Motor Practice as a Means of Developing Psychosocial Skills for The Integration and Cooperation of Autistic Children in Tunisia

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Abstract:

Learning is based on the establishment of routines and repetitions, but also by the introduction of variations within these routines. Nevertheless, it happens that despite the respect of all these principles the child does not progress. In this case, this model established a decision tree, a hierarchy of measures to be implemented according to the situations. Our research that allowed us to answer some questions concerning the notion of skills development and the difficulties of interaction with autistic children Our research is carried out on the basis of a bibliographic research, a pre-survey and observations noticed in the field and the practice of motor activity for autistic children the interaction difficulties encountered, Autism is a complex disorder, treated this problem it is both started to discuss autistic symptoms like contact disorder and social interactions, communication and language and behaviors, and many others. It requires adequate multidisciplinary care for autistic children throughout their lives. Until today, professionals have still not been able to find triggered causes of this pathology. With this in mind, activities will be developed in close collaboration with national, regional and local stakeholders. A team will be made up of different people who can bring experience in the field sought. For the relationship of the body to the social environment.

Keywords: Motor practice, psychosocial skills, cooperation, integration, autism.

INTRODUCTION

Many controversies exist around autism. For several years It was in 1911 that the Swiss Eugen Bleurer used the term "autistic" for the first time. Derived from the Greek "autos" which means "self", it is in describing the symptoms of schizophrenia that he uses this term to describe their isolation, their social withdrawal and their cut off from reality. For this reason, "autistics", in the sense of the symptom of withdrawal into oneself, and not in the sense of the autism disorder we know today, were labeled as schizophrenic or psychotic, and by the same token, were left abandoned in psychiatric hospitals. Autistic disorder. Autism spectrum disorder is a complex developmental impairment that usually occurs during the first three years of life as a result of a neurological disorder that affects brain function; Or levels of education An autistic child has difficulty communicating their thoughts and desires to those around them, and they try to communicate with their environment, but they are often not proficient in the proper use of language or the use of language alternatives such as hand movements and facial expressions, which often does not. Attempts to intervene in therapeutic programs by implementing training or teaching methods for the skills of autistic children are a way to provide them with a new linguistic outcome that helps them learn other forms of communication, as well as to help them learn certain patterns of behavior and skills that reduce their behavioral and language disorders. The childhood play activity is a very important educational means that works to shape the child

at this critical stage of human development. The importance of play is not only due to the long period of play spent by the child; it also contributes to an important role in the psychological and social composition of the child and lies in the foundations of the activity that control the student in his school life. The child begins to satisfy his needs through play" Where the child opens the dimensions of the social relations that exist between people and realizes that contributing to any activity requires that the person knows his rights and duties. Attempts to intervene in therapeutic programs by implementing training or teaching methods for the skills of autistic children are a way to provide them with a new linguistic outcome that helps them learn other forms of communication, as well as to help them learn certain patterns of behavior and skills that reduce their behavioral and language disorders. The childhood play activity is a very important educational means that works to shape the child at this critical stage of human development. The importance of play is not only due to the long period of play spent by the child; it also contributes to an important role in the psychological and social composition of the child and lies in the foundations of the activity that control the student in his school life. The child begins to satisfy his needs through play" Where the child opens the dimensions of the social relations that exist between people and realizes that contributing to any activity requires that the person knows his rights and duties. Research and studies highlight the importance of play and its role in the educational process in kindergartens. Play is the basis for the formation of creation, motivations and the dwelling of the child on a healthy collective life, without playing independently, play is the first school that teaches the child self-control, sincerity and honesty; and how to deal with others. Plan programs of activities that give children great importance and must be organized in such a way that they depend on the child and take him as the main objective of the educational process » Where the teacher at this stage adapts the knowledge according to the concerns and needs of the child within the framework of a plan in which all educational procedures and organizations for the activity are integrated so that the child acquires the required experience as an entry point to learn facts and behavioural skills. Thanks to the basic motor skills acquired by the child in the curricula, movement is strengthened and facilitated and straightened, making it part of his personality and often uses them in his environment and environment to gain a lot of knowledge and experience that benefits other aspects of his development as well as his physical and motor development; In the learning environment, by teaching basic motor skills with their transitional movements, control movements, control and stability and balance movements of the body, the child can perform more of these movements in various forms and patterns. Thanks to the above and within the limits of the knowledge of our research, there was a rarity in scientific studies that dealt with the use of play activities in the development of certain basic motor skills for autistic children, which caused motivation to work to identify its impact in learning certain basic motor skills in autistic children. Parasto Shahidan Akbar, Firozeh Ordooi Azar (2018) entitled "The impact of motor sensory training on the motor development of a child with high-function autistic disorder (HFD)". The objective of this study is to explore the impact of the driving experience with high-performance autistic disorder. Post-test by a set of Bruininks and Ozertesky tests. A session intervention movement was performed for 16 sessions for these girls. A K-S test was used to determine the distribution of the data. The results of the exercises. The results showed that the motor cognition training program had a significant impact on the development of agility, running, balance, double-sided coordination and strength in children (0.05 > P). But in precise measurements, including speed response and visual and motor control, the speed and agility of the upper limbs did not have a significant impact (0.05< P). According to these results, it can be said that the training program can be used to improve the basic skills of children with Hevo's disease. G et al (2018) entitled "The effectiveness of multisystem hydrotherapy in children with autism spectrum disorders" to measure the effectiveness of multisystem hydrotherapy in

