## Parents' Reasons to Enroll Their Daughters in an All-Girls School<sup>1</sup>

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#### Abstract

Research about school choice often leaves gender out of the equation. This omission becomes salient in a context in which a gender gap affects girls at school. Among the proposed interventions, single-sex schooling—its advocates say—emerges as a convenient proposal, as it is related to several advantages for girls, particularly disadvantaged ones. Some experts argue that enrolling their daughters in single-sex schools requires parents to make a pro-academic choice, which contributes to the creation of an environment that explains those advantages. This pro-academic choice assumes that parents know the advantages that single-sex schools offer to girls beforehand, and sustain several positive beliefs towards them. To explore this rationale, reasons for enrolling their kindergarten daughters in an all-girls school were collected among a group of parents (n = 18), and compared to parents' (n = 17) of girls enrolled in a coeducational school. Both schools served a working-class population. Descriptive statistics and inferential analysis showed that for parents of single-sex schoolgirls, the most important reasons were pedagogical (curriculum, achievement, teachers) and pragmatic (near home, free). Only parents' age was associated with preference for single-sex schooling. Nonetheless, the parents of the all-girls school hold positive beliefs regarding this type of education.

**Keywords**: school choice, educational choice, girls' education, educational grouping, coeducation, single-sex schooling.

# Причины, по которым родители отдают дочерей в школу для девочек

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#### Аннотация

Исследования, посвященные выбору родителями школы для детей, часто не учитывают фактор пола. Это упущение становится заметным, когда гендерный разрыв в школе затрагивает девочек. Среди предлагаемых решений – раздельное обучение, которое, по словам его сторонников, представляется весьма подходящим, поскольку оно связано с рядом преимуществ

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для девочек, особенно из неблагополучных семей. Некоторые эксперты утверждают, что стремление записать дочерей в школы с раздельным обучением обусловлено поиском благоприятной образовательной среды. Этот выбор предполагает, что родители заранее знают о преимуществах раздельного обучения для девочек и позитивно относятся к нему. Чтобы подтвердить это предположение, выявленные причины зачисления дочерей в первый класс школы для девочек (n = 18) были сопоставлены с причинами, обозначенными родителями девочек (n = 17), зачисленных в школу с совместным обучением. Обе школы примерно равны по социальному составу обучающихся и обслуживают рабочее население. Описательная статистика и логический анализ показали, что для родителей детей из школ для девочек наиболее важными факторами выбора были академические (учебная программа, успеваемость, учителя), а также прагматические (школа рядом с домом, бесплатное образование). Возраст родителей связан с особым предпочтением раздельного обучения. Исследование показало, что в целом родители детей, посещающих школы для девочек, положительно относятся к такому типу образования.

**Ключевые слова**: выбор школы, выбор образования, образование для девочек, совместное обучение лиц обоего пола, раздельное обучение.

#### Introduction

Recent years have seen the flourishment of an important corpus of literature that explores parents' motivations when choosing a school for their children. In Spain, the subject has raised new interest among researchers. However, despite being particularly sensitive, gender has been a scarcely explored variable in this field. Noteworthy is how little attention parents' preference for exclusively female or male education has received, in opposition to preference for coeducation. The first phenomenon, which consists in serving boys and girls separately—whether in different classrooms, or in different schools—is usually called *single-sex schooling* (SSS). This type of grouping, formerly prevalent in the Western world (Gordillo, 2015), has experienced a resurgence in various countries (Barnils, 2009), on many occasions accompanied by justifying explanations by its advocates. This phenomenon has sparked an important debate both in the news and in academia. Some have noticed that, on many occasions, this debate has been monopolized by religious, political, or even ideological arguments—nonetheless, a valuable amount of high quality evidence has been accumulated that has found favorable results for both modalities (Gordillo, 2017).

Some of this evidence appears to be particularly favorable for girls. In South Korea, where until 2009 students were randomly assigned to the any of the country's schools, girls from single-sex schools performed better in mathematics (Kim & Law, 2012) and in other curricular areas as compared to their peers from coeducational schools (Park, Behrman, & Choi, 2013). In a meta-analysis that included 1.6 million students from several countries, Pahlke, Hyde and Allison (2014) found an effect size of 0.22 in favor of girls from single-sex schools in verbal performance. A smaller meta-analysis found an effect size of 0.18 also favorable to girls from single-sex schools in the same area (Signorella, Hayes, & Li, 2013). Other favorable results include Malacova's (2017), who in a national sample from England found that SSS was associated with a better academic result, particularly for disadvantaged girls. It is fair to mention that there is also evidence for the contrary—for example, also in South Korea, Sohn (2016) found null results, and the same happened to Pahlke, Hyde, & Mertz (2013).

