



Girls Do Not Sweat: the Development of Gender Stereotypes in Physical Education in Primary School

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Abstract

Despite efforts towards gender equality, from an early age, girls practice sport less than boys. Explaining this is paramount to psychology. Stereotypes about gender-appropriate behaviour play a key role in doing physical-sports activity. Based on the expectancy-value model, this study describes the gender beliefs of boys/girls regarding physical education. A total of 30 children (half-boys, half-girls) that were 4th- and 5th-year pupils (8–10 years) at two Colombian schools were interviewed using a semi-structured script focusing on open-ended questions. Interviews were recorded, transcribed and analysed. The results suggest gender differences in boys/girls already in the 4th year with respect to their abilities and the value they put on physical education based on a wide range of gender stereotypes. Specifically, boys/girls see football as a men's sport, while skating, handball and volleyball are perceived as women's sports. Furthermore, boys/girls have a dominant gender narrative that makes femininity subordinate to masculinity, thereby encouraging binary gender beliefs and practices. These stereotypes are reflected in their choice of activities and in how they use the school facilities, educing in this way the opportunities of both boys/girls as far as physical-sports activity are concerned. We discuss the findings emphasizing their relation to education and sociocultural influences. The conclusions suggest the need to make boys and girls more aware about gender equality, make changes to the activities and to how the physical spaces are used and provide equal teaching and learning experiences to reduce a divide still present in physical-sports education.

Keywords Gender differences · Physical education and sport · Masculinity and femininity · Development of gender stereotypes · Expectancy-value theory

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Generally speaking, many studies have documented the differences in school performance between girls and boys. However, most of this research has been focused on a small number of school subjects, in particular mathematics, languages and science (Guo et al. 2018; Mullis et al. 2017). The consequences these differences bring to bear on the pupils as regards their interests and university access have also been recorded (Buser et al. 2014).

One area of particular interest is sport. Given its status of social practice, how it is conceived may vary depending on the circumstances under which it is studied. Specifically, Colombia establishes *Physical Education, Recreation and Sport* as a mandatory subject and fundamental part of the basic education syllabus (Ministerio de Educación Nacional 1994). This has led to the establishment of the term *physical education* (PE), which encompasses both sport and recreation, each with different functions within the school education process (Ministerio de Educación Nacional 2000).

Although PE forms part of primary school syllabuses all over the world, less research has been carried out into its relationship with gender (Nicholson et al. 2010). Maybe this is due to the fact that PE has historically been considered a 'non-essential' subject (e.g. like music and arts) or as a break from 'real' learning (Kohl and Cook 2013; Stirrup 2020). This has contributed, for instance, to schools devoting more time to instruction in 'core' academic subjects (e.g. language, mathematics, science) (Kohl and Cook 2013), even when PE is a highly relevant subject contributing to the physical and psychological wellbeing along the whole lifespan.

In the first instance, research shows physical activity and sport provide a variety of benefits ranging from the prevention of illnesses such as depression and anxiety to the optimal development of the executive functions, memory, attention span and academic performance among other psychosocial variables in both boys and girls (US Department of Health and Human Services 2018). For example, during secondary education, sport has positive effects on the building of educational trajectories, identity formation (Eccles and Barber 1999), higher self-esteem and educational and occupational aspirations (Marsh and Kleitman 2003). Specifically, the participation of girls in sports activities before going to university generates benefits such as fostering positive body image, enhanced perceptions of physical competence, more flexible gender identities and higher self-esteem (Richman and Shaffer 2000).

Second, despite these benefits for both boys and girls, sport is historically and overwhelmingly dominated by men. Although internationally speaking, the participation of women and girls in sport has increased spectacularly over recent decades (Edelman et al. 2017; Messner 2003), more men and boys take part in physical and sporting activities compared to women and girls in countries like Spain (García 2017) and the USA (Daniels and Leaper 2006), and Colombia is no exception. Colombian boys and girls are not only a long way off from achieving the recommended amount of participation in physical activity for reasons of health and wellbeing, but also girls are less physically active and more overweight than boys, a situation that became markedly worse between 2005 and 2015 (Instituto Colombiano de Bienestar Familiar 2015).

Thirdly, there is a massive gulf between boys and girls as regards their interests in and the way in which they practice physical-sporting activities (Lores and Murcia 2008), as well as different dropout patterns (Guillet et al. 2000; Lores and Murcia 2008). Young women abandon practising sports more frequently than men, especially during adolescence (Isorna et al. 2013).

With these educational realities in mind, these differences cannot be exclusively attributed to physiological and genetic factors (Baron-Cohen et al. 2004). Studies such as this one support the

gender similarities hypothesis developed by Hyde. This holds that males and females are more similar than different in the majority of their abilities and psychological variables and that any differences are mainly the product of social constructs learned by way of differentiated socialisation processes and, to a lesser extent, biological influences (Hyde 2005, 2014).

It is important to understand the beliefs behind the choice and participation of boys and girls in physical-sports activities. To illustrate this point, three sections are presented below. The first corresponds to the development of identity and gender stereotypes. The second presents the expectancy-value model (EVM) developed by Eccles et al. (1993) and, finally, the importance of the two dimensions of the EVM, the development of the *expectancy beliefs* (EBs) and the *subjective value* (SV) are analysed in greater depth in order to understand what motivates boys and girls in PE.

Identity Development and Gender Stereotypes in Physical Education

Although when looked at in a neutral manner the practice of sport implies a healthy and active body, sport is strongly linked with cultural representations of masculinity (Messner 2003). Traditionally women participate to a lesser degree in certain sports as they see them as masculine and others attempt to conciliate their participation with the traditional standards of femininity and hegemonic beauty (Choi 2005). Specifically, the differences found between girls and boys regarding their performance levels in PE are based on the pressures they implicitly or explicitly received during the development of their gender identities (Eccles and Barber 1999; Eccles et al. 2000; Wigfield et al. 1997).

