

BODILY AND MOVEMENT EDUCATION AT SCHOOL

EDUCAZIONE CORPOREA E AL MOVIMENTO A SCUOLA

Antonio Di Maglie

University of Salento

antonio.dimaglie@unisalento.it

Abstract

Pedagogical research has highlighted that a proper psychomotor development affects the learning process in a positive way during the psychophysical growth of children and young people. The literature calls attention to the fact that physical education and physical activity have made a significant contribution to the sedentary habits prevention, the adoption of healthy lifestyles, the health promotion and the learning process development of the subjects. Unfortunately, the data that we report in this work about people in Italy doing regular physical activities in their developing age doesn't represent encouraging figures. Moreover, it has been proved that urgent intervention is also needed after the events due to the pandemic Covid-19: many studies mentioned herein have demonstrated that there is a strong correlation between SARS-Cov-2 mortality and obesity. The interpretation is that, at an educational level, something is not working properly: it is necessary to strengthen the relationship between physical activity and education. In other words, it is fundamental for the Physical Education teachers, but also for those stakeholders connected to the teaching of sport and the recreational-motor activities to have the will to promote good practices. In particular, the specific motor and sport components should be oriented towards a real motor literacy, by promoting the development of autonomy and the self-emancipation of the individuals. The contribution emphasises and reflects on these issues by placing the body and the movement at the heart of a health promotion perspective.

La ricerca pedagogica ha messo in evidenza che un corretto sviluppo psicomotorio influisce positivamente sull'apprendimento, nella prospettiva della crescita psicofisica dei bambini e dei ragazzi, in letteratura è ampiamente evidenziato che il contributo dell'educazione fisica e delle attività motorie è determinante per la prevenzione di abitudini sedentarie, per l'acquisizione di stili di vita corretti, per la promozione della salute e lo sviluppo dei processi di apprendimento dei soggetti. Purtroppo dai dati che riportiamo nel presente lavoro emerge che in Italia la percentuale dei soggetti in età evolutiva che praticano abitualmente attività fisico-motorie non sono incoraggianti. L'urgenza di porre mano a ciò è emersa purtroppo anche con le vicende legate alla pandemia da Covid-19: molti studi, che qui citiamo, dimostrano oramai la forte correlazione tra incidenza di mortalità da contagio del virus Sars-Cov-2 e obesità. Qualcosa a livello educativo non sta funzionando bene: la nostra chiave di lettura è che è necessario rafforzare la relazione tra attività motoria e educazione, vale a dire che occorre investire di un'intenzionalità educativa le prassi dei docenti di 'educazione fisica', ma anche quelle di figure connesse all'insegnamento dello sport e attività ludico-motorie. In particolare occorre ri-orientare le specifiche componenti motorie e sportive in direzione di una vera alfabetizzazione motoria favorendo uno sviluppo dell'autonomia e dell'auto-emancipazione dei soggetti. Il contributo intende porre l'accento su queste problematiche ponendo al centro delle riflessioni il corpo e il movimento in una prospettiva di promozione della salute.

Keywords

Motor Literacy, Body, Physical Education, Health, Lifestyles.
Alfabetizzazione Motoria, Corpo, Educazione Fisica, Salute, Stili Di Vita.

Introduction

During childhood and youth, physical education offers an excellent opportunity for lifelong learning and practising skills that can improve physical fitness and health and promote the adoption of healthy lifestyles. The early acquisition of basic skills is essential to help children and young people to understand the value of physical exercise and sport during their educational process. Physical education is not limited to practising physical-athletic skills or having a recreational function. In fact, physical-motor and sports activities allow to deepen the knowledge and understanding of principles and concepts such as “rules of the game”, fair play, respect, body awareness and to develop a social education linked to personal interaction, commitment, and responsibility which are part of belonging to a group or a team. The goals, such as good health, the healthy personal development and social inclusion, can be achieved through physical education and sport and make physical education a very important subject within the school curricula. The social value of physical education and sport has also been confirmed in numerous documents of the European Commission (European Commission, 2007; EU, 2011; White Paper on Sport, 2007; EU Working Group on “Sport and Health”, 2008).

