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Transform  
Thrive

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# VIDYA ACADEMY OF SCIENCE & TECHNOLOGY

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AN ISO 9001:2008  
CERTIFIED INSTITUTION

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## Experience Vidya...

When you're thinking about what you want to study, **making the right choice** is about more than just the right course. Being in the right environment is just as important. At VAS, you **get the most from your learning experience**.

**Vidya Academy of Science & Technology** stands for excellence. The **pursuit of excellence** in all its myriad dimension is a relentless passion at Vidya. **You can feel it** in the serenity of the campus as you walk in.

The courses that we offer have been **designed with the same care and devotion** that an artist bestows to a painting or a musician to a lyric. The people who deliver the courses are among the finest you are likely to come across anywhere. **The leadership is truly visionary and inspirational** which can **shape your careers** and transform the ordinary to the extraordinary.

**We invite you to be a part of this exhilarating experience.**

At **Vidya Academy of Science & Technology**, it's all about ideas. It doesn't matter who you are, where you're from, or what you're studying. **What matters is that you're courageous enough to take chances, express your thoughts, discover your passions, and learn and grow from feedback.** At the core of our curriculum, and programs, students learn how to think and **open new intellectual horizons.** It's this approach that **empowers our students** and fosters world-changing ideas.

## Our Vision

Progress through Education

## Our Mission

To seek, to strive and to achieve greater heights in Engineering, Technological and Managerial Education and not to yield on quality of education



## A few reasons for choosing VAS...

The next few years are important in your life. The choices that you make and efforts that you put in will determine your success in your professional and personal life. At this stage what should you be looking for in an institution and a programme?

- An ISO 9001:2008 certified institution to ensure your future in science and technology.
- You will work closely with your select faculty, committed educators and renowned experts to build a strong academic foundation.
- High emphasis is provided on giving you the extra attention and support when you might need it throughout the program with individualized academic planning and mentoring through Vidya Students Support Cell (VSSC).
- VAS has been a consistent topper for several years in the list of campus MNCs and other institutions in India. We are proud that our graduates are highly rated by employers from industry and commerce in the private and public sectors.
- Offering information, advice, guidance and support for job-seeking students is considered a primary responsibility at VAS.
- To complement the academic component, the overall educational experience of students is enhanced through a wide range of extracurricular programmes and activities.
- To provide you with the right ambience of learning, our college is an epitome of architectural excellence built over 30 acres of aesthetically landscaped lush green area with world class standards in all wings of physical infrastructure, a place where you can be away from the world and yet still be a part of it.
- Dedication to the society has also been another important objective and keeping in line with the same, the college has been advocating rural education, promoting socially interactive activities like Debating Programmes, Entrepreneurship Development Clubs and National Service Scheme etc.
- Our academic programmes also include special sessions in Applied Mathematics to augment your excellence in engineering.

VAS is structured differently from other colleges, and these differences make the VAS experience special. This overview explains the basics to help you get started

### VAS EXPLAINED

- VAS was established in 2003 and is approved by AICTE and is affiliated to the University of Calicut. VAS offers undergraduate degree courses in the core engineering streams and Post-Graduate courses in M.Tech and MCA.
- Our courses cover the subject area very broadly in the initial years, after which you can choose a specialism from a wide range of options.

#### The college

- Admits undergraduate and post-graduate students
- Organizes lectures, seminars, practical's and projects
- Provides a distinctive supervision system of personalized tuitions
- Is responsible for academic and personal care
- Conducts and evaluates examinations as per University guidelines
- Awards degrees
- Provides hostel and recreational facilities

## The 'VAS' Excellence...

- VAS has been ranked consistently as one among the top three self financing Engineering colleges in the state based on the ranks of students admitted under the General Merit quota in the B.Tech Entrance Examinations of the Government of Kerala.
- Our students have been University Toppers from the very first year, bagging the first five ranks in 2010 in various disciplines.
- VAS has been awarded the best NSS Unit and best NSS Programme Officer by National Service Scheme cell (Technical), Directorate of Technical Education, Government of Kerala for the year 2010.
- Indian Society for Technical Education (ISTE) has recognised VAS as "Best Students Chapter" with maximum new membership in 2010.
- Institution of Engineers (India) has accredited all our B.Tech programmes.
- Our college team has won the University Table Tennis Men's Championship for the last six years.
- VAS has been approved as the ICT enabled Engineering College in EINDIA 2010 at Hyderabad.
- The Kerala State Council for Science, Technology & Environment has provided the college, grants worth around Rs. 7.85 lakhs to support our research programs.
- Anna University of Technology, Coimbatore has recognised VAS as its research centre in the departments of EEE and CSE for collaborative Research programmes.
- Our IEEE Student Branch Students were the recipients of the coveted "student enterprise award" for the year 2010.
- Received Energy Conservation Award in 2009.
- Institution of Engineers (India) has provided the college with several grants for its research projects.



# Intellectual Capital

VAS has some of the finest faculty, each one a specialist in a chosen field. Besides developing a forward-looking and contemporary curriculum, our faculty constantly **strive to bring innovations in the learning process** through research projects, real-world case studies, presentations, individual and group assignments as well as field-work and mini-projects. The faculty employs a **wide range of teaching methods** to create a varied learning environment. These include: Structured Lectures, Seminars, Case Studies, 'Hands on' Computer work and Project Assignment.

The faculty derives its strength from the **unique pedagogy** being followed and flexibility in designing, modifying and updating the contents of the curriculum based upon the inputs from the industry and then keeping it abreast with the latest technological developments.

Faculty members **enhance the nature of the teacher-student relationship** by actively involving in counseling, mentoring and self-improvement initiatives.

Besides being excellent teachers, our **faculty has published in several scholarly journals and books.**

VAS is one amongst the colleges in the State to have **maximum number of faculty with doctoral degrees.**



**Learning with Mentor** - Providing extra attention through individualized learning sessions

## Our Doctoral Faculty



**Dr. Pratapachandran Nair**  
M.Tech, Ph.D, FIE, MIEEE, MISTE, MECS  
**Research:** Application of Multi Variable Control Theory for Nuclear PWR/BWR Nuclear Reactors, Load flow studies of Power Systems.



