



**Racial and Ethnic Differences in
Welfare Leavers' Child Care Preferences:
A Factorial Survey Analysis**

A report prepared for the
William Penn Foundation and the Claneil Foundation
by the
Family and Children's Policy Collaborative

Anne Shlay
Marsha Weinraub
Michelle Harmon

April 2007

Family and Children's Policy Collaborative (FCPC) is a collaboration between Marsha Weinraub, Developmental Psychologist and Anne Shlay, Urban Sociologist and their research teams at Temple University to provide research on public policy issues related to children and their families. Formed in 1996, FCPC conducts evaluations of statewide, regional, and neighborhood-based programs. Many evaluations have centered on programs designed to improve the quality of child care in low and moderate income communities. Additionally, FCPC has investigated the effects of welfare reform and child care subsidies on low-income families. Findings from the child care research conducted by the FCPC have been presented at local, regional and national conferences. Reports have been published in prestigious academic journals.

Acknowledgments

“Racial and Ethnic Differences in Welfare Leavers' Child Care Preferences: A Factorial Survey Analysis” represents research conducted by the Family and Children’s Policy Collaborative at Temple University. We thank the William Penn Foundation and the Claneil Foundation for their generous financial support to conduct this research.

We are indebted to the members of our study advisory board, Harriet Dichter, Amy Gendall, Mary Graham, Louise Hayes, Natalie Martinez-Oliver, Giovanni Morante, Sharon Ward, Anne Rahn, Terry Shaner, Ebonnie Simmons-Hall, Natalie Sondheimer, and Peter Zurflieh for their strategic and thoughtful counsel.

We thank Helen Marie Rosenbaum for assisting in the design of the vignette instruments, Joe Jupin for programming vignette construction and the data entry system, and Melissa Correa for scheduling and administering lab visits. In addition to assisting in the administration of the factorial survey instruments, we thank Natalie Liepinis, Nicole Hamilton, Sharlene Hubert and Dareese Tolson for dedicated data management and entry.

We give special thanks to the parents who gave of their time so generously to be part of our study.

The factorial survey technique was invented and pioneered by the late Peter H. Rossi, who died in October, 2006. Many of the methodological techniques used in this research originated with him. Over the years, we have benefited greatly from his guidance in conducting factorial survey research. This is the first factorial survey analysis we have conducted without having him and he is sorely missed. We hope that this research lives up to the rigorous standards that defined his long and productive research career.

This research was funded by a grant from the William Penn Foundation (#62-04) and the Claneil Foundation.

Racial and Ethnic Differences in Welfare Leavers' Child Care Preferences: A Factorial Survey Analysis

EXECUTIVE SUMMARY

This study focuses on revealed preferences for child care by race and ethnicity. Employing the factorial survey technique, this research examines what a recent sample of welfare leavers want most from different child care settings.

The factorial survey technique is a method used to assess how people evaluate multidimensional phenomena free from real-world constraints (Rossi and Anderson, 1982). This method permits a simultaneous assessment of how respondents evaluate and make tradeoffs among multiple characteristics.

This research compares child care preference structures across Hispanic, White and African American samples. It also assesses whether parents' child care preferences correspond with contemporary public policy initiatives used to advertise and inform parents of the quality of particular child care settings.

Design and Methods

In the factorial survey approach, the vignette is the basic unit of analysis. A vignette is a written description of a multidimensional phenomenon – akin to short story. Factorial survey researchers assemble vignettes by randomly assigning characteristics to each vignette in a way that makes up a coherent description of the phenomenon under study. Then, the researcher analyzes the respondents' overall rating of each vignette as a function of each of the randomly assigned characteristics contained in the vignette. Thus, vignette characteristics are the *independent variables* that influence respondents' vignette ratings – the *dependent variable*.

Vignettes have both “dimensions” and “levels.” A dimension is a discrete variable associated with the phenomenon being studied. A level is the specific value within a dimension. So, for example, the type of child care situation would be a *dimension* of a child care, and family day care, center day care, relative care would each constitute individual *levels* of the dimension types of child care. The factorial survey researcher randomly assigns individual levels within each dimension to each vignette, ensuring that these individual characteristics are uncorrelated and independent of one another in the analyses.¹ Random assignment is a crucial feature of this technique, ensuring that vignette characteristics are uncorrelated with each other. Therefore, vignette descriptions often contain combinations of attributes not typically found within the real world.

The child care vignettes used in this study were constructed to represent the most salient child care dimensions from the perspective of parents and providers, the child care market, and public policy. The structure of the vignette sentences and paragraphs was designed by constructing a flow chart that put together levels within complete phrases, sentences, and paragraphs with appropriate punctuation and syntax.

¹ For a dimension with q levels, each level appears with a probability of 1/q.

One series of dimensions reflect regulatory and public policy dimensions of child care. These include whether a facility is licensed or not, participates in the Pennsylvania Keystone STARS Program, is accredited or not, accepts subsidized children, and whether it conforms to state regulations for child staff ratio. Another series of dimensions focus on activities and behaviors within the child care setting (provider acts like a teacher or parent, provider is warm or strict, the level of individual attention received by the children, level of planned activities and curriculum), the skill set and training of the provider (specialized training, level of experience), teacher characteristics (language spoken, race/ethnicity), amenities within the care facility (computers, cleanliness and safety), and cultural aspects (religious teaching, celebration of holidays). A final set of dimensions describes the racial, ethnic and economic characteristics of the children in the care facility.

Three questions were used to measure parents' child care preferences. The first question assessed parents' perception of child care desirability. The question asked specifically "How much would you like this child care for you and your family?" We assumed that this question about child care desirability also measured parents' definitions of child care quality. The rating scale associated with this question was anchored on a nine-point scale where -4 equaled "dislike very much," 0 equaled "neutral," and 4 equaled "like very much." We refer to this scale as the "desirability rating scale."

The second question addressed what parents considered to be a fair weekly price for the given child care arrangement without regard to its affordability. It specifically asked, "In your view, what would be a fair weekly price for this child care? Please disregard whether or not you could afford the price."

The third question addressed parents' expressions of willingness to pay given their income constraints. This question asked specifically "How much would you be willing to pay per week for this child care?" We asked this question in order to determine the dollar value parents would be willing to pay for varying child care characteristics within income constraints. The rating scale used for the willingness to pay and fair price questions ranged from \$0 to \$200 per week, at \$20 intervals, anchored around a mean of \$100 per week. This reflected the range in the cost of care within the low-income child care market.

We completed the factorial survey with 93 respondents. These included 17 White, 28 Hispanic and 48 African American respondents. Each parent completed a total of 30 vignettes.

We estimated two different types of model specifications using ordinary least squares regression. The first model examined the contribution of each level to the variation in the rating associated with each vignette. For example, it assessed whether family day care is preferred compared to center care, whether licensed care is preferred compared to unlicensed care. This analysis compared the impact of varying levels on child care preferences within each dimension.

A second model specification examined the contribution of each dimension to vignette rating. Using a type of analysis called "coding proportional to effect (Rossi & Anderson, 1982), the standardized coefficients (β) provided an index of the relative importance of each dimension compared to all others.

Findings

Similarities

The findings of this investigation show many commonalities in preferences across parents from different racial and ethnic groups, suggesting much more of a core understanding of what constitutes quality care among different racial and ethnic groups. Although different groups may use different forms of child care, the aspects of child care that parents want appear to be more similar than different.

The primary area of agreement is safety of the care situation. Although White respondents placed less emphasis on safety than African American and Hispanic respondents, they all evaluated care situations negatively that did not guarantee the safety of children. Safety weighed in so heavily in respondents' evaluations that its emphasis may have forced other less important, but salient, child care characteristics to be overlooked. In other words, if we took safety out of the factorial survey descriptions, we might find additional emphasis on other aspects of child care.

Taking safety out of the child care equation, however, is not reasonable, particularly for low-income families. The respondents' emphasis on safety reflects the consensus that no parent would knowingly put their child at risk of being in an unsafe child care setting. Safety remains a crucial child care issue but is particularly salient for low-income families for whom the health and safety of their children is an ongoing child care concern.

Respondents' emphases on the warmth and actions of the provider were a second area of convergence across groups. All three groups rated vignettes higher and would pay more for care if the vignette included a provider who exhibited a warm demeanor. All three groups rated vignettes lower and would pay less for care if the vignette included a provider who did not give the children individual attention.

All three groups viewed state regulations for staff child ratios as important. They also preferred care arrangements and would pay more for providers with experience and who provided planned activities for the children.

Thus, respondents' preferences converged around safety, state regulation about child staff ratios, the planning of activities, and provider warmth and experience.

Yet there were few systematic preferences for any particular type of care. For African American respondents, relative care was worth less than neighbor care but overall, vignettes were ranked neither higher nor lower if they described center care or any other particular type of care, net of the other characteristics described as part of the child care setting. Although previous researchers have suggested that African American families use center care more than other groups and Hispanic families use kith and kin care more than other groups, these type of care choices may reflect different understandings of what additional characteristics each type of care offers. That is, each group may believe that the type of care they use brings with it more safety, more planned activities, legally acceptable staff child ratios, and warm and experienced providers.

Almost uniformly, the race and ethnicity of the other children in care or the provider were not important. Only African American respondents were willing to pay more for care where the provider was also African American. Race and ethnicity were not revealed to be part of a core set of child care preferences for either Hispanic, African American or White respondents.

All three groups emphasized the importance of a Pennsylvania child care rating system named Keystone STARS, although in varying degrees. African American and Hispanic respondents placed the most emphasis on Keystone STARS, and White respondents placed the least emphasis on Keystone STARS. But for all three groups, the Keystone STARS dimension made it into the top ten most important dimensions evaluated. Without any prior explanation about the Keystone STARS program, African American and Hispanic respondents' systematically gave higher ratings for described child care setting that were assigned more stars by this government rating system.

It is important to remember that by design, the number of stars was deliberately not correlated with any other indicator of quality. Nevertheless, respondents tended to rank situations with more stars as more desirable, thought they were worth more, and were willing to pay more for care in child care settings with larger numbers of stars.

At the same time as respondents valued star ratings, respondents from each of the three groups exhibited total and complete indifference to whether a child care situation was accredited. Accredited child care situations were neither more desirable nor worth more, suggesting that accreditation, for this sample, may not appear to be an indicator of quality. Perhaps, our respondents were unfamiliar with how the term accreditation is used to convey the quality of care.

Differences

While there were many similarities in preferences across respondents from the three groups, there were also some differences between the group preferences. African American and Hispanic child care preference structures were more similar to each other than to White preference structures. Both African American and Hispanic respondents valued and would pay more for licensed care as well as for care rated higher by the Keystone STAR Rating System. They also wanted care situations to have computers available. White respondents exhibited overall indifference to the number of stars, to the care situation's licensing status, and to the availability of computers. Overall, African American and Hispanic respondents rated more highly the same child care dimensions suggesting greater commonality between these two groups than between these groups and White respondents

White respondents' preferences stood out from those of Hispanic and African American respondents in some areas. White respondents valued care offered by settings in which they had known the providers for a long time, children learned letters and numbers, and they celebrated holiday traditions of other groups. They were willing to pay more to have their children be in care situations among other low-income children. These characteristics were unimportant to African American and Hispanic respondents. White respondents shared with Hispanic respondents the desire to have their child care be close to where they worked and to have their

care provider accept subsidized children. White respondents shared with African American respondents concerns about what language was spoken to the children in care (not all Spanish).

Although many day care situations are in religious institutions, the teaching of religion in a child care setting was important to African Americans, but not important to Hispanic or White respondents. Only African American respondents ranked vignettes higher if they included religious teaching.

Overall, Hispanic and African American respondents seemed to be more tuned into child care as a system regulated by government than were White respondents. This is suggested by their preferences for care that follows state regulations for staff child ratios, licensing (Hispanic respondents only), and for care that is rated with the Keystone STARS Rating System. Hispanic and African American respondents paid attention to the role of agencies external to the child care environment to establish markers of quality. White respondents gave far less attention to child care characteristics associated with government or regulation.

Conclusion and Recommendations

This research does not support the conclusion that race and ethnicity are a major source of differences in preferences for child care. According to our findings, there is not an idealized Hispanic or Latino model of child care competing against either a White or African American idealized model of child care, at least among low-income welfare leavers. Rather there appears to more consensus around a large number of desired core care attributes.

The greatest commonalities in preferences were between African American and Hispanic respondents. In particular, African American and Hispanic respondents seemed more attentive to issues associated with the regulation of care; they appeared to believe that care associated with regulation or rated by government was more desirable care. They were for, not against, regulated care. Whites were not negative about regulated care, but they were more indifferent to child care dimensions associated with government regulation.

The low level of interest in the type of care (e.g., center care) combined with the strong interest in quality features indicates that people are concerned with quality independent of the type of child care facility. In the uncorrelated vignette world, quality and type of care are unrelated. But in the real world, quality and care type may be related. Parent education may be needed for parents to realize that these features can be separated from type of care and that some types of care – such as center care – can offer some of the qualities that they seek.

Of particular policy significance is the finding that the Keystone STARS Rating System operated as an indicator of quality for respondents. A recent evaluation of the Keystone STARS Rating System showed that it was a reliable indicator of quality (Barnard et al., 2006). The ability to have a government rating system that reliably measures child care quality conveys this information to the public, who then can use this information to make informed child care decisions, is critical because evaluating the quality of care is so difficult for parents. If people are aware of the rating of different care situations, families could more easily make better child care decisions. Our research suggests that a star based rating system represents established markers of quality that can be easily communicated to, and understood by, low-income communities varying by race and ethnicity. This research suggests that disseminating and

advertising star ratings for different child care settings may be used by parents to select higher quality care.

Racial and Ethnic Differences in Welfare Leavers' Child Care Preferences: A Factorial Survey Analysis

Table of Contents

1. Introduction.	1
2. Variations in child care preferences.	3
3. Limitations of prior research.	7
4. Goals of this study.	8
5. Design and methods: The factorial survey method.	9
5.1. Factorial survey instrument design.	11
5.2. Factorial survey questions	22
5.3. Sampling and data collection.	24
5.4. Model.	28
6. Findings.	30
6.1. Child care preferences, fair weekly price and willingness to pay distributions.	30
6.2. Child care preferences, fair weekly price and willingness to pay: Racial and ethnic differences.	33
6.2.1. Child care desirability by race and ethnicity.	37
6.2.2. The fair weekly price for child care by race and ethnicity.	40
6.2.3. Willingness to pay for child care by race and ethnicity.	47
6.3. Child care dimensions by race and ethnicity.	51
7. Discussion.	65
8. Conclusion and recommendations.	69
9. References.	71

List of Tables & Figures

Table 1: Child Care Factorial Survey Dimensions and Levels.	13
Figure 1. The Vignette Tree Structure.	16
Table 2: Sample Child Care Vignette.	21
Table 3: Respondent Characteristics.	26
Table 4: The Frequency Distribution of Responses to Vignette Questions of Desirability.	31
Table 5: The Frequency Distribution of Responses to Vignette Questions of Fair Weekly Price or Willingness to Pay.	31
Table 6: The Impact of Child Care Characteristics on Child Care Desirability by Hispanic, White and African American Welfare Leavers.	34
Table 7: The Impact of Child Care Characteristics on Fair Weekly Price by Hispanic, White and African American Welfare Leavers.	41
Table 8: The Impact of Child Care Characteristics on Willingness to Pay by Hispanic, White and African American Welfare Leavers.	48
Table 9: The Impact of Child Care Dimensions on Child Care Desirability for Hispanic, White and African American Welfare Leavers.	53
Table 10: The Impact of Child Care Dimensions on Fair Weekly Price to Pay for Hispanic, White and African American Welfare Leavers.	56
Table 11: The Impact of Child Care Dimensions on Willingness to Pay for Hispanic, White and African American Welfare Leavers.	59
Table 12: Top Ten Ranked Child Care Dimensions on Child Care Desirability by Race and Ethnicity.	62
Table 13: Top Ten Ranked Child Care Dimensions on Fair Weekly Price by Race and Ethnicity.	62
Table 14: Top Ten Ranked Child Care Dimensions on Willingness to Pay by Race and Ethnicity.	63

1. Introduction

The 1996 Personal Responsibility and Work Opportunities Reconciliation Act (PRWORA) gave child care heightened political centrality by requiring parents with young children who were receiving welfare to enter the labor market. PRWORA ended welfare as an entitlement program. It gave a five year total life time limit for receiving cash assistance and mandated a work requirement after two years of receiving cash assistance. Mothers were now required to enter the labor market in order to continue receiving cash assistance (after two years on welfare) and were terminated from the welfare rolls after reaching a life time limit of five years. To facilitate the employability of welfare recipients and to support the goals of welfare reform, welfare reform legislation made the provision of affordable child care a national policy objective.

