



- CONMEBOL -

SCIENTIFIC MAGAZINE

MEDICAL COMMISSION & ANTI-DOPING UNIT



2023 Edition



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**MEDICAL COMMISSION
& ANTI-DOPING UNIT**

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Technology at the service of sport



The year 2023 ends with some very good news for South American football, also in the field of sports medicine. This year we started the use of the Medical Monitoring System from the quarter-final stages of our two main club tournaments. The implementation of this new tool is part of a broader CONMEBOL policy of putting everything that technology has to offer at the service of football. We are convinced that this is the future, which is why we were the first confederation to implement VAR in its competitions. With medical monitoring technology we hope to speed up care and appropriate treatment for moderate and seri-

ous injuries. Our primary concern will always be the wellbeing of our players. Talent is abundant on our pitches, but it is essential that we know how to look after it.

I do not need to further elaborate here on the importance of the work of CONMEBOL's Medical Commission and Anti-Doping Unit. It is enough to say that organizing attractive matches and increasingly competitive tournaments, which generate overwhelming passion in our continent and spark interest around the world, is also a merit of this fundamental team of CONMEBOL. Without their methodical and silent work, we simply would not be able to achieve this.

For all this good work, I can only congratulate Dr. Osvaldo Pangrazio and his staff, and at the same time encourage them to remain focused on the new challenges we face in 2024. The magazine we present here contains essential information to understand the roles and objectives achieved by this body of the Confederation. It will be very useful for all professionals or for anyone who wants to learn more about sports medicine. Thank you very much.

Alejandro Domínguez W-S
President of CONMEBOL

“ Our primary concern will always be the wellbeing of our players. Talent is abundant on our pitches, but it is essential that we know how to look after it. ”

A step into the future



It also allows for active consultation between different professionals, with the aim of making an initial diagnosis as accurate as possible and adopting the urgent measures that the case requires.

This system puts CONMEBOL at the global forefront in terms of prevention and assistance for medium and high severity injuries. Our goal is to offer the best and most advanced technological tools to South American federations and clubs to look after and preserve our athletes.

We have also implemented in short competitions and the unique Finals of the CONMEBOL Libertadores and Sudamericana 2023 the digital draw system, which optimizes resources such as time, guaranteeing transparency in the selection process of players who will go through random doping controls, without using manual selection systems such as tokens, positioning us at the forefront of innovation and use of technologies applied to doping controls.

These new achievements are in addition to the regular work of the Medical Commission and the Anti-Doping Unit, which have fully accomplished their mission throughout 2023. This was made possible thanks to the collaboration of all the medical professionals involved and the excellent performance of all members of our Medical Commission and Anti-Doping Unit.

While renewing our firm commitment to the health and physical integrity of all members of the South American football family, we offer in this **publication** a summary of our work during the year. We hope that it will be of great contribution and use to the anti-doping community as well as to the medical community that safeguards health. Thank you very much.

Dr. Osvaldo Pangrazio
President
Medical Commission & Director
CONMEBOL Anti-Doping Unit

In sport and in life, success depends on many factors, among which teamwork clearly stands out. **Some time ago, we started with the structuring** of the Medical Commission and Anti-Doping Unit, currently comprising professionals, doctors with excellent management skills in their duties, **who have been joined by new talents that today make up a team**, under the principles and management lines of President Alejandro Dominguez.

One of the latest achievements of this team is the implementation of the Medical Monitoring System, starting with the quarter-finals of the CONMEBOL Sudamericana and CONMEBOL Libertadores in 2023. This is a **big step** into the future, an advance that we have been designing for some time and that will be of enormous help in the early detection of serious injuries, **TBI and suspected sudden death**. With this Monitoring System, CONMEBOL and participating clubs' doctors have immediate access to images of plays leading to injuries, from various angles.

“ This system puts CONMEBOL at the global forefront in terms of prevention and assistance for medium and high severity injuries. ”

A key part of the team



Every professional player knows that trust in other teammates is essential to achieve victory. The goalkeeper must trust the defenders, the forwards the midfielders and all of them in the coaching staff. And so also the trust between the squad and the medical staff and the professionals in charge of assisting and caring for the players is crucial for matches and tournaments.

In this sense, CONMEBOL's Medical Commission and Anti-Doping Unit inspire great confidence and security throughout South American football, with their rigorously professional and transparent work, far removed from any dispute or controversy.

To this progress, we must add all the regular duties of this good CONMEBOL team. The balance is highly positive in this year that is coming to an end, as anyone who accesses the information contained in this magazine will be able to see. Thank you.

Nery Pumpido
Deputy Secretary General
Football / Development
Director

“ CONMEBOL's Medical Commission and Anti-Doping Unit inspire great confidence and security throughout South American football. ”

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I. Injury Epidemiology Short Competitions

1.1 Injuries in Men's Short Competitions 2023

Preamble

The CONMEBOL Medical Commission, as part of its commitment to everything related to the health and care of players, permanently monitors the injuries that occur in the competitions organised by CONMEBOL. The flow of information on the subject of injuries handled by the Medical Commission is quite extensive, so since this year we have been able to unify criteria and terminology used to evaluate; equating the ideas

in concepts and thus obtaining accurate information. We were able to define the parameter of the injuries, to differentiate whether they were traumatic or non-traumatic. In addition, we analyse more broadly the diversity of muscle injuries and the area in which they occur. This evaluation methodology is

very useful in order to compile accurate data, which is useful for research studies.

Within the objectives we set ourselves as a department, in the case of injuries considered to be of high severity, we carried out a follow-up during and after the competition, with the

aim of accompanying the recovery process. As the tournaments progressed, we provided important support to all the team and national team doctors when they needed it, and we also provided close support through the medical coordinators in each of the cases that arose.

1.1.1. CONMEBOL Sub20 2023.

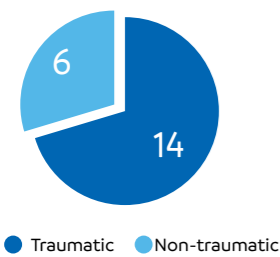
Held from January 19 to February 12 in Colombia, where the 10 teams representing the CONMEBOL member associations participated, it was a competition that granted 4 qualifying places to the World Cup of the Category. The Medical Team was formed by Dr. Jairo Rojas (COL) - Medical Coordinator, in addition to Doctors Fernando

Solera (BRA), Franco Carucci (VEN) and Mario Mercado (COL). The first phase of the tournament was held in the city of Cali, and the final phase was held in Bogota.

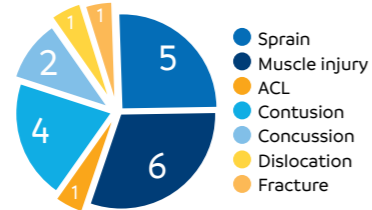
The competition lasted **25 days**, **35** matches were played during the competition and a total of 20 injuries were recorded.



Type of injury



Diagnosis



- There were **6.3** injuries per **1000** minutes of play.
- The most affected areas in terms of contact injuries were in the ankle, and in terms of muscular injuries the hamstring.
- The most serious injury was suffered by a footballer from Argentina, who was removed on a rigid stretcher, immobilized and taken to an ambulance to be transferred to a medical center. After studies, a sprain in the atlantoaxial ligament was confirmed. The player returned to his country.

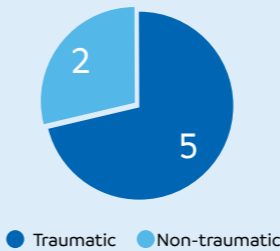


1.1.2. CONMEBOL Copa América Fútbol Playa 2023.

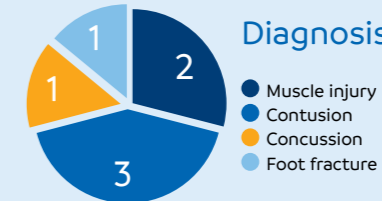
The competition was held from March 11 to March 19 in Rosario, Argentina, with the participation of the 10 teams representing the CONMEBOL member associations. **The champion of the competition was Brazil.** The Medical Team was formed by Dr. Paula Bolgeri (ARG) - Medical Coordinator, in addition to Doctors Gonzalo Gaiero (URU), and Osni Jaco Da Silva (BRA).

The competition lasted **8 days**, **27** matches were played during the competition and a total of **7** injuries were recorded.

Type of injury



Diagnosis



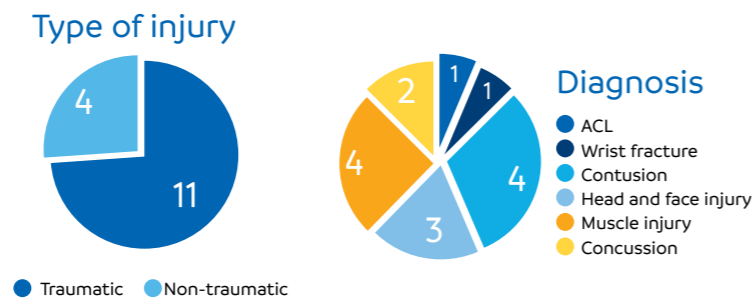
- A total of **2,8** injuries per **1000** minutes of play were recorded.
- The most significant injury was a fracture of the proximal phalanx of the 5th toe.
- This is the tournament with the highest temperatures recorded so far this year in short tournaments.
- The Hydration Break protocol was applied during the competition.





1.1.3. CONMEBOL Sub17 2023.

Held from March 30 to April 23 in Ecuador, where the participants were the 10 teams representing the member associations of CONMEBOL. The competition awarded 4 qualification places to the World Cup of the Category. The Medical Team was formed by Dr. Luis Sevilla (ECU) - Medical Coordinator, in addition to Doctors Gianni Mazzocca (VEN), Santiago Beretervide (URU) and Marcos Korukian (BRA). The first phase of the tournament was played in the city of Guayaquil, and the final phase was played in Quito.



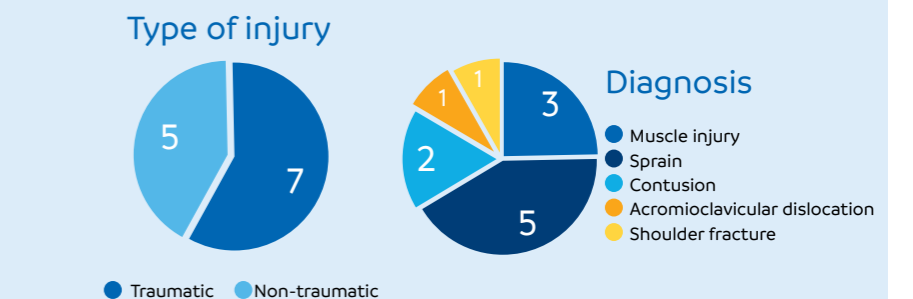
- The competition lasted **25 days**, **35** matches were played during the competition and a total of **15** injuries were recorded.
- **4.7** injuries per **1000** minutes of play were recorded.
- 1 case of anterior cruciate ligament rupture was recorded.
- One player suffered a fracture with displacement of the radius.
- The matches were played in the city of Quito at an altitude of approximately **2,850 m**.

1.1.4. CONMEBOL Libertadores Futsal 2023.



Held between May 21 and May 28 in Caracas - Venezuela where 12 clubs participated as representatives of the CONMEBOL Member Associations. **The champion of the competition was the team from Cascavel (Brazil).** The Medical Team that participated in the competition consisted of Dr. Javier Peralta (VEN) - Medical Coordinator, as well as Doctors Andres Serrano (VEN), and Boris Zambrano (ECU).

The competition lasted **8 days** and a total of **32** matches were played, registering a total of **12** injuries.



- **4.1** injuries per **1000** minutes of play were recorded.
- **7** injuries were traumatic.
- Among the injuries, it stands out a right clavicle injury.
- One case of acute appendicitis was diagnosed; a laparoscopic appendectomy was performed with satisfactory results.

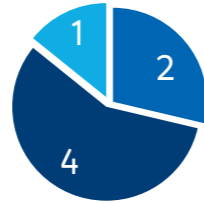
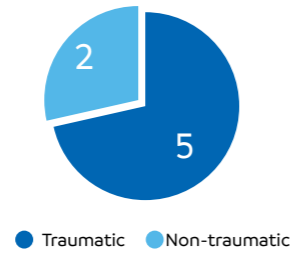


1.1.5. CONMEBOL Sub17 Futsal 2022.

Held from 17 to 25 June in Asunción-Paraguay where the 10 teams representing the CONMEBOL Member Associations took part. **The winning team of the competition was Argentina.** The Medical Team was composed of Dr. Nielsen Tapia (PER) - Medical Coordinator, as well as Doctors Miguel Arce (PER), and Luis Williams (VEN).

- The competition lasted **8 days** with a total of **27** matches being played, with a total of **7** injuries recorded throughout the tournament.
- A total of **2.8** injuries per **1000** minutes of play were recorded.
- No serious injuries were reported.
- Both the ankle and knee area were the most frequent injury locations.

Type of injury



Diagnosis

- Sprain
- Contusion
- Muscle contracture



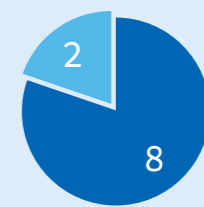
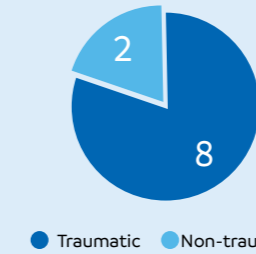
1.1.6. CONMEBOL Libertadores Fútbol Playa 2022.

Held between June 18 and June 25 in Iquique - Chile, where 12 clubs participated as representatives of the CONMEBOL Member Associations. **The champion of the competition was the team from Presidente Hayes (Paraguay).** The Medical Team was composed of Dr. Cristian Lavarello (CHI) - Medical Coordinator, as well as Doctors Sergio Freire (BRA), and Federico Gorria (URU).

The competition lasted **8 days** with a total of **32** matches being played, with a total of **10** injuries recorded throughout the tournament.



Type of injury



Diagnosis

- Contusion
- Muscle injury

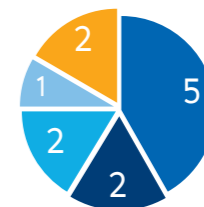
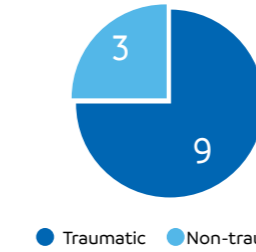
- A total of **3.4** injuries per **1000** minutes of play were recorded.
- Most injuries were traumatic and concussion injuries.
- In some cases players were assessed and returned to play.

1.1.7. CONMEBOL Libertadores Sub20 2023.

Held from July 1 to July 16 in Chile, 12 clubs representing CONMEBOL member associations participated in the competition. The Boca Juniors team (Argentina) was crowned champion of this 8th edition. The medical team that took part in the competition was formed by Dr. Rocio Nuche (CHI) - Medical Coordinator, and the team also included Doctors Jorge Sarango (PER), Guillermo Betancourt (COL) and Marcelo Rodriguez (ARG). The competition was divided into two venues: Coquimbo and La Serena, cities very close to each other. The final stage of the tournament was played in La Serena.



Type of injury



Diagnosis

- Contusion
- Muscle injury
- Concussion
- Wound
- Sprain

- The competition had a duration of **15 days, 22 matches** were played during the competition and a total of **12** injuries were recorded.
- **6.0** injuries per **1000** minutes of play were recorded.
- 1 chest contusion was recorded and the player was taken by ambulance to the medical center. A **pneumothorax** was confirmed, and the player was hospitalized for 8 days, receiving drainage treatment. The player returned to his country by land.
- The IFAB concussion substitution protocol was implemented on a trial basis and was used on **two occasions**.

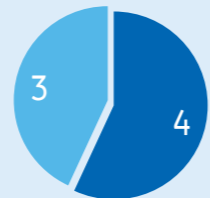
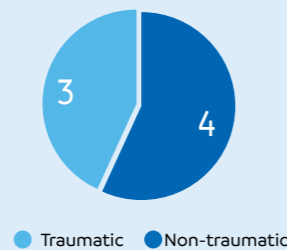


1.1.8. CONMEBOL Sub20 Fútbol Playa 2023.

Competition that took place between August 5 and August 13 in Iquique - Chile, where the 10 teams representing the member associations of CONMEBOL took part. **The champion of the competition was the national team of Paraguay.** The Medical Team consisted of Dr. Roberto Díaz (CHI) - Medical Coordinator, as well as Doctors Jorge Bitun (BRA), and Victor Carpio (PER).

The competition had a duration of **8 days** where **27** matches were played, with **7** injuries recorded throughout the competition.

Type of injury



Diagnosis

- A total of **3** injuries per **1000** minutes of play were recorded.
- Most injuries were contusions and sprains due to contact and non-contact.
- Temperature and humidity were monitored throughout the competition.
- There was **1** ambulance referral from the stadium to the hospital due to decompensation and dehydration.



