

## HW2: Problem 1

Ian Dover

### 1 Part A

Image converted to greyscale:



Figure 1: Greyscale image.

### 2 Part B

#### 2.1 Subsection 1

Image with zero-mean Gaussian white noise with variance of 0.01:



Figure 2: J1: Greyscale image with gaussian noise applied.

#### 2.2 Subsection 2

Image with salt-and-pepper noise, affecting approximately 5% of pixels:

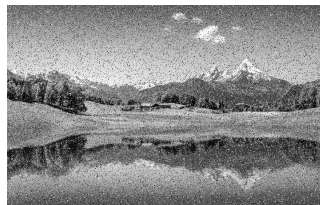


Figure 3: J2: Greyscale image with salt-and-pepper noise applied.

### 3 Part C

#### 3.1 Subsection 1

#### 3.2 J1

Images with gaussian filter denoise:

#### 3.3 J2



Figure 4: Gaussian filter denoised J1.

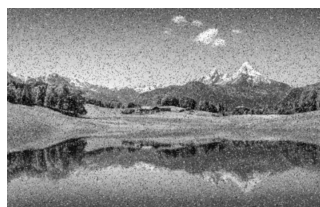


Figure 5: Gaussian filter denoised J2.