



# Whatever Happened to Ron Boisvert

Then	Capsule Summary	Now
	<p>Born in: Manchester, NH            Grew Up in: Manchester, NH            High School: Bishop Bradley High School            College Degrees:              BS Math, Keene State College, 1973;              MS Applied Science, College of William and Mary, 1975;              MS Computer Science, Purdue University, 1977;              PhD Computer Science, Purdue University, 1979.            Lived/Worked in: Maryland suburbs of Washington, DC            Contact: boisvert@nist.gov</p>	
<p>Purdue Highlights</p>	<p>Career Highlights</p>	
<p>Ron came to Purdue in 1975 aiming to work on mathematical software. ACM had just started a new journal on that topic and Purdue's John Rice was the Editor-in-Chief, so Purdue was the place to be. As the only numerical analyst among the grad students he was in charge of getting all the others through the required qualifying exam on that topic. (His cohorts included Steve Tolopka, Don Dennis and Jim Miller) In his first year he was one of a team of grad students teaching CS 101 organized by recent Purdue PhD Dorothy Denning. For the next 3 years he was supported by the ELLPACK project, which was developing a large scale system for the experimental evaluation of algorithms for solving elliptic partial differential equations (PDEs). ELLPACK had its own application-oriented high-level language supported by a large library of "software parts" -- all very innovative at the time. His thesis was on high order accurate discretization methods for elliptic problems. Due to the fact that he arrived in the at 8 am each day, he ended up being the first of his peers to finish. When he returned for graduation ceremonies the next spring a frisbee golf tournament on the ad hoc course that wound through married student housing was held in his honor.</p>	<p>Ron graduated at a time when everyone seemed to want to hire computer scientists. He had multiple job offers from universities, companies, and government labs, but instead chose to work for a relatively obscure government agency, the National Bureau of Standards. A research lab in the Commerce Department specializing in measurements and standards, NBS was trying to modernize its computing capabilities, and created a new unit, the Scientific Computing Division, to do it. (It turns out that Ron's professor at Purdue, John Rice, had been a postdoc at NBS years before.) Ron thought he'd stay there five years, tops. Thirty-three years later, he's still there. (NBS became the National Institute of Standards and Technology, NIST, in 1985.) Ron is now the Chief of NIST's Applied and Computational Mathematics Division, which has a staff of about 75. As a researcher at NBS/NIST, Ron collaborated with physical scientists doing mathematical modeling, and developed novel algorithms, implementing them in reusable libraries for problems such as solving PDEs, computing FFTs, and evaluating special functions. He built a catalog known as the Guide to Available Mathematical Software (GAMS), which was NIST's first Web service. Other services he helped develop include the Matrix Market (test data for linear algebra) and the Digital Library of Mathematical Functions (<a href="http://dlmf.nist.gov/">http://dlmf.nist.gov/</a>). Ron has served as Editor-in-Chief of the ACM Transactions on Mathematical Software, a journal founded by John Rice (1992-2005), Co-Chair of the Numerics Working Group of the Java Grande Forum (1998-2003), and Chair of the International Federation for Information Processing (IFIP) Working Group 2.5 on Numerical Software (2000-2012). He is currently Co-Chair of the Publications Board of the Association for Computing Machinery (ACM). He has several distinctions, including the U.S. Department of Commerce Silver Medal for Meritorious Federal Service (1992) and Gold Medal for Distinguished Achievement (2011). He has also received the Outstanding Contribution to ACM Award (2000), the Keene State College Alumni Achievement Award (2002), and the Outstanding Alumni Award from the Purdue University Department of Computer Science (2012). He was named an ACM Distinguished Scientist in 2006, and received the IFIP Silver Core distinction in 2007.</p>	

