



Version 1.2 – Guide for professionals in the sports sector

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Authors All partners

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inovarautismo.







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Summary

This document comprises a comprehensive guide tailored for various stakeholders within sports structures. This guide provide:

- Basic knowledge required to work with autistic individuals,
- Tips to support the specific needs of autistic athletes in sports activities and environments,
- Advices for organisations looking to develop sports programs for autistic individuals.

Disclaimer

Funded by the European Union. Views and opinions expressed are however those of the author(s) only and do not necessarily reflect those of the European Union or the European Education and Culture Executive Agency (EACEA). Neither the European Union nor EACEA can be held responsible for them.





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INTRODUCTION

Presentation of the guide

This guide is produced as part of the **Sacree project** (Sport and Autism, from scientific diagnosis to the CREation of a European educational model). This project is funded by the **Erasmus+ Sport programme** of the **European Commission** and has a dual aim:

- Enhancing the quality of life for autistic individuals by fostering participation in sports activities through the development of a model for sports programs suited to their needs across the EU.
- Addressing the existing gap in scientific knowledge regarding the relationship between sport and autism.

Our sports programme comprises a **comprehensive guide tailored for various stakeholders within sports structures**. Whether it's a club looking to initiate inclusive sports activities for autistic individuals, an organisation seeking to enhance its existing program, a coach in need of valuable insights, or a volunteer eager to contribute but lacking expertise in this domain, our guide provides practical support and guidance.

This guide will provide:

- Basic knowledge required to work with autistic individuals,
- **Tips to support the specific needs** of autistic athletes in sports activities and environments,
- Advices for organisations looking to develop sports programs for autistic individuals.

This version 1.2 is preliminary and not the final, definitive guide. *The completed guide will be released by the project's conclusion in 2025*. We are working day by day to improve it. Additionally, an e-learning tool will soon be accessible.

Please share any recommendations or advice by contacting us at sacree.project.autism@gmail.com.

We express our deepest gratitude to all individuals who contributed to the creation of this document:

- Those who participated in our online questionnaire regarding the experiences of autistic individuals,
- Those who generously shared their insights through interviews,





 Those who dedicated their time to review Version 1.1 of our sports program tailored for autistic individuals and provided valuable feedback through a questionnaire assessing its quality.

Your support and collaboration have been invaluable in shaping this document, and we extend our warmest thanks to each and every one of you.

About the layout: All of the graphic designers who created the icons in this document are mentioned in the Credits section of this document, in accordance with the conditions of use indicated on the Flaticon website.





This guide is also available in other languages (人主)



The first version of the guide for professionals in the sports sector has been translated into the languages of the Sacree project partners, including English (this document), French, Croatian, Portuguese, and Italian.

USER GUIDE —	USER GUIDE
The guide for professionals in French: click	The guide for professionals in Italian : <u>click</u>
<u>here</u>	<u>here</u>
USER GUIDE	USER GUIDE
The guide for professionals in Croatian : click	The guide for professionals in Portuguese :
<u>here</u>	<u>click here</u>

These links direct you to the "Documents to Download" section on our website, https://sacree.eu/, where you can access all the translated documents.





Presentation of the partners



Created in 1898, the **ASPTT Fédération Omnisports** (**FSASPTT**) represents today 240 multi-sport clubs that propose 200 sports and cultural activities to 200 000 members. Recognised by the Ministry of Sports, and the CNOSF (French National Olympic and Sports Committee), the ASPTT is an active member of the sporting world. It proposes sport activities to all audiences, regardless of age, physical abilities, and condition. Since 2016, the ASPTT has been running a sports project for the inclusion of autistic children.

Website: https://asptt.com/





Culture Sport Santé Société

The laboratory Culture, Sport, Health and Society (C3S) is a research unit (label EA4660) of the University of Bourgogne-Franche-Comte (France). The team brings together researchers, including 20 Professors and Associate professors, and 30 doctoral multidisciplinary students around the study of physical activity and sport. Scientists dedicate their research on the effects of several types of sports activities and training modalities on psychomotor and physiological factors, sociological and psychological behaviours.

Website: http://laboratoire-c3s.fr/



SS Romulea (SSR) is a historic Italian football club located in Rome founded in 1922 for all youth categories (500 members from 5 to 19 years old, male and female). The club supports them into professional football, which through the Romulea Autistic Football Club promotes football also among young people and adults on the autism spectrum in an inclusive way with a mixed team composed of players on the autism spectrum and other players who also have support functions: volunteer educators, parents and friends.

Website: https://autisticfootball.club



Autism-Europe (AE) is an international association created in 1983 whose main objective is to advance the rights of autistic people and their families and to help them improve their quality of life. It ensures effective liaison among almost 90 member autism organisations from 40 European countries. international governments and European and institutions. It plays a key role in raising public awareness, and in influencing the European decision-makers on the rights of autistic people.

Website: https://www.autismeurope.org/



The Croatian Union of Associations for Autism (CUAA)

is a non-governmental organisation that unites 14 member organisations spread in Croatia, all dedicated to the shared goal of enhancing the lives of autistic individuals and their families. Their overarching goal is to promote the well-being and quality of life of autistic individuals while actively encouraging the establishment of a comprehensive network of services and support systems for autistic individuals throughout Croatia.

Website: https://www.autizam-suzah.hr/

inovarautismo.

Inovar Autismo (IA) is an association for Citizenship and Inclusion founded in 2016 and has the status of IPSS and NGPD. The association defends the rights of autistic people, striving to empower society to embrace difference as something "normal". To promote the full participation of autistic people in society, the association encourages the inclusion of all people, defending the maxim that it is not people who must adapt to contexts, but that contexts must be "rehabilitated" to include all human diversity.

Website: https://www.inovarautismo.pt/





PART 1: WHY IS IT IMPORTANT TO INVOLVE AUTISTIC INDIVIDUALS IN SPORTS?

1.1 Because autistic people need it: the positive impact of sports for autistic individuals



/! This section has not been finalised and is currently being drafted by the scientific team.

Sport and physical activity offer lifelong preventive and therapeutic benefits for all individuals, including autistic people.

For chronic diseases, sport and physical activity decreased relative risk by:

- **29-41%** for **premature mortality** (ANSES, 2016; INSERM, 2018),
- **20-30%** for **Type 2 Diabetes** in targeted populations (Gill and Cooper, 2008),
- 25% for colon cancer (Wollin, 2009) and breast cancer (INSERM, 2018),
- 45% for Alzheimer's disease and 18% for Parkinson's disease(Hamer and Chida, 2009).

Sports also play a role in preventing complications, reducing relapses, and managing decline:

- In **coronary diseases**, the relative risk for death decreases by **16**% (e.g., from 60 minutes/day of physical activity, Loprinzi and Addoh, 2016).
- For **cancer**, physical activity improves treatment outcomes and fatigue tolerance, and reduces the relative risk of relapses (e.g., by 20% with 2 hours/week of physical activity, INSERM, 2018).
- In **mental health**, the relative risk of depression relapse decreases by **51%** (Babyak et al., 2000).
- For **neurodegenerative diseases**, physical activity slows sensorimotor and cognitive declines, optimising quality of life (Mahalakshmi et al., 2020).

The findings indicate that engaging in sports can provide autistic individuals a range of physical, psychological, and social advantages. Physically, sports promote motor skill development, coordination, and overall physical fitness, which can enhance the individuals' overall well-being. Interestingly, there is no full contra-indication for any activity, although some require a specific preparation. Each could provide benefits in a specific area. While we wait for this part to be finalised, take a look at our initial conclusions.

Studies have identified a number of **benefits** of sport and physical activity for autistic people, including **improvement** in, for instance:

- Social skills (Alexander et al., 2011), but it is only a single-subject case study,





- Motor skills (Huseyin, 2019),
- Quality of sleep (Wachob and Lorenzi, 2015),
- Fitness (Pierantozzi et al., 2022),
- Community involvement (Kunzi, 2015).

Participating in sports not only develops physical abilities but also **fosters crucial life skills essential in everyday living**. Activities involved in self-care, such as dressing, tying shoelaces, and maintaining personal hygiene, can be generalised from sports, thereby positively impacting their independence and overall quality of life (Huseyin, 2019).

Additionally, engagement in sports serves as a **means to counter sedentary habits**, reducing the risk of chronic health issues and mitigating the side effects of medications. This active involvement aids in managing prevalent conditions like anxiety, depression, and obesity often experienced by autistic individuals (Kunzi, 2015).



To have more information, we invite you to wait for the publication of a narrative review on the effect of sport on autistic people, written by the University of Franche Comté, one of the partners of the Sacree project. The link to the article will be included in the final version of this guide.





1.2 Expanding your sports programs: developing and improving opportunities for all

To develop your sport programs



Establishing a variety of sports accessible for individuals on the autism spectrum can distinguish your organisation positively from those that do not offer such accommodations. This proactive approach reinforces your societal impact and positions you as a catalyst for inclusion and social innovation. Moreover, it can broaden your visibility, reaching a diverse audience ranging from current and potential sports enthusiasts to partners and stakeholders.

Expanding your sports programs to include autistic individuals can also lead to increased participation rates. Autistic individuals constitute a significant portion of the population, with prevalence rates ranging from 1% to 2% across European Union Member States, equating to approximately 4.5 to 9 million European citizens.

To improve your sport programs (



Engaging in the process of setting up a sports programme accessible for autistic individuals offers valuable opportunities for personal growth and skill development. Additionally, many of the insights gained from these experiences can be applied in broader contexts beyond autism, benefiting diverse groups.

Incorporating inclusive practices into your sports programs can enhance the overall dynamics and quality of your services. Research has shown that sports programs can facilitate progress for both autistic and neurotypical individuals, while also fostering positive attitudes among neurotypical individuals towards those on the autism spectrum.





PART 2: A BRIEF INTRODUCTION TO AUTISM

2.1 Deconstructing misconceptions about autism

We are aware that **misconceptions**, **myths**, and **stereotypes** about autism prevail, often leading to **stigmatisation**, **discrimination**, and **violence** against autistic individuals and their families. It's imperative **to debunk these stereotypes** and **promote an inclusive society that respects neurodiversity**. To assist in this effort, we provide the following information sheet (sheet available in the appendices):



TO KNOW

- -Autism **is not a disease**, it's a **neurodevelopmental condition**. Unlike a disease, autism cannot be transmitted or cured, but there are ways to improve quality of life and manage certain challenging aspects of this condition.
- -There is no causal link between styles of parenting and the development of autism. The causes of autism are genetic and environmental. Not all autistic individuals have an intellectual disability, and conversely, not all individuals with an intellectual disability are autistic.
- -Autistic individuals may experience **crises**, which **are not acts of caprice** but often their way of expressing discomfort in response to overwhelming situations.
- -Just because an autistic person is **non-speaking does not imply a lack of intelligence** or the **inability to communicate**.
- -While autism may impact learning, it is not synonymous with a learning disability.
- -No sport is off-limits for autistic individuals, although each sport offers specific benefits and may require adaptations. The suitability of an activity varies from person to person.

Feel free to download the "Misconceptions about Autism" sheet (available in the appendix) and distribute it within your local communities and sports organisations. The document is available in the appendix.





2.2 What is the autism spectrum?

TO KNOW



-Autism is a spectrum condition: while common characteristics are shared among autistic individuals, each person's experience is unique (Garratt & Abreu, 2023). They may have a wide variety of support needs in different areas such as communication, executive functions, social interaction, sensory processing and perception, etc. There is not just one way for a person to be autistic.

- -Autism can be associated with other disabilities and conditions that require consideration, including but not limited to: attention deficit hyperactivity disorder (ADHD), Down syndrome, epilepsy, Rett syndrome, tuberous sclerosis, anxiety, digestive disorders, sleep disorders, intellectual disabilities, learning disability, being overweight, Tics, OCD (Obsessive compulsive disorder), schizophrenia, immunological problems (asthma, diabetes type 1, urticaria, etc).
- -Executive functions challenges, which involve planning, behaviour control, and adapting to social situations, can present in various forms, including difficulties in information processing, attention, and emotional regulation (van der Gaag, 2017).
- -Autistic individuals may need adjustments in their living, learning, and working environments to accommodate their unique differences.
- -"Stimming", or self-stimulating behaviours, are common among autistic individuals and serve as a means of calming or concentration. Stimming is a natural form of self-regulation, involving repetitive body movements or vocalisations, which can increase during stressful periods (Kapp et al., 2019).
- -When autistic people feel completely overwhelmed, they may experience a meltdown. This can involve verbal outbursts like shouting or crying, physical actions such as kicking or hitting, or withdrawing and shutting down completely, known as a "shutdown". It's important to distinguish meltdowns and shutdowns from tantrums or deliberate anger, as they are involuntary responses and not motivated by a desire to achieve or avoid something. The way these reactions manifest and the solutions to help vary greatly from person to person.
- All autistic individuals can derive similar benefits from sports, even those requiring significant support and attention.

