

# Module 2. 21st Century Educational Paradigms Integrated with Information & Communication Technology

## Introduction

Today, it's not obsolete to make reference to a technological revolution. The process continues — stronger and more determined than ever. It is a revolution, based on the development of information technologies, which leads to an imminent transformation in society. These *Information Technologies* are integrating the world into global networks. Once again, in a short term we have seen the emergence of economical, political, technological, and social changes which have created what Manuel Castells (1997) calls "the Network Society".

"Network Society" is a concept that entails much more than a computer connected to the Internet. Broadly speaking, it implies a profound transformation of social roles, national borders, culture, knowledge and information. The two "magic words" of this new social paradigm are *knowledge and information*.

The phenomenon of education in general terms and its relationship with the High Athletic Performance are not exceptions which lead us down a different path: education is at constant change, and so is the introjection of knowledge, attitudes and abilities of athletes.

We describe the student of the 21st century as someone who needs to develop abilities to be able to search, analyze, integrate and use information in a continuous and independent way. The new Information Age forces education to change from its foundations so that students can achieve an integral development and as part of it, the ability to "learn to learn, do, live and coexist".

Likewise, today, an "educated" person should be, above all, flexible: flexibility to adapt to new situations, acquire new knowledge and question old paradigms (UNESCO, 1998).

In accordance with the learning process in this new century, one described as dynamic, real and focused on the creation of new knowledge, a new educational paradigm is created; this new paradigm does no longer puts the student in the place of being a passive element in the acquisition of knowledge, and recognizes him or her as an active element within a new teaching model capable of achieving the development of necessary abilities in order to be successful in today's society.

In addition to the above, the new educational model must focus learning on motivation, problem solving and collaborative work. The ability to work in groups, based on defined projects, is extremely important in the new economic and social context.

Athletes from different socio-cultural environments, no matter the competition level and discipline in which they participate, are the protagonists in this massive disruption in the way we conceive the teaching-learning model: from passive agents of the teaching environment to active agents in the building of behaviors that allow them to solve situations in dynamic and different contexts. From merely reacting to orders to being proactive in the implementation of behaviors that form a leader-subject model based on the determining influence.

# Unit 2.1 The 21st Century Educational Paradigm and High Athletic Performance

The *information tools* understood as computers, the Internet, satellite networks, databases, virtual teaching platforms, etc. really provide the opportunity to create alternative and creative processes in which the professor loses his central role, and students play a proactive role establishing direct connections in a forum in which they are presented as virtual equals. With the advent of Internet, barriers between classrooms and the outside world are blurred, and physical distance gradually loses importance. In the world of sports, we find a blurring of the boundary between the field of play — understood as the physical platform of training and competition — and the outside world. Physical distance is dissolved at great strides.

Communication and sharing information systems which are possible through computer networks (WWW, chat, e-mail, ftp, videoconference, forums, etc.) help groups of students and/or professors to build virtual collaboration communities in certain subjects or fields of study. This way, any teacher can contact colleagues from other universities, for example, and plan collaborative educational experiences with his or her students. Sport coaches, managers and any other agent whose role is to make managerial decisions in the sporting environment which directly or indirectly impact athletes, have the same possibility as that expressed by the teaching staff in the education dimension.

This is one of the most interesting aspects of Information Technology in the service of education: we can break the barriers of time and space in order to develop teaching and learning activities. As Moreira (2003) explains, digital networks allow university studies to be made available, for example, to social groups that for whatever reason cannot attend classes in person. The same thing occurs in high performance sports.

According to Villa (2006), together with traditional methodologies, which include traditional assessment systems, we should now plan for the use of new methodologies and technologies. This is a change of approach that brings with it a major modification of teaching-learning methods, as it directly and significantly affects the way students learn and the way teachers teach. The author's proposal is supported on the idea of being able to change perspectives, that is to say, to evolve from content acquisition to skill acquisition: to know, to know how and to know how to be.

20th Century Teaching-Learning Process	21st Century Teaching-Learning Process
Imposition and transmission of knowledge	Creation of new knowledge
Passive element in knowledge acquisition	Active element in knowledge acquisition
Professor's leading role, superior knowledge	The professor loses their leading role; direct connection with the student (virtual equals)
Inflexible, theorized and parameterized approach	Focus on motivation, problem solving and collaborative work
The use of the computer, the advent of the Internet, but not yet at the service of education	Development of abilities and creativity. Virtual Teaching Platforms

Source: Prepared by the author.

The chart summarizes a fundamental difference that we have discussed before: in the old educational paradigm, the professor was the only reference through which knowledge could be accessed. That is to say, he had a monopoly on the specialized knowledge within the subject.

Today, the Internet allows to break that monopoly on knowledge. With the Internet, students have access to bibliographies, course contents or documentation from many educational centers. Thus, the learning process becomes a constant search, analysis and restatement of information and the teacher becomes a tutor who supervises the student's learning process.

*Networks substantially transform the way in which teachers and students interact, both in terms of modalities and timing.*

### 2.1.1 Planning the Teaching Process – Athletic Learning for 3.0 Athletes

Planning is one of the phases of athletic training from a psychological perspective. In order to be more specific, planning is one of the three ongoing phases of training (the other two are *adherence and assessment*). Planning is necessary throughout the entire teaching-learning process. Planning is necessary in order set out the path that coaches will follow alongside the athletes. In this sense, we can find three basic types of planning: improvisation (no planning) on one side and rigid planning (without adaptation) on the other. Within these possibilities, adapted planning stands out as the ideal option in terms

of high performance, taking into account the characteristics of the current educational models and the characteristics of athletes who are the final recipients of this plan.

Education in the 21st century finds itself in a dilemma; on the one hand, new requirements arise in order to shape graduates who are capable of effectively taking part in the professional world, as well as forming disciplined citizens, and on the other hand, we must mention the subjective demands that refer to the new relationships imposed by the knowledge society and the standardized skills demanded by the global economy (Touraine, 2005).

Within this scenario, we need to recognize that education represents a broad context of actors and elements impacted by policies, norms, relations, meanings and actions that form part of its nature, social function and structure.

