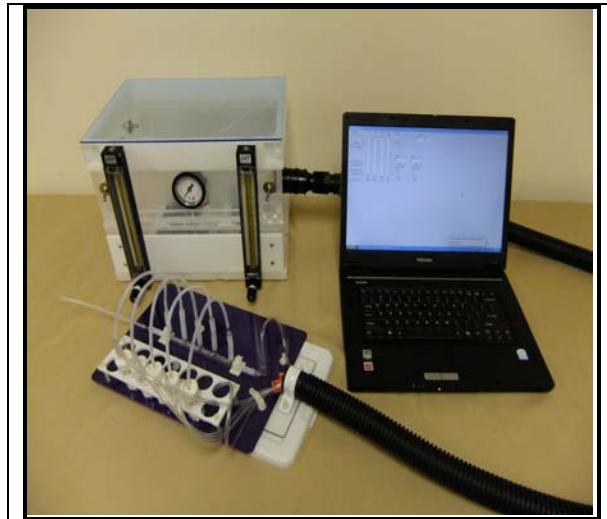


## OLFACT-fMRI™

**The OLFACT-fMRI is a computerized, odor delivery device that has proven to be a reliable and valid instrument for fMRI studies of olfactory function.**



*Applications include mapping olfactory centers, pharmacological, neurodegenerative disease studies, cognitive/learning research and neuro-marketing studies in a clinical setting as well as for use in basic research.*

### **Features and Functions:**

- **Odorants** – up to 4 odorants plus one blank. System can be changed and recharged by customer or OEI. Odors are delivered one at a time.
- **Air Flow** – maximum flow rate of up to 2 lpm of non-heated, non-humidified air. Adjustable stimulus flow rate of 0 - 800 ccpm and carrier flow rate of 0 - 2,000 ccpm.
- **Remote Odor Generator** - all glass and plastic odor delivery unit for inside MRI magnet. Hose length up to 30 feet from base unit.
- **Automated stimulus generation** – the stimulus presentation can be triggered by the Olfact software or respond to a trigger pulse from the fMRI.
- **Computer regulation of odor stimuli** - accurately and consistently regulate the timing, duration and/or concentration of the odorant (odor concentrations have been validated using gas chromatographic analysis or photoionization detection)
- **Applications** – any experimental protocol that involves stimulation of the olfactory centers of the brain. Can be used for olfactory mapping, neurodegenerative disease studies, cognitive/learning research and neuro-marketing studies.

# OLFACT-fMRI™

## Features and Functions (*continued*):

- **Laptop Computer & Software** – a laptop computer is included in the purchase price. The software provided is for the straightforward protocol to turn on and off one of the odors. However, custom software development is available for custom applications/protocols.
- **Upgrades** – The basic model can be expanded to include up to 16 odorants, presented one at a time.
- **Additional Models** – The model described above is the basic unit. Other devices which can present multiple odors/concentrations under computer control are also available. Models are available that will present from 2 - 8 odorants simultaneously. They can be configured with individually adjustable flow meters or electronically controlled mass flow controllers when applications require very precisely controlled levels of odorants.

## Warranty:

One-year warranty, which includes a recharge at 6 months to insure the quality and consistency of the odorants (or employ your own). At the end of 12 months a service charge will be required for the recharge to extend the warranty.

## Support:

- Technical support
- All maintenance included in the price for the tests purchased for up to 1 year
- Program modifications available:
  - Basic programming at \$80 per hour
  - Senior systems analyst/programmer for development of new protocols at \$120 per hour

## Technical Specifications:

- Olfactometer: 13-1/2d x 14-1/2w x 11h, 6 lbs
- Delivery unit: 9"d x 15"w x 7-1/2"h, 1 lb
- 12VDC external power supply
- Laptop with Windows XP (included with system)

*Other products are available for odor identification, threshold determination and memory.*