SUNY FREDONIA COMPUTER SCIENCE NEWS

Vol. 3 Newsletter for the Department of Computer and Information Sciences at SUNY Fredonia

May 2007

Third Year in Review

By Dr. Siddiqui

The department will celebrate its birthday on July 1, 2007. This past year was a year of growth in staff, catalog revisions, equipment upgrade and many fascinating enhancements. Three new fulltime faculty members, Drs. Ruslanov, Yang and Yi joined the department. Dr. Singh was renewed for another year and Dr. Nazarenko joined as a visiting Assistant Professor. All these faculty members have a PhD degree. With this recruiting, the department has become a true reflection of diversity on campus. The search Committee's tireless efforts, including that of its chair Dr. Barneva, are commended for this success. Counting these new members, the department now has nine tenured or tenure-track faculty members, three visiting Assistant Professors, four adjunct members and a Systems Administrator. Debbie Cambria, who was splitting her time between two departments has become a full-time member of Political Science and we added Melanie Wroblewski as our first full-time secretary.

We kicked off the new academic year with the joint faculty and student picnic at the Russell Joy Park that Dr. Ruslanov and Mr. Szocki organized. Some pictures of the event are available on the department's website.

The graduate and undergraduate curriculum committees were hard at work, and eight graduate and six undergraduate courses were added to the respective catalogs. The program descriptions were revised and a new fact sheet was developed. The letter of intent and a copy of the master program proposal were submitted to the administration. A new undergraduate program, "Systems Management," was developed and the Computer Information Systems was restructured as a degree program with two tracks: Systems Development and Systems Management. This track resulted in the creation of many new courses such as "Data Warehousing and Mining," "Electronic Commerce," etc. Currently, Drs. Barneva,

Nazarenko, Siddiqui, and Prof. Leslie are teaching most of these new courses.

Over the Christmas break we completed the CS Lab 115 and faculty/student servers upgrade with 25 new desktops and three new servers replacing 15 lab computers and one server. Three new faculty computers, a fully equipped display cart, a laptop, a scanner, and other peripherals were also received.

Including this past summer, more than 20 students graduated. Our current major/minor count in the department now stands at 110 and more than 750 students took our courses in each of the two semesters of Fall and Spring.

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Dr. Siddiqui Receives the President's Award for Excellence

Dr. Siddiqui served as Associate Chair of the Department of Mathematics and Computer Science from 1998 to 2001, and he was elected Chair of Computer and Information Sciences when it separated from Math in 2004. His Chair term was renewed this year for three more years. Dr. Siddiqui contributed significantly to the Computer and Information Sciences programs at SUNY Fredonia and reshaped it several times. When he was Associate Chair, enrollment in Computer Science increased every year during his tenure.

Dr. Siddiqui has over 70 publications. His research interests are in the areas of knowledge engineering, signal and image processing, and pattern recognition, and their applications. He also developed software for various applications. He organized international conferences and chaired some of their sessions. In addition to his academic experience at several institutions in the U.S. and Canada, he has many years of industrial experience. He also worked as a consultant to high-tech companies.

Dr. Siddiqui's awards include the Kasling Lecturer Award and Fulbright senior scholarship for Azerbaijan, and now the President's Award for Excellence.

Dr. Barneva Receives the Chancellor's Award for Excellence in Scholarship

Dr. Reneta Barneva was conferred the 2007 Chancellor's Award for Excellence in Scholarship and Creative Activities. This award supports the pursuits fundamental to sustaining the intellectual growth of SUNY institutions by recognizing consistently outstanding scholarly and creative productivity. The award is very competitive: the nominees are first evaluated at campus level and then at SUNY-wide level. The recipients receive a medallion, a certificate and a cash award. Dr. Barneva received several other awards including the Kasling Lecturer Award (in 2005) for her distinguished scholarship and the Wilkes Best Paper Award.

Dr. Singh Receives the Kasling Lecturer Award

By Dr. Singh

Dr. Singh's current research interests are in the fields of Nuclear Physics, Astrophysics and Space Science, and Elementary Particle Physics. His research involves a tremendous amount of data collection, data analysis, and computer modeling.

In his research, he investigates characteristics of singly-charged (hadrons) and multi-charged projectile fragments emerged in heavy-ion interactions at relativistic energies from experiments performed at National and International Accelerator facilities like the Brookhaven National Laboratory (BNL), Upton, NY, and the European Center for Nuclear Research (CERN) in Geneva, Switzerland.

Recently, he has published two very important papers in the Journal of Physics G: Nuclear and Particle Physics in 2006 and 2007. This scholarly work has been accomplished by Dr. Singh in a short span of less than two years in the Department of Computer and Information Sciences at SUNY Fredonia, and is based on his collaboration with Dr. A. Mukhopadhyay, Department of Physics, University of North Bengal, Siliguri, India. Their collaboration work indicates very interesting and encouraging results in the non-statistical, dynamical fluctuations of produced hadrons in relativistic heavy ion collisions. It also sheds important light on the very early evolution and missing mass of the Universe.

