

Mohd Anwar, Ph. D.

Assistant Professor of Computer Science

Director, Secure and Usable Social Media & Networks Lab

North Carolina A&T State University

Email: manwar (at) ncat.edu

Phone: 336-285-2449

Web: anwar.ncat.edu

Mail: 1601 E. Market Street, Greensboro, NC 27411

Education

Ph.D., Computer Science, 2009

University of Saskatchewan, Canada

Teaching Certification, 2008

University of Saskatchewan, Canada

M.S., Computer Science, 2003

North Dakota State University, ND, USA

B.S., Computer Science, 2000

Winona State University, MN, USA

Research Interests

Areas. **Cyber Security** – Access Control, Identity Management, Trust, Cloud Security, Mobile Security ; **Human Centered Computing** – Human Factors in Security, Online Social Networks, Healthcare Social Networks, Social Navigation Systems; **Healthcare Informatics** – mHealth, Tele-Health, and E-Health systems; **Identity Sciences** – Computational Model of Identity, Identity in Online Social Media; **Intelligent Tutoring Systems** – Location-based & Mobile Learning, Personalized Learning.

My primary research interest lies in Cyber Security & Privacy. My work focuses on developing usable privacy-preserving, secure, and trustworthy infrastructures, systems, and applications in different online contexts, specifically in social networks, healthcare, and e-learning. My other research interests include designing personalized, location-based, and mobile technologies for smart health and e-learning through harnessing social computing strategies, user generated content, and social networking platform. Towards pursuing my research goal, I use *Software Engineering, HCI, and AI* techniques as well as apply theories from Social Sciences to design solutions.

Google Scholar Citation Indices. Citations: 503, h-index: 12, i10-index: 14 (as of 1/1/17)

Erdős # 4

Grants and External Funding

Principal Investigator (2013 – 2017). *National Science Foundation's Secure & Trustworthy Cyberspace (SaTC) program, Improving Security Behavior of Employees in Cyberspace through Evidence-based Malware Reports and E-Learning Materials, Amount: \$456,028 (NC A&T part: \$210,568).*

Principal Investigator (2016 – 2017). *National Science Foundation's Secure & Trustworthy Cyberspace (SaTC) program, Supplemental funding to Improving Cybersecurity Behavior, Amount: \$41,999*

Principal Investigator (2015 – 2016). *National Science Foundation's Secure & Trustworthy Cyberspace (SaTC) program, Research Experiences for Undergraduates: Improving Security Behavior in Cyberspace, Amount: \$14,000 .*

Principal Investigator (2014 – 2018). *Clarkson Aerospace, Enforcing Security and Privacy in Cloud Computing through Auditing, Amount: \$147,630*

Principal Investigator (2016 – 2016). *Clarkson Aerospace, Supplemental Funding to Enforcing Security and Privacy in Cloud Computing through Auditing, Amount: \$25,000*

Principal Investigator (2013). *Title III HBGI Program, Cloud Testbed for Experimentation on Cloud Security, Amount: \$27,100*

Principal Investigator (2015). *Release Time Proposal Development Award by DORED/North Carolina Translational and Clinical Sciences Institute, Amount: \$20,550*

Investigator (2015 – 2017). *Center for Advanced Studies in Identity Sciences*

Senior Personnel (2016 – 2017). *HBCU-UP ACE Planning Grant, Amount: \$350,000*

Research Experience

Assistant Professor (08/12 – to-date) (On tenure track from 01/2013). Computer Science, NC A&T State University, Greensboro, USA

- Investigating security, access control, and trust issues in Cloud computing and online social media
- Analyzing vulnerabilities in mobile devices and Cloud platforms
- Investigating techniques for “patient empowerment” in mobile & pervasive e-health systems
- Investigating identity, reputation, and personalization in online social media
- Exploring serious games for technology-mediated healthcare interventions and education

Research Assistant Professor (09/10 – 08/12). School of Information Sciences, University of Pittsburgh, USA

