Samir Mohammad

Kingston, Ontario, Canada

Cell: 613-484-8328   samir@cs.queensu.ca

PROFILE

Industrious, Ph.D. candidate (expected to graduate on March 2011), and database management systems developer, trainer, and administrator seeks a teaching position at a reputable university. Background includes the following:

- Six years of experience in teaching, four of which were at universities.
- Eleven years of experience in database management systems development, administration, training and support, eight of which were at United Nations.
- Several publications in reputable conferences.
- Strong quantitative and analytical skills through which I accomplished excellent academic achievements in B.Sc., M.Sc., and Ph.D. programs.
- Holds several professional computer skills certifications in various fields including Database Management Systems.
- Technically proficient in many computer applications and programming languages including Java, C++, Pascal, Fortran, Windows operating systems, Access Visual Basic, AutoCAD, … etc .
- Honest, hardworking, precise and dedicated team player committed to providing high-quality support to my students and to the organization for which I am accepted to be a member of their team.

EDUCATION

QUEEN'S UNIVERSITY, Kingston, Ontario, Canada   *Sep 2006 – Present*
Doctorate of Philosophy degree candidate
 (Expected to graduate on March 2011)
Thesis "Index Structures for XML Databases"
Supervisor: Prof. Patrick Martin

CANADIAN BUSINESS COLLEGE, Mississauga, Ontario, Canada   *Mar 2006 – Sep 2006*
Diploma, Database Administration, **2006**

THE UNIVERSITY OF JORDAN, Amman, Jordan   *Sep 1999 – June 2002*
Master of Science degree in Computer Science, **2002**
Thesis "Query Optimization in Temporal Relational Databases"
Supervisor: Dr. Munib Qutaishat

AL-ZAYTOONAH UNIVERSITY, Amman, Jordan   *Sep 1994 – Sep 1997*
Bachelor of Science degree in Computer Science, **1997**
For the graduation project, I built a modified prototype
database for the university information system.

PUBLICATIONS & CONFERENCES

TYPE OF PUBLICATION	TITLE OF PUBLICATION	CONFERENCE OR PUBLISHER	YEAR
Paper	Relational Universal Index Structure for Evaluating XML Twig Queries (Accepted)	ICCIT (The International Conference on Communications and Information Technology)	2011
Book Chapter	Index Structures for XML Databases. Published in "Advanced Applications and Structures in XML Processing: Label Streams, Semantics Utilization and Data Query Technology"	IGI Global A publishing company specializing in high quality research publications	2010
Paper	LTIX: A Compact Level-based Tree to index XML Databases	IDEAS (International Database Engineering and Application Symposium)	2010
Paper	LLS: Level-based Labeling Scheme for XML Databases	CASCON (IBM Centers for Advanced Studies Conference)	2010
Technical Paper	LTIX: A Compact Level-based Tree to index XML Databases	Queen's University	2010
Presentation	Level-based Labeling Scheme for XML Databases	QGCSC (Queen's Graduate Computing Society Conference)	2010
Technical Paper	Relational Universal Index Structure for Evaluating XML Twig Queries	Queen's University	2010
Poster	LTIX: Level-based Tree Index for XML Databases	CASCON (IBM Centers for Advanced Studies Conference)	2009
Technical Paper	XML Structural Indexes	Queen's University	2009
Poster	Index Structures for XML Databases	CASCON (IBM Centers for Advanced Studies Conference)	2008

PROFESSIONAL EXPERIENCE

TEACHING ASSISTANT *Queen's University*   *Sep 2006 – Dec 2010*
                   Kingston, Ontario, Canada

- **Advanced Database Systems (CISC432)**   *Sep 2006 – Dec 2006*
- **Introduction to Computing Science II (CISC124)**   *Jan 2007 – Apr 2007*
- **Database Management Systems (CISC332)**   *Jan 2008 – Apr 2008*
- **Database Management Systems (CISC332)**   *Jan 2009 – Apr 2009*
- **Data Structures (CISC235)**   *Jan 2010 – Apr 2010*
- **Database Management: Models, Development and Applications (COMM 392)**   *Sep 2010 – Dec 2010*

Achievements

The students of the Database Management Systems courses were divided into groups of approximately 6 students per group. I supervised and helped these groups in building databases for the courses' project.