Feel free to download the "Misconceptions about Autism" sheet and distribute it within your local communities and sports organisations. The document is available in the appendix.

The rest of this guide will help you learn the basics about autism.





2.3 General mindset to have



Motivation and enthusiasm:

It's important to offer the minimum essential level of support and encouragement to ensure the athlete's advancement, emphasising both progress and independence.

Establishing a profound and supportive relationship between the coach and the athlete plays a pivotal role in enhancing the involvement of autistic individuals in sports.

The duty of the coaches encompasses ensuring that sports activities are not only enjoyable but also tailored to meet the unique needs of each individual.

To provide effective support for autistic individuals, having a skilled, motivated, and enthusiastic staff team is essential. These staff members should be deeply committed to their work and genuinely enjoy working with individuals who can have complex needs. It's crucial for the staff to be able to see beyond the complexities of these needs and focus on the person at the core. Empathy and understanding play a vital role in their interactions.



Routine and predictability

You shouldn't try to create something new and different all the time. Autistic individuals often encounter heightened stress and anxiety when facing change, notably in the context of sports. This change can encompass various aspects, including alterations to the playing environment, shifts in team dynamics with new participants or coaches, or adapting to different rules imposed by a different referee in tournaments. Many autistic athletes express a strong reliance on routines and structured frameworks in their lives to navigate these challenges effectively.



Open-mindedness and understanding:

Be aware that what might be considered "normal" or "good" for non-autistic individuals may not be suitable or right for autistic persons.

Instead of labelling individuals as "complex", seek to understand and empathise with their unique perspective.

It's important to implement a person-centred approach which understands the unique needs and of individuals characteristics and fosters trust-based relationships not only with the athletes and their families, notably the communication and interaction preferences

Understand the "spikey profile" of the autistic person. Indeed, autistic individuals demonstrate a varied profile of cognitive strengths weaknesses, referred to as a "spikey profile". This profile highlights where they might excel in certain areas while experiencing challenges or deficits in others. This profoundly impacts learning and adaptive functioning. Notable challenges include slow/different processing styles, limited working memory, and isolated difficulties in intellectual functioning (Greaves-Lord et al., 2022). Among the areas in which they regularly have positive experiences there are for example the good quality of observation, the better attention to details, etc.



Adaptability and flexibility

Enable opportunities for breaks, rest, and personal downtime.

Finding the right balance between the need for familiarity, repetition, and sameness versus exposure to change, variety, and new experiences.





PART 3: ENHANCING SPORTS ACTIVITIES FOR AUTISTIC INDIVIDUALS: KEY CONSIDERATIONS AND STRATEGIES FOR SUCCESSFUL IMPLEMENTATION

This part of the guide provides essential knowledge for supporting autistic individuals and offers guidance on appropriate strategies that you can implement into your sports programs, categorised by ease of implementation from level 1 to level 3 (ranging from easier to more challenging). It is not a set of rigid rules but rather a collection of suggestions, inspiration, and perspectives tailored to various situations. It's important to note that these tips are not universally applicable to all autistic individuals in every context, rather, they represent general trends and strategies, not a one-size-fits-all solution.

3.1 Optimising the environment: essential considerations and strategies for understanding and addressing sensory differences in autistic individuals

In any learning environment, individuals depend on their senses to comprehend the surroundings and effectively engage or function within it. This process is termed **sensory integration** (Stevenson, 2008) and revolves around the commonly recognized five senses: **hearing**, **vision**, **touch**, **smell**, and **taste**. Additionally, it encompasses other equally **vital sensory systems** essential for normal functioning, including the **proprioceptive system** (perception of the position of different parts of the body) and **vestibular system** (contributes to a sense of movement and balance) (NAT, 2019).

TO KNOW

- -Autistic individuals may face **challenges in processing everyday sensory information**. Any of their senses may be **over-sensitive** or **under-sensitive** or both, at different times.
- -These sensory differences play a significant role in **shaping their emotions and behaviours**, thereby greatly affecting their daily experiences (NAT, 2021).
- -These challenges can also intensify **anxiety**, **stress**, **hinder community participation**, and at times, even cause **discomfort** (lemmi et al., 2017). Sometimes, the sensory differences may generate behaviours that may be perceived as aggressive, or impolite by others (Stevenson, 2008).
- -Prolonged exposure to stress and sensory overload may lead to a condition known as **autistic burnout**. This syndrome emerges from **chronic life stress** and **excessive expectations surpassing an individual's capacity to manage** (Raymaker et al., 2020). It is marked by extreme





exhaustion, regression in previously acquired skills (e.g., self-care, speech), heightened sensitivity to sensory stimuli, impaired executive functions regulation, attention, emotions, negative effects on mental health, and potentially, thoughts of self-harm (Mantzalas et al., 2022).

- When an autistic person feels completely overwhelmed, they may experience a **meltdown**. This can involve verbal outbursts like shouting or crying, physical actions such as kicking or hitting, or withdrawing and shutting down completely, known as a "shutdown". It's important to distinguish meltdowns and shutdowns from tantrums or deliberate anger, as they are involuntary responses and not motivated by a desire to achieve or avoid something. **The way these reactions manifest and the solutions to help vary greatly from person to person**.
- -Due to **the differences of the sensory experience**, the experience of sports and physical activity for autistic individuals can vary significantly.







TIPS:

First and foremost, we recommend that you distribute a form at the start of the sports season that includes a section on sensory characteristics to help you understand the profile of autistic person. The sheet 2 of the appendix is an example of the form used by the ASPTT, which you can adapt according to the information you want to collect.

Creating a calm auditory environment (| x

TIPS: If you put music on, verify that it's not a problem. Level 1 ☐ Just in case, prepare some **noise-cancelling headphones** or **earplugs.** Avoid using sharp or startling sounds like whistles or shouting that might overwhelm individuals with sensory sensitivities. For indoor activities, **reduce noise** using curtains on walls, carpets on floor, high or sound-absorbing ceilings, close the doors if outside there is noise, etc. Level 2 ☐ To hide the offensive sound by masking it with "white noise", a randomly generated tone that combines all sound frequencies simultaneously, it can be used to cover up unwanted noise by saturating the hearing system. ☐ Have a **calm place** if the person needs to be alone for a moment. Level 3 ☐ If the activity is outdoors, **be careful of the movements** (bikes, cars, etc.). ■ Avoid overcrowded settings. ☐ Be aware of noises such as clocks ticking, humming from lights, road noises, building/gardening work in the distance. The slightest inconspicuous sound can be irritating and distracting (Simpson, 2016). Mindful lighting considerations TIPS: Just in case, prepare some sunglasses. Level 1 If you are taking photos, be careful with the flashes. Utilise natural light whenever possible to create a soothing atmosphere. Adjust the **brightness of overhead lights** to reduce glare and harshness. Level 2 Provide shaded areas or options for individuals who may be sensitive to brigh sunlight.





Leve	13	 Try to ensure that there are not too many bright or fluorescent lights. Create zones with different lighting levels to cater to varying sensory not 	eeds.		
		Managing smells in sports environments			
		TIPS:			
Leve	11	Regularly clean and maintain sports equipment, mats, and other sur the buildup of odours.	faces to prevent		
		☐ Ensure proper ventilation prior to each session.			
		Consider using odour-neutralising products (air fresheners or diffusers with neutral scents).	Level 2		
Leve	13	☐ Consider implementing scent-free policies.			
		Use relaxation strategies in sport activities			
		TIPS:	• Dractice class		
		☐ Begin each session with a few minutes of deep breathing exercise inhales through the nose and gentle exhales through the mouth to promote the mouth to pr			
Leve	11	☐ Incorporate gentle stretching exercises into warm-ups . Engage in release tension in the muscles, such as reaching for the sky, tou stretching arms and legs.			
	☐ Engage in quiet ball games like rolling or tossing soft balls. These low-key activities promote coordination and social interaction without overwhelming sensory input.				
Create sensory stations with tactile materials like textured balls, squishy toys, or sensory bins filled with rice or beans. Allow individuals to explore these stations to regulate sensory input and reduce stress.					
■ Nature breaks: take sports activities outdoors and incorporate nature walks or outdoor games. Connect with the natural environment and enjoy the calming effects of fresh air and natural surroundings.					
		Form small groups and practise simple massage techniques on each of arms, and hands. Enjoy the calming effects of touch and positive social			
Le	vel 3	Blow bubbles during breaks or cool-down periods. Engage in the s experience of blowing bubbles and watch them float away.			





Relaxation techniques: experiment with incorporating elements of yoga, meditation,					
and progressive muscle relaxation into sports activities. These techniques have been					
shown to have relaxing effects for some individuals.					
(2) You can refer to the section below the challenging situation					

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3.2 Communication and interaction: key considerations in sports settings

3.2.1 Understanding communication differences

Language and communication development are fundamental components of a person's overall growth, intricately interlinked with cognition, social development, and the comprehension of the world. Acquiring communication skills and language presents one of the most complex challenges, particularly for autistic individuals (Vuksan and Stošić, 2018). In the context of sports, proficient communication is an essential pillar for the comprehensive growth and overall well-being of autistic individuals.

TO KNOW

- Autistic individuals communicate in diverse and varied ways. When working with autistic individuals, it's crucial to **identify their specific communication needs** to facilitate task completion. Communicating with autistic individuals may necessitate practitioners to acquire new skills and adopt alternative methods (Stevenson, 2008). Some advice is taken from Duquette et al., 2016.
- Autistic individuals often face **communication difficulties** with **delayed language development** or **loss of language skills** (Carlsson, 2019). Verbal language **may be absent**.
- Many autistic people develop speech and language skills but not to a typical level, and progress tends to be uneven.
- While they may rapidly **acquire a rich vocabulary** in particular areas of interest, **comprehension might lag**.
- They may have a **good memory** for heard or seen information, reading words at an early age but **not understanding their meaning**.
- They **might not respond to others' speech or their own names**, leading to misconceptions of hearing difficulties (NIDCD, 2020).
- Autistic individuals may exhibit **repetitive speech** that lacks relevance to ongoing conversations. They may repeat phrases they've heard before a condition called echolalia. This can manifest in immediate echolalia (repeating words just spoken) or delayed echolalia (repeating words heard at an earlier time).
- They may speak in a **high-pitched** or **sing-song voice**, **use robot-like speech**, or **employ stock phrases** to initiate conversations.





- They may showcase highly specialised interests, allowing them to deliver **detailed monologues** on specific **topics of interest**, yet may **struggle** with **reciprocal conversations** on the same subject (Greaves-Lord et al., 2022).
- Autistic individuals might face **challenges in verbal and non-verbal communication**, including interpreting facial expressions, body language, and nuances in tone of voice, resulting in:
 - Potential confusion and increased anxiety in social situations: They may struggle to use gestures to enhance their speech's meaning or avoid eye contact, leading to misunderstandings of rudeness or disinterest (Greaves-Lord et al., 2022).
 - Difficulties comprehending non-verbal social cues and maintaining reciprocal social conversations, exemplified by challenges in initiating or sustaining back-and-forth interactions, (Greaves-Lord et al., 2022).
- Augmentative and alternative communication (AAC) can be introduced as a valuable solution. AAC encompasses a variety of modalities, including gestures, sign language, images, photographs, objects, videos, and written words. Indeed, communication tools, whether in physical or electronic formats (e.g., mobile phones, tablets, or computers), are often employed. The adoption of AAC strategies holds the potential to foster social interaction and facilitate a deeper comprehension (Hyman et al., 2020).
- In sport activity, small talk serves as a gateway to social bonding and establishing connections among teammates, but some autistic individuals find **difficulty in engaging in small talks**, sometimes viewing it as irrelevant to their specific interests. This **struggle to initiate or participate in casual conversations** can inadvertently lead to misunderstandings, as the absence of small talk may be misinterpreted as disinterest or rudeness.
- Interpreting banter, which frequently hinges on sarcasm or undertone, becomes an intricate task for individuals on the spectrum due to literal interpretation of language, difficulties in deciphering facial expressions, and body language.
- They may have a **central coherence deficit** which implies a **focus on some details** and sometimes **difficulties for having a general vision** of the situation.
- There may be **deficits non-verbal communicative behaviour**: body language, gestures, visual contacts... By the way, the deviations from conventional eye contact rules, whether due to sensory discomfort or difficulty consciously adhering to social norms, can hinder the sense of being understood or listened to in conversation settings (Webster, 2018).





