

Annie I. Antón, Ph.D.

North Carolina State University
College of Engineering
Department of Computer Science
890 Oval Drive
Raleigh, NC 27695-8206

1+ 919.319.8536

aianton@ncsu.edu

<http://www.csc.ncsu.edu/faculty/anton>

Last Updated: 1/15/2012

Education

GEORGIA INSTITUTE OF TECHNOLOGY

Ph.D. in Computer Science

June 1997

Minor in Management / Public Policy

Major Field of Study: Software Engineering

Thesis Title: "Goal Identification and Refinement in the Specification of Software-Based Information Systems"

Thesis Advisors: Peter A. Freeman and Colin Potts

Master of Science in Information and Computer Science

June 1992

Bachelor of Science in Information and Computer Science

June 1990

Minor in Technical and Business Communications

Experience

NORTH CAROLINA STATE UNIVERSITY

College of Engineering

2011 - Director, Computer Science Policy and Compliance Initiative

Raleigh, NC

2008 - Professor of Computer Science with Tenure

2003 -2008 Associate Professor of Computer Science with Tenure

1998-2003 ABB Assistant Professor of Software Engineering

PURDUE UNIVERSITY

Center for Education & Research in Info. Assurance & Security

2005-2006 Visiting Scholar (1-Year Faculty Sabbatical)

West Lafayette, IN

UNIVERSITY OF SOUTH FLORIDA

College of Business Administration

1997-1998 Assistant Professor

Tampa, Florida

ATLANTA COMMITTEE FOR THE OLYMPIC GAMES

1994-1996 Olympic Envoy to Equatorial Guinea

Atlanta, Georgia

GEORGIA INSTITUTE OF TECHNOLOGY

College of Computing

1993-1997 Graduate Research Assistant

Atlanta, Georgia

SCHLUMBERGER LABORATORY FOR COMPUTER SCIENCE

1992 Research Assistant

Austin, Texas

GEORGIA INSTITUTE OF TECHNOLOGY

College of Computing

1992 Graduate Research Assistant

Atlanta, Georgia

1991 Information System Project Manager

USERVIEW CORPORATION

1990 Project Manager

Atlanta, Georgia

Awards & Honors

- Named to the 2011 Edition of the eHow Women of Shift 100 (2011)
- Distinguished Paper, 19th IEEE International Requirements Engineering Conference (2011)
- Appointed by Secretary Janet Napolitano to US Department of Homeland Security Data Privacy and Integrity Advisory Committee (2011)
- ACM Distinguished Scientist (2009)
- Non-Resident Fellow, Center for Democracy and Technology (2009)
- Best All Around Trekker, Trekking For Kids Spain/Morocco Lite Trek (2009)
- North Carolina State University Libraries Fabulous Faculty Series Speaker (2009)
- Keynote Speaker: Summit on the National Academy of Engineering Grand Challenges (2009)
- 1994 *IEEE Software* paper with co-authors Colin Potts and Kenji Takahashi was ranked the #10 most highly cited *IEEE Software* paper in its 25th Anniversary issue (January 2009)
- Distinguished Alumni Award, St. Pius X Catholic High School, Atlanta, GA (2007)
- 13th Annual U.S. Frontiers of Engineering Symposium by the National Academy of Engineering -- Co-Chair for Security Session (2007)
- Appointed by Secretary Michael Chertoff to US Department of Homeland Security Data Privacy and Integrity Advisory Committee (2006)
- 12th Annual U.S. Frontiers of Engineering Symposium by the National Academy of Engineering -- One of 81 young engineers nominated and selected to participate (2006)
- Most Influential Paper of ICRE 1996 at RE 2006 for paper entitled "Goal-Based Requirements Analysis" (2006)
- CSO (Chief Security Officer) Magazine's Woman of Influence in the Public Sector Award (2005)
- Honorary Paratrooper, 82nd Airborne, Ft. Bragg, NC (2005)
- Selected as Member of 9th IDA/DARPA Defense Science Study Group (2004-2005)
- IEEE Senior Member (2003)
- NC State College of Engineering First Featured "Achiever" (2003)
- NC State College of Engineering Pride of the Wolfpack Award (2003)
- Computing Research Association Digital Government Fellow (2002)
- National Science Foundation CAREER Award (2000-2004)
- The ANAK Society, highest student honor at Georgia Tech (1995)
- Omicron Delta Kappa National Leadership Honor Society (1994-present)
- Outstanding Georgia Tech College of Computing Graduate (June 1997)
- Bellcore Scholarship (1997)
- Georgia Tech President's Graduate Research Fellowship (1992-1996)
- GTE Fellowship (1993-94)
- 1994 Washington Center Women As Leaders Seminar
Selected to represent the State of Georgia in two week leadership program in Washington D.C.
- Georgia Tech Alumni Association Leadership Award for International Study (1994)
- SWE Outstanding CS Graduate Student Award Recipient (1993)
- Georgia Tech Alumni Association Graduate Student Leadership Award (1992)

Publications

Book Chapters

Aaron K. Massey and Annie I. Antón. "Behavioral Advertising Ethics," in *Information Assurance and Security Ethics in Complex Systems: Interdisciplinary Perspectives*, Melissa Dark, ed., IGI Global, USA, pp. 162-185, 2011.

Paul N. Otto and Annie I. Antón. "Managing Legal Texts in Requirements Engineering," in *Design Requirements—Engineering: A Ten-Year Perspectives*, Kalle Lyytinen, Pericles Loucopoulos, John Mylopoulos, and Bill Robinson eds., Springer Berlin Heidelberg - Berlin, Heidelberg, pp. 374-393, 2009.

Eugene H. Spafford and Annie I. Antón. "The Balance of Privacy and Security," *Science and Technology in Society: From Biotechnology to the Internet, Vol II*, ed. by Daniel Lee Kleinman, Karen A. Cloud-Hansen, Christina Matta, and Jo Handelsman, pub. MaryAnn Liebert, Inc, NY, NY, pp. 152-16, 2008.

Annie I. Antón and Julia B. Earp. "Strategies for Developing Policies and Requirements for Secure Electronic Commerce Systems," in *E-Commerce Security and Privacy*, edited by Anup K. Ghosh, Kluwer-Academic Publishers, pp. 29-46, 2001.

Refereed Journal Publications

- Jeremy C. Maxwell, Annie I. Antón, Peter Swire, Maria Riaz, and Christopher M. McCraw. "A Legal Cross-References Taxonomy for Reasoning About Compliance," *To Appear: Requirements Engineering Journal*, Springer-Verlag, 2012.
- Annie I. Antón, Julia B. Earp and Jessica D. Young. "How Internet Users' Privacy Concerns Have Evolved Since 2002," *IEEE Security & Privacy*, 8(1), pp. 21-27, January/February 2010.
- Aaron K. Massey, Paul N. Otto, Lauren J. Hayward, and Annie I. Antón. "Evaluating EHR Requirements for HIPAA Compliance: A Case Study," *Requirements Engineering Journal*, Springer-Verlag, 15(1), 119-137, January 2010.
- Travis .D. Breaux, Annie I. Antón and Eugene H. Spafford. "A Distributed Requirements Management Framework for Compliance and Accountability," *Computers & Security*, Elsevier, 28(1-2), pp. 8-17, February-March 2009.
- Qingfeng He and Annie I. Antón. "Requirements-based Access Control Analysis and Policy Specification (ReCAPS)," *Information & Software Technology*, 51(6), pp. 993-1009, June 2009.
- Travis .D. Breaux, Annie I. Antón and Jon Doyle. "Semantic Parameterization: A Process for Modeling Domain Descriptions," *ACM Transactions on Software Engineering and Methodology*, 18(2), pp. 1-27, November 2008.
- Matthew W. Vail, Julia B. Earp and Annie I. Antón. "An Empirical Study of Consumer Perceptions and Comprehension of Web Site Privacy Policies," *IEEE Transactions on Engineering Management*, 55(3), pp. 442 - 454, August 2008.
- Thomas A. Alspaugh and Annie I. Antón. "Scenario Support for Effective Requirements," *Information and Software Technology*, Elsevier, 50(3), pp. 198-220, February 2008.
- Travis .D. Breaux and Annie I. Antón. "Analyzing Regulatory Rules for Privacy and Security Requirements," *IEEE Transactions on Software Engineering*, 34(1), pp. 5-20, January 2008.
- Paul N. Otto, Annie I. Antón and David L. Baumer. "The ChoicePoint Dilemma: How Data Brokers Should Handle the Privacy of Personal Information," *IEEE Privacy & Security*, 5(5), pp. 15-23, September-October 2007.
- Annie I. Antón, Elisa Bertino, Ninghui Li and Ting Yu. "A Roadmap for Comprehensive Online Privacy Policy Management," *Communications of the ACM*, 50(7), pp. 109-116, 2007.
- Annie I. Antón, Julia B. Earp, Matthew W. Vail, Neha Jain, Carrie Gheen and Jack M. Frink. "HIPAA's Effect on Web Site Privacy Policies," *IEEE Security & Privacy*, 5(1), pp. 45-52, January/February 2007.
- Ninghui Li, Ting Yu and Annie I. Antón. "A Semantics-based Approach to Privacy Languages," *International Journal of Computer Systems Science & Engineering*, 21(5), pp. 339-352, September 2006.
- Julia B. Earp, Annie I. Antón , Lynda Aiman-Smith, and William Stufflebeam. "Crossed Signals: Internet Privacy Policies and User Concerns," *IEEE Transactions on Engineering Management*, 52(2), pp. 227-237, May 2005.
- Annie I. Antón, Qingfeng He and David Baumer. "The Complexity Underlying JetBlue's Privacy Policy Violations ," *IEEE Security & Privacy*, 2 (6), pp. 12-18, 2004.
- Annie I. Antón and Julia B. Earp. "A Requirements Taxonomy to Reduce Website Privacy Vulnerabilities," *Requirements Engineering Journal*, Springer-Verlag, 9(3), pp. 169-185, August 2004.
- Annie I. Antón, Julia B. Earp, Davide Bolchini, Qingfeng He, Carlos Jensen and William Stufflebeam. "The Lack of Clarity in Financial Privacy Policies and the Need for Standardization," *IEEE Security & Privacy*, 2(2), pp. 36-45, March-April 2004.
- Annie I. Antón, Julia B. Earp and Ryan A. Carter. "Precluding Incongruous Behavior by Aligning Software Requirements with Security and Privacy Policies," *Information and Software Technology*, Elsevier, 45(14), pp. 967-977, 1 November 2003.
- Annie I. Antón and Colin Potts. "Functional Paleontology: The Evolution of User-Visible System Services," *IEEE Transactions on Software Engineering*, 29(2), pp. 151-166, February 2003.
- Annie I. Antón, Ryan A. Carter, Aldo Dagnino, John H. Dempster and Devon F. Siege. "Deriving Goals from a Use Case Based Requirements Specification," *Requirements Engineering Journal*, Springer-Verlag, 6(1), pp. 63-73, May 2001.