With PRWORA, child care subsidies became an important ingredient to the success of welfare reform. Although enacted at the federal level, child care subsidies were administered at the state level. Therefore, understanding the role of child care subsidies in supporting the employment of welfare leavers became an important local area of investigation.

To study child care subsidies and welfare leavers, the Temple University Family and Children's Policy Collaborative initiated a study of welfare leavers in the Philadelphia metropolitan area. Working in partnership with the Pennsylvania Department of Public Welfare and various child care advocacy organizations and with funding from the William Penn and Claniel Foundations, we launched a study to investigate welfare leavers' acquisition and utilization of subsidies, the impact of subsidies on subsequent employment, and the role of subsidies in supporting families

acquiring child care congruent with their preferences for care. In addition, we sought to explore racial and ethnic differences in subsidy use and employment.

Our research on subsidy utilization and its impact on employment is contained in our report *Leaving Welfare for Employment: The Role of Child Care Subsidies for White, Hispanic and African American Families* (Shlay, Weinraub and Harmon, 2007). This report, *Racial and Ethnic Differences in Welfare Leavers' Child Care Preferences: A Factorial Survey Analysis*, focuses on revealed preferences for child care by race and ethnicity. Employing the factorial survey technique, this research examines what a recent sample of welfare leavers want most from different child care settings.

The factorial survey technique is a method used to assess how people evaluate multidimensional phenomena free from real-world constraints (Rossi and Anderson, 1982). This method permits a simultaneous assessment of how respondents evaluate and make tradeoffs among multiple child care characteristics.

This research expands on previous research which pioneered the use of the factorial survey to investigate child care preferences (Shlay, Tran, Weinraub and Harmon, 2005; Tran, Shlay, Weinraub and Harmon, 2004). In our previous research, we determined that the factorial survey technique was a viable method for studying child care preferences. Also, we found that low-income, African American mothers wanted care that mirrored standards similar to those specified by early childhood development experts.

This new research expands on our earlier work in two major ways. First, it allows us to compare preference structures across Hispanic, White and African American samples. Second, it assesses whether parents' child care preferences correspond with

contemporary public policy initiatives used to advertise and inform parents of the quality of particular child care settings.

This report has several parts. The first part examines previous research findings on variations in child care preferences. The second part presents the design and methods associated with this research. The third part presents the study findings. The final part discusses the implications of these findings for policy and future research.

2. Variations in child care preferences

Child care preferences are difficult to disentangle from child care use. On the one hand, people may choose care based on their preferred type of care. In this scenario, people's child care preferences mirror choice. Alternatively, child care choices may be constrained by the child care market (Clarke-Stewart and Allhusen, 2005). People may prefer characteristics associated with child care which are not readily available in the child care market. In this scenario, preferences may differ from child care use because choices are limited by what is provided in the market.

It is also difficult to distinguish child care preferences from child care use because parents uniformly profess to be satisfied with the care they are using (Cryer & Burchinal, 1997; Peyton et al., 2001). Perhaps parents are overwhelmingly satisfied with care even though it is well documented that most child care is of mediocre quality (Fiene, Greenberg, Bergsten, Fegley, Carl, & Gibson, 2002; NICHD Early Child Care Research Network, 1999). Few parents express dissatisfaction with their child care, perhaps because when they are dissatisfied, they quickly alter their child care situation.

But it may also be the case that parents express satisfaction because they are unlikely to express discontent with the care situations of their precious children. Would a

“good” parent consciously put their child in a child care situation that is not to their liking? What kind of parent would knowingly leave their child in what they would consider to be an unsatisfactory situation?

Most important, child care choices are limited by cost. Even for wealthier families, child care costs often seem exorbitant. But for low-income families, child care choices are most severely limited. Child care that is congruent with the preferences of low-income families may be totally unaffordable. Therefore, particularly for lower income families, child care desires may be less likely to be reflected in the actual type of child care they use (Peyton et al., 2001; Pungello & Kurtz-Costes, 1999). Not surprisingly, many low-income families report desiring child care situations that are different from the one they are currently using (Coley, Chase-Lansdale & Li-Grining, 2001; Cryer & Burchinal, 1997; Kisker & Silverberg, 1991; Meyers, 1995; Sonenstein & Wolf, 1991).

Research also suggests that for low-income families, parents’ satisfaction with their child’s care may not correspond to the quality of that care. In the *Three City Study of Welfare, Children and Families*, Coley, Chase-Lansdale & Li-Grining, (2001) compared the observed quality of care to parents’ preferences for, and satisfaction with care. They found that from a developmental perspective, the higher quality child care situations were child care centers; unregulated situations had the lowest quality of care. But parents tended to find unregulated homes more satisfactory, accessible and flexible compared to child care center. Unregulated homes were more supportive of parents than child care centers. In this research, parent’s metric of quality may be different from the quality metric of developmental experts.

These researchers also found differences among low-income child care users. Recent welfare leavers tended to have their children in lower quality care (based on child developmental standards) as well as in care which was less supportive of the mothers. The researcher believe that these findings may speak directly to problems welfare leavers may have in finding good child care.

These findings suggest that recent welfare leavers might have a particularly difficult time obtaining acceptable child care (Coley, Chase-Lansdale & Li-Grining, 2001:5).

Child care preferences may be related to cultural differences in child-rearing beliefs and practices (Early & Burchinal, 2002; Fuller, Holloway, & Liang, 1996; Liang, Fuller, & Singer, 2000). Latino families appear to shy away from formal child care programs and gravitate toward care by relatives or caregivers with whom they are familiar or share similar childrearing attitudes and practices (Capizzano, Adams & Sonnenstein, 2000; Ehrle, Adams & Tout, 2001; Fuller, Hallaway, & Liang, 1996; Holloway & Fuller, 1999). Compared to White families, African American families with preschool-age children prefer care arrangements that emphasize instruction that is didactic rather than play-oriented (Holloway Rambaud, Fuller, & Eggers-Piérola, 1995). African American parents of elementary school students have been shown to be more likely than White families to emphasize the importance and utility of homework, examinations and structured forms of instruction (Stevenson, Chen & Uttal, 1990). Thus, it may be that African American families also place a special emphasis on the educational aspects of child care, believing that these types of experiences are necessary for social and economic advancement (Stevenson, Chen, & Uttal, 1990).

Child care preferences also vary with other family characteristics, particularly maternal education and employment (Hofferth, Shauman, Henke, & West, 1998; Peyton et al., 2001; Pungello & Kurtz-Costes, 1999). Education and employment appear to influence the level of emphasis that parents place on cognitive and social activities provided in care arrangements for children three years old and older (Johansen, Leibowitz, & Waite, 1996). Parents with more education, income and less parenting stress were more likely to emphasize quality when choosing a child care situation (Peyton et al., 2001). Parents with more education tend to view the role of child care as a setting in which preschool-aged children can learn and prepare for the grade-school years (Larner & Phillips, 1994).

Research on child care preferences tends to view parents as discriminating among aspects of care related to their children as the consumers of care; it focuses on children's child care experiences. This child-centered perspective focuses on the how parents evaluate child care as it may affect their children. But child care affects more than children; it affects parents as well. And parents, not developmental psychologists or child care experts, make child care decisions based on what they perceive to be a quality child care situation from their vantage point as busy, working, and economically constrained people. Therefore, another perspective focuses on preferences for characteristics associated with child care that do not directly affect the child. This second perspective views parents as consumers of care and looks at how these non-child specific attributes affect how people evaluate child care situations (Blau, 1991; Peyton et al., 2001). These factors are part of the environmental context in which child care decisions are made (Pungello & Kurtz-Costes, 1999).

For example, parents may prefer and make decisions about care based on location, cost, access to transportation and other features associated with the parents' ability to access the care and get their child in and out of the facility. While parents' desires for accessibility, convenience and affordability may coincide with their desires for child care features associated with child care quality, they also may not. Some research suggests that choice of care for its non-quality related features may be influenced by family characteristics; one study found that child care choices based on "practical" reasons (child care fees, hours of operation, location and availability) over quality reasons were influenced by family income as well as the level of parenting stress within the household (Peyton et al., 2001). Moreover, if quality child care situations are inaccessible, unaffordable and inconvenient, they may not be realistically available. How parents as consumers of care evaluate child care based on their budget and transportation requirements is important to establishing the critical features associated with the child care bundle (Blau, 1991).

3. Limitations of prior research

Contemporary knowledge of how parents evaluate child care quality is limited in three ways. First, findings on child care preferences reflect the child care market. Child care preferences reflect real world market constraints. What parents want from child care independent of what the market offers and deems possible is not clearly understood.

Second, parent child care decision-making reflects trade-offs among different child care characteristics. Parents may give up some characteristics that they consider to be important because of the presence of others that they view as more important.

Traditional survey research cannot assess how people make trade-offs among different child care characteristics.

Third, child care is a multidimensional phenomenon. The many dimensions of child care are often found in predictable packages and there is a high correspondence between the presence of particular bundles of characteristics (e.g., educated providers, child care centers, books and equipment). Therefore, expressed preferences for one characteristic (e.g., center versus home-based care) may proxy for preferences for other characteristics (e.g., education versus play activities).

4. Goals of this study

This study investigates child care preferences by taking into account these limitations of prior research. First, it asks parents to evaluate simulated child care arrangements in which the child care characteristics are organized together in unpredictable packages and are uncorrelated. Second, it allows parents to make trade-offs among different child care characteristics and permits research that measures and compares the values placed on each characteristic. Third, these simulated child care environments account for the multidimensional nature and complexity of real world child care facilities. This study employs the factorial survey technique to assess recent welfare leavers' child care preferences by race, ethnicity, and child care use.

It addresses the following questions. When divorced from real world market constraints, do child care preferences vary by race and ethnicity? Do child care preferences abstract from the market mirror the differences found in actual child care use among different racial and ethnic groups? Do higher levels of center use care by lower income African Americans reflect deeply held preferences for care? Do lower levels of

center care use and higher use of kith and kin care by lower income White and Hispanic households reflect what these families want?

Do families that vary by race and ethnicity have different ways of assessing quality care? Is what defines quality care for African American families the same as what defines quality care for White or Hispanic households.

What are the most important features of care for families and how do these vary by race and ethnicity. What are the specific features of child care that African American families want most, that Hispanic families want most, and that White families want most?

Importantly, this study asks whether preferences for child care are rooted, in part, in cultural differences among White, Hispanic and African American lower income families. The factorial survey method is used to delineate the key factors that influence complex judgments over child care situations.

5. Design and methods: The factorial survey method

To investigate the value placed on varying dimensions of child care, this work employed the factorial survey technique. This technique permits an assessment of preferences that are divorced from real-world market constraints and a comparison of the relative weights placed by families on a wide range of child care characteristics.

The factorial survey technique allows people to make judgments over multidimensional phenomena. People routinely make simple and complex judgments in everyday life. As part of this process, people weigh aspects they think are desirable against those considered undesirable. For example, the purchase of a loaf of bread may depend on the consumer evaluating a number of factors including brand name, past purchase history, date of expiration, fiber content, etc. How a person thinks about this

decision may include all or some of these factors. The factorial survey technique “unpacks” and measures the value of the individual attributes (e.g., brand name) that contribute to a summative judgment.

The factorial survey approach combines the primary strength of an experimental design with the complexity and realism of the survey approach. The experimental design is limited by the number of factors that can be examined. A survey design is limited by the difficulty of separating out competing influences among items that covary together. The factorial survey technique allows the researcher to separate out competing influences among items that covary together across a large number of factors.

In the factorial survey approach, the vignette is the basic unit of analysis. A vignette is a written description of a multidimensional phenomenon – akin to short story. Factorial survey researchers assemble vignettes by randomly assigning characteristics to each vignette in a way that makes up a coherent description of the phenomenon under study. Then, the researcher analyzes the respondents’ overall rating of each vignette as a function of each of the randomly assigned characteristics contained in the vignette. Thus, vignette characteristics are the *independent variables* that influence respondents’ vignette ratings – the *dependent variable*.

Vignettes have both “dimensions” and “levels.” A dimension is a discrete variable associated with the phenomenon being studied. A level is the specific value within a dimension. So, for example, the type of child care situation would be a *dimension* of a child care, and family day care, center day care, relative care would each constitute individual *levels* of the dimension type of child care. The factorial survey researcher randomly assigns individual levels within each dimension to each vignette,

ensuring that these individual characteristics are uncorrelated and independent of one another in the analyses.² Random assignment is a crucial feature of this technique, ensuring that vignette characteristics are uncorrelated with each other. Therefore, vignette descriptions often contain combinations of attributes not typically found within the real world.

The factorial survey technique overcomes the methodological issues stemming from traditional research on preferences. It is not constrained by what is available on the market, it permits people to choose among and rank different child care characteristics, and it allows respondents to determine trade offs among child care characteristics.

This strength of the factorial survey technique, orthogonality and statistical independence, may also be its limitation. Some respondents may be uncomfortable and confused by the unfamiliar combinations offered in the vignette world. Nonetheless, the factorial survey approach has been successfully applied to a range of topics including crime seriousness, definitions of sexual harassment, housing and neighborhood preferences, measures of household prestige, preferences for racial integration, as well as child care (Shlay & Digregorio, 1985; Shlay, Tran, Weinraub, Harmon, 2005; Hunter & McClelland, 1991; Emerson, Yancey, & Chai, 2001; Durham, 1986; Nock, 1982).

5.1. Factorial survey instrument design

Child care dimensions included on the factorial survey instruments were identified through an extensive review of the literature and through focus groups with low-income mothers of young children.

We followed Arthur Emlen's methodological direction in measuring child care quality (1999; 2000). Emlen constructed a scale to measure child care quality from the

² For a dimension with q levels, each level appears with a probability of 1/q.

parent's perspective. The scale consists of eight major dimensions of quality, including caregiver skill level, caregiver's warmth and interest in children, caregiver acceptance and support, richness of the environment and activities, safety of the care giving environment, children's feelings about safety and security, children's social interactions, and level of communication between child care provider and parent. Emlen also included dimensions of child care that affect the ability of families to access child care. These included aspects of care related to child care accessibility (e.g., ease of finding desired child care) and flexibility (e.g., caregiver's willingness to work around parent's schedule).

As suggested by Emlen, Koren, and Shultze (2000), we avoided the use of unspecified, abstract terminology (e.g., "high quality") to describe the levels that made up the dimensions. Instead, we created short, simple and descriptive statements about specific care characteristics. The list of dimensions and associated levels are shown in Table 1 (Pages 13-15).

The structure of the vignette sentences and paragraphs was designed by constructing a flow chart that puts together levels within complete phrases, sentences, and paragraphs with appropriate punctuation and syntax. This flow chart is shown in Figure 1 (Pages 16 - 20). The model structure delineated the placement of both the dimensions and the fixed text that linked the various dimensions together.³ A sample vignette is shown in Table 2 (page 21).

³ The layout (e.g., font, spacing) of the vignette paragraphs was designed to be consistent from vignette to vignette. Only the levels and the associated combinational restrictions were allowed to vary. The levels in each vignette were randomly selected using a custom built program. Analysis of zero order correlations among the levels within the dimensions confirmed orthogonality between each of the levels.