**Dr. S. P. Subramanian**  
M.Tech, Ph.D, FIE, MISTE  
**Research:** Energy Technology.



**Dr. M. N. Agnisarman Namboodiri**  
Ph.D (Texas A & M University, U.S.A), MISTE  
**Research:** VLSI Design



**Dr. V. N. Krishnachandran**  
Ph.D, MISTE  
**Research:** Topology of Semigroups and history of Kerala Mathematics.



**Dr. Sudha Balagopalan**  
M.Tech, Ph.D, MISTE, MECS  
**Research:** Power Systems and Energy Systems.



**Dr. Subin K. K**  
M.Tech, Ph.D  
**Research:** Structural Engineering - A Risk based frame work for the analysis of Intact and Damaged ships.



**Dr. K. B. Maheswaran Nambudiripad**  
Ph.D, MISTE, FIE  
**Research:** Engineering Mechanics



**Dr. T. N. P. Nambiar**  
Ph.D  
**Research:** Power System Dynamics.



**Dr. Mannil Mohan**  
M.Sc., Ph.D  
**Research:** Plasma Physics: Nonlinear evolution of waves in magnetized plasmas.



**Dr. S. Sateesh**  
M.Sc., NET, Ph.D  
**Research:** Statistics: Divisibility of distribution and associated stochastic processes.



**Dr. Sasidharan Sreedharan**  
M.Tech, Ph.D  
**Research:** Renewable Integration to the Grid, Grid Stability, Power System Optimization.

## Prominent Academic Visitors at VAS

**Dr. S. S. Mantha**  
Chairman  
AICTE, New Delhi

**Dr. Thomas Kailath**  
Stanford University

**Dr. Shankar P. Bhattacharyya**  
Texas A & M University

**Dr. Biswa Nath Datta**  
Northern Illinois University

**Dr. Narayanan Komerath**  
Georgia Institute of Technology, USA

**Dr. Roger Tan**  
National University of Singapore

**Dr. Pramod Khargonekar**  
University of Florida

**Dr. Anders Gunnar Lindquist**  
RIT, Sweden

**Dr. K. Kesavasamy**  
Head  
Academic Interface Programme  
Tata Consultancy Services

**Prof. N. R. Shetty**  
President, ISTE



Dr. Pramod Khargonekar during EPSCICON 2012



Dr. S. S Mantha, Chairman, AICTE inaugurating ISTE Annual State Convention

# Research

VAS is a leading centre for cutting edge research

Scholars, Scientists, and Educators transform our society and the world. At VAS they share the platform to transform ideas into success.

- VAS provides ultra-modern research facilities to its students to carry-out research as a part of their academics.
- The faculty and students are also involved in consultancy projects which provide tremendous exposure to the students.
- The Institute has attracted significant research grants from various Central and State government agencies.

## Ongoing Research Projects

- Development of a Solar Integrated Collector Storage System incorporating PCM based combined storage unit suitable for domestic application supported by KSCSTE.
- Cold Start Emission Control in SI Engine- Phase Change Material (PCM) Based Converter supported by IE(I).
- Gesture Recognized and Interactive Mouse supported by IE(I).
- "Web-based Electrical Machine Laboratory: A low cost implementation of SCADA based system" for Undergraduate students Experiments supported by IEEE.

## Consultancy services offered

- Solid Waste Management
- Watershed Management
- Design of Bio-gas plants
- Tests on structural steels
- Soil Testing
- Performance testing of petrol and diesel engines
- Testing of centrifugal pumps and reciprocating pumps
- Measurements of high temperatures using pyrometers
- Programming of CNC machines
- Relay/Instrument Transformer Testing and Calibration
- Calibration of Energy Meters



Research underway on Solar Integrated Collector Storage System

## Teaching and Learning: A world-class initiative

### Academic excellence

VAS is known and respected across the state for excellence in teaching and research, and the quality of its students - a status endorsed by the applicants who have opted VAS as their most favored engineering college during admissions. We are committed to encouraging and developing enquiring minds. VAS provides an unparalleled learning experience for our students. Not only you are taught in the lecture theatre by academics who are experts in the fields, but our distinctive supervision system means you receive more personal tuition from them, too.

### Lectures and Seminars

At VAS, our faculty or department arranges lectures and seminars which provides an opportunity to explore a particular topic in more detail and practicals teach you the hands-on skills and techniques to supplement your academic learning.

### Supervision

Supervision consists of teaching sessions for one or more students or small groups. It helps to develop independent learning skills, to explore course material in much greater depths and to gain further insights into subjects.

### Independent research

Dissertations and research projects are significant part of our courses and may form part of your degree assessment.

### Field trips and study visits

We provide exciting opportunities to experience the thrill of field trips and study tours which would add yet another dimension to your learning process.

### Study Abroad

You may have the opportunity to study abroad through efficient student exchange programmes with world's leading institution.

# VAS Scholarship

Rewarding merit and providing means for success to the deserving.

VAS offers equal opportunity to all its students to avail the generous scholarship schemes through the 'VAS SCHOLARSHIP OPPORTUNITY'. This scheme introduced since 2003 has given away awards to around 25 % students so far. This is one of the best offered bursary schemes by any engineering college.

Also, VAS offers several endowments and other financial assistance to help the needy students from financially and socially backward sections of the society.

Sl	Name of Scholarship	Course	Nos	
1	Vidya Merit - cum - Means Scholarships economically	B- Tech Lateral Entry MCA	24 3 3	Full Fee for socially and backward students
2	Vidya Excellence Full Fee Scholarships for Entrance toppers (Rank 1 to 2000)	B- Tech	3	
3	Vidya Competence 90% Fee Scholarships for Entrance achievers (Rank 2001 to 3000)	B- Tech	3	
4	VIDYA - AICTE Full Fee Waiver and B- Tech		24	Scholarships for Girls, Handicapped Weaker Sections
5	Vidya Merit - cum - Means Half Fee Scholarships	B- Tech Lateral Entry MCA	16 3 3	
6	Vidya Merit - cum - Means Full Fee Arts & Sports Scholarships	B-Tech	1	
7	Vidya Merit - cum - Means Sports B- Tech		1	Half Fee Arts & Scholarships
8	Vidya PTA Merit - cum - Means B- Tech		1	Scholarships by PTA
9	Vidya Alumni Merit - cum - Means Scholarships by Vidya Alumni Association	B- Tech	1	
10	Vidya Staff Club Merit - cum - Means Scholarships	B- Tech	1	
<b>Total Scholarships</b>			<b>85</b>	



# Admissions

B.Tech , M.Tech, MCA & Ph.D Programmes

## ...from Bachelor to Doctoral degrees

### B.Tech Courses

#### Admission Guidelines

Admissions are governed as per guidelines of the Commissioner of Entrance Examination, Government of Kerala and University of Calicut. 50% seats are reserved for Government allotment. The remaining 50% seats are filled up by the Management which includes NRI seats also. Merit is the only criterion for selection.

