



Asep Medical Holdings Inc.

Asep Medical Holdings Inc. Achieves Significant Milestones Addressing Antibiotic Failure Through Proprietary Diagnostic & Therapeutic Technologies

VANCOUVER, BC, December 24, 2022 (CNW) — **Asep Medical Holdings Inc. (“Asep Inc.” or the “Company”) (CSE: ASEP) (OTCQB: SEPSF) (FSE: JJ8)** is pleased to announce that, through its subsidiaries Sepset Biosciences Inc. (“Sepset”) and ABT Innovations Inc. (“ABT”), the Company is addressing antibiotic failure on two fronts — a novel diagnostic assay that detects severe sepsis in the emergency room (ER), and a peptide technology that combats hard-to-treat infections known as biofilms.

Antibiotic failure is generally referred to as any situation where bacteria survive antibiotic treatment, and the clinical symptoms of the infection persist¹. With around 47-50 million sepsis cases per year worldwide² and over 11 million deaths, faster and more accurate sepsis detection will save lives. In addition, there are currently no approved treatments for biofilm infections, which is alarming since 65%³ of all infections are biofilms.

Asep Inc.’s diagnostic technology, Sepset^{ER}TM, is a blood-based gene expression assay that can provide an early and accurate diagnosis of severe incidences of the deadly disease sepsis. Sepset^{ER} delivers results between 60-90 minutes whereas the conventional diagnostic tools may take approximately 8 - 36 hours. Early detection of sepsis along with timely, appropriate treatments increases the probability of survival for patients⁴ significantly.

In addition to speeding up the process of sepsis detection, Asep Inc. also offers a patented peptide technology that targets and suppresses biofilm regrowth and reduces inflammation, addressing the ineffectiveness of current treatments for a wide range of hard-to-treat infections. The technology covers a broad range of therapeutic applications, including bacterial biofilm infections (medical device infections, chronic infections, lung, bladder, wound, dental, skin, ear-nose and throat, sinusitis, orthopaedic, etc.), anti-inflammatories, anti-infective immune-

¹<https://www.frontiersin.org/articles/10.3389/fddsv.2022.892975/full#:~:text=Antibiotic%20failure%20can%20be%20defined%20as%20any%20situation%20where%20bacteria,symptoms%20of%20the%20infection%20persist.>

² <https://www.global-sepsis-alliance.org/sepsis>

³ <https://www.sciencedirect.com/science/article/pii/S1726490117302587>

⁴<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6304323/#:~:text=However%2C%20early%20detection%20of%20sepsis,and%20a%20reduction%20in%20mortality.>



Asep Medical Holdings Inc.

modulators and vaccine adjuvants. This opens up a number of different potential paths to revenue generation for this ground-breaking technology.

To date, the Company and its subsidiaries have received over \$20 million in non-dilutive grant funding from organizations, such as the Bill & Melinda Gates Foundation, Genome Canada and the University of British Columbia. The Company, through its pre-clinical partner iFyber LLC, has also received funding from the US Army for its novel antibiofilm peptide technology.

“Asep is addressing an unmet need in health care, which affects 49 million people per year. Having developed two new revolutionary technologies to diagnose sepsis and treat biofilm infection, the potential market opportunity for this company is massive as hospitals and clinics globally could be in line to treat their patients using these cutting-edge technologies,” stated Dr. Robert E. W. Hancock, the founder, chairman and CEO of Asep Inc.

ABOUT ASEP MEDICAL HOLDINGS INC.

Asep Medical Inc. (asepmedical.com) is dedicated to addressing antibiotic failure by developing novel solutions for significant unmet medical needs. The Company is a consolidation of two existing private companies (Sepset Biosciences Inc. and ABT Innovations Inc.) that are both in the advanced development of both proprietary diagnostic tools, enabling the early and timely identification of severe sepsis as well as broad-spectrum therapeutic agents to address multidrug-resistant biofilm infections.

Sepset Biosciences Inc. (sepset.ca) is developing a diagnostic technology that involves a patient gene expression signature that predicts severe sepsis, one of the significant diseases leading to antibiotic failure since antibiotics are the primary treatment for sepsis. Despite this, sepsis is responsible for nearly 20% of all deaths on the planet. The Sepset^{ER} test is a blood-based gene expression assay that is straightforward to implement, and results are obtained in about an hour in the emergency room or intensive care unit. This proprietary diagnostic technology differs from current diagnostic tests in enabling diagnosis of severe sepsis within 1-2 hours of first clinical presentation (i.e., in the emergency room), while other diagnostics only provide diagnosis after 24-36 hours. Asep Inc. believes this will enable critical early decisions to be made by physicians regarding appropriate therapies and reduce overall morbidity and mortality due to sepsis.



Asep Medical Holdings Inc.

ABT Innovations Inc.'s (abtinnovations.ca) peptide technology covers a broad range of therapeutic applications, including bacterial biofilm infections (medical device infections, chronic infections, lung, bladder, wound, dental, skin, ear-nose and throat, sinusitis, orthopaedic, etc.), anti-inflammatories, anti-infective immune-modulators and vaccine adjuvants. The company is in the pre-clinical development phase with promising data.

FOR MORE INFORMATION, PLEASE CONTACT —

Chris Dallin, Marketing Director

Asep Medical Holdings Inc.

E. chris@asepmedical.com

T. +1 (604) 362.3654

FORWARD-LOOKING STATEMENTS —

This news release contains certain "forward-looking statements" within the meaning of such statements under applicable securities law. Forward-looking statements are frequently characterized by words such as "anticipates," "plan," "continue," "expect," "project," "intend," "believe," "anticipate," "estimate," "may," "will," "potential," "proposed," "positioned" and other similar words, or statements that certain events or conditions "may" or "will" occur. These statements include but are not limited to the successful clinical testing of our Sepsis diagnostic test and its intended filing for regulatory approval; and the undertaking of pre-clinical studies on our lead therapeutic, with the expectation that this will lead to fast-track clinical trials. Various assumptions were used in drawing conclusions or making the predictions contained in the forward-looking statements throughout this news release. Forward-looking statements are based on the opinions and estimates of management at the date the statements are made and are subject to a variety of risks (including those risk factors identified in the Asep Medical Inc.'s prospectus dated November 9, 2021) available for review under the Company's profile at www.sedar.com and uncertainties and other factors that could cause actual events or results to differ materially from those projected in the forward-looking statements. Asep Medical Inc. is under no obligation, and expressly disclaims any intention or obligation, to update or revise any forward-looking statements, whether as a result of new information, future events or otherwise, except as expressly required by applicable law.