Table 1
Child Care Factorial Survey Dimensions and Levels

Type of Care

1. Type of care
 - a. Center care
 - b. Family day care
 - c. Relative care
 - d. Neighbor care

2. Care Setting
 - a. In your home
 - b. Not in you home

Commute to Work

3. Commute to work is a
 - a. Short distance from your job
 - b. Long distance from your job

Quality

4. License
 - a. Is licensed
 - b. Is not licensed

5. Keystone Stars
 - a. Participates in Keystone Stars, a statewide program that rates the quality of child care provided and received 1 out of 4 stars
 - b. Participates in Keystone Stars, a statewide program that rates the quality of child care provided and received 2 out of 4 stars
 - c. Participates in Keystone Stars, a statewide program that rates the quality of child care provided and received 3 out of 4 stars
 - d. Participates in Keystone Stars, a statewide program that rates the quality of child care provided and received 4 out of 4 stars
 - e. Does not participate in Keystone Stars

6. Accreditation
 - a. It is accredited by s national child care organization
 - b. It is not accredited by a national child care organization

Subsidy

7. Subsidy Acceptance
 - a. Accepts subsidized children
 - b. Does not accept subsidized children

Extended Hours

8. Evening – Weekend Hours
 - a. Offers care during the evenings and weekends
 - b. Does not offer care during the evenings and the weekends

9. Extra Hours of Care
 - a. Can provide extra hours of care on short notice
 - b. [BLANK]

Table 1
Child Care Factorial Survey Dimensions and Levels (continued)

10. Specialized Training in Child Development
 - a. The care provider has specialized training in child development
 - b. The care provider has little training in child development
 - c. [BLANK]

11. Experience
 - a. Care provider/ she has a lot of experience taking care of children
 - b. Care provider/ she has little experience taking care of children
 - c. [BLANK]

12. Warm and Strict
 - a. The care provider/ she is warm and strict
 - b. The care provider/ she is warm and not strict
 - c. The care provider/ she is not warm but strict

13. Teacher vs. Parent
 - a. She acts like a school teacher with the children
 - b. She acts like a parent with the children

14. Attention level to Children
 - a. Children get a lot of individual attention
 - b. Children do not get a lot of individual attention
 - c. [BLANK]

15. Known Care Provider
 - a. You have known the care provider for a long time
 - b. You have known the care provider for a short time
 - c. [BLANK]

16. Language
 - a. The care provider speaks English with the children
 - b. The care provider speaks both English and Spanish with the children
 - c. The care provider speaks mostly Spanish with the children

17. Teacher Race / Ethnicity
 - a. Is the same race/ ethnicity as you child
 - b. Is a different race/ ethnicity from you child

18. Staff-Child Ratio
 - a. Meets state regulations for staff-child ratios.
 - b. Does not meet standard for staff-child ratios

19. Group Size
 - a. The children are in small groups
 - b. The children are in large groups

20. Religious teaching
 - a. Includes religious teaching
 - b. Does not include religious teaching

21. Planned Activities
 - a. There are daily planned activities
 - b. There are no daily planned activities

Table 1
Child Care Factorial Survey Dimensions and Levels (continued)

- 22. Curriculum
 - a. The program emphasizes learning numbers and letters
 - b. The program emphasizes creative play
 - c. [BLANK]

 - 23. Computers
 - a. There are computers for the children
 - b. There are no computers for the children

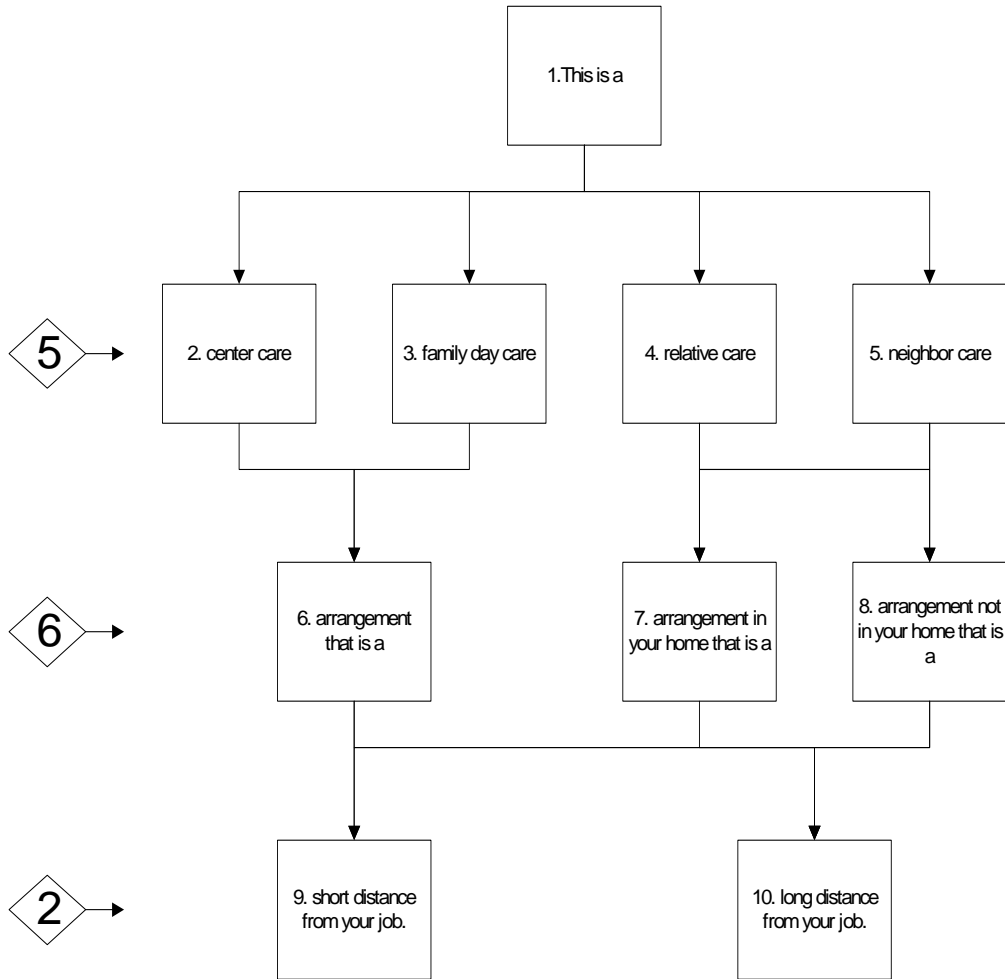
 - 24. Celebration of Holidays and Traditions
 - a. The care provider celebrates holidays and traditions of your own culture
 - b. The care provider celebrates holidays and traditions of many cultures

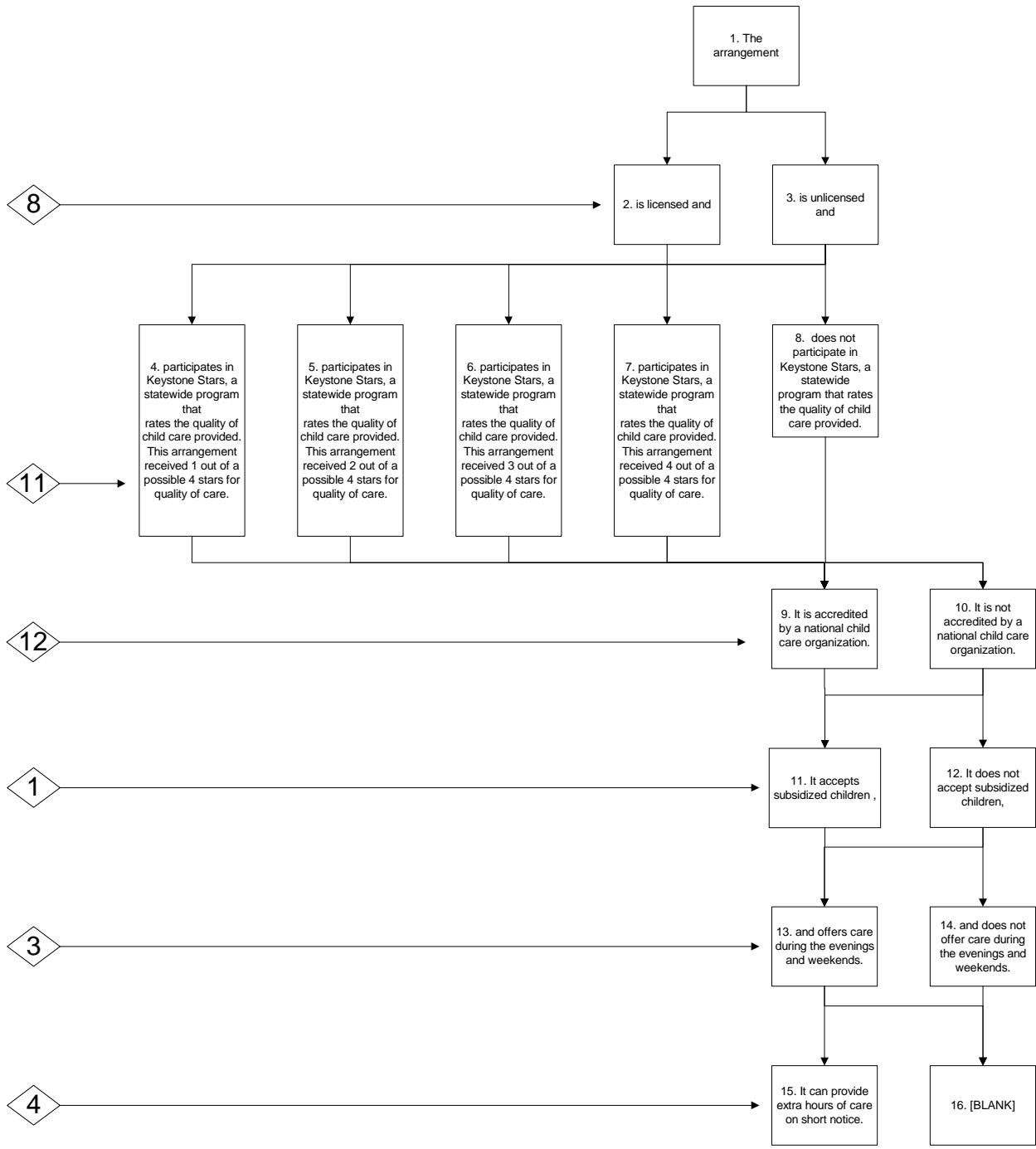
 - 25. Clean and Safe
 - a. The care provider always makes sure that everything is clean and safe
 - b. The care provider does not always make sure that everything is clean and safe
 - c. [BLANK]

 - 26. Child Race and Ethnicity
 - a. The children cared for are mostly white
 - b. The children cared for are mostly African American
 - c. The children cared for are mostly Latino
 - d. The children care for are racially/ethnically mixed

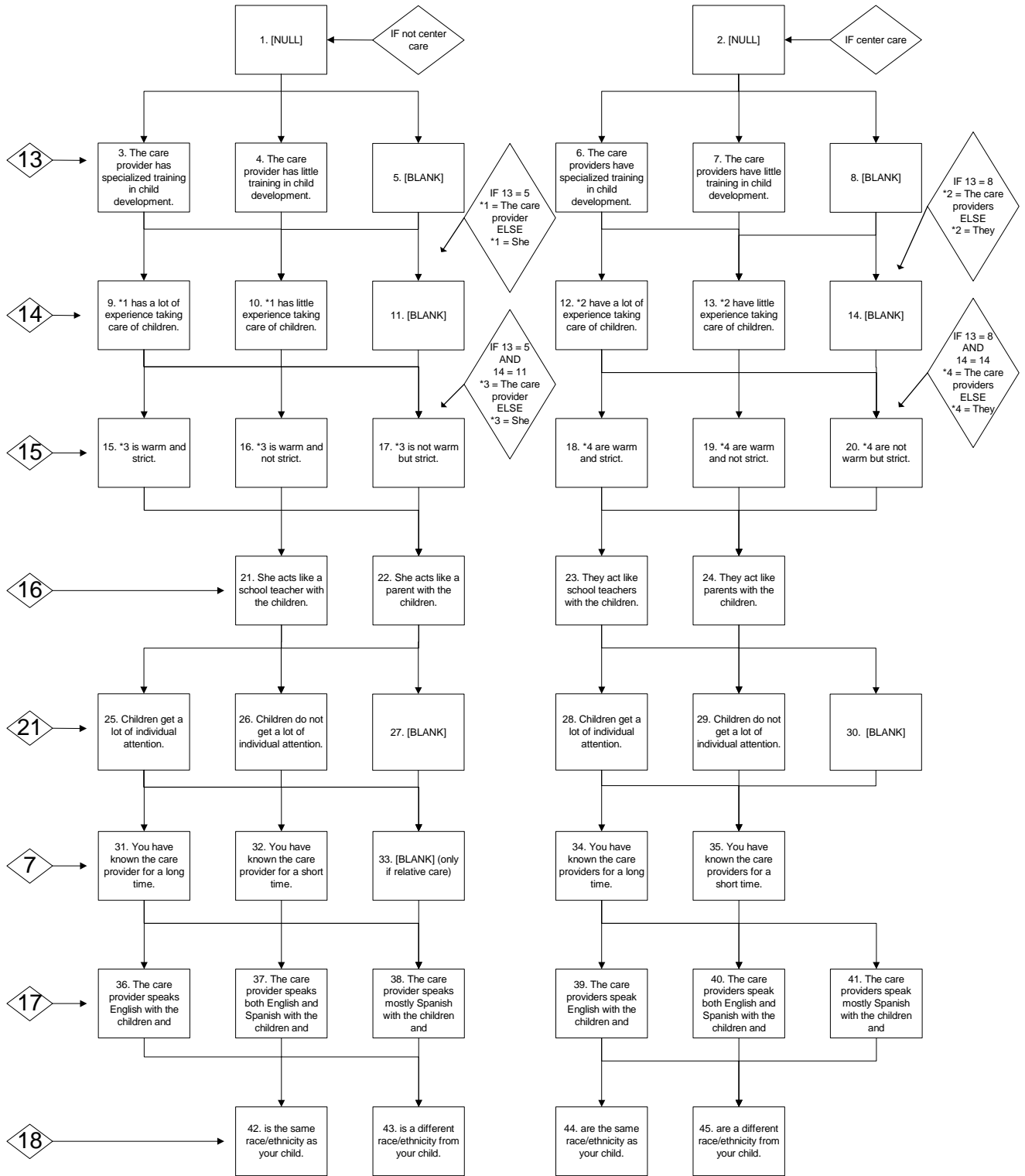
 - 27. Family Income
 - a. The children are mostly a mix of children with low and high income families
 - b. The children are mostly from high income families
 - c. The children are mostly from low-income families
-

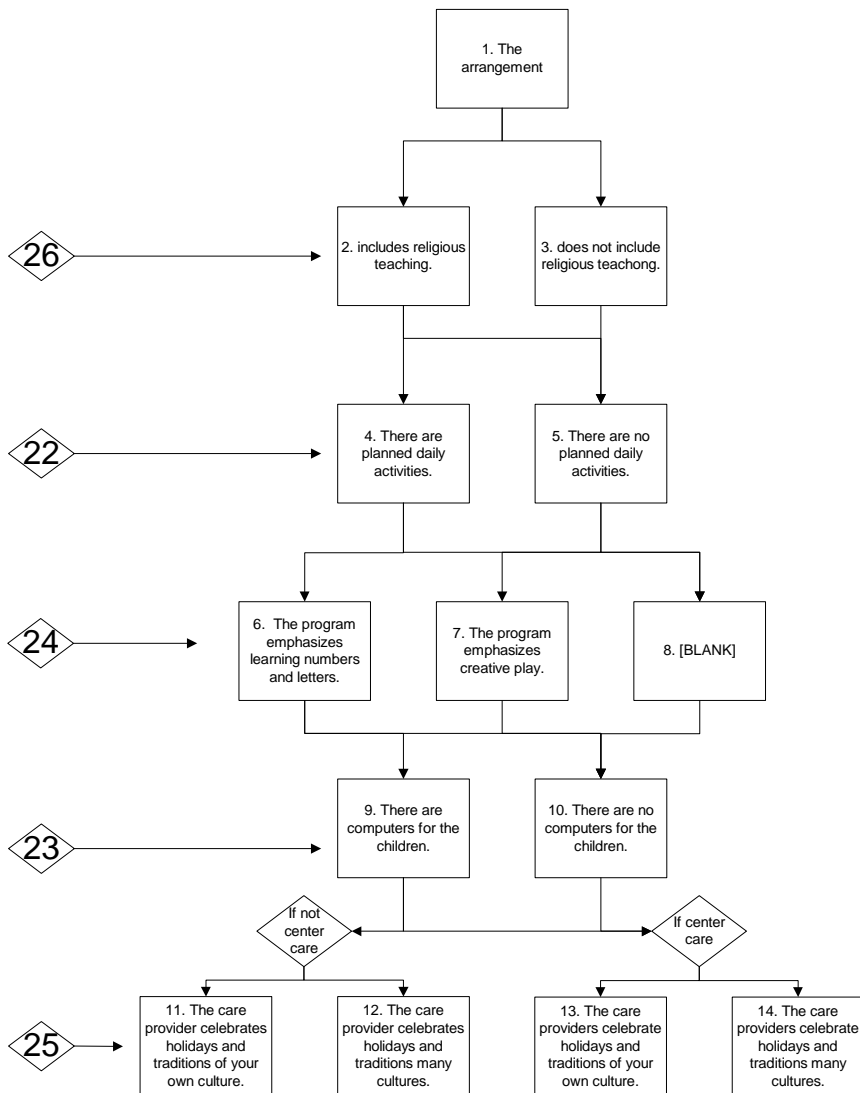
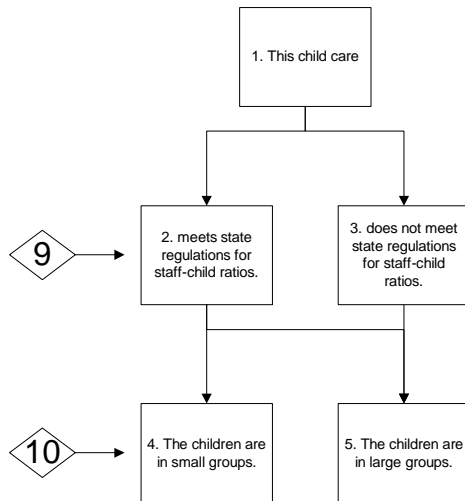
Figure 1. The Vignette Tree Structure