#### Eligibility

- Candidates who have passed Higher Secondary Examination, Kerala or there to, with 50% marks in Mathematics separately, and 50 % marks in Mathematics, Physics and Chemistry/Computer Science/Bio-technology/Biology put together are eligible for admission.
- Candidates who have diploma in Engineering awarded by the Board of Technical Examinations, Government of Kerala or a qualification recognized as equivalent thereto, by the State Board of Technical Education after undergoing an institutional course of at least 3 years, securing a minimum of 50% marks in the final Diploma Examination are eligible for admission to the special reservation quota.
- Candidates should have passed and be ranked in the KEAM 2012 for B.Tech Engineering.

#### Short-listing criteria

- The Rank List for admission to B.Tech courses under the Management Quota will be based on the ranks obtained in the entrance examination conducted by the Commissioner of Entrance Examination, Government of Kerala.

### B.Tech Lateral Entry

#### Admission Guidelines

Candidates have to qualify in the State Level Entrance Examination conducted by the Director of Technical Education, Government of Kerala. 50% of seats available for admission in Lateral Entry will be allotted by the Director of Technical Education and admission under the remaining 50% seats will be done by the Management.

#### Eligibility

- Candidates who have passed Diploma in Engineering awarded by the State Board of Technical Education or equivalent after undergoing a regular course of three years study in an approved institution are eligible for admission.
- Rank in the Lateral Entry Test (LET).

#### Short-listing criteria

- The rank list for admission to B.Tech Lateral Entry courses under the Management Quota will be based on the ranks obtained in the entrance examination conducted by the Director of Technical Education.

### M.Tech Courses

#### Admission Guidelines

Admissions are governed by the guidelines of the Commissioner of Entrance Examination, Government of Kerala and University of Calicut. 50% seats are reserved for Government allotment. The remaining 50% seats are filled up by the Management. Merit is the only criterion for selection.

#### Eligibility

- Eligibility will be in accordance with the rules and regulations of the University/ Director of Technical Education/AICTE.
- Should have passed B.Tech course in the respective branch or equivalent from an institution approved by AICTE.
  - The candidates shall have a B.Tech degree in the respective branch with minimum 55% aggregate marks.
  - Candidates who have passed AMIE/AMETE exam and satisfying the following conditions are also eligible:-  
They must have valid GATE score.  
A minimum 55% marks for section B in AMIE/AMETE exam  
A minimum 3 years of professional experience.

#### Short-listing criteria

Selection will be made based on GATE score. In case of tie, weightage will be given to marks of qualifying exams. In case sufficient qualified GATE candidates are not available the remaining seats will be filled up based on percentage of marks in qualifying exam.

### Master of Computer Applications (MCA)

#### Admission Guidelines

- Candidates have to qualify in the State Level Entrance Examination conducted by the Commissioner of Entrance Examinations or State Level/National Level Entrance Examination approved by Government of Kerala as equivalent 50% seats are set apart for allotment by the Government.
- Admissions under the remaining 50% seats are done by the Management. Merit is the sole criterion for selection.

#### Eligibility

- A Bachelor's Degree in any discipline of 3 year duration with Mathematics as one of the subjects with at least 50% marks and recognized by Calicut University.

#### Short-listing criteria

- Admission to the MCA program will be based on the ranks obtained in the entrance examination conducted by the Commissioner of Entrance Examinations, Government of Kerala.

### Doctoral Degree Programmes (Ph.D)

VAS is recognized as an approved research centre to have interaction with Anna University of Technology, Coimbatore for collaborative Research Programme in the areas of:

- Electrical and Electronics Engineering
- Computer Science and Engineering

Candidates may refer Anna University of Technology, Coimbatore regulations 2010 for admission criteria, eligibility etc. (Visit : [www.annauniv.ac.in](http://www.annauniv.ac.in))

### Study Abroad

Two years at VAS ; TWO YEARS ABROAD

There are no boundaries to the pursuit of knowledge at VAS. Through a strategic alliance with the State University of New York at New Paltz, VAS now offers a 'twinning program' for the students of EEE, ECE & CSE courses, who after completing their first two years at VAS can opt to continue their III & IVth year with the State University of New York and obtain a much sought after B.S Degree.

### Academic Programmes

VAS offers Undergraduate courses in B.Tech and Postgraduate courses in M.Tech and MCA, all affiliated to the University of Calicut and approved by AICTE.

#### Under-Graduate Courses

Engineering	Intake	Lateral Entry	Fee Waiver
Civil Engineering	60	6	3
Computer Science & Engineering	60	6	3
Electronics & Communication Engineering	120	12	6
Electrical & Electronics Engineering	60	6	3
Mechanical Engineering*	120	12	6
Production Engineering	60	6	3

#### Post - Graduate Courses

Post-Graduate Courses	Intake
Post-Graduate Courses	60
Master of Computer Applications (MCA)	24
M.Tech in Computer Science & Engineering*	24
M.Tech in Power Electronics*	

\*AICTE approved/University approval for additional seats awaited

#### NOTE:

- Admissions to the various courses are strictly on merit.
- Capitation fees or donations of any kind are not collected at the time of admission or during the course of studies.
- The college authorities or management have not authorized any person(s), consultants or agencies for admissions. All are requested not to fall prey to bogus consultants or middlemen.
- Disputes of any kind are subject to the jurisdiction of the Courts in Thrissur only.
- Candidates are also requested to visit the college website for further information.

