Information, Student-Parent Communication, and Secondary School Choice: Experimental Evidence from Kenya

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Abstract

Secondary school dropout rates are high in low-income countries, and information gaps about school characteristics may be an important contributing factor. If school choices are made with imperfect information, households may choose schools that are too expensive, not a good fit academically, or too costly to commute to, increasing the likelihood of the students dropping out. These information gaps may be further exacerbated when students and parents fail to communicate before making high stakes schooling decisions. I study the importance of these information and communication gaps in the transition from primary to secondary school using a field experiment with 3,000 Kenyan students and their parents. The intervention consisted of an informational meeting for 8th graders before they applied to secondary school, and randomly varied whether the parent participated in the meeting for a facilitated conversation with the student. I find that informational meetings with students led them to apply to more commutable schools without compromising school quality. Moreover, including the parents in these meetings improved parental knowledge about costs and led to better alignment of school preferences between the students and their parents. This ultimately led students to enroll in lower cost schools, which could generate meaningful savings.

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1 Introduction

While primary school completion rates in low-income countries have improved in recent decades, secondary school completion rates remain low (Inoue et al. (2015)). In Kenya, for example, while 80 percent of students finish primary school, less than 45 percent complete secondary school[1] (Kenya DHS (2015)). Secondary school completion is a key education milestone that unlocks access to a range of employment opportunities, and can have substantial positive effects on economic, health, and social outcomes (Duflo, Dupas and Kremer (2021), Ozier (2016)).

When applying to secondary schools, lack of information about school characteristics can lead households to choose schools that are poor matches - i.e., not a good fit academically, too costly to commute to, or more expensive than initially anticipated, increasing the likelihood of students dropping out. Existing research has explored information gaps about school quality and selectivity in school choice processes (Hastings and Weinstein (2007), Bobba and Frisancho (2016), Ajayi, Friedman and Lucas (2017), Ajayi, Friedman and Lucas (2020)) and the effects of targeting information towards student versus their parents (Ajayi, Friedman and Lucas (2017), Ajayi, Friedman and Lucas (2020)). However, there is little, if any, evidence that sheds light on the role of student-parent communication in the decision-making process. Conceptually, this is important because information gaps may be worsened by failures of communication between students and parents, which could lead students, for example, to misunderstand parents' budget constraints and apply to schools that are too expensive for them to attend.

This paper studies whether providing information and promoting student-parent communication about schooling options can improve secondary schooling choice, using a field experiment with 3,000 Kenyan students and their parents. I introduce an intervention that randomized individual informational meetings to 8th grade students across 183 schools at the key juncture when students are applying to secondary school. To examine the impact of addressing student-parent communication gaps, I further randomly varied whether parents were included in the meeting for a facilitated conversation about school choices: in one treatment arm, teachers met one-on-one with students, and in the second treatment arm, teachers met with students *and* their parents. In a third control arm (status quo), students and parents were interviewed, but received no meetings.

The transition from primary to secondary school in Kenya starts at the beginning of 8th grade[2]. Students first fill in an application which requires them to choose 11 secondary schools out of several hundred options that vary in performance, location, and cost. Students then take an entrance exam, where the score is used to determine admission to secondary school. Once students receive admission offers, parents choose which school, if any, the student will attend. There are two types of information gaps that could negatively affect school choice in this process: first, students make their application choices with incomplete information about school characteristics such as performance, location, and cost. Survey evidence from the study sample confirms this – only 17 percent of students and 5 percent of parents could accurately state the number of schools to which students are allowed to apply, and only 40 percent of parents

[1] This is computed among individuals aged 20-24 in Kenya.

[2] The process is the same in many other countries in Sub-Saharan Africa.

knew the costs of schools (within a 100 USD range[3]). Additionally, when students were asked about their preferred day schools, only 19 percent of students choices were commutable[4]. Second, although parents make the final schooling decision and pay for school fees, many students do not communicate with their parents before submitting their application - on average, parents knew only one-third of the schools to which their children applied, which could lead students to choose schools that are infeasible for the parents. Since students can only apply to a limited number of schools, and are locked into these choices early on, these information and communication gaps are costly.

To address these gaps, I designed an informational intervention based on detailed piloting and in collaboration with the Busia County Department of Education. The information provided included maps showing the location of secondary schools along with information about distance to school, school fees, and average academic performance. Each meeting was led by a trained enumerator under supervision of the school teacher. For meetings where parents were included, the enumerator additionally facilitated a conversation about the school choices between the student and the parent. To estimate the effect of the meetings on key socio-economic and educational outcomes, I collected a rich array of student and parent survey data on knowledge, preferences, and enrollment at three points in time over the application cycle[5]. I then linked this survey data to administrative records on final application choices, attendance, and test scores in order to measure the effects of the intervention on key educational outcomes of interest.

The experiment generated 4 main findings which, when taken together, indicate that improving knowledge and promoting parent-child communication leads students to make better schooling choices. First, I find that the informational meetings improved objective knowledge about the application process and schooling costs, confirming that the intervention successfully addressed informational gaps for students and parents – student and parent knowledge about the number of schools they need to select in the application increased by about 60 and 33 percentage points respectively. Additionally, parent knowledge about school costs increased by 23 percentage points over a control mean of 40 percent.

Second, the informational meetings led to more alignment[6] between stated preferences of students and parents. Informational meetings where the parent was included improved student knowledge about parent preferences for schools, and parent knowledge about student preferences by 11 and 12 percentage points respectively. Furthermore, following the meeting, alignment of student and parent school choices increased by 15 percentage points over a control mean of 25 percent. This alignment reflects shifts from both students and parents towards each other.

Third, I find that the meetings led students to prefer and apply to more commutable schools in both treatment groups: there was a 40-45 percent increase in the proportion of students that apply to day schools that are within a 7 km radius of students house. Conditional on selecting these lower cost sub-county day schools, treatment students are no more likely to enroll in a more commutable school. However, lower income households are 24 percent more likely than the

[3]School fees range from 100 USD per year to 500 USD per year.

[4]Commutable is defined as 7km or less each way from home.

[5]The application cycle is normally 1 year, but lasted for 1.5 years due to the Covid-19 school closures.

[6]Alignment is measured as the proportion of schools that match between the parents preference list and students preference lists. The outcome is constructed in this way, since schools are selected from non-overlapping choice categories.

control to attend a school within a 7km radius from home. Importantly, these distance savings come at no cost to performance of the school, as measured by average test score.

Fourth, when the parent attends the meeting, students ultimately enroll in lower cost schools. Students in Group 2 (parent included in meeting) pay 18 USD less in tuition each year overall (17 percent of average monthly earnings in the sample), driven by a shift into local day schools. This is even larger for below median income households who save 29 USD per year. Considering that parents must pay secondary school fees across several years for all of their children, these cost-savings over time can be substantial.

This paper adds to an active body of research on school choice in both high and low income country contexts. Existing research shows that information gaps in school choice systems are large and persistent, and can lead students to make sub-optimal schooling choices.(Ajayi (2013), Ajayi, Friedman and Lucas (2017), Ajayi, Friedman and Lucas (2020), Bobba and Frisancho (2016), Lucas and Mbiti (2012), Walters (2018), Hastings and Weinstein (2007), Lai, Sadoulet and de Janvry (2009), Kapor, Neilson and Zimmerman (2020)) Further, there is evidence that these gaps might be larger for marginalized groups such as girls and students and from low socio-economic backgrounds (Lai, Sadoulet and de Janvry (2009), Lucas and Mbiti (2012)). Much of the experimental evidence so far has focused on misalignment on the dimension of performance and provided information on either school quality (Ajayi, Friedman and Lucas (2017), Hastings and Weinstein (2007)) or student ability (Bobba and Frisancho (2016), Franco (N.d.), Dizon-Ross (2019)). Moreover, experimental interventions that have targeted information towards parents have found mixed results on eventual schooling outcomes. My study is the first, to my knowledge, to bring parent and student together in an informational meeting to discuss preferences and estimate the impact on individual knowledge, preferences, and eventual choice.

This research suggests that informational meetings with students and parents about secondary school choices addresses information and communication gaps during the secondary school process, and leads to students enrolling in lower cost schools. Teacher meetings are low cost and potentially very scalable since informational content such as maps can be generated and distributed across schools. Following the completion of the study, we intend to work with the Busia County Department of Education to disseminate this information more widely. In future work, I plan to track academic outcomes for the students in my sample to study how making a more informed school choice can impact secondary school academic achievement and eventual secondary school completion.

The remainder of the paper is structured as follows: Section 2 provides an overview of the empirical setting, Section 3 outlines a simple theoretical framework, Section 4 discusses the experimental design, sample, and data, Section 5 presents the main empirical results, Section 6 structurally estimates preferences in a rank-ordered logit framework, and Section 7 concludes.

2 Context

In the following section I first describe the secondary school application process in Kenya, and then discuss why these informational gaps in the secondary school sector persist.

2.1 Secondary School Application Process

To study how information sharing can improve schooling choices and eventual educational outcomes, I turn to a low-income context in western Kenya. The secondary school selection process consists of four periods. First, students submit their applications to secondary school. Second, students take the secondary school entrance exam - the score on which is used to determine admission to secondary school. Third, students receive admissions offers to school, and finally students enroll in school. There are two types of information gaps that could negatively affect school choice in this process: first, students make their application choices with incomplete information about school characteristics such as performance, location, and cost. Second, although parents make the final schooling decision and pay for school fees, many students do not communicate with their parents before submitting their application. Since students can only apply to a limited number of schools, and are locked into these choices early on, these information and communication gaps are costly.

2.1.1 Applications

At the beginning of Grade 8, students in Kenya apply for admission to secondary school by selecting 11 schools across four mutually exclusive categories (national, extra county, county, and sub-county)[7]. These categories vary in terms of selection criteria and costs[8]. National schools are the most prestigious schools in the country, but they are also the most expensive (500 USD per year) and the most selective, typically requiring 400 marks or higher on the secondary school entrance exam[9]. Schools decrease in selectivity and cost moving to extra county and county schools (400 to 500 USD per year). The most accessible schools are sub-county day schools, which have no official admissions cutoffs and are the most affordable at 100 USD per year. While national, extra county, and county schools are typically boarding schools, sub-county schools are day schools where students commute back and forth from home each day. Students who select a sub-county school that is too far from home may have trouble attending school every day or drop out entirely. Figure 1 shows the locations of secondary schools in the study area. It is important to note that while national schools are typically higher performing, there is a lot of variation in the performance of sub-county day schools (Figure 3), and many of them can out-perform county schools or even sub-county schools. There is also considerable variation in distances to sub-county day school (Figure 2).

When selecting schools for their secondary school application, students view a 300 page document that lists Kenyan schools in each of the four tiers, and contains basic information such as school name and category of school. Importantly, this document does not contain any information about the school location, performance, admission cut-offs or costs. Students are asked

[7]Extra county schools were formerly known as provincial schools. In the past, students selected only 10 schools (4 national, 2 extra county, 2 county, and 2 sub-county).

[8]Each tier of schools has their own admissions "cutoff", which is the minimum test score needed to receive an offer from that school. In general, national schools require 400 marks and above, extra county schools require 350 marks and above, and county schools require 250 marks and above. There is no minimum requirement for attending a sub-county day school, but students with lower test scores will have lower priority for their first choice sub-county schools. School performance can vary both within school tier and across school tier.

[9]School fees at national schools are around 500 USD per year. Students must obtain a 400 or above on the KCPE exam in order to gain admission to a national school.

to discuss their schooling preferences with their parents at home, and return to school ready to select their schools. In practice, we find evidence that many students do not communicate with their parents in advance of submitting their application. At baseline, parents and their children only know 30 percent of each others schooling choices, even after the application has been submitted.

2.1.2 Entrance Exam

At the end of the Grade 8 school year, students take the Kenya Certificate of Primary Education (KCPE) exam, which is used to determine admission to secondary school. Based on their performance on the KCPE exam and the schools that students selected on their application, students are assigned to secondary schools and receive admissions offers. They can receive up to one official offer, and they will ultimately choose which school to attend out of their set of offers.

2.1.3 Admission Offers

Students are assigned admission offers[10] to schools based on (1) their performance on the entrance exam and (2) county-level quotas. National schools are filled first by selecting the top performing students in each sub-county in each gender.[11] Next, extra-county schools are filled, with some slots reserved for the host county and sub-counties[12]. Under the government's 100% transition policy, everyone is guaranteed admission to at least one school. If a student doesn't receive an offer at any of the schools they applied to, they will be assigned to an under-subscribed sub-county school. Students can also choose to leave the public system and attend a private school, though these are typically more expensive and lower performing (only 1% of the sample eventually joins a private school).

The structure of this application process can lead to errors in two ways: first, students must apply to schools 11 months before they take the entrance exam that determines their placement and with limited information about the quality, selectivity, and cost of the school choices themselves. Second, the student fills out the application in school without their parents, so parents' financial capabilities and preferences for schools are not necessarily reflected. Since students can only apply to 11 schools, any mistakes are costly – students who fail to obtain admission to one of the schools to which they applied can still attend an under-subscribed sub-county school or private school, but would miss the opportunity to attend any schools that were more preferred.

