

**UNIVERSITY OF MISSOURI-KANSAS CITY SCHOOL OF MEDICINE
APPLICATION FORM FOR NON-PHYSICIAN FACULTY PROMOTION**

FACULTY SELF ASSESSMENT

Teaching: I have been invited to give short courses at regional, national, and international organizations and I am most proud of the fact that these groups invite me back repeatedly.

My web pages also provide an informal educational resource and are frequently praised by visitors. See www.childrensmerncy.org/stats/details/compliments.asp for some examples that I compiled over the past three years. These web pages number more than 1,300 and cover diverse topics in statistics, research methodology, and ethics.

I have contributed 17 articles and 4 miscellaneous items to Chance News, a Wiki site that provides recent news stories that incorporate concepts in probability or statistics. Chance News is an outstanding pedagogical resource for Statistics teachers who want to show the relevancy of the material they are teaching.

Professional service: I have provided extensive professional service to the American Statistical Association (ASA) over my entire career. I have held several chapter offices for local chapters of the ASA (the Northwest Ohio chapter, the Cincinnati chapter, and most relevant to this application, the Kansas/Western Missouri chapter). I am currently the chair of a national ASA committee (the traveling course committee) that matches nationally renowned statistics teachers with local ASA chapters.

I have also assisted the Kansas University Medical Center with the development of appropriate data monitoring for research studies. I am currently the Vice-Chair of the Data Safety and Monitoring Executive Committee. This committee is unique among medical centers because it provides not the monitoring for any individual trial, but rather an oversight process for all data and safety monitoring. The committee produces policies on monitoring and insures that any study with a conflict of interest requiring independent monitoring is set up with an appropriate review committee.

Advancement of knowledge (Research): I have a sustained record of high quality publications, averaging more than 4 peer-reviewed publications per year over the past decade. Several of these publications have earned major awards, such as a paper with received the Editor's Award for the American Journal of Audiology for the most outstanding publication in the calendar year 2003.

I have provided a mathematical model applying waiting times and control charts to patient safety events that serves as the basis for patent applied for by CMH (A System and Method for Monitoring and Analyzing Data Trends of Interest Within an Organization). I am listed as one of the three inventors on this patent (40% share). CMH is currently negotiating with a major health care software company to purchase the rights to this patent.

I do not track research presentations anymore, because there are just too many of them. Two presentations, however, stand out as special because they received major awards. I was co-author

of a research presentation (Nopper A, Wright T, Tee R, Horii K, Simon S, Popovic J, Alon U. Bone Density in Children With Hemangiomas Treated With Systemic Glucocorticoids) which received the ISSVA "R Schobinger Award" for best clinical paper, presented during the 16th International Workshop on Vascular Anomalies, June 2006, Milano, Italy. I was also the sole author of a presentation (Medical Statistics Case Studies on the Web) which was voted as the best presentation in the area of Teaching Statistics in the Health Sciences at the Joint Statistical Meetings in Anaheim CA, August 1997. I have also been invited to give research talks at two international conferences, in December 2006 and upcoming in December 2007.

It is impossible to find three research publications that represent the best of my work, as my efforts have been diffused across a great number of projects. Here are my choices, based more on emotion than anything else.

1. Statistical Evidence in Medical Trials: What Do the Data Really Tell Us. This is a book that I wrote by myself over a five year span. It started out as a loose collection of web pages that I used in teaching concepts about Evidence Based Medicine. It was published in 2006 by Oxford University Press. It has received several strong reviews (ebm.bmj.com/cgi/reprint/12/2/59.pdf is the best example). A bibliography of all known reviews (both good and bad) with brief excerpts appears on my website at www.childrensmarcy.org/stats/evidence/reviews.asp.

2. Influence of the news media on diagnostic testing in the emergency department. Vidya Sharma, MD Dowd, DS Swanson, AJ Slaughter, Stephen D Simon. Arch Pediatr Adolesc Med 2003; 157(3); 257-60. I am not the first author on this publication, but I provided a statistical model that allowed the researchers to examine the association between newspaper and television coverage and use of diagnostic testing. Although there is much informal speculation that the media exerts a strong influence on clinical practice, this paper represents one of the few attempts to quantify this phenomenon. I'm also proud of this paper because one of the graphs that I produced for this article made it as the cover art for the entire journal.

3. Understanding the odds ratio and the relative risk. Stephen D Simon. J Androl 2001; 22(4); 533-6. I was invited by an editor of the Journal of Andrology to produce a series of articles for the Laboratory Corner that outlined key statistical concepts that lab managers needed to know. This article is my favorite among the series, because it includes a colorful example (mortality on the Titanic) and offers pragmatic advice not found elsewhere in the peer-reviewed literature. The feedback that I received on this and other articles in the series gave me the incentive I needed to start writing the book that I got published five years later.

Candidate's Signature

Print Candidate's Name

Date