The concepts of *sex*, *gender* and *gender identity* are sometimes confused within different academic and social environments (García and Freire 2000) and, as a result, they require clarification. Sex alludes to the identification of the categories man, woman or intersex based on biological characteristics (genetic, gonadal and genital) (American Psychological Association 2012). In the main, people are identified using the binary categories man and woman. However, these do not suffice, according to Fausto-Sterling (1993), there are at least five sexes (i.e. male, female, hermaphrodite, pseudohermaphrodites, and male pseudohermaphrodites).

Gender, on the other hand, refers to the attitudes, feelings and behaviours culturally associated with sex (American Psychological Association 2012). Meanwhile, gender identity corresponds to the degree or sense of femininity, masculinity or something more (transgender) that every individual feels about him or herself (American Psychological Association 2012). This construct includes *gender role*, which refers to the pattern of appearance, behaviours and activities that have been culturally associated with masculinity and femininity (American Psychological Association 2012). In addition, gender identity is constantly performed in social situations (Butler 1999).

Boys/girls begin to develop their gender identity as of the moment they are born and continue doing so throughout their lives (Collins 2000). They acquire their social knowledge about gender via their interaction (Bandura 1986; Bussey and Bandura 1984). Boys/girls identify, observe and appropriate the behaviours they see as being socially inherent to each gender by way of differentiated socialisation processes and proceed to base how they behave on a feminine or masculine role (Martin and Ruble 2004). However, in our societies, these roles are presented differently. For example, the masculine role is more highly valued than the feminine. Also, by interrelating with other social categories (e.g. race, class), gender base

structures of power, privileges and disadvantages (Collins 2000), and in response to this, boys and girls differ in the way they learn and think about gender roles (O'Brien et al. 2000).

The main sources from which boys/girls acquire and develop their gender identities and stereotypes during childhood are family and school. To be precise, the family provides children with their first experiences of relations between men and women (Crespi 2004) and enables them to learn the social rules governing what boys and girls must be like (Ryle 2012). School is the first institution where boys/girls come into contact with gender-based social expectations in their interactions with both their peer group and with adults (Gestwicki and Bertrand 2011; Robson 2012). As of 3 and 4 years old, boys/girls actively participate in the construction of their gender identities and watch how other children are constructing theirs by appropriating a discourse on masculinity and femininity (Martin 2011).

In the same way, boys/girls learn the stereotypes and prejudices (affective responses) associated with certain groups (Bigler and Liben 2007). For example, experimental studies have revealed that teachers who made gender salient for their pupils (e.g. through physical separation, gender-specific language and gender-linked class organisation) can result in gender stereotypes and prejudices among children as soon as being 3 years old (Hilliard and Liben 2010).

Furthermore, the playtime materials and activities used during early schooling often represent traditional gender stereotypes. These encourage girls to perform more creative activities and boys to engage in more physical pastimes from earliest childhood (Laevers and Verboven 2000). It must be borne in mind that masculinity and femininity have multiple meanings that are socially construed (Vygotsky and Cole 1978) and, therefore, the activities performed in PE can be considered masculine or feminine depending on the society under study.

The stereotypes about activities deemed appropriate for each gender limit not only the beliefs of boys and girls regarding their competences but also the efforts they make to persist with an activity (Eccles and Barber 1999; Eccles et al. 2000; Wigfield et al. 1997). However, little research exists into how boys and girls develop stereotyped labels about PE. Research tends to typify sporting practice as masculine or feminine based on previous studies without confirming the existence of those stereotypes in other contexts (Lee et al. 1999).

The Expectancy-Value Model in Physical Education

The *expectancy-value model* (EVM) is drawn up based on a wide range of psychological and sociocultural determinants based on social cognitive theory (Eccles and Wigfield 2002). Among other factors, it combines the nature of the cultural environment (e.g. related to gender roles and occupational stereotypes), socialisation processes, the boys'/girls' perception (e.g. gender role, stereotyped activities) and their sociodemographic characteristics (e.g. gender, age), in order to provide an understanding of the pupils' performance and future choices in different subject areas (mathematics, languages, sport, among others) (Eccles et al., 1993). The EVM has two components, the expectancy beliefs (EBs) and subjective value (SV) that the pupils bestow upon the tasks (Eccles et al. 1983; Eccles and Barber 1999; Eccles 2009; Wigfield et al. 1997).

The EBs are made up of two subcomponents: The first of these is the individuals' beliefs in their abilities and their beliefs regarding their expectations of success with respect to performing a task. Belief in ability or academic self-concept is defined as the pupil's perception of his or her self-comparison ability and that of comparing him- or herself with everybody else (Eccles et al. 1983). Second, the expectations of success are defined as the boys'/girls'

belief about how certain behavioural patterns will lead to success. Both constructs are conceptually different, but in practice they are closely related, which makes distinguishing them empirically difficult (Eccles and Wigfield 2002).

The SV is defined as the incentives or reasons individuals have for taking part in a task or meeting diverse needs. Theoretically, it is made up of four subcomponents: *attainment value* (importance), *intrinsic value* (interest), *utility value* (usefulness) and *cost value* (Eccles and Wigfield 2002). The attainment value refers to the beliefs about the importance of performing a task to confirm or contradict salient features of the framework itself (e.g. masculinity, femininity, capacity for studying). The intrinsic value is defined as the enjoyment a task gives the individual. On the other hand, the attainment value refers to the belief that a task is applicable to the achievement of future goals. Finally, the cost value can be defined as the negative consequences of taking part in a task (Eccles and Wigfield 2002; Wigfield et al. 1997).

