

EDITORIAL STAFF

Editor: George D. Lundberg, MD
Deputy Editor: Richard M. Glass, MD
Deputy Editor (West): Drummond Rennie, MD
Senior Editors: Phil B. Fontanarosa, MD, Margaret A. Winker, MD
Senior Contributing Editor: M. Therese Southgate, MD
Contributing Editors: Charles B. Clayman, MD, Helene M. Cole, MD, Thomas B. Cole, MD, MPH, David S. Cooper, MD, David H. Mark, MD, MPH, Harriet S. Meyer, MD, Carin M. Olson, MD, Ronna Henry Siegel, MD, Jeanette M. Smith, MD, Jody W. Zytko, MD
Consulting Editors: Robert A. Clark, MD, Deborah J. Cook, MD
Statistical Editor: Naomi Vaisrub, PhD
Associate Senior Editor: Annette Flanagin
Associate Editors: Charlene Breedlove, Roxanne K. Young
Fishbein Fellow: Thomas C. Jefferson, MD
Medical News & Perspectives: Marsha F. Goldsmith (editor); Charles Marwick, Mike Mitka, Andrew Kolnick, Joan Stephenson, PhD (associate editors); Rebecca Voelker (contributing editor)
Assistant Editor: Juliana M. Walker

EDITORIAL BOARD

Daniel M. Albert, MD, Madison, Wis
Kenneth A. Arndt, MD, Boston, Mass
H. David Banta, MD, Amsterdam, the Netherlands
Jack D. Barchas, MD, New York, NY
Michael Berger, MD, Düsseldorf, Germany
Robert J. Blendon, ScD, Boston, Mass
Marjorie A. Bowman, MD, MPA, Philadelphia, Pa
Iain Chalmers, MBBS, MSc, Oxford, England
James E. Dalen, MD, Tucson, Ariz
Catherine D. DeAngelis, MD, Baltimore, Md
Lois DeBakey, PhD, Houston, Tex
Ronald G. Evens, MD, St Louis, Mo
Michael E. Johns, MD, Atlanta, Ga
Colin I. Johnston, MB,BS, Melbourne, Australia
Donald A. B. Lindberg, MD, Bethesda, Md
Hervé Maisonneuve, MD, Paris, France
Kenneth D. McClatchey, MD, DDS, Maywood, Ill
Claude H. Organ, Jr, MD, Oakland, Calif
Edmund D. Pellegrino, MD, Washington, DC
Reed E. Pyeritz, MD, PhD, Pittsburgh, Pa
Uwe E. Reinhardt, PhD, Princeton, NJ
Povl Riis, MD, Copenhagen, Denmark
William L. Roper, MD, MPH, Chapel Hill, NC
Roger N. Rosenberg, MD, Dallas, Tex
Rene Solomon, MD, New York, NY
Masaaki Terada, MD, Tokyo, Japan

INTERNATIONAL ADVISORY COMMITTEE

Bassel Atallah, MD, JAMA—Middle East
Mauro Bologna, MD, JAMA—Italy
Yuichiro Goto, MD, JAMA—Japan
Evin Kantemir, MD, JAMA—Turkey
A. J. Khan, SI, FRCP, JAMA—Pakistan
Jin-Pok Kim, MD, JAMA—Korea
C. R. Kumana, MBBS, JAMA—Southeast Asia
Li Chengyi, MD, JAMA—China
Alexandra Livaditou, MD, JAMA—Greece
Maria S. P. da Silva, MD, JAMA—Brazil
Miguel Vilardell Tarres, MD, JAMA—Spain
Ivan Vidmar, MD, JAMA—Slovenia
Jiří Widimský, MUDr, DrSc, JAMA—Czech/Slovak

JAMA (ISSN 0098-7484) is published weekly by the American Medical Association, except for 4 combined issues in months with 3 Wednesdays. Address: 515 N State St, Chicago, IL 60610.

SUBSCRIPTION RATES—The subscription rate for AMA members (\$20 per year) is included in and is not deductible from the annual AMA membership dues. The annual subscription rates for nonmembers are \$145 in the United States and US possessions, \$195 in the Americas, and £125 outside the Americas. The rate for nonmember medical students and resident physicians is \$48 in the United States. The annual institution rates are \$245 in the United States, \$345 in the Americas, and £195 outside the Americas. Address all subscription communications to Subscriber Services Center, American Medical Association, PO Box 10946, Chicago, IL 60610-0946. Phone: (800) 262-2350; fax: (312) 464-5831; e-mail: ama-subs@ama-assn.org.

CHANGE OF ADDRESS—POSTMASTER, send all address changes to: JAMA, The Journal of the American Medical Association, attention: Subscription Department, PO Box 10946, Chicago, IL 60610. Notification of address change must be made at least 6 weeks in advance; include both old and new addresses and a recent mailing label. Periodicals postage paid at Chicago and at additional mailing offices. GST Registration Number: 12622 5556 RT.

JAMA[®] Registered in the US Patent and Trademark Office.

Copyright © 1998 by the American Medical Association



Original Contributions

Randomized Trial of Estrogen Plus Progestin for Secondary Prevention of Coronary Heart Disease in Postmenopausal Women 605

S. Hulley, D. Grady, San Francisco, Calif; T. Bush, Baltimore, Md; C. Furberg, D. Herrington, Winston-Salem, NC; B. Riggs, Radnor, Pa; E. Vittinghoff, San Francisco, Calif; for the HERS Research Group

Evidence for an Alzheimer Disease Susceptibility Locus on Chromosome 12 and for Further Locus Heterogeneity 614

E. Rogaeva, Toronto, Ontario; S. Premkumar, Boston, Mass; Y. Song, Toronto, Ontario; S. Sorbi, Firenze, Italy; N. Brindle, A. Paterson, Toronto, Ontario; R. Duara, Miami Beach, Fla; G. Levesque, G. Yu, M. Nishimura, M. Ikeda, C. O'Toole, T. Kawarai, Toronto, Ontario; R. Jorge, D. Vilarino, Buenos Aires, Argentina; A. C. Bruni, Terme, Italy; L. A. Farrer, Boston, Mass; P. H. St. George-Hyslop, Toronto, Ontario

Genetic Studies on Chromosome 12 in Late-Onset Alzheimer Disease 619

W. S. Wu, St Louis, Mo; P. Holmans, Cardiff, Wales; F. Wavrant-DeVrièze, Jacksonville, Fla; S. Shears, St Louis Mo; P. Kehoe, Cardiff, Wales; R. Crook, Jacksonville, Fla; J. Booth, St Louis, Mo; N. Williams, Cardiff, Wales; J. Pérez-Tur, Jacksonville, Fla; K. Roehl, St Louis, Mo; I. Fenton, Cardiff, Wales; M.-C. Chartier-Harlin, Lille, France; S. Lovestone, London, England; J. Williams, Cardiff, Wales; M. Hutton, J. Hardy, Jacksonville, Fla; M. J. Owen, Cardiff, Wales; A. Goate, St Louis, Mo

National Use and Effectiveness of β -Blockers for the Treatment of Elderly Patients After Acute Myocardial Infarction: National Cooperative Cardiovascular Project 623

H. M. Krumholz, M. J. Radford, New Haven, Conn; Y. Wang, Middletown, Conn; J. Chen, A. Heiat, New Haven, Conn; T. A. Marciniak, Baltimore, Md

Cancer Risk in Women Exposed to Diethylstilbestrol In Utero 630

E. E. Hatch, Bethesda, Md; J. R. Palmer, Boston, Mass; L. Titus-Ernstoff, Lebanon, NH; K. L. Noller, Worcester, Mass; R. H. Kaufman, Houston, Tex; R. Mittendorf, Chicago, Ill; S. J. Robboy, Durham, NC; M. Hyer, Rockville, Md; C. M. Cowan; Chicago, Ill; E. Adam, Houston, Tex; T. Colton, Boston, Mass; P. Hartge, R. N. Hoover, Bethesda, Md

Brief Report

Whooping Cough Caused by *Bordetella pertussis* and *Bordetella parapertussis* in an Immunized Population 635

Q. He, M. K. Viljanen, H. Arvilommi, B. Aittanen, J. Mertosola, Turku, Finland

Review

Treating Achalasia: From Whalebone to Laparoscope 638

A. E. Spiess, P. J. Kahrilas, Chicago, Ill

Health Law and Ethics

Facing Requests for Physician-Assisted Suicide: Toward a Practical and Principled Clinical Skill Set 643

L. L. Emanuel, Chicago, Ill

Commentary

Adolescent Pregnancy and Sexual Abuse 648

M. J. Elders, Little Rock, Ark; A. E. Albert, Boston, Mass

Editorials

Hormone Replacement Therapy and Heart Disease Prevention: Experimentation Trumps Observation 650

D. B. Petitti, Pasadena, Calif

Untangling the Genetics of a Complex Disease 652

M. J. Daly, Cambridge, Mass

This Week in JAMA 585

(Table of Contents continued on next page.)