Promote effective communication



TIPS

	☐ Gather information on the individual's mode of communication, such as
	speech, tablet, sign language, or pictograms, before the sessions commence.
	Adapt and utilise forms like the one provided by ASPTT to understand their
	communication profile (see sheet 2 in the appendix). You can download the
	form <u>Here</u> .
Level 1	☐ Use simple, unambiguous language without undertones, metaphors, or jargon,
	considering the central coherence deficit common in autistic individuals. Frame instructions affirmatively (i.e say "Continue" rather than "Don't stop") and
	personalise interactions by addressing the individual by name to establish rapport.
	☐ Initiate engagement by asking the individual to perform a simple task, like touching
	their nose, before delivering instructions, to redirect their focus .
	☐ Present instructions sequentially
	☐ Physically demonstrate each step of the activity or task to provide a visual reference
	for the individual.
activities, Be flexible the inform order to r Society ad Respect e individuals Create an	this helps people to better understand and follow instructions. with time: be patient and allow enough time for the individual to assimilate nation and be aware that some people need to repeat instructions aloud in nemorise them. The guide for sports coaches and clubs of the National Autistic vises to leave 6 seconds between each instruction to allow time for it to sink in. ye contact: avoid insisting on eye contact during communication because some amay find it uncomfortable. environment that encourages questions, and actively inquire if the individual nds the instructions, fostering a mutual understanding of the task at hand.
Level 3	□ Using Augmentative and Alternative Communication, including images, symbols, objects, digital apps, sensory tools, and written or text-based methods. To find pictograms you can for example visit the website https://arasaac.org/pictograms/search . To use the pictograms, respect the condition of use, notably the logo of ARASAAC and the citation: The pictographic symbols used are the property of the Government of Aragon and were created by Sergio Palao for ARASAAC (http://www.arasaac.org), which distributes them under a Creative Commons BY-NC-SA Licence.





3.2.2 Navigating social interactions

Autistic individuals demonstrate unique strengths and challenges in the realm of social interaction. While they may encounter obstacles, they also possess remarkable capabilities and potential for growth in this area. Successful engagement with others involves the gradual development of diverse skills over time. Autistic individuals have the opportunity to enhance their ability to pay attention to social cues, understand social situations, problem-solve, and offer appropriate responses.

Recognizing the interconnectedness of communication and social interaction, we can leverage this relationship to create supportive environments that facilitate meaningful connections and social skill development. By considering the insights provided in the previous section on communication differences, we can **tailor our approaches to better suit individual needs and preferences**. Through encouragement, patience, and collaborative efforts, we can empower autistic individuals to navigate social interactions with confidence and positivity.



- Social skills differences among autistic individuals can manifest diversely based on language abilities, developmental stage, and age. These may include challenges in initiating, sustaining, and concluding interactions, difficulty comprehending and using verbal and nonverbal cues, such as eye contact and gestures, and struggling to grasp unspoken social conventions in a given setting (Hyman et al., 2020).
- -Engaging in **social interaction may provoke anxiety** in some autistic individuals.
- -Autistic individuals demonstrate **loyalty, care, and honesty in friendships**, yet encounter persistent **challenges initiating, understanding, and maintaining social connections** due to communication and interaction issues. These difficulties encompass initiating friendships, differentiating between casual friendliness and genuine connections, identifying sincere friendships to prevent exploitation, and sustaining these relationships (NAT, 2019).
- -"The double empathy problem" theory (Milton, 2012): communication challenges between autistic and non-autistic individuals stem from reciprocal differences in communication styles and understanding.
- Contrary to the misconception that autistic people do not seek social interaction or friendship, recent research indicates that autistic individuals often find greater ease and enjoyment in interacting with fellow autistic individuals. Studies show that these interactions are marked by alignment, enthusiasm, and shared affect, highlighting the significance of similar thinking and interests in fostering strong social connections among autistic individuals (Crompton et al., 2020; Williams et al., 2021). These findings challenge the traditional notion of autistic





individuals lacking social skills or a desire to socialise, emphasising that differences in neurotypes can impact the quality of relationships and communication (Crompton et al., 2020).

- It's crucial to recognise that individuals on the autism spectrum are more prone to being victims of violence rather than being the ones displaying aggressive behaviour (Holingue et al., 2021). As the autistic people victims of bullying and aggressions are a really frequent case, the coach has to take action against the violence. Including an autistic person in a sports group doesn't just mean behaving in a specific way towards that person, it really means changing the way the whole group is coached.
- Fairplay is an essential component in sport, basically autistic athletes already tend to faithfully abide by the rules and avoid foul play, but they need guidance in offering help to a falling opponent player and generally interact socially during the game.

Respect some principles of communication





For this part, you can refer to the section above on the communication differences

Use an individualised approach

TIPS:



Level 1

Understand the reasons for their participation in the sport programme, their interests,
and the coaching style that suits the athlete best and take the time to get to know each
athlete, learning about their unique abilities, interests, needs, and preferred methods
of communication.
Respect and accommodate the individual's preferred communication methods,
whether verbal, non-verbal, or augmentative and alternative communication (AAC)
tools. Provide access to tools and resources that facilitate effective communication.
Verify with each individual their preferred language for referring to autism. Respect
their choice of identity-first language, such as "autistic person", or person-first
language, such as "nerson on the autism spectrum" or "nerson with autism"

Empowering decision-making and supporting autonomy in autistic individuals ☑☑☑

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Level 1

Respect an autistic person's **right to say "no"**.

Respect a **desire to spend time alone** and avoid pressuring them into group settings that might cause distress.





	Recognize and respect the personal boundaries of autistic individuals, including their need for personal space, privacy, and autonomy in decision-making.
	Avoid imposing physical contact or social expectations that may cause discomfort or distress.
minimisir Incorpora select ac levels. Avoid fo	ge and assist autistic individuals in finding practical ways to fulfil their needs while and harm to themselves and respecting the rights of others. Attended the choice-making opportunities into the sports program, allowing individuals to attivities, equipment, or participation levels based on their interests and comfort constraints and unquestioning compliance and instead empower them to express the sand make choices independently.
Level 3	Provide resources and guidance to help autistic individuals develop self-advocacy skills , including assertiveness, self-expression, and the ability to articulate their needs and preferences.
	Fostering motivation and celebrating progress
	TIPS:
Level 1	 ■ Make regular, diverse, and constructive feedback as athletes learn new skills, acknowledging and positively reinforcing each step they take in their progress. ■ Utilise praise as verbal encouragement, smiles, clapping, thumbs up, or high-fives, tailored to the individual's preferences and comfort.
or in	ample space and support for athletes to attempt new activities from the sidelines private settings if they initially feel uncertain about performing in a group nament.
	Building an inclusive team dynamic



For the other tips, refer to the section Building an inclusive dynamic team in the part **Teammates**





3.3 Understanding motor and cognitive differences: tips for inclusive sports programs

3.3.1 Understanding and accommodating motor differences

TO KNOW

- Motor skill deficits are a significant and often under-recognized aspect of autism. These deficits are present in up to 87% of autistic people (Zampella et al., 2021).
- It's frequent that autistic people have **repetitive** and **stereotypical movements**. Stereotyped and repetitive movements like rocking or hand flapping are recognized as core symptoms, and atypical gait and clumsiness are regarded as "associated features", co-occurring but separate from the primary autism phenotype (APA, 2013).
- Specific motor skill domains such as praxis, object manipulation, and postural stability could be selectively impaired in autistic individuals (Zampella et al., 2021). These motor challenges can extend to areas like gait, postural control, and motor planning.
- Specific motor activities such as ball throwing and catching, using stairs, jumping, and bicycling can be particularly challenging for autistic individuals (Pusponegoro et al., 2016). These difficulties may stem from deficits in perception-action strategies, especially in tasks requiring anticipatory control, such as catching a ball in motion (Whyatt & Craig, 2011).
- The impact of motor coordination challenges can extend beyond physical limitations. For autistic individuals, keeping up with their peers in physical activities can be frustrating, leading to potential social and emotional consequences as they may fall behind in group activities due to the competition (Menear & Neumeier, 2015).
- Research indicates that gross motor skills, especially object control/aiming and catching skills like ball throwing and kicking, may be related to social skills in autistic children (Ohara et al., 2019). Children facing gross motor impairments tend to exhibit lower socialisation skills compared to those without such impairments (MacDonald et al., 2014; Pusponegoro et al., 2016).

Understanding the profile of the autistic individual



т	ı	D	C	
	ı	г	J	

	☐ Determine if the autistic person knows his body .
	☐ Determine his physical skills : if he knows how to run, climb, stretch out its arms
	and/or legs, bend its legs etc.
	Collect information about what he like, what he know and what he don't like and
Level 1	don't know







For these first 3rd points we recommend that you distribute a form at the start of the sports season that includes a section on motor characteristics to help you understand the profile of the autistic person. The sheet 3 in the appendix is an example of the form used by the ASPTT, which you can adapt according to the information you want to collect.

 Give athletes the freedom to select from various options, such as activity sequences, repetitions, team roles, colours, equipment, partnerships, or bre times. Ensure athletes are aware they can take breaks whenever necessary to rech or regroup, encouraging a healthy balance between engagement and rest. 	
Ensure each training session includes at least one activity in which the athlete finds	
success and enjoyment promoting positive experiences	Level 2
such as animals, superheroes, characters from various media, or favourite toys.	

Level 3

Encourage autistic individuals to explore new experiences that align with their preferences and interests, without restricting them to their current comfort zone. It's important to promote a balance between familiarity and new opportunities that can enrich their lives and help them grow.



It is not possible to help them progress without effective communication. Alongside this section, the advice in Part 3, section Effective communication should be kept in mind.

Adapting sports for autistic athletes of



Introduce more structured formats, reducing complexity, increasing the likelihood of positive involvement, and modify game rules for structured play. However, the adaptation should not be the first intention because it's important to not stigmatise the autistic people. In general, we recommend doing little collective adaptation (which concerns everybody in the session) to have an activity that is really inclusive. So, the following tips can be applied to all the teammates of the session (autistic people and neurotypicals people), and, when it's really necessary, an adaptation only for the autistic people.





Level 1	 Zoning the game: it can ensure that individuals on the autism spectrum have designated spaces for receiving, dribbling, and passing the ball; it avoids overcrowding and invasion of personal space. Ease athletes into activities gradually, whether by observing others participate, visiting the training area, or starting with individual tasks before integrating into group activities.
athletes to align with a If an athlet that target	erent levels of programmes (beginner/recreational/advanced) enabling progress from foundational skills to more advanced ones. These levels should in individual's skills and abilities rather than solely considering age. The end is a specific activity, provide alternative but similar tasks the same skill set. If you was a sequence of the programmes is a specific activity, provide alternative but similar tasks the same skill set. If you was a sequence of the programmes is a specific activity, provide alternative but similar tasks the same skill set.
specific nur Structuring	mber of passes before shooting in a basketball-style game. games as a series of one-on-one challenges provides a high degree of
adjustment example, d type of bal for better g	Activity: in this type of activity, the same task is carried out, but with its to the rules, space, or equipment to ensure everyone can take part. For uring a throwing and catching activity, participants are allowed to choose the litthey are comfortable with (an autistic participant might prefer a ripple ball grip due to proprioceptive differences). Is diffied equipment or activity variations to suit individual needs.
C	Parallel Activity: participants engage in the same activity but at varying levels suitable for their skills. For instance, in a netball game, while the majority play the standard game, a participant uncomfortable with larger groups may benefit from one-on-one coaching to practise essential skills.
Level 3	Alternate/Separate Activity: some individuals may need separate activities. For instance, an individual sensitive to loud noises might require a personalised program combining sensory integration activities and physical exercises, such as rocking activities or specific gripping exercises with specialised equipment.
	Disability Sport/Reverse Integration : this activity involves non-disabled individuals participating in disability sports like boccia, wheelchair basketball, goalball, or table cricket. This approach not only fosters participation among disabled individuals but also encourages non-disabled participants to learn new skills.
	Adapt the activity lengths to suit individual attention spans, especially for those with shorter attention spans. Frequent changes in activities help sustain motivation, while overly prolonged tasks may lead to boredom and disengagement





3.3.2 Embracing cognitive diversity

Cognitive functions encompass a diverse range of abilities that enable individuals to interact with their environment. These functions, such as adapting to new situations and processing information, vary among individuals and are influenced by many different factors. Autistic individuals may exhibit unique cognitive traits that contribute to their individual strengths and challenges in navigating the world around them. Understanding and embracing this diversity is essential for creating inclusive environments that support the unique cognitive profiles and needs of all people.

TO KNOW



- Autistic athletes often find comfort in routines and structured frameworks, relying on them to navigate challenges effectively. Changes in their environment can lead to increased stress and anxiety for autistic individuals.
- -The characteristic "single focus" attention can make it challenging to manage multiple tasks simultaneously during sport training sessions. This may manifest as heightened susceptibility to distractions from the surrounding environment, with difficulties in regaining focus after interruptions. Additionally, some autistic athletes may struggle to switch between tasks or follow multi-step instructions, potentially focusing primarily on the first task and potentially neglecting subsequent steps (Webster, 2018).