Beneficial results seem to include socio-emotional outcomes as well, particularly in regard to self-confidence (Eisenkopf, Hessami, Fischbacher, & Ursprung, 2015), self-concept (Kessels & Hannover, 2008), choosing STEM subjects in school and later during lifespan (Sullivan, Joshi, & Leonard, 2017), and reducing gender stereotypes (Pahlke et al., 2014). In Spain, Vázquez Alonso and Manassero Mas (2008) found that among girls from single-sex schools there was also a greater probability of choosing science subjects; Camps

Bansell, Selvam, and Sheymardanov (2019) found that students from all-girls schools had better conflict resolution strategies than girls from mixed schools.

The evidence becomes particularly salient when considered alongside studies that document the existence of a gender gap that affects girls in schools. For example, there is evidence that girls receive less attention in the classroom from their teachers (Beaman, Wheldall, & Kemp, 2006; Wellesley College Center for Research on Women, 1995), and are affected up to a greater extent than boys when teachers show prejudice towards students (Camps Bansell & Vidal Rodá, 2015; Damico & Scott, 1987). Some argue that these issues affect their self-esteem (Cribb & Haase, 2016), as does the potentially rude treatment that they may receive from boys in mixed environments (Gordillo, Cahuana Cuentas, & Rivera, 2016). In fact, some testimonies from female students seem to support this claim (Camps Bansell, 2015).

Considering the aforementioned gap, as well as the favorable results of SSS for girls, some view SSS as an interesting preventive or remedial intervention for them (Arms, 2007; Bowe, Desjardins, Clarkson, & Lawrenz, 2015; Salomone, 2001), particularly if they come from disadvantaged backgrounds (Jacobs, 2015; Lee, 1998; Riordan, 1998). Do parents consider this information when choosing an all-girls school for their daughters? Is the choice of this type of school a conscious option for SSS and the reasons that their advocates propose? In fact, some experts report the existence of a popular belief that considers single-sex schools being good for girls (Hunter, 1991; Jackson & Bisset, 2005), particularly in academic outcomes (West & Varlaam, 1991).

Some experts argue that a deliberate option for a single-sex school is a central element that contributes to educational success. Cornelius Riordan, an American sociologist who investigated the school effects of both types of grouping for several decades, states that a "pro-academic choice" is the "key explanatory variable" of the good results at these schools (Riordan, 1998, p. 56). His thesis begins by recognizing the existence within schools of "youth cultures" created by students (Riordan, 2015, p. 51). Many of them are not only unrelated to academic values, but also clearly opposed to them. These youth cultures divert students' energy from academics to other activities or values such as sports, social life, physical attractiveness, or popularity; others do it towards violence, indiscipline, breaking the law, harassment, use of prohibited substances, among others. Riordan asserts that anti-academic subcultures predominate in coeducational schools; in single-sex ones, on the contrary, pro-academic cultures predominate, which materialize in the presence of more order and control. In this way, if parents consciously seek a school environment that privileges academic values instead of anti-academic ones, and for that reason enroll their son or daughter in a single-sex school, they would be making a proacademic choice. Riordan affirms that this option becomes more robust if it is shared not only by parents, but also by teachers, administrators, and even students. This "shared set of values" (Riordan, 2015, p. 53) turns itself to be the key element that makes the school exert positive effects on the students, particularly if they are girls, who come from disadvantaged contexts, and if the option for a single-sex school takes place in a society where this type of schooling is scarce (Riordan, 1998).

