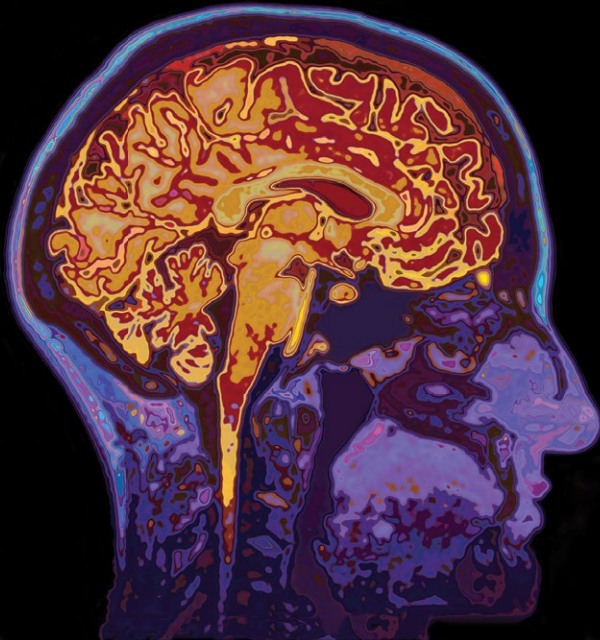


THE JOURNAL OF LAW, MEDICINE & ETHICS

Volume 52:4 • Winter 2024

A Journal of the American Society of Law, Medicine & Ethics • www.aslme.org



SYMPOSIUM

Emerging Portable Technology for Neuroimaging Research in New Field Settings: Legal & Ethical Challenges

GUEST EDITED BY Francis X. Shen,
Susan M. Wolf, and Frances Lawrenz

- 764** **Revolutionizing Neuroimaging Research with Highly Portable MRI: Confronting Ethical and Legal Challenges** *Francis X. Shen, Frances Lawrenz, and Susan M. Wolf*
- 769** **Conducting Research with Highly Portable MRI in Community Settings: A Practical Guide to Navigating Ethical Issues and ELSI Checklist** *Francis X. Shen, Susan M. Wolf, Frances Lawrenz, Donnell S. Comeau, Barbara J. Evans, Damien Fair, Martha J. Farah, Michael Garwood, S. Duke Han, Judy Illes, Jonathan D. Jackson, Eran Klein, Matthew S. Rosen, Efraín Torres, Paul Tuite, and J. Thomas Vaughan*
- 786** **Expert Stakeholder Perspectives on Emerging Technology for Neuroimaging Research with Highly Portable MRI: The Need for Guidance on Ethical, Legal, and Societal Issues** *Molly K. Madzelan, Frances Lawrenz, Susan M. Wolf, and Francis X. Shen*
- 805** **Far from Home: Managing Incidental Findings in Field Research with Portable MRI** *Susan M. Wolf and Judy Illes*
- 816** **The Realization of Portable MRI for Indigenous Communities in the USA and Canada** *Shana Birly, Angela Teeple, and Judy Illes*
- 824** **Socioeconomic Factors in Brain Research: Increasing Sample Representativeness with Portable MRI** *Martha J. Farah*

Plus more inside...

INDEPENDENT ARTICLES

Posthumous Sperm Use in Times of War: Ethics, Law and Society *Sharon Bassan*

Payers are Morally Responsible for Reimbursing Social Care by Medical Facilities: How to Make Value-Based Payments Work for Vulnerable Patients *Jacob Riegler*

How Did Human Rights Fare in Amendments to the International Health Regulations? *Lisa Forman, Judith Bueno de Mesquita, Luciano Bottini Filho, Benjamin Mason Meier, and Matiangai Sirleaf*

How Leaders at High-Performing Healthcare Organizations Think About Organizational Professionalism *Julie L. Agris, Sherril Gelmon, Matthew K. Wynia, Blair Buder, Krista J. Emma, Ahmed Alasmar, and Richard Frankel*

ISSN: 1073-1105

 CAMBRIDGE
UNIVERSITY PRESS

The Journal of Law, Medicine & Ethics (JLME): Material published in *The Journal of Law, Medicine & Ethics* (JLME) contributes to the educational mission of the American Society of Law, Medicine & Ethics (ASLME), covering public health, health disparities, patient safety and quality of care, and biomedical science and research, and more.

The Journal of Law, Medicine & Ethics is published by Cambridge University Press on behalf of the American Society of Law, Medicine & Ethics.

