



aTyr Pharma Announces First Quarter 2018 Operating Results, Program Prioritization and Corporate Restructuring

May 14, 2018

- Conference Call Today at 8:00 a.m. E.T./5:00 a.m. P.T. -

SAN DIEGO, May 14, 2018 (GLOBE NEWSWIRE) -- aTyr Pharma, Inc. (Nasdaq:LIFE), a biotherapeutics company engaged in the discovery and development of innovative medicines based on novel immunological pathways, today announced operating results for the first quarter ended March 31, 2018. The Company also announced a corporate restructuring plan to streamline its operations as it focuses its development efforts on the further clinical advancement of ATYR1923.

Program Prioritization and Corporate Restructuring

aTyr has decided not to proceed with IND-enabling activities, including GMP manufacturing, for the panel of antibodies identified in its ORCA program, as pre-clinical data generated over the last month did not show sufficient efficacy to justify further development at this time. In light of this, the Company has implemented a corporate restructuring based on the resources necessary to continue to develop ATYR1923 and pursue additional research efforts for the ORCA program. The corporate restructuring includes an immediate workforce reduction of approximately 30% as well as additional cost saving measures.

"This has been a very difficult process and we regret the impact this business decision has on our departing employees and their families. We are grateful for the many contributions of our impacted employees and I want to sincerely thank them for all their hard work and commitment to aTyr," commented Sanjay Shukla, M.D., M.S., President and CEO of aTyr. "Going forward, we are primarily focused on ATYR1923 and designing a future patient trial which will be influenced by data from our ongoing Phase I trial, translational activities and research related to the role of the receptor for ATYR1923."

Key Research Finding: Identification of Receptor for ATYR1923

The Company has identified Neuropilin-2 (NRP-2) as a binding partner for ATYR1923 from a screen of greater than 4,500 human membrane proteins. NRP-2 is a pleiotropic receptor that can bind to a number of different ligands. It has a well-established role in the development of the neural and lymphatic systems and an emerging role in the adult immune system. aTyr is currently evaluating the role of NRP-2 interactions in the control of immune responses, and designing optimal therapeutic approaches to modulate this newly-discovered receptor in the Resokine pathway. The Company believes the discovery of this receptor will aid in the clinical development of the ATYR1923 program.

First Quarter 2018 Financial Results and Cash Position

Research and development expenses were \$6.2 million and \$9.2 million for the quarters ended March 31, 2018 and 2017, respectively. The decrease of \$3.1 million was due primarily to a \$1.9 million decrease related to the completion of ATYR1940 clinical studies and a decrease of \$1.1 million related to lower product manufacturing costs.

General and administrative expenses were \$4.1 million and \$4.0 million for each of the quarters ended March 31, 2018 and 2017, respectively.

As of March 31, 2018, the Company had \$74.1 million in cash, cash equivalents and investments and 41.2 million shares of common stock outstanding on an if-converted basis (includes 29.8 million shares of common stock and 11.4 million shares of common stock if converted from Class X Preferred stock).

Conference Call and Webcast Details

aTyr Pharma will host a conference call and webcast today at 8:00 a.m. Eastern Time / 5:00 a.m. Pacific Time to discuss the results and the recent announcements. Interested parties may access the call by dialing toll-free (844) 358-9116 from the US, or (209) 905-5951 internationally and using conference ID 8255679. Links to a live audio webcast and replay may be accessed on the aTyr website events page at: <http://investors.atyrpharma.com/events-and-webcasts>. An audio replay will be available for at least 90 days following the event.

About aTyr Pharma

aTyr is a clinical-stage biotechnology company engaged in the discovery and clinical development of innovative medicines using its knowledge of tRNA synthetase biology. The company is focused on the therapeutic translation of the Resokine pathway, comprised of extracellular proteins derived from the histidyl tRNA synthetase (HARS) gene family. aTyr's clinical stage ATYR1923 candidate is an agonist of the Resokine pathway designed to temper immune engagement in interstitial lung diseases. aTyr's immuno-oncology research program, targets the Resokine pathway using antibodies to enhance the immune response in tumor settings. aTyr has built an intellectual property estate, to protect its pipeline, comprising over 250 issued patents or allowed patent applications that are owned or exclusively licensed, including over 300 potential protein compositions derived from tRNA synthetase genes. For more information, please visit <http://www.atyrpharma.com>.

