



STANDARD QUALITY

GLOBAL CONNECTION





ER1C FIBA SCOUTING CONCEPT NATIONAL INSTRUCTORS' CLINIC 2015



- Objectives of the session
- Introduction to Scouting
- ER1C FIBA Foundations
- The value of image
- ER1C Analysis & Reporting Tool
- Next Milestones
- ER1C Sports proposal

OBJECTIVES OF THE SESSION



- Basic knowledge of scouting
- Presentation of FIBA tools and plans
- Show current state of sport technology
- Detailed introduction to ER1C FIBA
- Current and future possibilities





- ER1C Sports, LTD group 1d3a, S.L.
- HQ in Barcelona
- 8 years in the market
- 28 Sports
- National tournaments, European Championships, World Championships and Olympic Games.

- Coding of sport activity
- Categories and concepts
- Objective and Subjective
- Quantity and Quality
- Manual and Automatic
- Is all about criteria



Homogeneous criteria

Rich concepts

Multimedia

Interactive

Centralized

Accessible

Productive

Extensible

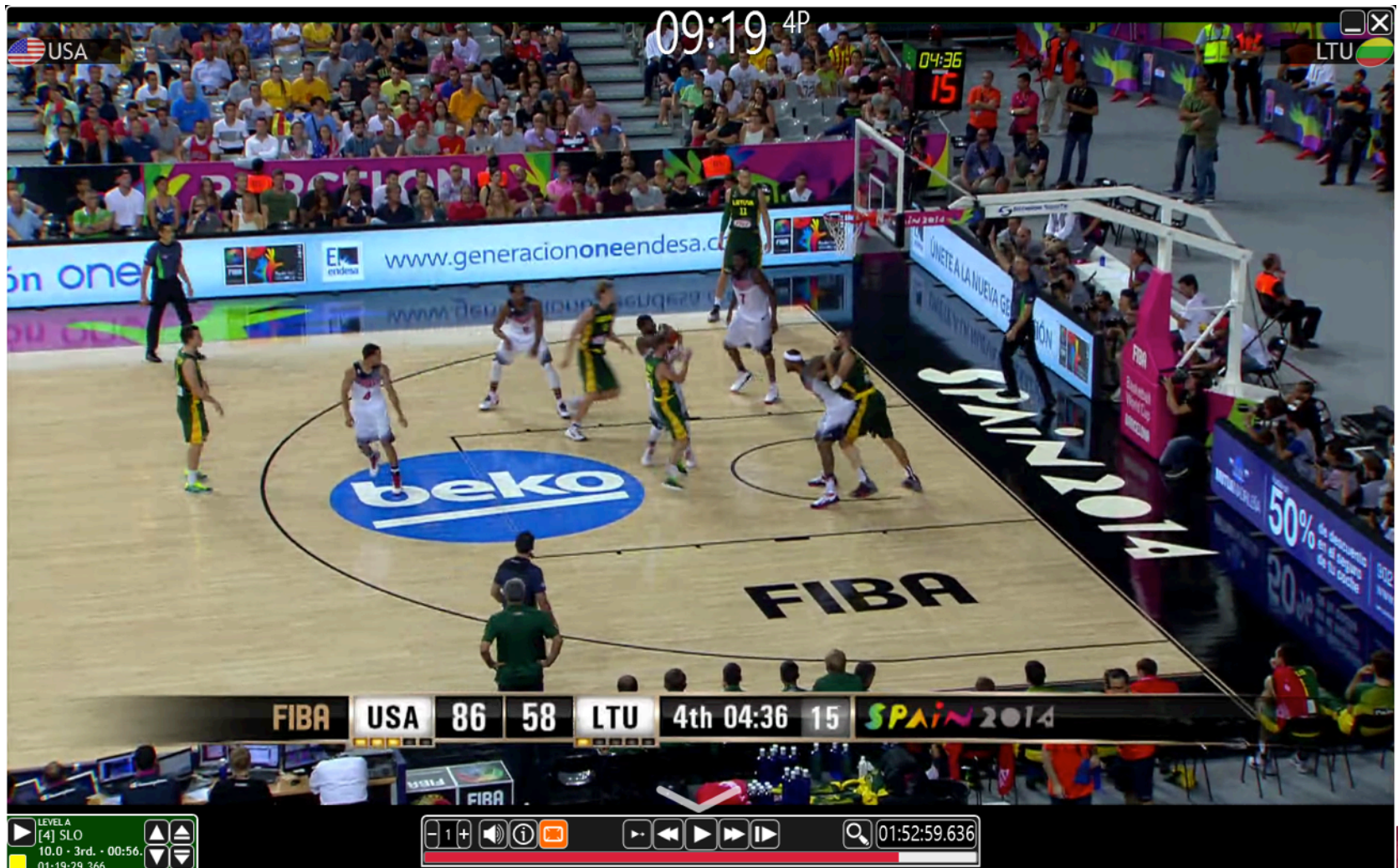
Easy to use and consume

THE VALUE OF IMAGE



FIBA

We Are Basketball



- The video as basis of categorization
- Can be revised with different criteria
- Multiple points of view
- The context as a concept
- Content for rules and teaching



