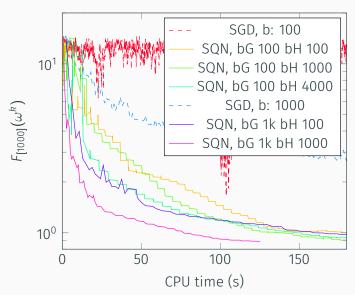
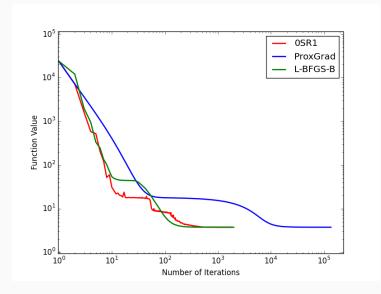
APPENDIX

EEG: Fixed Subset Objective vs. CPU time



PROXIMAL METHOD

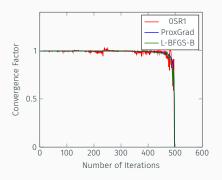


PROXIMAL METHOD

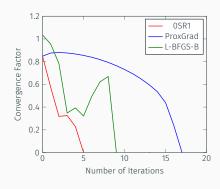
$$F(x) = ||Ax - b|| + \lambda ||x||_1$$

$$A \in \mathbb{R}^{1500 \times 3000}, \ b \in \mathbb{R}^{1500}$$

$$A_{ij}, \ b_i \sim \mathcal{N}(0, 1), \ \lambda = 0.1$$



$$\begin{split} F(x) &= \|Ax - b\| + \lambda \|x\|_1 \\ A &\in \mathbb{R}^{2197 \times 2197}, \ b \in \mathbb{R}^{2197} \\ A &: \text{ Discretization of 3D Laplacian} \\ \lambda &= 1 \end{split}$$



PROXIMAL METHOD

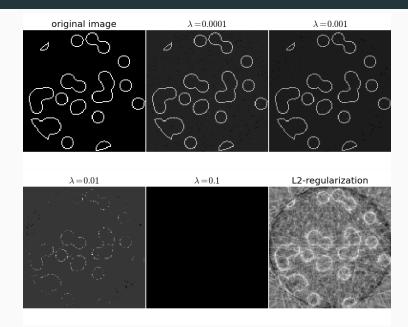




Figure 1: Noisy image



Figure 2: Reconstructed image

Figure 3: Dictionary learned