The present work represents Dr. Singh's continued effort from the past two decades on the subject of non-statistical fluctuations, which has been referred in more than 100 research articles throughout the world.

Dr. Singh joined the Department in Fall 2005 as a Visiting Assistant Professor. He also taught in the Department in 2001. He has a Ph.D. in Physics and an extensive teaching experience in several fields at many institutions.

Dr. Siddiqui joined the Department in 1995, and Dr. Barneva joined it in 2001. Drs. Siddiqui and Barneva have extensive teaching experience at several institutions in many countries.

High School Computer Science Contests

The Department of Computer and Information Sciences at SUNY Fredonia held its third annual high school contests on Monday, May 15, 2006 8:30 am - 1:00 pm. Over sixty students from seven high schools participated. There were 5 contests: Programming, Spreadsheet, Web Design, Internet Scavenger Hunt, and Quiz Show. The winners were

• Web Design: Bishop Timon.

• **Programming:** Fredonia.

• **Spreadsheet:** Silver Creek.

• Quiz Show: Bishop Timon.

• Internet Scavenger Hunt: Fredonia. Three other schools answered questions. These schools are: Bishop Timon, Falconer, and Silver Creek.

The winning teams of the first 4 competitions were awarded plaques and books, and every student who answered a question in the Internet Scavenger Hunt Contest was awarded a prize. In addition, every student who came to the competitions was awarded a Fredonia State T-shirt and a package with information about Fredonia and the department.

The contests were organized by Dr. Iyad Abu-Jeib and with the help and participation of many members of the department including the Chair, Dr. Khalid Siddiqui, and the former secretary Ms. Debra Cambria.

While the student teams participated in the competitions, their advisors were engaged in a small presentation on the state of the Computer Science Education in Western New York schools followed by a discussion on the state of technology/computer science programs, identification and possible solutions of issues. These activities were moderated by Dr. Siddiqui.

The competitions started with a breakfast. Lunch was also served. The event was concluded with an awards ceremony.

A survey was done at the end of the contests for both teachers and students. The feedback was very encouraging and useful. Here are two remarks made by two of the teachers. Teacher Rachel Gugliuzza of Silver Creek said "I thought the format was great! Everyone was professional and the event ran very smoothly." She continued "I really loved the T-shirts!!! My students were

very proud to be wearing them the next day in school!" Another teacher said "I really enjoyed the teacher discussion session. It was great to hear what other schools are doing."

A student who participated in the contests last year and is still in High School started taking courses from the Department. Another participant who is also still in High School will be joining the Department next year. A third participant, Joseph Spina, joined the Department last fall. Here is what he says about the contests we held last year "Last year's competition was very fun. It allowed the people without much physical ability to compete and win something. My entire class enjoyed the competition. It was exciting to compete and even more exciting to win regardless of the prize. That doesn't mean that the prizes weren't great, they were. In this age of computers, proving your school to be the best at using them is the same as winning a major sports event. I know it benefited me because it proved to me that computer science is my strong point, so that is what I am now pursuing in college."

The event appeared in Dunkirk's Observer Newspaper.



Students and Teachers Enjoying the Quiz Show

The date for this year's competitions is Monday, May 14, 2007 (8:30 AM – 1:00 PM). For more information, visit the High School Contests website: http://www.cs.fredonia.edu/cswebpage/HSCC

Student Research and Creativity

Drs. Arnavut, Barneva, and Siddiqui, and Mr. Szocki supervised students on various course/research projects. Two students of Dr. Arnavut, one student of Dr. Barneva, one student of Dr. Siddiqui, and four students of Mr. Szocki participated in the university's Research and Creative Endeavors Exposition this year. The projects that the students worked on were:

- Exploring Pattern Matching for ECG Signal Compression by Brian Woodard (supervised by Dr. Arnavut).
- Role Playing Game (RPG) University by Jennifer Wystup (supervised by Dr. Arnavut).
- Free and Open Source Software as a Solution for Small Business Environments by Michael Mendez (supervised by Dr. Barneva).
- Automated Task Management System Emergelife.com by Steven Glass (supervised by Dr. Siddiqui).
- Complete Redesign of SUNY Fredonia Website by Chris Becker, Jordan Bommelje, Robert Shannon, and Joe Spina (supervised by Mr. Szocki).

Our Programming Team Ranks Sixth Among 36 Teams

The Department sent two teams to participate in the programming contest organized by the Consortium for Computing in Small Colleges in the Northeast (CCSCNE). The competition was held on April 20, 2007 at Rochester Institute of Technology (RIT). Thirty six teams from twenty nine colleges participated in the contest. Our first team placed sixth among the twenty nine colleges and first among the SUNY colleges. Students on the first team were David Bronke, Devin Grady, and Bryan Woodard. Students on the second team were Ian Anderson, Troy Foster, and Jaramiah Welty.

Devin and Ian are scholarship recipients and Dave is currently working with Alan Keegan on redesigning the department's website. Devin and

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Scholarship Recipients

The following students received scholarships from the department for the next academic year:

- Arthur R. Maytum Scholarship: Danny Baker, Reid Bland, and Devin Grady.
- J. Beck Memorial Scholarship: Ian Anderson.