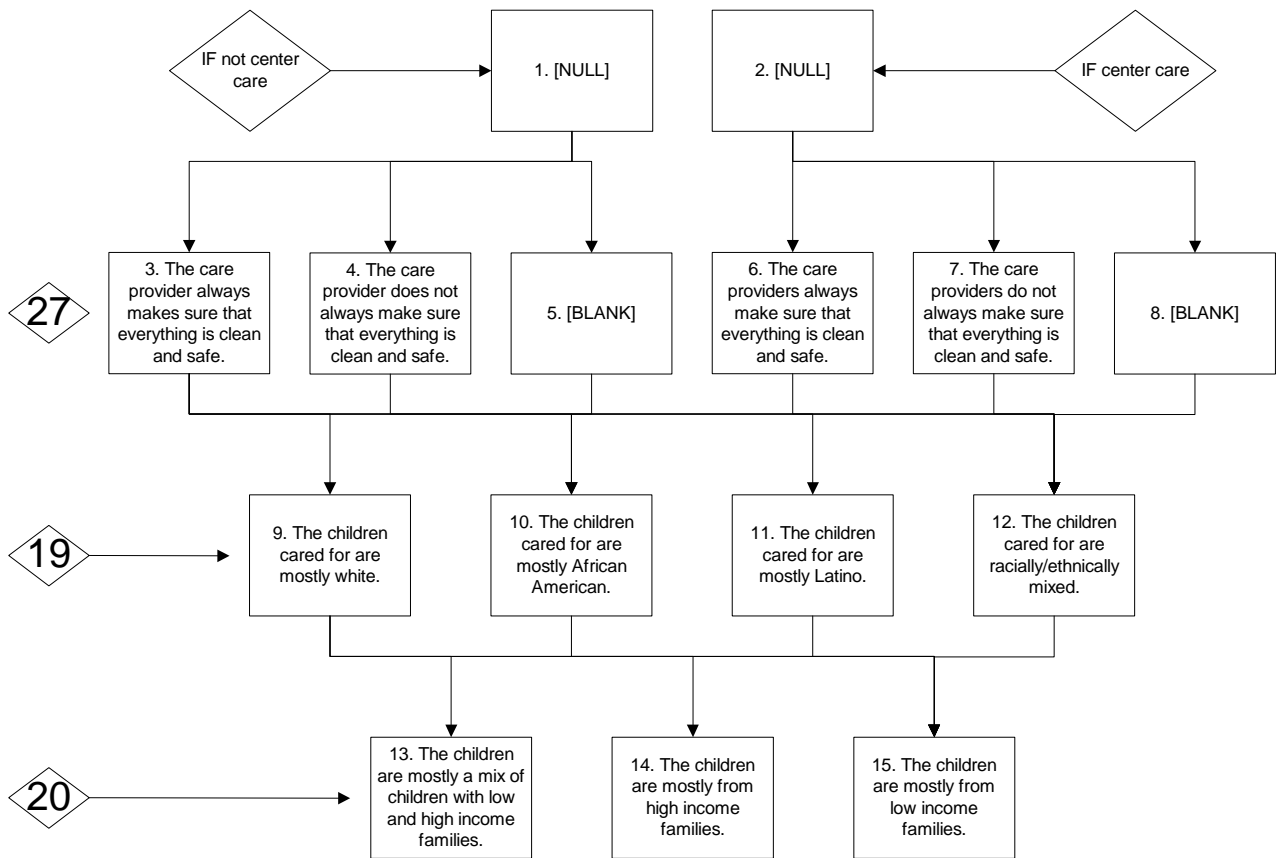




**Section 1
Paragraph 3**







As shown in Table 1, the child care dimension are intended to represent the most salient from the perspective of parents and providers, the child care market, and public policy. The dimension “type of care” includes the levels center care, family day care, relative care and neighbor care. The dimension “commute to work” contains levels describing care which is a short distance from your job or a long distance from your job.

Table 2
Sample child care vignette

This is a relative care arrangement not in your home that is a short distance from your job.

The arrangement is licensed and participates in Keystone Stars, a state-wide program that rates the quality of child care provided. The state Department of Education has given this program 3 out of a possible 4 stars for quality of care. It accepts subsidized children and does not offer care during the evenings and weekends.

The care provider has little training in child development. She has a lot of experience taking care of children. She is warm and strict. She acts like a school teacher with the children. Children get a lot of individual attention. The care provider speaks mostly Spanish with the children and is the same race/ethnicity as your child.

This child care meets state regulations for staff-child ratios. The children are in large groups.

The arrangement includes religious teaching. There are no planned daily activities. There are computers for the children. The care provider celebrates holidays and traditions of your own culture.

The care provider does not always make sure that everything is clean and safe. The children cared for are mostly Latino. The children are mostly from high income families.

Please circle the number that best corresponds with your answer.

1. How much would you like this child care for you and your family?



Dislike very much



Neutral



Like very much

4-----3-----2-----1-----0-----1-----2-----3-----4

2. In your view, what would be a fair weekly price for this child care? Please disregard whether or not you could afford the price.

\$0 \$20 \$40 \$60 \$80 \$100 \$120 \$140 \$160 \$180 \$200

1-----2-----3-----4-----5-----6-----7-----8-----9-----10-----11

3. How much would you be willing to pay per week for this child care?

\$0 \$20 \$40 \$60 \$80 \$100 \$120 \$140 \$160 \$180 \$200

1-----2-----3-----4-----5-----6-----7-----8-----9-----10-----11

A series of dimensions reflect regulatory and public policy dimensions of child care. These include whether a facility is licensed or not, participates in the Pennsylvania Keystone STARS program,⁴ is accredited or not, accepts subsidized children, and whether it conforms to state regulations for child staff ratio. A series of dimensions focus on activities and behaviors within the child care setting (provider acts like a teacher or parent, provider is warm or strict, the level of individual attention received by the children, level of planned activities and curriculum), the skill set and training of the provider (specialized training, level of experience), teacher characteristics (language spoken, race/ethnicity), amenities within the care facility (computers, cleanliness and safety), and cultural aspects (religious teaching, celebration of holidays). A final set of dimensions describes the racial, ethnic and economic characteristics of the children in the care facility.

5.2 Factorial survey questions

Three questions were used to measure parents' child care preferences. The questions and their associated rating scales are shown beneath the sample vignette in Table 2. The first question assessed parents' perception of child care desirability. The question asked specifically "How much would you like this child care for you and your family?" We assumed that this question about child care desirability also measured parents' definitions of child care quality. The rating scale associated with this question

⁴ The Pennsylvania Keystone STARS Quality Rating System is a program of the Department of Public Welfare whose goal it is to promote continuous quality improvements in early care and education programs. Early care and education programs (such as child care centers, family day care providers, group family day care homes, and Head Start programs) voluntarily enter the Keystone STARS program at the STAR 1 level and work their way through to the STAR 4 level based on research-based standards of quality. Key components of the STAR system include staff qualifications, professional development and compensation, early learning environment, leadership and management, and partnership with family and community.

was anchored on a nine-point scale where -4 equaled “dislike very much,” 0 equaled “neutral,” and 4 equaled “like very much.” We refer to this scale as the “desirability rating scale.”

The second question addressed what parents considered to be a fair price for the given child care arrangement without regard to its affordability. It specifically asked, “In your view, what would be a fair weekly price for this child care? Please disregard whether or not you could afford the price.”

The third question addressed parents’ expressions of willingness to pay given their income constraints. This question asked specifically “How much would you be willing to pay per week for this child care?” We asked this question in order to determine the dollar value parents would be willing to pay for varying child care characteristics within income constraints.

The rating scale used for the willingness to pay and fair price questions reflected the range in the cost of care within the lower income child care market. This range was determined using the 2005 Pennsylvania Child Care Market Rate Survey (Commonwealth of Pennsylvania, 2007). The market rate survey establishes Pennsylvania Commonwealth reimbursement rates for subsidized care. The maximum subsidized rate is a percentage of the actual market rate for care. At the time of the design of this study, the reimbursement rate was set for Philadelphia at 60% of the market rate, that is, at the 60th percentile of the rate distribution. Since the Commonwealth goal is to raise the reimbursement rate to the 75th percentile (Child Care Subsidy Rate Policy Task Force, 2004), we selected a dollar value close to the 75th percentile to reflect what state government in Pennsylvania might consider the highest fair weekly cost of care.

The scale that we used ranged from \$0 to \$200 per week, at \$20 intervals, anchored around a mean of \$100 per week.

5.3. Sampling and data collection

The sample of respondents for this study was part of a larger sample selected to study welfare leavers, child care subsidy utilization and employment outcomes. The original sample was selected from lists of welfare leavers who TANF cash benefits had been terminated and who had remained off of the welfare roll for two months. Sampling eligibility criteria included 1) being a parent of at least one children under the age of five years (as of September, 2004), 2) not receiving TANF cash benefits for two months prior to study contact, 3) being over the age of 18, 4) were White, African American or Hispanic, and 5) residing in one of five southeastern Pennsylvania counties (Philadelphia, Bucks, Montgomery, Chester and Delaware). The welfare leavers list was stratified by race and ethnicity (White, Hispanic, and African American). Sample members were randomly selected from these strata. The original sample consisted of 658 adults (215 White, 228 African American and 215 Hispanic). This sample became part of the Subsidy Utilization Study.

Subsequently in a second study, the Employment Outcomes Study, the original sample of 658 adults was reduced to include only English speakers, lowering the sample size to 610 adults. For that study, we interviewed 237 of the 610 members (39%) of the original welfare leaver's sample. These 237 adults became the sampling pool for this factorial survey study. Of the 237 potential respondents, we completed the factorial survey with 93 respondents (39%). These include 17 White, 28 Hispanic and 48 African American respondents.

Survey administration took place in our laboratory on Temple University's main campus between April and July 2006. Respondents completed a brief pre-visit questionnaire updating their personal and familial characteristics. Parents were given the choice of reading the vignettes on their own or having them read to them. All participants chose to read the vignettes on the day of their visit. Each parent completed a total of 30 vignettes divided into three packets of ten. Parents were given a brief break after each set of ten vignettes to help maintain clarity in understanding what they were reading. Parents who reported using a child care arrangement in their pre-visit questionnaire were also asked to complete a post-visit questionnaire that asked respondents to report on the characteristics that were present in their current child care arrangement.

Participants received \$30.00 for completing the interview. In addition, they were reimbursed for babysitting or travel expenses they may have incurred in order to attend the lab visit. For parents who did not have someone available during the time of the visit to watch their child(ren), we provided on-site babysitting services.

The characteristics of the study respondents are shown in Table 3 (page 26-28). About one fifth of the respondents were White, half were African American, and about a third were Hispanic (White, African American and Other Race). Respondents, on average, were in their mid twenties with about two children, and most were single not living with a partner. Nearly a quarter of the sample had not completed 12th grade. About one third had either a high school diploma or GED and one fifth had completed a vocational or technical program. Nearly a quarter of the sample had attended college for some amount of time.

Table 3
Respondent Characteristics (N=93)

Characteristic	
Gender of respondent	
% Female	97.8
Race of respondent ^a	
% White	18.3
% African American	51.6
Ethnicity	
% Hispanic	30.1
Age of respondent	
Mean	25.5
SD	5.1
Age of youngest child	
Mean	2.4
SD	1.3
Marital status	
% Married	10.1
% Divorced or widowed	2.2
% Separated	5.6
% Single, not living with partner	60.7
% Single, living with partner	16.8
Number of children	
Mean	2.1
SD	1.1
Highest grade or year of school completed	
% Did not complete 12th grade	22.6
% High school diploma/GED equivalent	30.1
% Vocational/technical program	22.6
% Some college	22.6
% Bachelor's degree	2.2
% Graduate or professional school	0
Currently employed	
% Yes	53.3
Hours worked per week	
Mean	36.1
SD	11.7
Income sources	
% Alimony	0
% Child support	18.3
% SSI or Disability	11.8
% Social Security	2.2
% Worker's compensation	0

Table 3
Respondent Characteristics (continued) (N=93)

Characteristics	
Monthly household income ^b	
Mean	\$1,657.8
SD	\$3,333.4
Used child care	
% used child care	64.5
Child care arrangement used for child	
% Center/preschool	34.4
% Relative, in own home	9.7
% Relative, in relative's home	14.0
% Non-relative, in own home	4.3
% Non-relative, in non-relative's home	2.1
% Maternal care	34.4
Child care arrangement licensed or registered	
% Yes	53.3
Number of hours per week child is in care	
Mean	33.6
SD	11.4
Number of days per week child is in care	
Mean	5.0
SD	0.8
Pay for arrangement	
% Yes	66.7
Amount paid out of pocket for arrangement per week	
Mean	\$57.9
SD	\$49.0
Amount provider charges for arrangement per week	
Mean	\$175.8
SD	\$196.4
Sources of income to help pay for child care	
% CCIS subsidy	44.3
% Welfare	31.1
% Headstart	8.2
% Tax Credit	1.6
% Employer	0
% Help from relatives or friends	6.6
% Other sources	1.6
Providers takes part in Keystone Stars	
% Yes	15.0
% No	41.7
% Don't know	43.3

Table 3
Respondent Characteristics (continued) (N=93)

Characteristics	
Satisfaction with child care	
% Very satisfied	57.4
% Somewhat satisfied	32.8
% Somewhat dissatisfied	8.2
% Very dissatisfied	1.6

Note: a = excludes Hispanics

b = Includes spouse/ live-in partner's income and income from other sources (e.g. child support, alimony, food stamps, workers compensation)

About half of the respondents were employed; those who were employed largely worked full time. Although few were married (10.1%) and all had children, few received child support (18.3%). Household income, on average, was low -- \$1,658 per month representing an annual income just under \$20,000.

The majority (64.5%) used some form of daycare; those using non-maternal care tended to use center care (54%). Child care users tended to have their children in care five days per week. Few of the parents reported that their provider (15%) took part in the Keystone STARS program and most did not know if their provider was participating or not. About half of the respondents used licensed care and received a CCIS child care subsidy. Most reported being somewhat satisfied (33%) or very satisfied (58%) with the child care they were using.

5.4. Model

Ordinary least squares were employed using the following model:

$$R_i = b_0 + b_1 D_{ik1} + \dots + b_k D_{ik} + b_k M_k + \epsilon_i$$

where:

R_i = the rating given to vignette i

b_0 = the regression intercept

b_i = the coefficient associated with the D_{ik} th child care characteristic

b_k = the coefficient associated with the M_{ik} vignette rating

D_{ik} = the child care characteristic contained in vignette i for every k th respondent

M_k = the mean vignette rating for every k th respondent

ϵ_i = random error

Each level of the various dimensions is coded in binary form: 1 if present and 0 if absent. One level is omitted for each dimension to avoid linear dependency. The unstandardized regression coefficients represent the mean difference in ratings between vignettes containing the given level and vignettes containing the omitted level, all other dimensions held constant. Each regression coefficient represents the contribution of each level variable to the overall vignette ratings.

The model controls for the respondents' mean vignette ratings because respondents may have different rating systems (Garrett, 1982; Nock, 1982). Some people may have higher standards and therefore give lower ratings overall to all of the vignettes. This means that their average scores, overall, would be lower than other respondents. At the same time, some respondents may have lower standards (that is, give higher ratings) overall to all of child care vignettes, and their average scores would be higher than other respondents. Controlling for the mean ratings corrects for this across subject variability so that each coefficient represents the impact on the vignette rating net of respondent propensity to rating vignettes either higher or lower.

We report two different types of model specifications. The first model examines the contribution of each level to the variation in the rating associated with each vignette.

For example, it assesses whether family day care is preferred compared to center care, whether licensed care is preferred compared to unlicensed care. This analysis compares the impact of varying levels on child care preferences within each dimension.

This type of analysis, however, does not permit a comparison of which dimensions are most important. Therefore, a second model specification examines the contribution of each dimension to vignette rating. This incorporates a technique known as “coding proportional to effect” (Rossi & Anderson, 1982).⁵ Using this type of analysis, the standardized coefficients (β) provide an index of the relative importance of each dimension compared to all others.

6. Findings

The study findings are presented in three parts. The first part presents the overall distribution of respondents’ ratings on child care desirability, fair weekly price and willingness to pay. The second part presents the findings of child care desirability, fair weekly price and willingness to pay by race and ethnicity. The third part presents the coding proportionate to analyses for each of the three specifications: desirability, fair weekly price, and willingness to pay by race and ethnicity.

6.1. Child care preferences, fair weekly price and willingness to pay distributions

Distributions for each set of vignette ratings are shown in Tables 4 and 5. Table 4 (page 31) shows the distribution of the desirability rating on a scale from 1 to 9. Table 5

⁵ Coding proportionate to effect is accomplished by creating a single quantitative dimension from each set of levels contained within the dimensions. Each non-omitted level is given a value that is equal to the unstandardized regression coefficient in the corresponding multiple regression analysis. The omitted level of each dimension is coded as zero. Estimating rating scores as a function of the effect-coded dimensions produces both unstandardized and standardized coefficients. The unstandardized coefficients for the dimensions are equal to one. The standardized coefficients (β) provide an index of the relative importance of each dimension.

shows the distribution of the fair weekly price and willingness to pay ratings in dollars, from \$0 dollars per week to \$200 per week.

