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): May 9, 2016

FATE THERAPEUTICS, INC.

(Exact name of registrant as specified in its charter)

Delaware (State or other jurisdiction of incorporation) 001-36076 (Commission File Number) 65-1311552 (I.R.S. Employer Identification No.)

3535 General Atomics Court, Suite 200 San Diego, CA 92121 (Address of principal executive offices, including zip code)

(858) 875-1800

(Registrant's telephone number, including area code)

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:

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))

Item 2.02 Results of Operations and Financial Condition.

On May 9, 2016 Fate Therapeutics, Inc. (the "Company") issued a press release announcing its financial results for the quarter ended March 31, 2016. A copy of the press release is attached as Exhibit 99.1.

The information in this Item 2.02 of this Current Report on Form 8-K, including Exhibit 99.1, is being furnished and shall not be deemed "filed" for the purposes of Section 18 of the Securities Exchange Act of 1934, as amended ("Exchange Act") or otherwise subject to the liability of that section, nor shall such information be deemed incorporated by reference in any filing under the Exchange Act or the Securities Act of 1933, as amended, regardless of the general incorporation language of such filing, except as shall be expressly set forth by specific reference in such filing.

Item 9.01 Financial Statements and Exhibits.

(d) Exhibits.

Exhibit No.	Description
99.1	Press release dated May 9, 2016

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.

Date: May 9, 2016

FATE THERAPEUTICS, INC.

By: /s/ J. Scott Wolchko J. Scott Wolchko President and Chief Executive Officer

Exhibit No.	Description
99.1	Press release dated May 9, 2016



Fate Therapeutics Reports First Quarter 2016 Financial Results

Phase 1/2 Clinical Trial of ProTmune™ for Prevention of Acute GvHD and CMV Infection to Begin Enrollment in mid-2016 Adaptive NK Cell Cancer Immunotherapy to be Featured at Innate Killer Summit in mid-May

Immuno-Regulatory CD34+ Cell Therapy Abstract Accepted for Presentation at American Diabetes Association's 76th Scientific Sessions in mid-June

San Diego, CA- May 9, 2016 – Fate Therapeutics, Inc. (NASDAQ: FATE), a biopharmaceutical company dedicated to the development of programmed cellular immunotherapies for cancer and immune disorders, today reported business highlights and financial results for the first quarter ended March 31, 2016.

"We are gratified by the strong interest and the collaborative involvement with ProTmune that we have received from the allogeneic hematopoietic cell transplant community during this launch stage of our Phase 1/2 clinical trial. The level of community engagement underscores that GvHD remains a significant cause of morbidity and mortality in transplant recipients," said Scott Wolchko, President and Chief Executive Officer of Fate Therapeutics. "Our *ex vivo* immune cell programming approach to prevent GvHD is novel and highly differentiated and avoids costly and cumbersome processes such as the depletion or genetic engineering of donor T cells. As we move ahead in 2016 with ProTmune, we look forward to enrolling the Phase 1 stage of the study with immune cells from matched unrelated donors and to sharing safety and efficacy data."

Recent Highlights & Program Updates

• ProTmune[™] Phase 1/2 Clinical Trial to Commence Enrollment in mid-2016. In January 2016, Fate Therapeutics announced that its Investigational New Drug (IND) application for ProTmune (FT1050-FT4145 programmed mobilized peripheral blood (mPB) cells) was cleared by the U.S. Food and Drug Administration. The Company is poised to begin subject enrollment in a multi-center, randomized, controlled study that is designed to evaluate safety and the potential of ProTmune to prevent acute graft-versus-host disease (GvHD) and cytomegalovirus (CMV) infection, both of which are leading causes of morbidity and mortality in patients undergoing allogeneic hematopoietic cell transplantation (HCT). There are currently no approved therapies for the prevention of GvHD or CMV infection in patients undergoing allogeneic HCT, giving rise to a significant unmet medical need.