behaviours, emotions, social interactions and swimming skills in children with autism spectrum disorders; Multi-system hydrotherapy is divided into three stages (emotional adjustment adaptation to swimming - social integration) and is applied for 10 months. Applied to the experimental group, the results showed a clear and tangible improvement in functional adjustment skills on the Finnish scale of adaptive behaviour. Children's scores also improve the dimensions of emotional responses and respond to changes in the measurement of autism in childhood CARS. There has also been a marked improvement in the swimming skills of the experimental group. The study showed that multi-system hydrotherapy may be useful for the multiple difficulties faced by autistic children compared to swimming training alone. Ketcheson L et al study entitled "The Impact of Early Intervention in Motor Skills on Motor Skills, Physical Activity Levels and Socialization in Young Children with Autism Spectrum Disorders: An Experimental Study" The objective of this pilot program was to measure the effectiveness of motor skills (total motor development test); physical activity (accelerometers); and socialization (field observation for peer participation) in young children with Spectre autistic disorders. Age 4 to 6 years; there is a very simple difference between autism spectrum disorder and autism spectrum disorder. The experimental group (N = 11) participated in an 8-week intervention to teach motor skills 4 hours a day and 5 days a week. The control group (N = 9) did not receive the intervention. Motor F (1), P = 10.07 object control (1). Analysis of repeated measures of fine differences revealed statistically significant differences between groups in the three motor results 1.96 6 og. "> m" partial 44+ < o7)" and a significant part) (> 1.07 o7) the results highlight the importance of the kinetic programming part of early intervention services for young autistic children. The effectiveness of a program based on Teacch structured education in improving executive function skills in children with autistic disorders"; the study aimed to verify the effectiveness of the organized education program (teacch) in improving certain operational skills, namely planning/organization; Stop responding. Children with autistic disorders. The training program for them and the number of (4) autistic children with a degree of autism have a single degree and a group of agents and the number of (4) children who are united by reality and their age range between 6 and 9 years. The tools included a preliminary data collection form for children with autistic disorders (prepared by the researcher), a socio-economic level scale prepared by (Hamden Fadda), the Goddar intelligence panel and the autistic child scale (prepared by Ade Abdullah (2003). The measurement of operational skills (preparation by the researcher), the list of preferred boosters for children with autistic disorders (preparation by the researcher) and the training program for autistic children (preparation by the researcher); One of the most important results was the existence of statistically significant differences between Mediterranean children with autistic disorders in the experimental groups and officers on the executive competence scale after the application of the program for the experimental group. program in favor of distance measurement, there are no statistically significant differences between the average ranks of distance and follow-up measurements in the executive function skills of the experimental group after the application of the one-month program." The effectiveness of a play therapy program for language development in children with ASD"; The study aimed to discover the effect of a play-based program on increasing language growth in children with autism spectrum disorders; the researcher used the semi-experimental program " The study sample consisted of children with autism spectrum disorders (8) autistic children with a low degree of autism; Autistic children in language growth as a whole and as subdivisions in favor of the experimental group; There are statistically significant differences between the mean scores of the experimental and control groups of autistic children in language growth as a whole and as subdivisions in favor of the experimental group; Their scores on the linguistic growth scale as subdivisions and as a whole. Direct motor interactions, means the acts that we have already mentioned and presented above under the name of communications and motor counter-communications. In this part we deal with basic theoretical concepts.

Motor Education

Regarding direct interactions, these are the essential motor interactions, explicitly submitted and sanctionable by the game code which specifies the technical characteristics of the opposition and /or cooperation relationships maintained by the participants. These are clearly observable and identifiable acts: charges, shots, passes, shots. As for the category of "indirect" interactions, it includes all the other essential interactions of the game. Interactions essentially prepare and promote the effective realization of "direct" interactions. These include two types of organization whose forms and modes of operation are articulated on two totally opposite behavioral categories: the "gestures" which are translated into a language by gestures of a fairly classic type and the "praxemes" whose specificity is to be part of the instrumental action of which they continually begin the realization. These two interactional universes relate to two types of semiotor code that are part of the worlds of sports games. Admittedly, the information transmitted by these indirect interactions is likely to be permanently identified on the field of play by each of the players vis-à-vis all the others: the network integrating all these communications is therefore complete and not differentiated. On the other hand, the consideration of direct interactions will be discriminatory since the playful rules impose very strict imperatives on the exchange of balls, roles or positions. In this case, the networks will highlight the communication constraints.

