## InsuFlo is declared as one of the national winners of ASME ISHOW India 2022

InsuFlo – an affordable insulin pump for type-1 diabetic patients (T1DM) in resource-constrained settings – designed and developed by <u>Deval Karia</u> under the guidance <u>Dr. Manish Arora</u> at <u>UTSAAH Lab</u> in <u>CPDM</u>, IISc is declared as one of the three regional winners of the <u>American Society of Mechanical Engineer's Innovation Showcase ASME ISHOW 2022</u>

The InsuFlo team comprises <u>Rajesh Jat</u>, <u>Arjun Gopkumar</u>, <u>Siddharth Kumar</u>, and Arun Joson along with support from interns. The project is currently funded and supported by the <u>BIRAC-SITARE-GYTI</u> award, the <u>BIRAC-BIG</u> grant with <u>C-CAMP</u> as the BIG partner, and the <u>Honeywell CSR grant</u> via <u>SID</u> and <u>CPDMeD</u>, IISc Bengaluru.

The three entrepreneurs that won from eight finalists of social innovators from all over India will receive seed grants and technical support to help bring their design innovations to market. This grant is meant to support social enterprises, that are on the frontlines of crisis response and the advancement of the U.N. Sustainable Development Goals, with accessible platforms for capacity building, expert engagement & co-design of scaling strategies suited for today's dynamic markets.

About InsuFlo: All T1DM patients require insulin to sustain life. Syringes and pens are presently the most popular insulin delivery devices in India. Though available for more than two decades, insulin pumps are now finding relevance because of their unique ability to continuously infuse insulin, closely mimicking that of physiological secretion from a normal pancreas. Unlike insulin shots with syringes, pump infusion sites need to be changed less frequently. Documented evidence also points to the benefit of pumps in improving quality of life, clinical health metrics such as HbA1C, and a number of hypoglycemic incidents among others. Despite such overwhelming evidence in support, the adoption of CSII (continuous subcutaneous insulin infusion) is sparse, particularly in resource-constrained settings like India. Institutional factors aside, fixed, and recurring costs of such a device are often found to be a withholding factor to widespread adoption. This is the exact problem InsuFlo attempts to address i.e., making an affordable insulin pump that is accessible to patients at the base of the economic pyramid and is designed for such users as opposed to an imported device.

## About ASME ISHOW (https://thisishardware.org/)

ASME ISHOW is a prestigious international hardware-led social innovation accelerator for entrepreneurs/startups that takes place in India, Kenya, and the United States every year. ISHOW, with its network of experts, helps entrepreneurs navigate the challenges they will encounter on their hardware journey to market. ISHOW winners receive seed grants, technical support, design consultations, and a customized design & engineering review from experts at ISHOW Bootcamp. ASME ISHOW is open to individuals and organizations with existing prototypes, that will have a positive social and environmental impact and improve the quality of life around the world. ISHOW is organized by the ASME Foundation, the philanthropic arm of ASME, under the program "Ideas that Innovate" which addresses the United Nations Sustainable Development Goals, enabling social entrepreneurs to bring life-changing solutions to where they are most needed.

About American Society of Mechanical Engineers (ASME): www.asme.org

**ASME Foundation:** www.asmefoundation.org