1.1.9. Intercontinental Sub20 2023.

Match held on Saturday 09 September at the Bombonera stadium, Buenos Aires, Argentina where the teams Boca Juniors (ARG) vs AZ Alkmaar (NL) winners of the CONMEBOL Libertadores Under-20 2023 and the UEFA Youth League respectively faced each other. The team of CONMEBOL medical officers accompanying the tournament consisted of Dr Daniel Stumbo (ARG) Medical Coordinator, Dr Matias Roby (CHI) as Field Doctor, Dr Matilde Miralles (URU) and Dr Octavio da Silveira (BRA) as Doping Control Officers. The match ended in a 1-1 draw after

90 minutes, but Boca Juniors emerged victorious in the penalty shoot-out.

Firstly, an AZ Alkmaar player suffered a non-contact knee sprain in the first half and was substituted. On the other hand, in the second half a player of the same team suffered a sprained shoulder and was taken off the pitch. An X-ray was carried out, ruling out a bone injury, and the final diagnosis was acromioclavicular sprain. The medical team carried out the corresponding accompaniment and the control of the medical services.



1.1.10. CONMEBOL Sub20 Futsal 2022.

Held between September 9 and September 17 in La Guaira -Venezuela, where the 10 teams representing the member associations of CONMEBOL participated. **The champion of the competition was the Brazilian national team.** The Medical Team consisted of Dr. Andres Serrano (CHI) - Medical Coordinator, as well as Doctors Santi-

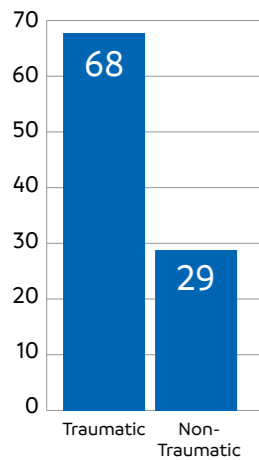
ago Beretervide (URU), and Alejandro Soler (COL).

- The competition had a duration of **8 days** where **27** matches were played, registering a total of **5** injuries.
- A total of **2.0** injuries per **1000** minutes of play were recorded.
- Temperature and humidity were monitored throughout the competition.
- The most affected area in terms of injuries was the knee.
- There was **1** case of ACL rupture, where the player was previously evaluated and then studies were carried out to confirm the injury.

1.1.11. Representative Charts.

- Throughout the year 2023 and to date, in the men's short competitions, **10 tournaments** have been played between football, beach football and futsal.
- A total of 266 matches were played in which we carried out a control and follow-up in each one of them, registering a total of **97** injuries.
- There was a predominance of **68** traumatic injuries compared to **29** non-traumatic injuries.
- The average number of injuries found in summary reflects **4.0** injuries per **1000** minutes of play.
- To highlight, there was one case of acute appendicitis, one pneumothorax and another case of severe dehydration.

Type of injuries



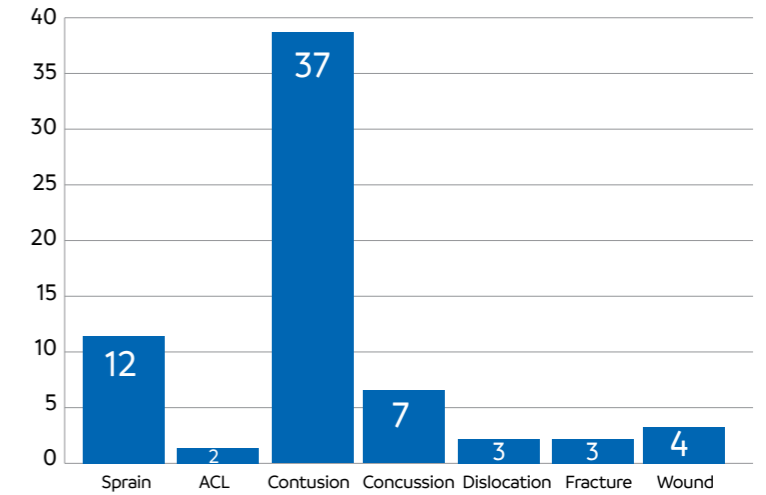
Traumatic

- Within the traumatic injuries, which predominated in the men's short tournaments, cases of **Contusion** were the most frequent.
- Following this, **Sprain** injuries were the most recurrent.

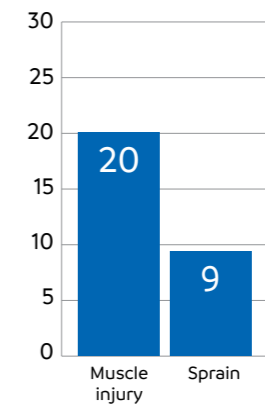
Non-Traumatic

- Among the non-traumatic injuries, **muscle injuries** predominated in the men's short tournaments.
- Also, in this group we diagnosed non-contact **sprains** during play.

Type of injuries



Injury classification



Conclusions

- CONMEBOL men's short competitions have very similar injury types and frequency to other competitions.
- Muscle injuries and sprains stand out.
- The CONMEBOL medical team must coordinate and manage any emergency on the field of play and be prepared to coordinate the means of transfer and hospital reception to resolve any eventuality.



1.2 Injuries in Women's Football 2023

Preamble

Women's football worldwide has grown exponentially in recent years, and this part of the continent is no exception. The number of women's tournaments held annually has increased considerably, both at national team and club level. The CONMEBOL Medical Commission has the same commitment to look after

the health of the players and establish the same protocols.

The epidemiology of injuries in women's football is a very broad field, which we must study in depth, as there is a large amount of information. We can mention that the anatomical and biomechanical differences

between men and women are notorious. Women have a wider pelvis, a shorter femur and valgus knees. In addition, women have greater external tibial torsion and pronation of the feet. In addition to this, the mechanics of their movements are different, and the force they use for certain movements is also different.

Moreover, the speed, intensity and pace of play are not the same. As a result of all these factors, injuries can be very varied, which is why we must focus more research on the women's game.



1.2.1. CONMEBOL Libertadores Futsal Femenina 2023.

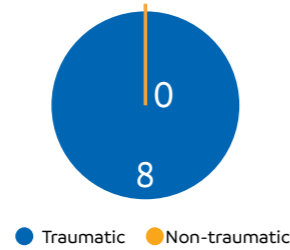
It took place from January 4 to June 11 in Asunción-Paraguay, where 10 teams representing CONMEBOL Member Associations participated. The Medical Team was formed by Dr. Soledad Travasso (ARG) - Medical Coordinator, in addition to Dr. Priscila Colombo (BOL) and Dr. Paola Lopez (ECU). **The winning team of the competition was Stein Cascavel (BRA).**

The competition lasted **7 days**, with **27 matches** played during the competition and a total of **8 injuries** recorded throughout the competition.

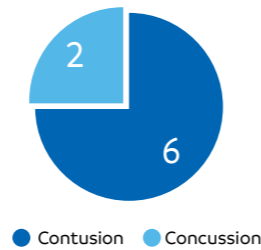
- A total of **3.3 injuries** per **1000** minutes were recorded.
- All injuries were traumatic.
- No muscular injuries were reported.
- In all cases the injured players were removed from the pitch.



Type of injury



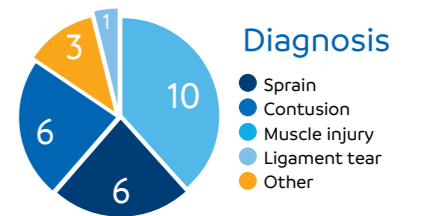
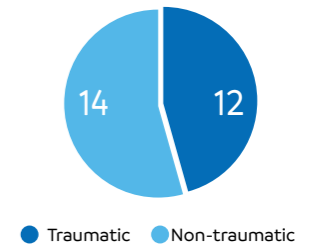
Diagnosis



1.2.3. CONMEBOL Libertadores Femenina 2023.

Held between October 5 and October 21, where 16 teams representing CONMEBOL member associations participated. The Medical Team was formed by Dr. Vanessa Lozano (COL) - Medical Coordinator, in addition to Dr. Mabel Kiese (ARG), Dr. Paola Bolgeri (ARG) and Dr. Jairo Rojas (COL). The winning team of the competition was Corinthians (BRA). The competition had a duration of **16 days**, **32 matches** were played during the competition and a total of **26 injuries** were recorded.

Type of injury



- There were **26 injuries** recorded in the **32 matches** played.
- There were **9.0 injuries** per **1000** minutes of play.
- The most serious injuries were ACL ruptures.
- Muscle injuries to the thigh predominated.
- More injuries were recorded on the right side.

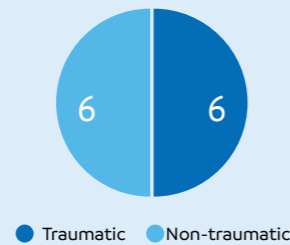


1.2.2. CONMEBOL Copa América Futsal Femenina 2023.

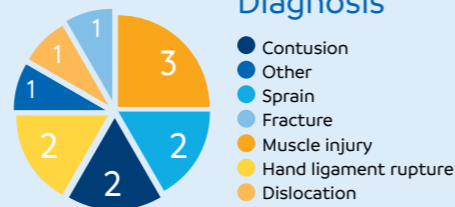
Competition held from September 24 to October 1 in Buenos Aires-Argentina, where the 10 teams representing the CONMEBOL Member Associations participated. The Medical Team was formed by Dr. Mabel Kiese (ARG) - Medical Coordinator, in addition to Dr. Lucia Astudillo (ECU) and Dr. Florangel Escalante (CHI). **The winning team of the tournament was Brazil.**

- The competition had a duration of **7 days**, with **27 matches** played during the competition and a total of **12 injuries** recorded throughout the competition.
- A total of **4.9 injuries** per **1000** minutes were recorded.
- Injuries were traumatic and non-traumatic.
- The results of the studies requested by the doctors were followed up.
- There were no serious injuries.

Type of injury



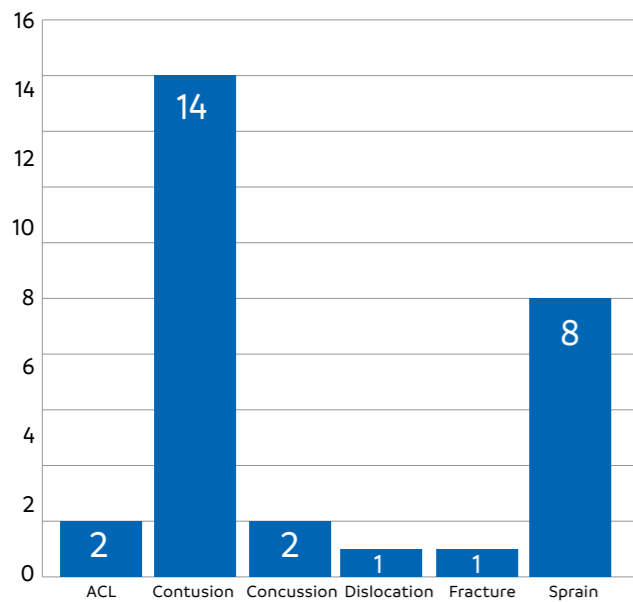
Diagnosis



For this competition, an additional substitution (out of the 5 established by the rules) was approved in case of suspected concussion. Satisfactorily, this substitution was **not used** throughout the tournament.

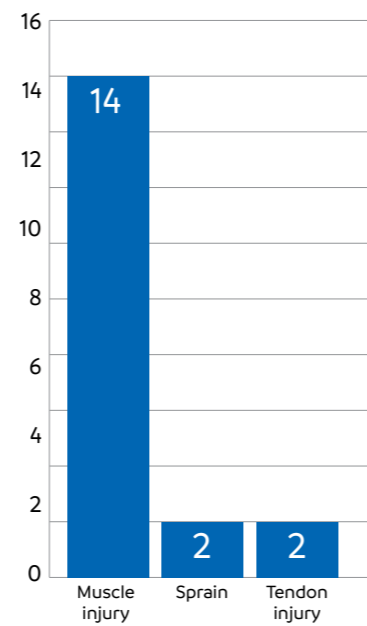
1.2.4. Representative Graphics.

- Throughout the year 2023 and to date, in the women's short competitions, 3 tournaments have been played counting football and futsal.
- A total of **86 matches** were played in which we carried out a control and follow-up in each one of them, registering a total of **46 injuries**.
- Traumatic injuries predominated with **28** in total and non-traumatic injuries with **18**.
- The average found in summary reflects **5.9** injuries per **1000** minutes of play.
- To highlight cases of ACL rupture in football



Traumatic

- Within the traumatic injuries, which predominated in the women's short tournaments, cases of **Contusion** were the most frequent.
- Following this, **Sprain injuries** were the most frequent.



Non-Traumatic

Among the non-traumatic injuries, which predominated in the women's short tournaments, **muscle injuries** were the most frequent. After that, **sprain injuries** and **tendon injuries** were the most frequent.



Conclusions

- CONMEBOL women's short competitions have very similar types of injuries and frequency to other competitions.
- Muscular injuries in the thigh area stand out.
- The CONMEBOL medical team must coordinate and manage any emergency on the pitch and be prepared to coordinate the means of transfer and hospital reception to resolve any eventuality.

II. Injury Epidemiology Long Competitions



- CONMEBOL -
LIBERTADORES



2.1. Epidemiology of injuries in CONMEBOL Libertadores 2023

155 matches were played in the CONMEBOL Libertadores 2023, of which no injuries were reported in 86 (56.7%), while injuries were reported in the remaining 66 (43.3%).

30 matches were played in the preliminary phase, 96 in the group phase and 29 in the final phase. A total of 104 injuries were recorded, of which 71 (68.3%) led to the

player's withdrawal from the pitch. Only one third of the injuries, 33 (31.7%), allowed the player to continue playing.

There were 60 (57.7%) direct trauma injuries and 44 (42.3%) non-contact injuries.

(42,3%). There was no difference between the two sides, 50 injuries

were on the right side and 41 on the left.

Injuries /1,000 minutes of play overall, considering minor injuries and serious injuries, those requiring withdrawal from the game, were 745.

The overall injuries per game were: 0.67

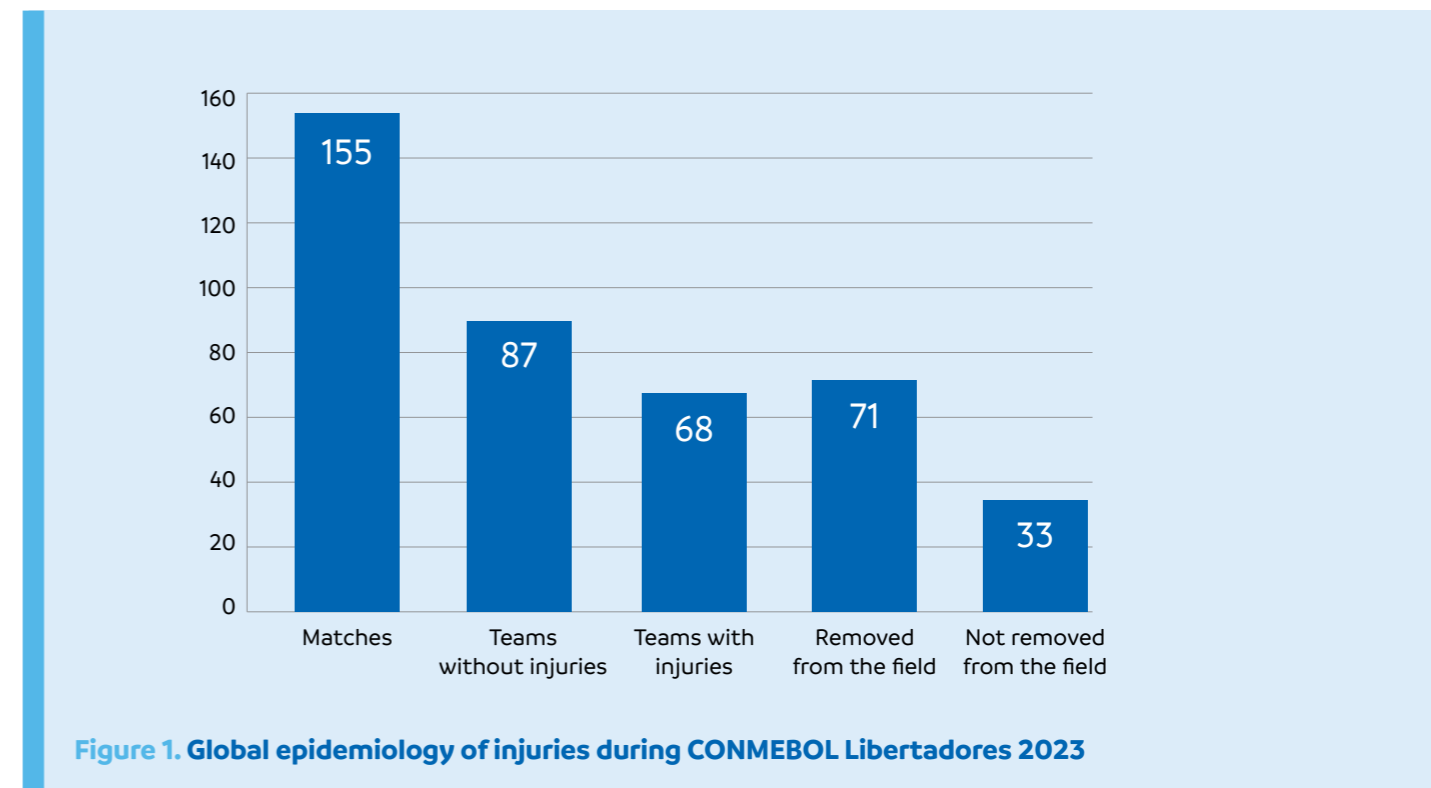


Figure 1. Global epidemiology of injuries during CONMEBOL Libertadores 2023

The distribution of the anatomical location of the injuries is shown in the following table, specifying those that forced the player to retire.

