Ponnurangam Kumaraguru (PK)

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EDUCATION

Ph.D., Computer Science, Carnegie Mellon University, USA
Sep 2004 - May 2009. Advisor: Dr. Lorrie Faith Cranor

M.S., Computer Science, Carnegie Mellon University, USA
Sep 2004 - May 2007. Advisor: Dr. Lorrie Faith Cranor

M.S., Software Systems, Birla Institute of Technology and Science, Pilani, India
Dec 2000 - May 2002. Advisor: Dr. Sandip Deb

B. Eng., Electronics and Communication Engineering, Madras University, India
Apr 1994 - Apr 1998.

RESEARCH EXPERIENCE

Graduate Research Assistant - Carnegie Mellon University (CMU), USA, Sep 2004 - present

Current:
- Lead of a team developing PhishGuru, an email-based anti-phishing training system, National Science Foundation (NSF) funded project. Advisors: Dr. Lorrie Cranor, Dr. Jason Hong, Dr. Vincent Aleven and Dr. Alessandro Acquisti

- Member of a team developing Anti-Phishing Phil, an interactive game that teaches users how to identify phishing URLs, NSF funded project. Advisors: Dr. Lorrie Cranor, Dr. Jason Hong, Dr. Vincent Aleven and Dr. Alessandro Acquisti

- Lead in developing a trust model for characterizing online users' decision making within the context of phishing, NSF funded project. Advisors: Dr. Alessandro Acquisti and Dr. Lorrie Cranor

- Member of a team helping Wombat Security Technologies, Inc. to develop educational technologies to combat phishing. My research work at Carnegie Mellon University has contributed in creating this company.

Completed:
- Designed user interface for Tor (Anonymous Internet communication system) GUI contest. Advisors: Dr. Lorrie Cranor and Dr. Jason Hong

- Analyzed the privacy reports by Dr. Alan Westin, to create a trend analysis of groups of people defined in the reports. Advisor: Dr. Lorrie Cranor

- Analyzed mental models of people with respect to perceptions of privacy in India and in the US. Advisor: Dr. Lorrie Cranor

Research Scholar - Carnegie Mellon University, USA, Aug 2003 - Aug 2004

- Analyzed the technical features and characteristics of Enterprise Privacy Authorization Language (EPAL). Advisor: Dr. Latanya Sweeney
- Built a module for learning personal privacy preferences from system usage and user feedback in the Reflective Agents with Distributed Adaptive Reasoning (RADAR) project. Advisors: Dr. Raj Reddy, Dr. Latanya Sweeney and Dr. Anthony Tomasic
- Conducted a written survey and interviews among 410 and 29 people respectively in India. Advisor: Dr. Lorrie Cranor and Dr. Raj Reddy

Research Scientist - Language Technologies Research Centre, International Institute of Information Technology (IIIT) - Hyderabad, India, Jan 2003 - Aug 2004

- Worked on a module for personalizing search engine results
- Analyzed user modelling and user preferences of search engine users. This involved natural language processing of the text provided as queries.
  Advisors: Dr. Rajeev Sangal and Dr. VasuDeva Varma

INDUSTRIAL EXPERIENCE

Summer Intern - National Association of Software and Service Companies (NASSCOM), May 2007 - Aug 2007.

- Strategized the roadmap, mission, and activities for the Data Security Council of India (DSCI). Interacted remotely with NASSCOM from the inception stages of DSCI and I am helping DSCI with their research and education activities till date
- Strategized the research and academic activities of the Cyber Security Research Center (CSRC), Chandigarh, India
- Lead in organizing a roundtable discussion on "Privacy in India."
  Advisors: Mr. Kiran Karnik (President, NASSCOM), Mr. Shyamal Ghosh (Chairman, DSCI) and Mr. Nandkumar Saravade (Director of Cyber Security and Compliance, NASSCOM)

Summer Intern - National Association of Software and Service Companies (NASSCOM), May 2006 - Aug 2006.

