



## FOR IMMEDIATE RELEASE

### **Tome Biosciences Launches with Over \$200 Million in Funding to Advance Programmable Genomic Integration Platform**

- Technology, in-licensed from the Massachusetts Institute of Technology (MIT), capable of inserting DNA sequences of any size into any programmed genomic location
- Potential to create curative cell and integrative gene therapies
- Backed by leading biotech investors Andreessen Horowitz, ARCH, GV, Longwood, Polaris and others

**Watertown, MA, December 12, 2023** – [Tome Biosciences](#), Inc., the programmable genomic integration company, has launched to usher in a new era of genomic medicines based on programmable genomic integration (PGI). PGI enables the insertion of any DNA sequence, of any size, into any programmed genomic location. The Company has raised \$213 million in Series A and B funding from investors: Andreessen Horowitz (a16z) Bio + Health, ARCH Venture Partners, GV, Longwood Fund, Polaris Partners, Bruker Corporation, FUJIFILM Corporation, Alexandria Venture Investments and others.

“PGI represents the maturation of editing technologies, breaking current barriers in genomic medicines discovery,” said Rahul Kakkar, MD, President and Chief Executive Officer. “PGI is revolutionary in that we can finally reprogram the human genome with an elegance and efficiency previously unimaginable. For patients with rare monogenic diseases, PGI allows for potentially curative treatments with a single drug per disease regardless of genetic heterogeneity, and for patients with more common disorders, PGI allows for the creation of cell therapies at the speed of biologics discovery with a complexity that enables the potential for broad use across human medicine.”

PGI combines the site-specificity of CRISPR/Cas9 with enzymes capable of inserting or writing sequences of DNA, including entire genes, without the need for double-strand DNA breaks. Tome’s most advanced PGI technology, called integrase-mediated PGI (I-PGI), utilizes proprietary integrases and is based on groundbreaking [PASTE technology](#) first discovered by Tome’s Co-Founders, Omar Abudayyeh, PhD, and Jonathan Gootenberg, PhD, while at MIT as investigators.

Just as a word processor is capable of pasting text anywhere in a document, I-PGI can insert large DNA sequences anywhere in the genome with unprecedented precision. Thus far, I-PGI has demonstrated insertions of more than 30kb of genetic code with site-specificity in multiple different dividing and non-dividing cell types, and can be multiplexed to enable complex cell engineering that will underpin the future development of cell therapies. Tome has an exclusive license to the core PASTE technology, which includes granted US patent numbers 11,572,556, 11,827,881 and 11,834,658.



“The ability to control where we insert DNA sequences is a game-changer. It means the field can now move away from random integration and utilize any natural promoter in the human genome, enabling us to orchestrate the tissue location, timing and amount of gene expression,” commented John Finn, PhD, Chief Scientific Officer.

The Company initially plans to develop integrative gene therapies for monogenic liver diseases and cell therapies for autoimmune diseases.

Dan Lynch, Chairman of the Board of Directors of Tome and Executive Venture Partner at GV added, “Tome has assembled a truly remarkable team to bring PGI to the many patients who could benefit from this technology. I have seen the incredible progress this team is capable of and look forward to working alongside them as we create new classes of breakthrough cell and integrative gene therapies.”

#### **Executive Team:**

- Rahul Kakkar, MD, President and Chief Executive Officer. Rahul has over a decade in pharma and biotech leadership, including CEO of Pandion Therapeutics (acquired by Merck for \$1.85B) and Founder, Chief Medical Officer and Chief Strategy Officer of Corvidia Therapeutics (acquired by Novo Nordisk for \$2.1B).
- Matt Barrows, Chief Technology Officer. Matt has over 20 years of senior leadership in CMC, including leading the manufacturing scale-up of Moderna’s COVID vaccine.
- John Finn, PhD, Chief Scientific Officer. John has over 20 years of gene therapy experience, with a focus on genome editing and delivery technologies. He was an early employee at Intellia Therapeutics where he led CRISPR/Cas9 editing for *in vivo* liver programs.
- Edward Freedman, JD, Chief Operating Officer. Edward has over 20 years of financial, legal and operational leadership expertise, including serving as the COO for Pandion Therapeutics (acquired by Merck for \$1.85B).
- Diane Wong, Chief, People & Culture. Diane has over 15 years of HR leadership experience from both entrepreneurial and established biopharmaceutical organizations, including serving as VP of Human Resources for Constellation Pharmaceuticals (acquired by MorphoSys for \$1.7B) and HR Business Partner at Novartis.

#### **Board of Directors:**

- Dan Lynch, GV (chair)
- Jorge Conde, a16z Bio + Health
- Alan Crane, Polaris
- Jay Markowitz, MD, ARCH Venture Partners
- Rahul Kakkar, MD, President and CEO
- Omar Abudayyeh, PhD, Co-Founder, Lead Investigator at Brigham and Women's Hospital; Jonathan Gootenberg, PhD, Co-Founder, Lead Investigator at Beth Israel Deaconess Medical Center

**About Tome**

Tome Biosciences, Inc., is the programmable genomic integration (PGI) company. Our technologies allow us to insert any genetic sequence of any size at any location in the genome with site-specific precision. We are writing the final chapter in genomic medicines, delivering cures to patients through cell and integrative gene therapies. Follow us on X @Tome\_Bio and on LinkedIn. [www.tome.bio](http://www.tome.bio).

PASTE™, PGI™, and I-PGI™ are brand names and technology of Tome Biosciences, Inc.

**Contacts:**

For media:

CG Life

[CGL.TomeBio@cglife.com](mailto:CGL.TomeBio@cglife.com)

For investors:

Michelle Avery, PhD, VP, Corporate Affairs

[investors@tome.bio](mailto:investors@tome.bio)