Refereed Journal Publications**(Continued)**

Annie I. Antón and Colin Potts. "A Representational Framework for Scenarios of System Use," *Requirements Engineering Journal*, Springer-Verlag, 3(3&4), pp. 219-241, December 1998.

Colin Potts, Kenji Takahashi and Annie I. Antón. "Inquiry-Based Requirements Analysis," *IEEE Software* 11(2), pp. 21-32, March 1994.

Other Journal Publications

Paco Hope, Annie I. Antón and Gary McGraw. "Misuse and Abuse Cases: Getting Past the Positive." for "Building Security In" column: *IEEE Security & Privacy*, 2(3) pp. 90-92, May/June 2004.

Annie I. Antón. "Successful Software Projects Need Requirements Planning," *IEEE Software*, 20(3), pp. 44-47, May/June 2003.

Annie I. Antón. "Guest Editorial: Requirements Engineering for Information Security," *Requirements Engineering Journal*, Springer-Verlag, 7(4), pp. 177-178, December 2002.

Refereed Conference**Proceedings**

Ramya Gopalan, Annie Anton and Jon Doyle. "UCON_{LEGAL}: A Usage Control Model for HIPAA," *To Appear: 2nd ACM SIGHIT International Health Informatics Symposium (IHI'12)*, Miami, FL, 28-30 January 2012.

Jeremy C. Maxwell, Annie I. Antón and Peter Swire. "A Legal Cross-References Taxonomy for Identifying Conflicting Software Requirements," *19th IEEE International Requirements Engineering Conference (RE'11)*, Trento, Italy, pp. 197-206, 29 August - 2 September 2011. **(Distinguished Paper Award)**

Aaron K. Massey, Paul N. Otto and Annie I. Antón. "Assessing the Accuracy of Legal Implementation Readiness Decisions," *19th IEEE International Requirements Engineering Conference (RE'11)*, Trento, Italy, pp. 207-216, 29 August - 2 September 2011.

Jeremy C. Maxwell and Annie I. Antón. "The Production Rule Framework: Developing a Canonical Set of Software Requirements for Compliance with Law," *1st ACM International Health Informatics Symposium (IHI '10)*, pp. 629-636, Arlington, VA, 11-12 November 2010.

Jessica D. Young and Annie I. Antón, "A Method for Identifying Software Requirements Based on Policy Commitments," *18th IEEE International Requirements Engineering Conference (RE'10)*, pp. 47-56, Sydney, Australia, 27 September - 1 October 2010.

Jeremy Maxwell and Annie I. Antón. "Developing Production Rule Models to Aid in Acquiring Requirements from Legal Texts," *17th IEEE International Requirements Engineering Conference (RE'09)*, Atlanta, GA, pp. 101-110, 31 August - 4 September 2009.

Travis D. Breaux, Jonathan D. Lewis, Paul N. Otto, and Annie I. Antón. "Identifying Vulnerabilities and Critical Requirements Using Criminal Court Proceedings," *24th Annual ACM Symposium on Applied Computing*, Honolulu, Hawaii, 9-12 March 2009.

Acceptance rate: 25%

Nadzeya Kiyavitskaya, Nicola Zeni, Travis D. Breaux, Annie I. Antón, James R. Cordy, Luisa Mich, John Mylopoulos. "Automating the Extraction of Rights and Obligations for Regulatory Compliance," *27th International Conference on Conceptual Modelling (ER'08)*, Barcelona Spain, pp. 154-168, 20-23 October 2008.

Acceptance rate: 25%

T.D. Breaux, A.I. Antón, K. Boucher and M. Dorfman. "Legal Requirements, Compliance and Practice: An Industry Case Study in Accessibility," *16th IEEE International Requirements Engineering Conference (RE'08)*, Barcelona, Spain, pp. 43-52, 10-12 September 2008.

Acceptance rate: 11%

N. Kiyavitskaya, N. Zeni, T.D. Breaux, A.I. Antón, J.R. Cordy, L. Mich and J. Mylopoulos. "Extracting Rights and Obligations from Regulations: Toward a Tool-Supported Process," *Twenty-Second IEEE/ACM International Conference on Automated Software Engineering (ASE'07)*, Atlanta, Georgia, USA, pp. 429-432, 5-9 November 2007.

Paul N. Otto and Annie I. Antón. "Addressing Legal Requirements in Requirements Engineering," *15th IEEE International Requirements Engineering Conference (RE'07)*, Delhi, India, pp. 5-14, 15-19 October 2007.

Acceptance rate: 25%

Refereed Conference**Proceedings
(Continued)**

Dright Ho, Laurie Williams and A.I. Antón. "Improving Performance Requirements Specifications from Field Failure Reports: A Commercial Distributed Software System Case Study," *15th IEEE International Requirements Engineering Conference*, Delhi, India, pp. 79- 88, 15-19 October 2007.

Acceptance rate: 12%

Matthew W. Vail, Julia B. Earp and Annie I. Antón. "Privacy Policy Representation in Web-based Healthcare," *40th Annual Hawaii International Conference on System Sciences (HICSS 2007)*, Waikoloa, HI, pp. 1-9, January 2007.

Travis D. Breaux, Matthew Vail and Annie I. Antón. "Towards Regulatory Compliance: Extracting Rights and Obligations to Align Requirements with Regulations," Accepted to: *14th IEEE International Requirements Engineering Conference (RE'06)*, Minneapolis / St. Paul, Minnesota, pp. 46-35, 11-15 September 2006.

Acceptance rate: 14%

T.D. Breaux and A.I. Antón. "Analyzing Goal Semantics for Rights, Permissions, and Obligations," *13th IEEE International Requirements Engineering Conference (RE'05)*, Paris, France, pp. 177-186, 29 August - 2 September 2005.

Acceptance rate: 20%

Aldo Dagnino, Karen Smiley, Hema Srikanth, Annie I. Antón and Laurie Williams. "Experiences in Applying Agile Software Development Practices in New Product Development," *8th IASTED International Conference on Software Engineering and Applications (SEA 2004)*, Cambridge, MA, pp. 501-506, 9-11 November 2004.

Davide Bolchini, Qingfeng He, Annie I. Antón and William Stufflebeam. "I need it now: Improving Website Usability By Contextualizing Privacy Policies," *4th International Conference on Web Engineering (ICWE 2004)*, Munich, Germany, 28-30 July 2004.

Acceptance rate: 13%

Julia B. Earp and Annie I. Antón. "Addressing End-User Privacy Concerns," *2004 Americas Conference on Information Systems (AMCIS 2004)*, 6-8 August 2004.

