Works Cited

Mathematical Optimization: Solving Problems using SCIP and Python — Mathematical

Optimization: Solving Problems using Gurobi and Python,

https://scipbook.readthedocs.io/en/latest/. Accessed 1 December 2025.

"Animations using Matplotlib — Matplotlib 3.10.7 documentation." *Matplotlib*,

https://matplotlib.org/stable/users/explain/animations/animations.html. Accessed 1

December 2025.

"Create 'wet-dry' mask grid." *PyGMT*,

https://www.pygmt.org/dev/gallery/images/grdlandmask.html.

Fernando Costa, Jose. "Create a custom shape mask with Python & Pillow." *Medium*,

https://levelup.gitconnected.com/create-a-custom-shape-mask-with-python-pillow-9f566d

d1e6ae.

Gruppetta, Stephen. "Image Processing With the Python Pillow Library – Real Python." *Real*

Python, 8 January 2025,

https://realpython.com/image-processing-with-the-python-pillow-library/. Accessed 1

December 2025.

"How to get centerline of the mask images." *Stack Exchange - Geometric Information Systems*,

https://gis.stackexchange.com/questions/466063/how-to-get-centerline-of-the-mask-ima

ges.

"How to obtain the skeleton of a binary image with scikit-image." *Stack Overflow*,

https://stackoverflow.com/questions/42910106/how-to-obtain-the-skeleton-of-a-binary-im

age-with-scikit-image.

"Image processing with Python and SciPy." *Prancer Physics at Louisville*,

https://prancer.physics.louisville.edu/astrowiki/index.php/Image_processing_with_Python

_and_SciPy.

"Interpolation (scipy.interpolate)." *Numpy and Scipy Documentation*,

https://docs.scipy.org/doc/scipy/tutorial/interpolate.html. Accessed 1 December 2025.

"Introduction to scikit-learn & scikit-image — MRI analysis in Python using Nipype, Nilearn and

more." *Peer Herholz*,

https://peerherholz.github.io/workshop_weizmann/prerequisites/python_scikit.html.

Accessed 1 December 2025.

Lalla-Ruiz, Eduardo. "Heuristics in Python."

https://www.utwente.nl/.utwente_base/ws2016/download.shtml?f=UKq5uSJwd7KXfq3Ab

euMqkdFAe0orA.C4WbWjxDIMLG-YuV.Ft8GDmt8PdjGSuZr_LC4pw.

"Masking grid cells." *PyGridTools*,

https://pygridtools.readthedocs.io/en/latest/tutorial/02_ShapefilesAndCellMasks.html.

"pathfinding 1.0.18." *pypi*, https://pypi.org/project/pathfinding/.

"Python - Nodes." *Tutorials Point*, https://www.tutorialspoint.com/python/python_nodes.htm.

Accessed 1 December 2025.

"SciPy Interpolation." *W3Schools*,

https://www.w3schools.com/python/scipy/scipy_interpolation.php. Accessed 1 December

2025.

"Skeletonize — skimage 0.25.2 documentation." *Scikit-image*,

https://scikit-image.org/docs/0.25.x/auto_examples/edges/plot_skeleton.html. Accessed

1 December 2025.

"Tutorial — NetworkX 3.6 documentation." *NetworkX*,

https://networkx.org/documentation/stable/tutorial.html. Accessed 1 December 2025.

"Tutorial — NetworkX 3.6 documentation." *NetworkX*,

https://networkx.org/documentation/stable/tutorial.html. Accessed 1 December 2025.