#### Literature review

As mentioned earlier, although there is relatively abundant literature on motivations for choosing a school, not so many studies incorporate gender into the equation (Jackson & Bisset, 2005). In a small sample from the United Kingdom, West and Varlaam (1991) found that a quarter of parents in their study (26-31%) stated that if it were possible for them to choose a school for their children (in the UK of the eighties this possibility was very limited), the fact that it was single-sex would have been an important criterion

to consider. In fact, more than 50% of parents of girls expressed that opinion. This contrasts with the smaller number of parents (18%) who considered important the fact that the school was coeducational. Even though it was true that 49 % of parents declared that for their children's next educational level they preferred a coeducational school, the number of those who preferred a single-sex one was very similar and not negligible—43 %, almost half of the sample. Also in the UK, and after the 1988 Education Reform Act (which gave parents more freedom to choose schools), Hunter (1991) performed 289 interviews to parents of boys and girls from first grade of high school, both from singlesex and coeducational ones. She found that their respondents considered SSS to be an important factor. Actually, for almost one third of them, the fact that it was a single-sex institution was one of the most important reasons for having chosen it—it was in the third place, below good discipline and good performance in exams. The majority of those who thought of SSS as an important choice criterion were, in fact, parents of girls enrolled in all-girls schools, while no more than 5% of interviewees with daughters enrolled in coeducational schools, or parents of boys, thought that way. However, opposite results were found in the UK as well. Jackson and Bisset (2005) explored the reasons of a group of parents of boys and girls from three independent schools for enrolling their children whether in a single-sex or in a coeducational one (the three schools covered all school levels). The researchers found that school grouping was not the main reason for school choice—these were school reputation and school results in national standardized tests.

In Barcelona, Ignasi Pérez carried out a study in two single-sex private schools, since he perceived that in the debate between SSS and coeducation, parents' opinion was missing—his study aimed to know the reasons behind the choice of this type of schools (Pérez Ribas, 2017). He carried out his study in two concerted schools—an all-girls one, and an all-boys one. Both schools belonged to the same sponsoring institution, which explicitly recognizes a Christian identity indebted to the founder of Opus Dei. The latter is a Roman Catholic international association, originated in Spain. One of the ideas that Pérez wanted to verify was that among parents' option for a single-sex schools, religion played an important role, probably because "the majority of single-sex schools in Spain are associated to Opus Dei" (Pérez Ribas, 2017, p. 22). Pérez thought that some kind of consonance might exist between the Catholic orientation of the schools and that of the parents. In some way, he sought to verify the existence of a link between SSS and Catholic Church, particularly, with Opus Dei within it, a narrative that some believe that is prevalent in Spain (Vega Vega, 2012). In addition to that—and similarly to what our study pursued—Pérez wanted to explore the extent to which parents of these schools were aware of the SSS model because they previously obtained information about it, and if among them there was a belief—particularly for parents of girls—that in this type of schools there were more opportunities for students in terms of gender equality.

Pérez designed an anonymous survey that parents could fill online. He obtained 323 filled surveys from both schools, from parents of children of nursery, elementary school, and high school. Using descriptive statistics, and contingency tables, he found that for the parents of the sample, the main reason for having chosen these schools was, by far, the fact that they were schools with a Catholic identity. The good academic results of both schools were at the second place. Both schools' prestige was the third most important reason. There was a relatively important association between the fact that the mother was a graduate from an all-girls school and the preference for SSS. In addition to that, and as the author supposed, the majority of the parents had knowledge of several details of the SSS model offered by the schools (Pérez Ribas, 2017). However, Pérez did not report if parents acquired the information about the characteristics of SSS before enrolling their

children in the schools, or if it was a product of the many informative initiatives that these institutions run in order to defend their position.

The last outlined point is particularly salient. It is safe to say that without knowing where the parents' knowledge about SSS comes from, it is difficult to assess the reasons behind the election of these schools. Therefore, while Pérez worked with a sample conformed by parents from all school levels, our study worked with parents of kindergarten girls only, under the assumption that the closer the surveyed parents were to the moment of school choice, the less likely was that they could distort any memories about the process. It is important to note that in Spain the majority of schools offer kindergarten, elementary school, and high school in the same building. Children who start their school life in the first year of kindergarten will remain in the same school until the last year of high school. Thus, the school choice process happens only once, typically right before the first year of kindergarten. The intention was to have a sample that was as far away as possible to have received any training on SSS advantages from schools after the children's enrollment.