Laurie Williams, Anuja Shukla and Annie I. Antón. "An Initial Exploration of the Relationship Between Pair Programming and Brooks Law," *2004 Agile Development Conference*, pp. 11-20, 22-26 June 2004.

Acceptance rate: 31%

Laurie Williams, Lucas Layman, William Krebs and Annie I. Antón. "Toward a Framework for Evaluating Extreme Programming," *8th Conference on Evaluation & Assessment in Software Engineering (EASE 2004)*, pp. 11-20, Edinburgh, Scotland, UK, 24-25 May 2004.

Julia B. Earp, Annie I. Antón, Lynda Aiman-Smith and William Stufflebeam. "Crossed Signals: Internet Privacy Policies and User Concerns," *Academy of Management*, Seattle, Washington, 1-6 August 2003. **(Best Visual Presentation Award)**

Acceptance rate: 12%

V. Cavalli-Sforza, A. I. Antón, O. Brooks, J. Carbonell, R. Cole, R. Connolly, J. Fortes, M. Herrera, I. Krsul, C. McSweeney, C. Ortega, S. Su, D. Towsley, J. Ventura and W. Ward. "Enabling Transnational Collection, Notification, and Sharing of Information," *The 2003 National Conference on Digital Government Research*, Boston, Massachusetts, 18-21 May 2003.

Olli Jarvinen, Julia B. Earp and Annie I. Antón. "A Visibility Framework for Privacy Management Requirements," *2nd Symposium on Requirements Engineering for Information Security (SREIS 2002)*, Raleigh, NC, 15-16 October 2002.

Julia B. Earp, Annie I. Antón and Olli Jarvinen. "A Social, Technical and Legal Framework for Privacy Management and Policies," *Eighth Americas Conference on Information Systems (AMCIS 2002)*, Dallas, Texas, pp. 605-612, 9-11 August 2002.

Annie I. Antón, Julia B. Earp and Angela Reese. "Analyzing Web Site Privacy Requirements Using a Privacy Goal Taxonomy," *10th Anniversary IEEE Joint Requirements Engineering Conference (RE'02)*, Essen, Germany, pp. 23-31, 9-13 September 2002.

Acceptance rate: 19%

¹ The best paper awards at these conferences were recognized as such via their invitation to be extended for publication in a journal.

Refereed Conference Proceedings**(Continued)**

Ryan A. Carter, Annie I. Antón, Aldo Dagnino and Laurie Williams. "Evolving Beyond Requirements Creep: A Risk-Based Evolutionary Prototyping Model", *IEEE 5th International Symposium on Requirements Engineering*, Toronto, Canada, pp. 94-101, 27-31 August 2001.

Acceptance rate: 20%

Annie I. Antón, Julia B. Earp, Colin Potts and Thomas A. Alspaugh. "The Role of Policy and Privacy Values in Requirements Engineering", *IEEE 5th International Symposium on Requirements Engineering*, Toronto, Canada, pp. 138-145, 27-31 August 2001. **(Best Paper Award)**¹

Acceptance rate: 20%

Annie I. Antón and Colin Potts. "Functional Palaeontology: System Evolution as the User Sees It," *IEEE International Conference on Software Engineering (ICSE 2001)*, Toronto, Canada, pp. 421-430, 12-19 May 2001.

(Best Paper Award)

Acceptance rate: 18%

Thomas A. Alspaugh, Annie I. Antón, Tiffany Barnes and Bradford Mott. "An Integrated Scenario Management Strategy," *4th IEEE International Symposium on Requirements Engineering*, University of Limerick, Ireland, pp. 142-149, 7-11 June 1999.

Acceptance rate: 24%

Annie I. Antón and Colin Potts. "The Use of Goals to Surface Requirements for Evolving Systems," in *International Conference on Software Engineering*, Kyoto, Japan, pp. 157-166, 19-25 April 1998.

Acceptance rate: 20%

Annie I. Antón. "Goal-Based Requirements Analysis," *IEEE International Conference on Requirements Engineering*, Colorado Springs, Colorado, pp. 136-144, 15-18 April 1996.

(Most Influential Paper of ICRE 1996 Award at RE 2006)

Acceptance rate: 30%

Annie I. Antón, W. Michael McCracken and Colin Potts. "Goal Decomposition and Scenario Analysis in Business Process Reengineering," *The 6th Conference on Advanced Information System Engineering*, Utrecht, The Netherlands, pp. 94-104, 6-10 June 1994.

Annie I. Antón, Thomas A. Gale, W. Michael McCracken and John J. Shilling. "Object Based Requirements Modeling for Process Continuity," *Proceedings of the Hawaii International Conference on System Sciences*, Vol. 3, pp. 191-202, 1993.

Refereed Workshop**Proceedings**

Jessica Young Schmidt, Annie I. Antón, Laurie Williams, Paul N. Otto. "The Role of Data Use Agreements in Specifying Legally Compliant Software Requirements," *4th International Workshop on Requirements Engineering and Law*, In conjunction with the *19th IEEE International Requirements Engineering Conference*, Trento, Italy, pp. 1-4, 30 August 2011.

Jeremy Maxwell and Annie I. Antón. "Validating Existing Requirements for Compliance with Law Using a Production Rule Model," *2nd International Workshop on Requirements Engineering and Law*, In conjunction with the *17th IEEE International Requirements Engineering Conference*, pp. 1-6, Atlanta, GA, 1 September 2009.

Aaron K. Massey, Paul Otto and Annie I. Antón. "Prioritizing Legal Requirements," *Second International Workshop on Requirements Engineering and Law*, In conjunction with the *17th IEEE International Requirements Engineering Conference*, Atlanta, GA, pp. 27 - 32, 1 September 2009.

Aaron K. Massey and Annie I. Antón. "A Requirements-based Comparison of Privacy Taxonomies," *First International Workshop on Requirements Engineering and Law*, In conjunction with the *16th IEEE International Requirements Engineering Conference*, Barcelona, Spain, 8 September 2008.

Travis Breaux and Annie I. Antón. "A Systematic Method for Acquiring Regulatory Requirements: A Frame-Based Approach," *6th International Workshop on Requirements for High Assurance Systems (RHAS-6)*, Delhi, India, September 2007.

Acceptance rate: 100%

¹The best paper awards at these conferences were recognized as such via their invitation to be extended for publication in a journal.

Refereed Workshop Proceedings**(Continued)**

Travis Breaux, Annie I. Antón, Clare-Marie Karat and John Karat. "Enforceability vs. Accountability in Electronic Policies," *IEEE 7th International Workshop on Policies for Distributed Systems and Networks (POLICY'06)*, London, Ontario, Canada, pp. 227-230, 5-7 June 2006.

Acceptance rate: 51%

Laurie A. Jones, Annie I. Antón and Julia B. Earp. "Towards Understanding User Perceptions of Digital Authentication Technologies," *CCS Workshop on Privacy in the Electronic Society*, Alexandria, VA pp. 91-98, 29 October 2007.

Qingfeng He, Paul Otto, Annie I. Antón and Laurie Jones. "Ensuring Compliance Between Policies, Requirements and Software Design: A Case Study," *4th IEEE International Information Assurance Workshop*, Royal Holloway, UK, pp. 79-92, 13-14 April 2006.

Travis Breaux and Annie I. Antón. "Mining Rule Semantics to Understand Legislative Compliance," *CCS Workshop on Privacy in the Electronic Society*, Alexandria, VA, pp. 51-54, 7 November 2005.

Acceptance rate: 38%

Travis Breaux and Annie I. Antón. "Deriving Semantic Models from Privacy Policies," *IEEE 6th Int'l Workshop on Policies for Distributed Systems and Networks (POLICY 2005)*, Stockholm, Sweden, pp. 67-76, 6-8 June 2005.

Acceptance rate: 22%

Ting Yu, Ninghui Li and Annie I. Antón. "A Formal Semantics for P3P," *Proceedings of ACM Workshop on Secure Web Services (SWS)*, Washington, D.C. October 2004.

William Stufflebeam, Annie I. Antón, Qingfeng He and Neha Jain. "Specifying Privacy Policies with P3P and EPAL: Lessons Learned," *Workshop on Privacy in the Electronic Society (WPES'04)*, Washington, D.C., 28 October 2004.

Qingfeng He and Annie I. Antón. "A Framework for Modeling Privacy Requirements in Role Engineering," *International Workshop on Requirements Engineering for Software Quality (REFSQ 2003)*, Klagenfurt / Velden, Austria, 16 - 17 June, 2003.

Annie I. Antón, Julia B. Earp and Ryan A. Carter. "Aligning Software Requirements with Security and Privacy Policies," *International Workshop on Requirements Engineering for Software Quality (REFSQ 2002)*, Essen Germany, 7-8 September 2002. **(Best Paper Award)**¹

Thomas A. Alspaugh and Annie I. Antón. "Scenario Networks: A Case Study of the Enhanced Messaging System," *Seventh International Workshop on Requirements Engineering: Foundation for Software Quality (REFSQ)*, Interlaken, Switzerland, pp. 113-124, 5-6 June 2001.

