1. Methodology

This contest is a time-series forecasting problem. If the demand for the next month be over-estimated, inventory cost is applied and if the demand be under-estimated, backorder cost is applied. To investigate the problem, ARMA in Matlab and Time-series forecasting package in Weka are used.

In order to get good estimations, on each month, the model is trained again and the demand for the next month is estimated. In the literature this is called Bayesian model. On each month all algorithms output their estimations. The performance of each algorithm is assessed by its performance on past months.

By utilizing the source code of Weka package, a simulator is designed to call Weka functions on each month.