

# **How to Discuss Statistics on Live Television**

**Jeffrey S. Rosenthal, University of Toronto**

With the success of his book "Struck by Lightning: The Curious World of Probabilities", the speaker conducted numerous interviews with television, radio, and print media concerning probability and statistics. In this talk, he will reflect on some of the challenges and difficulties he faced, as he attempted to convince the media (and, through them, the viewers) that dice have no memory, willpower can't change poker cards, rain doesn't seek out weekends, crime isn't increasing, lottery jackpots aren't very likely, coincidences aren't causal, airplanes aren't dangerous, polls aren't perfect, and other "obvious" truths that aren't always obvious to everyone. Absolutely no mathematics or statistics background is required to attend.

## **Brief Biography**

JEFFREY S. ROSENTHAL is a professor in the Department of Statistics at the University of Toronto. Born in Scarborough, Ontario, Canada in 1967, he was raised in a very mathematical family: both parents, one grandfather, and one uncle taught math, while another grandfather was an accountant. His interest in probability theory began at an early age; even as a child he enjoyed flipping coins, rolling dice, and computing probabilities.

Rosenthal received his BSc in Mathematics, Physics, and Computer Science from the University of Toronto at the age of 20; his PhD in Mathematics from Harvard University at the age of 24; and tenure in the Department of Statistics at the University of Toronto at the age of 29. He has received several Natural Sciences and Engineering Research Council of Canada research grants, a Premier's Research Excellence Award, and research funding through the Mathematics of Information Technology and Complex Systems initiative, and is a Fellow of the Institute of Mathematical Statistics. A popular lecturer, he has won two teaching awards: a Harvard University Teaching Award in 1991, and an Arts and Science Outstanding Teaching Award at the University of Toronto in 1998. He was awarded the 2006 CRM-SSC Prize in Statistics, and the 2007 Presidents' Award, the most prestigious honour bestowed by the Committee of Presidents of Statistical Societies (COPSS).

Rosenthal's book for the general public, *Struck by Lightning: The Curious World of Probabilities*, was a bestseller in Canada, and is being published in a total of sixteen countries and nine languages. Previously, Rosenthal published two textbooks about probability theory, one at the graduate level (*A First Look at Rigorous Probability Theory*, World Scientific, 2000), and one at the undergraduate level (*Probability and Statistics: The Science of Uncertainty*, with M.J. Evans, W.H. Freeman, 2003). He has published over seventy research papers, many related to the field of Markov chain Monte Carlo randomised computer algorithms. He has also worked as a computer game programmer, musician, and improvisational comedy performer, and is fluent in French. He maintains the web site [probability.ca](http://probability.ca). Despite being born on Friday the thirteenth, Rosenthal has been a very fortunate person.