The EVM sets forth that both EB and the SV explain the gender differences in the performance and the choice of future activities within diverse educational areas (Eccles and Harold 1991). In other words, boys and girls have different beliefs when answering questions such as 'how will I perform the task?', 'do I want to do the task?' and 'why do I want to do it?' Boys generally see sport as more important, more useful and they have a higher self-concept than girls, all of which results in more boys than girls participating in this domain (Eccles and Barber 1999; Eccles 2009; Wigfield et al. 1997).

The Development of Expectancy Beliefs and Subjective Value in Physical Education

Longitudinal studies show that boys'/girls' beliefs related with sporting ability tend to diminish as they progress from the 1st to the 12th year (Fredricks and Eccles 2002; Jacobs et al. 2002). To be precise, when comparing the EBs in PE of 2nd-year pupils with those of their 4th-year counterparts, the older children reported more negative beliefs than the younger ones (Xiang et al. 2003). However, other studies showed more encouraging results on finding that the EBs, as well as the physical activities of the children during the transition from 4th to 5th year, do not diminish significantly (Gu and Zhang 2016).

Along similar lines, the SV regarding PE for the younger boys/girls is generally higher in comparison with their older counterparts and that it diminishes as their schooling progresses (Jacobs et al. 2002; Xiang et al. 2003). Though, the results vary in relation to the type of value. In some studies, the perception of boys' and girls' interest between the 1st and 12th years diminished slightly while the importance of sports showed a more pronounced drop among the older children (Fredricks and Eccles 2002). Likewise, after the pupils moved from the 4th to the 5th year, the perception of the importance, interest, usefulness and their intention to participate in sports in the future diminished significantly (Gu and Zhang 2016). Nevertheless, other studies report a decrease as the boys/girls grow older as regards their beliefs about importance and usefulness, but not in their interests in sports (Wigfield et al. 1997).

It is possible that the decrease in the importance, interest and usefulness of PE found as children grow is due to the fact that they become more able to distinguish the value that society itself gives to intellectual qualities developed through academic study versus sports activities. This should be understood within the context of the increasing concern by some federal mandates, schools and parents about academic achievement in mathematics, languages and sciences as pre-requisite of further educational trajectories (Hillman et al. 2009; Kohl and Cook 2013).

As far as gender is concerned, boys have more positive beliefs about their expectations than girls, as well as a greater intention to take part in physical activities (Gu and Zhang 2016). Specifically speaking, studies show that the differences between boys and girls as regards their EBs arise after 6 years of age and diminish as their school education progresses (Eccles and Harold 1991). On the other hand, other studies show that these gender differences in EBs and SV remain stable throughout one (Xiang et al. 2003) and three school years (Wigfield et al. 1997).

Based on the evidence outlined, more studies are required in order to gain a better understanding of the changes and differences between boys and girls as per the subjective values they place on the practice of PE throughout their school lives. However, in general terms, the results show that the demotivation of the pupils of both genders with respect to taking part in PE programmes can be observed in the 4th year, and it increases as the pupils grow and is higher in girls (Jacobs et al. 2002; Xiang et al. 2003).

Taking Part in the Physical Education Activities

Generally speaking, boys report higher self-concepts than girls as regards those physical-sporting activities stereotyped as masculine (Eccles et al. 1989), while girls have more positive beliefs about their abilities in PE stereotyped as feminine than their male counterparts (Clifton and Gill 1994; Gill 1992). Some studies have shown that gender identity is linked to the intention of persisting with or giving up PE activities, and this affects both the EBs and the SV. Some teenage girls and young women end up creating ‘double identities’ because of images depicting women as physically active, which is inconsistent with traditional ideologies of femininity (i.e. ‘femininity deficit’) (Cockburn and Clarke 2002). Furthermore, when women have a greater androgynous¹ and masculine orientation, they show a far higher rate of long-term participation in sport than those with a femininity orientation (Guillet et al. 2000) and dropout from stereotypical masculine sports less frequently (Guillet et al. 2006).

Most of the aforementioned studies have focused their interest on secondary school pupils and higher education students (Eccles and Barber 1999; Eccles et al. 2000; Eccles 2009; Guillet et al. 2000; Guillet et al. 2006; Sarrazin et al. 2002; Wigfield et al. 1997). It must be highlighted that the majority of these research projects were carried out on US or European subjects (Eccles et al. 2000; Wigfield et al. 1997). Very little investigation has been carried out in Colombia or the other Latin American countries to help gain an understanding of what motivates the youngest boys and girls in PE.

Likewise, the gathering of data has been predominated by the use of standardised questionnaires (Daniels and Leaper 2006; Jacobs et al. 2002), thus ignoring the wealth of information provided by interviews and observations in helping to understand the development of gender stereotypes in PE, and this limits their conclusions to a large extent. Many studies are oriented towards obtaining the statistically ‘significant’ differences between boys and girls, which is not necessarily the most important information required for understanding the nature of the internal representational change in children (Karmiloff-Smith 1981). In some cases, developmental psychologists have concentrated more on defining the age at which children engage in certain behaviours and, to a lesser degree, on how they process information (Karmiloff-Smith 1999). It is crucial to study developmental sequences and processes of

¹ However, another perspective rises that an individual can develop a continuum of traits and behaviours of both genders, identified as psychological androgynous (Bem 1974; Vafaei et al. 2014).

change in infant cognition to understand the workings of the boys' and girls' minds (Müller and Giesbrecht 2008).