- Conducted interviews with experts (attorneys, technologists, journalists, entrepreneurs, consumer groups and government employees) to understand their perceptions of privacy
- Lead in organizing the first roundtable discussion on "Privacy in India."
  Advisors: Mr. Kiran Karnik (President), Mr. Sunil Mehta (Vice President) and Mr. Nandkumar Saravade (Director of Cyber Security and Compliance)

Senior Knowledge Officer - SlashSupport, Inc. India, April 2000 - Dec 2002

- Designed and developed knowledge management tools CaseTracker, iLearning and Knowledgebase builder (KBWare) which helped to lower turnaround time for solving customer problems
- Managed a team of 6 developers for designing and implementing 24 Customer Focused, Active, Reliable, Advanced Technology Service (24 CARATS), a portal for sharing knowledge among employees

- Designed and implemented the official website of SlashSupport, Inc.
- Advised graduate students (Masters) for final year projects
  Advisors: Dr. Sandip Deb and Mr. Raghuraman

Design Engineer, Genus Overseas Electronics Private Ltd., India, Aug 1999 - March 2000

- Designed, coded, tested and implemented intelligent static energy meters
- Analyzed and provided solutions according to the technical specifications provided by customers. Advisor: Mr. Tapan Kapoor

TEACHING EXPERIENCE

Successfully completed the Eberly Center for Teaching Excellence program, Documentation of Teaching Development, Carnegie Mellon University, Spring 2006 - Spring 2008.
- Attended seminars and one-on-one consultation with faculty on teaching skills
- Created a complete syllabus for a course Introduction to Cyber crime and Privacy
- Completed a project using the skills learned from the seminars

Teaching Assistant, School of Computer Science (SCS), CMU, Mobile and Pervasive Computing Services (08-781/08-766/46-866 - 9 units), Spring 2008
- Helped in creating homework assignments and exams
- Graded homework assignments
- Gave guest lectures

Teaching Assistant, SCS, CMU, Web Commerce, Security and Privacy (15-421/17-450/17-701 - 12 units), Fall 2006
- Helped in creating homework assignments and exams
- Graded homework assignments
- Gave guest lectures

Teaching Co-ordinator and Mentor, Master of Science in Information Technology (MSIT), IIIT - Hyderabad, Jan 2004 - Aug 2004
- Taught a mini semester course on Introduction to Privacy Technologies
- Advised graduate students (Masters) on various projects

Teaching faculty, IIIT - Hyderabad, Jan 2004 - Aug 2004
- Taught a mini semester course on Introduction to Privacy Technologies

Lecturer, Raja Rajeswari Engineering College, Chennai, India, Jan 1999 - Aug 1999
- Taught Electron Devices, Digital Electronics and Microprocessor Programming

JOURNAL PUBLICATIONS

- **Kumaraguru, P.**, Sheng, S., Acquisti, A., Cranor, L., and Hong, J. *Teaching Johnny Not to Fall for Phish.* Accepted in Association for Computing Machinery's Transactions on Internet Technology (TOIT).
- Karat, J., Bertino, E., Li, N., Ni, Q., Brodie, C., Lobo, J., Calo, S. B., Cranor, L. F., **Kumaraguru, P.**, and Reeder, R. W. *A Policy Framework for Security and Privacy Management.* IBM Journal of Research and Development, Harmonizing Security and Privacy, Volume 53, Number 2, 2009.

SELECTED PUBLICATIONS

- **Kumaraguru, P.** Cranshaw, J., Acquisti, A., Cranor, L., Hong, J., Blair, M. A., and Pham, T. *School of Phish: A Real-World Evaluation of Anti-Phishing Training.* Accepted in Symposium On Usable Privacy and Security, 2009.

- **Kumaraguru, P.**, Sheng, S., Acquisti, A., Cranor, L., and Hong, J. *PhishGuru: Lessons From a Real World Evaluation of Anti-Phishing Training.* In e-Crime Researchers Summit, Anti-Phishing Working Group, October 15 - 16, 2008, Atlanta, USA.

- **Kumaraguru, P.**, Sheng, S., Acquisti, A., Cranor, L., and Hong, J. *Anti-Phishing Education.* In Proceedings of The International Conference on E-Learning in the Workplace (ICELW 2008).

- Sheedy, C., **Kumaraguru, P.** *A Contextual Method for Evaluating Privacy Preferences.* Policies and Research in Identity Management (IDMAN), October 11 - 12, 2007, Rotterdam, The Netherlands.

- **Kumaraguru, P.**, Rhee, Y., Sheng, S., Hasan, S., Acquisti, A., Cranor, L.F., and Hong, J. *Getting users to pay attention to anti-phishing education: Evaluation of retention and transfer.* In e-Crime Researchers Summit, Anti-Phishing Working Group, October 4 - 5, 2007, Pittsburgh, USA.