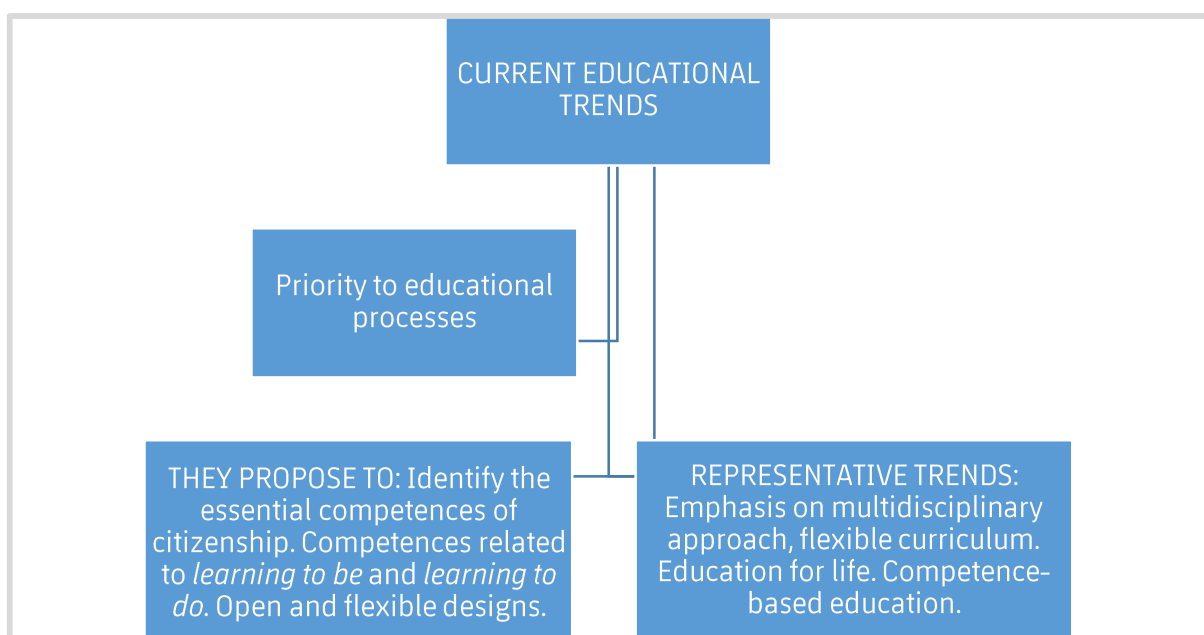
Accordingly, the educational institution, the figure of the teacher, knowledge, the figure of the student and the educational system have reached levels of complexity that require new ways of organizing curricula. All the sections related to education in general terms are completely connected with the phenomenon of High Athletic Performance. Currently, there is increasing importance and relevance related to handling with issues such as:

- **Socio-cultural diversity:** Education is a socio-cultural process for the transmission of culturally-valued knowledge and content. Echeita (2006, cited in Cano, 2005) explains it as being linked to the question of how and why it is necessary to achieve balance in educational systems — between what should be considered common for all students and the attention to different educational needs that arise from each student's individuality, without creating inequalities or exclusions.
- **Multidisciplinary approach:** The need to create closer bonds between the educational world and society is imminent. According to Quintana (2005, cited in Cano, 2005), the multidisciplinary approach organizes the teaching and learning processes, focusing actions on dealing with one or more topics from the perspective of a single discipline, but including content from others.
- **Multicultural and intercultural education:** This is a trend that aims at responding to the cultural diversities of current societies. The first concept makes reference to a dynamic vision of cultures, daily relationships through communication, construction of a broad base of citizens, only accepted with the equality of rights as citizens. The main characteristic of the second concept is to promote dialog and relationships among cultures; stating that the interaction among cultures must be based on the respect for diversity and mutual enrichment.
- **The pedagogy of leisure:** Defined as education focused on learning how to use free time correctly in order to reduce passive leisure. Puig and Trilla (1996) point out that the pedagogy of leisure should teach how to create — not only to consume — and

generate alternatives that can harmonize fun, creation and learning within activities carried out during free time, both individually and collectively.

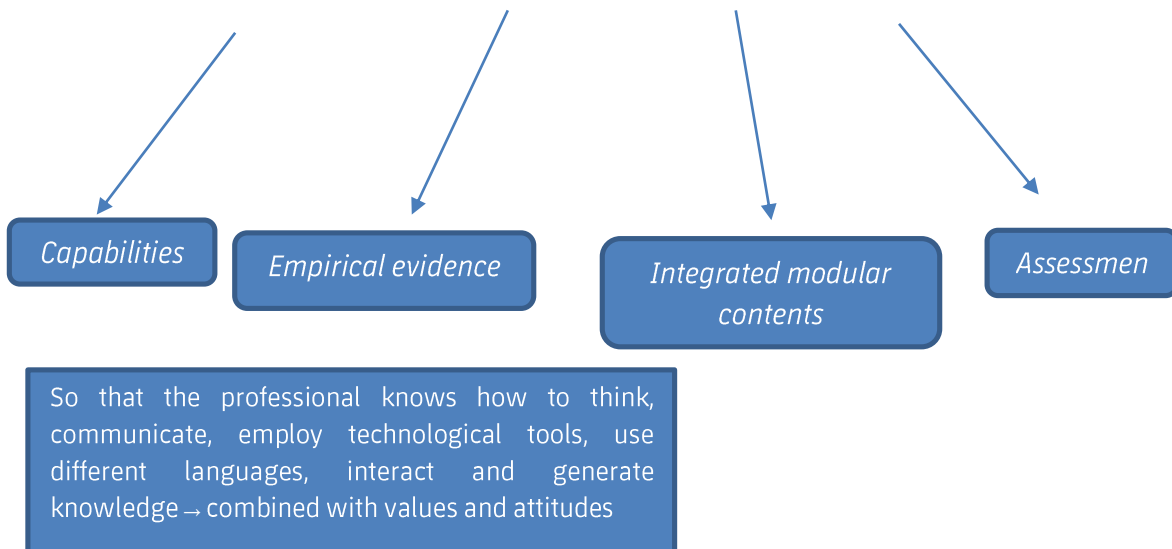
- **Education for life:** The concept of education for life seeks to influence individuals' daily lives, as a permanent training that offers a better quality of life. It is an interactive teaching-learning process that provides knowledge to students and lets them acquire attitudes and aptitudes necessary for the adoption of behaviors that allows them to enter in a responsible and effective way into the society in which they live, UNESCO (2000, cited in Cano, 2005).
- The main characteristic of **competency-based education** is that it aims to prepare students for being able to develop potentials that allow them to use their knowledge in situations that are unpredictable and even different from those learned in class. Tobón (2007, cited in Cano, 2005) defines a competency as the capacity that the individual has to make use of the knowledge he has gained throughout his life, in a particular context and specific moment; that is to say, being competent implies the conscious and functional use that the human being makes of his own knowledge and where his historical experience also converges, as a result of his interaction with the social and cultural environment.

