DEPARTMENT OF INFORMATION TECHNOLOGY

Date: 12.03.19

Report on the Two-Days Workshop on

<u>Artificial Intelligence, Machine Learning and Deep Learning</u>

7th and 8th March 2019

The department of Information Technology organized two days workshop on "Artificial Intelligence, Machine Learning and Deep Learning" in association with Dcrew IT Solutions Pvt.Ltd., Chennai on 7th and 8th March 2019. Dr.I.Sathik Ali, Head of the Department welcomed the speakers and students for the two days technical workshop. The students, research scholars and faculty from various departments namely IT, CSE, E&I, CA and Commerce registered for the workshop.

The main objective of the workshop is to impart the knowledge in the field of Artificial Intelligence, Machine learning and Deep Learning and expose the students to the tools of AI. Mr. Dinesh Kumar Subramanian, Founder of DTeam (Research Division, Dcrew IT Solutions Pvt.Ltd.,) presented the concepts and hands on session of the workshop. Mr.Dinesh was accompanied by his team Mr.Vignesh Ram and Mr.Arjun for the two days training session.

Mr.Dinesh started with the basics of Artificial Intelligence, Machine Learning and Deep Learning. The speaker clearly explained how Artificial Intelligence is concerned with Machine Learning and Deep Learning along with the real time example scenario. This session was further continued by introducing the Jupiter Notebook and gave a vivid picture about Python Programming-the Basics, Data-Type, Control Flow and Data Structures.

In the second session, he explained Numpy - a Library for the Python programming language, that supports large, multidimensional arrays and matrices and high-level mathematical functions to operate on these arrays. Sample code on numpy was executed and the students were given some problems to be solved.

The second day of the workshop dealt with Introduction to Neural Network, Comparison of Human Neuron with Artificial Neural Network, Basic flow of Neural Network(Input-Weight-Net Input Function-Activation Function-Output)and Mathematical components of Neural Networks(Back propagation).

Mr.Dinesh continued on Tensor Flow, Installing and Importing Tensor Flow packages, the Input and Output format of the Tensor Flow, Uses of Tensor Flow and need of TPU(Tensor Processing Unit-to process tensor flow packages just like GUI) and about Tensor boards. A practical demonstration on Google AI playground was given to understand the different categories of data and learning rate of neural networks.

Mr.Dinesh explained about Pandas and discussed about using pandas for data analysis in the banking domain. The information and knowledge shared by the resource person was very helpful for the students in choosing their project work in the latest technology trend. In a nutshell, the Artificial Intelligence& Machine Learning workshop was very useful for the students as it gave a bright knowledge about the blooming technology.

Co-ordinators   Conveners
Dr.G.Kavitha, Dr.P.Latchoumy, Ms.A.Sonya   Dr.I.Sathik Ali, Dr.Latha Tamilselvan