Physical and sports activities could have an important and more effective educational role especially in formal learning contexts. In Italian schools, unfortunately, the time spent for physical education is two hours a week and sometimes these hours are further reduced or missed. The teacher has to fulfil bureaucratic duties (take the roll call, fill in the registers, record the activities), then the students go to the gym (which is never next to the class!). So, out of 60 minutes scheduled, 10/15 minutes of lessons are wasted because of logistic problems. In some institutions the gym must be shared with other classes and in other schools the gym is not functional.

The physical education teaching time significantly varies from one country to another and from one level of education to another. In addition, some countries centrally set minimum hours of physical education, while others leave the decision to individual schools. In general, the time for physical education is rather low compared to other school subjects. This reveals that unfortunately physical education is thought to be of minor importance, particularly in primary school (European Commission, 2013). Nevertheless, in the “National guidelines for the curriculum for pre-primary school and the first cycle of education” published by MIUR in 2012, it is highlighted that the body and physical activity are vital because movement is a source of well-being and psychophysical balance. “Physical education promotes the knowledge of oneself and one’s potential and it contributes to the formation of the student’s personality through the knowledge and the awareness of one’s own body identity, as well as the continuous need for movement as constant care of one’s own person and well-being” (MIUR-Annali, 2012).

Numerous WHO documents and guidelines recommend that adults and the elderly do at least 150 minutes of physical activity throughout the week. Currently, such recommendations insist on the health benefits due to moderate physical activity at relatively short intervals. Children and young people should accumulate at least 60 minutes of moderate -to vigorous- intensity physical activity daily. Researchers and scientists of the WHO highlight that progressing to higher levels of physical activity will result in additional health benefits across all the age groups. Any inactive person should aim at following the WHO recommendations. Numerous studies show that even small amounts of physical activity are better than none. The WHO suggests that when someone cannot do the recommended amounts of physical activity due to health conditions, they should be as physically active as their abilities and conditions allow, even doing low intensity activities. Furthermore, recent research indicate that it would be useful to reduce sedentary activities, such as watching TV, playing video games, studying, working, as they are health risk factors, regardless of the physical activity practised (Cavallo et al., 2016).

1. The importance of physical activity for health

Although the benefits of physical activity are well known, an overall significant decline in the amount of daily physical activity has been proved worldwide. Studies show that globally, one out of three adults does not reach recommended activity levels. Even in Europe, statistics

demonstrate that over a third of adults is insufficiently active (Hallal et al., 2012). Recent analyses carried out by the Member States of the European Union (EU) demonstrate that six out of ten young people over the age of fifteen rarely or never do physical exercise or practise sport, and more than half only rarely practise or are never engaged in any physical activity, such as cycling, gardening, dancing, or skating (European Commission, 2014). At the same time, many adults in Europe spend more than four hours a day sitting, and, as a consequence, a sedentary lifestyle is facilitated.

In May 2021, the European Office of the World Health Organization (WHO Europe) published the “WHO European Childhood Obesity Surveillance Initiative (COSI) Report on the fourth round of data collection, 2015-2017”. This analyses the obesity problem and its related different dimensions, such as physical activity, sedentary lifestyle, eating habits, sleep duration (WHO, 2020; WHO 2021). In the “Physical activity, screen time and sleep” study, representative data from the 25 European countries is included and information on the PA behaviour, screen time (watching TV, playing videogames, using tablet and smartphone) and sleep duration is examined. Pooled analysis shows that:

- 60.2% of children are engaged in screen time for <2 h/day; 25.2% for 2 - 3 hours and 14.6% for more than 3.
- 84% of children sleep for 9–11 h/night.
- 79.4% of children practise PA for 1 h each day;
- 50% of children walk or cycle to school each day;
- 54.9% of children are not members of a sport or dancing club or are not engaged in any dancing or sports activities.

Therefore, it is clear that in Europe about 40% of children spend more than two hours a day in front of a screen causing an excessive sedentary lifestyle; only one out of two children goes to school on foot or by bicycle and more than half of the children do not practise any sport (WHO European, 2018).