To sum up, there is a lack of qualitative studies that examine these questions in the infant population. Therefore, it is absolutely necessary for us to improve our understanding of motivation with respect to sporting practice among boys and girls in primary education (Xiang et al. 2003). Many questions still remain unanswered in the literature on PE, such as, what is the relevance of the EBs and SV for the boys and girls in the practice of PE? And how do boys and girls develop the EBs and VS with respect to the practice of PE in light of their respective cultures? These are two of the questions that guided this study.

With the foregoing in mind, this study sets out to understand the gender beliefs, value and participation of the Colombian boys and girls in PE. Using a qualitative approach and in light of the theoretical expectancy-value model, we are particularly interested in exploring the development of stereotypical beliefs about gender identity, ability, intrinsic value, utility value, attainment value and participation in PE of boys and girls attending two Colombian educational establishments.

Method

This study is based on qualitative research in order to gain an in-depth understanding of the meaning people give to different phenomena in their daily lives (Creswell 2012), with the emphasis being put on the role of agent played by individuals when it comes to constructing meanings from reality (Bryman 2016). As we understand that reality is only comprehensible in the form of socially and experientially based mental constructions, whose content depends on the groups that support them, this paper falls within the constructivist theoretical paradigm (Guba and Lincoln 1994). Via the use of language as a frontline tool, the interaction between the participants of the research project—researcher, girls and boys—is employed to access the meanings being constructed by the latter. A phenomenological approach was used for the purpose of exploring the sense and the meaning PE has for the children based on their own beliefs and experiences (Creswell 2012).

Participants

Thirty pupils (50% girls, 50% boys) aged between 8 and 10 ($A_{age} = 9.00$, $SD = .70$) who were in the 4th (48.33%) and 5th (51.67%) years of primary education at two state schools in the city of Cartagena, Colombia, took part in the project. For the sake of convenience, the participants were selected using a non-probabilistic sampling method. Both schools are situated in an area with a medium to low socioeconomic level, are attended by pupils with similar sociocultural characteristics and have comparable fixtures, fittings and resources. As public institutions, and in accordance with decree 3020, one teacher is responsible for each primary school year (Ministerio de Educación Nacional 2002). For this reason, the 'support areas'—PE, English, art and computer science—tend to be distributed among the entire teaching staff. Specifically, in these two schools, PE was taken by primary education teachers qualified in other subjects such as mathematics and social sciences.

Procedures and Data Sources

The authors obtained the approval to go ahead with the project from the Ethics Committee of the Universidad Autónoma de Madrid. Later, they contacted the coordinators of the two schools to present the project. After agreeing to participate, the head teachers were asked for permission to contact the children's parents. The families were informed as to the objectives of the study, the methodological processes, the anonymous nature and the use of informed consent, which was signed by the parents in their capacity of legal representatives with regard to the participation of their children (American Psychological Association 2020; Colegio Colombiano de Psicólogos 2009).

The information was gathered using semi-structured interview techniques, which take the form of a flexible dialogue (Díaz-Bravo et al. 2013). This technique is based on a script with previously defined questions, but the sequence in which they are asked and the way in which they are formulated or the inclusion of additional questions varies with each of the interviewees (Blasco Hernández and Otero García 2008; Krause 1995). The script is developed from the review of the literature and the research questions and it consisted of five key questions:

Do boys and girls like the same or different things? What do you think of the physical education classes? How do you feel in the physical education classes? What do you think the boys/girls feel prior to performing a physical education task? Do you think boys are the same as or different to girls with respect to physical education?

A series of leading questions was also compiled and used in order to discover to which point the child is sure of the statements he or she is making (Delval 2001). These questions proposed alternative responses while maintaining the age and gender of the interviewee, for example: *The other day an x year-old (the child's age) girl/boy told me (the opposite to what the subject might have said); Do you think that boy/girl was right, or is what you say right? Why?*

The interviews were held by the first author during a single meeting with each interviewee in the months of March and April 2017. They were held in a spacious multipurpose room at each school reserved for the research activity, with every effort being made to ensure the conditions were similar in both schools. With the aim of encouraging communication and creating a pleasant atmosphere, the interviewer and interviewee sat opposite each other in chairs of the same height. The interviews lasted between 20 and 40 min, were recorded on audio and later transcribed verbatim using F4 software.

Analysis Plan

To analyse the data and establish the final categories we used three different coding processes: open, axial and selective (Strauss and Corbin 1998). Open coding was carried out with the aim of identifying concepts and dimensions. This took the form of a microanalysis that involved reading and rereading the accounts as the sentences or words related in the natural language of the children were labelled.

The data that were fragmented during the previous coding process were then regrouped using the axial coding technique, thereby establishing relationships between categories and dimensions and, in turn, in relation with the beliefs about PE category. Finally, the selective coding was carried out, thus identifying the five central categories described and analysed below in the principal results. In addition, the constant comparison method was used between the information that was being gathered and the categories that were emerging with the aim

being to validate the information gathered until the category saturation point was reached, with the surplus data being deleted.

Results

The analyses of the interview resulted in the creation of five central cores representing the spectrum of the accounts related by the children within the framework of this study, namely beliefs about ability in PE (male superiority vs equality in performance), intrinsic value (physical health and mental health), utility value (socialisation and training of sportspeople), attainment value (masculine vs feminine sports and featureless sports) and activities within PE (static activities vs dynamic activities). These transversal categories, together with their dimensions, enable a greater understanding of the boys'/girls' meanings, feelings and experiences, and these reflect an unequal social structure based on their gender stereotypes.

The results are presented in relation with the objectives of the study. Firstly, our analytical comments are set forth followed by a number of textual extracts taken from the interviews. All the names of the children used are pseudonyms.