[www.vidyaacademy.ac.in](http://www.vidyaacademy.ac.in)



# COMPUTER SCIENCE & ENGINEERING

The Department offers B.Tech, M.Tech and Ph.D degrees. The Department has a comprehensive curriculum on topics related to all aspects of Computer Hardware and Software with an emphasis on practical learning. The course structure is up-to-date and includes courses on nascent topics to equip students with the latest developments. The Department has state of the art infrastructure and computing equipment supported by high speed Internet and wireless networks. Various Student organisations like CSI Chapter, CSEA, Linux and FOSS Community are active throughout the year. Our faculty aims at delivering top class education blending their rich research experience with classroom teaching.

Anna University of Technology, Coimbatore has recognised the department of Computer Science and Engineering as its research centre for collaborative Research programmes.

## Department activities

- National conference "NCHIP 12" on Human Computer Interaction & Image Processing.
- Interactive activities such as Seminars, Workshops and industrial visits for the students.
- Distinguished Lecture Series by Eminent Scientists and Industrialists.
- Conducts National level technical symposiums like "Perizla", "Silverblaze" etc.



**Head of Department**  
**Prof. (Col.) M P Induchudan (Retd.)**  
ME, FITE, FIE, MCSI

## Research activities

The research activities in the department are carried out by the faculty and students in the fields of Computer networks, Natural Language Processing and Image Processing. In order to provide more support and to substantiate these activities, our department has taken initiative steps to accredit our department as research center under various prestigious universities.

## Highlights

- ▶ Microsoft – Campus Agreement Programme.
- ▶ VAS has developed a strategic alliance with the global giant IBM, by becoming a member institute in the IBM Rational Software University Relations Programme named Software Engineering for Educational Development (SEED).
- ▶ Infosys Campus Connect program conducting technical & soft skill development programme.
- ▶ Wipro - Mission 10x programme for faculty empowerment.
- ▶ Our students are placed in reputed IT companies like TCS, Infosys, Syntel, IBS, USTech., etc.



**Professor**  
**Dr. M. N. Agnisarman Nambodiri**  
Ph.D (Texas A & M University, U.S.A)



Material Testing Lab

# CIVIL ENGINEERING

- Civil Engineering is an all pervasive profession full of opportunities and challenges.
- With impressive infrastructure facilities and highly qualified faculty we are imparting in depth knowledge in the planning, design and construction of all types of structures needed for modern living.
- Some of the areas where we intend to do research are waste management, concrete technology, alternate building materials, stability of soil and studies of ecology and environmental protection.
- The department faculty are invited as resource persons for delivering lectures for programs conducted by IE, Nirmithi, COST Ford, PWD etc.
- The department is engaged in conducting short term courses for the benefit of Civil Engineers and take up consultancy works in water quality test, analysis and material testing.

**Lab facilities** - The Department has well equipped laboratories with modern instruments.

- **Material testing Lab:** The lab has facilities for testing Engineering materials.
- **Geo Technical Lab:** This lab houses the equipments for soil testing.



**Head of Department**  
**Prof. V. A. Sudhakaran**  
M.Tech. (IITK), FIE, MISTE, FUWA



**Professor**  
**Prof. K. V. Leela**  
M.Tech., MISTE, FIE

- **Environmental Engineering Lab:** This lab is equipped with sophisticated facilities for training students in water and waste water quality studies and management.
- **Survey Lab:** This lab has modern equipments including Total Station which are extensively used for training students.
- **Computer aided design center:** Modern computers of latest configurations with softwares like AutoCAD, Rivet, CostX etc.

## Highlights

- ▶ The department offers training programmes on software application courses like Auto CAD, Rivet, STADD, CostX etc. sponsored by KSCSTE.
- ▶ Conducts National Conferences on Recent Advances in Civil Engineering programmes at IIT, NIT,
- ▶ Many students have good GATE score and they are undergoing PG GEC etc. Our Students are among the toppers of Calicut University.



Advanced Computer Lab for Research & Development

# ELECTRICAL & ELECTRONICS ENGINEERING

The Department of Electrical and Electronics Engineering primarily focuses on information on energy conversion and transmission. The MTech programme conducted by the department also attracts both GATE scholars and ambitious students and teachers. The Department adds value to this accrued asset through an academic programme giving equal importance to theory classes and practical implementations. The supportive stream of curriculum contains Power and energy systems and analysis, analog and discrete control and computation, electrical machines and devices, electric circuit and system theory, signals and processing, electronics at the micro and power levels, modern techniques for measurements, instrumentation and estimation, etc. Most of the above topics are supported by practical classes or projects.



**Head of Department**  
**Dr. Sudha Balagopalan**  
M.Tech., Ph.D, MISTE, MIEEE



**Professor**  
**Dr. Sasidharan Sreedharan**  
M.Tech, Ph.D., MISTE

## Highlights of Department activities

- The EEE department of VAS is recognised as Research Centre by Anna University of Technology, Coimbatore for collaborative research activities.
- Institutional membership of IEEE, SEEM, ECS, IE(I), ISTE etc. are tapped to provide opportunities for the students.
- The Department conducts seminars, symposia and technical events in collaboration with industries and research institutions.
- The Department has conducted two highly acclaimed International Conferences graced by important personalities like Padmabhooshan Prof. Thomas Kailath and professors and researchers from more than 14 countries. The conferences attracted more than 150 contributed papers from IITs and NITs and good foreign universities. Also, there were 9 interdisciplinary workshops by experts from premium institutions and industry.
- The Department has obtained funding from AICTE, NBHM of DAE, CSIR, KSCSTE, ISTE, IEEE for the conferences and a student enterprise award from IEEE (US).
- Several industry-institute interaction programmes with Cochin Port Trust, TESM, Suvire Electricals, KSEB etc. are conducted to give industrial exposure to students. The objective for projects has been set to produce socially committed, competent and responsible technocrats of the raw students who appear on the rolls.
- Power Generation contest "Akshaya Agni" also received good media attention and accolades.



Digital & Communication Lab

# ELECTRONICS & COMMUNICATION ENGINEERING

The Department has an excellent academic and support staff committed to research and teaching and well equipped laboratories with the most modern facilities. Besides providing strong fundamentals in basic sciences and engineering subjects, greater emphasis is made to enable our students to specialize in the rapidly evolving technologies like VLSI and Embedded systems, Analog and Digital signal processing, Microwave and Mobile communication etc.