ISSN: 1073-1105

E-ISSN: 1748-720X

Copyright © 2025, the American Society of Law, Medicine & Ethics. All rights reserved. No portion of the contents may be reproduced in any form without written permission from the publisher

Printed in the USA by The Sheridan Group

Editorial Office

Journal of Law, Medicine & Ethics, 765 Commonwealth Avenue, Suite 1704, Boston, MA 02215 USA
Phone: 617-262-4990; Fax: 617-437-7596
E-mail: publications@aslme.org

Letters to the Editors: Comments on articles in the Journal should be addressed to the Editor at the editorial office or emailed to publications@aslme.org

Submission Guidelines: For submission guidelines, please contact the editorial office at publications@aslme.org or go to cambridge.org/jlme/submit

Supplements: Initial inquiries should be directed to the Editor at the editorial office or emailed to publications@aslme.org

Subscribe or Recommend a Subscription to your Librarian: Go to cambridge.org/jlme/subscribe or email subscriptions_newyork@cambridge.org (in the USA, Canada or Mexico) or journals@cambridge.org (elsewhere).

Copyright and Permissions: To request permission for republishing, reproducing, or distributing material from this journal, please visit the desired article at cambridge.org/jlme and click "Rights & Permissions." For additional information, please see cambridge.org/about-us/rights-permissions.

Advertising and Reprints: Contact ad_sales@cambridge.org. Acceptance of advertising in this journal in no way implies endorsement of the advertised product or service by Cambridge University Press, the American Society of Law, Medicine & Ethics or the journal editor(s). We reserve the right to reject any advertising it deems as inappropriate for this journal.

Member Subscription Information: American Society of Law, Medicine & Ethics member inquiries, change of address, back issues, claims, and membership renewal requests should be addressed to Membership Director, American Society of Law, Medicine & Ethics, 765 Commonwealth Avenue, Suite 1704, Boston, MA 02215; telephone: (617) 262-4990. Requests for replacement issues should be made within six months of the missing or damaged issue. Beyond six months and at the request of the American Society of Law, Medicine & Ethics, the publisher will supply replacement issues when losses have been sustained in transit and when the reserve stock permits.

Claims or Change of Address for Non-Members: Should be directed to subscriptions_newyork@cambridge.org (in the USA, Canada or Mexico) or journals@cambridge.org (elsewhere).

Discover the Entire JLME Back Archive: cambridge.org/jlme/read

Follow JLME on Twitter @JLME_ASLME

THE JOURNAL OF LAW, MEDICINE & ETHICS

VOLUME 52:4 • WINTER 2024

BOARD OF EDITORS

Anita Allen-Castellitto, J.D., Ph.D.
University of Pennsylvania Law School

Wendy K. Mariner, J.D., LL.M., M.P.H.
Boston University School of Public Health

R. Alta Charo, J.D.
University of Wisconsin Law School

Maxwell J. Mehlman, J.D.
Case Western Reserve University

Ellen Wright Clayton, M.D., J.D.
Vanderbilt University School of Medicine

E. Haavi Morreim, J.D., Ph.D.
University of Tennessee College of Medicine

Bernard M. Dickens, Ph.D., LL.D., LL.M.
University of Toronto Faculty of Law

Thomas H. Murray, Ph.D.
The Hastings Center

Barry Furrow, J.D.
Drexel University Earle Mack School of Law

Wendy E. Parmet, J.D.
Northeastern University School of Law

Jay A. Gold, M.D., J.D., M.P.H.
MetaStar, Inc.

Karen H. Rothenberg, J.D., M.P.A.
University of Maryland School of Law

Lawrence O. Gostin, J.D., LL.D. (Hon.)
*Georgetown University Law Center
Johns Hopkins University*

Margaret A. Somerville, A.M., FRSC
McGill University

Ana Smith Iltis, Ph.D.
Wake Forest University

Daniel P. Sulmasy, M.D., Ph.D.
Georgetown University

Nancy M. P. King, J.D.
Wake Forest School of Medicine

Lois Snyder Sulmasy, J.D.
American College of Physicians

John D. Lantos, M.D.
Children's Mercy Hospital

Susan M. Wolf, J.D.
University of Minnesota Law School

Stuart J. Youngner, M.D.
Case Western Reserve University

THE JOURNAL OF
LAW, MEDICINE & ETHICS
C O N T E N T S

VOLUME 52:4 • WINTER 2024

Symposium Articles

**Emerging
Portable
Technology for
Neuroimaging
Research in New
Field Settings:
Legal & Ethical
Challenges**

Guest Edited by
Francis X. Shen,
Susan M. Wolf, and
Frances Lawrenz

759
*Letter from
the Editor*

Cover image ©Getty Images

764

**INTRODUCTION
Revolutionizing Neuroimaging
Research with Highly Portable MRI:
Confronting Ethical and Legal
Challenges**

*Francis X. Shen, Frances Lawrenz, and
Susan M. Wolf (Guest Editors)*

**Section 1: Mapping the
Challenges of Emerging
Portable Neuroimaging
Technologies**

769

**Conducting Research with Highly
Portable MRI in Community Settings:
A Practical Guide to Navigating Ethical
Issues and ELSI Checklist**