- Investigated privacy, access control, and trust issues in online social networks and mobile & pervasive e-health systems
- Investigated trust issues in autonomous systems (AS) to address various attacks on routing protocols
- Investigated a social computing system for “experience-based” navigation assistance in physical space
- Developed model and methodology to support “location-based” and mobile learning
- Explored privacy, territoriality, and trust issues in community authoring and social e-learning systems

Post Doctoral Research Fellow. (02/09 – 08/10). iCORE Information Security Lab, Department of Computer Science, University of Calgary, Canada

- Investigated issues of privacy and security in social network systems
- Constructed topology-based access control and privacy models for Facebook-style social network systems
- Developed and evaluated visualization techniques for privacy policy assessment

Graduate Research Fellow. (06/05 – 01/09). ARIES Laboratory, Department of Computer Science, University of Saskatchewan, Canada

- Investigated issues of privacy, security, and trust in e-learning domain
- Constructed an identity and trust-based computational model for privacy to capture and address the subtleties of a user’s expectation of privacy
- Designed and developed a privacy-enhanced online discussion forum for e-learning environments
- Designed and developed a reputation management system for e-learning environments

Research Associate. (01/03 – 07/03). Dept. of Computer Science , Winona State University, MN, USA

- Collaborated in the research of increasing the accessibility of the computer science curriculum for students with diverse learning abilities (non-sighted learners) (NSF award # 9986689)
- Participated in the design and development of non-visual navigation tools for students with visual disabilities for navigating hierarchical structure of computer programs via keyboard input and speech/sound output

Graduate Research Assistant. (01/01 – 12/02). Department of Computer Science, North Dakota State University, ND, USA

- Designed a task allocation model for multiple Unmanned Aerial Vehicles using Neuro-Dynamic programming concept and benchmarked the performance of the model
- Developed a Neural Network learning tool to learn a heuristic function of goodness for task allocation
- Developed a simulator for task allocation in a dynamic environment

Teaching Experience

Assistant Professor. 2012 – present
Department of Computer Science, NC A&T State University, USA

Research Assistant Professor. 2011-2012
School of Information Sciences, University of Pittsburgh, USA

Guest Lecture. Winter 2009, Winter 2010
Department of Computer Science, University of Calgary, Canada

Sessional Lecturer. 2005–2008
Department of Computer Science, University of Saskatchewan, Canada

Lecturer. 2004–2005
Department of Computer Science, University of Minnesota - Morris, MN, USA

Assistant Professor (Term). 2003–2004
Department of Mathematics & Computer Science, Bemidji State University MN, USA

Instructor. 2003
Department of Computer Science, Winona State University, MN, USA

Institution	Courses Taught
NC A&T State University	Doctoral Research Methods, Information Privacy and Security, Usable Security, Secure Social Computing, Senior Project, Master's Thesis, Special Topics (Online Healthcare Social Media, Cloud Computing, Fundamentals of Access Control)
U of Pittsburgh	Network Security
U of Calgary	Foundations of Access Control (Hyper-safety & Policy Refinement, Noninterference), Programming Paradigms
U of Saskatchewan	Web Programming, Programming Practice and Principles, Data Structures and Software Development, and Developing Object Oriented Systems
U of Minnesota	Software Design & Development, Human Computer Interaction, Software Engineering, Ethical & Social Implications of Computer Technology
Bemidji State U.	Computer Science I, Computer Science II, File Processing & Database System, Software Engineering, Computer programming: Visual Basic.NET, Operating Systems, and Artificial Intelligence
Winona State U.	Computers in Society, Using Personal Computers

Industry Experience

Analyst/Programmer (05/99 – 05/00). Surgical Information Recording Systems, Mayo Foundation, Rochester, MN, USA

- Written and maintained data retrieving routines in IBM mainframe environments (using EZTrieve and JCL) to support health research
- Written SQL queries and maintained relational databases
- Written and maintained applications to generate reports and build user interfaces

Software Tester & Developer (01/97 – 05/99). IBM Software Testing Lab at Winona State University, Winona, MN, USA