In today's world, in which scientific and technological knowledge is dynamic and in a process of constant creation, we need to take on the project of a *flexible curriculum*, which allows us to organize the changes implicit in the knowledge society. In this case, contents should be adapted to students' skills and interests. As Nieto points out (2002, cited in Cano, 2005), the flexible curriculum is justified in a global society focused on exchange, where science and technology are at the service of the economy, and because of which the labor market and professional training are changing.



Source: UNESCO (2007) Document that deals with educational policies within the 2nd Intergovernmental Meeting of the Regional Education Project for Latin America and the Caribbean (EPT/PRELAC). Argentina: UNESCO, Regional Education Office for Latin America and the Caribbean.

Ruiz (2007, in UANL, 2007) points out that this educational alternative makes educational training more flexible, approaches the real world and allows the teacher to be collaborator and participant in a collective project and not a transmitter of knowledge. The same author considers that any *competence* alternative should have four elements:



All the described elements that make reference to the current educational paradigms are considered to be really important in order to efficiently plan the athletic training in real environments.

## 2.1.2 Adherence to Athletic Behavior Training via Competency-based Management Models (Adapted from the Field of Business Management)

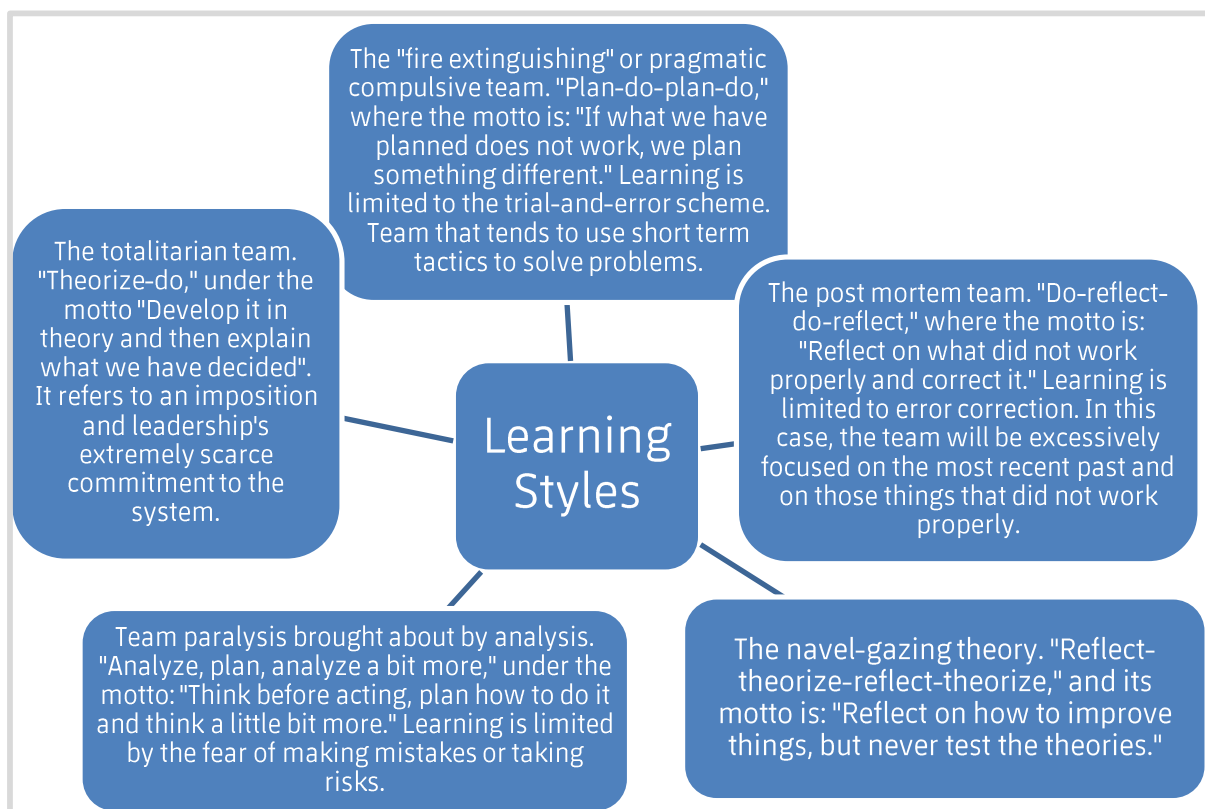
From a psychological perspective, adherence is another ongoing phase of athletic training. Adherence can be defined as the quantitative and qualitative attendance to a teaching-learning stimulus.

This phase is especially important within athletic training processes, as the core of training has to do with adherence. If athletes adhere, *they acquire knowledge, attitudes and abilities*; if there is adherence, you can take advantage of the *repetitive practice* as a mechanism to incorporate and automatize the acquired athletic behaviors; if their adherence exists, you can practice with athletes by *exposing them to competition conditions*. It is important to point out that the three underlined items correspond to the transitory phases of athletic training from the psychological perspective.

Below we will describe some aspects related to learning and their respective implications in competence-based management, from the concept of adherence as a central component of athletic training:

David Clutterbuck (2007, cited in Hawkins, 2012) defines the learning process as: "A group of people having a common purpose that assumes an active responsibility in order to develop themselves and with each other." This is a very useful definition, but I would like to expand it a bit: "a group of people having a common purpose that assumes an active responsibility in order to develop themselves and with each other, their team and the organization in which they operate through the act of learning and unlearning" (Hawkins, 2012, p.158).

We must also take into account that people and teams have different *learning styles* that affect the starting point from where they would like to start the learning process. Honey and Mumford (1992, cited in Hawkins, 2012) have developed a series of methodologies which allow individuals to discover what their learning style is. They are models that should be recognized before starting with the learning process. **Five main restrictive learning styles** are distinguished:



Source: Developed by the author.

What are the differences between aptitudes, competences and capabilities? In Hawkins and Smith (2006) we define these differences, basing ourselves in the previous work of Mike Broussine (1998): "Aptitudes" as well as "competences" can be learned and

developed, since the subject has to do with acquiring certain knowledge. However, the difference that exists between them lies in how learning is produced.