- Touchable full screen graphic interface
- Multilanguage
- Easy to use
- Highest productivity with less technical knowledge
- Direct support of all video formats
- Multi source and multi angle video
- Rich real time statistics
- Powerful filters and queries

ER1C ANALYSIS & REPORTING TOOL



15:42 24/04/2015

Control Panel

Analysis Menu Modify Analysis Open Laboratory

List of actions

- Event: Start 1st. Period
- 05.0 - 1st. - 00:00.0
- 00:12:10.400
- LEVEL A [9] CRO Zone 5
- 10.0 - 1st. - 00:51.1
- 00:13:01.557
- LEVEL A [9] SLO Zone 6
- 10.0 - 1st. - 01:49.9
- 00:14:00.391
- LEVEL A [9] CRO Zone 5
- 10.0 - 1st. - 01:49.9
- 00:14:00.391
- LEVEL A [5] MEX Zone 5
- 10.0 - 1st. - 02:34.9
- 00:14:45.391
- LEVEL A [9] SLO Zone 2
- 10.0 - 1st. - 05:34.2
- 00:17:44.427
- LEVEL A [9] MEX Zone 5
- 10.0 - 1st. - 07:31.5
- 00:19:41.929

USA 07:35 1P LTU

FIBA USA 6 7 LTU 1st 06:56 24 SPAIN 2014

FIBA 2014 FINAL 3

LEVEL A LEVEL B LEVEL 3 FIELD

REFEREES

MEX 02 CRO 02 SLO 02

TEAMS

USA 03 LTU 03

DECISION

Call 05 No Call Missed Call

Defense 02 Offense 03 OOB 01

OK 06 IC Debrief

PLAY SITUATIONS

On Ball 03 Off Ball 02 Situations

FOULS

HC 02 BC 02 DF-UF-TF-D-F

Fantasy Marginal Flop/Fake

VIOLATIONS

TV TIME 01 OTHER

RULES

AOS TIME OTHER

MECHANICS/IOT

MECHANICS IOT

GAME CONTROL

Time Management Behavior Team Work

SPECIAL

Weak Side Coverage 5 mins Last 2 min

Obvious Play Teaching Material Video Rule Book

- Import / Export data merged with video
- Multiple metadata sources (game stats, biometrics, tracking, ...)
- PowerPoint®/Keynote® like reports
- Drawing, zoom, slow motion over video
- Complete set of Slide Templates (chapter, video, image, draws, referee file, stats, ...)
- Cloud services for sharing and centralize all media and metadata
- Mobile services for real time tagging

ER1C ANALYSIS & REPORTING TOOL



FIBA

We Are Basketball

08:28 23/05/2015

INFORMES

Panel de Control

Open LAB Menú Informes Modificar Presentar

DIAPOSITIVAS 50

Defense Calls

Zone 5 • AUS • Call • Defense • On Ball • Situations • Penetration • HC • Hold

CHITI Alejandro (ARG)

