

You want to know where people are looking while performing a mobile task like using a new instrument, going through an airport, searching the aisles of a supermarket for a new product, training for tennis, golf, or any other complex coordination sport.

You want to analyze attention or visual search patterns in ergonomics, human factors, occupational health, wearable computing, sports, education, arts, or any other visually intensive task.

As a marketing or usability professional, or as a focused researcher, you want your results fast and reliable – in any environment and with any subject.



The Solution

The iView X™ HED is the latest generation mobile eye tracking system which combines full freedom of movement with easy setup and efficient operation:

- Fully mobile Tablet PC, lightweight headset, perfect for indoor & outdoor applications
- · High speed Up to 200Hz eye tracking for fast eye movements
- Fast & easy Prepare for measurement in minutes, fully automatic tracking, instant results
- · Robust & reliable Works with most glasses and contacts and under various lighting conditions
- Customizable Can be mounted on a bike helmet, baseball cap, flight helmet, or pilot headphones
- Mobility Package Unlimited working range with additional batteries and external charger
- · Headtracking Package Quantitative recording of 3D gaze vector in complex environments



The Results

The iView X[™] HED records all relevant eye movement data and allows fast and accurate control and analysis:

- · Scene video recording in broadcast quality for seamless integration with video analysis packages
- · Data and message recording including pupil size, user messages from auxiliary devices
- User configurable video overlays including gaze cursor. time stamps, trial information, logo etc.
- Scene video streaming via network (fixed or wireless) to remote control application

Specifications iView X HED

Technology

- · Non-invasive, video-based eye tracking
- Monocular, pupil-CR, dark-pupil tracking

Performance

Sampling rate eye movements	50Hz (default) 200Hz (optional)
 Tracking resolution 	<0.1° (typ.)
Gaze position accuracy	<0.5°-1° (typ.)
System	
Operating System	Windows XP
Workstation	Subnotebook or laptop
Headset	

- Lightweight, comfortable, quick & easy to adjust
- · Bike helmet, baseball cap, headphones, flight helmet and headband mount available
- Interface weight 79a 5m and 2m (set of cables)
- Cable length

Auxiliary devices / communication

- · Digital scene video recording in broadcast quality (720 x 576, MPEG-4)
- · Audio channel recording
- Socket based API interface via Ethernet (UDP)
- Compatible with SMI BeGaze[™] Analysis Software
- · Compatible with 3rd-party video analysis packages (e.g. The Observer[™] from Noldus)

Software options

SMI BeGaze[™] Video for HED

System options

- High-speed eye tracking option (200Hz)
- 6D head tracking option for numerical recording of gaze position in complex environments (e.g. simulators, CAVE) Flightcase

Norm compliance

· CE, EMC, Eye Safety

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