The Scholarship Committee Chair, Dr. Chan, the Department Chair Dr. Siddiqui and all faculty members extend their heartiest congratulations to all recipients. Keep up the good work!

In addition, a number of students from the department will be receiving the MACS Scholarship for the next academic year.

The MACS scholarship program hosted the following talks:

- Design Patterns and Computer Games, on April 26, 2007, by Dr. Paul Gestwicki (1998 Fredonia Computer Science graduate and Assistant Professor at Ball State University).
- A Strategy to Improve STEM Workforce and Pedagogy to Improve Math and Science Education, on April 13, 2007, by Dr. Osman Yasar (SUNY Empire Innovative Professor).
- What is it like to be a Grad Student, on March 16, 2007, by David Starling (Math/Physics graduate).
- Towards Creating a Sign Language Interfacing System, on February 23, 2007, by Dr. Beifang Yi (SUNY Fredonia).
- Channel Allocation in Cellular Networks, on December 1, 2006, by Dr. Jianchang Yang (SUNY Fredonia).
- Motion Planning, on November 3, 2006, by Erian Plaku (1999 Fredonia CS/Math graduate and Ph.D. candidate at Rice University).
- Experience of an Intern at Lockheed-Martin, September 22, 2006, by Troy Foster (Fredonia Graduate).
- How to Write a Resume, by the Fredonia Carrier Development Office.

Also, some MACS scholars attended the Image Processing Workshop at RIT on September 29, 2006.

For more information about the MACS scholarship, visit the grant's website http://www.cs.fredonia.edu/macs/ or contact Dr. Arnavut at arnavut@cs.fredonia.edu or Dr. Abu-Jeib at abu-jeib@cs.fredonia.edu.

Internships and Employment By Dr. Siddiqui

The department continued to offer internships and employment opportunities both on and off campus. During the academic year 2006/07 Dr. Siddiqui offered eleven internships and Dr. Abu-Jeib offered one. Paid internships were arranged for six students at Cliffstar, Buffalo Jills, Digitech, and Ultrapak. There will be more internship/job opportunities beginning Fall 2007 with the new **Technology Incubator** that the Campus started recently. Contact the Department Chair for opportunities at the incubator.

One student was hired at the Learning Center and over ten students were hired as proctors for Lab 115 for each semester and 4 students as lab assistants. The proctors this academic year were (some worked for one semester only and some worked also as lab assistants): D. Grady (Head Proctor), S. Cleeton, B. Kandemir, B. Woodard, Reid Bland, R. Olson, S. Glass, D. Bronke, D. Panzer, A. Gribble, J. Malthaner, A. Sak, J. Daniels, M. Wicks, C. Rader, M. Hammerle, and S. Kindlon.

The Chair continued to help students prepare resumes. All graduating seniors are encouraged to seek help from the Career Development Office and their advisors in building a professional resume and obtaining good recommendation letters. Frequently, employers contact the Department Chair to recruit fresh graduates. If you are graduating this year, contact Dr. Siddiqui for any such opportunity.

Student Recruitment By Dr. Siddiqui

The number of majors/minors in our two programs has stabilized and slowly increased. The introduction of CSIT 151 and 251, the required courses for Business, alone increased the enrollment in our courses by more than 180. The enrollment in CSIT 104, 105, 107, 120 and 121 remain strong and we were successful in filling up multiple sections of these courses and many students from these courses joined the department. Enrollment in 400-level courses also witnessed a significant increase.

Concerted efforts through Open Houses, individual invitations of students/parents, sending letters at various stages of admissions process, emails, presentations to liberal arts students, and phone calls were made to recruit new students.

Our aggressive recruiting efforts were fruitful and at the beginning of Fall 2006 more than thirty new students joined the program. This included 15 freshmen,

6 internal transfers, 5 external transfers, 2 readmits and 3 reinstatements. Many more students were added at the beginning of Spring 2007 and during Fall and Spring advising. The total number of majors/minors in the department now stands at 110.

An Alum's Opinion By Andrew Herberger

I was surprised to receive the Newsletter last year and could not believe how much Computer Science has grown. Thank you Dr. Siddiqui and your team. Here is a little about me.

I'm a graduate of the class of 1988 and currently work for the U.S. Government. After I graduated, I worked for my father's construction company while looking for a job in my field. In February, 1989 I took a job in Elmira, working for Orthstar Enterprises where I worked on two separate contracts for GE Aerospace. One was a flight control enhancement to the Navy's A10 "Warthog". The other was an Engine Control enhancement to GE's CF6 engine which was used on Boeing and MD commercial aircraft at that time.