Location	Removed	Not removed	Total
Head / face	6	17	23
Thigh	22	1	23
Leg	16	5	21
Knee	12	2	14
Ankle	6	2	8
Shoulder	3	1	4
Thorax	-	2	2
Lumbar	-	2	2
Hip	1	1	2
Pelvis	1	-	1
Hand	-	1	1
Arm	1	-	1

The diagnosis of the total injuries resulted as follows:

Injury Diagnosis	
Muscular	37
Contusion	35
Concussion	7
Face wound	7
sprained ankle	8
sprained knee	4
Low back pain	1
Tendinitis	1
Synovitis	1
Shoulder subluxation	1
ACL	1
Knee dislocation, ACL, PCL	1

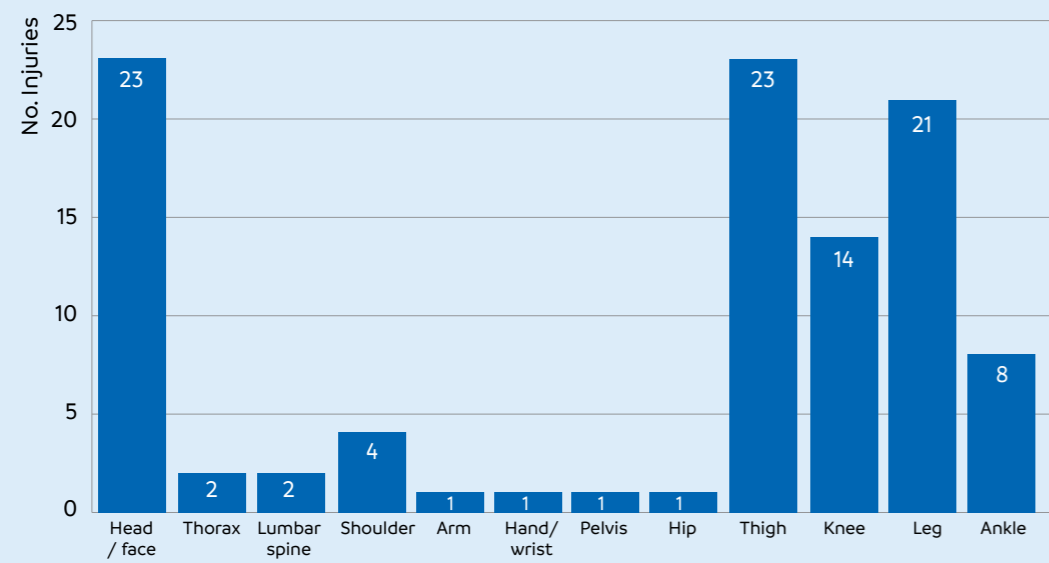


Figure 2. Anatomical location of injuries during CONMEBOL Libertadores 2023

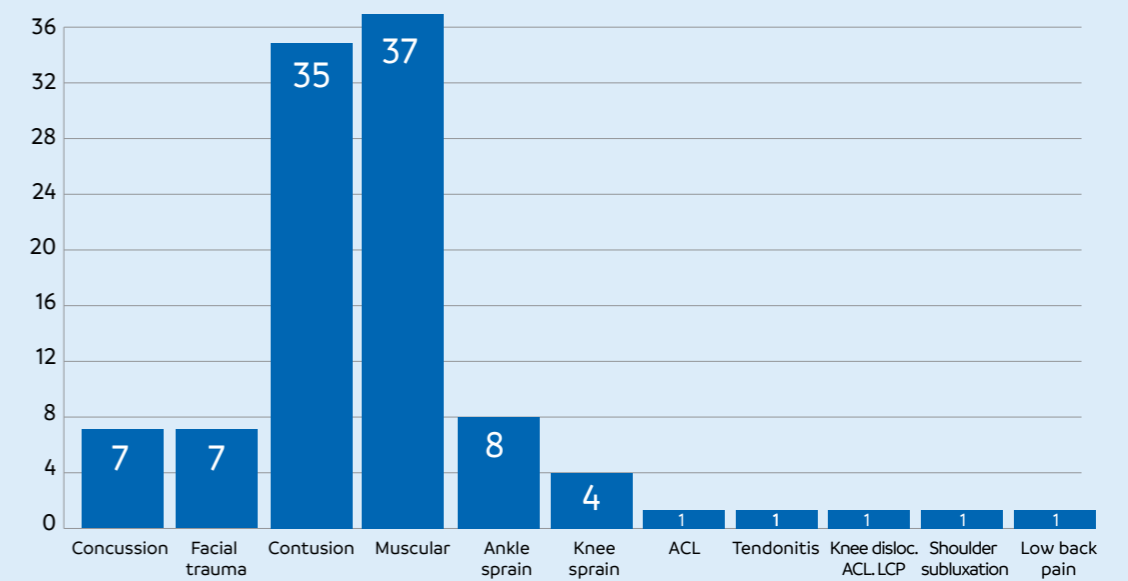


Figure 3. Diagnosis of injuries CONMEBOL Libertadores 2023



Time of lesion occurrence	
1 – 15	10
16 – 30	17
31 – 45	28
46 – 60	19
60 – 75	17
76 – 90	11

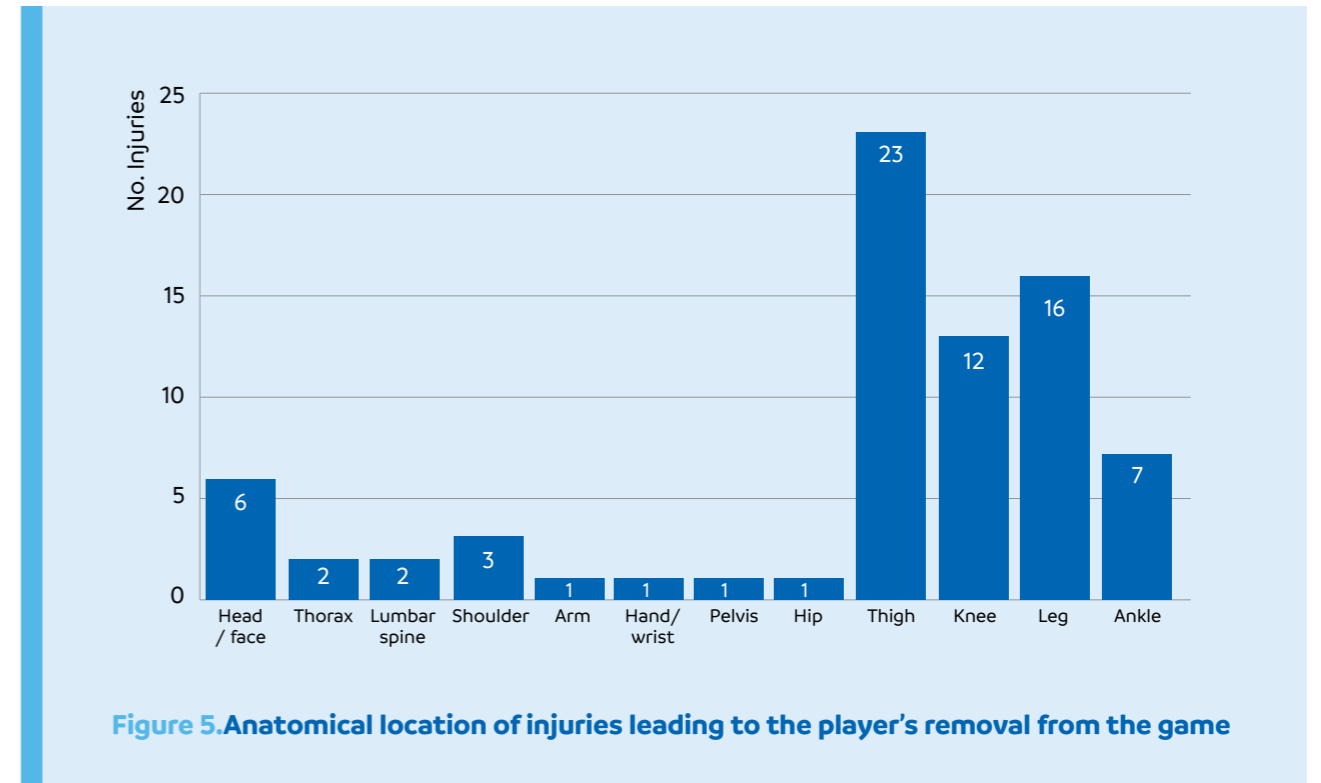
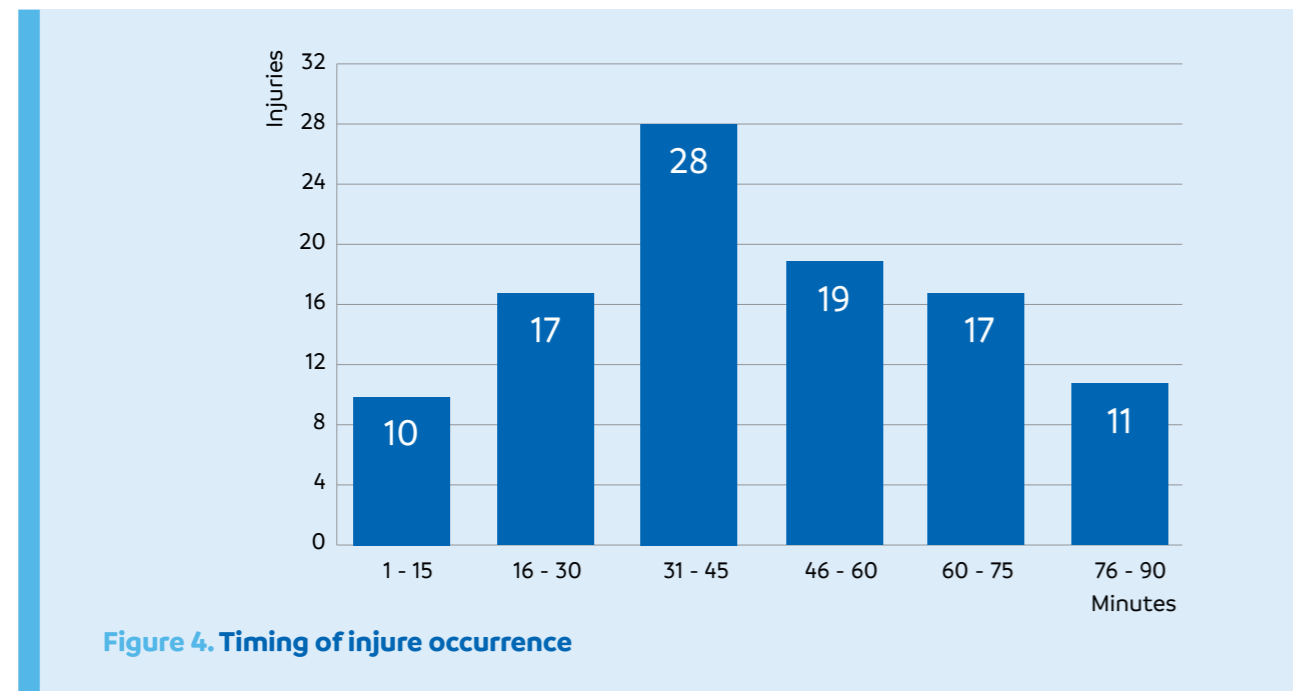


Figure 5. Anatomical location of injuries leading to the player's removal from the game

2.2. Injuries forcing the player off the pitch; serious injuries

Of those injured, 71 players withdrew from their match, of which 30 as a result of a contact injury and the remaining 41 non-contact.

Location of injuries of removed players	
Thigh	23
Leg	16
Knee	12
Ankle	7
Head/Face	6
Shoulder	3
Lumbar spine	2
Thorax	2
Pelvis	1
Hip	1



Injury Diagnosis	
Muscular	31
Contusion	14
Concussion	7
Sprained ankle	6
Sprained knee	4
Face wounds	2
ACL tear	1
Lux knee, ACL and PCL tear 1	1
Concussion with loss	1
Shoulder subluxation	1
Low back pain	1
Patellar tendinopathy	1
Arthralgia	1

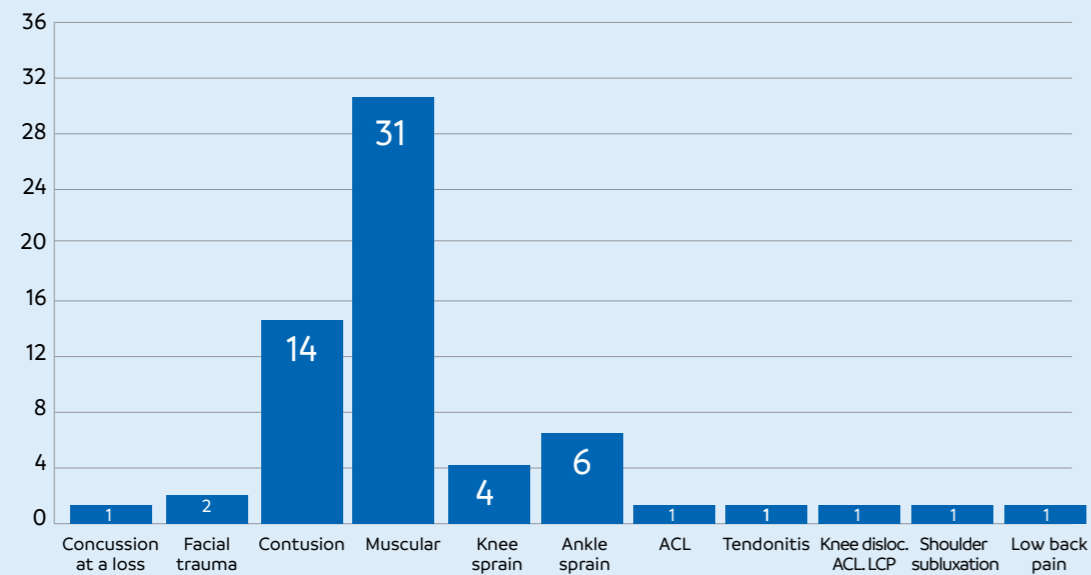


Figure 6. Diagnosis of injuries leading to the player's removal from the game

Time of injury occurrence	
1 - 15 min	4
16 - 30 min	14
31 - 45 min	17
46 - 60 min	13
61 - 75 min	15
76 - 90 min	7

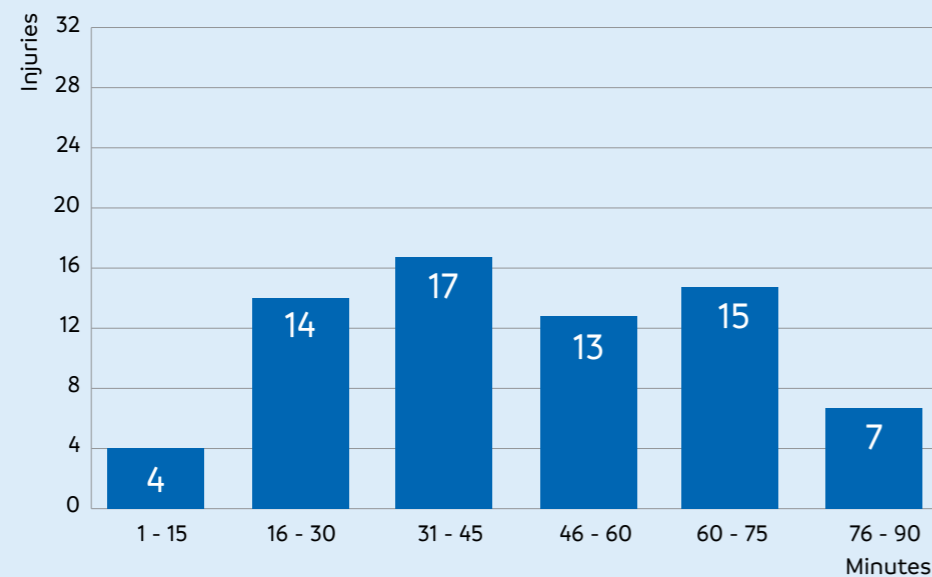


Figure 7. Time of injury leading to the player's removal from the game

2.3. Epidemiology according to competition stage CONMEBOL Libertadores 2023

CONMEBOL Libertadores preliminary round

- Matches: **30**
- Injured / removed: **10**
- Injuries / 1.000: **3,7**
- Injuries / match: **0,3**