*Francis X. Shen, Susan M. Wolf, Frances
Lawrenz, Donnell S. Comeau, Barbara
J. Evans, Damien Fair, Martha J. Farah,
Michael Garwood, S. Duke Han, Judy
Illes, Jonathan D. Jackson, Eran Klein,
Matthew S. Rosen, Efraín Torres, Paul
Tuite, and J. Thomas Vaughan*

Highly portable and accessible MRI technology will allow researchers to conduct field-based MRI research in community settings. Previous guidance for researchers working with fixed MRI does not address the novel ethical, legal, and societal issues (ELSI) of portable MRI (pMRI). Our interdisciplinary Working Group (WG) previously identified 15 core ELSI challenges associated with pMRI research and recommended solutions. In this article, we distill those detailed recommendations into a Portable MRI Research ELSI Checklist that offers practical operational guidance for researchers contemplating using this technology.

786

**Expert Stakeholder Perspectives
on Emerging Technology for
Neuroimaging Research with Highly
Portable MRI: The Need for Guidance
on Ethical, Legal, and Societal Issues**

*Molly K. Madzelan, Frances Lawrenz,
Susan M. Wolf, and Francis X. Shen*

Portable MRI (pMRI) technology, which promises to transform brain imaging research by facilitating scanning in new geographic areas and the participation of new, diverse populations, raises many ethical, legal, and societal issues (ELSI). To understand this emerging pMRI ELSI landscape, we surveyed expert stakeholder views on ELSI challenges and solutions associated with pMRI research.

**Section 2: pMRI Scanning in
New Populations and Settings**

805

**Far from Home: Managing Incidental
Findings in Field Research with Portable
MRI**

Susan M. Wolf and Judy Illes

Portable MRI for neuroimaging research in remote field settings can reach populations previously excluded from research, including communities underrepresented in current brain neuroscience databases and marginalized in health care. However, research conducted far from a medical institution and potentially in populations facing barriers to health care access raises the question of how to manage incidental findings (IFs) that may warrant clinical workup. Researchers should not withhold information about IFs from historically excluded and underserved population when members consent to receive it, and instead should facilitate access to information and a pathway to clinical care.

816

The Realization of Portable MRI for Indigenous Communities in the USA and Canada

*Shana Birly, Angela Teeple,
and Judy Illes*

The paucity of existing baseline data for understanding neurologic health and the effects of injury on people from Indigenous populations is causally related to the limited representation of communities in neuroimaging research to date. In this paper, we explore ways to change this trend in the context of portable MRI, where portability has opened up imaging to communities that have been neglected or inaccessible in the past. We discuss pathways to engage local leadership, foster the participation of communities for this unprecedented opportunity, and empower field-based researchers to bring the holistic worldview embraced by Indigenous communities to neuroimaging research..

824

Socioeconomic Factors in Brain Research: Increasing Sample Representativeness with Portable MRI

Martha J. Farah

People of low socioeconomic status (SES) are often under-represented in biomedical research. The importance of demographically diverse research samples is widely recognized, especially given socioeconomic disparities in health, but have been challenging to achieve. One barrier to research participation by low SES individuals is their distance from research centers and the difficulty of traveling. This article examines the promise of portable magnetic resonance imaging (pMRI) for enrolling participants of diverse SES in structural neuroimaging studies, and anticipates some of the challenges, practical and ethical, that may arise in the course of such research.

830

Portable Accessible MRI in Dementia Research: Ethical Considerations About Research Representation and Dementia-Friendly Technology

*Eran Klein, S. Duke Han, Paul Tuite,
W. Taylor Kimberly, and Mohit Agarwal*

The introduction of portable MRI (pMRI) has the potential to directly impact dementia research and ultimately clinical care. In this paper, we explore two ethical challenges facing the introduction of pMRI in dementia research. The first is the need to ensure that pMRI enhances rather than undermines efforts aimed at improving ethnographic representation in dementia research. The second is the need to implement pMRI in dementia research in a dementia-friendly way that attends to the social context and lived experience of people with dementia.

Section 3: Building a Process for Ethical Research with Portable MRI

840

The Need for IRB Leadership to Address the New Ethical Challenges of Research with Highly Portable Neuroimaging Technologies

*Donnella S. Comeau, Benjamin C. Silverman, Mahsa Alborzi Avanaki,
and Susan M. Wolf*

The emergence of innovative neuroimaging technologies, particularly highly portable magnetic resonance imaging (pMRI), has the potential to spawn a transformative era in neuroscience research. Resourced academic institutional review boards (IRBs) with experience overseeing traditional MRI have a special role to play in ethical governance of pMRI research and should facilitate the collaborative development of nuanced and culturally sensitive guidelines and educational resources for pMRI protocols. This paper explores the ethical challenges of pMRI in neuroscience research and the dynamic leadership role that IRBs should play to promote ethical oversight of emerging pMRI research.