Beliefs about Ability

When talking about their feelings and competences in the PE classes, allusions to a self-perception of a great ability both in boys and girls ($n = 29$) to achieve in PE were extremely frequent. Both the boys and the girls frequently used adjectives like good, very good or excellent to describe their achievements in this discipline. However, utterances changed when making comparisons between genders in PE with the appearance of stereotypical beliefs regarding academic performance. This first dimension has two categories, which go from male superiority to equality between boys and girls with respect to their abilities and achievements in PE.

Male Superiority

In the accounts quoted below, the participants came down, to a greater or lesser degree, on the side of male superiority ($n = 12$). It is worth highlighting that not one participant, irrespective of gender, considered girls to be far better than boys in PE. As far as the relationship between sporting abilities and learning is concerned, the participants consider that it is the boys who are more creative and that they act as instructors in front of the girls.

Superior...because the boys...they are, you know, more creative... or maybe they know how, how to stretch, how to do exercise; while some women cannot, and that's what makes the boys just that little bit better than the girls...maybe because they do not have the ability, or that they do not, that they cannot do it. (Ana, Girl, 5th).

In addition to believing that girls are less able to learn sports, some characteristics such as the lack of concentration stand out in the boys' answers to justify male superiority in the learning of sports.

The boys are more skilful, and they can do almost everything because they practice sport. Because when we are doing sport the girls start chatting while we always concentrate in physical education. (Lucas, Boy, 5th).

The stereotypical beliefs about male superiority are also evident with respect to physical appearance. The children's comments reflect the importance they place in perceived differences in terms of muscle development and agility to explain differences in sporting performance. Specifically speaking, the stereotypes related with the greater strength, sturdiness and power of the boys compared to the girls are frequently used to justify the stereotypical beliefs regarding the better overall performance of the boys in sport.

Some boys who say they are better at physical education... because as they are stronger, more... they have... they are more, like, more robust. (Bruno, Boy, 5th).

Sometimes the footballs are like really heavy and then they (the girls) cannot kick them properly, although they are also strong, but they get a bit bored with football. (Pedro, Boy, 4th).

On the other hand, the girls tend to use less forceful adjectives when referring to the practice of physical activity-sport associated with a lack of strength and speed. These adjectives are also frequently used when the girls talk about the competitions pitting boys against girls in the PE classes.

The boys better...some boys win and some girls lose... the boys...because they are faster and stronger. (Miguel, Boy, 4th)

The boys are better because, it's that they are... it's like a girl plays football and they, the girls, are weaker and the men aren't, and that's why I'm saying that the boys are better. (Viviana, Girls, 5th)

Equal Performance Levels

A lower number of pupils consider that the sporting performance of boys and girls is equal. However, these statements are only made by boys ($n = 3$). These participants told us that the degree of difficulty of PE activities varies, which also contributes to a greater diversity in performance levels.

It's the same, why, because some girls sometimes turn up and everything's normal, they start doing the exercise without any difficulty; some men find it difficult to do, other girls find it difficult and other men do it with, without difficulty. (Marcos, Boy, 4th).

The same, because some find the exercises difficult to do and others do not, like it can be a boy who finds it hard, who cannot touch his toes; or it could be a woman who has difficulties, who cannot touch her toes, and somebody else finds it easy. (Eduardo, Boy, 4th)

Intrinsic Value

This second category covers how much the children enjoy PE and their subjective interest in this discipline. The opinions gathered show that almost all the children ($n = 29$) enjoy taking part in PE, which has become a way for both boys and girls to improve their social, physical and emotional wellbeing, with the upshot being two dimensions we have denominated physical health and mental health. Neither boys nor girls said they were interested in PE for reasons of body appearance (e.g. because it made them look better).

Physical Health

A considerable number of the boys and girls interviewed mentioned that they felt motivated to perform the activities in PE for the effects they have on their physical health ($n, 17$). Allusions are also made in this dimension to the importance of sport as a tool for keeping illnesses at bay.

Me, I like it a lot because they make us do lots of exercise, and that keeps our bodies healthy (Nicolás, Boy, 4th).

We train and we make ourselves stronger so that we don't get ill and we stay healthy (Bruno, Boy, 5th).

Mental Health

Psychological wellbeing ($n = 7$) brought about by the PE activities was an important motivating factor for taking part in them among the 5th year girls. The girls not only refer to how important PE is with respect to bodily health but they also stress the its relevance for their mental health. By means of inward-looking self-discovery and imaginative processes, female pupils involve their thoughts and emotions within physical-sporting activities.

I'm taking pleasure in my imagination while doing it (PE) and I'm, while I'm doing this, I'm, I'm doing good things, I'm stretching and doing my body good, via the exercises and things like that. (Andrea, Girl, 5th)

For the girls, getting out of the classroom and doing PE gives them the chance to feel free, connect with their inner selves and with nature. This is especially true of the outdoor breathing, stretching and relaxation activities in which the girls place great value for attaining a state of wellbeing.

OK, I feel good, and that's because when you exercise, I feel really good, when I'm at home in the morning I exercise and when I exercise here I feel better because we use a playing field and you feel like free, free and you do your exercises, breathing fresh air and all that sort of thing and you relax, and then there are also the trees, we exercise in the shade (Victoria, Girl, 5th)

Utility Value

Within this third category there are two dimensions and these enable us to understand the boys' and girls' more 'extrinsic' motivations for doing PE, such as the positive values of spending time with their friends (socialisation) and improving as sportspeople (training of sportspeople).

