

INNOVATIONS IN EYE TRACKING

### **Eyetracking Software Analysis**

Gaze Tracker<sup>™</sup>

## GazeTracker™ Image Analysis



ASL is proud to offer GazeTracker<sup>™</sup> software for use with ASL's eye-tracking systems. GazeTracker<sup>™</sup> consolidates the information that researchers need to conduct their web design and software usability studies into one piece of software. GazeTracker<sup>™</sup> serves three functions:

- Stimulus Presentation: study eye response to still images, videos, software interfaces and live video input
- Information Gathering: record all eye-tracking, mouse, and keyboard data in one place
- Data Analysis and Creative Meaningful Visualization of your Data: easily view your data and output statistics based on user definable regions of interest and fixation data.

### GazeTracker Advantages

- **Powerful:** automatically corrects data for static and dynamic content, such as scrolling in web pages or video animation, to ensure accurate statistics.
- Easy to Use: generate different graphs of your data with the push of a button.
- **Saves Time:** conduct analysis across many subjects at one time, saving hundreds of hours of painstaking hand coding analysis.
- **Flexible:** offers a variety of options for the design of your study and the analysis of your data, including data export to text files for your own statistical analysis.



# Gaze Tracker<sup>™</sup>

# **GazeTracker Applications and Video Analysis**

# Scrolling Webpage and Software Applications



3D website view based on time spent in different regions of interest

# Analysis of Video Files



Don't limit your experiment.

- Present dynamic stimuli in the form of an .avi, .mpg or .mov file
- Time lock your digital data with the video file(s)
- Define MOVING look zones and specify appear/disappear timing for a truly dynamic analysis
- Customize your video presentation

Adeo Show Intro Information	
Duration to display black screen 0 (seconds)	
Duration to display while screen 0 [seconds]	
Adro Show Doplay Information	
Time between videos I <sup>1</sup> (Lecondu)	
Specily mage or select background color below Image: Brown.	
Specily additional advancement reptons	
Video automatically advances when completed	
Advance video by pretting a key or mouse button	
Disout Keys Keys Space	
Advance video after a specified time period	
Video display time 12 [seconds]	
F Shatch video to lit acrean	
Preserve aspect ratio of stretched video	
Backgound Color	
F Randomice Video Order	



#### Applied Science Laboratories

Tel.: (781) 275-4000 Fax: (781) 275-3388 www.asleyetracking.com Email: asl@asleyetracking.com

INNOVATIONS IN EYE TRACKING

# Gaze Tracker<sup>™</sup>

# GazeTracker Premium

Capture *LIVE* video from a head mounted scene camera (link to 501) and synchronize your video data with your digital data stream. Save valuable time with an automated analysis.

## Seatures

- Archive video data in an .avi format
- Define **MOVING** Look Zones and specify appear/disappear timing for a truly dynamic analysis
- Define fixation parameters and output statistics

## Overall Metrics

- Time span shown start (seconds)
- Time span shown end (seconds)
- Number of fixations
- Average fixation duration (seconds)
- Total time shown (seconds)
- Total tracking time lost (seconds)
- Total fixation duration (seconds)
- Total time nonfixated excluding gaps (seconds)
- Percent time lost
- Percent time fixated
- Percent time nonfixated
- Fixation Count / Total Time
- Fixation points in zones
- Percent fixations in zones

## LookZone Statistics

- Total time in zone (seconds)
- Percent time spent in zone
- Fixation count
- Fixation Count / Total Time in zone
- Percentage of total fixations
- Average fixation duration
- Total fixation duration
- Total time not fixated (seconds)
- Percent time fixated
- Percent time nonfixated
- Percentage of total fixation time spent fixated
- Number of fixations before first arrival
- Percentage of total fixations before first arrival
- Duration before first arrival
- Percentage of total slide time before first arrival
- Number of times zone observed

## GazeTracker System Requirements<sup>1</sup>

	GazeTracker Full	GazeTracker with Scene Re- cording (Premium)
Processor	750 MHz Pentium IV	750 MHz Pentium IV
RAM	128 Megs of RAM <sup>2</sup>	256 Megs of RAM <sup>2</sup>
Hard Disk	80 GB	80 GB DVD and CD burner recom- mended
Operating Systems	Windows 98, ME, 2000, XP <sup>3</sup>	Windows 98, ME, 2000, XP <sup>4</sup>

<sup>1</sup> GazeTracker will function on computers that do not meet these requirements; however, users may notice performance degradation when using the GT software. Data rendering and graphics in GT may appear slow, and during application analysis, other applications may run slower than normal. Typically, a computer purchased within the past 2 years is fine.