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Parents and Preschool Decisions: How Networks, Research, and Priorities Affect Program Quality

A thesis submitted in partial fulfillment of the requirement for the degree of Bachelors of Arts in Government from the College of William and Mary

by

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Accepted for

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Introduction

By the time students reach twelfth grade, children of low socioeconomic status are, on average, four years behind their wealthier peers in reading and math. The gap does not originate in high school. It is already visible and significant as children begin kindergarten (Barnett, Brown, et al. 2004). Early intervention through quality preschool has been shown to be effective in closing this early education gap and setting low-income kids on a level playing field with their wealthier peers, allowing for their success throughout the educational process. Preschool attendees have higher test scores, graduation rates, college attendance rates, and job retention rates, as well as lower incarceration rates and higher lifetime earnings (Barnett and Belfield 2006). These benefits spill over to society, creating an overall social return on investment rate of between 7 and 10 percent annually for each dollar invested (Heckman et al. 2010).

Because preschool has such positive effects, it is crucial to find out which children attend preschool and to examine the quality and duration of the programs they attend. The available research on parental choices of preschool programs generally falls into two categories. Some studies report the demographic characteristics of those who attend preschool and hypothesize about the reasons behind the trends that they find. Other studies examine the parental decision-making process in choosing childcare arrangements, in general, without a specific focus on the educational quality of the chosen program or the ways that the decision-making process may affect that quality. My research attempts to synthesize these two areas by asking the question, “Why do parents choose high- or low-quality preschool programs for their children?” I examine parents’ research processes, the factors they deem important to their decisions, and how their decision-making correlates with the quality of the program chosen. I access this information by surveying parents, asking about their reasoning for their preschool choice and their research process. My goal in conducting this research is to obtain useful data that will enable me to make
concrete recommendations about how to increase the number of children who attend quality preschool. Understanding why parents do or do not send their children to high-quality preschool will help policymakers target the problem, be it cost or other logistics.

**Theoretical Background**

*Preschool’s Effectiveness and the Importance of Quality*

A great deal of psychological research has shown that the years before school are formative for the brains of young children, setting up the directions of their educational paths (see for example Shonkoff and Phillips 2000). It follows logically that preschool would be an optimal time to positively influence future students – a theory that has been largely supported by research on preschool’s effectiveness. There are hundreds of studies on this topic, many of which focus on the weakly positive but varying effects of Head Start, which is federally funded but locally administered, creating diverse levels of quality across the country (Zigler and Valentine 1979). State or local public preschool programs are more likely to have consistent quality, so their effects are more emblematic of what preschool can do (Barnett and Belfield 2006).

High-quality preschool has short-term and long-term effects. The most important analysis of the short-term effects of a public program is a study of the Oklahoma universal preschool program (Barnett and Belfield 2006). Gormley and Phillips (2005) found an average of a 16 percent increase in scores on the Early Childhood Skill Inventory after completion of the preschool program, primarily for students of low-income backgrounds. While several studies show that academic gains may fade (Puma et al. 2010), long-term studies have found persistent positive results for at-risk children in areas of social and emotional health. The High/Scope Perry Preschool Project, the Chicago Child-Parent Center, and the Abecedarian program have each followed high-quality preschool participants for many years and found lower teen
parenting, drug use, and criminal activity rates, as well as net earnings gains of over $30,000 (Barnett and Belfield 2006).

Quality is key for steady gains for a program’s attendants. As a result, much research has focused on which characteristics preschool programs should possess. The National Institute for Early Education Research (NIEER) continually synthesizes the most recent research and collects data on state preschool programs in its well-respected, annual “State Preschool Yearbook.” This report sets out minimum guidelines for quality “consistent with what research has found to be effective” (Barnett et al. 2012 p. 11) and evaluates each state on its preschool regulations as well as its public program offerings. Based on current research, NIEER emphasizes teacher qualifications in four of its ten standards: requiring teachers to have a bachelor’s degree; requiring teachers to have a specialization in preschool education; requiring assistant teachers to have a Child Development Associate or equivalent credential; and requiring teachers to complete at least 15 hours of annual professional development. The other standards address teacher-student ratios, minimally capped at 1-to-10; developmentally appropriate curricular standards; and availability of comprehensive health services (Barnett et al. 2012).

However, it is important to acknowledge that not all programs claim to be educational – while I use the term “quality” or “high quality” to refer to programs with educational aims and certified techniques of reaching those goals (“preschools”), there are different objectives for many childcare arrangements. Some arrangements may simply aim to relieve parents of their duties for a time, such as employing teenaged babysitters. The body of literature on childcare decisions, discussed below, includes all of these types of care. Later on, I will discuss preschool demographics literature, which struggles to discern attendance trends of the many programs claiming to provide some educational value and identified by parents as preschool. But because
of the lack of clear standards for educational preschools, it is very difficult to determine these programs’ quality without the kind of comprehensive evaluation that NIEER suggests. A center-based program is not inherently more educational than a home daycare, and a program calling itself a preschool is not necessarily more educational than those labeled daycares.

**How Do Parents Choose Childcare?**

The body of literature on childcare decisions takes into account all of the possible arrangements that parents might make – babysitters, daycare centers, family day homes, and preschools, for example. Rather than isolating whether or not parents send a child to a program they define as preschool (at least partially for educational purposes, presumably) as will the literature discussed below, this research examines parents’ reactions to the whole web of childcare options. My research contributes to this literature by putting more emphasis on the information-gathering step than previous studies, and by connecting the decision-making processes to the quality of the program chosen.

Parents make decisions in the context of a confusing marketplace of childcare options. In “The Hell of American Day Care,” a sobering piece for the *New Republic* about the lack of childcare regulations in America and the resulting safety issues, Jonathan Cohn writes that “there are no regular surveys of quality” and that based on the evidence we have, “the overall quality is wildly uneven and barely monitored” (Cohn 2013). Parents have a hard time distinguishing between high and low quality programs due to a lack of organized information. According to Sara Mead, an expert at *Education Week*, the system “is difficult for policymakers and the public to make sense of, extremely challenging for families and providers to navigate, far from transparent about its services or costs” (Mead 2013). In an economics framework, Vandell and Wolfe (2000) classify the childcare system as having reached “market failure” because parents
cannot make decisions based on quality due to lack of information and resources. Even once they experience a program, parents have difficulty correctly identifying its quality level (Cryer et al. 2002 as cited in Grogan 2011).

Without the guidance and information that would be ideal, how do parents choose in the current state of affairs? Weber (2011) provides a comprehensive overview of the theories behind parental choice of childcare. A diagram from her report, included below, best explains her extrapolation of the current research. It shows family values and beliefs interacting with community features, such as the supply of childcare programs, the information available about them, social networks, and available employment, to produce parental preferences. These preferences then interact with parents’ employments and the opportunities and constraints perceived by the parent to determine the type of childcare and financial assistance used. All of these outcomes then influence the next childcare decision.

Figure 1. Weber (2011) diagrams parental childcare decisions.
An issue brief published by the U.S. Department of Health and Human Services outlines the literature on parents’ childcare decisions (Forry et al. 2013), corroborating my own review of the research available. Like my research, the studies the brief describes address parents’ decision-making processes and priorities. However, unlike my research, they put less emphasis on information-gathering techniques and lack much of a connection between the process and the quality of the chosen program. Instead, they look for trends between the demographic characteristics of a family, its most important factors when choosing programs, and the type of program it chooses. On the whole, and especially for those who are low-income, it appears that most parents begin their decision-making processes using information from family and friends, and then make the choice between about one to three options, usually within about two to four weeks (Pungello and Kurtz-Costes 1999; Layzer et al. 2007; Iruka and Carver 2006 as cited in Forry et al. 2013). Parents probably resort to these informal sources of information because of the lack of formal information available, as many report struggling to search for options (Sandstrom et al. 2012). Networks not only inform parents of their options but help them choose: Garavuso (2006 as cited in Forry et al. 2013) documented the importance of social networks on parents’ evaluations of programs.

Studies have found that generally, parents say that they prioritize factors relating to program quality over logistical considerations, and the fixation on quality increases with parental education, income, and work flexibility (Hofferth et al. 1996; Huston et al. 2002 as cited in Kim and Fram 2009) – low-income parents may tend to focus more on practical considerations such as hours, cost, and location. In terms of ethnic differences, Forry et al. (2013) write, “Associations between ethnicity and child care decision-making preferences are detected in some studies but not in others” (p. 27). For example, black children may be more likely to be taken
care of by relatives (Early and Burchinal 2001) and Hispanic parents, especially, seem to place high importance on ethnic cultural practices and ensuring that their care arrangements be “racially safe,” prioritizing the matching of class- and ethnic-based beliefs about childcare. (Uttal 1997 as cited in Forry et al. 2013). Other literature has shown evidence that those who are focused on practicality (usually low-income parents) are more likely to put their children in home-based care (Kim and Fram 2009; Johansen et al. 1996 as cited in Grogan 2011).

Regardless of preferences, many parents are constrained by lack of time or resources (Sandstrom et al. 2012). For example, those working for strict employers with demanding schedules, such as flight attendants, need childcare that is reliable in hours, or they are forced to be absent from work or use their sick days strategically (Desrosiers and Emlen 1997). Those on welfare may undergo even greater struggles when transitioning to being employed, facing obstacles in the confusing “patchwork” of multiple providers, subsidies, and job issues (Scott et al. 2005).

A couple of recent dissertations come the closest to answering my research question. Grogan (2011), at George State University, interviews and surveys parents of children participating in center-based care, examining the relationships between socioeconomic status and the factors parents consider when choosing childcare, without looking at the quality they receive. She finds that the factors on which parents rely cluster around quality or practicality considerations, and that family characteristics such as progressive or traditional beliefs about childrearing interact with the types of factors used. Grogan’s findings in terms of socioeconomic status mirror the rest of the literature: some indication that more education and higher incomes lead to more emphasis on quality considerations, but not an overwhelmingly clear trend. At the University of Iowa, Cronin (2013) conducted interviews for a qualitative dissertation on parents’ decision-making processes. He identifies themes in parents’ desires and information gathering
without tracing those themes using socioeconomic status or other identifying characteristics. Cronin finds themes that match up with Grogan’s list of factors that parents consider from her synthesis of the literature, and with answers in my preliminary survey (see methods section): Hours, cost, safety, teacher quality, and type of curriculum top the list.

Cronin and others provide detail and nuance through deep qualitative research about the decision-making process, while other researchers provide broad estimations of demographic trends in considerations and choices. My research will contribute to this body of work on childcare decision-making by building on the current explanations of the process and exploring correlations with the quality of the program chosen. This will allow policymakers to understand which decision-making processes should be used to produce the most desirable results: the most children in the highest quality preschools.

*Who attends “preschool”?*

Despite the nebulousness of the term “preschool,” it is important to review the research on preschool attendance, based on parents’ definitions, because it looks specifically at the late toddler ages that are most often used to prepare children for kindergarten and at those programs that aim for education content. By examining the mechanism between parent decision-making processes and the quality of the programs they choose, my research aims to fill in some of the details of these studies. As O’Gorman et al. identified, “The research that exists predominately considers parents’ selection of childcare, not their selection of preschool” (2004 as cited in Cronin 2013). To help close the gap, I look at some parts of the broad questions, “Who attends what quality of preschool?” and “Why did their parents choose that preschool?” The following preschool attendance literature sets the stage by identifying demographic trends.
Different governmental or institutional surveys, primarily those from the National Center for Education Statistics, the Current Population Survey (CPS) October Supplement, and the National Household Education Survey (NHES) have tracked preschool attendance. Long-term trends are visible in the CPS data, which goes back to 1965. Only 16 percent of four-year-olds were enrolled in some kind of school in 1965, but that proportion has grown rapidly over the past decades to nearly 70 percent in 2005 (CPS 2005 as cited in Barnett and Yarosz 2007; see also Bainbridge et al. 2005). This roughly aligns with broad surveys done by the Kaiser Family Foundation and Newsweek, which found that 61 percent of children ages 6 months to 6 years are enrolled in school\(^1\) and that people are most likely to plan to send their children to preschool at age 3 or 4 (Kaiser 2006; Newsweek 2000). Those surveys do not separate their results into demographic groups, but CPS, NHES, and other studies report detailed categories.

In terms of socioeconomic status, preschool participation rates appear to fall with income level from 89 percent at the $100,000-plus category down to 55 percent participation of four-year-olds at the $20,000 to $30,000 classification. Then, rates begin to rise again to a bit above 60 percent in the under $10,000 category, as families become eligible for public programs such as Head Start (Barnett and Belfield 2006). Meyers et al. (2003) find similar results from smaller studies and the 2000 CPS October Supplement – and these income variations seem to be the primary explanation for attendance gaps. Hofferth et al. (1994) and Bainbridge et al. (2005) found that income differences continued to be a strong predictor of enrollment disparities even after controlling for a variety of other factors, including race and maternal education.

\(^{1}\) This may overestimate the number of children in preschool, as it includes ages that likely already attend kindergarten.
Why do children attend preschool?

My research will contribute to the existing literature on the stories behind attendance rates by asking parents to identify the key factors in their decisions about enrolling their children in preschool. Other researchers have attempted to locate causes by looking at correlations between demographic factors and preschool attendance. In an attempt to answer the question of why certain students do not attend preschool, Meyers (2003) synthesized many smaller, economic studies to evaluate the salience of income as a key predictor. She found that “the cost of formal, market-forms of care depresses use by lower-income families,” but that public programs are capable of offsetting this problem for eligible families. Magnuson, Meyers, and Waldfogel (2007) confirm this finding. They show that public programs such as Head Start are responsible for between 8 and 11 percentage points of the increase in low-income preschool enrollment during the 1990s. The availability of these free programs expanded parental options that were formerly constrained by lack of financial resources.

