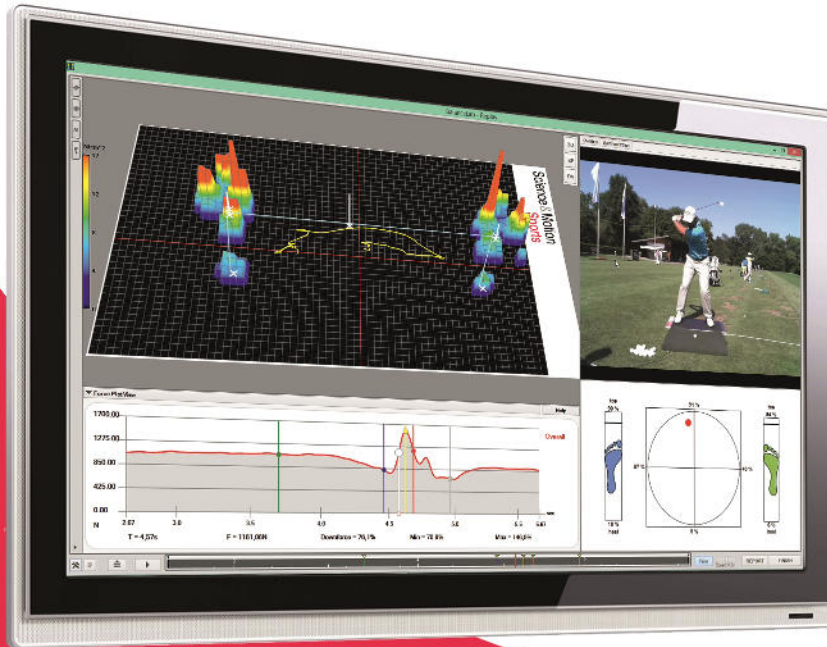


SAM BalanceLab

Science & Motion
Sports



...control the invisible



*Most advanced pressure
plate for coaching*

Stop the guesswork and start to rely on facts

Science and Motion's (SAM) BalanceLab is an ultra high resolution pressure plate to evaluate balance and weight transfer during a golf swing. The pressure signals and synchronized video are recorded in parallel and then interactively analysed in detail. Poor balance and an irregular weight shift are often responsible for swing flaws resulting in an unsatisfactory outcome of the shot.



