



Cascade



Table of Contents

Editorial.....	1
A Tearful Tribute	2
Events conducted at BHEL	3
Events conducted at BUTP	4
Events conducted JMC	4
Events conducted at MAMCE.....	4
What is Pervasive Computing?	6

Editorial Board

Dr. T. Abdul Razak
 Mr. A. Jahir Hussain
 Er. R. Selvaraj
 Er. D. Senthilkumar
 Er. S. Lakshmanan

Contact us

Office:

Institutions Building, 'B' Sector, BHEL Township,
 Kailasapuram, Tiruchirappalli – 620 014

Tiruchirappalli City Office:

F8-A, Bharathidasan University Technology Park,
 Khajamalai, Tiruchirappalli – 620 023

Chairman: **Dr. Gopinath Ganapathy**
 Director, BUTP, Tiruchirappalli
 Mobile: 9842407008
 gganapathy@gmail.com

Secretary: **Dr. T. Abdul Razak**
 Associate Professor of Computer Science
 Jamal Mohamed College, Tiruchirappalli
 Mobile: 9443110965
 abdul1964@yahoo.com

Editorial

Benefits of Green IT

Technology has advanced to such an extent with the adoption of IT that it's possible to send files from our smart-phones to distant Computers in an instant. As much as we depend on IT to make our lives easy, IT has been contributing to environmental problems. Nowadays the safety of environment has become crucial, moreover a necessity for the society's well being. Hence, in order to conserve energy in all the possible ways, respective governments advise all the sectors to make use of eco-friendly products and methodologies in every possible way. The root cause that severely affects the environment is Global Warming.

Computers run on electricity and electricity is produced by burning coal/oil. This process releases CO₂, sulphur, methane and other such gases into the atmosphere. These gases accumulate and result in Global Warming. They also cause respiratory diseases, acid rains etc. Another factor that is a major cause of concern to the environment is the disposal of computer peripherals like monitors which end up polluting land and water.

A solution to subside the effects of Global Warming is Green IT. Green IT can also be referred to as "Green Computing". It basically refers to the process of practicing environment friendly computing. This methodology is adopted in order to ensure that the usage of energy is done efficiently, to promote the idea of recycling of waste products. Businesses implement Green IT to reduce power consumption and thus lowering costs. Common people implement Green IT in order to sustain a healthy lifestyle.

Green IT is continuously interesting people and organizations all over the world, the main reason being greater financial returns on the investment made on green data center. Green IT has gained a lot of importance because of the rising energy costs and its impact on the environment. The need to manufacture and store energy has increased mainly due to the volume of systems that the organizations generally rely on. The power consumption by companies is a critical issue. The idea of using green computing is beneficial as it helps the companies dispose their electronic waste in an effective way so that the environment is not hampered. Green Computing with respect to data centers leads a lot of cost savings over time. Reduction in energy costs from servers, cooling and lightning helps any organization save a lot on their budget on power.

A Tearful Tribute to Our Cheerful Treasurer

With deep sense of sorrow and a heavy heart, we mourn the sad and untimely demise of our Treasurer, Mr. Syed Mohamed Ghouse, on 17th February 2013. He was associated with CSI Tiruchirappalli Chapter for more than two decades. To us he was a guide, philosopher, a good friend and an accommodating personality. His excellent qualities, pleasing manners and commitment towards completing his responsibilities have carved out a name and niche in the hearts of all those who were associated with him. Though we miss Mr. Ghouse, we shall cherish all the happy memories we had with him. The CSI will always remember his smiling and friendly face as well as his numerous contributions to the society. We wish and pray that Almighty God give peace to his soul, and courage to his family members to accept this unpredictable and unfortunately unavoidable part of the life.



Mohamed Ghouse – A person who has carved out a name and niche in our hearts

Dr. E. Kirubakaran, AGM, SSTP (Systems), BHEL, Tiruchirappalli

Mr. S.I. Syed Mohamed Ghouse was born on 6th January 1954 in Jala Kudir Street, Tiruchirappalli. He is the eldest son in the family and has two younger brothers and four younger sisters. He lost his father during his student days and the entire responsibility of the family fell on his shoulders.

Mr. Ghouse completed his Diploma in Mechanical Engineering from Seshayee Institute of Technology, Tiruchirappalli, and joined BHEL, Tiruchirappalli as a supervisor trainee in the Ancillary Development Department (Systems). Subsequently, he did B.E. (Mechanical Engineering) at the Regional Engineering College (now NIT), Tiruchirappalli. His hard work and sincerity earned him name and fame in the department, and this in turn fetched him the prestigious 'Flier Promotion' from Supervisory cadre to Executive cadre in the same department.

