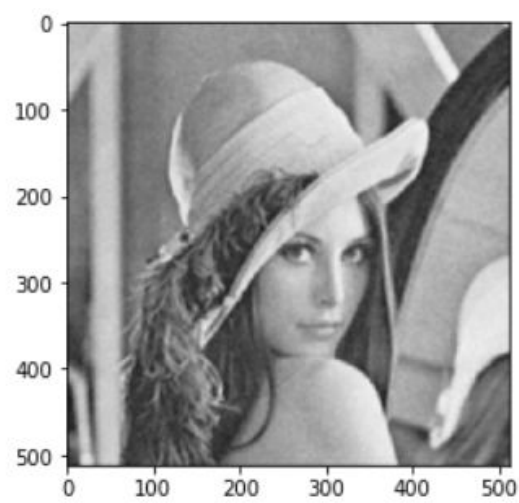
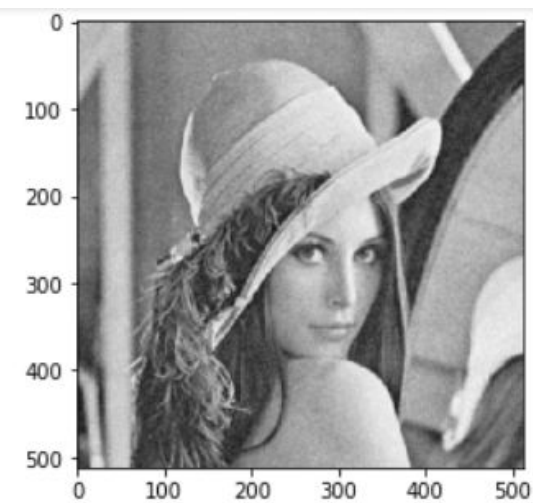
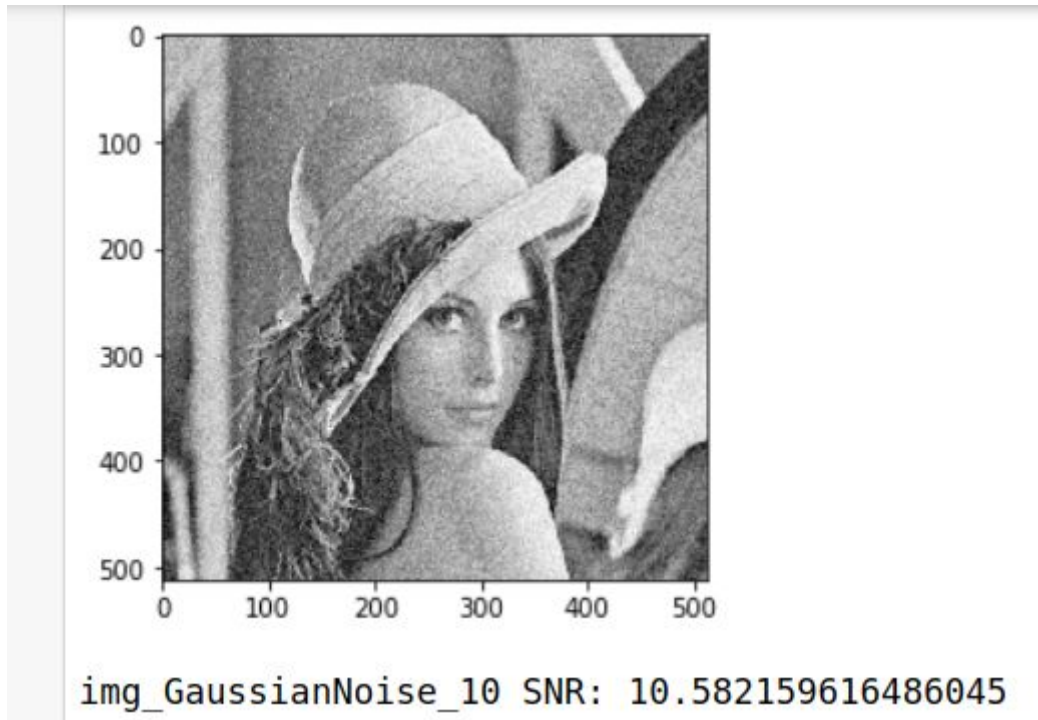
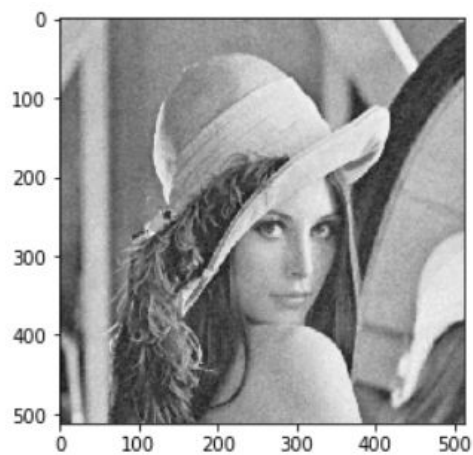