The Cover	586
Claude-Oscar Monet, <i>Water Lilies</i> M. T. Southgate	
Abstracts	586 k
Medical News & Perspectives	587
International AIDS Conference Faces "New Realism" of Advances, Obstacles . . . US Surgeon General David Satcher, MD, PhD . . . 200 Years of Protecting the Public Health . . . Public Understanding of NIH Funding Sought . . . <i>Miscellanea Medica</i>	
Health Agencies Update	594
Syphilis Genome . . . Antibiotics and Livestock . . . Cocaine and the Brain . . . Growing Neural Spare Parts	
From the Centers for Disease Control and Prevention	595
Foodborne Outbreak of Cryptosporidiosis—Spokane, Washington, 1997 . . . Civilian Outbreak of Adenovirus Acute Respiratory Disease—South Dakota, 1997	
Contempo 1998	597
Adolescents and Illicit Drug Use A. B. Bruner, M. Fishman, Baltimore, Md	
Poetry and Medicine	598 f
Letters	599
Hospital Services in the United States and Canada G. K. Aitken; S. Ma; B. D. Magee; P. R. Linquist; A. D. Redelmeier, C. M. Bell, A. S. Detsky, M. Crystal	
Antihypertensive Agents and the Risk of Cancer F. H. Messerli, E. Grossman; L. Rosenberg	
Cholera Vaccine in Refugee Settings D. A. Sack; A. Naficy, M. R. Rao, J. D. Clemens, D. Antona, A. Surkin	
Hearing Loss Among Children R. A. Dobie; J. H. Davis; A. S. Niskar, S. M. Kieszak, E. Esteban, C. Rubin, A. Holmes, D. J. Brody	
Accuracy of Tick Identification in a Lyme Disease Endemic Area R. C. Falco, D. Fish, V. D'Amico	
Lipid-Lowering Therapy After Myocardial Infarction: The Bavarian Cholesterol Screening Project W. O. Richter, P. Schwandt	
Corrections	604
Clarification of Data Hunger in an Adult Patient Population	
Error in Text Memory Loss—When Is It Alzheimer Disease?	
A Piece of My Mind	654
Profiles in Primary Care	655
Linda Headrick, MD: Seeking a Common Language in Primary Care F. Mullan	
Letter From France	659
Striking Against Managed Care: The Last Gasp of <i>La Médecine Libérale</i> ? P. C. Sorum	
Books, Journals, New Media	665
Disrupted Lives: How People Create Meaning in a Chaotic World (Becker) Reviewed by A. D. Bottomley	
Freud and His Aphasia Book: Language and the Sources of Psychoanalysis (Greenberg) Reviewed by J. T. Shurley	
Between Doctors and Patients: The Changing Balance of Power (Furst) Reviewed by L. R. Kirkland	
The Bends: Compressed Air in the History of Science, Diving, and Engineering (Phillips) Reviewed by F. W. Rudge	
Curing Cancer: The Story of the Men and Women Unlocking the Secrets of Our Deadliest Illness (Walcholz) Reviewed by J. Gutheil	
Laparoscopic Cholecystectomy: Surgical Procedure, Laparoscopic Cholecystectomy: Patient Education Program, Laparoscopic Nissen Fundoplication: Surgical Procedure, Laparoscopic Nissen Fundoplication: Patient Education Program, and Laparoscopic Inguinal Hernia Repair— Transabdominal and Balloon-Assisted Extraperitoneal Approaches: Surgical Procedure (Rosser, Jr) Reviewed by M. S. Tucker	
CD-Atlas of Ophthalmology (Ford, Marsh) Reviewed by E. Z. Blumenthal	
Obituary Listing	670
Resident Forum	670 b
JAMA 100 Years Ago	670 h
Classified Advertising and Announcements	673
JAMA Patient Page: Alzheimer Disease	674
JAMA Reader's Choice: Continuing Medical Education	671

JAMA®

The Journal of the American Medical Association

SCIENTIFIC INFORMATION AND MULTIMEDIA STAFF

Medical News and New Media Division: William M. Silberg (editorial director); Renée Roberts (manager, editorial graphics); Marty Suter (associate editor); Deborah Flapan, Neal Shankman (assistant editors); Marla A. Hall (staff assistant)
Editorial Systems and Administration: Elaine Williams (director), Vee Bailey (electronic input supervisor), Veronica Campos, Lenette Gardner-Gullens (electronic input specialists)

Administrative Assistant: Helga Fritz

Editorial Assistants: Linda Baker, Patricia Joworski, Gale Saulsbery (group supervisors); Kemberly Evans (letters coordinator); Mary Cannon, Susan Collier, Audrey Forman, Shirley Gogins, Gwenn Gregg, Lisa Hardin, Carmina Landeros, Mary Ann Lilly, Christina Myers, Kathie Owens, Ethel Pinkston, Jeni Reiling, Raul Serrato, Gloria Tate