Annie I. Antón and Julia B. Earp. "Strategies for Developing Policies and Requirements for Secure Electronic Commerce Systems," *1st ACM Workshop on Security and Privacy in E-Commerce (CCS 2000)*, Athens, Greece, (unnumbered pages), 1-4 November 2000. **(Best Paper Award)**

Annie I. Antón and Colin Potts. "Requirements Engineering in the Long-Term: Fifty Years of Telephony Feature Evolution," *International Workshop on Feedback and Evolution in Software and Business Processes (FEAST 2000)*, London, UK, 10-12 June 2000.

Annie I. Antón, John H. Dempster and Devon F. Siege. "Deriving Goals from a Use Case Based Requirements Specification for an Electronic Commerce System," *Sixth International Workshop on Requirements Engineering: Foundation for Software Quality (REFSQ)*, Stockholm, Sweden, 5-6 June 2000. **(Best Paper Award)**

Annie I. Antón, Eugene Liang and Roy Rodenstein, "A Web-Based Requirements Analysis Tool," in *IEEE Fifth Workshops on Enabling Technologies: Infrastructure for Collaborative Enterprises*, Stanford University, California, pp. 238-243, 19-21 June 1996.

Written Testimony

Annie I. Antón. "Social Security Administration's Role in Verifying Employment Eligibility," Testimony before the House Committee on Ways and Means Subcommittee on Social Security, on behalf of the USACM, Washington, DC, 14 April 2011.

Written Testimony**(Cont.)**

Peter Swire and Annie I. Antón. "Online Behavioral Advertising: Technical Steps Needed to Ensure Consumer Control," Testimony for the Federal Trade Commission, in response to the FTC Staff Statement, Online Behavioral Advertising: Moving the Discussion Forward to Possible Self-Regulatory Principles, 10 April 2008.

Annie I. Antón. "Protecting the Privacy of the Social Security Number from Identity Theft," Testimony before the House Committee on Ways and Means Subcommittee on Social Security, on behalf of the USACM, Washington, DC, 21 June 2007.

Lightly-Refereed Colloquium & Workshop**Proceedings**

Annie I. Antón and Julia B. Earp. "Multidisciplinary Project Studio: Designing Secure Electronic Commerce Systems," *6th National Colloquium for Information Systems Security Education (NCISSE)*, Redmond, Washington, 4-6 June 2002.

Annie I. Antón and Julia B. Earp. "A Multidisciplinary Electronic Commerce Project Studio for Secure Systems," *4th National Colloquium for Information Systems Security Education*, Washington, D.C., May 23-25, 2000.

Refereed Position & Panel**Papers**

Annie I. Antón. "The Challenge of Balancing Security and Privacy," *CRA Conference on Grand Challenges in Information Security and Information Assurance*, Airlie House, Warrenton, Virginia 16-19 November 2003.

Annie I. Antón and Jo Atlee. "What do you mean I've been practicing without a license? Certifying Requirements Engineering Professionals," in *IEEE International Conference on Requirements Engineering (ICRE 2000)*, Chicago, Illinois, 19-23 June 2000.

Refereed Research & Tool Demo**Posters**

Jessica D. Young and Annie I. Anton. "Identifying Commitment-Based Software Requirements to Thwart Unfair and Deceptive Practices," *2nd International Workshop on Requirements Engineering and Law (RELAW'09)*, Atlanta, GA, pp. 19-20, 1 September 2009.

Aaron K. Massey, Paul N. Otto and Annie I. Antón. "Aligning Requirements with HIPAA in the iTrust System," *16th IEEE International Requirements Engineering Conference*, Barcelona, Spain, September 2008.

Thomas A. Alspaugh and Annie I. Antón. "Contrasting Use Case, Goal, and Scenario Analysis of the Euronet System," *11th IEEE Joint International Conference on Requirements Engineering (RE'03)*, Monterey Bay, CA, pp. 355-356, 8-12 September 2003.

William Stufflebeam, Annie I. Antón, and Thomas A. Alspaugh. SMaRT -- Scenario Management and Requirements Tool, Research Demo, *11th IEEE Joint International Conference on Requirements Engineering (RE'03)*, Monterey Bay, CA, pp. 351, 8-12 September 2003.

Abstracts

W. M. McCracken and Annie I. Antón. "GDSS Tools: Uses and Research Applications," *23rd Annual Meeting of the Southeast Region of the Decision Sciences Institute*, Chattanooga, TN, pp. 130, 17-19 February 1993.

Dissertation

Annie I. Antón. *Goal Identification and Refinement in the Specification of Software-Based Information Systems*, Ph.D. Thesis, Georgia Institute of Technology, Atlanta, GA, USA, June 1997.

Thesis Co-Advisors: Dr. Peter A. Freeman and Dr. Colin Potts

Funding**Submitted Research****Proposals**

- *SHF: Small: Towards Regulatory Compliance Software Engineering with UCON_{LEGAL}*

Source: National Science Foundation — CCF Software and Hardware Foundations

PIs: Annie I. Antón, Jon Doyle, Peter Swire (Ohio State University)

Submission Date: December 17, 2011

Amount: \$474,508

Duration: August 2012 - August 2014

Sponsored Research**Grants**

- *SoD: Collaborative Research: Transparency and Legal Compliance in Software Systems*
Source: National Science Foundation — Science of Design
PIs: Annie I. Antón and Eugene H. Spafford (Purdue University)
Senior Personnel: David Baumer and Ignacio Valdes, M.D.
Amount: \$500,000 (NCSU: \$270,407)
Duration: August 2007 - August 2011

Agency/Program: NSF Information Technology Research Program
PIs: Annie I. Antón and Colin Potts (Georgia Tech)
Senior Personnel: Lynda Aiman-Smith, David Baumer, Julia B. Earp (NCSU College of Management)
Amount: \$ 920,000
Duration: August 2003 - August 2010
- *Collaborative Research: A Comprehensive Policy-Driven Framework for Online Privacy Protection: Integrating IT, Human, Legal and Economic Perspectives*
Agency/Program: NSF Cyber Trust Program
NCSU PIs: Annie I. Antón and Ting Yu
Purdue PIs: Elisa Bertino, Ninghui Li, Melissa J. Dark, Victor Raskin and Robert W. Proctor
Senior Personnel: David Baumer, Michael Rappa (NCSU College of Management)
Amount: \$ 1,194,000 (NCSU: \$ 534,000)
Duration: September 15, 2004 - August 31, 2010
- *Improving The Governance of ITIL-Based Processes Using Historical Incident Analysis*
Source: IBM Faculty Award
PIs: Annie I. Antón
Amount: \$24,000
Duration: August 2008 - August 2009
- *ITR: The Design and Use of Digital Identities.*
Agency: NSF Information Technology Research
Co-PIs: Elisa Bertino (Purdue), Mikhail J. Atallah (Purdue), Eugene H. Spafford (Purdue), Howard E. Sypher (Purdue), Annie I. Antón and Julia B. Earp.
Amount: \$990,000 (Subcontract: \$100,006)
Duration: August 15, 2004 - August 15, 2007
- *Transnational Digital Government*
Agency/Program: NSF Digital Government Program
PIs: Annie I. Antón and José Fortes (U. of Florida)
Amount: \$ 81,401
Duration: August 2003 - July 2005
- *Mapping CMMI to ISO Standard 12207-15504*
Agency/Program: ABB Corporate Research, Raleigh, NC
PIs: Annie I. Antón and Laurie Williams
Amount: \$ 25,000
Duration: August 2003 - May 2004
- *ABB: Software Engineering Knowledge Management*
Agency/Program: ABB
PIs: Annie I. Antón and Laurie Williams
Amount: \$ 25,000
Duration: August 2002 - May 2003
- *Aligning Internet Privacy Policies with Privacy Values*
Agency/Program: NC State E-Commerce Learning Center
PIs: Annie I. Antón and Julia B. Earp.
Amount: \$ 20,000
Duration: June 2003 - July 2003