Parents may also make decisions about preschool attendance for their children based on ethnic and cultural factors, but every parent faces a different set of challenges and opportunities that influence their child’s enrollment in a preschool program. Weber (2011) suggests that these factors include community pressures, family values, preferences, social networks, and parental employment, as well as available preschool choices, financial assistance, and consumer information. Many articles use some of these variables to try to explain patterns of enrollment within demographic groups, but they are mostly speculative. They offer lists of probable explanations for the trends they find, but do not test the validity of those explanations (see for example Barnett and Yarosz 2007; Hofferth et al. 1994; Bainbridge et al. 2005).
The body of work on immigrant enrollment rates, in particular, explores possible reasons behind low preschool attendance. Karoly and Gonzalez (2011) posit that issues such as lack of citizenship, suspicion about government, transportation problems, linguistic and cultural barriers to information (such as segregated neighborhoods), unconventional working hours, a desire to be self-sufficient, and limited resources for meeting medical requirements all contribute to low enrollment rates, even when the children are eligible for free public programs and the parents realize the importance of preschool. A study of New York City immigrants’ early education struggles interviewed parents and confirmed many of the same problems identified by Karoly and Gonzalez, especially the lack of information and linguistic barriers (Kirmani and Leung 2008). A similar Chicago study also found transportation, lack of information, suspicions of government, and linguistic barriers to be particularly salient (Adams and McDaniel 2009). A systematic survey of Latino parents in a sample of states discovered corresponding results, with lack of information and lack of resources as the primary reasons for low enrollment rates (Valencia, et al. 2006). My research also uses direct evidence from parents. However, it will go beyond the dummy variable of preschool attendance by examining the level of quality of the chosen program to look for correlations with decision-making and income level.

**K-12 School Choice Theory and General Hypotheses**

As outlined above, the available research on parental decisions about preschool programs falls into two categories. One group of studies examines the demographic breakdown of preschool attendance and speculates on reasons behind groups of children attending or not attending preschool. The other group of studies examines the parental decision-making process in picking between childcare programs without exploring the ways that different decision-making processes affect the quality of the final choice. My research attempts to combine these
threads of thought, looking at whether parents chose any program, how that program was chosen, and how that choice process correlates with the quality of the program chosen. Studies on parental decisions in K-12 school choice programs (vouchers, open enrollment, charter and magnet schools, etc.) provide a good basis of theory for my research, as they have linked process and quality. Therefore, I adapt K-12 school choice theory to fit parent decisions for pre-k.

School choice studies have looked at both decision-making processes and their effects on the quality of the program chosen, showing the influence of factors such as parent education, family income, access to information, and social networks. There is a definite schism between what parents say and what parents do in school choice situations. While most parents cite educational quality as their highest priority, they often end up choosing lower quality schools based on their use of information that provides little evidence of quality. Due to a lack of information on academic quality or a lack of effort to find it, parents often choose based on factors such as racial composition and location of the schools, using these as proxy indicators for quality (Hamilton and Guin in Betts and Loveless 2005). The reliance on these indicators is likely due to the typical information-gathering process of parents in school choice situations. Ascher, Fruchter, and Berne (1996) allege that “few parents of any social class appear willing to acquire the information necessary to make active and informed educational choices” (as cited in Goldring and Rowley 2006, p. 14). Parents rely on anecdotal or superficial information because it is easier than gathering large amounts of data (Lee et al. in Fuller and Elmore 1996).

But the quality of the anecdotal information varies with the type of social network to which the parents have access. Maddaus writes that “families in low-income neighborhoods tend to be more isolated and have fewer sources of information on child rearing than do families in more affluent neighborhoods” (Cochran and Henderson 1985 as cited in Maddaus 1990, p. 285).
Schneider et al. even titled these social alliances “networks to nowhere” because social networks’ conversations about education are so segregated by race and class (1998). Parents with higher levels of education (and presumably income) are likely to have large networks of other parents and community members with reliable information about schools, often including “experts” such as school board members or teachers (Schneider et al. 2000). Meanwhile, parents with less education find their social networks less useful than their well-educated peers, because they are likely to be small and lacking in expert knowledge. Lareau (2002) found that upper-income parents were more likely to have broader, weaker connections that usually include teachers, while lower-income parents have strong connections with a smaller circle of family and friends, less likely to include teachers. This leaves low-income parents to rely on formal sources of information, such as resources from each school and media portrayals of the schools. Obtaining information from the school often requires a great deal of effort in overcoming barriers such as social distance and logistical constraints – visiting a school would mean being available during the workday and feeling comfortable around teachers and principals. Additionally, the media conveys very little useful information about individual school performance (Schneider et al. 2000).

There are several differences between these K-12 choice programs and preschool choices. Data on preschool programs are much more scattered and much less standardized than K-12 school data, as discussed above. The most available information focuses on surface characteristics such as cost, location, and hours, as opposed to quality measures available on K-12 schools, such as test scores. Preschool quality standards, as discussed above, focus on teacher-child ratios and teacher certifications. Only five states have regulations that meet all of NIEER’s minimum quality benchmarks described above, which means that parents in other
states must research each program’s characteristics on their own (Barnett et al. 2012). There is a growing number of Quality Rating and Improvement Systems (QRIS) across the states, such as Virginia’s Star Quality Initiative, which I will use as part of my method of identifying quality programs. However, almost all of these are voluntary and include much less than half of all programs. Programs may opt in to be evaluated and assisted in improving quality characteristics (QRIS State Profiles 2012). Until QRIS becomes more prevalent, parents have no clear source of information on preschool quality. Moreover, accessibility is a key issue. Preschool programs vary in cost and location, and without the vouchers and buses usually supplied in K-12 choice programs, I expect that income will constrain parental decisions.

Without banks of formal information in the form of school test scores or media coverage, and without the transportation and resource support common in K-12 choice programs, preschool decisions are likely even more influenced by social networks. The research cited above on childcare decisions verifies this, showing friends and family as the top source for most parents (Forry et al. 2013). The main substantive sources of information are those with experience with preschool programs – other parents. Additionally, because of the lack of common access, those networks may be distinct from each other in terms of the preschools about which they have any knowledge. Less expensive preschools, or those that take childcare subsidies, may be most discussed in low-income networks, while more expensive programs are most discussed in upper-income networks.

Thus, my paper will draw on school choice theory but adapt it to early childhood situations. My focus will be the effects of income and information-gathering processes on the quality of preschool chosen. Because of their lack of quality information and resources, low-income parents are likely to choose based on accessibility and therefore end up with lower
quality preschool than higher income parents. My hypotheses are as follows: Parents with high income will choose programs primarily using informal information gathering processes; will report choosing programs based on educational factors (such as teacher-student ratio and curriculum); and will choose programs of higher quality. Meanwhile, parents with low income will choose programs primarily using formal information gathering processes; will report choosing programs based on administrative factors (such as cost, location, and hours); and will choose programs of lower quality, unless they use the public, means-tested preschool program.

**Data, Methods, and Specific Hypotheses**

My study will be primarily a quantitative one, using survey results from parents in Charlottesville, Virginia, due to personal connections\(^2\) and demographics\(^3\). I also conducted eleven interviews with parents from three different preschools, whose insights I will reference when appropriate during discussion of my survey results. The notes or transcripts from these interviews are available in Appendix E.

As seen in Table 1, the city of Charlottesville is not wholly representative of the United States, which will be important to keep in mind. While the median income is about $10,000 higher in the city than in the nation, the poverty rate is about ten percentage points higher in Charlottesville. Charlottesville also has a higher percentage of black residents: about 19 percent, as opposed to America’s 13 percent (Charlottesville.org 2011; World Factbook 2007; Von Reuter 2011; Lowrey 2013). Charlottesville City Schools’ overall student population is 54 percent low-income, meaning that over half of its students receive free or reduced price lunch from the National School Lunch Program because they live in families below 185 percent of the

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\(^2\) I attended Charlottesville City Public Schools and have contacts in the school system’s administration. Additionally, my father serves on the school board.

\(^3\) The codebook for my data is attached in Appendix F.
poverty line (Smart Beginnings 2009). As my study focuses on differences between parents based on income level, it will be helpful to have roughly half of the sample on each side of this near-poverty line.

**Table 1.** Sample city of Charlottesville, Virginia compared to the United States as a whole. Data from 2011.

<table>
<thead>
<tr>
<th></th>
<th>Percent black</th>
<th>Poverty rate</th>
<th>Median family income</th>
</tr>
</thead>
<tbody>
<tr>
<td>Charlottesville, VA</td>
<td>19%</td>
<td>26%</td>
<td>$61,900</td>
</tr>
<tr>
<td>United States</td>
<td>13.1%</td>
<td>14.0%</td>
<td>$60,974</td>
</tr>
</tbody>
</table>

Charlottesville is also representative in terms of preschool attendance. In the United States, about 70 percent of four year olds were enrolled in some kind of preschool in 2005 (CPS 2005 as cited in Barnett and Yarosz 2007; see also Bainbridge et al. 2005). Similarly, about 70 percent of Charlottesville children attended preschool in 2007. Data on who attends preschool in Charlottesville show that 54 percent attended the public program, 17 percent received private preschool education, 10 percent attended no preschool, and preschool attendance is unknown for another 19 percent of 2007-2008 kindergartners (Smart Beginnings 2009). Nationally, only 28 percent of four-year-olds attend public preschool programs (Barnett et al. 2012). The larger proportion of public program participation in Charlottesville did indeed have significant impacts, to be detailed in the results section.

The Charlottesville public preschool program director, Ann Dubliner, arranged for the elementary school secretaries to distribute my survey with kindergarten registration forms – so it was given to all parents who registered their children for kindergarten at Charlottesville City Schools during the spring and summer of 2013. These children will attend public kindergarten

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4 Roughly 69% of youth living in the city of Charlottesville attend its public schools. (Calculated using data from
at Charlottesville’s six elementary schools during the 2013-2014 school year. Two of these elementary schools returned very few or no surveys, probably due to a distribution error. However, I believe the sample is roughly representative of the population. The response rate was about 28 percent – 125 returned surveys as compared to 445 children registered for kindergarten. The free/reduced lunch eligible population of CCS kindergartners is about 55 percent, and, similarly, 56.9 percent of my survey’s respondents responded either “yes” or “maybe” to the question of their eligibility for public preschool (see Figure 2) – measures that are roughly equivalent in identifying low-income children (Virginia Department of Education 2013).

This estimated eligibility for the CCS pre-k program functions as an approximate measure of income, my first independent variable. Appendix A shows the survey questions that I used to measure my independent variables. Question number five asks parents to estimate their children’s eligibility for the public preschool program based on the presence of “some economic hardship or other stressors” in their families. The responses are illustrated in Figure 2 below. I have turned this into a binary variable (“eligibility1”) by grouping those answering “yes,” “probably,” and “maybe” into a category of respondents who are likely low-income. Those answering “probably not” are likely middle- or upper-income. Another independent variable I use mainly as a control is the free/reduced lunch rate of the parents’ neighborhood elementary school, which respondents named in question eight. This functions as a proxy for the socioeconomic status of the parents’ networks, assuming that their social connections vary based on their neighborhoods. The second group of independent variables includes the types of

http://factfinder2.census.gov/faces/tableservices/jsf/pages/productview.xhtml?src=bkmk and http://www.ccs.k12.va.us/about/facts.html. This number is the ratio of all youth ages 5-19 in city and K-12 attendance in public schools.)
information-gathering processes in which respondents might participate, using question number two of the survey. Each variable, Internet or providers (“Internet”), elementary school (“elem”), and friends and family (“friends”), respectively, uses a seven-point scale. A seven indicates a great deal of engagement in the activity while a one indicates no use of that research technique.

The third group of independent variables is comprised of the factors that may be important to respondents’ decision-making processes, as seen in survey question number three. This list of factors was developed based on open-ended answers to a similar question asked in a previous version of the survey, administered over the spring and summer of 2012 to the same population (in other words, the cohort one year ahead of the current sample). They are each measured on the same seven-point scale as the second group of independent variables (and as dummy variables in separate models, as detailed in the results section, due to a common respondent error).

**Figure 2.** Summary of eligibility of respondents, proxy variable for respondent income or socioeconomic status. X axis shows number of respondents.
The dependent variable of program quality is very roughly measured and limited to considering program inputs. A true judgment of quality would assess the child’s kindergarten readiness, but I cannot obtain individuals’ assessment scores. Instead, I will attempt to create a rough quality measure based on accreditations and curricula. Smart Beginnings, a nonprofit early education advocacy group, has a website with a search feature that allows parents to find programs that have voluntarily decided to participate in the Virginia Star Quality Initiative (VSQI)\(^5\) and to see their scores. The four participating Charlottesville programs have either received two, three, or four stars. The National Association for the Education of Young Children also has a website that lists the programs that have received its accreditation; four Charlottesville programs are accredited. These seven programs will be designated quality programs, along with the Charlottesville public program, due to its testing results: In spring 2011, the percentage of program participants passing the PALS literacy assessment was 92 percent, improving from 25 percent passing in the fall of 2010, upon entrance to the program (Dublirer 2011). Based on these designations, respondents writing the names of the programs they used in survey question number four will be classified as having chosen quality or not quality programs.

My specific hypotheses follow from the previously stated general ones and the operationalization of my variables. The causal chain connects low-income parents with formal sources of information, surface factors for their decisions, and lower quality preschool, but my hypotheses focus on each jump in the logic rather than at the overall connection between income and quality. My first hypothesis is that low-income parents will be more likely to respond with

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\(^5\) VSQI, a Quality Rating and Initiative System such as those described earlier, is an evaluation program for providers. Participation shows desire for improvement and feedback based on current research and quality guidelines. VSQI uses a five-star scale and rates programs based primarily on teacher credentials, teacher-student ratios and the quality of their interactions, facilities, and preparation for kindergarten (see for more information: http://www.smartbeginnings.org/home/star-quality-initiative/about-star-quality.aspx).
higher numbers on the scale for the variables of getting information from the Internet or providers and their neighborhood elementary schools. Meanwhile, low-income parents will be less likely to respond with higher numbers for the variable of asking friends and family for recommendations. My second hypothesis is that parents using information from the Internet or providers will be more likely to choose based on surface factors while parents using information from friends and family will be more likely to choose based on academic and environmental factors. My third hypothesis has three parts: a) that low-income parents are more likely to choose low-quality programs b) that parents researching using information from Internet or providers will be more likely to choose low-quality programs, while parents using information from friends and family will be more likely to choose high-quality programs; and b) that parents choosing primarily based on surface factors will be more likely to choose low-quality programs, while parents choosing primarily on academic and environmental factors will be more likely to choose high-quality programs.