All factors considered, there is substantial room for improving choices by promoting information and communication in the school selection strategy. For example, a high performing

[10] Assignment of students to secondary schools is now fully computerized as of 2021. This is different than previous years where the head teachers at each school would convene in Nairobi to select students for their schools.

[11] The formula for assignment of students to national schools is Sub-county Quota={Sub-county KCPE candidature of a given gender/ National KCPE candidature of given gender} X Available Vacancies in the National school. The top 5 performing candidates of either gender in each sub-county will be considered for placement to the national schools they selected. Candidates who scored 400 marks and above will be placed in national schools of their choice where possible. Where a candidate fails to be selected into a national school, they will be considered for placement in an extra county school of their choice. Candidates who score below 400 marks will be selected using quotas and cutoff marks to any of their national school choices by order of preference, where possible. The cut off mark of 280 will be used to fill the remaining vacancies in national schools.

[12] Selection of candidates to extra-county schools will be based on the ratio of 15:35:50, where, 15% is reserved for the host sub-county, 35% for the host county, and 50% is reserved for other counties.

student where cost is a major barrier should try to apply to the highest performing schools that are commutable from their house. Unfortunately, many students lack knowledge of schooling characteristics and instead apply to schools that are a poor match based on their location, willingness and ability to pay, and academic ability.

2.2 Persistence of Informational Gaps

At the time of the application, the primary source of information for secondary school options are the students' primary schools. Primary schools are supposed to have a record of all secondary schools that students can apply to, which should be updated regularly from the centralized education department in Nairobi. However, information at schools is often outdated, and performance data is not publicly available. At baseline, we asked teachers to identify the top performing schools and bottom performing schools in their sub-county: on average, teachers accurately identified only 1.65 out of 5 top performing schools and 1.84 out of 5 bottom performing schools in their own sub-county.

Rapid growth in the secondary school sector, coupled with a lack of information transmission from the capital to rural areas, has led these informational gaps to persist. First, Kenya has a dynamic secondary school sector, with the number of secondary schools nearly doubling in the last decade from 4,379 in 2006 to 8,259 in 2016 (KNEC). Second, the expansion of rural electrification has changed the quality of schools and transportation infrastructure changing relative distances.

3 Theoretical Framework

In this section, I outline a simple theoretical framework for understanding the sequence of events in the secondary school application process, and how information and parent-student communication gaps may constrain the choice set.

3.1 Student and Parent Preferences

Let I be the set of all households with a student transitioning to secondary school, and J represent the set of all secondary schooling options. The student ($k = s$) and parents ($k = p$) in household $i \in I$ have preferences over each school $j \in J$, with utility weights on distance of school from household, quality of school, cost of school and other school characteristics. Their utility function is given by:

$$U_{ij}^k = \omega_D^k \cdot D_{ij} + \omega_Q^k \cdot Q_j + \omega_C^k \cdot C_j + \sum_{x \in X} \omega_x^k \cdot x_j + \epsilon_{ij} \tag{1}$$

where D_{ij} is distance to school j from household i, C_j is cost of school, Q_j is quality of school, X_j is a vector of other school characteristics, and the ω^k's are the weights on each component for $k \in (s, p)$. Student and parent weights may differ - for example, students may value distance to school ($\omega_D^s > \omega_D^p$) more than parents, while parents may place a higher weight on cost ($\omega_C^s < \omega_C^p$).

Together, the household's total utility is a linear combination of student and parents utilities, given by:

$$U_{ij} = \gamma U^s_{ij} + (1-\gamma)U^p_{ij} \tag{2}$$

3.2 Application Process

The secondary school application sequence of events consists of three periods (Walters (2018)): in $t = 1$, students submit their application portfolio, A_i. In $t = 2$, students receive a set of offers O from schools in their submitted application portfolio, A_i. Third, parents decide which school their child will enroll in based on the available set of offers ($t = 3$).

3.2.1 Enrollment

At the time of enrollment ($t = 3$), parents decide whether or not their child will enroll in school and maximize total household preferences with respect to the students offer set $O(Z_{ij}) = \{j : Z_{ij} = 1\} \bigcup 0$ where Z_{ij} is an indicator for student i receiving an offer at school j and 0 is the outside option of attending no school or private school.

Parent's optimal school choice at the enrollment stage for student i is the school, j, in the student's offer set, $O(Z_i)$ that maximizes household utility:

$$S^*_i = \underset{\{j \in \{O(Z_i)\}}{\arg\max}\ U_{ij} \tag{3}$$

3.2.2 Student Application Choice

In period 1(t=1) student submits an application portfolio to schools.

$$A^s_i = \arg\max \sum [p_{ij} E[U^s_{ij}]] \tag{4}$$

where p_{ij} is the probability of receiving an offer for student i at school j and $E[U^s_{ij}]$ is student i's expected utility at school j.
Each application portfolio A^s_i generates an offer set $O(Z_i)|A^s_i$, which parents use to make their enrollment choice $S_i \in \{O(Z_i)|A^s_i\}$

To summarize, the sequence of events is as follows:

Step 1: Student submits application portfolio A^s_i

Step 2: Each student application portfolio A^s_i generates an offer set $O(Z_i)|A^s_i$.

Step 3: Given the offer set, parent chooses $S_i \in \{O(Z_i)|A^s_i \bigcup 0\}$ with associated student and parent utilities $U_c(S_i)$ and $U_p(S_i)$

Predictions about Student-Parent Choices

- Suppose that with communication, student knows that parent will make final decision and submits an application portfolio A^{s*}_i (considering parents choice) that yields an offer set $O(Z_i)|A^{s*}_i$ and corresponding parent choice (S^*_i)

- Without communication, student submits an application portfolio that only considers her own preferences (A_i^s) that yields an offer set $O(Z_i)|A_i^s$ and corresponding parent choice (S_i)
- $U(S^*) > U(S)$: that is, student utility will be higher when they submit an initial application that takes into account parental preferences by expanding the offer set to include schools the parent would actually consider.

4 Experimental Design

The first part of this section introduces the study intervention and treatment groups. Next, I describe the randomization into treatment groups and balance checks. Finally, I provide information on the timeline and data collected at different stages of the experiment.

4.1 Treatments: Student-Teacher & Student-Teacher-Parent Meetings

I introduce an intervention that provided individual informational meetings to 8th grade students at the key time before their secondary school applications were due. The meeting was conducted with each students' class teacher and the intervention randomly varied who participated in the meeting: in one treatment arm (**Group 1**), teachers met one-on-one with students, and in the second treatment arm (**Group 2**) teachers met with students *and* their parent/ guardian.

Based on detailed piloting and in collaboration with the Busia County Department of Education, I designed an informational intervention that bridged these gaps. The information provided in the meetings included maps showing the location of secondary schools along with information about distance to school, school fees, and average academic performance. Each meeting was led by a trained enumerator and under supervision of the school teacher. For meetings where parents were included, the enumerator facilitated a conversation about the school choices between the student and the parent.

The control arm (**Group 3**) received no meetings. Group 1 allows us to estimate the effect of directly providing information to students. Group 2 allows us to examine the added effect of opening the communication channel between students and their parents.

Information on secondary school characteristics (including school location, cost, performance, and admissions cut-offs) was compiled and organized in the form of maps to be presented to meeting participants in both treatment arms. Participants viewed two maps: the first was a map showing all the boarding schools [13] in Busia County to which any students could apply. The second was a a map of the student's home Sub-County showing the local sub-county day schools that the students could walk to from home (see Appendix C). As part of the intervention, the survey enumerator highlighted the three nearest day schools to the student's home primary school. Following the informational portion of the meeting, the teacher and meeting participants (that is, student in Group 1 and both parent and student in Group 2) were given time to discuss their secondary school preferences.

- **Control:** Status Quo. Students and parents surveyed and given list of secondary schools, but did not participate in any information meetings.

[13] These county boarding schools include National, Extra County, and County schools. Since boarding schools are typically single-gender only, we use separate maps for girls and boys that show the maps relevant for their gender only.

- **Group 1: Student-Teacher Meeting**: Students and parents surveyed and given list of secondary schools. Additionally, students participate in an informational meeting with class teachers. Maps with the location, costs, performance, and category of schools were presented to students.
- **Group 2: Student-Teacher-Parent Meeting**: Students and parents surveyed and given list of secondary schools. Additionally, students **and** their parents participate in an informational meeting with class teachers. Maps with the location, costs, performance, and category of schools were presented to students **and** their parents.

4.2 School Randomization, Pupil Selection, and Sample Statistics

Treatment was randomized at the primary school level so that every treatment student attending the same school participated in the same meeting group. In total, I randomly selected 183 schools across 5 Busia County sub-counties to be part of the study[14]. Randomization into treatment groups is stratified by sub-county of school and mean KCPE test score of school in the previous year (above or below the Busia County mean test score). During the launch of the study, surveyors randomly selected 20 students (10 boys and 10 girls) from each selected school registrar using an in-field random number generator. The final sample who agreed to participate and attended the baseline interview is 2,952 8th grade students and their parents.

Sample summary statistics indicate that roughly half (52 percent) of students are female, and 66 percent of parents are female[15]. The average household income is 106 USD per month and the median education of parent is less than primary school - 51 percent of parents had less than a primary school education, while the remaining 49 percent completed primary school or higher. These baseline demographic characteristics are balanced across treatment group (see Table A.1).

4.3 Experimental Timeline and Data Collection

Below, I detail the timeline of the experiment implementation and the main data collection activities. I combine student and parent survey data collected at three points of time with administrative data on final application choices.

Jan '20 - Mar '20	**Baseline, Intervention, Follow-up Survey 1:** (i) baseline student and parent surveys; (ii) intervention: student-teacher and student-teacher-parent informational meetings with 2,952 student-parent pairs across 183 schools; (iii) student and parent follow up survey 1
May '20 - Jul '20	**Follow-up Survey 2:** follow up data on secondary school plans and parental confidence as part of Covid-19 educational module
Mar '21 - Apr '21	**Administrative Data:** link with student administrative data on final application choices, primary school test score, and primary school enrollment
Aug '21 - Oct '21	**Follow-up Survey 3:** student survey on secondary school admissions offers and enrollment decisions

[14]There are 7 sub-counties in Busia County. I originally intended to include schools from all 7 of Busia County sub-counties, but due to the Covid-19 school closures in March of 2020 we ended our intervention earlier than planned and only surveyed a random subset of 5 of the 7 subcounties.

[15]Students were asked to bring the parent that is responsible for helping with schooling decisions.

- *Follow-Up Survey 1*: The first follow-up survey - conducted immediately after the intervention - assessed the effect of the meetings on student and parent knowledge, beliefs, and preferences. First, a set of knowledge questions were administered to both students and their parents assessing their knowledge about the application process (number of schools student could apply to, total points of the KCPE exam, and admissions cut-offs of each category of each school). A set of questions also assessed parental knowledge of costs in each group. Rank-ordered schooling preferences were elicited in all three groups from both students and their parents: respondents were able to view school lists in all three groups. Preferences are elicited privately (students and parents are interviewed separately, and the students' teacher is not present.) In both the student and parent surveys, we not only elicited own schooling preferences, but also second-order beliefs about the other's preferences. This allows us to examine how the intervention changed schooling preferences. Comparing student and parent preference lists allows us to measure the extent to which student and parent preferences are aligned.
- *Follow-Up Survey 2*: During the Covid-19 school closures, I administered a follow-up survey to assess student and parent school plans and confidence about helping student with their schooling choices.
- *Administrative Data*: I link student and parent survey responses with administrative data collected from each school on final application choices in March of 2021 as well as student test score and attendance. This allows me to characterize student application choice and compare with survey preferences.
- *Follow-Up Survey 3*: Finally, I collect survey data on the admissions offers that students received, as well as their final enrollment decisions beginning in August of 2021 when the student joined secondary schools.
- *GPS Coordinates*: The survey team geocoded Busia County primary and secondary schools in order to measure distance to school.

Future follow-ups will measure attendance and performance in the enrolled school in order to assess longer run student-school match and secondary school retention.

5 Main Results

In this section I report my main empirical results, with a focus on the effect of the intervention on key educational outcomes of interest. The estimation strategy uses intention-to-treat (ITT) estimates of treatment group assignment on the outcomes of interest. The main specification will be the following equation:

$$Y_i = \alpha + \beta_1 T_{1i} + \beta_2 T_{2i} + X_j'\theta + \epsilon_{ij} \tag{5}$$

where Y_i is the outcome of interest, T_{1i} and T_{2i} are treatment indicators corresponding to Treatment Groups 1 and 2, respectively. X_j is a vector of the variables used for sample stratification, including: sub-county of school and primary school KCPE score (above or below mean) of

school[16]. Standard errors are clustered at the school level.

