

## Medtronic gets FDA nod for PulseSelect trial for Atrial Fibrillation

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**First procedures in the trial were performed by Bradley Wilshire, M.D., at John Hunter Hospital, New Lambton Heights, NSW, Australia**



Medtronic in collaboration with leading clinicians, researchers and scientists worldwide offers the broadest range of innovative medical technology for the interventional and surgical treatment of cardiovascular disease and cardiac arrhythmias.

The company has announced that it received approval from the U.S. Food and Drug Administration (FDA) to proceed with an investigational device exemption (IDE) trial to evaluate the safety and effectiveness of the PulseSelect™ Pulsed Field Ablation (PFA) System, a new technology that uses pulsed electric fields to treat atrial fibrillation. First procedures in the trial were performed in December 2019 by Bradley Wilshire, M.D., at John Hunter Hospital, New Lambton Heights, NSW, Australia and in January by Atul Verma, M.D., the principal investigator (PI) for the study, at Southlake Regional Health Centre in Newmarket, Canada.

PFA uses pulsed electric fields to ablate or create lesions and scar tissue to interrupt irregular electrical pathways in the heart and the triggers of atrial fibrillation. However, unlike traditional methods of ablation that heat the tissue (radio frequency) or cool the tissue (cryo) to ablate, PFA is non-thermal and selectively targets cardiomyocytes (heart muscle cells) while avoiding other types of tissue.

“This study will evaluate a new energy source that may treat atrial fibrillation and potentially address the risks that have been associated with other ablation technologies, such as unintended tissue damage,” said Verma. “The rigorous pre-clinical research to get us to these first procedures has been impressive and we are excited to support the development of more clinical evidence.”

PULSED AF is a prospective, multi-center, non-randomized, unblinded and worldwide study that will enroll patients who will be treated with the Medtronic PulseSelect PFA System.

“As a global leader in the treatment of cardiac arrhythmias, Medtronic is constantly evaluating new and existing therapies to better meet the needs of patients and the physicians who care for them,” said Rebecca Seidel, vice president and general manager in the Atrial Fibrillation Solutions division, which is part of the Cardiac and Vascular Group at Medtronic. “The PULSED AF study is another example of our commitment to meaningful innovation and a major step forward in the development of a diverse set of therapy options for atrial fibrillation patients.”