I was finally hired by the Government in August 1989, got married a month later, and moved to Washington, DC. The job required programming in PL/1 and included day to day operations of the IBM mainframe. I learned a lot about software development and about the controls that help assure a quality product. In October 1992 I resigned, moved to Buffalo, and landed a job with a PL/1 CICS shop in Buffalo, Wile Company, which is now called Intercontinental Branded Apparel. The contract was on-again off-again, and my future was not looking stable. Things were looking pretty grim until I received a call from my old boss in the Government. He said my old division was moving to West Virginia and he knew I left because I didn't like DC so he was offering my job back to me. I accepted and moved to Fairmont, WV in 1994.

Since then we have upgraded our systems many times. I spent about 3 years from 1997-1999 working half the time at a contractor's facility during the development of the current system. The other half I was still supporting the mainframe system at our West Virginia office. We did major enhancements for the year 2000, but ended up getting the replacement system in August of 1999. I am currently working on requirements for the next generation of our system which will start being phased in next year and will be fully implemented by 2012. We are using mostly C code for speed. I have been concentrating mostly on interfaces and we are in the process of opening up our system to XML and Web services.

On the personal side, I have three children; two boys (Zack, 12 and Elliot, 11) and a girl (Marley, 4). The boys are straight 'A' students who have represented their schools at the annual Math Field Day for 3 years in a row. Zack has also gone to the regional spelling bee and this year came in second in the county. Currently, Zack wants to study Computer Science and Elliot wants to be a Video Game Designer. I will visit Fredonia sometime.

Upgrading the Labs and the Servers By Mr. Szocki

In addition to acquiring two new faculty servers last year (one for Web and E-mail, and the other for storage, development and research), the Department acquired a new student server and succeeded in increasing the number of machines in the Computer Science Lab in Fenton 115 from 15 to 25. During summer 2006, the lab was painted, thoroughly cleaned and carpets shampooed. The server room, Fenton 2158 was rewired with additional data ports to enable it to house multiple servers simultaneously.

The student server was received in February 2007. This has replaced the student server "pizza". It is dedicated for student storage and research. It has over 1200 megabytes of storage.

We received twenty five new machines in summer 2006 for our lab in Fenton 115. That is ten machines more than what we had previously. (The lab had 15 machines only since the upgrade of 2003, although it had 30 machines in 2000.) The breakdown is twenty three Dell Optiplex GX 620 machines and two Dell Precision 690 machines. The Precision 690's have two dual core processors and 4 GB of RAM memory. All new machines have 17 inch flat panel monitors, and an optical mouse. This Lab is administered by the Head Proctor Devin Grady and the Student Systems Administrator David Bronke along with a team of 10-12 assistants. Mr. Szocki supervises all proctors.

Our lab in Fenton 2164 will be upgraded next year, and the ceiling-projector will be replaced.

Curriculum Changes and New Courses By Dr. Siddiqui

The graduate and undergraduate curriculum committees were hard at work during the Fall semester. The letter of intent and a copy of the Master's program proposal were submitted to the administration. Eight new courses were added to the graduate catalog:

- CSIT 541: Algorithms
- CSIT 542: Advanced Data Structures
- CSIT 536: Network Security
- CSIT 639: Selected Topics Systems Structures
- CSIT 649: Selected Topics in Theory of Computation
- CSIT 665: Pattern Recognition
- CSIT 669: Selected Topics in Information Structures & Systems
- CSIT 672: Multimedia Systems

The curricular/course changes that CIS and CS undergraduate curriculum committees suggested were incorporated in the catalog. A new undergraduate program, "Systems Management," was developed. As a result, the "Computer Information Systems" degree was restructured as a degree program with two tracks: Systems Development and Systems Management. Six new courses were added to the undergraduate catalog:

- CSIT 151: Introduction to Information Systems
- CSIT 251: Information Systems Structures
- CSIT 335: Data Communications & Networks I
- CSIT 471: Information Systems Management
- CSIT 473: Data Warehousing and Mining
- CSIT 475: Electronic Commerce

The program descriptions were revised, a new "admission facts sheet" was developed and program checklists were revised. Articulation agreements and/or course transfer equivalency with Alfred State, and many community colleges including Corning, Dutchess, Erie, Finger Lake, Genesee, Herkimer Hudson Valley and Niagara were developed or revised.

A Graduate's Opinion By Bryan Woodard

My experience here at SUNY Fredonia has been an exceptional one. The faculty here took an honest interest in my education and motivated me to work hard to succeed. I entered the program in the Computer Science Department with limited programming knowledge, but will be leaving with the knowledge and skills needed not only to succeed in a career, but in life as well.

My classes were all well-structured and challenging. The lectures gave me the necessary tools for completing my assignments, and those assignments were a great supplement to the lectures. I spent many nights working in the lab on a project or a homework assignment. Strangely enough, I actually enjoyed those nights. I have never felt as accomplished as I did when, for Computer Architecture, my partner and I's DES Encryptor (written in VHDL) finally gave us the correct output, or when the compiler that I wrote for Compiler Construction was able to compile a program and run successfully.

Whenever I needed help with any of my projects or assignments, my professors were more than happy to give me advice or help me figure out what I needed to fix. It is nice to know that you can count on people being there to lend a hand when you need it.