Make the environment familiar



Level 1		 Offer visual aids such as photos of the facility, changing rooms, equipmed coaches, available on your website or in person. Offer flexibility in participation, allowing individuals to take breaks activities as needed. 		
 □ Allow participants to visit and explore the environment before starting the activity. □ Implement consistent routines and structure within the sports program to promote predictability. 				
Level 3] _	Offer trial sport sessions to allow individuals to experience the act comfortable setting. Create social stories or visual schedules detailing what to expect during activity.	·	





Ensuring consistency and structure



For any person engaging in an activity, a structure and routine aids learning. With autistic individuals, this structure needs to be more elaborate and well-defined. Providing them with precise expectations and consistency in their routine helps them to orientate themselves in the environment and in the task, which reinforces their concentration (Stevenson, 2008).

			Ensure that training sessions follow a predictable pattern , including an in the main part of the session , and a conclusion . Indeed, to structure as well-defined beginnings and endings creates predictability and facilitate within the training environment. For example, you can use timers to sign	ctivities with
			and conclusion of specific tasks.	
Le	vel 1		Offer transition cues to the group, such as "two more minutes, then we'l the next activity".	I move on to
			Offer advance preparation and information for upcoming events	through a
			combination of written and visual materials in addition to verbal commun	_
		П	Supply a written/visual schedule for your practice and review it with the	
			beginning and between activities.	9. c alp are area
		П	Remove unnecessary clutter and organise materials to minimise visual d	listractions.
			Label individual activities, areas, and equipment with visual markers	
		_	clarity and facilitate navigation.	
		П	Use physical dividers or markers in the room, such as screens, mo	vable walls.
			self-adhesive tapes, cones, flags, or chalk, to establish distinct visual	
			between activity areas.	
	Provide a personal i They are i	cons tem (stent routines and structure between workouts . istent and specific area for changing , you can for example mark it with a per image that resonates with the individual. Is ed to share an area with others to store clothes, so it is very likely that a councilethes with those of others or that they forget an item of clothing.	
	-		own clothes with those of others or that they forget an item of clothing,	
			to remind them to write one's initials on clothing labels, not to leave on the benches but to enclose them in their bags and place the bag on	Level 2
			to leave the bench free for another athlete.	
			ting areas, provide guidelines for equipment storage, and specify the	
	_		equipment or props.	
	•		orce rules of expected behaviour, both during training sessions and	
	•		aining, promoting consistency and understanding.	
			ual cues or pathways to guide individuals from one activity to another,	
	-		aids for transitions.	
	_		the building in accessible format.	





Leve	el 3		Ideally, have familiar individuals in proximity during changing times. Minimise staff rotation and aim to align staff with autistic individuals shared interests and mutual compatibility whenever feasible. Move away from the windows to keep away from outside distractions. Avoid multi-sports halls with many different lines on the floor, which can distracting.	
			Helping them progress	
			TIPS:	
			Repeat the different sequences of the exercise sufficiently in sequence. Make regular, diverse, and constructive feedback as athletes learn reacknowledging and positively reinforcing each step they take in their progresus praise as verbal encouragement, smiles, clapping, thumbs up, or tailored to the individual's preferences and comfort.	ess.
Level	1		and physical contact is accepted by the autistic person.	
			Help athletes in establishing individualised, attainable goals that allow opportunities for success and growth across various timeframes (training weeks, months, and years). Encourage the expansion of mastered skills to maintain motivation for	g sessions,
			development. For instance, if an athlete adeptly handles a basketball, them to practise with their non-dominant hand.	
			Offer opportunities for athletes to take on added responsibilities, such as "assistant coaches" demonstrating exercises, setting up equipment, er peers, or even teaching others new skills, not exclusively related to sports. You can adapt and use the sheet 4 and/or sheet 5 used by the ASPTT available appendix.	ncouraging
☐ Emp	loy visi	ual	ctions by breaking down the task into successive sequences. support and layouts with images, symbols, and colours to represent es, this helps people to better understand and follow instructions.	
☐ Prov	ide ex t	tra	time as needed. Avoid rushing your students allowing them the to adapt and process the transitions and the changes.	Level 2
sidel	-	in p	pace and support for athletes to attempt new activities from the private settings if they initially feel uncertain about performing in a group	

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	☐ Promote creativity by allowing athletes to explore skills in their unique way. If an
Level 3	athlete wants to attempt a skill differently, permit them to experiment before gently
	guiding them back to the task.
	☐ Promote a balance between familiarity and new opportunities that can enrich their
	lives and help them grow.

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3.4 Ensuring safety and support for autistic individuals

3.4.1 Enhancing safety measures

TO KNOW

- In some cases autistic people do not manifest the pain as neurotypical people.
- Some autistic people don't always foresee the consequences of their actions and some have a limited sense of danger.
- It's crucial to recognise that individuals on the autism spectrum are more prone to being victims of violence rather than being the ones displaying aggressive behaviour (Holingue et al., 2021). As the autistic people victims of bullying and aggressions are a really frequent case, the coach has to take action against the violence. Including an autistic person in a sports group doesn't just mean behaving in a specific way towards that person, it really means changing the way the whole group is coached.

Take care of their safety rules

	TIPS:
	☐ Keep an eye out for injuries , as some autistic people may continue to take part without realising that they have suffered an injury.
	■ Being particularly vigilant about the aggressions suffered by and, above all, systematically and firmly reframing any exclusionary behaviour or aggression (verbal
Level 1	or physical) that you witness. Not letting mockery go unchallenged (even under the guise of "humour") and setting a good example of a caring attitude that values all
	differences, whatever they may be.
	☐ Ensure athletes are aware they can take breaks whenever necessary to recharge, encouraging a healthy balance between engagement and rest.
	ure that you have clear physical boundaries for each session and explain ety rules in a way that the person understands.
☐ If th	nere are stairs , mark them with contrasting coloured non-slip strips.
ses	ually reinforce rules of expected behaviour, both during training sions and before/after training, promoting consistency and lerstanding.





3.4.2 Support strategies for navigating challenging situations

TO KNOW

- In working with autistic individuals, there are instances that may lead to high stress levels, especially during crises when he/she engages in distress, self-harming or aggressive behaviour that evokes fear or concern. These situations are often multifaceted and challenging for us to fully understand, as they are frequently linked to factors that are mostly beyond our immediate control. It's crucial to approach such "challenging" situations with a focus on identifying and removing environmental and other addressing unmet and not expressed urgent needs.
- When an autistic person becomes utterly overwhelmed by their current situation, he/she may experience a temporary and involuntary **loss of control**, referred to as a "**meltdown**". Meltdowns can manifest through verbal expressions (e.g., shouting, screaming, crying), physical actions (e.g., kicking, hitting, biting), or a combination of both. It's crucial to distinguish meltdowns from tantrums, as meltdowns are uncontrolled and not motivated by a desire to achieve or avoid something (Welch et al., 2020). **The manifestation of the meltdown and the solutions vary enormously from one individual to another**.
- Prolonged exposure to stress and sensory overload may lead to a condition known as **autistic burnout** (Raymaker et al., 2020). It is marked by extreme exhaustion, regression in previously acquired skills (e.g., self-care, speech), heightened sensitivity to sensory stimuli, impaired executive functions regulation, attention, emotions, negative effects on mental health, and potentially, thoughts of self-harm (Mantzalas et al., 2022).
- Autistic people may develop a **high risk of depression** because of their deficits in emotion regulation, anxiety and consequently social isolation. They also may experience **high stress** and **anxiety** in response to unexpected changes, emphasising the need for structure and advance notice to manage these challenges (Webster, 2018).
- In case of a challenging situation, it's important to recognise when behaviour is linked to unmet needs and take steps to address those needs and the best way to reduce such behaviours is to ensure that you understand why it is happening in the first place (NAT, 2019). Assess **factors that may increase the risk of challenging situations**, including (NICE, 2013):
 - Communication barriers: difficulties in understanding situations or expressing needs can lead to frustration or anxiety,
 - Associated conditions: other conditions like pain, gastrointestinal disorders, anxiety, depression, or neurodevelopmental issues like ADHD (Attention deficit hyperactivity disorder),
 - Physical environment and sensory factors: sensory overload, discomfort, or an unsuitable environment can trigger distress,
 - Social environment: issues at home, school, work, or leisure settings can cause stress,





- Change in routines and lack of predictability: sudden changes or lack of structure can cause distress,
- Developmental changes: transitional periods, such as puberty, can trigger emotional, physical, and hormonal changes,
- **Abuse**: experiencing exploitation or abuse can lead to emotional distress.

Be attentive to emotional, sensory and information overload



Level 1	 □ Talk about the meltdown with the autistic people before with simple questions: "What do you want me to do if you have a meltdown?" "What makes you feel better? □ Avoid crowding around the person in crisis: the fewer people around, the better. □ If the person has a comfort item or other objects that reassure them, give it to them. □ Don't touch the person if they haven't asked you to (not even a hand on the shoulder to comfort them). □ Encourage self-stimulatory behaviours (commonly referred to as "stimming"), 			
	intervening only if the individual experiences distress or harm. For recall, these behaviours serve a purpose and, if they don't cause harm or discomfort, allowing individuals to self-regulate is crucial.			
 Stay calm. Do not insist on re-establishing a verbal conversation. A common practice, which often works well, is to communicate with the person by text message (or to write a short message on a word processing application and show the person your phone): the written word is generally more effective than the spoken word. □ Once the stim is detected, it's important to observe the environment to search for the source of stress and eliminate this source of stress. 				
Level 3	 □ Provide a designated withdrawal room or area where individuals can retreat or access as needed. □ Engage in conversations and discussions rather than resorting to public punishment, singling out, or criticism, which can adversely affect trust and self-esteem 			





3.5 Actors to be mobilised

3.5.1 Involving families

Families with autistic youngsters have shown that there are many difficulties and barriers when they try to enrol their children in sporting activities. This section presents the experiences reported by Inovar Autismo's independent living support centres.

TO KNOW

- Involvement and support of parents towards sports significantly influence the active engagement of their autistic children in sports. The positive approach adopted by parents, coupled with their active participation in these activities, contributes to the increased involvement of autistic children in sports. This involvement not only encourages participation but also creates a supportive and conducive environment for the development and enjoyment of sports among autistic youth. Engaging a close family member can facilitate the transfer of skills learned in sessions to real-life scenarios.
- According to families, many sports organisations are not adequately informed about autism or the needs of autistic people. This can lead to misunderstandings, a lack of adequate support and even a refusal to accept autistic participants into their sports programs.
- Sports can be expensive, and families of autistic people often face additional financial challenges related to therapies and support services.
- The families of autistic people know that in some cases, autistic people may be rejected or discriminated against by coaches, teammates, or other families, which creates a significant barrier to participation. Keep in mind that some parents have already dealt with a lot of rejection. Families need coaches to give them confidence and attention when explaining their child's needs. Creating a sense of security is important, because the fear that their child will be excluded contributes to parents not enrolling them in mainstream sports activities.
- According to the families, the scarcity of sports programmes accessible for autistic people may limit their participation options.
- Constant mediation is necessary to bridge the differences in perspectives between service providers and families. By recognizing families not just as companions of autistic individuals, but as active participants in providing support, services can foster genuine experiences of inclusion, self-determination, and empowerment.

Building a trusting relationship with parents



☐ Seek guidance and insights from the individual's parents. Parents often possess valuable knowledge about their child's preferences, strengths, and challenges. This information can help in tailoring approaches. For example, you can adapt and use sheet 2 on the presentation of the child and sheet 3 on the motor skills (created and used by the ASPTT).





	☐ Be available , listen carefully to their concerns and show empathy.			
	☐ Communicate clearly and directly. Avoid complex or technical language	e and explain the		
	information in a simple and accessible way.			
Level 1	■ Establish a routine of regular communication with parents. This meetings, and messages via email or phone or even a messaging group informed about events and activities.	J		
	☐ Use a notebook to record information so you don't talk in front of the about the situations that occurred. These notebooks can be double-sided useful information to give to the coach before training and the coach important information and passes it on to parents after training. It notebook and exist in the form of an email exchange.	ed: parents record reports the most can be a digital		
	 □ Complete and provide the parents with a sheet on how the session we the appendix is an example of a sheet used by the ASPTT that you can add □ Set clear expectations: ask them what they expect from their child's paractivity, and state your expectations as well, including times, behaviour and 	apt. articipation in the		
 Be available to promptly respond to any concerns or questions parents may have. This helps to reassure parents and maintain open communication. Be willing to adapt communication to the specific needs of the family. Offer constructive feedback: provide constructive feedback on the autistic's person's performance in a balanced way, highlighting strengths and identifying areas for improvement. Share what is working and not only the problems. You can adapt and use the sheet 4 and/or sheet 5 used by the ASPTT available in the appendix. 				
Level 3	 Encourage parents to actively participate in sports activities with their could include being a volunteer assistant, organising events or providuring activities. To ease anxiety about new situations and meeting new people, consider involving family members in the first couple of sessions. 	ling support		

3.5.2 Teammates: fostering collaboration and supportive relationships

TO KNOW

-Participation in team games can present various challenges for autistic individuals due to the multiple aspects involved – such as understanding numerous rules, handling different types of equipment, interacting with both their own team and opponents, and operating within a specific space or multiple designated areas. The cumulative effect of these factors in quick succession can overwhelm an autistic person.