Computer Vision Homework8 report

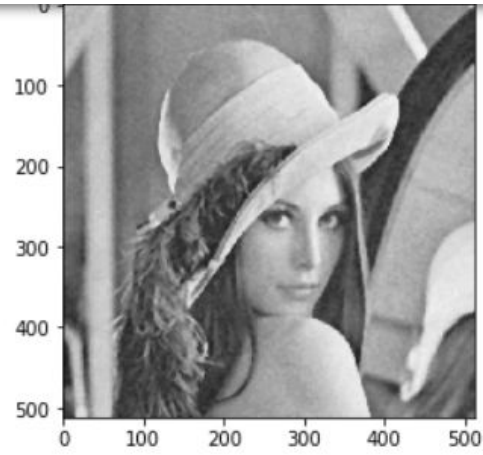
R08922143 賴振東

1. Noisy images with gaussian noise(amplitude of 10), and the operations

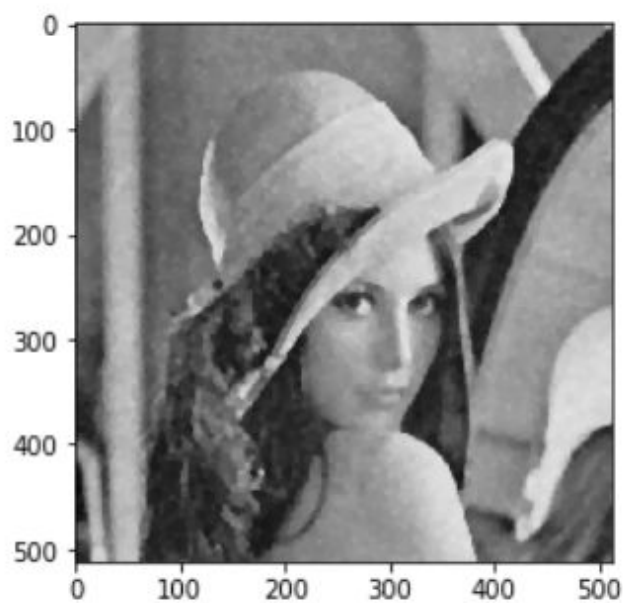




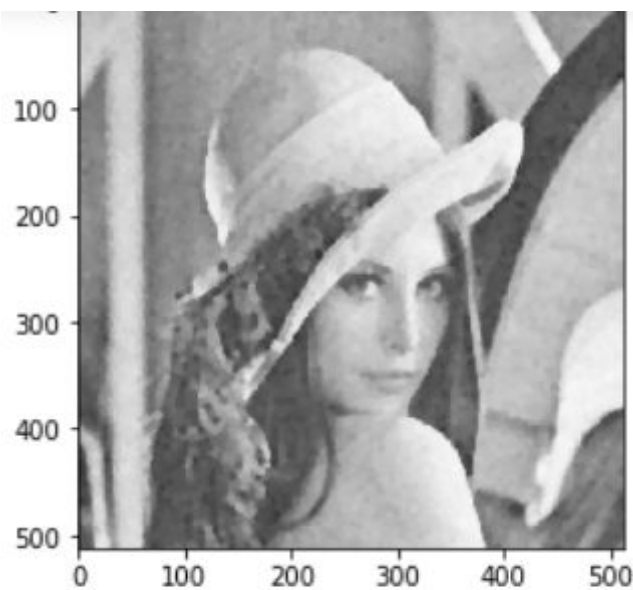
median_filter_G10_3x3 SNR: 15.871028776344156