- Cancer-Fighting Properties of ProTmune Presented at 2016 BMT Tandem MeetingsIn February 2016, Fate Therapeutics presented preclinical data at the BMT Tandem Meetings in Honolulu, Hawaii demonstrating that FT1050-FT4145 programmed T cells retain antitumor, or graft-versus-leukemia (GvL), activity *in vivo*. GvL activity of T cells is critical to eradicating residual cancer and realizing the curative potential of allogeneic HCT. These data complement previously presented preclinical data demonstrating that the adoptive transfer of FT1050-FT4145 programmed mPB cells results in a statistically-significant reduction in GvHD score and improvement in survival in a murine model of allogeneic HCT.
- NK Cell Cancer Immunotherapy Program to be Highlighted at Innate Killer Summit 2016Dr. Jeffrey Miller, M.D., Professor of Medicine and Deputy Director, University of Minnesota Cancer Center, plans to provide an overview of the Company's NK cell cancer immunotherapy program at the Innate Killer Summit 2016 in San Diego, California from May 16-17, 2016. Fate Therapeutics is currently advancing through clinical translation a small molecule (FT1238) programmed NK cell therapy, which is comprised of highly-specialized "adaptive" NK cells that exhibit persistence and direct anti-tumor and antibody-dependent cell-mediated cytotoxicity as compared to other NK cell populations.
- **CD34+ Immuno-Regulatory Cell Therapy Program to be Presented at ADA's Scientific Sessions.** Fate Therapeutics plans to present an abstract from its pharmacologically-modulated CD34+ cell therapy program at the American Diabetes Association's 76th Scientific Sessions in New Orleans, Louisiana from June 10-14, 2016. The Company has previously shown in preclinical studies that programmed CD34+ cells have immuno-regulatory properties with the potential to traffic to sites of T-cell proliferation and express powerful immunosuppressive factors, including PD-L1.

First Quarter 2016 Financial Results

- Cash & Short-term Investment Position: Cash, cash equivalents and short-term investments as of March 31, 2016 were \$55.6 million compared to \$64.8 million as of December 31, 2015. The decrease is primarily driven by the Company's use of cash to fund operating activities and to service principal and interest obligations under its loan agreement with Silicon Valley Bank.
- Total Revenue: Revenue was \$1.3 million for the first quarter of 2016. All revenue was derived from the Company's research collaboration and license agreement with Juno Therapeutics.
- Total Operating Expenses: Total operating expenses were \$9.2 million for the first quarter of 2016 compared to \$7.3 million for the comparable period in 2015. Operating expenses for the first quarter of 2016 include \$0.8 million of stock compensation expense, compared to \$0.6 million for the first quarter of 2015.
- **R&D Expenses:** Research and development expenses were \$6.6 million for the first quarter of 2016 compared to \$4.6 million for the comparable period in 2015. The increase in R&D expenses is primarily related to the conduct of the Company's collaboration with Juno, including the hiring of additional employees and the purchase of equipment and materials, and the conduct of preclinical development activities under its sponsored research agreements with the University of Minnesota and Boston Children's Hospital.

- **G&A Expenses:** General and administrative expenses were \$2.6 million for the first quarter of 2016 compared to \$2.8 million for the comparable period in 2015. The decrease in G&A expenses is primarily related to a decrease in corporation stock registration fees.
- **Common Shares Outstanding:** Common shares outstanding as of March 31, 2016 were 28.9 million compared to 28.7 million as of December 31, 2015. Common shares outstanding increased primarily as a result of the issuance of shares under the Company's equity incentive plan.

Today's Conference Call and Webcast

The Company will conduct a conference call today, Monday, May 9, 2016 at 5:00 p.m. EDT to review financial and operating results for the quarter ended March 31, 2016. In order to participate in the conference call, please dial 1-877-303-6235 (domestic) or 1-631-291-4837 (international) and refer to conference ID 99803287. The live webcast can be accessed under "Events & Presentations" in the Investors & Media section of the Company's website at www.fatetherapeutics.com. The archived webcast will be available on the Company's website beginning approximately two hours after the event.

About ProTmune™

ProTmune[™] is an investigational programmed cellular immunotherapy undergoing clinical development for the prevention of acute GvHD and CMV infection in patients undergoing allogeneic HCT. The cell therapy is produced by modulating a donor-sourced, human mobilized peripheral blood (mPB) graft *ex vivo* with two small molecules (FT1050 and FT4145) to enhance the biological properties and therapeutic function of the graft's immune cells. The programmed mPB graft is adoptively transferred and administered to a patient as a one-time intravenous infusion.

About Fate Therapeutics, Inc.

Fate Therapeutics is a biopharmaceutical company dedicated to the development of programmed cellular immunotherapies for cancer and immune disorders. The Company's cell therapy pipeline is comprised of immuno-oncology programs, including off-the-shelf NK- and T-cell cancer immunotherapies derived from engineered induced pluripotent cells, and immuno-regulatory programs, including hematopoietic cell immunotherapies for protecting the immune system of patients undergoing hematopoietic cell transplantation and for suppressing autoimmunity. Its adoptive cell therapy programs are based on the Company's novel *ex vivo* cell programming approach, which it applies to modulate the therapeutic function and direct the fate of immune cells. Fate Therapeutics is headquartered in San Diego, CA. For more information, please visit www.fatetherapeutics.com.