Both the desirability and fair weekly price ratings were more evenly distributed with less of the lower end clustering often seeing in factorial survey analysis.

Table 4
The Frequency Distribution of Responses to Vignette Questions of Desirability (N=2790)

Desirability Category	Desirability
1 “Dislike very much”	17.0%
2	9.4%
3	9.5%
4	10.2%
5 “Neutral”	15.8%
6	12.6%
7	13.3%
8	8.4%
9 “Like very much”	3.9%
Mean	4.55
(SD)	(2.42)

Table 5
The Frequency Distribution of Responses to Vignette Questions of Fair Weekly Price or Willingness to Pay (N=2788)

Weekly Price Category	Fair Weekly Price	Willingness to Pay
\$0	11.2%	21.7%
\$20	4.2%	8.6%
\$40	7.7%	11.4%
\$60	13.3%	15.9%
\$80	15.9%	15.9%
\$100	20.4%	13.7%
\$120	12.6%	6.6%
\$140	7.9%	3.0%
\$160	4.2%	1.8%
\$180	1.6%	.8%
\$200	1.0%	.5%
Mean	\$82.85	\$59.76
(SD)	(46.64)	(45.56)

Respondent ratings tended to cluster around the neutral desirability ratings (around 3-6) or at about \$80-\$100 per week as a suggested fair weekly price.

But respondents were less likely to be willing to pay these prices when they took into account their own economic circumstances. Respondents were not willing to pay anything for about one fifth of the vignettes. But the remaining vignettes were more evenly distributed and for just over 50% (52.1%) respondents were willing to pay from \$60 to \$120 per week. Few, however, rated these child care situations as worth more than \$140 per week.

The mean value for the desirability rating is 4.55. This indicates that on average, respondents tended to rate the child care vignettes more neutrally, neither intensely liking nor disliking the child care situations. The distribution of scores indicates a more normal distribution than is typically found in factorial survey rating scales, which often have extreme outliers. In this case, 46.1% of the distribution was below 5 (neutral) while 38.2% of the distribution was above 5 (neutral). Fully 15.8% were ranked as 5. The child care desirability rating distribution is fairly close to a normal distribution.

The fair weekly price and willingness to pay scales are more skewed, indicating that respondents assigned low dollar values respondents to each vignette. The fair weekly price scale is less skewed than the willingness to pay scale. The mean fair weekly price is \$82.85 indicating that respondents, on average, were willing to pay \$325 per month for the typical child care situation described on the vignettes. Just over half (52.3%) were rated as worth \$80 or less as a fair weekly price. About one fifth (20.5%) were rated at \$100 as a fair weekly price. Fewer vignettes were rated as being worth more than \$100 per week. Only 27.3% were rated as worth more than \$100 per week.

Very few vignettes were assigned the highest values of \$180 or \$200 per week even though these prices are well within the range of market rates found in the low-income Philadelphia child care market, particularly among child care situations that are subsidized.

Respondents believed that the child care situations were worth more (fair weekly price) than they would be willing to pay (willingness to pay). The mean of \$60 for the willingness to pay scale indicates that people were not willing to pay more, even when they thought the fair weekly price was, on average \$23 more per week. The bulk of the vignettes (66%) were rated at the lower dollar values, \$20-\$100 per week. The respondents were not willing to pay more than \$100 per week for most of the vignettes. Fully 22% of the vignettes were rated at the \$0 values indicating that people were not willing to pay anything for one fifth of the vignettes. Only 13% of the vignettes were rated at \$120 or higher, indicating that people were not willing to pay more than \$100 for the vast majority of the child care situations described on these vignettes.

6.2. Child care preferences, fair weekly price and willingness to pay: Racial and ethnic differences

Tables 6 (pages 34-36), 7 (pages 41-43) and 8 (pages 48-51) present regression analysis that show the effects of child care characteristics on perceived child care desirability, fair weekly price and willingness to pay for Hispanic, White and African American respondents respectively. Table 6 shows the effects of child care characteristics on child care desirability. Table 7 shows the effects of child care characteristics on respondents' assessment of the fair weekly price of the child care situations described in the vignettes.

Table 6

The Impact of Child Care Characteristics on Child Care Desirability by Hispanic, White and African American Welfare Leavers (Shown are the b coefficients with associated standard errors in parentheses)

Dimension and level	Hispanic	White	African American
N	840	511	1408
Type of Care¹			
Center care	-.091 (.171)	-.302 (.216)	-.085 (.145)
Family day care	.110 (.176)	-.067 (.216)	-.168 (.150)
Relative care	.032 (.186)	.031 (.228)	-.270* (.160)
Distance from work²			
Care short distance from your job	.241** (.120)	.391** (.150)	.105 (.106)
Licensing³			
Is licensed	.188 (.121)	.065 (.151)	.234** (.106)
Keystone Star Rating: Participates in Keystone Stars, a statewide program that rates the quality of child care provided⁴			
This arrangement received 1 out of 4 stars for quality of care.	-.302** (.182)	-.435** (.248)	-.354** (.166)
This arrangement received 2 out of 4 stars for quality of care.	.425** (.193)	.019 (.248)	.114 (.163)
This arrangement received 3 out of 4 stars for quality of care.	.377** (.190)	-.147 (.248)	.158 (.170)
This arrangement received 4 out of 4 stars for quality of care.	.597*** (.191)	.090 (.239)	.587*** (.163)
Accreditation⁵			
Is accredited by a national child care organization	.148 (.123)	-.131 (.152)	.020 (.106)
Care for subsidized children⁶			
Accepts subsidized children	.280** (.122)	.371** (.150)	.113 (.106)
Offers evening and weekend care⁷			
Offers care during the evenings and weekends	.316** (.122)	.047 (.151)	.037 (.106)
Extra hours⁸			
Can provide extra hours on short notice	.126 (.122)	.046 (.152)	.022 (.106)
Training in child development⁹			
Has specialized training in child development	.154 (.155)	.190 (.184)	.227* (.128)
Has little training in child development	-.045 (.144)	-.055 (.185)	-.098 (.129)

Table 6

The Impact of Child Care Characteristics on Child Care Desirability by Hispanic, White and African American Welfare Leavers (continued) (Shown are the b coefficients with associated standard errors in parentheses)

Dimension and level	Hispanic	White	African American
Experience¹⁰			
Has a lot of experience taking care of children	.081 (.148)	-.80 (.183)	.255*** (.129)
Has little experience taking care of children	-.605*** (.149)	-.291 (.191)	-.155 (.131)
Warm and strict¹¹			
Is warm and strict	.163 (.152)	-.224 (.187)	.045 (.128)
Is not warm but strict	-.238* (.148)	-.597*** (.182)	-.543*** (.130)
Provider demeanor¹²			
Acts like a school teacher with the children	.010 (.123)	-.032 (.150)	.022 (.106)
Attention level to children¹³			
Children get a lot of individual attention	.305** (.147)	-.036 (.190)	.142 (.131)
Children do not get a lot of individual attention	-.268* (.149)	-.308* (.183)	-.256** (.127)
Relationship to care provider¹⁴			
Known care provider for a long time	.016 (.142)	.185 (.182)	-.055 (.123)
Language spoken with children¹⁵			
Provider speaks English with the children	-.230 (.150)	-.348* (.191)	-.173 (.130)
Provider speaks mostly Spanish with the children	-.136 (.149)	-.470** (.183)	-.518*** (.130)
Provider race/ethnicity¹⁶			
Provider is same race/ethnicity as your child	-.095 (.121)	.088 (.150)	.127 (.105)
Meets state regulations¹⁷			
Meets state regulations for staff-child ratios	.378** (.122)	.261* (.151)	.418*** (.105)
Group size¹⁸			
Children are in small groups	-.043 (.123)	.088 (.151)	-.085 (.106)
Religiosity¹⁹			
Includes religious teaching	.044 (.122)	-.068 (.151)	.221** (.106)
Planned activities²⁰			
There are planned activities daily	.540*** (.122)	.367** (.152)	.298*** (.106)

Table 6

The Impact of Child Care Characteristics on Child Care Desirability by Hispanic, White and African American Welfare Leavers (Shown are the b coefficients with associated standard errors in parentheses)

Dimension and level	Hispanic	White	African American
Curriculum²¹			
The program emphasizes learning letters and numbers	.118 (.148)	.364** (.188)	.158 (.130)
The program emphasizes creative play	-.022 (.151)	.131 (.182)	.061 (.130)
Computers²²			
There are computers for the children	.502*** (.123)	.244* (.152)	.514*** (.105)
Holiday traditions²³			
The care provider celebrates holidays and traditions of your own culture	.044 (.121)	-.455** (.152)	.115 (.105)
Safety²⁴			
The care providers always makes sure that everything is clean and safe	.106 (.147)	.317* (.183)	.415*** (.130)
The care provider does not always make sure that everything is clean and safe	-1.004*** (.150)	-.841*** (.187)	-1.081*** (.128)
Child race and ethnicity²⁵			
The children cared for are mostly white	-.387 (.176)	.161 (.221)	-.237 (.157)
The children cared for are mostly African American	-.050 (.169)	-.091 (.219)	.006 (.149)
The children cared for are mostly Latino	.112 (.169)	-.297 (.217)	-.182 (.148)
Child's family income²⁶			
The children are mostly a mix of children with low and high income families	-.018 (.149)	-.149 (.186)	.170 (.131)
The children are mostly from low-income families	.216 (.148)	-.130 (.185)	.118 (.130)
Respondent mean	.955*** (.043)	1.017*** (.060)	.975*** (.042)
Constant	-.780* (.432)	.247 (.567)	-.445 (.401)
R ²	.502	.479	.398

Omitted variables are as follows: 1: neighbor care; 2: long distance from your job; 3: unlicensed 4: does not participate in Keystone Starts, a statewide program that rates the quality of child care provided; 5: is not accredited by a national child care organization; 6: does not accept subsidized children; 7: does not offer care during the evenings and weekends; 8: [Blank]; 9: [Blank]; 10: [Blank]; 11: is warm and not strict; 12: acts like a parent with the children; 13: [Blank]; 14: You have known the provider for a short time 15: The care provider speaks both English and Spanish with the children; 16: is different race/ethnicity from your child; 17: does not meet state regulations for staff-child ratios; 18: The children are in large groups; 19: does not include religious teaching; 20: There are no planned daily activities; 21: [Blank]; 22: There are no computers for the children; 23: The care provider celebrates holidays and traditions of many cultures; 24: [Blank]; 25: The children cared for are mostly African American; 26: The children are mostly from high income families. * $p \leq .1$, ** $p \leq .05$, *** $p \leq .001$.

Table 8 (page 48) shows the effects of child care characteristics on respondents' reported amount that they would be willing to pay for the care situations described on the vignettes. Column one shows these effects for Hispanic respondents. Column two shows these effects for White respondents. Column three shows these effects for African American respondents.

The unstandardized coefficients represent the effect of the presence of a particular level compared to the omitted level. For example, in column one for Hispanic respondents, the coefficient of .241 associated with "care short distance from your job" indicates that when this level was present in the vignette, it raised the respondents rating by .241 of a unit compared to when the vignette contained the statement that the care was a long distance from your job (the omitted variable). This effect is net of individual respondents' tendency to rate vignettes either higher or lower because the analyses control for the respondent mean rating. Therefore, this coefficient of .241 means that Hispanic respondents tended to rate vignettes .241 higher when the child care was a short distance from their job compared to when it was a long distance from their job, net of their propensity to rate the vignettes either higher or lower and net of other characteristics contained on the vignettes.

6.2.1. Child care desirability by race and ethnicity

The size and direction of the coefficients associated with each child care level and for each racial and ethnic group show as many similarities as differences. We start with describing the ways in which the groups were similar in their ratings.

The largest effects were associated with safety. Each group uniformly rated vignettes lower that stated that the care provider does not always make sure that

everything is clean and safe ($b = -1.004, -.841$ and -1.081 for Hispanic, White and African American respondents respectively).

All groups of respondents paid attention to the Keystone STAR Rating – even though most reported never having heard of these ratings before. Although the magnitude and consistency of this effect varied, each group of respondents found that a star based rating system and more stars for a care provider based on that system were salient criteria for assessing child care desirability.

Likewise, all groups cared whether a provider was warm or strict, and uniformly valued more those providers that were warm and not strict compared to not warm but strict ($b = -.238,$ ⁶ $-.597$ and $-.543$ for Hispanic, White and African American respondents respectively). All groups of respondents rated vignettes lower if the children were described as not receiving a lot of individual attention ($b = -.268,$ ⁷ $-.308,$ ⁸ and $-.256$ for Hispanic, White and African American respondents respectively). All groups found care more desirable if it met state regulations for staff-child ratios ($b = .378, .261,$ ⁹ and $.418$ for Hispanic, White and African American respondents respectively), if it had planned activities ($b = .540, .367,$ and $.298$ for Hispanic, White and African American respondents respectively), and if it had computers ($b = .502, .244,$ ¹⁰ and $.514$ for Hispanic, White and African American respondents respectively).

There were also some group differences in the ratings. African American respondents were most clear (compared to either White or Hispanic respondents) about the specific characteristics that made care more desirable. They valued relative care less

⁶ $P = .109$ for Hispanic respondents.

⁷ $P = .072$ for Hispanic respondents.

⁸ $P = .092$ for White respondents.

⁹ $P = .083$ for Hispanic respondents.

¹⁰ $P = .109$ for White respondents.

(compared to neighborhood care), licensed care more (compared to unlicensed care), specialized training in child development more (compared to no mention of training, i.e. blank text), a lot of experience taking care of children more (compared to blank text), and religious teaching more (compared to does not include religious teaching). None of these child care characteristics affected the desirability ratings of Hispanic and White respondents.

Both Hispanic and White respondents rated vignettes higher if the care situation was a short distance from their job (compared to a long distance from their job) and accepted subsidized children.(compared to does not accept subsidized children). Both White and Hispanic respondents rated vignettes lower if the provider spoke mostly Spanish with the children (compared to a mix of Spanish and English).

Hispanic respondents were the only group that valued care more that was offered during the evenings or weekends (compared to not offered during the evenings or weekend) and valued care less if the children care for were mostly white (compared to mostly African American). They also rated vignettes lower if the care provider was described as having little experience taking care of children (compared to blank text).

Only White respondents cared about the holidays and traditions observed in the care setting and rated vignettes lower if they celebrated holidays and traditions of their own culture (as compared to celebrating holidays and traditions of many cultures). Similarly only White respondents paid attention to whether the program emphasized letters and numbers (compared to blank text).

Although all three groups paid some attention to the Keystone STARS rating, the level of attention varied significantly across the three groups. All respondents rated

vignettes lower if the described arrangements received one out of four stars for quality of care (compared to does not participate in the Keystone STARS program). But White respondents rated vignettes neither higher nor lower with each additional star assigned to the child care situation. African American respondents' net rating only increased at the point where the child care situations was assigned four out of four stars. By contrast, Hispanic respondents paid attention to the specific variation in the number of stars assigned. Child care situations with more stars were rated higher, compared to those that did not participate in the Keystone STARS program. Apparently the Keystone STARS Rating System had highest salience for Hispanic respondents, next highest for African American respondents, and lowest for White respondents.

All three groups were indifferent to whether a child care situation was accredited (compared to not accredited), if it could provide extra hours of care on short notice (compared to blank text), if the providers acted more like a teacher (compared to acting more like a parent), and if they knew the provider for a long time (compared to knowing the provider for a short time).

6.2.2. The fair weekly price for child care by race and ethnicity

More desirable child care characteristics should be worth more money to people. Table 7 (page 41-43) shows each group's assessment of the fair market value associated with each child care characteristic. We asked respondents to report the fair weekly price for each care situation without taking into consideration their ability to afford this price. Each coefficient represents the net dollar value associated with a particular child care descriptor.

