



ABDELRAHMAN KAMEL SIDDEK ABDELHAMED

Computer Science Dept., School of Computing, 13 Computing Drive, Singapore 117417
akamel@comp.nus.edu.sg | <http://www.comp.nus.edu.sg/~akamel/> | +6585251358

EDUCATION | August 2015 – (Current)

SCHOOL OF COMPUTING, NATIONAL UNIVERSITY OF SINGAPORE, SINGAPORE
PHD STUDENT (COMPUTER SCIENCE)

- > Research interest: Computer Vision
- > Courses: CS5240 Theoretical Foundations in Multimedia, CS5248 Systems Support for Continuous Media, CS6234 Advanced Algorithms, CS6210 The Art of Computer Science Research. CAP: 4.38/5.

January 2012 – March 2014

FACULTY OF COMPUTERS AND INFORMATION, ASSIUT UNIVERSITY, EGYPT
MSC (COMPUTER SCIENCE)

- > Thesis: Real-Time Large-Scale Content-Based Image Retrieval [[PDF](#)]

September 2009 – September 2010

FACULTY OF COMPUTERS AND INFORMATION, ASSIUT UNIVERSITY, EGYPT
PRELIMINARY MASTER (COMPUTER SCIENCE)

- > Courses: Modern Computer Architectures, Data Compression, Software Reliability and Reusability, Object Oriented Software Engineering, and Advanced Topics in Computer Science.

September 2005 – June 2009

FACULTY OF COMPUTERS AND INFORMATION, ASSIUT UNIVERSITY, EGYPT
BSC (COMPUTER SCIENCE)

- > Grade: Distinction with Honor, GPA: 90%, First of Computer Science program.
- > Graduation Project: Building a Virtual Supercomputer based on Grid Computing (using C# and .NET Remoting)

RESEARCH INTERESTS

- > General: Computer Vision and Image Processing.
- > Specific: Image White-Balancing, Noise Modeling, Colorimetry, Large-scale Multimedia Retrieval, and Nearest Neighbor Search.

AWARDS

- > NUS Research Scholarship, National University of Singapore, August 2015 – (Current)

EXPERIENCE

TEACHING ASSISTANT COMPUTER SCIENCE DEPARTMENT, SCHOOL OF COMPUTING, NATIONAL UNIVERSITY OF SINGAPORE, SINGAPORE
JANUARY 2016 – CURRENT

- > Assisted in courses: CS2010 Data Structures and Algorithms II (Labs, Tutorials, Assignments, Marking, etc.)

ASSISTANT LECTURER COMPUTER SCIENCE DEPARTMENT, FACULTY OF COMPUTERS AND INFORMATION, ASSIUT UNIVERSITY, EGYPT
MAY 2014 – AUGUST 2015

RESEARCH AND TEACHING ASSISTANT COMPUTER SCIENCE DEPARTMENT, FACULTY OF COMPUTERS AND INFORMATION, ASSIUT UNIVERSITY, EGYPT
OCTOBER 2009 – APRIL 2014

- > Research interests: Computer Vision, Large-Scale Image Retrieval, High Performance Computing, and Nearest Neighbor Search.
- > Assisted in courses: Introduction to Computer Science with C, Structured and OOP programming in C++, Visual programming in C#, Compilers Theory, Computer systems security, Computer Organization and Architecture.

- PUBLICATIONS** |
- > Cheng D.L.*, **Abdelrahman Kamel***, Price, B., Cohen, S., Brown M. S., " Two Illuminant Estimation and User Correction Preference", accepted in IEEE Conference on Computer Vision and Pattern Recognition (**CVPR**), 2016. [[PDF](#) | [DOI](#) | [Web](#)] *Equal Contribution
 - > **Abdelrahman Kamel**, Yousef B. Mahdy, Khaled F. Hussain, "Multi-Bin Search: Improved Large-Scale Content-Based Image Retrieval," International Journal of Multimedia Information Retrieval (**IJMIR**), vol. 3, Springer London, 2014. [[PDF](#) | [DOI](#) | [Web](#)]
 - > **Abdelrahman Kamel**, Yousef B. Mahdy, Khaled F. Hussain, "Multi-Bin Search: Improved Large-Scale Content-Based Image Retrieval," 20th International Conference on Image Processing (**ICIP**), pp. 2597–2601, IEEE, 2013. [[PDF](#) | [DOI](#) | [Web](#)]