Editorial Processing Division: Cheryl Iverson (director), Diane L. Cannon (freelance manager), Connie Manno (freelance coordinator), Paul Frank (electronic editing specialist), Monica Mungle (assistant electronic editing specialist)

Copy Editing: Laura King (director); Susan R. Benner, Jane C. Lantz (senior copy editors); Coleen Adamson, Joy Jaeger, Brande Martin, Beverly Stewart

PRODUCTION AND DISTRIBUTION STAFF

Production and Distribution Division: Vanessa Hayden (director), Diane Darnell (publishing manufacturing analyst), Bonnie Van Cleven (manager, budgets and costs), Karen Adams-Taylor (director, advertising and production), Linda Knott (director, electronic production), Paul Gasiecki (manager, distribution)

Managers: Phil Arko (composition), Mary Ellen Johnston (database and new media), Teresa Omiotek (proofreading), Carole Piszker (advertising), Susan Price (print production), Charl Richey (color and graphics)

Proofreaders: David Antos, Daniel James, Mary Kay Tinerella, Barbara Wojtowicz

Production Associates and Operators: Joseph Amit, Gail Barrett, Karen Branham, Victoria Buckner, Debbie Camp, Brenda Chandler, La'son J. Diggs, Shannon Epplert, Amy Evers, Betty Frigerio, Kathy Gaydar, Mari Guizzetti, Mary Ann Kuranda, Sandra Lopez, Michael McGraw, Melanie Parenti, Sarah Powell, Jo Anne Turner, Carmela Ware, JoAnne Weiskopf, Alicja Wojcik-Dunn

Production Assistants: Bryan Irzyk, Ruth Sprague

CIRCULATION AND CONTENT MARKETING STAFF

Director, Division of Circulation and Content Marketing:

James A. Skowrenski

Circulation Processing: Beverly Martin (director)

Circulation Development: Bina Oza (director)

Licensing and Permissions: Norman Frankel (director),

Ada Jimenez-Walker (permissions)

Reprint Coordinator: Joseph Rekash

AMA Officers

President: Nancy W. Dickey, MD*

President-Elect: Thomas R. Reardon, MD*

Immediate Past President: Percy Wootton, MD

Secretary-Treasurer: Timothy T. Flaherty, MD*

Speaker, House of Delegates: Richard F. Corlin, MD

Vice-Speaker, House of Delegates: John A. Knote, MD

AMA Trustees

Herman I. Abramowitz, MD; Susan Hershberg Adelman, MD; Yank D. Coble, MD*; Palma E. Formica, MD; J. Edward Hill, MD; Donald T. Lewers, MD* (Vice Chair); William H. Mahood, MD; John C. Nelson, MD*; Donald J. Palmisano, MD, JD; William G. Pledsted III, MD; Bruce A. Scott, MD (Young Physician); Randolph D. Smoak, Jr, MD* (Chair); Andrew M. Thomas, MD (Resident); Jeffrey A. Towson (Student). *Executive Committee.

AMA EXECUTIVE STAFF

Executive Vice President, Chief Executive Officer:

E. Ratcliffe Anderson, Jr, MD

Chief Operating Officer: Lynn Jensen, PhD

Editor in Chief, Scientific Information and Multimedia:

George D. Lundberg, MD

Interim Senior Vice President, Publishing & Business:

Robert L. Kennett

Publisher: Peter J. Murphy

Director of Advertising Sales: Stuart H. Williams

ADVERTISING OFFICES—Eastern: 119 Cherry Hill Rd, 3rd Floor, Parsippany, NJ 07054 (Representatives: Susan J. Carollo, Alice H. Herman [973-263-9191]); **Midwest/Farwest:** 515 N State St IL 60610 (Representative: Jeffrey J. Bonistalli [312-464-2551]); **Classified Advertising:** 312-464-2456

ADVERTISING PRINCIPLES—Advertisements in this issue have been reviewed to comply with the principles governing advertising in AMA publications. A copy of these principles is available on request. The appearance of advertising in AMA publications is not an AMA guarantee or endorsement of the product or the claims made for the product by the manufacturer.

MANUSCRIPT SUBMISSION—Send manuscripts to the Editor, George D. Lundberg, MD, JAMA, 515 N State St IL 60610.

All articles published, including editorials, letters, and book reviews, represent the opinions of the authors and do not reflect the official policy of the American Medical Association or the institution with which the author is affiliated, unless this is clearly specified.