Using the survey data, I first examine student and parent knowledge and preference alignment, and characterize preferences along the dimensions of distance and performance. Second, I turn to administrative data collected from each primary school to characterize final application choices along the same dimensions. Finally, I use survey data to examine final enrollment choices. I examine heterogeneity along three pre-specified dimensions: household income (below or above median), education status of parent (below or above median), and gender of child. I highlight heterogeneity by income and education in this section, where I see significant differences. I do not observe significant differences by gender of child for any of the outcomes. All heterogeneity tables are shown in Appendix D.

5.1 Student and Parent Knowledge (Survey)

The intervention improved student and parent knowledge about schooling choices along several key dimensions. First, I examine parental knowledge of costs of schools for each of the four schooling tiers (Table 1, Panel A)[17]. Control group knowledge of costs are low, particularly for the higher tier schools, with only 23 percent of parents correctly stating the cost of National schools within a 100 dollar range (1/2 of mean costs). The parent meeting (Group 2) significantly improved parental knowledge of costs across all four categories (ranging from 19 to 30 percentage points), and doubled knowledge of national school costs.

Second, I examine student and parent knowledge about the overall application process using three outcomes: (i) the number of schools to which the student can apply; (ii) the number of total points on the KCPE entrance exam; and (iii) a means effect index that includes these two measures as well as knowledge about the cut-off marks for each category of school (Table 1, Panel B). Only 17 percent of control students and 5 percent of control parents could accurately state the number of schools to which the student was allowed to apply; however, treatment improved knowledge in both groups by a large 58 to 62 percentage points and including the parent in the meeting improved parent knowledge by 33 percentage points. Similarly, the treatment significantly increased knowledge about the necessary exam scores (15 percentage points for students, and 21 percentage points for parents) and the overall knowledge index for both student and parents.

5.2 Student and Parent School Preferences (Survey)

I use the survey data collected immediately after the intervention to measure student and parent preferences for schools. I first examine preferences for overall category of school (that is, national, extra county, county, or subcounty). Second, I use these preference lists to measure student and parent knowledge about *eachother's* choices; that is, I ask parents to list which schools they believe their child wants to apply to and students to list which schools they believe their parent wants them to apply to. Comparing these lists across student and parent allows me to examine the extent to which students and parents learn about each others preferences during

[16]KCPE score for each primary school is obtained from administrative data records from the Busia County Department of Education.

[17]Responses are considered correct if the respondent answers correctly within a 100 USD range.

the meeting. Third, I measure parental confidence about their ability to support their child's schooling and perceptions of the likelihood that their child will join secondary school. Fourth, I characterize student and parent preference lists along the dimensions of distance and performance (as measured by average test score). Finally, I evaluate whether the parent meeting leads students and their parents to align on schooling preferences by comparing the extent to which student and parent preference lists match across groups. I discuss each of these results below.

5.2.1 Preferences for Schooling Tiers

Examining the extent to which the meeting intervention impacted student and parent preferences for category of school, I find that attending the meeting shifted schooling tier preferences downwards, particularly when the parent was present in the meeting (Group 2). Nearly one-half (45 percent) of control parents prefer their child to attend an expensive national school, 19 percent of control parents prefer their child to attend a local sub-county school, and 16 percent of control parents prefer a school in each of the middle categories (extra county and county, respectively) (Table 2, Panel A). Attending the informational meeting (Group 2), leads parents to shift their preferences downwards to lower categories of schools. There is a significant 5.2 percentage point decrease in the proportion of parents who prefer their child to attend a national school, with preferences shifting towards extra county (significant 4.6 percentage point increase) and county (insignificant 2 percentage point increase).

Over one-half (54 percent) of control students prefer to attend a national school, but in contrast to the parents, only 11 percent of control students prefer to go to a local sub-county school. 22 percent and 14 percent prefer to attend an extra county or county school, respectively (Table 2, Panel B). Attending the informational meeting shifted student preferences for schooling category in both groups, but the level and direction of shifts differed depending on whether or not the parent was present in the meeting. In Group 1 (student-only) students shifted towards extra county schools (3.8 percentage point) from all other categories. When the parent was present in the meeting (Group 2), there was a large and statistically significant shift away from national schools (7 percentage points), and towards extra county (4.4 percentage points) and also county schools (2.4 percentage points). This parallels the results from the parents, suggesting that parental presence in the meeting may influence the child's preferences (or vice versa).

5.2.2 Student and Parent Alignment of Preferences

Th effect of including parents in decision-making may depend on the degree of alignment between parent and student preferences and learning about each others preferences. In addition to measuring student and parent's own preferences, I elicit student and parent second-order beliefs about each others' preferences; that is, parents are asked to list their child's preferred choices and students are asked to list their parents preferred choices. I first elicit preferences for the full set of 11 schools, and then elicit preferences for the Busia only categories (county and sub-county).

Attending the meeting improved both student and parent knowledge about each others schooling preferences. In the control group only about one-third of students and parents know each others preferences, however the student-teacher-parent meeting that includes all parties leads to a 11 and 12 percentage point increase in knowledge about eachothers preferences (Table 3,

Columns 1 and 2). The effect is even larger (21 percentage points over a baseline of 33 and 36 percent) when I restrict the set of schools to the local county and subcounty category of schools only (Table 3, Columns 3 and 4).

To understand the relative importance of each party in the decision making process, I examine how much students' preferences shift towards parents and vice versa after they learn about each other's preferences. In the control group, 25 percent of parent and student's choices align. This increased by 15 percentage points for all schools, and 17 percentage points for local Sub-County Schools, statistically significant at the 1% level, after parents and children attended the meeting (Table 3, Columns 5 and 6). There is evidence that both students shift towards parents and parents shift towards students (more so for local schools).

5.2.3 Parent Confidence and Secondary School Plans

Six months later, I elicit parent confidence about their ability to support their child's schooling in a phone survey conducted during the Covid-19 school closures. I construct a mean effects index of three self-efficacy questions[18], including "confidence in motivating child to try hard in schooll","confidence in ability to support child's learning at home", and "confidence in ability to make choices about child's schooling". Results show that attending the meeting (Group 2) leads to a positive and significant increase in the overall parent confidence index (Table 4, Column 1), driven by an increase in their confidence with helping their child with school choices. Confidence increases more for lower educated parents (Table 4, Column 4), suggesting that the information may particularly aid disadvantaged households. I also examine parents perceptions of the likelihood that their child will join secondary school. Similarly, I construct a means effect index ranging from 1 (very unlikely to join) to 4 (very likely to join). I find that overall, the meeting leads to a positive and significant increase in parents' perception of the likelihood that their child joins secondary school (Table 4, Column 6), with larger gains for below-median educated households (Table 4, Column 9). Taken together, this evidence suggests that facilitated meetings with students, teachers, *and* parents may be effective in better equipping parents to make schooling decisions for their children, particularly for disadvantaged households.

5.2.4 Student and Parent Preferences: Cost and Distance

I next turn to examining preferences for specific schools within each category and characterize schools by distance from home primary school and performance (as measured by average test score). I find that the meeting intervention increases student and parent preferences for closer schools and increases student preferences for higher performing schools. I examine the impact of treatment on distance of student and parent sub-county school preferences using two different outcomes (Table 5). First, I define commutability as the schools within a 7 km radius from their primary school, and examine whether student select commutable schools. Second, I estimate average distances from home primary school using GPS coordinates.

In the control group, only 19 percent of students choose all commutable schools. Baseline parental preferences for commutability are slightly higher, with 28 percent of parents choosing

[18]Respondents are asked to answer from 1 to 4, where 4 is the highest (very confident) and 1 is the lowest (not confident).

all commutable schools. The average distance of schools chosen is 6.77 km for control students and 5.35 km for control parents. I find that treatment significantly increased the likelihood of choosing commutable schools for all treatment groups. Students were 15 to 17 percentage points more likely to select all commutable schools – nearly double that of the control. Consistent with the commutability results, treatment students chose a set of schools that were 1.2 to 1.3 km closer on average. There is a weaker increase in commutability for parents preferences, with a statistically significant 9.3 percentage point increase in the proportion of parents who choose all commutable schools. There is not a significant effect on average GPS distance for parents who attend the meeting (Group 2).

Second, I examine whether the meeting treatment changes the average performance of preferred schools, where performance is measured as the average test score at each secondary school in the previous year. While one might expect students to have a preference for higher performing schools, it's possible that when choosing schools, students trade off between proximity and performance. Results show that student who attend the student-only informational meeting select a 7.8 percentage points higher share of above-median schools (from a control base of 61 percent). The results are similar when the parent attends the meeting, with a statistically significant 8.7 percentage point increase in the share of schools that are above median A.4. While control parents select a similar share of above-median schools as students, there is no significant effect of attending the meeting (Group 2) on parent preference for performance. This suggests that either that parents have a lower preference for performance or that performance is less salient for parents. Taking all these results together, attending the meeting leads students to select schools that are more commutable and higher performing, and weakly leads parents to more choose more commutable schools (with no change in performance).

5.3 Student Application Choices (Admin Data)

In order to examine how these preferences translate into actual schooling choices, I link the survey responses with administrative data on students' final application choices (measured 12 months later). Despite the long time frame between the intervention and application deadline due to the Covid-19 school closures, treatment students in both groups choose more commutable subcounty day schools, at no cost to quality of the school. There is a positive and significant 9.4 percentage point effect on proportion of treatment students that choose all commutable schools for Group 1 and a positive 8.4 percentage point effect for Group 2 (Table 5, Columns 3). Students also choose closer schools as measured by GPS distance, though these effects are not statistically significant (Table 5, Columns 6).

5.4 Student Enrollment

Finally, I turn to the final survey to measure student enrollment in school. At the time of the survey, 81 percent of students had enrolled in secondary school, with no significant differences across treatment group. Of these students, 2 percent enrolled in National school, 12 percent in Extra County school, 11 percent in County school, and 54 percent in a subcounty school (Table 6). 1 percent of students left the public school system and enrolled in an outside private school.

Students who participated in the parent meeting group (Group 2) are significantly more likely

to enroll in a lower cost subcounty day school (6 percentage points), shifting out of the higher three tiers. This parallels the pattern seen in the elicited preference lists where students shift out of the higher tier schools when the parent is in the meeting.

This shift carries through to the school fees ultimately paid. Students in Group 2 (parent group) ultimately pay 18 USD less in tuition each year overall (Table 7). This is even larger for below median income households who save 29 USD per year. These cost reductions are meaningful, particularly for low socio-economic status households. The average monthly earnings in the sample is 106 USD per household; thus the 18 USD average cost saved is equivalent to 17 percent of household income and the 29 USD for below median households is equivalent to 27 percent of monthly income. Considering that parents must pay school fees for 4 years for each child and have 4.12 children on average, this can yield up to 445 USD overall cost savings (more than 4 months of average income.)

Conditional on selecting these lower cost sub-county day school, treatment students are no more likely to enroll in a more commutable school overall. However, lower income households are 33 percent more likely than the baseline to attend a school within the 7km radius (Table 8. There are no significant differences in commutability by education status of the household or gender. Importantly, these cost and distance savings come at no cost to the average quality of the school, with treatment students and control students enrolling in schools with the same mean quality.

5.5 Alternative Mechanisms

Taken together, the results above indicate that the mechanisms through which the meeting intervention affects outcomes is through improving knowledge (Groups 1 and 2) and increasing communication between students and their parents (Group 2). In this section, I examine and rule out three alternative mechanisms that might be driving the results: (i) changes in effort effort in preparing for the KCPE exam; (ii) time spent discussing with parent outside of the meeting; and (iii) differences in budgeting for secondary school.

5.5.1 Effort

First, one might expect that the meeting intervention could lead treatment students to allocate differential effort to preparing for secondary school. This could occur if, for example, knowledge about school characteristics or communication with parents leads students to become more or less confident in their ability to attend particular schools or their parent's support for their preferred choices. I rule out effort as a mechanism in two ways. First, I test whether treatment and control students have different scores on the KCPE exam. Second, I test whether treatment and control students differentially attend secondary school leading up to the exam. In both measures, I find no differences across groups in exam scores or attendance, suggesting that the treatment does not lead to differential effort across group, along these dimensions (Table A.8).

5.5.2 Discussion

Second, I test whether students and their parents discuss schooling choices more outside of the meeting across group. I ask students and their parents how many times they discuss the school

choices in a typical week leading up to the application deadline and find that are no significant differences by treatment group (Table A.9).

5.5.3 Budgeting

Finally, I test whether there is evidence that parents in treatment groups budget for schools differently as a result of the meeting. In particular, I regress the amount of money budgeted for child's school on actual cost of school and the interaction between cost of school and treatment status. I find that there is a 0.57 correlation between actual cost of school and budgeted costs, but there is no significant differences for the parent meeting group (Group 2) suggesting that the meeting doesn't lead parents to budget differently for secondary school. (Table A.10).