Given the aforementioned educational gap that affects girls in Western schools, the aim of our research was to find out if among parents in Spain there were elements that allowed us to suppose that the option for this type of school is an informed and positive decision in favor of SSS and its remedial or beneficial effects for girls.

## Methodology

The study was carried out in Valladolid, Spain. An all-girls school was chosen, where parents' information could be collected. It was a school located in a working-class neighborhood, which served lower-middle and low socio-economic status (SES) students. To enrich the analysis, it was decided to include a coeducational school in the study, comparable to the first one. This decision was partially motivated to overcome a limitation seen in the Pérez's study (2017), who only collected information from single-sex schools.

Both schools were concerted ones (i.e., public in funding, but privately managed), and ruled by different Roman Catholic nun congregations. The single-sex school (hereinafter, SSS) offered kindergarten and elementary school, and had 195 girls enrolled. According to the principal, it is chosen by families of lower-middle SES. In the first and second years of kindergarten, there were 23 girls. The coeducational school (hereinafter, CES) offered kindergarten, elementary school, and high school, and had 650 students enrolled. According to the principal, it served a low-income population. In the first and second years of kindergarten there were 80 students, 44 of which were girls. Both schools were located a few blocks away from each other.

The exploratory design had some guiding questions:

- a) Knowledge of SSS effects and enrollment decision: Do parents know the effects of single-sex schools before making the decision to enroll their daughters in them? Is this knowledge related to the enrollment decision?
- b) Beliefs about SSS and enrollment decision: What is the degree of agreement of parents with some widespread beliefs regarding single-sex schools? Is this degree of agreement related to their decision to enroll their daughters in this type of schools?
- c) Religion and enrollment decision: Is the enrollment of girls in single-sex schools related to religious reasons (i.e., Opus Dei membership, religion, etc.)?
- d) General reasons for enrollment decision: What are—in general—the reasons of parents for choosing a single-sex school for their daughters? What are the reasons of parents of girls from the coeducational school for not having enrolled them in any single-sex one?

In each school, a questionnaire was filled by parents of girls from the first two years of kindergarten only. The reasons for this were the following. In first place, it is reasonable to assume that when more time elapses between the process of choosing a school and the data collection by the researcher, it is likely that there could be forgetfulness, cognitive distortion, or even fabrication of memories (Loftus, 2003; Mazzoni & Memon, 2003). It is also possible that the longer a student has been enrolled in a school, the more likely for them or their parents to generate biases towards the school, maybe because of the positive or negative experiences that they may have. In fact, some other studies have followed this criterion because of the same reasons (Jackson & Bisset, 2005), and there is evidence that different answers are collected when the inquiry for reasons of enrollment takes place while children are already studying in the school and when the inquiry happens before (West & Varlaam, 1991). Therefore, it is safe to assume that by taking information from parents of the grades that are closer to the decision-making process, the aforementioned risks could be limited. In the second place, experience shows that many single-sex schools—particularly where they are a scarce option, or when they position themselves as a countercultural institution—tend to offer an important volume of information about the benefits of SSS, and the reasons why the school has chosen the SSS setting. It is reasonable to assume that having the sample of parents exposed to this possibility for an extended period of time increases the risk of biases in their responses. Therefore, it was considered safer to survey parents who had just joined the institution and had very little opportunity to be exposed to this kind of training.

Finally, the sample consisted of 18 parents from SS School (51.4%), and 17 from CE School (48.6%).

Survey

An adaptation of Pérez's survey was performed, since it was the only questionnaire on the topic written in Spanish. It was made by Pérez ad hoc, and followed guidelines from the Spanish Center for Sociological Research, particularly for the collection of sociodemographic information (Pérez Ribas, 2017). The adaption intended for the current study was performed by eliminating non-relevant questions, as well as adding some other questions or answer choices according to our objectives, to similar studies, and to the characteristics of the sample. The questionnaire was designed to have multiple-choice questions, as well as open-ended questions, which is consistent with similar studies (Pérez Ribas, 2017; Yaacob, Osman, & Bachok, 2015).

The first part of the survey asked for socio-demographic data, as well as filter data. In Spain, inquiring for participants' SES can be hard to ask for, and hard for them to answer. Pérez found an important rate of non-answered questions when asking for this information (Pérez Ribas, 2017). Thus, it was decided not to ask for participants' SES, and use the information provided by both principals.

