Child Care and Transit

Making the Link in California

A State Planning and Research Project funded by
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LINCC
CONNECTING CHILD CARE + ECONOMIC DEVELOPMENT

4Cs
Child Care Coordinating Council

Caltrans 5313(b) *Statewide Transit Planning Studies*
Child Care and Transit: Making the Link in California

Executive Summary

Purpose
This study assesses the impact of child care location on parents' use of public transit. It examines child care centers in California that are located within one-third of a mile of transit stations, some of which were intentionally developed in connection with transit station area planning. Considering these cases where parents and staff might be most likely to use public transit, the study investigates the factors that influence transit ridership, and offers recommendations for how to strengthen this connection.

Background & Methods
The research was conducted by Local Investment in Child Care (LINCC), a collaborative of child care intermediaries, with the Child Care Coordinating Council of San Mateo County (4Cs) as a working partner and fiscal sponsor. The project was made possible by a statewide planning grant from the California State Department of Transportation (Caltrans), issued through the Metropolitan Transportation Commission (MTC) in 2006.

The methods of data collection included a review of the existing literature, a survey of 781 child care consumers (parents) at 19 transit-oriented child care centers throughout California, telephone and in-person interviews of 22 child care administrators (center directors), and interviews with local transportation agency professionals and government officials who were involved in the development of stations that include child care nearby. Survey distribution and data collection occurred between April and June of 2007.

Findings
The survey found that the majority of parents use cars for child care drop off and pick up, even in centers that are close to transit. However, a substantially higher percentage of parents in the survey sample (7-8%) used transit to get to and from child care when compared with national estimates of transit use by parents (2%). In San Francisco and Los Angeles, 13% of parents used transit to get their children from home to child care and 25% used transit to get from the child care center to their final destination (usually work). The largest mode share with transit was walking.

The study considers a number of variables that might explain differences in transit usage among the cases examined. It reveals key barriers to transit usage by parents, as well as promising strategies to promote transit use. Parents report that carrying children and their belongings is the biggest barrier to using transit, both for reasons of convenience and speed. This suggests that working parents would benefit from child care within walking distance from their homes or jobs, preferably with transit available to complete their trip. Parents are also concerned about the ability to reach their children in the event of an emergency, suggesting that guaranteed ride home programs (and awareness of them) could have a positive impact on transit usage.

Survey responses reflected a diversity of commuting experiences and opinions. Many parents said that taking transit or walking with their children is less stressful than driving, while others expressed concerns about the time required to take transit, the infrequency of service, crowding, and the effect of their children's behavior on other passengers. We were surprised to find that one parent commutes with a child on the ferry across San Francisco Bay, and that a majority of responding centers use public transit to take their children on field trips.

Recommendations

The report presents recommendations for a range of stakeholders: transportation agencies, local government, child care operators, child care advocates, researchers, and funders. These include:

- The most effective way for transportation planners and government agencies to develop child care facilities near transit is to subsidize land costs and facilitate access to existing streams of state and federal funding;
- Locate child care within walking distance of home or work. The chance that parents will use transit to complete their trip between home and work is greatest if they can minimize the distance carrying children and their belongings during their connections. Walkable communities that include child care, transit, and housing or jobs nearby are most conducive to transit use by parents.
- Employer participation in guaranteed ride home programs is a promising way to address parent concerns about their ability to reach their children in an emergency.
- Both transit agencies and child care operators should increase cross marketing of their respective services when they are located near one another.
- Child care operators can develop transit-supportive policies (e.g., priority enrollment for transit riders, coordination of staff parking or subsidies for transit use) and work with city government to minimize problems with parking and child drop off, (e.g. agreements not to enforce parking restrictions during drop off and pick up times).

Conclusion

Child care is a critical support service for working families of all income levels. While the particular challenges facing parents with young children will always tend to produce lower rates of transit usage than within the general population, policymakers can increase transportation choices for parents by encouraging development of child care centers near transit. Moreover, the accessibility of transit at such centers can further increase ridership by child care staff and by children as part of the program curriculum. Location of child care near stations does not guarantee that parents will use transit, but the connection can be strengthened through careful planning and deliberate efforts by transit agencies, planners and child care operators.

In summary, levels of transit use and walking at the centers studied were moderately higher on balance than within the general parent population. This study takes a first step in identifying the constellation of factors, including location, that enable families at all income levels to choose alternatives to automobiles during commutes that involve trips to and from child care. In a society where one parent working and one parent at home describes only 11% of the population, this study offers important insight on strategies to embed critical family services in new communities and to improve linkages between land use, transportation and service planning.

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1. Purpose of the Study

This study improves our understanding of the commute patterns of working parents who use transit-oriented child care, and of the factors that support or discourage them from using transit. The central research questions are:

- What is the rate of transit use by parents and staff at transit-oriented child care centers?
- How can we explain variations in ridership among transit-oriented child care centers?
- What are the principal barriers for parents who do not use transit?
- Which policies and incentives are most effective in improving transit ridership?
- How can transportation planning strengthen the link between child care and transit?

The population that this study targets – working parents – is of great interest to transportation planners. Transit agencies, air quality management authorities, and local governments want to encourage transit usage by all groups, to reduce vehicle usage and traffic congestion and to improve air quality. The majority of parents with young children work outside the home, and a large percentage of them depend on formal, licensed child care. Their ability to use public transit is challenged by the need to drop off and pick up their children at a third destination between home and work.

Some transportation planners and government agencies have sought to meet this challenge by locating child care facilities at transit stations and in transit-oriented developments (TOD). This strategy is seen as particularly promising when the goal is to promote walkable communities with services near transit. There are multiple cases of this approach in the San Francisco Bay Area, metropolitan Los Angeles, and other parts of California.[1] This study provides an assessment of the success of some of these past efforts in order to inform planning of future projects and partnerships.

The Local Investment in Child Care (LINCC) Project is committed to strengthening the relationship between child care and transportation planning. The starting point for a research agenda was the growing evidence that parental commutes could negatively impact children's development, in addition to worsening traffic congestion and air quality. One state level report, produced by the California Department of General Services in the late 1980s, estimated the additional miles that parents commute to child care and quantified the corresponding air emissions. On a national level, the United States Department of Transportation National Household Travel Survey released in 2003 found that young children spend an average of 65 minutes a day in cars, and 6-18 year olds average 61 minutes per day.

[1] In selecting potential cases for inclusion in the parent survey, the researchers identified more than 50 child care centers that appeared to be within one-third of a mile of a transit station.

This study represents the second stage of LINCC's research on parents' transportation choices in relation to child care. The first, in 2005, was a meeting of Northern California transportation and child care professionals to explore ways the two fields can work together to improve transportation and child care connections for working parents. The participants included representatives from Bay Area Rapid Transit (BART), the Metropolitan Transportation Commission (MTC), SamTrans, University of California,. Berkeley Institute of Transportation Studies, the Transportation and Land Use Coalition (TALC), and the Center for Transit-Oriented Development. LINCC subsequently commissioned a literature review on child care and transportation linkages,[2] which discovered a dearth of information to guide policy and practice. A "white paper" based on the meeting summary and literature review recommended further research on these connections.[3]

2. Intended Audience

This study is intended to inform the policy making and daily planning work of transportation planners and local governments. In those cases where a lead agency undertakes a development that is designed to promote transit usage, a case can be made that child care would complement other land uses and increase the likelihood that parents will ride transit. Because collocated child care reduces the distance that families must travel to and from home and work, it creates the potential for higher ridership. However, the link is not automatic. In looking at transit usage in cases where child care location would seem to favor it, the study identifies the most salient barriers that working parents face when considering their commute choices. It also highlights decisions in the planning phase of such developments that can contribute to the effectiveness of the linkage between child care and transit use, as well as the incentives and policies that can strengthen this relationship on an ongoing basis.

Public and private organizations that fund land use planning for mixed-use, walkable communities can also benefit from the study. Collocated child care can make it possible for parents living or working near transit to consider alternatives to the automobile, and sound planning can make that choice more attractive. To the extent that regional transportation agencies seek to encourage child care in TODs, for example, this research suggests some guidelines for the award of station area planning grants. In general, funders who want to encourage interdisciplinary work on transportation and child care will find areas for future research highlighted in this report.

The study is also directed at child care professionals and advocates. For child care administrators who operate (or seek to operate) facilities near transit, it indicates how program design can influence transit use by parents and staff, how communication with transit agencies might increase incentives to use transit, and how proximity to transit can be a marketing asset to the center. Child care advocates will find evidence to support the inclusion of child care at transit stations and in transit-oriented developments, as well as guidance about the kinds of policies that are most likely to create an effective linkage.

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[2] Pojani, Dorina, MCP. *Child Care and Transportation—A Literature Review*, 2005.

[3] *Linking Child Care, Transportation and Land Use: Local, State and National Obstacles, Opportunities and Next Steps.* White Paper. Local Investment in Child Care (LINCC) Project, 2005.

Finally, employers that are accessible by transit and seek to create a family friendly workplace can adopt programs and incentives that enable transit use by employees with young children. As indicated above, guaranteed ride home programs are a promising answer to one of the primary barriers to parental transit use. Businesses that proactively enhance their employees' commute and child care options may see real benefits in the form of workplace morale and employee retention (as well as lower parking demand).

3. Contribution to Transportation Planning

This project is funded by a Caltrans statewide transportation planning grant, administered through the Metropolitan Transportation Agency (MTC). The study is designed to yield information that will support effective planning to link child care and public transit, satisfying several of Caltrans' broader goals for the transportation system (e.g., land use efficiency through infill development, reduced dependency on single-occupant vehicle trips, reduced traffic congestion, improved air quality). It also contributes to several areas of emphasis for federal transportation planning (e.g., reducing the time that children spend in automobiles, and increasing their safety and security). By providing information of value to transportation professionals, the study is designed to enhance the ability to plan and implement transportation services and projects. It may also support the improvement of existing infrastructure if its recommendations can be applied to the study sites where child care and transit are already collocated but not performing as expected.

4. Literature Review

Despite limited research on the connections between child care and transportation, previous analyses provide information on (a) the factors affecting transit use in the general public, (b) the influence of children's travel needs on parents' behavior, and (c) previous experience with collocating child care and transit.

A. Predictors of Transit Use

The availability of free parking at the workplace greatly decreases the likelihood of riding transit (Cervero and Landis 1997; Hess 2001). Other factors including working near a transit station, having low auto access, and having a long commute, were also associated with higher rates of transit use in a San Francisco Bay Area study (Cervero and Landis 1997). The quality of transit in the region also affects behavior (Cervero and Gorham 1995). In summary, commuters going to a central business district with expensive parking are most likely to ride transit.