New Members Join the Department









In addition to Dr. Natalie Nazarenko and Mr. Derrick Decker, last year the Department hired a new secretary, Mrs. Melanie Wroblewski, and three faculty members. One more faculty member was hired this year. The new faculty members are:

- Professor Gregory Cole will join us next year as an Adjunct Professor. In the Fall 2007, he is scheduled to teach CSIT 120. Professor Cole received his M.S. degree in Business Education with a concentration in Technical Education from Buffalo State College. Professor Cole is also the recipient of numerous Professional and Technical certificates. He is currently a Career and Technical Education Instructor for ECC BOCES as well as an Adjunct Instructor at Jamestown Community College. He resides in Silver Creek.
- **Dr. Anatole Ruslanov** was hired as a tenure-track Assistant Professor. He has a Ph.D. in Computer Science from Drexel University. His research interests are in algorithm engineering, high-performance computing, automated performance tuning, computer architecture, and performance analysis and benchmarking. He has been teaching Computer Science for 6 years.
- Dr. Jianchang Yang was hired as a tenure-track Assistant Professor. He has a Ph.D. in Computer Science from the University of Kentucky. His research areas are distributed systems, channel allocation in cellular networks, fault-tolerance, ad-hoc networks, overlay multicast, and peer-to-peer systems.
- **Dr. Beifang Yi** was hired as a Visiting Assistant Professor. He has a Ph.D. in Computer Science and Engineering from the University of Nevada, Reno. His

research areas include computer graphics, human-computer interactions (HCI), and software engineering. He also worked on HCI-related image processing and computer vision NASA projects when he was a Ph.D. candidate. Before he came to the U.S. in 2000, he was a computer engineer in China for 15 years.

So, what is the impression of the new faculty about their new work place? Here is what two of them say:

Dr. Yi: I came to Fredonia last August from Reno, Nevada – a city with many casinos and of course, a lot of clanking and clattering. Six years of dwelling in that city and fifteen years of living in a metropolis in China should have been long enough to convert me to a city lover. But only several days after settling down here, I had my new discovery, no, a reminiscent rediscovery – an English word "cozy" which had been buried in my brain for so long, suddenly jumped out of my mind. That was my first impression of Fredonia, reminding me of my birthplace, a quiet and small village, close to the Yangtze River. I hope in a couple of years I will not be a visitor but a resident here simply because this is Free-donia where you can find everything a cozy home provides: an easy and relaxed life while enjoying your wild imagination full of idyllic charms.

Dr. Nazarenko: I was hired by SUNY Fredonia in fall 2006 as a Visiting Assistant Professor for the Computer and Information Sciences Department. I was delighted from the beginning, because the department met all of my expectations. First of all, the chairman wants to know the opinion of all faculty members about the teaching process. Course curriculums are a subject of discussion at

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Other News and Events

Faculty News

- Mr. Szocki was selected to represent the Department in the University Senate. He replaced Mr. Thomas Taylor.
- Dr. Siddiqui was reappointed Chair of the Department for the next three years.
- Some professors had papers accepted/published.
- Dr. Zubairi will be on leave of absence next year.
- Dr. Abu-Jeib will be on sabbatical next year.
- Dr. Abu-Jeib's tenure and promotion to Associate Professor have been approved by the President.
- Dr. Abu-Jeib attended, on January 25-27, the Winter Plenary of the SUNY Senate at Stony Brook as a SUNY Alternate Senator.
- Dr. Barneva was a co-organizer of one of the ten special tracks at the International Symposium on Visual Computing held at Lake Tahoe, Nevada, November 6-8, 2006. This is a selective scientific forum (acceptance rate 23% based on three blind reviews) that attracted participants from all over the world. The track "Discrete and computational geometry and their application in visual computing" was the one with most papers and took two of the 13 sessions. Dr. Barneva chaired the two sessions and organized an informal round table.
- Dr. Barneva became vice-chair of the Technical Committee on Discrete Geometry (TC 18) of the International Association on Pattern Recognition (IAPR). Discrete geometry plays an essential role in the field of image analysis, computer graphics, pattern recognition, shape modeling, computer vision, and document analysis. The aim of IAPR-TC 18 is to promote interactions and collaboration between researchers working in this field.
- Dr. Barneva is an invited speaker at the COCID Conference "Training faculty to Support Scholarly Work & Undergraduate Research with (High Performance) Computing Tools" sponsored by SUNY FACT. Her talk is entitled "Using high performance computing for computational biology". The goal of the conference is to provide professional development for faculty in the utilization of computing tools to implement mathematical models with undergraduate students and beyond. Talks will also be given by Dr. Hauptman, Nobel Prize Laureate and Dr. Jose Castillo,

- Director, Computational Science Research Center at San Diego State University.
- Dr. Barneva received an Individual Development Award.
- Dr. Barneva gave a talk to Gifted Math Program students at the University at Buffalo. This is a program delivering college mathematics courses to exceptional secondary school mathematics students.
- Dr. Barneva is the computer science co-advisor of the theses of the first two master's students in the department of Computer and Information Sciences, Michael Mendez and Robert Olson. They are pursuing their studies in the framework of the Program Interdisciplinary Studies. Mike and Rob may graduate this academic year.
- Dr. Barneva serves on the Program Committee of the International Symposium on Visual Computing (ISVC), International Workshop on Combinatorial Image Analysis (IWCIA), Discrete Geometry for Computer Imagery (DGCI), and Thematic Conference on Computational Vision and Medical Image Processing (VipIMAGE). She is also on the editorial board of the International Journal for Computation Vision and Biomechanics.