Introduce un texto para filtrar

Diapos Seleccionadas

Game report - TUR vs AUS
por Jordi Urquijo

Duration: 00:24:20.0

1r - 02:08.6

2/50

Zone 5 • AUS • Call • Defense • On Ball • Situations • Penetration • HC • Hold

Introducir observaciones sobre la diapo

Editar Diapositivas

Trazos y Efectos

Guardar Cambios

Carrier 1:29 AM 100%

00:00:00 2 ▶

7 actions

CALL NO CALL MISSED CALL Call n.: 5

OK ? IC

REFEREE 1
REFEREE 2
REFEREE 3

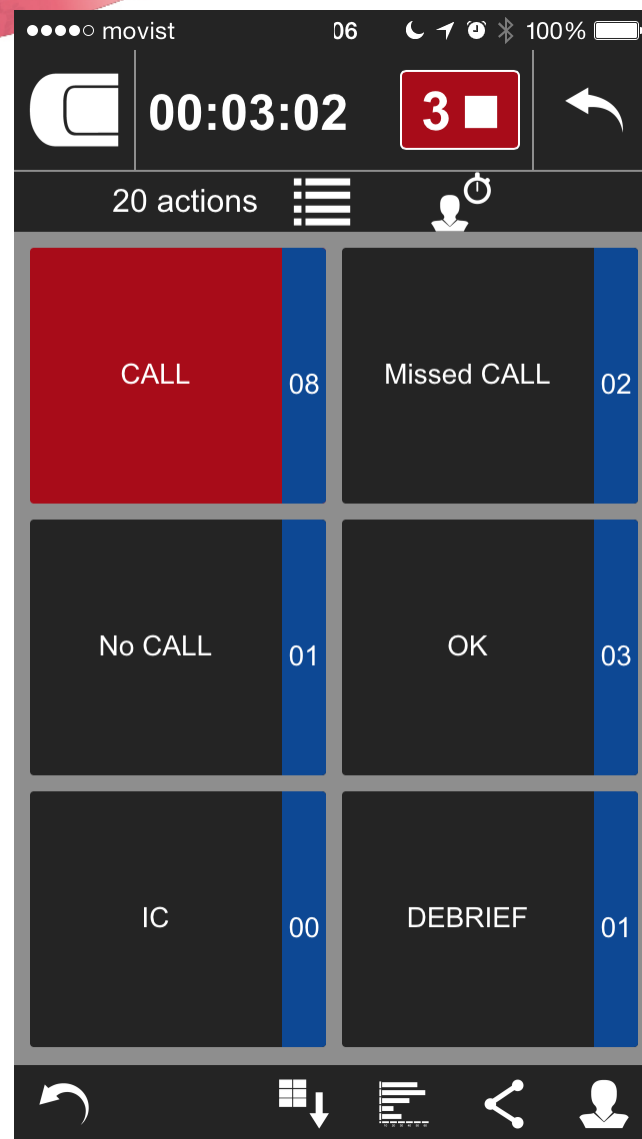
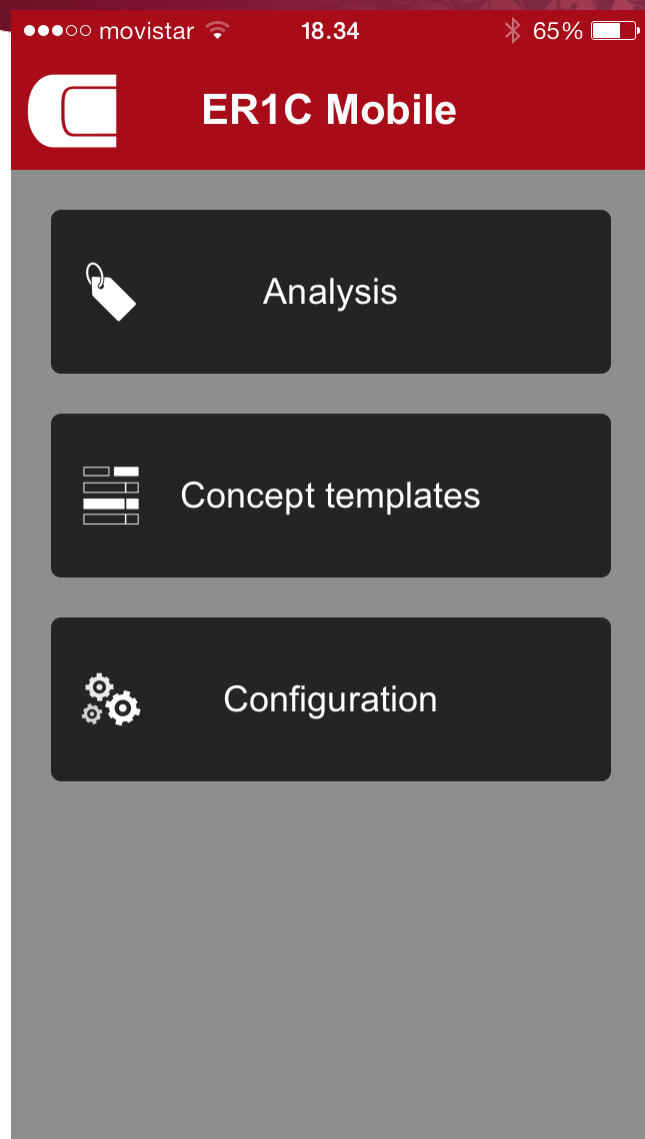
L4 Zone 4 C3 T3
L5 Zone 5 Zone 2
L6 Zone 6 Zone 1 C1 T1

TMA TMB DEBRIEF EDIT NEXT PLAY HIGHLIGHTS ERROR

COURT PRESENCE GAME CONTROL
BEHAVIOR RULES
TEAM WORK TIMING
HAND CHECKING MECHANICS
DEFENSIVE FOULS 3 5 8 24 VIOLATIONS
OFFENSIVE FOULS TRAVELLING VIOLATIONS
T-U-D FOULS OTHER VIOLATIONS

