# Vision To be an organization with potential for excellence in engineering and management for the advancement of society and human kind.

Mission
To excel in academics,
practical engineering,
management and to
commence research
endeavors.
To prepare studentsfor
future opportunities.
To nurture students
with social and ethical
responsibilities.

## THE LEAD

Department of Humanities and Applied Sciences

**Newsletter** 

August 2023



## "You have to learn the rulesof the game. And then you have to play better thananyone else." – Albert Einstein.

#### **Department**

It is very well said "There is no such thing as a special category of science called Applied Science; there is science and its applications, which are related to one another as the fruit is related to the tree that has borne it." by Louis Pasteur. Humanities & Applied Sciences strives to build up a strong fundamental background concerning many natural phenomenon's' in application different disciplines of Engineering and caters to the needs of engineering students in their first year of the 4 years B.E. course in various branches. We at KCCEMSR, take pride in our dedicated team of faculty members.

The department is committed to adopt a

positive approach and provide flexible and innovative learning opportunities to students and enable them to build great careers confidently. Students are encouraged to participate in seminars, group discussions, quiz, extempore speeches etc. Department motivates all the faculty members to adopt the latest techniques in teaching and learning.

#### **Departmental Activities:**

Deeksharambh-2023: The InductionCeremony

The induction program called "Deeksharambh" allows the new students to adjust and feel

comfortable in the new ambience and blossom in their thirst for knowledge and development. It also helps to inculcate in them the ethos and culture of the institution. They form a bond with other students and faculty members. Keeping this in mind a 2day Induction Program - Deeksharambh 2023 was organized from 22 and 23 August 2023. It was organized exclusively for first of students all branches Information Technology, Computer Engineering and Electronics & Telecommunication.

The Program was inaugurated with welcoming of the dignitaries and all the first-year students. It was organized under the able guidance of our Chairperson Dr. Harsh Khanna, Managing Director Dr. Sai Kiran Khanna, Director Ms. Pushpa Narang, Chief Operating Officer Dr. Puja Rai Pradhan and Principal Dr. Vilas Nitnaware. As a culture of the institute, the National Anthem and University Anthem was played and sung by everyone.

The First-year Students were welcomed and made aware of the broad spectrum of engineering by our Principal Dr. Vilas Nitnaware and Chief Operating Officer Dr. Puja Rai Pradhan who motivated and encouraged the students for their new journey in engineering.

The next session began with the introduction of the code of conduct for students and attendance policy by A.P. Onkar Potadar.

TPO Session (SIP Module 3) was conducted by Dr. Ravi Prakash who shed light on training and placement activities and overall development of the students as per industry requirements.

After that IETE- Student forum session was engaged by Mr. Avinash Rajak and his team (student group from EXTC Department). His team briefed the importance of IETE forum especially for EXTC students and also for other branches.

After that Rotaract Club presentation was hosted by a student group under the guidance of Dr. Vaishali Gore was very well appreciated by students. They participated with a lot of fun and excitement.

The Departmental presentation was delivered by H.O.D., Dr. Shelley Oberoi for the department of Humanities and Applied Sciences. The students were made familiar with the department functioning and faculties of the department.

Presentation on Examination Pattern was delivered by A.P. Pournima Vadak. The session was interactive and appreciated by students.

The session on NSS Presentation (SIP Module 3) was hosted by A.P. Pratap Nair. Students of the

NSS team presented various activities of NSS in an interactive way.

The E-CELL Presentation (SIP Module 3) was hosted by A.P. Yogesh Karunakar, who gave an insight into the world of making

Entrepreneurs. Students were shown 3-D printed products. Students also were explained about startups and how to become entrepreneur by Prof. Yogesh Karunakar.

Next, Ms. Rashmi Joshi's Green Initiatives for Environmental Sustainability (SIP Module 9) was

a very interesting session. She ignited them with the Eco Awareness session and guided the students towards a right understanding of the importance of co-existing with the environment and their role as an engineer.