Importance of Motor Interaction

It is imperative to highlight the conditions of this behavioral influence. For this we will try to distinguish an essential motor interaction from an inessential motor interaction. It is undeniable that during a match, the intervention of the public can have a decisive influence on the driving behaviors of the players. This motor interaction can therefore be qualified as contingent and over added, so it will be qualified as inessential and will not be taken into account in the analysis of the sports game as such (even if it is of great interest in the overall study of the sports spectacle). In addition, it turns out that the constraints that govern the space sometimes prevent any operational interaction between competitors. For example, in their 110-metre hurdles corridor or on their parallel slalom track, runners have no instrumental relationship. The socio-emotional influence is clearly manifested on the driving behaviors of the actors, but is not a necessary and founding element of the task; here too, interaction will be described as inessential. Essential motor interaction, or praxic communication, means any operative motor interaction that contributes constitutively to the instrumental accomplishment of the task. Note that this is carried out by the participants explicitly provided for this purpose by the rules of the game, particularly with regard to a rugby load, a tennis smash or a basketball demarcation behavior. The player's interaction with coaches, spectators or other potential competitors isolated in their space would be an inessential motor interaction. These definitions relate to the sharing made by the two concepts of psychomotricity and socio-motor skills. The peculiarity of psychomotor situations is that they do not involve praxic communication, as already mentioned above. In addition, they can eventually lead to an inessential motor interaction, for example between two runners engaged in their 100-metre corridor or between a pole vaulter, his competitors and the public. In addition, praxic communication is the determining criterion of socio-motor situations: the essential interaction is fundamental. The distinctive identification of praxic phenomena is an essential condition for any research in this field. The absence of a differentiated examination of the universe of motor acts can lead to confusion where all parameters can be deregulated.

The Concept of Communication and Exchange of Information

Knowing that it has a polysemic character, the concept of communication has a semantic core that can be identified in most of its terminologies: it refers to the transmission of signals or messages, and in an already less precise sense, an exchange of information, or even a simple exchange of meaning. In this regard, the psychosociologist Théodore Newcomb specifies: "Any act of communication is considered as a transmission by a transmitter to a receiver of information constituted by distinct stimuli" (1971, pp. 21-22). It should be noted that many authors are satisfied only with verbal information. George Mead would be one of the first authors to focus his work on bodily reactions during the communication process. We also remember the famous expression on this subject: "conversation by gestures". To illustrate the sporting confrontation, George Mead uses the example of the boxer and the fencer whose gestures and behaviors carry meaning. For him, "gestures become significant symbols" (1963, p. 41). His studies have led him to deduce that communication promotes the internalization of other people's attitudes and collective norms, and ultimately represents the major factor in the socialization process. Although established for more than half a century, this analysis was avant-garde. For some time, Ray Birdwhistell, has undertaken a real investigation of the gestural field. It should be noted that he was only able to establish a fine approach to the issue of bodily communications through linguistic tools. Undeniably, language, by its privileged and extremely elaborate structure, exerts a consequent influence, which Ray Birdwhistell was aware of. However, he was forced to abandon his initial pro-linguistic scheme to focus on multiple sensory channels taking into consideration the context of communication. We do not pretend to support the idea that bodily communication has not been on the agenda of studies conducted by psychosociologists. Already many have referred to it and given it some comments. In his synthesis book on social psychology, Jean Stætzel looked at "communication without language" and to illustrate this aspect uses the example of the sports duel highlighting "the interaction of two wrestlers where each takes into account the attacks, dodges, feints of the other" (1963, pp. 185-186). That said, motor communication essentially holds a lateral status of illustration which is in fact the constant point of our culture in which the language primacy is deeply rooted "The privileged instrument of communication", is it not "obviously", as specified by J. Stætzel, "language". (p. 187).

The Verbal Model

The question that seems to be plaquing the mind is whether it would be desirable or possible to exempt oneself from this omnipresent verbal model? Are we necessarily called upon to define in a clear and precise way the notion of communication as would be implied by the study of ludomotor situations? Observing the field situations, we can immediately note that all the sociomotor sports and in many traditional collective games, each player can constantly see and often rub shoulders with any other participant. In other words, whether by gesture or verb, anyone can communicate with everyone. Indeed, the transmission channels can be exploited by all players. This reciprocal communication relationship specific to all participants in the game implies properties of reflexivity, symmetry, transitivity and totality: to synthesize, an equivalence relationship. It should be noted that by limiting themselves to the vague sense of the notion of communication, the communication networks of all socio-motor sports belong to the same class. A network approach highlights simple redundancy and makes no distinction and is therefore of no interest. In addition, we have noted in the previous pages that the analysis of the ludosportive duel allows us to identify two totally different, not to say opposite, forms: communication and motor counter-communication. Taking into consideration spatial and temporal data of the phenomena of contact and violence, pushes us to admit such a dichotomy. That said, the countercommunication charge of football or rugby cannot be akin to a friendly exchange of a communication pass. This is another distinguishing factor specific to the sports game. The specificity of the motor action deployed during ludomotor situations undoubtedly calls for an original and precise definition of communication phenomena, which will certainly imply a methodology adapted to its concepts.

Motor Interaction as a Unit of Analysis

The experimental approach that we will follow will lead us to adopt the notion of "minimal", namely that of motor interaction. It will be a question of motor interaction when, the accomplishment of a motor task implies that the motor behavior of a participant influences in an observable way the motor behavior of one or more other stakeholders, thus crystallizing the original concept of socio-motor skills.

