

MACHINE VISION.

Lab01: Capturing and displaying images

BACKGROUND.

In Lecture 1 we looked at basic OpenCV functions for capturing, recording, loading and saving images and videos. The goal of this lab is to setup a development environment and implement some basic functions to make sure that the environment is setup correctly.

Task 1.

Create a Python program that captures an image sequence from your web camera and saves it as a video to a file using OpenCV. Also display the video on screen while you are recording it.

Task 2.

Create a Python program that loads the video file created in task 1, extracts the 10th frame from this file and saves this frame into an image file using OpenCV.

Task 3.

Create a Python program that loads the image file created in task 2 and displays it on the screen using OpenCV.