As part of the Assessing the New Federalism project, this study investigated the number of child care arrangements that employed mothers with children under 5 years old. The study began by examining national and state estimates of the number of arrangements used by these children, focusing on how these patterns differ for children of different ages. Then, the types of child care arrangements that are combined when parents use multiple arrangements were studied. Data are from the 1997 National Survey of America's Families, a survey of 44,461 that oversampled families with income below 200% of the federal poverty level and collected information on a nationally representative sample of children and children in 12 states. Across the county, almost 2 in 5 children under 5 years with employed mothers are in 2 or more nonparental child care arrangements each week. The percentage of children in multiple arrangements varies somewhat by state, but there is relatively little variation from the national average. Younger children across the United States are less often in multiple child care arrangements than 3- and 4-year-olds, who are more likely to be in three or more arrangements. However, low-income children are no more likely to be in multiple child care arrangements than those from higher-income families. It is important to note that while the use of multiple arrangements is widespread, it is not clear whether it has a detrimental impact on parents or children. (SLD)
The Number of Child Care Arrangements Used by Children under Five: Variation across States

Jeffrey Capizzano and Gina Adams

Balancing employment and child rearing can be a complex endeavor for parents with preschool children. With roughly 76 percent of children under five with employed parents in some form of nonparental care each week, often for many hours, parents must sometimes use more than one child care arrangement. For example, parents may primarily use a center-based child care arrangement or family child care home, but also may rely on a relative for some hours each week. Relatively little is known about the reasons behind the use of multiple child care arrangements; parents may desire to expose children to a number of different environments, or they may need more than one arrangement to cover all of the hours of their employment. Factors such as the availability of certain types of child care, the costs of care, the ability of parents to pay for care, and the differences between work schedules and the hours of child care programs may also play a role in parents’ use of more than one child care arrangement.

This brief investigates the number of child care arrangements that children under five with employed mothers use each week nationally and across selected states. State patterns in the use of multiple child care arrangements are examined because it is likely that great diversity exists across states, due in part to differences in the costs and supply of child care as well as variations in labor force patterns and child care policies. It is important to note that the consistent weekly use of multiple child care arrangements is being investigated here, not the stability of child care arrangements over time (i.e., the number of different sequential arrangements that a child may experience over a certain time period). This analysis of the use of multiple child care arrangements is important because such practices represent an important dimension of the child care experiences of America’s families.

For those preschool children in child care, being in more than one child care arrangement each week is a fairly common experience.

We begin by examining national and state estimates of the number of arrangements used by children under five with employed mothers. We focus on how these patterns vary for children of different ages (infants and toddlers contrasted with three- and four-year-olds) and for children in low- and higher-income families. Finally, we analyze the types of child care arrangements that are combined when parents use multiple arrangements for their children.

The National Survey of America’s Families

Data from the 1997 National Survey of America’s Families (NSAF) are used to examine the use of multiple child care arrangements. The NSAF oversampled households with income below 200 percent of the federal poverty level (FPL) and collected child care information on a nationally representative sample of children, as well as on representative samples of children in 12 states. For randomly selected children in the sample households, interviews were conducted with the person most knowledgeable about each child. Since the mother was most often the most knowledgeable adult, the term “mother” is used here to refer to this respondent. The interviewers asked the mother about the categories of care used by her child and about the number of hours that the child spent in each category of care.

Our estimates may undercount slightly the actual number of arrangements used by families, as the survey did not always capture multiple arrangements if they fell within the same category of care. This analysis focuses only on children under five whose mothers were interviewed during the nonsummer months. The analysis is also restricted to preschool children whose mothers are employed and to those children who have a nonparental child care arrangement. Nonparental arrangements include a...
child care center, nursery, or preschool program; a before- or after-school program; a family child care home; a baby-sitter or nanny; a relative in the child’s home; and a relative in the relative’s home. We sum the number of arrangement types that each preschool child is in each week on a regular basis and examine the proportion of children in one, two, or three or more child care arrangements.

