



Modern Education Society's College of Engineering, Pune- 411001

Accredited by NBA and NAAC with A++ grade.

Department of Mechanical Engineering

In Association with



International Symposium & Workshop [Virtual]

on

“EV Technology and Battery Modelling”

28/02/2023 to 05/03/2023

Organizing Secretary

Dr. Amit R. Patil (9326273960)
arpatil@mescoepune.org

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Mr. Sushant S. Jadhav (9881507955)

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- Mrs. A. A. Kulkarni

Highlight of the Event

- Resource person from IITs/ Industries / International universities
- Live Case Studies
- Demonstration of Simulation software like MATLAB, ANSYS

Objectives

- Learner will know EV technology and its role in automotive ecosystem
- Participant will understand battery technology and modeling using SimScape
- Participant will know thermal management of battery pack

Topic to be covered

- Introduction of EV technology and its role in automotive ecosystem
- Battery technology and modeling
- Thermal management of battery pack

Target Audience

UG/PG/PhD Scholars, Faculty, Persons from industries.

Last date of registration: 27/02/2023

Registration

<https://tinyurl.com/5yy94bjp>



Indian : ₹500/- International: \$30/-

About MESCOE:

Modern Education Society was established in 1932, with motto "**FOR THE SPREAD OF LIGHT**".

The Modern Education Society's College of Engineering, Pune was established in 1999 and runs the following programs leading to Bachelor's Degree in Engineering & Master Degree in Engineering.

Undergraduate Programme :

Computer Engineering	:180
Mechanical Engineering	:120
E & Tc Engineering	:120
Auto and Robotics Engineering	: 60

Post Graduate Courses :

Mechanical Engineering Design	:24
Signal Processing	:12
Computer Engineering	:12

Vision:

To Groom - Motivated, Environment friendly, Self-esteemed, Creative and Oriented Engineers.

Mission :

To Develop Industry Oriented Manpower to accept the challenges of Globalization by,

- Promoting Value Education through motivated trained faculty
- Maintaining conducive environment for education at affordable cost
- Promoting Industry Institute interaction
- involving alumni.

About the Department:

Established in the year 1999, the Mechanical Engineering department of MES College of Engineering, Pune with its team of dedicated, qualified and experienced faculty, offers a sound programme at both UG which is accredited by NBA. The department aims at providing a valuable resource not only to the industries but also the society through excellence in technical education and research. To inculcate and foster Research abilities of students through staff, department always encourages departmental faculty for externally funded projects by Govt. agencies like BARC, BCUD, University of Pune, etc. and by leading industries in and around Pune. Mechanical Department had exclusively signed MoU with industries for collaborative research work as well as development of laboratories, etc. for overall development of its students and departmental faculty. The latest 3D Printing Lab developed under AICTE MODROB and Industrial Tribology labs scheme along with other lab to provide state of are facility in additive manufacturing along with other labs to both student and faculty. The Department take proactive interest in organising different Workshop/FDP/STTP for exchange of knowledge about recent developments.

Centre of Excellence Lab:

- NI LabVIEW Lab
- Industrial Tribology Lab
- 3- D Printing Lab
- Advance Manufacturing & Robotics Lab
- Baker MESCOE MQC Lab

Schedule of Workshop

Tuesday, 28/02/2023

Session I	Inauguration Session
Session II	New Mobility and New Energy perspective in India

Wednesday, 01/03/2023

Session I	Overview of Li-Ion Battery chemistry
Session II	Hybrid Vehicle System Architecture Modelling

Thursday, 02/03/2023

Session I	Modelling of eV Battery using SimScape
Session II	Testing of Electric Vehicle & Component

Friday, 03/03/2023

Session I	HEV and Its Architecture
Session II	Motors for Electric Vehicles

Saturday, 04/03/2023

Session I	Electro-Thermal Modeling of Electric Vehicles
Session II	Battery Modeling and Parameter Estimation for Electric Vehicle Applications

Sunday, 05/03/2023

Session I	Lithium-ion Battery Thermal Management System
Session II	Thermal Simulation of eV Batteries using CFD

Valedictory Function



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(Wadia College Campus)**

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Mechanical Engineering Department

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International Symposium & Workshop [Virtual]

on

“EV Technology and Battery Modelling”

February 28 to March 05, 2023

Speakers



Chandrasekhar Chincholkar

Director, Customized Energy Solutions Pvt. Ltd, India



Jill Pestana

North America Battery Lead
Accenture, US



K. L. Bhamidipati, Ph.D

Electrification Leader,
Ex GM and GE Employer, US



Shaunak Khot

CFD Engineer
Capgemini Engineering,
France



M Janartan Mazhubalan

Director, JV Skill Training
Centre, Malaysia



Saptarshi Basak, Ph.D.

Centre for Automotive
Research & Tribology (CART),
IIT, Delhi, India



W. R. Calderón Muñoz, Ph.D.

Chairman, MED, Universidad
de Chile, Santiago, Chile



Sree Varshini

Automotive Application
Engineer, MathWorks, India



Debanand Singdeo, Ph.D.

Senior Engineer,
MathWorks, India



Adinath M. Funde, Ph.D.

Centre for Energy Studies,
SPPU, India



Bansilal Bairwa, Ph.D.

School of Elect. and Electro.
Engineering, REVA University,
India



Vijay D. Walunjkar

Managing Director, Inspired
E-Mobility solutions, India

Date	Time	Speaker	Topic
28-02-2023	9.30AM - 12.00PM	Inauguration Ceremony	
	2.00PM - 04.30PM	Mr. C. Chincholkar	Keynote Session on New Mobility and New Energy perspective in India
01-03-2023	9.30AM - 12.00PM	Ms. Jill Pressena	Overview of Li-Ion Battery chemistry
	2.00PM - 04.30PM	Ms. Sree Varshini	Hybrid Vehicle System Architecture Modelling
02-03-2023	9.30AM - 12.00PM	Dr. Deb Singdeo	Modelling of eV Battery using SimScape
	2.00PM - 04.30PM	Mr. V. D. Walunjkar	Testing of Electric Vehicle & Component
03-03-2023	9.30AM - 12.00PM	Mr. M. J. Mazhubalan	HEV and Its Architecture
	2.00PM - 04.30PM	Dr. Saptarishi Basak	Motors for Electric Vehicles
	6.00PM - 08.00PM	Dr. W. R. C. Muñoz	Electro mobility and Digital Twins
04-03-2023	9.30AM - 12.00PM	Ms. K. L. Bhamidipati	Electro-Thermal Modeling of Electric Vehicles
	2.00PM - 4.30PM	Dr. Bansilal Bairwa	Battery Modeling and Parameter Estimation for Electric Vehicle Applications
05-03-2023	9.30AM - 12.00PM	Dr. A. M. Funde	Li-ion Battery Thermal Management System
	2.00PM - 4.00PM	Mr. Shaunak Khot	Thermal Simulation of eV Batteries using CFD
	4.00PM-5.00PM	Valedictory Function	

FOR INFORMATION :
Amit R. Patil, Ph.D.
Organising Secretary
arpatil@mescoepune.org



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REGISTRATION FEES:

Indian : ₹500/-
International: \$30/-



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HoD
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Principal
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