RESEARCH ASSISTANT *Queen's University*   *May 2007 – Aug 2010*
                   Kingston, Ontario, Canada

- **Research on pervasive data access**   *May 2007 – Aug 2007*
- **XML index structures for pervasive data management**   *May 2008 – Aug 2008*

- Work on XML indexing techniques for collections of documents   *Jan 2009 – Apr 2009*
- Work on XML databases indexing   *May 2009 – Aug 2009*
- Work on evaluation of XML indexing scheme   *Sep 2009 – Dec 2009*
- Work on XML databases indexing   *May 2010 – Aug 2010*
- Work on XML databases indexing   *Sep 2010 – Dec 2010*
- Work on XML databases indexing   *Jan 2011 – Apr 2011*

Achievements

As part of my research at the Ph.D. program, I developed many XML information system prototypes to test the efficiency of several proposals of novel indexing schemes for XML databases by using relational database and other native XML database systems.

COMPUTER & INFORMATION SYSTEMS MANAGER   *Sep 2004 – Mar 2006*
Oakville Electric
Oakville, Ontario, Canada

- Implemented, monitored and maintained the general integrity of the company's database.
- Supervised data entry of invoices, inventory and shipping receipts.
- Developed a process for backup operations and disaster recovery on all data collection devices so as to guarantee the integrity of archive and online files for all users.
- Consulted with users, management, vendors, and technicians to assess computing needs and system requirements.
- Recruited, hired, trained and supervised staff, and/or participated in staffing decisions.
- Assigned and reviewed the work of systems analysts, programmers, and other computer-related workers.
- Controlled operational budget and expenditures, and purchased necessary equipment.
- Evaluated the organization's technology use and needs and recommended improvements, such as hardware and software upgrades.
- Reviewed project plans in order to plan and coordinate project activity.
- Prepared and reviewed operational reports or project progress reports.
- Identified technical problems, processes and solutions.

Achievements

I supervised a collaborative project to develop a database management system to control and analyze information with regard to purchasing, sales, services, and inventory of electric motors and electric supplies. I also directed the development of a disaster recovery plan in which a backup system is used to run the company's business during unexpected system downtime.

STAFF TUTOR *Arab Open University (Computer Science Dept.)*   *Sep 2002 – Sep 2004*
Kuwait City, Kuwait

- Contributed to education at the undergraduate level.
- Monitored the grading of students' assignments.
- Contributed to research activities as agreed with the Head of the Department Director.
- Provided a link between regional and faculty staff through regular and ad hoc meetings.
- Contributed to the development and assessment of courses through course team and exam board membership.
- Contributed to regional operations and policy-making by participating in appropriate regional committees and groups, ensuring that the interests of the Faculty are represented at all levels.
- Organized appropriate tutorial provision in accordance with faculty and regional policies.

Achievements

In addition to my duties, and in order to improve the efficiency of the school testing system, I took the initiative to develop an examination database system to generate test forms along with their ideal answers forms. The purpose of this system is to provide a convenient and efficient way to test the university's students in different courses. The system will select the exam questions randomly from the testing database according to a given criteria that may include the type and the number of questions in each form.

DATABASE SYSTEM ADMINISTRATOR *United Nations*   *Sep 1994 – Sep 2002*
                                 UNRWA
                                 Amman, Jordan (FULL TIME)

- Participated in the development, installation, training and support for the Social Services Department Information Systems in many countries in the Middle East.
- Implemented on-the-job training programs.
- Assisted in the cooperation with external research institutions.
- Provided computer related programs training to the Agency' Relief and Social Services staff in all field offices in the Middle East.
- Participated in the development of two large-scale projects and seven small-medium scale systems using Sybase Database Management System in the back end and many programming languages such as Visual Basic, Access Visual Basic, Paradox, Clipper, and FoxPro in the front end.
- Designed standard and special reports from the Relief & Social Services database on special hardship cases to guide social services activities using different query utilities including SQL, MS Access, Excel, Crystal reports, and Paradox.
- Monitored technological advances in the field of information services with a view to ensuring the department is using the most appropriate and up to date software and hardware.
- Participated on the preparation of instruction manuals and other documentation relative to the establishment and functioning of new or modified operational systems.