- Furthermore, the concept of winning and losing, although not to be entirely avoided, can be a difficult area to navigate. Invasive team games might be especially problematic for some autistic individuals, and they should not be compelled to engage in such activities.
- For recall, autistic individuals are more prone to being victims of violence rather than being the ones displaying aggressive behaviour (Holingue et al., 2021). As the autistic people victims of bullying and aggressions are a really frequent case, the coach has to take action against the violence. Including an autistic person in a sports group doesn't just mean behaving in a specific way towards that person, it really means changing the way the whole group is coached.

Building an inclusive team dynamic

	HPS:
	☐ Determine with the autistic person if he/she wants to talk about him/her diagnosis
Level 1	to the group and how he/she wants to do it (if he/she prefers that the coach talks
	about it instead of him/her, does he/she want to be present or not, etc.).
	☐ Involve the participants in the process of choosing a team name , this encourages a
	sense of ownership and unity within the group.
	Respect an individual's desire to spend time alone.
	☐ Demonstrating cooperative behaviour and working harmoniously with others can
	set a positive example for the participants.
	☐ Discourage comparisons between athletes.
	☐ Promote positive encouragement and celebration of both individual and team
	achievements.
	Remain vigilant for any signs of violence or bullying, addressing such behaviour
	promptly and firmly. Don't hesitate to intervene and reframe exclusionary actions or
	aggression, whether verbal or physical. Mockery should never be tolerated,
	regardless of its guise as "humour".
	that all participants have the opportunity to contribute to the team's success.
☐ Explicit	ly instruct athletes on effective teamwork strategies, emphasising the
importa	ance of working collectively towards a shared goal.
☐ Foster	cooperation and communication skills through group-based games and
exercise	es.
☐ Foster	connections by pairing athletes with similar abilities, interests, and
commu	nication styles.
☐ Educate	athletes on appropriate behavioural responses in challenging scenarios, such
as tellin	g them to demonstrate sportsmanship by recognizing opponents' successes and

handling defeat gracefully without arguing with referees.





	☐ Introduce a gradual integration method when involving participants in larger
	groups. You can for example initiate activities in a one-to-one setting, potentially
Level 3	with the aid of a support worker or assistant to ensure a comfortable transition.
	☐ Emphasise that each team member has their unique strengths and contributions ,
	fostering an environment free from unnecessary competition or comparisons.
	☐ Provide team t-shirts or jerseys to instil a sense of belonging and unity among the
	participants. It helps them feel like an integral part of the team.
	☐ Personal narratives can inspire and connect, emphasising the value of
	participation. So encourage participants to tell anecdotes about the place of sport
	in their lives.

About competitive sports:

When considering participation in sporting competitions, it's essential to recognize that **not all** autistic individuals may enjoy or excel in competitive settings. Factors such as physical limitations, emotional challenges, or difficulty coping with social and competitive pressures may impact their ability to engage in traditional competitive sports. Rather than excluding them from activities, it's important to explore alternative ways for them to participate without the pressure of competition.

For instance, if an autistic individual prefers not to compete, they could **still engage in training sessions** to benefit from physical activity and skill development. Additionally, if they wish to support the team without participating in competitions, they could **contribute to logistical tasks or provide assistance to teammates**, fostering a sense of inclusion and participation within the sports community. Ultimately, prioritising individual preferences and providing flexible options ensures that all individuals can enjoy the benefits of sports participation in a way that suits their unique needs and abilities.

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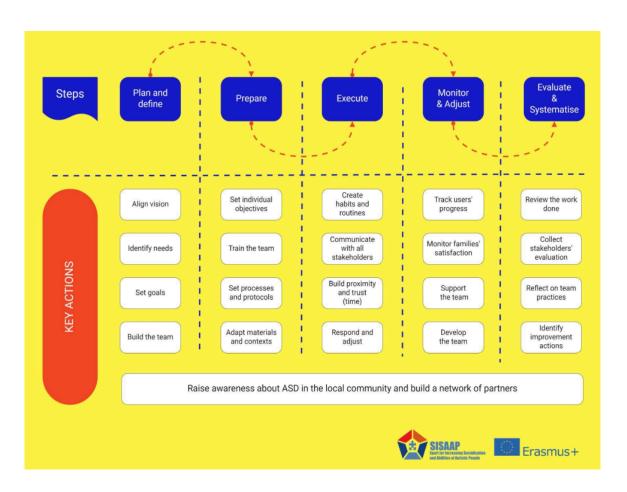


PART 4: ENHANCING SPORT FOR AUTISTIC PEOPLE: TIPS FOR SERVICE PROVIDERS

4.1 Guidelines and organisational strategies for establishing inclusive sports programs for autistic individuals

This section draws upon insights from "The Beginners Guide on Sport on the Spectrum", a handbook developed by the partners of the SISAAP project. While this serves as a summary, for more in-depth information, we encourage you to explore the full handbook of the SISAAP project.

According to the guide of the SISAAP project, to set up a sport programme for autistic people there are 5 steps:



Each step is composed of different key actions:





Step 1: Plan and define:

- 1. Needs' Analysis
 - Speak to all the relevant people: users, users' families, relevant stakeholders
 - Analyse the resources available both in the organisation and in the local community
 - Review the legal framework and the associated policies
- 2. Set goals
 - Define the professional profiles you are looking for
 - Identify the benefits of your initiative
- 3. Draft communication plan
 - Design an awareness raising campaign towards civil society
 - Involve users and reference persons
 - Involve media (Social networks, web, TV)
 - Improve communication
- 4. Prepare a budget
- 5. Build a Business Plan
 - Identify possible sources of income
 - Public funds
 - Private donations
 - o Sponsorships
 - Partnerships
 - Non-monetary contributions (equipment, infrastructures, etc)
- 6. Assign a team to the project (Human Resources)
 - Define the competences of the team (Skills, Knowledge, Attitudes)





Step 2: Prepare

- 1. Needs' Analysis
 - Stakeholders' needs' analysis
 - Structure individual objectives for each participant
- 2. Train the team
 - Professionals
 - Volunteers (short trainings and workshops)
 - Onboarding for newcomers
- 3. Create processes and protocols
 - organisation chart with clear roles and responsibilities
 - Have a specific methodology to progress gradually in the activities (propaedeutic)
 - Group protocol specific group/activity briefing
 - Team programme to monitor the team itself and the activities
- 4. Adapt materials and context
- 5. Communication and dissemination
 - Meet the family in the context
 - Offer trial lessons
 - Organise an "open day"
 - Name a communications manager to plan a communication strategy
 - Have an updated website / social media channels





Step 3: Execute

- 1. Coordination
 - Good coordination is key
 - A good team has experience, motivation and technical knowledge
 - Involve families at every step
 - Create opportunities for social gathering
- 2. Communication
 - Keep a smooth and continuous communication with everyone involved (partners, families, supporters, sponsors, etc.)
 - Promote project visibility (Media, TV, etc.) and dissemination
- 3. Deliver
 - Respect the timing of actions
 - Prepare different briefings for different users
 - Give a test run of the activity to the users
 - Respect the rules of your local/national administration
 - Monitor the activities constantly
 - Be flexible

Step 4: Monitor and Adjust

- 1. Users' progress and fulfilment
 - Basic observation of the skills that are targeted by the activities
 - Importance to set individual objectives for each participant to measure her/his progress
- 2. Family satisfaction
 - Simple satisfaction questionnaires
 - Involve and communicate frequently with families
- 3. Teamwork and team wellbeing





- Individual feedback from the leader every three months
- Questionnaires about the wellbeing of the team and activities
- Offer psychological supervision
- Expert or structured team meetings open to all topics
- Team-building activity twice a year (leaders, experts, staff, volunteers)
- Emphasise open communication in the team with the goal of having good feedback and adjust the programme
- Provide autism trainings with experts on Autism at least twice a year

Step 5: Evaluate and systematise

- 1. Review the work done
 - Assess the results achieved in light of the achieved objectives
 - Collect stakeholders' feedback:
 - Users
 - Users' families
 - Partner organisations
 - Sponsors
 - Identify adjustments and improvements needed
 - Celebrate the achievements as a team
- 2. Reflect on the work done
 - Focus on transversal competences and teamwork
 - Identify opportunities for individual and team training and development
 - Identify possible changes and innovation in team organisation and management
 - Identify improvements in the service
- 3. Plan the new initiative / Project
 - Include improvement actions into the design of the new project
 - Design a strategy to maintain the connection with stakeholders and keep the network alive





4.2 Find financial support for the programme



In France, there are various ways of **raising funds for a Sport and Autism project**. We advise you to **create a monitoring table** in which you put the links of the sites to be monitored. We advise you to keep an eye on:

Public funding:

- Departmental grants
- Regional grants
- National grants
- European grants

Private funding:

- Foundations, particularly company foundations
- Associations

There are a **number of sites that list existing grants** (public and private) and are very useful in helping you to keep an eye on them:

- Aides et territoires
- Subventions.fr
- Sport en commun
- Territoires solidaires
- Appelàprojets.org
- Etc.

To note: The above list is not exhaustive and includes sites used by the ASPTT.

For example, to finance its SOLIDARITÉ autisme by ASPTT programme, the ASPTT Fédération Omnisports has received grants from the Orange Foundation, the AG2R La Mondiale Foundation and the Fondation Initiative Autisme.

Finally, in parallel with the financial support, in France we advise you to make contact with the autism resource centres (CRA) of your region from the very start of your project. They are the key actors in the field of autism in France and can help you with your project. They are organised at regional level and work in coordination with professionals and autistic people.. You can find the contact for each region here.



In Italy, there is currently no aggregator for funds and financing dedicated to sports activities for autistic people. However, there are several annual project funding opportunities offered by private foundations and public entities that allow individuals to submit their sports project and receive





non-repayable funding, in addition to direct support from private families associations and volunteer organisations. We are not currently aware of specific websites that list existing contributions, except for some public administrations, such as the City of Rome, which lists agreements and available bonuses on their website to ensure disadvantaged citizens have access to sports activities.

Some of these include:

Public funding:

- National contributions
- Regional contributions
- City administrations

Private funding:

- Vodafone OSO, Ogni sport oltre
- Tim Foundation
- Baroni Foundation
- Con il Sud Foundation
- National and regional associations

It should be noted that these mentioned lists are not exhaustive and primarily include options, websites and funding used by SS Romulea. For example, in previous years, SS Romulea has used contributions provided by the Baroni Foundation to finance the implementation of the Autistic Football Club sports program and donation of a regional association of families of autistic people.

In Italy, the majority of sports programs and projects for autism are promoted by private associations, informal groups, or small local entities primarily funded by the registration fees of the athletes themselves and only to a small extent by public or private grants, with the support of local volunteers. There are still very few sports clubs that have developed specialised programs and made adjustments to their facilities, as they cannot benefit from direct support from the national government, local administrations, or large sports federations.

Finally, in addition to financial support, we recommend contacting the main private volunteer organisations promoting the rights of people on the autism spectrum in Italy with regional offices: **Gruppo Asperger**, **Angsa**, **Anffas**. They are key players in the field of autism in Italy and can support new projects on national and regional level, working in coordination with associations of professionals and individuals on the autism spectrum.

Here are the contacts for the national offices

- Gruppo Asperger onlus
- Angsa aps onlus
- ANFFAS ets-aps

To date, unfortunately, there are still few projects that involve autism and sports. However, thanks to the support of the Lega Calcio a 8 (8-a-side Football League) and the Lega Nazionale Dilettanti (National Amateur League) and in collaboration with other dedicated football organisations (Insuperabili, Meraki APS Empoli FS, Albano Primavera, SS Lazio, AS Roma FS Meta Coop), SS Romulea has managed to implement an ambitious project in the 2023/2024 sports season; an entire league and first championship dedicated to inclusive and integrated teams, with autistic and





not autistic players, with and without intellectual disabilities, the championship <u>Lega Calcio a 8</u> **Unica**.



In Croatia:

In Croatia most sports and autism sports programs and projects can be divided into two categories.

First category is programs that are developed and managed by NGO-os in the field of autism and are mostly funded by small grants from the local government, with the extensive support from the local volunteers and the community. In that regard, funding is a combination of small local grants, agreements for a free use of local sports facilities and smaller membership fees from sports practitioners and their families.

In the second category we put sports clubs that have developed specialised programs and have made adjustments to their facilities if needed. Sports clubs are eligible for some support from the national and local governments and the sports associations but most of their funding comes from membership fees.

For now there is no centralised website or government office that has extensive information on funding of sports and autism programs in Croatia.



In Portugal:

There are still not many projects that involve autism and sport. However, Inovar Autismo managed to implement a project in 2021, through a partnership with a Portuguese tennis club, which was funded by the <u>Portuguese Institute for Sport and Youth - IPDJ</u>, as part of a programme run by this institute called the <u>"National Sport for All Programme"</u>.