What is the situation in Italy? Thanks to the national surveillance system “OKkio alla Salute” of the Italian Institute of Health it is possible to know the overweight and obesity conditions and lifestyles among children aged 6-10 years and to provide some *trends* that allow to assess the impact of school and health policies over the years. The surveillance system has currently reached its sixth data collection, and the last took place in spring 2019, the previous ones took place in 2008/9, 2010, 2012, 2014, 2016. In the research of 2019, a sample made up of more than 50,000 children of the third grade of primary school answered the national surveillance questionnaire (OKkio alla SALUTE health surveillance system, 2020). This research gave the opportunity to focus on the lifestyles of children in all Italian regions, therefore, to monitor their weight status and to analyse the school, social and family context of reference. The collected data was presented during the webinar “Children’s lifestyles and obesity: the Italian data of OKkio alla SALUTE and the comparison with Europe” (Rome, 10 November 2020) and published on EPICENTRO, the Epidemiology for public health website developed by Italian Institute of Health. The survey showed that overweight children were 20.4% and 9.4% were obese (thresholds of the International Obesity Task Force, IOTF); males had higher obesity values than females (obese males 9.9% vs obese females 8.8%). There was also a geographical trend, in fact southern regions had higher weight values in both males and females. Higher prevalence of obesity was observed in families with more disadvantaged socioeconomic conditions and among children who had never been breastfed or had been breastfed for less than one month. The comparison of the findings highlighted a *trend* of a slow but steady decreasing percentage of overweight and obese children:

- obesity: the 12% in 2008/2009 dropped to 9.3% in 2016 and in 2019 there was a slight worsening (0.1%) as the average percentage was 9.4%, for both genders.
- overweight: from 23.2% in 2008/2009 to 21.3% in 2016 and 20.4% in 2019.

As regard physical activity and movement, the indicators reported are almost stable over the

years, indicating that the minimum levels recommended by the WHO and the Italian Institute of Health have not been reached yet and that therefore it is still necessary to promote healthy lifestyles. The 2019 data reported that 20.3% of children did not perform any physical activity the day before the survey, 43.5% still had a TV in their bedroom, and 44.5% of children spent more than 2 h a day in front of TV/tablet/mobile.

Thanks to the initiative promoted by the National Surveillance 'Okkio alla SALUTE' (of the Italian Institute of Health), Italy participates in the initiative of the European Region of the World Health Organization (WHO) "Childhood Obesity Surveillance Initiative - COSI" and in the last survey it was among the nations with the highest values of overweight children together with other countries of the Mediterranean area.

According to the WHO, children and adolescents aged 5-17 years should do at least an average of 60 minutes per day of moderate-to-vigorous intensity physical activity (WHO, 2010).

Data from HBSC Italy (Health Behaviour in School-aged Children - Behaviours related to the health in school-aged children) shows that in 2014 14.6% of children aged 11-15 years did PA 60 minutes a day (as recommended by the WHO guidelines 2016-2025); 10.3% of children were aged 13 years and 8.3% of children were aged 15-years. With increasing age, the percentage of children who did physical and sporting activities every day decreases. In 2018, the data was worse as only one out of 10 adolescents carried out physical-sporting activity for at least "60 minutes for 7 days a week" and unfortunately even here physical activity decreased further with increasing age. Indeed, the percentage for people aged 11 years is 11.9%, for people aged 13 years it is 9.3% and for people aged 15 years it is 6.8%. In 2014 the percentage in the three ages examined was 11.3% while in 2018 it dropped to 10%.

Another alarming figure is the percentage of children who have never done any PA. In 2014 the percentage was 4.2% for children aged 11 years, 7.4% for children aged 13 years and 12.1% for children aged 15 years.

Furthermore, in 2018 there was a significant worsening of the percentages among children of those ages: 5.0% (11 years), 9.0% (13 years) and 14.0% (15 years). In both the 2014 and 2018 research we can see that with increasing age the percentage of children who have never done physical activity or sport increased. It would be advisable, especially at school, to focus on a body education of children and young people to ensure them the correct connection among physical education, sports practice, and physical activity in their free time in order to acquire and preserve physically active lifestyles and promote a complete educational process.

