

FOR IMMEDIATE RELEASE

Heartseed raises \$37 Million in series C funding to accelerate development of iPSC-derived stem cell therapy for heart failure

TOKYO, JAPAN, June 11, 2021 – Heartseed (Heartseed Inc.), a Tokyo-based biotechnology company developing iPSC-derived cardiomyocytes for heart failure (HF), today announced it has raised 4 Billion-yen (approx. \$37 Million) at Series C round, bringing its total financial backing to 8.2 Billion yen (approx. \$75 Million) since it was founded in 2015.

New investors are UTokyo Innovation Platform Co. (UTokyo IPC), Medical Incubator Japan, Keio Innovation Initiative (KII), and Sumitomo Mitsui Trust Investment. Among the existing investors, SBI Group, Nissay Capital, SMBC Capital, Medipal Holdings, and Itochu Chemical Frontier participated in this round.

Heartseed plans to use the new funds to accelerate the initiation of global clinical trial of our lead asset, HS-001 for HF as well as to confirm its proof of concept in Phase 1/2 LAPiS study in Japan. In addition, Heartseed will also examine a less invasive administration such as transendocardial injection using a catheter.

“Heartseed has made a strong progress in our research and development of our cardiac remuscularization therapy, as proved by the clearance of clinical trial application of Phase I/II LAPiS Study by the Japanese Pharmaceutical and Medical Agency and a number of awards we received.” said Professor. Keiichi Fukuda, co-founder and CEO at Heartseed. “The commitment from both new and existing investors in this round is a strong validation of our technology and strategic vision. With their support, we look forward to accelerating our development to deliver potentially curative therapy for heart failure across the globe.”

About HS-001

Heartseed's lead pipeline, HS-001, is allogeneic iPSC-derived, highly purified ventricular cardiomyocyte spheroids. By forming micro-tissue-like spheroids, retention rate and viability of cell transplant are improved. The spheroids are transplanted using a special administration needle (SEEDPLANTER®) and guide adapter developed for safe and efficient administration of the spheroids into the myocardial layer of the heart.

The expected mechanism of action is that the transplanted cardiomyocytes electrically couple with the patient's myocardium to improve cardiac output by remuscularization, and secretion of angiogenic factors to form new blood vessels around the transplant site (neovascularization).

The review of the Clinical Trial Application of a phase I/II clinical trial (LAPiS Study) evaluating the safety and efficacy of HS-001 for the treatment of heart failure caused by ischemic heart disease in Japan was successfully completed in March 2021 by Japan's Pharmaceutical and Medical Devices Agency.

About Heartseed

Heartseed Inc. was founded in 2015 to develop and commercialize cardiac remuscularization therapy developed by Professor Keiichi Fukuda and his group at the Department of Cardiology, Keio University, Tokyo, Japan. Heartseed has proprietary technologies throughout the entire manufacturing process of the cardiomyocyte-cell product, including purification, cell delivery and iPSC production.

Heartseed announced the global collaboration and license agreement with Novo Nordisk A/S for HS-001 in June 2021. Heartseed was named “Healthcare Company of the Year 2020” by Healthcare Magazine and “Top 10 Startup in Japan” by Startup City and “Minister of Science and Technology Policy Award” at Japan Venture Awards 2021.

For more information, visit [company website](#) or [LinkedIn](#).

Company Name: Heartseed Inc.

Established: November 30, 2015

CEO: Keiichi Fukuda

Headquarter: The Art Complex Center of Tokyo #302, Daikyo-cho 12-9, Shinjuku-ku, Tokyo, Japan

Shareholders: Founders/Employees, Angel Bridge, Astellas Venture Management, Shibuya Corporation, SBI Investment, JMDC, Gene Techno Science, Nissay Capital, SMBC Venture Capital, Itochu Chemical Frontier, Medipal Holdings

Source: Heartseed Inc.

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