

[Return to Assessments page](#)

Name: _____

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Worksheet 04 - CIFAR type prediction challenge

Part 1

Please state the names of all the students you worked with on this assignment:

Answer Point Value: 0.0 points

Model Short Answer: -----

Part 2: Prediction challenge

You are given CIFAR-type training data of 6000 images picturing either cats, dogs or frogs. The data consists of training images (**data_x**) with associated labels (**data_y**) in {0=cat,1=dog, 2=frog} and an unlabeled test set (**test_x**). Your task is to train a convolutional neural network model to predict labels from images. As a submission, please upload your prediction of labels for the test set (**test_x**).

For the tutorial, be prepared to show your code, explain how you prepared the data, how you chose the network architecture and other hyperparameters, how you validated the model, and show the convergence of the training error. To load and visualize the data as well as save your prediction, please refer to the following code snippet:

<https://gist.github.com/cwehmeyer/a27a4766e9d7d7f475f84eb690cdd89a>

Attachments

prediction-challenge-02-data.npz

Use your trained model to predict the labels for the test data. Store the prediction as a one-dimensional numpy.ndarray and upload your prediction file.

Please note that you need to use exactly the shown file format, file name, and array shape as shown in the code snippet. Otherwise, we might not be able to correctly process your submission.

Please note that all members need to submit their own prediction or they won't be awarded points.

For this prediction, we will use the following scheme:

accuracy	points
$\geq 50\%$	2
$\geq 60\%$	5
$\geq 70\%$	10

Click "Browse" to locate your file and then click "Upload" to upload your file.

File:

Answer Point Value: 10.0 points