How Many Arrangements Are Preschool Children in Each Week?

The National Picture

Nationwide, a large minority of children under five with employed mothers is in two or more nonparental child care arrangements each week. Almost two out of five (38 percent) children in nonparental care have more than one regular child care arrangement each week (figure 1). Most of these children are in two arrangements—30 percent—while 8 percent have three or more. The remaining 62 percent have only a single child care arrangement.

State Patterns

While the percentage of children in multiple arrangements varies somewhat by state, there is relatively little variation from the national average (figure 2). The focus below is on the states with the highest and lowest shares of children under five in multiple arrangements are highlighted.7

Across the individual states, findings show that:

- In each state, at least one in three children using nonparental care is regularly placed in more than one child care arrangement each week. Minnesota, Michigan, and Wisconsin have the largest percentage of children regularly in multiple arrangements (46, 45, and 45 percent of children, respectively), while California has the smallest percentage of children in more than one arrangement each week (35 percent).

Multiple Child Care Arrangements among Children of Different Ages

When examining the use of multiple child care arrangements, it is important to look separately at preschool children of different ages because parents tend to make different choices for the care of their infants and toddlers versus their three- and four-year-olds. These differences across the two age groups may be a result of different preferences for the care of infants and toddlers versus three- and four-year-olds or may be because parents have different forms of care more readily available to them. For example, three- and four-year-olds are more likely to have access to day-care programs, such as Head Start and state prekindergarten programs, which may result in a greater use of multiple arrangements among this group. Therefore, it is useful to examine the number of child care arrangements used by children under three in contrast to the numbers used by three- and four-year-olds.

Multiple Child Care Arrangements among Children under Five (1997)*

<table>
<thead>
<tr>
<th>Percentage of Children</th>
<th>One</th>
<th>Two</th>
<th>Three or More</th>
</tr>
</thead>
<tbody>
<tr>
<td>62%</td>
<td></td>
<td>30%</td>
<td>8%</td>
</tr>
</tbody>
</table>

Source: Urban Institute calculations from the 1997 National Survey of America’s Families. Percentages are for children in nonparental child care only. A sizable percentage of children with employed parents are not placed in nonparental child care. See, for example, brief B-7 in this series.

*Children in nonparental care only.
The Nation Overall

Among preschool children in nonparental care with employed mothers nationwide, infants and toddlers are less often in multiple child care arrangements than three- and four-year-olds. Specifically, 34 percent of children under three are regularly in multiple child care arrangements, compared with 44 percent of three- and four-year-olds (table 1). This difference in the use of multiple child care arrangements is driven almost entirely by the greater use of three or more arrangements by three- and four-year-old children. While children under three are equally as likely as three- and four-year-olds to be in two arrangements per week (30 percent and 31 percent, respectively), three- and four-year-olds are much more likely to be in three or more arrangements (13 percent, compared with 4 percent).

Variation across the States

For both age groups across states, there is a good deal of variation in the percentage of children in multiple child care arrangements each week.

Infants and Toddlers. Among infants and toddlers in nonparental care, every state examined has a sizable portion—at least one quarter—in multiple child care arrangements, although some states have significantly higher proportions (figure 3). The use of three or more arrangements for infants and toddlers, however, is not common across the focal states. Specifically:

- In Michigan, 41 percent of children under three are in more than one child care arrangement; in contrast, only 27 percent in Mississippi are in multiple arrangements.
- Florida has the largest percentage of infants and toddlers in three or more arrangements (8 percent). New York has the smallest proportion of infants and toddlers in three or more arrangements, less than 1 percent.

Three- and Four-Year-Olds. A substantial number of three- and four-year-olds are in two or more nonparental arrangements per week in many of our focal states, but the percentages vary widely (figure 4):  
- Over 50 percent of these children have multiple child care arrange-
ments in Washington, Minnesota, Michigan, and New York (56, 55, 51, and 52 percent, respectively), while only 35 percent of three- and four-year-olds are in multiple arrangements in California.

