# Ahmed E. Youssef, Ph.D.

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### **Education**

- Ph.D. Computer Science & Engineering, University of Connecticut, USA, 2006.
- M.Sc. Computer Science & Engineering, University of Connecticut, USA.
- M.Sc. Electronics & Electrical Communications Engineering, Helwan University
- **B.Sc.** Electronics & Electrical Communications Engineering, Helwan University

### **Employment History**

- Associate Professor, CCIS, King Saud University (KSU), KSA, 2016 till present
- Assistant Professor, CCIS, King Saud University (KSU), KSA, 2010 2016
- Assistant Professor, Faculty of Engineering, Helwan University (HU), Egypt, 2007 2010
- TA/RA, University of Connecticut (UConn), USA, 2000-2006
- TA, Helwan University (HU), Egypt, 1991-1999

### **Research Interest**

Cloud Computing, Mobile and Pervasive Computing, Green Computing, Internet of Things, Big Data Analytics.

### **Teaching Experience**

Institute	Courses
King Saud University (KSU)	<ul> <li>Fundamentals &amp; and Ethics of Information Systems (IS 201)</li> <li>IS Projects Management (IS 351)</li> <li>Data Transmission and Computer Networks (IS 370)</li> <li>E-health (IS 472)</li> <li>Capstone Projects (IS 498, IS 499)</li> <li>Software Project Management and Quality Assurance (IS 540)</li> <li>Enterprise Applications Development (IS 522)</li> <li>Enterprise Content Management (IS 554)</li> <li>Research Seminar (IS 598)</li> <li>Master Project (IS 599)</li> <li>E-Business Strategies (CIS 628)</li> <li>IT Project Management (IS 602)</li> <li>Web Content Management (IS 621)</li> </ul>
British University in Egypt (BUE)	- Artificial Intelligence
Misr International University (MIU)	-Advanced Operating Systems
Canadian International College (CIC)	- Operating Systems
	- Electronics Design Tools

- Computer Architecture & Organization
- Digital Logic Design
- Microprocessors
- Microelectronics, Integrated Circuits (ICs), IC labs
- Artificial Intelligence
- Programming with Java
- Operating Systems
- Real-time Systems
- Software Engineering
- Computer Organization & Architecture
- Computer Interface
- Programming with C++
- Real-time Systems
- Digital Systems Interface
- Expert Systems
- Real-time Systems
- Operating Systems
- Object Oriented Programming
- Data Structure & Algorithms
- Graph Theory
- Data Processing & Management
- Programming with C++
- Queuing theory
- Digital Logic Design Lab
- Digital Logic Design Lab

# **Professional Activities**

- Serving in the following Committees: Accreditation (ABET, NCAAA), IS dept. Annual Report, TA affairs. Manpower, KSU Strategic plan, Graduation Projects, MSc program, Student advising.
- Participating in e-course training session, CCIS, KSU, 2014.
- Participating in The 1<sup>st</sup> annual forum for university teaching, KSU, 11-12 Sep, 2011
- Participating in The Preparatory Week for University Teaching, KSU, 19-21 Sep, 2010
- Participating in training session "Teaching with Active Learning", KSU, Sep, 2010
- Participating in training session "Assessing Student Learning", KSU, Sep, 2010
- Participating in training session "Improving Students Learning and Motivations", KSU, Sep 2010
- Participating in training session "Effective Classroom Management", KSU, April 2010

# Funded Research

- 1. "A Novel Multi-primary Approach Based on Static Ownership Protocol for Primary Backup Replication", Sponsored by Research Center of College of Computer and Information Sciences (CRC) at King Saud University, Grant Number RC120917, 2012.
- "Energy-aware Leadership Transfer Protocol for MANETs", Sponsored by Research Center of College of Computer and Information Sciences (CRC) at King Saud University, Grant Number RC130393, 2013.
- 3. "Design and implementation of intrusion detection system for smart phones against SMS-based *attacks*", Sponsored by Research Center of College of Computer and Information Sciences (CRC) at King Saud University, Grant Number **RC1303108**, 2013.