- Written test cases and performed IBM Client Access/400 Testing
- Written test cases and performed database connectivity and application testing in AS/400 platform
- Performed testing and debugging on the components of IBM's San Francisco Project – a Java-based application development software

Publications

Peer-reviewed Publications

- Brown, J., Anwar, M. and Dozier, G.: **An Artificial Immunity Approach to Malware Detection in a Mobile Platform.** Accepted for Springer Journal on Information Security (EURASIP), 2016.
- Alasmay, S. and Anwar, M.: **Security & Privacy Challenges in IoT-based Health Cloud.** Proceedings of IEEE Conference on Computational Science and Computational Intelligence (Internet of Things Track), Las Vegas, 2016.
- He, W., Anwar, M., Yuan, X., Tian, X.: **Developing and Using Evidence-based E-learning Videos for Cybersecurity Education.** Proceedings of the KSU Conference on Cybersecurity Education, Research and Practice, 2016.

- Anwar, M. and He, W. and Yuan, X.: **Employment Status and Cybersecurity Behaviors**. Proceedings of the International Conference on Behavioral, Economic, and Socio-cultural Computing, Duke University, Durham, NC, USA, 2016.
- Kanampiu, M., Anwar, M.: **"Not All FRIENDs are Equal": Friendship Classification for Defending against Social Engineering Attacks**. Journal of Cybersecurity Education, Research and Practice (accepted with revision), 2016.
- Brown, J., Anwar, M., and Dozier, G: **Mobile Malware Detection using Multiple Detector Set Artificial Immune System**, IEEE S&P Poster paper, Oakland, CA, 2016.
- Anwar, M., He, W., Ash, I., Yuan, X., Li, L., Xu, L.: **Gender Difference and Employees' Cybersecurity Behaviors**. Elsevier Journal of Computers in Human Behavior (In print), 2016.
- Anwar, M. and Brusilovsky, P.: **Privacy and Territoriality Issues in an Online Social Learning Portal**. International Journal of Information Security & Privacy (In print), 11(1), pp.1–17, 2016.
- Brown, J., Anwar, M. and Dozier, G.: **Detecting Mobile Malware: An Artificial Immunity Approach**. IEEE S&P : Bio-inspired Security, Trust, Assurance, and Resilience, pp. 74–80, 2016.
- Brown, J., Anwar, M. and Dozier, G.: **Intrusion Detection using Multi-detector Set Artificial Immune System**. IEEE International Conference on Information Reuse & Integration (IRI), Pittsburgh, 2016.
- Brown, J., Anwar, M. and Dozier, G.: **An Evolutionary General Regression Neural Network Classifier for Intrusion Detection**. IEEE International Conference on Computer Communication and Networks (ICCCN), Big Island, HI, 2016.
- He, W., Anwar, M., Ash, I., Yuan, X., Li, L., and Xu, L. (2016). **A Study of Employees' Self-Reported Cybersecurity Behaviors**. TREO Talk and Proceedings of the 22nd Americas Conference on Information Systems (AMCIS 2016), San Diego, USA, August 11-14, 2016.
- Williams, I., Yuan, X., McDonald, J.T., and Anwar, M.: **A Method for Developing Abuse Cases and Its Evaluation**. Journal of Software (ISSN 1796-217X), 11(5), pp. 520–527, 2016.
- Anwar, M., Yuan Z.: **Linking Obesity and Tweets**. In Proceedings of International Conference for Smart Health, pp. 234–246, Phoenix, AZ, Nov. 17–18, 2015.
- Anwar, M. & Doss, C.: **Lighting the Mobile Information FHIR: How FHIRframe Could Dramatically Improve Mobile Health and Change HIM in the Process**. Journal of American Health Information Management Association, 86(9), 2015.
- Anwar, M. and Joshi, J. B. D., Tan, J.: **Anytime, anywhere access to secure, privacy-aware healthcare services: Issues, approaches and challenges**. Health Policy and Technology, 4(4), 299-311, 2015.
- Anwar, M. & Imran, A.: **Access Control for Multi-tenancy in Cloud-based Health Information Systems**. In proceedings of IEEE Cyber Security and Cloud Computing Conference, pp. 104–110, New York, NY, 2015.
- Olanya, M.O., Anwar, M., He, Z., Larkin, R. P., Honeycutt, C. W.: **Survival Potential of P. Infestans Sporangia in relation to Environmental Factors and Late Blight Occurrence**. Journal of Plant Protection Research, 56(1), 73–81, 2015.
- Doss, C., Anwar, M., & Manjaro, N.: **A Context-aware Remote Health Monitoring Service for Improved Patient Care**. In Wickramasinghe, Troshani, and Tan, ed. Key Considerations in Consumer Health Informatics. Springer, 2015.
- Anwar, M. & Imran, A.: **A Comparative Study of Alphanumeric and Graphical Passwords for Mobile Authentication**. In Proceedings of the Modern Artificial Intelligence & Cognitive Science Conference, pp. 13–18, 2015.
- Anwar, M., He, W., & Yuan, X.: **Enhancing Student Learning of Network Traffic Analysis from Real**

