

February 24, 2006

Dear Prospective Participant:

The Center of Excellence for Simulation Research at Western Michigan University would like to invite you to participate in a research project using healthcare simulation. The research will identify a profile of healthcare team skills using processes developed in the air carrier industry. These skills will be integrated into future curriculums for healthcare professionals. The research is being funded by the Michigan Economic Development Corp – Tri-Corridor Life Science Funding.

The Institute of Medicine (IOM) confirmed in 1999 that patient injuries are common and usually caused by human error within an industry that is highly dependent on individual human performance. Recent figures indicate deaths due to error approach 195,000 annually. In addition to causing human suffering and death, medical errors are financially costly. Medication errors alone are estimated to produce approximately two billion dollars annual direct costs. The IOM estimated that the total indirect cost of medical errors which result in patient harm is between 17 and 29 billion dollars annually.

The IOM urges the healthcare community to look for examples of safety successes in other high-risk industries and specifically to identify simulation-based strategies to reduce medical errors. Our hypothesis holds that the aviation experience offers a model for enhancements within healthcare. Aviation has developed effective processes to mitigate the adverse effects of inevitable human error in complex, time-critical, ill-defined circumstances. There are many similarities between personality types and operating challenges shared between the two industries. However, there are also very important differences between the ways work is conducted within the two domains.

It is our concept to identify a profile of healthcare team performance using simulation and the processes for team skills identification developed in the airline industry. The simulations will be conducted in various locations including within your hospital or clinic environment

We are soon to be at the point where we will need to test our scenarios and skill performances in labs and hospital settings and are inviting you to participate in this research.

If you are interested please contact Beth Seiler at 269-387-7396 or by email at beth.seiler@wmich.edu.

We will be available to discuss the research and answer any questions or concerns you may have regarding the process and what we hope to accomplish. You may contact us at:

PLACE: College of Health and Human Services, Office 3425
Or College of Aviation, Office 1201

PHONE: 269-387-7396

EMAIL: william.rutherford@wmich.edu or william.hamman@wmich.edu

We are very much looking forward to working with you and creating a healthcare team performance model that can be as successful as the one we have developed in the air carrier industry. What we have learned from simulations that we have already conducted in other healthcare systems have been extremely exciting, the participants enjoyed the experience and the information provided to the participants and Healthcare organization has been tremendous.

Sincerely,

Dr. William Rutherford
Principal Investigator

Dr. William Hamman
Co-Principal Investigator