



## Functional Assessment

Professional and recreational athletes alike can benefit from accurate assessments of their body movements. Poor body posture or lack of strength and stability will ultimately affect performance and, in the worst case, health.

This is where Qualisys' unique Functional Assessment module software comes into play. It offers a suite of test protocols tailored to collect objective information about an athlete's movement status before or after an injury. Results are presented in a comprehensive report, supporting and enhancing your recommendation.

Motion capture cameras are set up around the athlete. They record the 3D position of reflective markers placed on the athlete's body along with ground reaction forces that are integrated into the floor.

## FEATURES

- Tailored solution to assess status of athletes and non-athletes alike
- High-precision 3D measurement at 300 Hz frame rate or more<sup>1</sup>
- Test protocols and parameters selected by experts
- Full body marker set for accurate 3D tracking of all major body segments
- Easy processing and data management work flow

<sup>1</sup>Frame rate depends on the chosen camera type.

## CONCEPT

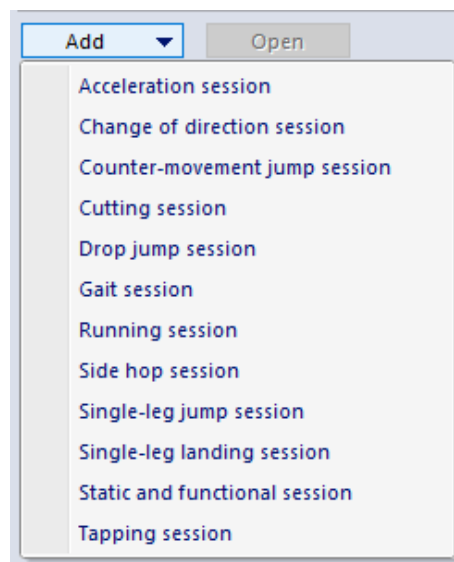
The solution builds on accurate measurements of the athlete's movement while performing tasks such as running, cutting, counter-movement jumps, and drop jumps, among others.

## PROCESS

After recording all tasks with the 3D Motion Capture system, data from the movement is processed by Visual3D that performs all necessary calculations and prepares the data for the report.

## REPORT

The software automatically generates a report that includes variables such as joint angles, joint moments and ground reaction forces. Electromyography (EMG) may also be included to measure the athlete's muscle activity



*The module includes reports for a comprehensive list of tasks*



## MODULE OPTIONS AND REQUIREMENTS

Module	Marker set	Cameras (min)	Room size (min)	Processing engine	Report
Functional Assessment	Full body	12 Miquis M3	10 x 5 m		Visual3D, Web report <sup>2</sup>
<b>Precise 3D tracking</b>		<b>Accurate model</b>		<b>Comprehensive report</b>	
Qualisys cameras track the movements of the athlete in all three dimensions.		Force plates and EMG systems from major manufacturers are seamlessly integrated into the system.		Printable report with all relevant measurement results and space for your logo.	

<sup>2</sup>Planned for 2020

QUALISYS



[qualisys.com](http://qualisys.com)

[sales@qualisys.com](mailto:sales@qualisys.com)

Qualisys Europe

Gothenburg, Sweden

Qualisys Americas

Chicago, USA

Qualisys Asia Pacific

Shanghai, China