Achievements

In order to facilitate efficient information access to management, in which information are stored and manipulated through a computerized database system, rather than manually, I recommended and developed several database systems such as: a system to follow-up on the agency's vehicles usage and maintenance in the Agency's area of operations in the Middle East for the Motor and Transport Department; a system for basic commodity purchasing and distribution throughout the Agency's areas of operations in the Middle East, for the Supply Department; a system to prepare and follow-up purchasing order, for the Motor and Transport Department; a system to facilitate the fundraising from Non-Governmental Organizations, for the Relief and Social Services Department; a system to detect discrepancies in Social Services Database information. As a result of these database system creations, information was processed in a timely manner and used to create reports that guide future decision of the management. I also participated in the development of other large scale systems such as: Field Registration System; Relief and Social Services System; and Unified Registration System, which is planned to host a Family Files Archiving System.

COMPUTER SOFTWARE INSTRUCTOR *CompuBase*   *May 1998 – Sep 1999*
                                  (Microsoft Authorized Training Center)
                                  Amman, Jordan   (PART TIME)

- **Provided one-on-one as well as small group classrooms for computer courses training.**
- **Provided advance and intensive training in Access Database Management System development tools, Microsoft Visual Basic of Access, and Microsoft Visual Basic 5.0.**
- **Taught Microsoft Windows 95 and Microsoft Office 97; MS Word, Excel, Power Point, Access, Front Page, and Internet Explorer.**

SECRETARY & COMPUTER PROGRAMMER *Wimpey International*   *Jul 1993 – Sep 1994*
                                  (British Company)
                                  Amman, Jordan

- **Developed several database systems.**
- **Improved the storage and retrieval of data in the company's computer systems.**
- **Developed and tested new procedures.**
- **Coordinated work flow and kept projects on schedule.**
- **Updated and chased delegated tasks to ensure progress to deadlines.**
- **Took initiative in manager's absence.**
- **Maintained procedures manual to ensure consistent performance of routines.**
- **Arranged essential mail in priority action order.**
- **Checked deadlines on incoming requests and put preliminary work in play.**
- **Processed replies on my own initiative or from the manager notes and directions.**
- **Researched, drafted or abstracted reports.**
- **Handled all inquiries within my capacity.**
- **Prepared and controlled administrative budgets.**

  Achievements

  Because of my success in developing a database system, during my spare time, to monitor the manpower cost and distribution of the work of the company's employees, I was asked to develop another two database systems: a quantity survey system; and an inventory system for the company's assets in addition to my duties above.

COMPUTER OPERATOR & ACAD DRAFTSMAN (DESIGNER)   *Oct 1991 – May 1993*
                                  Forum Furniture Co.
                                  Amman, Jordan

- **Assisted the architecture engineer in the furniture designing using AutoCAD.**
- **Mastered AutoCAD drawing, and used Auto Lisp programming language.**
- **Used Excel, MS Word, Foxpro2, AutoCAD Engineering Drawing Tools.**

  Achievements

  I initiated the use of computer automated design applications, such as AutoCAD, in designing furniture, where I used the AutoCAD to test and implement new designs and to specify the exact measurement of the components of these designs before sending them to the production unit for assembly.

LIFEGUARD   *K. H. Medical Center Swimming Pool*   *May 1991 – Sep 1991*
              Jordanian Armed Forces, Amman, Jordan

- **Swimming instructor and lifeguard - Fitness**

TENDER OFFICER & COMPUTER PROGRAMMER   *Mar 1989 – May 1991*

Jordanian Royal Medical Services
Supply Department, Tenders Office
Amman, Jordan

- Prepared and delivered tender documents.
- Input data into a database system.
- Ensured that all details regarding tender documents are passed on to the contracts department.
- Attended various tender committee meetings of different departments.
- Responsible for the provision and coordination of services relating to the tendering function and contracts.