Data: Development of Case-based Learning Objects. **Accepted in IEEE Frontiers in Education Conference (FIE)**, 2015.

- He, W., Ash, I., Li, L., Xu, L., Anwar, M., & Yuan, X. : **A Security Behavior Model of Employees in Cyberspace**. In Proceedings of the 21st Americas Conference on Information Systems (AMCIS 2015), Puerto Rico, USA, August 13-15, 2015.
- Anwar, M.: **Leveraging Online Social Media for Capturing Observations of Daily Living and Ecological Momentary Assessment**. In Proceedings of the IEEE Conference on Information Reuse and Integration, pp. 104–108, 2014.
- Li, L., He, W., Ash, I., Xu, L., Anwar, M., & Yuan, X.: **Does Explicit Information Security Policy Affect Employees Cyber Security Behavior? A Pilot Study**. In Proceedings of the IEEE Conference on Enterprise Systems, pp. 169–173, 2014.
- Imran, A., & Anwar, M.: **Design of a HIPAA Compliant Health Cloud**. In mHealth conference, Duke University, 2014.
- Anwar, M., Masoumzadeh, A., and Joshi, J.B.D.: **Privacy and Security in Location-Based Services**. In Hassan A. Karimi, ed. *Advanced Location-Based Technologies and Services*, pp. 235–264. Taylor & Francis, 2013.
- Jin, L., Joshi, J., and Anwar, M.: **Mutual-friend Based Attacks in Online Social Networks**. *Elsevier Computers & Security*, 37(1), pp. 15 – 30, 2013.
- Konstantinos, P., Zadorozhny, V., Kounev, V., Oleshchuk, V., and Anwar, M.: **Automatic Evaluation of Information Provider Reliability and Expertise**. *World Wide Web Journal*, pp. 1–40, Springer, 2013.
- Anwar, M., Hill, E., Skujins, J., Huynh, K., and Doss, C.: **Kalico: A Smartphone Application for Health-smart Menu Selection within a Budget**. In Proceedings of the International Conference for Smart Health (ICSH '13), Springer LNCS (8040), pp. 113–121, 2013.
- Anwar, M. and Greer, J.: **Facilitating Trust in Privacy-preserving E-Learning Environments**. *IEEE Transactions on Learning Technologies*, 5 (1), pp. 62-73.
- Anwar, M. and Greer, J.: **Role- and Relationship-based Identity Management for Privacy-enhanced E-learning**. *International Journal of Artificial Intelligence in Education*, 21 (3), pp. 191–213, IOS Press, 2012.
- Anwar, M., Zhao, Z., Fong, P.W.L.: **An Access Control Model for Facebook-style Social Network Systems**. Technical Report 2010-959-08, Department of Computer Science, University of Calgary, Canada.
- Anwar, M. and Fong, P.W.L.: **A Visualization Tool for Evaluating Access Control Policies in Facebook-style Social Network Systems**. In Proceedings of the 27th ACM Symposium on Applied Computing (SAC'12), Security Track, pp. 1443 –1450, Riva del Garda, Trento, Italy, March 26-30, 2012.
- Benner, J.B., Anwar, M., and Karimi, H.A.: **LearNet : A Location-Based Social Networking Methodology for Group Forming for Learners**. In proceedings of the International Conference on Computer Supported Education (CSEDU 2012), Porto, Portugal, April 16-18, 2012.
- Jin, L., Long, X., Joshi, J. B. D., Anwar, M. : **Analysis of Access Control Mechanisms for Users' Check-ins in Location-Based Social Network Systems**. *IEEE International Conference on Information Reuse & Integration*, pp. 712–717, 2012.
- Gonzalez, J., Anwar, M., and Joshi, J. B. D.: **A Trust-based Approach against IP-spoofing Attacks**. *IEEE International Conference on Privacy Security and Trust (PST' 2011)*, pp. 63–70, Montreal, Canada, July 19-21, 2011.
- Ahmadinejad, S.H., Anwar, M., and Fong, P.W.L.: **Inference Attacks by Third-Party Extensions to Social Network Systems**. In Proceedings of the 3rd IEEE International Workshop on Security and Social Networking (SESOC'11), pp. 282–287, Seattle, Washington, USA, March 21, 2011.