*Competences* can be learned in the classroom, but aptitudes can only be acquired directly or while carrying out the task. The risk is that we can acquire a wide variety of skills without developing the ability to know when to use each of them and how.

Supervision is of great importance in helping the supervised person to transform his competences into capabilities, and guarantee that aptitudes are displayed with a higher capability to work with others with a brave compassion.

"Capabilities" are more related to our personality than to our way of doing. They are human qualities that can be improved and refined. Each capacity is supposed to be developed throughout the entire life, and development is not a process that has only one direction.

Why is the competence-based management model considered to be important in athletic training? Current environments are mainly dynamic, changing, focused on the short-term. Configuring high performance processes implies being able to adapt to these different scenarios on a permanent basis, both for coaching staffs as well as athletes.

Adherence is the essential operation which allows efficiency and effectiveness when improving athletes' performance levels. Adherence is the intention, sustained over time, through which someone commits 100% of their attention to the service of something that they consider important.

### **2.1.3 Transferring Athletic Behavior to its Competitive Situation via Specific Behavioral Indicators**

In the previous two sections, we have mentioned some of the main contributions in relation to phases of athletic training (planning and adherence). Below, we will discuss the mental operation, which according to sports psychology, must have a solid presence at the time of a sports competition.

This operation is Transference. We will not deal with this concept from a psychoanalytic theory but from a cognitive-behavioral framework.

In this sense, we will say that if the objective of athletic training is the incorporation of the athlete's new resources (where resources are competences that arise from more and better knowledge, attitudes and abilities), the aim of sports competition is the use of all the resources previously acquired. In order to meet those objectives, it is necessary to

adhere in training sessions and transfer in competitions. This is how it worked in the past and how it works in current environments.

Thus, the key question could be: How do we know if the transfer to the competitive situation is optimal? The answer seems not to be a matter of "he's played well" or "he's playing worse and worse", since these statements lack specificity, but the concrete behaviors that the athlete shows on the field of play when competing.

All athletes have an ideal response profile. This profile describes each of the behavioral patterns that the athlete should develop satisfactorily in every sporting situation. Taking into account the nature of each athletic discipline, these behaviors can be inserted within wider constructs, that is to say, in certain competences (not in the sense of sports competitions).

It is also true that every athlete has a real response profile. This profile is the athlete's current possibility to perform — in his own way — each of the indicators of his ideal profile.

The gap that naturally arises between the real and the ideal profile, is the behavioral distance that cognitive-behavioral sports psychology has to manage. It is when managing the athlete's ideas and emotions, that the mechanisms to reduce this gap arise. The smaller the difference is between the current and the real profile, the closer the athlete will be to optimal levels of high athletic performance. The greater the difference is, the contrary will occur.

This is why it is important to define which competences the athlete should develop and which behavioral indicators make up these competences. If we included within these competences aspects of mental, physical, nutritional, technical, tactical and strategic preparation, we can clearly and precisely define the concrete range of behaviors that the athlete should train for.

If we also make use of the behavioral analysis technique on these indicators, we will have a clear map of what the transfer process implies for the athlete. This behavioral analysis has to do with four possibilities of human behavior:

Behaviors to maintain: the ones that are present and should still be present.

Behaviors to be consolidated: the ones that are present in an oscillating manner and that should be permanent.

Behaviors to add: the ones that are not present and should be present.

Behaviors to be eliminated: the ones that are present and should not be present.

Every indicator should be found within any of these four frames. If we are clear about which are high athletic performance indicators, and we have clear in mind each indicator's degree of appearance in the athlete's current response profile, we will be able to measure, and manage, the ability to transfer that which was acquired in training to competitive situations.

### **2.1.4 Assessing the Athletic Teaching-Learning Process for 3.0 Athletes**

Assessment as an ongoing phase of athletic training—from the psychological perspective—is defined as the instrument we possess to recognize and measure the effectiveness of the resources incorporated by the athlete. Throughout different periods, the word "assessment" has not had a precisely positive meaning since it entails a "pass/fail" duality. In current environments this has changed, both at the level of formal general education and at the athletic level in particular. We should not be afraid of assessment. On the contrary, assessment should take place in an ongoing manner. And not from the point of demonstrating that someone has risen to the occasion, but from the perspective of assessment as part of the growth process. Not assessment for demonstration but assessment for growth.

In post-modern eras, where self-management is an everyday occurrence for current generations, it is important to provide athletes with self-assessment principles (creating a proactive culture related to the educational process, and not one based on reactivity towards the teacher of the day).

Current educational trends are beginning to cast aside the traditional assessment system—along with its "final test"—which places value on the knowledge acquired by students/athletes throughout the program or process. These trends emphasize and give importance to other *assessment instruments* such as: self-assessment, observation sheets, portfolio, practice reports/logs, performance tests of real and/or simulated tasks and observation techniques, among others, which could be creatively designed by the teacher in order to assess the acquisition of competences by the student (related to knowing, knowing how to do, knowing how to be and knowing how to be present).

According to De Miguel (2006), the assessment system should allow one to make effective and timely adjustments to itself and within the activity, to be conscious of the system's trajectory and progress, and to become totally involved in the learning process. We also need to stress ongoing feedback, in order to adapt and correct things that are not working.

As stated by Bolívar (2008), Cano (2005), Cela, Fandos, Gisbert and González (2005), Galvis (2007), Paricio (2007), Torrego (2004) and Villa (2006), it is not only the student who must acquire competences: the university professor-tutor must develop a series of general and

specific, intrapersonal and interpersonal competences in order to satisfactorily assume his new role. Let's discuss these competences below:

<b>Competences</b>		
<p>Related to oneself:</p> <ul style="list-style-type: none"> <li>• Self-knowledge and observation</li> <li>• Self-confidence</li> <li>• Self-motivation</li> <li>• Adaptability</li> <li>• Sporting spirit and the spirit of sacrifice</li> <li>• Reasoning and critical thinking</li> <li>• Open mindedness</li> <li>• Initiative and decision</li> <li>• Flexibility and variety</li> <li>• Responsibility</li> <li>• Innovation and variety</li> </ul>	<p>Related to the activity:</p> <ul style="list-style-type: none"> <li>• Start from specific and generic competences</li> <li>• Teach to learn and reflect</li> <li>• Plan and organize the teaching-learning process</li> <li>• Manage information, summarize, structure and transfer it</li> <li>• Manage computer resources, multimedia</li> <li>• Ordered, systematic, coherent and consistent performance</li> <li>• Diagnose problems, prevent them and manage them</li> <li>• According to De Miguel (2006), the assessment system should allow one to make effective and timely adjustments to itself and within the activity, to be conscious of the system's trajectory and progress, and to become totally involved in the learning process. We also need to stress ongoing feedback, in order to adapt and correct things that are not working.</li> <li>• The assessment system should allow one to make effective and timely adjustments to itself and within the activity, to be conscious of the system's trajectory and progress, and to become totally involved in the learning process (De Miguel, 2006). Assess on the basis of competences before, during and after</li> </ul>	<p>Related to others:</p> <ul style="list-style-type: none"> <li>• Develop social and communicative abilities</li> <li>• Work in teams and cooperate in the service of orientation</li> <li>• Stimulate and motivate others</li> <li>• Celebrate achievements</li> <li>• Negotiate</li> <li>• Manage moods</li> <li>• Suggest more than impose</li> <li>• Leadership and strength in flexibility</li> <li>• Be authentic, fair, humble and reliable for others</li> <li>• Work in teams, collaborate and cooperate</li> <li>• Coordinate</li> </ul>

## Unit 2.2 Social Networks and High Athletic Performance

**COMMUNICATION VIA THE INTERNET** is currently the most important and revolutionary medium, as it contains images, text, sounds and visual sequences. Moreover, its impact on the receiver is direct, since individuals look for information on the Internet due to their interest in buying or acquiring a product or service (Rivera Camino, Molero Ayala, u.d.).

An example of communication on the Internet is when a fan of a particular soccer team looks for information in its web page and a banner about a sponsoring sports brand pops up, in which he can directly see the new models of shoes, t-shirts, advertising and which also offers the possibility of buying the products online (Rivera Camino, Molero Ayala, u.d.).

In general terms, communication on the Internet is considered (Rivera Camino, Molero Ayala, u.d.):

- **Polyvalent media:** it offers information about a club's products and services, for example, about the schedule of fixtures, the club's philosophy and institution values, its philanthropic actions, etc.

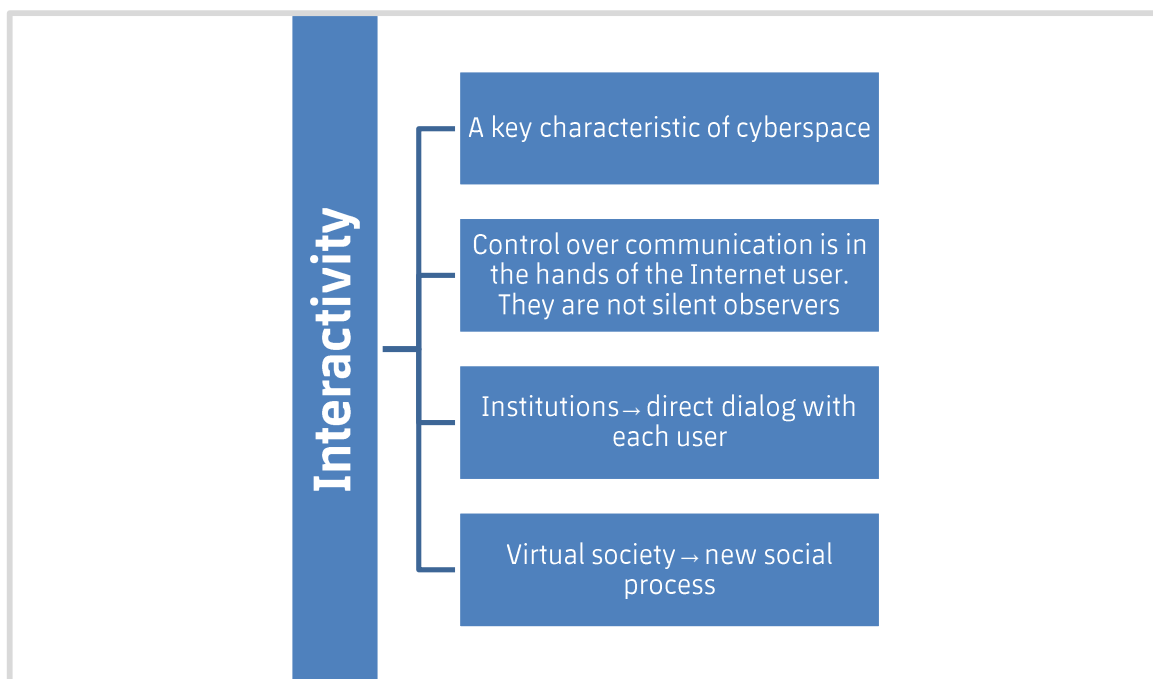


- **Global and local media:** since communication on the Internet is accessible, without being overly-expensive; communication occurs on different scales (advertising, direct marketing, corporate and private-sector publicity).
- **An informative medium:** the Internet allows for the acquisition of massive amounts of information at no cost; if we continue using the same example: from club history to players' characteristics, from institutional plans, forms for becoming a club member to benefits and possible discounts — all through links that make it easy to access the information.

Some of the *advantages of communicating on the Internet* (adapted by Rivera Camino, Molero Ayala, u.d.) include:

- 1) The Internet enjoys a wide popularity and attracts more clients than any other form of traditional communications media, such as TV and magazines.
- 2) Communication via the Internet is an inexpensive means of communication if we compare it to other, more traditional options.
- 3) Online communication creates an opportunity to interact immediately with the consumer, something that is impossible in traditional media.
- 4) The Internet provides users with great quantity, as well as variety of information.
- 5) By means of the Internet we can send personalized messages to consumers.
- 6) Time is not an important factor in Internet communication. Access is available 24 hours a day.

Proenca (2011 en Rivera Camino, Molero Ayala, u.d.) highlights the term '**interactivity**':



*Mobile technology* → facilitates access to the Internet through devices that are not anchored to a fixed position. If telephones allowed for the exchange of verbal information and cellular phones brought said verbal exchange to a mobile context, new devices (iPhone, Android, etc.) bring the exchange of information of any type (voice, data, images, etc.) in any place, at any time and by any person (Rivera Camino, Molero Ayala u.d.).

All the above-mentioned information — a frame of reference for what happens in current contexts and which also transcends to sports — is useful for understanding the Internet's

impact in general terms and the impact of social networks in particular, as pillars of the New Information and Communication Technologies (ICTs). These tools are the vehicles for athletes' actions, both on an interpersonal level, as well as an *intrapersonal* one (as their identity and personality are expressed in these channels).