Other News

- Enrollment in the Department continued to grow.
- A documentary "Hackers: Outlaws and Angels" was shown on March 13, 2007. A computer-themed movie "Pirates of Silicon Valley" was shown on April 26, 2007. Both events were organized by Dr. Ruslanov who will be arranging more documentaries and computer-themed movies in the future.
- Dr. Ruslanov organized on September 16, 2007, a picnic for students and faculty at Russell Joy Park in Fredonia.
- An alumni leadership conference will be held on June 1-2, 2007.
- Five of our students (4 major and 1 minor) graduated in the Fall Semester, and 11 students (10 major and 1 minor) applied for graduation in the Spring Semester.
- The Department Website has been completely redesigned. Two of our students, David Bronke and Alan Keegan, worked on the new design with the supervision of Dr. Abu-Jeib.

- A reception for graduates and scholarship recipients will be held on Friday, May 11, 07, 11:00 am 1:00 pm.
- Twelve students worked for the department in the fall semester as lab proctors or lab assistants, and 11 students worked as lab proctors in the spring semester.

New Members Join the Department - Continued from Page 7 -

most department meetings. Secondly, meetings are well organized and it is possible to know the agenda and to get the Chair's report ahead of time, and to prepare suggestions which save a lot of time for very busy faculty members. Thirdly, there is a good atmosphere in the Department and I received a lot of support from the faculty and the secretary. People in the College are very friendly and always come to help. I taught my first semester in Houghton Hall and was nervous at the beginning, because it was impossible to haul the computer cart from Fenton Hall to my lecture room. But fortunately, I had no problem. The Physics Department provided me with all the equipment I needed and people there (Dr. Pendyala and Michelle), and Shirley Woch from the Chemistry Department helped me resolve problems I had during the semester. My overall experience at SUNY Fredonia has been very positive.

Dr. Arnavut, UUP, and Library By Dr. Arnavut

Dr. Arnavut has been serving as a member of the SUNY Faculty Senate Operations Committee since September 2006. This committee, among other things, is in charge of library resources, and funding of SUNY colleges and universities. Dr. Arnavut serves on the library subcommittee and is advocating more electronic database access for SUNY faculty and students. On February 27, he joined other UUP members in Albany to lobby lawmakers for more resources. His activity was noticed by the reporters of the New York Teacher magazine. An article about him, his lobby efforts, and his conversation with

Senator Young appeared in the March issue of the New York Teacher Magazine. See

http://www.nysut.org/cps/rde/xchg/nysut/hs.xsl/newyorkteacher_6953.htm.

In his recent report to the University Senate, Dr. Arnavut reported that SUNY libraries will have a 10% budget increase (with respect to book rate inflation), as opposed to 3% we had before. Furthermore, he reported that SUNY Provost Office will be requesting 35 million dollars to improve SUNY Connect, which will allow more SUNY colleges to access more electronic databases. If that is achieved, databases such as IEEE will be accessible from SUNY Fredonia.

Faculty Service to the Campus and SUNY

- **Dr. Abu-Jeib**: Alternate SUNY Senator, Information Technology Advisory Board, Graduate Council, and Co-PI for MACS Scholarship.
- **Dr. Arnavut**: Director of MACS Scholarship, SUNY Fredonia Senator, Operations Committee (SUNY Senate), Student Research and Creativity Committee.
- **Dr. Barneva**: Kasling Committee, Planning and Budget Committee, Executive Committee, Vice Chair of the University Senate, Chair of the Faculty and Professionals Affairs standing committee of the University Senate. Next academic year she will be the Chair of the University Senate.
- **Dr. Hansen**: Science and Technology Building Committee.
- Dr. Siddiqui: Kasling Committee, Science and Technology Building Committee., FSA Board, Incubator Committee, Graduate/Research Committee (SUNY Senate), UUP Membership Officer, Graduate Dean's Committee for Course Reviews, Search Committee, Dean Advisory Committee, Alumni Conference Committee, etc.
- **Mr. Szocki:** University Senate, ITAB's Hardware Committee, and Alumni Conference Committee.

Computer Science Club

By Jordan Bommelje

The Computer Science Club is steadily growing. As each semester passes, we gain new eager members. We launched extra events this year not only to learn, but also to have fun. In the Fall of 2006, we hosted a LAN Party in the Computer Science lab; we had a great turn out. The LAN Party was supplemented with a Game Design workshop, held by Dave Bronke, a junior Computer Science major. Because both the LAN Party and the game design workshop had generated such an interest among students, the CS Club immediately scheduled another one for the Spring of 2007, this time drawing nearly three times more people to the event. Though it was great to have such a large turnout, the Computer Science lab did not have enough computers to accommodate the large number of people that attended the event. Next semester, due to the expanding size of the Computer Science club, we hope to hold the LAN Party in a larger computer lab.