- Minnesota and New York have nearly one in five three- and four-year-old children in three or more arrangements per week (each with 19 percent); California has the smallest percentage (7 percent).

**Variation within each State**

Large differences also exist in the number of arrangements for children of different ages within each state. Comparing infants and toddlers with three- and four-year-olds shows that within almost all states, older preschool children are more likely to be in multiple arrangements per week than are infants and toddlers. Specifically:

- The largest differences between the number of arrangements used by these two age groups occur in Washington, Mississippi, and New York (table 1). In these states, the percentage of three- and four-year-olds using multiple arrangements is close to 20 percentage points greater than for infants and toddlers. In California, however, there is virtually no difference in the use of multiple child care arrangements between older and younger pre-school children.
- As is true nationally, in many states the large differences in the use of multiple child care arrangements can be attributed to the greater use of three or more arrangements by three- and four-year-olds. In New York, for example, 19 percent of three- and four-year-olds are in three or more arrangements each week, compared with less than 1 percent of infants and toddlers (table 1). California and Florida are exceptions, as each of these states has a similar proportion of infants and toddlers and three- and four-year-olds in three or more arrangements.

**Multiple Child Care Arrangements for Families of Different Incomes**

A common hypothesis is that the use of multiple child care arrangements is greater among low-income families than higher-income families. Parents from low-income families are more likely to work odd-hour jobs, have access to a smaller range of child care options, and have a family composition different from higher-income families. These differences may make it more difficult for low-income parents to find one arrangement to cover all of their child care needs, potentially leading to a higher use of multiple arrangements. In addition, many part-day preschool programs (such as Head Start and state prekindergarten programs) are targeted toward low-income children. Therefore, it is important to examine separately the use of multiple arrangements among the low-income population and higher-income families.8

**Nationally**

Contrary to this hypothesis, findings show that low-income children are no more likely to be in multiple nonparental child care arrangements than are higher-income children. Across the nation, 37 percent of chil-
Children from low-income families are regularly in multiple child care arrangements, compared with 40 percent of higher-income children (table 1). Children from low-income families are also no more likely to be placed in three or more arrangements each week: 7 percent of low-income children are regularly in three or more arrangements, compared with 9 percent of higher-income children.

Across the States

Examining children from different income groups across states reveals a good deal of state variation in the percentage of children in each income group in multiple child care arrangements.

Low-Income Families. Every state has less than half of low-income preschool children with employed parents in multiple child care arrangements, though there is some variation (figure 5). Specifically:

- Massachusetts has the largest percentage of low-income children in multiple child care arrangements (48 percent), while New Jersey and Mississippi have the smallest percentages (32 and 31 percent, respectively).
- Massachusetts and Minnesota have 16 and 13 percent of low-income children in three or more nonparental arrangements, respectively; Michigan has only 2 percent.

Higher-Income Families. Variation exists across states in the use of multiple child care arrangements among children from higher-income families (figure 6):

- Michigan has the largest percentage of higher-income children in multiple child care arrangements (49 percent); California has the smallest percentage (34 percent).

Comparisons within States

Looking at income differences within states shows that most states mimic the national pattern, with the proportion of children in multiple arrangements being similar for the low- and higher-income populations. Specifically, data show that:

- In 7 of the 12 focal states, the difference in the share of each income group using multiple arrangements is 5 percentage points or less (table 1). In Texas, for example, there is virtually no difference between the proportion of low- and higher-income children in multiple arrangements (36 percent and 37 percent, respectively). In contrast, however, the percentage of higher-income children in multiple arrangements in Michigan is 14 points higher than that of low-income children (49 percent, compared with 35 percent).

What Types of Child Care Arrangements Are Combined?

