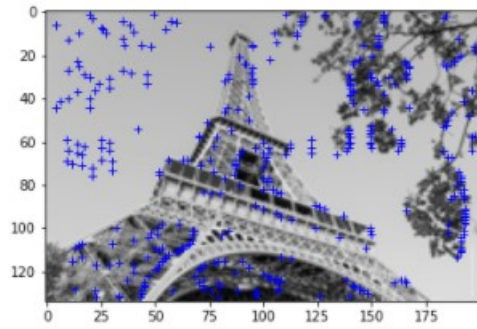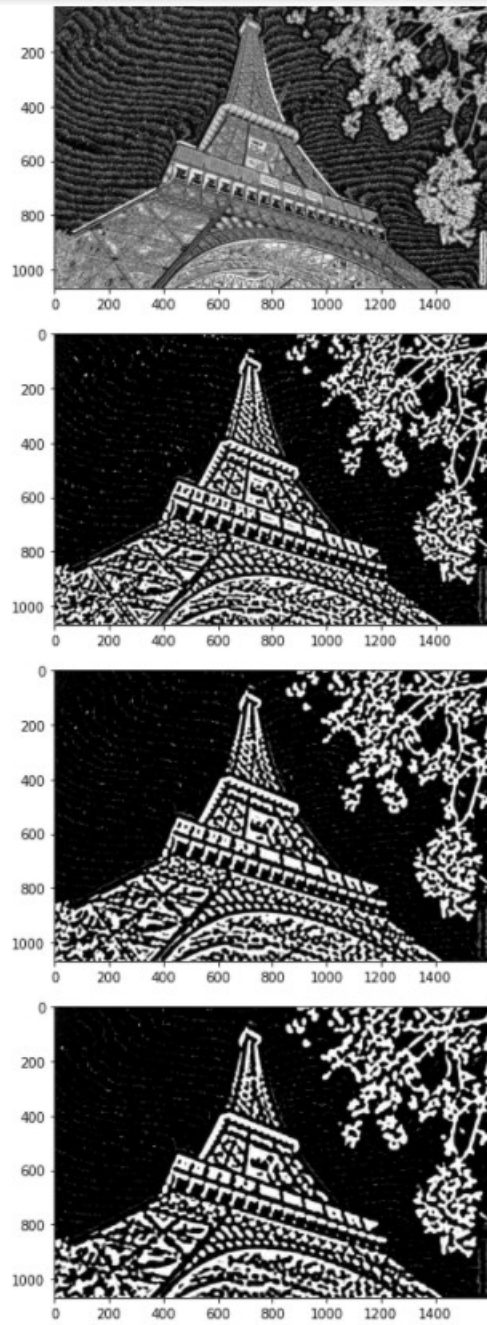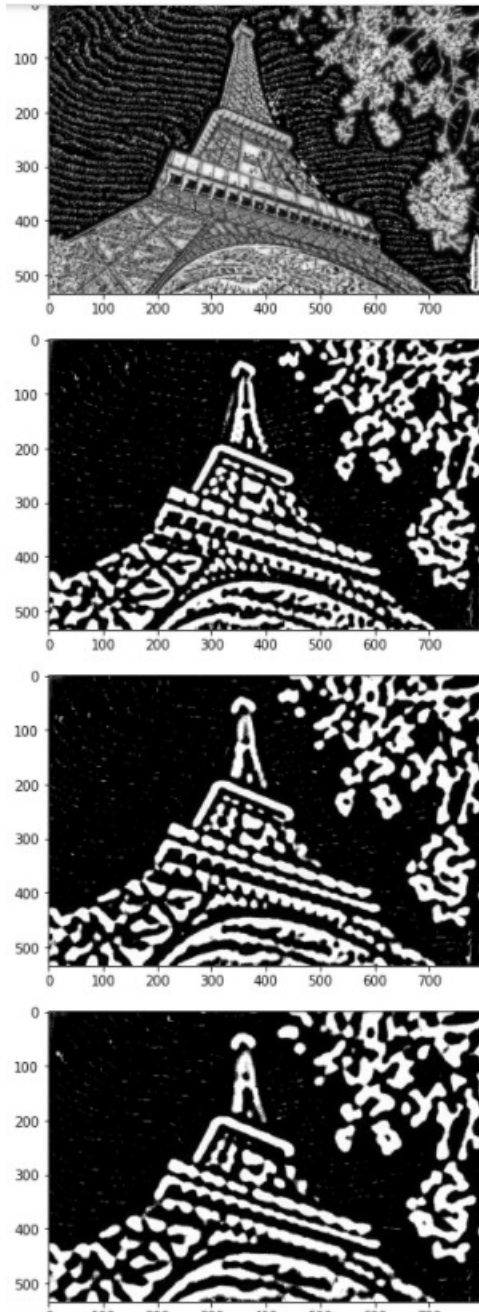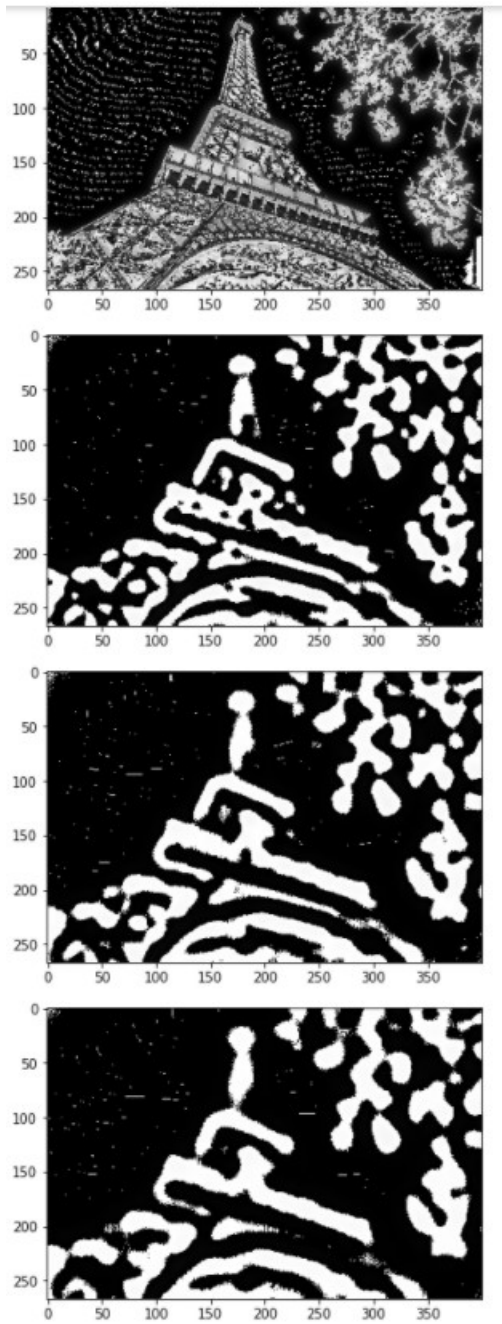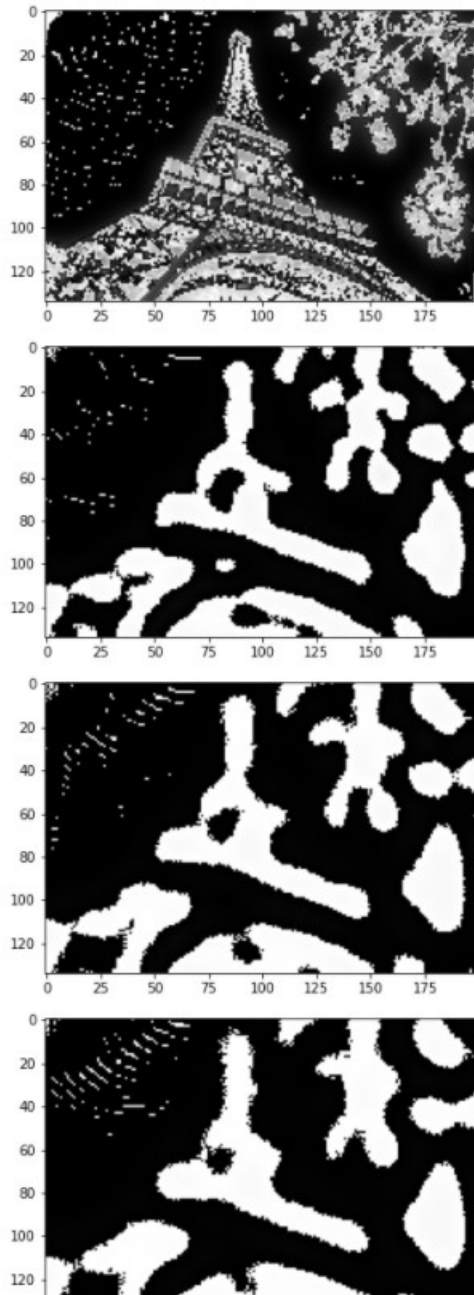Brianna Solano

(a)

Octive 1 DoG

Octiave 2 DoG

Octiave 3 DoG

Octiave 4 DoG

(b)

Features in this approach require one to take an image, downscale the image into different octives and blur the images usign guassian blur. Once complete, these gussian blurs are subtracted from the other images from their same ovtiave and generate a set of diffrenece of gussain. These steps are hard coded into the process of sift. Feartures in a deep learning network are adabitable. These features repeatedly go through convolution operations and is the signal is repeatdily filtered. Therfore, they provide a more accurate result then that of a the

features in this approach.

(c)

The advanatge of learned features is the their trainble aspect. With a deep learning network, these features can be constntly train and adapt to these features. Deep learning networks obtain a higher accuracy rating when compared to hand crafted features. Unlike a handcrafted features, which doesn't have this trainable aspect. With handcrafted features the user has to code the processes and is not adaptiable to changes like a deep learning network. The disadvantages of a deep learning working is that is a power hungry. When training a deep learning network to identity certain features, it requires a great amount of computation power and gpu power.