

# Building an MLP framework

# Pytorch-like API

```
D_in, H, D_out = 2, 3, 2

mlp = MLP([
    Linear(D_in, H),
    ReLU(),
    Linear(H, D_out)
])

optimizer = SGD(mlp, lr=0.1)
loss = CrossEntropy(mlp)

epochs = 100
for e in range(epochs):
    for x, y in zip(X, Y):
        y_pred = mlp(x)
        loss(y_pred, y)
        loss.backward()
        optimizer.update()
```