median_filter_G10_5x5 SNR: 15.202067497138092

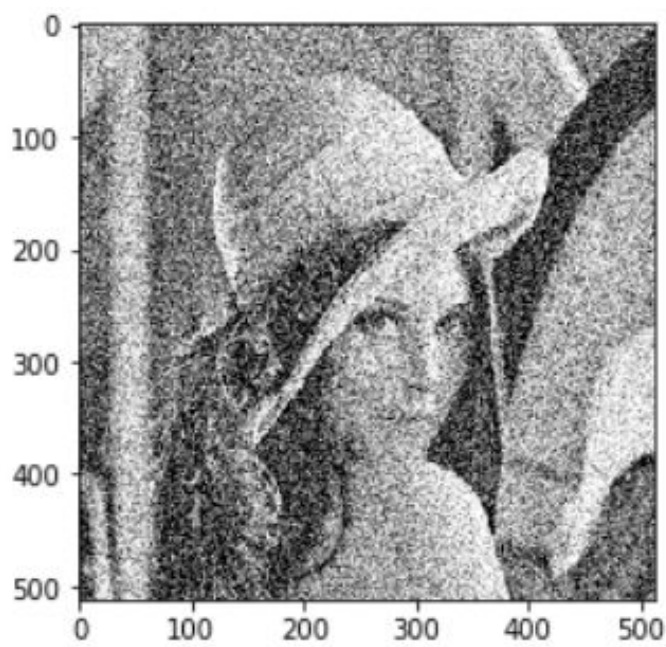


oc_G10 SNR: 12.869013087216084

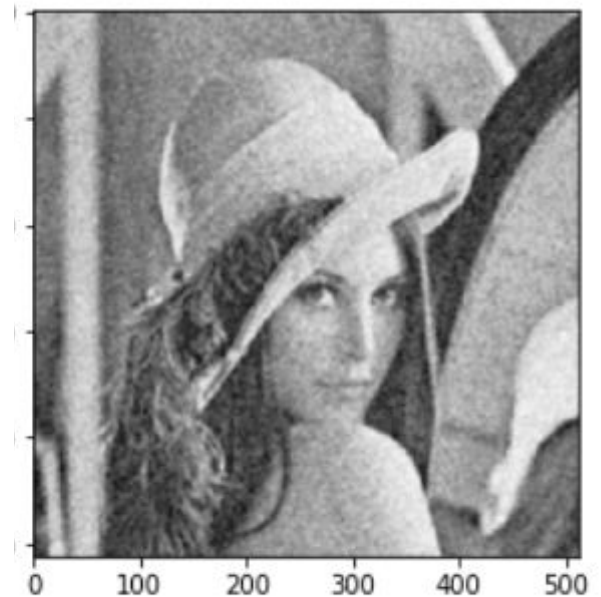
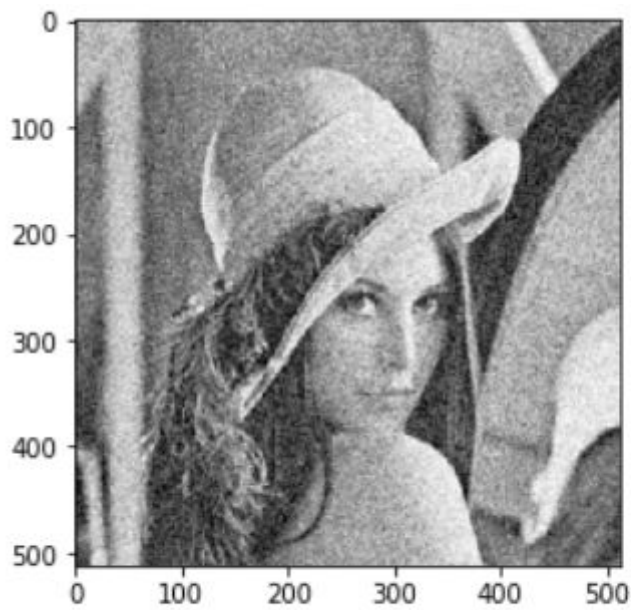


co_G10 SNR: 13.102026914070791

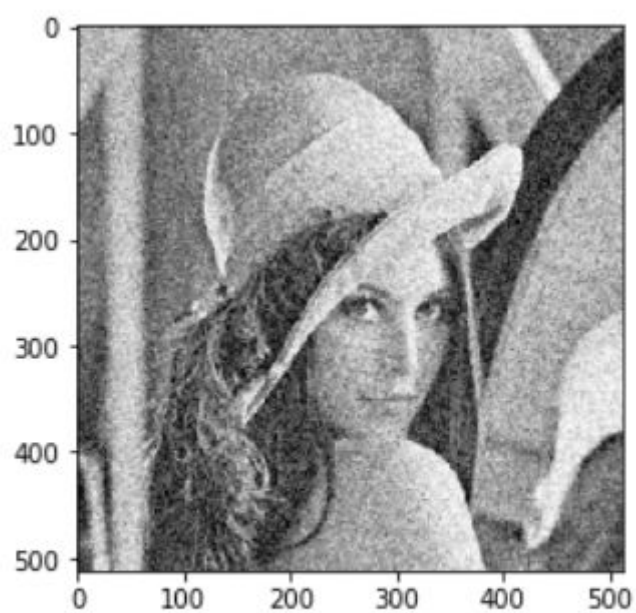
2. Noisy images with gaussian noise (amplitude of 30), and the operations



