DISCLAIMER: Code shared in this toolbox is experimental and is meant for non-commercial use only. No warranty is provided or implied. Use at your own risk. Please use this toolbox only if you accept that the authors shall not be held responsible in the unlikely event of any loss of data or software or hardware malfunctions resulting directly or indirectly out of use of this toolbox.

This toolkit contains the main Matlab function and other supporting functions required to denoise noisy images using our PLOW method. This distribution contains a "demo.m" script that demonstrates how the PLOW toolbox can be used to denoise images with different parameters. Most of the functions are in Matlab. However, some precompiled code (written in C) is also used to speed up certain parts of the denoising process. The source code for these precompiled files are also included with this distribution.

DEPENDENCIES: For the code to work you will need to have license for the **Matlab statistics toolbox**. This code has been verified to work with Matlab 2009b. The package has not been checked for backward compatibility with older versions. The Mex files are compiled with **BLAS/Lapack libraries** which are included with recent versions of Matlab. Instructions to compile the C codes using the libraries are provided at the top of the relevant C codes.

When reporting results obtained from this code, please cite the related papers below.

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Related papers:

[1] P. Chatterjee, and P. Milanfar, "Patch-based Near-Optimal Image Denoising", IEEE Transactions on Image Processing, vol. 21, num. 4, April 2012.

[2] P. Chatterjee, and P. Milanfar, "Patch-based Locally Optimal Denoising", Proc. of IEEE International Conference on Image Processing, pp. 2553-2556, September 2011.

For questions and/or suggestions, please first refer the paper. You can reach the authors at {priyam, milanfar}@soe.ucsc.edu

We thank you for your interest in our work.