# INFECTION CONTROL AND HOSPITAL EPIDEMIOLOGY®

EDITORIAL	
<u>Yersinia enterocolitica</u> : A New or Unrecognized Nosocomial Pathogen? WILLIAM R. JARVIS, MD	137
ORIGINAL ARTICLES	
Yersinia enterocolitica Infections in Hospitalized Patients: The Problem of Hospital-Acquired Infections CONSTANCE G. CANNON, RN, CIC; CALVIN C. LINNEMANN, JR., MD	139
Increased Use of Pneumococcal Vaccination in a Medicine Clinic Following Initiation of a Quality Assessment Monitor JOANNE K. TOBACMAN, MD	144
A Cluster of Pseudofungemia Associated With Hospital Renovation Adjacent to the Microbiology Laboratory VICIORIA HRUSZKEIVYCZ, BSN; BRUCE RUBEN, MD;	147
CATHERINE M. HYPES, MT (ASCP); GRACE D. BOSTÍC, MT (ASCP) (SM); JOANNA STASZKIEWICZ, MPH; JEFFREY D. BAND, MD	
Antimicrobial Therapy for Methicillin-Resistant <i>Staphylococcus aureus</i> Colonization in Residents and Staff of a Veterans Affairs Nursing Home Care Unit  LARRY J. STRAUSBAUGH, MD; CLEONE JACOBSON, RN, CIC; DAVID L. SEWELL	151 L., PHD;
SUSAN POTTER, MT, THOMAS T. WARD, MD	
BRIEF REPORT  Clustered Bacteremias in a Hemodialysis Unit: Cross-Contamination of Blood Tubing From Ultrafiltrate Waste  ROBERT N. LONGFIELD, MD; WILLIAM G. WORTHAM, MD; LINDA L. FLETCHER, RN, MS; WILLIAM F. NAUSCHEUTZ, PHD	160
BEYOND INFECTION CONTROL: THE NEW HOSPITAL EPIDEMIOLOGY	
Continuous Quality Improvement MICHAEL D. DECKER, MD, MPH	165
READERS' FORUM  Methicillin-Resistant Staphylococcus aureus Infections of Sternal Wounds  ALLAN PERCEVAL, MSC, MASM	173
SHEA NEWS	175
LETTERS TO THE EDITOR	
Statistics and Meaningful Infection Rates (and Reply) DAVID BIRNBAUM, MPH ROBERT P. GAYNES, MD	134
Home Healthcare (and Reply)  JOHANNE MOUSSEAU, RN, NP, MSC  BRYAN SIMMONS, MD	135

Twenty-eight years ago we declared germ warfare.

Cicex\*



## **Meet our** newest weapons.

Twentyeight years ago, Johnson & Johnson Medical. Inc. revolutionized disinfection with the introduction of CIDEX\*

Activated Dialdehyde Solution. And now, we're offering two new additions to the CIDEX Solution Family of Products.

Introducing ENZOL\* Enzymatic Detergent - it breaks down and removes tough, dried-on organic matter from instruments. Plus, easy rinsing means no clogging of scopes.

And, new CIDEX

Solution Test Strips - developed exclusively for monitoring the effectiveness of CIDEX Solution. It's the easiest, most reliable way to detect unintentional dilution. Simply dip a test strip in CIDEX Solution, remove and read.

Depend on Johnson & Johnson Medical to lead the charge in asepsis and infection control. For additional product information, call 1-800-433-5009, or contact your Johnson & Johnson Medical sales representative.

With our two newest additions, the CIDEX Solution Family of Products is the most powerful weapon you have.