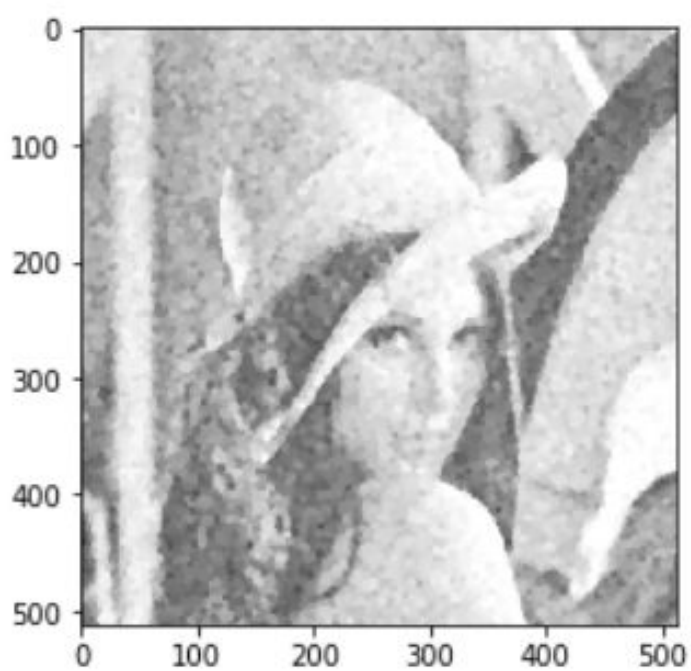
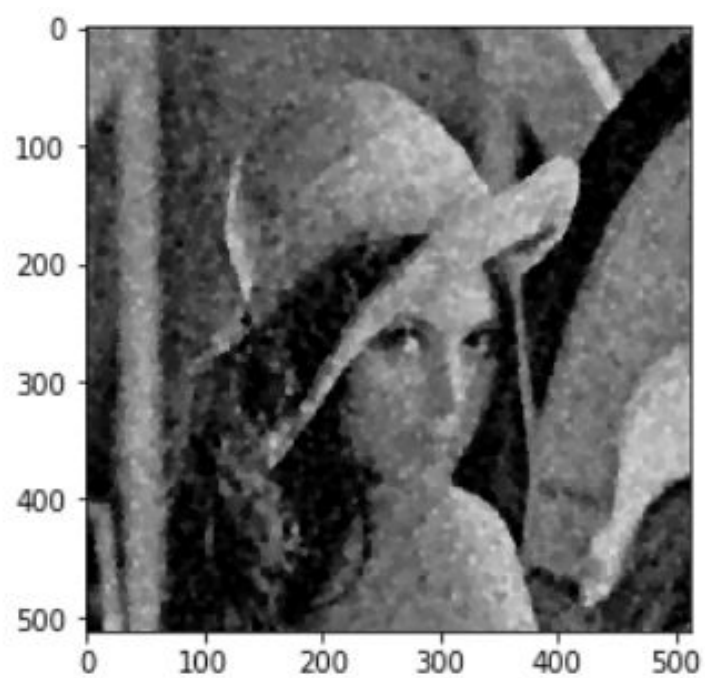
img_GaussianNoise_30 SNR: 1.1060348709648216



boxfilter_G30_3x3 SNR: 9.840695431928022 filter_G30_5x5 SNR: 11.364750313



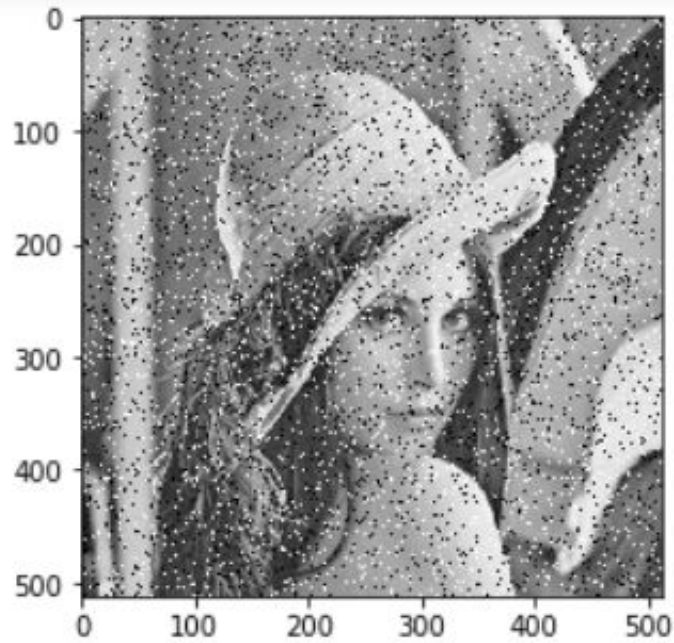
median_filter_G30_3x3 SNR: 8.361866565208482 |_filter_G30_5x5 SNR: 10.76217