Psychomotor Games

These are those during which the subject acts in isolation, without there being any instrumental interaction with another co-participant (see Figure 1, p. 51). We can find these situations especially in the traditional sector (hoop, stilts, juggling, ball on the wall ...). The practitioner is confronted only with the material environment, the only foreign element inclined to destabilize his motor action is the informational uncertainty that could transmit the external environment more or less domesticated and devoid of intention. Here we find the analyses of the previous paragraph.

Socio-Motor Games

These are the ones that necessarily lead to motor interactions between co-participants (see Figure 1, p. 51). This is a situation of interpersonal skills and the corresponding socio-sexual behaviors are totally different from the previous ones since there is no other person. The uncertainty it generates is due to the behavior of others. This playful dynamic has guite particular specificities. Indeed, in a socio-motor game, the subject is in a structure of exchanges that will eventually give scope and meaning to his achievements. The action of a player will not make sense if it is not linked to that of the other participants and the latter must grasp the intention of his partners or opponents. His every move is loaded with meaning and each teammate is alternately soliciting and solicited. It is imperative that the player has a dynamic representation of the "field" of jeude structuring immediate and potential lines of force. In the event that he has a status of "solicitor", he is obliged to place himself – taking into account the opponent – according to the carrier of the ball obviously, but also relative to the partner with whom he will chain the pass. Having the status of "solicited", he must not only take into account the teammate he will serve, but he must choose the latter according to the other partners through whom this teammate will extend his action. Socio-motor skills can be read in each gesture made and there is no action of a teammate without a socio-sexual load. That said, intentionality, meaning are not of great importance. The player must continually identify the information conveyed by the behaviors of the Co-participants, apprehend it, give it meaning. His role is also to capture relationships and create new ones through the new organizations he undertakes in his "distribution" of the game. A coherent, structured, harmonious game essentially involves forecasting, apprehension of structures. The player must anticipate the action of other players and prepare to respond to it. His ability to anticipate is required: he must perceive any useful information in the wake of the potential incentives that present themselves to him. The player required to act, therefore choose, is continually plaqued by assumptions about the intentions and plans of the other participants. He thus makes assumptions of hypotheses, which lead to decisions. In addition, it is certain that flexible and adaptive driving that admits possible readjustments is a determining factor. In this

context, the player's representation of his opponents and partners strongly influences the actions he undertakes. He acquires this ability to discern an intention, to evaluate a situation, a conduct. Its learning is perfected as this evaluation evolves. That said, many of the usual problems related to psychomotricity such as the mastery of space and time, the evaluation of trajectories and velocities persist, they are however revised and integrated into a context that makes them more or less significant. In fact, this specification is imperative: It is through a praxic interaction that it will be possible to establish a link between motor action and the affective and relational phenomena of group dynamics. Co-action has the advantage of giving rise to other strategic centers that the player must take into account. Knowing that the other is also producer and information detector will not be without causing an implementation of the semiotician very different from that which relates to the psychomotor game. This distinction highlights a divide separating disciplines that are predominantly psychological from disciplines that are predominantly sociological. The proposed terminologies are opposed to those of the usual language which considers, for example, "individual sports" fencing and combat sports, and "team sports" athletics. We also confuse "team", accepted as an addition of points, and "team of individuals" who must necessarily interact to accomplish a task knowing that the direct confrontation of an opponent deepens the "individual" character of the practice. The consideration of inter-motor skills will be decisive in the modelling of sports games (motor communication networks, socio-motor role systems, semiotor codes).

Interaction of the Practitioner with the Physical Environment

The material character of the environment is evaluated according to the information that the subject takes from it, which will allow him to organize his motor behaviors. In the event that the environment in question is stable and known to the individual acting (athletic tracks, jumpers, equipment, swimming lanes ...), the amount of information provided will be small. This will not be the case if the environment is random and may involve unforeseen events (river currents, rough sea, snowy slopes, air masses, etc.), the amount of information taken will be considerable, varying according to the level of learning of the subject and his degree of familiarity with the situation. So much informational data, to a certain extent subjective, testifies to a greater or lesser predictability of external elements and their sequence. This criterion will be called: uncertainty from the external environment. We are not dealing here with a neutral and essentially intellectual assessment of the probabilities of occurrence of this or that phenomenon, but with an assessment that is concretized in motor decisions. The bodily commitment is real and confirmed and the success of the motor strategy depends on the technical competence of the subject. There lies all the motor specificity solicited: the action taken depends not only on the particularities of the environment, but also on the driving behaviors of responses technically implemented in the field. The estimation of the chances forces the actor to take into account his technical competence. Here it is clear that being in the same situation, an emeritus surfer does not have the same perception of the marine environment. The athlete is introduced to the reading to the processing of information: to external clues (natural phenomena: snow, wind, presence of foam ...), he gradually associates praxic meanings ("resumption of edges", "strokes of acceleration paddle"). Unintentionally, his reaction is determined by an integrated semiotic code and this decoding makes him likely to anticipate by his bodily action the obstacles he has pre-empted. Acting is then equivalent to pre-acting. The use of a semioctor code is a way to dispel the uncertainty of the environment and to pre-respond to it. This quick analysis places the interaction with the environment at the heart of the motor action. Take as an example experienced athletes in their respective specialties, the uncertainty they show is generated immediately by the nature of their competitive situation. We were able to note that the number of information emitted by an