- Sheng, S., Magnien, B., **Kumaraguru, P.**, Acquisti, A., Cranor, L.F., Hong, J., and Nunge, E. Anti-phishing phil: The design and evaluation of a game that teaches people not to fall for phish. In SOUPS '07: Proceedings of the 3rd symposium on Usable privacy and security (New York, NY, USA, March 2007), ACM, pp.8899. Symposium On Usable Privacy and Security.

- **Kumaraguru, P.**, Cranor, L., Lobo, J., and Calo, S. A survey of privacy policy languages. Workshop on Usable IT Security Management (USM 07). In SOUPS '07: Proceedings of the 3rd symposium on Usable privacy and security (New York, NY, USA, March 2007), ACM, Symposium On Usable Privacy and Security.

- **Kumaraguru, P.**, Rhee, Y., Acquisti, A., Cranor, L.F., Hong, J., and Nunge, E. *Protecting people from phishing: the design and evaluation of an embedded training email system.* In CHI '07: Proceedings of the SIGCHI conference on Human factors in computing systems, New York, NY, USA, May, 2007, ACM Press, pp.905 - 914.

- **Kumaraguru, P.**, Acquisti, A., and Cranor, L. *Trust modeling for online transactions: A phishing scenario.* In the proceedings of Privacy Security Trust, Oct 30 - Nov 1, 2006, Ontario, Canada

- **Kumaraguru, P.**, Cranor, L., and Newton, E. *Privacy Perceptions in India and the United States: An Interview Study.* In The 33rd Research Conference on Communication, Information and Internet Policy (TPRC), Sep 23 - Sep 25, 2005, The National Center for Technology and Law, George Mason University School of Law, USA.

- Diesner, J., **Kumaraguru, P.**, and Carley, K. *Mental Models of Data Privacy and Security Extracted from Interviews with Indians.* 55th Annual Conference of the International Communication Association (ICA), May 26-30, 2005. New York, NY.

- **Kumaraguru, P.**, and Cranor, L. *Privacy in India: Attitudes and Awareness.* In Proceedings of the 2005 Workshop on Privacy Enhancing Technologies (PET 2005), 30 May - 1 June 2005, Dubrovnik, Croatia.

REPORTS PUBLISHED	• **Kumaraguru, P.**, Cranshaw, J., Acquisti, A., Cranor, L., Hong, J., Blair, M. A., and Pham., T. *School of Phish: A Real-Word Evaluation of Anti-Phishing Training.* Technical report, Carnegie Mellon University, March, 2009. http://www.cylab.cmu.edu/research/techreports/cmucylab09002.pdf
	• **Kumaraguru, P.**, Sheng, S., Acquisti, A., Cranor, L.F., and Hong, J. *Teaching johnny not to fall for phish.* Technical report, Carnegie Mellon University, January, 2007. http://www.cylab.cmu.edu/files/cmucylab07003.pdf.
	• **Kumaraguru, P.**, Rhee, Y.W., Acquisti, A., Cranor, L., Hong, J., and Nunge, E. *Protecting people from phishing: The design and evaluation of an embedded training email system.* Technical report, Carnegie Mellon University, November, 2006. http://www.cylab.cmu.edu/files/cmucylab06017.pdf.
	• **Kumaraguru, P.**, and Cranor, L. *Privacy Indexes: A Survey of Westin's Studies.* Tech. rep. CMU-ISRI-5-138, December 2005, Institute for Software Research International (ISRI), Carnegie Mellon University.
	• Egelman, S., and **Kumaraguru, P.** DIMACS Workshop and Working Group Meeting on Usable Privacy and Security, DIMACS Center - Rutgers University, July 7 - 9 2004.
WORKING PAPERS	• *Expert and Non-expert Decision Making in Online Trust Scenarios* (Journal version).
	• *A Survey of Privacy Policy Languages* (Journal version)
OTHER ACADEMIC PURSUITS	• Post Graduation Diploma in Personnel Management and Industrial Relations. Aug 1998 - May 1999. Annamalai University, India
	• Post Graduate Diploma in Computer Applications. Aug 1997 - Aug 1998. Loyola Institute of Business Administration - Informatics Center, India
HONORS AND AWARDS	• Full financial scholarship for Ph.D. supported by Carnegie Mellon CyLab and NSF, Sep 2004 - present
	• Full financial scholarship for M.S., Software Systems by SlashSupport, Inc., Dec 2000 - May 2002
	• Member of the "Best Stall Award" winning team at IT.com, India, Nov 2000
	• Partial Financial Scholarship for High School, Apr 1992 - Apr 1994
	• General Proficiency award in the Math talent Examination conducted by Gnanadheep Academy, March 1992
RELEVANT GRADUATE COURSEWORK	Carnegie Mellon University, USA • Cognitive Modeling and Intelligent Tutoring System, fall 2008, 05 - 832 • Research Methods for the Learning Sciences, spring 2008, 85 - 748 • Usable Privacy and Security, spring 2006, 17 - 500 • Survey Design Analysis, spring 2006, 19 - 703 • Applied Data Analysis, spring 2006, 19 - 704 • Statistical Theory for Social and Policy Research, fall 2005, 90 - 905 • Algorithms in the Real World, fall 2005, 15 - 853 • Advanced Artificial Intelligence, spring 2005, 15 - 780 • Privacy Policy, Law, and Technology, fall 2004, 17 - 801 • Dynamic Organizations and Networks, fall 2004, 17 - 756 • Computation, Organization and Society Lab, fall 2004, 17 - 710 • Database Management, fall 2003, 95 - 703