B. Influence of Children's Travel Needs

While we intuitively recognize that the need to get children to child care, school, and recreation activities affects the travel behavior of parents, numerous studies quantify this relationship. Much of the research in this area has focused on analyzing differences in travel behavior between men and women. The primary finding of this research is that women travel differently

than men and economic variables alone cannot explain the variation (Rosenbloom 1987). Women are more likely to have shorter commutes (Crane 2007; Turner and Niemeier 1997; Hanson and Pratt 1988) and to chain trips (Rosenbloom 1985; Rosenbloom 1989; Prevedouros and Schofer 1991; McGuckin and Murakami 1999). For example 65% of women with children under 6 years of age linked trips to work; 42% of comparable men did so (Rosenbloom 1987). Interestingly, when men link trips, it is often for recreation purposes; women tend to link passenger or household errands in a single trip (Rosenbloom 1987; Rosenbloom 1985; McGuckin and Murakami 1999). These patterns were seen in Sweden, the Netherlands, the U.K., and France (Rosenbloom 1987; Hanson and Hanson 1980; Raux and Rosenbloom 1986). Analysis of U.S. survey data shows that women make two-thirds of trips to drop off or pick up someone (Surface Transportation Policy Project 2002).

Many researchers have concluded that women's responsibility for the travel needs of children largely accounts for the variation between men and women's travel (Rosenbloom 1987). Importantly, these differing allocations of household tasks are not simply explained by personal income (Rosenbloom 1987). In addition, women's household and family responsibilities appear to influence their choice of job location – women tend to live closer to work than men (Rosenbloom 1987; Madden 1981; Rosenbloom and Burns 1993).

C. Collocation of Child Care and Transit

While there is no academic literature on the joint siting of child care and transit, several projects exist across the country. KidStop in Montgomery County, Maryland was built at the Shady Grove metro stop using public and private money and received a 30 year lease from the Washington Area Transit Authority for $10 (Spain 1996). A report from the National Council of Negro Women (2005; rev. 2007) profiles several other projects including the Linden Transit Center in Columbus, Ohio; the Tamien Childcare Center in San Jose, California; the Louis Stokes Rapid Transit Station (Head Start) in Cleveland, Ohio; and the 39th and Troost MetroCenter in Kansas City, Missouri. Many of these projects are aimed at providing services to low-income populations and often combine child care and transit with other services such as medical and police.

5. Study Methodology

A. Research Team

This study was conducted by LINCC members from San Mateo County (Kristen Anderson and Greg Greenway) and Alameda County (Ellen Dektar), and by Professor Noreen McDonald of the University of North Carolina. Emily Trono provided valuable research support. Greg Greenway managed the project on behalf of 4Cs of San Mateo County, which served as partner and fiscal sponsor. Members of the Advisory Committee (Appendix 1) reviewed the study design and findings throughout the course of the research, providing critical guidance and feedback. Transportation and Land Use Coalition (TALC) staff contributed technical expertise and assisted in developing the dissemination strategy for the report.

B. Parent Survey

A short survey was designed for parents to better understand how they get their children to and from child care, and the link to their work commutes. The survey covered mode choice for trips to and from child care and parental destinations, attitudes toward coordination of child care and transit, and demographic characteristics of the households (Appendix 2). When possible, questions replicated existing validated surveys. Surveys were pre-tested with a small group of Bay Area parents with children attending child care centers.

The sampling frame focused on child care centers as the most efficient way to survey parents with children in care. Based on outreach to child care resource and referral agencies, state Community Care Licensing, and professional networks, the study team generated a list of child care centers that were proximate to rail or bus stations in the San Francisco Bay Area. With this approach, the study concentrates on centers that present the most likely connection between child care location and transit use, treating them as crucial cases to test the hypothesis that location of child care near transit stations increases ridership. For comparison, we use data from national and Bay Area travel surveys to compute base levels of transit use in the population. This design also permits comparisons of the factors that differentiate these cases and might help to explain variations in ridership.

Statewide, the study team identified 50 child care centers that appear to be within one-third of a mile from a transit station.[4] Within this population, centers were classified primarily by their location (urban/suburban/rural) and whether they provided subsidized care to low-income families.[5] A stratified random sample was drawn based on these two criteria. To provide comparisons between the Bay Area experience and other parts of California, we deliberately selected several child care centers in Los Angeles, Watsonville, and Sacramento that met the same criteria. Unfortunately, despite the Los Angeles Metropolitan Transportation Authority's active involvement in planning several centers at Metrolink stations, these centers were not able to provide us with parent surveys. Additionally, although our intent was to survey transit "friendly" centers, we learned through director surveys that in some cases there were physical and environmental barriers (such as train tracks or poor sidewalks) which would discourage walking to and from transit to the center.

We sought to generate an overall sample size of 600 to 1,000 parents in order to achieve a margin of error of 3-4%. Based on this standard, we selected 25 centers for parent surveys and director interviews. Appendix 4 provides a summary of each center.

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[4] Note that this group of child care centers does not constitute the universe of programs statewide. No methodology was available to identify all such centers within any reasonable timeframe. For example, GIS mapping of thousands of child care centers and transit stations was infeasible.

[5] Subsidized centers were defined as those contracted by the California Department of Education or federal Head Start to provide child care/early education for children from very low-income families. Generally all (or nearly all) families enrolled have very low incomes. This factor is used as a proxy for family income. Household income eligibility cut-off for federal Head Start is around $20,650 for a family of 4, while state cut-off is around $48,370 for a family of four. However it should be noted that since state funding is available to serve only about 25% of eligible families statewide, many never receive subsidized services and only the poorest may be served.

The total number of surveys distributed was approximately equal to the total enrollment of the centers in the sample, and the overall response rate was 47%. Among those centers that returned surveys, there was a 60% response rate. Response rates varied greatly across centers. Six centers did not return any surveys; two centers had nearly all parents complete the survey. All center directors were offered an online version of the survey. Thirteen centers requested online versions of the survey and their parents had the option of completing the survey by hand or online. The response rate was highest for urban subsidized centers and lowest for the suburban/rural unsubsidized category. Of the 781 surveys received, 768 had complete information and were usable. To compensate centers for the time they devoted to the survey, we paid them a nominal fee of $5 per survey returned.

C. Center Director Interviews

A survey of child care administrators was designed to complement the parent survey. Some questions were intended as a check on answers provided by parents, while others determined commute patterns of center staff. The director survey also provided information necessary to sort cases by key variables (e.g., publicly subsidized vs. parent fee-supported as a proxy for income levels of families served) and to assess the impact of programs, incentives and benefits on transit usage.

While the same questions were asked of each director, the surveys were conducted as in-person or phone interviews, which also permitted open-ended answers and follow-up questions. Twenty-two child care directors were interviewed, including three at centers that returned no parent surveys.

D. Transportation Agency & Government Interviews

There is an important distinction within the sample between centers that happen to be located near a transit station and those whose proximity is the result of deliberate planning. First of all, most of the transit-proximate centers seemed to be relatively walkable from transit but in several instances we learned that our surveyed centers were separated from transit by train tracks, poor sidewalks (or none at all), and deserted cityscapes. For those centers that were deliberately planned near transit, we sought to learn what motivated planners to include child care in station area developments, what role the agency played, what resources it contributed to the project, and what results and lessons have been over time. In some cases, the appropriate subject for the interview would be a transportation agency (e.g., where a center is located directly within a station on land owned by the agency), while in others it would be a government official (e.g., when a city is the lead agency for a transit-oriented development around a station).

This method of data collection can only supplement the primary data from the parent and director surveys. It is challenging to identify individuals who were connected with the planning and development phases of projects that deliberately linked child care and transit, largely because of the passage of time since that process occurred. Nevertheless, interviews with agency representatives in three geographic regions provided context and richness to the analysis, as well as insight into the ways that planning (and resources) can influence the linkage between child care and transit use.

6. Parent Survey Results

A. Summary

In spring 2007, 768 parents at 19 transit-proximate child care centers in Los Angeles, the San Francisco Bay Area, Watsonville, and Sacramento answered questions about how they get their children to child care and get themselves to work. These are the key findings.

i. Getting to and from Child Care

- Levels of transit use are much higher at the transit-proximate childcare centers included in this study than national averages
    - National data from 2001 shows 2% of trips to child care are by transit
    - In this study 7-8% of parents used transit to get their kids to and from child care
    - In San Francisco and LA, 13% of parents used transit to get their kids from home to child care. Then 25% of parents used transit to get from the child care center to their final destination (usually work).
- Transit use is highest for
    - people who must pay for parking at work
    - people receiving subsidies at their child care center (but only in areas with extensive transit networks)
    - people with no cars
- …But simple proximity between child care centers and transit is not necessarily enough.
    - The Tamien child care center (located next to the Tamien rail station) had low rail ridership among parents – even on their way to work after dropping children at child care.
- The mother's commute needs are particularly important because 63% of children are picked up and dropped off by their mothers (this matches national statistics).
    - 17% of kids have parents that split pick up and drop off responsibilities
    - 10% of kids have fathers that do both drop off and pick up
    - 10% rely on a mix of family members, nannies, and friends

ii. Opinions about Child Care and Transit

- The biggest barrier to using transit is having to carry a child and their belongings
- Location of transit seems less critical (likely because the survey considers only centers where transit is a realistic option)
- Parents' number one consideration in choice of child care is quality.
    - Availability of child care is the second consideration.
    - Location appears to be less of a consideration. This is not surprising given the highly constrained supply of child care.
- 86% of parents agreed with the statement "Driving is the fastest way to drop my child at child care."
- 71% of parents agreed with the statement that they "needed a car to get to their child in an emergency." In addition, fewer than 10% of parents reported having access to guaranteed ride home programs. It is possible that these numbers reflect a lack of

knowledge about guaranteed ride home programs, or that these programs are primarily available to people who work for large employers.

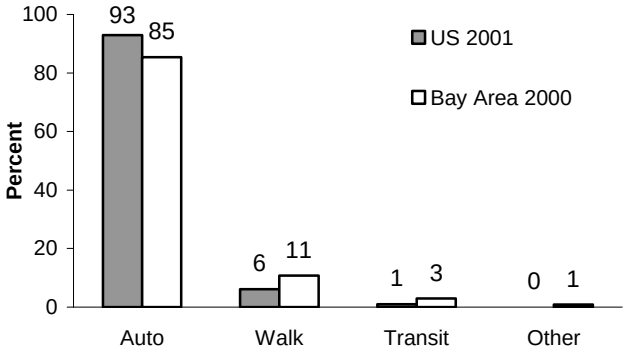
- Many parents have free or affordable parking at work. Of those surveyed, 62% disagreed that "parking is very expensive near my work" and 64% reported having free parking at work. This greatly reduces the likelihood of these parents riding transit.