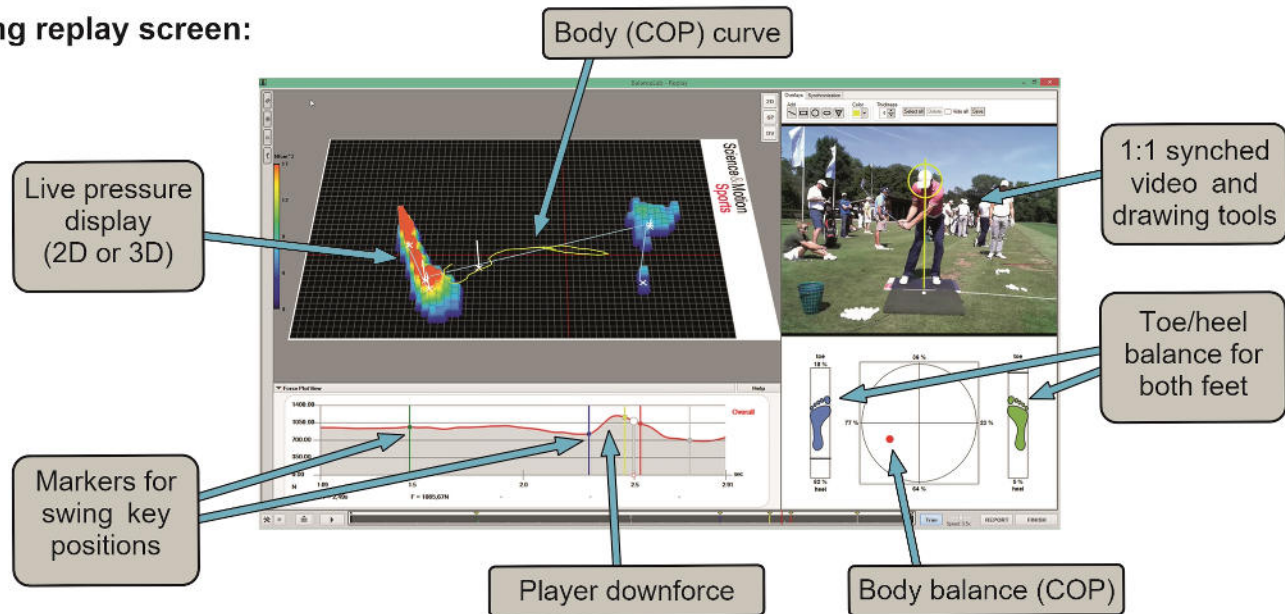
Main Features of SAM BalanceLab

- Medical proven pressure plate technology (2560 sensors and 100 FPS recording)
- 2D/3D display of pressure distributions
- Left/right foot and heel/toe balance analysis
- Replay and graphical report modules
- Center of pressure (COP) + weight transfer analysis
- Synchronized video recording
- Live feedback and training mode
- Launch monitor integration

New Features

- Automatic impact detection and recording
- Innovative performance parameters
- New golf specific data analysis
- 1:1 camera synchronisation with pressure data

Swing replay screen:

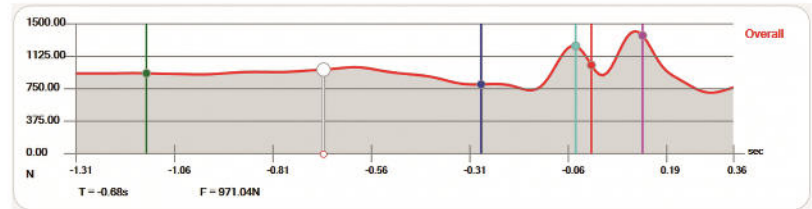


Data curves provide insight

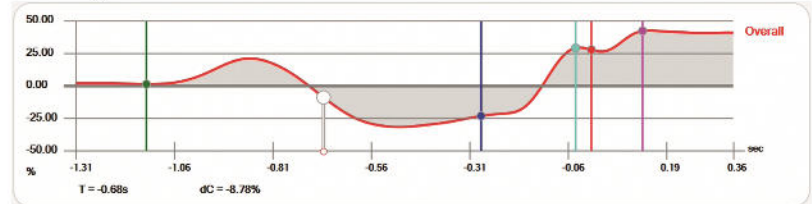
Data curves help to better understand the individual dynamic patterns of balance and weight shift. This information allows tailoring individual training interventions to substantially increase the efficiency of a golf swing.

Based on the data curves relevant COP parameters can be derived such as maximum downforce, frontal and lateral COP shift range, timing of COP shift or maximum COP speed.

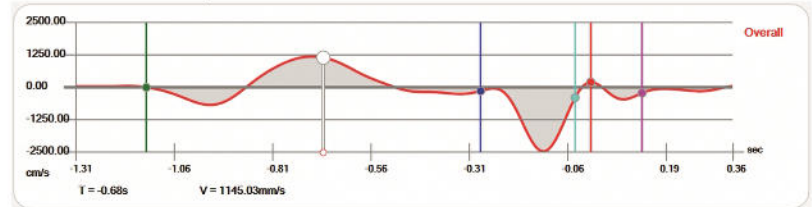
Total downforce



Left/right COP shift



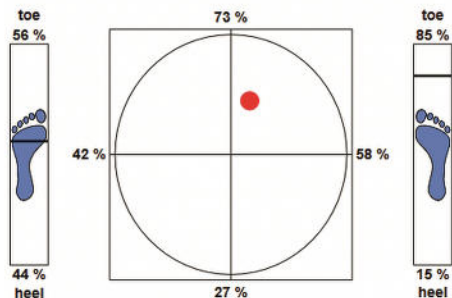
Lateral COP speed



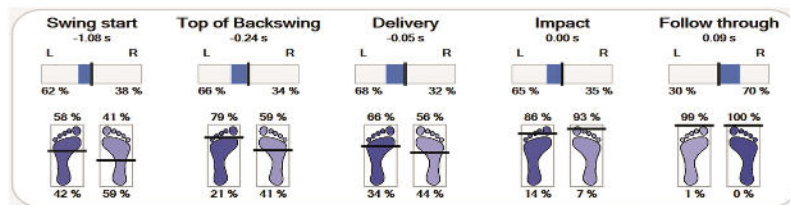
Different views for relevant swing data

Data views are presented in screen graphics and as printable PDF reports. Reports can also be sent by Email directly from the software.

