



**James. P. Bagian, MD, PE**



**Patient Safety: Challenges and Ways to Overcome Them**

**Monday November 13, 2017  
4:40PM in 1123 LBME**

Patient safety has become a commonly recognized challenge among not only care providers but patients throughout the world over the last 19 years. Its rise to prominence was spurred by the Institute of Medicine's (now called the National Academy of Medicine) landmark report entitled "To Err Is Human". While initially, there was a good deal of denial in the medical profession that the level and frequency of harm to patients was not as high as the report contended, 44,000 to 98,000 annually, there was general agreement that the number by any accounting was too high. More recently, there have been reports that put the annual number of deaths as high as 250,000 making it the 3rd leading cause of death in the USA. This increase in the reported number of patients harmed may be more a result of the methods used in the counting process rather than an increase in the risk of harm due to care but reinforces the reality that the risk is still one that can benefit from corrective action.

Obstacles to improvement range from a failure to acknowledge that the problem exists, to who is responsible, to an over-simplistic and superficial perspective that seldom goes past the determination of proximate cause and implementation of siloed symptom-based corrective actions. The failure to routinely take a systems-based approach to the identification of vulnerabilities that place the patient at risk and failure to formulate and implement corrective actions that address these foundational vulnerabilities are the principal challenges that the patients and healthcare faces today.

The presentation will identify some of the barriers to improvement and potential approaches to overcome these barriers.

**Dr. James P. Bagian** is the Director of the Center for Healthcare Engineering and Patient Safety and is a Professor in the Department of Anesthesiology in the Medical School and in the Department of Industrial and Operations Engineering in the College of Engineering at the University of Michigan. Previously, he served as the first Director of the VA National Center for Patient Safety (NCPS) and the first Chief Patient Safety Officer for the Department of Veterans Affairs from 1999 to 2010 where he developed numerous patient safety related tools and programs that have been adopted nationally and internationally. Dr. Bagian served as a NASA astronaut and is a veteran of two Space Shuttle missions and was an investigator of both the Challenger and Columbia Space Shuttle mishaps. Presently, he is applying systems engineering approaches to the analysis of medical adverse events and the development and implementation of systems-based corrective actions that will enhance patient safety primarily through preventive means. He received his B.S. in mechanical engineering from Drexel University and his M.D. from Jefferson Medical College at Thomas Jefferson University. He is a Fellow of the Aerospace Medical Association, a member of the National Academy of Engineering, the Institute of Medicine, and has received numerous awards for his work in the field of patient safety and aerospace medicine.

The seminar series "Providing Better Healthcare through Systems Engineering" is presented by the U-M Center for Healthcare Engineering and Patient Safety (CHEPS): Our mission is to improve the safety and quality of healthcare delivery through a multi-disciplinary, systems-engineering approach.

For additional information and to be added to the weekly e-mail for the series, please contact [genehkim@umich.edu](mailto:genehkim@umich.edu)