

## Market Data

### BullFrog AI Nasdaq: BFRG

Price	\$2.68
52-wk Range	\$1.43-8.35
Market Cap	\$21.2M
Shares Out.	7.9M
Float	5.2M
Revenue (ttm) <sup>1</sup>	\$70k
Cash (mrq) <sup>1</sup>	\$7.0M
Avg. Vol (90-day)	167,323

Price & share data as of July 17, 2024

<sup>1</sup> As of March 31, 2024

[bullfrogai.com](http://bullfrogai.com)



**Using AI to Precisely Identify  
the Molecular Drivers of Disease  
to Enable the Discovery of  
Novel Drug Targets and  
Accelerate the Development of  
Effective Therapies**

## Company Overview

BullFrog AI is revolutionizing drug development through the use of scientific machine learning and causal AI. A pioneering technology-enabled drug discovery company, BullFrog AI utilizes its ensemble of AI technologies, including its proprietary bfLEAP™ graph-based analytics platform, to precisely identify causal molecular drivers of disease, enabling the discovery of novel drug targets. BullFrog AI's advanced analytics platform transforms the drug discovery process by leveraging multimodal data sets to identify causal drivers of disease and defining the position of related proteins within biological networks. This enables a deeper understanding of the disease process and of the therapeutic potential of drug target candidates, thereby minimizing failure rates for new therapeutics. BullFrog AI's mission is to transform drug discovery and development, ultimately improving the lives of countless patients by delivering the therapies they need.

## Investment Highlights

### Exclusive Licensing Deals with Leading Research Institutions

- Preclinical phase siRNA obesity drug candidate; obesity market size expected to grow to \$77B by 2030
- Phase 2 ready Mebendazole formulation along with preclinical stage novel **Mebendazole prodrug** for glioblastoma and additional oncology indications; glioblastoma market size was \$2.1 billion in 2020, expected to grow at 8.8% CAGR between 2021-2028
- Exclusive partnership with the Lieber Institute provides exclusive access to brain data and a strong competitive edge in targeting companies focused on the development of drugs targeting central nervous system disorders; CNS therapeutics market ~\$117 billion in 2022 and expected to surpass \$140 billion in 2026
  - Multiple novel drug targets already identified and early results demonstrated biological stratification of brain expression data, offering potentially unprecedented insights into psychiatric conditions
- Discovery phase oncolytic virus program with J Craig Venter Institute

### Proprietary bfLEAP™ AI Platform

- Ensemble of proprietary AI/ML technologies and processes
- Unsupervised AI/ML platform has ability to make predictions with incomplete data and reveal meaningful insights without pre-existing hypotheses
- Proprietary clustering algorithms find non-linear, multi-variate relationships in large, highly complex data sets
- Components of bfLEAP™'s algorithm suite selected as finalist for the R&D 100 Awards

### Lieber Institute for Brain Development Collaboration

- Partnership has allowed BullFrog AI to analyze comprehensive genomic and phenotypic data from post-mortem human brains using bfLEAP™ and causal AI, leading to the identification of novel molecular subtypes and potential therapeutic targets for neuropsychiatric disorders
- BullFrog AI has used this information to identify key genetic loci and gene expression markers that could guide the development of more effective drugs for Schizophrenia, Bipolar Disorder, and Major Depressive Disorder.

### Accomplished Leadership Team

- Vin Singh, Founder, Chairman & CEO; extensive knowledge in electrical and biomedical engineering. Former CEO of Next Healthcare Inc and co-founder of MaxCyte (Nasdaq: MXCT)
- Dr. Tom Chittenden, CSO; distinguished career at intersection of AI, machine learning, drug discovery, and biostatistics; previously President/CSO at BioAI Health, President/CTO at HiberCell, and President/CTO and Founding Director of the Genuity Artificial Intelligence Research Institute at Genuity Science

## Pipeline with Worldwide Exclusive Rights

*Demonstrated success advancing in-licensed assets*



## Value Proposition

BullFrog AI is revolutionizing the biopharma industry with its innovative bfLEAP™ platform, an AI-driven solution designed to enhance drug development success rates while reducing development time and costs. Recognized with awards such as Johns Hopkins APL Technology of the Year (2018) and R&D100 Award Finalist (2023), bfLEAP™ leverages over 250 analytical functions to provide unparalleled accuracy and efficiency in drug discovery and drug target identification. By incorporating causal AI, BullFrog AI precisely identifies the molecular drivers of diseases, enabling the discovery of novel drug targets and accelerating the development of effective therapeutics.

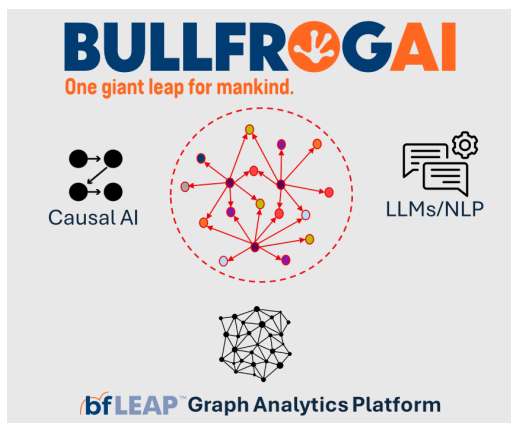
Exclusive partnerships with prestigious institutions like the Lieber Institute for Brain Development (LIBD) grant BullFrog AI access to disease-focused datasets that can be leveraged for drug target discovery. The LIBD collaboration has already identified novel drug targets for neuropsychiatric disorders, and early results demonstrate previously unknown biological stratification of brain expression data, offering potentially unprecedented insights into psychiatric conditions. These insights are poised to drive innovation in CNS therapeutics, a market projected to reach \$200 billion annually by 2028.

BullFrog AI's lean operational model ensures maximum resource allocation towards growth and innovation, enabling agile market responses. The company's technology directly addresses the biopharma sector's critical challenge: the low 12% success rate of drugs transitioning from clinical trials to market. With annual R&D spending expected to hit \$204 billion in 2024, BullFrog AI's solutions are addressing a massive market opportunity.

Positioned at the forefront of AI-driven drug discovery and drug target identification, BullFrog AI offers a compelling investment opportunity with its powerful technology, strategic partnerships, and efficient operations.

## Improving Odds of Success with AI-enabled Discovery and Development

- Drug Target Identification
- Patient Stratification for Trial Design and Optimization
- Drug Repositioning
- Real-World Data Analytics



### Data Inputs Include:

- BullFrog-exclusive data
- Client-provided data
- Third-party data

**Graph /ML Analytics / Explainable AI**

**Scalable Analytics / Data Agnostic**

**Multimodal / Incomplete Data**