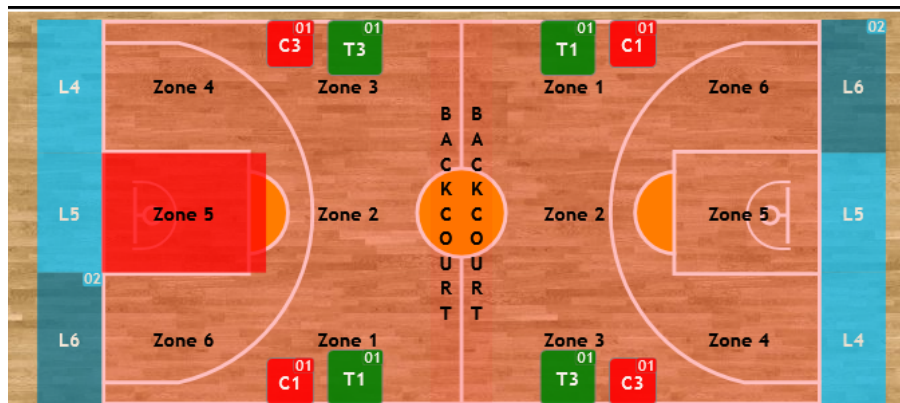
14

ER1C MOBILE



CONCEPT TEMPLATES & GAME CODING

- The key of coding are in the concepts and categories
- No value without criteria
- Quantity and quality
- Enrichment by layers



- Real time information
- Grouping by concepts
 - Position
 - Period
 - Zone
 - Type
- Is not opinion – Are Facts
- Trends and habits
- Evaluation and metrics



GAME STATISTICS



FIBA
No. An. Ecu. 2014

TUR

1P 00:00

AUS

FIBA 2014 FINAL 3

13:08 29/04/2015

ANALYSIS

Control Panel

Analysis Menu

Modify Analysis

Open Laborat

List of actions

- LEVEL A [9] USA Zone 5 10.0 - 4th. - 14:08.6 02:05:50.464
- LEVEL A [10] USA 10.0 - 4th. - 14:35.9 02:06:17.842
- LEVEL A [10] USA Zone 1 10.0 - 4th. - 16:02.3 02:07:44.238
- LEVEL A [10] BRA Zone 5 10.0 - 4th. - 18:08.3 02:09:50.166
- LEVEL A [11] BRA Zone 5 10.0 - 4th. - 19:08.3 02:10:50.212
- LEVEL A [2] Weak Side Cov 10.0 - 4th. - 19:28.3 02:11:10.232
- LEVEL A [2] 5 mins 10.0 - 4th. - 19:28.3 02:11:10.232
- LEVEL A [5] BRA 10.0 - 4th. - 20:49.7 02:12:31.573
- LEVEL A [6] I AT

TUR

Calls per Referee

AUS

Periods	Period 1				Period 2				Period 3				Period 4				TOTAL			
3 Referees	5'		10'		5'		10'		5'		10'		5'		10'		Last 2'	TOTAL		
MARANHO Cristiano Jesus (BRA)	0 (0,0%)	1 (100,0%)	0 (0,0%)	1 (50,0%)	1 (50,0%)	0 (0,0%)	0 (0,0%)	2 (100,0%)	2 (66,7%)	1 (33,3%)	0 (0,0%)	0 (0,0%)	2 (50,0%)	2 (50,0%)	1 (50,0%)	1 (50,0%)	0 (0,0%)	0 (0,0%)	6 (37,5%)	8 (50,0%)
ANDERSON Steven Marquis (USA)	0 (0,0%)	1 (100,0%)	2 (50,0%)	2 (50,0%)	2 (100,0%)	0 (0,0%)	0 (0,0%)	2 (100,0%)	1 (50,0%)	0 (0,0%)	1 (16,7%)	5 (83,3%)	0 (0,0%)	4 (100,0%)	2 (100,0%)	0 (0,0%)	0 (0,0%)	0 (0,0%)	8 (36,4%)	14 (63,6%)
LATISEVS Olegs (LAT)	0 (0,0%)	0 (0,0%)	0 (0,0%)	0 (0,0%)	0 (0,0%)	0 (0,0%)	0 (0,0%)	2 (100,0%)	1 (50,0%)	1 (50,0%)	1 (50,0%)	1 (50,0%)	0 (0,0%)	0 (0,0%)	0 (0,0%)	0 (0,0%)	0 (0,0%)	1 (100,0%)	2 (25,0%)	4 (50,0%)
TOTAL	0 (0,0%)	2 (66,7%)	2 (33,3%)	3 (50,0%)	3 (60,0%)	0 (0,0%)	0 (0,0%)	6 (100,0%)	4 (66,7%)	2 (33,3%)	2 (25,0%)	6 (75,0%)	2 (25,0%)	6 (75,0%)	3 (75,0%)	1 (25,0%)	0 (0,0%)	1 (50,0%)	16 (34,8%)	26 (56,5%)
	3 (6,5%)		6 (13,0%)		5 (10,9%)		6 (13,0%)		6 (13,0%)		8 (17,4%)		8 (17,4%)		4 (8,7%)		2 (4,3%)		46 (100,0%)	