- SOFTWARE PROJECTS** |
- > Building a Virtual Supercomputer based on Grid Computing (C# & .NET Remoting), BSc project, Assiut University, 2009.
 - > Software Protection System based on Online Activation and PKI Asymmetric Encryption, Assiut University, 2008.
 - > Documents Archive System for the Faculty of Computers and Information, Assiut University, 2011.

- TRAINING** |
- > CCNA Exploration: Network Fundamentals, Cisco, 2010.
 - > Developing Local Talent in Technology (DLTT), Cisco, 2010.
 - > University Teacher Preparation, Assiut University, 2013.
 - > Strategic Planning, Assiut University, 2010.
 - > Student Evaluation Systems, Assiut University, 2010.
 - > Scientific Conference Organization, Assiut University, 2010.
 - > Credit Hours Systems, Assiut University, 2011.

- SOFTWARE SKILLS** |
- > Distributed Apps (.NET Remoting)
 - > Windows Forms / WPF Apps (.NET Framework)
 - > Database Systems (SQL Server, ADO.NET, Access)
 - > Parallel/Cluster programming (MPI, MPI.NET, MapReduce/Hadoop)
 - > Web development (HTML, ASP.NET, PHP/MySQL)
 - > Video Games (XNA Game Studio, OpenGL)
 - > 3D Graphics Modeling (3ds Max, Photoshop)

ACTIVITIES, MEMBERSHIP & LEADERSHIP	<ul style="list-style-type: none"> > Leader of BSc Graduation Project team, Assiut University, 2009. > Manager of many students' graduation projects, Assiut University, 2009 – 2015. > Organizer of programming competitions, Assiut University, 2010 – 2015. > Conducting several talks and presentations, and leading workshops and tutorials on High Performance Computing (HPC) Labs at Assiut University, 2014 – 2015. (sample: link) > Conducting a guiding talk on “How to get a PhD scholarship” for BSc and MSc students, Assiut University, 2015. (link) > Linking Cinema to the Scientific Method, “Interstellar: The Scientific Method”, a presentation. (link) > IEEE Student Member
PROGRAMMING LANGUAGES	<ul style="list-style-type: none"> > C++, C, C#, MATLAB, JAVA, PHP, Python, HTML/CSS, B4A (In descending order of expertise)
DEVELOPMENT TOOLS	<ul style="list-style-type: none"> > Visual Studio, SQL Server, MATLAB, Eclipse, Android Studio, B4A, Microsoft Office.
CONCEPTUAL SKILLS	<ul style="list-style-type: none"> > Software engineering methodologies and techniques. Data structures and algorithms. Modeling and documentation. Project and time management.
COMMUNICATION & TEST SCORES	<ul style="list-style-type: none"> > Native Arabic speaker. > English: TOEFL iBT: 94/120 [R: 23, L: 22, S: 27, W: 22] > GRE: [Q: 160, V: 145, W: 3]
REFERENCES	<ul style="list-style-type: none"> > Assoc. Prof. Michael S. Brown Associate Professor, Vice Dean (Corporate Relations) Department of Computer Science, School of Computing National University of Singapore brown@comp.nus.edu.sg michael.s.brown@gmail.com > Prof. Yousef B. Mahdy Professor and Head of Department of Computer Science Faculty of Computers and Information, Assiut University, Egypt ybmahdy@fci.au.edu.eg ybmahdy@gmail.com > Assoc. Prof. Khaled F. Hussain Associate Professor, Department of Computer Science Vice Dean for Community Services and Environmental Development Faculty of Computers and Information, Assiut University, Egypt khussain@aun.edu.eg khaled.hussain2000@gmail.com