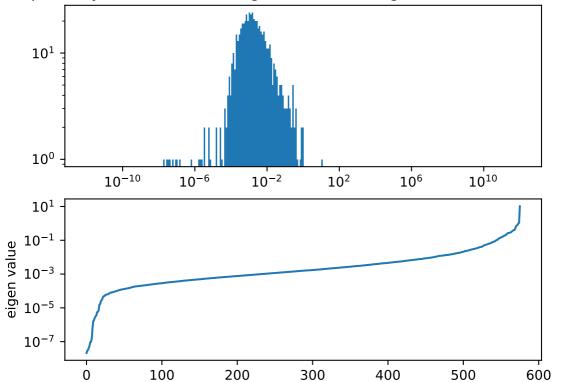
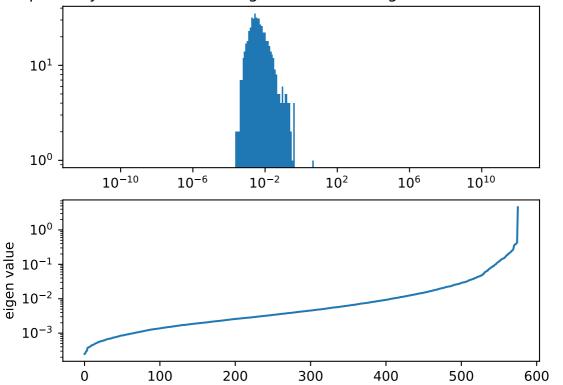
ep: 58 conv1 maxeig: 5.7e+01 mineig: 3.8e-03 con: 1.5e+04  $3 \times 10^{0}$  $2 \times 10^{0}$ 10<sup>0</sup> 1010 10-10 10-6 10-2 10<sup>2</sup> 10<sup>6</sup> 10<sup>1</sup> eigen value 10<sup>-1</sup>  $10^{-2}$ 10 15 25 20

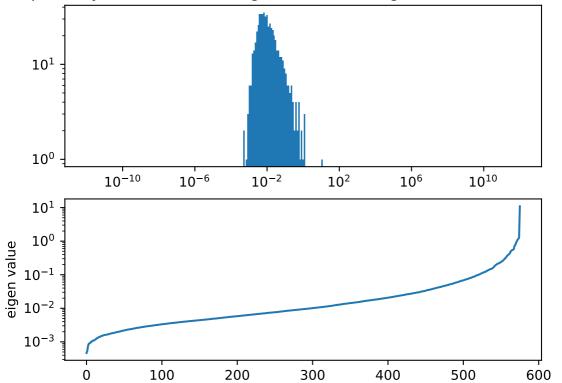
ep: 58 layer1.0.conv1 maxeig: 1.0e+01 mineig: 2.1e-08 con: 4.8e+08



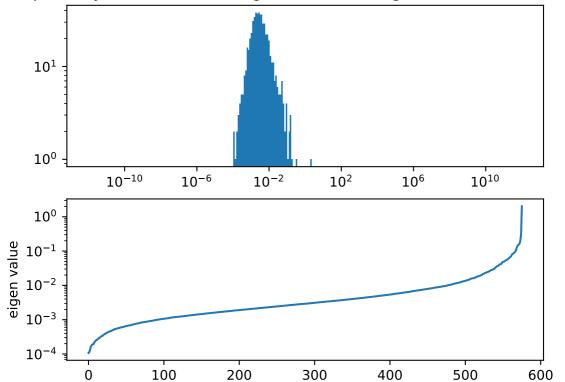
ep: 58 layer1.0.conv2 maxeig: 4.6e+00 mineig: 2.5e-04 con: 1.8e+04



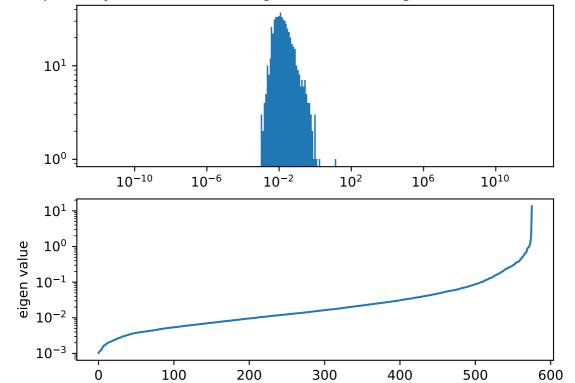
ep: 58 layer1.1.conv1 maxeig: 1.1e+01 mineig: 4.7e-04 con: 2.3e+04



ep: 58 layer1.1.conv2 maxeig: 2.0e+00 mineig: 1.1e-04 con: 1.9e+04



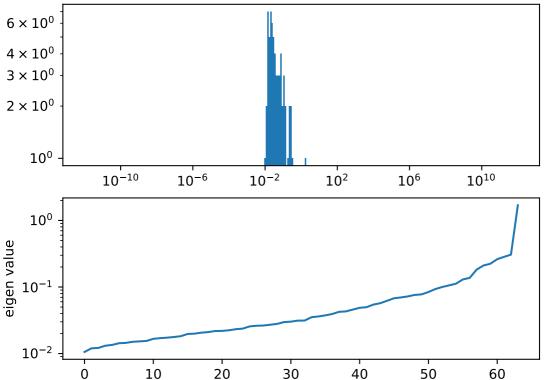
ep: 58 layer2.0.conv1 maxeig: 1.3e+01 mineig: 1.0e-03 con: 1.3e+04