Location of injuries of removed players	
Thigh	5
Head / Face	2
Leg	1
Ankle	1
Lumbar spine	1

Diagnosis of injuries	
Muscular	6
Concussion without loss of consciousness	1
Sprained ankle	1
Wound	1
Shoulder subluxation	1
Low back pain	1

Time of occurrence of injury	
1 - 15 min	1
16 - 30 min	3
31 - 45 min	1
46 - 60 min	2
61 - 75 min	3
76 - 90 min	0

CONMEBOL Libertadores Group Stage

- Matches: **96**
- Injured / removed: **41**
- Injuries / 1.000: **4,7**
- Injuries / match: **0,43**

Location of injuries of removed players	
Thigh	9
Leg	9
Knee	9
Ankle	4
Head/ Face	3
Shoulder	3
Thorax	2
Pelvis	1
Hip	1

Diagnosis of injuries	
Mucular	15
Sprained ankle	3
Contusion	11
Face wounds	3
Concussion without loss of consciousness	1
Sprained knee	1
ACL tear	1
Lux knee, ACL and PCL tear	1
Shoulder subluxation	1
Patellar tendinopathy	1
Arthralgia	1

Time of occurrence of injury	
1 - 15 min	2
16 - 30 min	9
31 - 45 min	12
46 - 60 min	6
61 - 75 min	5
76 - 90 min	6

CONMEBOL Libertadores Finals

- PMatches: **29**
- Injured / removed: **17**
- Injuries / 1.000: **6,5**
- Injuries / match: **0,59**

Location of injuries of removed players	
Thigh	7
Leg	5
Knee	3
Head / Face	1
Ankle	1

Diagnosis of injuries	
Muscular	12
Concussion with loss	1
Sprained ankle	1
Sprained knee	1
Contusion	1

Time of occurrence of injury	
1 – 15 min	1
16 – 30 min	2
31 – 45 min	3
46 – 60 min	4
61 – 75 min	7
76 – 90 min	1

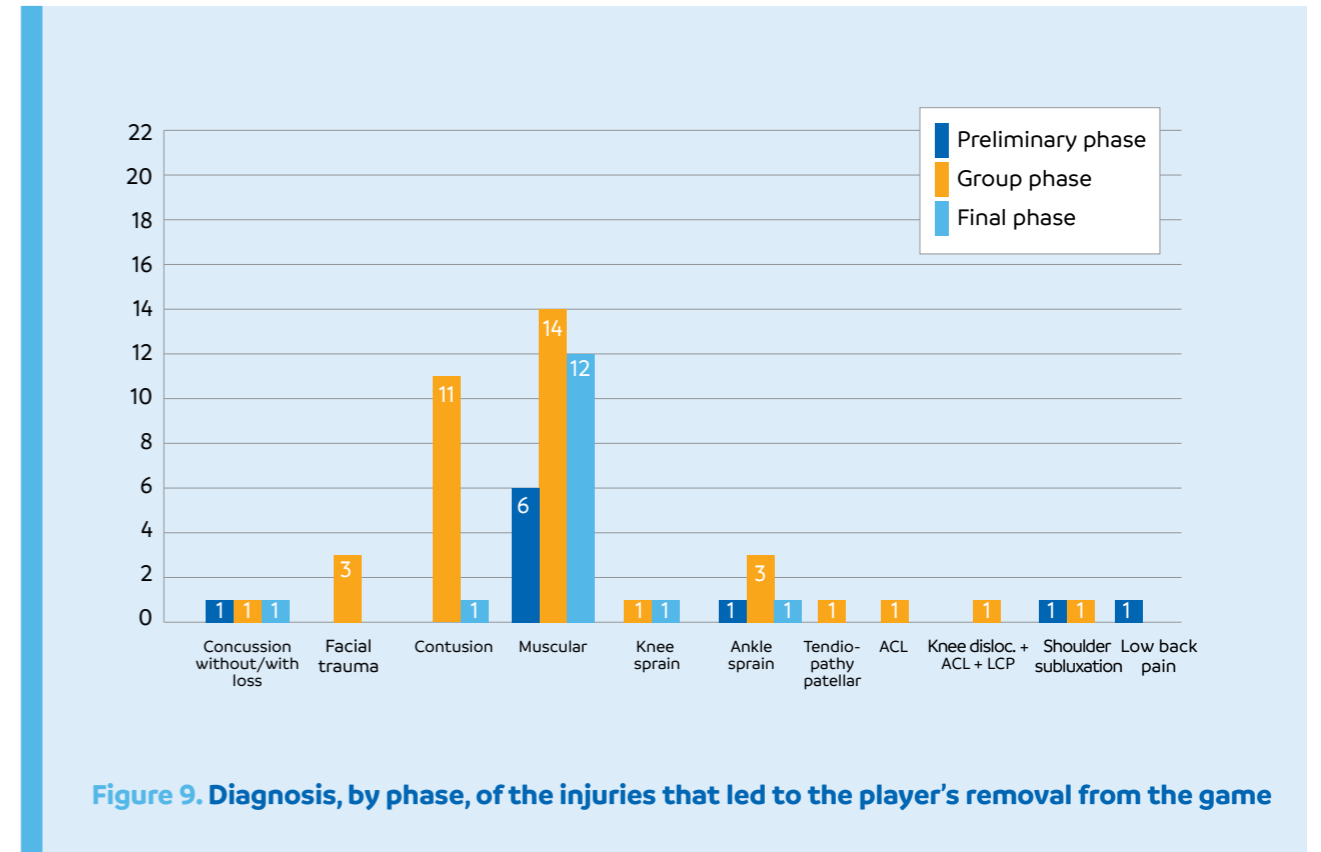


Figure 9. Diagnosis, by phase, of the injuries that led to the player's removal from the game

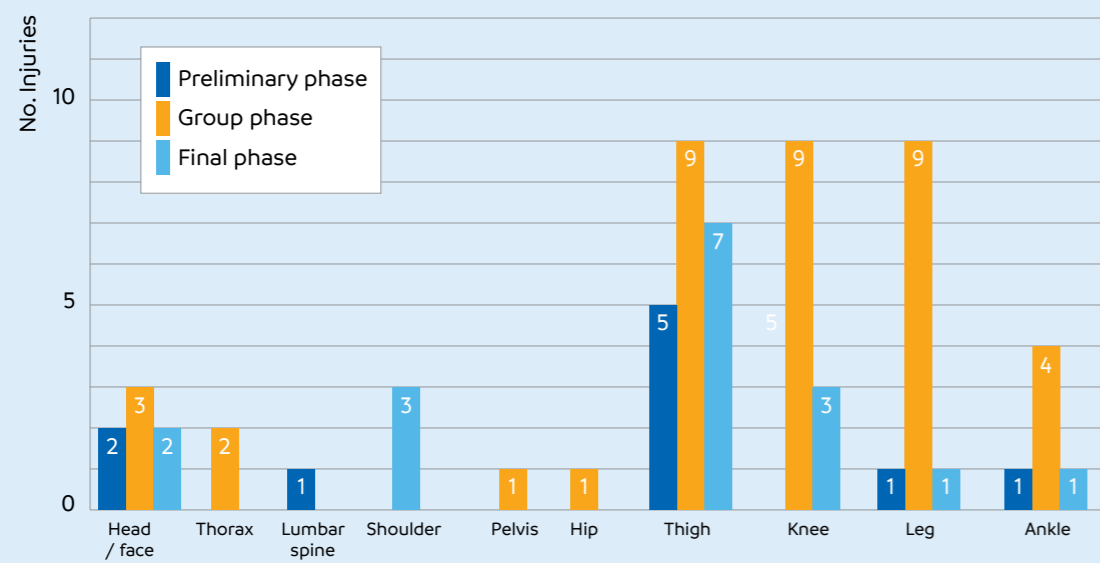


Figure 8. Anatomical location, by phase, of the injuries that led to the Player's removal

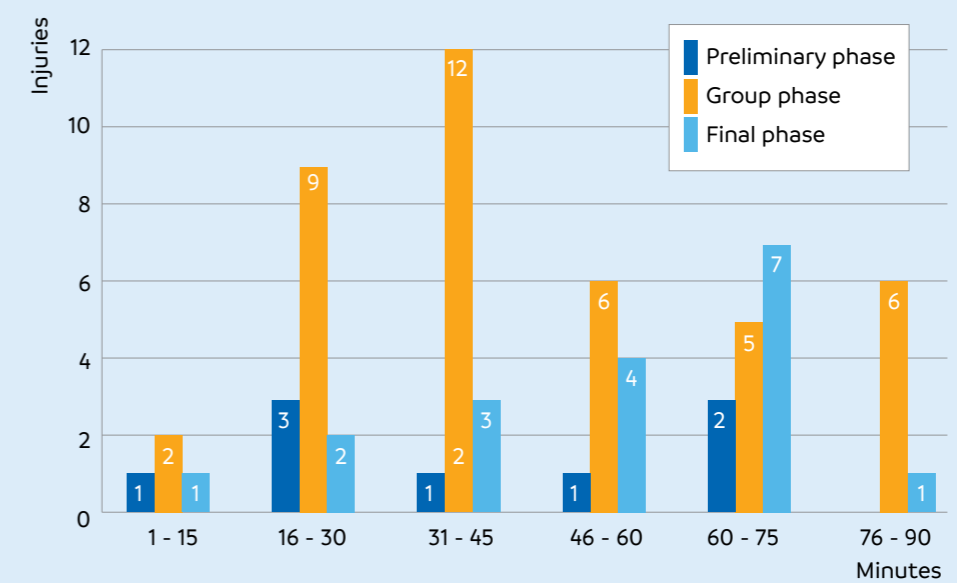


Figure 10. Timing of the injuries that led to the player's removal, by phase



- CONMEBOL -
SUDAMERICANA

2.4. CONMEBOL Sudamericana 2023

CONMEBOL Sudamericana 2023 consisted of a total of 157 matches, with a preliminary phase of 16 matches, a group phase of 96 matches and a final phase of 45 matches. In the 157 matches, played

between March and October 2023, there were 66 matches without injuries (42%) and 91 (58%) with at least one injury. There were 65 players withdrawn during the different matches of the competition,

we consider them as 'serious injuries', with 4.6 serious injuries per 1000 minutes of play or 0.4 serious injuries per match. Forty per cent of the serious injuries were contact injuries.



2.5. Epidemiology of total injuries

All injury records are analysed, both those that allowed the player to remain on the pitch and those that forced him to retire.

Location of total injuries	
Thigh	27
Head / face	23
Ankle	16
Leg	13
Knee	10
Shoulder	3
Hip	4
Lumbar	3
Foot	3
Pelvis	2
Thorax	1
Hand	1
Elbow	1

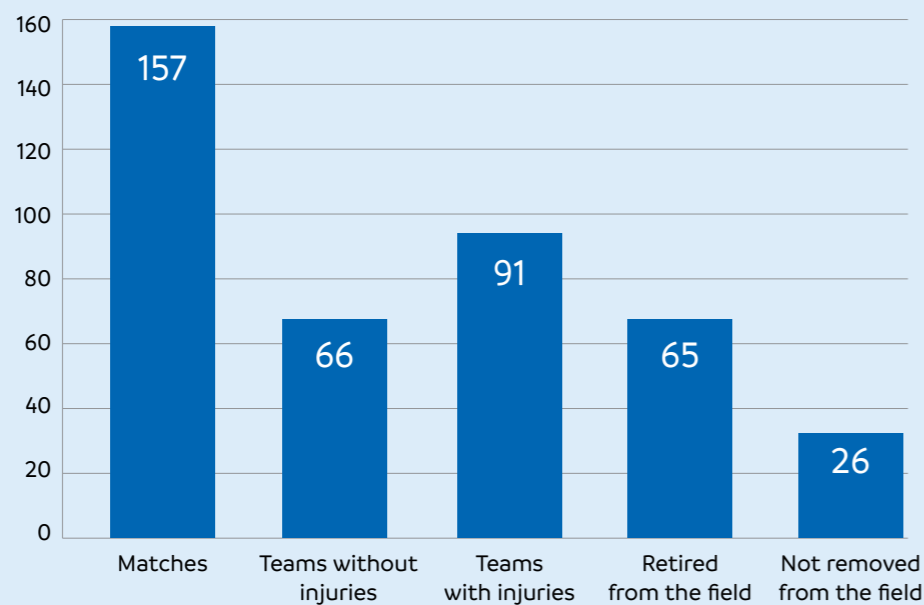


Figure 1.

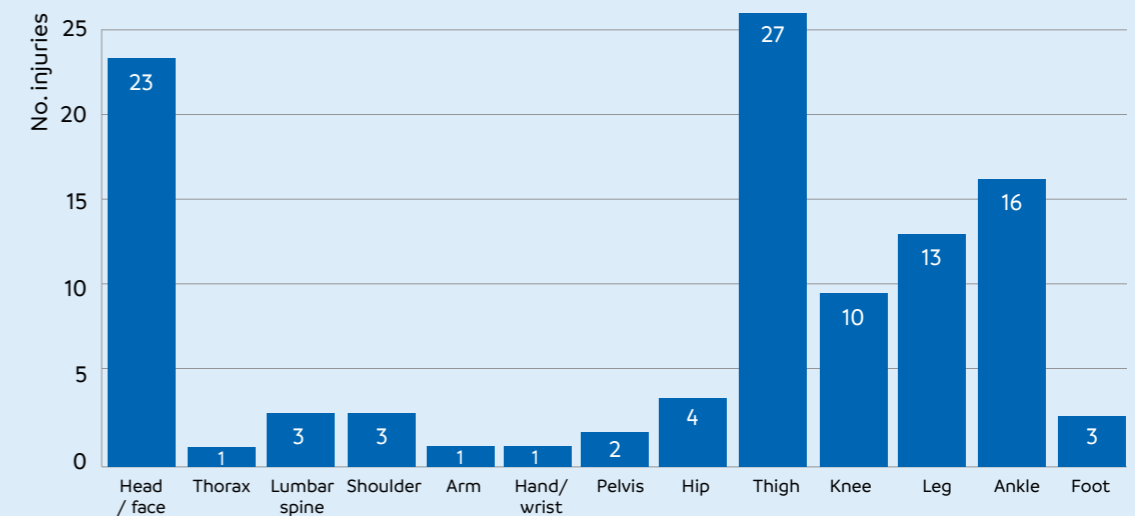


Figure 2. Anatomical location of the injuries

Side	
Right	56
Left	31

Diagnosis	
Contusion	32
Muscular injuries	
Strain	23
Contracture	5
Fibre tear	3
Overload	1
Strain	
Ankle	9
Knee	4
Concussion	
Without loss of consciousness	14
Face wounds	7
Ligaments	
Knee external collateral lig.	1
Knee medial collateral lig.	1
Low back pain	1
Pubalgia	1
Plantar fasciitis	1
Fracture	1
Interphalangeal dislocation hand	1
Recurrent shoulder dislocation	1

We detected 32 muscle injuries which we divided into three groups, contracture and overload (6), strain (23) and fibre tear (3). The most affected muscles were of the thigh, especially the hamstring muscles (8) and of the leg, the triceps suralis (7), with a predominance of the two calf muscles.

Muscular Injuries	
Anterior rectus muscle	2
Hamstring muscle	8
Adductor muscle	2
Triceps suralis muscle	7
Biceps femoris muscle	2

Ankle sprains (9) and knee sprains (4) are being diagnosed with increasing frequency and are of varying severity. On this occasion, two ruptures of the collateral ligaments of the knee were diagnosed, one internal and one external.

