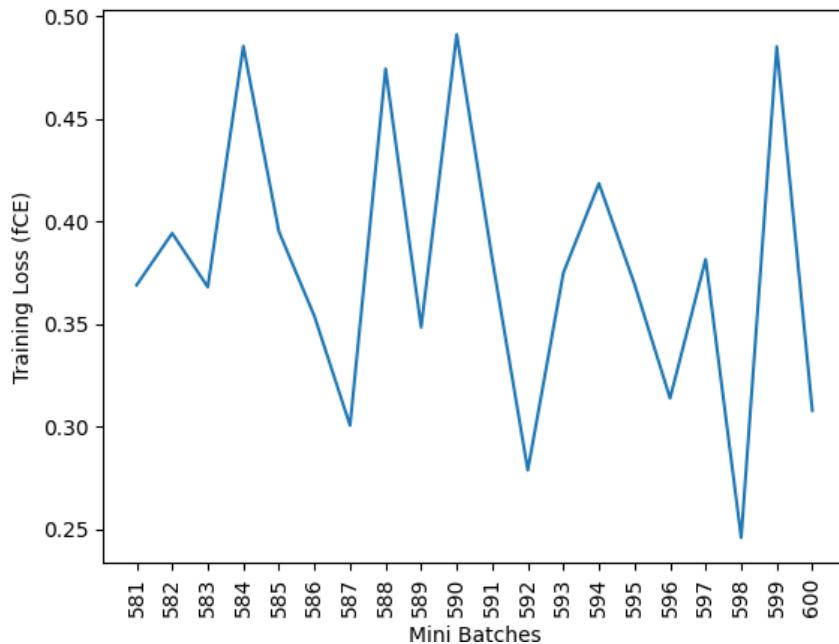


CS 4342 - Machine Learning
Homework - 3 Softmax regression and Titanic Disaster Challenge

Part 1

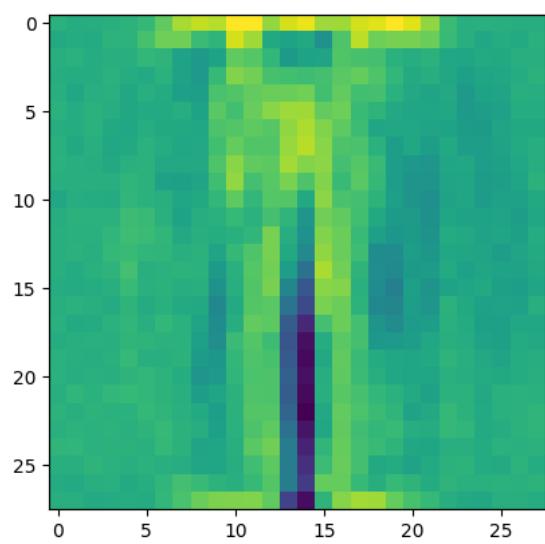
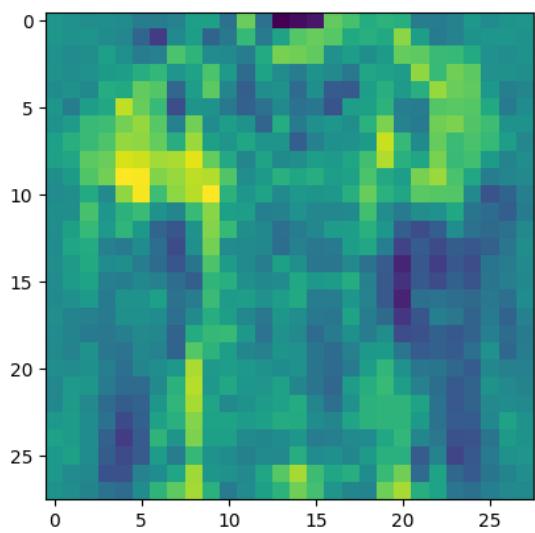
- a. Training Loss during the last twenty mini-batches of the last epoch:

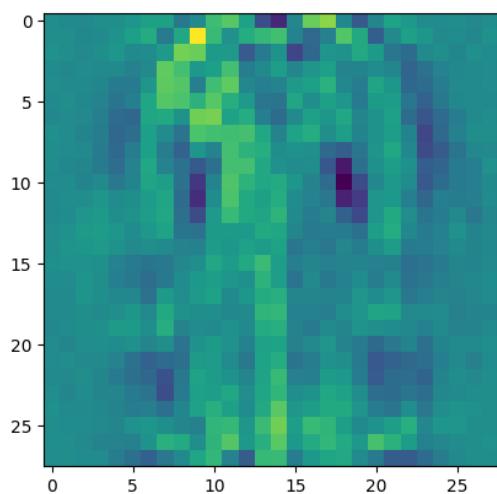
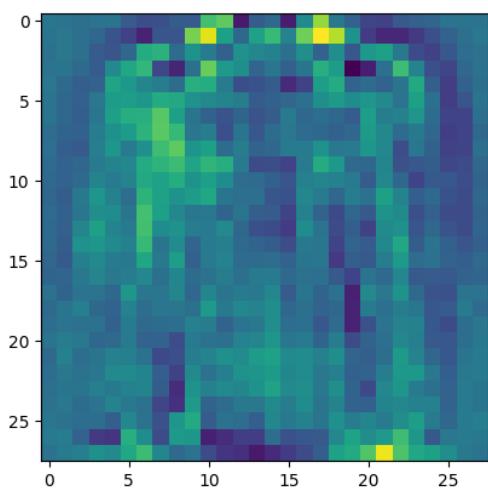