As far as the national theme is concerned, presenting project proposals to local councils, in particular to councillors responsible for sport and social rights, is not only a way of publicising the need for projects in the field of inclusive sport but also to find out about possible ways of requesting funding from local councils.

The legal nature is very important in Portugal: for example, a federation that wants to apply for funding from the "Sport for All Programme" mentioned above, must ensure that it meets the requirements of the beneficiaries of this source of funding, i.e. that is a federation with a public sporting utility. Another alternative is for sports clubs to look for associations that are developing programmes in the field of sport and inclusion. As long as these associations (such as Private Institutions of Social Solidarity - IPSS) are financed by funds that are looking for IPSS projects in the area of sports.





4.3 Which sports and how



This section will be available in the final version of the program.

4.4 Knowledge of staff members

This guide provides the **basic knowledge** needed to set up a sports activity accessible to autistic people. However, to enhance the quality of the offer and to facilitate the activity of the staff, it is important to **follow one or more training courses**.

Staff members should possess knowledge about autism, particularly understanding difficulties that environments generate and the kinds of support, changes and precautions that may be necessary. Supporting autistic individuals is a specialised role that can be challenging, and as such, staff members should receive thorough training and ongoing support. This training should cover essential areas such as (NAT, 2019):

- **Understanding** and empathising with the day-to-day needs of autistic people,
- **Practical communication techniques** for interacting with autistic individuals and supporting their communication,
- Assisting in decision-making with autistic individuals and promoting their autonomy,
- Recognising sensory needs and learning how to meet them effectively,
- Preparing and supporting autistic individuals in coping with change and transitions,
- Understanding, preventing, and responding to distress, including behaviours caused by challenging situations.

Compensation for their work should reflect the significance of their role (NAT, 2019).



In France:

In France, the <u>Autisme Info Service website</u> has a Training section which includes <u>professional training</u> courses as well as <u>free training courses</u>. We advise you to browse their website to find the training course that suits your profile and your needs, availability, prices, and so on.

We are placing particular emphasis on the **autism resource centres (CRA)**, which are the **key players in the field of autism in France**. They are organised at regional level and work in coordination with professionals, the people concerned, etc. They offer **training courses** and **E-learning tools**.



In Italy:

In Italy, there is the <u>Osservatorio Nazionale Autismo</u> (National Autism Observatory) that promotes training activities dedicated to professionals in the healthcare, social and educational sectors, and





collaborates with university institutions and professionals with documented experience in autism. It also has a platform dedicated to distance learning, **EDUISS** of the ISS, **Istituto Superiore di Sanità** (Higher Institute of Health). ISS publishes National Guidelines about autism with recommendations based on scientific evidence.

Additionally, almost all Italian public and private universities offer autism training courses, first and second level masters, conferences on specific topics, and study days with professionals from the international panorama. They also set up observation, research, and training laboratories on social and cognitive neuroscience. Similar trainings are organised by private volunteer organisations promoting the rights of people on the autism spectrum too.

Finally, <u>Edizioni Centro Studi Erickson</u>, a renowned publishing house and disability training centre in Italy, offers training and updating activities for teachers, school principals, pedagogues, professional educators, social workers, psychologists, psychotherapists, speech therapists, and other social and healthcare operators. They are accredited by the Ministry of Education, University and Research for school personnel training, by the Ministry of Health as an ECM (Continuing Education in Medicine) provider, and by the National Council of Social Workers (CNOAS).



In Portugal:

There are some resources such as a course <u>manual for sports coaches</u> drawn up by the Portuguese Federation of Sport for People with Disabilities available on the internet and in this case published by the Portuguese Institute for Sport and Youth, although it doesn't focus exclusively on autism. This manual includes tips such as: "See the person and not their disability"; "Listen to the athletes, as they are experts in their disability and know what the best adaptations are for you".

Concerning training, Inovar trained tennis coaches and the training modules were:

- Huma Rights, Disability and Inclusion a new approach;
- Barriers to participation and inclusion how to deal with them;
- Emotional Intelligence and Communication;
- Mediation for Inclusion;
- Autism.

These themes proved crucial for gaining a better understanding of autism and inclusion and, above all, for preparing the coaches to work with autistic people, since they realised the main characteristics, difficulties and strategies for including them. For their part, the coaches also helped the trainers realise what the main challenges are in the context of sports.



In EU in general:





<u>IPA. Autism - training for inclusion</u>: The IPA+ project has developed and trialled two online trainings to cover the educational requirements of professionals with different levels of experience and know-how:

- Module 1: Introduction
- Module 2: Definition and conceptualization of ASD & Aetiology of autism and associated conditions
- Module 3: Basic principles and strategies of intervention & Specific support and intervention programs
- Module 4: Intervention models of reference & Strategies to design and evaluate the Personal Development Plans
- Module 5: Specific knowledge of the concrete characteristics of each autistic people
- Module 6: Characteristics and needs in different contexts and stages of life
- Module 7: Competences and professional profile

<u>SISAAP</u> - The <u>beginners guide</u> on <u>Sport on the Spectrum</u>: This guide/handbook has been developed with an intention to provide an easy to use tool that can be a starting point for developing sports programs, showing some important steps and factors in this journey. In two years that this resource was developed we met to discuss our experiences in this field and to exchange ideas and knowledge.

We also invite you to discover the <u>analysis of existing sports programmes</u> drawn up as part of this project, so that you can find out more about existing sports models and the different learning methods that can be used with autistic people.





PART 5: EXPERIENCES FROM ORGANISATIONS THAT HAVE SUCCESSFULLY ESTABLISHED SPORTS ACTIVITIES FOR AUTISTIC PEOPLE

ASPTT Fédération Omnisports's experience (FSASPTT)



In 2016, one of the ASPTT's clubs, <u>ASPTT Montpellier</u> (200 volunteers and 25 employees) set up a sport project for the inclusion of autistic children. This project was born from an observation: **autistic children are excluded from sports** and **practising sport enables people to improve** their self-esteem, relationships with other people and the development of coordination and motor skills. Thereby, the <u>ASPTT club of Montpellier</u> created a **programme based on inclusion and on the 1 to 1 approach**: one autistic child is included to exercise in a group of neurotypical children with the support of an educator specialised in Adapted Physical Activity.

The <u>ASPTT club of Montpellier</u> developed this project with the financial support of a corporate foundation: <u>the Fondation Orange</u>. Quickly, in the same year, the <u>ASPTT Federation Omnisports</u> (<u>FSASPTT</u>) signed a convention with the French National Olympic and Sports Committee (CNOSF) and the <u>Orange Foundation</u> to share this pilot project in other ASPTT clubs around France, allowing autistic children to exercise with neurotypical children. It's the start of the programme <u>SOLIDARITE autisme by ASPTT</u>. In 2024, this programme is available in **20 ASPTT clubs** around France, which represents **175 children** (versus 27 in 2016). <u>ASPTT Brest</u> also shares this programme **in Africa** (Dakar, Cape Verde, Gambia and Morocco), thus allowing more than a hundred autistic people to play inclusive sport.

To diffuse the programme, the ASPTT Fédération Omnisports (FSASPTT) financed the ASPTT clubs. For that, the FSASPTT searches for grants. Some structures have helped us to finance this programme, for example: the Foundation AG2R la Mondiale, the Orange Foundation etc. The ASPTT Fédération Omnisports also helps the clubs to set up the project with different tools.

To summarise, the ASPTT club must be voluntary to set up the programme. The project has to be validated during the club management committee. Upon validation, an Adapted Physical Activity educator is hired. There are two possibilities: either work with an educator of the club who already has this qualification and in this case there is an adaptation of their employment contract, or to employ an educator with the support of the Profession Sport and Leisure federation or the French society of professionals in adapted physical activity. It's also possible to obtain support from the State by the intermediary of an Employment support contract (Contrat d'Accompagnement à l'Emploi, CUI-CAE). Then, the educator employed and the project manager are trained by the ASPTT Fédération Omnisports (FSASPTT). We recommend a basic training in autism for the educational team and a more specific training for the supervisor who will welcome the child in its group.





The success of this program is also due to the tools made available by the ASPTT Fédération Omnisports (FSASPTT). Some of the tools are available in.

Website: https://asptt.com/
Email: contact@asptt.com

SS Romulea - Romulea Autistic Football Club's experience - Italy (SSR)



The team was originally founded during the World Autism Awareness Day (WAAD) tournament in 2015 with the support of:

- <u>Gruppo Asperger Lazio</u> (volunteer organisation of families and persons on the autism spectrum)
- Giuliaparla onlus (cooperative providing services)
- Cooperativa Garibaldi (a cooperative of workers on the autism spectrum)

We created the Autistic Football Club because despite the existence of several important football and disability-related sporting events many exclude much of the autism spectrum:

- Paralympic Games: football is for blind or players with cerebral palsy.
- Special Olympics: Intellectual disability requirement.
- Special federations of integrated football teams: with modified FIFA rules that are not fully inclusive and intellectual disability requirements.

We know that only one third of people on the autism spectrum have an intellectual disability. Even players on the autism spectrum without an intellectual disability face difficulties in inclusion and sports practice.

In 2018, the Autistic Football Club became an official team of <u>SS Romulea</u> (SSR), which is a historic Italian football club, founded in 1922, for all youth categories accompanying them into professional football.

SSR now fosters social inclusion through sport at four levels:

- 1. Through the Romulea Autistic Football Club where 2/3 of players are young adults and adults on the autism spectrum who play in ordinary championships together with other players, who also have additional support functions: volunteer educators, parents and friends.
- 2. Children on the autism spectrum are playing in the mainstream football teams of SSR, including the summer camp, in the context of "Elite Football School", collaborating with the cooperative of professionals Giuliaparla.
- 3. Players on the autism spectrum included in Romulea eSports: electronic sports practised at a competitive and organised level (the new Olympic discipline), collaborating with MCES Academy Roma;
- 4. A traineeship for workers on the autism spectrum as part of our staff.





At SSR, inclusive football aims to improve social inclusion and psycho-motor skills through a structured sports activity, tailoring interventions to the characteristics and needs of each individual, including motor profiles, while fostering inclusive social interactions and events.

The game is inclusive because it strictly adopts FIFA rules, unlike other special projects that modify the rules of the game and are limited to a separate special sport context, involving only special teams (the so-called integrated football). In contrast, in inclusive football all players have to follow the same rules of the game and play a genuine competitive game against any team, but teammates help each other to understand and follow the rules of the game, as well as social rules.

The captain of Romulea Autistic Football Club, Pietro Cirrincione, says: "In my life I practised sport since childhood, but always facing difficulties of accessibility and inclusion, now I can finally play sport removing all barriers and with the feeling of being at ease, enjoying to be a part of a social context".

Website: https://autisticfootball.club/en/ Email: calcioinclusivo@ssromulea.it

Feedback from some coaches

During the construction of this guide, it was possible to contact some coaches of autistic people and gather some testimonies.

One tennis coach, who already has experience working with autistic youngsters, pointed out that in the beginning he experienced some difficulties: "I began to feel that although the students were prepared to integrate the autistic student into the lessons and help him as much as possible, as time went by, they themselves also began to get a little tired of having to wait a long time, in other words, they felt that they were being harmed by the fact that the lesson couldn't have a 'normal' dynamic, like the others, when the autistic colleague was there. I began to feel this difficulty over time".

Despite this difficulty, he recognises that in the case of one youngster he worked with as part of an Inovar Autismo project, there was progress when the training was one-to-one: "(...) in a more individual context of one-to-one work, this doesn't happen any more, it's closer work, you notice faster progress". However, autism is a spectrum and what works for one youngster is different for others, as was the case with two autistic youngsters who preferred to train together: "(...) they started off individually and then ended up working together (...). They had more or less the same 'limitations' for practice and had similar needs in terms of what the development of the practice would be. I ended up putting them together and it worked out very well! (...) when one of them couldn't go and only the other one went, it was much more difficult without the colleague. They wanted to do it with their colleague (...)".

In the case of the surf instructor, knowledge about the person is a key skill when training autistic people: "(...) we have a few tips that we learnt from Inovar as well, but it's very much a matter of 'getting to know them', seeing how they react to this or that and understanding how we can deal with each of them, because each of them has their own characteristics and each has their own way of dealing with people."

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For a handball and swimming coach, his advice to other coaches is to look at the person regardless of whether they are autistic or not, as reflected in the following words: "I don't care about any of that. I'm only interested in two things: realising what limitations he has and what potential he has. In other words, the limitations... I can try to go there to see if it's possible to 'move' anything; if I realise that it's not possible to 'move', forget it. And the abilities he has, I'll try to make the most of them".





CONCLUSION AND RESOURCES

Conclusion

Autistic individuals often face unique challenges and barriers when it comes to engaging in sports and physical activities. These challenges can range from a lack of understanding about autism to communication barriers and the absence of tailored sports programs. Recognizing and addressing these obstacles is vital to fostering an inclusive and supportive sports environment for autistic individuals.