- Privacy and Anonymity in Data, fall 2003, 17 - 802

International Institute of Information Technology, Hyderabad, India
- Natural Language Processing, spring 2003
- Computational Linguistics, spring 2003

Birla Institute of Technology and Science, Pilani, India
- Management Information Systems, spring 2001

PROGRAMMING EXPERIENCE
- JAVA, C, C++, PHP, MYSQL
- Matlab, Mathematica, Minitab, R

SERVICE
- Reviewer for Impact: Journal of Applied Research in Workplace E-learning
- Reviewer for ACM's Transactions on Internet Technology (TOIT)
- Program Co-Chair, eCrime Researchers Summit, 2009
- Usable Security Track Co-Chair, International conference and workshop on Cyber Security, Cyber Crime and Cyber Forensics, 2009
- Reviewer for International Journal of Information Security
- External reviewer for Financial Cryptography 2009
- Panelist for selecting best course project in 08-731 - Web commerce, security, and privacy, Fall 2008, CMU
- Judge in evaluating course projects in 95-762 - Privacy in the Digital Age, Fall 2008, CMU
- Program committee member of eCrime Researchers Summit, 2009
- Reviewer for Computer Human Interaction (CHI), 2009
- Active member of the Internet Policy Committee (IPC), Anti-Phishing Working Group
- Student volunteer, Symposium On Usable Privacy and Security, 2008
- Program committee member of Faculty Workshop on Secure Software Development, 2008
- Active member of the Advisory board for creating a credential Certified Information Privacy Professional (Information Technology), CIPP(IT) for International Association of Privacy Professionals (IAPP)
- External reviewer for Computer Human Interaction (CHI), 2008
- Program committee member of e-business congress in Toronto, 2007
- External reviewer for 7th Workshop on Privacy Enhancing Technologies, 2007
- External reviewer for 4th International Conference on Trust, Privacy & Security in Digital Business, 2007
- Program committee member of W3C Workshop on Languages for Privacy Policy Negotiation and Semantics-Driven Enforcement, 2006
- External reviewer for 3rd International Conference on Trust, Privacy & Security in Digital Business, TrustBus, 2006
- External reviewer for International Conference on Privacy, Security and Trust, PST, 2006

- Graduate student representative to the Graduate Student Assembly (GSA) of Carnegie Mellon University for COS PhD. program (Spring 2006, Fall 2006)
- Posters Co-chair for Symposium On Usable Privacy and Security, 2005
- President of the Software Process Improvement Network (SPIN), IIIT Hyderabad Chapter, India, Feb 2003 - Feb 2004

AFFILIATIONS

- Member of CMU Usable Privacy and Security Laboratory (CUPS)
- Student member of Association for Computing Machinery (ACM)
- Student member of International Association of Privacy Professionals (IAPP)