## Major Laboratories

- Analog Electronics Lab
- Digital & Communication Lab
- Advanced Communication Lab
- Microprocessor & Microcontroller Lab
- VLSI Lab
- Project Lab
- Research & Simulation Lab with latest versions of Xilinx software, Spartan controllers, Digital Storage Oscilloscope, etc. FPGA kits, OrCad, MATLAB, DSP

## Highlights of Department activities

- Institutional membership of IEEE, IE (I), IETE, ISTE, etc provides opportunities for the overall development of the students.

- Every year the department conducts National Conference (NCOCN), inter disciplinary workshops & training sessions, in which the academicians, research scholars, scientists and experts in industry share their knowledge, achievements, experience and perceptions.
- The Department received support from professional societies like IE (I), ISTE and IETE for conducting National Conference, seminars & workshops.

## Achievements

- ▶ Ms. Anjitha.V, student, ECE has secured third rank in Calicut University in the year 2011.
- ▶ Excellent placement records in TCS, NeST, Reliance Communications, Syntel, Sutherland Global Services, SunTech, ISRO, Infosys, IBM, Etisalat, Indian Army, Wipro Technologies & nationalized banks.
- ▶ Mr. Ramesh C.R, Asst. Professor has published a Lab Manual ("Electronic Circuits Lab Manual") for B.Tech course.



**Head of Department**  
**Prof. Beena A**  
M.Tech



**Professor**  
**Prof. P. C. John**  
M.Tech



Electrical Machines Lab



# PRODUCTION ENGINEERING

Production engineering is a combination of manufacturing technology with management science, where a production engineer deals with engineering practices and management challenges related to mass production. The programme includes study and practice of metal casting, joining processes, metal cutting and tool design, metrology, machine tools, machining systems, jigs and fixtures, die and mould design, automation, CADD/CAM, CIM, operation research, inventory control, quality control, mechatronics, robotics, supply chain management and all other management subjects related to such industries. This branch of study covers almost all areas of Mechanical Engineering except thermal power engineering and heat transfer. Production engineering course is having a compulsory industry based project work and this helps the students to have excellent industry interaction and training, prior to attending any interview. Placement opportunities are available in public and private sector manufacturing organizations, which are engaged in development and management of new production processes, computer controlled inspection, assembly and handling. It is to be noted that the four year production engineering subjects include major portions of MBA course for engineers, who seek managerial level jobs.



**Head of Department**  
**Prof. K. C. John**  
M.Sc.(Engg.), FIE, MISTE

### Laboratory facilities:

- 1) Advanced Manufacturing Lab
- 2) Metrology and Instrumentation Lab
- 3) Production Engineering Labs
- 4) Industrial Engineering Lab
- 5) CAD/CAM and Robotics Lab

### University Toppers



**Jerish. P.J** (2007-11)  
PE Branch I Rank



**Ambareesh. P** (2007-11)  
PE Branch IV Rank



Fluid Mechanics lab

# MECHANICAL ENGINEERING

The Mechanical Engineering Department of VAS is equipped with world class laboratories, infrastructure and well qualified faculty. It offers a platform for the young graduates to specialize further in emerging areas of Mechanical Engineering like robotics, design and systems, refrigeration, fluid mechanics, material science and finite element analysis. This will help them to seek employment in a wide range of firms including the Government sector, PSU, MNCs and other engineering giants based overseas.

The department is executing a project led by the principal Dr. S. P. Subramanian for which it receives a grant of Rs.8,00,000 from KSCSTE. The Mechanical Engineering Department organizes National Seminars twice a year named NAVISSANCE and a technical festival named MECHMERIZE.

The fully equipped and well organized laboratories owned by the Department are the Thermal lab, Production lab, Fluid mechanics lab, Heat and mass transfer lab, Metrology and instrumentation lab and CAD/ CAM lab. The CAD/ CAM lab is best among the other engineering colleges in Kerala with ultra modern CNCs, 6-axis robot and 10 work stations. CAD/ CAM lab uses software like the latest version of AUTODESK, INVENTOR 2011, PRO/E, WILD FIRE 3.0, CNC train simulation software and ANSYS.



**Head of Department**  
**Prof. Soolapani Varrier**  
M.Tech (IIT-M), MISTE

Production Engineering Lab



# MASTER OF COMPUTER APPLICATIONS

(Visit Department website: <http://mca.vidyaacademy.ac.in>)

The Department was established in the year 2006. Within a short span of six years the Department could establish itself as the best Computer Applications Department among all colleges affiliated to the University of Calicut. This is attested by the quality of students joining the College and also by the results in University Examinations. In popular rating based on the last ranks of students admitted under the General Merit quota in the MCA Entrance Examinations of Govt of Kerala, this Department is one of the top three Departments among all institutions in Kerala offering MCA programme.

## Highlights of Department activities

### IBM Software Centre of Excellence

The Computer Laboratory of the Department has been declared as the Software Lab of the IBM Software Centre of Excellence. This is a great recognition to the Lab with all state of the art computational facilities. VAST is the first institution under Calicut University to secure this distinction and the third College in Kerala State to have such a Centre.

### IBM Software Training

MCA students of Vidya get opportunities for training under IBM Certified Trainers in latest IBM softwares. There were two such training sessions for MCA students during the academic year 2010-11. The trainers were from Vinsys IT (Services), Pune.

### Competitive ambience

The Department provides several opportunities to acquire knowledge and to develop skills to excel in life and work. One such activity is an All-Kerala C Coding Contest, the second edition of which was completed in December 2011. The department organizes a unique contest to design the best website using Google-Sites every year to bring out the creative talent and the spirit of enquiry among the students. Paper presentations, seminars and presentation slides preparation contest are a few of the other similar activities designed by the department to attain the full potential of the students.

## Our 2009-11 batch MCA students with TCS



ANN MARY JOHN



BENITTA BABY



CHRISTINE JOSE K



HEMA V



NISHA SHUKOOR K



REJA C R



Chemistry Lab



Our Language Lab

**Head of Department**  
**Dr. V. N. Krishnachandran**  
M.Sc., Ph.D, MISTE



The Computer Laboratory of the Department has been declared as the Software Lab by the IBM Software Centre of Excellence.