The pivotal role played by coaches and sports program leaders cannot be overstated in shaping positive experiences for autistic athletes. This guide offers practical insights and strategies, highlighting best practices to empower coaches and leaders in effectively supporting autistic participants. By educating coaches, sports organisations, and community members, we can create an environment that celebrates diversity and ensures equal opportunities for all.

Adaptations within sports programs are essential to ensure that autistic athletes feel welcomed and accommodated according to their unique needs and preferences. Whether it involves adapting communication methods, modifying the environment, or implementing personalised training approaches, these adjustments contribute to a more inclusive sports culture.

Furthermore, this guide serves as a roadmap for developing new sports initiatives tailored to the specific requirements of autistic individuals. We envision its utility as a valuable resource for cultivating nurturing sports environments where every participant, including those on the autism spectrum, can thrive and fully enjoy the benefits of sports.

This document is a version 1.2, and this concluding section will therefore be reworked in future versions. Nevertheless, we hope that the final version of this programme will encourage organisations to take their first steps in developing new and innovative sports programmes for autistic people, and will encourage people on the autism spectrum to participate. A wide range of resources were used to create this guide, which can be found in the bibliography and appendices.

Resources

A) Internal tools

Tools Sacree:

- Analysis of existing sport programmes
- Guide to choose the appropriate activity (available in appendix)
- Sport Preference Questionnaire for Autistic Individuals (available in appendix)
- Sacree website
- Literature review being submitted to a scientific journal (to come)
- Sheet: Misconceptions about autism (available in appendix)
- Sheet: What is the autism spectrum (available in appendix)





Tool developed by SUZAH and its partners:

- Handbook SISAAP

Tool developed by Inovar Autismo and its partners:

- European Guide for the inclusion of persons on the autism spectrum.

Tools created and used by the ASPTT Fédération Omnisports (FSASPTT) available in appendix:

- Sheet n°1: First contact
- Sheet n°2: General presentation of the child
- Sheet n°3: Motor skills
- Sheet n°4: Evaluation of the session
- Sheet n°5: End of season update

B) External tools

- Pictograms: https://arasaac.org/pictograms/search. To use the pictograms, respect the condition of use, notably the logo of ARASAAC and the citation: The pictographic symbols used are the property of the Government of Aragon and were created by Sergio Palao for ARASAAC (http://www.arasaac.org), which distributes them under a Creative Commons BY-NC-SA Licence.
- See below in our **bibliography** and **list of website links the sources used to write this programme**.





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APPENDIX - Sacree guide for professionals:

- Appendix 1: Sheet misconceptions about autism
- Appendix 2: Sheet what is the autism spectrum
- Appendix 3: Sheet 1 to 5 developed and used by the ASPTT
- Appendix 4: Sport Preference Questionnaire for Autistic Individuals
 - Appendix 5: Guide to choose the appropriate sports activity





APPENDIX 1- Sheet misconceptions about autism





MISCONCEPTIONS ABOUT AUTISM

- Autism is not a disease, it's a neurodevelopmental condition. Unlike a disease, autism cannot be transmitted or cured, but there are ways to improve quality of life and manage certain challenging aspects of this condition.
- There is no causal link between styles of parenting and the development of autism. The causes of autism are genetic and environmental. Not all autistic individuals have an intellectual disability, and conversely, not all individuals with an intellectual disability are autistic.
- Autistic individuals may experience **crises**, which **are not acts of caprice** but often their way of expressing discomfort in response to overwhelming situations.
- Just because an autistic person is non-speaking does not imply a lack of intelligence or the inability to communicate.
- While autism may impact learning, it is not synonymous with a learning disability.
- No sport is off-limits for autistic individuals, although each sport offers specific benefits and may require adaptations. The suitability of an activity varies from person to person.





APPENDIX 2 - Sheet what is the autism spectrum





WHAT IS THE AUTISM SPECTRUM

- Autism is a **spectrum condition**: while common characteristics are shared among autistic individuals, each person's experience is unique. They may have a wide **variety of support needs in different areas such as communication**, **executive functions**, **social interaction**, **sensory processing and perception**, etc. There is not just one way for a person to be autistic.
- Autism can be associated with other disabilities and conditions that require consideration, including but not limited to: attention deficit hyperactivity disorder (ADHD), Down syndrome, epilepsy, Rett syndrome, tuberous sclerosis, anxiety, digestive disorders, sleep disorders, intellectual disabilities, learning disability, being overweight, Tics, OCD (Obsessive compulsive disorder), schizophrenia, immunological problems (asthma, diabetes type 1, urticaria, etc).
- Executive functions challenges, which involve planning, behaviour control, and adapting to social situations, can present in various forms, including difficulties in information processing, attention, and emotional regulation (van der Gaag, 2017).
- Autistic individuals may **need adjustments** in their living, learning, and working environments to accommodate their unique differences.
- -"Stimming", or self-stimulating behaviours, are common among autistic individuals and serve as a means of calming or concentration. Stimming is a natural form of self-regulation, involving repetitive body movements or vocalisations, which can increase during stressful periods (Kapp et al., 2019).
- When autistic people feel completely overwhelmed, they may experience a **meltdown**. This can involve verbal outbursts like shouting or crying, physical actions such as kicking or hitting, or withdrawing and shutting down completely, known as a "shutdown". It's important to distinguish meltdowns and shutdowns from tantrums or deliberate anger, as they are involuntary responses and not motivated by a desire to achieve or avoid something. The way these reactions manifest and the solutions to help vary greatly from person to person.
- All autistic individuals can derive similar benefits from sports, even those requiring significant support and attention.





APPENDIX 3 - Sheets developed and used by the ASPTT:

- Sheet n°1: First contact
- Sheet n°2: General presentation of the child
 - Sheet n°3: Motor skills
 - Sheet n°4: Evaluation of the session
 - Sheet n°5: End of season update



Fiche 1: First contact

Name and su			
Chosen activ	ity:		
☐ Kidisport Other:	_	g 🗆 Babysport	
		activity (several po	



Fiche 2: General presentation of the child

My name is:	ү	ear of birth :
My mother:		/
My dad:		
My brothers and sisters:		
In case of emergency:		
riione number		
	Host structure	
Type (Sessad, Ulis, MPEA, CAMPS, IME)		
Name of the structure		
Name and contact		
details of the referent		
	Follow up of the child	
	-	Contact dataile
	Name and surname	Contact details
Psychomotrician		
Psychologist		
Neurologist		
Neurologist Occupational therapist		
Occupational		
Occupational therapist		
Occupational therapist Speech therapist		
Occupational therapist Speech therapist Physiotherapist		
Occupational therapist Speech therapist Physiotherapist Others, specify:	sis of the child::	
Occupational therapist Speech therapist Physiotherapist Others, specify:	sis of the child: :	



Fiche 2: General presentation of the child

Mode of communication with the child: ☐ FSL ☐ PECS ☐ MAKATON ☐ Personal mode ☐ No or little communication □ Tablet ☐ Written Others, specify:..... The child's mode of expression: □ Words ☐ Sentences ☐ Sounds ☐ Cry ☐ Gestures ☐ Pointed ☐ PECS workbook Others, specify:..... **Sensory considerations:** ☐ Hypo sensitivities ☐ Hearing ☐ Visual ☐ Gustative ☐ Hypersensitivities ☐ Epidermic □Vestibular ☐ Search for sensory sensations:..... Relationship with others (Physical, sensory and social interaction): ☐ Avoid contact ☐ Doesn't know how to deal with peers ☐ Physical contact ☐ Search the contact ☐ Imitation of possible peers **How I manifest my desires:** CLEANLINESS (autonomy) **FEAR HUNGER** (particularity) **PAIN** COLD **FATIGUE** (sleep well at night) **THIRST How I manifest my emotions:** IOY **SATISFACTION DISAPPOINTMENT SADNESS ANGER FRUSTRATION** Others important informations to communicate to us (allergy, phobia):



Fiche 3: Motor skills

Knowledge of the body: Does your child know where they are?					
☐ Head	□ Hair	□Eyes	□ Ears	□ Nose	\square Mouth
☐ Arms	☐ Hands	□Belly	□Back	□ Legs	□ Feet
Physical ski	lls: Does your o	child know how to	?		
out the arms	□ Bending th	_	Opening/closing thing out the legs wall)		☐ Stretching g the legs
Motor deve	lopment:				
\square Good	□ Ме	edium	□To develo	р 🗆	Hypotonic
Additional i	nformation:				
	I like			I don't like	
-			-		
-			-		
-	l know		- - -	l don't know	ı
- - -	I know		- - -	l don't know	1
- - - -	l know		- - - - -	l don't know	ı
	crisis what ar		or strategies wh		
child? (exan	crisis what ar nple: a song, a	nursery rhyme	- - - or strategies wh	ich permit t	o calm your
child? (exan	crisis what ar nple: a song, a	nursery rhyme	or strategies wh	ich permit t	o calm your
child? (exan	crisis what ar nple: a song, a	nursery rhyme	or strategies wh	ich permit t	o calm your
child? (exan	crisis what ar nple: a song, a	nursery rhyme	or strategies wh	ich permit t	o calm your



SHEET 4: EVALUATION OF THE SESSION

Date:	
Supervisor(s):	
Surname and first name of child:	
Activity practised:	
Child behaviour :	
☐ Enthusiast ☐ Cooperative ☐ Tired	☐ Refuses to practice
Comment:	
Control of emotion:	
☐ No control, sharp, impulsive reactions	☐ Good control
☐ Low/Medium control, comments taken	into account 🛘 Full control
Comment:	
Relationships with others:	
\square No or few relationships	☐ Relations conflictuelles
☐ Relation exclusive avec l'adulte	☐ Confiante (coopération et échanges)
Comment:	
Understanding instructions:	
\Box Does not understand \Box To be devel	oped Good
Comment :	
Axis of work:	



Report on the Sports Years and the relationship with others

Surname and first name of	child:		
Activity chosen:			
☐ Kidisport ☐ Swimr Other:	ming □ Babyspo	rt [
Practice day:			
☐ Monday ☐ Tuesday ☐ Saturday	□ Wednesday	□ Thursday	□ Friday
Regular attendance:			
□ Yes □ No			
1st year			
Balance			
Jump			
Catch			
Launch			
Opposition			
Move			
Flotation			
Jump			
Immersion			
Breath			
Beat Leg to wall			
Recap			
Recommandation			
Integration			

2 nd year	
Balance	
Jump	
Catch	
Launch	
Opposition	
Move	
Flotation	
Jump	
Immersion	
Breath	
Beat Leg to wall	
Recap	
Recommandation	
Integration	
3 rd year	
Balance	
Jump	
Catch	
Launch	
Opposition	
Move	
Flotation	
Jump	
Immersion	
Breath	
Beat Leg to wall	

Recap	
Recommandation	
Integration	





APPENDIX 4 - Sport Preference Questionnaire for Autistic Individuals





Sport Preference Questionnaire for Autistic Individuals

This questionnaire is all **about you and your personal preferences** when it comes to sports and physical activities. There are no right or wrong answers, so please answer honestly based on what you enjoy and feel comfortable with.

By completing this questionnaire, you'll gain valuable insights into the types of sports that best suit your needs and interests. Whether you're looking for a team sport, individual activity, or something in between, this questionnaire will help guide you in the right direction.

After completing this questionnaire, we invite you to explore our "Guide to Making the Right Choice". This resource is designed to help you discover the sport that best aligns with your preferences and interests.

1.	What types of physical activities do you enjoy participating in? Team sports (e.g., soccer, basketball, volleyball)
	☐ Individual sports (e.g., swimming, running, cycling)
	☐ Martial arts (e.g., karate, taekwondo)
	☐ Gymnastics or dance
	Outdoor activities (e.g., hiking, rock climbing, kayaking)
	Other (please specify):
2.	Are there any sports or physical activities you have tried in the past and enjoyed? Yes
	□ No
	☐ If yes, please list:
3.	Do you prefer team sports, individual sports, or activities that can be done alone? Team sports
	☐ Individual sports
	☐ Activities that can be done alone





	☐ No preference
4.	Are there any specific sports or activities you have always wanted to try? Yes
	□ No
	☐ If yes, please list:
5.	How do you feel about competitive sports versus non-competitive activities? Prefer competitive sports
	☐ Prefer non-competitive activities
	☐ No preference
6.	Do you have any physical limitations or health concerns that may affect your choice of sport? Yes (please specify):
	□ No
7.	Are there any sensory sensitivities or preferences that should be considered when choosing a sport? \[\text{Yes (please specify):} \]
	□ No
8.	Do you prefer sports or activities that involve structured routines and rules, or ones that allow for more flexibility and creativity? Prefer structured routines and rules
	☐ Prefer flexibility and creativity
	☐ No preference
9.	Are you interested in learning new skills and techniques, or do you prefer activities that are more familiar and comfortable? ☐ Interested in learning new skills
	Prefer activities that are familiar and comfortable





	☐ No preference
10.	Do you have any preferences regarding the environment where the sport is played (indoors/outdoors, noisy/quiet, crowded/uncrowded)? Circle what you prefer. Indoors/outdoors
	☐ Noisy/quiet
	☐ Crowded/uncrowded
	☐ No preference
11.	How do you feel about social interaction during sports activities? Do you prefer working independently or interacting with others? □ Prefer working independently
	☐ Prefer interacting with others
	☐ No preference
12.	Are there any specific goals or outcomes you hope to achieve through participating in sports or physical activities? Yes (please specify): No
13.	How do you typically cope with stress or anxiety? Are there any sports or activities that help you feel calm and relaxed? Yes (please specify): No
14.	Do you have any preferences regarding the duration and intensity of physical activity sessions? Circle what you prefer. Short duration, low intensity Long duration, high intensity No preference

15. Are there any logistical considerations (such as transportation, cost, or scheduling) that may impact your ability to participate in certain sports or activities?





