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Supplementary material

Electroreception in the obligate freshwater stingray, *Potamotrygon motoro*

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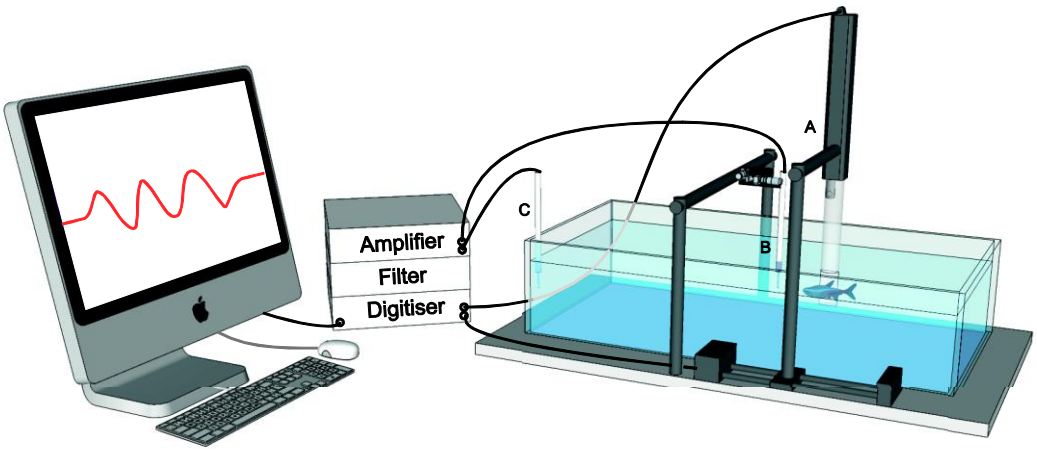

Fig. S1. Electrophysiological apparatus used to measure voltage produced by a living organism. A representative prey item was secured to a submerged stage on the arm of a linear translation system (A). The tip of a recording electrode (B) was placed at various locations along the body, and the voltage from the recording and reference (C) electrodes was differentially amplified, filtered, digitised, and visualised on a computer. For the distance trials, the fish was moved in automated 1-cm increments away from the recording electrode using the linear translation system.

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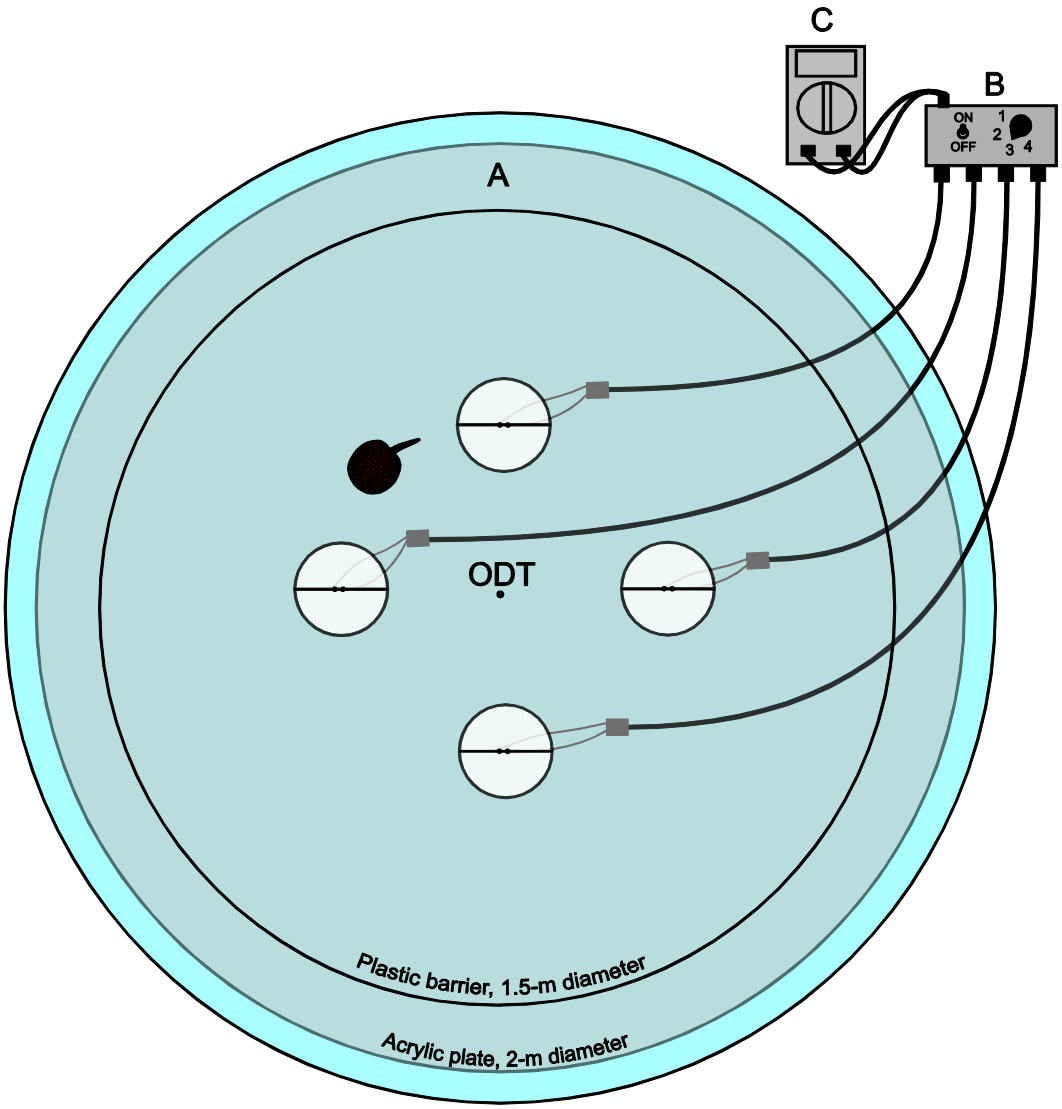

Fig. S2. Simplified top-down view of experimental apparatus for behavioural sensitivity trials. An acrylic plate 2 m in diameter (A) rested on the bottom of the experimental tank of equal diameter. Electrodes connected to the centre of each 20-cm-diameter circle on the plate were controlled by a bioelectric field generator (B) that emits an electric current. Current was monitored using a multimeter (C). To encourage prey-searching behaviour, an odour stimulus was introduced into the tank before electrode activation by an odour-delivery tube (ODT) mounted flush to the middle of the plate.