Since last year, we have upgraded our status from being an Acknowledged Group to being a Chartered Group. With this new status, we are now required to hold additional events. With the rapidly growing number of students, that should be no problem.

The Computer Science club meets once a week for approximately 1-2 hours. Topics covered during the meetings include Linux tutorials, upcoming events, and interests of the members. The CS Club members are:

- Jordan Bommelje, President.
- Robert Scott, Vice President.
- Bryan Woodard, Secretary.
- Christopher Becker, Treasurer.
- Christopher Case, Activities Chair.
- David Bronke, Webmaster.

If you have questions or comments about the Computer Science Club, please contact Jordan Bommelje at bomm6831@fredonia.edu.

Summer, SLN, and J-Term Courses

The department continued to offer courses in the J-term and summer sessions, and courses through SUNY Learning Network (SLN) and Angel.

In the J-term of 2007, the department offered: CSIT 120 (SLN – Dr. Siddiqui), CSIT 455 (SLN – Dr. Siddiqui), and CSIT 456 (SLN – Dr. Barneya).

In the first summer session of 2007, the department will be offering: CSIT 104 (SLN - Mr. Szocki), CSIT 105 (Angel - Dr. Nazarenko), CSIT 107 (SLN - Mr. Szocki), CSIT 120 (SLN - Dr. Siddiqui), CSIT 121 (Dr. Yang), and CSIT 462 (Angel - Dr. Barneva). In the second summer session, the department will be offering: CSIT 205 (Angel - Dr. Yi), CSIT 300 (Dr. Siddiqui), and CSIT 431 (SLN - Dr. Siddiqui).

Our Programming Team Ranks Sixth Among 36 Teams

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Dave are also proctors in one of our labs.

The Chair of the Department, Dr. Siddiqui, described the performance of the team as "very honorable." The teams were accompanied by Dr. Ziya Arnavut. The committee in charge of the programming competitions consists of Dr. Arnavut (Chair), Mr. Szocki, and Dr. Yang.

"A programming competition is like asking doctors to perform speed surgery.' I overheard this from one of the faculty involved at our most recent CCSCNE competition while we were frantically programming. The three hour competition really stresses knowing the subject well enough to write programs that implement algorithms to solve any problem they throw at you, as well as having the debugging skills to quickly resolve any problems. For example, there was a question that required you to check all numbers less than a given number for forming a complete set - the algorithm was straightforward as presented but took too long to run (and would not be acceptable to the judges), unless you wrote a better algorithm that took less time. It's an enjoyable time and all the students had fun. You really get to know your team members through practice and the three hours of working together on one computer." says Devin Grady.

Message from the Chair By Dr. Siddiqui

It has been a very busy and productive year for the Department, and considering the superb scholarship of the faculty and students it would not be an exaggeration if I call the department the "Department of Excellence." First and foremost Dr. Abu-Jeib was promoted to the rank of Associate Professor and recommended for the tenure. He has ten journal articles published or submitted. Dr. Singh received the Kasling award for 2007. He has published over 100 scholarly articles, of which more than 70 are journal articles. Dr. Barneva received the Chancellor's award of Excellence for Scholarship and I was fortunate to receive the President's award for Excellence. Last year, Dr. Zubairi participated in the organization of six national/international conferences. Drs. Arnavut and Siddiqui were the members of the organizing team of the International Conference Series on Computational Science and Education, 2006 which was sponsored by the Graduate and Research Committee of the SUNY Senate. Dr. Siddiqui, was also a member of the SPIE's organizing committee for the Photonix East, Boston, 2005 & 2006. Dr. Barneva participated in the organization of three national/international conferences. She became the Vice Chair of the Technical Committee of reputable International Association on Pattern Recognition. She advised the first two graduate students and gave many talks. Dr. Hansen presented his work at the Faculty Expo.

Students cholarship was equally noticeable. Seven students participated in the Student Expo. Two teams participated in each of the ACM and CCSCNE programming competitions. Four students received the Maytum and Beck scholarships and 15 students were selected to receive the MACS scholarship. Dr. Arnavut arranged many guest speakers throughout the year as a part of MACS feature activities.

We upgraded most of the computer equipment of faculty and Labs, and more is on the way. Among new programs, the "Systems Management" track was introduced in the CIS degree program. The graduate program proposal finally left the department and many new courses were developed. We continued to adapt to the changing face of computer and information sciences education. New on the horizon are: launching of the graduate program, certificate programs, a 3+2 program, scholarship colloquium, and more...

Despite the national trends of low enrollment in computer science, our enrollment remains strong and we

already met our target of 110 majors/minors for the next year.

It is always both a sad and a happy occasion as we say farewell to our graduating seniors. All members of the department wish you success in your careers. Stay in touch and keep us informed what you are doing.