Johnson Johnson MEDICAL INC. TRADEMARK LINNIGO



# INFECTION CONTROL AND HOSPITAL EPIDEMIOLOGY ®

#### CONTENTS

EDITORIAL Ventria de Pris de Novembre de la Constantina della Constantina de la Constantina della Cons	137
Yersinia enterocolitica: A New or Unrecognized Nosocomial Pathogen?  WILLIAM R. JARVIS, MD	137
ORIGINAL ARTICLES	
Yersinia enterocolitica Infections in Hospitalized Patients: The Problem	
of Hospital-Acquired Infections	139
CONSTANCE G. CANNON, RN, CIC; CALVIN C. LINNEMANN, JR., MD	
Increased Use of Pneumococcal Vaccination in a Medicine Clinic Following Initiation	
of a Quality Assessment Monitor	144
JOANNE K. TOBACMAN, MD	
A Cluster of Pseudofungemia Associated With Hospital Renovation Adjacent	
to the Microbiology Laboratory	147
VICTORIA HRUSZKEWYCZ, BSN; BRUCE RUBEN, MD; CATHERINE M. HYPES, MT (ASCP);	
GRACE D. BOSTIC, MT (ASCP) (SM); JOANNA STASZKIEWICZ, MPH;	
JEFFREY D. BAND, MD	
Antimicrobial Therapy for Methicillin-Resistant Staphylococcus aureus Colonization	151
in Residents and Staff of a Veterans Affairs Nursing Home Care Unit	131
Larry J. Strausbaugh, MD; Cleone Jacobson, RN, CIC; David L. Sewell, PhD; Susan Potter, MT, Thomas T. Ward, MD	
BRIEF REPORT	
Clustered Bacteremias in a Hemodialysis Unit: Cross-Contamination of Blood Tubing	1.00
From Ultrafiltrate Waste	160
ROBERT N. LONGFIELD, MD; WILLIAM G. WORTHAM, MD; LINDA L. FLETCHER, RN, MS; WILLIAM F. NAUSCHEUTZ, PHD	
BEYOND INFECTION CONTROL: THE NEW HOSPITAL	
EPIDEMIOLOGY	
Continuous Quality Improvement	165
MICHAEL D. DECKER, MD, MPH	
READERS' FORUM	170
Methicillin-Resistant Staphylococcus aureus Infections of Sternal Wounds	173
ALLAN PERCEVAL, MSc, MASM	
DEPARTMENTS	132
Information for Authors	
Letters to the Editor	134
Medical News	170
SHEA News	175
Calendar of Events	179

THE PUBLICATION OF ADVERTISING IN THE JOURNAL DOES NOT CONSTITUTE ANY GUARANTEE OR ENDORSEMENT BY THE SOCIETY FOR HOSPITAL EPIDEMIOLOGY OF AMERICA OR SLACK INCORPORATED OF THE ADVERTISED PRODUCT OR SERVICE OR OF CLAIMS MADE BY THE ADVERTISER. THE PUBLICATION OF ARTICLES AND OTHER EDITORIAL MATERIAL IN THE JOURNAL DOES NOT NECESSARILY REPRESENT THE POLICY RECOMMENDATIONS OR ENDORSEMENT BY THE SOCIETY.

PUBLISHER: Infection Control and Hospital Epidemiology (ISSN-0899-823X) is published exclusively by SLACK Incorporated 12 times a year. Address: 6900 Grove Rd.. 'Thorofare, NJ 08086. Telephone: (609) 848-1000.

COPYRIGHT 1992 by The Society for Hospital Epidemiology of America, Inc. and SLACK Incorporated. All rights reserved. No part of this publication may be reproduced without written permission from the publisher.

SUBSCRIPTIONS: Request; should be addressed to the publisher (except Japan). In Japan, contact Woodbell Incorporated, 4-22-11, Kitakasai, Edogawaku, Tokyo 134, Japan. Subscription rates in the United States and possessions: Individual: One vex-S80.00: Two years—\$115.00: Three wars-\$145.00: Institutional: One year—\$90.00: Two years—\$130.00; Three years\$170.00. Fellows: \$40 per year. Canada: \$18.00 additional each year; all other countries: \$36.00 additional each year. Single copies of &rent issues may be obtained for \$15.00. United States and possessions; \$20.00 all other countries.

REPRINTS: All requests to reprint or use material published herein should be addressed to Lester J. Robeson, SLACK Incorporated. 6900 Grove Rd., Thorofare, NJ 08086. For reprint orders and prices, contact Lester T. Robeson at (609) 848-1000. Authorization to photocopy items for internal or personal use, or the internal or personal use of specific clients, is granted by SLACK Incorporated, provided that the base fee of \$1.00 per copy, plus \$1.5 per page is paid directly to Copyright Clearance Center. 27 Congress St., Salem. MA 01970. This consent does not extend to other kinds of copying, such as for general distribution, resale. advertising and promotional purposes, or for creating new collective works.