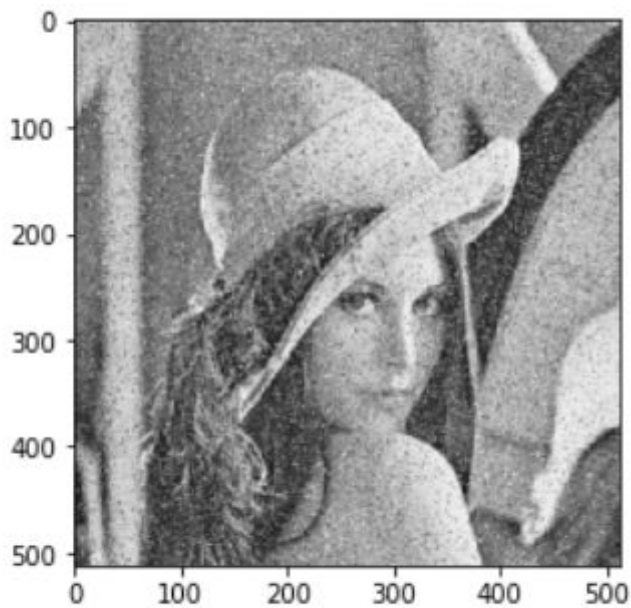
oc_G30 SNR: 9.868676183602243

co_G30 SNR: 9.74582246847833

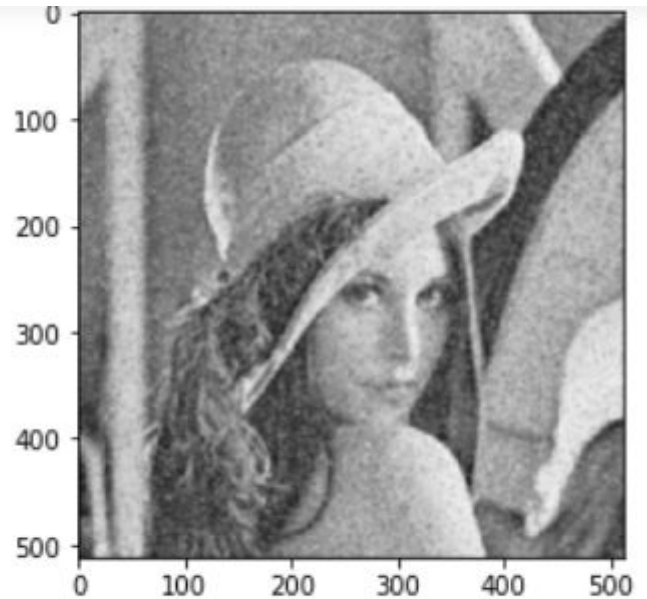
3. Salt-and-pepper noise, probability=0.05, and the operations



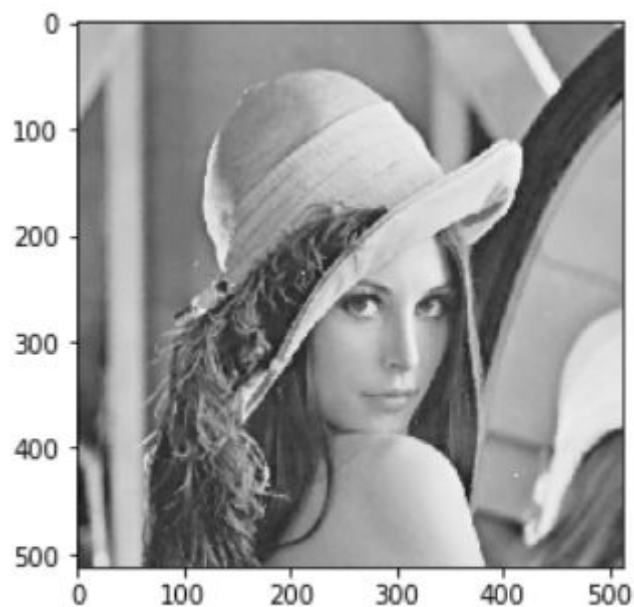
img_SaltAndPepper_005 SNR: 0.960553723260913