Sponsored Research**Grants
(Cont.)**

- *Assessing E-Commerce Software Development Processes*
Agency/Program: NC State E-Commerce Learning Center
PIs: Annie I. Antón and Julia B. Earp.
Amount: \$ 23,730.50
Duration: August 2002 - May 2003
- *CACC Assessing Agile Requirements Practices*
Agency/Program: NC State CACC
PIs: Annie I. Antón and Laurie Williams
Amount: \$ 26,805
Duration: August 2002 - May 2003
- *ITR/PE: Aligning Societal Values, Privacy Policy, and IT Requirements*
Agency/Program: National Science Foundation Information Technology Research
PIs: Annie I. Antón and Colin Potts (Georgia Institute of Technology)
Amount: \$ 334,866
Duration: August 15, 2001 - August 15, 2003
- *Agile Processes to Support E-Commerce Software Development*
Agency/Program: NC State E-Commerce Learning Center
PIs: Annie I. Antón and Julia B. Earp.
Amount: \$ 27,945.50
Duration: August 2001 - May 2002
- *ABB Learning Objects*
Agency/Program: ABB
PIs: Annie I. Antón and Laurie Williams
Amount: \$ 20,000
Duration: August 2001 - May 2002
- *CACC: Analyzing Emerging Software Development Methodologies and Practices*
Agency/Program: NC State CACC
PIs: Laurie Williams and Annie I. Antón.
Amount: \$ 47,895
Duration: August 2001 - June 2002
- *Towards Estimating Requirements Coverage: Managing Goals and Scenarios During Requirements Evolution*
Source: National Science Foundation CAREER Award
PI: Annie I. Antón.
Amount: \$ 220,000
Duration: June 2000 - June 2004
- *Creating and Validating CMM-Compliant Software Process Models*
Source: Asea Brown Boveri, Raleigh, NC
PI: Annie I. Antón.
Amount: \$ 34,378
Duration: September 2000 - June 2001
- *Towards Object-Oriented Rapid Prototyping and Automated Code Generation*
Source: BellSouth Telecommunications, Atlanta, GA
PI: Annie I. Antón.
Amount: \$ 75,000
Duration: June 2000 - June 2001
- *Service Requirements for Process Improvement*
Source: BellSouth Telecommunications, Atlanta, GA
PI: Annie I. Antón.
Amount: \$ 30,000
Duration: August 1999 - June 2000

Sponsored Research**Grants
(Cont.)**

- *Identification and Prioritization of Business Rules*
Source: GTE Data Services, Tampa, FL
PI: Annie I. Antón.
Amount: \$ 7,000
Duration: October 1997 - February 1998
- *USF Economic Development Matching Grant: Identification and Prioritization of Business Rules*
Source: University of South Florida, Tampa, FL
PI: Annie I. Antón.
Amount: \$ 7,000
Duration: January 1998 - June 1998

Gifts

- *CISCO Biannual Equipment Donation Program Grant*
Source: CISCO Systems Critical Infrastructure Assurance Group
PIs: Peng Ning, Annie I. Antón and Julie Starr
Date of Award: Fall 2003
Amount: \$ 100,000
- *Intel E-Commerce Equipment Grant*
Source: Intel Corporation
PI: Annie I. Antón
Date of Award: December 2001
Amount: \$39,990
- *NCSU E-Commerce Studio Seed Gift*
Source: Newton Instruments, Butner, NC
PIs: Michael Rappa, Annie I. Antón and Julie Earp
Amount: \$ 25,000
Date of Award: January 2001

Sponsored Summer**Support**

- *CITAP Summer Research Salary*
Source: NCSU Center for Information Technology and Policy (CITAP)
Sponsor: Dr. Bob Entman, NCSU Department of Communication
Amount: \$ 5,000
Duration: May 1999 - June 1999
- *Electronic Commerce Summer Research Salary*
Source: NCSU College of Management
Sponsor: Dr. Michael A. Rappa, Director NC State E-Commerce Learning Center
Amount: \$ 5,000
Duration: June 1999 - July 1999

Invited Presentations

-
- “Regulatory Compliance in Government Systems,” Japan Advanced Institute of Science and Technology (JAIST), Nomi, Ishikawa, Japan, 29 March 2012.
- “Successful Career Networking,” CRA Career Mentoring Workshop, Washington, DC, 27 February 2012.
- “The Techie Perspective for Privacy Law Students,” Moritz College of Law, Ohio State University, Columbus, OH, 9 November 2011.
- “Radiate From Within, Shine on the World,” **Keynote Speaker**, Georgia Tech Women's Leadership Conference, Georgia Institute of Technology, Atlanta, GA, 4 November 2011.
- “Protecting Your Privacy When Online,” U.S. Department of Homeland Security, Stop. Think. Connect. Cyber Citizen Forum, North Carolina State University, Raleigh, NC, 12 October 2011.

Invited Presentations**(Cont.)**

“Health: Bridging the Gap Between Local and Global,” Global Issues Seminar Series, Office of International Affairs, North Carolina State University, Raleigh, NC, 11 October 2011.

“Invited Vision Talk,” School of Interactive Computing, Georgia Institute of Technology, Atlanta, GA, 15 September 2011.

“RE For Social Computing,” Invited Panelist, Workshop on RE for Social Computing at 19th IEEE International Requirements Engineering Conference, Trento, Italy, 29 August 2011.

“Frontiers in Privacy and Security,” Panel Moderator, 21st Annual Conference Computers, Freedom & Privacy, Georgetown University Law Center, Washington, DC, 15 June 2011.

“Complying with Policies & Regulations,” **Keynote Speaker**, IEEE International Symposium on Policies for Distributed Systems and Networks, George Mason University, Fairfax, VA, 23 July 2010.

“Changing Mind-Sets in Academia: How ISOs Can Leverage Faculty to Improve Privacy and Security,” **Keynote Speaker**, 2010 EDUCAUSE Security Professionals Conference 2010, Atlanta, GA, 14 April 2010.

“Designing Software to Comply with Privacy Laws,” **Distinguished Lecture** Series (DLS) Recruitment Events for Groups Underrepresented in Computing, Polytechnic University of Puerto Rico, San Juan, PR, 5 December 2009.

“Designing Software to Comply with Privacy Laws,” **Distinguished Lecture**, University of Michigan, Computer Science Department, Ann Arbor, MI, 26 October 2009.

“Designing Software to Comply with Privacy Laws,” Center for Research on Computation & Society, Harvard University, Cambridge, MA, 6 May 2009.

“Grand Challenges in Cyber Security, Privacy and Public Policy,” Society of Women Engineers Southeastern Regional Conference, Georgia Institute of Technology, Atlanta, GA, 7 March 2009.

“Grand Challenges in Cyber Security, Privacy and Public Policy,” **Keynote Speaker**, Summit on the National Academy of Engineering Grand Challenges, Duke University, Durham, NC, 3 March 2009.

“Designing Software to Comply with Privacy Laws,” **Keynote Speaker**, EU Security Workshop, University of Trento, Italy, 19 January 2009.

“Personal Experiences in Pursuing Computer Science with ADHD & Dyslexia,” AccessComputing Leadership Institute, Seattle, Washington, 6 November 2008.

“Designing Software Systems that Comply with Privacy Laws,” **Dean's Distinguished Lecture**, B. Thomas Golsiano College of Computing and Information Sciences, Rochester Institute of Technology, 31 October 2008.

“Designing Software Systems that Comply with Privacy Laws,” GVI Alumni Lecturer, College of Computing, Georgia Institute of Technology, Atlanta, GA, 23 October 2008.

“Complying with Privacy Law,” Invited Speaker, American Bar Association Law Conference, Washington, DC, 19-20 June 2008.

“Designing Legally Compliant Software Systems that Contain Sensitive Information,” NSF TRUST Software annual Womens Institute in Technology Center's 3rd Summer Enrichment (WISE), Cornell University, Ithaca, NY, 9 June 2008.

“Designing Legally Compliant Software Systems that Contain Sensitive Information,” University of Notre Dame, IBM Lecture Series, South Bend, Indiana, 24 April 2008.

“Designing Legally Compliant Software Systems that Contain Sensitive Information,” University of Virginia Computer Science Seminar Series, 18 February 2008.

“Consumer Privacy Through Notice and Consent,” Data Privacy: In Transatlantic Conflict or Cooperation, Duke University School of Law, Durham, NC, 10 January 2008.

“Security in Numbers: SSNs and ID Theft,” Federal Trade Commission, Washington, D.C., 10 December 2007.

Invited Presentations**(Cont.)**

“Balancing Security and Privacy on the eCampus,” Dartmouth Regional Summit on Campus Information Security, Dartmouth College, Hanover, NH, 10 October 2007.

“Information Privacy and Security,” North Carolina State University Board of Trustees Meeting, Raleigh, NC, 21 September 2007.

One of two NCSU College of Engineering faculty members, invited by Dean Martin-Vega, to provide overview of our research before the NCSU Board of Trustees.

“Protecting the Privacy of the SSN from Identity Theft,” Testimony Before the Subcommittee on Social Security of the House Committee on Ways and Means, on behalf of the Association for Computing Machinery, 21 June 2007.

“Ethics, Design and Sensitive Information Systems,” CA Inc. Technical Leadership Council Annual Retreat, Prague, Czech Republic, May 16, 2007.

“Incorporating Privacy Values, Policies and Law in Information Systems,” Syracuse University EECS/CASE Colloquium, Syracuse, NY, 25 April 2007.