Results

Hypothesis 1

I tested my first hypothesis, examining the relationship between income and respondents’ research processes, through t tests and ordered regressions. As described above, the “eligibility1” variable is a binary measure of estimated eligibility for the means-tested public preschool program, a proxy for socioeconomic status, and the information-seeking dependent

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6 I decided to omit the “prior knowledge” category seen in question two of the survey in Appendix A because of its vagueness. It was impossible to tell how much respondents highly rating this answer may have “heard of” programs by asking family and friends versus relying solely on unsolicited knowledge.

7 I include these first two parts of the third hypothesis, not explicitly related to the chain of logic described above, because of limitations on measuring the decision-making factors’ effects on the quality of the program. My results section explores this problem further.
variables are each on a seven-point scale. Table 2 shows the results of a difference of means test for each of the dependent variables, Internet or provider research, elementary school information, and asking friends or family for recommendations. Each result was statistically significant at the .05 level and shows a difference of over a one-unit change in the seven-point scale of 1, “not at all,” to 7, “a great deal.” In other words, on average, respondents who are low-income report engaging in one unit less of Internet research, one unit more of elementary school research, and one unit less of asking friends and family than their wealthier peers. These differences are largely what I expected – lower income parents using their networks less and relying more on formal sources of information, like elementary schools. However, they did not use other formal sources, as they also engaged less in Internet research or contacting providers. Ordered logit\(^8\) regressions controlling for the free/reduced lunch rate of the neighborhood elementary school (the network socioeconomic proxy variable) support these conclusions – as the far-right column in Table 2 shows, while holding the parents’ type of social network constant, low-income parents are more likely to engage more in receiving information from the elementary school and less likely to engage more in Internet or provider research or ask friends and family for recommendations. Full regression results can be found in Appendix B.

**Table 2.** Research processes’ mean scores on 1-7 scale compared by estimated income, eligible for public program (low-income) or ineligible (upper-income).

<table>
<thead>
<tr>
<th></th>
<th>Mean for eligible</th>
<th>Mean for ineligible</th>
<th>Difference</th>
<th>Ordered logit regression coefficient</th>
</tr>
</thead>
<tbody>
<tr>
<td>Internet</td>
<td>3.47</td>
<td>4.91</td>
<td>-1.45*</td>
<td>Negative*</td>
</tr>
<tr>
<td>Elem</td>
<td>4.39</td>
<td>2.65</td>
<td>1.74*</td>
<td>Positive*</td>
</tr>
<tr>
<td>Friends</td>
<td>4.47</td>
<td>5.78</td>
<td>-1.31*</td>
<td>Negative*</td>
</tr>
</tbody>
</table>

\(^*\)= significant at the .05 level

\(^8\) Throughout this paper, I cite logit or probit regressions. In all cases, I have run both types of models and there have been no significant differences. Please ask if you would like to see further models or data.
These findings are partly consistent with my hypothesis – while I was correct that low-income parents rely less on friends, I was incorrect in assuming that this meant they would proactively turn to formal sources of information from the Internet or preschool providers. This theory may not transfer from K-12 situations for a variety of reasons. First of all, as described earlier, there is less information readily available, so the costs of digging into research may outweigh the benefits. As one upper-income parent I interviewed observed, “When I did try to connect to [program] websites, to find these places, a lot them weren't even maintained – the website had expired or the URL was no longer active or – so it was really hard to find that information. And there’s definitely a need here for that. So, I think a lot of people still do rely on word of mouth.” Perhaps low-income parents are aware of the lack of substantive information about preschool programs, and therefore do not attempt to gather data from formal sources. It is also possible that low-income parents think of preschool as more of a general childcare arrangement, a necessity for their own ability to return to work but not a program whose quality needs to be investigated.

If they do feel that preschool quality is important, low-income parents still may lack the time and resources to actually examine potential programs. Low-income people are less likely to have Internet access at home: between 70 and 85 percent of those earning less than $40,000 a year have Internet access, versus between 94 and 97 percent of those earning more than $50,000 annually (Rainie 2013). The efforts described by other interviewed parents included online research, calling programs, and visiting them: “We did, I guess, a combination of things. We looked online; we talked to the directors if it seemed interesting from there forward; we made a point of visiting a couple or a few of the programs that seemed to be a good fit.” Low-income
parents may not have the time or cultural capital to invest in these activities. According to Lareau (2002), and in accordance with the K-12 choice literature, lower-income\(^9\) parents may face “intimidation and confusion” when facing institutions such as schools and doctors, while middle-class parents are usually “very assertive” in these situations (p. 766-7).

My results may also be influenced by my survey question wording, which could be underestimating the breadth of social networks. According to many of the parents I interviewed, they gathered information mostly from acquaintances – colleagues, neighbors, and other parents they might meet. For example, one interviewee said, “Anyone who goes out anywhere with small kids in Charlottesville and is remotely social…encounters people whose kids go to preschool and will tell you what they think…That’s what parents talk about…so, when people told me about stuff, then I would, like, Google it and look at the preschool's site – sort of thing.” Another echoed those sentiments: “My first recommendation came from a mom at a playground, believe it or not…really, it was meeting strangers at parks and talking to them while our kids played together and asking them what they knew about childcare in town and early childhood centers; if they had friends that sent them or if they sent their own kids.” Cronin (2013) found similar results, in that parents cared more about whether the other parent shared similar experiences and values, and used friends and coworkers more than family members.

Finally, the preponderance of the sample of low-income parents using the public program probably influenced this result – having already received information from the elementary school

\(^9\) Lareau distinguishes between income and class, while the K-12 literature focuses on income. I also focus on income, and while it does usually align with class, it is important to note the differences. I interviewed a couple of parents who expressed financial need as graduate students, but who clearly had access to the university social network. One parent said, “Not friends, but just sort of people in the university community that I came across,” such as her dissertation committee members, would offer up information. “I’d sort of heard about it in that way. I wouldn’t say that I actively sought out their opinion.”
about its preschool classes or having known about the public program already, low-income parents are less likely to even need to research other options, when they already will likely have access to a free, high-quality preschool.

The results for the elementary school free/reduced lunch rate show this same impact of the public option – lower-income neighborhoods’ parents are less likely to use friends, when controlling for individual income level. This may be mostly because the elementary schools with more low-income families have more slots for preschoolers, so parents living nearby are more likely to receive information about those programs (Charlottesville City Schools 2013). Additionally, parents in low-income areas may not consult friends because they are aware that their networks are less likely to include those with expertise about preschool quality.

**Hypothesis 2**

I tested the second hypothesis, the relationship between the type of information gathering and the factors that were important to the parents’ decision-making process, several different ways. Originally, I grouped the factors into environmental, academic, and surface categories, and used those groups as dependent variables to test Hypothesis 2. However, I found no statistically significant results in models using those categories as dependent variables. The results that were marginally close (p<.3) to being statistically significant are included in Appendix C, and I discuss the most interesting results here – keep in mind that they are not statistically significant and all results describe the relationship while holding all other independent variables constant. Low income was negatively associated with using academic factors, maybe because of more of a focus on logistical factors, or maybe because they were very likely to quickly decide to use the free, public program, therefore not needing to use academic factors to distinguish between programs. Using friends for information was positively associated
with environmental and academic factors, which shows some evidence of support for my hypothesis: Friends may be more capable of passing along information pertinent to these more substantive factors. Meanwhile, there is some evidence that using the Internet or providers was negatively associated with using academic factors, while holding constant other groups of factors, neighborhood free/reduced lunch rate, and individual income level. This tenuously supports my hypothesis, that the Internet and providers are less likely to provide substantive, academic information about programs than are friends who have experienced those programs.

I also ran regressions for each individual factor using a binary and an ordered scale, and many of those were statistically significant. Because many respondents checked off factors rather than giving each factor a ranking on the seven-point scale, I created a binary variable for each, whether it was a factor in the parent’s decision or not. See Figure 3 for a breakdown of the differences in income levels in the samples of parents who responded with ordered versus binary answers for Appendix A, survey question two: low-income parents were much more likely to use the binary checking method for this question, which means that the ordered sample includes fewer low-income parents than the larger, binary sample\(^\text{10}\). For the binary model, those who gave a factor a rating of one, two, or three were categorized as “not a factor” along with those left blank, and those over four were counted as being used as a factor in the decision along with those checked off. I ran binary probit regressions for each factor, and I also ran ordered probit regressions for each factor using those respondents who used the seven-point scale. These regression results can be found in Appendix C.

\(^{10}\) It is also interesting to note that low-income parents were more likely to give extreme answers when they did use the ordered method, most of them rating hours and curriculum at “7,” the most important they could be.
Figure 3. Factors’ importance for those not eligible for public program (No) vs. those eligible (yes) – seven-point scale versus checking “yes” or “no.”

Table 3. Statistically significant (p< .05) results for binary or ordered regressions where the models were not contradictory in sign. Binary and ordered logit regressions were run for each DV with the independent variables of Internet, elem, friends, elemincome, eligibility.

<table>
<thead>
<tr>
<th>Independent variable</th>
<th>Dependent variable</th>
<th>Sign of coefficient</th>
<th>P value (binary/ordered logit results)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Low-income</td>
<td>Cost</td>
<td>Positive</td>
<td>.004/.006</td>
</tr>
<tr>
<td>Using friends to research</td>
<td>Diversity</td>
<td>Positive</td>
<td>.125/.020</td>
</tr>
<tr>
<td>Elem f/r lunch</td>
<td>Reputation</td>
<td>Positive</td>
<td>.025/.447</td>
</tr>
<tr>
<td>Using Internet to research</td>
<td>Location</td>
<td>Positive</td>
<td>.392/.030</td>
</tr>
<tr>
<td></td>
<td>Hours</td>
<td>Positive</td>
<td>.288/.034</td>
</tr>
</tbody>
</table>

For those that did not have conflicting signs between the binary and the ordered regression, the statistically significant findings are reported in Table 3 (above), and most seem to support my hypotheses. The control of elementary school free/reduced lunch rate is statistically significant and positive for the factors of location and hours, which aligns with my general hypothesis – those living in neighborhoods with more low-income students are more likely to rely on formal sources of information rather than their non-expert networks (holding other
independent variables constant), leading them to find and decide based on the facts that are readily available, such as hours and location. The control variable measuring socioeconomic status, eligibility for the public program, is positive and statistically significant for the factor of cost (while holding other independent variables constant), which also aligns with my general hypothesis. Low-income parents are more likely to be constrained by cost due to a lack of resources.

Independent variables of interest with statistically significant beta coefficients are “friends” and “Internet” in their relationships with the dependent variables of reputation, hours, religion, and cost. While holding other independent variables constant, respondents who report engaging in more asking of friends’ advice are more likely to use reputation as a factor in their decisions, which makes logical sense: Those asking to hear about programs’ reputations then use those reputations to choose programs. Also, those who report using more of friends’ recommendations are more likely to use religion as a factor in their decisions, while holding other independent variables constant. This is also unsurprising, as those who ask friends are more likely to be invested in a strong social network, such as those comprising churches and religious schools. Friends may be more likely to recommend religious schools to other friends because they share religious backgrounds.
Figure 4. The probability of using hours as factor as the amount Internet or providers consulted increases. Binary model shows the probability change for those who use hours as a factor. Ordered model shows the probability change for each level on the scale of using hours as a factor, color-coded as seen in key.

The independent variable measuring the amount of Internet or provider research in which the respondent engages has beta coefficients that also seem to support my hypotheses. As seen in Figure 4, those who report higher levels of Internet research are more likely to use program hours as a deciding factor when choosing preschools or daycares, while holding other independent variables constant. The left graph shows the binary results, while the right graph shows the ordered regression results: each line in the bottom graph represents the probability of hours being rated as each level on the seven-point scale, as indicated in the key. As my hypothesis predicts, this means that formal sources of information may provide mainly surface factors about programs, including their hours, and those who rely on formal sources choose based on the information they are able to find.

Hypothesis 3

I originally tested my third hypothesis, the relationship between the factors of decision-making and the quality of the chosen program, through binary probit models. As described
above, the binary quality measure is very rough, and as seen in Table 4, the majority of those receiving “quality”\textsuperscript{11} are using the public program. Additionally, because of the small number of cases available due to listwise deletion (85 cases, as seen in Table 5, because a number of parents did not list the programs they used), I was unable to include the categories of factors as variables. Long and Freese write (2006) that samples under 100 are “risky” because we do not know the properties of maximum likelihood estimators with small n sizes, and they stress the importance of a small number of independent variables and wide variation in the dependent variable. There is likely enough variation in the dependent variable, as seen in Table 4, but I needed to limit the number of independent variables. I did this by using “totalfactors,” a count variable measuring the number of factors each respondent used in making his or her decision, rather than including the variable for each category of factors (academic, environmental, and surface). Therefore, the hypothesis I will be testing concerns the effects of income and information-gathering techniques on the quality of preschool received as opposed to the effect of decision-making factors on the quality received – jumping over a step in the causal chain, but the best we can do.

Table 4. Tabulation of quality variable compared with attending public program (CCS) variable – number of respondents receiving quality preschool, broken down by those who attended or did not attend the public program.

<table>
<thead>
<tr>
<th>4quality</th>
<th>Attended CCS preschool</th>
<th>0</th>
<th>1</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td></td>
<td>39</td>
<td>0</td>
<td>39</td>
</tr>
<tr>
<td>1</td>
<td>20</td>
<td>44</td>
<td></td>
<td>64</td>
</tr>
<tr>
<td>Total</td>
<td>59</td>
<td>44</td>
<td></td>
<td>103</td>
</tr>
</tbody>
</table>

\textsuperscript{11} Throughout the discussion of results, I use the terms “quality” and “not quality” and “high-quality,” “medium-quality,” and “low-quality” – these are shorthand and not meant to be interpreted literally. As discussed earlier, these are very rough measures and I am not confident about their accuracy in describing the programs.
Table 5. Logit quality model

As seen in Table 5, the regression results, the beta coefficient of the variable “totalfactors,” or the number of factors respondents used in their decision-making processes, is positive but not statistically significant. The same goes for the beta coefficient of the free/reduced lunch rate of the school, “elemincome” – it is positive but not statistically significant. The variable “Internet,” measuring the amount that parents engaged in research on the Internet or from the providers has a negative beta coefficient but is also not statistically significant. These high p values mean that we cannot proceed as if there were a relationship between those variables and the quality of the preschool received. However, a few variables were statistically significant, with p values below .1. The control “eligibility1,” measuring estimated socioeconomic status, is statistically significant and has a positive beta coefficient,
meaning that while the other independent variables are held constant, a respondent who is low-income is more likely to choose a quality preschool program. The variables of interest that are statistically significant are “elem,” the amount that the parent engaged in research by receiving information from the elementary school, and “friends,” the amount that the parent engaged in asking friends and family for recommendations. The elementary school variable is positive, meaning that those who research more using elementary school information are more likely to choose quality programs, holding other independent variables constant. The friends and family variable is negative, meaning that those who engage more in asking friends and family for advice are less likely to choose quality programs while other independent variables are held constant.