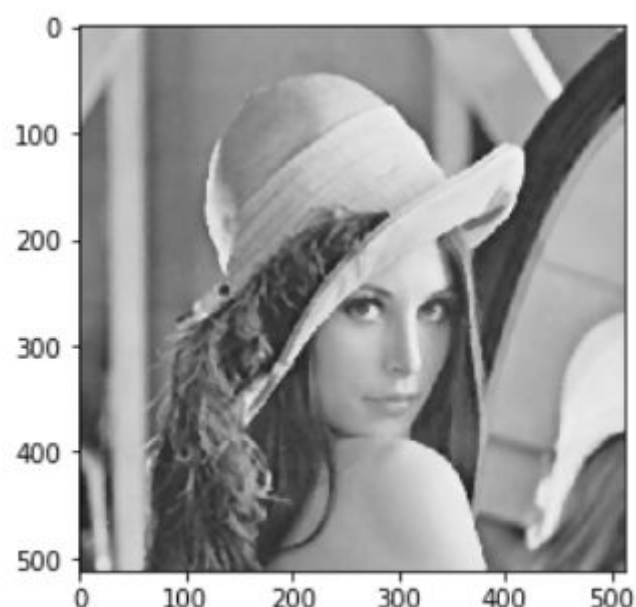
boxfilter_SAP005_3x3 SNR: 9.2707610!