## DEPARTMENT OF APPLIED SCIENCES

The department of Applied Sciences aims to provide a strong foundation in the fundamental sciences. Students of engineering are provided with the basic tools of analysis as well as the knowledge of the principles on which engineering is based. The department also strives to instill the scientific temper and the spirit of enquiry in students. It encourages the students to understand and therefore apply the physical laws to the development of their fields of study. The Department has well equipped laboratories for Physics and Chemistry.



**Head of Department**  
**Prof. C. N. Parvathy Antharjanam**  
M.Sc, MISTE

### Professors

**Dr. Mannil Mohan**  
Ph.D, Professor in Physics

**Dr. Sathesh S**  
Ph.D, Professor in Mathematics

## DEPARTMENT OF HUMANITIES

The study of humanities is aimed at not only the acquisition of English language skills and economic theories but the overall development of budding engineers as complete human beings capable of observing human values in all walks of life. The Department includes faculty in Economics and English and also a Language Lab.



**Head of Department**  
**Prof. M. Mohandas**  
M.A, M.D (AM)



**Employers look for many other qualities besides academic achievement. VAS students acquire a range of skills and experiences to compete most effectively. Exposure to teamwork, problem solving, leadership and communication skills are provided by encouraging the students to take up responsible positions.**

## Careers Transforming your future

VAS graduates have outstanding long-term career prospects and find success in all industries and sectors across the globe. Study at VAS is an investment in your career.

**Transferable skills**  
During your study at VAS, you develop a wide range of acquired skills through both your studies and social activities. These skills are required in a wide range of careers, and employers look for evidence of them in your CV and job application.

**Transferable skills that you're likely to acquire at VAS include:**

- Learning quickly
- Commitment and Ambition
- Good Organizational Skills and Flexibility
- Effective Communication
- Analysis and Attention to detail- Studying at VAS you learn to think logically, explore ideas and information systematically and find connections.
- Creativity and Problem solving- In your studies you're encouraged to develop your own new approaches to subject matter and find solutions to problems.
- Confidence- The tuition you receive through supervisions as well as the supportive learning environment here help you to develop your confidence, and to be articulate and decisive.

### Entrepreneurship Development

A training ground is provided to the budding entrepreneurs in order to sprout in them the seed of entrepreneurship and to hone their business skills by actively involving them in various live business projects brought in, started, encouraged, incubated and partnered by the department.

### Academia Industry Interface

Students of Vidya constantly interact with industry by varied forms of Summits, Guest Lecturers and Workshops. This facilitates the understanding of the changing corporate scenario among students to make them more dynamic and job oriented.

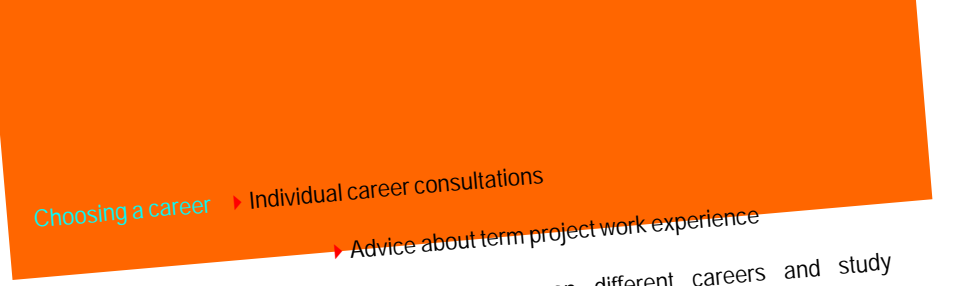
As a student at VAS you have access to excellent Career Service through our efficient Placement and Training Cell and a wide range of activities it offers.

### Placement Cell - Services



**Head of Placement & Training Cell**  
**Mr. Paul J. Chakola, MCA**

- Formerly
- Over 15 years of Software Industry experience for some of the leading companies like ICICI, 3i Infotech.
  - Project Manager with MASTEK Ltd., Mumbai.
  - Certified Project Management Professional.



Choosing a career -> Individual career consultations

- ▶ Advice about term project work experience
- ▶ Briefing sessions on different careers and study options to give you a flavour of what's involved in each.
- ▶ Several training sessions on employment related topics
- ▶ To design a good CV and how to face and succeed in interviews.

Choosing an Occupation

Finding Vacancies -> Online vacancy information provided.

- ▶ Email subscription service to regularly send you information, news and advice on your chosen career interests.

### What make companies recruit VAS students?

- VAS is consciously working towards a regime wherein industry's aspiration for recruiting plug and play kind of employees are met by imparting employability skills to the students.
- VAS students have strong conceptual foundations, capacity to work and exposure to real-life work situations.
- Many students are given live projects in the form of technical analysis, making new business plans, conducting surveys and new entrepreneurial activities.
- The vocational focus of many of the courses and industrial training help to develop the maturity and employability of students.
- Many students undergo in-house industry standard certification courses such as CCNA, DB2, Ethical Hacking and Six Sigma etc.



# Major Facilities & Centres

## Campus

- Over 30 acres of aesthetically landscaped lush green campus providing a serene ambience. Spacious fully Air Conditioned auditorium with excellent acoustics having a seating capacity of over 1500.
- World class standards in all wings of physical infrastructure.
- Banks with ATM, Departmental stores, Cafeteria.
- A food court built to the highest standards of hygiene.
- Transportation facility for staff and students to commute from various locations.

## Class Rooms and Laboratories

- 40 Class Rooms equipped with Audio-Visual Facilities.
- Over 35 laboratories equipped with state-of-art Equipments.
- Dedicated and qualified laboratory technicians and staff.
- Specialized laboratories established in several frontier thrust areas of Research and Development.
- Language Laboratory.

## Library

- Excellent Library facilities catering to needs of curriculum, research and general reading. Fully automated barcode facility for lending and digital catalogue. Access to online journals through AICTE and DELNET consortiums.
- Access to over 22,000 books, 104 periodicals and 1024 CD-ROMs, about 200 full text e-journals.
- An exclusive 2164 sq mt library block consisting of a digital knowledge centre with over 200 terminals is under construction.

## Computing

- Robust Networking solution & Wi-Fi campus with CISCO Devices.
- Powerful servers and workstations from HP/IBM for efficient data management.
- Highly sophisticated surveillance and access control system.

