

Locomotor Activity TEST

Groups of mice that will undergo Cardiac Arrest, or Stroke surgery will also be tested for their locomotor activity. The behavior will be monitored through the Open field monitor Accuscan Fusion instrument. (<http://www.accuscan-usa.com>) Each locomotor activity chamber is a clear acrylic plastic box (40 cm L x 40 cm W x 30 cm H) with a removable plastic lid perforated with holes for ventilation and food and water at all times. The test chamber is placed into an AccuScan® (Columbus, OH) activity monitoring system. These monitors contain photocell beams and detectors that are mounted on opposite walls (2 cm above the chamber floor). General locomotor activity and the mouse position in the chamber are detected by breaks of the photocell beams, which are recorded by a computer that help acquire the data collected, such as the rest time, movement time, horizontal and vertical activity , rearing movements etc. Mice will have an acclimation run, to adapt with the new environment for a period of 30 minute one day prior of the real testing. Chambers are cleaned first with a Kimwipe soaked with water, followed by Rescue after each test run between mice. Two mice can be tested at the same time at separated compartments of the chamber. Testing time will range from 30 minutes to 60 minutes each time. Testing will take place at three different time points, pre stroke surgery, and 24 and 48 hrs. post stroke, in room 1-9809B. After the test mice will be returned to their home cage and will be transported back to the two way room awaiting the next round of tests followed by the euthanasia and tissue collection.