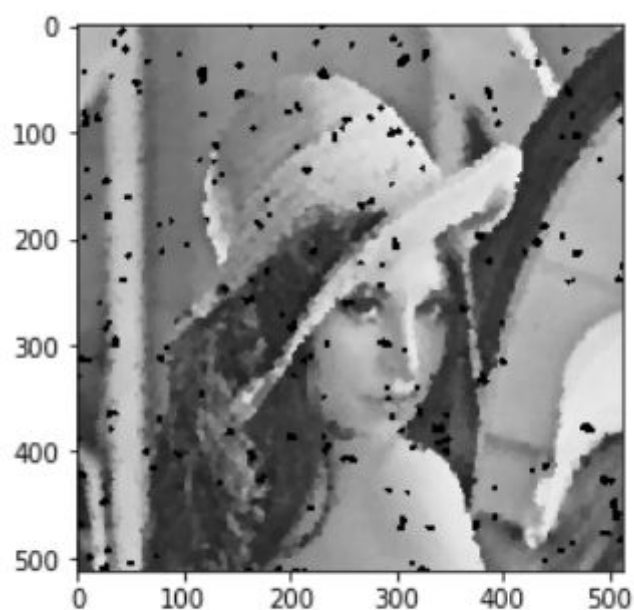
boxfilter_SAP005_5x5 SNR: 10.58522997



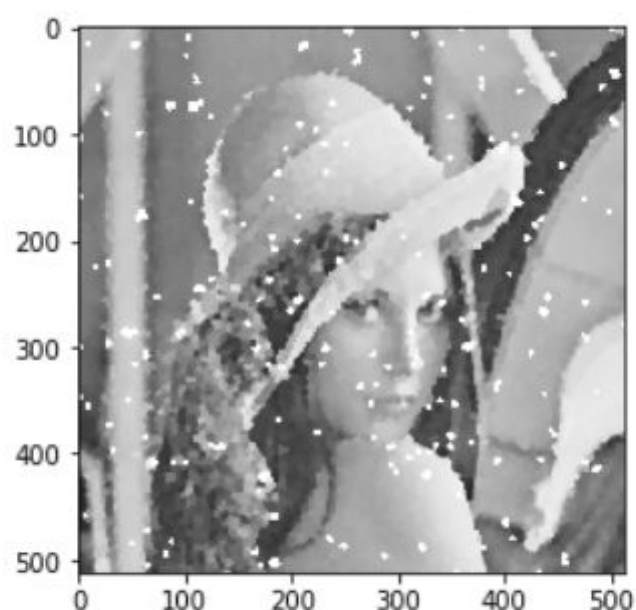
median_filter_SAP005_3x3 SNR: 18.391



median_filter_SAP005_5x5 SNR: 15.844

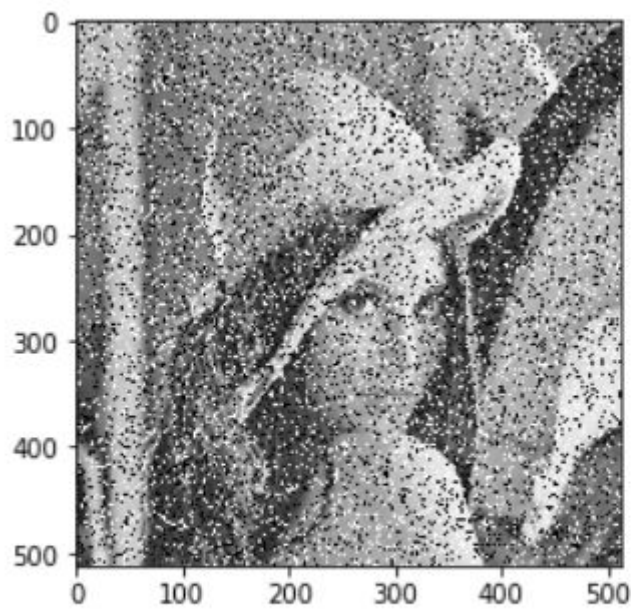


oc_SAP005 SNR: 5.632387268088957

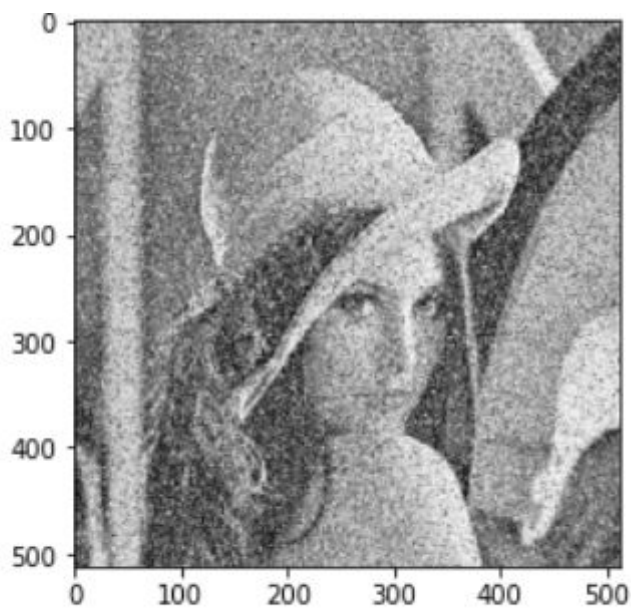


co_SAP005 SNR: 5.2533349222179755

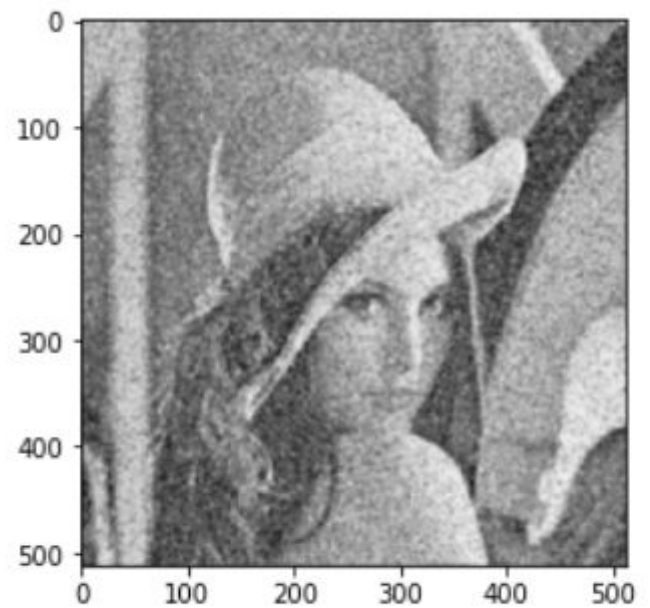
4. Salt-and-pepper noise, probability=0.1, and the operations



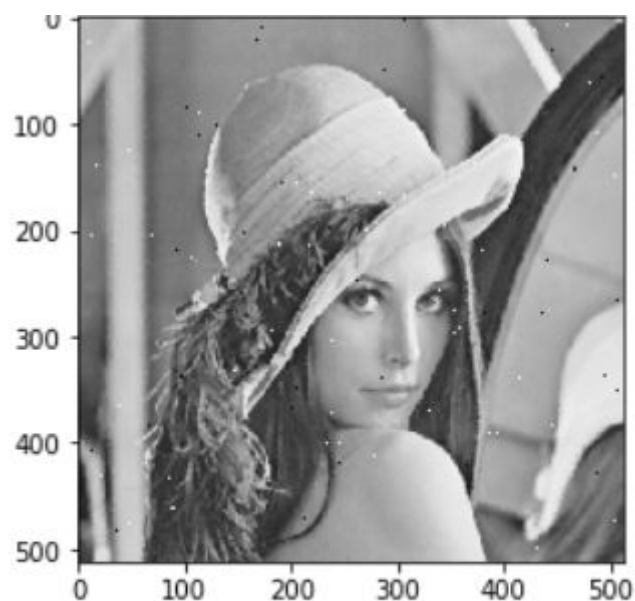
img_SaltAndPepper_01 SNR: -2.1134794115489886