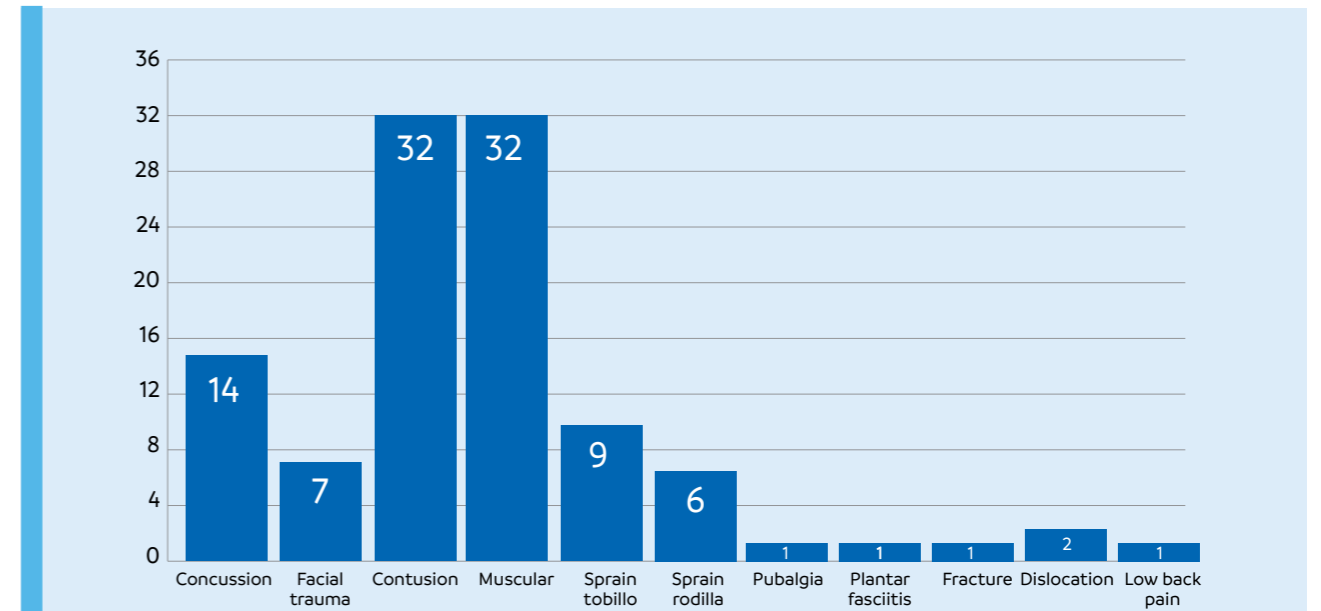


Figure 3. General diagnosis of injuries

Injuries and minutes of play	
- 15 min	14
16 - 30 min	17
31 - 45 min	30
46 - 60 min	10
61 - 75 min	15
76 - 90 min	23

In each part, the tendency is to see the number of injuries increase as the end of the game approaches.

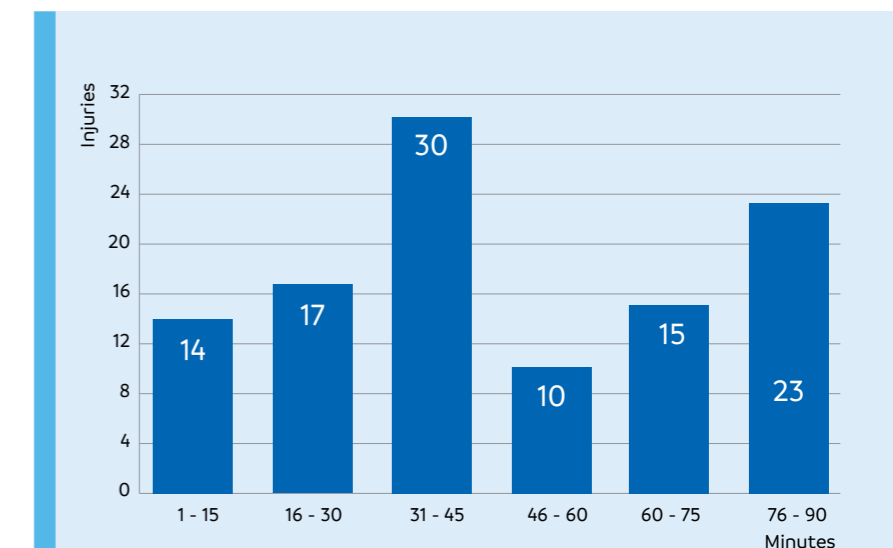


Figure 4. Minute at which the injury occurs

2.6. Epidemiology of injuries leading to the player's removal

We consider an injury to be one that requires the player to be removed from the pitch and at least one day of absence. In this case we observed that during the entire CONMEBOL Sudamericana competition, 65 players were removed from the pitch due to injury, of which 26 (40%) were due to contact and the remaining 39 (60%) were not. A higher number of serious injuries were due to the player's own conditions.

Location of injuries in removed players	
Thigh	21
Ankle	10
Leg	10
Knee	7
Head / face	9
Foot	2
Lumbar	2
Hip	1
Thorax	1
Pelvis	1
Shoulder	1
Abdomen	1
Elbow	1

The most severe injuries are most often located on the thigh, leg and ankle. This is followed by the face and head and knee. However, an injury can occur anywhere on the body.



Diagnóstico	
Muscular injury	30
Contusion	13
Head / face	5
Sprained ankle	7
Sprained knee	4
Knee ligaments	1
Plantar fasciitis	1
Lumbalgia	1
Dislocated shoulder fracture	1
Nausea	1

Muscle injuries of different types are the most common diagnosis, but a high percentage of them require the player to be removed from the pitch. Some contusions also require the player to be removed from the pitch and should therefore not be underestimated. Sprains of varying severity

prevent the player from playing any further. In the CONMEBOL Sudamericana we also have chronic processes (recurrent shoulder dislocation, plantar fasciitis) and one player felt gastro-intestinal discomfort with nausea that prevented him from playing any further.

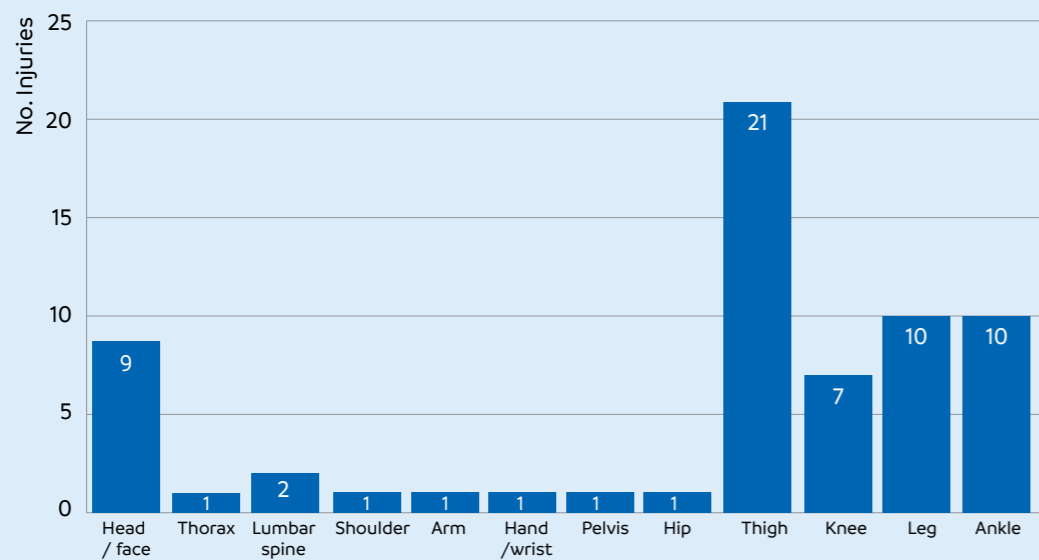


Figure 5. Location of serious injuries

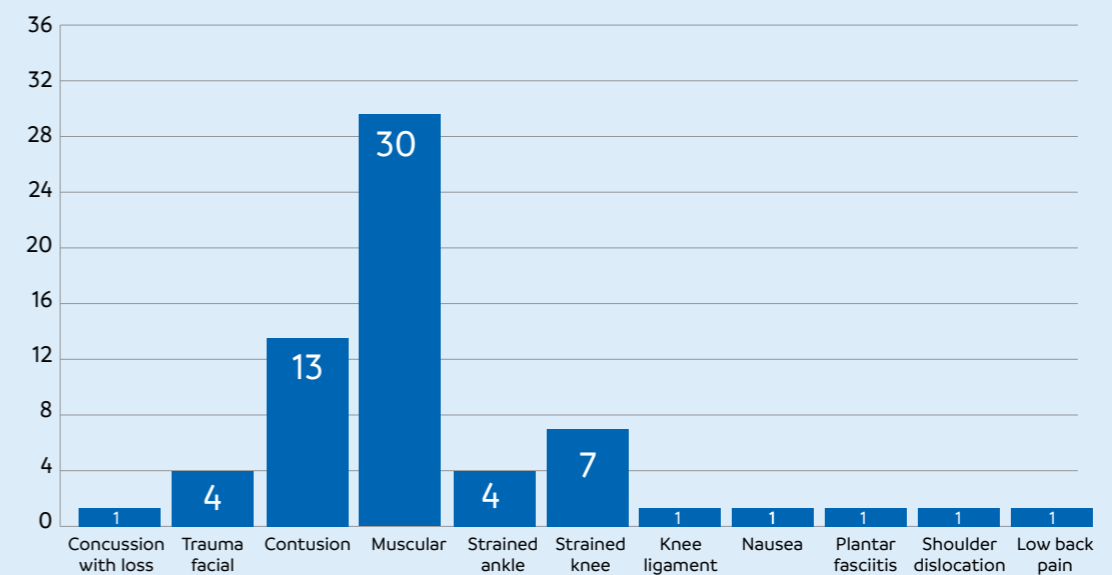


Figure 6. Diagnosis of injuries that resulted in the player being removed from the game



In contrast to the total injuries, the most serious injuries, those that prevent further play, occurred evenly throughout the match with a similar number of injuries in all quarters.

Moment at which the injury occurred during the match	
01 – 15 min	10
16 – 30 min	10
31 – 45 min	13
46 – 60 min	9
61 – 75 min	11
76 – 90 min	12

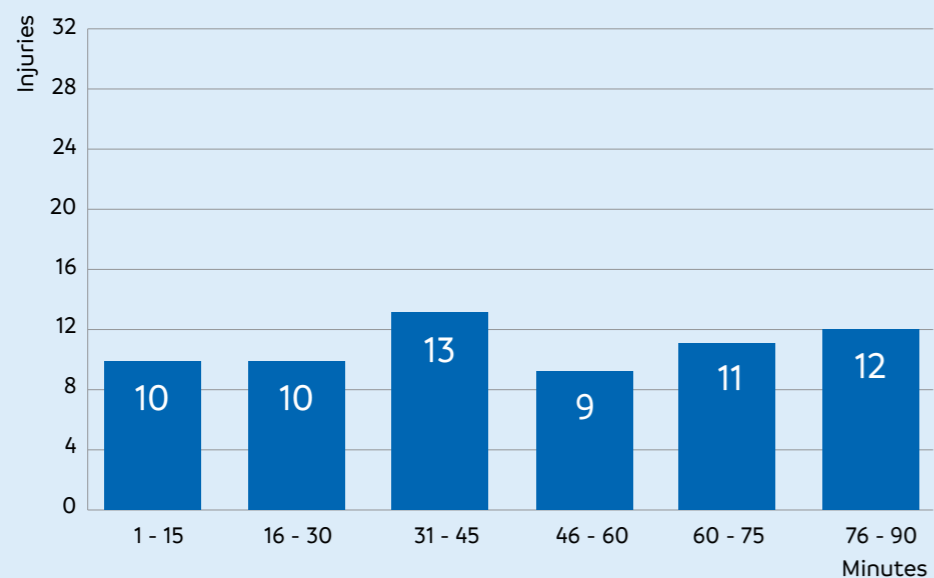


Figure 7. Time of injury leading to the player's removal from the game

2.7. Epidemiology of injuries at different stages of competition

In CONMEBOL Sudamericana 2023 there were three phases, the preliminary phase (16 matches), the group phase (96 matches) and in the final phase including the play-offs (45 matches) of those teams competing to enter the finals. We analyzed the injuries of the players who had to leave the field in each of the phases with the intention of analyzing whether the level and intensity of the competition can have an impact on the severity of the injuries.

Preliminary phase

- Total matches: **16**
- Injuries with removed players: **10**
- Injuries per 1000 minutes of play = **6,9**
- Injuries per match = **0,62**

Location of injuries	
Thigh	5
Ankle	2
Hip	1
Knee	1
Foot	1

Diagnosis of injuries	
Muscular injury (overall)	4
Strained ankle	2
Strained knee	1
Contusion	2

Timing of injuries	
15 min	2
- 30 min	1
31 – 45 min	1
46 – 60 min	2
61 – 75 min	2
75 – 90 min	1

Group phase

- Total matches: **96**
- Injuries with removed players: **28**
- Injuries per 1000 minutes of play = **3,24**
- Injuries per match = **0,29**

Location of injuries	
Thigh	10
Ankle	6
Leg	4
Knee	3
Head / face	3
Lumbar spine	1
Thorax	1

Diagnosis of injuries	
Contusion	8
Muscular injury (overall)	21
Concussion	3
Face wound	1
Strained ankle	4
Strained knee	3
Plantar fasciitis	1
Low back pain	1

Timing of injuries	
01 – 15 min	7
16 – 31 min	7
31 – 45 min	8
46 – 60 min	4
61 – 75 min	7
76 – 90 min	8

Final phase

- Total matches: **45**
- Injuries with removed players: **15**
- Injuries per 1000 minutes of play = **3,7**
- Injuries per match = **0,3**

Diagnosis of injuries	
Contusion	4
Muscular injury	5
Strained knee	2
Strained ankle	1
Face wound	1
Concussion without loss	1
Nausea	1

Location of injuries	
Thigh	4
Knee	2
Ankle	2
Head / face	2
Pelvis	1
Leg	1
Shoulder	1
Elbow	1
Abdomen	1

Timing of injuries	
01-15 min	1
16 - 30 min	2
31 - 45 min	4
46 - 60 min	3
61 - 75 min	2
76 - 90 min	3

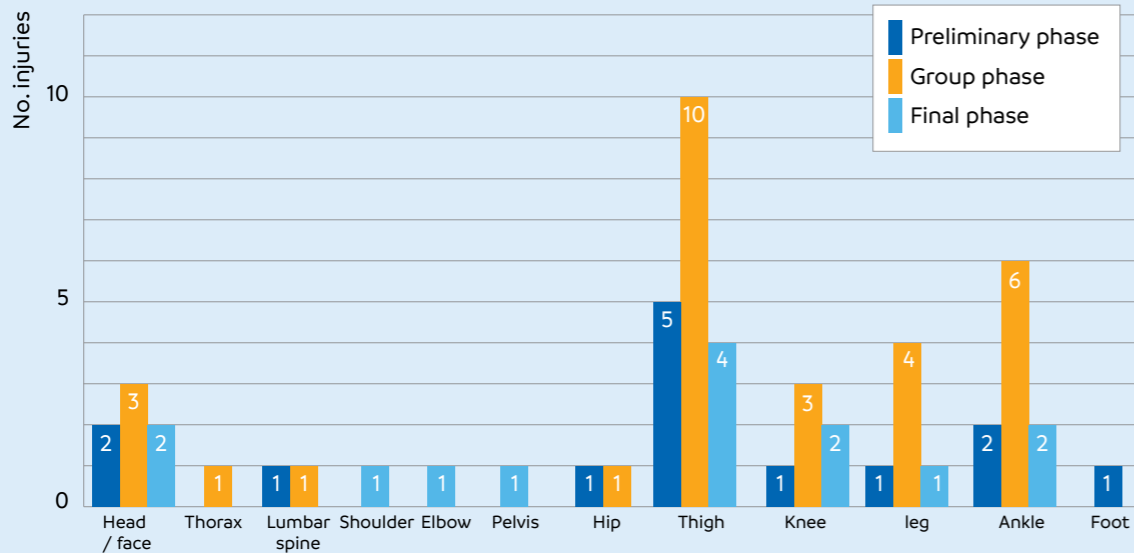


Figure 8. Anatomical location of injuries - by phase

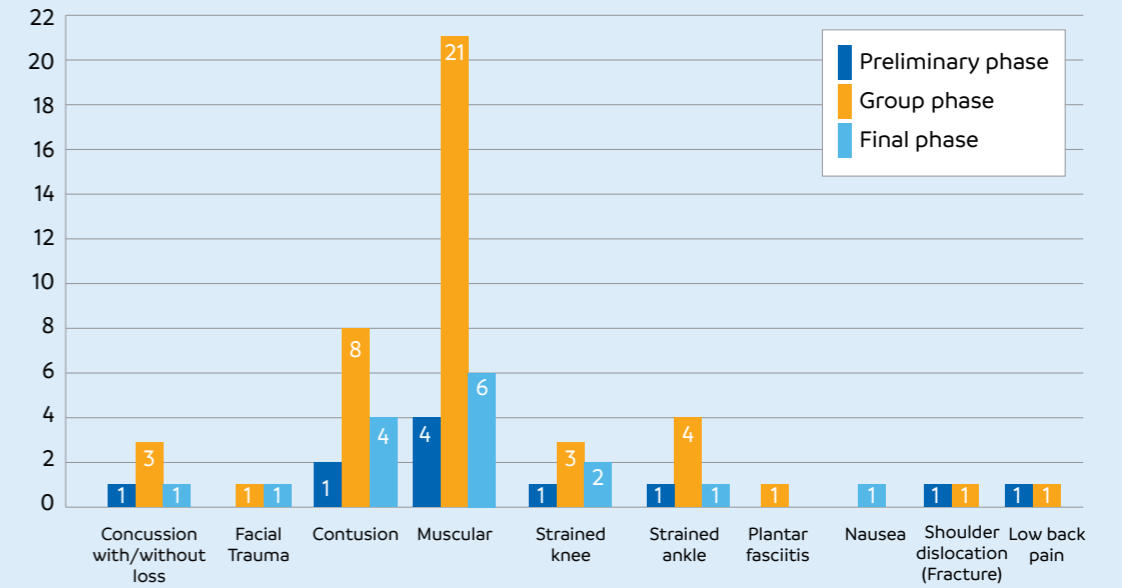


Figure 9. Diagnosis of injuries - by phase

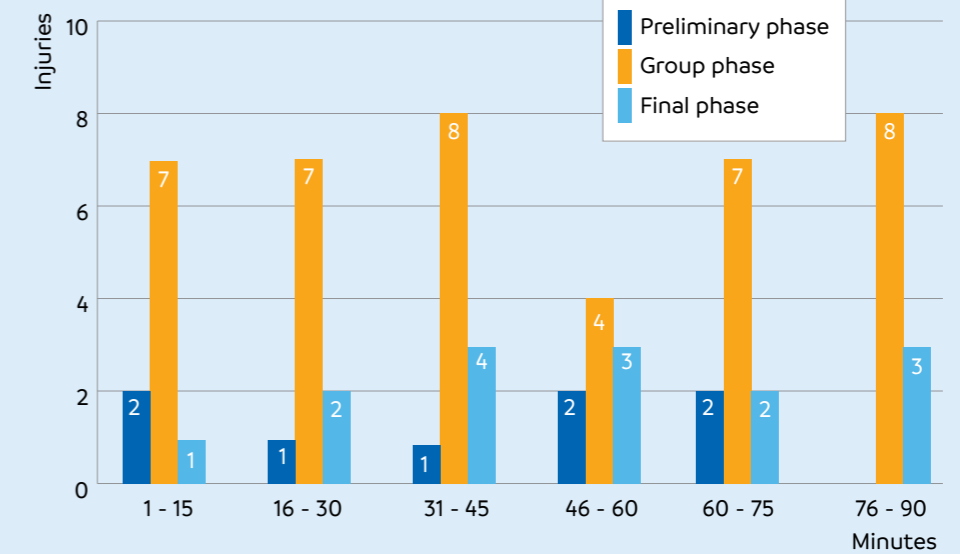


Figure 10. Timing of Injury Occurrence - by Phase

Analysing the different phases, we can see that there are no major differences between them, with a higher frequency of inju-

ries to the thigh, leg, head and face, and knee. Muscle injuries are the ones that force a greater number of players to withdraw.

