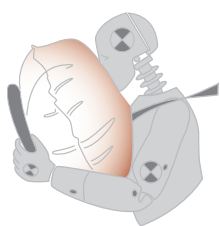




image
SYSTEMS
TEMA
AUTOMOTIVE

The ultimate motion analysis tool for highest possible accuracy in automotive crash testing



TEMA Automotive is the world leading system for advanced motion analysis in the automotive industry.

TEMA is EURO-NCAP compliant and covers the complete process from bringing the image into the program via automated tracking and analysis to a result presentation in predefined tables and graphs.

Measurements of deformations, airbag volume, dummy head accelerations and steering column penetration are just a few of many applications in the automotive industry.

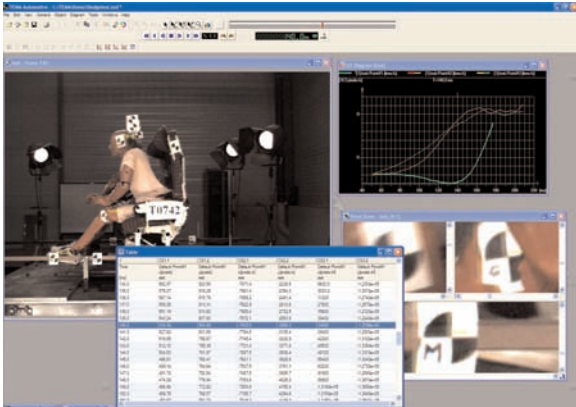
ACCURATE – A lens calibration tool for correcting the lens distortion in the high speed camera is included to get the best data accuracy and traceable results.

POWERFUL - Handles and analyses at rapid speed large quantities of data from high speed cameras and other sensors. The operator can choose between a large number of tracking algorithms and track an unlimited number of points throughout the image sequence.

SYNCHRONIZED - The User Interface is fully synchronized: any change of parameters or set-up will directly effect all parts of the tracking session, updating results, graphs and tables.

COMPATIBLE - The system handles all major image formats on the market and has options to control most of the available high speed cameras on the market.

FLEXIBLE - The flexible windows based user interface makes it fast and easy to find the best setup for your application



User interface

The windows based user interface of TEMA provides a very flexible way of setting up a test. The operator can easily load one or multiple camera views and define the points he wants to track in the image sequence. The Menu bar, Tool bar or Key bindings will all give quick access to the wanted feature or function. The User Interface is fully synchronized: any change of parameters or set-up will directly effect all parts of the tracking session, updating results, graphs and tables.

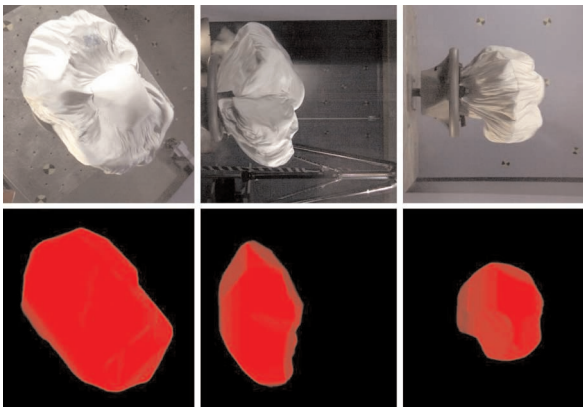


Tracking and analysis

The operator has full control of the tracking in TEMA with many possibilities to adjust for different applications. The tracking can be made Manual, Semi Automatic or Automatic.

TEMA has a very powerful set of different tracking algorithms available such as Correlation, Quad, MXT. Circular, Center of gravity etc.

By using the integrated lens calibration tool, data accuracy can be kept at a maximum and the results are traceable.



Presentation

TEMA Automotive can present the analysis data and results in a variety of customized graphs and tables. It is easy to add comments and add custom graphics to customize the appearance of a certain view or plot.

Key functionality:

- Most powerful and flexible tracking algorithms.
- Lens calibration (included!) for dramatic accuracy improvements.
- Tracking in 16bit, color/bw/R/G/B mode and auto/semi/manual mode.
- All major image formats supported, including native camera formats
- Efficient and synchronized user interface
- Templates
- Instant analysis: Position, velocity, acceleration, angles, distances, etc...
- Advanced image export
- Local 2D coordinate systems
- Flexible scaling options, including depth scaling
- Data import and export
- Generation of professional reports

Image Systems AB is your partner in motions analysis and supplies both standard products and customized projects. The standard products handles all steps in the process of digitizing cine film, controlling multiple cameras, tracking and analyzing image sequences and present result. The company has long experience of customized projects. A typical project includes software development, integration into current systems, installation, acceptance testing, training and maintenance.

Image
SYSTEMS

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