CHANGE OF ADDRESS: Notice should be sent to the publisher six weeks in advance of effective date. Include old and new addresses with zip codes. The publisher cannot accept responsibility for undelivered copies. Second-class postage is paid at Thorofare. New Jersey 08086, and additional entry points. Postmaster: Send address changes to SLACK Incorporated. 6900 Grove Rd., Thorofare, NJ 08086.

INFECTION CONTROL AND HOSPITAL EPIDEMIOLOGY is listed in Index Medicos, Current Contents--Clinical Practice, Hospital Literature Index, Cumulative Index to Nursing & Allied Health Literature, Nursing Abstracts, and laboratory Performance Information Exchange System.

#### **EDITORIAL OFFICES**

Vanderbilt University School of Medicine A-1131 Medical Center North Nashville, TN 37232-2637 (615) 343-1095; (615) 343-1882 (FAX)

Email: iche@mcmail.vanderbilt.edu

Michael D. Decker, MD, MPH

MANAGING EDITOR

Susan Cantrell

STATISTICAL EDITOR

Beverly G. Mellen, PhD

SENIOR ASSOCIATE EDITORS

C. Glen Mayhall, MD Gina Pugliese, RN, MS

William Schaffner, MD ASSOCIATE EDITORS

Donald A. Goldmann, MD

Didier Pittet, MD, MS

Andreas Widmer, MD, MS

**SECTION EDITORS** 

**Beyond Infection Control:** The New Hospital Epidemiology

Bryan P. Simmons, MD

Stephen B. Kritchevsky, PhD

Memphis, Tennessee

Wing Hong Seto, MD

Hong Kong

**Disinfection and Sterilization** 

William A. Rutala, PhD, MPH

Chapel Hill, North Carolina

Emerging Infectious Diseases Larry J. Strausbaugh, MD

Portland, Oregon

Robert W. Pinner, MD

Atlanta, Georgia

From the Laboratory

Marcus Zervos, MD

Royal Oak, Michigan Fred C. Tenover. PhD

Atlanta, Georgia Information Management

John A. Sellick, DO

Buffalo, New York

The International Perspective

Mary D. Nettleman, MD, MS

Richmond, Virginia

**Issues in Surgery** James T. Lee, MD, PhD

St. Paul, Minnesota

**Medical News** Gina Pugliese, RN, MS

Chicago, Illinois

Martin S. Favero, PhD

Irvine, California

**Practical Healthcare Epidemiology** Loreen A. Herwaldt, MD

Iowa City, Iowa

**SHEA News** Murray D. Batt, MD

Clarksburg, West Virginia

**Statistics for Hospital Epidemiology** 

David Birnbaum, PhD, MPH Sidney, British Columbia, Canada

**Topics in Long-Term Care** Philip W. Smith, MD

Omaha, Nebraska

Publisher

John C. Carter

**Editorial Director** Jennifer Kilpatrick

**Production Editor** 

Shirley P. Strunk, ELS

**Topics in Occupational Medicine** 

**Vice President/Group Publisher** Richard N. Roash

David Weber, MD, MPH

Chapel Hill, North Carolina

### INFECTION CONTROL AND HOSPITAL EPIDEMIOLOGY®

#### **EDITORIAL ADVISORY BOARD**

Jacques F. Acar, MD

J. Wesley Alexander, MD

Cincinnati, Ohio

Paul Arnow, MD Graham A.J. Ayliffe, MD Chicago, Illinois Birmingham, United Kingdom