Mr. Ghouse is known for his courtesy and commitment towards his family. He took care of the education and marriage of all his brothers and sisters and ensured that they are well settled in their lives. He also took care of her aged mother very affectionately till her last breath. Just to cite one incident; when he purchased a car, it was his desire to take his mother in the car first and he took her along with his wife, children and sisters. I had the pleasant privilege of being the driver of the car then.

Mr. Ghouse had a flair for academics too, particularly in promoting Computer Awareness. We were together resource persons for a training program on UNIX at Srimathi Indira Gandhi College, Tiruchirappalli during early 90's. I value the hints he had prepared for handling the classes, as a treasure, and I am still preserving it. He was an active member of CSI and got himself involved, with utmost sincerity and dedication, in all Lectures, Seminars, Conferences and Workshops, organized by the CSI Tiruchirappalli Chapter. He always used to be one among the last set of persons to leave the venue after completing the assignment.

Mr. Ghouse is survived by his wife, a son (elder), and a daughter. His son, Syed Rameez Ahmed, is a Mechanical Engineer working in Rane Madras Ltd., Uttarchand. His daughter, Reehana Banu, has just completed her B.B.A. from Holy Cross College, Tiruchirappalli.

His excellent qualities, pleasing manners and commitment towards completing his responsibilities have carved out a name and niche in the hearts of all those who were associated with him.

Voice of Love

**It is better to have a bad name and live a good life, than to have a good name and live a bad life.
The disease to please everyone eats us out.**

Events conducted at IE Building, Bharath Heavy Electricals Ltd.(BHEL)

A special lecture on 'IT Journey from 1974 to 2009 in BHEL.' was organized on 9th April 2013. Mr. R. Sandanadurai, Retd. GM/ITS&S, Bharath Heavy Electricals Ltd., Tiruchirappalli was the resource person. He spoke on IT journey in BHEL highlighting the aspects such as organization, hardware technology, software developments, programming languages, and nature of applications.



A special lecture on 'Customized Server Dash Board' was organized on 28th May 2013 at the BHEL office in association with the Institution of Engineers Local Centre. Shri A. Anand, Sr. Engineer, Informatics Centre, Bharat Heavy Electricals Limited, Tiruchirappalli was the resource person. In his talk, he explained how to create server dash boards and design our own monitoring tools using JMX Technology and Hyperic - SIGAR API.



On 25th June 2013, Mr. S. Babu Gandhi, Engineer/IT Solutions & Services, Fossil Boilers, Bharath Heavy Electricals Ltd., Tiruchirappalli gave a special lecture on 'Introduction to rendering concepts for media generation from 3D'. The main objective of his lecture was to understand the use of 3D models for generating media for projecting their design to the customers. He introduced the concepts of rendering and explained the terminology related to 3D modeling and media. He also discussed about the various software related to the context and their capability. He finally demonstrated how to develop digital images using programming without any software.

Ms. C. Aparna, Associate Professor, Department of CSE, MAM College of Engineering, Tiruchirappalli gave a special lecture on 'Secure Routing for Mobile Adhoc Networks using GNSD' on 9th July 2013. She highlighted on the various issues in providing secure routing in MANETs. She also explained the impact of bad neighbor nodes in adhoc routing and also proposed methods for identifying good neighbor nodes in the network for provider better security.



Events conducted at Bharathidasan University Technology Park (BUTP)



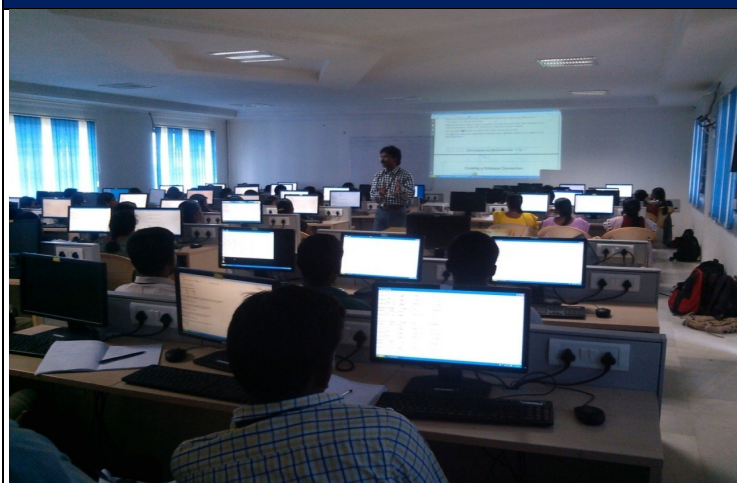
A Soft Skills Programme was presented by Mr. Stephen, IDEAS International, for MCA and M.Tech. IT students on 23rd July 2013 at BUTP, Tiruchirappalli. In his lecture, the speaker explained the importance of various soft skills and how these skills help in the personality development of the individual. He also highlighted on the soft skills that every company expects from the new entrants such as, communication skills, adaptability, team work positive attitude, integrity and work ethics.