The second part of the questionnaire dealt with the reasons for enrollment. The main question of the survey inquired for parents' reasons for choosing the single-sex school—or the coeducational one. It was a multiple-choice question, which offered several options. Parents were asked to select three reasons from the list and to rate them from the most important to the least important for them.

In order to explore parents' beliefs about SSS for girls (one of the guiding questions of the study), it was decided to take West and Hunter's initiative (1993) of presenting the participants with some statements about SSS that can be interpreted as advantages for girls. These statements were chosen because they had been reported as widespread beliefs in the population (Jackson & Bisset, 2005; West & Hunter, 1993; West & Varlaam, 1991), or because they are the most important empirical findings in robust quantitative

or literature review studies (Eisenkopf et al., 2015; Kessels & Hannover, 2008; Kim & Law, 2012; Mael, Alonso, Gibson, Rogers, & Smith, 2005; Malacova, 2007; Pahlke et al., 2014; Park et al., 2013; Signorella et al., 2013; Sullivan et al., 2017; Vázquez Alonso & Manassero Mas, 2008). The degree of agreement of the participants with each statement was measured using a Likert scale of five alternatives, including a neutral option (NO)—NO was included in order not to force any answers on respondents (Matas, 2018).

The questionnaire received content validity through two expert judgments. Both gave a positive assessment of the instrument.

#### Results

Quantitative analysis of data was performed using descriptive and inferential statistics—the point-biserial correlation coefficient (Gay, 1976), as well as contingency tables, and Chi-Square tests (Welkowitz, Ewen, & Cohen, 1981). Due to a small size of the sample, a non-normal distribution was assumed. To correct any potential bias in the use of Chi-Square, Fisher's exact test was used (Pértega Díaza & Pita Fernández, 2004). Whenever it was possible, variables were recoded to make them dichotomous, so Fisher's exact test could be used. Statistical analysis was performed using SPSS version 22.0.0 (IBM Corp., 2013).

Open-ended questions were processed following Lichtman's guidelines for treating qualitative data (2006). However, due to a very small number of obtained responses, their analysis could not enrich the analysis of the rest of the data, so it was left off from this report.

## Knowledge of SSS effects and enrollment decision

When asked if they had previous knowledge of the benefits of SSS for girls, 51.4% of the whole sample had not heard of the "advantages", while 42.9% were aware of them. Table 1 shows an interesting fact: in CE School, most of the parents have heard of the benefits of SSS for girls, while in SS School most parents have not.

School			Frequency	Percentage
SS School		No	12	66.7
		Yes	6	33.3
		Total	18	100.0
CE School		No	6	35.3
		Yes	9	52.9
		Total	15	88.2
	Lost values		2	11.8
	Total		17	100.0

Table 1. Parents who had previously heard about the advantages of single-sex schools for girls

No statistical association between prior knowledge of SSS effects and enrollment decision was found. These results suggest that SSS benefits for girls were not a criterion used by parents when enrolling their daughters in this type of school.

Beliefs about SSS and enrollment decision

Parents' answers were analyzed coding each belief as a variable, and calculating the mean of the received ratings for each of them.

The three more accepted beliefs among parents of SS School were (from strongest to weaker level of agreement):

- 1) In girls' only schools there is more discipline.
- 2) In single-sex schools, girls increase their self-confidence, especially regarding obtaining good grades or studying difficult subjects.
  - 3) In mixed schools boys distract girls.

These statements were ranked by parents of girls who were already studying in SS School, and this fact may had reinforced their degree of acceptance of each of the proposed beliefs. At the same time, it is interesting to note that the first and third statements can be interpreted as related to discipline, while the second and third, to academic performance. The presence of discipline and academic performance among the most accepted beliefs is consistent with what other studies have found regarding school choice, as will be seen later.

In turn, the three most supported statements among parents of CE School were (also in decreasing order):

- 1) Single-sex schools are mostly about academics—Coeducational schools are mostly about socializing, making friends, etc.
  - 2) In girls' only schools there is more discipline.
- 3) In single-sex schools, girls face less cultural male aggression and violence, as well as less gender stereotypes.