Options
Calls per Referee
Calls per Position & Zone
Call Types per Referee
Calls per Zone Map
Print

DECISION 103

No Call 01

Missed Call 16

Offense 07

OOB 16

IC 02

Debrief 02

LAY SITUATIONS 79

Off Ball 10

Situations 38

FOULS 42

etc 21

In-Game Fouls 02

Marginal 01

Flag/Fake 01

VIOLATIONS 08

TIME 02

OTHER 03

RULES 08

TIME 08

OTHER 08

MECHANICS/IOT 08

IOT 08

GAME CONTROL 02

Behavior 01

Team Work 01

SPECIAL 12

05 05

Last 2 min 01

L6 Zone 6

Zone 1 14

Zone 3 03

Zone 4 06

L4

C1 09

T1 14

T3 03


C3 06

- Selection of the key actions
- Preparation of a Video Report
- Presentation of refereeing statistics
- Interactive presentation and comments with referees in locker room
 - Slow motion, zoom and drawing over video
- Immediate correction and enforcement for next actuations

AFTER GAME BRIEFING

1st. • 03:45.2

Zone 1 • Call • Defense • Off Ball • Situations • Perimeter play • BC • Push



A screenshot from a basketball game broadcast, showing a live play. The court is marked with 'FIBA' and 'beiko' logos. Players in white (Turkey) and green (Australia) jerseys are visible. A referee is in the center. Tactical annotations include: a green arrow pointing from the right side towards the basket; a red curved line on the right side of the key; a blue circle around a player in the key; and a green line on the left side of the key. The bottom of the screen shows a video player interface with controls and a scoreboard.