According to the WHO, sedentary behaviours should also be faced because if they are extended for a long period of time they are considered dangerous for the health. For example, watching TV and using electronic devices /playing video games for many hours a day can have consequences for the health and well-being of adolescents (Carson et al., 2016). There is a strong correlation, supported by multiple scientific evidence, between sedentary behaviour (mainly "time spent in front of a screen" or screen time) and obesity in children and adolescents (de Rezende, 2014). In the last 10 years the use of media among adolescents has continued to grow, also enhanced by the use of smartphones which are constantly internet-connected (Council on Communications and Media, 2016). However, the recommendations of international experts suggest limiting the screen-based activities to less than 2 hours a day (Council on Communication and Media, 2013) as extended sedentary lifestyle can negatively compromise the state of good psychophysical health of the subjects as well as can cause overweight and obesity (Tremblay et al., 2011). In general, from the analysis of the data of the HBSC Italy 2018 research, it can be observed that during the school days the time spent in front of the TV / video / DVD / PC / videogames is equal to or more than two hours a day for 42.2% of children aged 11-years, 52.9% of children aged 13 years and 56.2% of children aged 15 years. During the weekend, when children are freer, an increase is confirmed (62.6%, 71.7% and 69.5% respectively for children aged 11, 13 and 15 years), while the trend among the age groups is the same. Unfortunately, as we can see, a large percentage of young people prefers spending most of their time in front of the screens rather than going out for a walk, cycling or doing any kind

of physical activity or sport. Moreover, in this case it has emerged that with increasing age the percentages of children who spend their time in front of a video increases, thus facilitating a sedentary lifestyle.

2. Overweight and obesity: a risk for public health

It is important to promote the prevention of overweight and obesity especially at school, because thanks to its educational and training purposes, it is the privileged place to foster personal, psycho-physical and cognitive growth of pupils through motor activities teaching tools. Given that the educational value of the body and movement in the didactics research (Sibilio, 2011), in the school context, several goals are pursued synergistically and simultaneously to further the correct psychophysical development and promote the well-being of the student through motor activities (Coppola, 2015), creating the basis to acquire the correct lifestyles that should be maintained throughout life.

According to the WHO (World Health Organization), it is necessary to intervene promptly through educational models that aim to educate children and young people to adopt correct lifestyles that will be useful to prevent the proliferation of non-communicable diseases. Obesity is now one of the main public health problems in the world. It is a real global epidemic that has spread to many countries, and which can cause serious health problems in the coming years unless there is immediate and constant action. In fact, obesity has a negative impact on the general health of the population both in young people (dyslipidaemia, hypertension, orthopaedic problems, hepatic steatosis, etc.) and in adults (progressive increase of patients with diabetes and other chronic diseases). Early reports have shown that obesity is strictly connected to an increased risk of developing severe complications and mortality in COVID-19 patients and therefore plays a role in the development of infectious diseases (Barry et al., 2020). Since the beginning of the Coronavirus pandemic, it was clear that, even in young patients, obesity would cause greater probability of developing the disease in serious forms or even to make it impossible to overcome it. This observation has been reflected in a series of scientific studies that have confirmed the greater vulnerability of obese people. Research has also shown that simply being overweight represents a risk factor that should not be overlooked (Pakanzar, 2020). From the first meta-analysis carried out on almost four hundred thousand patients, truly alarming data is highlighted. Scientists have pointed out that these patients are more likely to be hospitalized than normal weight people. The probability of being in intensive care is 74% higher and the probability of dying is 48%. The work was carried out by a team of researchers who collected data from 75 peer-reviewed articles and was then published in "Obesity Reviews". In an article written by Meredith Wadman (2020) and published in the journal *Science*, some of the main international studies that have addressed the topic are analysed and illustrated together with US and British scholars, highlighting the conditions that can be associated with obesity that increase the risk of intensive care admission or mortality.

Numerous studies (HBSC, Okkio alla SALUTE) show that obesity is often associated with socio-economic conditions, affecting to a greater extent the most disadvantaged social classes, in particular those which are vulnerable to environmental influences and to less healthy lifestyles. In this regard, the school should positively influence lifestyles of children and young people, above all with targeted educational interventions to involve disadvantaged socio-economic families in order to reduce the existing socio-cultural gap that unfortunately still exists.

3. The importance of the educational intention

Body and its movement are fundamental in the education and development process. They contribute to the growth of the person, promoting awareness of the body and the achievement of the acquisition of skills, the construction of personal identity and the conquest of autonomy (Belgianni, 2017).