“Challenges Facing Women in Computing Research,” International Women's Day Invited Speaker, University of California, Berkeley, Berkeley, CA, 9 March 2007.

“Incorporating Privacy Values, Policies and Law in Information Systems,” University of California, Berkeley, Trust Seminar, Berkeley, CA 8 March 2007.

“Incorporating Privacy Values, Policies and Law in Information Systems,” Rice University, Department of Computer Science Colloquium, Houston, TX, 29 November 2006.

“The Need for Transparency in Privacy Statements,” *Georgetown University Law Center and ISSA Conference: Emerging Trends in Information Security and the Law*, Washington, D.C. 10 November 2006.

“Conformance Across Privacy Values, Software Requirements, Policies and Law,” **Invited Plenary Closing Address**, *AusCERT 2006*, Gold Coast, Australia, 24 May 2006.

“Healthcare Privacy Policy Expression vs. User Comprehension,” Queensland University of Technology, Brisbane, Australia, 19 May 2007.

“Aligning Privacy Values, Policies, Law and Software Requirements,” University of Illinois, Trust & Security Institute Seminar, 5 April 2006.

“Aligning Privacy Values, Policies, Law and Software Requirements,” Carnegie Mellon University CyLab Seminar, 7 March 2006.

“Rappateur Report: The Scientists' and the Political Decision Makers' Approach,” Hungarian Parliament, Closing Session of World Science Forum, Budapest, Hungary, 12 November 2005.

Attendees included Otto von Hapsburg, Austrian archduke and former pretender to the Austro-Hungarian throne, son of Emperor Charles I and Empress Zita as well as Hungarian Prime Minister Ferenc Gyurcsany.

“Privacy Matters,” Invited Dinner Keynote for IDA-DARPA Defense Science Study Group Banquet, Institute for Defense Analysis, Alexandria, VA, April 2005.

“Blinded Computation,” Institute for Defense Analysis, Alexandria, VA, April 2005.

“Aligning Privacy Values, Policies, Law and Software Requirements” CERIAS Security Seminar, Purdue University, 12 October 2005.

“Balancing Privacy: Inalienable Right or Privilege?,” CERIAS Sixth Annual Information Security Symposium, Purdue University, West Lafayette, IN, 24 March 2005.

“Privacy Matters” **NSF / CISE Distinguished Lecture Series**, Arlington, VA, 2 March 2005.

“Requirements for Machine Enforceable Policies & jetBlue Update,” 2004 The Privacy Place Spring Workshop, Georgia Institute of Technology, Atlanta, GA, 8 March 2004.

Invited Presentations**(Cont.)**

“Requirements for Machine Enforceable Policies,” 4th Annual IAPP Privacy and Security Summit Washington, D.C., 18 February 2004.

“The Complexity Underlying JetBlue's Privacy Policy Violations,” IBM Tivoli, Research Triangle Park, NC, 12 January 2004.

“When Internet Privacy Policies Lie,” Open University, Milton Keynes, UK, 10 December 2003.

“Four Grand Challenges in Trustworthy Computing,” panel discussion on Capitol Hill, representing the CRA with Eugene H. Spafford, Dan Geer, Susan Landau and John Richardson, Washington, D.C., 20 November 2003.

“Crossed Signals: Internet Privacy Policies and User Concerns,” Universidad Autónoma de Madrid, Madrid, Spain, 9 June 2003.

“Aligning Privacy and Security Policies with Software Requirements,” I-Cubed, Raleigh, NC, 31 March 2003.

“Contrasting Goal and Scenario Analysis,” IFIP Requirements Engineering WG 2.9 Workshop, St. Thomas, VI, 18 February 2003.

“Crossed Signals: Internet Privacy Policies and User Concerns,” **CRA Digital Government Fellow Presentation** for Federal Trade Commission (FTC), Washington, D.C., 12 March 2003.

“Reducing Website Privacy Vulnerabilities,” Universitat Politècnica de Catalunya, Barcelona, Spain, 8 Nov. 2002.

“Alineamiento de Requisitos de Privacidad con Políticas y Valores de Usuarios,” **Keynote Speaker:** Fifth Ibero-American Workshop on Requirements Engineering, Valencia, Spain, 11-12 November 2002.

“Research Perspectives: Report on the 1st Symposium on Requirements Engineering for Information Security,” NIAP (National Information Assurance Partnership) Government-Industry IT Security Forum: Strategies for the Development of Security Requirements and Specifications for Computing and Real-Time Control Systems, Indianapolis, IN, 7 March 2001.

“Scenarios, Goals and Policies,” IFIP Req'ts Eng. WG 2.9 Workshop, Duck Island, FL, 21 February 2001.

“Our Policy is to Violate Your Privacy: When Privacy Goals Conflict,” Purdue University Center for Education and Research in Information Assurance and Security, West Lafayette, Indiana, 15 November 2000.

“Deriving Goals from a Use Case Based Requirements Specification for an Electronic Commerce System,” Research Triangle Park SPIN Meeting Speaker, Durham, NC, 13 June 2000.

“Software Process Improvement via Requirements Traceability,” BellSouth Telecommunications Technical Seminar Series, Atlanta, GA, 29 October 1999.

“Goal-Based Requirements Analysis,” ABB Seminar Series, Raleigh, NC 23 October 1999.

“From the RE of Enterprise to the Enterprise of RE,” IFIP Requirements Engineering WG 2.9 Workshop, Duck Island, FL, 22 January 1999.

“A Proposal for Scenario Management,” IFIP Requirements Engineering WG 2.9 Meeting, Duck Island, FL, 20 January 1999.

“Goal-Based Requirements Engineering,” IBM Technical Vitality Seminar, Research Triangle Park, NC, 18 November 1998.

“Goal Identification and Refinement in the Specification of Software-Based Information Systems,” booth session at *IFIP WG 2.9 Software Requirements Engineering Inaugural Meeting*, Bramshill House, Blasingstoke, Hampshire, UK, 22-25 March 1995.

Professional Service & Leadership***Editorial Board Member***

- International Board of Referees, *Computers & Security* (2006-present)
- Cognitive Issues Area Editor, *Requirements Engineering Journal* (2000-2008)
- Associate Editor, *IEEE Transactions on Software Engineering* (2004-2007)

Professional Service & Leadership (Cont.)

Guest Editor

- Special Issue of *Requirements Engineering Journal*, “Requirements Engineering for Information Security,” December 2001.

National Board / Committee Memberships

- National Security Agency Advisory Committee Panel #2 Chair (2009 - present)
- National Security Agency Advisory Committee Panel #1 Member (2008 - present)
- The Future of Privacy Forum Advisory Board (2008 - present)

The Future of Privacy Forum (FPF) is a think tank led by privacy experts Jules Polonetsky and Christopher Wolf and includes an Advisory Board comprised of leading figures from industry, academia, law and advocacy groups. FPF advocates for privacy advances that promote transparency and user control in a manner that is practical for business to implement to ensure personal autonomy for all who seek to embrace the benefits of our digital society.

- Georgia Tech Alumni Association Board of Trustees (2007 - 2010)

In the Spring of 2007, I was one of 11 individuals elected from over 100 nominees for the GTAA Board of Trustees. The Georgia Tech Alumni Association was chartered in June 1908 and incorporated in 1947 as a not-for-profit organization governed by a board of alumni volunteers known as the Board of Trustees.

- CRA Board of Directors (2006 - present)

The CRA Board of Directors is widely recognized as a distinguished group of leaders in computing research from academia and industry. Members of the CRA Board of Directors are elected by the chairs and heads of over 200 CS & CE academic departments in North America. Representatives from each of the affiliated professional societies (e.g. ACM, IEEE) also are appointed to serve on the board. My election to the board as the only Associate Professor among the academic members is a strong acknowledgment of my leadership ability and our colleagues' regard for my research contributions.

- U.S. Department of Homeland Security Data Privacy and Integrity Advisory Committee (2006-2011)

In Fall of 2006, I received a cabinet-level appointment as a Special Government Employee from Secretary Michael Chertoff to this Advisory Committee. “The DHS Data Privacy and Integrity Advisory Committee advises the Secretary of the Department of Homeland Security and the DHS Chief Privacy Officer on programmatic, policy, operational, administrative, and technological issues relevant to DHS that affect individual privacy, data integrity and data interoperability and other privacy related issues.”

- Member, External Advisory Board for U.C. Berkeley TRUST Research Center (2006 - 2009)

The TRUST Center is an \$18M NSF Funded Software Technology Center, directed by Dr. Shankar Sastry. The Team for Research in Ubiquitous Secure Technology (TRUST) is devoted to the development of new science and technology that will radically transform the ability of organizations (software vendors, operators, local and federal agencies) to design, build, and operate trustworthy information systems for our critical infrastructure. The multi-university center is lead by UC Berkeley with the following university partners: Carnegie Mellon University, Cornell University, Mills College, San Jose State University, Smith College, Stanford University, and Vanderbilt University.

