* MVU Module/Slide Notes
  + "Neural Networks in Business": <https://www.informationweek.com/big-data/ai-machine-learning/neural-networks-in-business-advantages-and-perspectives/a/d-id/1329970>
  + "Neural Networks": <https://en.wikipedia.org/wiki/Neural_network>
* Elements of Statistical Learning with R (ELA)
* Chapters 11, pages 389-400
  + Extracts linear combinations of inputs as features
  + Models output as non-linear
  + “single hidden layer back propagation network”
  + Single layer perceptron
  + NON-LINEAR
  + 2 STAGE
    - Regression or
    - Classification
  + Originally developed to mimic human brain and thus signals only passed on from neuron after reaching a certain threshold (step function). Later recognized that more smooth curve (sigmoid) is more useful.
  + Often good practice to normalize the inputs

Battery: $230

Timing belt, tensioners, and water pump, and get a coolant exchange:

Misfires sparking and arking crank shaft center codes. They think we need to replace spark plugs and wires. We’re losing the sparks on. Maybe an issue with crank shaft sensor.

Crank shaft sensor is in with the timing belt so do it at the same time. It’s a bigger repair.

Powering steering fluid is dirty but we have seen worse:

Transmission fluid is dirty, have seen worse:

Fuel induction cleaning

Intake manifold gasket sets.

$3951.18

Diagnostic

Oil change

Tune up: Spark plugs, spark plug wires, intake manifold gasket

Timing belt, tensioners, and water pump, and get a coolant exchange. ASK ABOUT CRANK SHAFT sensor, I know you can get to it at the same time, what is the extra cost or was that already included.

Valve Induction service ~$250

I NEED To replace the battery, and the engine air filter. Then do power steering fluid and automatic transmission fluid swap later.