athletics jumper or lancer is zero: the regulations standardized all the important elements and the athlete was able to recognize the places in advance. In return, the amount of information emitted by a ski slope, breaking waves or thermal ascendances is often considerable. Based on the thermodynamic (then cybernetic) model, we can affirm that the second case gives rise to a "disorder", that is to say an unpredictable chaos with high entropy. The first case to, on the contrary, would symbolize situations where "order" reigns. While admitting the amounts of information, entropy and probability, it is difficult to set drastic measures. What could certainly make the task easier is the large number of ludosportive practices located at the two limits of the range of variation, mentioned above: situations with zero uncertainty (athletics, gymnastics, swimming ...) and situations with maximum uncertainty (practiced in the wilderness, on adventure). We can therefore envisage a "dimension" on which sports games are based according to the uncertainty they cause in the player. Also, a specialty can led to several other competitive activities. Let us mention as an example the canoe-kayak and its different forms: the "line race" which takes place in calm water and in corridor is of zero entropy, the "slalom" which takes place on a course punctuated by sheets, but in white waters, is already less predictable, and the "adventure raid" is as unpredictable as it is wild. The uncertainty criterion places each ludo-system on an objective dimension by favoring semioctor decoding and motor decision. It places the subjectivity of the acting subject at the center of the problem.

METHODOLOGY

Learning is based on the establishment of routines and repetitions, but also by the introduction of variations with in these routines. Nevertheless, it happens that despite the respect of all these principles the child does not progress. In this case, this model established a decision tree, a hierarchy of measures to be implemented according to the situations.

Objective of the Research

The research aims to determine the impact of cooperative play on the development of certain basic motor skills (running, throwing, jumping, crawling) for autistic children, as well as on the variable of integration and adaptation with the environment.

Program

A program planned and organized in the light of the scientific and educational foundations based on the principles and techniques of the "Behavioral School" where it offers training through a range of activities of a number of sessions.

Gaming Activities

It is a targeted or unguided activity carried out by children in order to achieve pleasure and entertainment and exploited by adults in order to contribute to the development of children's behavior and personality by taking them away from the different physical, mental and emotional dimensions.

Basic Motor Skills

These are some manifestations of motor realization that appear with the early stages of physical maturity such as love" walking; running; roll; perforation; throw; climbing; attachment; and because these motor patterns appear in humans in the first form" so they are called basic motor skills or key motor skills.

Research Plan and Procedures

Teaching Framework and Use of Joint Activities:

The child and the therapist carry out together, from session to session, the same routine activities. These routines are short-term activities (2 to 4 minutes) that are selected according to the preferences, and interests of the child. They have several objectives in different areas. The implementation of routines goes through several stages: from the choice of the activity, to the learning of the routine, by developing the turn and the collaboration between the two protagonists, to the complexification of the routine action to expand the repertoire of activities of the child and develop his mental flexibility, until the cessation of the routine, to move to a new routine. There are several types of routines. Routines with objects make it possible to work on the alternation of attention, on triadic commitment (child-object-therapist) and joint attention. Sensory routines are part of a positive effect, in order to promote dyadic engagement, including the sharing of pleasure activities. These sensory routines make it possible to modulate the awakening of the child and to attract his attention, to promote reciprocity and social exchanges. The objectives of these different routines are the development of communication, cognitive and motor skills, but also to promote imitation, joint attention and exchange. To summarize the pedagogical practices used in the ESDM (Fulton, E., Eapen, V., Crncec, R., Walter, A., & Rogers, S. (2014)). are based on the management of the child's attention, the modulation of his affect and awakening, the optimization of his motivation, but also on the quality of the dyadic commitment, in a positive affect. The adult must be sensitive and receptive to the child, and adapt to the child's language skills. The activities chosen should promote joint attention and cognitive development.

Mode of Investigation

The sessions are carried out in a shared play environment without any learning constraints. They are predictable with the establishment of routines, reassuring benchmarks for the child. The sessions are often biweekly and of short duration of thirty minutes each, during which the activities are supervised by two people, who alternate between the role of observer and that of psychomotrician. The intervention was carried out through the functional assessment of the child and the creation of an individualized project. The functional assessment of the child guided us to structure the detailed developmental phases of the child by detecting the strengths, and still fragile points, the emerging skills to be consolidated. The assessment focuses on the examination of: autistic symptomatology, disorders of psychophysiological functions, cognitive functioning, language or socio-communicative skills Vismara, L., Young, G., & Rogers, S. (2012).

This evaluation also makes it possible to know what the child appreciates in order to define the activities that will be proposed to him during the sessions. The educational provisions developed are regularly revised following reassessments of the child. It is a question of contextuality of the environment so that the child is in the best possible conditions favoring his motivation to learn, and developing his skills. The principles are necessary: serenity, the availability of the psychomotor therapist, and reciprocity. Serenity is based on the establishment of a safe atmosphere. The Goals and Effects of Autism on the Development and Behaviour of Children with ASD is associated with a comprehensive care program focused on the child, their educational environment and the nature of their interaction with the psychomotor therapist. The goals of the association of these interventions are to homogenize the psychological development of the child, the installation of emerging skills and pivotal functions to improve the socio-emotional adaptation of the child in his environment, and improve his integration into society.