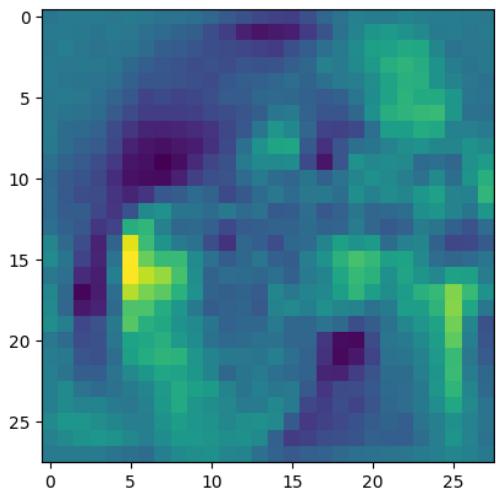
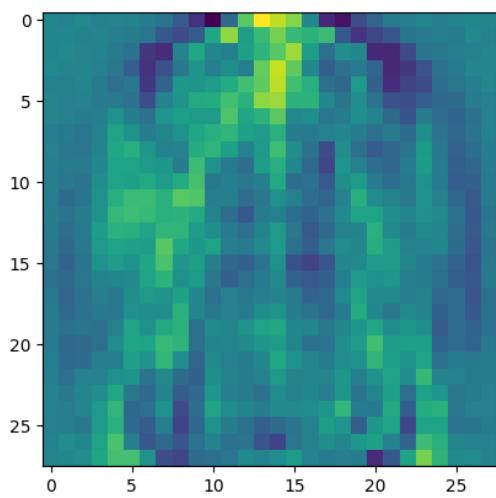
- b. CE loss and PC accuracy on the Test set (includes PC for the training data as well)

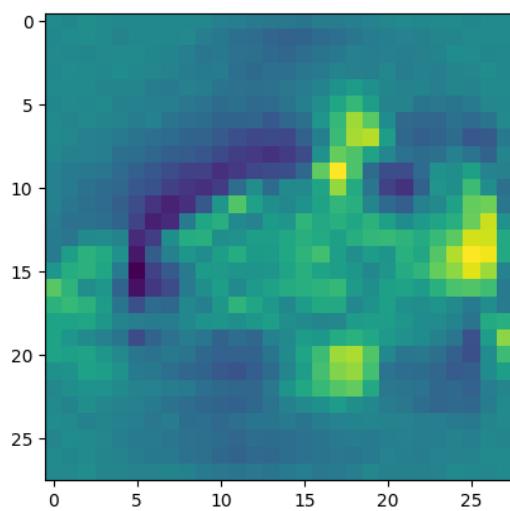
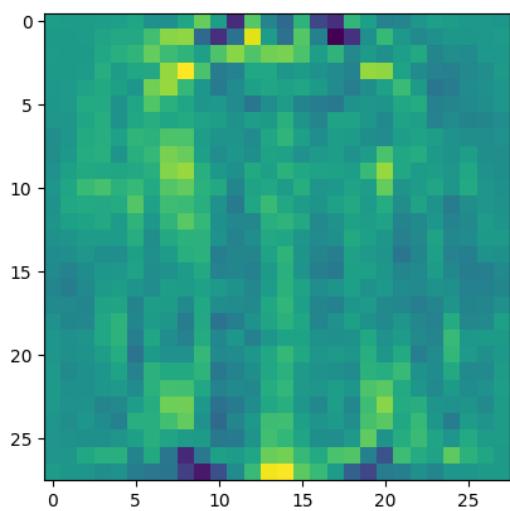
```
Training Accuracy (fPC): 0.86
Testing Accuracy (fPC): 0.842
Testing Loss (fCE): 0.45215715385915384
```

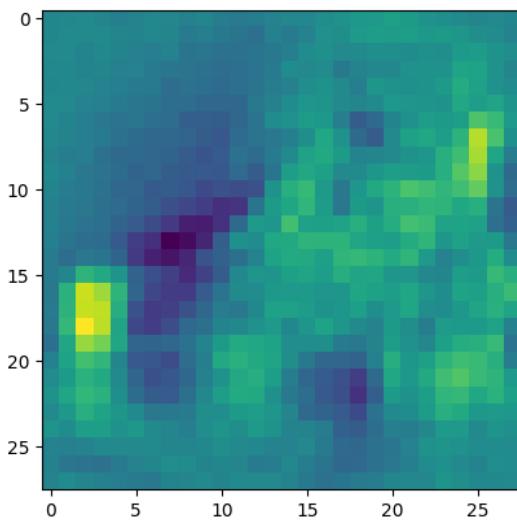
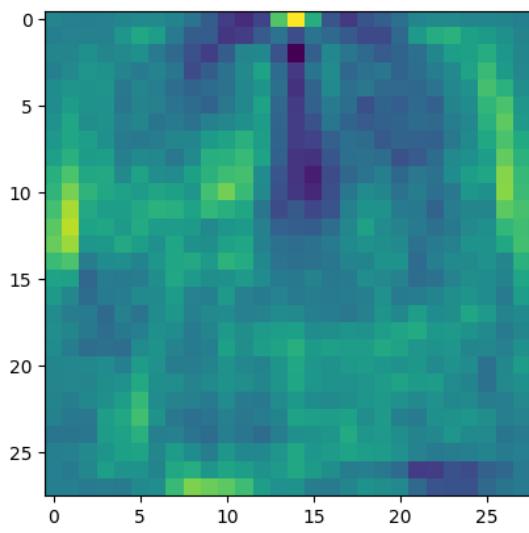
- c. Visualizing trained weights:











Part 2

Accuracy of the Softmax Regression Model on the Titanic test data: 0.77272