Forward-Looking Statements

This release contains "forward-looking statements" within the meaning of the Private Securities Litigation Reform Act of 1995, including statements regarding the Company's advancement of, and the anticipated timing, progress, milestones and plans related to, the Company's product candidates, clinical studies, research and development programs and partnerships. These and any other forward-looking statements in this release are based on management's current expectations of future events and are subject to a number of risks and uncertainties that could cause actual results to differ materially and adversely from those set forth in or implied by such forward-looking statements. These risks and uncertainties include, but are not limited to, the risk that results observed in prior studies, including

preclinical studies of ProTmune[™], will not be observed in ongoing or future studies involving these product candidates, the risk that the Company may cease or delay preclinical or clinical development activities for any of its existing or future product candidates for a variety of reasons (including requirements that may be imposed by regulatory authorities and requirements for regulatory approval, difficulties or delays in patient enrollment in current and planned clinical trials, and any adverse events or other negative results that may be observed during preclinical or clinical development), and the risk that the Company's research collaborations, including with Juno Therapeutics, may not be successful or may be terminated. For a discussion of other risks and uncertainties, and other important factors, any of which could cause our actual results to differ from those contained in the forward-looking statements, see the risks and uncertainties detailed in the Company's periodic filings with the Securities and Exchange Commission, including but not limited to the Company's most recently filed periodic report, and from time to time the Company's other investor communications. Fate Therapeutics is providing the information in this release as of this date and does not undertake any obligation to update any forward-looking statements contained in this release as a result of new information, future events or otherwise.

Availability of Other Information about Fate Therapeutics, Inc.

Investors and others should note that we routinely communicate with our investors and the public using our company website (www.fatetherapeutics.com) and our investor relations website (ir.fatetherapeutics.com), including without limitation, through the posting of investor presentations, Securities and Exchange Commission filings, press releases, public conference calls and webcasts on our websites. The information that we post on these websites could be deemed to be material information. As a result, we encourage investors, the media, and others interested in Fate Therapeutics to review the information that we post on these websites on a regular basis. The contents of our website, or any other website that may be accessed from our website, shall not be deemed incorporated by reference in any filing under the Securities Act of 1933, as amended.

Condensed Consolidated Statements of Operations and Comprehensive Loss (in thousands, except share and per share data)

	_	Three Months Ended March 31,			
		2016		2015	
		(unaudited)			
Collaboration revenue	\$	1,322	\$	_	
Operating expenses:					
Research and development		6,636		4,568	
General and administrative		2,602		2,756	
Total operating expenses		9,238		7,324	
Loss from operations		(7,916)		(7,324)	
Other income (expense):					
Interest income		27		1	
Interest expense		(488)		(558)	
Total other expense, net		(461)		(557)	
Net loss	\$	(8,377)	\$	(7,881)	
Other comprehensive income:					
Unrealized gain on available-for-sale securities, net		14		_	
Comprehensive loss		(8,363)	\$	(7,881)	
Net loss per common share, basic and diluted		(0.29)	\$	(0.38)	
Weighted-average common shares used to compute basic and diluted net loss per share		8,777,790	2	0,554,478	

Condensed Consolidated Balance Sheets (in thousands)

	201	March 31, 2016 (unaudited)		December 31, 2015		
Assets	(unauu	iteu)				
Current assets:						
Cash and cash equivalents	\$	39,487	\$	64,809		
Short-term investments		16,125				
Prepaid expenses and other current assets		955		843		
Total current assets		56,567		65,652		
Long-term assets		2,138		2,306		
Total assets	\$	58,705	\$	67,958		
Liabilities and stockholders' equity						
Current liabilities:						
Accounts payable and accrued expenses	\$	4,013	\$	3,435		
Long-term debt, current portion		7,705		7,550		
Current portion of deferred revenue		2,105		2,401		
Other current liabilities		63		55		
Total current liabilities		13,886		13,441		
Long-term debt, net of current portion		8,700		10,688		
Deferred revenue		4,408		4,934		
Other long-term liabilities		984		857		
Stockholders' equity		30,727		38,038		
Total liabilities and stockholders' equity	\$	58,705	\$	67,958		

Contact:

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