

Photo Compression

Professor R. Ghaderi

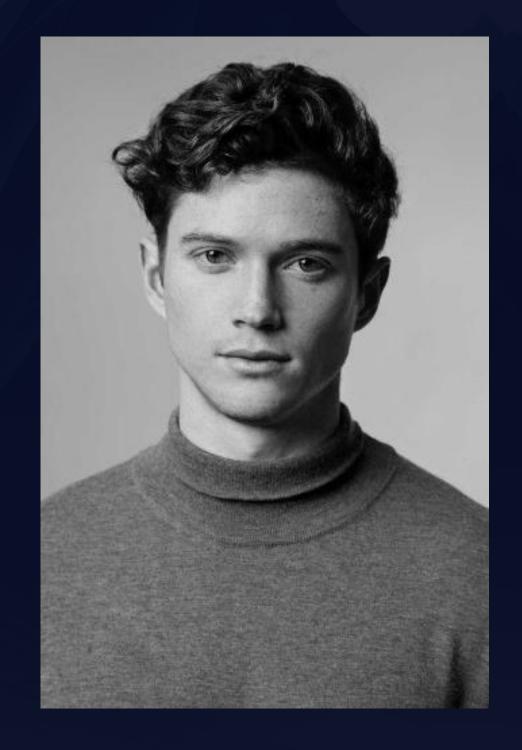
Seyed Mohammad Sajadi

Photo preparation



Original img

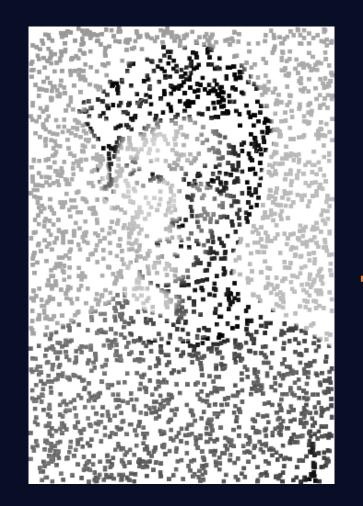
to Gray img



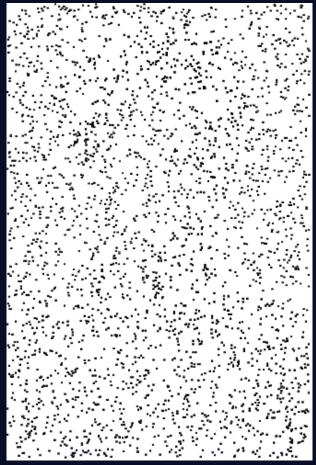
The parameters for training

Max Iter	Hidden Layer Sizes	Test Size	Random State
5000	400,200	0.05	42

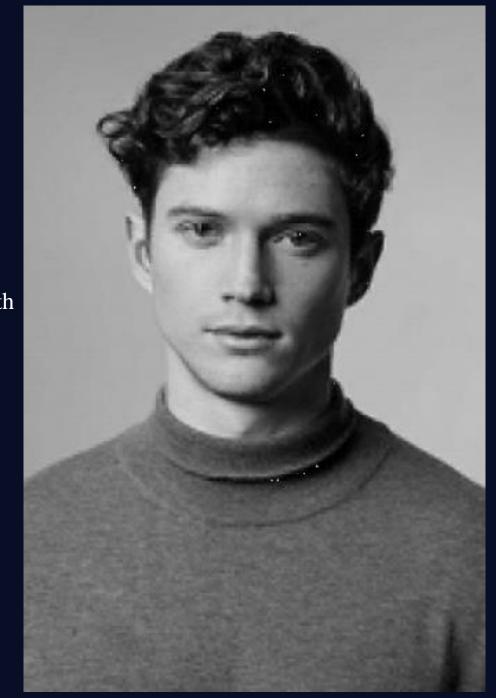
8x8 box



Compress img



Reconstructed with neural network



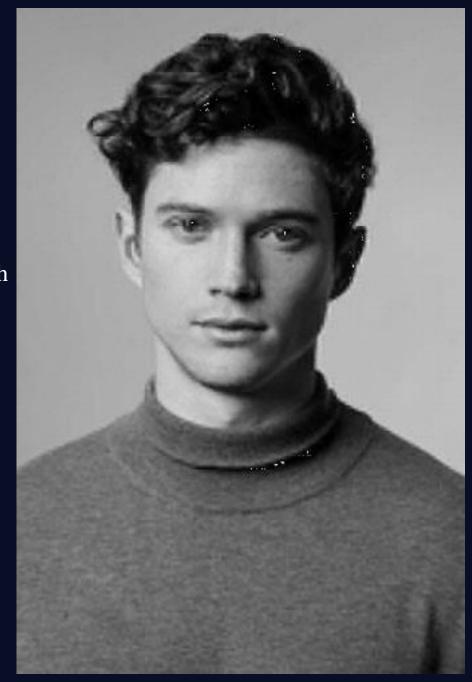
16x16 box



Compress img



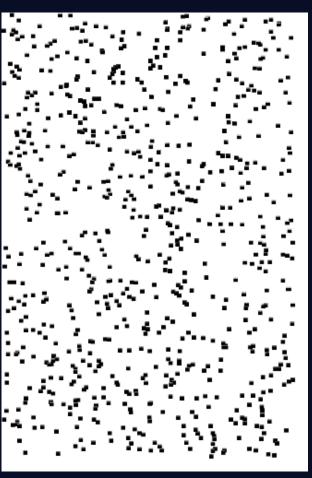
Reconstructed with neural network



32x32 box



Compress img



Reconstructed with neural network



Final Result

Framing	8 x 8	16 x 16	32 x 32
Smaller Framing	4 x 4	4 x 4	8 x 8
Samples Number	4000	2000	1000
PSNR (dB)	33.97	33.87	32.22



Thank for your patience