6 Estimating Preference Parameters

6.1 Student Preferences

Returning to the utility framework, let U_{ij} denote student i's utility from enrolling in school j, where $\mathcal{J} = \{1, 2, ...J\}$ is the set of available schools. I focus on the set of subcounty day schools, which is the relevant set of schools for most students in the sample. Students submit rank-ordered choice lists for subcounty schools $R_i = (R_{i1}, R_{i2})'$ where the school ranked first on a student's list is

$$R_{i1} = \arg\max_{j \in \mathcal{J}} U_{ij} \tag{6}$$

and the school ranked second is:

$$R_{i2} = \arg\max_{j \in \mathcal{J} \setminus \{R_{i1}\}} U_{ij} \tag{7}$$

Following Abdulkadiroğlu et al. (2020), I summarize student preferences by fitting random utility models, where student i's utility from enrolling in school j is:

$$U_{ij} = \delta_j + \gamma_{ij} D_{ij} + \epsilon_{ij} \tag{8}$$

The parameter δ_j is the mean utility of school j (capturing all characteristics of the school, including cost and quality) and γ_{ij} is student (dis)utility of distance. Unobserved tastes ϵ_{ij} are modeled as independent extreme value type I distributions.

The conditional likelihood of the rank list R_i implied by the logit model is:

$$\mathcal{L}(R_i | X_i, D_i) = \prod_{k=1}^{l(i)} \frac{\exp(\delta_j + \gamma_{ij} D_{ij})}{\sum_{j \in \mathcal{J} \setminus \{R_{i1}\}} \exp(\delta_k + \gamma_{ik} D_{ik})} \tag{9}$$

6.2 Treatment Effects on Schooling Choices

Reduced form results suggest that students apply to closer sub-county day schools, at no cost to the quality of the school and that students ultimately enroll in lower cost and closer sub-county schools at the same level of quality. However, treatment and control students may have differential preferences for secondary school characteristics beyond these measured characteristics of distance, cost, and performance.

I test whether treatment and control students have different preferences for schools by fitting a rank-ordered logit model with secondary school fixed effects. For student application choices, I estimate (i) a restricted model that includes secondary school fixed effects and distance (Equation 14), and (ii) an unrestricted model that interacts school fixed effects and distance with treatment status (Equation 11).

$$U_{ij} = \delta_j + \gamma_{ij} D_{ij} + \epsilon_{ij} \tag{10}$$

$$U_{ij} = \delta_j + \lambda_j \times T_i + \gamma_{ij} D_{ij} + \phi_{ij} D_{ij} \times T_i + \epsilon_{ij} \tag{11}$$

I then compare the model fit for both application choices and enrollment choices using a Likelihood Ratio Test (Equation 12), with 81 degrees of freedom, finding that we can reject the null hypotheses that the two models are the same for student application (Table 9).

$$\lambda_{\text{LR}} = -2[\ell(\theta_0) - \ell(\hat{\theta})] \tag{12}$$

6.3 Performance vs Distance to School

When selecting subcounty day schools, students face trade-offs between two observable parameters: distance to school and quality (performance) of school. To assess student relative valuations of distance and performance and how this varies across treatment group, I estimate parameters on performance and distance in the following model in each treatment group:

$$U_{ij} = \beta_1 P_j + \beta_2 D_{ij} + \epsilon_{ij} \tag{13}$$

P_j is average test score of each secondary school (out of a 12 point scale) and D_{ij} is distance from student i to school j, measured using GPS distance from home primary school to secondary school.

The conditional likelihood of the rank list R_i implied by the logit model is now:

$$\mathcal{L} = \prod_{k=1}^{l(i)} \frac{\exp(\beta_1 P_j + \beta_2 D_{ij})}{\sum_{j \in \mathcal{J} \setminus \{R_{i1}\}} \exp(\beta_1 P_j + \beta_2 D_{ij})} \tag{14}$$

The preference parameters on the logit estimation indicate that students have a significant dislike

for distance across all three groups (although the differences are not statistically significant) and a preference for performance. Students in Group 2 have a higher relative utility for performance. Taking the ratio between coefficients ($-\beta_2/\beta_1$) allows for the estimation of trade-offs between distance and performance across groups (e.g. the valuation of performance in distance units). Performance is measured as the average test score of each secondary school, standardized to scale from 1 (F) to 12 (A) where each point difference represents a one grade shift (e.g. from a B+ to an A-). (Table 9) indicates that the control group (Group 3) is willing to trade off 0.4 points per km traveled, Group 1 trades off 0.41 points per km traveled, and Group 2 is willing to trade off 0.35 points per km traveled, suggesting that Group 2 values performance more relative to distance when compared to Group 1 and 2.

The point estimates are not statistically significant across treatment groups. This is consistent with the reduced form estimates for GPS distance (Table D.28) and performance (Table A.5) of schools in the final application. Taken together with the result from the log likelihood test, this suggests that treatment students make different choices, but that these choices cannot be fully explained by characteristics such as performance and distance alone. Future work will explore the characteristics of these preference parameters.

7 Conclusion and Policy Implications

Choosing the right secondary school can greatly influence the likelihood of secondary school completion. Information gaps about school characteristics can lead households to choose schools that are too expensive, not a good fit academically, or too costly to commute to, increasing the likelihood of students dropping out. These information gaps may be further exacerbated when students and parents fail to communicate about school choices before making high stakes schooling decisions. This paper studies whether providing information and promoting student-parent communication about schooling options can improve secondary schooling choice, using a field experiment with 3,000 Kenyan students and their parents. The intervention randomized individual informational meetings for 8th grade students across 183 schools, further randomizing whether parents were included in the meeting for a facilitated conversation about school choices. The informational meetings involved a detailed guided discussion about characteristics of available secondary school options including school fees, commuting distances and school quality. Results show that the informational meetings led students to apply (and enroll in the case of low-income students) to more commutable secondary schools. Including the parent in the meeting led parents to learn about costs and students to ultimately enroll in lower cost schools, generating to meaningful savings - households saved 17% of average monthly earnings each year.

These findings suggest that informational meetings with facilitated conversations between students and their parents can be an effective way to address information and communication gaps affecting secondary school choice in low-income settings. Such interventions can be easily employed by education authorities at scale - the meetings I conducted were very low-cost, short[19], and can potentially be scaled by teachers as part of the school curriculum going forward. Therefore, they can be an important channel to improve educational outcomes in low-income countries

[19]Roughly 20 minutes each.

going forward. In future work, I plan to track secondary school performance, attendance, and eventual graduation in my sample to study whether the meetings affected longer run measures of student-school match. Tracking attendance will be key for assessing whether the initial cost-savings leads to a lower likelihood of dropping out of secondary school, and how this varies by gender and socio-econoomic status.

References

Abdulkadiroğlu, Atila, Parag A. Pathak, Jonathan Schellenberg and Christopher R. Walters. 2020. "Do Parents Value School Effectiveness?" *American Economic Review* 110(5):1502–1539.

Ajayi, Kehinde F. 2013. "School Choice and Educational Mobility: Lessons from Secondary School Applications in Ghana." p. 50.

Ajayi, Kehinde F., Willa H. Friedman and Adrienne M. Lucas. 2017. "The Importance of Information Targeting for School Choice." *American Economic Review* 107(5):638–643.

Ajayi, Kehinde, Willa Friedman and Adrienne Lucas. 2020. When Information Is Not Enough: Evidence from a Centralized School Choice System. Technical Report w27887 National Bureau of Economic Research Cambridge, MA: .

Bobba and Frisancho. 2016. "Learning about Oneself: The Effects of Performance Feedback on School Choice." https://publications.iadb.org/en/publication/12606/learning-about-oneself-effects-performance-feedback-school-choice.

Dizon-Ross, Rebecca. 2019. "Parents' Beliefs about Their Children's Academic Ability: Implications for Educational Investments." *American Economic Review* 109(8):2728–2765.

Duflo, Esther, Pascaline Dupas and Michael Kremer. 2021. The Impact of Free Secondary Education: Experimental Evidence from Ghana. SSRN Scholarly Paper ID 3874078 Social Science Research Network Rochester, NY: .

Franco, Catalina. N.d. "How Does Relative Performance Feedback Affect Beliefs and Academic Decisions?" . Forthcoming.

Hastings, Justine S. and Jeffrey M. Weinstein. 2007. Information, School Choice, and Academic Achievement: Evidence from Two Experiments. Working Paper 13623 National Bureau of Economic Research.

Inoue, Keiko, Emanuela di Gropello, Yesim Sayin Taylor and James Gresham. 2015. *Out-of-School Youth in Sub-Saharan Africa: A Policy Perspective*. World Bank Publications.

Kapor, Adam J., Christopher A. Neilson and Seth D. Zimmerman. 2020. "Heterogeneous Beliefs and School Choice Mechanisms." *American Economic Review* 110(5):1274–1315.

Kenya DHS. 2015. "Kenya Demographic and Health Survey 2014.".

Lai, Fang, Elisabeth Sadoulet and Alain de Janvry. 2009. "The Adverse Effects of Parents' School Selection Errors on Academic Achievement: Evidence from the Beijing Open Enrollment Program." *Economics of Education Review* 28(4):485–496.

Lucas, Adrienne M. and Isaac M. Mbiti. 2012. "The Determinants and Consequences of School Choice Errors in Kenya." *American Economic Review* 102(3):283–288.

Ozier, Owen. 2016. "The Impact of Secondary Schooling in Kenya: A Regression Discontinuity Analysis." *Journal of Human Resources* 53.

Walters, Christopher R. 2018. "The Demand for Effective Charter Schools." *Journal of Political Economy* 126(6):2179–2223.

8 Main Tables and Figures

Table 1: Parent Knowledge about Tuition Costs

	Panel A: Parent Knowledge about Tuition Costs				
	(1) National Cost	(2) Extra County Cost	(3) County Cost	(4) Sub-County Cost	(5) Mean Cost
Group 2: Student and Parent Meeting	.3***	.19***	.22***	.19***	.23***
	(.02)	(.03)	(.03)	(.03)	(.02)
Group 1: Student Meeting	-.0014	.0076	.00016	.013	.0048
	(.02)	(.02)	(.02)	(.03)	(.02)
Control Mean	.23	.33	.43	.61	.40
F-test p-val ($\beta_1 \neq \beta_2$)	< 0.001	< 0.001	< 0.001	< 0.001	< 0.001
N	2952	2952	2952	2952	2952

	Panel B: Student and Parent Knowledge about Application Process					
	Share Correct No. Schools		Share Correct Exam Marks		Knowledge Index (SD units)	
	(1) Student	(2) Parent	(3) Student	(4) Parent	(5) Student	(6) Parent
Group 2: Student and Parent Meeting	.58***	.33***	.15***	.21***	1.6***	1.2***
	(.03)	(.02)	(.02)	(.02)	(.09)	(.07)
Group 1: Student Meeting	.62***	-.0034	.15***	.025	1.7***	.028
	(.03)	(.01)	(.02)	(.02)	(.08)	(.05)
Control Mean	.17	.05	.79	.58	.00	.00
F-test p-val ($\beta_1 \neq \beta_2$)	.2	<0.001	.84	<0.001	.21	<0.001
N	2952	2952	2952	2940	2952	2952

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table 2: Student and Parent Preferences for School Category

	Panel A: Parent Preferences across School Tiers			
	(1) National	(2) Extra County	(3) County	(4) Sub-County
Group 2: Student and Parent Meeting	-.052**	.046**	.02	-.026
	(.03)	(.02)	(.02)	(.02)
Group 1: Student Meeting	-.024	.013	-.0096	.014
	(.02)	(.02)	(.02)	(.02)
Control Mean	.45	.16	.16	.19
F-test p-val ($\beta_1 \neq \beta_2$)	.29	.11	.14	.05
Number Observations	2952	2952	2952	2952
	Panel B: Student Preferences across School Tiers			
	(1) National	(2) Extra County	(3) County	(4) Sub-County
Group 2: Student and Parent Meeting	-.07**	.044**	.024	-.0077
	(.03)	(.02)	(.02)	(.02)
Group 1: Student Meeting	-.019	.038*	-.016	-.012
	(.03)	(.02)	(.02)	(.02)
Control Mean	.54	.22	.14	.11
F-test p-val ($\beta_1 \neq \beta_2$)	.087	.77	.018	.75
N	2952	2952	2952	2952

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table 3: Student and Parent Alignment of Preferences

	Knowledge of Preferences All Schools		Knowledge of Preferences Busia Schools		Parent - Child Alignment	
	(1) Child	(2) Parent	(3) Child	(4) Parent	(5) All	(6) Busia
Group 2: Student and Parent Meeting	.11***	.12***	.21***	.21***	.15***	.17***
	(.02)	(.01)	(.02)	(.02)	(.01)	(.01)
Group 1: Student Meeting	.012	-.016	.005	-.03*	.014	.0075
	(.01)	(.01)	(.02)	(.02)	(.01)	(.01)
Control Mean	.31	.28	.36	.33	.25	.36
F-test p-val ($\beta_1 \neq \beta_2$)	<.001	<.001	<.001	<.001	<.001	<.001
N	2952	2952	2952	2952	2952	2952

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table 4: Parental Attitudes Towards Schooling

