Computer Science in High Performance Sport - Applications and Implications for Professional Coaching

PRESENTATIONS 10-15 MIN

PROGRAM (UPDATE 1)

Monday
9:00-12:00
Chair: Jaime Sampaio

Jurgen Perl
Process-oriented qualitative game analysis

Sofia Fonseca
Spatial metrics to characterize tactical behavior in team sports.

Ricardo Duarte
Interpersonal coordination dynamics underlying individual and team tactical behaviors in soccer.

António Lopes
Creating and interactive multilevel team sports analysis intelligence system

Michael Stockl
Isopar in golf and applications to team sports.

14:00-17:00
Chair: Stuart Morgan

Martin Lames
Theory and practice of computer scientist intervening in practice

Bjoern Eshofier
Wearable computing systems for feedback applications in elite sports

W. Schollhorn
Pattern recognition of movements

Aaron Coutts
A working model for implementing a training monitoring system in a professional football club.

Michel Brink
Framework for monitoring physical and psychological load and recovery.

Tuesday
9:00-12:00
Chair: Koen Lemmink

Wouter Frenken
Match Analysis: ideas for tactical performance analysis coming from scientists and coaches. Demo Software

Jaime Sampaio
Match and training analysis with positional data. Interaction between tactical, physiological and technical variables.

Anna Volossovitch
Tactical performance analysis in sports games: using positional data in describing collective behavior patterns

Stuart Morgan
Representing ball movement trends in football using an interactive visualization method.

Daniel Link
Match analysis in goalball

14:00-17:00
Chair: Dietmar Saupe

Dietmar Saupe
The critical power concept for performance and training monitoring optimization

Thomas Jaitner
Team training control in cycling: development and application

Markus Wagner
Optimizing pacing strategies for team pursuit track cycling

Peter Lamb

Technique analysis and feedback in golf using motion analysis

Tim McGarry
Decision Making. Penalty shoot-out in football (soccer)

Wednesday
9:00-12:00
Chair: Martin Lames

Patrick Lucey
Large scale analysis and retrieval of events in continuous sports.

Josef Wiemeyer
Serious games – an option for high performance sports OR Coaches' attitude to use ICT in training and competition

Arnold Baca
Intelligent systems

Kerstin Witte
Research fields in Magdeburg

Martin Lames
IACSS interaction