Achievements

To help the tender committee in evaluating submitted quotations for tenders, I developed a database system for tenders processing.

ADDITIONAL QUALIFICATIONS

- **Microsoft Certified Professional**
- **Certified Lifeguard**
- **CPR and First Aid Certification**

TECHNICAL TRAINING

- **SQL Server 2000 Administration**
- **Windows 2000**
- **Statistical Analysis using SPSS**
- **Safety Awareness & Introduction to Workplace Hazardous Materials Information System**
- **Bridging the Gap: From Academic Writing to Business Writing**
- **Foundation of Project Management I**
- **Foundation of Project Management II**
- **Business Conduct Excellence and Dining Etiquette**

WORKSHOPS

- **Managing large projects,**   Oct 2, 2008, Queen's Univ., Kingston, Canada
- **Time management strategies,**   Oct 15, 2008, Queen's Univ., Kingston, Canada
- **Stress management and problem solving,**   Oct 28, 2008, Queen's Univ., Kingston, Canada
- **Researching patents for scientists and engineers,** Nov 10, 2008, Queen's Univ., Kingston, Canada
- **Advanced memory strategies,**   Nov 17, 2008, Queen's Univ., Kingston, Canada
- **Effective reading,**   Jan 26, 2009, Queen's Univ., Kingston, Canada
- **Your intellectual property,**   Sep 9, 2009, Queen's Univ., Kingston, Canada
- **Accessible customer service,**   Oct 7, 2010, [Online]
  http://www.queensu.ca/equity/content.php?page=CSOnlineTraining
- **Get feedback on your impact,**   Oct 20, 2010, Queen's Univ., Kingston, Canada
- **The art of powerful conversation,**   Nov 17, 2010, Univ. of Ottawa, Ottawa, Canada
- **Teaching and learning with technology,** Nov 19, 2010, Queen's Univ., Kingston, Canada

Awards

- Award from the National Science and Engineering Research Council of Canada to fund my research on XML databases.
- Grace L. Boileau Award. Awarded on the basis of academic achievement at Queen's University.
- Al-Zaytoonah University Students Award. Awarded on the basis of academic achievement.
- Queen's University Graduate Award. Awarded on the basis of academic achievement.

Volunteering & Community Servings

- Privacy Committee Representative, Graduate Computing Society, Queen's University, for the period from Sep 2008 to present time.
- Industry Liaison Officer, Queen's University, for the period from Sep 2010 to present time.
- International Students Mentor, Queen's University. Responsibilities include assisting new international students in the transition from their respective countries to Queen's University.
- Member of Kingston Islamic Society.
- Member of Queen's Teaching Assistant and Fellow Association.
- Member of Queen's University Muslim Students' Association.
- Member of Society of Graduate and Professional Students, Queen's University.

Personal

Hobbies	:	Swimming, reading, travelling, and watching documentaries.
Citizenship	:	Canadian

Academic and Professional References

- Prof. Patrick Martin. School of Computing, Queen's University, Tel. 613-533-6063, **martin@cs.queensu.ca**
- Mrs. Beth Kuttab, Relief and Social Services Director, United Nations Relief and Works Agency (UNRWA). **Tel** 962-6-5808460. Fax 962-6-5808479. **b.kuttab@unrwa.org**.
- Prof. Hossam Hassanein. School of Computing, Queen's University, Tel. 613 533-6052, **hossam@cs.queensu.ca**
- Research associate and, adjunct instructor Wendy Powley, School of Computing, Queen's University, Tel. 613-533-6734, **wendy@cs.queensu.ca**
- Prof. Yahia Al-Halabi. Princes Sumaya University for Technology, Faculty of King AL-Hussain, Computer Science Department, Tel. 00 962 6 5358835 (9 lines) / Ext- 238 Fax: 00 962 6 5347295, **yahia_1111@yahoo.com** or **yahiah@psut.edu.jo**
- Dr. Munib A. Qutaishat. Faculty of Computer Science. University of Jordan. Tel 962-77-498959. **maq@ju.edu.jo**