The students were engrossed and were eager to do activities suggested by the speaker.

The second-day (23/08/2023), started with Physical Health and Related Activities-Yoga (SIP Module 2) which was conducted by A.P. Dr. Pallavi Chopade.

Next, students were taken for campus rounds and shown the labs, classrooms, and various facilities.

After the yoga and campus round sessions, students were introduced to the Student Council of the institute. Core members of the student council presented various activities and events under the council. The students understood the importance of extracurricular activities along with core technical subjects.

Next, the presentation from Dr. Rajeev Iyer, HOD of EXTC Department was engaged. Students were informed about the department functioning, policies and career development activities.

Then a counseling session was arranged for students. Ms. Rajni Sharma, a professional counselor, explained about the importance of counseling during academic studies.

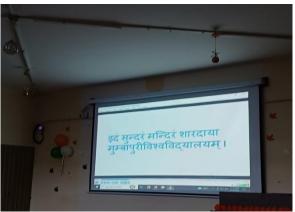
Then, the session was on library policies (SIP Module 3). This was followed by a presentation from the Library Department by Mr. Sunil Shinde, Librarian of the institute. He explained the students on library policies, functioning and benefits the students can avail from the institute library.

Post lunch session, students were shown a movie titled "Pursuit of Happiness". This was intended to know what happiness is and how to inculcate habits of doing stress free tasks during academics for the students.

It was with support of the College Management and active participation of all the faculty members and supporting staff that the induction program achieved its aim to welcome the first year students and guide them towards their journey of engineering.

























Photos of Deeksharambh – 2023-24

#### **Step into Engineering (2023-2024)**

Considering a long break since the HSC Exams, Student Induction Program (SIP) proved to be a fun filled educational activity and resource for their procrastinated educational goals.

Step into Engineering (2023-2024) was organized for the first year students from 08/08/23 to 14/08/2023.

The purpose was to make the engineering entrants adjust and feel comfortable in the new academic ambience.

This year we divided the induction into two phases. We called the first phase as Step into Engineering and the second phase was called as DEEKSHARAMBH.

The details of the activities under Step into Engineering are documented in this report.

In this phase I of SIP, the faculty of KCCEMSR actively engrossed themselves in training the students to generate their interest in technology and explain some basic fundamentals of Technical subjects.

As a culture of KCCEMSR, the inaugural ceremony started with playing of the National anthem and University Anthem. Then students were welcomed and introduced to the institute by the keynote address of our Principal Dr. Vilas Nitnaware. COO of the institute Dr. Puja Rai Pradhan briefed the students and guided them with her wonderful thoughts.

Later the students were dispersed to different labs and were asked to follow the time table for the entire days, depending on their branches. The students were divided into individual batches to ensure smooth conduction of all the technical sessions.

The following subjects were covered during the program. 1) AWS- Amazon Web Services by Dr. Rajiv Iyer

- 2) E-Cell by A.P. Yogesh Karunakar
- 3) Computer and Network Fundamentals (CNF) by Mr. Ravindra Patil and Mr. Shyam Mohan
- 4) Web Development by Mr. Rishabh Singh
- 5) Bridge Course on Engineering Mechanics (EM) by A. P. Akhtar Momin and A. P. Onkar Potadar
- 6) Bridge Course on Basic Electrical Engineering (BEE) by A. P. Riya Pal
- 7) Soft Skills Training by Ms. Deepika Singh.

The objective of these sessions was to underline the importance and establish connectivity with various branches of engineering. Also to explore the fun quotient involved there in.

All the sessions were interactive and students were able to connect their basic knowledge to real life scenarios and technology demands. Based on the student performance and feedback, it was clear that students could develop basic cognitive level in order to begin their journey in core technical subjects. They got to know overall understanding of AWS, Web Development, web development, CNF Soft Skills and basic requirements for EM and BEE subjects. With this we concluded Step

into Engineering 2023-24 successfully with support of the college management and active participation of all the faculty members and supporting staff.



