B. Detailed Findings

i. Travel Modes

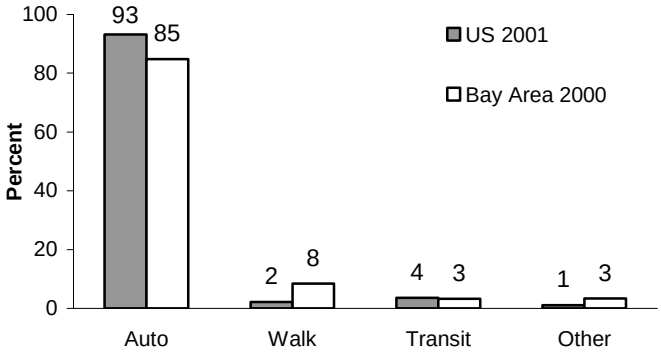
Survey data for the United States and the San Francisco Bay Area show that the auto is the most common way children get to child care (Figure 1) and parents of young children get to work (Figure 2).

Figure 1: How parents get children to and from child care



Note: Based on the modes of children 0-3 years old going to daycare/school. Excludes school bus travel.
Source: Unpublished Analysis of National Household Travel Survey 2001, US Department of Transportation; Bay Area Travel Survey 2000, Metropolitan Transportation Commission

Figure 2: How parents with children 5 and under get to work



Note: Not all children attend child care centers and not all parents responsible for drop-off/pick-up.
Source: Unpublished Analysis of National Household Travel Survey 2001, US Department of Transportation; Bay Area Travel Survey 2000, Metropolitan Transportation Commission

Our analysis of parents with children in centers close to transit showed that auto use was substantially lower than in the national and Bay Area statistics. Parents in our sample walked substantially more and also used transit much more. For example, approximately 75% of parents in this study drove between home and the child care center for pick up and drop off. The level of transit use is about 7% for these trips (Table 1). From the child care center to parents' final destination – generally work – there is a change in behavior. Many parents are able to park at or near the center and then walk to their final destination. Many of these parents have child care in the same building or in the vicinity of their office.

Table 1: How Parents Travel To and From Child Care

	Morning		Afternoon	
	From Home to CC	CC to Final Destination	Pick-up child at CC	CC to Home
Auto	77%	66%	66%	75%
Walk	15	26	26	16
Bus	6	5	6	6
Train	1	2	2	1
Other	1	1	1	1
Total	100	100	100	100

Source: LINCC Survey, May 2007
CC=Child Care

The overall averages mask substantial variation across the centers. Grouping the centers by their location (urban or suburban/rural) and level of subsidy (offers subsidies or does not offer subsidy), we are able to better understand behavior. Transit use is highest in the urban subsidized centers reflecting their location in areas served well by transit, combined with families having lower levels of auto access (Table 2). Use of rail is highest at the urban unsubsidized centers, reflecting their location very close to rail stops. In the suburban centers, all parents are very reliant on autos, which largely reflects the difficulties of using transit in lower-density areas. Appendix 6 shows the data for each center.

Table 2: Travel Mode between Home and Child Care Center in the Morning

	Child Care Center Characteristics			
	Urban Subsidized*	Urban Unsubsidized	Suburban/Rural Subsidized	Suburban/Rural Unsubsidized
Auto	68%	88%	93%	96%
Walk	12	6	5	2
Bus	17	3	2	0
Train	2	3	0	0
Other	1	1	0	1
Total	100	100	100	100

*Excludes the Fruitvale Head Start facility, which provides a part-day program.

After dropping children off, most parents reach their final destination by driving. For subsidized centers – either in urban or suburban areas – the mode shares for the trip to the final destination are comparable to those from home to the child care center (Table 3). However, for parents with children in unsubsidized centers, a substantial number walk to their final destination. This reflects the fact that many of the unsubsidized centers are employer-sponsored, ensuring, in most cases, that child care is located close to the workplace. For example, nearly 10% of those with children in unsubsidized centers who walked to their final destination reported a walk time of 1 minute or less and approximately 90% reported that it took them less than 10 minutes to walk to their destination.

Table 3: Travel Mode between Child Care Center and Final Destination in the Morning

	Child Care Center Characteristics			
	Urban Subsidized*	**Urban Unsubsidized**	**Suburban/Rural Subsidized**	**Suburban/Rural Unsubsidized**
Auto	67%	62%	91%	79%
Walk	13	32	7	17
Bus	15	1	2	1
Train	4	4	0	2
Other	1	1	0	1
Total	100	100	100	100

*Excludes the Fruitvale Head Start facility, which provides a part-day program.

ii. Factors Affecting Transit Use

Factors such as vehicle access, household income, frequency of transit service, and the availability of free parking at work all affected rates of transit use as predicted from previous research.

Transit use is much higher in households that do not own a car (Table 4). For example, 23% of parents use transit to get their child to care in households without vehicles compared to 5% for those with at least 1 vehicle.

Table 4: Travel Mode by Vehicle Access

	From Home to CC		From CC to Next Dest	
	≥1 HH Vehicle	**No HH Vehicles**	**≥1 HH Vehicle**	**No HH Vehicles**
Drive	84%	19%	73%	16%
Walk	11	56	22	55
Bus	4	21	3	20
Train	1	2	2	8
Other	0	2	0	1
Total	100	100	100	100

Source: LINCC Survey, May 2007

Thirteen percent of parents with no free parking at work use transit to get their children to centers (Table 5). This compares to 1% of parents with free parking. The lack of free parking in downtown business districts such as San Francisco is a primary reason many choose to use alternative modes.

Table 5: Travel Mode by Access to Free Parking

	From Home to CC		From CC to Next Dest	
	No Free Parking	With Free Parking	No Free Parking	With Free Parking
Drive	75%	95%	49%	87%
Walk	10	3	34	12
Bus	10	1	8	1
Train	3	0	6	1
Other	2	1	3	0
Total	100	100	100	100

Note: Excludes the Fruitvale HeadStart facility
Source: LINCC Survey, May 2007

Families receiving a child care subsidy – who must be lower-income – use transit more, but the effect is seen only in San Francisco and Los Angeles with extensive transit networks (Table 6).

Table 6: Travel Mode by Income, San Francisco and LA centers

	From Home to CC		From CC to Next Dest	
	No CC Subsidy	CC Subsidy	No CC Subsidy	CC Subsidy
Drive	76%	57%	53%	48%
Walk	9	18	34	34
Bus	8	22	6	12
Train	5	3	4	6
Other	2	0	3	0
Total	100	100	100	100

Source: LINCC Survey, May 2007

The quality of transit also affects how much parents are able to coordinate child care and transit. As Table 6 demonstrates, parents in urban areas use transit more even when controlling for the level of subsidy at the center. Consider the contrast between the Tamien Child Care Center (San Jose) and Rockridge Little School (Oakland). Both centers are unsubsidized and located in largely residential neighborhoods in close proximity to a rail station (BART for Oakland and Caltrain/light rail/bus for San Jose). However the observed travel behavior is quite different for the two centers. At Rockridge Little School, 12% of parents use BART; no surveyed parents use transit at Tamien.

The survey results at the Tamien center are striking and warrant further discussion. While some interviews suggested that the relative infrequency of Caltrain service might be a barrier to parents taking transit, this would not seem to explain the lack of reported transit use at Tamien because it is a multimodal station. It is possible that an unidentified sampling bias at this center caused us to get results from non-transit riders at a disproportionately high rate, but this is an unsatisfying explanation for the fact that the reported rate of transit use was zero. More likely is a combination of factors that is consistent with our major findings.

The parent survey results are intriguing not only because they are dramatic, but also because they contrast with reported rates of transit use by the center director and previous surveys. In an

evaluation report a year after the center opened, the transit agency found that 17% of families served by the center used transit for at least part of their commute trip (Santa Clara Valley Transportation Authority 1996). Eight years later, agency staff reported rates of transit use of nearly 40% by center parents (Santa Clara Valley Transportation Authority 2004). Similarly, the center director reported for this study that 40-50% of parents using the center had documented transit passes. Why, then, is there such a discrepancy in reported rates of transit use, and why are the results of this survey so low?

The most likely explanation for the difference between what the director and parents reported for this study is that they are counting different things. The director reported the number of parents who demonstrated that they had transit passes, while parents reported (anonymously) whether they actually used transit.[6] Because parents receive a discount on their child care fees for purchasing a transit pass, some may find it economical to purchase a pass despite using it infrequently if at all. Moreover, a popular employee benefit among companies in Santa Clara County is Eco Pass, a discounted transit pass offered by the Valley Transportation Authority (VTA) to employers of any size for all their full-time employees. Employees themselves do not pay for the pass, and it entitles them to an emergency ride home program as well as a discount on their child care fees at the Tamien center. This helps to explain why possession of a transit pass does not necessarily equate to transit ridership.

One of the central findings of this study is that the critical shortage of quality child care makes it difficult for parents to choose a provider based on location (proximity to transit, for example). The strong demand for quality care tends to overshadow other factors. At Tamien, VTA management was committed from the beginning to bringing in a high quality child care operator. This was certainly a matter of principle to serve the community, but it was also a strategy to minimize risk as the agency stepped out of its core business to develop a child care facility (see the case study later in this report). The result of an extensive community outreach and search process was that the agency selected a for-profit operator that intended to pursue national accreditation, a high standard of quality that also requires a significant financial investment.

A year after the center opened, the VTA cited the need to find sources of funds to subsidize tuition as a future challenge, finding that "the majority of the children at the Center are from the upper income groups" (Santa Clara Valley Transportation Authority 1996). Because the costs of operating a high quality facility are high, the ability to provide access to lower-income families is a major challenge in the child care field. In the case of Tamien, it would not be surprising if higher-income parents are attracted to the center because of the quality care it provides, while proximity to transit is an incidental consideration at best. Because people with higher incomes tend to ride transit at a lower rate in general, the demographics of families who can afford market-rate care at the Tamien center may not produce particularly high rates of transit use.

iii. Travel Companions

Mothers in this sample do the majority of picking up and dropping off, which is what the national statistics would predict (Table 7). Studies have shown that the need to pick up and drop

[6] It seems likely that the 40% rate of transit use reported by VTA in 2004 was based on a similar methodology – number of parents at the center who had transit passes.

off children makes women less likely to switch to alternative modes of travel (Rosenbloom and Burns 1993).

Table 7: Who Picks Up and Drops Off Children?