- Gonzalez, J., Anwar, M., and Joshi, J. B. D.: **Trust-based Approaches to Solve Routing Issues in Ad-hoc Wireless Networks: A Survey**. In Proceedings of IEEE International Conference on Trust, Security and Privacy in Computing and Communications, pp. 556 – 563, Changsha, China, November, 2011. IEEE Computer Society Press.
- Gonzalez, J., Anwar, M., and Joshi, J. B. D.: **A Trust-based Approach to Mitigate Rerouting Attacks**. In Proceedings of International Conference on Collaborative Computing: Networking, Applications and Worksharing (CollaborateCom '11), Orlando, Florida, USA, Oct 15-18, 2011.
- Anwar, M., Karimi, H.A., Benner, J.B.: **OnLocEd: Finding Learning Resources and Communities**. In Proceedings of the International Conference on Computer Supported Education (CSEDU '11), pp. 204–210, Noordwijkerhout, The Netherlands, May 6-9, 2011.
- Baracaldo, N., Lopez, C., Anwar, M., and Lewis, M.: **Simulating the Effect of Privacy Concerns in Online Social Networks**. In Proceedings of IEEE International Conference on Information Reuse & Integration 2011, pp. 519–524, Las Vegas, USA, August 2, 2011.
- Karimi, H., Benner, J., and Anwar, M.: **A Model for Navigation Experience Sharing through Social Navigation Networks (SoNavNets)**. In Proceedings of IEEE International Conference on Information Reuse & Integration 2011, pp. 557–560, Las Vegas, USA, August 2, 2011.
- Anwar, M., Fong, P.W.L., Yang, X.D., Hamilton, H.: **Visualizing Privacy Implications of Access Control Policies in Social Network Systems**. In Garcia-Alfaro, J., Navarro-Arribas, G., Cuppens-Boulahia, N., Roudier, Y., eds.: Data Privacy Management and Autonomous Spontaneous Security, Volume 5939 of LNCS, Chapter 9, pp. 106–120. Springer Berlin / Heidelberg, 2010.
- Fong, P.W.L., Anwar, M., Zhao, Z.: **A Privacy Preservation Model for Facebook-style Social Network Systems**. In Proceedings of the 14th European Symposium on Research in Computer Security (ESORICS'09), LNCS (September 2009), pp. 303–320.
- Anwar, M. and Greer, J.: **Implementing Role- and Relationship-based Identity Management in E-learning Environments**. In Proceedings of the 14th International Conference on Artificial Intelligence in Education, pp. 608–610, Brighton, UK (2009).
- Anwar, M.: **Identity and Reputation Management for Online Learners**. In Proceedings of the International Conference on Intelligent Tutoring Systems, Young Researchers Track, 11 pages, Montreal, Canada (2008).
- Anwar, M., Greer, J.: **Role and relationship-based identity management for private yet accountable e-learning**. In Proceedings of the IFIPTM Joint iTrust and PST Conferences on Privacy, Trust Management and Security. IFIP International Federation for Information Processing, Trondheim, Norway, Springer Boston (2008), pp. 343–358.
- Anwar, M. and Greer, J.: **Enabling Reputation-based Trust in Privacy-Enhanced Learning Systems**. In Proceedings of the 9th International Conference on Intelligent Tutoring Systems, pp. 681–683, Montreal, Canada (2008).
- Anwar, M., Greer, J., and Brooks, C.: **Privacy Enhanced Personalization in E-learning**. In Proceedings of the ACM Conference on Privacy, Security and Trust, pp.1–4, Toronto, Canada (2006).
- Anwar, M. and Greer, J.: **Privacy and Trust in E-learning**. In: Proceedings of the 3rd Annual Scientific Conference of the LORNET Research Network (I2LOR-06), Montreal, Canada (2006).
- Anwar, M. and Greer, J.: **Reputation Management in Privacy-Enhanced E-learning**. In Proceedings of the 3rd Annual Scientific Conference of the LORNET Research Network (I2LOR-06), 6 pages, Montreal, Canada (2006).
- Smith, J., Long, J., Lung, T., Anwar, M., and Subramanian, S.: **Paperspace: A System for Managing Digital and Paper Documents**. In Proceedings of the Conference on Human Factors in Computing Systems (CHI 2006), pp. 1343–1348, Montreal, Quebec, Canada (2006).