The fact that the last statement appears among the highest ranked in the sample of parents from CE School may be better explained by the NO used in the Likert scale rather than by their actual preferences. In fact, no participant from CE School ranked their level of agreement to that statement using "Agree" nor "Strongly agree". Instead, 7 participants selected the NO for it. Since NO scored as 3 for calculations, it is possible to assume a mathematical justification for its appearance in the third place. Given the fact that the NO was not prevalent among the rest of the answers, it was decided not to remove it from the rest of the calculations.

What happened with the most agreed belief in the list among CE School parents is a completely different phenomenon. Six of them chose "Strongly agree" when confronted to the statement "Single-sex schools are mostly about academics—Coeducational schools are mostly about socializing, making friends, etc." The idea behind the statement, which was found to be prevalent among parents in some other studies (Jackson & Bisset, 2005; West & Hunter, 1993), seems to support Riordan's thesis, namely that in single-sex schools parents perceive an engagement with a pro-academic culture among students and teachers. However, this would have been true if support for this belief would have been found among parents of both schools, which was not the case. Paradoxically, only 6 SS School parents "Strongly disagree[d]" with it. In general (and as was expected), parents from CE School showed a stronger degree of disagreement with statements favorable to SSS.

### Religion and enrollment decision

No participant in the sample was a member of Opus Dei. This could be explained by the fact that there is no relationship between being a member of this group and the preference for SSS, or because this relationship exists in a different socio-economic setting, since some narrative about Opus Dei states that their members come from middle and upper socio-economic levels. In any case, in each school there was almost the same number of parents identifying themselves as Roman Catholics (10 in SS School vs. 8 in CE School).

In addition to that, none of the parents from SS School marked the option "Separating boys and girls is the model that fits the best my religious beliefs" as relevant for their decision-making process. It was expected that this option could be prevalent among

Muslim parents in the sample, since in Muslim countries SSS is a common option due to religious reasons, and for Muslims in other countries this is apparently the preferred alternative (Hamdan, 2010). Unfortunately, due to a very small number of Muslim parents in our study (1 in SS School vs. 2 in CE School) it was impossible to perform any analysis.

Statistics confirmed that there was no association between religion and school choice in the sample.

## General reasons for enrollment decision

Question 15 was designed to inquire for the general reasons of parents for choosing a single-sex school or a coeducational one for their daughters. There was a notable difference in the way in which parents from each school answered it. While SS School parents selected three of the prompted alternatives and ranked them (as the survey instructions said), CE School parents selected as many as they wanted (sometimes more, and sometimes less than three), and did not ranked them. It was not possible to find an explanation that could account for this difference. Thus, it was decided to propose different forms of analysis for each school's surveys. Consequences of this procedure for the study were (a) the impossibility of carrying out a statistical analysis of the relationship between the ranking of the reasons and the selection of a school type; and (b) the impossibility of comparing results in this matter between schools.

In the case of SS School, a count of the times in which a proposed reason was ranked as "the most important", "very important", or simply "important", for the decision-making process, was performed. Each prompted reason that was not chosen by parents was also counted. The result of this analysis can be seen in Table 2.

Table 2. Number of times in wh	hich each prompted reason was	s selected by parents of SS School

	Not selected	Important	Very important	The most important
Relationship with school's religious congregation	15			
Wanted a girls' only school	14	1		
Knew about good effects of single-sex schools for girls	15			
Liked school's educational proposal	9			6
Good facilities	15			
Good academic results	10	1	3	1
Close to home	7	2	4	2
Good teaching staff	8	3	3	1
Religious motifs	15			
Previous positive experience of another daughter in SS School	13	2		
All daughters in one place	14		1	
Good prestige of the school	14	1		
Good discipline	12	1	1	1
Has an acquaintance studying there	11	3	1	
Low cost or free	9	1	3	2
Graduated from that school as a child	14			1
Identification with school values	15			

Among the reasons considered influential by parents of SS School, identification with the educational proposal of the school stands out. Apparently, this alternative does not include the scale of values or the Catholic morality of the school. Choosing this option as the most influential, one seems to reveal a preference solely for the pedagogical elements of the school. Within the category labeled as "the most important" the proximity and the free nature of the school, both of a pragmatic nature, were ranked second. In fact, when looking at the other options chosen by the parents as influential, although less important, it is clear that almost none of them was directly related to the fact that the school was single-sex.

