

**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): October 18, 2023

BEAM THERAPEUTICS INC.

(Exact name of registrant as specified in its charter)

Delaware
(State or other jurisdiction
of incorporation)

001-39208
(Commission
File Number)

81-5238376
(IRS Employer
Identification No.)

238 Main Street
Cambridge, MA
(Address of principal executive offices)

02142
(Zip Code)

(Registrant's telephone number, including area code): (857) 327-8775

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 (see General Instruction A.2. below):

- 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
Common Stock, par value \$0.01 per share	BEAM	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 (§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

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 13(a) of the Exchange Act.

Item 2.05. Costs Associated with Exit or Disposal Activities.

On October 18, 2023, the board of directors of Beam Therapeutics Inc. (the "Company") approved a portfolio prioritization and strategic restructuring of the Company to streamline its operations. The Company intends to prioritize development of its *ex vivo* and *in vivo* sickle cell disease programs, including BEAM-101, its Engineered Stem Cell Antibody Paired Evasion (ESCAPE) conditioning strategy, and *in vivo* delivery to hematopoietic stem cells program, as well as its *in vivo* base editor BEAM-302 in development for the treatment of alpha-1 antitrypsin deficiency. The Company also intends to explore partnership opportunities for continued development of select programs, including BEAM-201 and other potential *ex vivo* CAR-T therapies.

In connection with this portfolio prioritization and strategic restructuring, the Company expects to reduce its employee headcount by approximately 100 positions, or about 20% of its workforce. The Company expects to incur one-time costs of approximately \$6.6 million in the fourth quarter of 2023 in connection with the workforce reduction. These costs consist primarily of cash expenditures related to severance payments. The Company estimates that the workforce reduction will be substantially completed in the fourth quarter of 2023. The estimate of costs that the Company expects to incur and the timing thereof are subject to a number of assumptions and actual results may differ. The Company may also incur additional costs not currently contemplated due to events that may occur as a result of, or that are associated with, the actions described above.

Item 7.01. Regulation FD Disclosure.

On October 18, 2023, the Company updated its corporate presentation that it intends to use in connection with presentations at conferences and meetings. The slides from the Company's corporate presentation are furnished as Exhibit 99.1 to this Current Report on Form 8-K and are incorporated herein by reference.

The information in this Item 7.01 (including Exhibit 99.1 attached hereto) is being furnished and shall not be deemed "filed" for purposes of Section 18 of the Securities Exchange Act of 1934, as amended (the "Exchange Act") or otherwise subject to the liabilities of that section, nor shall it be deemed incorporated by reference into any filing under the Securities Act of 1933, as amended, or the Exchange Act, except as expressly set forth by specific reference in such filing.

Item 8.01. Other Events.

On October 19, 2023, the Company issued a press release announcing the portfolio prioritization and strategic restructuring. The full text of the press release is filed as Exhibit 99.2 to this Current Report on Form 8-K and is incorporated herein by reference.

Item 9.01. Financial Statements and Exhibits.

(d) Exhibits

<u>Exhibit No.</u>	<u>Description</u>
99.1	Beam Therapeutics Inc. Corporate Presentation
99.2	Press Release Issued by Beam Therapeutics Inc. on October 19, 2023.
104	Cover Page Interactive Data File (embedded within the Inline XBRL Document).

Cautionary Note Regarding Forward-Looking Statements

This Current Report on Form 8-K and the attached press release contain forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995. Investors are cautioned not to place undue reliance on these forward-looking statements, including, but not limited to, statements related to: the Company's pre-clinical and clinical development plans and timing expectations; expectations related to the cost and timing of the Company's portfolio prioritization and strategic restructuring; the Company's expected cash runway, including the potential impact of the portfolio prioritization and strategic restructuring on the Company's expected cash runway; the potential impact of the portfolio prioritization and strategic restructuring on the Company's operations and development timelines; the therapeutic applications and potential of the Company's technology; the Company's plans, and anticipated timing, to advance its clinical trials and programs; the Company's ability to seek, establish and maintain a collaboration or partnership to develop its programs with a collaborator or partner; and the Company's ability to develop life-long, curative, precision genetic medicines for patients through base editing. Each forward-looking statement is subject to important risks and uncertainties that could cause actual results to differ materially from those expressed or implied in such statement, including, without limitation, risks and uncertainties related to: risks related to the Company's ability to successfully achieve the benefits of the portfolio prioritization and strategic restructuring; the Company's ability to develop, obtain regulatory approval for, and commercialize its product candidates, which may take longer or cost more than planned; the Company's ability to raise additional funding, which may not be available; the Company's ability to obtain, maintain and enforce patent and other intellectual property protection for its product candidates; the potential impact of pandemics and other health emergencies, including their impact on the global supply chain; the uncertainty that the Company's product candidates will receive regulatory approval necessary to initiate human clinical studies; that preclinical testing of the

Company's product candidates and preliminary or interim data from preclinical studies and clinical trials may not be predictive of the results or success of ongoing or later clinical trials; that initiation and enrollment of, and anticipated timing to advance, the Company's clinical trials may take longer than expected; that the Company's product candidates may experience manufacturing or supply interruptions or failures; risks related to competitive products; and the other risks and uncertainties identified under the headings "Risk Factors Summary" and "Risk Factors" in the Company's Annual Report on Form 10-K for the year ended December 31, 2022, the Company's Quarterly Report on Form 10-Q for the quarter ended June 30, 2023, and in any subsequent filings with the Securities and Exchange Commission. These forward-looking statements speak only as of the date of this Current Report on Form 8-K or the attached press release, as applicable. Factors or events that could cause the Company's actual results to differ may emerge from time to time, and it is not possible for the Company to predict all of them. The Company undertakes no obligation to update any forward-looking statement, whether as a result of new information, future developments or otherwise, except as may be required by applicable law.

SIGNATURES

Pursuant to the requirements of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned hereunto duly authorized.

BEAM THERAPEUTICS INC.

Date: October 19, 2023

By: /s/ John Evans

Name: John Evans

Title: Chief Executive Officer



Beam Therapeutics

PRECISION GENETIC MEDICINES THROUGH BASE EDITING

NASDAQ: BEAM

Cautionary note regarding forward-looking statements



This presentation contains forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995. Such forward-looking statements include statements regarding: the initiation, timing, progress and results of preclinical studies and research and development programs, including the initiation and progress of clinical trials, including our BEACON trial and our BEAM-201 trial; the advancement of our pipeline, including the advancement of BEAM-101, BEAM-201, BEAM-301, BEAM-302, and additional CAR-T and liver programs in multiple preclinical studies; our current expectations and anticipated results of operations, including our expected use of capital; the potential activities and benefits under license and collaboration agreements and the formation of new collaborations; and the therapeutic applications and potential of our technology, including our potential to develop life-long, curative, precision genetic medicines for patients through base editing, including potential safety advantages, all of which are subject to known and unknown important risks, uncertainties and other factors that may cause our actual results, performance or achievements, market trends, or industry results to differ materially from those expressed or implied by such forward-looking statements. Therefore, any statements contained herein that are not statements of historical fact may be forward-looking statements and should be evaluated as such. Without limiting the foregoing, the words "anticipate," "expect," "suggest," "plan," "vision," "believe," "intend," "project," "forecast," "estimates," "targets," "projections," "potential," "should," "could," "would," "may," "might," "will," and the negative thereof and similar words and expressions are intended to identify forward-looking statements.

