



## MADANAPALLE INSTITUTE OF TECHNOLOGY & SCIENCE

(UGC-AUTONOMOUS INSTITUTION)

Affiliated to JNTUA, Ananthapuramu & Approved by AICTE, New Delhi

NAAC Accredited with A+ Grade, NIRF India Rankings 2021 - Band: 201-250 (Engg.)

NBA Accredited - B.Tech. (CIVIL, CSE, ECE, EEE, MECH), MBA & MCA



**Report on**  
**One day skilled workshop Titled "Fundamentals of PCB design"**  
**Organised by**  
**Department of Electrical & Electronics Engineering**

Date: 19.11.2022 (Saturday).

Venue: WB- 220 (Simulation laboratory)

Submitted by: Dr. K. Arul kumar, Associate professor

Total participants: 35

**MADANAPALLE INSTITUTE OF TECHNOLOGY & SCIENCE**  
(UGC-AUTONOMOUS INSTITUTION)  
www.mits.ac.in  
Madanapalle-517325, Annamayya Dist., Andhra Pradesh  
ESTD: 1998

**Department of Electrical & Electronics Engineering**  
**One day skilled workshop on**  
**Fundamentals of PCB design**  
Date : 19.11.2022

**Resource person**  
**Mrs. Y. Uma Maheswari**  
Cognizant

Chief Patron: Dr. N. Vijaya Bhaskar Choudary (Secretary & Correspondent)  
Chief Patron: Mrs. N. Keerthi (Executive Director)  
Patron: Dr. C. Yuvaraj (Principal)  
HOD/EEE: Dr. A. V. Pavan Kumar (Professor)

Co-ordinator: Dr. K. Arulkumar, Associate Professor

Resource person: Mrs. Y.Uma Maheswari, Cognizant.

Department of Electrical & Electronics Engineering in association with Institutions Innovation council (IIC) at MITS organised one day skilled workshop Titled "Fundamentals of PCB design" through online mode.

The workshop started by 10.00 am with 35 participants. The coordinator Dr. K. Arulkumar welcomed the resource person and participants and given the brief introduction and significance of the workshop. The head of the Electrical & Electronics Engineering Dr. A. V. Pavan Kumar greeted the resource person and given the significance of the workshop with the today scenario in the industry.

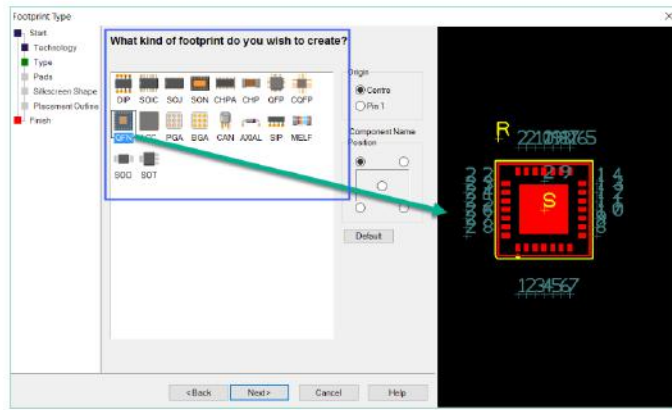
The online platform is given to the resource person Mrs. Uma Maheswari, cognizant for the presentation.

Topics include:

1. Printed Circuit Board (PCB) introduction
2. Layers of PCB design
3. Masking & Traces of PCB
4. Different softwares used in market
5. Demo of the software circuit – DESIGNSPARK

The participants installed the software designspark in the laptop and followed the resource person demo. The circuit of voltage source, resistor and LED is connected in the schematic design, PCB design and project file.

Standard footprint to start from are:

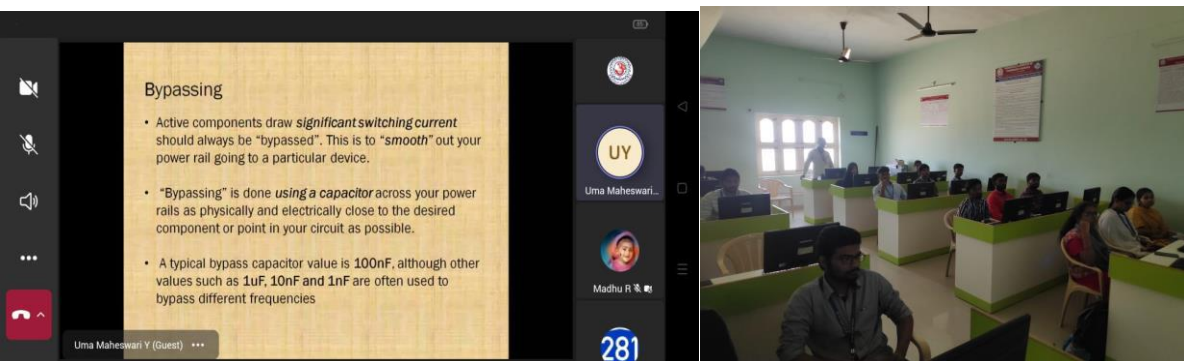
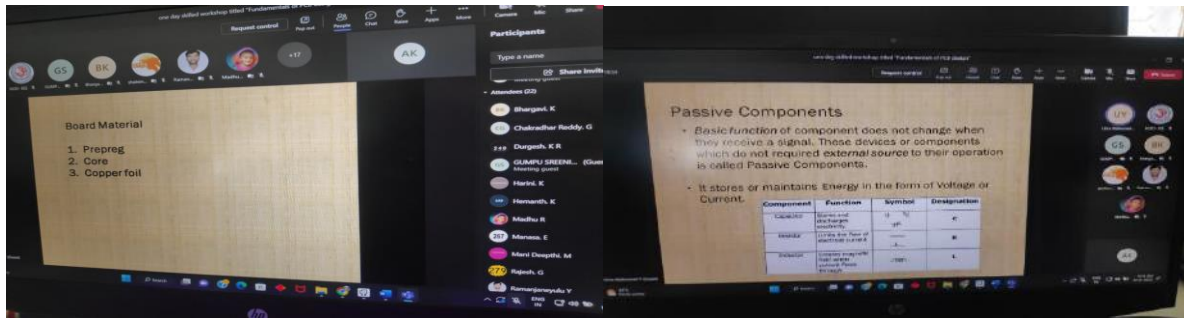


Resource person conveyed that many opportunities are existing in PCB design for career growth and to get placed in reputed companies like eaton, valeo, GE, NXP semiconductors.

The workshop concluded with brief fundamentals of PCB design and with one circuit design of 555 timer circuit with LED. The coordinator concluded the workshop by thanking the resource person, HOD and management of MITS.

**Attachment:**

Photos of workshop.



**Outcome of the workshop:**

Participants practiced the circuit in the PCB software. The response and feedback was good and they told it will be used in their project work. They also requested for one more workshop near future. And they ended with thanking the MITS management for the opportunity given.