

JANUARY 2013

Information Technology **NEWS LETTER**

Ignited Trendz



VISHNU
UNIVERSAL LEARNING



**VISHNU INSTITUTE OF TECHNOLOGY
BHIMAVARAM**

Vishnu Institute of Technology



Vishnu Institute of Technology, the scion of Shri Vishnu Educational Society was established in 2008 and is currently the eleventh educational institution to disseminate education under the aegis of this society. Nascent that it is, it combines in its matrix the lofty idealism of its Founder Chairman the Late Padmabhushan Dr. B. V. Raju, a distinguished industrialist, philanthropist and an eminent educationalist; the experience and vigour provided by the Chairman Sri K.V. Vishnu Raju, a man of holistic vision and his team comprising dexterous administrators, reputed academicians and brilliant line of students. They constantly strive to make the institution join the ranks of prestigious technical institutions.

Campus

The Campus, sprawling over 100 acres, is located in the verdant atmosphere of Vishnupur in Bhimavaram. It is in the very vicinity of the town and is well connected by road. VISHNU also provides hostel facilities to the students who opt for a residential mode of education. The hostels are constantly updated and provide an atmosphere conducive to pursue education.

Hands on Experience

To make the instruction in VISHNU more practical-oriented, special focus is on hands on experience. The Assistive Technologies Lab run in collaboration with the University of U Mass, USA helps students to combine technology with a humanistic outlook. Gadgets for the physically challenged are designed and developed here by the students under the guidance of eminent professors both from the Institute and abroad. VISHNU aims at empowering students with technical skills and can-do entrepreneurial spirit. The IBM Software Centre of Excellence in the campus provides the students with the best of quality technical education there by increasing the skill set of each student and faculty for a great career.

Department of Information Technology

The mission of the department is to advance and enhance computer science engineering fundamentals to build the intellectual capital of students. The IT Department endeavours to be an important resource centre for the development of computing systems and applications.

The department was established in the academic year 2008-09 with an annual intake of 66. It offers 4 year B.Tech. This program affiliated to JNTU Kakinada & approved by AICTE. The department has number of well equipped Laboratories and provides excellent facilities for learning.

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HELM OF AFFAIRS

Academics are a continuing process of exploration, growth and sustenance. Today information explosion has brought about many changes. New ideas are generated, new interpretations are given and new applications are invented. The equations are changing very fast both in education and at the work place. Every day brings in new demands. One has to constantly upgrade to cope with the fast emerging trends. A software professional once said "We are training people in technologies to find solutions for problems that have not yet been identified". Moreover the roles and responsibilities of professionals are ever expanding making it imperative to move beyond the confines of the classroom and the stipulated curriculum and focus on the skills needed to cater to the needs of the society. Hence it has become imperative to all the stakeholders in education to arm themselves with the necessary knowledge, skills and attitude to keep themselves abreast of the rapid changes.

That explains everything—the Chairman's message to the faculty to constantly update themselves with the emerging new technologies and concepts, the focus on research, paper presentations and publications, undertaking new projects, adopting new technologies for information collection and dissemination as well.

"The key to growth is the introduction of higher dimensions of consciousness into our awareness" -- Lao Tzu.

That is what the message of our Chairman does, to motivate us to action.

The stimulus has been given...

it's time for response.



Chairman Message

I am happy to inform that the department of Information Technology of Vishnu Institute Of Technology is publishing their department news letter for the academic year 2012-2013. I Commend and appreciate the efforts taken by the staffs and students to enhance the quality of academics in the college. Vishnu Institute Of Technology moreover has the credentials and Proven strengths to initiate such an indispensable academic activity.

***Message from Principal***

It is my pleasure in congratulating the department of IT on the pleasant occasion of releasing the newsletter for the period 2012-2013. It is great to find a considerable number of winners and participants in co curricular and extracurricular activities which certainly prove that our staff and students are adequately equipped and possess necessary skill-sets to bring such laurels to the institution. I am sure that publishing a newsletter of this sort containing the achievements of the wards will be recognition to them and I wish them all the very best for future endeavours.

***Message from HOD***

Welcome and best wishes for all the Staffs and Students of the department who receive this News Letter. It has been interesting and busy year for the members of the department. And has had a number of Successful events including Guest Lecture, Workshop, National Level Conference and Symposium. I invite all the readers of this news letter to share this with your friends and contribute more items for 2014 News Letter.



Progressive Strides

Chairman's Visit

Chairman Shri K.V. Vishnu Raju visited the campus on 7 August. He addressed the final B Tech students regarding training and placements. In his address he explained the importance of campus placements, the need to acquire industry compatible skills, and motivated them to train themselves well and participate in the training and placement activities. He assured them maximum support from the college.

Earlier he visited the ATL Lab at VIT and observed the activities going on there. He interacted with the students and staff involved in the ATL lab giving them the much needed motivation.

Foreign Languages

The second phase of A1 level in German was held between 4th July to 8th July'12 by Mr.M.Satish Kumar, Languages Labs, Chennai.

