

TOP ENGINEERING COLLEGE OF INDIA as per MATIONAL INSTITUTIONAL RANKING FRAMEWORK, 2018 Ministry of Human Resource Development, Government of India

## DEPARTMENT OF ELECTRICAL AND ELECTRONICS ENGINEERING

# INTERNET OF THINGS OF WORKSHOP BY LIVE WIRE

VENUE: CTPS LAB (EEE)

**DATE: 26<sup>th</sup> MARCH 2019** 



DEPARTMENT OF ELECTRICAL AND ELECTRONICS ENGINEERING

## WORKSHOP ON INTERNET OF THINGS

## IN ELECTRICAL AND ELECTRONICS ENGINEERING



ESOFT CLUB DEPARTMENT OF EEE

EXPERTS FROM LIVE WIRE: MR.LOKESH (ENGINEER) MR.SAI RAM (TECH SUPPORT)

STUDENT CO ORDINATOR LOHITH V HITISH G AMOGH

0

FACUTLY CO ORDINATOR DR.S.SUJITHA

VENUE: EEE CTPS LAB TIME : 8:30 AM DATE : 26/03/2019

#### **OBJECTIVE:**

- To bring the basic knowledge on INTERNET OF THINGS and enhance the skills in programming
- Make students have idea of programming in ardiuno

#### **ACTIVITIES:**

- Presentation on IOT
- Hands on training on ARDIUNO software

#### ADDRESSING OF THE GUEST BY HOD AND WORKSHOP COORDINATOR:

As an official way of getting into the workshop the Head of EEE department Dr.S.Ramkumar and Faculty Coordinator Dr.S.Sujitha started the workshop by addressing the guest and the students by his inspiring speech to get the environment even more interesting and interactive. His motivation was such inspiring that each and every student should start up with the project. His speech had a good fire on the floor to bring the students on the mark of learning new things



**INTRODUCTION TO IOT** 



As the workshop had started the person from live wire Mr.Lokesh ignited the spirit of IOT to the students by a wonderful presentation of what is IOT and what is its application. As we moved into the basics he had a very good flow in the way of teach by telling the importance of in different places like home automation, vehicles, mobiles phones, work place, etc.

The person also started his talks with SCADA and PLC for making the things clear on what are the places we have used IOT.

#### **GETTING STARTED:**

The person had given a set of package which had contents of an :

- Ardiuno MEGA
- IR Sensor
- WIFI Module
- Bluetooth Module
- Bread board

At the start none had an idea of what was the plan and what he was up to with the ardiuno.

1. He started his session with a simple program of changing the colour of the lights by using the PSW pins in the ardiuno which was the basic program in the ardiuno using the digital write pins and some small level of programming language.

Later on to go further with the workshop he explained each and every line in the program of what was it function which meant even more informative session.

2. After everyone completing the program and output by his guidance we moved on to the next type of programming where he made us know something about the IR sensors.

He had made a short program where the ardiuno uses the IR sensor to sense the movement of objects infront of its path .

The Ardiuno used to make it so interesting by giving answers like if there an object detected it message was given as "OBJECT IS DETECTED" if there is no movement the ardiuno used to give a message as "OBJECT NOT DETECTED" which was interesting to play with and we had an idea of where to use this program.



3. On the go he moved to a next level of usage of ardiuno by using a Bluetooth module to turn on and turn off the light by using the Bluetooth module and a smartphone where he turned ON the light by giving an input of A and B for turning OFF the lights which was very much interesting to work where he mentioned we can operate many lights by a different program were we can control our home light by a single button which changes the condition of the light to ON and OFF.



4. On our next program we were thought on how to use the cloud to give inputs to the temperature control of the system using a new website named THINGSPEAKS.COM which was a student friendly website where we can use it to control our home lights, fans, television, Refrigerator and other home appliances for a far distance from our home using the internet were we give an input for a certain range which gets activated for that required input given by us.





#### **VOTE OF THANKS:**

As a part of the workshop I the student of EEE department express my deep gratitude to the faculty Dr.S.SUJITHA for organising such an informative and interesting workshop for us. And a special thanks for our HOD Dr.S.Ramkumar for giving permission to conduct this kind of workshop in our department to enhance the brains of our students.

I would like to thank the person from LIVE WIRE Mr.Lokesh for making the session informative and interactive.

#### **REPORT BY:**

HITISH G

EEE 4A

LOHITH V EEE 4A YASHVANTHA P EEE 4A





