

Bias and Variance

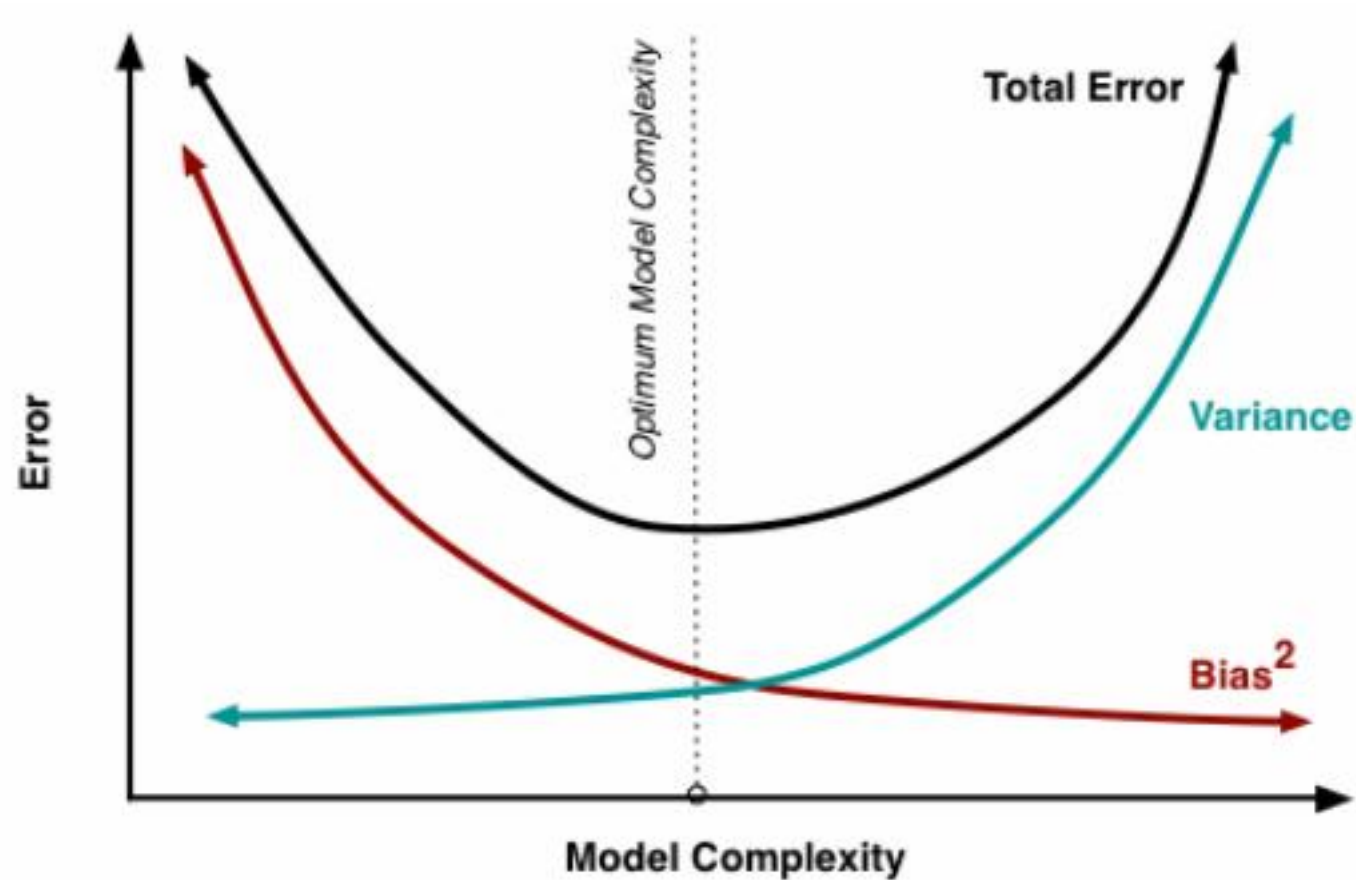
Bias Error

Bias are the simplifying assumptions made by a model to make the target function easier to learn.

Variance Error

Variance is the amount that the estimate of the target function will change if different training data was used.

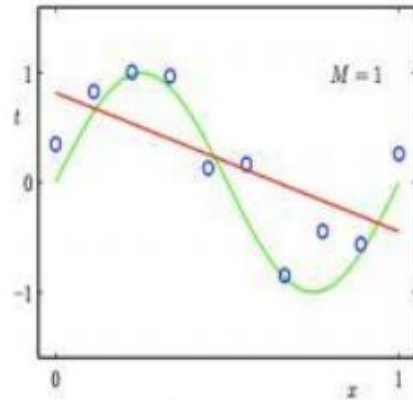
Slide including training error and generalization error – Bias and Variance



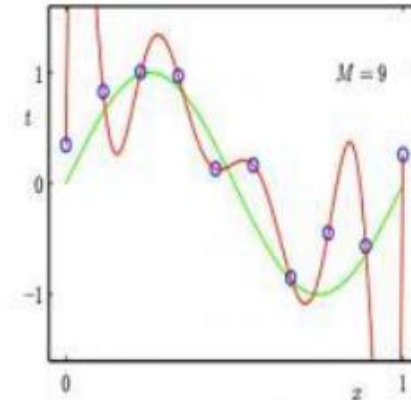
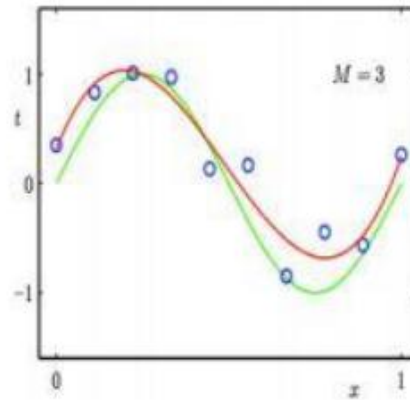
Under & Over Fitting

Under- and Over-fitting examples

Regression:



predictor too inflexible:
cannot capture pattern



predictor too flexible:
fits noise in the data

Classification:

