



# *Distinguished* LECTURE SERIES

## **Sleep and Circadian Rhythms: Impact on Performance, Health and Safety of U.S. Navy and Marine Corps Personnel**

*Presented by:*

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**MAY 31  
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2 p.m.**  
IN THE JUNKER CENTER



Office of Naval Research  
875 N. Randolph St., Arlington, Virginia  
Bobby Junker Executive Conference Center, 14<sup>th</sup> Floor

# Sleep and Circadian Rhythms: Impact on Performance, Health and Safety of U.S. Navy and Marine Corps Personnel

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Along with nutrition and exercise, sleep is the third, and often unrecognized, pillar of good health, especially in the "can do" culture of the Navy. Insufficient sleep, sleep disorders and circadian disruption impair physical and mental health, performance, productivity and safety, costing the Navy an estimated \$640 million annually.

Real-world events dictate the schedules that military personnel must work. The current operational tempo in the military requires some of the most demanding schedules known, including very long hours and night work. In the Navy's comprehensive review of recent surface force incidents, it was determined that fatigue or ineffective fatigue/rest management was

embedded in all of the mishaps in the Western Pacific, and it was recommended that the Navy should establish a comprehensive fatigue-management policy.

We have shown that implementation of a sleep health education and sleep disorders screening program can substantially reduce the risk of injuries and cut disability day usage in half, even among first responders working 24-hour shifts. A comprehensive sleep health education and sleep disorders screening program could significantly reduce the costs of absenteeism, lost productivity and health care associated with sleep deficiency and circadian disruption among Navy and Marine Corps Personnel.

## ABOUT

### Dr. Charles A. Czeisler

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Charles A. Czeisler, PhD, MD, graduated magna cum laude with a degree in Biochemistry and Molecular Biology from Harvard College, was subsequently inducted into Phi Beta Kappa, and received his PhD in Neuro- and Bio-behavioral Sciences and his MD from Stanford University.

He is Director of the Sleep Health Institute and Chief of the Division of Sleep and Circadian Disorders in the Departments of Medicine and Neurology at the Brigham and Women's Hospital; the Frank Baldino, Jr., PhD Professor of Sleep Medicine, Professor of Medicine, Director of the Division of Sleep Medicine, and an Affiliate Faculty Member in the Neuroscience Program at Harvard Medical School (HMS).

His research is in the field of basic and applied research on human circadian rhythms and sleep-wake function and the impact of sleep loss on vigilance, neurobehavioral performance, and health.

Dr. Czeisler is a member of the National Academy of Medicine, the American Clinical and

Climatological Association, the International Academy of Astronautics, and a Fellow of the Royal College of Physicians (London), the American Physiological Society, the American Society for Clinical Investigation, and the Association of American Physicians. He was formerly President of the Sleep Research Society and Chair of the Board of Directors of the National Sleep Foundation.

Dr. Czeisler is the recipient of the William C. Dement Academic Achievement Award and the Mark O. Hatfield Public Policy Award from the American Academy of Sleep Medicine; the Lifetime Achievement Award and the Healthy Sleep Community Award from the National Sleep Foundation; the Lord Adrian Medal from the Royal Society of Medicine, London; the Distinguished Scientist Award and the Mary A. Carskadon Outstanding Educator Award from the Sleep Research Society; the Johnson Space Center Director's Innovation Award from NASA; and the NIOSH Director's Award for Scientific Leadership in Occupational Safety and Health.