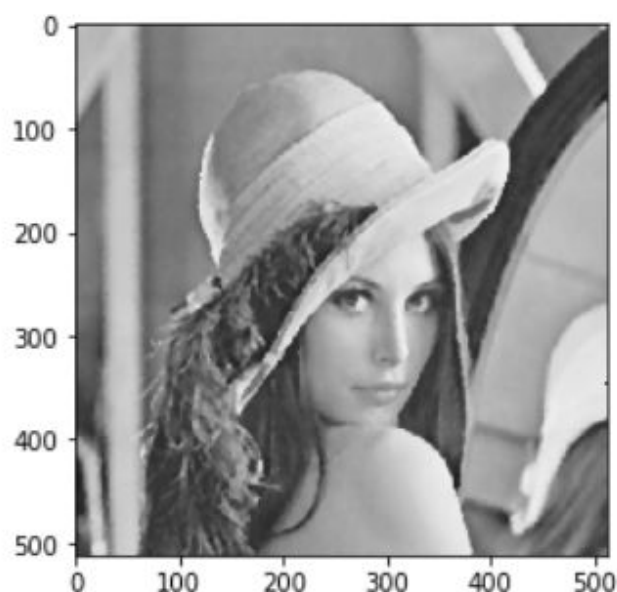
boxfilter_SAP01_3x3 SNR: 6.197246757663



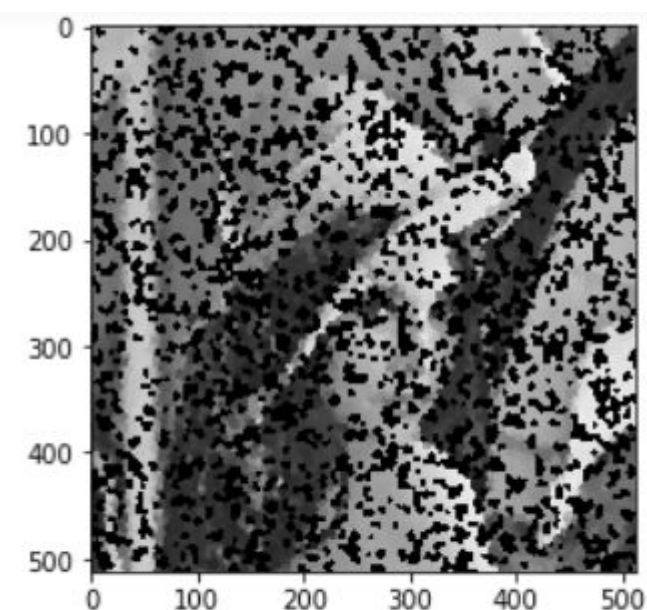
boxfilter_SAP01_5x5 SNR: 8.1493492



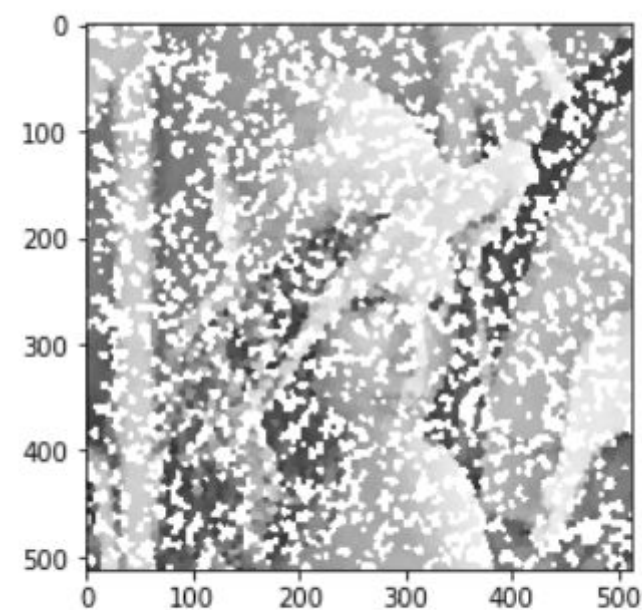
median_filter_SAP01_3x3 SNR: 14.11578



median_filter_SAP01_5x5 SNR: 14.241946



oc_SAP01 SNR: -2.0318200503358743



co_SAP01 SNR: -2.533524998007206

p.s oc means opening then closing, co means closing then opening