Study Population

The study involves 20 children between 4 and a half and 6 years old, cared for at the private center for the autistic child in Sousse, benefiting from motor activation session once a day. This over a period of 3 months. An initial assessment is conducted and then a reassessment takes place at the end of this period. This reassessment is to verify whether an improvement in abilities: imitation, shared attention, interaction, regulation of behavior, perception has been made. In addition, regular assessment of autistic symptoms to show if a decrease in social communication disorders is achieved. The analysis of the child's interaction with the environment will be considerably observed to check whether the children accept the novelties of the environment, and better tune their behavior. These testify to the improvements following this intervention, promotes the development of the child.

Research Approach

The population of our research represents the autistic children of the governorate of Sousse, aged from 4 and a half to 6 years, the research sample intentionally by selecting the Specialized Center of which had (24) children in order to meet the conditions of the average severity of autism on a scale of motor activity; The research sponsored some of the conditions of the selection:

- The child does not have a motor disability that prevents him or her from participating in the activities of the program.
- The child does not take any medication that affects motor performance.
- The common child should not undergo other motor programs.
- The child's guardian agrees to participate

Search Tools

Diagnostic Measure of The Autistic Child:

Description of the Scale:

This measure is designed to determine if a child is autistic and also how much they have autism. The scale used is that of the University of North Carolina and prepared by Professor Eric Schubler in 1988, who is also the discoverer of the teacch program.

The form contains fifteen evaluation elements:

- 1. Relationship with others
- 2. Imitation.
- 3. Emotional response
- 4. Using the body.
- 5. Use stereoscopic
- 6. Adapting to change
- 7. Visual response.
- 8. Audio response.
- 9. Respond to taste, smell and touch.
- 10. Fear or nervousness.
- 11. Verbal communication.
- 12. Non-verbal communication.
- 13. Level of activity.
- 14. Level and harmony of mental response
- 15. General impressions.

Scaling Instructions:

After completing the scores for the 15 elements of the form, the examiner compiles the marks of the elements of the form to obtain the total mark of the examination according to the form for the scale.

In each element of the form, there is a special section of notes under each element that can be written about the examiner's observations on the child's behaviors associated with the element. Once the observation of the child is complete, the appropriate degree of the child's behavior is placed in the element by placing a circle around the degree to which the description of the child's behavior is described in that element. The examiner may find that the child's behaviour falls between two terms of the element, in which case the examiner places a circle around the degree (1.5 - 2.5 - 3.5).

Basic Motor Tests:

Basic motor tests were developed by identifying the most important basic motor skills of the autistic child, based on theoretical readings and specialized scientific references" These skills were placed in the form of a survey and presented to a group of experts composed of (8) teachers of special motor education with at least o1 years of work in the field of leisure, basic play and motor skills.

- 1. Racing.
- 2. Discard.
- 3. Attachment.
- 4. Shooting.
- 5. Crawl.

These variables were presented to a group of experts to ensure that they fit and fit into this category is possible. A survey of studies and research as well as scientific references were conducted in which these abilities were applied to samples similar to the research sample to achieve tests that measure research skills and the researcher achieved the following tests.

- 1. Running:
- 2. Jump: Stability long jump
- 3. Throw: Throw a ball at the farthest distance.
- 4. Crawl: Crawl on the stomach.

The Program Based on the Use of Play Activities for Autistic Children:

First:

The overall objective of the program:

The current program aims to develop some basic motor skills for autistic children from the age of (5 to 9) years of simple autism to the average.

Second:

The objectives of the program:

- Develop the physical elements to help perform the both men's muscular strength running skill and speed activities.
- Development of elements to help perform the jumping skill of the muscular capacity of the feet.
- Development of elements to help perform the shooting skill of the muscular strength of the arms.

- Development of elements that help perform the creeping skill of the strength of the muscles of the arms and torso.
- Identify the importance of positive activities to which autistic children respond and contribute to achieving one's goal.
- The ability to communicate verbally, non-verbally and self-expression in the autistic child.

It also aims to:

- Help the child to drain potential energy.
- Help the child develop attention and concentration.
- Help the child develop large and small muscles that are important in learning basic motor skills.
- Practice appropriate social behavior such as (obedience order cooperation role sharing expectation).
- Develop some concepts associated with the perception of spatial relationships such as:
 above under right left front behind.
- Develop some of these children's abilities that help develop communication skills such as (understanding' imitation' connectivity; recognition' etiquette).
- Develop the ability to imagine and play, and thus contribute brides to the development of a clear weakness in these children.
- Develop certain skills of discrimination and auditory perception.

There are basic principles to follow when applying the program with the autistic child:

- Repeated skill stabilization training in autistic children.
- Make a daily routine schedule with these people, based on its characteristics.
- Taking into account the individual differences between these children.
- Using appropriate reinforcement methods.
- Provide the right place to apply the program in order to be away from distractions.
- Put the task in the form of small steps.
- Save enough time to complete the mission.
- Lead these children to develop their attention and learn new skills.
- Give instructions clearly in front of the child" using the signal as much as possible.