Each forward-looking statement is subject to important risks and uncertainties that could cause actual results to differ materially from those expressed or implied in such statement, including, without limitation, risks and uncertainties related to: our ability to develop, obtain regulatory approval for, and commercialize our product candidates, which may take longer or cost more than planned; our ability to raise additional funding, which may not be available; our ability to obtain, maintain and enforce patent and other intellectual property protection for our product candidates; the potential impact of pandemics and other health emergencies, including their impact on the global supply chain; that preclinical testing of our product candidates and preliminary or interim data from preclinical studies and clinical trials may not be predictive of the results or success of ongoing or later clinical trials; that initiation and enrollment of our clinical trials may take longer than expected; that our product candidates may experience manufacturing or supply interruptions or failures; risks related to competitive products; and the other risks and uncertainties identified under the headings "Risk Factors Summary" and "Risk Factors" and elsewhere in our annual report on Form 10-K for the year ended December 31, 2022, our Quarterly Report on Form 10-Q for the quarter ended March 31, 2023, our Quarterly Report on Form 10-Q for the quarter ended June 30, 2023, and in any subsequent filings with the Securities and Exchange Commission (the "SEC") which are available on the SEC's website at www.sec.gov. Additional information will be made available by our annual and quarterly reports and other filings that we make from time to time with the SEC. These forward-looking statements speak only as of the date of this presentation. Factors or events that could cause our actual results to differ may emerge from time to time, and it is not possible for us to predict all of them. We undertake no obligation to update any forward-looking statement, whether as a result of new information, future developments or otherwise, except as may be required by applicable law.

Our vision is to provide life-long cures for patients suffering from serious diseases

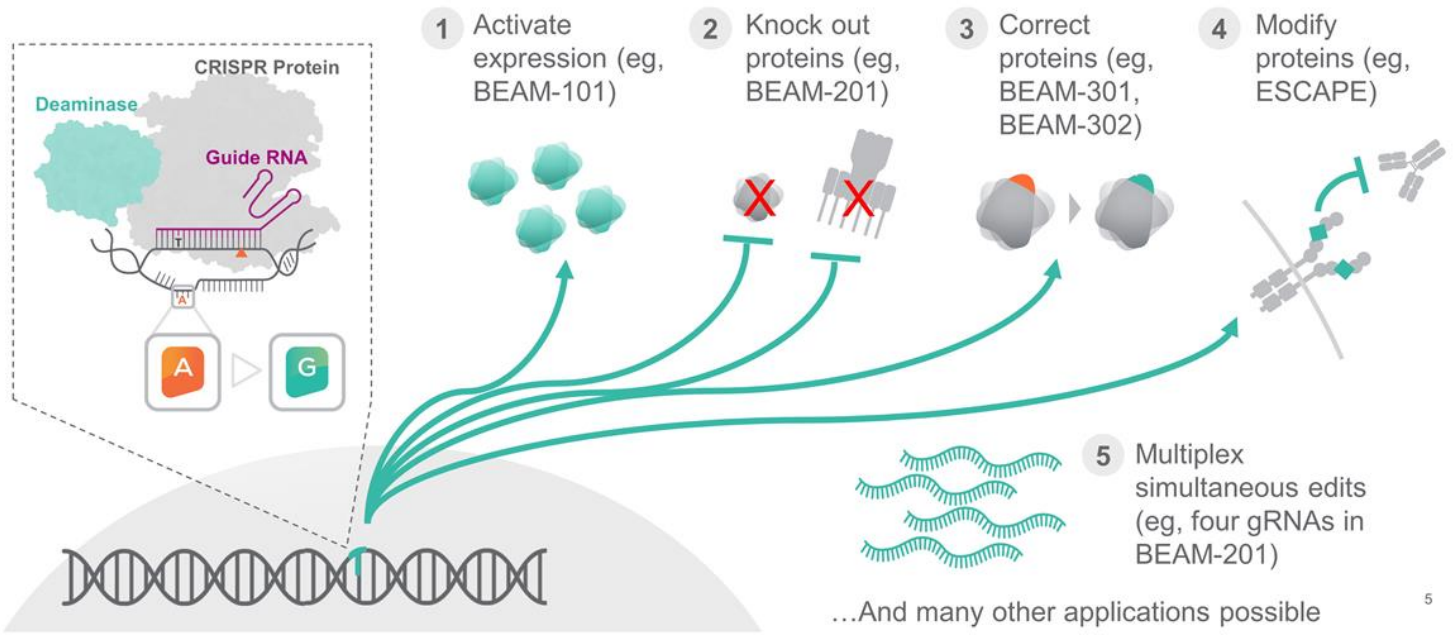
- ▶ Potential for **one-time, curative therapies**
- ▶ Gene editing for **rare and common diseases**
- ▶ Platform for **rapidly-programmable precision medicines**

Base editing is a differentiated, potentially best-in-class gene editing technology

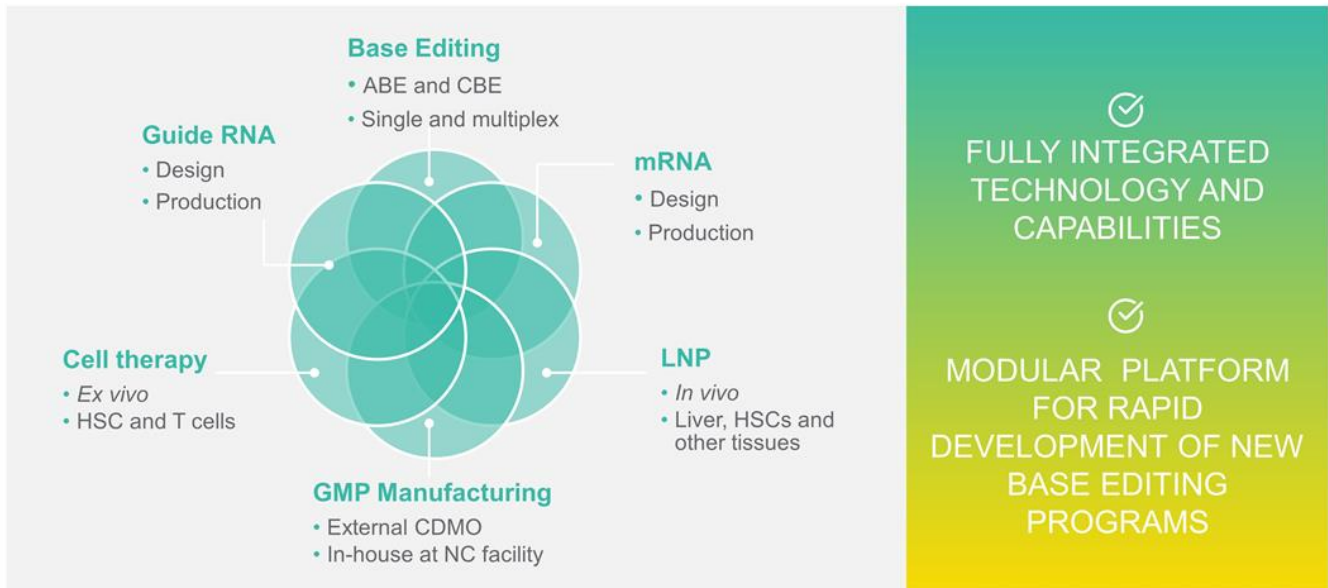


Precise targeting?	Yes (guide RNA or ZF/TALE)	Yes (guide RNA)
Durability of edit?	Permanent	Permanent
Double strand breaks?	Yes	No
Applications?	Primarily knockout	Correct, modify, activate, multiplex
Editing predictability	Random insertions and deletions 100s of uncharacterized edits	Single base edits All edits fully characterized
Efficiency of precise edit?	Low – dividing cells only	High – any cell type

