Celeritas™ Optical Response System

Psychology Software Tools, Inc. has engineered the new Celeritas Optical Response System to accurately gather participant responses and verify signals — minimizing the chance of data loss. The new system can be customized to fit your research needs by selecting the combination of Button Response Units (BRUs) and Joysticks. The BRUs and Joysticks comfortably fit both small to large hand sizes and are constructed of entirely non-metallic components. The units communicate button presses through fiber optic cabling which connects to an Interface Console located in the control room through an available wave guide. The Interface Console provides real-time feedback of participant responses via LED indicators and includes a set of buttons that make responses for the participant as needed. The system seamlessly integrates with E-Prime® through a USB connection. The new Interface Console comes with an Optical Connector and a BNC Connector. These connectors allow the computer to accept either an optical or an electrical TTL pulse that the stimulus presentation computer interprets as another button press, allowing the user to synchronize their experiments with the MR scanner.

Celeritas BRU Features:
- Ergonomic design
- Wrist strap and adjustable wrist sled for a more comfortable fit
- Tactile indicator on index finger button
- Molded from high-impact, chemical resistant, medical grade, biocompatible plastic
- Custom molded wall mount holder for BRUs and cabling
- Contains no metal or conductive materials

Celeritas Joystick Features:
- Omnidirectional analog stick with four buttons
- Comfortable ambidextrous design
- Hand strap for comfortable positioning
- Molded from chemical resistant, medical grade, biocompatible plastic
- Custom molded wall mount holder for Joysticks and cabling
- Contains no metal or conductive materials