Lastly, the department is indebted to many people across campus for its continued success and growth. I, on behalf of the department, thank Ms. Klose and Mr. Plaister of ITS, and the members of ITAB Committee for providing the needed equipment for the student labs and facilitating the timely upgrades. Mr. Pepe and Mr. Cloos of Facilities Management are acknowledged for arranging the cleaning of the lab 115 and renovation of the new space that the department acquired last summer. Thanks are also due to Dr. Swansinger for moving the master program forward. Drs. Ewing, Horvath and Hefner are graciously acknowledged for providing their full support to our programs and in accomplishing many of our objectives throughout the year.

Third Year in Review

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The introduction of CSIT 151 and 251 and our aggressive advertising and recruiting efforts throughout the year paid off and at the beginning of Fall 2006 more than 30 new students joined the program. This includes 15 freshman, 11 internal and external transfers, 2 readmits, and 3 reinstatements. We added 16 more students during Fall and Spring advising and lost 12 due to fall graduation or transfers.

We acquired additional space in rooms 2140 and 2165A and created the CS Commons.

All brochures were rewritten and updated. Summer advising material was updated. Admission fact sheets were revised and articulation agreements or course equivalencies with SUNY sister campuses and other area colleges were created or revised.

We lost Dr. Ehrlich and Professor Taylor decided to take a long vacation at the moment. Dr. Abu-Jeib will be on a one year sabbatical leave during 2007-08 and Dr. Zubairi decided to extend his overseas stay for another year.

Faculty and students produced outstanding research and scholarship and were prominent at their respective expos.

Our students and faculty participated in many on and off-campus scholarly activities. Dr. Hansen presented his work at the Faculty Research Expo. Various projects of many students with the supervision of Drs. Arnavut, Barneva, and Siddiqui were displayed or presented at the Student Expo.

The department continued to function in a decentralized manner, through strong and fairly independent committees each of which is administered by a member of the department. Each full-time member is a Chair of at least one of the committees.

Most committees were very active throughout the year. Due to the separation of Computer Science (CS) and Computer Information Systems (CIS) degrees, two separate Curriculum Committees were structured. Dr. Arnavut chaired the CS committee whereas Dr. Barneva chaired the CIS committee. Six other committees, namely Administrative (Dr. Hansen), Assessment (Drs. Ruslanov, Siddiqui), CS&F (Mr. Szocki), Scholarships (Dr. Chan), Graduate (Dr. Barneva), and Student Welfare & Outreach (Drs. Ruslanov, Siddiqui) were particularly noticeable. In addition, Dr. Abu-Jeib continued to volunteer to lead the High School Competitions and maintained the department's website which is currently going through another facelift. The website was instrumental in bringing new student applications to the department.

Another new addition this year was the introduction of the film series that Dr. Ruslanov initiated. Two documentaries "Hackers," and "Pirates of Silicon Valley," were featured and over 100 students watched these films.

The department's participation in service to the Campus, SUNY Central, and the profession is equally noticeable. Dr. Barneva became the Vice Chair of the Senate, and she is serving on many other committees as well. Other members including Drs. Abu-Jeib, Arnavut, Hansen, Siddiqui, and Mr. Szocki are involved in many campus and/or system-wide committees.

In short, all members of the department have tirelessly contributed to the growth and success of the department.

Mr. Thomas Taylor Retires

Mr. Thomas Taylor started his teaching career at SUNY Fredonia in Fall 1982, when he taught Introduction to Computing in BASIC (equivalent to CSIT 105). He received a BA degree in Mathematics from SUNY Fredonia in 1965 and an MA degree in Mathematics from SUNY College at Buffalo in 1970. When he was on sabbatical for one year from the Gowanda Central Schools in the mid 1980s, he took more Computer Science courses

at SUNY Fredonia. At that time, he was also a Teaching Assistant in the Department of Mathematics and Computer Science. After the sabbatical, he became the Coordinator of User Services for Information Technology at SUNY Fredonia for more than one year. (At that time, Fred Ullman was the director and Mr. Taylor worked with Bruce Wilger and the programming team.) Then, because of his interest in teaching, Mr. Taylor returned to Gowanda where he became the Director of Technology until his retirement in 1998. After retirement from Gowanda, he started teaching more courses at Fredonia.

In addition to the computing course mentioned above, Mr. Taylor taught many courses at SUNY Fredonia including CSIT 261 (Programming II - in Pascal), CSIT 260 (Programming I - in Pascal), CSIT 221 (Computer Science II), CSIT 121 (Computer Science I), Spreadsheet and Database application course in Lotus 1-2-3 and Dbase III, CSIT 120 (Computer Science Overview), CSIT 105 (Visual Basic), and CSIT 104 (Introduction to Microcomputer Software in MS Office).

Mr. Taylor's service to the department was very valuable. He served on many committees including Faculty Search, Computer Science Curriculum, Administrative, Student Welfare and Outreach, and High School Contests. He was also the department's representative at the University Senate. Mr. Taylor retired early this Spring.

SUNY FREDONIA COMPUTER SCIENCE News

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