A precise gene editing technology with highly versatile applications



We are establishing a leading fully integrated platform for precision genetic medicines



Beam's portfolio strategy creates broad potential for wholly-owned programs and partnership opportunities

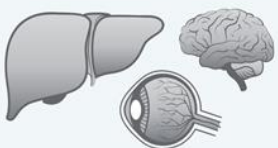


HEMATOLOGY



Near term: BEAM-101
Future platforms: ESCAPE for conditioning
In vivo delivery

GENETIC DISEASES



BEAM-301, BEAM-302
Multiple new liver targets
LNP for liver and beyond

IMMUNOLOGY-ONCOLOGY



BEAM-201
Next-generation allogeneic platform (4-6+ edits)

- ▶ **Lead programs:** Potentially de-risk technology, generate revenue, benefit patients with unmet need
- ▶ **Future platforms:** Expand addressable patient populations to create valuable, differentiated franchises
- ▶ **Business strategy:** Pursue both internal development of priority assets and external partnerships

ESCAPE: Engineered Stem Cell Antibody Paired Evasion

Advancing a diversified pipeline into the clinic



PROGRAM / DISEASE		DELIVERY	EDITING APPROACH	RESEARCH	LEAD OPTIMIZATION	IND ENABLING	PHASE I/II	PIVOTAL
BEAM-101	Sickle Cell Disease Beta Thalassemia	<i>Ex vivo</i> HSCs	Activation of fetal hemoglobin					
ESCAPE	Sickle Cell Disease Beta Thalassemia	<i>Ex vivo</i> HSCs	Multiplex CD117 edit-antibody pair					
BEAM-302	Alpha-1 Antitrypsin Deficiency	<i>In vivo</i> LNP	Correction of E342K mutation					
BEAM-301	Glycogen Storage Disease Ia	<i>In vivo</i> LNP	Correction of R83C mutation					
BEAM-201	T-ALL / T-LL CD7+ AML	<i>Ex vivo</i> T cells	Multiplex silenced CD7 CAR-T					
Complement Pathway (Apellis)		<i>In vivo</i> LNP	Undisclosed					
3 undisclosed targets (Pfizer)		<i>In vivo</i> LNP	Undisclosed					

LNP = Lipid Nanoparticle; HSC = Hematopoietic Stem Cell; T-ALL / T-LL = T-Cell Acute Lymphoblastic Leukemia / T-Cell Lymphoblastic Lymphoma; AML = Acute Myeloid Leukemia; ESCAPE: Engineered Stem Cell Antibody Paired Evasion

Key progress and anticipated milestones

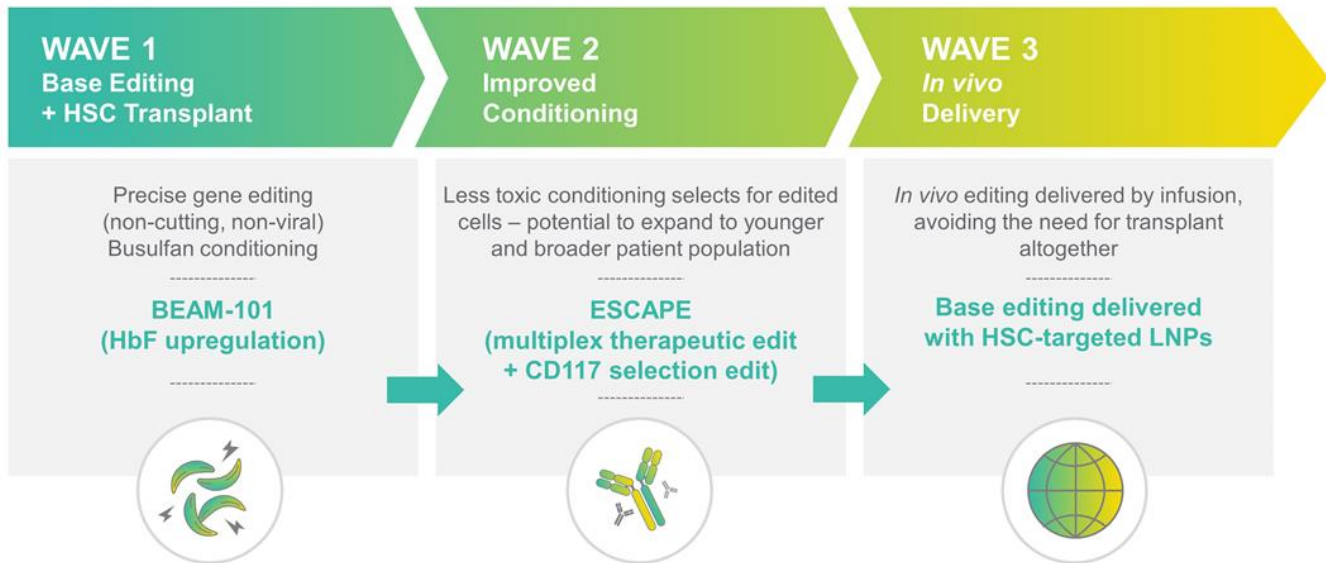
2023 ACHIEVEMENTS

- ✓ Complete **BEACON** sentinel cohort enrollment and initiate enrollment of expansion cohort in 2023
- ✓ Dose first patient in the **BEAM-201 study**
- ✓ Initiate preclinical studies for **BEAM-301** and **BEAM-302**
- NC manufacturing site **GMP operational** in late 2023

2024 UPCOMING MILESTONES

- Data presentation on multiple patients from **BEACON** in 2024
- Regulatory filing for **BEAM-302** in Q1 2024
- Regulatory filing for **BEAM-301** in 1H 2024
- Data presentation of first cohort from **BEAM-201** study by year-end

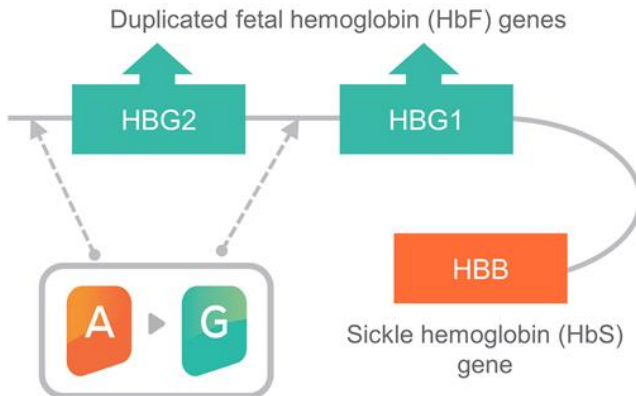
Well positioned to deliver potentially best-in-class regimens for SCD patients, now and in the future



* ESCAPE: Engineered Stem Cell Antibody Paired Evasion

BEAM-101: Designed to treat sickle cell disease with a potentially one-time, direct, non-cutting activation of HbF

Sickle Cell Disease: 100,000 patients in the US; severe pain crises, multi-organ damage, early mortality



A single base editor + gRNA edits regulatory element of both fetal hemoglobin genes, without cutting DNA

HPFH = Hereditary Persistence of Fetal Hemoglobin

Designed for best-in-class profile:

- ▶ **One-time therapy with potential for highest** fetal hemoglobin (HbF) induction
- ▶ **Direct editing** of HbF genes to turn them on
- ▶ **Potential for greatest reduction of disease-causing HbS** due to hemoglobin switching
- ▶ **Non-viral:** No detectable random insertion
- ▶ **Non-cutting:** Lower risk for genotoxic stress and chromosomal abnormalities

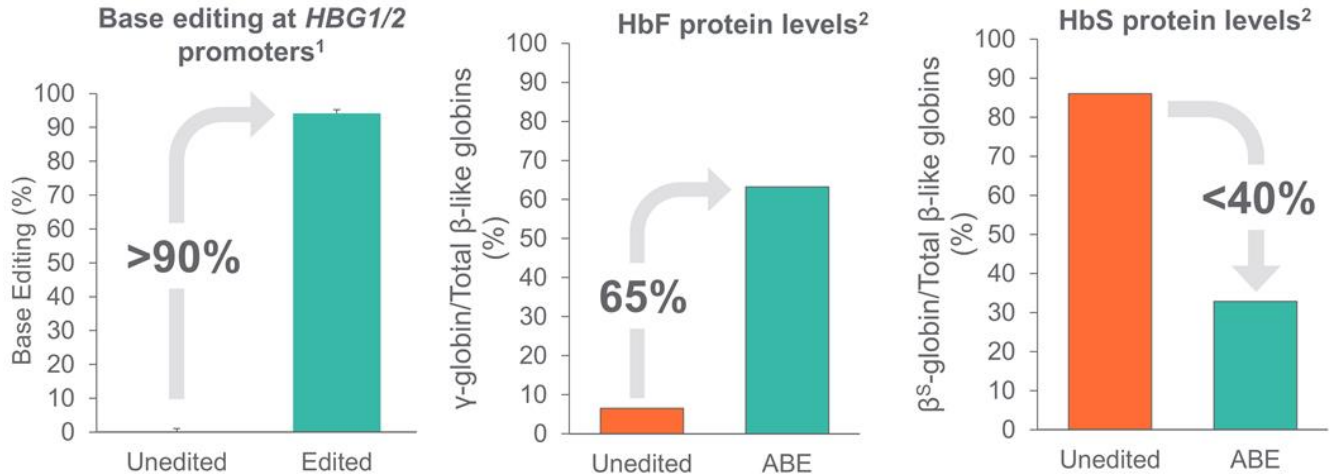
Investment in patient delivery to differentiate:

- ▶ **Wholly owned manufacturing:** control over quality and connection to patient services
- ▶ **Investment in patient services:** optimizing patient experience

Potentially best-in-class attributes of BEAM-101 product



Edited human CD34+ cells followed by 16 week engraftment in mice



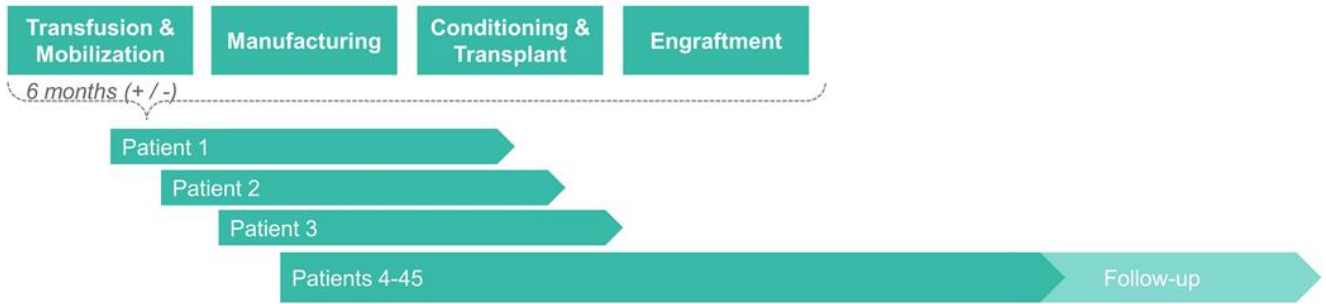
- ▶ Potential for highest HbF induction and lowest residual HbS levels versus other approaches in the field
- ▶ Building capabilities for potential best-in-class patient delivery including internal manufacturing

Preclinical data presented at ASGCT 2020; Edited human HSPCs analyzed 16 weeks after infusion in NBSGW mice (Mean±SEM, n=4-6); 1. Sorted human Lineage-CD34+ bulk bone marrow; 2. Sorted erythroid cells (GlyA+)

BEAM-101 is the first clinical base editing program in the U.S., accelerating path to patients and the market



BEACON-101 Phase 1/2 Study Design



Select inclusion criteria

- ▶ Patients with sickle cell disease (SCD) with severe vaso-occlusive crises despite hydroxyurea or other supportive measures
- ▶ Age ≥ 18 to ≤ 35 years for initial cohort

Select safety endpoints

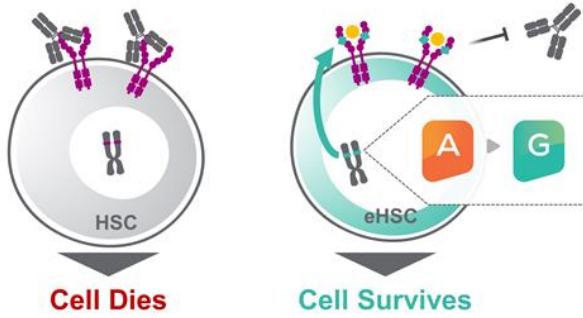
- ▶ Proportion of patients with successful neutrophil engraftment by day 42
- ▶ Safety and tolerability assessments

Select efficacy endpoints

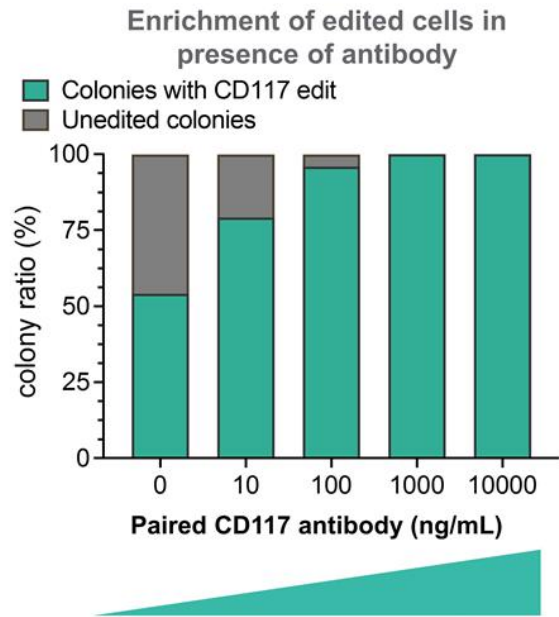
- ▶ Severe vaso-occlusive crises
- ▶ Transfusion requirements
- ▶ Hemoglobin F levels
- ▶ Quality of life and ability to function
- ▶ Red blood cell function and organ damage

ESCAPE* designed for selective depletion of diseased cells, which may enable non-genotoxic conditioning

- ▶ Stem cell factor (SCF) signaling via CD117 is required for HSC survival and proliferation
- ▶ A single base edit changes an epitope on the CD117 receptor and is designed not to impact HSC biology
- ▶ Customized conditioning antibody depletes diseased unedited cells, but enables CD117-edited cells to “ESCAPE” and grow normally