Socialisation

Compared with other subjects such as mathematics and languages, PE is classified as one of their favourite subjects by both the girls and the boys ($n = 20$). In PE, there is a lot of emphasis on teamwork activities, and this allows the pupils to spend time with their friends. The participants stress that this subject gives them the chance to enjoy themselves with their classmates while doing PE, recreational and sports activities.

We really enjoy ourselves because we play sports that are great fun (Bruno, Boy, 5th).

Regarding physical education, or rather sport, recreation, when you go over to the kiosks. like we did yesterday, it was our turn to do physical education and we were playing ... playing a little bit of everything. Fun, that's why I really like physical education. (Samuel, Boy, 4th)

Training of Sportspeople

Those pupils who are enrolled in extracurricular sports activities find this subject to be extremely useful for achieving their goals in the sport they are practicing. In this sense, the subject has a positive value as it allows the boys and girls to train, warm up, recover from injury and perfect their techniques when pursuing other sporting interests.

As I practice sports, it stands to reason that physical education helps me with my body and keeps my bones and joints and everything completely pain free. (Hugo, Boy, 4th)

Attainment Value

The importance the boys and girls place in doing PE is closely linked with the type of physical-sporting activity they perform to confirm their gender identities. This fourth category encompasses two dimensions, masculine vs feminine sports and featureless sports. The responses of most of the boys and girls, both 4th and 5th year, reflect stereotypical beliefs that fall within the existence of feminine or masculine sports, presented in a limited way. However, the latter stance recognises sporting interests regardless of the children's gender.

Masculine Vs Feminine Sports

Both the boys and the girls hold beliefs regarding the normative identity of masculinity and femininity respectively, where the physical-sporting interests and practices are associated with their genders. A considerable number of the boys ($n = 9$) and girls ($n = 11$) see football as being a mainly masculine sport, with the same applying to baseball, although the latter receives less mention ($n = 3$). The pupils consider that boys develop a greater liking for and interests in these sports and that they play them more than the girls.

Girls do things like skating, things like that... Play basketball... The boys like playing football, football and more football. (Ana, Girl, 5th).

Specifically, playing football involves a series of patriarchal rules related with the strength and aggression attributed to the boys ($n = 9$). The fact that girls are represented as fragile ($n = 7$) and, therefore, less interested in this sport, makes this a masculine type sport.

Because for the girls (football) is a little boring and very aggressive, more aggressive than all other sports. (Juan, Boy, 5th).

(girls do not play football) because they could get a broken leg, and boys are able to put up with a bit more. (Miguel, Boy, 4th)

Girls avoid physical confrontations that might see them getting hurt by an opponent or picking up a self-injury. Girls are seen as being a feminine heterosexual being, fragile and weak, namely situations that maintain a gender hierarchy in this sport.

Because (football) is very rough, the use of feet means I could get kicked and I might fall over or get hit, therefore no, I prefer handball. (Lizeth, Girl, 4th).

I don't like it, because when I play football or, in other words, I fall over, and if I fall over, I no longer enjoy myself. (Victoria, Girl, 5th)

On the other hand, most of the boys and girls believe that handball ($n = 6$), skating ($n = 5$) and volleyball ($n = 4$) are feminine sports. Also, other sports practiced by girls such as basketball, dance, swimming and athletics are mentioned in the interviews, but with less frequency ($n = 6$). Therefore, the girls have more alternatives established as 'purpose made for their gender', while the boys mainly limited themselves to football.

The girls prefer handball...Because now it is more of a girl's than a man's game. For example, my cousin, who's a woman, prefers volleyball, my female neighbours like playing pure volleyball, they do not like playing any(thing) else but pure volleyball. (Marcos, Boy, 4th).

In addition to this, boys and girls enact their notions of masculinity and femininity in sport. In addition to fostering difference and stereotypes in sport, these findings show that the dominant social rules on gender do not appear to leave space for the integration of boys/girls who do not fulfil a hegemonic gender identity.

The boys play other manly things such as, for example, football, basketball, and the girls play volleyball, womanly things, swimming and the like ... Volleyball is more for the feminine sex. (Mario, Boy, 5th).

The boys like playing football...the girls do not like football so much...because it is a boring sport and, as the men say, it's for men only. (Ana, Girl, 5th).

The feeling of being a girl or a boy is made up of fixed roles and features in sport. As a result, the boys/girls try not to act in a way that goes against their feelings. Furthermore, the boys and girls regularly attribute the gender role to themselves and to their classmates. For example:

The boys all like the same thing or rather, they like football, here in physical education...none of the girls like football...I do not like football because it makes me feel like a man and I do not like that. (Victoria, Girl, 5th).

In addition, sweating is a feature that the girls ($n = 3$) associate with masculinity. They also use sweating to justify their lack of interest in certain sports. They identify themselves as being less hectic when performing their activities.

The boys, they like running, they like sweating a lot, they really like playing football, getting dirty. (Sara, Girl, 4th).

The boys have, like, more energy than the girls, because the girls are, like, a little calmer and the boys are not quite so calm. (Laura, Girl, 4th)

Featureless Sports

Very few participants considered a particular sport as an activity for all genders. Only a couple of boys ($n = 2$) considered that the same sports could be enjoyed by both boys and girls and be practiced irrespective of the participants' gender. In this sense, the girls did not identify any sport as mixed.

There are some girls who like playing football and others...and men also like playing football... it's a genderless sport, it can be played, football can be played by men, football can be played by women. (Marta, Girl, 4th).

Both genders like sport, both the girls and the boys. (Pedro, Boy, 4th)

Physical Education Activities

The fifth category refers to the activities the boys and girls perform during their breaktimes and in PE classes. The boys/girls report that during PE classes they perform physical activities involving all the pupils, with this being followed by a free games or sports period in which boys and girls perform different activities. Furthermore, boys and girls are spread across different areas of the schools resulting in different dynamics between genders.