To give a concrete example of the importance of social networks and mobile-apps in High Athletic Performance, we can mention what happened during the last Olympic Games which took place in Rio de Janeiro in 2016: all the athletes, thousands of athletes from around the world who arrived at the Olympic Village were presented with a mobile phone given as a gift, which included on-line apps that were specific to the Olympic Games, and broad spectrum social networks, also to be used by athletes and coaching staffs.

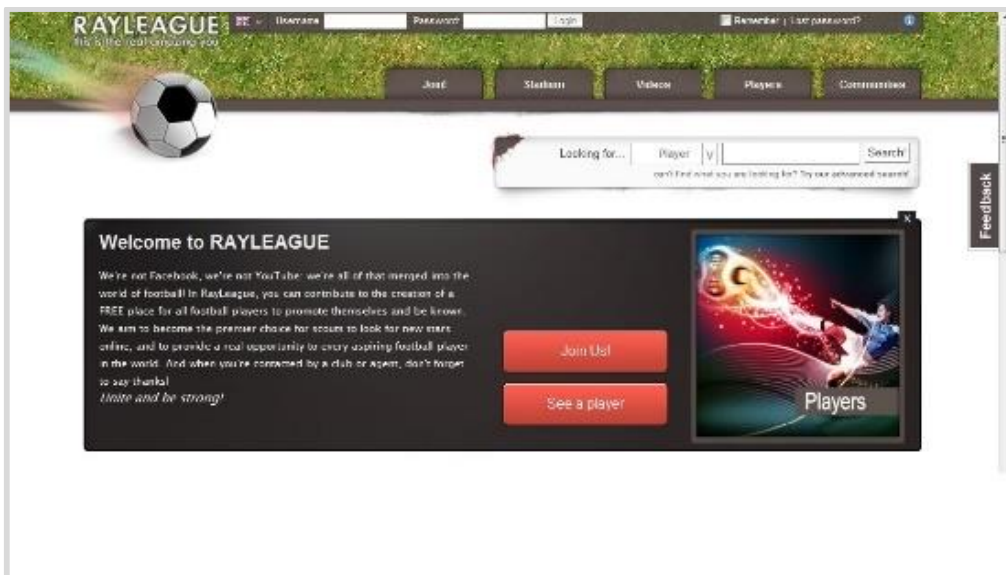
Below, we will mention some specialized networks that allow one to establish relations with other sports professionals, and which are distinguished due to their broad public and possibilities:

## SaludCOE



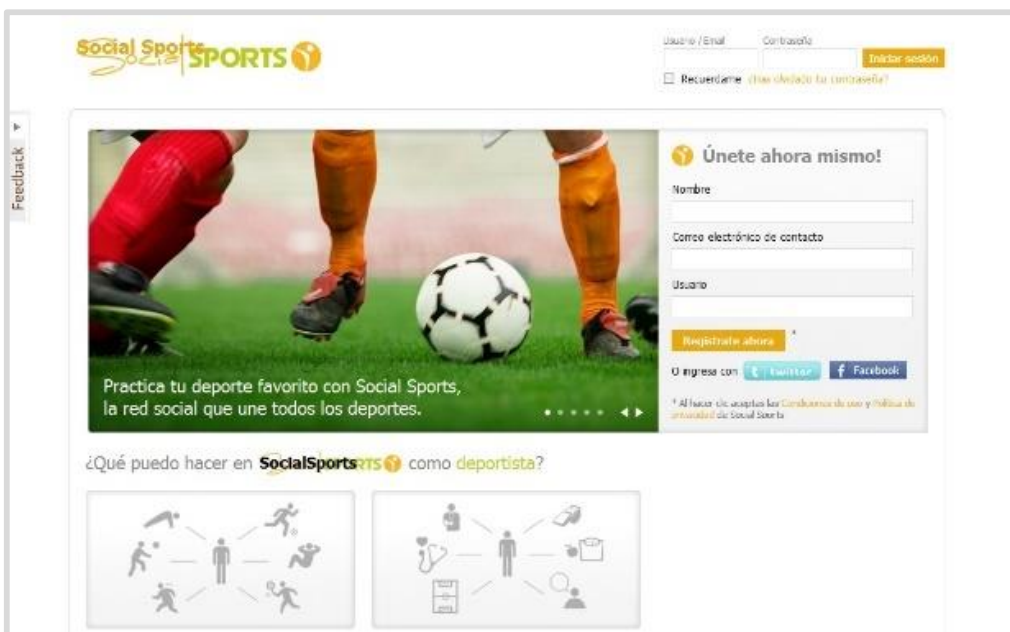
Offered by the Spanish Olympic Committee and many health organizations, which allows us to infer that its focus is on the athletes' wellbeing through healthful practices. For this it contains information about illnesses, recommendations, diet suggestions, contact with specialists and other sports professionals, tests for improved mental performance, etc.

## RayLeague



Similar to 2Sponsors, but exclusively for male and female soccer players. An athletic dashboard in which each player can upload videos and game-related details (position, technique, ability, nationality) as a data sheet, promoting their image and making it available to talent scouts or interested clubs.