In the case of CE School, it was decided to interpret each of the marks that a prompted answer received as a vote in favor of that reason. Regardless of how many other options had been marked, the average number of votes that each one of them received was calculated, as can be seen in Table 3.

Table 3. Mean of votes for each reason marked as relevant for enrollment by CE School parents

Prompted reasons	Mean	SD
Relationship with school's religious congregation	.00	.000
Wanted a girls' only school	.00	.000
Knew about good effects of single-sex schools for girls	.06	.243
Liked school's educational proposal	.71	.470
Good facilities	.65	.493
Good academic results	.71	.470
Close to home	.76	.437
Good teaching staff	.82	.393
Religious motifs	.18	.393
Previous positive experience of another daughter in SS School	.06	.243
All daughters in one place	.41	.507
Good prestige of the school	.41	.507
Good discipline	.12	.332
Has an acquaintance studying there	.59	.507
Low cost or free	.18	.393
Graduated in that school as a child	.29	.470

*Note.* n = 17. No lost values.

As it can be seen, the fact that the school was mixed was not regarded as important for the decision-making process. The most important reasons were pragmatic ones, such as academics, and closeness to home.

Regarding potential determinants of school choice in the whole sample, a correlation between parents' age and the preference for a coeducational school was found: the older the person who was in charge of choosing a school was, the greater the probability that a mixed one would have been chosen ( $r_{pb}$  = .550; p = .001). No other socio-demographic variables were associated with the decision to enroll a girl in a single-sex school.

#### Discussion

The results seem to indicate that for the parents in our sample the decision of enrolling their daughters in an all-girls school is not related to any prior knowledge about the benefits of SSS for them. In fact, our results show that parents do not know about

these benefits. Thus, it is reasonable to assume that enrollment in a single-sex school is not regarded by them as a remedial nor a preventive intervention.

Riordan's hypothesis regarding the pro-academic choice that parents would be making when enrolling their daughters in a single-sex school assume that parents have previous knowledge of these benefits and support several positive beliefs regarding this type of school grouping and its effects. These beliefs are related to finding more order and control in single-sex schools, more leadership opportunities for girls, and a richer or greater curriculum among others (Riordan, 2015). All of these would constitute the set of motivations and expectations that parents have towards the school. In turn, schools would aim to meet those motivations and expectations. For the American sociologist, the success of a pro-academic choice lies in that harmony. Since our results show that parents were not familiar with the positive effects of SSS for girls, a key element of the pro-academic choice would be missing, at least for them. Instead, their motivations and expectations seem to be driven by other factors, such as teaching staff or pragmatic reasons. It is worth noting that these elements appeared as the most influential among parents in CE School. This coincidence will be discussed later. Nonetheless, no evidence was found that the choice of a single-sex school was associated with pro-academic choice. Instead, it seems that parents could be making a pro-academic choice on their own, not mediated by SSS.

Having said that, it is interesting to note that some of the elements mentioned by Riordan (1998, 2015), as sought by parents in single-sex schools, appeared in this study as beliefs that they hold about them. As it has been already exposed, these parents believe that in all-girls schools there is more discipline and less distraction for girls, a belief that evokes greater order and control in single-sex schools, according to Riordan (1998, 2015). These parents also believe that in these institutions girls' self-confidence grow, which has a positive impact on their performance (which, in turn, is related to leadership, also mentioned by Riordan). These parents hold these beliefs about single-sex schools, although they had not experienced them by themselves, nor having seen them become true in their daughters. For instance, it is impossible for them to know if their 4-year-old girl has increased her levels of academic self-confidence as she is still unable to verbalize her academic expectations at that age. It would be impossible for them, as well, to know if boys distract their daughters at school, since there are no boys at these schools. Neither could they verify that in their daughter's classroom there is more discipline than in a coeducational school unless they have some other children enrolled in the latter.

It seems safe to assume that regarding a pro-academic choice, although these parents did not choose the single-sex school *per se* but for ancillary reasons, they still expect to find such benefits in them. Properly speaking, these benefits are actually beliefs that are the result of a widespread dissemination of a popular narrative, and not of the dissemination of empirical evidence. Oddly enough, these parents hold a set of ideas and beliefs that are indeed related to a pro-academic choice, but that, according to some experts, has more of a moral basis than an empirical one (Bonal, 1997). At the same time, and paradoxically, their motivations are clearly pragmatic.