Events conducted at Jamal Mohamed College (JMC)

Activities for the year 2013-2014 at Jamal Mohamed College, was inaugurated by Prof. S. T. Rajan, Head, Department of Computer Science, St. Joseph's College, Tiruchirappalli on 31st July 2013. The speaker spoke on the benefits of the co-curricular activities conducted under the banner of Computer Science Association and the CSI. He highlighted on the various skills that would be developed by participating in such activities. On the technical part of his talk, he greatly emphasized on the importance of data structures for good programming



Events conducted at MAM College of Engineering (MAMCE)



The Department of CSE, has organized the final phase of Workforce Development Program on ORACLE 10g for the third year students during their summer holidays from 4th to 8th June and from 24th to 28th June 2013. The Resource Person was Mr. J. Naveen, Associate Professor and ORACLE Certified WDP Trainer.

Events conducted at MAM College of Engineering (MAMCE)

A One Day Refresher Workshop was organized on 1st June 2013. The workshop was conducted by the experts from Infosys Technologies, Chennai. A batch of 15 faculty members from the Department of CSE participated in the workshop.

Mr. A. Jahir Husain, Associate Professor, Department of CSE gave an Orientation programme on 'Free Open Source Software' for the second year CSE students of MAMCE on 3rd July 2013.

The Department of CSE has organized a Seminar on 'Computer Networks' for the students of MAM Polytechnic College, Tiruchirappalli on 5th and 8th July 2013. The Resource Person was Mrs. C. Aparna, Associate Professor in CSE, MAMCE.

The Department of CSE has organized an Orientation Programme on 'Free Open Source Software' on 8th July 2013. About 25 students from RSK higher Secondary School, Kailasapuram participated. The Resource Person was Mr. A. Jahir Husain, Associate Professor in CSE, Resource Center Coordinator, Spoken Tutorial Projects, MAMCE

The Department of CSE has organized a seminar on 'Middleware Technology' on 8th & 9th July 2013. The Resource Person was Mr. S. Vinayaga Moorthy, Assistant Professor in IT, AVC College of Engineering, Mayiladuthurai.

A Guest Lecture on 'Data Structures' was organized by the Department of CSE on 11th July 2013. Dr. A. Vadivel, Professor of Computer Applications, National Institute of Technology, Tiruchirappalli delivered the lecture.

Dr. A. Maluk Mohamed, Professor & Principal, MAM College of Engineering gave a special lecture on 'Distributed Systems' on 15th July 2013 in the Department of CSE.

The Department of CSE has organized a Certificate Course on 'Hands-on Training on JAVA Programming' for the third year students on 27th July 2013. The course was conducted by Ms. G. Kanimozhi and Mr. A. Abdul Khader, Associate Professors in CSE, MAMCE.

What is Pervasive Computing?

The idea that technology is moving beyond the personal computer to everyday devices with embedded technology and connectivity as computing devices become progressively smaller and more powerful. Also called *ubiquitous computing*, pervasive computing is the result of computer technology advancing at exponential speeds -- a trend toward all man-made and some natural products having hardware and software. Pervasive computing goes beyond the realm of personal computers: it is the idea that almost any device, from clothing to tools to appliances to cars to homes to the human body to your coffee mug, can be imbedded with chips to connect the device to an infinite network of other devices. The goal of pervasive computing, which combines current network technologies with wireless computing, voice recognition, Internet capability and artificial intelligence, is to create an environment where the connectivity of devices is embedded in such a way that the connectivity is unobtrusive and always available.

An example of a practical application of pervasive computing is the replacement of old electric meters with smart meters. In the past, electric meters had to be manually read by a company representative. Smart meters report usage in real-time over the Internet. They will also notify the power company when there is an outage, reset thermostats according to the homeowner's directives, send messages to display units in the home and regulate the water heater.

Humour

Kevin took a part time job as a computer technician dealing with most problems by telephone. One day he received a call. The caller told Kevin that her computer was not working. She described the problem and he concluded that the computer needed to be brought in and serviced. Kevin told her to unplug the power cord and bring it to him in the office and he would fix it.

About fifteen minutes later she showed up at Kevin's door with the power cord in her hand...