



220A Olfactometer

Reliable, fast and repeatable odor production for demanding olfaction experiments

The 220A Olfactometer delivers odors of a desired concentration at the precise time required for studying behavioural response, central processing of olfactory information in the brain and for sensory physiology.

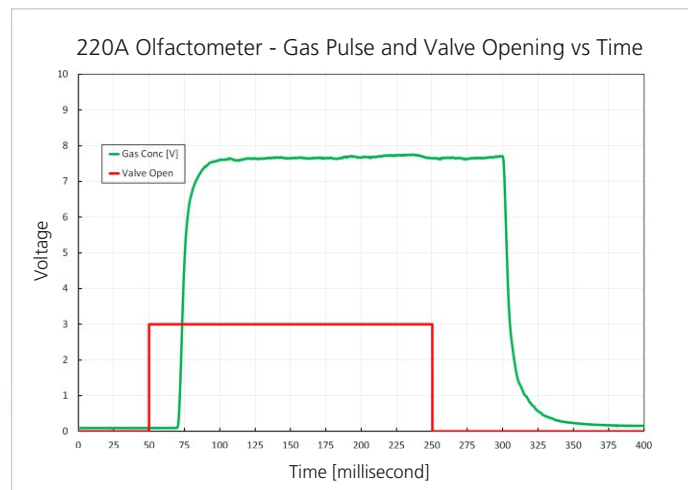
Optimal fluid design ensures repeatable odor profiles generated with minimum time delay between activation and arrival of the odor at the subject. The system uses three mass flow controllers and a series of precision valves to mix the selected odorant with clean air. The 220A can be configured with 4, 8, 12 or 16 vials for maximum flexibility. Odorants are stored in liquid phase.

The Olfactometer is designed for continuous airflow and washing to eliminate odorant residues, decreasing the likelihood of cross-contamination. A final valve located close to the release point is used to switch between clean air and the odorant stream, achieving steady state concentration in as little as 25 milliseconds. In addition, the 220A can produce multiple odor applications during a single experiment without the need to change vials.

Lab tested design with proven performance, the 220A Olfactometer will quickly and reliably produce odors at the desired concentration for the most demanding olfaction experiments.

System Features

- modular design permits 4, 8, 12 or 16 odor vials to be chained together
- Includes control software (Windows based) for maximum programming flexibility
- three mass flow controllers ensure repeatable odor profile
- 25ms odor switching time due to final valve located at animal chamber
- easily integrated with the 200B Fast Response Olfaction Sensor for odor verification
- continuous washing of odorant residue to minimize cross-contamination



220A Olfactometer, shown with optional 220A-V 4-channel plug-on module, provides 8 or up to 16 odor channels for maximum experimental flexibility.



Specifications - 220A-4

Mass Flow Controller: Odor: 0-100 SCCM
Clean Air: 0-1000 SCCM
Exhaust Air: 0-1000 SCCM

Odor Dilution Range: 0.2% - 10% of vial odor concentration

Odor Pulse Delay: 25 msec (final valve switching to steady state odor conc.)

Odor Pulse Duration: 30ms – continuous

Channel Expansion: 4-channel plug-on vial modules (max 16 channels); automatic controller config.

Temperature Range: 0 - 40°C

Dimensions (LxWxH): 31 x 20 x 15 (cm)

Weight: 4.6kg

Power: IN: 100 – 240 VAC, 1.8A