851

Ethical Oversight and Social Licensing of Portable MRI Research

Barbara J. Evans

This article explores two questions: (1) whether portable MRI research might escape regulatory oversight altogether under existing U.S. privacy and research ethical frameworks, leaving research participants without adequate protections, and (2) whether existing regulatory frameworks, when they do apply, can guard society's broader interest in ensuring that portable MRI research pursues socially beneficial, ethically sound aims that minimize the potential for externalities affecting nonparticipating individuals and groups, who might be stigmatized or otherwise harmed even if they decline participation in the research.

Independent Articles

868

Posthumous Sperm Use in Times of War: Ethics, Law and Society

Sharon Bassan

This article delves into the legal developments, bioethical nuances, and societal perspectives surrounding posthumous sperm use, particularly in the context of soldiers falling during their service. It analyzes the Israeli example during The Swords of Iron War, where the bioethical dilemma is decided based on national solidarity, beyond the "clean" bioethical-legal discussion.

THE JOURNAL OF
LAW, MEDICINE &
ETHICS
C O N T E N T S
VOLUME 52:4 • WINTER 2024

878

COMMENTARY

Posthumous Use of Sperm: Legal and Bioethical Reflections on Israeli Policy
Roy Gilbar

883

Payers are Morally Responsible for Reimbursing Social Care by Medical Facilities: How to Make Value-Based Payments Work for Vulnerable Patients
Jacob Riegler

Payers have shaped the healthcare system in the United States as fee-for-service has facilitated a care model that prioritizes volume over the sake of patient care. This worsens health disparities, especially in safety net facilities where ancillary social work is both necessary clinically and completely uncompensated. Using concepts from Iris Marion Young's Responsibility for Justice, it can be concluded that payers have a moral responsibility for reimbursing social care to address historical injustices. In this article, I describe the ethical hazards in paying for social care and propose a way to finance this through value-based payments.

903

COMMENTARY

The Power and Limits of Political Philosophy in Analyzing Healthcare Markets
Lauren A. Taylor

907

How Did Human Rights Fare in Amendments to the International Health Regulations?

Lisa Forman, Judith Bueno de Mesquita, Luciano Bottini Filho, Benjamin Mason Meier, and Matiangai Sirleaf

In this article, we examine the relationship between the World Health Organization International Health Regulations (IHR) and human rights and its implications for IHR reform, considering the evolution of human rights in the 2005 IHR, the role of human rights in IHR reforms and the implications of these reforms in key domains including equity and solidarity, medical countermeasures, core capacities, travel restrictions, vaccine certificates, social measures, accountability, and financing.

922

How Leaders at High-Performing Healthcare Organizations Think About Organizational Professionalism

Julie L. Agris, Sherril Gelmon, Matthew K. Wynia, Blair Buder, Krista J. Emma, Ahmed Alasmar, and Richard Frankel

This pilot study is the first formal exploration of the concept of "Organizational Professionalism" (OP) among health system leaders in high-performing healthcare organizations. Semi-structured key informant interviews with 23 leaders from eight healthcare organizations that were recipients of the Malcolm Baldrige National Quality Award (MBNQA) or Baldrige-based state quality award programs explored conceptualization, operationalization, and measurement of OP. Further exploration and understanding of OP in healthcare organizations has the potential to establish and sustain professional and ethical organizational cultures that bolster trust through the sound implementation of laws, policies, and procedures to support the delivery of high-quality patient care.

Columns

936

PUBLIC HEALTH AND THE LAW
Diminution of Public Health Agency Authorities Post-Loper

James G. Hodge, Jr. and Maxwell Lauzon

940

HEALTH POLICY PORTAL
A Regulatory Roadmap for Repurposing: Comparing Pathways for Making Repurposed Drugs Available in the EU, UK and US

Mirre Scholte, Liam Bendicksen, Sabine E. Grimm, Teebah Abu-Zahra, Bianca Pauly, Manuela Joore, Aaron S. Kesselheim

950

CURRENTS IN CONTEMPORARY BIOETHICS
State-Mandated Ethics Oversight Is Inappropriate for Gender-Affirming Care

Hilary Mabel, Laura Guidry-Grimes, and Lauren R. Sankary

Symposium articles are solicited by the guest editor for the purposes of creating a comprehensive and definitive collection of articles on a topic relevant to the study of law, medicine and ethics. Each article is peer reviewed.

Independent articles are essays unrelated to the symposium topic, and can cover a wide variety of subjects within the larger medical and legal ethics fields. These articles are peer reviewed.

Columns are written or edited by leaders in their fields and appear in each issue of *JLME*.

Next Issue:

Ten Years of Global Health Law
A Symposium Guest Edited by Michele Bratcher Goodwin, Katie Gottschalk & Benjamin Mason Meier