Table 7

The Impact of Child Care Characteristics on Fair Weekly Price by Hispanic, White and African American Welfare Leavers (Shown are the b coefficients with associated standard errors in parentheses)

Dimension and level	Hispanic	White	African American
N	839	511	1408
Type of Care¹			
Center care	-1.013 (3.042)	-2.913 (3.699)	1.650 (2.448)
Family day care	-.823 (3.132)	-3.081 (3.688)	.235 (2.523)
Relative care	-2.864 (3.319)	-2.755 (3.897)	-6.103** (2.689)
Distance from work²			
Care short distance from your job	2.057 (2.144)	1.643 (2.251)	-.956 (1.792)
Licensing³			
Is licensed	6.719** (2.159)	-.467 (2.581)	3.557** (1.791)
Keystone Star Rating: Participates in Keystone Stars, a statewide program that rates the quality of child care provided⁴			
This arrangement received 1 out of 4 stars for quality of care.	-.431 (3.251)	-4.776 (4.250)	-3.033 (2.801)
This arrangement received 2 out of 4 stars for quality of care.	6.839** (3.434)	3.022 (4.282)	4.667* (2.755)
This arrangement received 3 out of 4 stars for quality of care.	4.084 (3.391)	2.874 (4.266)	7.663** (2.870)
This arrangement received 4 out of 4 stars for quality of care.	14.747*** (3.411)	4.458 (4.097)	10.489*** (2.748)
Accreditation⁵			
Is accredited by a national child care organization	2.643 (2.195)	-.323 (2.597)	1.263 (1.785)
Care for subsidized children⁶			
Accepts subsidized children	4.839** (2.177)	3.243 (2.558)	3.632** (1.787)
Offers evening and weekend care⁷			
Offers care during the evenings and weekends	2.775 (2.179)	3.188 (2.581)	2.269 (1.784)
Extra hours⁸			
Can provide extra hours on short notice	2.725 (2.168)	.365 (2.604)	.916 (1.785)
Training in child development⁹			
Has specialized training in child development	.109 (2.758)	8.137** (3.144)	4.525** (2.156)
Has little training in child development	.849 (2.564)	2.483 (3.161)	-2.854 (2.177)

Table 7

The Impact of Child Care Characteristics on Fair Weekly Price by Hispanic, White and African American Welfare Leavers (continued) (Shown are the b coefficients with associated standard errors in parentheses)

Dimension and level	Hispanic	White	African American
Experience¹⁰			
Has a lot of experience taking care of children	.920 (2.639)	-3.902 (3.124)	1.915 (2.167)
Has little experience taking care of children	-9.064*** (2.651)	-7.524** (3.262)	-4.249** (2.204)
Warm and strict¹¹			
Is warm and strict	4.805* (2.695)	-5.615* (3.180)	.599 (2.157)
Is not warm but strict	.972 (2.638)	-6.496** (3.104)	-4.616** (2.193)
Provider demeanor¹²			
Acts like a school teacher with the children	-2.491 (2.188)	.995 (2.571)	-.017 (1.779)
Attention level to children¹³			
Children get a lot of individual attention	6.830** (2.612)	2.358 (3.259)	2.611 (2.210)
Children do not get a lot of individual attention	-.281 (2.648)	.238 (3.129)	-3.733* (2.134)
Relationship to care provider¹⁴			
Known care provider for a long time	1.116 (2.532)	4.616 (3.105)	-1.510 (2.077)
Language spoken with children¹⁵			
Provider speaks English with the children	-2.888 (2.663)	-3.692 (3.263)	-1.316 (2.188)
Provider speaks mostly Spanish with the children	-3.351 (2.653)	-1.151 (3.109)	-5.624** (2.193)
Provider race/ethnicity¹⁶			
Provider is same race/ethnicity as your child	-1.606 (2.159)	1.672 (2.567)	2.098 (1.778)
Meets state regulations¹⁷			
Meets state regulations for staff-child ratios	4.967** (2.173)	2.671 (2.576)	6.581** (1.775)
Group size¹⁸			
Children are in small groups	-1.665 (2.191)	.383 (2.584)	-1.526 (1.799)
Religiosity¹⁹			
Includes religious teaching	3.154 (2.174)	2.732 (2.582)	2.585 (1.787)
Planned activities²⁰			
There are planned activities daily	6.807** (2.166)	4.549* (2.595)	4.979** (1.788)

Table 7

The Impact of Child Care Characteristics on Fair Weekly Price by Hispanic, White and African American Welfare Leavers (continued) (Shown are the b coefficients with associated standard errors in parentheses)

Dimension and level	Hispanic	White	African American
Curriculum²¹			
The program emphasizes learning letters and numbers	3.646 (2.632)	7.332** (3.213)	1.088 (2.188)
The program emphasizes creative play	1.673 (2.682)	.333 (3.106)	.063 (2.199)
Computers²²			
There are computers for the children	6.069** (2.183)	1.663 (2.592)	8.163*** (1.776)
Holiday traditions²³			
The care provider celebrates holidays and traditions of your own culture	-.358 (2.155)	.067 (2.595)	-.676 (1.774)
Safety²⁴			
The care providers always makes sure that everything is clean and safe	3.166 (2.613)	.746 (3.134)	7.491** (2.187)
The care provider does not always make sure that everything is clean and safe	-14.623*** (2.682)	-5.430* (3.198)	-17.984*** (2.157)
Child race and ethnicity²⁵			
The children cared for are mostly white	-4.897 (3.134)	3.801 (3.779)	-2.214 (2.645)
The children cared for are mostly African American	-.851 (3.000)	-3.027 (3.748)	-2.767 (2.519)
The children cared for are mostly Latino	2.510 (3.018)	-5.201 (3.713)	-4.786* (2.491)
Child's family income²⁶			
The children are mostly a mix of children with low and high income families	-1.470 (2.647)	1.090 (3.193)	.805 (2.214)
The children are mostly from low-income families	.400 (2.637)	2.942 (3.171)	-2.688 (2.193)
Respondent mean	.968*** (.033)	1.008*** (.051)	.991*** (.028)
Constant	-16.257** (7.362)	-8.914 (9.588)	-7.723 (6.432)
R ²	.590	.506	.538

Omitted variables are as follows: 1: neighbor care; 2: long distance from your job; 3: unlicensed 4: does not participate in Keystone Starts, a statewide program that rates the quality of child care provided; 5: is not accredited by a national child care organization; 6: does not accept subsidized children; 7: does not offer care during the evenings and weekends; 8: [Blank]; 9: [Blank]; 10: [Blank]; 11: is warm and not strict; 12: acts like a parent with the children; 13: [Blank]; 14: You have known the provider for a short time 15: The care provider speaks both English and Spanish with the children; 16: is different race/ethnicity from your child; 17: does not meet state regulations for staff-child ratios; 18: The children are in large groups; 19: does not include religious teaching; 20: There are no planned daily activities; 21: [Blank]; 22: There are no computers for the children; 23: The care provider celebrates holidays and traditions of many cultures; 24: [Blank]; 25: The children cared for are mostly African American; 26: The children are mostly from high income families. * $p \leq .1$, ** $p \leq .05$, *** $p \leq .001$.

There were fewer agreements between Hispanic, White and African American respondents' assessments of the fair weekly price associated with each child care characteristics than with assessments of more abstract measures of child care desirability. All three groups revealed that providers with little experience taking care of children were worth less money (compared to blank text). The coefficients associated with Hispanic and White respondents indicate that they thought that providers with little experience were worth much less money compared to African American respondents. Hispanic respondents thought that providers with little experience were worth just over \$9 less per week. White respondents thought that less experienced providers were worth \$7.52 less per week. African American respondents thought that less experienced providers were worth \$4.25 less per week.

The absence of a uniformly safe care situation was worth less to all groups of respondents. But it was worth much less to African American respondents ($b = -\$17.984$) and to Hispanic respondents ($b = -\$14.623$) than to White respondents ($b = -\$5.43$). Only African American respondents thought that care with a guarantee of safety (care providers always makes sure that everything is clean and safe) was worth more ($b = \$7.491$).

Having a care situation with planned activities was worth more to all three groups. Hispanic respondents thought that having planned activities were worth much more than either White or African American respondents. Hispanic respondents thought care with planned activities was worth \$6.81 more per week. White respondents thought care with planned activities was worth \$4.55 more per week. African American respondents thought that care with planned activities was worth \$4.98 more per week.

A particular combination of provider warmth and strictness was worth more to all three racial and ethnic groups. Hispanic respondents thought that a provider who was warm and strict was worth \$4.80 more per week compared to care that was warm and not strict.¹¹ White respondents thought that care that was warm and not strict was worth \$6.49 than care that was not warm but strict and \$5.62 more than care that was warm and strict. African American respondents thought that care that was warm and not strict was worth \$4.62 more than care that was not warm but strict.

Hispanic and African American respondents thought that care that reflected prevailing standards represented by licensing and following state guidelines was worth more than White respondents. Licensed care (compared to unlicensed care) was worth \$6.72 more per week for Hispanic respondents and \$3.56 more per week for African American respondents. Care meeting state regulations for staff child ratio was worth \$4.97 more per week for Hispanic respondents and \$6.58 more per week for African American respondents. In addition, Hispanic and African American respondents expressed that care was worth more if it involved computers ($b = \$6.069$ and $\$8.163$ for Hispanic and African American respondents respectively). Both Hispanic and African American respondents thought that care was worth more if it accepted subsidized children ($b = \$4.839$ and $\$3.632$ for Hispanic and African American respondents respectively). The absence of statistically significant coefficients associated with White assessments indicates their indifference to child care licensing status, state regulations for child staff ratios, and computers.

Hispanic and African American respondents also thought that care that was rated higher according to the Keystone STARS Rating System was worth more than White

¹¹ $P = .075$.

respondents. Hispanic respondents thought that care with two out of four stars was worth \$6.84 more per week than care not participating in the Keystone STARS Rating System. For African American respondents, care with two out of four stars was worth \$4.67 more per week, three out of four stars was worth \$7.66 more per week, and four out of four stars was worth \$10.49 more per week. For Hispanic respondents care rated as four out of four stars was worth a net \$14.75 more per week. For Hispanic and African American respondents, the Keystone STARS Rating System conveyed authentic value that translated into what they considered higher but fair prices for care. For White respondents, the Keystone STARS Rating System did not appear to convey meaningful information about the economic value of a care situation.

Both White and African American respondents thought care was worth more if the provider had specialized training in child development. White respondents thought this was worth almost twice as much as African American respondents ($b = \$8.137$ and $\$4.525$ for White and African American respondents respectively).

African American respondents thought care was worth less if it 1) was relative care (compared to neighbor care, $b = -\$6.103$), 2) if children did not get a lot of individual attention (compared to blank text, $b = -\$3.733$), 3) the provider spoke mostly Spanish with the children (compared to a mix of English and Spanish, $b = -\$5.624$), and 4) the children in care were mostly Latino (compared to mostly African American, $b = -\$4.786$). Only White respondents thought that a program emphasizing learning letters and numbers was worth more (compared to blank text, $b = \$4.646$).

6.2.3. Willingness to pay for child care by race and ethnicity

A price may be considered fair but people may not be willing to pay this price. Our question about willingness to pay for care was asked to determine what care characteristics they would actually spend money on if their financial situation were taken into account. The results are shown in Table 8 (pages 48-50).

What people thought was a fair price was often more than they were willing to pay but only for some dimensions. Consistent with their assessment of the fair weekly price, all three groups were willing to pay more for planned activities ($b = \$5.68, \$4.40,$ ¹² and $\$4.38$ for Hispanic, White and African American respondents respectively), pay less for care where the provider did not always make sure that everything was clean and safe ($b = -\$11.71, -\5.83 and $-\$18.10$ for Hispanic, White and African American respondents respectively), pay more when the provider always made sure that everything is clean and safe ($b = \$5.41, \6.51 and $\$6.19$ for Hispanic, White and African American respondents respectively), and pay less for providers with little experience ($b = -\$10.12, -\$4.86,$ and $-\$5.08$ for Hispanic, White and African American respondents respectively). Planning, safety, and experience were bottom line items for which Hispanic, White and African American respondents were willing to pay.

Unlike Hispanic respondents, White and African American respondents were willing to pay more for different combinations of provider warmth and strictness ($b = -\$10.05$ and $-\$4.31$ for is not warm and strict for White and African American respondents respectively) less for providers who spoke only Spanish with the children ($b = -\$6.83$ and $-\$6.59$ for White and African American respondents respectively), and less

¹² $P = .06$ for White respondents.

Table 8

The Impact of Child Care Characteristics on Willingness to Pay by Hispanic, White and African American Welfare Leavers (Shown are the b coefficients with associated standard errors in parentheses)

Dimension and level	Hispanic	White	African American
N	839	511	1408
Type of Care ¹			
Center care	-3.105 (2.885)	-5.709* (3.318)	-.463 (2.440)
Family day care	-2.933 (2.966)	-2.182 (3.316)	-2.140 (2.515)
Relative care	-2.180 (3.149)	-6.610* (3.498)	-4.921* (2.683)
Distance from work ²			
Care short distance from your job	1.771 (2.034)	1.289 (2.317)	.531 (1.785)
Licensing ³			
Is licensed	5.279** (2.046)	-.506 (2.317)	.370 (1.785)
Keystone Star Rating: Participates in Keystone Stars, a statewide program that rates the quality of child care provided ⁴			
This arrangement received 1 out of 4 stars for quality of care.	-2.051 (3.087)	-5.132 (3.811)	-5.649** (2.792)
This arrangement received 2 out of 4 stars for quality of care.	4.320 (3.257)	1.748 (3.820)	5.210** (2.746)
This arrangement received 3 out of 4 stars for quality of care.	.820 (3.205)	-1.304 (3.813)	6.727** (2.859)
This arrangement received 4 out of 4 stars for quality of care.	9.794** (3.237)	3.905 (3.673)	11.056*** (2.739)
Accreditation ⁵			
Is accredited by a national child care organization	.884 (2.081)	-3.524 (2.333)	1.372 (1.778)
Care for subsidized children ⁶			
Accepts subsidized children	4.195** (2.066)	2.090 (2.302)	2.304 (1.781)
Offers evening and weekend care ⁷			
Offers care during the evenings and weekends	2.750 (2.066)	.993 (2.319)	1.204 (1.778)
Extra hours ⁸			
Can provide extra hours on short notice	1.168 (2.061)	.561 (2.228)	3.707** (1.780)
Training in child development ⁹			
Has specialized training in child development	1.320 (2.616)	4.394 (2.830)	6.309** (2.149)
Has little training in child development	-.852 (2.430)	1.359 (2.841)	.193 (2.170)

Table 8

The Impact of Child Care Characteristics on Willingness to Pay by for Hispanic, White and African American Welfare Leavers (continued) (Shown are the b coefficients with associated standard errors in parentheses)

Dimension and level	Hispanic	White	African American
Experience ¹⁰			
Has a lot of experience taking care of children	-.344 (2.506)	-3.752 (2.811)	2.352 (2.159)
Has little experience taking care of children	-10.015*** (2.512)	-4.855* (2.937)	-5.082** (2.196)
Warm and strict ¹¹			
Is warm and strict	2.079 (2.557)	-7.093** (2.855)	.101 (2.151)
Is not warm but strict	-1.872 (2.502)	-10.049*** (2.789)	-4.311** (2.184)
Provider demeanor ¹²			
Acts like a school teacher with the children	-.779 (2.076)	-2.925 (2.316)	-.025 (1.773)
Attention level to children ¹³			
Children get a lot of individual attention	5.633** (2.478)	2.906 (2.914)	2.016 (2.203)
Children do not get a lot of individual attention	-1.798 (2.509)	-3.395 (2.807)	-4.968** (2.127)
Relationship to care provider ¹⁴			
Known care provider for a long time	2.816 (2.399)	5.599** (2.790)	.779 (2.069)
Language spoken with children ¹⁵			
Provider speaks English with the children	-2.351 (2.528)	-5.472* (2.913)	-3.332 (2.179)
Provider speaks mostly Spanish with the children	-2.818 (2.516)	-6.827** (2.805)	-6.857** (2.186)
Provider race/ethnicity ¹⁶			
Provider is same race/ethnicity as your child	-.936 (2.048)	-.334 (2.312)	3.297* (1.773)
Meets state regulations ¹⁷			
Meets state regulations for staff-child ratios	3.769* (2.061)	-1.450 (2.315)	6.587** (1.770)
Group size ¹⁸			
Children are in small groups	-.688 (2.078)	3.013 (2.321)	-1.591 (1.790)
Religiosity ¹⁹			
Includes religious teaching	2.943 (2.062)	2.100 (2.319)	3.125* (1.782)
Planned activities ²⁰			
There are planned activities daily	5.680** (2.054)	4.398* (2.330)	4.377** (1.782)

Table 8

The Impact of Child Care Characteristics on Willingness to Pay by for Hispanic, White and African American Welfare Leavers (continued) (Shown are the b coefficients with associated standard errors in parentheses)

Dimension and level	Hispanic	White	African American
Curriculum²¹			
The program emphasizes learning letters and numbers	.094 (2.500)	8.533** (2.894)	1.416 (2.180)
The program emphasizes creative play	-.809 (2.543)	3.184 (2.790)	1.312 (2.191)
Computers²²			
There are computers for the children	7.362*** (2.071)	2.554 (2.336)	8.020*** (1.771)
Holiday traditions²³			
The care provider celebrates holidays and traditions of your own culture	-.605 (2.044)	-2.380 (2.332)	-1.105 (1.768)
Safety²⁴			
The care providers always makes sure that everything is clean and safe	5.407** (2.479)	6.510** (2.818)	6.188** (2.181)
The care provider does not always make sure that everything is clean and safe	-11.711** (2.540)	-5.833** (2.864)	-18.102*** (2.149)
Child race and ethnicity²⁵			
The children cared for are mostly white	-7.043** (2.973)	4.596 (3.392)	-3.370 (2.636)
The children cared for are mostly African American	-.403 (2.845)	-1.602 (3.372)	-1.621 (2.512)
The children cared for are mostly Latino	2.197 (2.860)	-1.535 (3.338)	-7.101** (2.484)
Child's family income²⁶			
The children are mostly a mix of children with low and high income families	.383 (2.512)	4.523 (2.853)	2.041 (2.208)
The children are mostly from low-income families	4.023 (2.510)	5.590** (2.844)	-1.517 (2.185)
Respondent mean	.977*** (.033)	1.026*** (.043)	.991*** (.028)
Constant	-10.455 (6.783)	.078 (7.979)	-8.771 (6.154)
R ²	.594	.600	

Omitted variables are as follows: 1: neighbor care; 2: long distance from your job; 3: unlicensed; 4: does not participate in Keystone Starts, a statewide program that rates the quality of child care provided; 5: is not accredited by a national child care organization; 6: does not accept subsidized children; 7: does not offer care during the evenings and weekends; 8: [Blank]; 9: [Blank]; 10: [Blank]; 11: is warm and not strict; 12: acts like a parent with the children; 13: [Blank]; 14: You have known the provider for a short time; 15: The care provider speaks both English and Spanish with the children; 16: is different race/ethnicity from your child; 17: does not meet state regulations for staff-child ratios; 18: The children are in large groups; 19: does not include religious teaching; 20: There are no planned daily activities; 21: [Blank]; 22: There are no computers for the children; 23: The care provider celebrates holidays and traditions of many cultures; 24: [Blank]; 25: The children cared for are mostly African American; 26: The children are mostly from high income families. * $p \leq .1$, ** $p \leq .05$, *** $p \leq .001$.

for relative care (compared to neighbor care, $b = -\$6.61$ ¹³ and $-\$4.92$ for White and African American respondents respectively).