Department Activities

A five day workshop on "Embedded Systems" was organized by the departments of CSE and IT at VIT. This is the first such Workshop at VIT organized by the Indo-United States Consortium for Engineering Education (IUCEE) Faculty Leadership Initiative (FLI) in the

year 2012. The workshop was conducted by Dr. Santosh Pande, Professor, CSE from Georgia Tech University, Atlanta, USA.

A total of 40 participants attended the workshop from the various departments of CSE, IT and ECE from different colleges. The programme was targeted at teaching faculty of Undergraduate and Post graduate courses. Interested students also participated in the programme.

The workshop benefited the faculty as it exposed them to the current trends in Embedded Systems.

Dr. D. Suryanarayana convened a meeting with Mr. Kantha Reddy, HODs and the members of the Research Activities committee on 30 August 2012.

Guest Lecture by Mr. Dattatreya Piyush Sharma, Director – GuruPrevails on Machine Learning III CSE & IT Students on 22-12-12

DB2 Associate Certification Exam by Mr Sami, IBM- Pune Number of Students taken Examination – 64 (5 students were absent) – qualified – 49 Number of Faculty Members – 5 (qualified – 5)

Organized Staff Development Programme on "Recent Trends in Data mining and Warehousing" between Dec-5th and Dec-17th, 2012.

40 days training program .NET in Summer Vacation – 2012 in the college for the students

Internal training on IBM RAD Tools between 20th – 30th August 2012.



Organized a two day workshop on ANDROID between 16th & 17th September 2012 for the students. 60 students from VIT & BVRICE participated in the workshop. Mr.P C Varma from Net Enrich acted as resource person.

Organized three day workshop on IBM-DB2 between 16th & 18th December 2012 for the CSE & IT students of VIT. Mr.Abhinav Pandey and Mr.Charan Kumar Reddy from WebTek Labs Private Limited, New Delhi acted as resource persons.

organized Guest Lecture on “Artificial Intelligence Applications” on 22nd December 2012. Mr. Dattatreya Piyush Sharma, from GuRu Prevails- Bangalore, gave an overview of various application areas of Artificial Intelligence.

Forty nine students (III & IV B.Tech CSE,IT) & Five faculty members of CSE & IT were certified in DB2 Academic

Associate Examination conducted by IBM on 27-12-12.

Department hosted Preliminary test for National Programming League (NPL) as part of NIT Warangal's TECHNOZION'12

Student Activities

80 students from III & IV CSE & IT participated in the workshop IBM-DB2 workshop by Mr.Abhinav Pandey and Mr. Charan Kumar Reddy from WebTek Labs Pvt. Lab, New Delhi from 16-12-12 to 18-12-12

Five of III B.Tech CSE (2010-14) students undergoing Mission R & D training in the Campus.

Students Participated in Cyber Forensics and Exploration workshop at NIT Warangal TECHNOZION'12 from 28-09-12 to 30-09-12.

Students Participated in Web Development Workshop at NIT Warangal TECHNOZION'12 from 28-09-12 to 30-09-12.

Students Participated in Just Google at NIT Warangal TECHNOZION'12 from 28-09-12 to 30-09-12.

Research and Development

Mission R& D

Mission R&D exam was conducted on 16-08-12 for III B.Tech I Sem students. In this exam 300 students attended and 5 students qualified. The Training will be given by Mr. Perraju, Ex- employee of Microsoft.

Research Activities

A meeting was held by our Vice Chairman Mr. Ravichandran Rajagopal on 28 August in the campus regarding the R&D activities in the campus. Members interested were identified to be a part of the Research Activity Committee from every college in the campus. Principals, HODs, Senior Faculty members and Associate Professors of all the colleges attended the meeting.

Articles

MOBILE COMPUTING

**By—B.Deepthi Lakshmi
III IT**



Mobile computing is human-computer interaction by which a computer is expected to be transported during normal usage. Mobile computing involves mobile

communication, mobile hardware, and mobile software. Communication issues include ad hoc and infrastructure networks as well as communication properties, protocols, data formats and concrete technologies. Hardware includes mobile devices or device components. Mobile software deals with the characteristics and requirements of mobile applications. Mobile computers are spreading faster than any other consumer technology in history. Smart phones have even begun reaching the group of relative technophobes that consumer researchers call the "late majority." About half of mobile-phone users now have one.

Mobile security or mobile phone security has become increasingly important in mobile computing. It is of particular concern as it relates to the security of personal information now stored on the smartphone.

More and more users and businesses use smartphones as communication tools but also as a means of planning and organizing their work and private life. Within companies, these technologies are causing profound changes in the organization of information systems and therefore they have become the source of new risks. Indeed, smartphones collect and compile an increasing amount of sensitive information to which access must be controlled to protect the privacy of the user and the intellectual property of the company.

All smartphones, as computers, are preferred targets of attacks. These attacks exploit weaknesses related to smartphones that can come from means of communication like SMS, MMS, wifi networks, and GSM. There are also attacks that exploit software vulnerabilities from both the web browser and operating system. Finally, there are forms of malicious software that rely on the weak knowledge of average users.

Different security counter-measures are being developed and applied to smartphones, from security in different layers of software to the dissemination of information to end users. There are good practices to be observed at all levels, from design to use, through the development of operating systems, software layers, and downloadable apps.