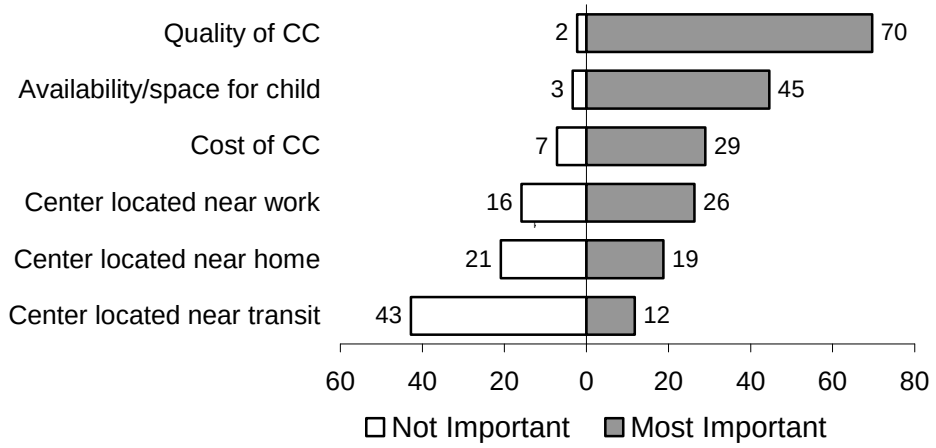
		Pick-up Person				
		Mother	**Father**	**Relative**	**Other**	**Total**
Drop-off Person	**Mother**	63%	9%	1%	1%	74%
	Father	8	10	0	1	19
	Relative	1	0	3	0	4
	Other	1	0	0	1	2
	Total	74	19	4	3	100

Source: LINCC Survey, May 2007

iv. Parental Attitudes toward Transit Use

An innovative feature of this survey is that it collected information on parental attitudes about the possibility of coordinating child care and transit. In assessing the potential for making this linkage, it is important to keep in mind how parents choose child care centers. In our study, 70% of parents identified quality as the most important factor (Figure 3). The second most commonly cited factor was availability. These responses are key – most parents, particularly those with cars, are willing to trade travel time for higher quality care (if they can afford it). In addition, the supply of child care is so tight that most parents are unable to optimize based on location – they are lucky just to get a space in a quality center.

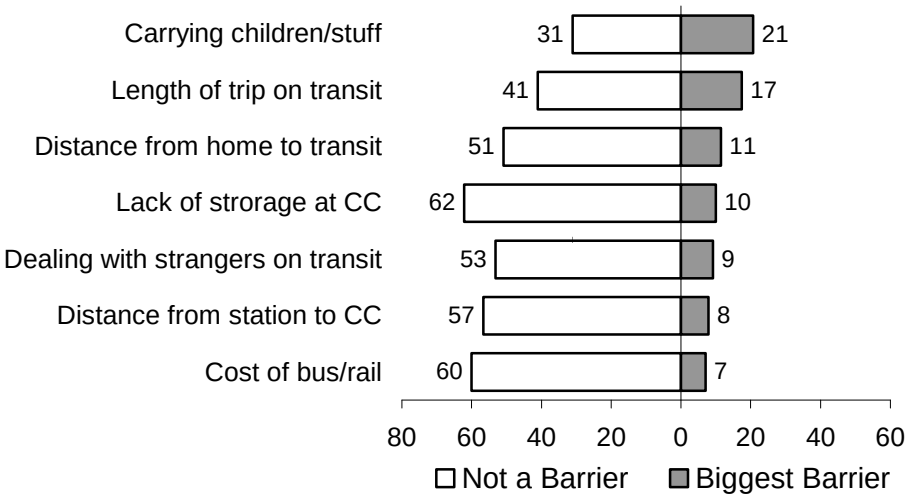
Figure 3: Key Factors in Choice of Child Care Center



Source: LINCC Survey, May 2007

Parents report that carrying children and their belongings is the biggest barrier to using transit (Figure 4). Respondents were less concerned about the cost of transit, distance from the transit station to the child care center, or storage at the center. Although parents had different opinions about the barriers to transit use, there was agreement that driving provides the fastest means of getting their children to care and getting themselves to work (Figure 4).

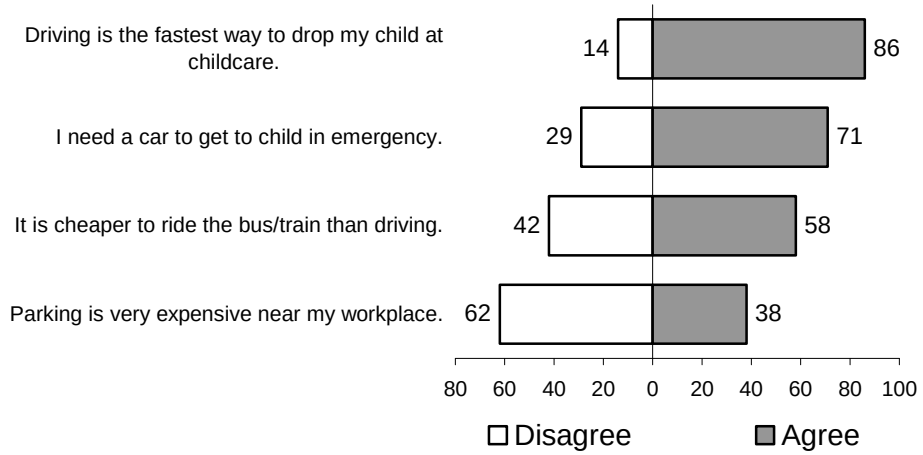
Figure 4: Parental Perceptions of Barriers to Transit Use



Source: LINCC Survey, May 2007

In addition, 71% of parents agreed that they needed a car to reach their children in an emergency (Figure 5). Although many have speculated that this is a Bay Area phenomenon, the data do not support this conclusion. Bay Area parents are actually slightly less likely to agree with the statement that they need to reach their children in the event of an emergency. It also seems that parents do not know about guaranteed ride home programs offered by many large employers. Fewer than 10% of parents indicated they had access to a guaranteed ride home.

Figure 5: Parental Opinions



Source: LINCC Survey, May 2007

7. Director Survey Results

The results of interviews with 22 child care center directors are included in the study, although parent surveys were collected from only 19 centers. The three additional interviews of directors at centers built by Los Angeles MTA at Metrolink stations provided useful information despite the absence of parent surveys from these centers.

A. Purpose of Director Interviews

The child care center director surveys served two purposes. First, they were used to confirm sample variables for the centers – size (licensed capacity and current child/family enrollment), number of staff, publicly subsidized vs. market rate fee supported (used as a proxy for family income), location near transit or in transit-oriented development, and employer sponsorship. Second, the interviews with directors provided additional data on parents, child care staff, and each center's policies and programs. Areas of investigation included:

- Transportation supports, incentives, and barriers for parents and staff;
- Staff commute behavior as reported by the director;
- Child care program-related transit use (field trips);
- Relationship with transit agencies and local governments

Originally conceived as a paper survey questionnaire, the information was ultimately gathered via a structured telephone interview by a member of the study team. This both facilitated completion by busy child care directors and allowed follow-up clarifying/probing questions by interviewers.

B. Parent Transportation Benefits and Transit Incentives

Through the interviews with child care center directors, data were gathered on factors that might be expected to affect parents' use of transit including parking and traffic conditions at the child care center, accommodations for parents using transit (e.g. stroller parking area), and direct incentives to use transit (e.g. child care discounts, transit discounts/ticket availability).

i. Traffic and Parking Conditions

The twice-daily parent visits to drop off and pick up a child at a center are complicated for drivers by the availability of at least short-term parking or drop-off curbs. Unlike schools for older children, "kiss and ride" curbs do not meet this need due to requirements that parents deliver/escort children into the center and sign them in/out. (Though this could be done at curbside by child care staff, none of the centers in this study offered that, presumably due to the cost of staffing that service.)

Short-term parking during drop-off and pick-up times was a problem for many centers; 12 reported auto congestion problems at that time. Ten centers have short-term drop-off (designated) parking spaces. Some reported difficulty preventing the general public from using them when parking in the area was limited.

Nine centers (41%) have curbside loading zones with time limits ranging from 3 to 20 minutes; some of these accommodated only 1-3 vehicles at once. Some urban downtown centers (most in

San Francisco) have informal arrangements with cities and/or law enforcement to use white zones or metered parking, allowing drivers to leave vehicle to deliver children.[7]

Parents using some employer-sponsored child care centers (at/near work site) had use of a parking garage nearby. However, this did not always support parking once and walking to child care and work, if the location and pedestrian routes between them were problematic.[8]

ii. Child Care Center Accommodations for Transit Riders

Center directors were very accommodating of parents' needs to store strollers or carseats during the day. While actual designated areas were rare in centers, informal arrangements enabled storage of these items as needed, in the entry lobby, director's office, etc.

Child care centers surveyed don't provide transit incentives to parents but many believed that parents' employers may do so (e.g., transit pass programs such as Commuter Check). The Tamien Child Care Center was the only one where child care discounts of 3% are given for riders (per agreement with VTA), and where transit passes are sold onsite. The Metrolink centers in Los Angeles provided transit discounts for a limited period of time.

C. Staff Transportation

Director interviews also asked about staff commute behavior and related factors, including transit incentives and parking.

Child care centers in the study employ an average of 16 staff during the week to cover what is usually a 10-12 hour child care day. The range was 4 to 41 employees, depending on the center's capacity (which ranged from 20-120 spaces, with an average of 67).

Directors provided information on staff commute behavior. Most employees drive themselves to work. The average number of center employees who drive themselves to work was 62% (lower than for the overall workforce). At 32% of the centers, more than half of staff use transit; and 77% report some level of transit use (range of use was 6 to 100%). Other common commute modes of staff included carpools, and walking or biking to work.

These high levels of alternative commute modes (other than driving alone) may be explained partly by the location of the child care centers near transit and partly by the typically low incomes of child care workers. In general, lower income workers use transit at a higher rate than the general public.

Child care employers did not commonly provide transit incentives to staff. While 32% reported having pretax payroll deduction for transit tickets available, only 18% offered discounted tickets. Directors of some of those centers (generally part of multi-site agencies/companies) that offer such programs reported that staff didn't use them because the transit alternatives were not accessible to their centers (e.g. "no way to get from Caltrain to our site at light-rail station, or it would take

[7] San Francisco Traffic Code Article 3, Section 38 c exemption allows child care parents to use white curb zones for short-term parking to drop off children since Cal. licensing requires that children are delivered into the facility. However, variation in directors' description of the rules suggests that clarification would be helpful.

[8] For example, at Union Station's Gateway CDC, child care parents using the MTA-sponsored center had dedicated garage parking with elevator access to the center. However, in order to park for the work-day, they need to exit and re-enter a different part of the garage.

hours"). This raises a possible issue to consider in future research: to what extent do physical, geographic features make a center "transit friendly" and "walkable" in relation to a station, apart from its location within one-third of a mile?

Fully 64% of child care centers reported having free parking available for staff, usually at suburban centers or those at transit stations with large public lots. A few centers (14%) in suburban and in more urban areas had only 1-3 parking spaces allocated for staff in a shared garage. So other staff had to find, and possibly pay, for parking in the area.

In one urban case where parking is limited and expensive, the center helped staff to coordinate parking at a satellite transit station and then take transit downtown to work.

Safety of the walking route between transit and child care, in terms of traffic and crime, was not found to be a problem as reported by directors in this sample of centers, even in dense urban areas.