With close to 40 percent of preschool children in multiple nonparental child care arrangements nationally, and as many as 46 percent in such arrangements in some states, the question arises as to what types of multiple arrangements families are using. While this question cannot be examined here for individual states, nationally, most of those children that are placed in multiple child care arrangements (65 percent) are placed in some combination of "formal" (such as center-based and family
child care) and “informal” (such as relatives and nannies or baby-sitters) arrangements (table 2). For example, among those children in multiple arrangements each week, 24 percent are placed in a center-based arrangement and with a relative each week, 9 percent are placed in a center-based arrangement and with a nanny/baby-sitter, and 7 percent are placed in a family child care home and with a relative.

A much smaller percentage of those children using multiple arrangements are placed exclusively in combinations of formal arrangements (20 percent). Finally, 15 percent of those children with two or more arrangements are in a combination of different informal care arrangements—13 percent are with two relatives and the remaining 2 percent are with a relative and a nanny/baby-sitter.

Variation by Age

The age of the preschool child affects the types of care that are combined (table 2). Infants and toddlers using multiple child care arrangements are more likely to be in two informal arrangements than are three- and four-year-olds. Twenty-four percent of infants and toddlers with multiple arrangements use combinations of informal arrangements, compared with 7 percent of three- and four-year-olds. Conversely, three- and four-year-olds using multiple arrangements are more likely to use two formal arrangements than are younger children: 25 percent of older preschool children are in all formal arrangements, compared with 15 percent of infants and toddlers. Both of these age groups, however, are still most likely to have some combination of formal and informal child care. Seventy percent of three- and four-year-olds and 61 percent of infants and toddlers in multiple arrangements use a mixture of formal and informal arrangements.

Variation by Income

Low- and higher-income families, however, do not differ in the extent to which they use combinations of formal and informal care. Children from low- and higher-income families are equally likely to combine two formal arrangements (21 percent of higher-income children, compared with 19 percent of low-income children) and be in combinations of informal arrangements (14 percent of higher-income children and 17 percent of low-income children). Likewise, children from both income groups are equally likely to have some combination of formal and informal care each week (64 percent of low-income children and 63 percent of higher-income children).

Conclusions

In this analysis of the use of multiple child care arrangements, a number of findings emerge. First, for those preschool children who are in nonparental care, placement in more than one child care arrangement is a fairly common experience—nationally and across individual states. Indeed, nationwide, nearly two out of five preschool children (38 percent) in nonparental care are in multiple child care arrangements each week, with individual states not varying considerably from this average. Further, multiple arrangements are common among both infants and toddlers and three- and four-year-olds (34 and 44 percent, respectively). Three- and four-year-olds, however, are three times as likely as younger preschool children to be in three or more arrangements nationally, with even larger differences evidenced in certain states. Finally, low- and higher-income parents are equally likely to use multiple arrangements, but there seems to be greater variation among the low-income

Table 2

<table>
<thead>
<tr>
<th>Combinations of Nonparental Arrangements: Children under Five with Employed Mothers, by Child's Age and Income</th>
</tr>
</thead>
<tbody>
<tr>
<td>Combinations</td>
</tr>
<tr>
<td>-------------------------------------------------------------</td>
</tr>
<tr>
<td><strong>Formal Arrangements Only</strong></td>
</tr>
<tr>
<td>Center-Based + Center-Based</td>
</tr>
<tr>
<td>Center-Based + Family Child Care</td>
</tr>
<tr>
<td>Three Formal Arrangements</td>
</tr>
<tr>
<td>Total</td>
</tr>
<tr>
<td><strong>Combination of Formal and Informal</strong></td>
</tr>
<tr>
<td>Center-Based + Relative</td>
</tr>
<tr>
<td>Center-Based + Nanny/Baby-sitter</td>
</tr>
<tr>
<td>Family Child Care + Relative</td>
</tr>
<tr>
<td>Family Child Care + Nanny/Baby-sitter</td>
</tr>
<tr>
<td>Center + Two Relatives</td>
</tr>
<tr>
<td>Center + Family Child Care + Nanny/Baby-sitter</td>
</tr>
<tr>
<td>Center + Family Child Care + Relative</td>
</tr>
<tr>
<td>Other Combinations of Three Arrangements</td>
</tr>
<tr>
<td>Total</td>
</tr>
<tr>
<td><strong>Informal Arrangements Only</strong></td>
</tr>
<tr>
<td>Relative in Child's Home + Nanny/Baby-sitter</td>
</tr>
<tr>
<td>Relative in Home + Relative out of Home</td>
</tr>
<tr>
<td>Total</td>
</tr>
<tr>
<td><strong>Sample Size</strong></td>
</tr>
</tbody>
</table>