The Content of the Program:

The program contains a range of different motor activities that are collective or individual and simple and include motor activities, which are essential activities for children in general and autistic children in particular, where the program offers children the opportunity to engage in sports activities that contribute to the development of autistic children's concepts and motor perceptions, cognitive and emotional" and also help reduce the repetitive stereotypes that appear to them.

Materials and Tools:

- 1. Chairs.
- 2. Hoops.
- 3. Balls.
- 4. Wooden boxes.
- 5. Graphic design
- 6. Plastic baskets.
- 7. Cones

80%

p = 0.02

58%

800.008

8. Strings

Statistical Tools:

1^{ère} Period

2^{èm} Period

3^{èm} Period

54%

p = 0.01

RESULTS

The analysis of the child's interaction with the environment that is considerably observed to check whether the children accept the novelties of the environment, and better tune their behavior of development of skills. The results of the related work to develop, devices and tools for monitoring and evaluating skills, within the centers of autistic children in Tunisia. The establishment of standards and mechanisms for monitoring the quality of education for autistic children by targeting all formal and non-formal educational structures, starting with the family. One of the effects to be produced, in order to contribute to the achievement of this general objective of the "Quality Education" project, is the development of individual and collective skills. This work makes it possible to significantly deepen the knowledge of the mode of operation of the centers presenting autistic children, as well as the effect of motor activities on these subjects It should be noted that the study was conducted in coordination with the various stakeholders and partners concerned including children. The various bodies concerned. It is structured around the five phases, namely: the results illustrated in Table 1 show:

Activities on Mental activity (labyrinths -Internal External puzzle installation - games). independence motor motor activity. competencies activity. 72% 68% 42% 18% p = 0.01p=0.001p=0.008p = 0.0256% 62% 24% 66% p = 0.01p=0.001p=0.02p=0.008

30%

p=0.001

Table 1: Analysis of The Variation of Activities by Period

The statistical analysis of variations in motor activities according to the period of their application of different motor activities that are collective or individual and simple include motor activities, which are essential activities for children in general and autistic children in particular, where the program offers children the opportunity to engage in sports activities that contribute to the development of the concepts of autistic children and their motor, cognitive and emotional perceptions and also contribute to reducing repetitive stereotypes that reveal very significant (p=0.001 and p=0.01) and significant (p=0.02 and p=0.04) differences.

The practice of games for autistic children in the first period give more importance to everything that is Activities on independence skills, internal motor activity and external motor activity. Bodily existence is a form of a body considered as part of the medium. This is explained by the study regime which does not attach great importance to the practice of motor activity. Indeed, Most Autistics of the second period (84%) show a gradual adaptation with the environment of the practice of motor activity and begin to develop cooperation. Autistics in the third period choose much more the biological body of other children than the objects distributed in the space of activity, since the body is connected to all that is play.

Table 2: Distribution of the progression of the Development of the cooperation variable by sex.

	Cooperation		Opposition	
Féminin- Féminin	84%	p=0,001	16,00%	p=0,02
Avec le sexe opposé	64%	p=0,007	35,99%	p=0,3
Masculin- Masculin	70%	p=0,001	30%	p=0,02

Regarding the development of the cooperation variable by sex, the statistical analysis shows a very significant difference (p=0.001) regarding the cooperation between same-sex and female autistics and prefer games with opposite-sex partners (p=0.007). The relationship to the body is not limited only to the spatial representations of bodily practices but also to the relationship between the two sexes The relationship to the body is similar in both sexes in the distinction of perceptions of the body. The notion of body is distinct, it is considered as an object of belonging. The use of body appearance depends on the educational context in which the individual evolves. The mastery of this socio-corporeal knowledge is an issue of belonging to the group and the bodily appearance is a socio-educational construct in which the practices of actors are in action.

Table 3: Effect of the program based on the use of play activities for autistic children on their skills development:

		The racing	jumping skill	Shooting	creeping	self-	contribute to
		skill		skill	skill	expression.	achieving its objective
	1 ^{ère}	76%	62%	54%	66%	52% p=0.04	58% p=0.02
		p=0,008	p=0,009	p<0.0001	p=0.001		
Ī	2 ^{ème}	74%	92%	12%	62%	52% p=0.04	54% p=0.02
		p=0.008	p=0.009	p<0.0001	p=0.001		

The Concept of Developing the Following Skills

Develop the physical elements to help perform the both men's muscular strength running skill and speed activities. Development of elements to help perform the jumping skill of the muscular capacity of the feet. Development of elements to help perform the shooting skill of the muscular strength of the arms. Development of elements that help to perform the creeping skill of the strength of the muscles of the arms and torso.

Identify the importance of positive activities to which autistic children respond and contribute to achieving one's goal. The ability to communicate verbally, non-verbally and self-expression in the autistic child.

Show that:

Autistic children conceive of the physical quality of running at 76% (p=0.002), during the two periods of application of motor activity the performative efficiency at 76% (p=0.008) and belonging to oneself can be explained by the specificity of the activity conceived as individual. The stability of the recorded values given the variation in the development of these skills refers us to the competence of shooting. the fall in values recorded before and after a period of motor activity brings us back to the idea that autistic children subject to our research consider their body as an object of belonging to them and feel comfortable being alone which leads us to study the variation of motor practice according to their stage of autism.