Photos of Step into Engineering

#### Our Heritage: Beyond India

On 17<sup>th</sup> October, 2023, a Universal Human Values session was conducted by KCCMSR for first-year engineering students on the topic of "Our Heritage Beyond India". The session aimed to help students reflect on the concept of integration of our rich heritage into technical education and gain a deeper understanding of its meaning, as well as explore the relationship between our culture, spiritual science, and modern education system. The event commenced with the resonating notes of the national anthem, symbolising unity in diversity.

The audience witnessed a solemn and auspicious moment as the lamps of Goddess Saraswati were ceremoniously lit, invoking blessings for knowledge and wisdom. Shri Kamal Lochan Das Prabhuji, the esteemed chief guest, delivered an enlightening and thought-provoking speech on the integration of Indian culture in technical education, capturing the essence of the event's theme. Shri Kamal Lochan Das Prabhuji's discourse shed light on the profound relevance of Indian culture in the realm of technical education, emphasising the importance of blending ancient wisdom with modern knowledge. The event instilled a sense of pride and commitment among the participants to preserve and integrate their cultural heritage into their educational pursuits, fostering holistic growth. The "Guest Lecture on 'Our Heritage—Beyond India'" provided an enriching experience, emphasising the importance of cultural integration in technical education for FE students. The wisdom imparted by Shri Kamal Lochan Das Prabhuji has left a lasting impact, inspiring a commitment to preserve and integrate our heritage.

















Photos of Our Heritage: Beyond India

A Brief Report on the Guest Lecture

ABSTRACT: Department of Humanities and Applied Sciences organized Guest Lecture on 16/09/2023 for the subject Engineering Physics I of SEM I from 2.00 PM to 4.00 PM in Guru Gobind Singh Auditorium, 3<sup>rd</sup> floor as a part of the activity of teaching and learning.

The guest speaker of Engineering Physics I, Mr. Brijesh Gangwar who is Research Scholar at IIT Bombay established research-grade lab in rigorous scientific exploration. Mr.Brijesh Gangwar has delivered the session on 'Superconductors and Supercapacitors'. First of all speaker focused on the basics terms involved in the superconductivity and then types and applications of superconductors. In the

recent applications, speaker also discussed about 'MAGLEV', fastest train in the world. With innovative slides in the presentation students understood the recent trends related to superconductors. Students got the benefit from this session. After the session, time was given to the students to interact with the speaker.

The event was very successful with huge response of the students.





## BEE Expert Lecture of "Electrical Machines" by A.P. Yogesh Karunakar.

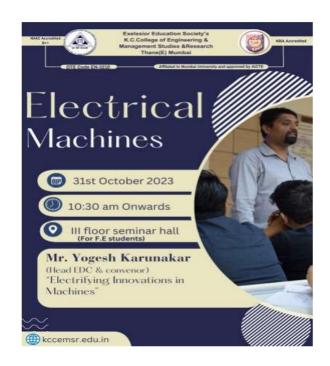
Department of Humanities and Applied Sciences organized BEE Expert Lecture on 31/10/2023 for the subject Basic Electrical Engineering for First Year Engineering students from 10.30 AM to 1.00 PM in Guru

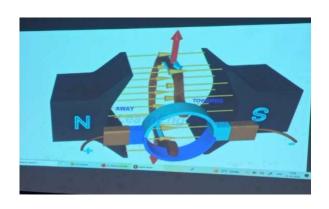
Gobind Singh Auditorium, 3<sup>rd</sup> floor as a part of the activity of teaching and learning.

The guest speaker is A.P. Yogesh Karunakar (Head EDC & Convenor), Electrical Machines: Rotating magnetic field produced by three phase ac, principle of operation of Three-phase induction motor, constructional details and classification of Induction machines.

