I view myself as somewhere between an applied mathematician and an engineer, who has a good knowledge of stochastic simulation. As famous psychologist Abraham Maslow said, "if all you have is a hammer, everything looks like a nail." So basically, I try to use stochastic simulation to solve every problem that I find interesting. Throughout my academic career, I have also picked up some tools from applied probability, statistics, optimization and, recently, artificial intelligence, and integrated them into stochastic simulation to make the hammer more powerful.

Almost all my research work in past twenty years may be put into one of the following six bins. Some of them may belong to more than one bin. Click the links of the following six bins, you will find more information on what we have done and what we are doing in these areas.

* Simulation optimization
* Ranking and selection
* Monte Carlo methods in financial engineering
* Monte Carlo methods in stochastic programming
* Emerging areas in stochastic simulation
* Operations analytics

If you are looking for a paper, here is the full list of my publications and preprints organized chronologically.