Why does this sort of contradiction occur? While keeping in mind that parents' reasons could include a mixture of narratives and rationales (Bosetti, 2004), perhaps the easiest way to explain it has to do with the sample's lack of knowledge regarding single-sex effects for girls. Maybe parents did not know the positive effects of SSS because they have not been exposed to information circuits in which they are discussed. Therefore, a recommendation for single-sex schools—particularly in contexts of social deprivation, such as the one in which this research was carried out—is to disseminate information about those benefits among their target population. Since the literature describes that

coeducational schools have some benefits for girls, it would be fair to recommend the same to the other type of school as well. This recommendation seems to be particularly relevant for our research participants, because it was found that the recommendation of a school by an acquaintance or getting to know it through the experience of somebody already studying there were the prevalent mechanisms for initiating a decision-making process.

Another possible explanation may have to do with the sample's SES. Unlike many other single-sex vs. coeducation studies carried out in Spain, the present one worked with a population of medium-low or low SES, according to schools' principals. It is important to bring back the coincidence about motivations of parents of the whole sample. Both groups were guided by pragmatic criteria and seemed to consider the fact that the school was mixed or single-sex on a much lower level of importance. This is consistent with what was found in literature, as discussed earlier - main motivations for school choice among parents in other studies were academic performance (Bosetti, 2004; Hunter, 1991; Jackson & Bisset, 2005; Pérez Ribas, 2017), or proximity to school (Hunter, 1991; West & Varlaam, 1991). Maybe the common element among all sample parents' motivations was SES. Actually, some other enrollment decision studies have described this variable as a critical one (Beavis, 2004; Bosetti, 2004). It is likely that, in this particular case, SES could have shaped parents' expectations about their children's schools, as long as they hope that these institutions could provide them with the proper social credentials to achieve a better social position in the future (Coleman & Hoffer, 1987). Thus, it would be interesting to run this study with a wider social spectrum, as well as with public schools, since they could give a broader representation of the general school population. Unfortunately, there are not public single-sex schools in Spain, unlike other countries such as Peru (Gordillo & Idme-Apaza, 2022), Australia, United Kingdom, South Korea, United States (Barnils, 2009), or New Zealand (Mandic et al., 2017).

This fact was, indeed, one of the main limitations of this study. The small size of the sample, the fact that it was "accidental" (León & Montero, 2015), as well as the little variability of the sample's SES, reduced the possibilities of a richer and more representative analysis. These limitations also had important consequences on the employed statistics, which is why it was decided to keep the statistical processing as simple as possible. Nonetheless, it is also true that this research constitutes a first approximation to a phenomenon that received little attention in Spain, and in Spanish-speaking countries.

#### Conclusion

It has been interesting to give parents a voice about their position and their motivations regarding enrollment in a single-sex school. As several authors point out, this fact is usually absent from the debate (Pérez Ribas, 2017). In this regard, a final deduction of this work is the verification that for the parents of this sample, the debate seems to be non-relevant, since their decisions are moved by pragmatic criteria. Perhaps, this fact is interesting for better understanding of the nature of the debate over SSS vs. coeducation, particularly in Spain, where polarization around it is strong. Our data may show that discussions and any polarization surrounding it tend to be more prevalent in social and economic sectors than in others. Also, it may show that this debate tends to occupy some other educational actors and not only parents. However, as this research lacks representativeness, the aforementioned rationales cannot be stated other than as ideas. Other types of studies are needed to examine them.

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## Statements on open data, ethics, and conflict of interest

Author will provide access to the original data upon request. Data could be accessed only by the solicitant, and no one else can grant access to it without the written permission of the author.

Access to field was granted after the negotiation of conditions of anonymity, confidentiality, and publicity with the principals of both schools. The reached agreements were put in a contract that was signed by the researcher, as well as by each of the principals. Participants were guaranteed anonymity and confidentiality as well, and were assured that their survey responses were not to affect the permanence of their daughters at school. Their participation was voluntary. The final draft of this paper was sent to both principals for their approval, in order to verify that neither anonymity nor confidentiality were broken in it.

The author declares that he had no conflict of interests while conducting the study nor while writing the paper.

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