- Anwar, M. and Greer, J.: **Privacy through Identity Management in E-Learning (poster paper)**. In Proceedings of the Second International Conference of the Learning Object Repository network (LORNET '05), Vancouver, Canada 2005.
- Kamel, A., Anwar, M., and Nygard, K.: **Neuro-dynamic Programming for Task Allocation to Unmanned Aerial Vehicles**. In Proceedings of the ISCA 13th International Conference on Intelligent and Adaptive Systems and Software Engineering, pp.121–127, Nice, France (2004).
- Smith, A., Francioni, J., **Anwar, M.**, Cook, J., Hossain, A., and Rahman, M.: **Nonvisual Tool for Navigating Hierarchical Structures**. In Proceedings of the ACM SIGACCESS Conference on Computers and Accessibility, pp. 133–139, Atlanta, GA, USA (2004).

Honors & Awards

Center for Entrepreneurship and Innovation (CEI) Faculty Fellowship. NC A&T State University (2016-2017).

Highest number of student posters at CoE Graduate Poster Competition. NC A&T State University (2015).

LORNET Graduate Fellowship. University of Saskatchewan (2005 – 2008)

Graduate Research Assistantship. North Dakota State University (2001 – '02)

Computer Science Alumni Scholarship. Winona State University (1998 –'00)

Cross-cultural Outreach Scholarship. Winona State University (1996 – 1999)

Deans List. Winona State University (1997 – 1998)

Professional Activities / Recognition

Professional Affiliation/ Collaboration

- Director, Secure & Usable Social Media & Networks Lab, NCAT
- co-Director, mHealth Interoperability Lab, NCAT
- co-Director, Cyber-Human Analytics for the Internet of Things(CHARIOT), NCAT
- Faculty Associate, The Center for Cyber Defense, NCAT
- Faculty Associate, The Center for Advanced Studies in Identity Sciences, NCAT
- Collaborator, Geoinformatics Laboratory, University of Pittsburgh
- Collaborator, Laboratory for Education and Research on Security Assured Information Systems (LER-SAIS), University of Pittsburgh
- Collaborator, Wu He, Old Dominion University
- Collaborator, Bernard Fuemmeler, Duke University Medical Center
- Collaborator, Paschal Sheeran, UNC Chapel Hill
- Collaborator, Seonae Yeo, UNC Chapel Hill
- Collaborator, Dipankar Dasgupta, University of Memphis
- Collaborator, Joseph Tan, McMaster University, Canada
- Collaborator, Modesto Olanya, Research Scientist with USDA-Agricultural Research Service, PA
- Collaborator, Nathan Botts, Westat & Health E-services LLC.
- Member & Project Facilitator, Health Level Seven International, a standards developing organization for Electronic Health Information
- Industry Broader Context Partner: Cone Health Community Health & Wellness Clinic

Grant Review Panel Member. USDA, DoD, NIH Early Career Reviewer.