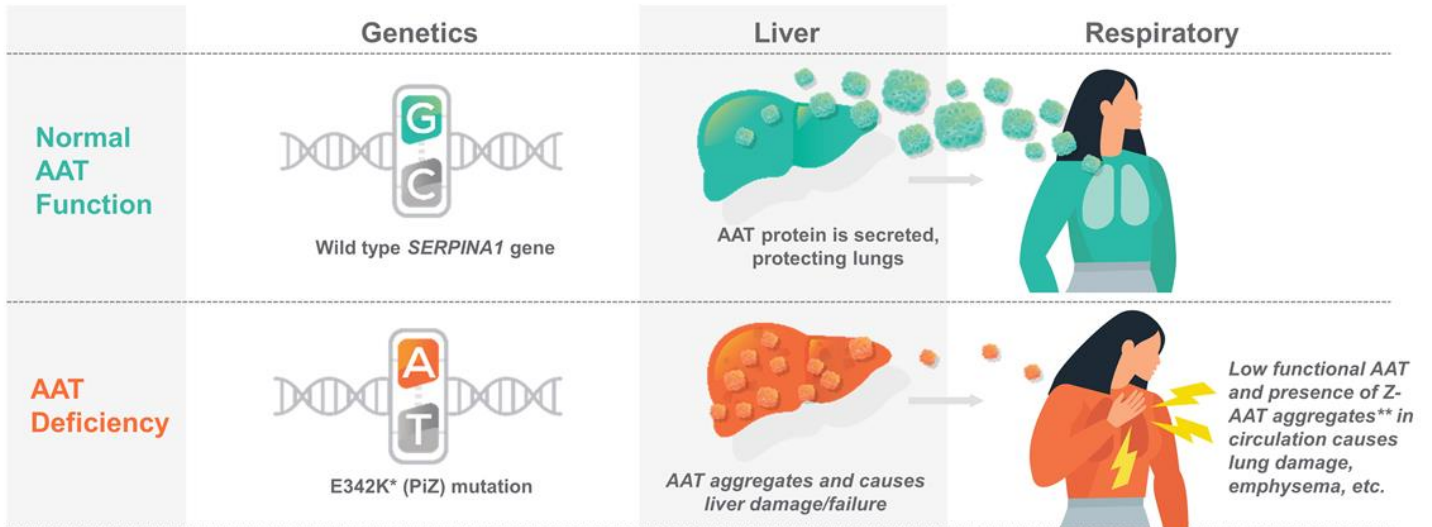


* ESCAPE: Engineered Stem Cell Antibody Paired Evasion



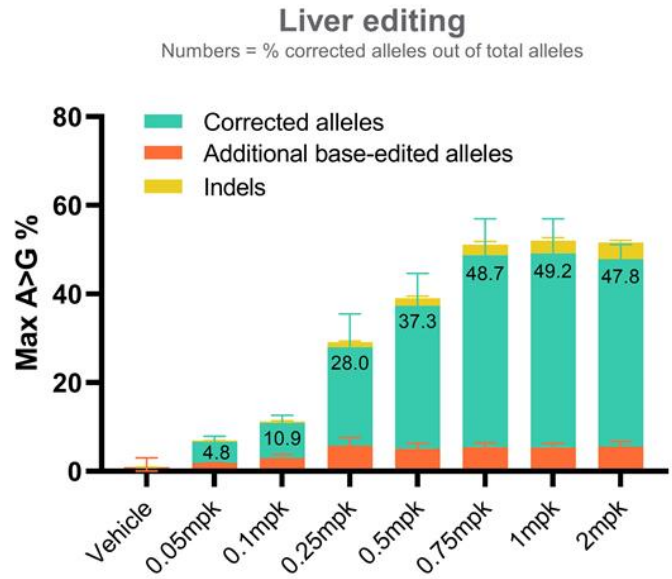
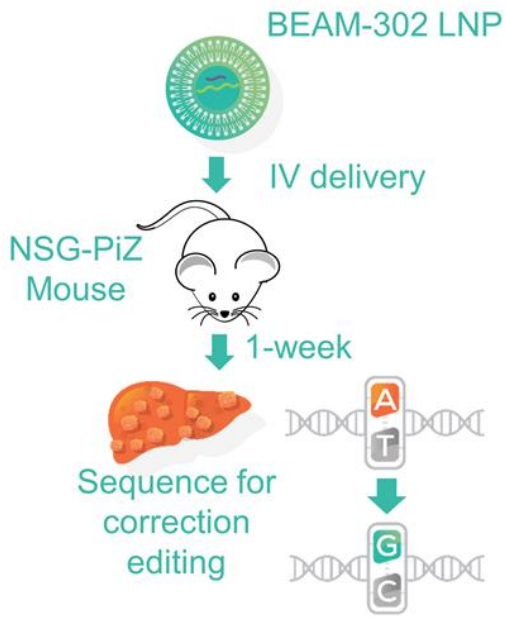
BEAM-302: A potential one-time treatment of AATD with potential to correct liver and lung disease

Alpha-1 Anti-trypsin Deficiency (AATD): 60,000 ZZ patients in US; severe progressive lung & liver disease



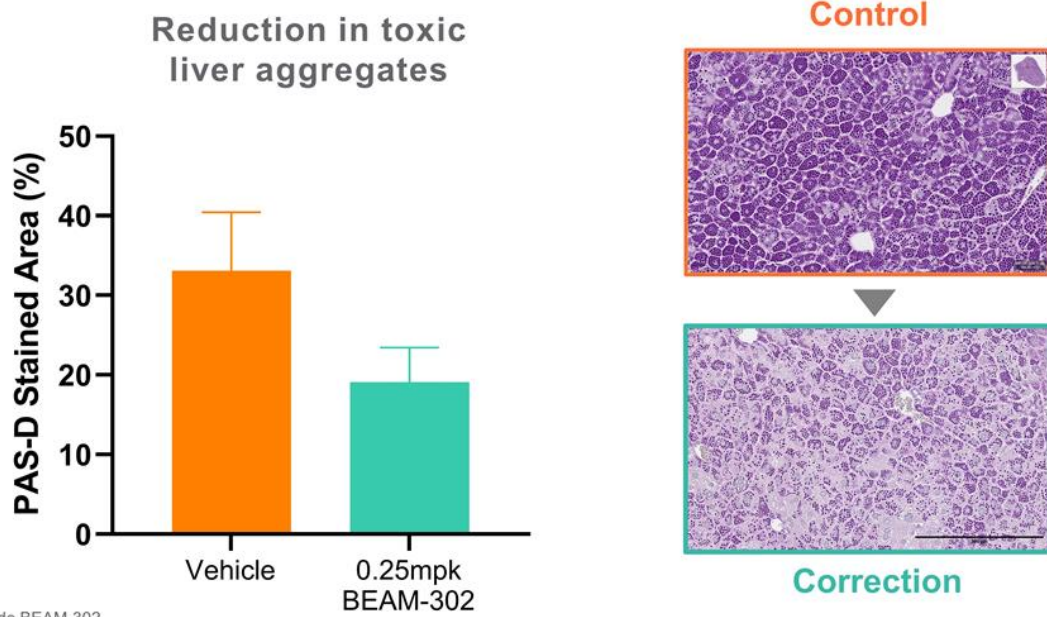
* Also referred to as E366K (includes the signal peptide subject to post-translational cleavage)
** Aggregates also referred to as polymers

In vivo correction of the causative AATD “PiZ” point mutation in mice with BEAM-302