### **Publications**

### Papers in refereed journals:

- Abdelouahid Derhab, Kashif Saleem, Ahmed Youssef, and Mohamed Guerroumi, "Preventive Policy Enforcement with Minimum User Intervention Against SMS Malware in Android Devices" Arabian Journal of Science & Engineering (AJSE), Springer, 41(2), 479-493, Feb, 2016. (ISI Indexed, SCI)
- Almetwally M. Mostafa and Ahmed E. Youssef, "PRP: A Primary Replacement Protocol Based on Early Discovery of Battery Power Failure in MANETs", Multimedia Tools and Applications, vol. 74, no. 16, pp. 6243–6254, Springer, Aug. 2015. (ISI Indexed, SCI)
- Ahmad A. Al-Daraiseh; Mohammed Morsi; Ahmed Youssef, "Feasibility Verification and Performance Evaluation of Exclusion-Based VANETs (EBV)". The journal of KING ABDULAZIZ UNIVERSITY, Computing and Information Technology, Volume 3, No.1, 2015.
- Almetwally Mostafa, Ahmed Youssef and Gamal Alshorbagy, "A Framework for a Smart Social Blood Donation System Based on Mobile Cloud Computing", Health Informatics-An International Journal (HIIJ), Vol.3, No.4, pp. 1-10, November 2014.
- Almetwally Mostafa and Ahmed Youssef, "Improving Resource Utilization, Scalability, and Availability in Replication Systems Using Object Ownership", Arabian Journal of Science & Engineering (AJSE), Springer, vol. 39, no. 12, pp. 8731-8741, 2014. (ISI Indexed, SCI)
- 6. Ahmed E. Youssef, "A Framework for Secure Healthcare Systems Based on Big Data Analytics in Mobile Cloud Computing Environments", International Journal of Ambient Systems and Applications (IJASA), vol.2, no.2, pp. 1-11, June, 2014.
- Abdulelah Almishal and Ahmed E. Youssef, "Cloud Service Providers: A Comparative Study", International Journal of Computer Applications and Information Technology (IJCAIT), vol. 5, no. 2, pp. 46-52, May, 2014.
- Ahmed E. Youssef, "Towards Pervasive Computing Environments With Cloud Services", International Journal of Ad hoc, Sensor & Ubiquitous Computing (IJASUC), Vol.4, No.3, pp.1-9, June, 2013
- Ahmed A. Al-Johani and Ahmed E. Youssef, "A Framework for ERP Systems in SME Based on Cloud Computing Technology", International Journal on Cloud Computing: Services and Architecture (IJCCSA), Vol.3, No.3, pp. 1-14, June 2013
- 10. Almetwally M. Mostafa and **Ahmed E. Youssef**, "A Primary Shift Protocol For Improving Availability in Replication Systems", **International Journal of Computer Applications (IJCA)**, Vol. 72, No. 4, pp 37-44, June 2013.
- 11. Abeer Hamdy, Reda Ammar, and Ahmed E. Youssef, "Efficient Scheduling of Real-Time Parallel Applications on Clusters" International Journal of Computer Science & Information Technology (IJCSIT), Vol. 4, No. 5, pp. 197-212, October 2012.

- 12. Ahmed E. Youssef, Abeer Hamdy, and Reda Ammar, "Efficient Processing Power Reservation Approach to Improve Real-Time Task Schedulability and Reliability" International Journal of Computer Science Issues (IJCSI), Vol. 9, Issue 5, No 2, pp. 196-205, Sept. 2012
- Abeer Hamdy, Ahmed E. Youssef, and Reda Ammar, "Real-Time Workload Allocation on a Uniprocessor", International Journal of Computer Applications (IJCA), Vol. 53– No.12, pp.17-24, Sept. 2012.
- 14. Ahmed E. Youssef, "Exploring Cloud Computing Services and Applications", Journal of Emerging Trends in Computing and Information Sciences, Vol. 3, No. 6, pp. 838-847, July 2012.
- 15. Ahmed E. Youssef and Manal Alageel, "A Framework for Secure Cloud Computing", International Journal of Computer Science Issues (IJCSI), Vol. 9, Issue 4, No 3, pp. 478-500, July 2012.
- 16. Ahmed Emam and Ahmed Youssef "Do Females Read Faster Than Males? An Empirical Study Using Eye Tracking System", International Journal of computer Science Issues (IJCSI), Volume 9, Issue 3, pp.232-240, May 2012.
- 17. Abdulaah Alshwaier, Ahmed Youssef and Ahmed Emam "A New Trend for E-Learning in KSA Using Educational Cloud", Advanced Computing: An International Journal (ACIJ), Vol.3, No.1, pp.81-97, Jan. 2012.
- Ahmed Youssef and Ahmed Emam, "Network Intrusion Detection Using Data Mining Techniques and Network Behavior Analysis", International Journal of Computer Science & Information Technology (IJCSIT), Vol 3, No 6, pp. 87-98, Dec. 2011.
- 19. Medhat Awadallah and Ahmed Youssef, "Scalable Symmetric Key Cryptography using Asynchronous Data Exchange in Enterprise Grid" International Journal of Computer Science Issues (IJCSI), Vol. 8, Issue 6, No 3, pp. 107-115, Nov. 2011.
- 20. Ahmed Youssef and Manal Alageel "Security Issues in Cloud Computing" GSTF International Journal on Computing, Vol.1, No. 3, pp. 7-12, Aug. 2011.
- Reda Ammar, Abeer Hamdy and Ahmed Hussein, "Efficient Execution of Real-Time Tasks on a Single Processor", International Journal of Intelligent Computing and Information Sciences (IJICIS), Vol.9, No.2, pp. 31-40, July 2009.