We observed several facial injuries, most of which required stitches, and only one concussion with loss of consciousness.



2.8. Injury epidemiology summary season 2023

The injury register of the CONMEBOL Libertadores and CONMEBOL Sudamericana in its three phases has been followed by recording the medical incidences in its three phases, preliminary, group and final. This is an effort and a milestone for the second consecutive year. From here we have to congratulate all the medical teams of each of the participating delegations and also the medical officers and pitch doctors of CONMEBOL.

There is still room for improvement, but what we have

achieved is valuable information that will allow us to monitor our actions and needs in a more precise way. No confederation has a register of this kind. In some cases, there are long-term records of specific teams.

In the Libertadores and Sudamericana competitions we have been insisting on the importance and seriousness of muscular injuries. It is true that they are not serious injuries, in the majority of cases, but they cause inconvenience to the player, they cause many days of sick leave to the detriment of the teams and create a lot of anxiety due to the fear of suffering a muscular injury at any moment.

Correct treatment and proper diagnosis are essential and should be a line of work for the coming years.

We have emphasised injuries that force a player to withdraw. These injuries are never technical or part of the tactics of a match, on the contrary, they are always an inconvenience. In some cases the player will recover in a few days, in others he will need a long recovery period. The removal does not define the player's days off, but these injuries are more worrying and require further studies and, possibly, different diagnoses than those initially established.

The most serious injuries detected in the two long-running competitions were a dislocated knee with ruptured anterior and posterior cruciate ligaments; a ruptured anterior cruciate ligament; a concussion with loss of consciousness that followed the protocol established by CONMEBOL and a fractured - dislocated shoulder as a result of a fall.

However, muscular injuries to the thigh, especially on the back of the thigh, and to the leg, also on the back of the thigh, are the ones that cause the greatest

number of players to leave a match. It can be said that muscular injuries in these two areas are the most common cause of injury for medical teams, although in some cases they allow the player to recover quickly while in others they take a much longer period of time.

The longitudinal study of injuries in two long competitions such as Libertadores and Sudamericana is a good opportunity to analyse the evolution of injuries. We have not observed a clear trend, but CONMEBOL Libertadores has shown an increase in injuries

per match as we approach the final, while in CONMEBOL Sudamericana there are more injuries initially and then they stabilise in the last two phases (Figure 1). Logically, the same rule applies when analysing injuries per 1000 minutes of play (Figure 2).

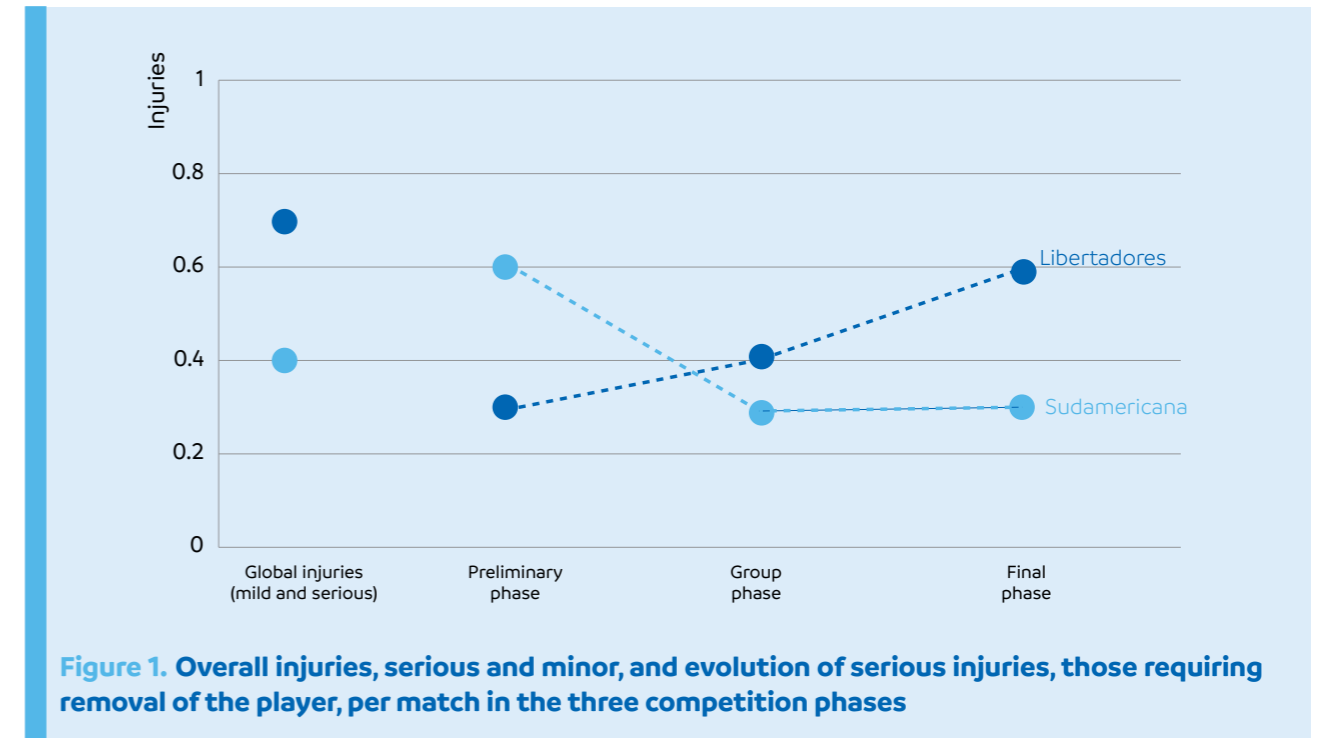


Figure 1. Overall injuries, serious and minor, and evolution of serious injuries, those requiring removal of the player, per match in the three competition phases

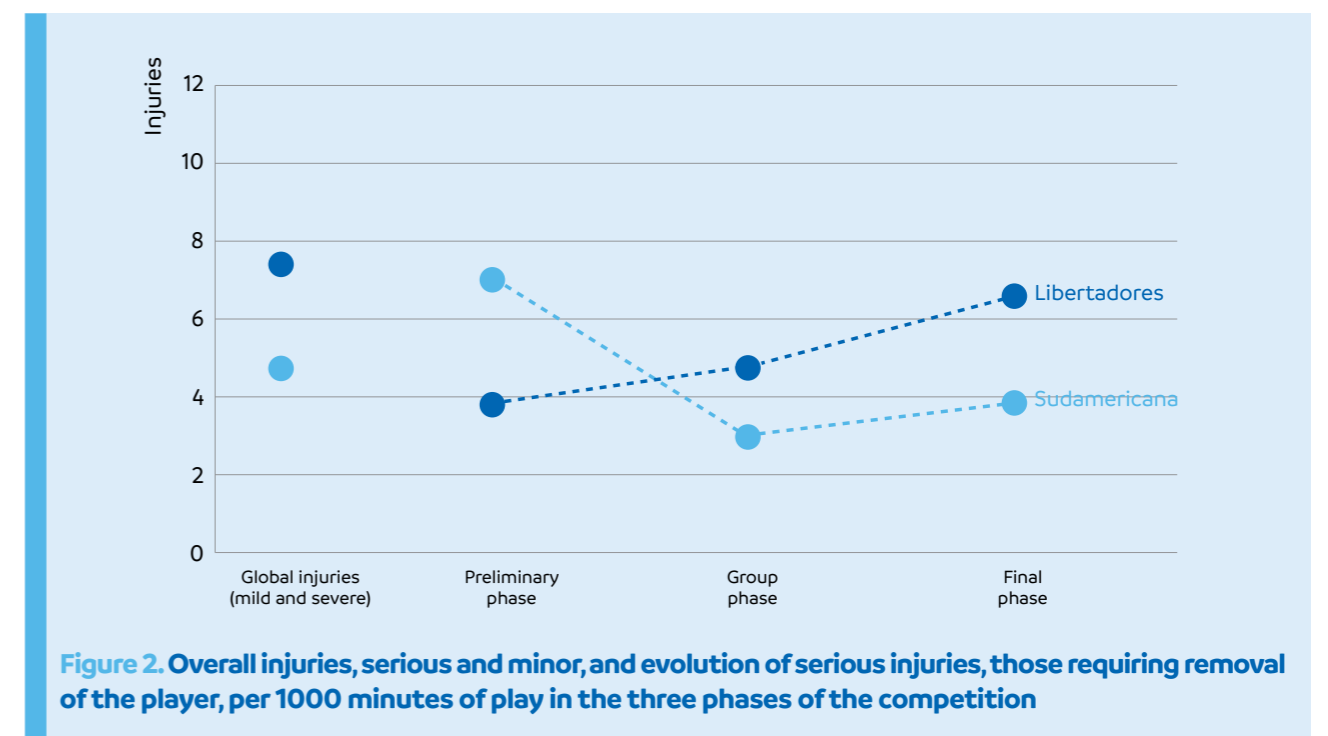


Figure 2. Overall injuries, serious and minor, and evolution of serious injuries, those requiring removal of the player, per 1000 minutes of play in the three phases of the competition



III. Medical Media Day



On Friday 02 June, at the CONMEBOL premises, the Medical Media Day, an activity aimed at journalists and the media, was held at the initiative of the Medical Commission. The event covered vital topics such as Cardio Pulmonary Resuscitation (CPR) and the use of the Automated External Defibrillator (AED). The activity was led by the President of the Medical Commission, Dr. Osvaldo Pangrazio and Mr. Daniel Savia - ZOLL Brand Representative. The first part was focused on the theoretical aspect, with a brilliant informative talk on all the points to take into account and approach CPR and correct use of the AED, where the participants were very interested in the topics. This was followed by the practical part in the field, where everyone involved had the opportunity to put into practice what they had learnt. Teams were set up with phantoms or dummies to perform CPR, mechanising the

movement and the appropriate technique. In addition, they observed and analysed the AED, how to activate it and the whole process and procedures for its correct use. It should not be forgotten that every minute

is important and counts. The aim of CONMEBOL's Medical Commission is to ensure that people who attend sporting activities know and handle CPR techniques and lose their fear of using the AED.





This tool consists of a Tablet device that will help CONMEBOL Medical Officials to visualise injuries occurring on the pitch from different TV angles and in turn be able to make medical recommendations to the Doctors of the participating Teams; the aim is to improve diagnostic accuracy and reduce the time spent providing care on the pitch. Being able to detect the severity of an injury, the speed with which action is taken and the range of assertiveness in making a diagnosis are vital steps in caring for the welfare of athletes. By having systems in place for immediate review and communication between the Team Physician and the Field Medical Officer, the medical care process could be streamlined, allowing for quicker and more appropriate intervention.

In the event of an injury, the Medical Officer with the device is authorised to communicate the information to the doctor and may only approach the team doctor for a review of the injury, not any other member of the coaching staff.

With the implementation of this technology we are taking a big step forward as a confederation to further advance the health care of our players. Since the appearance of these tools, team doctors have already requested the review of plays, which allows us to follow up much more closely in case of serious injuries and to know what the doctor's actions were in the situation.

IV. Medical Monitoring

Tuesday 22 August can be considered a historic day for the entire Medical Commission team. With the start of the first leg of the quarter finals of both the CONMEBOL Libertadores and CONMEBOL Sudamericana, the Medical Monitoring System is be-

ing used for the first time in competitions organized by CONMEBOL. The implementation of this tool is considered a victory for the entire medical team because of the fact that we continue to grow as a department through technological innovation.



V. Annual Meeting Presidents of Medical Commissions

On Friday 01 September at the CONMEBOL headquarters a very important meeting took place, the Annual Meeting of Presidents of Medical Commissions. This activity promoted by the CONMEBOL Medical Commission is very important as it seeks to strengthen ties with our medical representatives of the member associations, looking for the common good. Doctors from the 10 associations were pres-

ent, where each one shared a brief overview of the work they have been doing and presented the challenges for the year 2024. On the other hand, the CONMEBOL Medical Commission led by Dr. Osvaldo Pangrazio, made a summary of the medical protocols, the epidemiology of injuries in the last part of 2022 and the first part of 2023, as well as indicating the objectives for the coming year. Ideas, views and

medical criteria were exchanged and issues of common interest to all were discussed.

The challenge of the CONMEBOL Medical Commission is to provide and improve the constant support to all national commissions to care for, coordinate and establish protocols that improve the health of players and thus fulfil our duty to ensure the welfare of athletes.

ANTI-DOPING UNIT REPORT

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Introducción

The Anti-Doping Unit has developed an annual Anti-Doping Control and Education Plan for all CONMEBOL competitions during the year 2023, which has been carried out in 96.7% (3306/3416) according to plan, due to the fact that 1 competi-

tion has been postponed to the year 2024.

Regarding the Control Plan, urine samples have been collected in all competitions played, in addition to blood samples in the CONMEBOL Libertadores

and Finalissima. 20% of the samples collected were collected in out-of-competition testings, and 80% corresponded to samples collected in competition.

Collected samples are sent to WADA-accredited laboratories.



I. Education Plan

Anti-Doping Educational Talks 2023

1.1. Educational Talks

This activity seeks to reach players and support staff, using educational talks as a pedagogical tool. Each talk lasts 45 minutes and is guided by an educator specialized in the subject, who seeks to directly influence and raise awareness about the fight against doping in South American Football.

The talks are divided into 3 stages:

The educational talks are intended for:

- Professional Players
- Support Staff: doctors, coaches, nutritionists, psychologists, managers, parents, etc.

Anti-Doping Educational Talks were given to:

2,837 players and coaching staff

The topics developed were:

- List of Prohibited Substances and Methods;
- Risks posed by Nutritional Supplements;
- Anti-Doping Rule Violations;
- Consequences of Doping: Sanctions, Health and Social Damages;

Introduction	Brainstorming by interacting with the public to identify anti-doping rule violations and the causes that lead to them.
Main Part	Presentation with slides, CONMEBOL video of the topics to be discussed.
Final	Closure with a playful activity of motivation and analysis that leads to a commitment to fight against doping in soccer.

- Doping Control Procedures;
- Rights and Responsibilities of Players and their Support Staff;
- Therapeutic Use Exemptions;
- The Offense That Doping Poses to Sportsmanship.
- Applicable Player Location/Whereabouts Requirements.

1.2. Evolution of the scope of anti-doping educational talks (Period 2021 – 2023)

Over time, the anti-doping unit has been developing new strategies to increase the impact and scope of anti-doping educational talks in all competitions that comprise the annual Anti-Doping Education Plan, seeking to combat doping due to lack of knowledge, as well as to provide training on doping control procedures in CONMEBOL.

In addition to increasing the number of people who have been spectators of these talks during 2023, the Anti-Doping Unit has prioritized the quality of the talks, making them more personalized for the target audience, so that players feel identified with the topics presented in the talks, always emphasizing

the repercussions that an anti-doping rule sanction implies for the player's sporting life.