Research Supervision. Advisor: 4 MS (graduated), 3 PhD (underway), 5 MS (underway)
Committee member: 2 PhD (graduated), 1 PhD (underway)
Supervised: 1 PhD at University of Pittsburgh.

Program Co-Chair. IEEE International Workshop on Issues & Challenges in Social Computing - WICSOC 2011, WICSOC 2012, WICSOC 2013, WICSOC 2014, WICSOC 2015.

Session Chair. Big Data & Smart Health Session, International Conference on Smart Health 2015, Phoenix, AZ; Tele-Health track, IEEE Conference on Cybersecurity and Cloud Computing 2015, New York, NY; ICCN, 2016, Big Island, HI; International Conference on Behavioral, Economic, and Socio-Cultural Computing (BESC2016), Durham, NC.

Editorial Board Member. International Journal of Privacy and Health Information Management (IJPHIM), International Journal of Healthcare Information Systems and Informatics, International Journal of Information Security and Privacy.

Program Committee. International Conference on Smart Health 2015, Modern Artificial Intelligence & Cognitive Science Conference 2015, Privacy, Security, & Trust - PST 2012, Data Privacy Management - DPM 2011, 2010, Model-Based and Policy-Based Engineering in Information Security -MPEIS 2011, Artificial Intelligence and Music - FLAIRS 2005, FLAIRS 2004.

Organizing Committee. The 12th Information Hiding Conference, Calgary, Alberta, Canada, June 28-30, 2010. The 13th IEEE Conference on Information Reuse and Integration, Las Vegas, USA, August 8-10, 2012.

Reviewer. IEEE Transactions on Services Computing (TSC), International Journal of Healthcare Information Systems and Informatics, International Conference on Smart Health (ICSH), Privacy, Security, and Trust (PST), Annual Computer Security Application Conference (ACSAC), Journal of Information Privacy & Security, Journal of Social Network Analysis and Mining (SNAM), User Modeling and User-adapted Interaction (UMUAI), User Modeling, Adaptation, and Personalization (UMAP), International Journal on AI Tools (IJAIT), AI in Education (AIED), Intelligent Tutoring Systems(ITS), World Wide Web Conference (WWW), IEEE Computer Software & Application Conference (COMPSAC), International Conference on Information Systems, Learning Object Repository Network Conference (LORNET)

Invited Speaker. – Graduate Research Assistant Symposium at DORED, October 2016. Topic: Evaluation of Scientific Research.

– mHealth Conference at Duke University, April 2014. Topic: Mobile Intervention for Mitigating Barriers to Obtaining Healthy Food.

– School of Information Sciences, University of Pittsburgh, October 2010. Topic: Managing Privacy, Security and Trust in E-Learning and Social Networks.

– Computer Science Department Seminar Series, University of Regina, September 2009. Topic: Assessing Privacy Implications of Access Control Policies in Social Network Systems.

Presented in Conferences. IEEE Cyber Security & Cloud Computing (CSCloud '15), Springer International Conference for Smart Health (ICSH '13, ICSH '15), mHealth Conference 2014, IEEE International Conference on Information Reuse & Integration (IRI '14, IRI '12, IRI '11,), European Symposium on Research in Computer Security (ESORICS '09), Data Privacy Management (DPM '09), Intelligent Tutoring Systems (ITS '08), Privacy, Security, and Trust (PST '06, '07, '11), IFIP conference on Trust Management (IFIPTM '08), LORNET ('05, '06).

January 2, 2017