

# Data Mining: Learning from Large Data Sets - Fall Semester 2015

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## Large Scale Image Classification

Briefly describe the steps used to produce the solution. Feel free to add plots or screenshots if you think it's necessary. The report should contain a maximum of 2 pages. Keep in mind that you only have to submit one report per group. Please indicate the contribution of each group member to the project.

**Problem formulation.** The goal of this project was to use a SVM to classify a set of images into whether they are images of people, or images of nature. The images were provided in the form of pre-computed feature vectors.

**Approach.**

**Mapper.** Performs the online svm using *Stochastic Gradient Descent*. (passes sum of  $w$  on to reducer)

**Reducer.** Creates a weighted average of the  $w$  passed by the mappers.

**Learning lambda.** Cross validation

**Results.**

**Workload distribution.**