White respondents were not willing to pay more for care within the Keystone STAR rating system. Hispanic and African American respondents, however, were willing to pay more for care with more stars but they differed in terms of the value of each star. Hispanic respondents did not distinguish among the care situations with less than four stars and revealed they would pay more solely for care with 4 out of 4 starts ($b = \$9.79$). African American respondents were willing to pay more for each additional star. They would pay less for providers with one star (compared to not being in the rating program, $b = -\$5.65$), more for two stars ($b = \5.21), more for three stars ($b = \$6.73$) and four out of four stars ($b = \$11.06$). For African Americans, the Keystone STAR Rating System had the most systematic salience in evaluating care situations.

Only Hispanic respondents would pay more for care that accepted subsidized children ($b = \$4.19$) and that was licensed (compared to unlicensed, $b = \$5.28$). Only White respondents were willing to pay more for programs that emphasized learning letters and numbers ($b = \$8.53$).

6.3. Child care dimensions by race and ethnicity

Tables 9 (pages 53-55), 10 (pages 56-58) and 11 (pages 59-61) show the coding proportionate to effect analysis for each of the three specifications: desirability, fair weekly price, and willingness to pay. These analyses are shown for each racial and ethnic group: Hispanic, White and African American.

For each dimension, shown are the unstandardized coefficients and associated standard errors, and the ranking of the dimension in terms of its overall importance. By

¹³ $P = .059$.

design, the unstandardized (b coefficients) regression coefficients are a constant, approximately “1” because they are linear combinations of the levels within each dimension. The β weights indicate the relative impact each dimension has on the overall rating across all vignettes with higher values being more important.

Table 9 (page 53-55) shows the impact of child care dimensions on overall child care desirability by race and ethnicity. Table 10 (page 56-58) shows the impact of child care dimensions on fair weekly price by race and ethnicity. Table 11 (page 59-61) shows the impact of child care dimensions on willingness to pay by race and ethnicity. The ten most highly rated dimensions are shown for each group and for each type of analysis in Tables 12, 13 and 14 (pages 62 and 63 respectively).

Safety was the most important desired dimension for all three groups. Safety was important to African American respondents ($\beta = .253$), White respondents ($\beta = .226$) and Hispanic respondents ($\beta = .209$). No other dimension was ranked nearly as important as safety.

The Keystone STAR rating was the second most important dimension for both Hispanic and African American respondents ($\beta = .139$ and $.123$ for Hispanic and African American respondents respectively). For White respondents, the Keystone STAR rating ranked sixth in important. This rating system had salience particularly for African American and Hispanic respondents and communicated significant qualities about these day care situations to these families, independent of other characteristics.

All groups ranked planned activities as very important. White and African American respondents featured prominently the dimension associated with what language

Table 9

The Impact of Child Care Dimensions on Child Care Desirability for Hispanic, White and African American Welfare Leavers

	Hispanic			White			African American		
	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>
Type of care	1.001 (.827)	.031	17 ^a	1.001 (.580)	.060*	12 ^c	1.002 (.557)	.041*	14
Distance from work	1.002 (.493)	.051	12	1.000 (.373)	.089**	5	.997 (.994)	.021	17
Licensing	.998 (.635)	.039**	15	1.007 (2.264)	.015**	20	.998 (.448)	.047**	11
Keystone Star Rating	1.000 (.180)	.139***	2	.999 (.385)	.087	6	1.000 (.172)	.123***	2
Accreditation	.999 (.814)	.031	17 ^a	1.000 (1.123)	.030**	17 ^d	-.983 (5.237)	-.004	21
Care for subsidized children	1.000 (.430)	.059**	11	1.000 (.392)	.085	7	1.002 (.928)	.023	16
Offers evening and weekend care	1.000 (.378)	.066	10	.991 (3.131)	.011	21 ^f	1.002 (2.830)	.007	19
Extra hours of care	1.003 (.950)	.027	18	1.006 (3.231)	.011	21 ^f	1.009 (4.758)	.004	20
Training in child development	1.002 (.726)	.035	16	1.003 (.700)	.048	15	1.000 (.387)	.054*	10
Experience	1.000 (.197)	.128***	3	.999 (.619)	.055	14	1.000 (.309)	.068***	7
Warm and strict	1.000 (.359)	.070**	9	1.000 (.293)	.114***	2	1.001 (.198)	.106***	3
Provider demeanor	.986 (11.993)	.002	23	.991 (4.546)	.007	22	-.996 (4.748)	-.004	21

Table 9
The Impact of Child Care Dimensions on Child Care Desirability for Hispanic, White and African American Welfare Leavers
(continued)

	Hispanic			White			African American		
	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>
Attention level to children	.999 (.258)	.098**	6	1.000 (.521)	.064**	11	1.002 (.319)	.066**	8
Relationship to care provider	1.007 (7.705)	.003	22	1.004 (.858)	.041	16	.992 (2.124)	.011	19
Language spoken with children	1.001 (.634)	.040	14	1.001 (.366)	.093**	4	1.000 (.243)	.087***	5
Provider race/ethnicity	1.003 (1.261)	.020	20	1.004 (1.651)	.020	18 ^e	.998 (.823)	.026	15
Meets state regulations	1.001 (.317)	.080**	7	1.001 (.563)	.060*	12 ^c	1.000 (.250)	.084***	6
Group size	1.004 (2.827)	.009	21 ^b	.998 (1.682)	.020	18 ^e	1.004 (1.238)	.017	18
Religiosity	.989 (2.725)	.009	21 ^b	1.006 (2.149)	.016	19	.999 (.475)	.044**	12
Planned activities	.999 (.222)	.113***	4	1.000 (.403)	.084**	8	1.000 (.351)	.060**	9
Curriculum	1.003 (.962)	.026	19	1.000 (.495)	.068**	10	.997 (.802)	.026	15
Computers	1.000 (.240)	.106**	5	.998 (.608)	.056	13	1.000 (.203)	.104***	4
Holiday traditions	1.010 (2.706)	.009	21 ^b	.999 (.325)	.104**	3	-.996 (.906)	-.023	22
Safety	1.000 (.120)	.209***	1	1.000 (.148)	.226***	1	1.000 (.083)	.253***	1
Child race and ethnicity	1.000 (.337)	.075**	8	.999 (.439)	.077**	9	1.001 (.492)	.043**	13
Child family income	1.001 (.568)	.045	13	1.000 (1.107)	.030	17 ^d	-.999 (.745)	-.028	23

Table 9

The Impact of Child Care Dimensions on Child Care Desirability for Hispanic, White and African American Welfare Leavers (continued)

	Hispanic			White			African American		
	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>
Respondent mean rating	.955 (.042)	.566***		1.017 (.058)	.595***		.975 (.042)	.490***	
Constant		-.779*** (.318)		.247 (.443)			-.445 (.321)		
R ²	.502			.479			.398		
N	840			511			1408		

Note: a, b, c, d, e, f = tied ranking

* $p \leq .1$, ** $p \leq .05$, *** $p \leq .001$

Table 10
The Impact of Child Care Dimensions on Fair Weekly Price to Pay for Hispanic, White and African American Welfare Leavers

	Hispanic			White			African American		
	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>
Type of care	1.000 (1.123)	.022	18	1.000 (1.012)	.033	14	1.000 (.331)	.062**	6
Distance from work	-1.000 (1.029)	-.022	24	1.000 (1.514)	.021	18	1.000 (1.843)	.010	21 ^g
Licensing	1.000 (.316)	.072**	5	1.001 (5.381)	.006	20	-1.000 (.498)	-.037**	24
Keystone Star Rating	1.000 (.192)	.119***	2	1.000 (.377)	.087**	3	1.000 (.178)	.103***	2
Accreditation	1.000 (.813)	.028	16	1.000 (7.788)	.004	22	1.000 (1.398)	.013	19
Care for subsidized children	1.000 (.443)	.052**	10	1.000 (.769)	.042	10 ^c	1.000 (.486)	.038**	11
Offers evening and weekend care	1.000 (.769)	.030	14	1.000 (.790)	.042	10 ^c	1.000 (.777)	.024	15
Extra hours of care	1.000 (.784)	.029	15	1.001 (6.878)	.005	21 ^e	1.000 (1.924)	.010	21 ^g
Training in child development	1.000 (2.718)	.008	22	1.000 (.365)	.090**	1	1.000 (.293)	.063***	5
Experience	1.000 (.238)	.096***	3	1.000 (.418)	.079**	5	1.001 (.345)	.054***	7 ^f
Warm and strict	1.000 (.518)	.044**	11	1.000 (.431)	.076**	6	1.000 (.383)	.048***	10
Provider demeanor	1.000 (.856)	.027	17	1.000 (2.499)	.013	19	.975 (103.539)	.000	23

Table 10
The Impact of Child Care Dimensions on Fair Weekly Price to Pay for Hispanic, White and African American Welfare Leavers
(continued)

	Hispanic			White			African American		
	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>
Attention level to children	1.000 (.322)	.070**	6	1.000 (1.197)	.027	16	1.000 (.341)	.054**	7 ^f
Relationship to care provider	1.000 (2.183)	.012	21	1.000 (.579)	.058*	9	1.000 (1.358)	.015	18
Language spoken with children	1.000 (.716)	.032	13 ^a	1.000 (.847)	.039	11	1.000 (.367)	.050**	9
Provider race/ethnicity	1.000 (1.327)	.017	20 ^b	1.000 (1.492)	.022	17 ^d	1.000 (.840)	.022	16
Meets state regulations	1.000 (.429)	.053**	9	1.000 (.938)	.035	13	1.000 (.267)	.069***	4
Group size	1.000 (1.300)	.018	19	1.001 (6.606)	.005	21 ^e	1.000 (1.164)	.016	17
Religiosity	1.000 (.678)	.034	12	1.000 (.921)	.036	12	1.000 (.684)	.027	14
Planned activities	1.000 (.313)	.073***	4	1.000 (.552)	.059*	8	1.000 (.355)	.052**	8
Curriculum	1.000 (.707)	.032	13 ^a	1.000 (.376)	.086**	4	.999 (1.755)	.011	20
Computers	.918 (.325)	.065**	7	1.000 (1.516)	.022	17 ^d	1.000 (.216)	.085***	3
Holiday traditions	.999 (5.919)	.004	23	1.002 (37.610)	.001	23	1.000 (2.594)	.007	22
Safety	1.000 (.139)	.165***	1	1.000 (.452)	.072**	7	1.000 (.083)	.223***	1
Child race and ethnicity	1.000 (.414)	.055**	8	1.000 (.368)	.089**	2	1.000 (.512)	.036**	12
Child family income	1.000 (1.352)	.017	20 ^b	1.000 (1.025)	.032	15	1.000 (.591)	.032*	13

Table 10

The Impact of Child Care Dimensions on Fair Weekly Price to Pay for Hispanic, White and African American Welfare Leavers (continued)

	Hispanic			White			African American		
	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>
Respondent mean rating	.968 (.032)	.688***		1.008 (.050)	.673***		.991 (.028)	.655***	
Constant	-16.256 (5.862)			-8.914 (7.763)			-7.725 (4.695)		
R ²	.590			.506			.538		
N	839			511			1408		

Note: a, b, c, d, e, f, g = tied ranking

* $p \leq .1$, ** $p \leq .05$, *** $p \leq .001$

Table 11
The Impact of Child Care Dimensions on Willingness to Pay for Hispanic, White and African American Welfare Leavers

	Hispanic			White			African American		
	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>
Type of care	1.009 (.800)	.029	15	1.000 (.445)	.070**	7	1.000 (.501)	.040**	11
Distance from work	1.010 (1.135)	.020	17 ^b	1.000 (1.743)	.017	21	1.001 (3.309)	.006	22
Licensing	1.005 (.382)	.060**	8	1.001 (4.451)	.007	23 ^f	-1.000 (.524)	-.035*	24
Keystone Star Rating	.996 (.245)	.093***	3	1.000 (.359)	.082**	4	1.000 (.152)	.120***	2
Accreditation	1.016 (2.312)	.010	19 ^c	1.000 (.642)	.046	14	1.000 (1.282)	.014	18
Care for subsidized children	.850 (.411)	.047**	9	1.000 (1.078)	.027	19 ^e	1.000 (.764)	.024	16
Offers evening and weekend care	1.012 (.736)	.031	14 ^a	1.000 (2.280)	.013	22	1.000 (1.460)	.013	19 ^h
Extra hours of care	.985 (1.740)	.013	18	1.000 (4.041)	.007	23 ^f	1.000 (.474)	.039**	12
Training in child development	1.000 (1.154)	.020	17 ^b	1.000 (.610)	.049*	13	1.000 (.300)	.061***	6 ^g
Experience	.965 (.211)	.104***	2	1.000 (.552)	.054*	12	1.000 (.285)	.064***	5
Warm and strict	.997 (.622)	.036	12	1.000 (.262)	.111***	2	1.000 (.432)	.042**	10
Provider demeanor	.960 (2.601)	.008	21	1.000 (.766)	.038	16	.994 (70.254)	.000	23

Table 11
The Impact of Child Care Dimensions on Willingness to Pay for Hispanic, White and African American Welfare Leavers
(continued)

	Hispanic			White			African American		
	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>
Attention level to children	.998 (.319)	.071**	6	1.000 (.433)	.068**	8	1.000 (.300)	.061**	6 ^g
Relationship to care provider	.999 (.741)	.031	14 ^a	1.000 (.445)	.071**	6	.975 (2.532)	.008	21
Language spoken with children	1.012 (.816)	.028	16	1.000 (.379)	.078***	5	1.000 (.315)	.058**	7
Provider race/ethnicity	.985 (2.161)	.010	19 ^c	1.000 (6.704)	.004	24	1.000 (.533)	.034*	13
Meets state regulations	1.006 (.535)	.043*	10	1.000 (1.553)	.019	20	1.000 (.266)	.069***	4
Group size	.966 (2.980)	.007	22 ^d	1.000 (.751)	.039	15	1.000 (1.111)	.017	17
Religiosity	1.000 (.687)	.033	13	1.000 (1.072)	.027	19 ^e	1.000 (.564)	.032*	14
Planned activities	1.001 (.355)	.064**	7	1.000 (.513)	.057**	11	1.000 (.404)	.046**	9
Curriculum	1.013 (2.509)	.009	20	1.000 (.326)	.090**	3	1.000 (1.379)	.013	19 ^h
Computers	.900 (.249)	.083***	4	1.000 (.890)	.033	17	1.000 (.219)	.083***	3
Holiday traditions	.986 (3.320)	.007	22 ^d	1.000 (.953)	.031	18	1.000 (1.581)	.012	20
Safety	1.000 (.142)	.160***	1	1.000 (.218)	.134***	1	1.000 (.085)	.214***	1
Child race and ethnicity	.997 (.306)	.074***	5	1.000 (.444)	.066**	9	1.000 (.326)	.056**	8
Child family income	1.000 (.563)	.041*	11	1.000 (.462)	.063**	10	1.000 (.604)	.031*	15