**Figure 5.** PRGEN graph showing relationship between probability of choosing quality and amount of friends’ advice sought.

![Graph showing relationship between probability of choosing quality and amount of friends’ advice sought.](image)

The graph in Figure 5 allows us to visualize these results by showing specific variables across a range while holding other independent variables constant. The probability of respondents choosing quality decreases as the amount of asking for friends’ recommendations increases with all other independent variables held at their respective means. More specifically,
the predicted probability of choosing a quality preschool changes by -.41 as the amount of research engaged in by asking friends and family for advice changes from its minimum of one to its maximum of seven, while holding other independent variables constant. The x-axis shows the seven-point scale of the independent variable, increasing the amount of engagement as the numbers ascend. The y-axis shows the probability of choosing a quality program, or having a value of “1” for the binary quality variable.

The statistically significant results are mostly contrary to my hypothesis, but can likely be explained by my rough quality measure and the heavy influence of the public program. As seen in Figure 2, most of those respondents classified as low-income were able to attend the high-quality means-tested public program. This means that my sample does not include very many low-income parents choosing low-quality preschools, which explains the statistically significant and positive beta coefficient for the socioeconomic status variable. Additionally, my rough measure of quality means that many of the private programs chosen by upper-income parents may indeed be of high quality, but are not classified as such because they have not gone through the accreditation processes that I used to indicate quality.

This may also help to explain the negative relationship between asking friends for advice and choosing a quality program, holding other variables constant – most parents choosing quality programs were choosing the public program. I assume that most, if not all, of the information supplied by elementary schools is about the programs that they themselves run – the public programs. Therefore, assuming that they are likely to rate highly the research technique that led them to their final choices, those who report researching a great deal by receiving information from the elementary school will be likely to choose the public, high-quality program, and those who report engaging in a great deal of asking friends and family for recommendations are not
likely to choose the public program, since they seem to need supplemental information. The parents who ask their friends are probably more likely to choose private programs, because they are looking to their networks for information. These private programs may actually be quality programs, but are not classified as such under my original mechanism, which only designates NAEYC and VSQI accredited programs and the public program as high quality. Many private programs may be perceived as high quality by parents, and may actually be of high quality, but may not have proved it by applying for an accreditation.

I examined the third hypothesis in two more ways in an attempt to better understand the relationships between my independent variables and the dependent variable of program quality. I had originally hoped to categorize each program listed by respondents using the types of curricula used, teacher qualifications, and teacher/student ratios. However, after attempting this classification system and realizing the extent to which I would be ruling on the nuances of these attributes subjectively, I questioned this approach. (For example: Is it better to have all teachers with associates’ degrees, or one with a master’s and two with high school diplomas only? Is it more important to have a curriculum or to have a low teacher/student ratio? How qualified do teaching assistants need to be?) I shared my concerns with Professor Meg Sewell, a local expert on early childhood education and the Virginia Star Quality Initiative in Charlottesville. She agreed with my hesitation to attempt a basic version of the VSQI, which in its true form takes expert evaluation and months of work, and suggested that my metric be based solely on the program’s curriculum and state certification. Therefore, I developed a three-step classification system – high quality programs being those with a designated curriculum of some kind, medium quality programs having licenses from the state, and low quality programs being those with neither a curriculum nor a license.
Appendix B includes the list of programs that respondents provided and the categories I placed them in – 1 being high quality (an order which I later reversed so that the regression results would make more intuitive sense). As you can see in Table 6 below, in the tabulation of that variable (“qualitynew”), there was a very high proportion of high quality programs using this metric. Accordingly, when I ran an ordered logistic regression, Stata warned that 45 of the 82 observations were “completely determined” and that the standard errors were “questionable” because of little variation on the dependent variable. None of the p values were below .3. To address the problem, I considered adjusting the scale so that high quality was broken into two steps: highest quality including NAEYC/VSQI accredited programs and programs with specific, brand name curricula; then lower quality including those with unnamed but thoroughly outlined curricula. I also considered breaking out the accredited programs from the programs with curricula only.

Ultimately, I rejected these tactics because of fears of bias. Just because a curriculum does not carry the name of a research-based system developed by an educational organization does not mean that it cannot address all of the same issues – in fact, it could be identical. Similarly, as discussed above, a program could meet all of the standards for accreditation with VSQI or NAEYC and simply choose not to participate\textsuperscript{12}. At least one program director I spoke with mentioned the expense involved with NAEYC. Accreditation costs around $2,000 for an average-sized preschool program (NAEYC 2011). Additionally, a couple of directors mentioned that the VSQI star system might create some publicity problems. Because of the rigor of the

\textsuperscript{12} Granted, these fears could be applied to my measuring of curricula, as well – a program could describe its curriculum as research-based and thorough without implementing it well, or it could be using a sub-par curriculum. Professor Sewell’s recommendations, however, guided me to trust in the curriculum measure as more reliable than others.
standards, a two-star program may be very high quality – but parents perceive anything less than four or five stars as subpar\textsuperscript{13}.

**Table 6.** Tabulation of 3-step quality scale and estimated income status.

<table>
<thead>
<tr>
<th>3-step quality scale, 3=high</th>
<th>Estimated eligible for public program?</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>1</td>
<td>2</td>
<td>0</td>
</tr>
<tr>
<td>2</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>3</td>
<td>40</td>
<td>55</td>
</tr>
<tr>
<td>Total</td>
<td>44</td>
<td>56</td>
</tr>
</tbody>
</table>

**Table 7.** Tabulation of 3-step quality scale of those using non-public programs and estimated income status.

<table>
<thead>
<tr>
<th>Program attended before or instead of CCS</th>
<th>Estimated eligible for public program?</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>1</td>
<td>2</td>
<td>13</td>
</tr>
<tr>
<td>2</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>3</td>
<td>40</td>
<td>18</td>
</tr>
<tr>
<td>Total</td>
<td>44</td>
<td>34</td>
</tr>
</tbody>
</table>

Instead, I chose to rework the quality variable by attempting to remove the effect of the large proportion of low-income respondents using the high quality public option. My survey asked for the programs used by children ages 2 through 5 – so many parents listed programs used

\textsuperscript{13} I spoke with many program directors and teachers over the summer of 2012 in the first iteration of this project, gathering information about the accessibility of programs available in Charlottesville. I did not focus on quality considerations, unfortunately for this research, but did acquire some of that information incidentally. Please ask if you would like to see my data on programs’ features, such as cost, location, hours, and scholarships.
before the public program, which usually begins at age $4^{14}$. I went through the surveys and coded a new variable, “preCCS,” with values only for those respondents who used a program other than Charlottesville City Schools at some point. This narrowed the n size to 65, and a large proportion were still classified as high quality, due to the issues described above, but it provided a fairly even split on the income variable (as seen in Table 7). With a limited number of independent variables, I felt comfortable running an ordered probit regression, while remaining cautious about the outcomes (Table 8, below).

Table 8. Ordered probit regression using non-CCS, 3-step quality variable.

```
. oprobit preCCS totalfactors Internet elem friends elemincome eligibility1

Iteration 0:  log likelihood = -39.54881
Iteration 1:  log likelihood = -28.851328
Iteration 2:  log likelihood = -28.012625
Iteration 3:  log likelihood = -28.004348
Iteration 4:  log likelihood = -28.004347

Ordered probit regression

| preCCS           | Coef. | Std. Err. | z     | P>|z|  | [95% Conf. Interval] |
|------------------|-------|-----------|-------|------|----------------------|
| totalfactors     | .1769327 | .0875491 | 2.02  | 0.043| .0053397 -.3485257  |
| Internet         | .0144908 | .1059923 | 0.14  | 0.891| -.1932502 .2222318  |
| elem             | -.0708658 | .0929489 | -0.76 | 0.446| -.2530424 .113107   |
| friends          | -.1392456 | .1251546 | -1.11 | 0.266| -.3845441 .106053   |
| elemincome       | -.0332179 | .015565  | -2.13 | 0.033| -.0637246 -.0027111 |
| eligibility1     | -1.334262 | .320794  | -2.51 | 0.012| -2.377118 -.2914053 |
| /cut1            | -3.912833 | 1.254046 |       |      | -6.370718 -1.454948 |
| /cut2            | -3.64721  | 1.243125 |       |      | -6.083691 -1.21073  |

```

$^{14}$ There is a program for three-year-olds, but it is much smaller in scope (60 three-year-olds versus 144 four-year-olds).
None of the information-gathering processes’ variables were statistically significant. The statistically significant variables are “totalfactors” (positive coefficient, p=.043), “elemincome” (negative coefficient, p=.033), and “eligibility1” (negative coefficient, p=.012). This means that while holding constant income, information gathering, and socioeconomic environment, as parents consider more factors in their decisions, they are more likely to choose a higher quality preschool. As seen in the left-hand graph of Figure 6 below, the probability of choosing a high-quality preschool (pr(3), the green line) increases as the number of factors considered increases. The probability of choosing a moderate- or low-quality program (pr(2) or pr(1), the red and blue lines) decreases as the number of factors increases. The graph below shows opposing results in the same format for the neighborhood socioeconomic status variable: meanwhile, with all of the other independent variables held constant, parents who live in a low-income area are less likely to choose a higher quality preschool – and the same is true for parents with low incomes, themselves.

**Figure 6.** PRGEN graphs of “preCCS” variable

Probability of choosing a high-quality preschool (pr(3)) increases as factors considered increases; probability of choosing a low-quality (pr(1)) or middle-quality preschool (pr(2)) decreases as factors considered increases.
Probability of choosing a high-quality preschool (pr(3)) decreases as free/reduced percentage increases; probability of choosing a low-quality preschool (pr(1)) increases as free/reduced percentage increases.

Using more factors probably implies a greater amount of thought about the preschool decision, so it makes sense that these parents are more likely to end up with high-quality choices. It is important, and not surprising, that the direction of the association between income and quality changes direction when taking the public option out of consideration. Before their children were eligible for the free, well-advertised (about 80 percent of parents reported knowing about the program), high quality public program, these parents were likely limited to affordable programs they already knew about. It is also important to note that this regression does not take into account all of the parents who did not write down program names at all, nor does it include those who left the ages before the public program blank. This latter category probably consists of parents who did not use daycare or preschool before their children turned four\textsuperscript{15} – so it is even

\textsuperscript{15} Although it does include parents who did not answer the program-listing question at all – I included as “attending CCS” those parents who answered “yes” to survey question 5, the income proxy.
overestimating the quality of program received (if we consider no preschool even lower quality than the low-quality programs).

**Implications**

My findings for my first hypothesis both supported and contradicted my predictions. While I was correct that low-income parents are less likely to rely on their friends and more likely to use information from elementary schools, I was wrong to assume that they would use more formal sources of information such as the Internet or the preschool providers themselves. Probably, they did not resort to formal sources because of already having information from the elementary schools or because of an assumption about the lack of substantive information available. These findings generally align with the literature – in K-12 choice situations as well as in childcare decisions. While I thought that the utter lack of obvious information on early childhood care would drive parents without informative networks to search the Internet or contact providers themselves, the literature was correct. Parents, especially low-income parents, it seems, lack the motivation, energy, time, or knowledge to take a full research project on in order to choose a preschool program.

My second hypothesis was mostly supported, although there were many non-statistically significant variables and a few contradictions between the ordered and binary results. In general, it seems that there is some evidence that those using friends are more likely to use substantive, academic factors when choosing preschools, and those using the Internet or providers for information are more likely to use surface, logistical factors. This supports the idea that formal sources lack the substantive information that friends and family may be able to provide. Also, the positive association between being low-income and using cost as a factor emphasizes the
constraining effects of a lack of resources. These results support the existing literature, showing the increased use of logistical factors for low-income parents.

Because I was unable to test the effect of the types of factors on the quality received (Hypothesis 3), the next step in the logical chain, I looked at the larger causal story, focusing on the effect of income and the types of research on the quality received. In the binary model with most of the low-income parents using the high-quality public option, those researching using friends are less likely to choose a quality program, which is the reverse of my hypothesis. As discussed above, these findings are likely a function of the large number of low-income parents choosing the public option and the roughness of my quality measure. In the model that uses only the cases in which parents chose a program other than the public option, at some point during ages two through five, my hypotheses fared better. While I did not have any statistically significant results for the information-gathering techniques, which is unhelpful for examining that step of the causal chain, there were some visible results. Those using more factors to decide were more likely to choose higher quality programs, and those living in low-income neighborhoods and/or being low-income themselves were less likely to choose high-quality programs. Using more factors may increase the likelihood of choosing high-quality programs because it is indicative of greater access to information. It may also signal a greater amount of time and effort put into the decision-making process. The income-related results align very well with the literature on school choice. Those with lower-income, less expert-filled networks are receiving lower quality childcare, probably because of a combination of logistical constraints and lack of good information.

Of course, all of these conclusions are hampered by my rough measure of quality. Having a curriculum or not may be the best shortcut to measuring the quality of a preschool
program, but it is not a substitute for the comprehensive evaluations done by NAEYC and VSQI. Attempting to evaluate the programs has given me an understanding of the complexity and confusion that abounds in the childcare marketplace: if, as a researcher, I have trouble identifying programs, what must it be like for parents with full-time jobs?