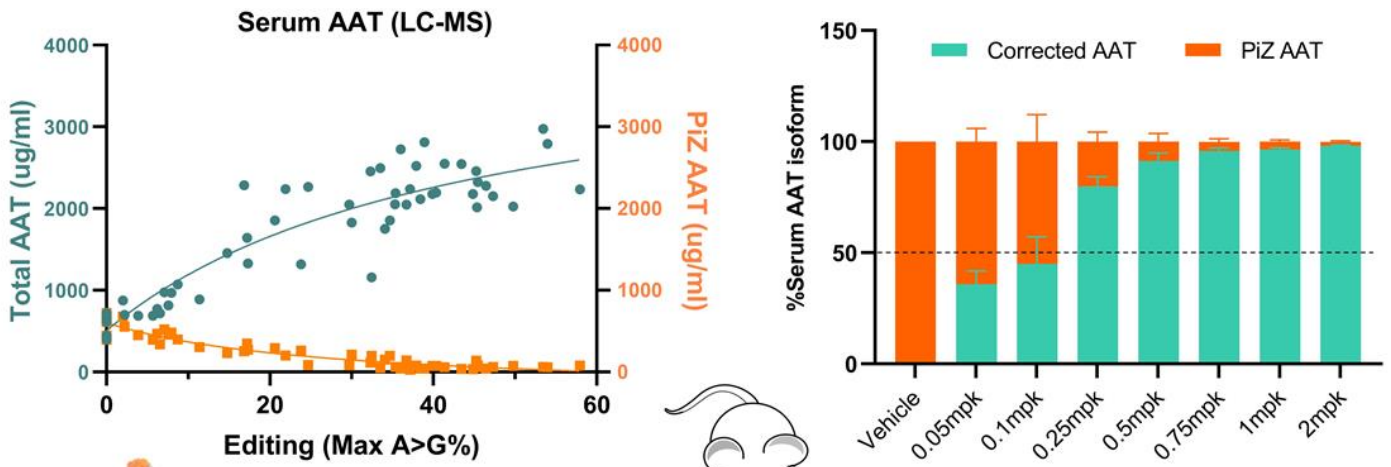
Corrected alleles include WT correction and WT correction plus D341G bystander edit – both proteins observed to function and secrete normally

Correction of PiZ mutation in mice with BEAM-302* decreased liver aggregates



* Research grade BEAM-302

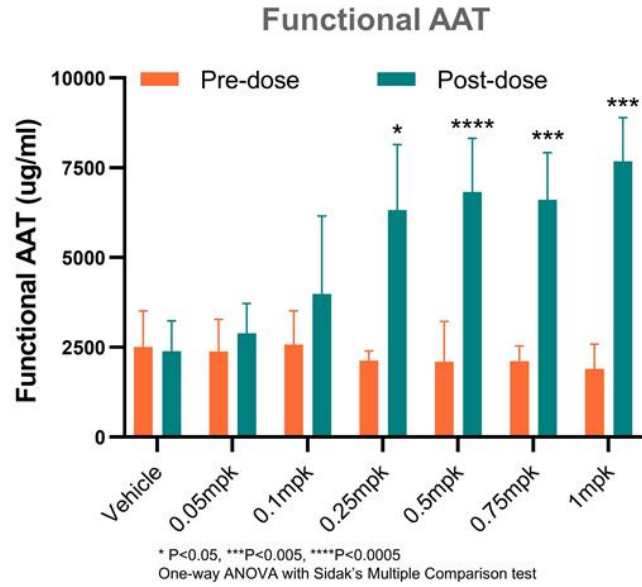
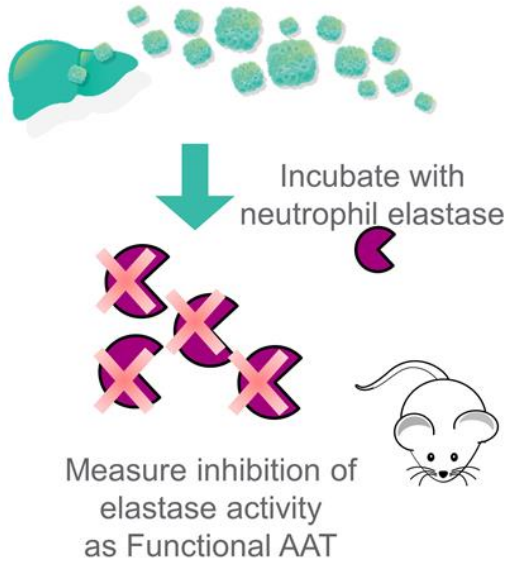
AATD mice dosed with BEAM-302 had **decreased serum PiZ AAT** and **increased corrected AAT**



Measured secreted AAT in blood 1-week post-dose

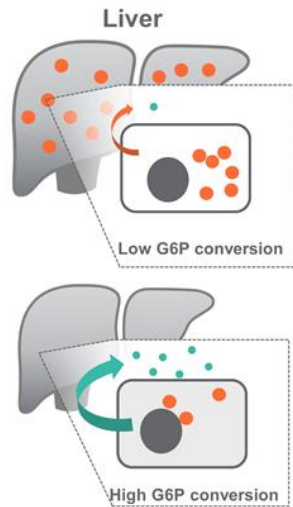
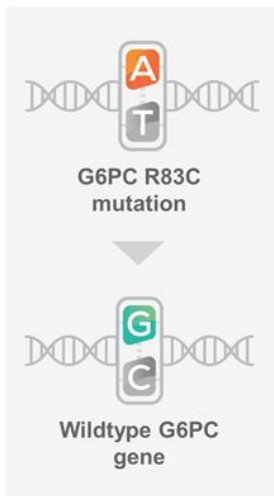
Increased serum AAT in mice after BEAM-302 dosing corresponded to increased functional AAT

Collect serum from dosed NSG-PiZ mice



BEAM-301 program aims to restore impaired glycogen metabolism which otherwise causes significant morbidity

Glycogen Storage Disease Ia: 900 US R83C patients; severe hypoglycemia, liver & kidney dysfunction



GSD1a unmet need:

- ▶ Low G6PC activity can result in severe drop in blood glucose levels within 1-3 hrs
- ▶ Hypoglycemia may result in seizures or can be lethal
- ▶ Multiple organ dysfunction (e.g. renal and liver)

BEAM-301 potential:

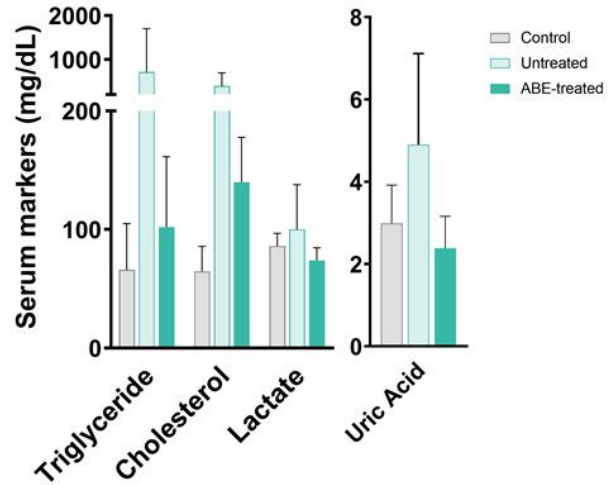
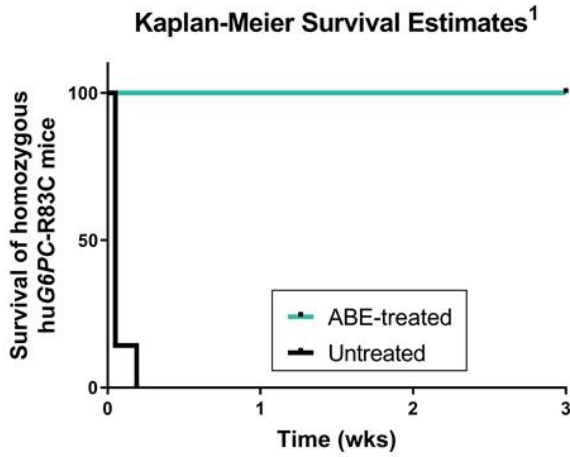
- ▶ Near-normal serum metabolites, G6PC activity, hepatic morphology, increased survival in mice
- ▶ Animal studies suggest 11% editing sufficient for restoring fasting glucose¹