TUR 5 3 AUS 1st 07:09 8 SPAIN 2014

50% 25% 10%

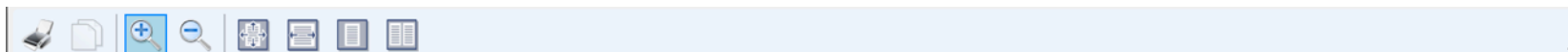
2/48

AFTER GAME BRIEFING



FIBA

We Are Basketball



FIBA WCM 2014 - Round
13/04/2015 17:00 - Estadio

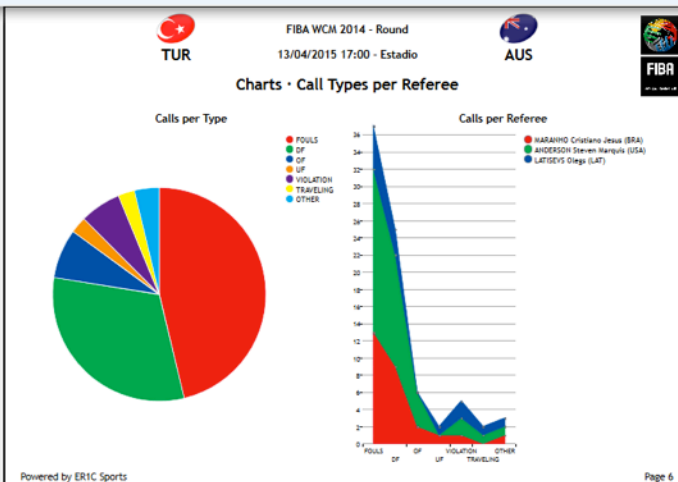
TUR AUS

Table - Call Types per Referee

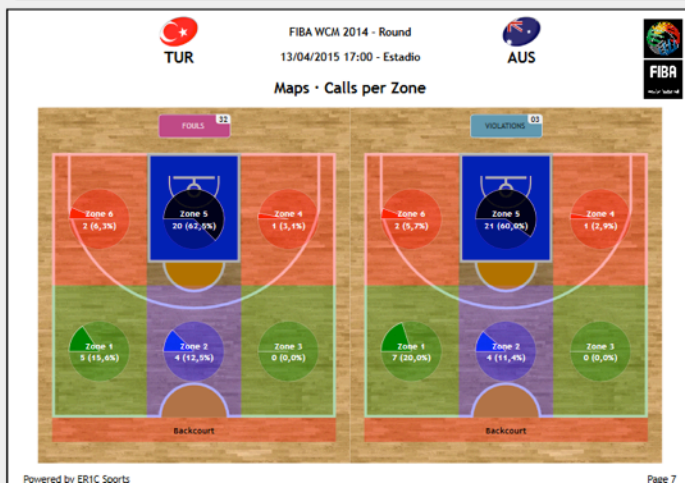
Types/Referees	HARARIO Cristiano Jesus (BRA)	ANDERSON Steven Harquiss (USA)	LATIEVO Diego (LAT)	TOTAL
CALL	4 (40.0%)	8 (80.0%)	2 (20.0%)	14 (70.0%)
FOULS	4 (40.0%)	3 (30.0%)	0 (0.0%)	7 (35.0%)
DP	1 (10.0%)	0 (0.0%)	0 (0.0%)	1 (5.0%)
UP	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)
VIOLATION	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)
TRAVELING	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)
OTHER	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)

Powered by ERIC Sports

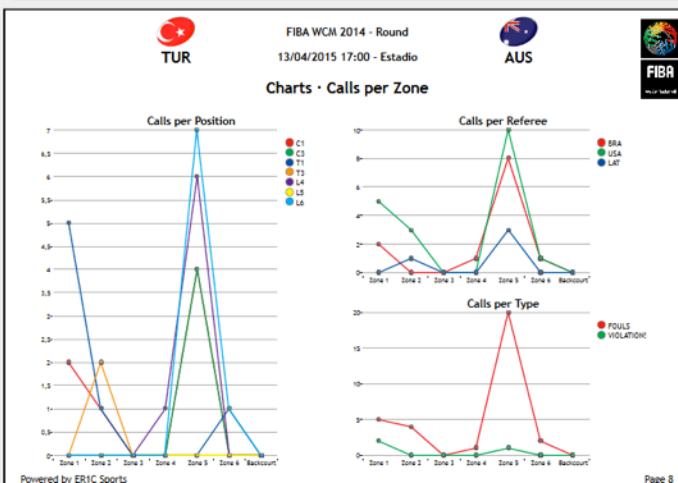
Page 5



Page 6



Page 7



Page 8



- All calls with all attributes are published in a central database
- Each concept is likely to be searched
 - Championship
 - Referee
 - Type of call or specific infraction
 - Position and zone
- Data can be presented and compared in tables and charts

DATABASE AND BIG DATA




fibapp.er1csports.com

JUO ▾ Desa ▾ Apple ▾ Google Traductor Google ▾ Original ▾ Panell Activació Er1c ER1C Cloud Signup Optimot COSMOS de Carl Sagan Adobe Kuler Color 3 Anys ARA Elevator Pitch MCE Mac ▾ >> +


 **FIBA**
We Are Basketball 

From: Action: Referee:

To: Team: 

☒ Slides list 156 / 156 ↻

Backcourt Zone 2 · ARG · Call · Defense · OK · On Ball · Situations · Fast break · HC · Hand checking



Zone 5 · CRO · Call · Defense · OK · ... 00:00:30



Zone 6 · CRO · Call · Offense · IC · ... 00:00:30

ARG · Call · Defense · OK · O... 00:00:30

Backcourt Zone 2 · ARG · Call · ... 00:00:30

Zone 3 · CRO · Call · Defense · OK · ... 00:00:30

Zone 4 · ARG · Call · Defense · OK · ... 00:00:30

Search...  

DATABASE AND BIG DATA



Browser window: fibapp.er1.csports.com/index.php

Navigation: Slides list 1 / 49

Zone 5 · AUS · Call · Situations · Rebound · On Ball · BC · Push

Extended filter

From: dd/mm/aaaa Action: On Ball Referee: LATISEVS Olegs

To: dd/mm/aaaa Team: AUS, TUR Extended filter

From: dd/mm/aaa Action: On Ball Referee: LATISEVS Olegs

To: dd/mm/aaa Competition: FIBA WCM 2014 Stage: All 49

Team: AUS, TUR Local team: All Visitor team: MARAN... 18

Zone: Zone_5_R, Zone_1_L, Zone_2_R, Zone_5_L Localization: All Period: LATISEVS Olegs 9