Future Research

My research contributes one step towards determining parents’ decision-making processes, but it needs several adjustments in order to make fully defendable claims. Future steps could include exploring the results with more quantitative analysis, adjusting the categorizations and observing any changes. For example, I could re-code the binary factor variables using one through four on the ordered scale as “not a factor” rather than one through three. I could also regroup the factors into different categories, perhaps breaking down the large “environmental” category into smaller groups. I could also conduct more interviews with parents of children currently in preschool, especially those on the lower end of the socioeconomic spectrum. The biggest problem is that I would also need to increase the accuracy of the quality measure – ideally, by linking children’s kindergarten readiness scores with their preschool programs, or by conducting a VSQI-type investigation of each program’s curriculum, teachers, and environment.

Finally, I would theoretically like to add survey results from a location other than Charlottesville. The large public program in Charlottesville has a heavy influence on my results, and I am not as confident about my results with the smaller sample size of those using something other than the public option. Picking a city and/or a rural location without such a large public program would increase the proportion of low-income parents not using the public option, as well as add diversity and size to the overall sample.
The important take-away from the influence of the public program, however, is the huge impact it is having on low-income children. In the spring of 2013, the percentage of program participants passing the PALS literacy assessment was 91 percent, improving from 45 percent passing in the fall of 2012, upon entrance to the program (Charlottesville City Schools 2013). This actually measures outcomes, and shows significant indication that the Charlottesville public program is high-quality preschool, preparing its students for kindergarten. With Obama’s Preschool for All initiative launched during his last State of the Union and subsequent bills in Congress looking to expand access to these public programs, it is heartening that this one appears to be working.

If more parents were able to send their children to the public program, more children would receive high-quality preschool. Magnuson, Meyers, and Waldfogel (2007) show that public programs such as Head Start are responsible for between 8 and 11 percentage points of the increase in low-income preschool enrollment during the 1990s – that could happen again, with the lower-middle class. A question on my survey asked about parents’ interest in the public program if there were no eligibility requirements, and latent demand is high – of those who were “probably not” eligible, about 78 percent replied that they would have been definitely or maybe interested in sending their children to the free, public program if possible. This is not surprising, given that a recent study found that annual childcare costs are higher than annual college tuition in 31 states in America – an amazing amount of money even for the middle class (Wood and Kendall 2013).

All of the issues brought up by my research regarding parent struggles to find accurate information about preschool quality are only relevant in the current state of competing programs, little regulation, and limited public access. Improving quality measurements and making them
widespread and public would alleviate some of the parental burden and increase the quality received by most children. Allowing access to free, high-quality public preschool for all children would improve the next generation’s chances in life, and our country’s future.
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Appendix A. Survey (original version fit on one double-sided piece paper)

Pre-Kindergarten Program Survey

1. Some parents choose to use preschool or daycare programs for their young children, while others keep their children at home with friends or family. Which did you do for the child you are now registering for kindergarten?
   ○ I used some preschool or daycare for my child.
   ○ I did not use a preschool or daycare program; my child remained at home or with friends and family. (If selected, please skip question number 2.)

2. When their children are toddlers, some people look for information about preschool or daycare programs while others choose between programs they have heard about already. To what extent did you do the following? Circle the numbers that describe how much you engaged in each activity, 1 being not at all and 7 being a great deal.

   I looked for information on the Internet or from the providers
   1 2 3 4 5 6 7

   I looked at information provided by my neighborhood elementary school
   1 2 3 4 5 6 7

   I asked friends and family for recommendations
   1 2 3 4 5 6 7

   I had already heard of programs and chose based on that prior knowledge
   1 2 3 4 5 6 7

3. Why did you choose the type or care or programs you used for your child before kindergarten (ages 2 to 5) rather than other programs? Please note the extent of each factor’s influence on your decision using the 1-7 scale established above: a 1 indicates very little importance, while a 7 indicates great importance to your decision.

   __ convenient location
   __ hearing good things about the program
   __ convenient hours
   __ diversity within the program
   __ program’s curriculum or approach to learning
   __ religious values
   __ financial considerations
   __ quality of teachers
   __ past association with the program (knowing a teacher, sibling attending)
   __ opportunities for parent involvement (co-op programs, for example)
__ other (please specify: 
__________________________________________)

4. What are the names of the daycare, preschool programs, or other types of care that you used for your child before kindergarten? If your child did not participate in a program during one or more years, please briefly describe the type of care used.
   Program used at age 2: ________________________________
   Program used at age 3: ________________________________
   Program used at age 4: ________________________________
   Program used at age 5: ________________________________

5. Charlottesville City offers a free public preschool program for 3 and 4 year olds from families having some economic hardship or other stressors. Do you think that your child may have been eligible?
   O Yes, and he or she did attend the Charlottesville public program and/or Head Start.
      (If selected, please skip question number 6.)
   O Probably, and he or she applied but did not attend (because
      ________________________________.)
   O Maybe
   O Probably not

6. Would you have been interested in registering your child for the Charlottesville public preschool program if it were open to anyone, regardless of economic situation?
   O Yes
   O Maybe
   O No

7. How did you hear about the Charlottesville public preschool program? Fill in the bubble next to all answers that apply.
   O I was not aware of the Charlottesville public preschool program.
   O Fliers or newspaper postings
   O On the internet
   O Neighbors, friends, family, or church
   O Information provided by my neighborhood elementary school
   O Other (Describe briefly here: ________________________________)
8. Which elementary school will your child be attending in the fall? __________________

**Appendix B. Regression table for Hypothesis 1**

<table>
<thead>
<tr>
<th>Information-Gathering Processes</th>
<th>Internet b/se</th>
<th>Elementary b/se</th>
<th>Friends b/se</th>
<th>Prior b/se</th>
</tr>
</thead>
<tbody>
<tr>
<td>main</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Estimated eligible for public program?</td>
<td>-1.123**</td>
<td>1.145**</td>
<td>-0.893*</td>
<td>0.728*</td>
</tr>
<tr>
<td>Percentage free/reduced lunch in neighborhood school</td>
<td>0.003</td>
<td>0.022*</td>
<td>-0.018+</td>
<td>-0.012</td>
</tr>
<tr>
<td>cut1</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>-1.544*</td>
<td>-3.015**</td>
<td>-3.154**</td>
<td>-4.992**</td>
</tr>
<tr>
<td>cut2</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>-1.060+</td>
<td>1.260+</td>
<td>-2.896**</td>
<td>-2.826**</td>
</tr>
<tr>
<td>cut3</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>-0.839</td>
<td>1.684**</td>
<td>-2.779**</td>
<td>-2.196**</td>
</tr>
<tr>
<td>cut4</td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>-0.536</td>
<td>1.853**</td>
<td>-2.363**</td>
<td>-1.898**</td>
</tr>
<tr>
<td>cut5</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>0.148</td>
<td>2.026**</td>
<td>-1.832**</td>
<td>-1.319*</td>
</tr>
<tr>
<td>cut6</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>0.930</td>
<td>2.775**</td>
<td>-1.220+</td>
<td>-0.498</td>
</tr>
<tr>
<td>cut7</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>3.286**</td>
<td></td>
<td></td>
<td>0.440</td>
</tr>
</tbody>
</table>

N 104 105 105 104

+ p<0.10,  * p<0.05,  ** p<0.01
Appendix C. Regression tables for Hypothesis 2

1. Ordered Probit Models with DVs Groups of Factors, run with IVs eligibility1, elemincome, Internet, elem, friends: Table shows independent variables with P values under .3.

<table>
<thead>
<tr>
<th>Independent Variables</th>
<th>Group of Factors (DV)</th>
<th>Direction of coefficient</th>
<th>P value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Elem f/r lunch rate</td>
<td>Surface factors</td>
<td>Positive</td>
<td>.222</td>
</tr>
<tr>
<td></td>
<td>Environmental factors</td>
<td>Positive</td>
<td>.151</td>
</tr>
<tr>
<td></td>
<td>Academic factors</td>
<td>Positive</td>
<td>.202</td>
</tr>
<tr>
<td>Using friends for information</td>
<td>Environmental factors</td>
<td>Positive</td>
<td>.144</td>
</tr>
<tr>
<td></td>
<td>Academic factors</td>
<td>Positive</td>
<td>.147</td>
</tr>
<tr>
<td>Using Internet or providers</td>
<td>Academic factors</td>
<td>Negative</td>
<td>.208</td>
</tr>
<tr>
<td>Eligibility for CCS</td>
<td>Academic factors</td>
<td>Negative</td>
<td>.164</td>
</tr>
</tbody>
</table>

2. Binary Probit Models for Each Factor as DV

<table>
<thead>
<tr>
<th>Factors Important to Preschool Decision: Binary Models</th>
<th>Location b/se</th>
<th>Reputation b/se</th>
<th>Hours b/se</th>
<th>Diversity b/se</th>
<th>Curriculum b/se</th>
<th>Religion b/se</th>
<th>Cost b/se</th>
<th>Teacher Qu-y b/se</th>
<th>Prior Amo-n b/se</th>
<th>Parent Inv-t b/se</th>
</tr>
</thead>
<tbody>
<tr>
<td>main</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Did parent use Internet or</td>
<td>-0.626</td>
<td>-0.426</td>
<td>0.066</td>
<td>0.057</td>
<td>-0.038</td>
<td>-0.079</td>
<td>0.066</td>
<td>-0.095</td>
<td>-0.309</td>
<td>0.013</td>
</tr>
<tr>
<td>contact provider?</td>
<td>(0.07)</td>
<td>(0.08)</td>
<td>(0.06)</td>
<td>(0.06)</td>
<td>(0.06)</td>
<td>(0.07)</td>
<td>(0.06)</td>
<td>(0.07)</td>
<td>(0.07)</td>
<td>(0.07)</td>
</tr>
<tr>
<td>Did parent use information from elementary school?</td>
<td>0.075</td>
<td>-0.050</td>
<td>-0.018</td>
<td>0.038</td>
<td>-0.023</td>
<td>-0.044</td>
<td>-0.024</td>
<td>-0.010</td>
<td>0.037</td>
<td>0.027</td>
</tr>
<tr>
<td>(0.06)</td>
<td>(0.07)</td>
<td>(0.06)</td>
<td>(0.06)</td>
<td>(0.06)</td>
<td>(0.07)</td>
<td>(0.06)</td>
<td>(0.06)</td>
<td>(0.06)</td>
<td>(0.06)</td>
<td>(0.06)</td>
</tr>
<tr>
<td>Did parent ask friends and family</td>
<td>0.056</td>
<td>0.178</td>
<td>-0.039</td>
<td>-0.015</td>
<td>0.056</td>
<td>0.105</td>
<td>0.022</td>
<td>0.095</td>
<td>0.063</td>
<td>0.079</td>
</tr>
<tr>
<td>for advice?</td>
<td>(0.07)</td>
<td>(0.08)</td>
<td>(0.07)</td>
<td>(0.07)</td>
<td>(0.07)</td>
<td>(0.07)</td>
<td>(0.07)</td>
<td>(0.07)</td>
<td>(0.07)</td>
<td>(0.08)</td>
</tr>
<tr>
<td>Percentage free/reduced lunch in neighborhood school</td>
<td>0.007</td>
<td>0.013</td>
<td>0.012</td>
<td>-0.005</td>
<td>0.011</td>
<td>0.010</td>
<td>0.007</td>
<td>0.006</td>
<td>0.014</td>
<td>0.008</td>
</tr>
<tr>
<td>(0.01)</td>
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<td>(0.01)</td>
<td>(0.01)</td>
<td>(0.01)</td>
<td>(0.01)</td>
<td>(0.01)</td>
<td>(0.01)</td>
<td>(0.01)</td>
<td>(0.01)</td>
<td>(0.01)</td>
</tr>
<tr>
<td>Estimated eligible for public program?</td>
<td>-0.629</td>
<td>-0.708</td>
<td>-0.688</td>
<td>-0.477</td>
<td>-0.176</td>
<td>-0.026</td>
<td>0.188</td>
<td>-0.533</td>
<td>-0.166</td>
<td>-0.061</td>
</tr>
<tr>
<td>(0.03)</td>
<td>(0.03)</td>
<td>(0.03)</td>
<td>(0.03)</td>
<td>(0.03)</td>
<td>(0.03)</td>
<td>(0.03)</td>
<td>(0.03)</td>
<td>(0.03)</td>
<td>(0.03)</td>
<td>(0.03)</td>
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<td>Constant</td>
<td>0.218</td>
<td>0.518</td>
<td>-0.133</td>
<td>-0.378</td>
<td>-0.252</td>
<td>-1.475*</td>
<td>-0.742</td>
<td>0.394</td>
<td>-0.845</td>
<td>-1.720*</td>
</tr>
<tr>
<td>(0.68)</td>
<td>(0.75)</td>
<td>(0.65)</td>
<td>(0.64)</td>
<td>(0.68)</td>
<td>(0.75)</td>
<td>(0.65)</td>
<td>(0.68)</td>
<td>(0.67)</td>
<td>(0.75)</td>
<td>(0.67)</td>
</tr>
</tbody>
</table>