	Parental Confidence					Join Secondary				
	(1) Overall	(2) Below Med Income	(3) Above Med Income	(4) Below Med Educ	(5) Above Med Educ	(6) Overall	(7) Below Med Income	(8) Above Med Income	(9) Below Med Educ	(10) Above Med Educ
Group 1: Student Meeting	.044	.079	-.028	.086	-.023	.047	.034	.07	.078	.054
	(.05)	(.07)	(.07)	(.06)	(.07)	(.04)	(.07)	(.06)	(.07)	(.05)
Group 2: Student and Parent Meeting	.092**	.1	.035	.19***	-.022	.099**	.13*	.083	.22***	.0055
	(.04)	(.07)	(.06)	(.06)	(.07)	(.05)	(.07)	(.07)	(.07)	(.06)
Control Mean	-.01	-.06	.06	-.07	.10	-.01	-.08	.04	-.09	.09
F-test p-val ($\beta_1 \neq \beta_2$)	.27	.77	.38	.085	.98	.23	.2	.84	.044	.44
N	2861	1135	1306	1341	1279	2858	1133	1305	1338	1279

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table 5: Distance to School

	Commutable			GPS Distance		
	(1) Student Survey	(2) Parent Survey	(3) Final Admin	(4) Student Survey	(5) Parent Survey	(6) Final Admin
Group 2: Student and Parent Meeting	.16***	.09*	.083	-1.3***	-.5*	-.2
	(.04)	(.05)	(.05)	(.32)	(.29)	(.82)
Group 1: Student Meeting	.15***	.054	.093*	-1.1***	-.29	.003
	(.04)	(.04)	(.06)	(.32)	(.29)	(.73)
Control Mean	.19	.28	.21	6.77	5.35	6.46
F-test p-val ($\beta_1 \neq \beta_2$)	.75	.47	.87	.63	.33	.81
N	2928	2825	2903	2862	2767	2831

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table 6: Category of Enrollment

	(1) National Enroll	(2) Extra County Enroll	(3) County Enroll	(4) Subcounty Enroll	(5) Private Enroll	(6) Total Enroll
Group 2: Student and Parent Meeting	-.0053	-.02	-.014	.06**	.0013	.018
	(.01)	(.01)	(.02)	(.03)	(.00)	(.02)
Group 1: Student Meeting	.0034	.004	-.033**	.044	-.0026	.012
	(.01)	(.02)	(.02)	(.03)	(.00)	(.02)
Control Mean	.02	.12	.11	.54	.01	.81
F-test p-val ($\beta_1 \neq \beta_2$)	.41	.13	.17	.57	.26	.77
N	2952	2952	2952	2952	2952	2952

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table 7: School Fees of Enrolled School

	Fees of Enrolled School		
	(1) Overall Sample	(2) Below Med Income	(3) Above Med Income
Group 2: Student and Parent Meeting	-18**	-29**	-4.8
	(8.57)	(12.10)	(11.72)
Group 1: Student Meeting	-10	-19	-4
	(10.02)	(12.94)	(12.23)
Control Mean	187.62	202.55	175.20
F-test p-val ($\beta_1 \neq \beta_2$)	.46	.37	.96
N	2344	904	1097

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table 8: Distance to Enrolled School

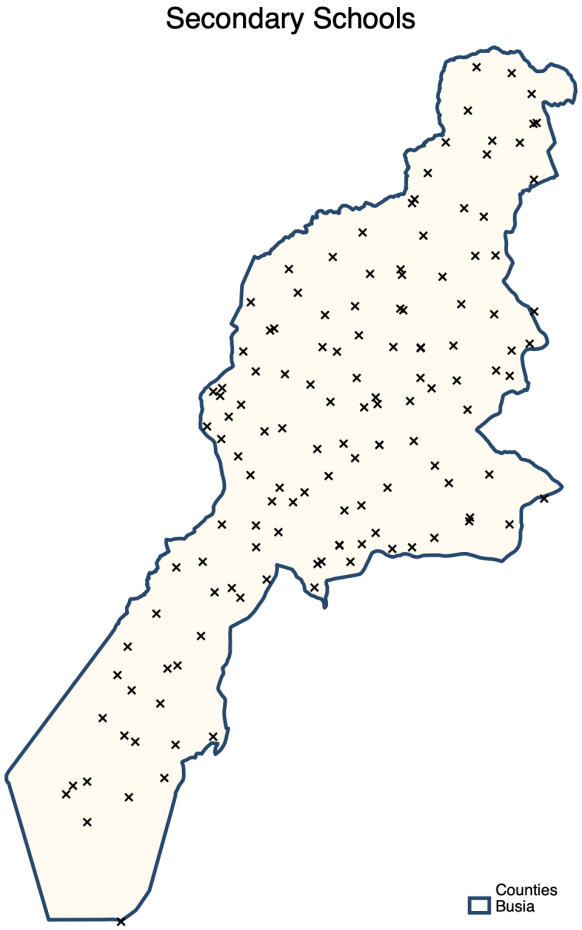
	Commutable			GPS Distance		
	(1) Overall Sample	(2) Below Med Income	(3) Above Med Income	(4) Overall Sample	(5) Below Med Income	(6) Above Med Income
Group 2: Student and Parent Meeting	.0054	.13**	-.08	-.18	-.74	.38
	(.05)	(.06)	(.06)	(.44)	(.49)	(.46)
Group 1: Student Meeting	.026	.11*	-.053	.014	-.57	.74
	(.05)	(.06)	(.05)	(.43)	(.53)	(.45)
Control Mean	.60	.54	.65	4.65	5.00	4.26
F-test p-val ($\beta_1 \neq \beta_2$)	.67	.75	.66	.56	.67	.44
N	1695	699	754	1655	684	733

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table 9: Preference Parameters

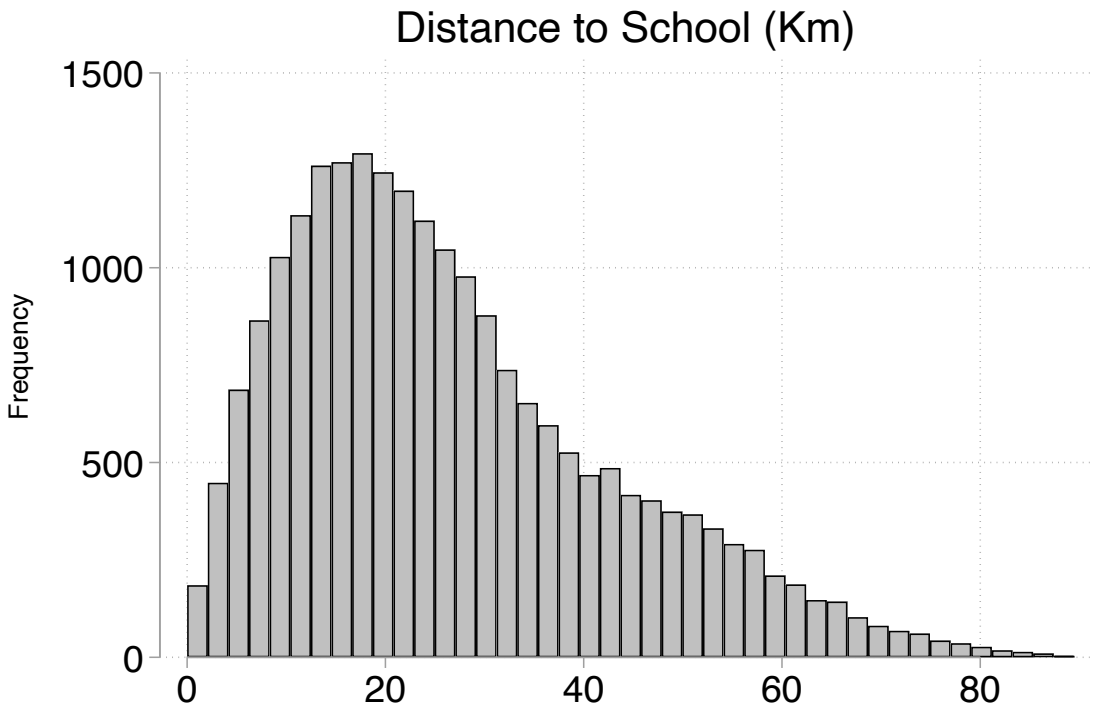
	Panel A: Likelihood Ratio Test		
	χ^2	Prob $> \chi^2$	
Application	2242.74	< 0.001	
N (schools)	80		
	Panel B: Logit Model Coefficients		
	Group 1	Group2	Group3
Distance	-.24***	-.25***	-.25***
	(.005)	(.005)	(.005)
Performance	.58***	.7***	.62***
	(.043)	(.038)	(.05)
N	2899	2899	2899
Ratios $(-\frac{\beta_2}{\beta_1})$	0.41 pt/km	0.35 pt/km	0.4 pt/km

Figure 1: Secondary Schools in Busia County



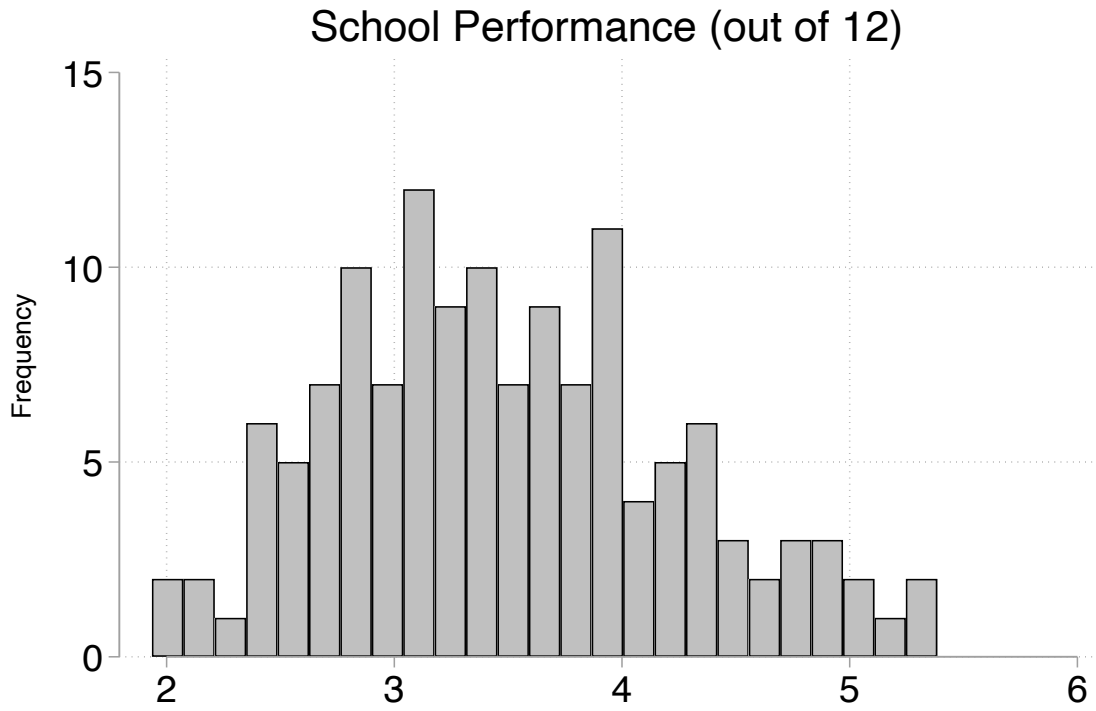
Notes: This figure plots the secondary school choices in Busia County.

Figure 2: Density Function



Notes: This figure plots the distribution of distance between home primary school and each subcounty and county secondary school in Busia County in kilometers.

Figure 3: Density Function



Notes: This figure plots the distribution of performance of each between home primary school and each subcounty secondary school. Units are a standardized score from 1 to 12 representing the grade range from an F to an A. Each one point is interpreted as a one grade shift - e.g. from a B+ to an A-.