Note: Percentages do not sum to 100 as a result of rounding.
population than among higher-income families in the use of multiple arrangements across states.

In addition, it was expected that low-income children would be more likely to be in multiple nonparental child care arrangements; this turns out not to be the case. Nationally and across most states, children from low-income families are no more likely to be in multiple arrangements than higher-income children. In fact, in the only state where a statistically significant difference between the two populations was found—Michigan—higher-income children were more likely to be in multiple arrangements than children from low-income families.

Finally, most children who have multiple child care arrangements nationally are in a combination of formal and informal care, regardless of age or income. Older children, however, are slightly more likely than infants and toddlers to be in combinations of all formal arrangements (such as a center and family child care home), while children under three are more likely to be in two "informal" child care arrangements. There are no differences between children from families of different incomes in the extent to which they rely on combinations of formal and informal arrangements.

It is also important to note that while the use of multiple arrangements is widespread, it is not clear whether it has a detrimental impact on parents or children. Coordinating multiple arrangements may add to the complexity and stress of balancing employment and child rearing, but it may also provide greater reliability of care because of the presence of alternative child care arrangements should one form of care be unavailable (Folk and Yi 1994). While research has found that unstable and disrupted arrangements over time are detrimental to children, little research has been conducted on the impact of multiple stable arrangements. Future research should investigate the relationship between multiple child care arrangements, parental stress, and the development of children. What is clear, however, is that parents commonly use multiple child care arrangements for their preschool children, making it an issue for many American families that must balance work and raising children.

Notes

The authors thank James Barsimantov for his excellent research assistance as well as Alan Weil, Stefanie Schmidt, Joan Lombardi, and Sandy Hoffarth for helpful comments on earlier versions of the brief.

1. The NSAF is a national survey of over 44,000 households and is representative of the noninstitutionalized, civilian population of persons under age 65 in the nation as a whole and in 13 focal states.

2. The states are Alabama, California, Florida, Massachusetts, Michigan, Minnesota, Mississippi, New Jersey, New York, Texas, Washington, and Wisconsin. Colorado is also a focal state in the Assessing the New Federalism (ANF) project but is not included in these analyses. Due to the late addition of Colorado to the ANF project, responses to the child care questions from a large number of Colorado respondents were received during the summer months and did not provide information on nonsummer child care arrangements, which are the focus of this analysis. Because of the small size of the nonsummer sample from Colorado, it is excluded from the analysis.

3. The mother of the child was the "most knowledgeable adult" for 78.5 percent of the children in the sample.

4. For more on NSAF survey methods, including the "most knowledgeable adult," see Dean Brick et al. (1999).

5. To capture child care arrangements, mothers were asked if the child attended any of three separate categories of center-based care: Head Start; a group or day care center, nursery, preschool, or prekindergarten program; or a before- or after-school program. Mothers were also asked about baby-sitting in the home by someone other than them or their spouse and questioned about "child care or baby-sitting in someone else's home." A child can be cared for in two center-based arrangements within the same category (two nursery schools, for example), two different baby-sitters in the child's home, or two different individuals outside the child's home. In these cases, the NSAF captures only one of the arrangements and therefore undercounts the number of arrangements used by that parent. These undercounts, however, are small. For example, NSAF's percentage of children in two center-based arrangements is 5 percentage points lower than National Childhood Education Survey (NCES) estimates, another nationally representative data source. This is also true of NSAF data about the percentage of children regularly cared for by two different relatives, which is 4 percentage points lower than the NCES.