N = 102, 99, 102, 99, 98, 98, 99, 92, 93

p < 0.10, * p < 0.05, ** p < 0.01
3. Ordered Probit Models for Each Factor as DV

<table>
<thead>
<tr>
<th>Factors Important to Preschool Decision: Ordered Models</th>
<th>Location</th>
<th>Reputation</th>
<th>Hours</th>
<th>Diversity</th>
<th>Curriculum</th>
<th>Religion</th>
<th>Cost</th>
<th>Teacher Qu-y</th>
<th>Prior Ansof-n</th>
<th>Parent Inv-t</th>
</tr>
</thead>
<tbody>
<tr>
<td>main</td>
<td>b/se</td>
<td>b/se</td>
<td>b/se</td>
<td>b/se</td>
<td>b/se</td>
<td>b/se</td>
<td>b/se</td>
<td>b/se</td>
<td>b/se</td>
<td>b/se</td>
</tr>
<tr>
<td>Did parent use Internet or contact providers?</td>
<td>-0.007</td>
<td>0.029</td>
<td>0.136*</td>
<td>0.014</td>
<td>0.047</td>
<td>-0.116</td>
<td>0.110</td>
<td>-0.050</td>
<td>-0.227**</td>
<td>-0.034</td>
</tr>
<tr>
<td>Did parent use information from elementary school?</td>
<td>-0.018</td>
<td>0.002</td>
<td>-0.167*</td>
<td>-0.004</td>
<td>-0.030</td>
<td>-0.080</td>
<td>-0.097</td>
<td>-0.107</td>
<td>0.110</td>
<td>0.144*</td>
</tr>
<tr>
<td>Did parent ask friends and family for advice?</td>
<td>-0.131</td>
<td>0.099</td>
<td>-0.146*</td>
<td>-0.214*</td>
<td>-0.121</td>
<td>0.160*</td>
<td>0.003</td>
<td>-0.074</td>
<td>-0.106</td>
<td>0.030</td>
</tr>
<tr>
<td>Percentage free/reduced lunch in neighborhood school</td>
<td>0.053*</td>
<td>0.013</td>
<td>0.016</td>
<td>-0.014</td>
<td>-0.013</td>
<td>0.006</td>
<td>0.005</td>
<td>-0.004</td>
<td>0.019</td>
<td>0.003</td>
</tr>
<tr>
<td>Estimated eligible for public program?</td>
<td>0.075</td>
<td>0.110</td>
<td>0.860*</td>
<td>1.039*</td>
<td>0.590</td>
<td>-0.007</td>
<td>1.259**</td>
<td>0.894*</td>
<td>-0.677</td>
<td>-0.102</td>
</tr>
<tr>
<td>cut1 Constant</td>
<td>-1.234</td>
<td>-0.744</td>
<td>-1.175</td>
<td>-2.109*</td>
<td>-2.457**</td>
<td>-1.273</td>
<td>-1.337</td>
<td>-2.676**</td>
<td>-2.519**</td>
<td>-1.136</td>
</tr>
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<td>cut2 Constant</td>
<td>-1.074</td>
<td>-0.389</td>
<td>-0.797</td>
<td>-1.004*</td>
<td>-2.230*</td>
<td>-0.370</td>
<td>0.234</td>
<td>-2.351*</td>
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<td>0.332</td>
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<tr>
<td>cut3 Constant</td>
<td>-0.048</td>
<td>-0.195</td>
<td>-0.521</td>
<td>-1.365*</td>
<td>-1.004*</td>
<td>1.020</td>
<td>0.176</td>
<td>-1.942*</td>
<td>-0.861</td>
<td>0.591</td>
</tr>
<tr>
<td>cut4 Constant</td>
<td>-0.258</td>
<td>0.210</td>
<td>-0.026</td>
<td>-1.092</td>
<td>-1.003*</td>
<td>1.285</td>
<td>0.452</td>
<td>-0.784</td>
<td>-0.663</td>
<td>0.768</td>
</tr>
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<td>cut5 Constant</td>
<td>0.232</td>
<td>1.095</td>
<td>0.492</td>
<td>-0.628</td>
<td>-1.126</td>
<td>1.441*</td>
<td>0.674</td>
<td>-0.630</td>
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<td>0.887</td>
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<td>0.839</td>
<td>-0.246</td>
<td>-0.816</td>
<td>1.624*</td>
<td>1.166</td>
<td>-0.402</td>
<td>1.075</td>
<td></td>
<td></td>
</tr>
<tr>
<td>cut7 Constant</td>
<td>1.990*</td>
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<td>1.521</td>
<td></td>
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* p<0.10,  * p<0.05,  ** p<0.01
Appendix D. Quality categorizations of programs listed by parents. “NAEYC” stands for National Association for the Education of Young Children accreditation. “State” means the government runs and accredits the program. “HS” means Head Start accredits the program. If accredited, did not look for curriculum. Curriculum category marked “yes” means program does not specify a titled curriculum, but describes an approach to learning, in detail.

<table>
<thead>
<tr>
<th>Program</th>
<th>Accreditation</th>
<th>Curriculum</th>
<th>DSS license</th>
<th>Category (3 is high)</th>
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<td>UVA Child Development Centers (Copeley and Earhart locations)</td>
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<td>Foundations CDC</td>
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<td>Complete Resource Book</td>
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<td>First United Methodist Preschool</td>
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<td>Ms. Karen Rhodes</td>
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<td>Ms. Jean Seay</td>
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<td>Christ Episcopal</td>
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Appendix E. Notes from interviews with parents. Parents were contacted via the program directors at Congregation Beth Israel Preschool, Chancellor St. Preschool, and Molly Michie Preschool. (Directors at the UVa Child Development Center, First Baptist ECDC, and Barrett ELC did not respond to the request.) The audio files from the first eight interviews were lost, so my notes from those in-person encounters are presented. The final three interviews are presented in their full transcripts, from phone conversations, except for irrelevant parts. Red text represents unclear audio.

Parent #1

1. Why did you decide to send your child to a daycare or preschool program rather than keeping him or her at home?
   a. ready for social interaction and structured time
2. How did you go about getting information on your daycare or preschool options?
   a. husband at UVA – lived nearby so already aware of Chancellor St Preschool and had a sense of its good atmosphere. it was our first choice and when we toured we knew it was right: steps were to fill out an online application, then tour because we knew we wanted to get a spot. had lots of friends going through the same process
3. Did you feel like your family and friends would be helpful?
   a.
4. Did you find any resources that were especially helpful – a website or agency?
   a. no, didn't really check. Chancellor St doesn't advertise in high-end publications because it's looking for diversity
5. Which factors were most important to you when choosing a program? Why?
   a. play-based learning (almost 100% the only factor), co-op is a bonus. very glad it's not a church school – secular education important
6. Do you think your child will be ready for kindergarten?
   a. yes and no – socially, yes, but half day can’t prepare for a full day. academically chancellor st isn’t quite like CCS – oldest didn’t know letters before getting to kindergarten (but we didn’t want him to)

Parent #2

1. Why did you decide to send your child to a daycare or preschool program rather than keeping him or her at home?
   a. she wanted to go to preschool; co-op was nice to ease in
2. How did you go about getting information on your daycare or preschool options?
   a. Internet – searched for co-ops and Charlottesville really only has 2
3. Did you feel like your family and friends would be helpful?
   a.
4. Did you find any resources that were especially helpful – a website or agency?
   a. no
5. Which factors were most important to you when choosing a program? Why?
   a. co-op, traditional nursery school with social curriculum rather than academic
6. How would you describe a quality preschool program?
7. Do you think your child will be ready for kindergarten?
   a. definitely

Parent #3

1. Why did you decide to send your child to a daycare or preschool program rather than keeping him or her at home?
   a. moved from Chicago, needed time for parents to be able to work, kid was social and wanted interaction
2. How did you go about getting information on your daycare or preschool options?
   a. Internet, knew someone at UVA who knew about co-ops and we knew we wanted to be involved; contacted Chancellor St because of location
3. Did you feel like your family and friends would be helpful?
   a. yes, but we were moving from Chicago – like deciding on colleges, we asked other parents to really hear what programs were like
4. Did you find any resources that were especially helpful – a website or agency?
   a. no, just went straight to program websites
5. Which factors were most important to you when choosing a program? Why?
   a. co-op, meeting teachers, seeing them interact with kids, diversity, art, financial limitations
6. How would you describe a quality preschool program?
   a. small teacher/student ratio, teacher quality, play-based, diversity of learning experiences, outside time
7. Do you think your child will be ready for kindergarten?
   a. yes

Parent #4

1. Why did you decide to send your child to a daycare or preschool program rather than keeping him or her at home?
   a. parents needed to work, socialization, sibling
2. How did you go about getting information on your daycare or preschool options?
   a. Internet research, friends connections, local publications, schools website
3. Did you feel like your family and friends would be helpful?
   a. yes
4. Did you find any resources that were especially helpful – a website or agency?
   a. Charlottesville Family magazine, UVA grad has a list online
5. Which factors were most important to you when choosing a program? Why?
   a. space/facility quality, location, teachers, learning approach (play-based)
6. How would you describe a quality preschool program?
   a. engaged community, patient teachers, stimulating environment, opportunities to connect with other parents
7. Do you think your child will be ready for kindergarten?
   a. yes – open format here, but ready for more structure in kindergarten
Parent #5

1. Why did you decide to send your child to a daycare or preschool program rather than keeping him or her at home?
   a. to experience a school environment before getting to kindergarten (good to have part week/day options)
2. How did you go about getting information on your daycare or preschool options?
   a. searched for part-day, part-week programs with play-based curricula on Internet, asked friends and coworkers
3. Did you feel like your family and friends would be helpful?
   a. not really
4. Did you find any resources that were especially helpful – a website or agency?
   a. no
5. Which factors were most important to you when choosing a program? Why?
   a. time frame (not every day), play-based philosophy
6. How would you describe a quality preschool program?
   a. not a lot of teaching but still teaches, small size, people
7. Do you think your child will be ready for kindergarten?
   a. yes

Parent #6

1. Why did you decide to send your child to a daycare or preschool program rather than keeping him or her at home?
   a. to socialize child, find friends for parents
2. How did you go about getting information on your daycare or preschool options?
   a. knew we wanted co-op so visited both Cville programs, visited a non co-op, knew other parents
3. Did you feel like your family and friends would be helpful?
   a. no just knew already what we wanted
4. Did you find any resources that were especially helpful – a website or agency?
   a. knew already
5. Which factors were most important to you when choosing a program? Why?
   a. play-based learning, older and younger kids playing together, common sense discipline, exploration allowed
6. How would you describe a quality preschool program?
   a. play, age range (to model behavior to younger ones), teacher quality (very impressed with Chancellor St)
7. Do you think your child will be ready for kindergarten?
   a. yes – was concerned but older daughter was more than ready (we did some things to prepare at home)

Parent #7

1. Why did you decide to send your child to a daycare or preschool program rather than keeping him or her at home?
a. value in learning structured behavior, getting used to separation (for parent and for child)
2. How did you go about getting information on your daycare or preschool options?
   a. friends figuring things out at the same time, had a couple who were ahead in the process, had faint prior knowledge – compiled a list and visited them based on ones seen nearby, phonebooks
3. Did you feel like your family and friends would be helpful?
   a. good starting point to ask them but not a depth of knowledge
4. Did you find any resources that were especially helpful – a website or agency?
   a. no
5. Which factors were most important to you when choosing a program? Why?
   a. convenient location, wanted to be involved, teacher quality, cost concerns some
6. How would you describe a quality preschool program?
   a. creativity, engagement, support from teachers, individualized learning/respecting children’s personalities
7. Do you think your child will be ready for kindergarten?
   a. older child definitely was

Parent #8

1. Why did you decide to send your child to a daycare or preschool program rather than keeping him or her at home?
   a. social interaction – enjoyment and preparation for kindergarten, parents could meet other parents
2. How did you go about getting information on your daycare or preschool options?
   a. sister, friends, then went online and to open house; knew co-op model and liked it already
3. Did you feel like your family and friends would be helpful?
   a. yes – very influential
4. Did you find any resources that were especially helpful – a website or agency?
   a. work in pediatrics so knew a lot already; program website was helpful
5. Which factors were most important to you when choosing a program? Why?
   a. parent involvement, secular program, budget limitations
6. How would you describe a quality preschool program?
   a. nurturing environment, teachers kids can trust
7. Do you think your child will be ready for kindergarten?
   a. yes

Parent #9

Researcher: Hi. Sam, are you still there?

Parent #9: I am.
Researcher: Okay. Great. All right, I hope this is working. Thanks so much for being my guinea pig. Okay.

Parent #9: Sure.

Researcher: So, I'm basically just going to ask you to sort of elaborate on your answers, and I guess that might be difficult since now you don't have the survey in front of you, but -- so, the first question is just sort of why you decided to send your child to a preschool program rather than just keeping them at home.

Parent #9: Um, sheer exhaustion. [Laughter] No. But I'm a teacher, and we moved here two years ago, and I was looking for work, so I needed childcare while I looked for work, but also, they needed socialization, and they needed instruction that I didn't feel I was necessarily prepared to give them, even though I think I'm pretty good at it. I think that in a more structured environment, it's a lot easier for kids to learn than doing it at home.

Researcher: Okay.

Parent #9: So, that's why I sent them there.

Researcher: Yeah. That suffices. The next question is just sort of how you went about getting information about your options about where to send them.

Parent #9: My first recommendation came from a mom at a playground, believe it or not. I was asking around about preschools, and I didn't want to send my kids to a chain preschool. That's all I was really finding, and we were new to the area, so we didn't know about reputations or what preschools were "good" -- or -- we just -- we had no information. So, I really relied on moms and their recommendations, and then once I got the names of preschools, I researched them online and called them to find out about availability, because it's really limited here ___ ___ ___ for full-time childcare that's not at a chain. And so finding something a few days a week was really difficult. And we were lucky enough to visit CBI just after a family had left, because otherwise we would've [inaudible due to crosstalk and break in audio]

Researcher: Yeah. So, I guess I'm curious --

Parent #9: So, I ___ --

Researcher: -- why --
Parent #9: - ___ ___ ___ moms.

Researcher: Yeah. Yeah, that's a good resource. I guess I'm curious why you wanted to avoid chains.

Parent #9: One, because I'm an educator, I'm kind of leery of canned curriculum, and I wanted something that I felt would maybe speak more to the individual child, rather than, "Oh, this is what a typical three year old does; this is what a typical four year old does." And so my biggest fear was that my kids would just be another number in the cubby; they wouldn't necessarily be recognized as these little people who have very different personalities and that are maybe not the norm – although I think they're pretty typical. I just – I didn't want my kids to be part of that. I didn't want them to be brochure kids, I guess.


Parent #9: If that makes sense. And also, I just – local. I trust local. I try to – I really try to embrace that philosophy: supporting local businesses rather than a chain.

Researcher: That makes sense. So, I guess kind of a follow-up question is: you're – you said you relied a lot on moms. Were those sort of your family and friends that you knew, or just –

Parent #9: No.

Researcher: Did you find –

Parent #9: We knew –

Researcher: – networks –

Parent #9: – no one here.

Researcher: – or anything? Yeah.

Parent #9: I – really, it was meeting strangers at parks and inaudible due to laughter] them while our kids played together and asking them what they knew about childcare in town and early childhood centers; if they had friends that sent them or if they sent their own kids. And two people recommended CBI to me.

Researcher: Okay.
Parent #9: Just random people that I had met. We don't have family here, so within probably a month of us moving to Charlottesville, we found CBI just by doing that: just by asking people.

Researcher: Okay. So, I guess a follow-up to that would be: did you find any resources other than people – sort of like an agency or a website or something – that was especially helpful?

