School of Computer Science Engineering and Technology

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| Course- BTech | Type- Elective |
| Course Code- CSET335L | Course Name-Deep Learning |
| Year- 2023 | Semester- Even |

**Lab Assignment 9.1 – Modern CNN architecture**

This Lab focused on solving a problem with the help of customize the existing pretrained model. We will be playing around with two models.

1. VGG16
2. VGG19

The goal here is to use MNIST dataset to play with the following ideas:.

1. You will replicate the work done in my paper Imbalanced breast cancer classification, IEEE Transactions on Computational Biology.
2. You will extract features from intermediate layers of the pretrained CNN.
3. You will change the mode of classification from dense to:
   1. SVM
   2. Random forest
   3. Logistic Regression

I want to see the results on MNIST dataset in terms of accuracy.