



### AGRICULTURAL ENGINEERING

## **NEWSLETTER 2023-2024**

**VOLUME 3 (JANUARY- MARCH)** 

# EXCEL ENGINEERING COLLEGE (AUTONOMOUS)

Approved by AICTE, New Delhi & Affiliated to Anna University, Chennai Accredited by NBA (AERO, CSE, ECE & MECH), NAAC with "A+" and Recognised by UGC (2f &128)

KOMARAPALAYAM

#### DEPARTMENT VISION MISSION

#### **VISION**

To be a global leader in Agricultural Engineering, pioneering innovative solutions, fostering creativity and inspiring lifelong learning, all while embracing social responsibility to enhance agricultural sustainability and nourish the world.

#### **MISSION**

- I.Provide an exceptional teaching and learning experience that integrates Experimental learning with practicalskills and knowledge in agriculture engineering.
- 2. Advance cutting-edge research and comprehensive training, stringing to be at the forefront of innovations and knowledge dissemination in our field.
- 3. Emphasis on skill development, value addition and hand-on field work, to make students academically proficient.
- 4. Foster technological advancements and create abundant career opportunities, to ensure graduates arc well prepared for successful careers and become industry leaders.

#### PROGRAMME EDUCATIONAL OBJECTIVES

- Graduates will demonstrate comprehensive technical proficiency as agricultural engineers, applying knowledge and skills to design, implement, and manage innovative agricultural systems effectively
- Graduates will cultivate an entrepreneurial mindset, showcasing the ability to identify, evaluate, and implement sustainable agricultural solutions, contributing to the growth and viability of agricultural enterprises.
- Graduates will champion sustainable development in agriculture by integrating environmentally
  conscious practices, promoting resource efficiency, and engaging in initiatives that address the
  socio-economic needs of communities
- Graduates will embrace a culture of creative learning, continuously adapting to emerging technologies and contributing to the advancement of agricultural sciences. Furthermore, they will actively serve society by applying their expertise to address agricultural challenges and promote community well-being.

#### PROGRAMME SPECIFIC OUTCOMES

- PSOI: To develop the skills in the field of Agriculture Engineering to become well versed in farm Mechanization, Food and Dairy Processing, Soil and Water Conservation, Bio Energy and IoT in Agriculture.
- PS02: To imbibe the skills on supervising, coordinating, guiding, leading and decision making in the minds of Agriculture Engineering students for completing crop production projects in time

#### **MESSAGES**

#### **CHAIRMAN'S MESSAGE**



Prof.Dr.A.K.NATESAN

Agricultural Engineering is one of the essential branches of Engineering which demands innovation. With the rapid advancement of technology, Agricultural Engineering is becoming more important to tackle challenges in the global food market. The future of Agricultural Engineering is to integrate technology with biology and the social aspects of agriculture to create sustainable environment. I congratulate the Department of Agricultural Engineering for their initiatives to introduce department newsletter and also I wish the students to shine in their career.

#### VICE CHAIRMAN'S MESSAGE



**DR. N. MATHAN** Department of Agric **KARTHICK, M.B.B.S.**, department newsletter. **M.H.SC.** (**DIABETOLOGY**), **AKS** 

Agricultural engineers' main role is to solve problems found in agricultural production. Goals may include designing safer equipment for food processing. Agricultural engineers must creatively apply the principles of engineering. Agricultural engineer solve problems concerning power supplies, machine efficiency, the use of structures and facilities, pollution and environmental issues, and the storage and processing of agricultural products. I congratulate the Department of Agricultural Engineering for their initiatives to introduce department newsletter.



DR. K. BOMMANNA RA.JA, PH.D.



DR.K.P.VISHALAKSHI, M.E., PH.O.,

Agricultural Engineering is highly job oriented discipline especially in India where agriculture plays a major role in the economy of the country. I congratulate all the students and faculty members in publishing the department newsletter portraying the academic activities, student and faculty participation and achievements.

The Department of Agriculture Engineering started during the Academic Year 2018-19 with an intake of 60 students. We have well established laboratories, well qualified and multi-disciplinary faculty members from various specializations such as Soil and Water Conservation Engineering, Farm Machinery and Power, Bio Energy Resources and ToT in Agriculture, Agricultural Process Engineering, Food and Dairy Engineering, Water Resources Engineering. Since agriculture started from ancient period, nowadays modern methods are being used. Also it requires much contribution from engineers to improve the economic wellbeing of the farmers through efficient mechanization. We are proud to create the entrepreneurs in agriculture field. I congratulate all the students also members of GRAES association to launch the newsletter for the Academic year 2022-2023.

#### DEPARTMENT EVENTS

#### "Celebration of Gandhi Jayanthi"

Department of Agriculture Engineering, Excel Engineering College (Autonomous) has organized off day Activity for "Celebration of Gandhi Jayanthi" on 02.10.2023.

This program celebration inter college faculty & status only. From Excel Engineering College, Komarapalayam, Namakkal has celebration on Celebration of Gandhi Jayanthi to our Agricultural Engineering students.

Benefitted Participants are 60 students and 3 faculty members.

Mahatma Gandhi, also known as Mohandas Karamchand Gandhi, was born on October 2, 1869, and died on January 30, 1948. He was a political and spiritual leader in India and played a key role in the Indian independence movement. Gandhi developed the novel technique of non-violent agitation, which he called "Satyagraha", loosely translated as "moral domination".



#### **DEPARTMENT EVENTS**

#### "World Environmental Health Day 2023"

Department of Agriculture Engineering, Excel Engineering College (Autonomous) has organized off day Activity for "World Environmental Health Day 2023" on 26.09.2023.

This program organized by Mr.v.Bharath Assistant professor, Agricultural Engineering, internal faculty in this activity on World Environmental Health Day 2023 to our Agricultural Engineering students.

Environmental health is one of the largest fields within public health because of the myriad ways external forces can impact how people eat, live, and grow. These forces can be about addressing our natural environment (as in the case for clean water or sanitation), but they can also be the consequence of human beings' actions. According to World Health Organisation (2016), global environmental issues account for more than 12.6 million deaths each year.

Along with the issues mentioned, include soil pollution, ultraviolet radiation, and biodiversity loss. According to the data, more than 100 illnesses and injuries can be directly linked to environmental health concerns. Often, these issues have the greatest impact on communities that are poor and already have significant health care vulnerabilities.

Benefitted Participants are 55 students and 3 faculty members



#### DEPARTMENT EVENTS

#### "Recent Trends in Water Resources Development in India"

Department of Agriculture Engineering, Excel Engineering College (Autonomous) has organized off day seminar on "Water Resources Development in India" on 10.07.2023.

Chief guest Mrs.P.Dhivya Agricultural Officer Mobile Soil Testing Laboratory External Faculty has Delivered on Recent Trends in Water Resources Development in India to our Agricultural Engineering students.

Benefitted Participants are 55 students and 3 faculty members.

Water is essential to the popular occupation of agriculture in India. Farmers are unable to produce crops in the absence of water. The drought in 2019 even destroyed the supplementary crops in addition to the winter crops. The scarcity of water has rendered a lot of valuable farmland in India completely useless and much of the farming industry in these regions has ceased to operate.

In 2016, the city of Latur witnessed mass unemployment, where about half of its workforce was threatened to be unemployed as the agricultural industry struggled. Much of the local economy and farming regions nearly collapsed as the citizens were left with no choice but to use the polluted water.