Parent #9: I did find – so, there were two websites. One – actually, three. And one was PNOC, which is a parent network of Charlottesville – trying to find more information or comments about the school and then sending out an inquiry through them. I joined and sent out feelers that way, but then I found some other websites. One was through DFS, and it was primarily – the listings that I was seeing – I had the feeling it was more for low income. And the other list was – oh, my gosh; it’s been so long. It was a very incomplete list of early childhood centers and preschools.

Researcher: Was it perhaps put out by UVA – the grad school programs? I’ve seen a list that they put out, that might’ve been –

Parent #9: I – no, but now that you mention it, I did actually look at that one, too. But they didn’t give me any good information. They gave me a list of names and numbers, and so I was back at square one, calling around town, asking for, like, some tour or – you know?

Plus, here – we came from Colorado, and those – there’s actually a network – a provider network that we had in our community that was really – it was very thorough. It had ratings; it had – and it was pretty much like report cards for public schools. It was like a GreatSchools website, and it talked about their accreditation; it talked about the – it got really in depth, like some of the stuff like: what sort of assessments do we do on kids? And I wasn’t really interested in that, so much, but I was definitely just trying to find more information about: what is this place really like?

And when I did try to connect to other websites, to find these places, a lot them weren’t even maintained – the website had expired or the URL was no longer active or – so, it was really hard to find that information. And there’s definitely a need here for that. So, I think a lot of people still do rely on word of mouth.

And there’re a lot of private schools here – a lot of private preschools, and then they feed into a private school setting, which is not something – yeah, and we’re not used to that sort of – I just – that was not something that was very familiar to me, because we came from
out west, and public education is totally different out there. And here it's very much about private education, so ...

Also, a lot of it was just part time; they only offered half-day programs, and that was no good. I'm — ____ drop my kid off and then pick them up three hours later; it's like a play date. It wasn't serving my needs at that point.

So, we were really lucky that we found TBI and that they accepted us, 'cause we're not even — and we're not Jewish. We're not members of their congregation ____ ____ ____ [Inaudible due to breaks in audio]

**Researcher:** Okay, that's – I guess they prioritize members?

**Parent #9:** Yeah. Yeah. And they – I mean, they were just so welcoming, and – yeah, really impressive approach to education: just teaching the whole child. They had art everywhere, which I love, because I'm an art teacher. The staff immediately engaged with the kids; welcomed them into their classrooms. The kids were sitting on the teachers' laps while they were singing and playing, and, I mean, it was like they had gone there since they were little – teeny tiny.

**Researcher:** I guess that's – we're already sort of answering my next question, but that's just sort of: what factors were most important to you when you were choosing a program, and why?

**Parent #9:** Well, obviously, what types of programs or I guess what types of methods they use to teach the kids. And I was drawn to the emergent curriculum idea – rather than, like I said, a canned curriculum – letting the kids sort of dictate where their learning was going to go. And then they're engaged. They're – it's more enjoyable for them, and I think that's the kind of learner that I want my kids to be.

Also, cost, of course, was a factor. And it was – it's reasonable. It's something – it's doable. That and the fact that they offer scholarships.

**Researcher:** Yeah, that's great.

**Parent #9:** So, no matter how minimal the scholarship was, it's still helpful, because childcare is expensive. So – and my son goes there full time, right now, for – he's in – well, you know this: he's in Ann's class. But he – I feel he is an advanced learners in some ways, and I really wanted him to be in a class where they could work with him. ____ he's starting to read, and he just turned five, and I really wanted a place where they would nurture that.
Researcher: Yeah. Yeah, that’s great.

Parent #9: So – because I can’t do that on my own.

Researcher: And then next – I guess we’ve sort of touched on this already, but just: how would you describe a quality preschool program?

Parent #9: Mmm. Well, teaching the whole child; flexibility in daily schedules, according to a child’s needs. I’m not about letting a kid run the program, by any means, because it would be utter chaos, but definitely letting kids sort of guide a daily schedule is helpful, I think, because it gives them a choice, and it minimizes behavior issues and, I mean, they’re still learning how to communicate. So, I think that that flexibility is really important.

What else? Qual – the – repeat the question for me, so [inaudible due to crosstalk]

Researcher: Oh, sorry. Yeah.

Parent #9: [Inaudible due to crosstalk and breaks in audio]

Researcher: Just sort of how you describe a quality preschool program.

Parent #9: Mmm. Integration of the arts, which they have, because of visual literacy in early learning. I think that’s really important. Inclusion and a multicultural approach to learning is really important because it teaches tolerance. Oh, gosh. I think you get what you pay for. Parents want cheap, but ultimately we get a kickback on our taxes, too, so I’m not going to complain too much. And if it means that I pay $200 more a month for a good program, as opposed to an in-home program that may not have as many staff members to work with the kids or, like I said, a chain, where they could offer childcare cheaper, I would definitely pay more for more one on one with my kid.

And – have not had problems getting them to go there, and it’s amazing to me, because the program we were with in Colorado was a small nonprofit, and my daughter threw tantrums before going to school every day. She hated it. And I – our hands were tied, because there weren’t a lot of options for us, and with schedules and teaching and – it was really hard. And it’s hard to see your kids go through that.

So, they were both – my daughter went there for four months, and – no, six months; sorry. And my son is still there, two years later. And we love it.
Communication with parents is also key. I am shocked at – I mean, they do so much, already, during the day, but Ann e-mails at least three times a week ___ ___ with blog postings; with pictures; with personal e-mails or updates or – it’s just – the work that she does, above and beyond – yeah, it’s amazing to me. And it’s so important, because I can’t be there. So – and every parent wants that; wants to know those little details that their kids [inaudible due to crosstalk] – it’s really – it’s amazing.

I don’t know what other centers you’ve been at or where else you’re gathering information from, but this school is – it’s a gem.

Researcher: That’s awesome. I’m glad you feel that way. Yeah, the only ones I’ve looked at were co-ops, so: Chancellor Street and Molly Michie are the ones that I’ve interviewed people at.

Parent #9: And those were the other ones that I looked into.

Researcher: Really? Yeah.

Parent #9: Yeah. And Molly Michie was one of those places: like, "Oh, it’s co-op." I need time away from my children, so that I can [inaudible due to crosstalk] – job, and it’s only part time. And that – and I have heard amazing – and Chancellor Street, too – amazing things, but it’s not – it wasn’t – it’s not enough time. ___ ___ ___.

Researcher: Yeah, it definitely is a very specific market.

Parent #9: Yeah.

Researcher: Parents who have flexible schedules.

Parent #9: And there are a lot of people that can do that, here: a lot of moms that just need a few hours every morning to get stuff done. So, there’s a niche, but it’s Charlottesville, too. I don’t know if you’re from here?

Researcher: I am, yeah.

Parent #9: ___ ___ ??

Researcher: Yeah.

[conversation about schools excluded – parent teaches at researcher’s former school]

Parent #9: Well, good luck with your –
Researcher: Thank you.

Parent #9: – your –

Researcher: Thank you. I just have one more question, which is just if you think that – is one of your kids already in kindergarten, or –

Parent #9: So, my daughter, Harper, is in first grade; she goes to Venable.

Researcher: So, the question –

Parent #9: ___ ___ ___ –


Parent #9: No, no, no. Griffin’s the – he’s the one at CBI still.

Researcher: Okay. Okay. So, I’m just curious if you think that your daughter was ready and that your son will be ready for kindergarten.

Parent #9: Yes. She was more than ready. In fact, we had a really hard time deciding whether or not we would send her to CBI for kindergarten or put her in public schools, and ultimately it just came down to: she’s going to have to make the transition in first grade, and all these kids are going to know each other.

Researcher: Yeah, that’s true.

Parent #9: It’s going to be that much harder. And next year, Griffin will be – he’ll do kindergarten in the public schools, so he’ll know their system and how the schools work, because it’s so different in city schools, compared to CBI kindergarten. So, he – and he is going to be prepared. No doubt.

Researcher: Good.

Parent #9: In fact, I teach a bunch of kids who went to CBI, and they’re now –

Researcher: Really?

Parent #9: – yeah – they’re now –

Researcher: That’s fun.
Parent #9: - *kindergartners* at my schools. And they are probably – I would have to say – the more advanced kids.

Researcher: You think? All right.

Parent #9: Yeah. And they’re definitely – they’re free thinkers, but they’re more articulate in communicating their ideas; they are, I think, more adept at sharing opinions, because of the way that CBI is structured; and they’re very confident, confident little people – for such a young age. Yeah, so it – they have a model there that’s working, and it’s working well. So, the kids thrive.

Researcher: That’s great.

Parent #9: Yeah.

Researcher: Well, that was all my questions. Thank you so much for –

Parent #9: Okay.

Researcher: – sending this in and –

Parent #9: Yeah.

Researcher: – *enduring* –

Parent #9: No problem.

Researcher: – the questioning.

Parent #9: Good luck.

Researcher: Thank you.

Parent #9: *Lots and lots* of luck. If you need anything else, let me know.

Researcher: Okay. Yeah. And let me know if you have any questions or anything like that.


Researcher: Yeah. Thank you.

[Goodbyes]
Parent #10

Researcher: So, the first question is just sort of: why did you decide to send your child to a preschool program rather than keeping him or her at home?

Parent #10: When or why?

Researcher: Why.

Parent #10: Oh. Why not keep her at home? Well, first of all, just practically, I'm a graduate student, and so I needed to be able to do ___ ___ pursue other life projects besides just mothering. And I think that the socialization process that one gets in preschool is quite important, actually, so ...

Researcher: And then how did you go about getting information about you options for preschool programs?

Parent #10: Well, my husband and I both happen to be Jewish, so I ___ just sort of had a sense that the kind of – the Jewish preschools that are run out of more progressive synagogues or Jewish community centers ___ ___ tend – or at least traditionally – tended to have play-based programs that – actually, I attended a Jewish community center preschool, as a kid, and I just – I went – I was curious about preschool – different options, and I went to view, like, a Montessori program in the area, just out of curiosity and was really terrified by what I saw there.

Researcher: Really?

Parent #10: So, I just liked the play-based approach, and ___ ___ a combination of kind of our cultural – our kind of – what I would say are our cultural needs and kind of pedagogical approach.

Researcher: Okay. Yeah. So, you knew about CBI because you go to the synagogue?

Parent #10: Actually, we're not synagogue members, but I just – that's the only place in – that's the only Jewish preschool in this area. So I went there to look at it, and I talked to the director, and I felt comfortable there, and I knew other – from being in the university community, I knew of other people whose kids had gone there, like, in pre – who were, like, now older children.

Researcher: And then when you were – I mean, you've sort of already touched on this, but did you feel like you had family and friends who were knowledgeable and helpful about preschool options?
Parent #10: Not friends, but just sort of people in the university community that I'd come across. So, our families are not based in this part of the world.

Researcher: Okay. So, I guess I'm wondering how you sort of sought out people in the UVA community. Did it sort of just happen when you had conversations, or were you actively looking for parents?

Parent #10: Oh, no, I wasn't actively looking ___ ___ people like one of my dissertation committee members – his kids had gone there, and he's pretty active in the synagogue, and when I was – like, earlier in my grad school experience, I had TA'd for someone who – at the time, her kid – her youngest kid was going there. So I'd sort of heard about it in that way. I wouldn't say that I actively sought out their opinion. And I'm just trying to think where else I got information.

I mean, also, we happen to live in Belm – I don't know if you're familiar with Charlottesville, but we live in Belmont, and I –

Researcher: Yeah, yeah.

Parent #10: – ___ – we're a one-car family, and so I like the idea of being able to walk –

Researcher: Right. Yeah, that's great.

Parent #10: – [inaudible due to crosstalk and breaks in audio]

Researcher: That's great. Okay.

Parent #10: And a lot of the other options around here – I mean, besides Montessori – at that age, Waldorf – she started when she was, like, too young for the Waldorf program, I guess. And that age that she started at – there weren't a whole lot of options for preschool, because she started at – let's see. She was born in March 2010, and so she started in September, when she was two and some months – I don't know; you could do the math – [laughter] – so, she –

Researcher: So, you were looking for something where she could start when she was two?

Parent #10: Yeah, like a two-year-old room. And there's actually not a whole lot of them, so [inaudible due to crosstalk] church preschools were out, and I didn't like what I saw at Montessori. And then the cooperative preschools required too much parental time, ___ ___ ___ wanted to ___
__. So, that was kind of – maybe there were other options. Oh, I looked at the international school here. I didn’t like __.

**Researcher:** Yeah. So, I guess –

**Parent #10:** I’m trying to remember __ –

**Researcher:** – when you were looking –

**Parent #10:** – [inaudible due to crosstalk and break in audio]

**Researcher:** – for those options, did you sort of like look online, or maybe you’d heard of them and then you went to visit, or – I don’t know.

**Parent #10:** I think it’s a combination. Like, anyone who goes out anywhere with small kids in Charlottesville and is remotely social, like, encounters people whose kids go to preschool and will tell you what they think about those pre – kind of – that’s what parents talk about. Parents don’t talk about interesting things like politics or [laughter] social theory. They just talk about boring shit like preschool – you know [inaudible due to laughter] – but, like, that’s what parents talk about here. And so you get – you sort of get that if you’re in any kind of social context here. That’s what people talk about, kind of ad nauseam.

And I think I looked – so, when people told me about stuff, then I would, like, Google it and look at the preschool’s site – sort of thing. So, like, if someone said, "Oh, yeah, you should look at" – like, ___ ___ someone whose kids went to Waldorf, I looked at their website. I actually didn’t ever visit there, but I checked out things in that way. Like, so I didn’t go first to websites; I think I went – people said, "Oh, the international school is in your neighborhood ___ ___.”

**Researcher:** Okay. Yeah, that makes sense. So, I guess you probably would have mentioned this already, but did you find any resources that were especially helpful besides other parents, like a website or an agency or anything like that?

**Parent #10:** Other resources, like, besides website and parents?

**Researcher:** Yeah. I guess I was just thinking, like, if there were some third party that put out a list that you used or something.