The school must consider the value of the body, above all by examining it as an authentic expression of itself in its relational, communicative, expressive, and operational aspects. In

addition, it must enhance movement as a motor language integrated in the development process of the student's autonomy. Physical education and motor activities, managed by expert teachers, can make students aware of their corporeality.

If it is managed properly by educators, the motor-recreational-sporting activity will become highly formative as the subjects are functionally stimulated to exercise personal responsibility through motor and game experiences. Furthermore, through the knowledge and the learning of motor skills, one's own awareness can grow. These elements highlight the need not to limit the teaching of physical and motor education to a simple sequence of movements or gymnastic exercises to be repeated mechanically, but to adopt a reasoned and reflective action. Safeguarding the playful elements can allow subjects to face motor activities in a dimension of exploration of themselves and the relationships with others, as the emotional sphere and the pleasure of sociality are involved (Bellantonio, 2014).

The educational institution, through its educational professionals, must establish firm foundations to create the environments and conditions that, through recreational-motor activities, can facilitate and encourage new discoveries. Moreover, this will let students experiment by making them have the pleasure of solving problems, overcoming new and increasingly complex obstacles by learning to use new movement strategies, so that the activities carried out will help to increase the learners' self-esteem, giving them the opportunity to gain their autonomy.

The gradual learning of motor skills and the possibility of experimenting new motor experiences through the comparison with new stimuli are a source of gratification and naturally generate students' pleasure of feeling master of their own body by acquiring awareness and confidence.

Especially for children, in order to intentionally achieve the predetermined educational goals and act positively on all dimensions of the personality, motor activities should be carried out mainly in a playful form, varying the activities to give new stimuli, making the lessons always interesting and engaging with significant differentiations, also using and adapting the plurality of training settings in which these activities are carried out: gardens, parks, groves, gyms, classrooms, oratories, fields. 'Playing games' is the fundamental nucleus for the implementation of the educational intervention for both children and teenagers. Through it and through physical education, children explore the spaces around them, learn how to share them with others and understand the rules that define the game itself, distinguishing it from other games.

Carrying out motor group game activities means strengthening the feeling of being the protagonist of significant experiences, thus elaborating the sense of belonging.

Group recreational-motor activities create opportunities for experimenting those experiences that are fundamental for the personal and social growth of children and young people. If these activities are properly guided, some responsible behaviours will be acquired, such as respect for playing spaces, respect for the rules and for others, recognition and enhancement of diversity, solidarity, altruism, cooperation, recognition of one's limits and incentives for being able to overcome them, recognition of one's own bodily reality. Once consolidated, these behaviours will accompany students throughout their lives and will be an essential tool both in the recreational-motor and sports context and in all sectors of everyday relational-social life.

Each individual builds and reconstructs his/her body image, based on the body image shared by the social group to which they belong; this allows to be guided in real life and to interact and communicate with others (Lo Piccolo, 2019).

The construction of corporeal identity implies the responsibility and active abilities of the subjects of building their identities and their lives and making the conscious choice of a healthy lifestyle for a functional life project. Individual corporeality takes shape through an active and constant comparison with certain social and cultural codes of behaviour, which sometimes can be accepted and acquired, but sometimes can be rejected because they do not fully correspond to one's model of corporeal identity. In this context, individuals are able to act, to operate freely, and to make informed choices. In this way, the body becomes the space in which "non-formalized knowledge" takes shape and this strongly affects our choices, our actions, our evaluations

(De Mennato, 2006).

However, in order to favour a correct body education, first of all, it is necessary for educators/trainers to have the educational intentionality and for them to be prepared and adequately trained to guarantee an effective physical-motor-sports educational project. This should be connected to a coherent pedagogical intentionality that presupposes a clear distinction between some basic concepts in order to properly define the motor action and to attribute it a right value.

In order to organise the physical-motor educational activities according to their potential for representing learning experiences oriented to the goals of one's growth and well-being as described above, it is essential to clarify the meaning of: "physical activity", "physical exercise", "recreational-motor activity" and "sport".