Table 11

The Impact of Child Care Dimensions on Willingness to Pay for Hispanic, White and African American Welfare Leavers (continued)

	Hispanic			White			African American		
	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	β	<i>Rank</i>	<i>B</i> (<i>SE</i>)	<i>B</i>	<i>Rank</i>
Respondent mean rating	.978 (.032)	.700***		1.026 (.042)	.737**		.991 (.027)	.660***	
Constant	-10.858** (4.890)			.078 (6.399)			-8.771* (4.690)		
R ²	.594			.600			.546		
N	839			511			1407		

Note: a, b, c, d, e, f, g, h = tied ranking

* $p \leq .1$, ** $p \leq .05$, *** $p \leq .001$

Table 12
 Top Ten Ranked Child Care Dimensions on Child Care Desirability by Race and Ethnicity

Rank	Hispanic	White	African American
1	Safety	Safety	Safety
2	Keystone Star Rating	Warm and strict	Keystone Star Rating
3	Experience	Holiday traditions	Warm and strict
4	Planned activities	Language spoken with children	Computers
5	Computers	Distance from work	Language spoken with children
6	Attention level to children	Keystone Star Rating	Meets state regulations for child staff ratios
7	Meets state regulations for child staff ratios	Care for subsidized children	Experience
8	Child race and ethnicity	Planned activities	Attention level to children
9	Warm and strict	Child race and ethnicity	Planned activities
10	Offers evening and weekend care	Curriculum	Training in child development

Table 13
 Top Ten Ranked Child Care Dimensions on Fair Weekly Price by Race and Ethnicity

Rank	Hispanic	White	African American
1	Safety	Training in child development	Safety
2	Keystone Star Rating	Child race and ethnicity	Keystone Star Rating
3	Experience	Keystone Star Rating	Computers
4	Planned activities	Curriculum	Meets state regulations for child staff ratios
5	Licensing	Experience	Training in child development
6	Attention level to children	Warm and strict	Type of care
7	Computer	Safety	Attention level to children
8	Child race and ethnicity	Planned activities	Experience
9	Meets state regulations for child staff ratios	Knows provider	Planned activities
10	Care for subsidized children	Care for subsidized children	Language spoken with children

Table 14
 Top Ten Ranked Child Care Dimensions on Willingness to Pay by Race and Ethnicity

Rank	Hispanic	White	African American
1	Safety	Safety	Safety
2	Experience	Curriculum	Keystone Star Rating
3	Keystone Star Rating	Keystone Star Rating	Computers
4	Computers	Language spoken with children	Meets state regulations for child staff ratios
5	Computers	Knows provider	Experience
6	Attention level to children	Type of care	Specialized training
7	Planned activities	Attention level to children	Attention level to children
8	Licensing	Child race and ethnicity	Language spoken with children
9	Accepts subsidized children	Income level of children's families	Child race and ethnicity
10	Meets state regulations for child staff ratios	Planned activities	Planned activities

was spoken to the children. White and Hispanic respondents also ranked the race and ethnicity of other children in care as very important. White respondents, however, cared the most about dimensions less related to actual care of the children: celebrating holiday traditions, provider location's distance from work, and whether the care providers accepted subsidized children. The only non-child centered characteristic ranked highly by Hispanic respondents was whether care was offered during the evening and weekends. African American respondents did not rank highly any dimension that was unrelated to the child's care experience.

Hispanics and African American respondents were more similar to each other (than to White respondents) in their preference structures. Of significant importance to both groups were dimensions related to the professional characteristics of the provider, provider behavior toward the children, and regulatory compliance. For Hispanic and

African American respondents, these more important dimensions included provider experience, attention level to children, and whether the provider met state regulations for child staff ratios. Hispanic and African American respondents also ranked computers as being very important ($\beta = .106$ and $.104$ for Hispanic and African American respondents respectively). African American respondents gave the most attention to these types of provider and child centered dimensions and ranked training in child development as very important.

The coding proportionate to effect analysis shown in Table 10 indicates the dimensions that respondents felt were the most valuable monetarily in the form of a fair weekly price. Hispanic and African American respondents evaluated items similarly. The most valuable dimensions largely included those associated with the safety and quality of the child care environments. Safety, Keystone STAR ratings, provider experience, attention levels to children, and meeting state regulations for child staff ratios were worth more to Hispanic and African American respondents. African American respondents emphasized these characteristics as indicated by the larger β coefficients compared to either Hispanic or White respondents. Both White and Hispanic respondents valued more the particular race and ethnicity of the children in care and whether care was offered for subsidized children than African American respondents. Only African American respondents placed high importance on the type of facility (e.g., center or family day care). Only Hispanic respondents placed high importance on the licensing status of a provider.

As shown in Table 11, the willingness to pay analysis reveals more commonalities among all three groups. Several dimensions were salient to all three

groups: safety, Keystone STAR ratings, attention levels to children, and planned activities. Hispanic and African American respondents continue to value more having computers available and meeting state regulations for child staff ratios than White respondents. Only White respondents were willing to pay more for characteristics associated with the length of time they knew the provider and income levels of the children's parents. Only Hispanic respondents consistently emphasized the licensing status of a provider.

7. Discussion

The findings of this investigation show many commonalities in preferences as well as differences across parents from different racial and ethnic groups. The commonalities are important and indicate much more of a core understanding of what constitutes quality care among different racial and ethnic groups. Different groups may use different forms of child care, but the aspects of child care that parents want appear to be more similar than different. The findings in this study show important points where groups diverge in their preferences or where the intensity of preferences varies. Where they converge, however, is important to underscore.

A core element is safety of the care situation. Although White respondents placed less emphasis on safety, like African American respondents and Hispanic respondents, they evaluated care situations negatively that did not guarantee the safety of children. Safety weighed in so heavily in respondents' evaluations that its emphasis may have forced other less important, but salient, child care characteristics to be overlooked. In other words, if we took safety out of the factorial survey descriptions, we might find additional emphasis on other aspects of child care.

Taking safety out of the child care equation, however, is not reasonable, particularly for low-income families. The respondents' emphasis on safety reflects the consensus that no parent would knowingly put their child at risk of being in an unsafe child care setting. Safety remains a crucial child care issue but is particularly salient for low-income families for whom the health and safety of their children is an ongoing child care concern.

Respondents' emphases on the warmth and actions of the provider did not vary significantly by race and ethnicity. All three groups rated vignettes higher and would pay more for a provider who exhibited a warm demeanor. All three groups rated vignettes lower and would pay less for a provider who did not give the children individual attention.

All three groups also viewed state regulations for staff child ratios as important. They also emphasized and would pay more for providers with experience and who provided planned activities for the children.

A core set of preferences converged around safety, state regulation about child staff ratios, the planning of activities, and provider warmth and experience. Yet there were few systematic preferences for any particular type of care. For African Americans, relative care was worth less than neighbor care but overall, vignettes were ranked neither higher nor lower if they described center care or any other particular type of care, net of the other characteristics described as part of the child care setting. Although previous researchers have suggested that African American respondents use center care more than other groups and Hispanic respondents use kith and kin care more than other groups, these type of care choices may reflect different understandings of what additional

characteristics each type of care offers. That is, each group may believe that the type of care they use brings with it more safety, more planned activities, legally acceptable staff child ratios, and warm and experienced providers.

All three groups emphasized the importance of the Pennsylvania child care rating system named Keystone STARS, although in varying degrees. African American and Hispanic respondents placed the most emphasis on Keystone STARS and White respondents placed the least emphasis on Keystone STARS. But for all three groups, the Keystone STARS dimension made it into the top ten most important dimensions evaluated. Without any prior explanation about the Keystone STARS program, African American and Hispanic respondents systematically gave higher ratings for described child care setting that were assigned more stars by this government rating system. It is important to remember that by design, the number of stars was deliberately not correlated with any other indicator of quality. Nevertheless, respondents tended to rank situations with more stars as more desirable, thought they were worth more, and were willing to pay more for care in child care settings with larger numbers of stars.

At the same time, all groups exhibited total and complete indifference to whether a child care situation was accredited. Accredited child care situations were neither more desirable nor worth more, suggesting that accreditation, for this sample, may not appear to be an indicator of quality. Perhaps, our respondents were unfamiliar with how the term accreditation is used to convey the quality of care.

African American and Hispanic child care preference structures were more similar to each other than to White preference structures. Both African American and Hispanic respondents valued and would pay more for licensed care as well as for care

rated higher by the Keystone STAR Rating system. They also wanted care situations to have computers available. White respondents exhibited overall indifference to the number of stars, the care situation's licensing status, and the availability of computers. Overall, African American and Hispanic respondents rated more highly the same child care dimensions.

White respondents cared about some different child care characteristics. They valued care offered by settings in which they knew the providers for a long time, children learned letters and numbers and that celebrated more than their own holiday traditions. They were willing to pay more to have their children be in care situations among other low-income children. These characteristics were unimportant to African American and Hispanic respondents. White respondents shared with Hispanic respondents the desire to have their child care be close to where they worked and to have their care provider accept subsidized children. White respondents shared with African American respondents concerns about what language was spoken to the children in care (not all Spanish).

Almost uniformly, the race and ethnicity of the other children in care or the provider were not important. Only African American respondents were willing to pay more for care where the provider was also African American. Race and ethnicity were not revealed to be part of a core set of child care preferences for either Hispanic, African American or White respondents.

Although many day care situations are in religious institutions, the teaching of religion in a child care setting was important to African Americans, but not important to Hispanic or White respondents. Only African American respondents ranked vignettes higher if they included religious teaching.

Overall, Hispanic and African American respondents seemed to be more tuned into child care as a system regulated by government than White respondents. This is suggested by their preferences for care that follows state regulations for staff child ratios, licensing (Hispanic respondents only), and for care rated by the Keystone STARS Rating System. Hispanic and African American respondents paid attention to the role of agencies external to the child care environment to establish markers of quality. White respondents gave far less attention to child care characteristics associated with government or regulation.

8. Conclusion and recommendations

This research does not support the conclusion that race and ethnicity are a major source of division in preferences for child care. According to our findings, there is not an idealized Hispanic or Latino model of child care competing against either a White or African American idealized model of child care, at least among low-income welfare leavers. Rather there appears to be more consensus around desired core care attributes.

Although there appears to be consensus about what is wanted from care, the greatest commonalities in preferences were between African American and Hispanic respondents. In addition, African American and Hispanic respondents seemed more attentive to issues associated with the regulation of care. Moreover, they appeared to believe that care associated with regulation or rated by government was more desirable care. They were for, not against, regulated care. White respondents were not negative about regulated care. Rather they were more indifferent to child care dimensions associated with regulation.

The small level of interest in the type of care (e.g., center care) combined with the strong interest in quality features indicates that people are concerned with quality independent of the type of child care facility. In the uncorrelated vignette world, quality and type of care are unrelated. But in the real world, quality and care type may be related. Parent education may be needed for parents to realize that these features can be separated from type of care and that some types of care – such as center care – can offer some of the qualities that they seek.

Of particular policy significance is the finding that the Keystone STARS Rating System operated as an indicator of quality for respondents. A recent evaluation of the Keystone STARS Rating System showed that it was a reliable indicator of quality (Barnard et al., 2006). The ability to have a government rating system that reliably measures child care quality conveys this information to the public, who then can use this information to make informed child care decisions is critical because evaluating the quality of care is so difficult for parents. If people are aware of the rating of different care situations, families could more easily make better child care decisions. Our research suggests that a star based rating system could establish markers of quality that could be easily communicated to, and understood by, low-income communities varying by race and ethnicity.

9. References

- Barnard, W., Smith, W.E., Fiene, R. & Swanson, K., 2006. Evaluation of Pennsylvania's Keystone STARS quality rating system in child care settings. Harrisburg, PA: Pennsylvania Office of Child Development.
- Capizzano, J., Adams, G., & Sonenstein, F., 2000. Child care arrangements for children under five: Variations across states. *New federalism: National survey of America's families, Series B (No. B-7)*. Washington, DC: The Urban Institute.
- Child Care Subsidy Rate Policy Task Force, 2004. Report of the Build Subsidized Child Care Rate Policy Task Force: Recommendations for action. Harrisburg, PA: Pennsylvania Department of Education.
- Clarke-Stewart, A. and Allhusen, V. D., 2005 *What we know about childcare*. Cambridge, MA: Harvard.
- Coley, R. L., Chase-Lansdale, P. L., and Li-Grining, C., 2001. Child care in the era of welfare reform: Quality, choices and preferences. Policy Brief 01-04. Baltimore, MD: Johns Hopkins University.
- Commonwealth of Pennsylvania, 2007. Attachment 1b – Analysis of ceiling percentiles calculated from 05 Market Rate Survey. Retrieved from www.dpw.state.pa.us/Child/ChildCare/ChildCareDevFund/003673729.htm, January 26, 2007.
- Cryer, D. & Burchinal, M., 1997. Parents as child care consumers. *Early Childhood Research Quarterly*, 12, 35-58.
- Ehrle, J., Adams, G., & Tout, K., 2001. Who's caring for our youngest children? Child care patterns for infants and toddlers. *New federalism: National survey of America's families*. Washington, DC: The Urban Institute.
- Early, D. M. & Burchinal, M. R., 2002. Early childhood care: Relations with family characteristics and preferred care characteristics. *Early Childhood Research Quarterly*, 16, 475-497.
- Fiene, R., Greenberg, M., Bergsten, M., Fegley, C., Carl, B., & Gibson, E., 2002. The Pennsylvania early childhood quality setting study. Research report prepared for the Task Force on Early Childhood Care and Education, Governor Schweiker's Policy Office, Commonwealth of Pennsylvania.
- Fuller, B., Hollaway, S., & Liang, X., 1996. Family selection of child care centers: The influence of household support, ethnicity, and parental practices. *Child Development*, 67, 3320-3337.

- Holloway, S. D., & Fuller, B., 1999. Families and child care: Divergent viewpoints. In S. Helburn (Ed.), *The child care crisis*, Annals of the American Political Science Association, 56, 98-115.
- Holloway, S. D., Rambaud, M. F., Fuller, B., & Eggers-Piérola, C., 1995. What is “appropriate practice” at home and in child care? Low-income mothers’ views on preparing their children for school. *Early Childhood Research Quarterly*, 10, 451-473.
- Kisker, Ellen E., & Silverberg, M., 1991. Child care utilization by disadvantaged teenage mothers. *Journal of Social Issues*, 47(2), 159-177.
- Liang, X., Fuller, B., & Singer, Judith D., 2000. Ethnic differences in child care selection: The influence of family structure, parental practices, and home language. *Early Childhood Research Quarterly*, 15(3), 357-384.
- Meyers, Marcia K., 1995. Child care and welfare reform: Findings from California. Paper presented at child care workshop, Board on Children and Families, February 21, 1995. Department of Public Administration, Maxwell School of Citizenship and Public Affairs, Syracuse University.
- NICHD Early Child Care Research Network, 1999. Child outcomes when child care center classes meet recommended standards for quality. *American Journal of Public Health*, 89, 1072-1077.
- Peyton, V., Jacobs, A., O'Brien, M. & Roy, C., 2001. Reasons for choosing child care: Associations with family factors, quality, and satisfaction. *Early Childhood Research Quarterly*, 16, 191-208.
- Pungello, E. P. & Kurtz-Costes, B., 1999. Why and how working women choose Child Care: A Review with a Focus on Infancy. *Developmental Review*, 19, 31-96.
- Rossi, P. H. and Anderson, A.B., 1982. The factorial survey approach and introduction. In P. H. Rossi & S. L. Nock (Eds.), *Measuring social judgments: The factorial survey approach* (pp. 15-67). Beverly Hills, SAGE Publications.
- Shlay, A. B., Weinraub, M., Harmon, M., 2007. Leaving welfare for employment: The role of child care subsidies for White, Hispanic and African American families. Philadelphia, PA: Temple University Family and Children’s Policy Collaborative, Philadelphia, PA.
- Shlay A.B., Tran, H., Weinraub, M., Harmon, M., 2005. Teasing apart the child care conundrum: A factorial survey analysis of perceptions of child care quality, fair market price and willingness to pay by low-income, African American mothers. *Early Childhood Research Quarterly*, 20, 393-416.

- Sonenstein, F. L., & Wolf, D. A., 1991. Satisfaction with child care: Perspectives of welfare mothers. *Journal of Social Issues*, 47(2), 15-31.
- Stevenson, H. W., Chen, C., & Uttal, D. H., 1990. Beliefs and achievement: A study of black, white, and Hispanic children. *Child Development*, 61, 508-523.
- Tran H., Shlay, A. B., Weinraub M., & Harmon, M., 2004. Barriers to subsidies: Why low-income families do not use child care subsidies. *Social Science Research*, 33, 134-157.