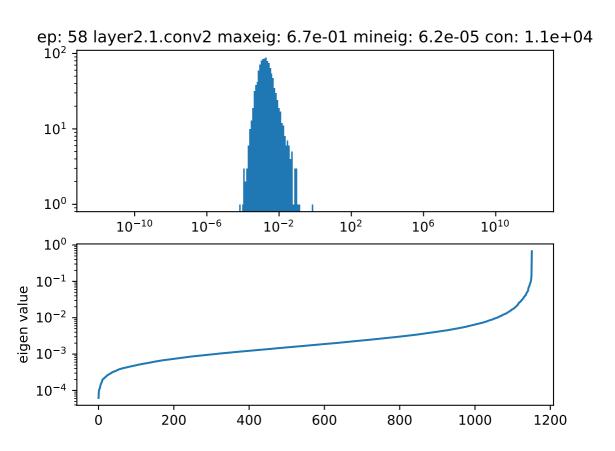
ep: 58 layer2.0.conv2 maxeig: 3.9e+00 mineig: 6.5e-04 con: 5.9e+03  $10^{2}$  $10^{1}$ 10<sup>0</sup> 1010 10-10  $10^{-2}$  $10^{-6}$ 10<sup>2</sup> 10<sup>6</sup> 10° en lo -1 lo -2 lo 10<sup>-3</sup> 200 400 600 800 1000

1200

ep: 58 layer2.0.shortcut.0 maxeig: 1.7e+00 mineig: 1.1e-02 con: 1.6e+02

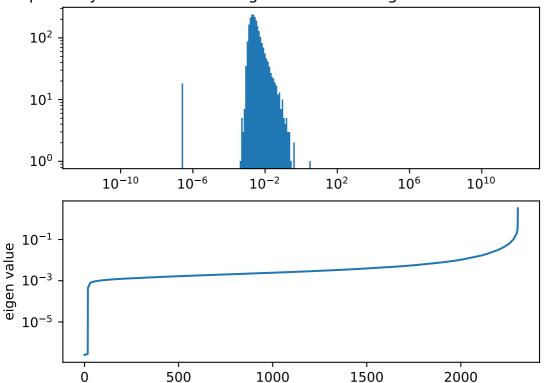


ep: 58 layer2.1.conv1 maxeig: 1.1e+01 mineig: 1.8e-04 con: 5.8e+04  $10^{2}$  $10^{1}$ 10<sup>0</sup> 1010 10-10 10-2 10<sup>6</sup>  $10^{-6}$ 10<sup>2</sup>  $10^{1}$ 10<sup>0</sup> eigen value  $10^{-1}$ 10-2 10<sup>-3</sup> 200 400 600 800 1000 1200

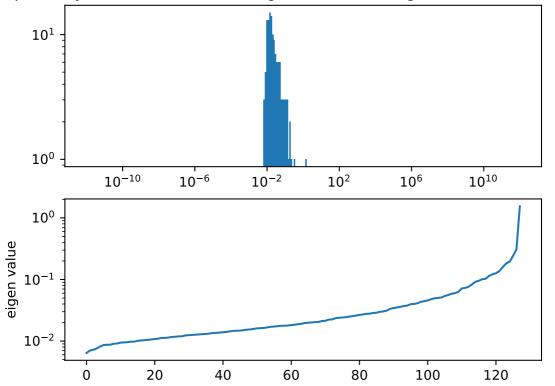


ep: 58 layer3.0.conv1 maxeig: 1.1e+01 mineig: 1.0e-03 con: 1.1e+04  $10^{2}$  $10^{1}$ 10<sup>0</sup> 1010 10-10 10<sup>6</sup>  $10^{-6}$  $10^{-2}$ 10<sup>2</sup>  $10^{1}$ en loo uen loo uen loo 10<sup>-1</sup> 10<sup>-2</sup> 10<sup>0</sup> 10<sup>-3</sup> 200 400 600 800 1000 1200