Principle of operation of Single phase induction motors, stepper motor (single stack variable reluctance and permanent magnet)

Principle of operation of DC generators and DC motors, constructional details and classification of DC generators and DC motors, constructional details and classification of DC machines, e.m.f equation of generator/motor, applications











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#### **Departmental Activities:**

### Report on Workshop "How to create a strong LinkedIn Profile" for first year students:

Creating a strong LinkedIn profile is a foundational step for first-year engineering students to establish their professional identity and build connections within the engineering community. The facilitator-presenter was introduced and the aim of the workshop was given by Asst. Prof. Sheena Unmesh. Thus as a part of Content beyond Syllabus criterion, a workshop undertaken by Asst. Prof. Onkar Potadar exclusively for first year students on first April 2024. With the help of Power point presentation, Asst. Prof. Onkar explained first year students the basics of LinkedIn Profile. The need and importance of starting to prepare the profile right in first year of Degree College was explained to students. Various aspects associated to LinkedIn profile like establishing a professional presence, showcasing technical skills and crafting a compelling summary was explained to students in lucid language and numerous examples. Nearly 130 students participated in the workshop and appreciated the efforts taken by the

expert and faculty. The session was interactive by the presenter. Students cleared their doubts by directly interacting with the presenter. The programme concluded with Vote of thanks by Asst. Prof. Dr. Tanvi Pokhare.





Photo of seminar of how to build a strong linkedin profile?

#### **NEP 2020:- Promotes Financial Literacy And Awareness:**

The IQAC Committee of the K. C. College of Engineering and Management Studies and Research, in association with the Board of Industry-Academia Partnerships (BIAP), conducted an awareness session on financial literacy. BIAP is an organization that strives to create a platform to promote and enhance the collective potential of college students, educational institutes, and corporate organizations and strives to bridge the gap between industry and academia. The program began with a welcome and felicitation from the guest speaker and college dignitaries. Dr. Vani Kamath, a finance-subject faculty member certified SEBI Smart Trainer, led the awareness session on March 28, 2024. Staff members were the target audience for the session. She explained the basics of investment with lucid explanations and examples. She also elaborated on the mechanisms of financial terms like SIP, mutual funds, and equity markets. The session was interactive, with active participation from staff members. The programme concluded with a vote of thanks.

#### **Expert lecture on UHV:**

The Humanities and Applied Sciences Department organized the Universal Human Values (UHV) session. The session took place on January 5 and 8, 2024. We organized the A and B divisions on January 5th, and the C and D divisions on January 8th, 2024. The Chief Operating Officer of the Excelsior Education Society, Dr. Puja Rai Pradhan, delivered her expert talk on the topic. She introduced the talk with reference to the recent movie '12th Fail' and real-life examples of students passionate about cracking UPSC and connected the exams, topic mythological characters from the Hindu epic Mahabharta. She kept the session interactive by soliciting input from the students, thereby engaging them in the topic. She used mythological stories to explain how human emotions such as greed, jealousy, and poor decision-making contribute social destructive. Students showed appreciation through their active participation expressed their desire for more such programs. ms. These values are not only necessary for being good human beings but also for having a better and more positive working environment with motivating and supportive relationships. Universal human values play an important role in the lives of humans at various stages, including their homes, education, and careers.





Photo of expert lecture on UHV

#### **Science Day Report:**

The Department of Humanities and Sciences (HAS) at K.C. College of Engineering and Management Studies & Research organised a vibrant and engaging celebration in honour of National Science Day on March 15, 2024. Students organized the event with the goal of encouraging a scientific mindset and deepening their understanding of science. The celebration featured a range of activities, including a poster presentation competition, a PowerPoint (PPT) presentation, a quiz, and debate.



#### Quiz:

The day began with invoking Goddess Saraswati's blessings, followed by a highly anticipated event, the quiz, which tested participants' knowledge of science and its applications. We designed the questions to test students' comprehension of scientific concepts and underscore the significance of scientific literacy in today's world. The quiz created an atmosphere of friendly competition and enthusiasm among the participants.