Static Activities

The girls are usually grouped together to play board games in PE, to play with dolls or just chat amongst themselves, with very few boys engaging in these activities. What is more, the girls usually bring their own resources with them to perform these activities. The girls tend to spread themselves around the areas adjoining the playing field or walkways, occupying smaller and less centralised areas than the boys.

That's what we girls do, play with our dolls. (Gina, Girl, 4th).

The girls play educational games or sometimes we go to the park. (Mara, Girl, 4th)

Dynamic Activities

During the PE classes, the majority of the boys play football. Likewise, at breaktimes, many of the boys use their plastic drink bottles as balls for playing football as they do not have access to sports equipment at these times.

The boys also play on the school football pitch or create imaginary pitches. Another group of boys, although smaller, plays baseball, for which they use the plastic caps of their drinks bottles. The girls do not take a direct part in these sports activities alongside the boys. To be precise, during breaktimes, not one girl plays football. Instead, the girls play passive roles as cheerleaders and spectators of the masculine teams. The daily life that unfolds at the schools during breaktimes and the PE classes shows that it is the boys who make far more use of the public spaces and engage in physical and dynamic activity than the girls.

The boys use the pitch for playing football. (Mara, Girl, 4th).

When we do physical education, it's the boys who like playing football, but there are some girls who run a mile. (Julia, Girl, 4th)

Discussion and Conclusions

Bearing in mind the five transversal categories that emerged in the analytical process, we present the following discussion topic and conclusions based on the available literature and background. We do so without being able to affirm that the findings can be generalised or are representative of all primary schools in Colombia.

The first conclusion of this study is that as of the 4th year the boys and girls believe they are more different than similar, with a specific example of this being that the boys are classified as being physically and psychologically superior with respect to their performance in PE. These PE-related EBs among the boys/girls are based on biologicistic ideas, in other words, in their view, it is the biological differences that explain an apparent superiority of the boys as regards their physical-sporting abilities. These differences define identities of masculinity and femininity, both fixed and inconsistent. Femininity is presented as weak and fragile as opposed to masculinity, which is seen as being powerful, aggressive and strong. These gender role expectations could be a dominant influence in men's behaviour, especially when it comes to respecting sport rules. Several studies have found that many youth and adolescent men consider different forms of aggression as legitimate (e.g. inflicting pain, intimidating) and are more likely to show aggressive behaviour in sports compared to women (Shields et al. 2007; Tucker and Parks 2001). Conversely, although not always highlighted, girls and women value more cooperation and community-building than winning (Lenskyj 1994).

Boys and girls participating in this study have a dominant gender discourse that subordinates femininity, favours masculinity and fosters binary gender beliefs and practices. These results agree with those found in other studies where the beliefs and expectations expressed by the boys regarding their sporting abilities are more positive and higher than those of the girls (Eccles and Barber 1999; Eccles 2009; Wigfield et al. 1997). In the same vein, research undertaken in Latin America also reflect a dominance of the masculine over the feminine, where the boys consider themselves as more able in PE than girls, on the basis of their physical capabilities (Jaramillo and Sevilla 2006; Scharagrodsky 2001).

Following the same logic, the attainment value is based on the pupils' need to take part in physical-sports activities that confirm their masculinity or femininity. This claim is backed up by the fact that boys and girls state they are strongly attracted to and motivated by different physical-sporting activities, with these being identified by the participants as gender-specific. These results coincide with other studies in which primary school boys and girls consider sports to be divided into masculine and feminine (Blández et al. 2007; Schmalz and Kerstetter 2006). For example, a group of Spanish boys said they were more attracted to football, followed by other sports such as rugby, basketball, handball, swimming, hockey and tennis, while the girls showed greater motivation towards activities related with dance, followed by sports like swimming, basketball, volleyball and padel (Blández et al. 2007). It must be said that football is seen as being a masculine sport and dance as a feminine activity, both in the aforementioned study and in this one. Other sports, however, such as handball, basketball,

swimming and athletics were classified by the Colombian boys and girls taking part in this study as feminine, whereas those same sports were identified as 'masculine' by the Spanish children. Having said this, a number of sports such as rugby, hockey and paddle tennis are not usually played in some Latin American countries, including Colombia. When interviewed, both boys and girls convey a dualism in relation to gender by interpreting practices inherent to each gender, with their culture playing a crucial role in the development of stereotypical labels regarding sport, the meanings of which change in the light of the social context influence.

The boys/girls limit their own sporting opportunities by having stereotypical beliefs and behavioural patterns about gender in their physical-sports activities. It is important to stress the disadvantages faced by the girls from 4th year in terms of their low involvement in physical activities and their stereotypical beliefs concerning sweating or running as a masculine and not a feminine characteristic.

The very existence of these dichotomies produces and regulates unequal power relations between boys and girls. Therefore, interactions feature inequality experiences resulting from the historical context that subordinates girls' bodies (Foucault 1994). It is also clear that femininity is the object of an emphatic normalizing discourse based on the dominance of patriarchy that exalts canons of beauty and an immobile body, putting 'looking good' before being in good health.

Another cause for concern is the fact that the children taking part in the study only practiced two sports, thereby making it necessary to get them involved in a greater variety of sporting activities. The results of a number of research projects show that gender labels lead to social exclusion (Jaramillo and Sevilla 2006; Messner 2003), erode capacity of choice and the authenticity of boys and girls (Brinkman et al. 2014) and become barriers to gender equality (Martin 2011).