**Parent #10:** Not in Charlottesville. We almost moved to L.A. last year – ___ ___ from L.A. And so there, I did look – she was actually signed up to go to a Jewish preschool in L.A., and then at the last minute, we stayed in
Charlottesville; we didn’t go. But, so, there, there is more – like, **once the** Jewish community **there’s a** more extensive kind of online resource, and there’s kind of more sites that do, like, ranking. And I sort of started with that ___ because I don’t have as many contacts in L.A., but I did eventually just email people that I’d actually gone to high school with, who were involved in the Jewish community, to get their sort of like: "what’s really going on." [Inaudible due to crosstalk] But I’m a researcher at heart, so [inaudible due to crosstalk and laughter] –

**Researcher:** Yeah, I understand that.

**Parent #10:** – research.

**Researcher:** So, then, what factors were the most important when you were choosing a program? I guess –

**Parent #10:** I guess –

**Researcher:** – already, of course –

**Parent #10:** – I would say –

**Researcher:** – you’ve touched on this, but –

**Parent #10:** – yeah, the quality of care, slash, pedagogical approach. I wasn’t totally, like, "It must be a Jewish preschool," but I liked the idea, like, if that worked out – that combination. Just the feeling that I got when I walked in there and spent some time was important to me. A lot of childcare facilities just feel really icky [inaudible due to laughter] – there’s just something – I don’t know if you’ve been to, like, the old ABC Childcare.

**Researcher:** I haven’t, yet, no.

**Parent #10:** I just wonder if they’ve moved their building, but I remember going in there and just thinking, like, this – I mean, nothing bad about the parents who send their kids there, but just, like – I just couldn’t do it. I was like, "___ ___ ___.”

So, at CBI, there was a boy wearing, like, a lavender tutu the first time I walked in there. He was, like, just coming out into the hallway. I was like, "Oh, yes. This is a place I could see my child." Like, if they’re willing – if this is Virginia and the South, and they’re willing to let this kid run around in a lavender leotard, then, "Yes. That’s the right place for us." You know?
Researcher: Yeah. Yeah, that makes sense.

Parent #10: So, other factors? I suppose on some level I also knew that ___ ___ __ Jewish ____ I’d probably get more help from grandparents, so that’s, of course, another factor.

Researcher: Okay. And I guess this is a very related question, but how would you describe a quality preschool program?

Parent #10: I think it has some overall vision, mission – of what it’s trying to do, and its director has kind of the leadership abilities to make that happen on different levels or to help – I think a quality program has high retention. Like, staff retention is really key. Preschool’s obviously not a place that pays very well, so people are there – there are some – a lot of childcare centers – people will openly admit to you that they’re there because they can’t find anything else to do. And you don’t want someone taking care of your kid all day who sort of, on some level, resents that that’s where they ended up in life. So, I think teacher retention says a lot.

Quality programs? I think the ratio – the child/provider ratio – is important. I think the two things that CBI is probably lacking: I think facilities – they’re doing the best they can. They’re sort of – they have some limitations there, facility-wise. And so I would say that that’s – that can add to it, but it’s not necessarily, like, the number one thing.

Researcher: And our last question is just sort of: do you think that your child is going to be ready for kindergarten?

Parent #10: Yeah, absolutely. But I’m one of those people who thinks it’s a whole bunch of bullshit if you, like, try to teach your kids to read and write when they’re three and that that’s, like, why – if that’s why people are sending them to preschool, well, then, I just feel sorry for the kid, really, ___. And that’s a reason why most of the preschools that I’d heard about were not even on the radar for me, ’cause if they were – and actually, when I saw – her class is actually doing some pre-literacy things, which I think is bullshit, but [inaudible due to crosstalk] I think they’re just trying to curb parent anxiety.

Researcher: Yeah.

Parent #10: So I ____ of it, they were like, "We need this so people don’t freak out."
Researcher: All right. Well, that’s pretty much it. Obviously, feel free to let me know if you have any questions or want to see the results or anything. And thank you so much for your time. This was really helpful.

Parent #10: Sure. Have you had difficulty finding other parents to talk to?

Researcher: No, not really. CBI has been really helpful; Chancellor Street was really helpful, too; and Molly Michie Preschool was helpful, too. I’m trying to get sort of more of a representative sample, so it has been more difficult finding lower-income parents to talk to, but –

Parent #10: Uh-huh.

[...]

Researcher: – evening, and ___ ___ –

Parent #10: [Inaudible due to crosstalk]

Researcher: – let me know if you have any questions.

Parent #10: Okay, sure. Okay –

Researcher: Thanks again.

[Goodbyes]

Parent #11

Researcher: So, I’m basically just going to ask you to expand on your answers or sort of talk about them out loud. So, the first question is the same as the survey: just why did you decide to send your child to a preschool program rather than keeping him or her at home?

Parent #11: I would say two primary reasons: one, for the socialization and enrichment of participating in a preschool program; and two, both my wife and I work.

Researcher: Okay. And then how did you go about getting information, when you were looking for options of programs?

Parent #11: We came from out of state, and so I – and I’m on – I joined the faculty at UVA. So I called and spoke with colleagues of mine who I knew had young kids and just kind of got a word-of-mouth sense of what some
of the schools were and then spoke with the director at CBI and kind
of thought highly of that interaction. My wife came to visit and
thought highly of the school. And that's how we chose it.

Researcher: Okay. So, I guess this isn't super relevant, since your friends and
family weren't in the area, but did you feel like they would be helpful
when you were making a decision – or your –

Parent #11: Who? I'm sorry.


Parent #11: Mmm – oh, I m – yeah, I don't think it's relevant. We just weren't in
the area.

Researcher: But you felt, I guess, like your colleagues were good sources of
information?

Parent #11: Yes – the ones who had young kids. I mean, they identified a few
different preschools for us to consider, and then we explored from
there.

Researcher: And when you explored, did you sort of look online or call the
programs or –

Parent #11: Could you say that again?

Researcher: And when you say you explored from there, do you mean you sort of
looked online, or did you contact the programs directly?

Parent #11: We did, I guess, a combination of things. We looked online; we talked
to the directors if it seemed interesting from there forward; we made
a point of visiting a couple or a few of the programs that seemed to be
a good fit. We found it – we found out that the – that CBI, the one that
we most wanted to send our kids to – that they got in pretty early in
the process, so that probably limited the scope of our search, had we
not gotten in.

Researcher: And it sounds like this is not true, but did you find any resources that
were especially helpful from a third party, like a website or an agency
of some kind?

Parent #11: No.
**Researcher:** Okay. That’s pretty much the answer I’ve always been getting. And then what factors were the most important, when you were choosing a program?

**Parent #11:** I would say the – our own observations of the children interacting with each other and with the teacher; our sense of the director and how she ran the place. It’s a – CBI is at the Jewish congregation. Our family is Jewish, so that certainly was a factor, because it was a – it was a strong factor, because we thought it would be a good way to connect with other Jewish families in Charlottesville. It’s centrally located, so – easy to get to.

**Researcher:** Yeah, that’s a great location. And then sort of a related question is what – how you would describe a quality preschool program.

**Parent #11:** It’s a good question. I don’t know that I really think I know the answer. I think that in our case, we think very – we kind of appreciate the way the teachers communicate with the children; we appreciate the other children who are at the school and their – and the way that their parents interact with them.

But at the end of the day, we’re there basically at drop-off and pick-up and occasionally at other times, and the fact that both of our kids really like being there and have developed strong friendships – for us, that’s – those are the main considerations. We like the values that the school, I think, instills in the children, around honesty and caring for one’s community and giving back to those who are less fortunate. I’d say those are our primary considerations, much more so than the extent to which they’re preparing them to read or write or do well academically.

**Researcher:** So, then, the last question is just: do you think your child will be ready for kindergarten?

**Parent #11:** Our daughter is in kindergarten at CBI. I think – so, I guess I think of it in terms of whether she’ll be ready for first grade, so to speak, or he’ll be ready for kindergarten. I think my wife and I tend to both take a pretty holistic view of this: that we care about them being happy and healthy and well rounded. And I think unfortunately a lot of elementary schools have evolved to a fairly narrow definition of academic readiness, and we’re not too focused on that. So long as they are curious and have good interpersonal skills and good values, we’re going to be happy.

**Researcher:** Okay. Great. Well, those are all of my questions. Definitely feel free to let me know if you have any questions or you want to know anything
more about my research or anything. And thank you so much for your time. It’s been really helpful.

Parent #11: Okay. My pleasure. Good luck with your project.

Researcher: Thank you. Have a nice evening.

Parent #11: Bye.

Appendix F. Variable codebook for survey data.

Program – did parent use some sort of childcare arrangement (binary measure; 1=yes, 0=no)

Internet – how much parent used Internet or providers to research (ordinal measure, 1=very little, 7=a great deal)

elem – how much parent used info from elementary school to research (ordinal measure, 1=very little, 7=a great deal)

friends – how much parent used info from friends and family to research (ordinal measure, 1=very little, 7=a great deal)

prior – how much parent used prior knowledge of programs (ordinal measure, 1=very little, 7=a great deal)

location – how much parent used location as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

reputation – how much parent used reputation as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

hours – how much parent used hours as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

diversity – how much parent used diversity as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

curriculum – how much parent used curriculum as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

religion – how much parent used religion as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

cost – how much parent used cost as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)
teacher – how much parent used teacher quality as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

assoc – how much parent used past association with program as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

parent – how much parent used parent involvement as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

other – how much parent used another factor as a factor in the decision (ordinal measure, 1=very little, 7=a great deal; 98=not checked, 99=checked)

othername – specified other factor (text)

totalyears – total number of years of preschool education (out of ages 2-5, if listed programs)

age2 – program attended at age 2

age3 – program attended at age 3

age4 – program attended at age 4

age5 – program attended at age 5

quality – is the program high quality? binary measure of quality, given to public program and programs accredited by NAEYC or VSQ! (1=quality, 0=not)

eligibility – does parent think his/her child would be eligible for public program? (1=yes, attended, 2=yes, applied, 3=maybe, 4=probably not)

ccsinterest – parent interest in public program if it were not means tested (1=yes, 2=maybe, 3=probably not)

notaware – parent was not aware of public program (binary measure, 1=not aware, 0=aware)

fliers – parent heard of public program through fliers (binary measure, 1=yes, 0=no)

internet – parent heard of public program through Internet (binary measure, 1=yes, 0=no)

AD (duplicate variable name, intended “friends”) – parent heard of public program through friends, family, neighbors (binary measure, 1=yes, 0=no)

AE (duplicate variable name, intended “elem”) – parent heard of public program through elementary school (binary measure, 1=yes, 0=no)

AF (duplicate variable name, intended “other”) – parent heard of public program through other means (binary measure, 1=yes, 0=no)
AG (duplicate variable name, intended “othername”) – specified other means of hearing of public program

school – name of elementary school child will be attending

location1 – binary measure, 0 = location is not a factor (1,2,3, 98 of “location” variable), 1 = location is a factor (4,5,6,7,99 of “location” variable)

reputation1 – binary measure, 0 = reputation is not a factor (1,2,3, 98 of “reputation” variable), 1 = reputation is a factor (4,5,6,7,99 of “reputation” variable)

hours1 – binary measure, 0 = hours are not a factor (1,2,3, 98 of “hours” variable), 1 = hours is a factor (4,5,6,7,99 of “hours” variable)

diversity1 – binary measure, 0 = diversity is not a factor (1,2,3, 98 of “diversity” variable), 1 = diversity is a factor (4,5,6,7,99 of “diversity” variable)

curriculum1 – binary measure, 0 = curriculum is not a factor (1,2,3, 98 of “curriculum” variable), 1 = location is a factor (4,5,6,7,99 of “curriculum” variable)

religion1 – binary measure, 0 = religion is not a factor (1,2,3, 98 of “religion” variable), 1 = religion is a factor (4,5,6,7,99 of “religion” variable)

cost1 – binary measure, 0 = cost is not a factor (1,2,3, 98 of “cost” variable), 1 = cost is a factor (4,5,6,7,99 of “cost” variable)

teacher1 – binary measure, 0 = teacher quality is not a factor (1,2,3, 98 of “teacher” variable), 1 = teacher quality is a factor (4,5,6,7,99 of “teacher” variable)

assoc1 – binary measure, 0 = past association with program is not a factor (1,2,3, 98 of “assoc” variable), 1 = past association with program is a factor (4,5,6,7,99 of “assoc” variable)

parent1 – binary measure, 0 = parent involvement is not a factor (1,2,3, 98 of “parent” variable), 1 = parent involvement is a factor (4,5,6,7,99 of “parent” variable)

other1 – binary measure, 0 = there are not other factors (1,2,3, 98 of “other” variable), 1 = there are other factors (4,5,6,7,99 of “other” variable)

eligibility1 – binary income estimator: 1,2,3 of eligibility=1, 4=0

school1 – number corresponding to elementary school will attend

Internet0 – did parent use Internet? binary measure of Internet use for research (0= 1,2,3 of “Internet” variable, 1=4,5,6,7 of “Internet” variable)

elem0 – did parent using elementary school information? binary measure of elementary school information for research (0= 1,2,3 of “elem” variable, 1=4,5,6,7 of “elem” variable)
friends0 – binary measure of using friends and family for research (0= 1,2,3 of “friends” variable, 1=4,5,6,7 of “friends” variable)

prior0 – binary measure of using prior knowledge (0= 1,2,3 of “prior” variable, 1=4,5,6,7 of “prior” variable)

surface – number of surface factors indicated in binary scale (location, hours, cost)

environment—number of environmental factors indicated (reputation, diversity, religion, parent, assoc)

academic – number of academic factors indicated (curriculum, teachers)

CCS – did child attend public program? binary use of CCS (1=1 in “eligibility” variable; 0=2,3,4 in “eligibility” variable)

elemincome – free/reduced lunch percentage of neighborhood elementary school

totalfactors – count variable of total factors considered (using binary measure), except “other”

quality3 – what level of quality was the highest quality program the child attended? 3-step scale of quality determined based on accreditation and curricula (1=high quality, 2=medium quality, 3=low quality)

quality4 – what level of quality was the highest quality program the child attended, besides the public program? same 3-step scale only for those using a program other than CCS at some point (1=high quality, 2=medium quality, 3=low quality)

qualitynew – “quality3” variable but with flipped scale so that regression results make more intuitive sense (3=high quality, 2=medium quality, 1=low quality)

preCCS – “quality4” variable but with flipped scale so that regression results make more intuitive sense (3=high quality, 2=medium quality, 1=low quality)