### Papers in Conferences Proceedings:

- 22. Abdelouahid Derhab, Kashif Saleem and Ahmed E. Youssef, "Third Line of Defense Strategy to Fight against SMS-based Malware in Android Smartphones", The International Wireless Communications and Mobile Computing Conference (IWCMC 2014), Nicosia, Cyprus, Aug, 2014.
- 23. Almetwally M. Mostafa and Ahmed E. Youssef, "A Multi-Primary Ownership Partitioning Protocol For Highly Scalable and Available Replication Services", The Second Saudi International Electronics, Communications and Photonics Conference, SIECPC '13, Riyadh, 27 - 30 April, 2013.

- 24. Almetwally M. Mostafa and Ahmed E. Youssef, "Leader Replacement Protocol Based on Early Discovery of Battery Power Failure in MANETs", International Conference on IT Convergence and Security (ICITCS), Macua, China, 16-18 Dec, 2013.
- Mohammed Alnuem, Samir EL-Masri, Ahmed Youssef, and Ahmed Emam "Towards Integrating National Electronic Care Records in Saudi Arabia", 12th Int'l. Conference on Bioinformatics and Computational Biology BIOCOMP'11, LV, USA, July 18-21, 2011.
- 26. Ahmed Emam, Ahmed Youssef, Samir EL-Masri, and Mohammed Alnuem "Towards Universial Patient Identifiers in KSA", 10th Int'l Conference on Information and Knowledge Engineering IKE'11, LV, USA, July 18-21, 2011.
- Hamdy A. Morsy, Joshua Gluckman, Ahmed Hussein, Fathy Z. Amer "Block Based Steganography", In Proceeding of 9th European Conference on Information Warfare and Security (ECIW), Thessaloniki, Greece, 1-2 July 2010. (ISI indexed)
- 28. Hamdy A. Morsy, Ahmed Hussein, Joshua Gluckman, Fathy Z. Amer "Hiding Appropriate Messages in the LSB of JPEG images", In Proceeding of 5th International Conference on Information Warfare and Security (ICIW). The Air Force Institute of Technology, Wright-Patterson Air Force Base, Ohio, USA, 8-9 April 2010.
- 29. Nora Naguib, Ahmed Hussein, Hisham Kishk, and Mohamed Eladawy, "Using PFA in Feature Analysis and Selection for H.264 Adaptation", Paris 2009 International Conference on Image and Vision Computing (ICIVC 2009), June 2009.
- Nora Naguib, Ahmed Hussein, Hisham Kishk, and Mohamed Eladawy, "Contrast Error Distribution Measurement for Full Reference Image Quality Assessment", 18th International Conference on Computer Theory and Applications (ICCTA), Alex, Egypt, Oct 2008.
- 31. Reda Ammar, S. Rajasekaran Ahmed Hussein, and Abeer Hamdy, "Efficient Real-Time Task Scheduling on Cluster Platforms with Network Limitations", IEEE International Symposium on Computers and Communications (ISCC), Aveiro, Portugal, July 2007.
- 32. Abeer Hamdy, Reda Ammar, and Ahmed Hussein, "Efficient Workload Allocation to Schedule Fork-Join Real-Time Task Graphs on Cluster Computing Platforms", 2nd International Computer Engineering Conference, ICENCO'2006), Cairo, Egypt, Dec. 2006.
- 33. Ahmed Hussein, Reda Ammar, and Abeer Hamdy, "Efficient Workload Allocation to Schedule Tandem Real-Time Task Graphs in a Cluster Computing Environment", International Society of Computers and their Applications (ISCA), 19th International Conference on Parallel and Distributed Computing Systems (PDCS), San Francisco, California, USA, Sep. 2006.
- Reda Ammar, Ahmed Hussein, and Abeer Hamdy, "Efficient Execution of Real-Time Tasks on a Single Processor", IEEE International Symposium on Signal Processing and Information Technology (ISSPIT), Vancouver, Canada, Aug. 2006.

- 35. Abeer Hamdy, **Ahmed Hussein**, and Reda Ammar, "An efficient workload allocation to improve scheduling real-time tasks", **IEEE International Symposium on Computers and Communications (ISCC)**, Pula-Cagliari, Sardinia, Italy, June 2006.
- 36. Ahmed Hussein, Reda Ammar, and Abeer Hamdy, "Efficient Processing Power Utilization to Execute Real-Time Tasks", IEEE International Symposium on Signal Processing and Information Technology (ISSPIT), Athens, Greece, Dec. 2005.