A Additional Tables

Table A.1: Balance of Baseline Demographics Across Treatment Group

Variable	(1) Treatment 1 (T1)	(2) Treatment 2 (T2)	(3) Control (C)
Child Female	0.54	0.50	0.50
	(0.50)	(0.50)	(0.50)
Parent Female	0.66	0.64	0.67
	(0.47)	(0.48)	(0.47)
Household Income (USD)	108.99	104.22	106.92
	(334.44)	(362.36)	(401.41)
Educ < Primary	0.50	0.51	0.52
	(0.50)	(0.50)	(0.50)
Child Age	15.44	15.51	15.51
	(1.57)	(1.48)	(1.58)
Observations	974	906	1,072

Table A.2: Strict Preference Match

	(1) Strict Match All Schools	(2) Strict Match Busia Only
Group 1: Student Meeting	.014	.0074
	(.01)	(.01)
Group 2: Student and Parent Meeting	.12***	.1***
	(.01)	(.01)
Control Mean	.20	.23
F-test p-val ($\beta_1 \neq \beta_2$)	1.1e-15	2.3e-11
N	2952	2952

Table A.3: Survey Preferences - Commutability of School (Full)

	All Commutable		One Commutable		GPS Distance (km)	
	(1) Student	(2) Parent	(3) Student	(4) Parent	(5) Student	(6) Parent
Group 2: Student and Parent Meeting	.16***	.09*	.1**	.016	-1.3***	-.5*
	(.04)	(.05)	(.04)	(.04)	(.32)	(.29)
Group 1: Student Meeting	.15***	.054	.16***	.062**	-1.1***	-.29
	(.04)	(.04)	(.03)	(.03)	(.32)	(.29)
Control Mean	.19	.28	.66	.79	6.77	5.35
F-test p-val ($\beta_1 \neq \beta_2$)	.75	.47	.47	.47	.63	.33
N	2928	2825	2928	2825	2862	2767

Table A.4: Survey Preferences: Performance of School

	School Above Median	
	(1) Student	(2) Parent
Group 2: Student and Parent Meeting	.087***	.019
	(.03)	(.04)
Group 1: Student Meeting	.078***	.0069
	(.03)	(.04)
Control Mean	.61	.62
F-test p-val ($\beta_1 \neq \beta_2$)	.8	.74
N	2952	2952

Table A.5: Final Application: Performance of School

	School Above Median
	(1) Student
Group 2: Student and Parent Meeting	.053
	(.04)
Group 1: Student Meeting	.014
	(.04)
Control Mean	.62
F-test p-val ($\beta_1 \neq \beta_2$)	.36
N	2903

Table A.6: Tier of Offers

	(1) National Offer	(2) Extra County Offer	(3) County Offer	(4) Subcounty Offer
Group 1: Student Meeting	.011	.0033	-.009	-.011
	(.01)	(.02)	(.02)	(.03)
Group 2: Student and Parent Meeting	.0049	-.014	-.0018	.012
	(.01)	(.02)	(.02)	(.03)
Control Mean	.02	.16	.22	.64
F-test p-val ($\beta_1 \neq \beta_2$)	.53	.35	.76	.5
N	2952	2952	2952	2952

Table A.7: Performance of Enrolled School

	Median Performance at Enrolled School				
	(1) Overall	(2) Below Med Income	(3) Above Med income	(4) Below Med Educ	(5) Above Med Educ
Group 1: Student Meeting	-.013	.0085	.0089	-.04	.0092
	(.05)	(.06)	(.06)	(.06)	(.06)
Group 2: Student and Parent Meeting	-.024	-.047	.021	-.066	.04
	(.05)	(.06)	(.06)	(.06)	(.06)
Control Mean	.67	.66	.67	.66	.66
F-test p-val ($\beta_1 \neq \beta_2$)	.83	.39	.84	.7	.6
N	1611	666	713	822	647

Table A.8: Student Effort

	(1) Test Score	(2) Number of Days (Last 5 days)
Group 1: Student Meeting	.049	-.0011
	(.06)	(.05)
Group 2: Student and Parent Meeting	.049	-.029
	(.07)	(.05)
Control Mean	-.00	4.79
F-test p-val ($\beta_1 \neq \beta_2$)	1	.61
N	2746	2770

Table A.9: Student-Parent Discussion After Meeting

	(1) Discuss
Group 1: Student Meeting	.091
	(.07)
Group 2: Student and Parent Meeting	-.065
	(.07)
Control Mean	2.32
F-test p-val ($\beta_1 \neq \beta_2$)	.013
N	2823

Table A.10: Budgeting

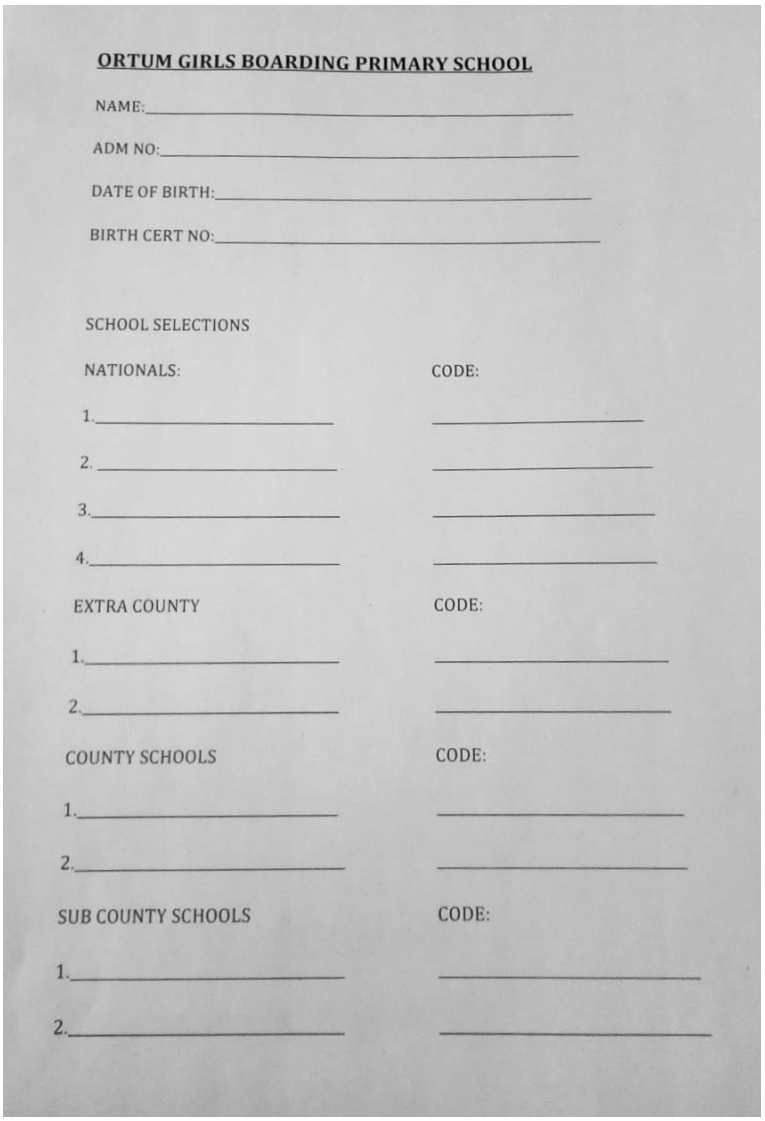
	(1) Budgeted Fees
Actual School Fees	.56***
	(.03)
School Fees x Group	.068*
1 (Student)	(.04)
School Fees x Group	.02
2 (Student & Parent)	(.03)
Control Mean	.85
F-test p-val ($\beta_1 \neq \beta_2$)	.19
N	2319

B School Selection Materials

KENYA NATIONAL EXAMINATIONS COUNCIL

		School Code & Name		Category	Type	Cluster
C1	138	01101101	DR.AGGREY HIGH SCHOOL	Extra County	Boys	C1
	139	01101201	ST. MARY'S HIGH SCHOOL LUSHANGONYI	Extra County	Boys	C1
	140	01114102	MURRAY GIRLS' HIGH SCHOOL	Extra County	Girls	C1
	141	01114301	MWASERE GIRLS' SECONDARY SCHOOL	Extra County	Girls	C1
	142	01115101	VOI SECONDARY SCHOOL	Extra County	Boys	C1
	143	02127102	MAZERAS HIGH SCHOOL	Extra County	Boys	C1
	144	04107101	MALINDI HIGH SCHOOL	Extra County	Boys	C1
	145	04122103	KOMBENI GIRLS SECONDARY SCHOOL	Extra County	Girls	C1
	146	04122105	RIBE GIRLS SECONDARY SCHOOL	Extra County	Girls	C1
	147	04129201	LUTSANGANI BOYS SECONDARY SCHOOL	Extra County	Boys	C1
	148	06130101	LAMU BOYS SECONDARY SCHOOL	Extra County	Boys	C1
	149	07214101	NYAHURURU HIGH SCHOOL	Extra County	Boys	C1
	150	07215202	WANJOHI SECONDARY SCHOOL	Extra County	Girls	C1
	151	07216101	NJABINI BOYS HIGH SCHOOL	Extra County	Boys	C1
	152	07216108	MT KINANGOP GIRLS' SECONDARY SCHOOL	Extra County	Girls	C1
	153	08202001	NYERI HIGH SCHOOL	Extra County	Boys	C1
	154	08202007	GIAKANJA SECONDARY SCHOOL	Extra County	Boys	C1
	155	08210201	NAROMORU GIRLS SECONDARY SCHOOL	Extra County	Girls	C1
	156	08217101	KANJURI HIGH SCHOOL	Extra County	Boys	C1
	157	08217202	KIRIMARA HIGH SCHOOL	Extra County	Boys	C1
	158	08218102	TUMUTUMU GIRLS' HIGH SCHOOL	Extra County	Girls	C1
	159	08219101	SOUTH TETU GIRLS' HIGH SCHOOL	Extra County	Girls	C1
	160	08219103	ST BONAVENTURE,KAHETI BOYS HIGH SCHOOL	Extra County	Boys	C1
	161	08220301	ST. BAKHITA GATARAGWA GIRLS HIGH SCHOOL	Extra County	Girls	C1
	162	08221301	KANGUBIRI GIRLS HIGH SCHOOL	Extra County	Girls	C1
	163	08237001	KARIMA BOYS' HIGH SCHOOL	Extra County	Boys	C1
	164	08237002	OUR LADY OF FATIMA CHINGA GIRLS SECONDARY SCHOOL	Extra County	Girls	C1

Figure 4: Secondary School Choice List



ORTUM GIRLS BOARDING PRIMARY SCHOOL

NAME:_____

ADM NO:_____

DATE OF BIRTH:_____

BIRTH CERT NO:_____

SCHOOL SELECTIONS

NATIONALS:	CODE:
1._____	_____
2._____	_____
3._____	_____
4._____	_____
EXTRA COUNTY	CODE:
1._____	_____
2._____	_____
COUNTY SCHOOLS	CODE:
1._____	_____
2._____	_____
SUB COUNTY SCHOOLS	CODE:
1._____	_____
2._____	_____

