

Achrom Experiment Instructions

In this task you will look through these two holes (point) to see images and make responses using this videogame controller. On each trial, the image you see will look basically like this (show picture). The decision you make on each trial will concern test objects that quickly appear and disappear in the middle of the scene (show examples). Sometimes the test objects will be disks, and sometimes spheres.

There are two different types of trials. In one type you are to make judgments about whether the test surface is best characterized as reddish or as greenish. When you make that judgment you would use the left key to respond reddish and the right key to respond greenish. In the other type of trial you are to make judgments about whether the test surface is best characterized as bluish or as yellowish. When you make that judgment you would use the left key to respond bluish and the right key to respond yellowish. If you forget which key is which, please ask the experimenter.

Some of the test surfaces you see may not easily judged in terms of reddish/greenish or bluish/yellowish. For example you might see a test surface that appears predominantly blue on a reddish/greenish trial. If this occurs you should continue to make a judgment along the directed dimension to the best of your ability. In the example of the blue test surface on a reddish/greenish trial, you would still make your best judgment as to whether the blue surface is more reddish or more greenish.

Please indicate your responses as quickly and accurately as possible after the object disappears. Trials of each type will come in alternating blocks, so you will respond to multiple red/green trials before switching to blue/yellow trials. The switch in task will be indicated by the computer's voice. At the beginning of a set of trials it will indicate which block you are currently on and will wait for you to press a button. After this it will then say either red/green or blue/yellow to indicate which task you should perform for the next set of trials. After the computer has spoken you can press either key on your response pad to begin making judgments of the type indicated by the computer voice. After you make a response to one stimulus the next stimulus will automatically appear.

Earlier, we had you judge the appearance of grayscale blocks, and emphasized that we wanted you to judge the color the blocks appeared to be painted with, independent of the lighting that fell on the blocks. In making your responses in this experiment, we'd like you to make that same type judgment about the test objects – make your judgment about the color they appear to be made of, independent of the illumination in the scene.

If you feel that you need a break, please wait until the computer voice indicates which block you are on and then take your break before pressing the button to hear the instructional cue. There are 30 blocks of trials and it will take you about 15 to 20 minutes to complete them. If you take breaks between blocks of trials, please keep the lights off and stay in the room unless it is an emergency. You may take a longer break to use the restroom or perform activities in a lit room after the 30 blocks of trials is complete.