- Intel Corporation Special Advisory Board on Security & Privacy (2006 - present)

- Electronic Privacy Information Center Advisory Board Member (2007 - 2009)

EPIC is a public interest research center in Washington, D.C. It was established in 1994 to focus public attention on emerging civil liberties issues and to protect privacy, the First Amendment, and constitutional values. Other computer scientists on this board include Vint Cerf, Whitfield Diffie, David Farber, Peter Neumann, Ray Ozzie, Ron Rivest, Latanya Sweeney, and Willis Ware.

- NSF CISE Advisory Council (2005 - 2009)

“The CISE Advisory Committee supplements NSF knowledge by providing up-to-date information on the state of the field, performing specialized policy-informing functions facilitating the Foundation's response to rapid changes in the CISE subdisciplines and the balance between them, and to identify situations requiring policy attention. More specifically, the AC provides advice on the impact of NSF support policies and programs on the CISE community; provides oversight on program management and performance; and provides advice to the CISE Assistant Director on special issues, forming ad hoc subcommittees to carry out needed studies as necessary.”

Professional Service**(Cont.)**

- USACM -- ACM *Executive Council* on US Public Policy (2005 - present)
Vice Chair as of January 2011 (while Ed Felten is serving as CTO at the FTC)
Named Co-Vice Chair with Professor Ed Felten (Princeton) in 2008
“The ACM U.S. Public Policy Committee (USACM) serves as the focal point for ACM's interaction with U.S. government organizations, the computing community, and the U.S. public in all matters of U.S. public policy related to information technology.”
- CRA Committee on the Status of Women in Computing Research (2005 - 2007)
“The goal of the CRA Committee on the Status of Women in Computing research (CRA-W) is to take positive action to increase the number of women participating in Computer Science and Engineering (CSE) research and education at all levels.”
- 9th IDA/DARPA Defense Science Study Group (2004 - 2005)
“The DSSG selects young professors from many of the nation's top universities, as well as non-university affiliated men and women, all of whom have been nominated by senior academic officials; DSSG alumni, mentors, and advisors; and other officials from various government agencies to take part in DSSG. Over the course of the two-year program, those invited to participate focus on defense policy, related research and development, and the systems, missions, and operations of the armed forces. The DSSG seeks to convey to members an understanding of the technical dimensions of national security issues and an appreciation for the people and operations involved.”
- USACM -- ACM Committee on US Public Policy (2003 - 2010)
- Microsoft Research University Relations Advisory Board (2003 - 2005)
- Georgia Tech National Advisory Board (1992-96)

National Awards Selection Committees

- CSO Magazine Most Influential Women in Information Security Awards (2006)
- CRA Nico Habermann Award Committee (2006 - 2007)

General / Organizing Chair

- 4th International Workshop on Requirements Engineering and Law, Trento, Italy (2011)
- 3rd International Workshop on Requirements Engineering and Law, Sydney, New South Wales, Australia (2010)
- 2nd International Workshop on Requirements Engineering and Law, Atlanta, GA (2009)
- 1st International Workshop on Requirements Engineering and Law, Barcelona, Spain (2008)
- CRA Career Mentoring Workshop for Women, FCRC, San Diego, CA (2007)
- 2nd Symposium on Requirements Engineering for Information Security, Raleigh NC (2002)

Program Chair and Co-Founder

- 3rd Symposium on Requirements Engineering for Information Security, Paris, France (2005)
- 1st Symposium on Requirements Engineering for Information Security, Indianapolis, IN (2001)

Chair or Co-Chair of Workshops / Co-Llocated Events Chair and Organizing Committee Member

- IEEE International Conference on Software Engineering, Minneapolis, MN (2007)
- IEEE 5th International Conference on Requirements Engineering, Essen, Germany (2002)

Doctoral Workshop Chair and Organizing Committee Member

- IEEE 5th International Symposium on Requirements Engineering, Toronto, Canada (2001)

Tutorials Chair and Organizing Committee Member:

- IEEE 4th International Symposium on Requirements Engineering, Limerick, Ireland (1999)
- IEEE 3rd International Conference on Requirements Engineering, Colorado Springs, CO (1998)

Publicity Chair and Organizing Committee Member:

- IEEE 4th International Conference on Requirements Engineering, Chicago IL (2000)

Corporate Sponsors Chair

- IEEE/ACM Conference on Software Engineering Education and Training, Atlanta, GA (1998)

Professional Service**(Cont.)****Program Committee Member:**

- IEEE 20th Requirements Engineering International Conference, Chicago, IL (2012)
- IEEE 19th Requirements Engineering International Conference, Trento, Italy (2011)
- IEEE 16th Requirements Engineering International Conference, Atlanta, GA (2009)
- ACM SIGSOFT Symposium on the Foundations of Software Engineering, Newport Beach, CA (2004)
- IEEE 26th International Conference on Software Engineering, Edinburgh, Scotland, UK (2004)
- IEEE 25th International Conference on Software Engineering, Portland, OR (2003)
- IEEE 10th Anniverary Joint International Symposium/Conference on Requirements Engineering, Essen, Germany (2002)
- IEEE 5th International Symposium on Requirements Engineering, Toronto, Canada (2001)

Program Committee Member:

- 3rd Ibero-American Workshop on Requirements Engineering, Rio de Janiero (2000)
- IEEE 4th International Conference on Requirements Engineering, Chicago IL (2000)
- IEEE 4th International Symposium on Requirements Engineering, Limerick (1999)
- 1st International Workshop on Requirements Engineering Process (1999)
- IEEE 3rd International Conference on Requirements Engineering, Colorado Springs (1998)

Reviewer:

- NSF Committee of Visitors for CISE (2006)
- NSF BPC Review Panel (2005)
- NSF CISE Review Panel (2005)
- NSF ITR Site Visit Panel Member (2005)
- NSF Committee of Visitors for OPP PRSS (2004)
- NSF Proposal Review Panel (2004)
- NSF Panel for 2001 SFS Awards
- *IEEE Transactions on Secure and Dependable Computing* (2006-present)
- *ACM Transactions Software Engineering and Methodology* (2000-present)
- *IEEE Software Magazine* (1996-present)
- *IEEE Transactions Software Engineering* (1997-present)
- NSF Panel for 1998 CISE Awards

Other:

- Elected Member, International Federation of Information Processing (IFIP) Working Group 2.9 (2001 - present)
- Member, Institute of Electrical and Electronics Engineers since 1991, Senior Member since 2003
- Association of Computing Machinery (1991-present)
- International Association of Privacy Professionals (2003-present)
- Moderator, International Student Requirements Engineering e-mail list (1993-1997)

University Service & Leadership**NORTH CAROLINA STATE UNIVERSITY**

- Chair, University Reappointment, Promotion And Tenure Committe (URPTC) 2010 - 2011)
The URPTC is appointed by the provost in consultation with the chair of the faculty, for the purpose of advising the provost in matters relating to the policy and processes involved in reappointment, promotion and tenure review.
- Member, University Reappointment, Promotion And Tenure Committe (URPTC) (2009 - 2011)
- Chair, Computer Science Strategic Planning Committee (2009 - 2010)
- Elected Member, Computer Science Strategic Planning Committee (2008 - 2010)
- Director, ThePrivacyPlace.Org (2001-present)
The Privacy Place is a multi-university, multi-disciplinary research center that I established in 2001. This has become one of the premier academic online resources for people interested in privacy research. It has served as a focal point of information and collaboration for researchers, faculty, students, industry and the public.
- Chair, NC State University Public Policy Task Force (2008)
The task force, charged by Provost Larry A. Nielsen, was comprised of 14 faculty and 2 students from 13 different colleges and research centers with conflicting viewpoints about what was best for the university. Over the course of six months, I was instrumental in leading our effort to complete a comprehensive inventory of all public policy research, courses and contributions at NC State. In addition, we produced a comprehensive report in which the task force unanimously recommended that we establish the Institute for Science & Technology — Engaged Public Policy (InSTEPP). The full report is available online: http://www.provost.ncsu.edu/governance/task-forces/documents/PublicPolicypptf_finalReport_submit.pdf