St. Louis, Missouri

Beer Sheva, Israel

Atlanta, Georgia

Black Butte, Oregon

Nashville, Tennessee

Bethesda, Maryland

San Diego, California

Nashville, Tennessee

Nashville. Tennessee

Brussels, Belgium

Madison, Wisconsin

Bethesda, Maryland

Atlanta, Georgia

Brussels, Belgium

Buffalo, New York

San Antonio, Texas

Iowa City, Iowa

Houston, Texas

Vienna, Austria

Jerusalem, Israel

Trenton, New Jersey

Mexico City, Mexico

Madison, Wisconsin New York City, New York

Prahran Victoria, Australia

New York, New York

Brentwood Tennessee Minsk, Republic of Belarus

Millwood, Virginia

Barcelona, Spain

Toronto, Ontario, Canada

Montreal, Quebec, Canada

Pittsburgh, Pennsylvania

Minneapolis, Minnesota

Winnepeg, Manitoba, Canada Helsinki, Finland

Munich, Federal Republic of Germany

Bronx, New York

Atlanta, Georgia Nashville, Tennessee

Taipei, Taiwan

Charlottesville, Virginia

Farmington, Connecticut

Los Angeles, California Chapel Hill, North Carolina

Paris, France

Neil L. Barg, MD Yakima, Washington

Elizabeth Ann Bolyard, RN, MPH, CIC Atlanta, Georgia

John M. Boyce, MD Providence, Rhode Island

Professor Dr. Ilja Braveny Munich, Federal Republic of Germany Columbia, South Carolina

Charles Bryan, MD

Christian Brun-Buisson, MD Creteil, France Donald E. Craven, MD Boston, Massachusetts

Sue Crow, MSN, RN, CIC Shreveport, Louisiana

Freiburg, Federal Republic of Germany Franz Daschner, MD

Leigh G. Donowitz, MD Charlottesville, Virginia Charles E. Edmiston, Jr., PhD Milwaukee, Wisconsin

Theodore C. Eickhoff, MD Denver, Colorado

Manhasset, New York

Bruce Farber, MD

Victoria J. Fraser, MD

Peter C. Fuchs, MD, PhD

Richard A. Garibaldi, MD

Velvl Greene, PhD, MPH

Robert Gaynes, MD

David W. Gregory, MD

David K. Henderson, MD

Peter N.R. Heseltine, MD

Karen Hoffmann, RN, CIC, MS

Marguerite McMillan Jackson, RN, PhD

Janine Jagger, MPH, PhD

William R. Jarvis, MD

Douglas S. Kernodle, MD

Robert H. Latham, MD

Lewis B. Lefkowitz, MD Hsieh-Shong Leu, MD, MSc

Jack Levy, MD

Victor Lorian, MD Dennis G. Maki, MD

Professor Dr. Walter Marget

William J. Martone, MD

Allison McGeer, MD

John E. McGowan, Jr., MD Jonathan L. Meakins, MD, DSc

Raf Mertens, MD

Robert R. Muder, MD

Joseph M. Mylotte, MD, CIC

Lindsay Nicolle, MD Juhani Ojajärvi, MD

Michael T. Osterholm, PhD, MPH

Jan Evans Patterson, MD

Sindy M. Paul, MD Michael A. Pfaller, MD

Samuel Ponce de Leon, MD, MSc Isaam Raad, MD

Manfred L. Rotter, MD, DipBact

Theodore Sacks, MD

William E. Scheckler, MD Kent Sepkowitz, MD

Denis Spelman, MD Michael L. Tapper, MD

Clyde Thornsberry, PhD Professor Leonid P. Titov

Timothy R. Townsend, MD

Antoni Trilla, MD, PhD

Professor Wang Shu-Qun

J. John Weems, Jr., MD

Robert A. Weinstein, MD Professor Dr. W. Weuffen

Sergio B. Wey, MD

Greenville, South Carolina

Beijing, People's Republic of China

Chicago, Illinois Greifswald, Federal Republic of Germany

São Paulo, Brazil

Rebecca Wurtz, MD

Evanston Illinois

SLACK Incorporated 6900 Grove Road Thorofare, New Jersey 08086 (609) 848-1000

**Assistant Editor** Eileen C. Anderer

Circulation Manager Lester J. Robeson, CCCP

**Production Director** Christine Malin

**Production Coordinator** Joanne Patterson

**Publishing Director/ Advertising** Wayne McCourt

Pharmaceutical Group Sales Director Michael LoPresti

Advertising Sales Representative Jennine Kane

Classified/Recruitment Sales Manager

Michele Burch

## Protection is our line.



NEUTRALON' Brown Surgical Glove MICRO-TOUCH' Latex Surgical Glove MAXXUS' Orthopaedic Surgical Glove MICRO-TOUCH' XP Latex Medical Glove MICRO-TOUCH' Latex Medical Glove

Protection. The key to our superior glove line. At Johnson & lohnson Medical, Inc., we have a reputation that spans more than 20 years — years dedicated to the research and development of quality gloves that provide maximum protection, optimum fit and excellent touch sensitivity.