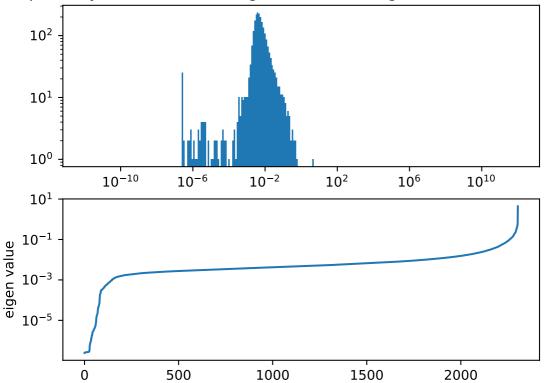
ep: 58 layer3.0.conv2 maxeig: 3.3e+00 mineig: 2.5e-07 con: 1.3e+07



ep: 58 layer3.0.shortcut.0 maxeig: 1.5e+00 mineig: 6.4e-03 con: 2.4e+02



ep: 58 layer3.1.conv1 maxeig: 4.4e+00 mineig: 2.4e-07 con: 1.8e+07



ep: 58 layer3.1.conv2 maxeig: 8.2e-01 mineig: 1.2e-07 con: 6.6e+06 10<sup>2</sup>  $10^{1}$ 10<sup>0</sup> 1010 10-10  $10^{-2}$ 10<sup>2</sup> 10<sup>6</sup>  $10^{-6}$ 10<sup>0</sup>  $10^{-2}$  $10^{-4}$  $10^{-6}$ 

1000

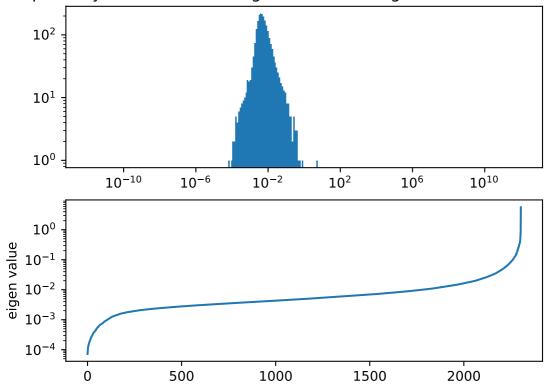
1500

2000

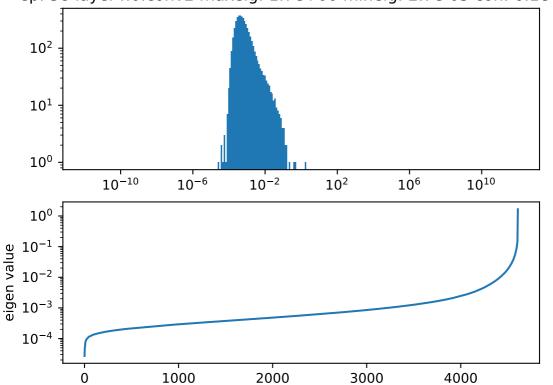
500

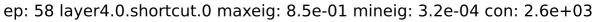
eigen value

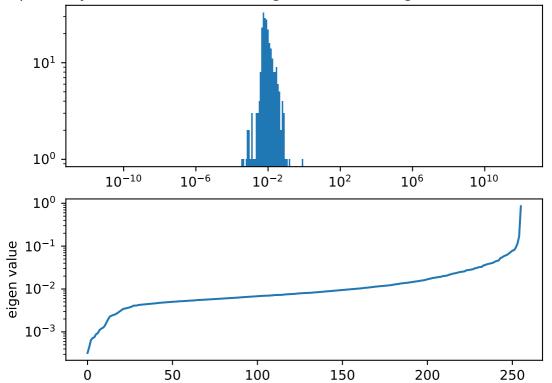
ep: 58 layer4.0.conv1 maxeig: 5.6e+00 mineig: 7.2e-05 con: 7.8e+04



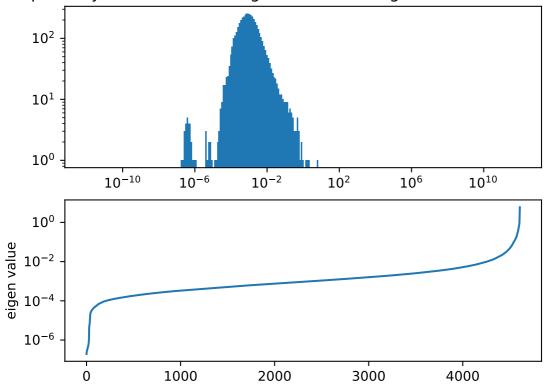
ep: 58 layer4.0.conv2 maxeig: 1.7e+00 mineig: 2.7e-05 con: 6.1e+04







ep: 58 layer4.1.conv1 maxeig: 5.9e+00 mineig: 2.0e-07 con: 3.0e+07



ep: 58 layer4.1.conv2 maxeig: 3.6e+00 mineig: -2.7e-08 con: 1.1e+11

