

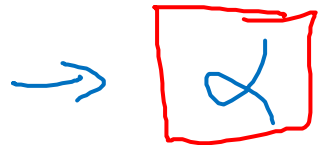


deeplearning.ai

Hyperparameter tuning

Tuning process

Hyperparameters



alpha is the most important for sure.

But for the yellow and purple, I think other deep learning practitioners may well disagree with me or have different intuitions on these.



$\beta_1, \beta_2, \epsilon$
0.9 0.999 10^{-8}

#layers

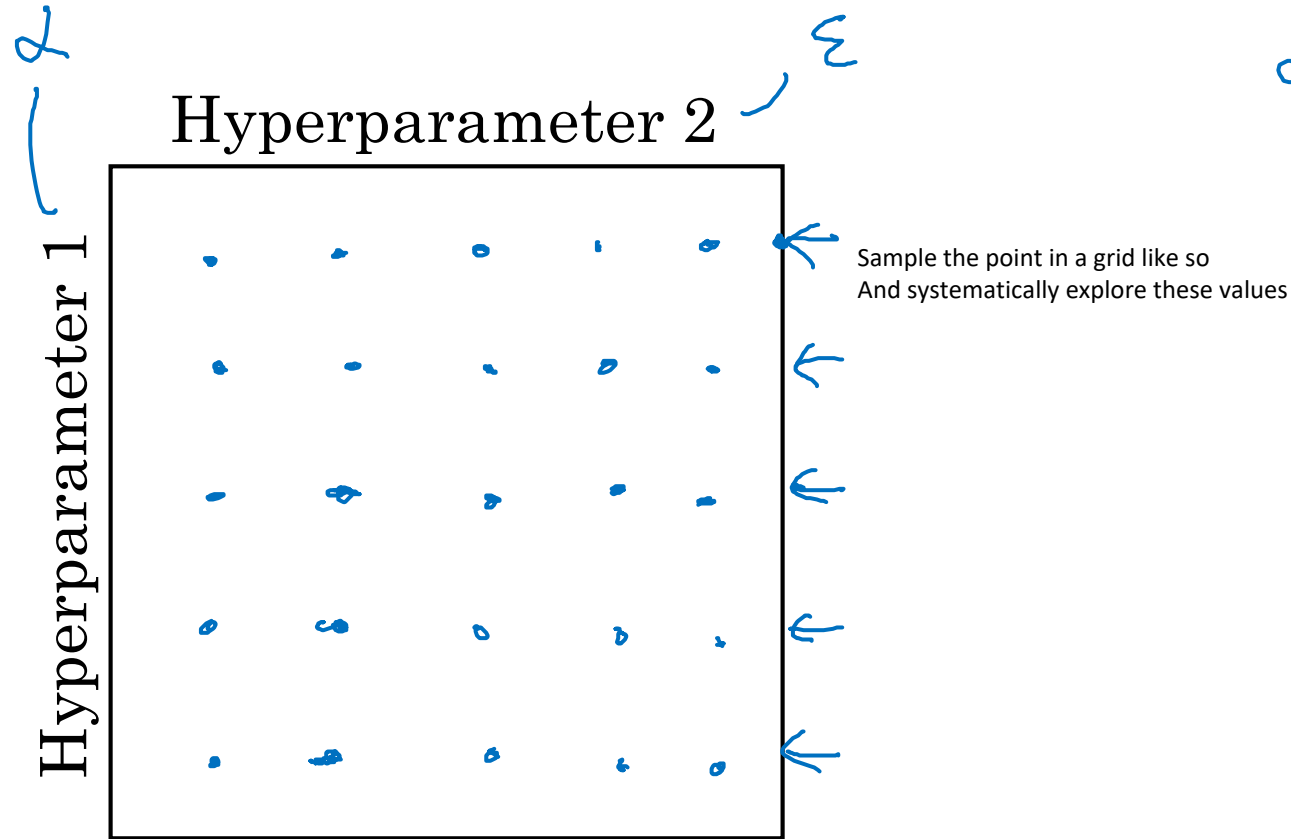
#hidden units

learning rate decay

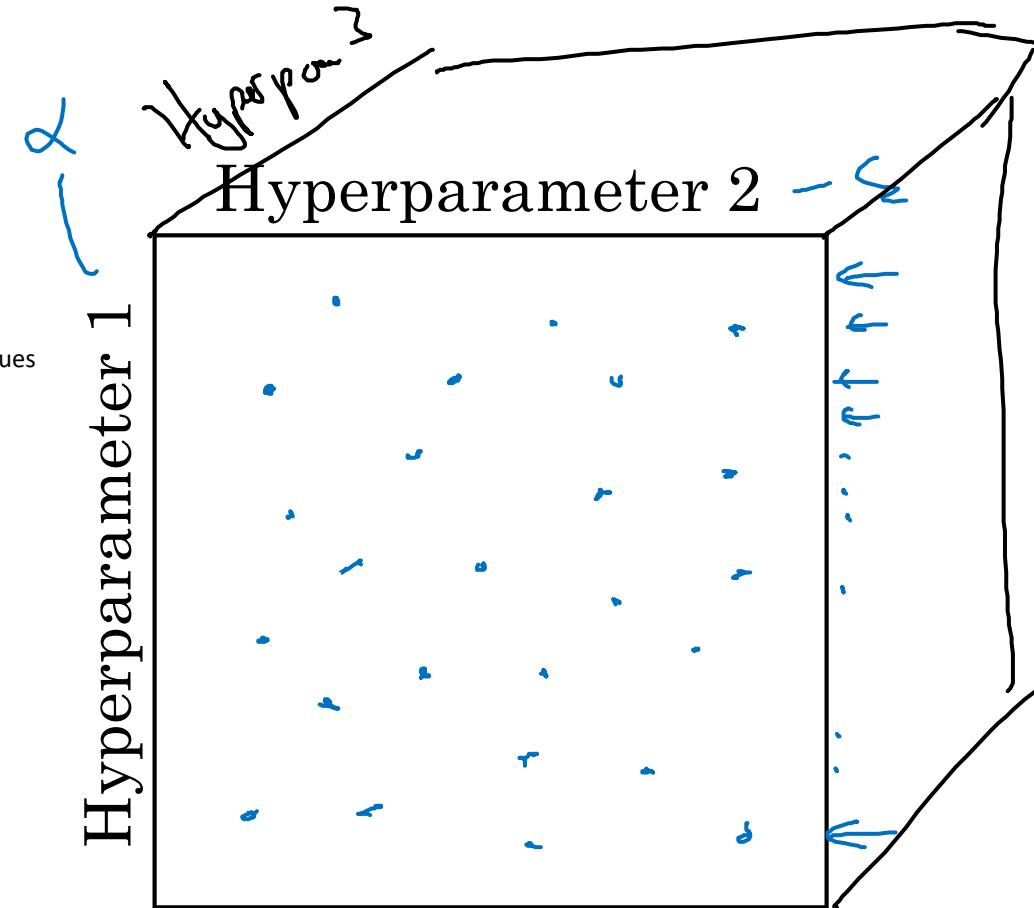
mini-batch size

Try random values: Don't use a grid

Sampling at random rather than in the grid shows that you are more richly exploring set of possible values for the most important hyperparameters whatever they turn out to be.



And this practice works okay when the number of hyperparameters was relatively small



The reason you do that is that it's difficult to know in advance which hyperparameter are going to be the most important for your problem.

Coarse to fine

Using random sampling and adequate search.
Another common practice is to use a coarse to fine sampling scheme.