#### **Photo of Quiz**

#### **Poster Presentation Competition:**

The students showcased their creativity and scientific acumen in a poster presentation competition. The posters covered a wide array of topics, ranging from recent scientific advancements to environmental conservation. Participants effectively communicated complex scientific concepts through visually appealing designs and concise explanations.



#### Photo of Poster Presentation Competition.

#### **PPT Presentation:**

Following the poster presentation, students delivered PowerPoint presentations various scientific topics. FE 'B' made a presentation on 'Vedic Maths'. intention was to create awareness of Vedic mathematics that existed thousands of years ago. They conveyed the message that the discovery of contemporary theorems and mathematical concepts occurred 1,000 years ago, significantly predating the fame they gained from Europeans and Greeks. FE 'D' delivered a presentation that focused on 'Hacking Attacks' and 'Prevention' strategies. The presentations were informative and well-researched, reflecting the students' dedication to understanding and communicating scientific principles. Topics included recent discoveries, technological innovations, and their impact on society.





#### **Photo of PPT Presentation**

#### **Debate:**

The day concluded with a lively debate on the topics "Should online platforms and apps replace traditional textbooks in mathematical education?" "Are EVs better than traditional fuel vehicles?" and "Is carbon pricing an effective strategy to reduce greenhouse gas emissions'?" Participants engaged in a thought-provoking discussion, presenting arguments for and against the motion. The debate provided a platform for students to

articulate their views on the ethical implications of scientific advancements and the responsibility of scientists towards society and the environment.

#### Report on Namo Nav Matdata Sammelan

On the occasion of National Voter's Day, K.C. College of Engineering & Management organized a live telecast of honorable Prime Minister Shri Narendra Modi on January 25, 2024, in the seminar hall of the college. It was organized specially for first- and second-year students, who are going to be first-time voters in the coming elections. At the commencement of the program, the college principal, Dr. Vilas Nitnaware, greeted the local representatives, Mr. Bharat Chavan and his team, with a floral token of welcome. The program started with the national anthem and was attended largely by first-year engineering students. Prime Minister Narendra Modi virtually addressed first-time voters across the country on National Voters; Day and was named NaMO Nav Madata Sammelan. He urged new voters to defeat family-run parties with the power of their vote and emphasized India's progress and potential to become one of the top three economies in the world. He brought to notice that in present times, people talk about credibility, not corruption; success stories, and not scams. Earlier, India was on the list of the five fragile economies. However, now Bharat is the fifth-largest economy in the

world. Also, in the coming years, India will become one of the top three economies in the world. Furthermore, he urged first-time voters to become an important part of the democratic system as their names have been registered on the voter list. It is a he occasion of National Voters' Day, K.C. College of Engineering & Management organized a live telecast of honorable Prime Minister Shri Narendra Modi on January 25, 2024, in the seminar hall of the college. It was organized specially for firstand second-year students, who are going to be first-time voters in the coming elections. At the commencement of the program, the college principal, Dr. Vilas Nitnaware, greeted the local representatives, Mr. Bharat Chavan and his team, with a floral token of welcome. The program started with the national anthem and was attended largely by first-year engineering students. Prime Minister Narendra Modi virtually addressed first-time voters across the country on National Voters; Day and was named NaMO Nav Madata Sammelan. He urged new voters to defeat family-run parties with the power of their vote and emphasized India's progress and potential to become one of the top three economies in the world. He brought to notice that in present times, people talk about credibility, not corruption; success stories, and not scams. Earlier, India was on the list of the five fragile economies. However, now Bharat is the fifth-largest economy in the world. Also, in the coming years, India will become one of the top three economies in the world. Furthermore, he urged first-time voters to become an important part of the democratic

system as their names have been registered on the voter list. It is a time when the country is going through its 'Amrit Kaal'. that they have enrolled their names for casting their valuable votes. He also stressed that first-time voters have the responsibility of building a developed India by 2047. They all have a great opportunity to decide how they can get your names etched with golden letters in a developed India. PM Modi stressed the importance of the vote and said, "Your one vote has a very big power," also adding, "Friends, when there is a stable and full majority government in the country, then the nation big decisions." The NSS take Volunteers coordinated the arrangement of the program along with the faculty members of the Humanities and Applied Sciences Department.