- High end biometric /online attendance.
- 4 IBM servers, 10 HP workstations.
- Dedicated and secured data centre with powerful rack servers.
- Over 650 terminals with latest Core 2 Duo, Dual Core and Quad Core computers.
- Internet facility with 24 Mbps.
- High end firewall security featured network.
- Comprehensive multi campus ERP system.

## Centres

- Recognized as an approved Research Centre to have interaction with Anna University, Coimbatore for collaborative Research programme in CSE and EEE.
- Recognized as PG Examination Centre by University of Calicut Programme Centre (IIPC).
- VAS IT Centre is recognized by Microsoft IT Academy, CISCO Networking Academy and Redhat GLS.

University of Technology,  
Centre for IGNOU-ISTE  
Academy and Redhat



**VAS Library** - A serene place ideal for self-learning and generating ideas

## Our fully equipped CAD/ CAM lab



# The Student Experience

## Life outside the lecture theatre

The institute provides a host of opportunities in academic, sports, cultural and organizational activities for students to gain experience and pursue their interests.

### Life at VAS

At VAS, strong emphasis is laid on academic, co-curricular and extra-curricular activities to ensure an all-round development of the students while providing multiple platforms to improve their soft skills, which are imperative for their excellence in their career.

### Accommodation: A home away from home

VAS has separate hostel blocks for boys and girls within the campus. Much more than just a hall of residence, your hostel is also where you'll do a lot of your studying and socialising. For the most, it provides experiences and friendships that will last a lifetime. Exclusive yoga and meditation sessions are provided for the inmates of our Ladies hostel.

### Sports for all levels

At VAS, you have a choice of sports for fun, health and serious competition. Many clubs have starter sessions at the beginning of the year for newcomers to know more. There are College teams in a diverse range of sports offering opportunities for novices and experts alike to compete in inter-college leagues.

Separate Department of Physical Education established to create awareness about sports and physical fitness.

- Expansive playground, state-of-the-art sporting infrastructure.
- Indoor shuttle badminton courts and Table tennis facilities.
- Modern well-equipped gymnasium.

### Student societies

College with its clubs and societies is trying things you've never had the chance to do before (and might never get the chance to do again). At VAS you can do almost anything at almost any level, from 'having a go' to semi-professional levels.

### List of such societies at VAS.

- Cultural and Sports Club
- Energy Conservation Cell

- Fossers culb (Free and open source software)
- Entrepreneurship Club
- Rotract Club
- Eco Club
- Toastmasters Club
- Music Club
- Dance Club
- National Service Scheme (NSS)

The student and faculty chapters of the following International and National professional societies have a major presence in the Institute:

- Institute of Electrical and Electronics Engineers (IEEE)
- Indian Society for Technical Education (ISTE)
- Computer Society of India (CSI)
- Institution of Electronics & Telecommunication Engineers (IETE)
- Institution of Engineers India (IEI)

## Vidya Student Support Cell (VSSC)

The College supports and value each of its students extensively. Therefore, students who are struggling with a particular problem or feeling a bit lost and lonely won't go unnoticed. Within your College you have a number of people looking out for your academic and personal welfare, and supporting you throughout your time in the campus.

### Tutors

College allocates you a Tutor, who will:

- Protect your interests
- Provide personal support
- Offer you specific personal advice when you are in need

### Security & Students Insurance

VAS provides maximum security for all its students, both within and outside the campus. Inside the campus all possible safety measures are adopted to ensure protection to the students. Apart from this, the College provides a unique insurance coverage called the 'Students Safety Insurance Policy' to all its students, under which the students are eligible to file an insurance claim in case of accidental death of their parents. The insurance company will financially support the student for his/her remaining period of study. This policy also covers the accidental death of the student also, in which case the parents can file a claim with the insurance company.

