July 30, 2024

ProMIS Neurosciences Showcases Novel Vaccine Approach for Maximal Targeting of Toxic Amyloid-Beta Oligomers at the 2024 Alzheimer's Association International Conference

Preclinical data showed strong antibody responses with no measurable pro-inflammatory T cell responses against AßO and support novel approach for potential Alzheimer's disease vaccine

CAMBRIDGE, Massachusetts and TORONTO, Ontario, July 30, 2024 (GLOBE NEWSWIRE) -- ProMIS Neurosciences Inc. (Nasdaq: PMN), a biotechnology company focused on the generation and development of antibody therapeutics targeting toxic misfolded proteins in neurodegenerative diseases such as Alzheimer's disease (AD), amyotrophic lateral sclerosis (ALS) and multiple system atrophy (MSA), presented preclinical data at the 2024 Alzheimer's Association International Conference (AAIC) that further supports the potential therapeutic advantage of the Company's novel approach to optimization of an Alzheimer's disease (AD) vaccine for maximum targeting of toxic amyloid-beta oligomers (AβO).

A large body of evidence indicates that the most pathogenic species of amyloid-beta (Aß) in AD consist of soluble toxic oligomers as opposed to insoluble fibrils and monomers. ProMIS' proprietary computational platform identified four different AßO-restricted conformational B cell epitopes as vaccine candidates. Additionally, the Company's novel ex vivo approach selected an optimal vaccine configuration to provide maximal binding to a toxic oligomer-enriched low molecular weight fraction of soluble AD brain extracts.

The results from the study showed that vaccination with AßO-restricted conformational B cell epitopes produced strong antibody responses with no measurable pro-inflammatory T cell responses against Aß. Importantly, immunization with epitope 301, the target of PMN310, alone was sufficient to produce maximal reactivity against brain AßO.

"The new data presented at the AAIC conference and the increasingly recognized benefit of targeting oligomers of Aβ underscores the potential advantage of our PMN310 antibody and AβO vaccine candidates," stated Neil R. Cashman, M.D., Chief Scientific Officer and Co-Founder of ProMIS Neurosciences and an author on the paper. "These data are particularly encouraging as an AD vaccine capable of inducing an effective antibody response against pathogenic Aβ, as seen in these preclinical data, could potentially be administered as a preventative measure to at-risk individuals to prevent the development of symptomatic disease or given therapeutically to diagnosed patients to inhibit the progression of AD."

Details of the poster presentation are as follows:

Poster Title: Novel approach to optimization of Alzheimer's vaccine configuration for maximal targeting of toxic amyloid-beta oligomers
Poster Number: 86601
Date and Time of Presentation: Monday, July 29, 2024 from 7:30 am – 4:15 pm EDT
Session: Drug Development
Authors: Johanne Kaplan, Ebrima Gibbs, Scott Napper, Erin Scruten, Juliane Coutts, Neil R. Cashman

The poster presentation is available on the Posters and Publications page of the Company's website at www.promisneurosciences.com.

About ProMIS Neurosciences Inc.

ProMIS Neurosciences Inc. is a clinical stage biotechnology company focused on generating and developing antibody therapeutics selectively targeting toxic misfolded proteins in neurodegenerative diseases such as Alzheimer's disease (AD), amyotrophic lateral sclerosis (ALS) and multiple system atrophy (MSA). The Company's proprietary target discovery engine applies a thermodynamic, computational discovery platform - ProMIS™ and Collective Coordinates - to predict novel targets known as Disease Specific Epitopes on the molecular surface of misfolded proteins. Using this unique approach, the Company is developing novel antibody therapeutics for AD, ALS and MSA. ProMIS has offices in Toronto, Ontario and Cambridge, Massachusetts.

Forward-Looking Statements

This press release contains forward-looking statements that are made pursuant to the safe harbor provisions of the Private Securities Litigation Reform Act of 1995. Certain information in this news release constitutes forward-looking statements and forward-looking information (collectively, "forward-looking information") within the meaning of applicable securities laws. In some cases, but not necessarily in all cases, forward-looking information can be identified by the use of forward-looking terminology such as "plans", "excited to", "targets", "expects" or "does not expect", "is expected", "an opportunity exists", "is positioned", "estimates", "intends", "assumes", "anticipates" or "does not anticipate" or "believes", or variations of such words and phrases or state that certain actions, events or results "may", "could", "would", "might", "will" or "will be taken", "occur" or "be achieved". In addition, any statements that refer to expectations, projections or other characterizations of future events or circumstances contain forward-looking information. Specifically, this news release contains forward-looking information relating to the Company's novel vaccine approach for maximal targeting of toxic amyloid-beta oligomers and the potential implications thereof, the Company's expectations regarding its clinical development of its lead product, PMN310, for AD, and the Company's plans to advance into a Phase 1b multiple ascending dose study in AD patients. Statements containing forward-looking information are not historical facts but instead represent management's current expectations, estimates and projections regarding the future of our business, future plans, strategies, projections, anticipated events and trends, the economy and other future conditions. Forward-looking information is necessarily based on a number of opinions, assumptions and estimates that, while considered reasonable by the Company as of the date of this news release, are subject to known and unknown risks, uncertainties and assumptions and other factors that may cause the actual

results, level of activity, performance or achievements to be materially different from those expressed or implied by such forward-looking information, including, but not limited to, the risk that the results of nonclinical studies and early clinical trials are not necessarily predictive of future results with PMN310, the Company's ability to fund its operations and continue as a going concern, its accumulated deficit and the expectation for continued losses and future financial results. Important factors that could cause actual results to differ materially from those indicated in the forward-looking information include, among others, the factors discussed throughout the "Risk Factors" section of the Company's most recently filed Annual Report on Form 10-K for the year ended December 31, 2023 and in its subsequent filings filed with the United States Securities and Exchange Commission. Except as required by applicable securities laws, the Company undertakes no obligation to publicly update any forward-looking information, whether written or oral, that may be made from time to time, whether as a result of new information, future developments or otherwise.

For further information:

Visit us at www.promisneurosciences.com

Please submit media inquiries to info@promisneurosciences.com.

For Investor Relations, please contact:
Precision AQ
Anne Marie Fields, Managing Director
annemarie.fields@precisionaq.com
Tel. 212-362-1200

Source: ProMIS Neurosciences Inc.