#### **FACULTY ACHIEVEMENTS**

Research Publications/ Workshops /STTPs/FDPs/ Seminars Attended

#### Dr. Vaishali Gore:

- Attended the online one-week short-term training program on "Research Publication, Copyright, and Patents in Science and Technology"/ 3<sup>rd</sup> July to 7<sup>th</sup> July, 2023.
- Successfully completed the course Outcome-Based Pedagogic Principles for Effective Teaching/ Feb and Mar 2024.

 Successfully completed the course NBA Accreditation and Teaching-Learning in Engineering. / Jan-April 2024.

#### A.P. Swati Panvalkar

- Attended the online one-week shortterm training program on "Research Publication, Copyright, and Patents in Science and Technology"/ 3<sup>th</sup> July to 7<sup>th</sup> July, 2023.
- Successfully completed the course Outcome-Based Pedagogic Principles for Effective Teaching/ Feb and March 2024.

#### Dr. Pallavi chopade

- Attended the online one-week shortterm training program on "Research Publication, Copyright, and Patents in Science and Technology"/ 3<sup>th</sup> July to 7<sup>th</sup> July, 2023.
- Successfully completed the course Outcome-Based Pedagogic Principles for Effective Teaching/ Feb and March 2024.
- Participated in international faculty development program on "Applications of Mathematics in Various Fields with Innovative Approaches"/ 21st Nov to 25th Nov, 2023.

#### A.P. Onkar Potadar

- Participated and successfully completed faculty development program on "Empowering Mobility:
   The Role of Power Electronics in EV Development and Interfacing of IC Engines and EVs," / 18th March to 20th March, 2024.
- Participated in the National Faculty
   Development Program on Data
   Analytics using Power BI and
   Tablea / 11<sup>st</sup> March to 15<sup>th</sup> March,

   2024.
- Participated in the National Faculty
   Development Program on Deep
   Learning and Artificial Intelligence
   from 26<sup>th</sup> Feb to 1<sup>st</sup> March, 2024.
- Successfully participating in a faculty development program on data science./ 1<sup>st</sup> March to 7<sup>th</sup> March 2024.

#### A. P. Akhtarhusen Momin

- Participated in the National Faculty
   Development Program on Data
   Analytics using Power BI and
   Tableau/ 11<sup>th</sup> March to 15<sup>th</sup> March,

   2024.
- Participated in and successfully completed the faculty development program on "Empowering Mobility: The Role of Power Electronics in EV Development and Interfacing of

- IC Engine and EV"/ 18th March to 20th March, 2024.
- Successfully participating in a faculty development program on data science./1st march to 7th march, 2024.
- Participated in an online faculty development program on "Advance in Materials Technology for Next-Generation Manufacturing. /1st feb to 5th feb 2024.
- Participated and successfully completed a faculty development program on induction training/ 18<sup>th</sup> Sep to 29<sup>th</sup> Sep 24.
- Participated in and successfully completed a national-level faculty development program on cloud infrastructure (AWS)/ 21<sup>st</sup> Aug to 25<sup>th</sup> Aug, 2023.

#### A.P. Bhuma Devi

 Successfully completed the course Outcome-Based Pedagogic Principles for Effective Teaching/ Feb and March 2024.

#### A.P. Deblina Ghosh

- Successfully completed the course Outcome-Based Pedagogic Principles for Effective Teaching/ Feb and March 2024.
- Successfully completed the course in Financial Mathematics from Jan to April 2024.