SELECTED TALKS

- Teaching Johnny Not to Fall for Phish, (ISC)2 e-symposium, March 17, 2009. *Invited*
- Identity theft. Guest lecture, 08-733 - Privacy Policy, Law, and Technology, CMU, Nov 11, 2008. *Invited*
- Phishing: Countermeasures. Guest lecture, 08-731 - Web commerce, security, and privacy, CMU, Sep 30, 2008. *Invited*
- Popularizing inter-disciplinary research in developing countries. Reading group for Human Computer Interaction in the Developing World, CMU, May 21, 2008. *Invited*
- Trust and semantic attacks. Guest lecture, 08-734 - Usable Privacy and Security, CMU, March 17, 2008. *Invited*
- Mobile Commerce & Mobile Enterprise Applications Today. Lecture, 08-766 - Mobile and Pervasive Computing Services, CMU, Feb 14, 2008.
- Mobile Internet Programming. Lecture, 08-766 - Mobile and Pervasive Computing Services, CMU, Jan 29, 2008.
- Getting users to pay attention to anti-phishing education: Evaluation of retention and transfer, e-Crime Researchers Summit, Anti-Phishing Working Group, October 5, 2007, Pittsburgh, USA.
- PhishGuru: A System for Educating Users about Semantic Attacks, Indian Institute of Technology, Kanpur, India, Aug 9, 2007. *Invited*
- Privacy and security research at CMU and around the globe. International Institute of Information Technology, Pune, India, July 17, 2007. *Invited*
- PhishGuru: A System for Educating Users about Semantic Attacks, Tata Research Development and Design Centre (TRDDC), Pune, India, July 11, 2007. *Invited*
- PhishGuru: A System for Educating Users about Semantic Attacks, Indian Institute of Technology, Bombay, India, July 6, 2007. *Invited*
- International perspective of Cyber Security, Symposium on Cyber Security Awareness, Cyber Security Research Centre, Chandigarh, May 23, 2007. *Invited*
- Protecting people from phishing: the design and evaluation of an embedded training email system. Computer Human Interaction (CHI), May 1, 2007.
- Trust in Phishing. Special Interest Group on Online Trust. Computer Human Interaction (CHI), May 1, 2007.
- Final report: what do we expect? Special lecture, 15-421 - Web Security, Privacy and Commerce, CMU, Nov 09, 2006.

- Trust modeling for online transactions: A phishing scenario. Privacy Security Trust, Oct 30 - Nov 1, 2006, Ontario, Canada.

- Introduction to Mobile Application Programming. Special lecture, 15-421 - Web Security, Privacy and Commerce, CMU, Oct 09, 2006.

- Semantic Attacks. Guest lecture, 15-421 - Web Security, Privacy and Commerce, CMU, Sept 19, 2006.

- What I did this (2006) summer. CUPS group meeting, CMU, Sept 13, 2006.

- Privacy in India. Round table discussion, Mumbai, India, Aug 08, 2006.

- Privacy Perceptions in India and the United States: An Interview Study. Telecommunications Policy Research Conference (TPRC), Washington DC, USA, Sep 25, 2005.

- Privacy in India: Attitudes and Awareness. Privacy Enhancing Technologies (PET), Croatia, June 01, 2005.

- Question answering system. Reflective Agents with Distributed Adaptive Reasoning (RADAR), CMU, Nov, 2003.

POSTERS, AND DISCUSSIONS (incomplete)

- Egelman, S., and Kumaraguru, P. Metrics for Characterizing Research Participants' Technical Knowledge. In Symposium On Usable Privacy and Security. July 23 - 25, 2008 (*discussion*).

- Kumaraguru, P., Sheng, S., Acquisti, A., Cranor, L., and Hong, J. Testing PhishGuru in the Real World. In Symposium On Usable Privacy and Security. July 23 - 25, 2008 (*poster*).

- Kumaraguru, P. Privacy in India. MindSwap. October 19 - 20, 2007 (*poster*).

- Sheng, S., Magnien, B., Kumaraguru, P., Acquisti, A., Cranor, L., and Hong, J. Anti-Phishing Phil: a Game that Teaches People not Fall for Phish. In CyLab Corporate Partners Conference. May 9 - 11, 2007 (*poster*).

- Kumaraguru, P., Rhee, Y., Sheng, S., Acquisti, A., Cranor, L., Hong, J., and Nunge, E. PhishGuru: A System for Educating Users about Semantic Attacks. In CyLab Corporate Partners Conference. May 9 - 11, 2007 (*poster*).

- Kumaraguru, P., Acquisti, A., Downs, J., and Holbrook, M. Trust and Mental Models of Online Security Threats. In CyLab Corporate Partners Conference. Spring 2006 (*poster*).