D. Child Care Program Use of Transit for Field Trips

In addition to use of transit by parents and staff in child care centers, we were interested in how much they used transit for curriculum-related purposes. This could include transporting children to other locations for events or to visit facilities (museums, parks, etc), or to enrich lessons about transportation (a favorite curriculum theme of young children). Many child care operators find bus rentals for field trips too costly and seek inexpensive alternatives when they cannot walk. Field trip use is mostly during off-peak hours, creating added value for transit operators.

Sixty-eight percent (68%) of the child care centers reported that they use transit to take children on field trips. The frequency of use ranged from once or twice per year to "all the time." For example, the Tamien center uses the train as its first pre-Kindergarten field trip. Other centers indicated that they take children on walks to the transit station just to 'explore.'

Some companies don't allow their programs to take transit at all for safety/liability reasons, some allow only older preschoolers to be taken (4-5 yr olds), or allow use of trains but not buses. There seems to be some confusion on this point as centers from the same corporation reported different understandings of the policy. In addition, one center reported problems taking children on buses since they are forced to break into smaller groups and go in shifts. The same center reported drivers being reluctant to accept large groups of small children. Other centers reported no problems riding transit, commenting that, "AC Transit has been great."

The cost of transit passes, especially for teachers and parents/adult volunteer chaperones, was reported as another barrier. It was not clear whether all center directors knew that children under five years of age ride free on many transit services.

E. Marketing of Transit by Child Care Centers

In the study interviews, directors were asked if transit convenience was mentioned in the centers' marketing materials. Only half of the centers (50%) said it was included in parent information; some only mentioned it in their staff recruitment information. A few centers operated by national companies said that marketing materials for all their centers were produced centrally and only

provided space (e.g. on brochures) for the center's name and contact information.[9] Directors of most of the employer-sponsored centers (36% of the sample) believed that the company's HR departments provided employees with transit information.[10]

To encourage child care and transit linkages, both parents and staff need information about transit location and services nearby. Providing transit information is a service child care programs can easily offer.

F. Child Care Centers' Interaction with Related Transit Agencies

Responses from directors indicate that most never communicate with transit agencies, even when the child care center is located at a station or in a transit-oriented development. Of the four directors who had such contact, only the Tamien Child Care Center director meets regularly with transit agency staff. The others either had facility operation/maintenance needs or inquired about discounted tickets for field trips.

All directors expressed interest in working with transit agencies to improve transportation choices for parents and staff. The greatest desire expressed was to obtain transit discounts for staff commuters and for field trips (adults and children).

G. Other Child Care Center Characteristics that Affect Transit Use

Included in the sample of child care centers was one program that offers only a part-day schedule, De Colores Head Start located in the Fruitvale Transit Village in Oakland. Parents using the three-hour preschool program are not likely to be on their way to work or to use transit because of its collocation. Also the fact that families must have very low incomes to qualify for the program increases the chance parents are not in the paid labor force. Data from the parent surveys showed low transit ridership but high rates of walking since the program serves the pre-existing low-income neighborhood.

Parents' ability to use transit to work may also be affected by the hours the child care program is open. One of the centers near Rockridge BART in Oakland is open only 8:30am–5:00pm, which may discourage transit use for working families.

Transit agencies or developers that plan to include child care space in a transit station or TOD with the goal of increasing ridership should consider these program characteristics when selecting an operator.

[9] Note: This would not preclude a center from adding an insert or providing separate informational material, even those provided by the transit agency(ies).

[10] Employers who sponsor child care centers and commute alternative programs could facilitate linkage of this information for employees. In one case in the study sample, the two benefits were administered through different departments of the public agency.

8. Agency Interviews

Transportation planners and local government officials were interviewed in cases where they acted as the lead agency to develop child care near transit. In most of the cases included in the study, the location of child care near transit was not necessarily the result of intentional planning on the part of transportation agencies or governments to achieve that outcome. In those cases where authorities have embraced the concept of building child care facilities near transit stations, interviews with representatives of the lead agencies sought a greater understanding of the factors that (a) motivate and support such planning, (b) enable implementation, (c) challenge implementation, and (d) facilitate a connection between use of the center and transit ridership by parents.

Following are three case studies (in San Jose, Watsonville, and the Los Angeles area). In summary, they illustrate several lessons for successful projects where public agencies play a leadership role:

- **Contribute land where possible.** Land availability and cost are the biggest barriers to overcome for child care facilities development.
- **Be opportunistic in identifying state and federal funds**. Dedicated public funds are essential, and emerging sources at the federal level in particular made the difference in several projects.
- **Commit for the long run**. Assessment, planning, provider selection, and construction take several years. Political will and leadership plays a key role in sustaining momentum.
- **Engage partners early who have needed expertise**. Facility design makes a difference.
- **Foster creative collaborations.** Inter-agency cooperation creates opportunities for pooling resources, and agencies may need to rely on each other for different kinds of expertise.
- **Be flexible and responsive to community needs.** Seek the intersection between community demand for quality child care and agency goals for transit ridership.
- **Offer incentives for parents to use transit.** Proximity creates options but does not assure transit use. Communication, cross marketing, and intentional design featuress can increase ridership.
- **Foster communication between agencies and providers.** Regular contact during and after the development of facilities can enhance marketing opportunities and improve property management.
- **Consider transition plans for lease agreements.** Demonstration projects typically begin with subsidized rents but give way to demands to convert to market rate. Long-range planning and clear expectations can improve the chances that a facility is sustainable and meets the goals of the transit agency.

CASE STUDY #1: Tamien Station (San Jose)

LEAD AGENCY

Santa Clara Valley Transportation Authority (VTA)

PROJECT DESCRIPTION

Located at a major transportation hub, the Tamien Child Care Center is located onsite at the Tamien Caltrain and Light Rail Stations, and is also served by two VTA bus lines. Completed in November 1995, the center has a licensed capacity of 123 children from ages six weeks through 12 years. It offers full- and part-time care, as well as a before and after school program. The facility is operated by Bright Horizons Children's Centers under contract to the VTA. Low-income families received reduced tuition.

CRITICAL RESOURCES

Construction of the center was enabled by a land contribution from the transit agency and the availability of a significant amount of public revenue. The 9,600 square foot facility is located on a 0.6-acre section of the Caltrain parking lot owned by VTA, and the agency provided a free land lease. At a cost of $2.5 million, the facility was built using local funds ($540,000 from VTA), state funds ($200,000 from State Transportation Systems Management) and federal funds ($1.6 million) made available from the Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA), which encourages development compatible with intermodal transportation. The development of the center was a 5-year process, including a yearlong feasibility study, application for federal funding, formation of an expert committee to design an RFP and select an operator, and a year of construction.

A key to the project was the convergence of a resource opportunity for transit (federal funds) and a high level of political will to address child care needs. When the project was proposed, VTA was an agency of Santa Clara County. A member of the board of supervisors with a particular interest in children's issues served as a champion to move the project forward, working with local congressional representatives to access transportation funds.

CHALLENGES

Political leadership was important not only to access funding, but also to persuade the transit agency to risk moving outside its core business operation. To address these concerns, management's strategy was to identify a high quality operator for the child care facility to minimize uncertain outcomes. This was also the biggest challenge for the agency, which went through a research and learning process to assess different models prior to requesting proposals from operators. Over time, as the child care center moved from a high- to low-profile project within the agency, the relationship with the center has focused less on its contribution to transit ridership and more on property management. This can be seen as a potential challenge for the operator over the longer term, as expectations of the agency change to include financial returns on a lease that initially included no rent payments.

MAKING THE CONNECTION

The center is promoted by VTA as the first of its kind with such an extensive relationship to transit services. The intent of the project was to demonstrate that offering child care and transit services at the same location would provide a viable incentive to parents to use public transportation instead of single occupant automobiles. In a typical case envisioned for the project, a parent parks free at the station, drops the child off at the center and rides light rail, Caltrain, or a bus to her/his final destination. Special transit incentives are offered to parents with children at the center, including: discounts on VTA light rail, bus, and Caltrain monthly pass; priority enrollment and discounts on

tuition for children of all transit users; transit passes sold on site; free commuter parking; emergency trip service; and transit information on site.

A number of design considerations were intended to strengthen the relationship between the center and the station. The center was deliberately located at the far end of the parking lot away from the station to separate children from station users who do not have business at the center. To mitigate noise from trains, VTA built a sound wall that was painted with a mural that became an attractive feature of the community.

CASE STUDY #2: Via del Mar (Watsonville)

LEAD AGENCY
City of Watsonville

PROJECT DESCRIPTION
This child care facility is licensed for 32 spaces in a 40-unit affordable rental housing development located adjacent to the Watsonville Transit Center, which provides bus service to the rural community. Planning began in 1998 and construction was completed in 2005.

CRITICAL RESOURCES
Key resources that made the project possible were: subsidized land, state and federal tax credits, strong design team, and grants. City of Watsonville secured the 2/3-acre site on a 99-year lease at $1/year from Santa Cruz Metropolitan Transit District (Metro). For the child care center, the city received a $50,000 foundation grant for needs assessment and facility planning, and more than $400,000 in grants for pre-development and development. The plan called for half of the spaces to be fee-based for downtown workers, and half to be subsidized and prioritized for qualifying Via del Mar residents. Intending to be the developer, the city engaged an architect and child care operator for early input on design of the center. When lack of development experience prevented the city from qualifying for affordable housing tax credits, they selected Mid-Peninsula Housing Coalition to be the developer. The City assigned the lease to Mid-Pen, which secured financing and received the tax credits.

MAJOR CHALLENGES
Control of the site was a challenge that resulted in administrative cost and delay. Metro received Caltrans funding to help purchase the site for a transit center. With its interest in the property, Caltrans was not in favor of assigning a long-term lease for housing or child care on the site. Metro eventually transferred Caltrans' financial interest in the site to an adjacent parcel it owned (the current location of the transit center). From an operational perspective, shared playground use is a challenge in such a constrained space.

MAKING THE CONNECTION
With 40% of its population under 18 years old, the City of Watsonville prioritizes child care and housing. The city demonstrated its commitment through a 7 ½-year process involving assessment of community needs, a challenging transfer of land interests, change in lead developer, design within tight space constraints, and assembling grants and financing from more than a dozen sources. Aside from its location adjacent to the transit center, the project has features to encourage transit use by residents and child care families, including reduced parking at the housing development, curbside access for child drop off and pick up, and a pedestrian walkway between the child care and transit center.

CASE STUDY #3: Sylmar & Chatsworth Stations (Los Angeles Area)

LEAD AGENCY

Los Angeles Metropolitan Transportation Authority (Metro).

PROJECT DESCRIPTION

Two intermodal child care centers, located at the Sylmar (Transit Tots East), and Chatsworth (Transit Tots West) transit centers. Built in the mid 1990s, both are served by multiple commuter bus and rail lines. Licensed capacities are 67 and 80 child care spaces within 5,000-6,000 interior square feet. Each center leased the property at one dollar a year for 5 years, after which leases were renegotiated based on current property values.