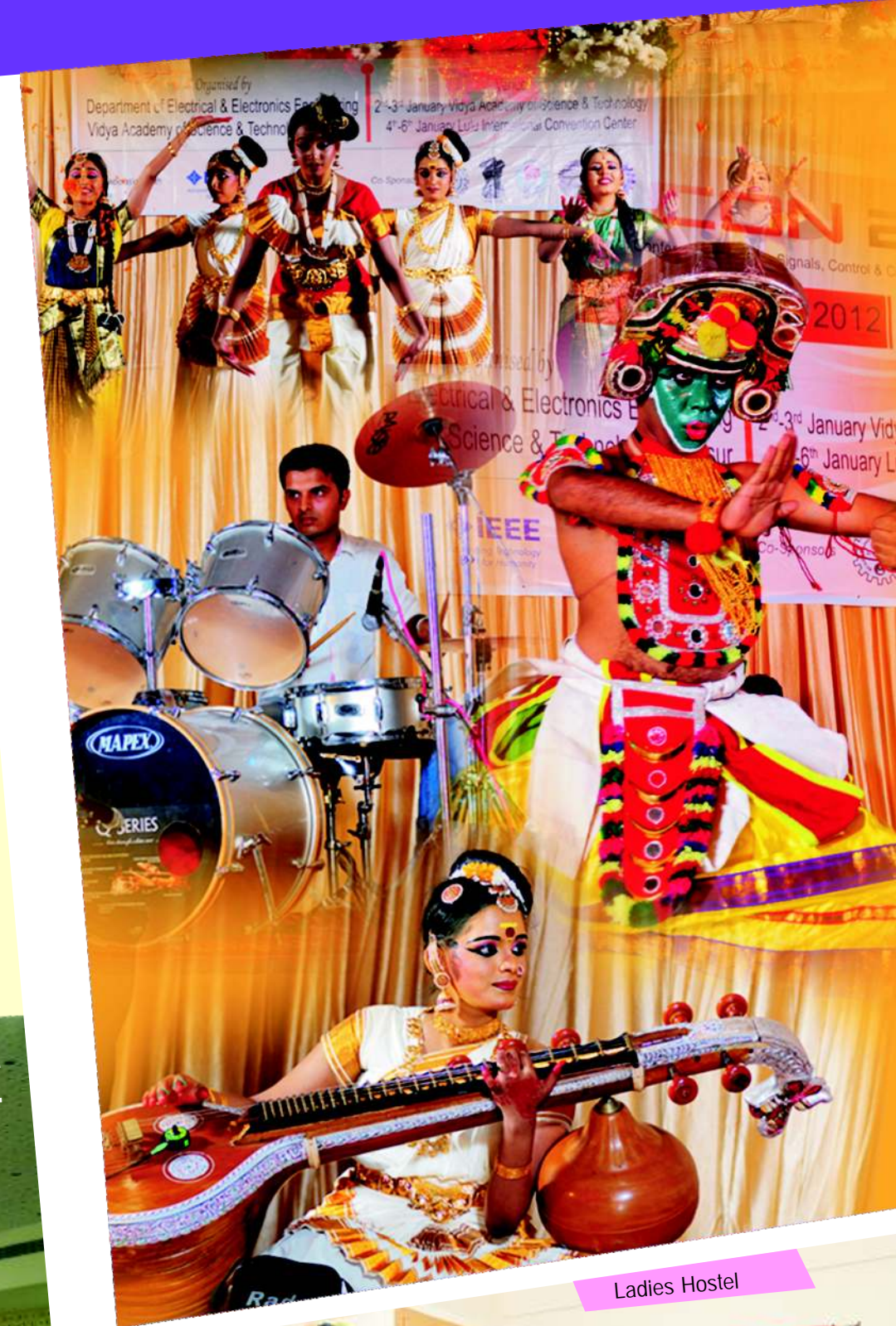
### Healthcare

At VAS we strongly believe in healthy living. We provide the facility of a visiting doctor to cater to the healthcare and well being of our students.

### Counseling

Personal, non-academic counseling is provided by a trained counsellor to help and motivate the students and to attend to their overall developmental needs which helps to maintain and enhance their psychological, emotional, and relational well-being.

Air Conditioned auditorium with excellent acoustics having a seating capacity of over 1500.



Ladies Hostel



# The 'VAS' Management

## Spreading its Wings

Inspired by a philanthropic urge and motivated by social concern, Vidya Academy of Science & Technology has been established by Vidya International Charitable Trust (VICT). The trustees are financially strong entrepreneurs, educationists and philanthropists committed to establish and develop the institute into a world-class education center.

VICT in its mission to propel higher education in backward regions of Kerala, is now setting up similar institutions in various parts of Kerala horizontally deploying the good practices and success of VAS. Vidya Academy of Science and Technology Technical Campus, Kilimanoor, the second engineering college of the Trust is fast coming up in a serene 18 acre campus at Kilimanoor, Trivandrum District. Admissions to this new college in Kilimanoor are slated to commence in 2012 and in Kannur by 2014. The Board of Trustees is responsible for the overall administration of the Trust and its activities. An Executive Committee, comprising 11 members, manages the educational institutions of the Trust.


VICT offers free education to bright but financially weaker students to complete their studies. Apart from scholarship enrolments, VICT also extends financial assistance to the economically weaker students studying in Higher Secondary levels for undergoing entrance coaching with leading training institutes in Thrissur, Alleppey, Kollam and Trivandrum districts.

### VIDYA INTERNATIONAL CHARITABLE TRUST (VICT)

#### Executive Committee

Er. P. K. Asokan	Chairman
Dr. V. S. Ajaikumar	Vice Chairman
Mr. Sabu Soumain	Secretary
Er. B. Sreekumar	Joint Secretary
Mr. Samson Checkove	Treasurer
Mr. K. K. Vidya Dharan	Executive Member
Er. K. G. Sukumaran	Executive Member
Er. K. K. Thilakan	Executive Member
Er. K. P. R. Vijayan	Executive Member

#### Steering Committee

	<b>Mr. T. N. Jayachandran, IAS (Retd.)</b> Chairman
Dr. V. M. Manoharan	Er. R. Devarajan Member
Vice Chairman	Mr. Suresh Lal Member
Er. G. Mohanachandran	Mr. D. P. Vijayan, VICT

# The 'VAS' Administration



**Er. G. Mohanachandran**  
Executive Director

Positions Held  
Deputy Chief Engineer, Kerala State Electricity Board



**Er. R. Devarajan**  
Director

Positions Held  
Chief Engineer, KSEB Abudhabi  
Senior Manager, EMCO.



**Mr. Suresh Lal**

Positions Held  
FVP - Operations, JP Morgan chase, Tokyo

VICT Co-ordinator

Mr. V. S. Dinamony



**Dr. S. P. Subramanian** M.Tech., Ph.D.  
Principal, VAS

30 Years of Experience in Teaching, Research and Administration



**Dr. P. Pratapachandran Nair** M.Tech, Ph.D.  
Professor Emeritus

Positions Held  
Joint Director of Technical Education, Kerala  
Principal, College of Engineering, Chengannur



**Dr. M. N. Agnisarman Namboodiri**, Ph.D.  
Dean - PG studies

Positions Held  
Professor, Bucknell University, Pennsylvania, USA  
Head, Dept. of Computer Applications, Govt. Engineering College, Thrissur

VAS Administrator

Lt. Col. (Retd.) C. K. Babu

## Social Responsibility of Vidya

As part of our social responsibility VAS caters to the developmental needs of various schools

St George High school, Puttekara



## Advisory Board

**Mr. P. M. Abraham, IAS (Retd.)**  
Former Secretary  
Ministry of Surface Transport, Govt. of India.

**Prof. Abdul Karim Musaffar**  
Professor, TKM Institute of Management,  
Member of TKM College Trust.

**Mr. P. V. Chandran**  
Managing Editor  
Malthrubhumi printing and publishing

company, Kerala.

**Mr. T. N. Jayachandran, IAS (Retd.)**  
Former Additional Chief Secretary,  
Govt. of Kerala &  
Former Vice-Chancellor,  
University of Calicut and CUSAT.

**Dr. V. M. Manoharan**  
Former Principal of Government Colleges of  
Thrissur & Chittur.

**Er. M. N. Prasad**  
Former Chairman,  
Railway Board of India and Ex officio Principal  
Secretary, Ministry of Railways, Govt. of India.

**Dr. K. R. Rajappan**  
Director and Senior Plastic Surgeon, Specialist  
Hospital, Kochi.

**Mr. A. R. Sankaranarayanan IAS (Retd.)**



Our Second Engineering College

Vidya Academy of Science & Technology Technical Campus  
Kilimanoor, Trivandrum

Our Expanding Horizons