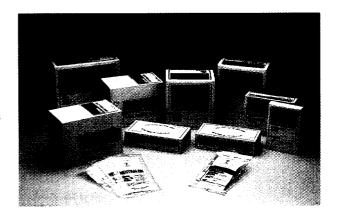
We engineer quality into every aspect of our gloves beginning with 100 percent on-line visual inspection of all latex gloves, and quality standards that far exceed those required by the FDA.

Our protective lines include NEUTRALON' Brown Surgical Gloves, MICRO-TOUCH\* Latex Surgical Gloves, MICRO-TOUCH" Latex Medical Gloves, DISPOS-A-GLOVE" Examination Gloves and both the new MAXXUS\* Orthopaedic Surgical Gloves, and the longer cuff MICRO-TOUCH" XI' Latex Medical Gloves.

Protection and Johnson & Johnson Medical, Inc. - an unbeatable combination.

For more information, contact your Johnson & Johnson Medical, Inc., Medical Specialties Sales Representative or call 1-800-433-5009.





\*TRADEMARK © JJM,INC. 1990



# ow all the sig

There aren't any you can see. The truth is, there is absolutely no way to tell from outward appearance who is infected with HIV, the virus that causes AIDS. So don't fool yourself.

How you act will determine your risk for HIV infection. There are some general rules. Never share drug needles or syringes. And unless you're sure your sex partner isn't infected, don't take a chance. Or at least use a latex condom, correctly, every single time you have sex.

Know how to determine your risk for HIV and AIDS. There is help available. Call your State or local AIDS hotline, or the National AIDS Hotline at 1-800-342-AIDS. Call 1-800-243-7889 (TTY)

RESPONDS

TO AIDS

for deaf access.

#### HIV is **the virus** that causes AIDS.

# INFECTION CONTROL AND HOSPITAL EPIDEMIOLOGY®

## The Society for Hospital Epidemiology of America (SHEA) and SLACK Inc. Copyright and Republication Policy

The Society for Hospital Epidemiology of America (SHEA) and SLACK Inc. hold copyright on Infection *Control and Hospital Epidemiology*. We request that all authors of works transfer to SHEA and SLACK Inc. all rights, title, and interest to such works, including copyright. In accord with the Copyright Act of 1976, we must acquire every author's signature to effect the transfer. A written work cannot be considered for publication until the 'Assignment of Copyright' form is signed by the author or authors and is on file at the editorial offices. Please submit this signed from with your manuscript. In the event that a manuscript is not accepted for publication, this agreement will be returned to the authors.

Signed 'Assignment of Copyright' forms confirm that a work submitted has not previously been published, is not subject to copyright or other rights except those of the author to be transferred to SHEA and SLACK Inc., and is not under consideration for publication elsewhere, except under circumstances communicated to us in writing at the time the work is submitted.

Permission to reproduce any part of the works published by SHEA and SLACK Inc. in *Infection Control and Hospital Epidemiology* in any form or by any means, electronic or mechanical, is not permitted without written permission from SLACK Inc.

#### **Assignment of Copyright**

In consideration of SLACK Incorporated and The Society for Epidemiology of America (collectively called the 'Publisher') in publishing my (our) submitted manuscript, the undersigned hereby transfer(s), assign(s), and otherwise convey(s) all copyright in the manuscript to the Publisher. The undersigned declares that the manuscript is original and, to the best of the undersigned's knowledge, contains no matter that is libelous or unlawful or that infringed upon anyone else's rights of copyright.

In addition, we affirm that the work is the work of every author listed, and is not under consideration for publication elsewhere, except under circumstances communicated to us in writing at the time the work is submitted.

Manuscript Number (ifknown)	DATE
Authors	
TITLE	
ALL AUTHORS	
Signature	Date