- India and Outsourcing. Panel discussion, Privacy Summit, IAPP, Washington DC, March, 2006 (*discussion*).

- Bhave, A., and Kumaraguru, P. Incorporating ICT in 'Learning by Doing' In India. 40th Annual National Convention of Computer Society of India. Nov 9 - 12, 2005 (*discussion*).

- Kumaraguru, P., and Cranor, L. Privacy in India: Attitudes and Awareness. In CyLab Corporate Partners Conference. April 13-15, 2005 (*poster*).

SELECTED NEWS

- Teaching Consumers On-Line Safety Easiest When They Take the Bait, **Business Wire**, Oct 15, 2008.
  http://www.businesswire.com/news/home/20081015006058/en

- Web tool detects something phishy, **Pittsburgh Tribune-Review**, Dec 11, 2007.
  http://www.pittsburghlive.com/x/pittsburghtrib/news/cityregion/s_542119.html

- Researchers: Current education inadequate to fight phishing, **Computerworld**, 10 Oct 2007.
  http://www.computerworld.com.au/index.php/id;112125935;fp;2;fpid;1

- Phishers won't stop as long as users continue to click, **MacWorld**, Oct 10, 2007.
  http://www.macworld.com/article/60463/2007/10/phish.html

- Antiphishing education requires real-world techniques, **NetworkWorld**, Oct 8, 2007.
  http://www.networkworld.com/news/2007/100807-real-antiphishing-education.html

- Phishing victims learn online security lesson, **Vnunet**, Oct 3, 2007.
  http://www.vnunet.com/vnunet/news/2200372/phishing-victims-learn-online

- Fighting Phish. **Dr. Dobbs Portal**, Oct 2, 2007.
  http://www.ddj.com/security/202200218

- Coolest Security Tool Ever!, **Softpedia**, Oct 2, 2007.
  http://news.softpedia.com/news/Coolest-Security-Tool-Ever-67362.shtml

- Can you spot a phish? Play Carnegie Mellon's game and see, **Computer-World**, Sep 28, 2007. http://www.computerworld.com/action/article.do?command=viewArticleBasic&articleId=9039758

- CMU develops scam-busting online game, **C|Net News.com**, Sep 28, 2007.
  http://www.news.com/8301-10784_3-9787549-7.html?tag=nefd.only

- Fighting Phishing With Fun, **Chronicle of Higher Education**, Sep 28, 2007.
  http://chronicle.com/wiredcampus/index.php?id=2417

- Online Game Helps People Recognize Internet Scams, **Science Daily**, Sep 28, 2007. http://www.sciencedaily.com/releases/2007/09/070925110204.htm

- Phishers caught hook, line and sinker, **PC Pro**, Sep 27, 2007.
  http://www.pcpro.co.uk/news/126386/phishers-caught-hook-line-and-sinker.html

- Anti-Phishing Phil Aims to Educate, **Digital Trends**, Sep 27, 2007.
  http://news.digitaltrends.com/news/story/14299/anti-phishing_phil_aims_to_educate

- Carnegie Mellon Floats Anti-Phishing Game, **PC Magazine**, Sep 26, 2007.
  http://www.pcmag.co.uk/vnunet/news/2199555/carnegie-mellon-floats-anti

- Fish named Phil helps foil phishers. **CBC News**, Sep 26, 2007.
  http://www.cbc.ca/technology/story/2007/09/26/phil-phish.html

- CMU's Anti-Phishing Phil helps users identify Internet scams, **POP City**, Sep 26, 2007. http://www.popcitymedia.com/timnews/phishing0926.aspx

- Phishing Game Aims to Teach Online Safety, **PCWorld**, Sep 19, 2007.
  http://blogs.pcworld.com/staffblog/archives/005466.html

- Department of Public Relations, Chandigarh Administration, Press Note-2, Jun 23, 2007. http://admser.chd.nic.in/uploadfiles/press/pressnote/pr1615.pdf

- Addressing the digital underside, **Financial Express**, Aug 14, 2007.
  http://www.financialexpress.com/fe_full_story.php?content_id=137200

- The February 2006 issue of the Privacy Journal features a blurb on the Privacy Indexes: A Survey of Westins Studies, Tech. rep. that I wrote with Dr. Lorrie Cranor.

OTHER SKILLS

- High school volley ball team captain (1995)
- Cricket
- Tennis (Took a mini course at CMU)
- Golf (Took a mini course at CMU)