Key points:

- ▶ Beam's first *in vivo* DC
- ▶ First DC in industry with *in vivo* direct correction gene editing²
- ▶ U.S. regulatory filing expected in 1H 2024

1. Chou & Mansfield. 2007. Curr. Gen. Ther.
2. Based on publicly announced development candidates

BEAM-301 program aims to restore impaired glycogen metabolism which otherwise causes significant morbidity

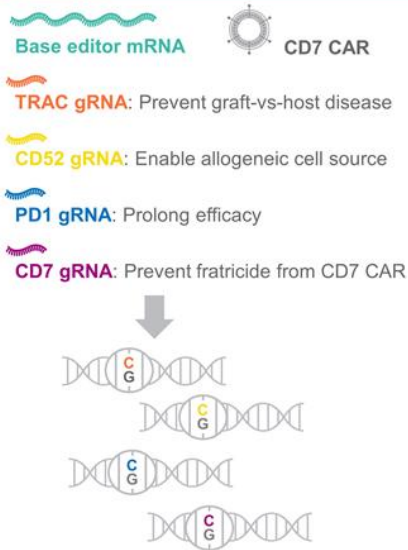


- ▶ ABE correction of GSDIa R83C mutation associated with improved survival of R83C mice
- ▶ Near-normal serum metabolites, G6PC activity, hepatic morphology and lipid deposition

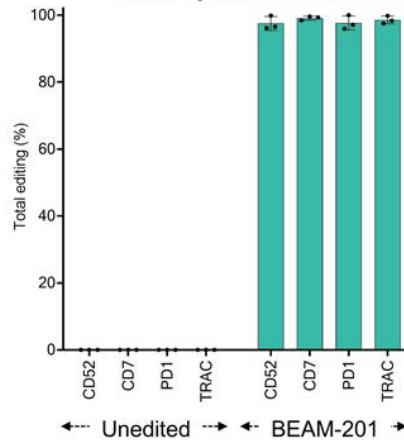
Preclinical data presented at ESGCT 2021 1. Homozygous huG6PC-R83C mice untreated or treated with LNP via temporal vein shortly after birth, and untreated mice survived less than 3 days with glucose therapy

BEAM-201: Base edited allogeneic cell therapy candidate with an opportunity to treat aggressive CD7+ leukemias

T-Cell Acute Leukemia: 15% of ALL, not treated by B-cell CARTs, few options for relapsed/refractory patients



Clinical-scale process yielded 96-99% editing, >90% quad edited¹

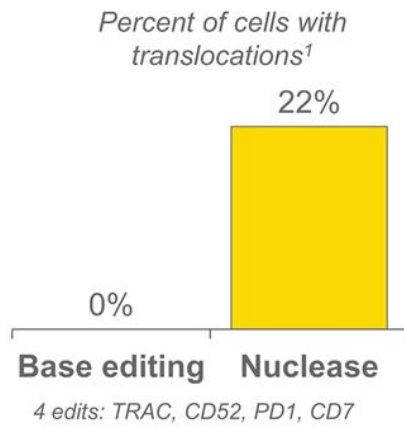


- ▶ **Multiplex base editing:** Unlike nuclease editors, no detected chromosomal rearrangements, normal cell expansion, and no detected DNA damage response in preclinical studies
- ▶ **Clinical-scale process:** 96-99% editing, >90% quad edited¹
- ▶ **BEAM-201 first patient dosed in August 2023**

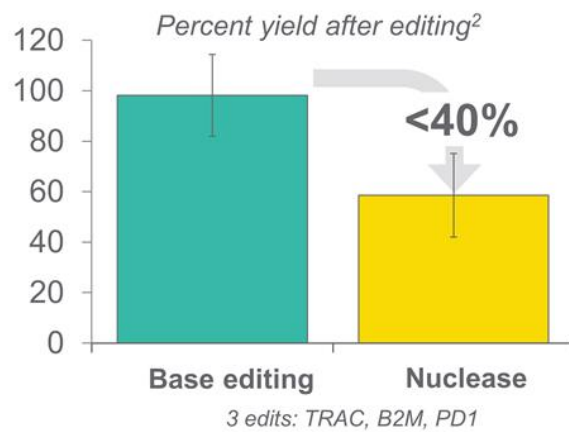
Preclinical data presented at SITC 2020; 1. Simultaneous base editing at four target loci using clinical-scale process as measured by NGS.

BEAM-201: Significant advantages of multiplex base editing without double strand breaks

Chromosomal rearrangements



Impact on cell expansion



- ▶ Multiplex editing more efficient with base editing which translates to better cell product
- ▶ Optimization of platform ongoing with focus on generating next generation “true allogeneic” products

Preclinical data presented at SITC 2020; 1. Base editing versus nuclease editing with the same four guide RNAs measured via G-banded karyotypes from 100 cells; updated analysis shows <0.1% translocations using first generation CBE (data unpublished) 2. Extensive guide screen across three targets, with BE4 and spCas9 sgRNAs selected for high editing efficiency and expansion in single-plex test, final cell yields compared between 3 edits, normalized to electroporation only control

Additional strategic and innovator deals potentially unlock base editing value and broaden therapeutic impact



Strategic deals



- ▶ \$300M upfront, \$1B+ in potential milestones
- ▶ 3 gene targets using Beam's editing and delivery to target liver, muscle, CNS
- ▶ **Beam option at end of P1/2 for 35% WW cost/net profit split on one program**



- ▶ \$75M in upfront payments for base editing for complement mediated diseases
- ▶ **Beam opt-in to 50% of US rights after Phase 1 on one program**



- ▶ \$50M upfront for license to Cas12b nuclease for certain engineered cell therapies
- ▶ **Non-exclusive license – Beam retains ability to use or repartner Cas12b**

Innovator deals



- ▶ License to Beam's base editing technology for the prevention of cardiovascular disease
- ▶ 3 targets: PCSK9 (VERVE-101 and VERVE-102), ANGPTL3 (VERVE 201), Undisclosed #3
- ▶ **Beam opt-in after P1: 50% US (PCSK9 and ANGPTL3) or 35% of WW (Target 3) cost/profit**






































- ▶ Prime editing (PE) is a novel gene editing technology, complementary to base editing
- ▶ Beam provides delivery and CRISPR technology/know-how
- ▶ **Beam has exclusive rights to PE: Any transition edit (A-G, C-T) plus any edit for SCD**



- ▶ Next-gen RNA and delivery; Beam provides interim leadership and RNA/LNP capabilities
- ▶ **Beam has meaningful equity stake in Orbital**
- ▶ **Beam access to Orbital IP for gene editing (exclusive) and certain fields (non-exclusive)**