Forward-Looking Statements

This press release contains forward-looking statements within the meaning of the Private Litigation Reform Act. Forward-looking statements are usually identified by the use of words such as "anticipates," "believes," "estimates," "expects," "intends," "may," "plans," "projects," "seeks," "should," "will," and variations of such words or similar expressions. We intend these forward-looking statements to be covered by such safe harbor provisions for forward-looking statements and are making this statement for purposes of complying with those safe harbor provisions. These forward-looking

statements, including statements regarding the potential therapeutic benefits of our product candidates, our ability to successfully advance our pipeline or product candidates, undertake certain development activities (such as clinical trial enrollment and the conduct of clinical trials) and accomplish certain development goals, and the timing of such events, the anticipated benefits and cost-savings relating to the corporate restructuring, and the scope and strength of our intellectual property portfolio reflect our current views about our plans, intentions, expectations, strategies and prospects, which are based on the information currently available to us and on assumptions we have made. Although we believe that our plans, intentions, expectations, strategies and prospects as reflected in or suggested by those forward-looking statements are reasonable, we can give no assurance that the plans, intentions, expectations or strategies will be attained or achieved. Furthermore, actual results may differ materially from those described in the forward-looking statements and will be affected by a variety of risks and factors that are beyond our control including, without limitation, risks associated with the discovery, development and regulation of our product candidates and the risk that we may cease or delay preclinical or clinical development activities for any of our existing or future product candidates for a variety of reasons (including difficulties or delays in patient enrollment in planned clinical trials), as well as those set forth in our most recent Annual Report on Form 10-K, Quarterly Reports on Form 10-Q and in our other SEC filings. Except as required by law, we assume no obligation to update publicly any forward-looking statements, whether as a result of new information, future events or otherwise.

ATYR PHARMA INC.
Condensed Consolidated Statements of Operations
(in thousands, except share and per share data)

	Three Months Ended	
	March 31,	
	2018	2017
Operating expenses:		
Research and development	\$ 6,150	\$ 9,204
General and administrative	4,070	4,007
Total operating expenses	<u>10,220</u>	<u>13,211</u>
Loss from operations	(10,220)	(13,211)
Total other expense, net	<u>(447)</u>	<u>(194)</u>
Net loss	<u>\$ (10,667)</u>	<u>\$ (13,405)</u>
Net loss per share attributable to common stock holders, basic and diluted	<u>\$ (0.36)</u>	<u>\$ (0.56)</u>
Weighted average common stock shares outstanding, basic and diluted	<u>29,795,466</u>	<u>23,739,057</u>

ATYR PHARMA INC.
Condensed Consolidated Balance Sheets
(in thousands)

	March 31,	December 31,
	2018	2017
Cash, cash equivalents and available-for-sale investments	\$ 74,100	\$ 85,119
Other assets	1,996	1,956
Property and equipment, net	<u>2,374</u>	<u>2,280</u>
Total assets	<u>\$ 78,470</u>	<u>\$ 89,355</u>
Accounts payable, accrued expenses and other liabilities	\$ 3,995	\$ 5,379
Current portion of long-term loans, net of debt issuance costs and discount	7,027	5,012
Term loans, net of current portion and debt issuance costs and discount	12,950	14,719
Stockholders' equity	<u>54,498</u>	<u>64,245</u>
Total liabilities and stockholders' equity	<u>\$ 78,470</u>	<u>\$ 89,355</u>

Contact:

Mark Johnson

Sr. Director, Investor Relations

mjohnson@atyrpharma.com

858-223-1163



Source: aTyr Pharma, Inc.