On the other hand, there is a large variety of subjective interests determining why taking part in PE (Seippel 2006). For instance, through PE, children enjoy and improve their social relationships and their physical and mental health. However, gender also affects interests. Girls, for example, show more interest in psychological wellbeing than boys. As we have already pointed out, the decision to participate in the physical and sport activities is motivated by the individual's beliefs about their ability and their perception of the value of the activity (Wigfield et al. 1997). The information provided by the different socialisation agents such as the family, teachers and the mass media can affect boys' and girls' decision-taking processes.

In the light of this, we recommend the intervention of the schools by way of actions specifically targeting both boys and girls and resulting in an increase of daily physical activity. The lack of physical and sports activities during childhood has significant consequences for the health of boys and girls. In particular, a high number of boys and girls are overweight or obese, and this can result in heart disease, diabetes and certain types of cancer in later life (Sallis et al. 1992; US Department of Health and Human Services 2018). We must therefore channel our efforts into promoting the physical and psychosocial development of all our children as soon as possible (Gu et al. 2016). Which may involve devoting more efforts to girls in certain cultural environments where opportunities for them to explore their possibilities as sport and physical exercise practitioners are less frequent.

To do so, it is necessary to work on being more flexible, be it in the schools, media, family and educational and government institutions, which in turn must not only ensure gender equality and equal opportunities in the practice of physical activities and sports but also motivate both boys and girls to participate in sports irrespective of the social stereotypes regarding masculinity and femininity. It is a fact that those people who behave androgynously

are better able to adapt, both mentally and physically, than those who only identify themselves as masculine or feminine (Bem 1974; Vafaei et al. 2014). In other words, society still has to disrupt the binary view of sex and gender, as well as the illusion of two natural and essential categories (Butler 1999), which until today serve to justify prejudices and stereotypes.

In some schools, children cannot express freely through their bodies, because they are likely inhibited by different disciplinary mechanisms that exercise control over their body, within educational processes (Bargas et al. 2020) The educational institutions have a great opportunity to transform themselves into benchmark social frameworks that enable boys and girls to transcend the stereotypical impositions so prevalent in PE.

This would entail making every necessary effort within the school environment to create a positive climate that, in addition to fostering participation, keeping in good physical shape and healthy habits and lifestyles, promotes social inclusion, harmony, respect, peace and the value of plurality and identity. To achieve this, it is recommended to promote mixed and varied activities both at break times and in PE classes. Segmented PE perpetuates discriminatory ways and habits that reproduce outmoded and ingrained beliefs of strong, dynamic boys vs fragile and immobile girls (Jaramillo and Sevilla 2006; Young 2005).

Another recommendation is for families to encourage boys and girls to participate in a variety of sporting activities as this would reinforce their children's development. This is of prime importance as it is fathers/mothers who have a greater influence as socialising agents in inspiring expectancy beliefs and sporting values in their children compared to their teachers in primary school (Eccles et al. 1983). By fostering tolerance and respect, sport must be seen as a facilitator of development and coexistence, a promotor not only of health and education but also of social inclusion (Assembly 2015).

The gender perceptions of both teachers and families play an important role in the academic performance of both male and female pupils (Eccles et al. 1983). There are some teachers who believe that boys and girls already exhibit physical, biological and psychological differences at their first years at infant school (Wingrave 2018). This only goes to show that classrooms are not free of gender stereotyping and prejudices on the part of adults who, via the use of different strategies, perpetuate binary gender practices (Callahan and Nicholas 2019; Martin 2011). We therefore propose training families and the teaching and administrative staff in the gender perspective. In this way, adults with a better understanding of gender and sport can provide boys and girls with fairer and more balanced learning experiences, thereby narrowing the existing gap between the performance levels of boys and girls in PE.

Both stereotypes and prejudices can be shaped by educational, social and legal policies (Bigler and Liben 2007). It is necessary to put gender and PE back on the agenda of the Colombian Ministry for Education so that teachers qualified in PE can be sent out to work in the country's state schools. In addition, the schools must ensure diversity among staff in all their subject areas. A visibility of a diverse cross-section of men and women working in our schools is a crucial objective for improving educational quality (Gestwicki and Bertrand 2011).

One of our main limitations is having the boys/girls as our sole sources of information. The family plays a crucial role in the construction of gender identity and stereotypes. It is the core of socialisation processes (Crespi 2004; Ryle 2012). Therefore, knowing and understanding how families interact in their daily lives could increase what we already know about the possible transmission of gender stereotypes regarding the practice of physical-sports activities by boys and girls. Specifically, it would be interesting that future research projects explore these analysis units in diverse households among boys and girls to observe the possible existence of a differentiating pattern in beliefs about sporting activities.

Extending the research of gender stereotypes to early years is a critical and significant need (Gestwicki and Bertrand 2011). We argue that more attention must be paid to understanding the development of the stereotypical beliefs of boys and girls that guide their motivations regarding the performance of physical-sports activities in other social contexts.

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Authors' Contributions CC, AM and CB designed the study. CC collected the data. CC performed the data analysis. CC, AM and CB wrote the manuscript.

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Data Availability The datasets of this study are not available in public repositories but can be provided upon reasonable request.

Compliance with Ethical Standards

Conflict of Interest The authors declare that they have no conflict of interest.

Ethical Approval The research ethics committee of Universidad Autónoma de Madrid (Spain) has reported favourably on this research under the code CEI-68-1203 (January 26, 2016).

Informed Consent The study was carried out by professionals that are aware of the ethical standards that apply to research involving human participants. The interviewees and their families were given details about the team carrying out the research and informed of the purposes of the study, and they agreed to participate before starting to answer the interview. No personal information that could allow to identify the participants was stored by the research team and the data was used only for research purposes.

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