CRITICAL RESOURCES

The child care centers were developed as part of Metro's Transportation Demand Management program, spurred by the availability of new state and federal funds. Metro jointly owns the land at the sites with the City of Los Angeles. Funding for Chatsworth and Sylmar included State Proposition C sales tax revenue, City of Los Angeles local match, grants from the regional air quality district, and Metro annual budget allocations. In addition, Sylmar received a grant for energy efficient design from the California Energy Commission, and Chatsworth received federal transportation enhancement and capital improvement grants. Total investment was $1.36 million for the Sylmar center and $1.46 for the Chatsworth center. Metro spent $35,000 on a preliminary marketing survey to identify potential child care center locations.

CHALLENGES

The projects required easements with the railroad, utilities and Los Angeles County Flood Control. Significant levels of transit use by parents at the centers required 2-4 years of concerted marketing funded by the transit agency. The sustainability of child care centers depends on their successful negotiation of market-rate leases that operators can afford after the initial period of subsidy.

MAKING THE CONNECTION

The design of the center included dedicated parking for drop off and pick up, as well as security measures to enhance safety. As an incentive for transit use and a marketing strategy for both centers, Metro provided transit-commuting parents with a $300 subsidy over three months toward the cost of child care enrollment and/or transit fares. To be eligible, a parent had to enroll a child for at least three days per week at the center and commute to work using public transit and/or carpool. Metro funded a two-year program to market both centers, design bilingual brochures, and manage the number of existing and new transit users that registered at the centers. During this period, the agency evaluated its efforts to support a linkage between child care and transit use. With a combination of subsidies and marketing, approximately one in three parents with children enrolled at the centers were transit riders.

9. Recommendations

National data and this report's parent survey responses contextualize our recommendations: the majority of parents drive to drop children off at child care; child care is chosen primarily based on quality with location a secondary concern; and public policy makers and advocates can do little to minimize parents'need to carry child-related gear, the primary identified barrier to taking children to or from child care on transit.
Nevertheless, the interviews, surveys and Advisory Committee outreach done for this report showed that child care availability near transit can result in more parents riding or walking than general population averages and generated ideas about how different sectors impacted by child care proximity to transit can take action to establish or solidify information sharing and planning to yield new, high quality facilities, fewer cars on the road, and higher transit usage.

A. Recommendations for Transportation Agency Planners and Government Officials

i. Support development of child care at transit stations and in Transit Oriented Development (TOD)

Child care benefits families across the nation by supporting parent labor force participation. Scores of recent studies document the contribution of quality child care to child development and positive macroeconomic and microeconomic outcomes. Only 11% of households nationally have a parent at home caring for children while another parent works.

Child care programs, provided that the demographics justify the need and that special accommodations like playground space are factored in, can provide a solid use of transit oriented space that is more typically set aside for retail businesses. Child care intermediaries such as child care planning councils and resource and referral agencies can help find resources to assess the local market and identify prospective child care providers. Following are guidelines about how to support child care facility development near transit, based on the study results.

<u>Critical factors for child care center development at transit include:</u>

- The land or facility is provided at low or no cost.
  (Examples: In Los Angeles, centers received a low or no cost lease for five years; in Watsonville, city officials recognized that land at no cost was critical; at Tamien, the center was build by the transit authority on land it owned.)
- Access to public funding streams.
  (Examples: Air quality funds supported the Watsonville center and two Los Angeles commuter rail linked centers; Los Angeles MTA provided discounted fares to parents enrolling at commuter rail linked centers on a temporary basis as an incentive for enrollment.)

<u>The connections between child care and transit seem to be strongest when:</u>

- Working parents do not have free parking at work.
- Transit service is frequent and reliable.
- Children's families have no access to a car, or the program serves subsidized children, and the center is in an urban area served by multiple modes of transportation.

- The parents are in the paid labor force or do not live near the center necessitating trips outside of the neighborhood.
- The route between the child care and the transit is within approximately one third of a mile, and is perceived to be safe and "pedestrian friendly" vs. centers farther away (half a mile) or close to transit but separated by train tracks or other hazards or barriers.
- The child care is in a location that has multiple other destinations within walking distance around a transit station.

The connections are weakest when:

- Employers offer free parking at work. 13% of parents with no free parking use transit to get their children to child care compared to 1% of parents with free parking. So if an employer at TOD develops child care in conjunction with free parking, it's less likely the parents would ride to the center on transit with the children.
- Child care program offers only a part-day schedule, discouraging use by working parents.
- Lack of communication between child care operators and transit agency leaves missed opportunities for cross marketing and promotion.
- The "schlepping factor" takes precedence. Survey respondents expressed concern about carrying their children and their belongings on transit. This inhibitor to transit use might be minimized if housing and child care were collocated at transit stations, so parents' trip to child care would consist of a short walk.

Given survey results and the factors discussed above, transit or other public agencies which design funding streams that permit funding of child care center planning and development near transit should encourage child care programs to meet the following criteria:

- The program selected to operate the child care provides full-day child care services which meet the needs of commuting working families.
- The program is designed to serve children and families with demographics that mirror those of the transit riders as well as local employers and residents.
- The program agrees to highlight its transit linkages in its marketing materials.
- The program administrators are willing to work with transit agencies and child care intermediaries to promote linkages

ii. Promote Guaranteed Ride Home Programs

Employers can participate in these programs in conjunction with regional congestion management agencies (CMAs). 71 % of respondents said they needed a car to be able to get to a child in an emergency. One approach might be for CMAs and commute alternative programs to produce a brochure for parents who use transit and child care. Because most of the participants in such programs are large employers, strategies might also focus on outreach to smaller employers to encourage their participation.

iii. Increase Targeted Marketing

Of child care information at stations: Post information at stations and on the internet that alerts parents to local child care resource and referral agency information and how these programs can help parents find care in the station proximity.

Of transit services at child care programs: 68% of responding centers close to transit use transit for children's field trips. In addition to providing transit information to child care staff and parents, transit operator marketing departments can develop brochures about trips for children on transit and/or share them with child care programs to solidify links or catalyze fieldtrip planning.

iv. Promote Accessible Vehicle Fleets

Transit operators that use low floor buses and have large open spaces make it easier for parents to transport strollers. While such buses also benefit transit agencies for other reasons, they also help to address the key barrier to transit use by parents (the need to carry child-related gear). Similarly, trains can allow more or less access to strollers (and signage can ask riders to yield space to parents who bring them aboard). In addition to these features of the vehicles, transit drivers might also be educated about the needs of parents and child care operators who use transit for field trips.

B. Recommendations for Child Care Program Administrators

Consider outreach to developers and community planning processes around stations where communities are being redesigned to encourage walking, and where families with young children are present or expected. Sometimes the key demographic factor for the program's success might be tapping into a local population that uses the transit to commute to work. In the Bay Area, BART plans to have updated information on demographics of its station users in June, 2008.

i. Expand or relocate child care at transit oriented developments

- New facilities are often developed at transit oriented developments (TOD). They typically undergo a complex and long development process, but these developments present an opportunity for child care administrators to tap into public capital resources and to operate in a redeveloped community with access to transit and pedestrian options. When child care is considered for location in a TOD, encourage development of other services (retail, etc.) nearby to promote a more walkable community and facilitate connections between child care consumers and transit.
- Design issues: if the child care is located at a transit station with no other services, strive to make design distinctive enough so that you are not approached by transit riders regarding ticket sales, transit problems or bathroom usage.
- Some providers feel that proximity to transit helps them with marketing by virtue of being more visible to the community.

ii. Address concerns regarding drop off parking: Consider prioritizing enrollment for families who live in the surrounding neighborhood or who use public transit as a way of minimizing parent issues with congestion during pick up and drop off hours.

iii. Include Transit Information in Marketing Material and Onsite: Promote transit links in marketing materials to attract parents. Location near a transit station/hub can be a marketing asset. Centers might also provide transit schedules onsite.

iv. Coordinate transportation for staff attraction and retention: Programs in urban areas with expensive parking could help staff coordinate parking at a satellite transit station and

then take transit downtown, as one Sacramento center has done. Other programs offer to pay for staff mileage or subsidize transit costs to assist with staff recruitment. Unfortunately, reimbursing staff for mileage expense does not support transit use or other commute alternatives. Incentivizing carpooling, bicycle or walking would not increase transit ridership but would address parking, traffic congestion and air quality issues. With the exception of large child care agencies (i.e. multiple sites and large numbers of employees), child care programs are unlikely to be aware of any resources available to assist employees or parents with transportation needs. Child care administrators can explore the availability of these resources by contacting regional transportation agencies.

v. **Take transit reliability into account when developing policies:** Although the study did not test the quality or reliability of transit as a determinant of ridership, comments from center directors and the advisory committee suggest that this is likely a factor in parents' choice to use transit. To the extent that centers want to encourage transit ridership, their policies might allow flexibility to account for periodic uncertainties in schedules associated with transit use (e.g., creating exceptions for late arrival fees caused by transit delays).

C. Recommendations for Child Care Advocates

This study does not show such high numbers of transit usage by parents at transit linked child care that transportation agencies will necessarily see it as a vital use of dollars. Funding streams to support more efficient land use near transit are being developed at the regional and state level, and many of these sources specify that a range of services should be offered near transit. Services are sometimes specified, such as child care, shoe repair or restaurants, but sometimes they may be defined broadly. The planning processes to create funding guidelines for these new developments represent an opportunity to assert that child care is a critical community service that needs to be considered and prioritized to optimize families' ability to take advantage of walkable communities. Key strategies might include:

- Request that child care be a factor in funding decisions for TOD projects by local and regional transportation and congestion management agencies, and in air quality programs that provide planning and capital dollars for TOD projects.
- Encourage local governments to adopt land use policies that facilitate location of child care near transit.
- Encourage child care resource and referral agencies to include transit information in child care referral databases.

D. Recommendations for Employers Near Transit Stations

Twenty-six percent (26%) of parents responding to the survey expressed interest in accessing child care near their work site. This number is rather high relative to past child care field estimates. However, our survey shows that where employers do provide employer-sponsored child care (which is a relatively rare benefit) and offer free parking, few employees use transit for their trips.

Regardless of whether child care is offered on or near an employment site, employers could consider offering an emergency ride home program. This could benefit parents who otherwise would be reluctant to take public transit to child care. More information on offering guaranteed ride home programs can generally be found through regional congestion management agencies.

For parents who are challenged by commuting with children, employers can also offer flex time and telecommuting options to offset time lost at work and possibly improve productivity.