Total balance and left/right foot balance



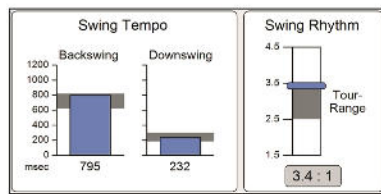
Detailed balance data for all swing positions



Launch monitor data view



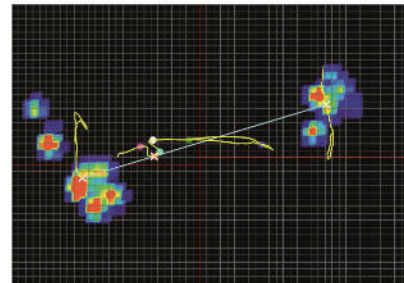
Swing tempo / rhythm



Similar report capabilities to our proven SAM PuttLab system.

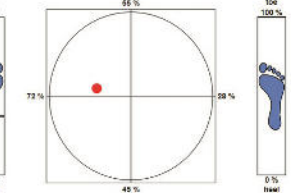
Well balanced swing

On the right you can see a quite efficient weight shift of an US Tour player (Iron 5). Backswing and forward swing are in the same plane. At impact the COP is 72% at the front foot with an almost even heel/toe balance with 55%. The club head can freely accelerate through impact on the target line to create power and control.



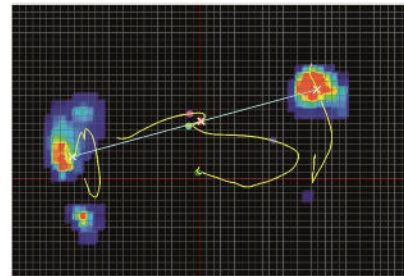
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COP at impact:
72% left, 55% front



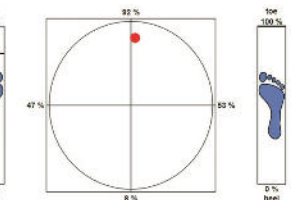
Weight too far towards toe

Insufficient weight shift and uneven balance in heel/toe direction are common flaws in poor golf shots. The lower picture shows the COP at impact with a lack of weight shift to the left with only 47% as well as a balance too much forward at the toes with 92%. Improper balance will reduce the power at impact and may e.g. result in an out to in swing plane, promoting a pull, slice or fade.



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COP at impact:
47% left, 92% front



Poor balance - a frequent trigger of a miss-hit golf shot.



"As someone who has been trained in Biomechanics and over 40 years of teaching experience, I can honestly say that the BalanceLab is the most accurate piece of equipment on the market today. It not only analyzes the ground reaction forces accurately but also arms you the teacher to interpret the information efficiently."

Dr. Jim Suttie, 2000 National PGA Teacher of the Year

"The SAM BalanceLab has allowed me to see the invisible. Things that I would not be able to see on video or with the naked eye are now very apparent to me. And incredible piece of equipment to understand why people move the way they do. My only regret is I didn't have it 25 years ago."

Martin Hall, 2008 PGA of American National Teacher of the Year



"The SAM BalanceLab is an extremely innovative tool that allows us to see the golfer's weight distribution at address but also within the motion of the swing. It is extremely difficult to see with the naked eye or even with slow motion cameras. The system enables us to identify exactly what is happening during the swing and where the faults might lie which is of great benefit to our clients."

Steve North, Director of Instruction, St Andrews Links Golf Academy

SAM BalanceLab - ultra high precision pressure plate

Features

- Ultra high resolution 2560 sensors (4 per inch)
- Total size (w/l/d): 24" x 38" x 0,83"
- Portable system, weight 12 Kg
- USB connection
- Audio impact detection
- Support for industry cameras (IDS)
- Launch monitor integration (Trackman / Flightscope / GC2)



Applications of SAM BalanceLab 3

- Teaching and playing professionals
- Golf clubs
- Indoor centers
- Fitting centers
- Golf stores
- Manufacturers

Computer requirements

- Windows 7/8/10 - 32/64 Bit
- i5/i7 CPU, 8 GB RAM or better
- Harddisk minimum 200 GB
- USB2, USB3 or Ethernet camera

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Knowledge. Improvement. Success.

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