Figure 5: Example School Choice Form

C Intervention Materials

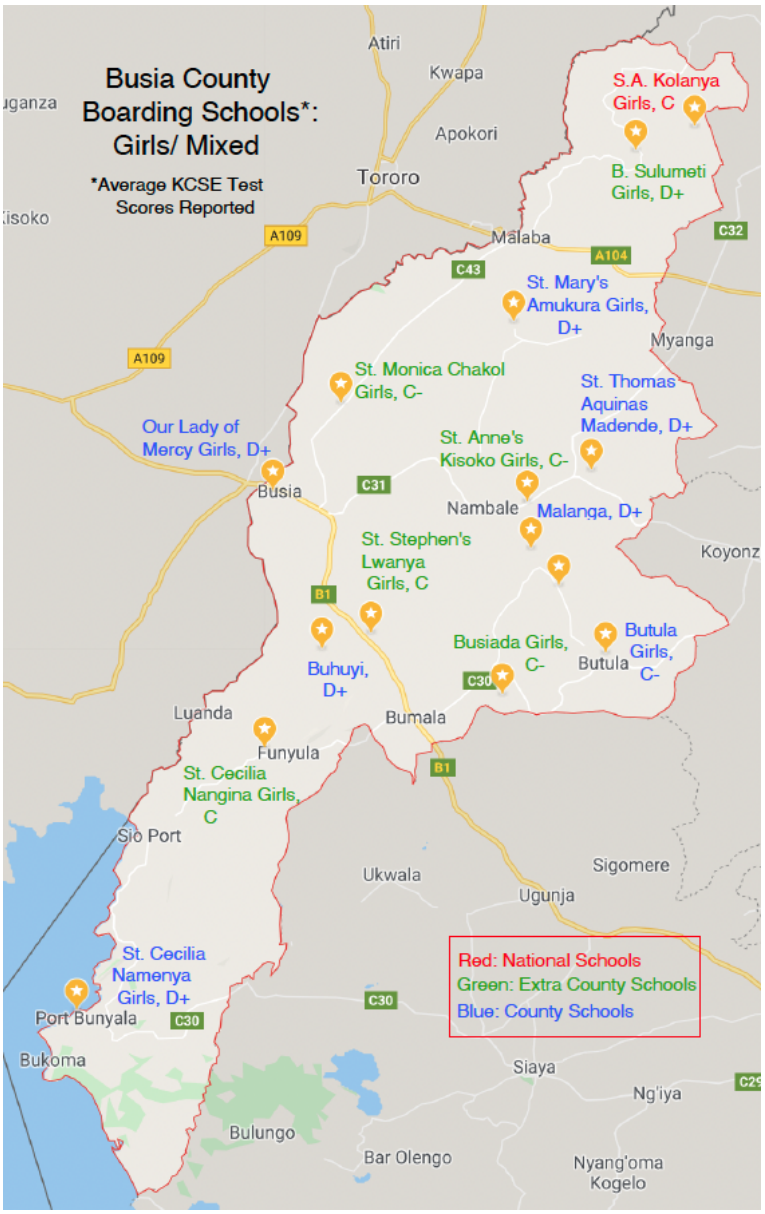


Figure 6: Busia County Map: Girls

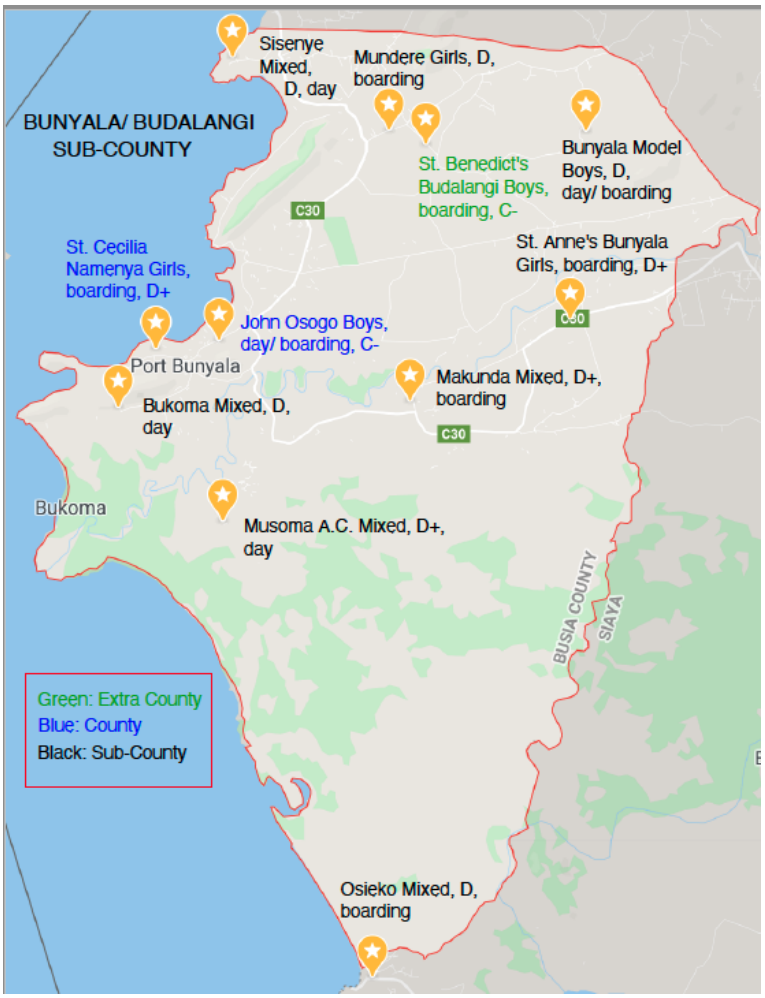


Figure 7: Example SubCounty Map: Bunyala Sub-County

D Heterogeneity by Income, Education Level, and Child Gender

Table D.1: Parent Knowledge about Tuition Costs by Income Group

	Parent Knowledge about Tuition Costs			
	(1) National Cost	(2) Extra County Cost	(3) County Cost	(4) Sub-County Cost
Group 1: Student Meeting	-.005	.016	-.039	.044
	(.03)	(.03)	(.04)	(.04)
Group 2: Student and Parent Meeting	.28***	.15***	.21***	.25***
	(.04)	(.04)	(.04)	(.03)
Above Med Income	.045	.076**	.058*	.078**
	(.03)	(.03)	(.03)	(.03)
Group 1 x Above Med Income	.0014	-.000053	.055	-.023
	(.04)	(.04)	(.05)	(.05)
Group 2 x Above Med Income	.088*	.08	.023	-.082*
	(.05)	(.05)	(.05)	(.05)
Control Mean	.23	.33	.43	.61
F-test p-val ($\beta_1 \neq \beta_2$)	.053	.089	.54	.22
N	2523	2523	2523	2523

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.2: Parent Knowledge about Tuition Costs by Education Group

	Parent Knowledge about Tuition Costs			
	(1) National Cost	(2) Extra County Cost	(3) County Cost	(4) Sub-County Cost
Group 1: Student Meeting	-.0022	.026	.0084	.04
	(.03)	(.04)	(.03)	(.04)
Group 2: Student and Parent Meeting	.31***	.19***	.22***	.19***
	(.04)	(.04)	(.03)	(.03)
Educ < Primary	-.094***	-.1***	-.14***	-.028
	(.03)	(.03)	(.03)	(.03)
Group 1 x Educ < Primary	-.0051	-.027	-.0048	-.042
	(.04)	(.05)	(.05)	(.05)
Group 2 x Educ < Primary	-.0033	.016	-.0043	-.014
	(.05)	(.05)	(.04)	(.04)
Control Mean	.23	.33	.43	.61
F-test p-val ($\beta_1 \neq \beta_2$)	.97	.42	.99	.54
N	2695	2695	2695	2695

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.3: Parent Knowledge about Tuition Costs by Child Gender

	Parent Knowledge about Tuition Costs			
	(1) National Cost	(2) Extra County Cost	(3) County Cost	(4) Sub-County Cost
Group 1: Student Meeting	.0041	-.037	-.012	-.0045
	(.03)	(.03)	(.04)	(.04)
Group 2: Student and Parent Meeting	.33***	.18***	.19***	.19***
	(.03)	(.03)	(.03)	(.03)
Child Female	.031	-.035	.0025	-.015
	(.02)	(.03)	(.03)	(.03)
Group 1 x Child Female	-.012	.084**	.023	.033
	(.03)	(.04)	(.05)	(.04)
Group 2 x Child Female	-.053	.034	.043	-.00019
	(.04)	(.04)	(.04)	(.04)
Control Mean	.23	.33	.43	.61
F-test p-val ($\beta_1 \neq \beta_2$)	.36	.22	.66	.46
N	2952	2952	2952	2952

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.4: Knowledge Indices by Income Group

	Share Correct No. Schools		Share Correct Exam Marks		Knowledge Index (SD units)	
	(1) Student	(2) Parent	(3) Student	(4) Parent	(5) Student	(6) Parent
Group 1: Student Meeting	.6***	-.013	.15***	.014	1.6***	-.0084
	(.04)	(.02)	(.03)	(.04)	(.11)	(.07)
Group 2: Student and Parent Meeting	.55***	.26***	.14***	.22***	1.5***	1.1***
	(.04)	(.03)	(.03)	(.03)	(.11)	(.09)
Above Med Income	-.028	-.0081	.0018	.18***	-.079	.23***
	(.02)	(.01)	(.03)	(.03)	(.06)	(.06)
Group 1 x Above Med Income	.064*	.01	-.0018	-.00021	.19*	.058
	(.04)	(.02)	(.03)	(.05)	(.09)	(.10)
Group 2 x Above Med Income	.05	.12***	.023	-.017	.24***	.27**
	(.04)	(.04)	(.03)	(.05)	(.09)	(.13)
Control Mean	.17	.05	.79	.58	.00	-.01
F-test p-val ($\beta_1 \neq \beta_2$)	.75	.0083	.29	.73	.59	.11
N	2523	2523	2523	2523	2523	2523

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.5: Knowledge Indices by Education Group

	Share Correct No. Schools		Share Correct Exam Marks		Knowledge Index (SD units)	
	(1) Student	(2) Parent	(3) Student	(4) Parent	(5) Student	(6) Parent
Group 1: Student Meeting	.59***	.00022	.14***	.055**	1.6***	.093
	(.04)	(.02)	(.02)	(.03)	(.09)	(.06)
Group 2: Student and Parent Meeting	.54***	.43***	.13***	.14***	1.5***	1.3***
	(.04)	(.03)	(.02)	(.02)	(.10)	(.08)
Educ < Primary	-.023	-.013	-.053**	-.35***	-.18***	-.52***
	(.03)	(.01)	(.02)	(.03)	(.06)	(.06)
Group 1 x Educ < Primary	.049	-.0022	.022	-.069	.14	-.14
	(.04)	(.02)	(.03)	(.05)	(.09)	(.09)
Group 2 x Educ < Primary	.047	-.14***	.041	.14***	.14	-.2*
	(.04)	(.03)	(.03)	(.04)	(.08)	(.12)
Control Mean	.17	.05	.79	.58	.00	-.01
F-test p-val ($\beta_1 \neq \beta_2$)	.96	.00013	.33	1.4e-06	.98	.63
N	2695	2695	2695	2695	2695	2695

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.6: Knowledge Indices by Child Gender

	Share Correct No. Schools		Share Correct Exam Marks		Knowledge Index (SD units)	
	(1) Student	(2) Parent	(3) Student	(4) Parent	(5) Student	(6) Parent
Group 1: Student Meeting	.59***	-.002	.12***	.034	1.7***	-.021
	(.04)	(.02)	(.02)	(.03)	(.09)	(.06)
Group 2: Student and Parent Meeting	.57***	.37***	.14***	.18***	1.6***	1.2***
	(.03)	(.03)	(.02)	(.03)	(.10)	(.10)
Child Female	-.0083	.0009	-.043	-.034	-.015	-.12**
	(.02)	(.01)	(.03)	(.03)	(.07)	(.05)
Group 1 x Child Female	.052	-.0029	.049	-.014	.099	.097
	(.04)	(.02)	(.03)	(.04)	(.09)	(.08)
Group 2 x Child Female	.0083	-.079**	.022	.068*	-.078	-.039
	(.04)	(.03)	(.03)	(.04)	(.10)	(.11)
Control Mean	.17	.05	.79	.58	.00	-.01
F-test p-val ($\beta_1 \neq \beta_2$)	.3	.015	.2	.058	.059	.24
N	2952	2952	2952	2940	2952	2952

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.7: Parent-Child Knowledge of Preferences by Income Group

	Child		Parent	
	(1)	(2)	(3)	(4)
	Beliefs	Beliefs - Local	Beliefs	Beliefs- Local
Above Med Income	.013	.0017	.027*	.026
	(.01)	(.02)	(.01)	(.02)
Group 1: Student Meeting	-.016	-.03	-.038*	-.048*
	(.02)	(.02)	(.02)	(.03)
Group 2: Student and Parent Meeting	.069***	.16***	.1***	.19***
	(.02)	(.02)	(.02)	(.02)
Group 1 x Above Med Income	.039*	.053**	.034	.028
	(.02)	(.03)	(.02)	(.03)
Group 2 x Above Med Income	.078***	.096***	.027	.038
	(.02)	(.03)	(.02)	(.03)
Control Mean	.31	.36	.28	.33
F-test p-val ($\beta_1 \neq \beta_2$)	.000071	9.3e-12	9.5e-10	1.3e-14
N	2523	2523	2523	2523

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.8: Parent-Child Knowledge of Preferences by Education Group

	Child		Parent	
	(1)	(2)	(3)	(4)
	Beliefs	Beliefs - Local	Beliefs	Beliefs- Local
Educ < Primary	-.027**	-.015	-.027*	-.016
	(.01)	(.01)	(.01)	(.02)
Group 1: Student Meeting	.027	.025	-.009	-.024
	(.02)	(.02)	(.02)	(.02)
Group 2: Student and Parent Meeting	.13***	.24***	.12***	.23***
	(.02)	(.02)	(.02)	(.02)
Group 1 x Educ < Primary	-.032	-.038*	-.016	-.0081
	(.02)	(.02)	(.02)	(.03)
Group 2 x Educ < Primary	-.028	-.041*	.0073	-.019
	(.02)	(.02)	(.02)	(.03)
Control Mean	.31	.36	.28	.33
F-test p-val ($\beta_1 \neq \beta_2$)	3.3e-06	7.2e-16	3.4e-10	1.7e-22
N	2695	2695	2695	2695

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.9: Parent-Child Knowledge of Preferences by Child Gender

	Child		Parent	
	(1)	(2)	(3)	(4)
	Beliefs	Beliefs - Local	Beliefs	Beliefs- Local
Child Female	.0036	.014	.011	.01
	(.01)	(.02)	(.01)	(.02)
Group 1: Student	.027*	.022	-.015	-.022
Meeting	(.01)	(.02)	(.02)	(.02)
Group 2: Student and	.13***	.23***	.13***	.22***
Parent Meeting	(.02)	(.02)	(.02)	(.02)
Group 1 x Child	-.028	-.031	-.0038	-.016
Female	(.02)	(.02)	(.02)	(.02)
Group 2 x Child	-.03	-.038	-.02	-.018
Female	(.02)	(.03)	(.02)	(.03)
Control Mean	.31	.36	.28	.33
F-test p-val ($\beta_1 \neq \beta_2$)	2.2e-07	5.0e-19	9.0e-13	1.2e-22
N	2952	2952	2952	2952

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.10: Parent-Child Preference Alignment by Income Group

	(1)	(2)
	Parent-Child Match	Parent-Child Match - Local
Above Med Income	.035***	.029*
	(.01)	(.02)
Group 1: Student	.0028	.0011
Meeting	(.01)	(.02)
Group 2: Student and	.11***	.15***
Parent Meeting	(.02)	(.02)
Group 1 x Above Med	.014	.0067
Income	(.02)	(.02)
Group 2 x Above Med	.067***	.058**
Income	(.02)	(.03)
Control Mean	.25	.36
F-test p-val ($\beta_1 \neq \beta_2$)	1.1e-09	5.5e-10
N	2523	2523

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.11: Parent-Child Preference Alignment by Education Group