6. Because child care arrangements and the hours spent in care can vary widely from the school year to the summer, the observations with data on child care relating to the summer months (June 12 to September 26) were not included in this analysis. The observations that are included in the analysis are weighted to provide representative data on child care during the school year. Our data set contains a total of 3,974 children under five with employed mothers, and each state sample contains at least 214 children.

7. The states that have the highest and lowest percentages of children in multiple arrangements are presented here; they are statistically different from each other at the .05 level. Differences among other states not presented in the text may or may not be statistically significant. In addition, one should be cautious in interpreting the actual point estimates. Confidence intervals around the national point estimates averaged +/- 3 percentage points, while intervals around subpopulation point estimates within states were larger (+/- 8 percentage points for our state estimates of age and income subpopulations).

8. Here we define low-income families as families with incomes at or below 200 percent of the FPL—i.e., $25,258 for a family of two adults and one child in 1997. Higher-income families are defined as those above 200 percent of the poverty level.

9. While there is no common definition of "formal" and "informal" child care, "formal" child care arrangements refer to child care settings that are more likely to be regulated by state licensing systems. These include most center-based arrangements and, depending on the state, the majority of family child care homes. "Informal" arrangements refer to care settings that are seldom regulated by state licensing agencies, including relative care and baby-sitters or nannies in the child's home.

10. These figures may be slightly underestimated (see note 5). Given the small size of the underestimation, however, it is unlikely that these percentages were significantly influenced by the undercount.

References


This series presents findings from the National Survey of America’s Families (NSAF). First administered in 1997, the NSAF is a survey of 44,461 households with and without telephones that are representative of the nation as a whole and of 13 selected states (Alabama, California, Colorado, Florida, Massachusetts, Michigan, Minnesota, Mississippi, New Jersey, New York, Texas, Washington, and Wisconsin). As in all surveys, the data are subject to sampling variability and other sources of error. Additional information about the survey is available at the Urban Institute Web site: http://www.urban.org.

The NSAF is part of Assessing the New Federalism, a multiyear project to monitor and assess the devolution of social programs from the federal to the state and local levels. Alan Weil is the project director. The project analyzes changes in income support, social services, and health programs. In collaboration with Child Trends, the project studies child and family well-being.


About the Authors

Jeffrey Capizzano is a research associate in the Urban Institute’s Population Studies Center. He has written and published in the areas of transportation and welfare policy and is currently working on an investigation of child care policy in 13 states.

Gina Adams is a senior research associate in the Urban Institute’s Population Studies Center, where she is responsible for directing research on child care and early education. Her research efforts focus on policies and programs that affect the affordability, quality, and supply of child care and early education, as well as on the child care arrangements of families.

Publisher: The Urban Institute, 2100 M Street, N.W., Washington, D.C. 20037
Copyright © 2000
The views expressed are those of the authors and do not necessarily reflect those of the Urban Institute, its board, its sponsors, or other authors in the series.
Permission is granted for reproduction of this document, with attribution to the Urban Institute.
For extra copies call 202-261-5687, or visit the Urban Institute’s Web site (http://www.urban.org) and click on “Assessing the New Federalism.”
NOTICE

Reproduction Basis

☑️ This document is covered by a signed "Reproduction Release (Blanket)" form (on file within the ERIC system), encompassing all or classes of documents from its source organization and, therefore, does not require a "Specific Document" Release form.

☐ This document is Federally-funded, or carries its own permission to reproduce, or is otherwise in the public domain and, therefore, may be reproduced by ERIC without a signed Reproduction Release form (either "Specific Document" or "Blanket").