

# Study sheds light on end of life management of implanted defibrillators

April 5 2011

---

Each year, more than 100,000 patients in the U.S. undergo implantation of a new implantable cardioverter defibrillator (ICD) for heart rhythm abnormalities. This number constitutes a 20-fold increase over the last 15 years. Current medical guidelines advocate discussion of end of life care of these medical devices, including deactivation, but many patients may not understand their options. Now, researchers at the University of Pennsylvania School of Medicine say that discussions should also address post-mortem donation of ICDs for product improvement or reuse overseas as pacemakers, to help reduce global health disparities.

"ICD patients agree that discussions about ICDs and end of life are important," said senior author James Kirkpatrick, MD, assistant professor of Medicine, [Cardiovascular Medicine](#) Division at Penn. "The majority of the patients we polled also support the concept of an ICD-specific advanced directive and post-mortem donation for product improvement or reuse, but have not considered or discussed these topics."

Penn researchers conducted a phone survey of 153 ICD patients concerning advance directives and ICD handling at the end of life. Half of the patients that were questioned said they would like their ICD deactivated in an end of life illness. Most also thought that a do not resuscitate (DNR) order justified ICD deactivation. Although 17 percent reported ever thinking about ICDs in an end of life illness; just two patients had actually addressed the topic in an advance directive arrangement. Only five percent of the patients had ever discussed ICD

deactivation directly with their doctor.

Regarding donation of ICDs for reuse or review of the device for improvement purposes, 88 percent said they would donate their device to facilitate product improvement, 87 percent would donate for reuse overseas, and 80 percent for reuse in animals. When asked to choose just one donation option, the majority of patients would donate their devices for reuse in patients overseas. The study results were reported at the 2011 American College of Cardiology meeting in New Orleans.

Dr. Kirkpatrick and colleagues at Penn concluded "Educational initiatives aimed at patients and their families are warranted to help cardiovascular clinicians address end of life issues."

Provided by University of Pennsylvania School of Medicine

Citation: Study sheds light on end of life management of implanted defibrillators (2011, April 5) retrieved 9 May 2023 from

<https://medicalxpress.com/news/2011-04-life-implanted-defibrillators.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.