	(1) Parent-Child Match	(2) Parent-Child Match - Local
Educ < Primary	-.045***	-.037**
	(.01)	(.01)
Group 1: Student Meeting	.027**	.028*
	(.01)	(.02)
Group 2: Student and Parent Meeting	.17***	.18***
	(.02)	(.02)
Group 1 x Educ < Primary	-.023	-.036*
	(.02)	(.02)
Group 2 x Educ < Primary	-.045**	-.0058
	(.02)	(.02)
Control Mean	.25	.36
F-test p-val ($\beta_1 \neq \beta_2$)	2.8e-13	4.9e-12
N	2695	2695

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.12: Parent-Child Preference Alignment by Child Gender

	(1) Parent-Child Match	(2) Parent-Child Match - Local
Child Female	-.0041	-.0048
	(.01)	(.02)
Group 1: Student Meeting	.0093	.0041
	(.01)	(.02)
Group 2: Student and Parent Meeting	.15***	.18***
	(.01)	(.02)
Group 1 x Child Female	.009	.0073
	(.02)	(.02)
Group 2 x Child Female	-.0062	-.0091
	(.02)	(.03)
Control Mean	.25	.36
F-test p-val ($\beta_1 \neq \beta_2$)	1.8e-16	1.3e-15
N	2952	2952

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.13: Survey Preferences: Commutability of School by Income Group

	All Commutable		One Commutable		GPS Distance (km)	
	(1) Student	(2) Parent	(3) Student	(4) Parent	(5) Student	(6) Parent
Group 1: Student Meeting	.17***	.069	.17***	.069*	-1.5***	-.41
	(.05)	(.05)	(.04)	(.04)	(.44)	(.33)
Group 2: Student and Parent Meeting	.19***	.12**	.13***	.055	-1.4***	-.39
	(.05)	(.05)	(.05)	(.05)	(.44)	(.33)
Group 1 x Above Med Income	-.036	-.03	-.023	-.0072	.46	.011
	(.04)	(.04)	(.04)	(.04)	(.36)	(.25)
Group 2 x Above Med Income	-.019	-.02	-.044	-.061	.35	-.17
	(.04)	(.05)	(.04)	(.04)	(.33)	(.28)
Above Med Income	.0075	.018	.034	.035	-.47*	.062
	(.02)	(.03)	(.03)	(.03)	(.27)	(.18)
Control Mean	.19	.28	.66	.79	6.77	5.35
F-test p-val ($\beta_1 \neq \beta_2$)	.71	.84	.57	.16	.72	.52
N	2511	2449	2511	2449	2452	2398

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.14: Survey Preferences: Commutability of School by Education Group

	All Commutable		One Commutable		GPS Distance (km)	
	(1) Student	(2) Parent	(3) Student	(4) Parent	(5) Student	(6) Parent
Group 1: Student Meeting	.15***	.023	.13***	.066*	-1.1***	-.26
	(.04)	(.05)	(.04)	(.04)	(.37)	(.33)
Group 2: Student and Parent Meeting	.16***	.031	.089*	.0093	-1.1***	-.22
	(.05)	(.05)	(.05)	(.05)	(.40)	(.37)
Group 1 x Educ < Primary	-.019	.066	.042	-.0017	-.22	-.24
	(.04)	(.04)	(.04)	(.04)	(.34)	(.25)
Group 2 x Educ < Primary	-.004	.1*	.026	.01	-.38	-.66**
	(.05)	(.05)	(.04)	(.04)	(.35)	(.31)
Educ < Primary	.031	-.076**	-.011	-.0098	-.13	.24
	(.03)	(.03)	(.03)	(.03)	(.27)	(.20)
Control Mean	.19	.28	.66	.79	6.77	5.35
F-test p-val ($\beta_1 \neq \beta_2$)	.74	.47	.68	.76	.62	.13
N	2679	2606	2679	2606	2617	2552

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.15: Survey Preferences: Commutability of School by Child Gender

	All Commutable		One Commutable		GPS Distance (km)	
	(1) Student	(2) Parent	(3) Student	(4) Parent	(5) Student	(6) Parent
Group 1: Student Meeting	.11**	.056	.18***	.063	-1.2***	-.29
	(.05)	(.05)	(.04)	(.04)	(.41)	(.32)
Group 2: Student and Parent Meeting	.18***	.13**	.14***	.036	-1.5***	-.69**
	(.05)	(.05)	(.05)	(.05)	(.41)	(.33)
Group 1 x Child Female	.061*	-.0044	-.035	.0041	-.054	-.17
	(.04)	(.04)	(.05)	(.04)	(.39)	(.28)
Group 2 x Child Female	-.035	-.071	-.057	-.034	.36	.37
	(.04)	(.05)	(.05)	(.04)	(.38)	(.31)
Child Female	-.018	.0063	.043	-.0074	-.46	-.11
	(.02)	(.03)	(.04)	(.03)	(.32)	(.21)
Control Mean	.19	.28	.66	.79	6.77	5.35
F-test p-val ($\beta_1 \neq \beta_2$)	.032	.22	.6	.35	.18	.076
N	2928	2825	2928	2825	2862	2767

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.16: Survey Preferences: Performance of School by Income Group

	Child	Parent
	(1) Above Median Performance	(2) Above Median Performance
Group 1: Student Meeting	.08**	.035
	(.03)	(.04)
Group 2: Student and Parent Meeting	.064*	.011
	(.04)	(.04)
Above Med Income	-.032*	.042*
	(.02)	(.02)
Group 1 x Above Med Income	.0037	-.036
	(.03)	(.04)
Group 2 x Above Med Income	.043	.018
	(.03)	(.03)
Control Mean	.61	.62
F-test p-val ($\beta_1 \neq \beta_2$)	.69	.56
N	2523	2523

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.17: Survey Preferences: Performance of School by Education Group

	Child	Parent
	(1) Above Median Performance	(2) Above Median Performance
Group 1: Student Meeting	.097***	-.0035
	(.03)	(.04)
Group 2: Student and Parent Meeting	.13***	.013
	(.03)	(.04)
Educ < Primary	.031	-.073***
	(.02)	(.02)
Group 1 x Educ < Primary	-.044	.021
	(.03)	(.03)
Group 2 x Educ < Primary	-.073**	.015
	(.03)	(.03)
Control Mean	.61	.62
F-test p-val ($\beta_1 \neq \beta_2$)	.28	.67
N	2695	2695

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.18: Survey Preferences: Performance of School by Child Gender

	Child	Parent
	(1) Above Median Performance	(2) Above Median Performance
Group 1: Student Meeting	.098***	.019
	(.03)	(.04)
Group 2: Student and Parent Meeting	.09**	-.00068
	(.04)	(.04)
Child Female	.043*	-.0072
	(.02)	(.02)
Group 1 x Child Female	-.038	-.018
	(.03)	(.03)
Group 2 x Child Female	-.016	.029
	(.03)	(.04)
Control Mean	.61	.62
F-test p-val ($\beta_1 \neq \beta_2$)	.83	.63
N	2952	2952

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.19: Final Application: Commutability of Schoo by Income Group

	All Commutable		GPS Distance
	(1)	(2)	(3)
Group 1: Student Meeting	.11*	.077	-.15
	(.06)	(.06)	(.80)
Group 2: Student and Parent Meeting	.086	.053	-.36
	(.06)	(.06)	(.85)
Group 1 x Above Med Income	-.034	-.036	.46
	(.04)	(.04)	(.53)
Group 2 x Above Med Income	.0054	-.042	.56
	(.04)	(.04)	(.59)
Above Med Income	.00056	.019	-.22
	(.02)	(.03)	(.33)
Control Mean	.21	.72	6.46
F-test p-val ($\beta_1 \neq \beta_2$)	.4	.9	.88
N	2482	2482	2420

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.20: Final Application: Commutability of School by Education Group

	All Commutable		GPS Distance
	(1)	(2)	(3)
Group 1: Student Meeting	.073	.057	.14
	(.06)	(.06)	(.81)
Group 2: Student and Parent Meeting	.079	.048	-.052
	(.05)	(.06)	(.91)
Group 1 x Educ < Primary	.041	.0046	-.25
	(.05)	(.04)	(.57)
Group 2 x Educ < Primary	.0092	-.044	-.21
	(.05)	(.05)	(.57)
Educ < Primary	-.0039	.021	-.00013
	(.03)	(.04)	(.42)
Control Mean	.21	.72	6.46
F-test p-val ($\beta_1 \neq \beta_2$)	.52	.25	.94
N	2649	2649	2584

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.21: Final Application: Commutability of School by Child Gender

	All Commutable		GPS Distance
	(1)	(2)	(3)
Group 1: Student Meeting	.11**	.06	-.078
	(.06)	(.06)	(.73)
Group 2: Student and Parent Meeting	.12**	.05	.1
	(.05)	(.06)	(.82)
Group 1 x Child Female	-.043	-.0012	.13
	(.05)	(.05)	(.54)
Group 2 x Child Female	-.082*	-.039	-.59
	(.04)	(.04)	(.43)
Child Female	.046	.011	.25
	(.03)	(.03)	(.37)
Control Mean	.21	.72	6.46
F-test p-val ($\beta_1 \neq \beta_2$)	.4	.35	.096
N	2903	2903	2831

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.22: Final Application: Performance of School by Income Group

	(1) Above Median Performance
Above Med Income	-.016
	(.02)
Group 1: Student	.017
Meeting	(.04)
Group 2: Student and	.04
Parent Meeting	(.04)
Group 1 x Above Med	-.0045
Income	(.03)
Group 2 x Above Med	.031
Income	(.03)
Control Mean	.62
F-test p-val ($\beta_1 \neq \beta_2$)	.3
N	2482

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.23: Final Application: Performance of School by Education Group

	(1) Above Median Performance
Educ < Primary	.0072
	(.03)
Group 1: Student	.034
Meeting	(.04)
Group 2: Student and	.078*
Parent Meeting	(.04)
Group 1 x Educ <	-.023
Primary	(.04)
Group 2 x Educ <	-.033
Primary	(.04)
Control Mean	.62
F-test p-val ($\beta_1 \neq \beta_2$)	.78
N	2649

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.24: Final Application: Performance of School by Child Gender

	(1) Above Median Performance
Child Female	-.0021
	(.02)
Group 1: Student	.018
Meeting	(.04)
Group 2: Student and	.026
Parent Meeting	(.05)
Group 1 x Child	-.0075
Female	(.04)
Group 2 x Child	.053
Female	(.03)
Control Mean	.62
F-test p-val ($\beta_1 \neq \beta_2$)	.098
N	2903

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.25: Final Application: Performance of School by Income

	(1) below Median (day schools)	(2) below Median (day schools)
Group 1: Student	.0089	-.039
Meeting	(.06)	(.05)
Group 2: Student and	.02	.0048
Parent Meeting	(.06)	(.04)
Below Med Income	-.0047	-.02
	(.04)	(.03)
Group 1 x Below Med	-.0027	.011
Income	(.06)	(.05)
Group 2 x Below Med	-.066	-.05
Income	(.06)	(.05)
Control Mean	.67	.67
F-test p-val ($\beta_1 \neq \beta_2$)	.32	.29
N	1379	1974

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.26: Final Application: Performance of School by Education

	(1) below Median (day schools)	(2) below Median (day schools)
Group 1: Student Meeting	.0083	-.018
	(.06)	(.05)
Group 2: Student and Parent Meeting	.039	.063
	(.06)	(.05)
Educ < Primary	.014	.047
	(.05)	(.03)
Group 1 x Educ < Primary	-.048	-.048
	(.07)	(.05)
Group 2 x Educ < Primary	-.1	-.14**
	(.07)	(.06)
Control Mean	.67	.67
F-test p-val ($\beta_1 \neq \beta_2$)	.44	.13
N	1469	2125

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.27: Final Application: Performance of School by Child Gender

	(1) below Median (day schools)	(2) below Median (day schools)
Group 1: Student Meeting	-.012	-.049
	(.06)	(.05)
Group 2: Student and Parent Meeting	-.067	-.042
	(.06)	(.05)
Child Female	-.049	-.072**
	(.04)	(.03)
Group 1 x Child Female	-.00064	.029
	(.06)	(.05)
Group 2 x Child Female	.085	.057
	(.06)	(.05)
Control Mean	.67	.67
F-test p-val ($\beta_1 \neq \beta_2$)	.14	.63
N	1611	2313

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.

Table D.28: Final Application: School Fees by Child Gender

	(1) School Cost
Group 1: Student Meeting	-21*
	(11.78)
Group 2: Student and Parent Meeting	-16
	(11.29)
Child Female	-13
	(9.18)
Group 1 x Child Female	20
	(14.61)
Group 2 x Child Female	-3.5
	(15.21)
Control Mean	197.77
F-test p-val ($\beta_1 \neq \beta_2$)	.17
N	2344

Notes: Standard errors in parentheses, * (p<.10), ** (p<.05), *** (p<.01). Specifications control for the variables used for sample stratification: sub-county of school and primary school average test score (above or below the Busia County mean). Standard errors are clustered at the primary school level.