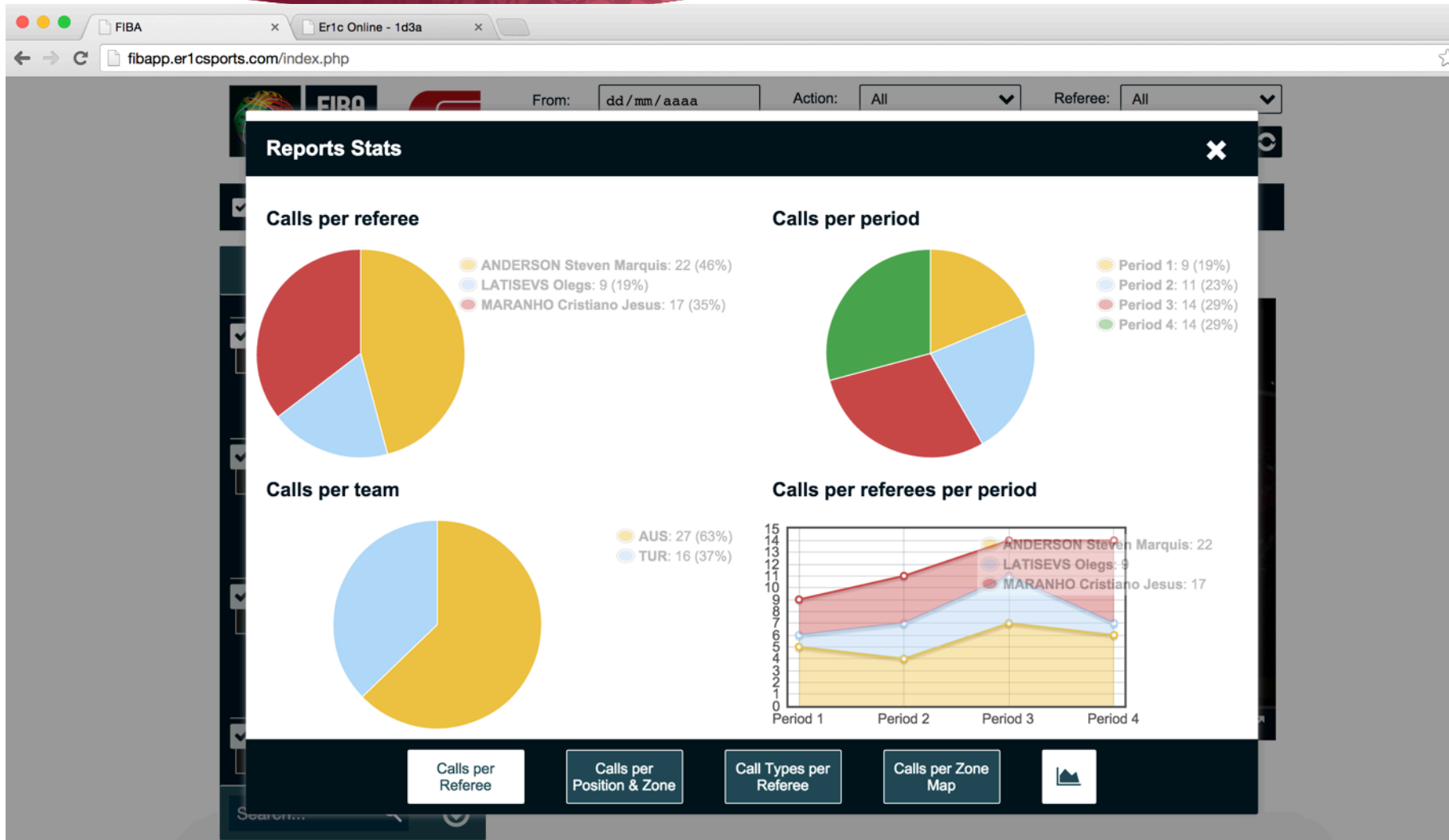
ANDER... 22

Steven Marquis

Search...

Demo time

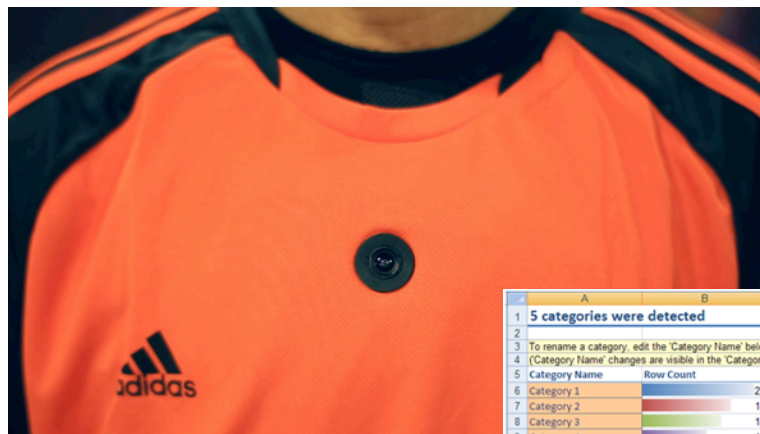
DATABASE AND BIG DATA



- Integration with external sources:
 - Game statistics and Table data
 - Biometrics (Heart rate, O₂ in blood, ...)
 - Tracking
 - IRS
- Data Mining
- Subjective cameras
- Any suggestion?