Table 4: Motor practices according to the level of autism disorder.

	Period 1	Period 2	Period 3		
1 ^{ère} TSA level (SDI)	68%	66%	66%		
	p<0.0001	p=0.009	p<0.001		
2 ^{ème} TSAlevel (DIL)	80%	66%	46%		
	p<0.0001	p=0.009	p<0.001		
3 ^{ème} TSA level (DI)	34%	32%	34%		
	p<0.0001	p=0.009	p<0.001		

Regarding motor and communicational acquisitions according to the degree of autism spectrum disorder: 68% of autistic children (IDS) without any sign of intellectual disability keep stable values throughout the test periods the same for (ID) with remarkable intellectual disabilities while the values recorded for children with mild intellectual disabilities show a regression marked by the development of skills adaptations with the environment and cooperation which leads to the conclusion that motor activity is a more effective means for the development of individual skills and attitudes of autistic children with mild intellectual disabilities.

DISCUSSION

The mode of training in social skills presented by the study (Liratni, Blanche, Pry, 2013) on the evolution of the symptomatology and socio-communicative skills of children, with autism with moderate mental retardation, has clearly shown that this mode of management is beneficial for developing socio-communication in autistic subjects. The observation of behavior is a very important step that is organized during structured activities in the presence of the adult to recognize the signs testifying to the atypical development of the early childhood period. It ensures the analysis of the nature and quality of interactions with parents, communication capacity, the nature and quality of one's games, autonomy, and nutrition as well as the level of adaptation of certain behaviors (Rogé, 2002). This helps to foster a good appreciation of the limits and resources in the associated environments. the evolution of the child through the regular assessments that are practiced, they are instruments both of the family dialogue and with educators (Guidetti, tourrette, colin, 1996). Socialization, communication and daily life coping skills and motor skills are determined by the Vineland Adaptive Behavior Scale (Sparrow et al, 1984). It is one of the tools currently used to measure the socio-adaptive behaviors of the child and it is carried out by a professional. The latter must rate the scale in order to obtain an age of development in each area of competence. Other tools for assessing the level of development of autistic children, among others such as pep-3 (Psycho-Educational Profile, 3rd version, Schopler et al, 2004) an improvement in social skills as well as academic results through physical activity programs. Motor disorders and coordination disorders for children with autism spectrum disorders are expressed by poor coordination of the upper limbs in vasomotor tasks or dexterity tasks and poor coordination of the lower limbs in balance, agility or speed tasks. The correlation between motor disorders and communication disorders is still a relevant object of research. As a result, our general hypothesis is verified. Movements have a role in early communication and the motor plane improves the communication prognosis of autistic children, the decrease in running speed and the appearance of instability in the sagittal plane during activities involves a double task in autistic people, especially in football: running + control of the ball at the foot ect In fact there is no significant difference between the groups when walking, there is a difference in speed only. Studies have shown a decrease in stereotypies with the practice of physical exercise. Some show a short-term effect of intense aerobic exercise (such as running) (Petrus C, Adamson SR 2008). And others show longer-term effects (up to 1 month later), with a decrease in stereotypies

social behaviors are found to be improved in several studies (Movahedi A, 2012). Meta-analysis by Sowa and Meulenbroek showed superiority of individual interventions over group interventions. An early diagnosis of autistic children is very sensitive and especially in terms of the future of this child. An adapted and rapid intervention is therefore more effective for a better management of his disorder and helps his family to cope with the difficulties encountered on a daily basis. To obtain an early diagnosis the experience of professionals can also be involved especially with the lack of specialized structures, diagnosis for the youngest age, especially that. early signs can be subtle and generally represent only slight deviations from normal development (Rogé, 2002). Autistic children, present difficulties of interaction in the care, which are related to three symptoms, disorders of contact and social relationship, language and communications, behaviors and / or repetitive activities, restricted interests. It is emphasized that the difficulties of interaction in the management, present in all cases, indeed Our results confirm this hypothesis. Trainers find interaction difficulties in these three symptoms presented in autistic children, they are summarized as follows: The first hypothesis of this research stems from the fact that educators of autistic children encounter difficulties, such as the problem of contact and social relationship, and difficulties that can engender.

CONCLUSION

As part of our research that allowed us to answer some questions concerning the notion of skills development and the difficulties of interaction with autistic children Our research is carried out on the basis of a bibliographic research, a pre-survey and observations noticed in the field and the practice of motor activity for autistic children the interaction difficulties encountered, Autism is a complex disorder, treated this problem it is both started to discuss autistic symptoms like contact disorder and social interactions, communication and language and behaviors, and many others. It requires adequate multidisciplinary care for autistic children throughout their lives. Until today, professionals have still not been able to find triggered causes of this pathology. With this in mind, activities will be developed in close collaboration with national, regional and local stakeholders. A team will be made up of different people who can bring experience in the field sought. For the relationship of the body to the social environment. The socially-conscious bodily appearance of the educator and their interactions with autistic children is our research perspective in this field. The notion of social representations of the body presents itself as a variable of study of the future.

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