E. Recommendations for Researchers and Funders

Child care programs are a rich source of research data on parents (working or non-working) and child care/preschool staff. It is important to understand how to identify facilities and the factors differentiating them that will affect transit use. Working with child care intermediary agencies is recommended to increase participation in studies and response by the target groups. In the case of this study, one on one outreach to engage the busy center directors was critical to obtaining parents' survey data. For the same reason, we chose to interview directors over the phone rather than with a paper survey. An appendix at the end of this report describes some of the center outreach and survey administration techniques used and challenges encountered.

This report has identified a range of strategies to better coordinate child care and transit resources for the benefit of children and families and to define the environments in which child care centers near transit can flourish (including active, walkable communities). Because these issues do not fall squarely into one policy area, there are few organizations that have the capacity or mission to promote these connections. Additional funding could support outreach on these strategies, including writing articles and making presentations, promoting more research, and/or identifying new organizations to assume responsibility for some of this work.

Overall, one of the conclusions of this study (and a recommendation going forward) is to reframe the question of whether child care should be located near transit. Instead, we should ask: Where and how (under what conditions and with what policy tools) is collocation of child care and transit likely to be effective in expanding parent transportation choices and increasing transit use? Such a framing points to a number of areas for future research and work.

<u>Areas for further research, education, and other work might include:</u>

- **Walking and Child Care:** Where should we locate child care so that parents will walk to it?

- **Parking and Child Care:** How can parking around employment centers be priced to balance incentives for transit use with benefits to employees? Which policy tools (cash out options, tiered pricing based on time of arrival, conversion of parking benefits to transit passes or child care benefits, etc.) can provide effective incentives for transit use?

- **Housing and Child Care:** Where are the opportunities for transit agencies and governments to promote child care location near transit oriented developments (without expanding parking)?

- **Work vs. Home:** Does it make a difference whether child care and transit located near each other are also close to home or close to work? Should the focus be on development of child care facilities near TOD housing or employment centers within walking distance from transit?

- **Guaranteed Ride Home:** Would expansion and promotion of such programs, particularly among smaller employers, increase use of transit?

- **Quality Time with Children:** What are the cognitive (and health) benefits of walking vs. driving that would help to justify greater focus on expanding choices for parents?

- **Quality of Transit:** How does the quality and frequency of transit affect use by parents in child care stations located near transit (test this variable independently from proximity to transit)?

- **Low-Income Families:** How can provision of child care within walking distance of transit improve the economic independence of low-income parents who are challenged by the cost of owning an automobile?

- **Fixing Broken Links:** How do we explain and address low transit use in cases where it is expected to be higher?

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APPENDICES

APPENDIX 1: Advisory Committee Roster

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APPENDIX 1: Advisory Committee Roster

Cathy Boettcher	GoKids
James Corless	Metropolitan Transportation Commission
Corinne Goodrich	SamTrans
Jeff Hobson	Transportation & Land Use Coalition
Sarah Johnson	4Cs of San Mateo County
Melinda Kanter-Levy	Marin Day Schools
Fran Kipnis	U.C., Berkeley
Valerie Knepper	Metropolitan Transportation Agency
Jessica Manzi	San Francisco Municipal Transportation Agency
Ellen Murtha	Child Care Ventures
Eric M. Nelson	Child Care Planning Associates
Desiree Portillo-Rabinov	Los Angeles County Metropolitan Transportation Authority
Maria Raff	Low Income Investment Fund
Diane Stark	Alameda County Congestion Management Agency
Sarah Syed	BART
Saskia Traill	National Economic Development and Law Center
Matthew West	Low Income Investment Fund
Marie Young	Low Income Investment Fund

APPENDIX 2: Parent Survey Instrument

(See attached at end of report)

APPENDIX 3: Center Director Questionnaire

(See attached at end of report)

APPENDIX 4: Description of Child Care Centers

Centers	City	Station	Dist. To Rail (miles)	Dist. To Bus (miles)	Infant Care[11]	Capacity	Provides Subsidies?
24-Hr. Parent-Teacher Ctr.	Oakland	Fruitvale BART	0.30	0.30	Y	70	Y
Bright Futures Early Learning Ctr	Oakland	12th St. BART	0.20	0.05	Y	70	N
Bright Horizons – Tamien	San Jose	Tamien Caltrain	0.05	0.05	Y	132	N
Bright Horizons@221 Main	San Francisco	Embarcadero BART	0.20	0.10	Y	119	N
California Hospital Med Ctr	Los Angeles	Blue Line/Figueroa & Pico stop	0.30	0.05	N	36	Y
Davis Street CC Center	San Leandro	San Leandro BART	0.50	0.05	N	60	Y
Healthy Environments	San Francisco	Montgomery BART/Caltrain	0.40	0.05	Y	86	N
De Colores Head Start	Oakland	Fruitvale BART	0.05	0.05	Y	122	Y
GoKIDS – Via Del Mar	Watsonville	Watsonville Bus Transit Center	0.00	0.05	N	32	Y
Holy Family Day Home	San Francisco	16th St. BART	0.30	0.05	N	150	Y
Kaiser Permanente Watts	Los Angeles	Blue Line/103rd St.	0.30	0.05	N	24	Y
Kidango Ohlone Chynoweth Center	San Jose	Ohlone-Chynoweth Light Rail	0.20	0.20	Y	44	Y
La Petite Academy/Magic Years	Richmond	Richmond BART	0.20	0.20	Y	84	N
Our Place – Marin Day Schools	Redwood City	Redwood City Caltrain	0.30	0.20	Y		N
Plaza CDC/Family Service	Redwood City	Redwood City Caltrain	0.20	0.20	N	24	Y
Rockridge Little School	Oakland	Rockridge BART	0.20	0.05	N	41	N
Small Trans Depot (Caltrans)	Oakland	19th St. BART	0.30	0.05	Y	36	N
The Phoenix School	Sacramento	Downtown Plaza, St. Rose of Lima Park	0.10	0.05	Y	112	N
Union Station Gateway Child Devel Ctr	Los Angeles	Los Angeles Union Station	0.05	0.05	Y	86	N

[11] All centers in the study serve preschool-age children (3-5 yrs). This column indicates those that also serve infants and/or toddlers.

APPENDIX 5: Survey Response Rates by Child Care Center

Centers	# Sent *	# Received	Response Rate
Urban Subsidized			
De Colores/Fruitvale – Oakland	220	198	90%
Holy Family Day Home – SF	95	19	20%
24 Hr Parent-Teacher Ctr – Oakland	70	61	87%
CA Hospital Medical Ctr – LA	45	41	91%
Kaiser Permanente Watts – LA	20	8	40%
TOTAL	**450**	**327**	**73%**
Urban Unsubsidized			
The Phoenix School – Sacramento	90	20	22%
Union Station Gateway – LA	95	32	34%
Bright Horizons @ 221 Main – SF	80	38	48%
Healthy Environments – SF	78	56	72%
Kathy Michiels School – SF	84	0	0%
Bright Futures – Oakland	45	30	67%
Small Trans Depot – Oakland	36	24	67%
Children's Learning Ctr – LA	61	0	0%
TOTAL	**569**	**200**	**35%**
Suburban/Rural Subsidized			
Kidango – Peninsula	33	17	52%
GoKids – Via del Mar – Watsonville	30	20	67%
Plaza CDC – Peninsula	23	20	87%
Davis Street – San Leandro	30	30	100%
TOTAL	**116**	**87**	**75%**
Suburban/Rural Unsubsidized			
Tamien – San Jose	95	42	44%
La Petite Academy – Richmond	54	51	94%
Little Elephant – Oakland	31	0	0%
Kids Station – LA	50	0	0%
Kindercare – Transit Tots East – LA	73	0	0%
Kindercare – Transit Tots West – LA	60	0	0%
Our Place / MDS – Peninsula	95	48	51%
Rockridge Little School – Oakland	59	26	44%
TOTAL	**517**	**167**	**32%**
TOTAL – ALL CENTERS	**1652**	**781**	**47%**
SUBTOTAL – Subsidized	**566**	**414**	**73%**
SUBTOTAL – Unsubsidized	**1086**	**367**	**34%**
SUBTOTAL – Urban	**1019**	**527**	**52%**
SUBTOTAL – Suburban/Rural	**633**	**254**	**40%**
TOTAL – EXCLUDING CENTERS THAT RETURNED NO SURVEYS	**1293**	**781**	**60%**

* Includes estimates of the number of parents who received the online option.

APPENDIX 6: Mode Split by Center

		From Home to CC						From CC to Final Destination					
Center Name	**Transit Station**	**Auto**	**Walk**	**Bus**	**Train**	**Other**	**Total**	**Auto**	**Walk**	**Bus**	**Train**	**Other**	**Total**
East Bay													
24hr Parent-Teacher Ctr	Fruitvale BART	92%	3%	5%	0%	0%	100%	92%	2%	7%	0%	0%	100%
Bright Futures	12th St. BART	93	7	0	0	0	100	67	23	0	10	0	100
Small Trans Depot	19th St. BART	96	4	0	0	0	100	67	29	0	4	0	100
Davis St. San Leandro	San Leandro BART	97	0	3	0	0	100	97	3	0	0	0	100
De Colores Head Start	Fruitvale BART	44	46	10	1	0	100	46	45	9	1	0	100
La Petite Academy	Richmond BART	96	4	0	0	0	100	57	37	2	2	2	100
Rockridge Little School	Rockridge BART	88	8	0	0	4	100	85	0	0	12	4	100
San Francisco													
Bright Horizons	Embarcadero BART	92	3	3	3	0	100	63	37	0	0	0	100
Healthy Environments	Montgomery BART	72	16	5	5	2	100	40	52	0	2	5	100
Holy Family Day Home	16th St. Mission	53	21	11	11	5	100	42	16	16	21	5	100
Los Angeles													
CA Hospital Med Center	Blue Line/ Figueroa	39	22	39	0	0	100	41	27	29	2	0	100
KP Watts	Blue Line/ 103rd St.	75	13	13	0	0	100	75	25	0	0	0	100
Union Station Gateway	Union Station	94	6	0	0	0	100	100	0	0	0	0	100
Peninsula													
Our Place, MDS	Redwood City Caltrain	100	0	0	0	0	100	83	17	0	0	0	100
Plaza CDC	Redwood City Caltrain	90	5	5	0	0	100	85	5	10	0	0	100
Bright Horizons Tamien	Tamien	98	0	0	0	2	100	98	2	0	0	0	100
Kidango	Ohlone/Chynoweth	94	6	0	0	0	100	100	0	0	0	0	100
Sacramento													
Phoenix Schools	Downtown Plaza	95	0	5	0	0	100	90	5	5	0	0	100
Watsonville													
Go Kids, Via del Mar	Watsonville Bus Transit Ctr.	90	10	0	0	0	100	80	20	0	0	0	100

APPENDIX 7: Notes on Child Care Facilities as a Research Source

Receiving adequate survey responses from busy parents of young children and generally overworked and poorly compensated child care providers is a complex challenge. The experience of this study highlights the importance of funds, outreach and timing in getting a strong survey response.