NEXT MILESTONES



5 categories were detected

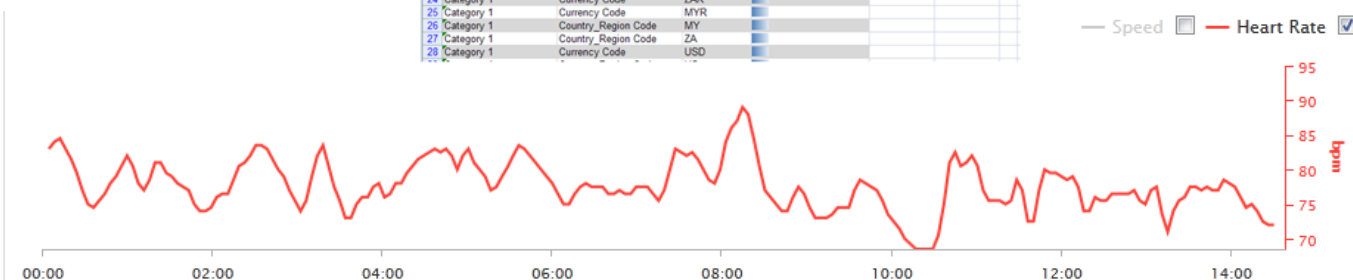
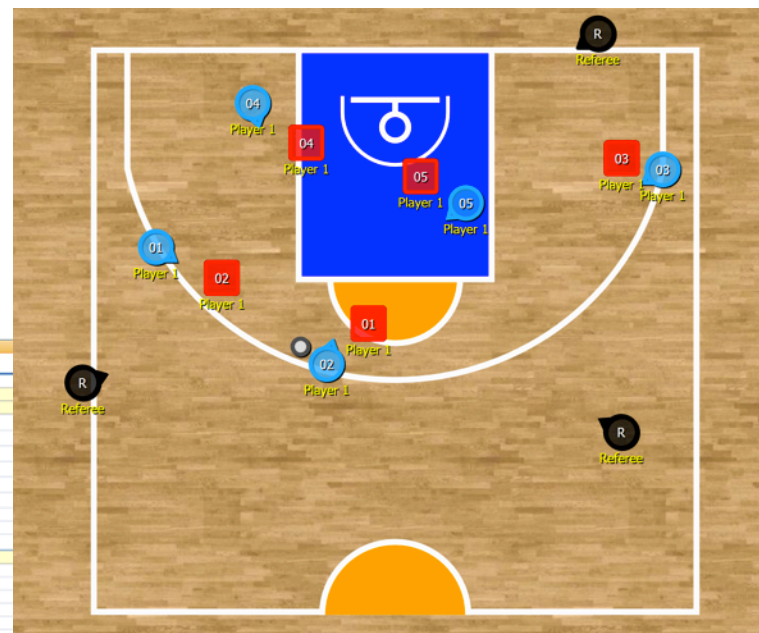
To rename a category, edit the 'Category Name' below.
(Category Name changes are visible in the 'Category' column of the source Excel table)

Category Name	Row Count
Category 1	21
Category 2	16
Category 3	14
Category 4	11
Category 5	6

Category Characteristics

Filter the table by 'Category' to see the characteristics of different categories

Category	Columns	Value	Relative Importance
Category 1	Gen_Bus_Posting Group	EXPORT	
Category 1	VAT Bus_Posting Group	IMPEXP	
Category 1	Customer Posting Group	BUITENLAND	
Category 1	Fin_Charge Terms Code	2.0 BUT	
Category 1	Reminder Terms Code	BUITENLAND	
Category 1	Language Code	ENU	
Category 1	Salesperson Code	HD	
Category 1	Location Code	GEEL	
Category 1	Currency Code	ZAR	
Category 1	Currency Code	MYR	
Category 1	Country_Region Code	MY	
Category 1	Country_Region Code	ZA	
Category 1	Currency Code	USD	



- ER1C Cloud, Start & Coach (1 user)
- ER1C FIBA Start Pack (2 users)
- ER1C FIBA Progress Pack (2 users)
- ER1C FIBA Workgroup Pack (4 users)
- From 248 € to 5.090 € (+ VAT)
- Yearly licenses
- 12 hours of practical training
- Mail support with remote access
- Product updates



STANDARD QUALITY

GLOBAL CONNECTION

International Basketball Federation
FIBA
Route Suisse 5 - PO Box 29
1295 Mies
Switzerland

Tel: +41 22 545 00 00
Fax: +41 22 545 00 99