Command Line Arguments:

dir = pet\_images

arch = vgg

dogfile = dognames.txt

Great\_dane\_05320.jpg

['Great', 'dane', '05320']

Beagle\_01125.jpg

['Beagle', '01125']

Collie\_03797.jpg

['Collie', '03797']

Dalmatian\_04068.jpg

['Dalmatian', '04068']

Miniature\_schnauzer\_06884.jpg

['Miniature', 'schnauzer', '06884']

German\_shepherd\_dog\_04890.jpg

['German', 'shepherd', 'dog', '04890']

Basenji\_00963.jpg

['Basenji', '00963']

cat\_02.jpg

['cat', '02']

Golden\_retriever\_05223.jpg

['Golden', 'retriever', '05223']

great\_horned\_owl\_02.jpg

['great', 'horned', 'owl', '02']

Basset\_hound\_01034.jpg

['Basset', 'hound', '01034']

Cocker\_spaniel\_03750.jpg

['Cocker', 'spaniel', '03750']

Poodle\_07927.jpg

['Poodle', '07927']

Beagle\_01141.jpg

['Beagle', '01141']

Saint\_bernard\_08010.jpg

['Saint', 'bernard', '08010']

Boxer\_02426.jpg

['Boxer', '02426']

Great\_pyrenees\_05367.jpg

['Great', 'pyrenees', '05367']

German\_shorthaired\_pointer\_04986.jpg

['German', 'shorthaired', 'pointer', '04986']

Dalmatian\_04037.jpg

['Dalmatian', '04037']

fox\_squirrel\_01.jpg

['fox', 'squirrel', '01']

polar\_bear\_04.jpg

['polar', 'bear', '04']

Basenji\_00974.jpg

['Basenji', '00974']

Saint\_bernard\_08036.jpg

['Saint', 'bernard', '08036']

Beagle\_01170.jpg

['Beagle', '01170']

gecko\_02.jpg

['gecko', '02']

Boston\_terrier\_02285.jpg

['Boston', 'terrier', '02285']

Golden\_retriever\_05195.jpg

['Golden', 'retriever', '05195']

Golden\_retriever\_05182.jpg

['Golden', 'retriever', '05182']

Dalmatian\_04017.jpg

['Dalmatian', '04017']

Golden\_retriever\_05257.jpg

['Golden', 'retriever', '05257']

Boston\_terrier\_02259.jpg

['Boston', 'terrier', '02259']

gecko\_80.jpg

['gecko', '80']

Poodle\_07956.jpg

['Poodle', '07956']

Great\_pyrenees\_05435.jpg

['Great', 'pyrenees', '05435']

cat\_01.jpg

['cat', '01']

Boston\_terrier\_02303.jpg

['Boston', 'terrier', '02303']

skunk\_029.jpg

['skunk', '029']

cat\_07.jpg

['cat', '07']

Rabbit\_002.jpg

['Rabbit', '002']

German\_shepherd\_dog\_04931.jpg

['German', 'shepherd', 'dog', '04931']

Pet Image Label Dictionary has 40 key-value pairs.

Below are 10 of them:

1 key: Great\_dane\_05320.jpg label: great dane

2 key: Beagle\_01125.jpg label: beagle

3 key: Collie\_03797.jpg label: collie

4 key: Dalmatian\_04068.jpg label: dalmatian

5 key: Miniature\_schnauzer\_06884.jpg label: miniature schnauzer

6 key: German\_shepherd\_dog\_04890.jpg label: german shepherd dog

7 key: Basenji\_00963.jpg label: basenji

8 key: cat\_02.jpg label: cat

9 key: Golden\_retriever\_05223.jpg label: golden retriever

10 key: great\_horned\_owl\_02.jpg label: great horned owl

The results dictionary is: {'Great\_dane\_05320.jpg': ['great dane', 'great dane', 1], 'Beagle\_01125.jpg': ['beagle', 'beagle', 1], 'Collie\_03797.jpg': ['collie', 'collie', 1], 'Dalmatian\_04068.jpg': ['dalmatian', 'dalmatian', 1], 'Miniature\_schnauzer\_06884.jpg': ['miniature schnauzer', 'miniature schnauzer', 1], 'German\_shepherd\_dog\_04890.jpg': ['german shepherd dog', 'german shepherd dog', 1], 'Basenji\_00963.jpg': ['basenji', 'basenji', 1], 'cat\_02.jpg': ['cat', 'cat', 1], 'Golden\_retriever\_05223.jpg': ['golden retriever', 'golden retriever', 1], 'great\_horned\_owl\_02.jpg': ['great horned owl', 'great horned owl', 0], 'Basset\_hound\_01034.jpg': ['basset hound', 'basset hound', 1], 'Cocker\_spaniel\_03750.jpg': ['cocker spaniel', 'cocker spaniel', 1], 'Poodle\_07927.jpg': ['poodle', 'poodle', 1], 'Beagle\_01141.jpg': ['beagle', 'beagle', 1], 'Saint\_bernard\_08010.jpg': ['saint bernard', 'saint bernard', 1], 'Boxer\_02426.jpg': ['boxer', 'boxer', 1], 'Great\_pyrenees\_05367.jpg': ['great pyrenees', 'great pyrenees', 0], 'German\_shorthaired\_pointer\_04986.jpg': ['german shorthaired pointer', 'german shorthaired pointer', 1], 'Dalmatian\_04037.jpg': ['dalmatian', 'dalmatian', 1], 'fox\_squirrel\_01.jpg': ['fox squirrel', 'fox squirrel', 1], 'polar\_bear\_04.jpg': ['polar bear', 'polar bear', 1], 'Basenji\_00974.jpg': ['basenji', 'basenji', 1], 'Saint\_bernard\_08036.jpg': ['saint bernard', 'saint bernard', 1], 'Beagle\_01170.jpg': ['beagle', 'beagle', 0], 'gecko\_02.jpg': ['gecko', 'gecko', 1], 'Boston\_terrier\_02285.jpg': ['boston terrier', 'boston terrier', 1], 'Golden\_retriever\_05195.jpg': ['golden retriever', 'golden retriever', 1], 'Golden\_retriever\_05182.jpg': ['golden retriever', 'golden retriever', 1], 'Dalmatian\_04017.jpg': ['dalmatian', 'dalmatian', 1], 'Golden\_retriever\_05257.jpg': ['golden retriever', 'golden retriever', 1], 'Boston\_terrier\_02259.jpg': ['boston terrier', 'boston terrier', 1], 'gecko\_80.jpg': ['gecko', 'gecko', 0], 'Poodle\_07956.jpg': ['poodle', 'poodle', 1], 'Great\_pyrenees\_05435.jpg': ['great pyrenees', 'great pyrenees', 1], 'cat\_01.jpg': ['cat', 'cat', 0], 'Boston\_terrier\_02303.jpg': ['boston terrier', 'boston terrier', 1], 'skunk\_029.jpg': ['skunk', 'skunk', 1], 'cat\_07.jpg': ['cat', 'cat', 1], 'Rabbit\_002.jpg': ['rabbit', 'rabbit', 1], 'German\_shepherd\_dog\_04931.jpg': ['german shepherd dog', 'german shepherd dog', 1]}

MATCH:

Great\_dane\_05320.jpg:

Real: great dane Classifier: great dane

Beagle\_01125.jpg:

Real: beagle Classifier: beagle

Collie\_03797.jpg:

Real: collie Classifier: collie

Dalmatian\_04068.jpg:

Real: dalmatian Classifier: dalmatian

Miniature\_schnauzer\_06884.jpg:

Real: miniature schnauzer Classifier: miniature schnauzer

German\_shepherd\_dog\_04890.jpg:

Real: german shepherd dog Classifier: german shepherd dog

Basenji\_00963.jpg:

Real: basenji Classifier: basenji

cat\_02.jpg:

Real: cat Classifier: cat

Golden\_retriever\_05223.jpg:

Real: golden retriever Classifier: golden retriever

Basset\_hound\_01034.jpg:

Real: basset hound Classifier: basset hound

Cocker\_spaniel\_03750.jpg:

Real: cocker spaniel Classifier: cocker spaniel

Poodle\_07927.jpg:

Real: poodle Classifier: poodle

Beagle\_01141.jpg:

Real: beagle Classifier: beagle

Saint\_bernard\_08010.jpg:

Real: saint bernard Classifier: saint bernard

Boxer\_02426.jpg:

Real: boxer Classifier: boxer

German\_shorthaired\_pointer\_04986.jpg:

Real: german shorthaired pointer Classifier: german shorthaired pointer

Dalmatian\_04037.jpg:

Real: dalmatian Classifier: dalmatian

fox\_squirrel\_01.jpg:

Real: fox squirrel Classifier: fox squirrel

polar\_bear\_04.jpg:

Real: polar bear Classifier: polar bear

Basenji\_00974.jpg:

Real: basenji Classifier: basenji

Saint\_bernard\_08036.jpg:

Real: saint bernard Classifier: saint bernard

gecko\_02.jpg:

Real: gecko Classifier: gecko

Boston\_terrier\_02285.jpg:

Real: boston terrier Classifier: boston terrier

Golden\_retriever\_05195.jpg:

Real: golden retriever Classifier: golden retriever

Golden\_retriever\_05182.jpg:

Real: golden retriever Classifier: golden retriever

Dalmatian\_04017.jpg:

Real: dalmatian Classifier: dalmatian

Golden\_retriever\_05257.jpg:

Real: golden retriever Classifier: golden retriever

Boston\_terrier\_02259.jpg:

Real: boston terrier Classifier: boston terrier

Poodle\_07956.jpg:

Real: poodle Classifier: poodle

Great\_pyrenees\_05435.jpg:

Real: great pyrenees Classifier: great pyrenees

Boston\_terrier\_02303.jpg:

Real: boston terrier Classifier: boston terrier

skunk\_029.jpg:

Real: skunk Classifier: skunk

cat\_07.jpg:

Real: cat Classifier: cat

Rabbit\_002.jpg:

Real: rabbit Classifier: rabbit

German\_shepherd\_dog\_04931.jpg:

Real: german shepherd dog Classifier: german shepherd dog

NOT A MATCH:

great\_horned\_owl\_02.jpg:

Real: great horned owl Classifier: great horned owl

Great\_pyrenees\_05367.jpg:

Real: great pyrenees Classifier: great pyrenees

Beagle\_01170.jpg:

Real: beagle Classifier: beagle

gecko\_80.jpg:

Real: gecko Classifier: gecko

cat\_01.jpg:

Real: cat Classifier: cat

# Total Images 40 # Matches: 35 # NOT Matches: 5

\*\* Statistics from calculates\_results\_stats() function:

N Images: 40 N Dog Images: 30 N NotDog Images: 10

Pct Corr dog: 33.3 Pct Corr NOTdog: 100.0 Pct Corr Breed: 93.3

\*\* Check Statistics - calculated from this function as a check:

N Images: 40 N Dog Images: 30 N NotDog Images: 10

Pct Corr dog: 100.0 Pct Corr NOTdog: 100.0 Pct Corr Breed: 93.3

\*\*\* Results Summary for CNN Model Architecture VGG \*\*\*

N Images : 40

N Dog Images : 30

N Not-Dog Images : 10

pct\_match : 87.5

pct\_correct\_dogs : 33.33333333333333

pct\_correct\_breed : 93.33333333333333

pct\_correct\_notdogs : 100.0

INCORRECT Dog Breed Assignment:

Real: great pyrenees Classifier: great pyrenees

Real: beagle Classifier: beagle

\*\* Total Elapsed Runtime:0:1:46