Yes (please specify): _	
No	





APPENDIX 5 - Guide to choose the appropriate sports activity

A GUIDE TO THE RIGHT CHOICE

Appendix to the Sacree model









Disclaimer:

Funded by the European Union. Views and opinions expressed are however those of the author(s) only and do not necessarily reflect those of the European Union or the European Education and Culture Executive Agency (EACEA). Neither the European Union nor EACEA can be held responsible for them.

This guide, attached to the project Sacree, aims to provide a simple tool for parents, siblings, coaches, autistic persons, to select the best activity that suits them.

Because there is no universal recipe to find the sport activity that would make you enjoy practicing, here are some tips on which criteria to focus on.

How to read the directory?

The directory is based on the classification of sports on two (or three) categories of criteria.

CHARACTERISTICS OF THE ACTIVITY

INDOOR OUTDOOR	Does the activity is mostly played outside (e.g. natural environment) or inside (e.g. gymnasium)
TEAM INDIVIDUAL	Whether the activity is a team or an individual sport
TOOL FREE HAND	If the activity involves to manipulate a tool during the whole activity (e.g. a racket), or ponctually (e.g. a ball)
FACE-TO-FACE OPPOSITION	If the activity involves a direct confrontation to any/several oponents
CONTACT	The degree of which the activity involves to get in contact with partners/opponents
OPEN CLOSED	Open practices: high levels of uncertainty, regarding the environment and/or the type of actions to perform. Closed activities: participants develop their skills within a very stable environment designed for their sport.

How to read the directory?

The directory is based on the classification of sports on two (or three) categories of criteria.

SPECIFIC NEEDS

Motor	The degree of fine motor skills the player has to manage. Temporal pressure, the manipulation of tools, the open aspect, are criteria
Sensory	The degree of sensorial informations (mostly tactile) that participants has to tolerate. Contact with other participants is one of the main criteria.
Cognitive	The complexity and number of informations that participants have to manage at the same time. The complexity of decision-making process.
Psychology	Presence of stressfull and anxiety-generating situations. Presence of a score, a direct confrontation to any or several opponent, risk of fall, are one of the main criteria.
Adaptability	The degree of uncertainty regarding the progress of the activity, that requires high adaptation/flexibility skills. Temporal pressure, associated to the open-skills aspect, are ones of the main criteria.
Social aspects	The degree of interactions with partner and/or opponents, which require communication skills.

How to read the directory?

The directory is based on the classification of sports on two categories of criteria.

PERSONNAL PREFERENCE

Personnal preferency

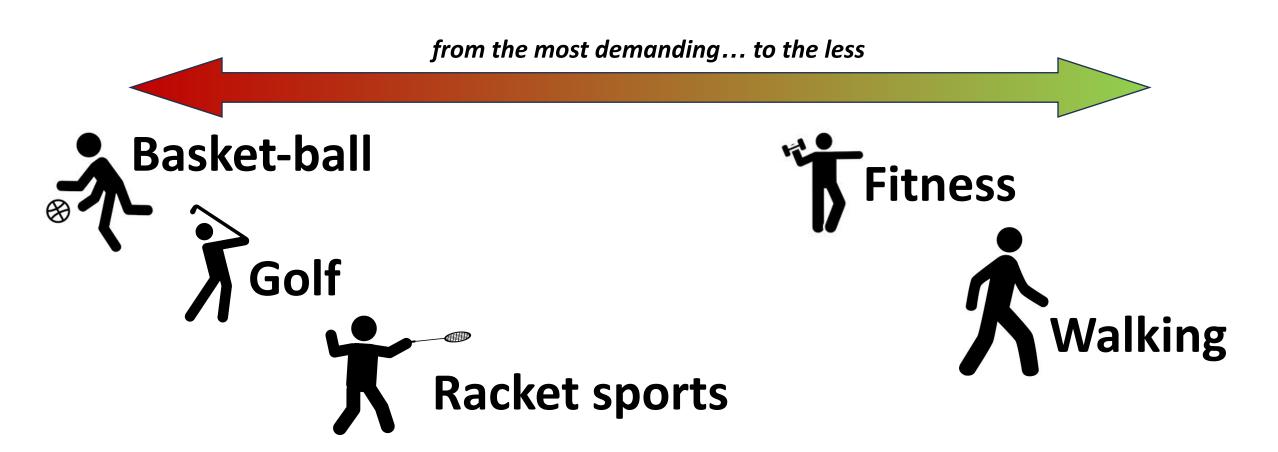
☐ Since of the main criteria is, ultimately, that the participant has a personnal attraction toward an activity, this is one of the main criteria. Fullfill the column with you own notations, from — (I don't like it a all), to +++ (I love it)

	CHARACTERISTICS						SPECIFIC NEEDS						Fullfill it yourself
SPORT	INDOOR OUTDOOR	TEAM INDIVIDUAL	TOOL FREE HAND	FACE-TO-FACE OPPOSITION	CONTACT	OPEN CLOSED	Motor	Sensory	Cognitive	Psychology	Adaptability	Social aspects	Personnal preferency
SWIMMING	INDOOR	INDIV	FREE	NO	-	CLOSED	+++	++	+	+	+	+	
ARCHERY	BOTH	INDIV	TOOL	NO	-	CLOSED	++++	+	++	++	+	+	
BADMINTON	INDOOR	BOTH	TOOL	YES	-	OPEN+	+++	+	+++	++	+++	++	
BASKET-BALL	INDOOR	TEAM	BOTH	YES	+	OPEN+	++++	++	+++	+++	+++	+++	
CYCLING	OUTDOOR	INDIV	TOOL	NO	-	OPEN	++	+	+	+	++	++	
BOXE	INDOOR	INDIV	TOOL	YES	++	OPEN+	++	+++	+++	+++	+++	++	
CLIMBING	BOTH	INDIV	BOTH	NO	-	OPEN	+++	+	++	+++	++	++	
DANSE	INDOOR	BOTH	FREE	NO	+	CLOSED	++	+	+	+	+	++	
FENCING	INDOOR	INDIV	TOOL	YES	+	OPEN+	++++	++	+++	++	+++	++	
FITNESS	INDOOR	INDIV	FREE	NO	-	CLOSED	+	+	+	+	+	+	
GOLF	OUTDOOR	INDIV	TOOL	NO	-	CLOSED	+++	+	+	+	+	+	
GYMNASTICS	INDOOR	INDIV	FREE	NO	-	CLOSED	+++	+	+	++	+	+	
HANDBALL	INDOOR	TEAM	BOTH	YES	+	OPEN+	++	++	+++	+++	+++	+++	
HORSE RIDING	OUTDOOR	INDIV	TOOL	NO	-	OPEN	+	+++	+	++	++	++	
MARTIAL ART	INDOOR	INDIV	BOTH	YES	++	OPEN+	+	+++	++	+++	+++	+++	
PARKOUR	BOTH	INDIV	FREE	NO	-	OPEN	+++	+	++	+++	+++	+	
RUGBY	OUTDOOR	TEAM	BOTH	YES	++	OPEN+	+++	+++	+++	+++	+++	+++	
RUNNING	OUTDOOR	INDIV	FREE	NO	#K	OPEN	+	+	+	+	+	+	
SOCCER	OUTDOOR	TEAM	BOTH	YES	+	OPEN+	+++	++	+++	++	+++	+++	
SURF	OUTDOOR	INDIV	TOOL	NO	-	OPEN	+++	++	+	++	++	+	
TABLE TENNIS	INDOOR	BOTH	TOOL	YES	_	OPEN+	+++	+	+++	+	+++	++	
TENNIS	BOTH	ВОТН	TOOL	YES	-	OPEN+	+++	+	+++	+	+++	++	
TRACK AND FIELD	ВОТН	INDIV	BOTH	NO	-	CLOSED	+	+	+	+	+	+	
VOLLEYBALL	INDOOR	TEAM	BOTH	YES	+	OPEN+	+++	+	+++	++	+++	+++	
WALKING	OUTDOOR	INDIV	FREE	NO	_	CLOSED	+	+	+	+	+	+	
YOGA	INDOOR	INDIV	FREE	NO	-	CLOSED	+	+	+	+	+	+	

EXAMPLES

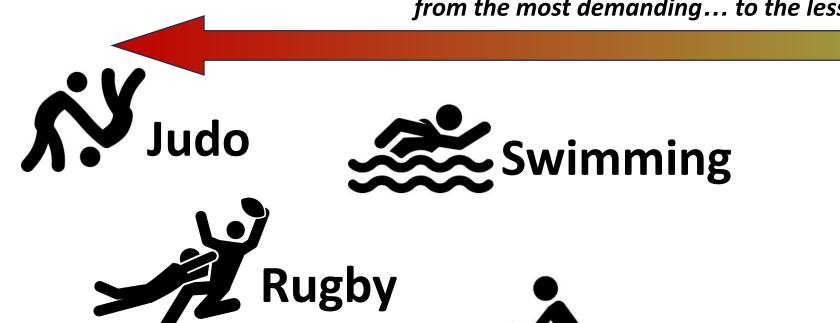
In the next part please find some examples to illustrate the different continuums that exist between activities, regarding the specific needs of autistic persons.

MOTOR CONTEXT



SENSORY CONTEXT

from the most demanding... to the less







COGNITIVE CONTEXT

from the most demanding... to the less

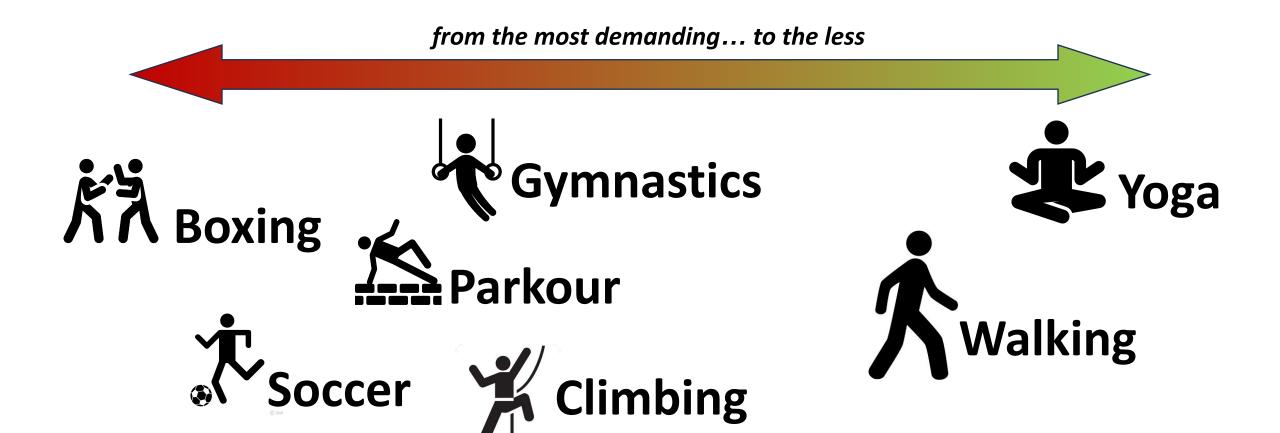








PSYCHOLOGICAL CONTEXT



SOCIAL CONTEXT

from the most demanding... to the less











ADAPTABILITY CONTEXT

from the most demanding... to the less





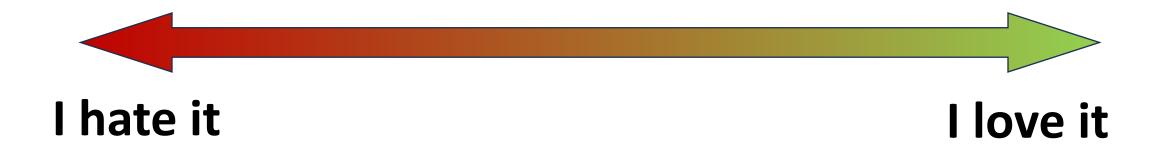








PERSONAL CONTEXT



Personal preference 😂