Funds for surveys
To get an adequate survey response, the researchers decided that it was essential to compensate centers for their time to administer and complete the surveys. Providing small payments to parents directly is problematic, so we opted instead to compensate centers for their time at a rate of $5 per survey returned. Given the financial challenges of providing quality child care, this might explain why urban centers serving subsidized children had the highest survey response rates.

One on one personal outreach from child care field
The strategy of having child care intermediaries do the outreach to solicit participation and interview the center directors was most effective. (LINCC staff currently or have previously worked at child care planning councils or resource and referral agencies.) The staff at these agencies are often familiar with individual programs or the structures of their work demands, in contrast to other groups like transportation researchers or transit agencies. It was necessary to follow up with the directors (often several times) and leave messages in order to find a good time to talk about the research. Directors play a critical role as 'gatekeepers' – giving or obtaining permission to participate – and typically are familiar with the logistics of successful survey distribution and collection.

Making participation as easy as possible for both the directors and parents was critical. Directors do not necessarily see every parent personally at drop off or pick up times. Several approaches contributed to the response rate: Providing a flyer about the study for posting or copying, sending an email message that directors could forward to parents explaining the study, and giving sufficient copies of surveys in English and Spanish. Transportation-themed stickers were enclosed with the surveys to help raise the visibility of the survey in each center to encourage parent participation.

Availability of online surveys
Center directors were given the option of distributing the parent survey in an online version via a web link. Thirteen directors requested the online version, forwarding it to parents as a link in an email message with an introduction provided by the researchers. No centers used the online version exclusively, and parents were instructed to respond to only one survey. Eight of the centers had families who used the online version; a total of 109 of the 768 surveys completed were done online. One disadvantage of the online option was that the directors could not track the responses of their parents as they could with the paper surveys. Directors' follow-up with parents as a group, and probably individually, determined the centers' response rate.

Time of year
The goal of our project was to administer the survey before summer — a transitional time when families and staff take vacations and new children are enrolled to replace those going off to kindergarten. LINCC surveyed the centers in May. Generally, this was an effective time, although several centers were conducting their own year-end surveys about this time (for national accreditation purposes or company assessment) and other expressed "survey exhaustion" after a year of similar requests from outside researchers. March or April might be optimal months to request survey participation. Least desirable times are likely to be the beginning and end of the school year (September and May/June), and the winter holiday season.

SURVEY OF CHILD CARE AND TRANSPORTATION

We'd like to learn about how you get your child to this child care center to improve options for working parents. To thank you for your time, your child's child care center will be provided with $5 per returned survey.

This survey will take about 5 minutes to fill out.

DROPPING OFF AT CHILD CARE

1. **Last week, who dropped off your child(ren) at this center most often?**
   - ☐ Mom
   - ☐ Dad
   - ☐ Babysitter/Nanny
   - ☐ Other _____

2. **How many days last week did they drop off your child(ren)?**

   ___ days

3. **Are they employed?**
   - ☐ Full-time
   - ☐ Part-time
   - ☐ Homemaker

4. **How did they get to the child care center?**
   - ☐ Drive/drop off in car
   - ☐ Walk
   - ☐ Bike
   - ☐ Bus (AC Transit/Muni/VTA)
   - ☐ Train (BART/Muni/Caltrain/VTA)
   - ☐ Other

5. **How long did the trip take?**

   ___ minutes

6. **After dropping off at child care, what was their final destination?**
   - ☐ Work
   - ☐ Return home
   - ☐ Errands
   - ☐ Drop off others
   - ☐ Other

7. **How long did it take to get to their final destination?**

   ___ minutes

8. **How did they get to their final destination?**
   - ☐ Drive/drop off in car
   - ☐ Walk
   - ☐ Bike
   - ☐ Bus (AC Transit/Muni/VTA)
   - ☐ Train (BART/Muni/Caltrain/VTA)
   - ☐ Other

9. **Is there free parking at their final destination?**
   - ☐ Yes
   - ☐ No
   - ☐ Don't Know

PICKING UP AT CHILDCARE

10. **Last week, who picked up your child(ren) most often?**
    - ☐ Mom
    - ☐ Dad
    - ☐ Babysitter/Nanny
    - ☐ Other _____

11. **How many days last week did they pick up your child(ren)?**

    ___ days

12. **Where did this person come from?**
    - ☐ Work
    - ☐ Home
    - ☐ Other

13. **How close is this to a rail/bus station?**

    ___ miles or ___ blocks ___ don't know

14. **How long did it take to get to child care?**

    ___ minutes

15. **How did they get to the child care center?**
    - ☐ Drive/drop off in car
    - ☐ Walk
    - ☐ Bike
    - ☐ Bus (AC Transit/Muni/VTA)
    - ☐ Train (BART/Muni/Caltrain/VTA)
    - ☐ Other

16. **How did they get to their final destination?**
    - ☐ Drive/drop off in car
    - ☐ Walk
    - ☐ Bike
    - ☐ Bus (AC Transit/Muni/VTA)
    - ☐ Train (BART/Muni/Caltrain/VTA)
    - ☐ Other

17. **How long did it take to get to their final destination?**

    ___ minutes

SOME QUESTIONS ABOUT YOUR FAMILY

18. What are the ages of the children you have <u>in this center</u>?

_____Child #1
_____Child #2
_____Child #3

19. How many people are in your household?

____ Number of Adults
____ Number of Children

20. Are you a single parent?

☐ Yes
☐ No

21. Are your child care fees subsidized at this center?

☐ Yes
☐ No

22. How many vehicles in working condition are available to your household?

_____ vehicles (cars/vans/SUVs/trucks)

23. Do you or your partner have any of the following? (check all)

You	Partner	
☐	☐	Multi-ride/monthly bus/train pass
☐	☐	Emergency ride home program

24. How close is your home to a rail/bus station?

____ miles or ___ blocks ___ don't know

25. Please tell us the <u>cross streets</u> (intersection) closest to your home (e.g. Russell & Ashby, Berkeley 94702).

_____ Streets
_____ City, Zip

26. What is your child's race? (Check all).

☐ African American/ Black
☐ Asian
☐ Hispanic/Mexican/Latino
☐ White/Caucasian
☐ Other _____

YOUR OPINIONS

27. How important were the following factors in your choice of child care center?

	Not Important	Somewhat Important	Very Important	Most Important
Center located near home	☐	☐	☐	☐
Center located near work	☐	☐	☐	☐
Center near a bus/train station	☐	☐	☐	☐
Quality/reputation of center	☐	☐	☐	☐
Cost of child care	☐	☐	☐	☐
Availability/Space for child	☐	☐	☐	☐

28. How much of a barrier are each of the following to using the bus or train to get to child care?

	Not a Barrier	Somewhat of a Barrier	Large Barrier	Biggest Barrier
Distance from station/stop to child care	☐	☐	☐	☐
Distance from home to station stop	☐	☐	☐	☐
Length of trip on bus/train	☐	☐	☐	☐
Dealing with strangers on bus/train	☐	☐	☐	☐
Carrying children/their stuff	☐	☐	☐	☐
Cost of bus/rail	☐	☐	☐	☐
Lack of stroller/carseat storage at child care	☐	☐	☐	☐

29. Tell us how much you agree or disagree with the following.

	Strongly Disagree	Disagree	Agree	Strongly Agree
I need a car to get to my child in an emergency	☐	☐	☐	☐
Driving is the fastest way to drop my child at child care	☐	☐	☐	☐
It is cheaper to ride the bus/train than driving.	☐	☐	☐	☐
Parking is very expensive near my workplace.	☐	☐	☐	☐

Thank you for completing our survey.

SURVEY OF CHILD CARE AND TRANSPORTATION

Thank you for agreeing to be part of our study of the links between transportation and child care. We would like to ask you a few questions about your center and the transportation options available to your staff and families.

This survey will take approximately 10 minutes to complete.

Quick Overview of Your Center

1. **How many children are in your center?**

   _____ total number of children

2. **How many staff work in your center**?

   _____ full & part time staff members

3. **Is your center "employer-sponsored"?**

   _____ Yes Also open to community? Yes/No
   _____ No

4. **What is the racial mix of children in your center?** (rough estimates are fine)

   _____% White
   _____% Black/African-American
   _____% Hispanic/Latino
   _____% Asian

5. **How many children enrolled in your center receive state (CDE) or federal (Head Start) child care services?**

   _____number receiving subsidy
   _____percentage receiving subsidy

6. **Was your center intentionally built at or adjacent to a rail or bus station?**

   _____ Yes
   _____ No
   _____ Don't Know

7. **Is your center part of a housing complex near a rail or bus station?**

   _____ Yes
   _____ No

Staff Transportation Issues

8. **Check the transportation benefits available to your staff:**

   _____ Free parking
   _____ Pay parking (cost per month $____)
   _____ Payroll deduction for bus/rail passes
   _____ Other _____

9. **How does your staff get to work? (number of staff members for each)**

   ____ Drive themselves
   ____ Get a ride (carpool)
   ____ Bus/Train
   ____ Walk/Bike
   ____ Can't estimate

10. **Is the cost of transportation an issue in staff retention at your center?**

    _____ Yes
    _____ No

11. **Does your center use buses or trains to take children on field trips?**

    _____ Yes
    _____ No

12. **How safe is the walking route from the closest bus or rail station to your Center?**

Traffic (circle one):	Very Unsafe	Unsafe	OK	Safe	Very Safe
Crime (circle one):	Very Unsafe	Unsafe	OK	Safe	Very Safe

Turn over, survey continues on back.

Parent Transportation Issues

13. Please indicate whether your center provides any of the following <u>for parents</u>:

Yes	No	# Spaces (if Yes)	
_____	_____	_____	Vehicle parking **<u>during pickup and drop off only</u>**
_____	_____	_____	Vehicle parking **<u>all day</u>**
_____	_____	_____	Staffed curbside loading zone
_____	_____	_____	Unstaffed curbside loading zone
_____	_____	_____	Stroller parking/storage
_____	_____	_____	Carseat storage
_____	_____	_____	Bicycle/trailer parking

14. Is auto congestion a problem at pickup and drop off times?

_____ Yes
_____ No

15. Do you mention convenience to public transit in your center's marketing materials to prospective parents or staff?

_____ Yes
_____ No

16. Are parents at your center offered any of the following 'perks' if they use buses or trains? (Check all)

_____ All day parking at your center
_____ Child care discounts
_____ Discounted bus or rail tickets/monthly passes

17. Would you be interested in working with local transit officials to offer parents and staff more travel options?

_____ Yes
_____ No

18. Have you had any interaction with transit agency officials regarding your center?

_____ Yes
_____ No

Contact name/phone, if any:

Thank you for your participation. Please contact me if you have any questions about this survey.

Person interviewed _____ *Title* _____

Person completing survey _____ *Date* _____