## SocialSports



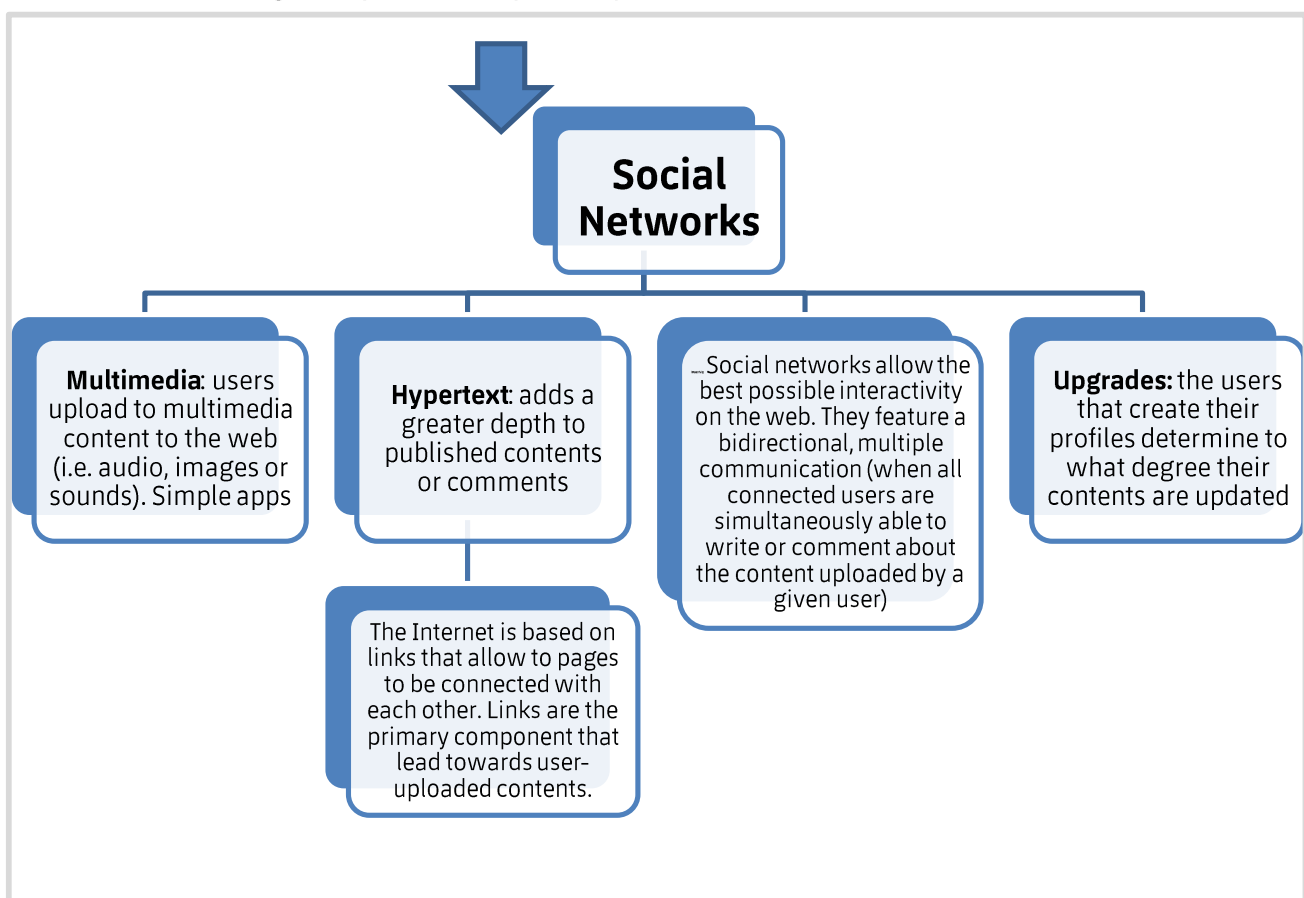
An Argentine social network to contact other sports professionals, join groups that practice nearby and during convenient times, create events and obtain information about specific topics. It is also useful for searching for tips, nutritionists, available playing fields, referees, personal trainers and other sports-related services.

## 2.2.1 Social Networks with Audio-Visual Impact as Modelers for the Acquisition and Consolidation of Athletic Skills

The success of social networks can be backed up by reports and numbers. In 2005, a Forrester Research report announced an ever-increasing habit among Internet users to visit blogs, social networks or content syndication sites on a daily basis (Cabrera, 2008). According to Orihuela (2008), social networks are "web-based services that allow users to relate with each other, share information, coordinate actions and, in general terms, stay in contact".

In all cases, what is predominant is the construction of identity within the new network. Orihuela and Salaverría agree by pointing out that social networks are an extension of personal relations in real life, where communities such as family, school, co-workers are created (Dupín, 2009). That is to say, said relationships have been transferred to the web with these new tools.

It is a tool that combines all the elements that comprise the nature of the Internet and *underline its singularity with the system of communications.*

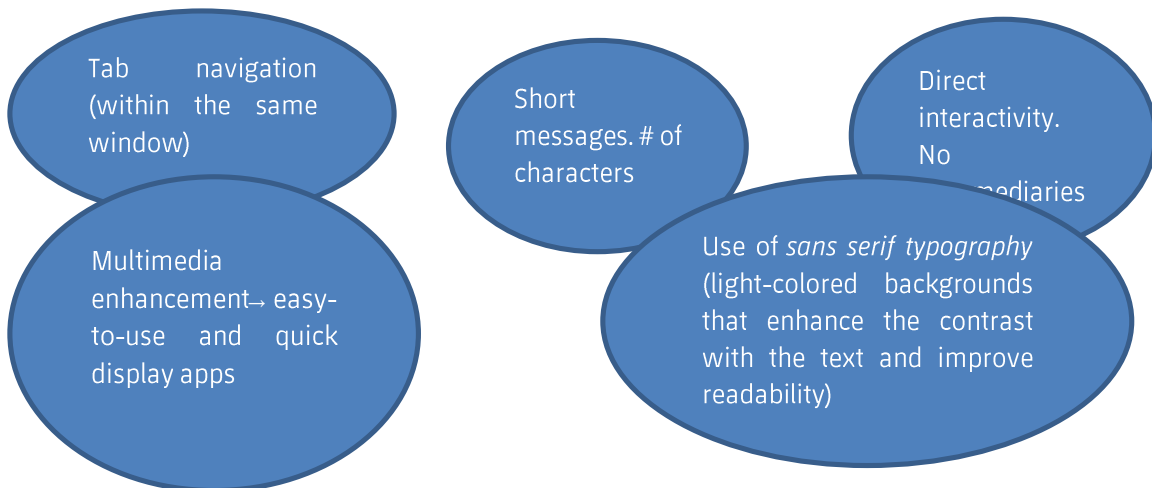


Today, it's possible to find in social networks with audio-visual impact, such as YouTube, thousands of training tutorials from the most diverse sports disciplines, where the very

athletes share their methods for acquiring competences; the digital screen turns into a real-time mirror where we can "upload" training behaviors and shape new behaviors based on the models provided on-line; this usage and habit is now incorporated to the 3.0 training culture.

## 2.2.2 Social Networks with Audio-Visual Impact as Channels of Feedback for the Execution of Athletic Behavior in Competitive Situations

Another characteristic of social networks is that their broad acceptance is thanks to their design: based on simple and easy structures that allow us to navigate and publish on the web very quickly. The most significant defining features can be found in the following list:  
CHART



### Connected people

*Today, 940 million people make use of them around the world. There are global and local networks, elitist and mainstream, oriented to work or to flirting, easy or difficult to use, for young people and adults. But what they all have in common is that they are formed around the people, allowing us to see the invisible lines which are the relationships that connect us.*

In the previous section, modeling and shaping were mentioned as features present within athletic teaching-learning processes. Today more than ever, the empire of social networks allows all of us to see and analyze what the athlete has performed, here and now. Real time becomes continual time. Everything is available in the cloud. All the time. Getting feedback regarding what occurred is therefore an ongoing choice.