Meet the Beam Team



									
John Evans Chief Executive Officer	Giuseppe Ciaramella, PhD President, Chief Scientific Officer	Terry-Ann Burrell Chief Financial Officer	Amy Simon, MD Chief Medical Officer	Christine Bellon, PhD, JD Chief Legal Officer	Susan O'Connor Chief Human Resources Officer	Brian Riley Chief Manufacturing Officer	Manmohan Singh, PhD Chief Technology Officer	John Lo, PhD Chief Commercial Officer	Gopi Shanker, PhD. Chief Scientific Officer
									
									
									

Significant team track record in discovery, development, approval of first-in-class medicines

Thank you





Beam Therapeutics Announces Portfolio Prioritization and Strategic Restructuring Focused on Potential Near-term Value Drivers and Long-term Growth of Precision Genetic Medicines Pipeline

Highest priority programs – BEAM-101 and ESCAPE for sickle cell disease and BEAM-302 for alpha-1 antitrypsin deficiency – expected to provide foundation for meaningful value creation

Company to explore partnership opportunities for continued development of select programs

Anticipated cost savings, which includes an approximately 20% reduction in workforce, expected to extend the company's cash runway into 2026

CAMBRIDGE, Mass., October 19, 2023 - [Beam Therapeutics Inc.](#) (Nasdaq: BEAM), a biotechnology company developing precision genetic medicines through base editing, today announced portfolio priorities and plans to streamline its business operations to support potential near-term value drivers and long-term growth. This plan includes cost reduction initiatives that align with the company's near-term goals, and the anticipated cost savings are expected to extend its revised operating plan into 2026.

"From the beginning, Beam's strategy has been to develop base editing technology broadly across a diverse portfolio of programs and delivery modalities, and our science and pipeline continue to progress across the board. In this challenging market environment, however, we need to make the difficult decision to focus our resources on those clinical programs and research areas we believe have the highest potential for near-term value creation, while continuing to build a strong company for the future," said John Evans, chief executive officer of Beam. "We are grateful for the dedication and innumerable contributions of our impacted colleagues. We understand the challenge this presents for them and are fully committed to supporting them throughout this process."

"Base editing represents a potentially best-in-class gene editing technology designed to provide differentiated benefits for patients, as exemplified by our sickle cell disease and alpha-1 antitrypsin deficiency development programs," continued Mr. Evans. "Looking ahead, while our pipeline and research efforts will be more streamlined, we expect to continue our track record of generating innovative new base editing programs and creative partnership opportunities. We are steadfast in our mission to bring new precision genetic medicines to patients suffering from serious diseases."

Beam outlined the following key strategic decisions for its portfolio of pipeline programs:

- Prioritize development of its *ex vivo* and *in vivo* sickle cell disease programs, including BEAM-101, its Engineered Stem Cell Antibody Paired Evasion (ESCAPE) non-genotoxic conditioning strategy, and *in vivo* delivery to hematopoietic stem cells (HSCs).
- Prioritize development of its *in vivo* base editor BEAM-302 for the treatment of alpha-1 antitrypsin deficiency (AATD).

- Conduct an initial BEAM-301 clinical trial for the treatment of glycogen storage disease 1a (GSD1a) at a select number of sites in the United States.
- Generate a focused clinical dataset for BEAM-201 for the treatment of T-ALL and seek potential partnership for this and other potential *ex vivo* CAR-T programs, including Beam's ongoing research into creating next-generation allogeneic cell therapies with multiplex base editing.
- Focus near-term research and platform investments on specific applications leveraging Beam's *in vivo* editing capabilities in the liver targeting both rare genetic and common disorders, as well as select opportunities in hematology and immunology/oncology. The company's hepatitis B virus program will be paused and designated for partnering given the requirement of specialized development and commercial capabilities.

In alignment with its portfolio prioritization, Beam intends to undertake efforts to streamline its operational expenses and increase efficiencies:

- Beam plans a reduction in headcount of approximately 100 employees, about 20% of its current workforce, which is anticipated to be completed in the fourth quarter of 2023.
 - Related to the workforce reduction, Beam expects to incur one-time costs of approximately \$6.6 million, of which nearly all are cash expenditures related to severance and are anticipated to be incurred in the fourth quarter of 2023.
- The combination of these anticipated cost savings, and the company's balance of cash, cash equivalents and investment securities of \$1.1 billion as of June 30, 2023, are now expected to fund its revised operating plan into 2026.

About Beam Therapeutics

Beam Therapeutics (Nasdaq: BEAM) is a biotechnology company committed to establishing the leading, fully integrated platform for precision genetic medicines. To achieve this vision, Beam has assembled a platform that includes a suite of gene editing and delivery technologies and is in the process of building internal manufacturing capabilities. Beam's suite of gene editing technologies is anchored by base editing, a proprietary technology that is designed to enable precise, predictable and efficient single base changes, at targeted genomic sequences, without making double-stranded breaks in the DNA. This has the potential to enable a wide range of potential therapeutic editing strategies that Beam is using to advance a diversified portfolio of base editing programs. Beam is a values-driven organization committed to its people, cutting-edge science, and a vision of providing life-long cures to patients suffering from serious diseases.

Cautionary Note Regarding Forward-Looking Statements

This press release contains forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995. Investors are cautioned not to place undue reliance on these forward-looking statements, including, but not limited to, statements related to: our pre-clinical and clinical development plans and timing expectations; expectations related to the cost and timing of our portfolio prioritization and strategic restructuring; our expected cash runway, including the potential impact of the portfolio prioritization and strategic restructuring on our expected cash runway; the potential impact of the portfolio prioritization and strategic restructuring on our operations and development timelines; the therapeutic applications and



potential of our technology; our plans, and anticipated timing, to advance our clinical trials and programs; our ability to seek, establish and maintain a collaboration or partnership to develop our programs with a collaborator or partner; and our ability to develop life-long, curative, precision genetic medicines for patients through base editing. Each forward-looking statement is subject to important risks and uncertainties that could cause actual results to differ materially from those expressed or implied in such statement, including, without limitation, risks and uncertainties related to: risks related to our ability to successfully achieve the benefits of the portfolio prioritization and strategic restructuring; our ability to develop, obtain regulatory approval for, and commercialize our product candidates, which may take longer or cost more than planned; our ability to raise additional funding, which may not be available; our ability to obtain, maintain and enforce patent and other intellectual property protection for our product candidates; the potential impact of pandemics and other health emergencies, including their impact on the global supply chain; the uncertainty that our product candidates will receive regulatory approval necessary to initiate human clinical studies; that preclinical testing of our product candidates and preliminary or interim data from preclinical studies and clinical trials may not be predictive of the results or success of ongoing or later clinical trials; that initiation and enrollment of, and anticipated timing to advance, our clinical trials may take longer than expected; that our product candidates may experience manufacturing or supply interruptions or failures; risks related to competitive products; and the other risks and uncertainties identified under the headings "Risk Factors Summary" and "Risk Factors" in our Annual Report on Form 10-K for the year ended December 31, 2022, our Quarterly Report on Form 10-Q for the quarter ended June 30, 2023, and in any subsequent filings with the Securities and Exchange Commission. These forward-looking statements speak only as of the date of this press release. Factors or events that could cause our actual results to differ may emerge from time to time, and it is not possible for us to predict all of them. We undertake no obligation to update any forward-looking statement, whether as a result of new information, future developments or otherwise, except as may be required by applicable law.

Contacts:

Investors:

Chelcie Lister
THRUST Strategic Communications
chelcie@thrustsc.com

Media:

Dan Budwick
1AB
dan@1abmedia.com