The new approach applied to the talks consists of identifying and categorizing the target audience based on the experience that the group has in education and anti-doping testings, seeking active participation during the talk with those who have more experience in the matter, thus establishing a link with the players and the group, which in turn allows optimizing the educator's discourse, as it identifies which topics are relevant to that particular group.

On the other hand, within the 2023 Anti-Doping Education Plan, we aimed to diversify our target audience, paying special attention to the medical staff of teams. For this, in collaboration with the CONMEBOL Development department and the Member Associations, we have developed Sports Medicine and Anti-Doping Issues courses

throughout 2023, reaching a total of 132 anti-doping educational talks addressed to this group of health workers in teams that participate not only in CONMEBOL competitions, but also in those that operate locally in competitions organized by the Member Associations.

In this way, we have reached a total of 2837 attendees who have obtained training in various areas that directly influence the work carried out by these professionals on a daily basis for the well-being of the players.

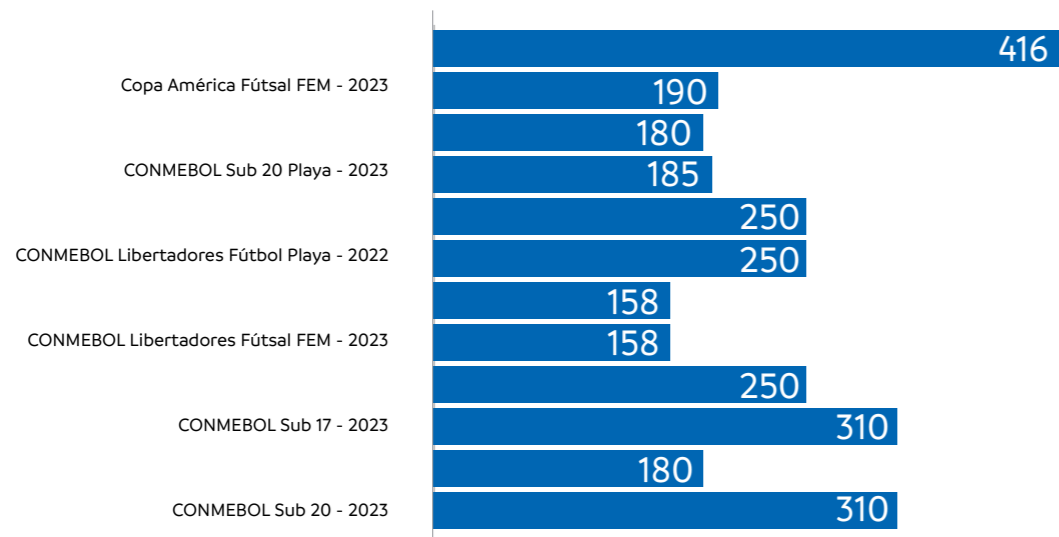
Finally, Prohibited List Courses and Therapeutic Use Exemption procedures have been carried out for all team doctors participating in the group stage of the CONMEBOL Libertadores and Sudamericana (96 teams).

Thus, we observe the evolution of the scope of anti-doping educational talks in the last three years:

Total 2,837



Total Number Trained 2023
ANTI-DOPING EDUCATIONAL TALKS



II. Anti-Doping Control Plan

In all CONMEBOL competitions in 2023, the Anti-Doping Control Plan has been governed and applied based on the CONMEBOL Anti-Doping Regulations 2021 edition.

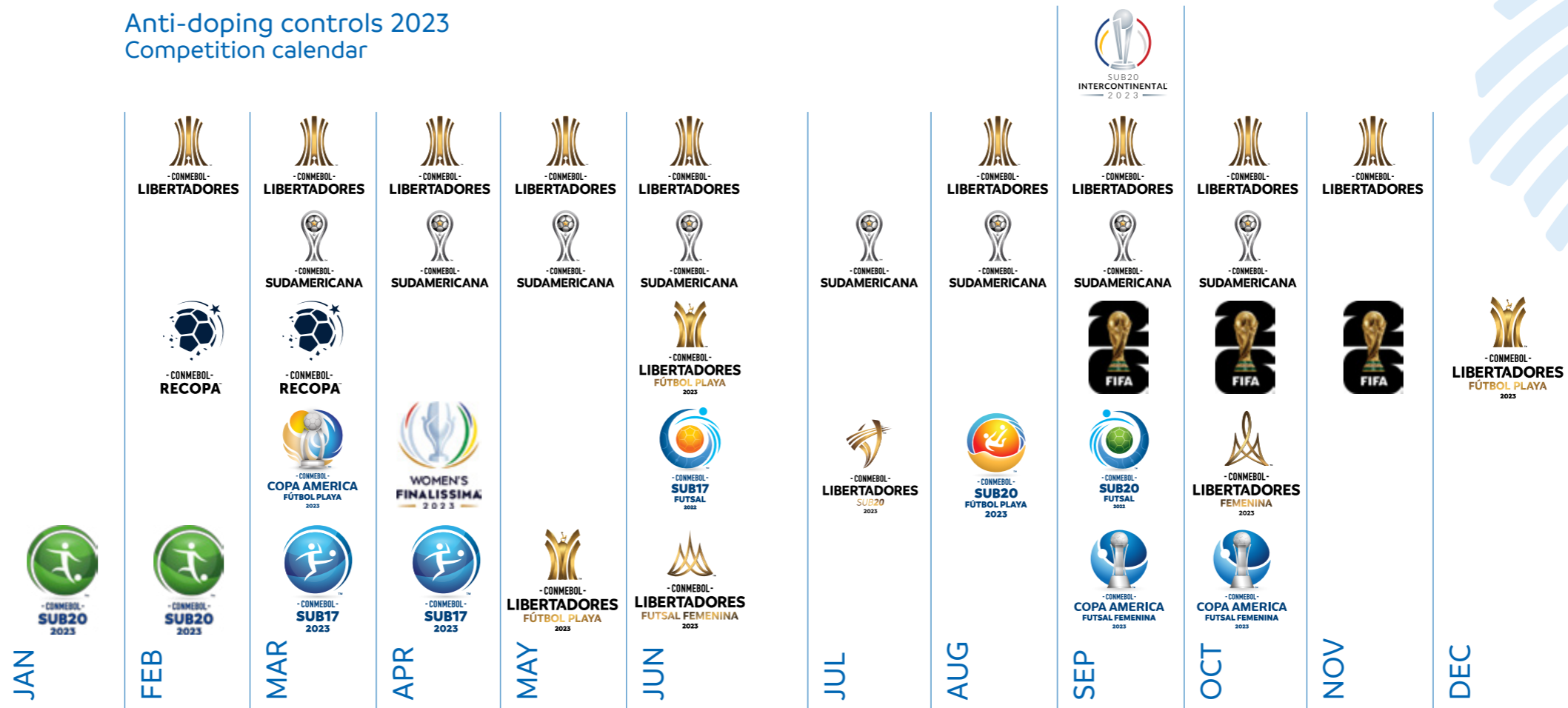
2.1. 2023 CONMEBOL Competitions Calendar

A total of 19 CONMEBOL competitions have been held in 2023,

of which 2 competitions have been held in conjunction with the Union of European Football Associations (UEFA): Women's Finalissima (UK), The U-20 Intercontinental (ARG).

Timeline Chart of Competitions

Anti-doping controls 2023 Competition calendar



The choice of the players to pass their anti-doping control was by draw, in most cases and targeted selection increased.

In the highest-risk competitions, out-of-competition testings have been carried out by going at a certain time to the accommodation of the delegations taking a team of medical officers and assistants to the hotels. To obtain urine and/or blood samples, a team of collectors was available.

The blood samples were dispatched as soon as possible for reception at the laboratory in accordance with the Testing and Research standards.

It is emphasized that anti-doping testings were carried out in men's and women's soccer

2.2. Lockcon Materials

The collection of urine and blood samples were carried out



in compliance with the World Anti-Doping Code 2021 – WADA within the framework of the agreement signed between WADA and FIFA. All the anti-dop-

ing materials used were from the renowned Swiss brand *Lockcon*, with which the CONMEBOL Anti-Doping Unit has been working exceptionally since 2019.



2.3. Number of Samples Collected

In 2023, the Anti-Doping Unit has collected a total of 3306 anti-doping samples in all competitions during the year, based on the execution of the Annual Testing Plan.

These numbers reflect a historic increase in the number of

anti-doping testings carried out in the year, in relation to previous years, being the largest collection of anti-doping samples in the history of CONMEBOL in a regular competition calendar, unlike what had occurred in 2021, during which a total of 3351 anti-doping samples had

been collected due to the compressing of the 2020 and 2021 Testing Plan in the latter period due to the COVID-19 pandemic.

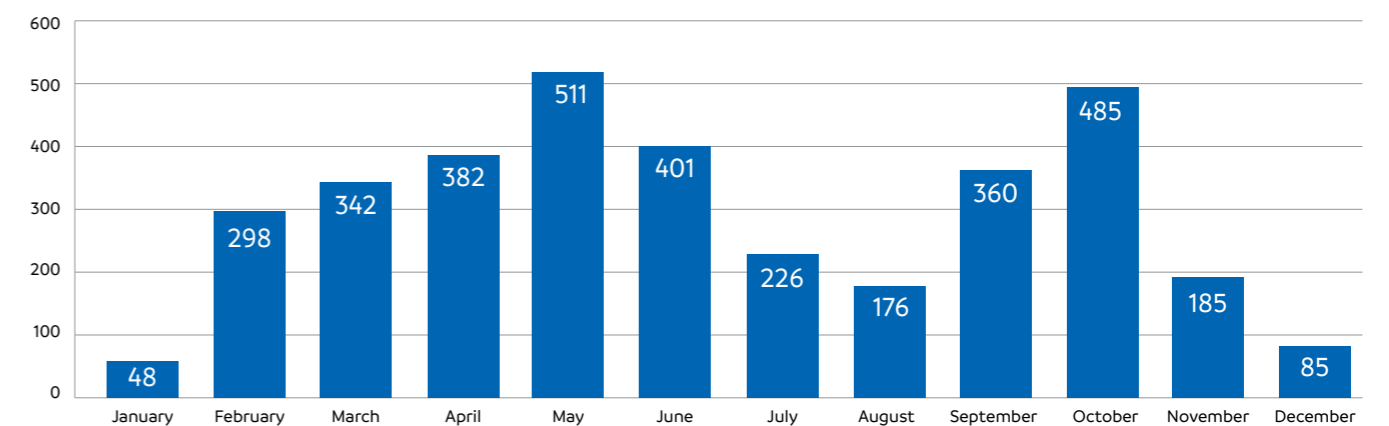
Compared to 2022, the total number of anti-doping samples collected in 2023 implies an increase of 12.94%.

Charts of samples collected by competition

Event	Athlete gender	Sport	Discipline	Date	Location	Total testing
Finalissima	Female	FOOTBALL	Field	April 6	London (ING)	4
Sudamericana - World Cup FIFA Canada - USA - MEX 2026	Male	FOOTBALL	Field	03/20 to november 26th	To be defined	120
Intercontinental Sub 20	Male	FOOTBALL	Field	September 9th	Buenos Aires - ARG	4
CONMEBOL Sub 20	Male	FOOTBALL	Field	01/19 to february 12th	Colombia	207
CONMEBOL Sub 17	Male	FOOTBALL	Field	03/30 to april 23rd	Ecuador	108
CONMEBOL Libertadores	Female	FOOTBALL	Field	October 5th to 21st	Colombia	210
CONMEBOL Libertadores - Sub 20	Male	FOOTBALL	Field	July 1st to 16th	Chile	88
CONMEBOL Libertadores	Male	FOOTBALL	Field	February 8th to november 11th	To be defined	891
CONMEBOL Sudamericana	Male	FOOTBALL	Field	03/09 to 10/1	To be defined	839
CONMEBOL Recopa	Male	FOOTBALL	Field	February 8th and 15th	Quito (ECU) - Rio de Janeiro (BR)	61
Copa America	Female	FOOTBALL	Futsal	09/24 to October 1st	Argentina	110
CONMEBOL Sub 20 - 2022 Edition	Male	FOOTBALL	Futsal	September 9th to 17th	Venezuela	72
CONMEBOL Sub 17 - 2022 Edition	Male	FOOTBALL	Futsal	June 17th to 25th	Paraguay	56
CONMEBOL Libertadores	Male	FOOTBALL	Futsal	May 21st to 28th	Venezuela	130
CONMEBOL Libertadores	Female	FOOTBALL	Futsal	June 4th to 11th	Paraguay	77
CONMEBOL Sub 20	Male	FOOTBALL	Beach	August 5th to 13th	Chile	64
CONMEBOL Libertadores - 2022 Edition	Male	FOOTBALL	Beach	June 18th to 25th	Iquique - Chile	80
CONMEBOL Libertadores - 2023 Edition	Male	FOOTBALL	Beach	December 3rd to 10th	Paraguay	77
Copa America	Male	FOOTBALL	Beach	March 11th to 19th	Argentina	108
						3,306



Charts of samples collected per month



2.4. Types of Anti-Doping Tests

80% in-competition (2635 samples collected)

20% out-of-competition (671 samples collected)

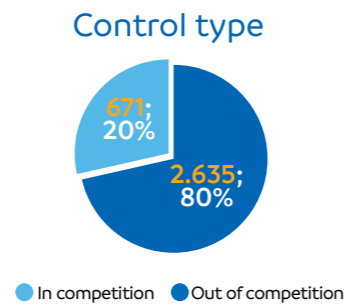


Chart: Types of Anti-Doping Tests

Sample type by control type

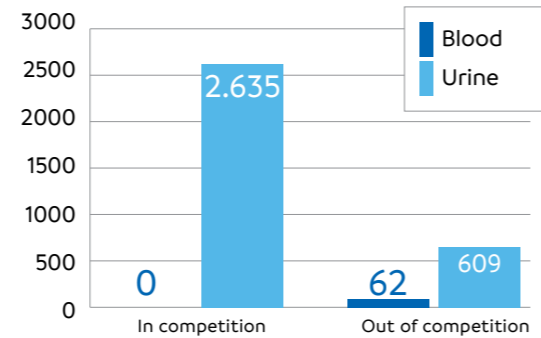
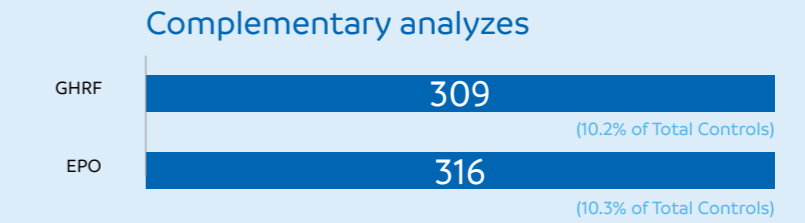


Chart: Types of Anti-Doping Tests by Type of Testing

2.7. Complementary Analysis Chart: Complementary Analysis

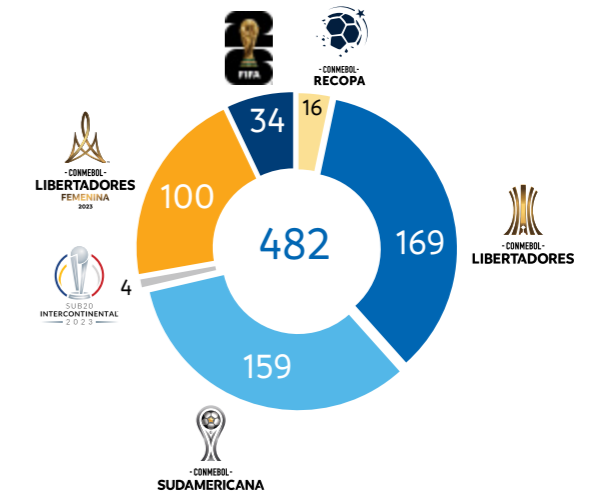
Complementary Analyses have been applied to a total of 10% of all samples collected, thus complying with the provisions of the International Standard for Testing and Investigations.



2.8. Sample Storage Chart: Sample Storage

The World Anti-Doping Code 2021 (WADA) has established that anti-doping organizations must, within their distribution of the Testing Plan, store several samples for the purpose of retesting with new technologies or procedures in the future, the implementation of new detection methods, and the emergence of increasingly accurate instrumentation and machinery. They will allow the detection of forms of doping that could currently go unnoticed by control systems, which is why they are stored.

The CONMEBOL Anti-Doping Unit has decided to store 471 urine samples for a period of 10 years (corresponding to 14.2% of the total samples collected in CONMEBOL competitions in 2023).