The impact of social networks is massive in terms of the possibility of accessing athletes' performance individually, in parallel, and including analysis in the different kinds of behavioral analysis software synchronized via social networks. And even more surprising is athletes' habit of seeing their daily practice on social networks, and sharing it all the time. "The athlete is the one that is in the networks, online, and I'm this athlete," seems to be the slogan of athletes from different generations immersed in the "connected" world.

### **2.2.3 Social Networks with Communicational Impact as Facilitators of Coaches' and Athletes' Active Involvement in the Resolution of Specific Sports Situations**

"One cannot not communicate," was one of the contributions of the Theory of Human Communication, developed by Paul Watzlawick, (1981). If at the time this fundamental work was launched, this axiom was a reality, currently it is imposed as an avant-guard concept and a verifiable truth.

Access to information has never been so broad, comfortable and accessible in history, as is the case today with 3.0 culture.

We live in online times, and connectivity invites us to be witnesses of all that was done by our ancestors, as well as that which is done by those of us who must act in the present.

Sports is part of this reality, and as a social phenomenon of great development during the 20th century and its consolidation in the 21st century, this continual advance of techniques, theories, tools, methods and all that entails interaction between coaches and athletes is given traction via social networks. We would never have enough time in our lives to read and watch exclusively what appears in the networks regarding every high performance sports discipline. The data and video library is expanding minute by minute and it is just one click away of us.

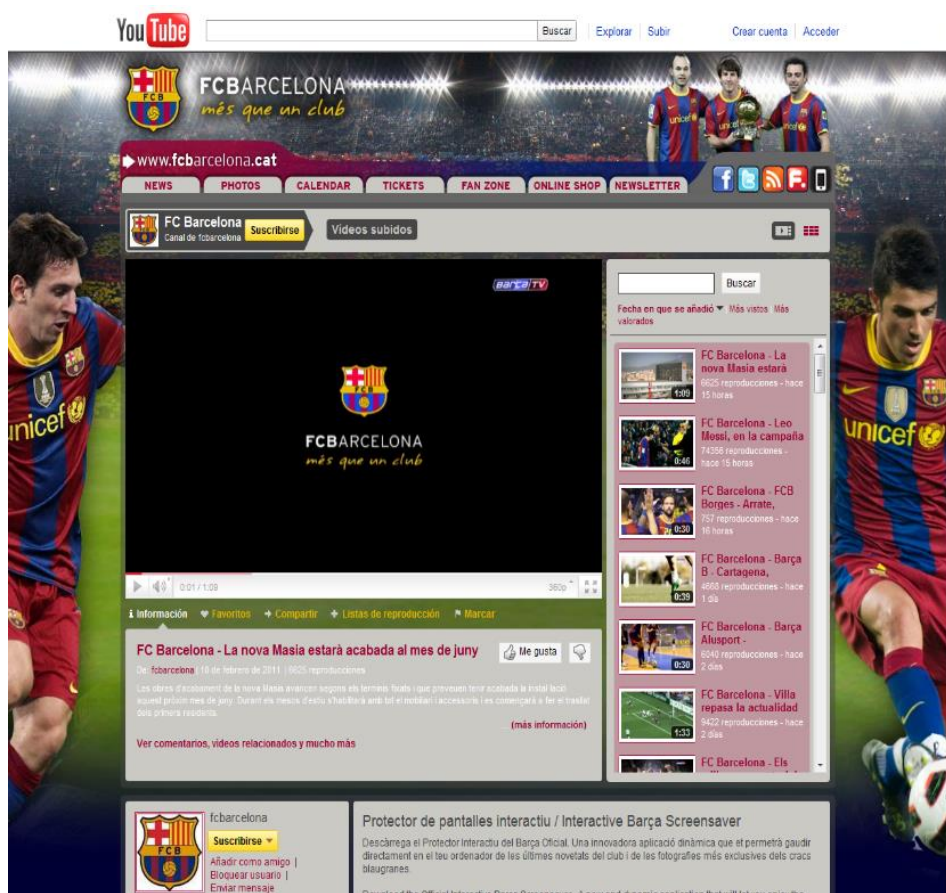
Physical and geographical barriers disappear thanks to online social networks in terms of the exchange between coaches and athletes, and all other actors that contribute via their roles to the sports community.

Sports psychology — based on the practice of those that develop these contents — is a witness to this reality: we could not be part of the high performance processes of athletes and coaches that live around the world if social networks did not exist.

If the phenomenon of communication is bi-directional as Watzlawick (1981) described, today social networks are the channel *par excellence* that can send and receive what human beings have to share and allow others to participate, and that is to communicate.

## 2.2.4 Social Networks and the Increase of the Audience Effect Implications for Athletes – Coaching Staffs – Directors – the Global Community

*El Barca, the sporting entity with more fans on Facebook than any other in the world (3/25/2011).*



*Fernández, L. for lainformacion.com*

*There is no sports team in the world that has more fans on Facebook than FC Barcelona. The Club has turned the social network into an element of its communication strategy that puts it in contact with fans from the five continents.*

*Dídac Lee, head of the Technological Area of FC Barcelona, explains in this interview "With Facebook News" how they manage this written page:*

*How did you get 11 million followers on Facebook? Is it enough with a trade mark and a team such as Barcelona?*

*It is obvious that 'el Barca' as a global phenomenon is unusually strong around the world, but the numbers are achieved with a strategic plan which*

*considers social networks as an asset of the Club's communication plan. As such, every action that we carry out in our social networks has been thought through and fulfills a concrete plan in which we try to involve all the departments of FC Barcelona.*

*Which of the actions that you have applied in Facebook were most successful?*

*Recently, in order to celebrate the figure of 10 million fans, we promoted a campaign with Leo Messi, in which the number 10 Barca player invited Barca followers to join Facebook 10, a quantitative figure but one that also intends to foster the quality of contents as well as the dialog among Barca supporters around the world.*

*Do you use Facebook to manage crises?*

*As part of the Club's communication strategy, social networks are an important asset. That's why, what is important is the content that is transmitted and that the Club uses the social networks as another channel to communicate, but we will not deal with this matter specifically on Facebook.*

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