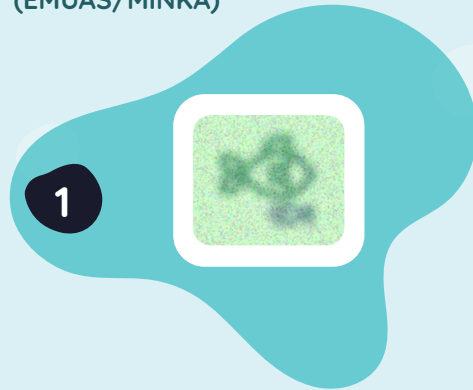


ATIRES

- ATIRES (Automatic underwater Image REstoration System) computationally enhances underwater images, which often suffer from color distortion and poor visibility due to water conditions. By correcting colors and improving clarity, it provides clearer images for human review and better quality input for automated analysis systems like AIES-MAC.

Image input
(EMUAS/MINKA)



The system receives a raw underwater image. The source can be the EMUAS camera system or an image uploaded by a citizen scientist via the MINKA observatory.

Image restoration



ATIRES applies computational photography methods to enhance the image. This corrects color distortion and improves visibility and contrast.

Enhanced output



The restored, clearer image is made available. It can be viewed by humans for review or sent automatically to the AIES-MAC system for further analysis, like identifying organisms.

ATIRES receives images from the EMUAS camera system and the MINKA citizen observatory. It enables clearer human review and also sends the restored images to AIES-MAC for analysis.