University Service & Leadership**(Cont.)**

- Co-Chair, 40th Anniversary Celebration Committee, Department of Computer Science (2006-2007)
- Chair, Awards Committee, Department of Computer Science (2006-2009)
- Member, Software Engineering Faculty Recruiting Committee, Department of Computer Science (2006-2007)
- Chair, Software Engineering Faculty Recruiting Committee, Department of Computer Science (2004-2005)
- Member, Software Engineering Faculty Recruiting Committee, Department of Computer Science (2003-2004)
- Chair, Strategic Planning Committee, Department of Computer Science (2002-2003)
The committee put together a 25-page compact plan document which outlined a set of strategic directions for the department. The two highest priority items identified by the committee, namely the hiring of nine (9) new faculty in strategic areas and the allocation of five (5) new TAs, were fully funded by the College. The committee also crafted new vision and mission statements for the department, which were adopted overwhelmingly by the faculty, planned the January 2003 faculty retreat, and facilitated the strategic plan discussions at the retreat.
- Facilitator, Department of Computer Science Faculty Retreat (January 2003)
- Coordinator, NSA (National Security Agency) Center of Academic Excellence in Information Assurance Education Application Team (2001-2002)
- Faculty Liaison, Department of Computer Science ePartners Industrial Affiliate Program (2000-2002)
- Co-Director, Electronic Commerce Studio (2000-present)
- Member, NCSU Multidisciplinary Studies Curriculum Committee (2000-present)
- Member, Recruiting Committee for E-commerce Faculty Position, NCSU CS Department (2000-01)
- Member, Computer Science Graduate Admissions & Recruiting Committee (1998-2000)
- Member, Recruiting Committee for E-commerce Faculty Position, NCSU College of Mgmt (1998-99)

UNIVERSITY OF SOUTH FLORIDA

- Member, University of South Florida IS/DS Faculty Recruiting Committee (1997)
- Faculty Mentor, McNair Scholars Program (1998)

GEORGIA INSTITUTE OF TECHNOLOGY

- President, Georgia Tech Alumni Association Sun Coast Club, FL (1998)
- Member, Vice President for Student Affairs Search Committee (1996-97)
- Chair, Georgia Tech Capital Campaign Student Volunteer Team (1996)
- Member, Software Engineering Strategic Planning Committee (1992-95)
- Member, Georgia Tech President's Inaugural Planning Committee (1994-95)
- Member, Executive Director of Information Technology Search Committee (1993-94)
- Member, Coordinator of Disabled & Non-Traditional Students Search Committee (1993-94)
- Member, Georgia Tech Alumni Association Leadership Awards Committee (1993, 1996)
- Member, College of Computing (CoC) Graduate Program Committee (1992-94)
- Elected, CoC Graduate Student Liaison to the Faculty (1990-92)
- Chair, CoC Graduate Student Committee (1990-92)
- Member, CoC Undergraduate Curriculum Reform Committee (1990-91)

Teaching Experience**NORTH CAROLINA STATE UNIVERSITY**

1998-Present

Assistant Professor, Associate Professor & Full Professor

Raleigh, North Carolina

- CSC 326 - Software Engineering (Fall '98, Fall '99, Fall '00, Spring '02, Spring '03)
- CSC 495 - Software Engineering Project (Spring '00)
- CSC/ECE 510 - Software Engineering
(Fall '02, Spring '04, Fall '04, Fall '06, Fall '07, Spring '08, Fall '08, Fall '09, Spring '10, Spring '11)
- CSC/BUS 516 - Information Assurance Practicum (Spring '07)
- CSC/BUS 516 - Electronic Commerce Practicum (Spring '01, Fall '01, Fall '02, Spring '05)
- CSC 595i - Contextual Design (Spring '00)
- CSC 595/791 - Requirements Engineering (Spring '99, Spring '03, Spring '08, Spring '12)
- CSC 630 - Software Engineering Seminar (Fall '98, Fall '99, Fall '00)
- CSC 591/791 - Privacy Technology, Policy & Law (Spring '09, Spring '11)

UNIVERSITY OF SOUTH FLORIDA

1997-1998

Assistant Professor

Tampa, Florida

- ISM 3113 - Systems Analysis & Design (Fall '97, Spring '98 -- two sections)

Teaching Experience

(Cont.)

1990-1994

GEORGIA INSTITUTE OF TECHNOLOGYGraduate Teaching Assistant

Atlanta, Georgia

- CS 4345 - Computerization in Society (Fall '94)
- CS 4807,8,9 - Senior Design Project Advisor for 15 students (Spring-Summer '91, Fall '95-Spring'96)
- CS 4351 - MIS Methodology (Winter '91, Fall '91)
- CS 4753 - Human Factors in Software Development (Fall '90, Spring '93)

Thesis Committee Chair**Ph.D. Students**

- Thomas A. Alspaugh, Doctor of Philosophy (December 2002)
Thesis: Scenario Networks and Formalization for Scenario Management
Affiliation After Graduation: University of California, Irvine
Current Affiliation: Georgetown University, Washington, DC
- Qingfeng (Frank) He, Doctor of Philosophy (December 2005)
Thesis: Requirements-based Access Control Analysis and Policy Specification (ReCAPS)
Affiliation After Graduation: Researcher, ABB Corporate Research, Raleigh, NC
Current Affiliation: Folio Investing, McLean, VA
- Jim Yuill, Doctor of Philosophy December 2006)
Co-Chair: Mladen Vouk
Thesis: Deception Investigation for Incident Response
Affiliation After Graduation: Self-Employed, Durham, NC
Current Affiliation: Visiting Assistant Professor, North Carolina State University College of Management
- Travis Breaux, Doctor of Philosophy (May 2009)
Thesis: Legal Requirements Acquisition for the Specification of Legally Compliant Information Systems
Affiliation After Graduation: Institute for Defense Analysis, Alexandria, VA
Current Affiliation: Assistant Professor, Carnegie Mellon University, Pittsburgh, PA
- Paul Otto, Doctor of Philosophy & Juris Doctorate (JD 2011 @ Duke; PhD 2012 @ NCSU)
Thesis Area: Legal Compliance in Software Systems
- Aaron Massey, Doctor of Philosophy (2012)
Thesis Area: Regulatory Compliance
- Jessica Young, Doctor of Philosophy (2012)
Thesis Area: Commitment Theory
- Jeremy Maxwell, Doctor of Philosophy (2013)
Thesis Area: Using Production Rules to Model Regulations
- Ramya Gopalan, Doctor of Philosophy (2014)
Thesis Area: UCON_{LEGAL}: Access Control for Regulated Software Systems

M.S. Students

- John Hampton Dempster, Master of Science (June 2000)
Thesis: Inconsistency Identification and Resolution in Goal-Driven Requirements Analysis
- Ryan A. Carter, Master of Science (May 2001)
Thesis: Evolutionary Prototyping for Electronic Commerce
- Hema Srikanth, Master of Science (May 2002)
Thesis: Agile Evolutionary Prototyping
- William H. Stufflebeam, Master of Science December 2005)
Qualifying Exam for PhD: November 2005
- Matthew Vail, Master of Science (May 2006)
Thesis: Privacy Policy Representations and User Comprehension
- Paul Otto, Master of Science May 2007)
Qualifying Exam for PhD: Spring 2007
- Aaron Massey, Master of Science (May 2009)
Qualifying Exam for PhD: Spring 2009
- Jessica Young, Master of Science (December 2009)
Qualifying Exam for PhD: June 2009
- Gurleen Kaur, Master of Science (May 2010)
Qualifying Exam for PhD: December 2009
- Ramya Gopalan, Master of Science (May 2011)
Qualifying Exam for PhD: April 2011

Thesis Committee Chair

(Cont.)

Undergraduate Honors Thesis Students

Kevin Farmer (December 2000)
Felton Samuel Dengler (December 1999)
Matthew Vail (December 2004)
Jack Frink (May 2005)
Neha Jain (May 2005)

Thesis Committee Member

PhD Thesis committee member for:

Dingbang Xu (Chair: Peng Ning)
Carlos Jensen (Georgia Institute of Technology)
Yutao Xie (Chair: Dr. Purush Iyer)
Junyu (Allen) Zheng (Civil Engineering)
Dright Ho (Chair: Dr. Laurie Williams)
Andy Meneely (Chair: Dr. Laurie Williams)

MS Thesis committee member for:

Joseph Clay Drye, 2001 (Chair: Dr. W. Lee)	Prashant Baheti, 2003 (Chair: Dr. Laurie Williams)
Kai Yang, 2002 (Chair: Dr. L. Williams)	Erkang Zhang, 2004 (Chair: Dr. M. Vouk)
Anuja Shukla, 2002 (Chair: Dr. L. Williams)	Luo Gao, 2004 (Chair: Dr. Ting Yu)
Raoul Jetley, 2002 (Chair: Dr. P. Iyer)	Bharathy Sethumadhavan, 2004 (Chair: Dr. Ting Yu)
V. Ramachandran, 2002 (Chair: Dr. L. Williams)	Michael Gegick, 2004 (Chair: Dr. Laurie Williams)

Research Scientists

Laurie Jones (2006) -- Now a PhD student at CMU, funded with an NSF PhD Graduate Fellowship

CRA DMP Mentees

Roksolana Antonyuk (2001)	Angela Reese (2001)
Laura Bode (2002)	Marlies Santos (2007)
Neha Jain (2004)	Ha To (2000)
Laurie Jones (2005)	

AGEP Mentees

John Edwards (2008)

References

Available upon request.