2.5. Types of Samples Collected

2% Blood Samples (62 samples collected)

98% Urine Samples (3243 samples collected)

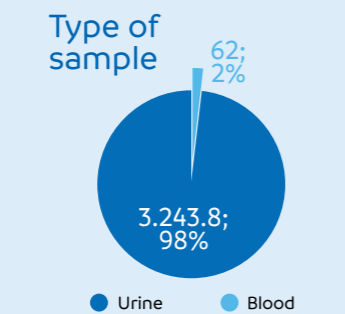


Chart: Types of Samples Collected



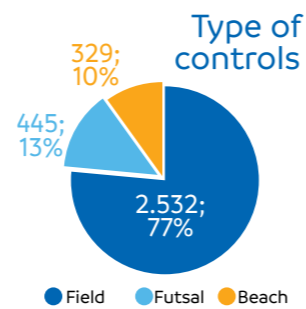
The collection procedure is the same as IC and OC

2.6. Samples collected by Discipline

Of the total events in 2023, four of them have been female competitions, and fifteen were male.

In addition, four correspond to the discipline of beach soccer, five to futsal and ten to field soccer. Thus, the samples collected by discipline are divided as follows:

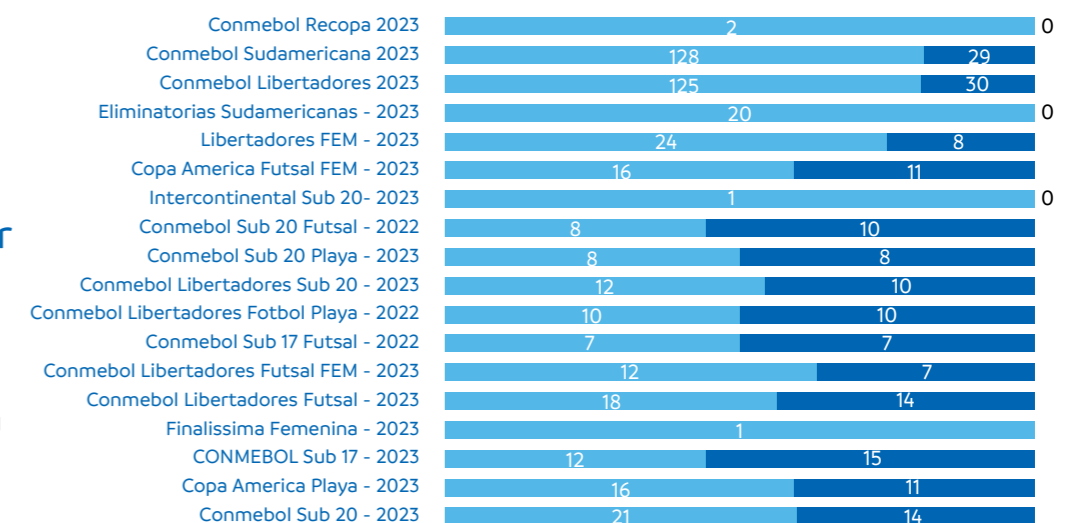
CONMEBOL 2023 TESTING PLAN - TYPE OF SAMPLE		
SPORT	DISCIPLINES	TOTAL TESTING
1	Field	2,532
	Futsal	445
	Beach	329
SUBTOTALS		3,306



Charts of samples collected by Discipline

2.9. Player Selection Method Chart: Player Selection Method

● Drawing ● Targeted



Draw 441 – 70%
Targeted 184 – 30%

The CONMEBOL Anti-Doping Unit conducts in-competition and out-of-competition doping testing on players participating in our competitions, collecting urine and/or blood samples.

The selection of designated players for the testings can be determined in two ways;

Targeted Testing

In which any player present on the Squad List and on the Lineup Sheet of the match (in the case of a test in competition) may be selected.

Considering the sum of testings carried out in all CONMEBOL competitions during 2023, 30% of all missions created have been carried out using the Targeted method for the selection of the players to be controlled, with the remaining 70% of testings using the draw method for such selection. This implies a considerable increase of 56% compared to the previous year in terms of the use of the targeted method for player selection:

This is explained by the fact that the CONMEBOL's Anti-Doping Unit has been perfecting its player classification system when it comes to targeted testing, through the application of the Risk Matrix. This matrix is based on statistical data and categorization factors of actions

within the field of play, which are seen as parameters for the selection of players who will go through this type of testing.

The risks of doping and the effective use of resources are carefully assessed to optimize detection. In soccer, as a team sport, targeted testing is mainly carried out to detect systematic doping. This method consists of the analysis of statistical data of the game, personalized by club/selection and by player, which is monitored throughout the competition by analyzing individual and collective performance. To do this, the relationship between the minutes played and the performance of each player is used, adding factors such as yellow and red cards, goals scored and conceded, age, physical build, playing position, anomalous biological parameters (blood parameters, steroid profiles, etc.), injuries, failure to comply with whereabouts reports, history of testings of the player and rehabilitation after a period of suspension. The selection of these criteria is given in accordance with the International Standard for Testings and Investigations of WADA and the CONMEBOL Anti-Doping Unit.

This selection method optimizes the collection, evaluation and processing of anti-doping information from available sources, in order to implement an effective and intelligent testing plan, establishing a base of investi-



gations of our players in all our competitions.

Digital Drawing System

It is a system that seeks to digitize and streamline the process of randomly selecting players, which was manually done with files in previous years, as of this year becomes digital, thanks to the development of software with the function of being able to do so..

In competition

Testing, it is carried out during the match according to each discipline:

Field Football: 75th minute of the match

Futsal: After 2 minutes of the second half

Beach Football: After 2 minutes of the third half

In all cases, you will be able to count on the presence of the representatives of each team, and as it is digital, you will receive via email the players selected by the software.

III. Adverse Analytical Findings (AAF)

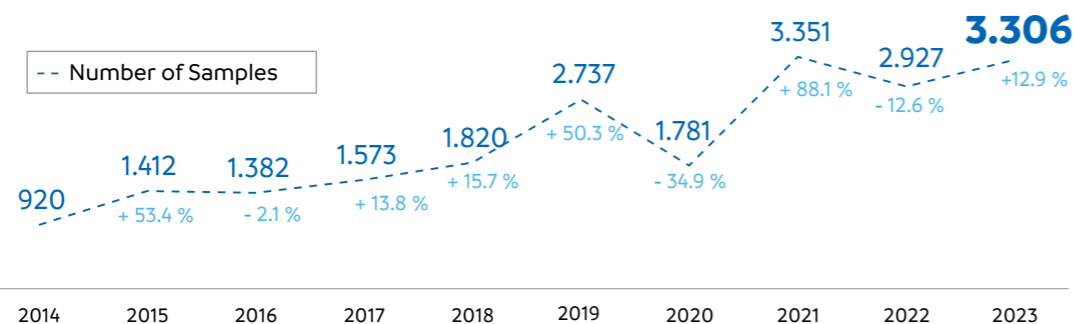
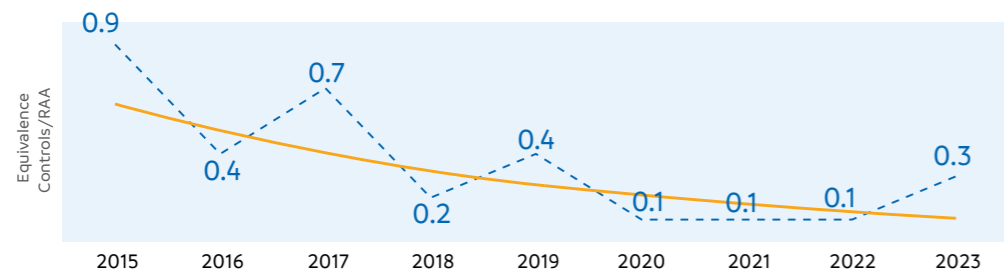
Of the total samples collected in 2023, 10 AAFs (Adverse Analytical Findings) were obtained. The following are the clubs of the players with AAF, the competition in which they were tested, and the substance that was found in the sample:

1. Bolivia National Team - CONMEBOL Sub 20 - CALI - COLOMBIA 2023 Boldenone metabolite (S1 ANABOLIZING AGENTS, 1. ANABOLIC ANDROGENIC STEROIDS (AAE))
2. 4 cases of the Paraguay National Team - CONMEBOL Sub 20 - CALI - COLOMBIA 2023 - Substance: Boldenone (S1 ANABOLIZING AGENTS, 1. ANABOLIC ANDROGENIC STEROIDS (AAE))
3. FLUMINENSE – BRA - CONMEBOL LIBERTADORES 2023- Substance: SARM Enobosarm (Ostarine) (2 - Other Anabolic Agents, S1 Anabolic Agents)
4. Sport Club Internacional (INTERNACIONAL - BRA) - CONMEBOL LIBERTADORES 2023 - Substance: SARM Enobosarm (Ostarine) (2 - Other Anabolic Agents, S1 Anabolic Agents)
5. Defensa y Justicia (ARG) - CONMEBOL SUDAMERICANA 2023- Metabolite of the banned substance Carboxy-THC (S8. Cannabinoids)
6. INDEPENDIENTE MEDELLIN (COL) - CONMEBOL SUDAMERICANA 2023 - Substance: Furosemide (S5. DIURETICS AND ENMASKING AGENTS)
7. Centauros (VEN) - CONMEBOL Libertadores Men's Futsal 2023. Substance: Boldenone (1 - Anabolic Androgenic Steroids (EAA))

Compared to previous years, there is a percentage increase in the number of samples collected in the year with a percentage of AAF cases of 0.3%, which indicates that the Education Plan implemented by the Anti-Doping Unit has facilitated results in the fight against doping in CONMEBOL competitions, generating awareness among players and staff members:



	2015	2016	2017	2018	2019	2020	2021	2022	2023
N° of test	1412	1382	1573	1820	2677	1781	3351	2927	3306
N° AAF	14	6	11	3	12	2	6	5	10
Percentage	0.90%	0.40%	0.70%	0.20%	0.40%	0.10%	0.10%	0.10%	0.30%



IV. Therapeutic Use Exemption (TUE)

A player may suffer from illnesses or ailments that require the use of medication. If the substance that the player needs to take is on the current Prohibited List, a Therapeutic Use Exemption may allow the player to take that medication that would otherwise be prohibited.

2. If no alternative treatment is available, a player with a documented medical history requiring the use of a prohibited substance or prohibited method must first apply for a TUE. However, TUEs are granted only in cases where there is a clear and convincing clinical need, and no sporting advantage is obtained for the player.

such TUE, CONMEBOL relies on the following documents in force:

- 2021 CONMEBOL Anti-Doping Rules
- 2021 World Anti-Doping Code, published by WADA
- 2021 International Standard for Therapeutic Use Exemption (ISTUE)

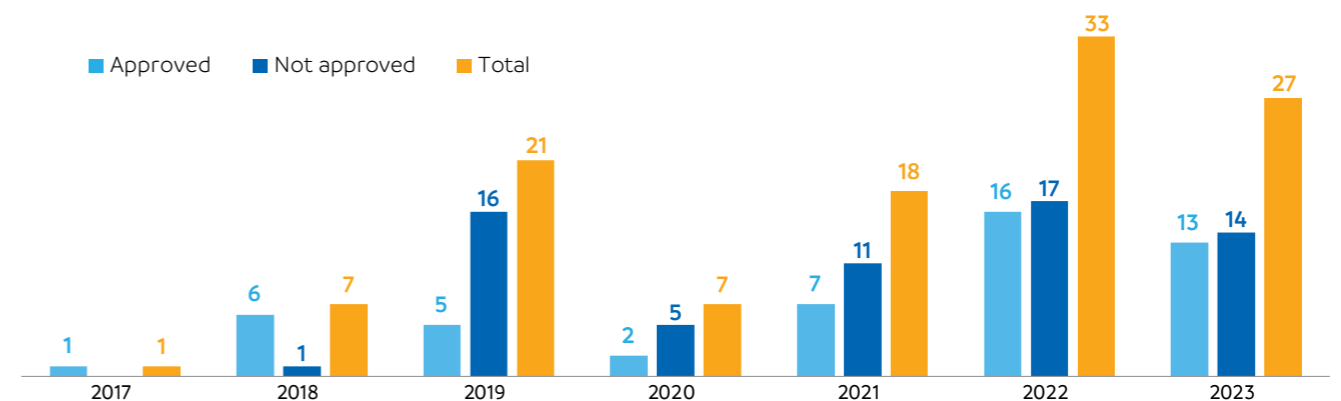
There are criteria for granting a TUE and these are described below:

1. Any player who consults a doctor who prescribes a treatment or medication for therapeutic purposes must ask if the prescription contains prohibited substances or methods. If this is the case, the player must request an alternative treatment.

3. The application for and approval of TUEs is carried out in accordance with a strict procedure, as set out in WADA's International Standard for Therapeutic Use Exemptions and the current CONMEBOL TUE policy.

During all CONMEBOL competitions in 2023, the TUE Sub-Commission has processed a total of 27 applications, of which 13 have been approved and 14 have been rejected. The reason for the rejection is due to a lack of documentation or medical examinations required to validate the application, or because the application did not correspond.

For the approval or denial of





V. Logistics and Laboratories

The urine samples have been sent through the DHL Courier, and the blood samples have been personally transported by Anti-Doping Unit personnel from the collection point to the Laboratory. Through the DHL Platform, 119 waybills have been generated

for the shipment of materials to our officials in South America, and another 300 for the shipment of samples from the sample collection site to the laboratories designated by the Anti-Doping Unit for each competition.

In total, 416 waybills have been generated throughout the year (as of 10/10/2023). All samples collected were processed to be sent to WADA-accredited laboratories; CONMEBOL works with two of them:



Number of Samples and Materials Sent to Lab



VI. Anti-Doping Testing Software

Chart: Number of Missions Created

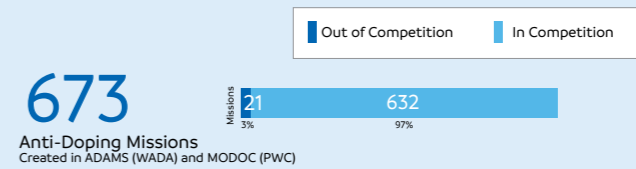
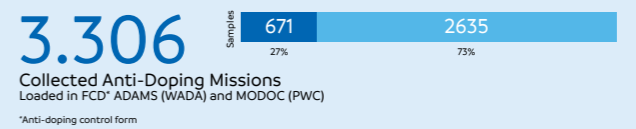
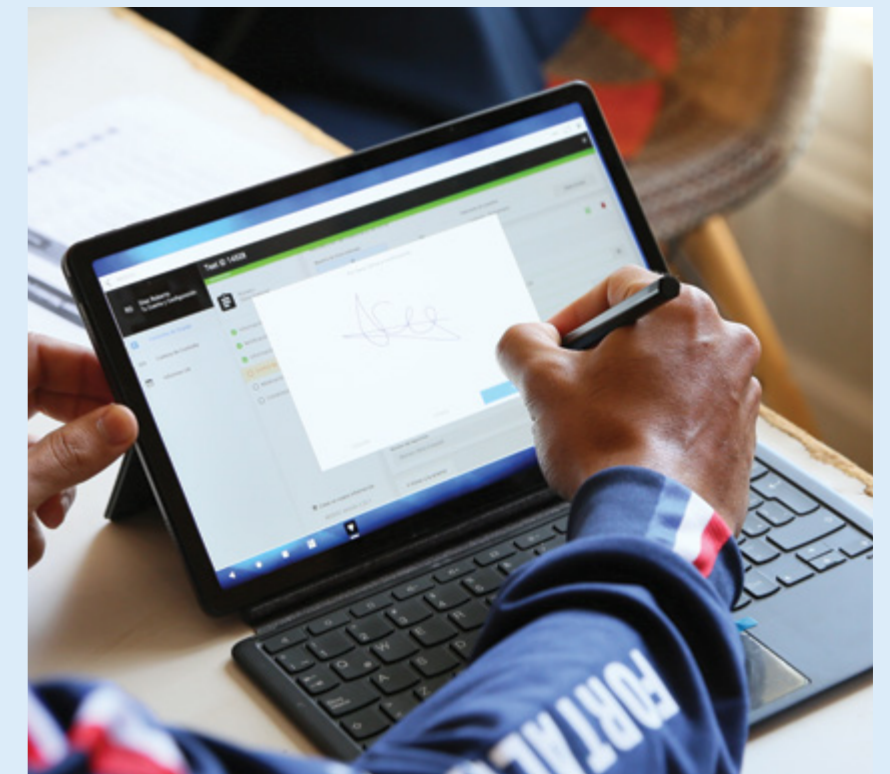


Chart: Number of Doping Testing Forms Uploaded



The 2023 Testing Plan has been executed, using ADAMS (WADA) platforms for the generation of Missions and linking sample results with the laboratory; and MODOC (PWC), for testing through digital forms. Using these tools, the following results have been achieved:

The total number of samples collected in 2023 by the CONMEBOL Anti-Doping Unit represents an increase from the previous year. This is due to the postponement of three competitions that were initially scheduled to take place in 2022, which were moved to 2023. For the collection of these samples, 673 Anti-Doping Missions have been created on the ADAMS and MODOC platforms. All Doping Testing Forms (DTFs) have been uploaded to both platforms.









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