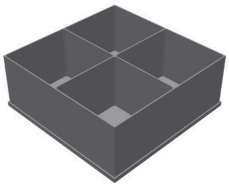
Feb 28, 2025

Mouse OpenField + ANY-Maze Protocol

This protocol is a draft, published without a DOI.



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Protocol status: Working
We use this protocol and it's working

Created: September 26, 2023

Last Modified: February 28, 2025

Protocol Integer ID: 88429

Abstract

OpenField setup and analysis with ANY-Maze for the mouse room. September 2023

Guidelines

Try not to move the camera too much and not tare the grey tape on the floor.

Materials

OG C1 Camera
SD card (already in the camera)
USB chord with orange tape
OpenField apparatus
ANY-Maze laptop

Setup and Record Experiment

15m

1 - Plug the USB cord with orange tape connected to the ceiling camera to the power strip on the ground. This will turn on the camera
- Slowly and carefully move the apparatus to align with the grey tape on the floor

PLEASE BE CAREFUL NOT TO TARE THE GREY TAPE!

- Set the infrared lights around the apparatus.
- On the remote, press the infrared button **(1)**
- Switch off the lights
- Press the record button **(2)** on the remote to start recording the session (**10 min recording**)

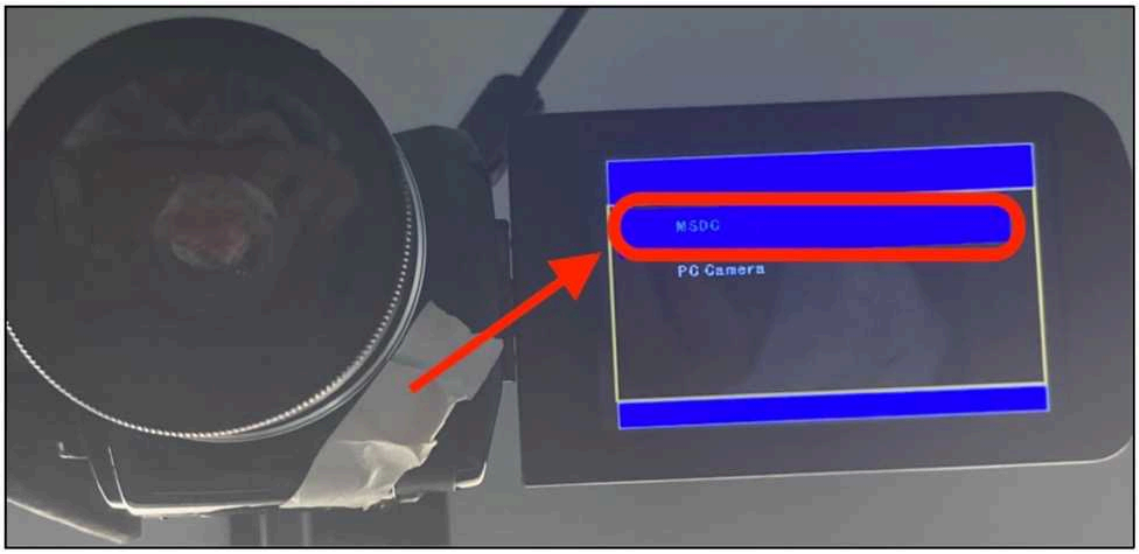
ANY-Maze Analysis

1h

2 Transfer Data to Laptop:

- Turn on the laptop (Password: 2020).
- Plug the USB cord with orange tape to the laptop

PLEASE BE CAUTIOUS NOT TO MOVE THE CAMERA!



On the camera, press “**MSDC**” on the touch screen

On the top of the camera, press “**Photo**”

- This will open a new window on the laptop with the folder of the SD card.

- Transfer your files on the card into your personal folder.

- Open the application "ANY-maze" on the desktop.
- Open the " Mouse OpenField 2023 Selene BZ protocol".

3 Protocol Configuration:

- Navigate to the "Protocol" tab.
- Under "Video source," choose "OG1 Camera" and select your video file to use.
- Apparatus Setup: Define zone limits for each box:
    o Disabled unused chamber (if testing fewer animals).
    o Adjust orange rectangles for exterior and center zones. The center zone must always be 40% of the total area.
    o Also adjust the green ruler to match the apparatus side.
- Behavior Setup: Move to "Zones" and verify that the correct zones are highlighted in blue.

4 Experiment Configuration:

- Move to the "Experiment" tab.
- Specify an experiment title.
- Add treatments with the corresponding number of animals (example: nicotine A, vehicle B)
- in the "View animals" tab, assign treatment to each animal (example = A for nicotine).

5 Test Execution:

- Proceed to the "Test" tab.
- Ensure everything is set correctly.
- Click "Rewind and start the video at a test start" while pressing the start button.
- If the initial start doesn't work correctly, click "Stop," scroll down to the start button, and select "Start the video at a test start" **twice** to begin when desired.
- If issues arise, the experiment can be restarted by canceling in the left window.
- After completing one animal, load another video and repeat.

6 Results Analysis:

- Go to the "Result" tab.
- Choose desired results, configure "Data Grouping", adjust "Report Format," and track plot.
- View Plots.
- Save what you want to save : protocol, text, track plot, ...