The expression "motor activity" is synonymous for "physical activity". It concerns all the movements of the body that involve an energy consumption (they are the activities that are performed daily, such as walking, cycling, stair-climbing, doing housework, etc.). The term "physical exercise" means structured, planned and regularly performed physical activity and refers to planned, intentional and structured movements, specifically intended for improving physical body, physical performance and health. "Recreational-motor activities" mean activities that offer a wide spectrum of opportunities, with their total involvement in different cognitive, emotional, social, and motor aspects (for example, playing activities and experimentation with what is new and unexpected). Finally, the term "sport" includes structured competitive situations that are subject to very specific rules. In fact, the concept of sport refers to activities that are in compliance with shared rules and that meet competitive and/or educational training and competition and cooperation criteria. Sports activities, if correctly proposed, contain an educational value that concerns both the process and the achieved results themselves, as well as the ways in which the latter are processed and acquired at both group and individual levels. In this sense, the positive connotation of sport must be referred to its training and educational contents. However, it emerges quite clearly from the observation of the most widespread forms of sporting activity that sport does not have a positive value in and of itself, therefore it acquires a positive or negative value due to how it is experienced and internalized. In fact: "sport can convey absolutely different contents depending on how it is practiced and its components, considered consubstantial with it, can relate aspects that encourage emancipatory growth or that induce forms of estrangement and impoverishment of the self" (Cunti, 2013).

For this reason, it seems essential that the motor sports activities proposed to young athletes for educational and training purposes must be guided by professionals who have a technical education of the proposed disciplines and an adequate pedagogical competence, that currently hardly ever occurs.

Conclusions

Motor sports activities provide learners with opportunities to reflect on their own body's changes, to accept and experience them serenely as an expression of growth and as a process of development of each person. They also offer the chance to focus on the value that the self-image has in comparison with the peer group. Motor education is therefore the occasion to foster cognitive, social, cultural and emotional experiences. The motor experience must connote itself as a "positive experience", emphasizing the pupils' ability to do something, enabling them to be constantly protagonist and progressively aware of the motor skills gradually acquired (MIUR, 2012, p.76).

The school as an institution should focus on quality body education by creating the logistical, organizational, managerial, and practical conditions to ensure that recreational-motor-sports activities won't remain marginal, limited in the educational planning or practised for just a few hours a week. The preparation and training of teachers, instructors and coaches who work with children and young people should not be neglected either. In this regard, Emanuele Isidori, full professor of General Pedagogy and Sport, states that: "all those who work in the field of sport and motor activities develop, through a specific training, a pedagogical knowledge that allows

them to interpret and critically understand the educational values of these fundamental human practices and to be always engaged in the search for meanings and in experimenting new ways of teaching them “(Isidori, 2008, p. 12).

Providing learners with the chance to be aware of the potential of their body and mind also means making sure that the gym or the playing fields are not only the spaces strictly connected to motor-sport activity, but also the places for reflection, comparison and where it is possible to build one’s own bodily identity. The playground, gym, swimming pool become privileged areas that encourage meeting, dialogue, interpersonal relationships, cooperation, healthy competition.

It clearly emerges from the “National Indications for the Curriculum of the kindergarten and the first cycle of education” (MIUR, 2012) that it is important, from the earliest grades, to work didactically on the body, the construction of the personal identity, the enhancement of corporeality as a channel of knowledge and as a primary and main way of relating to ourselves, to others and to the world in which we are immersed in. In this sense, it becomes strategically necessary for the school to focus on its didactic intervention with the pedagogical and training intention of enhancing corporeality instead of limiting it through a mortifying, static and sometimes inhibiting school teaching (Collacchioni, 2016).

The fundamental task of teachers, instructors, and coaches, who work with pupils in developmental age, should be aimed at knowing how to develop, through movement and therefore through recreational-motor-sporting activities, the potential of children and young people starting from the analysis of their background, respecting their difficulties, needs and diversity.

The role of teachers is fundamental, as they can educate and involve all pupils in movement and motor play, taking particular care of those who appear shy, awkward, uncooperative, or those who are not very interested in movement or being active. The figure of the pedagogist-teacher is decisive so that none of the learners is neglected, put aside or marginalised. Each pupil must be given the best possible chances to feel involved in diversified and funny activities that must be properly tailored to them. Body and movement education involves the overall health and well-being of the person. It should positively influence the lifestyles of the subjects even in adulthood and can no longer be left to chance, but must be promoted and managed by competent professionals.

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