

**What Helps and Hinders Hmong Pre-Kindergartners' School
Readiness: Learning from and about the Hmong in St. Paul, Minnesota.**



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Ready4K

Table of Contents

Acknowledgements	3
Executive Summary	6
Introduction	9
Ecological Theoretical Framework	13
Conditions of Hmong Families in St. Paul, Minnesota	13
Hmong Formal Child Care	18
Conditions of Hmong in St. Paul Public Schools (SPPS)	25
Hmong Students in SPPS	25
Hmong Staff in SPPS	27
Hmong Children’s School Readiness	29
School Readiness: Vocabulary Skills	30
Reading, Writing, and Mathematic Skills	31
Reading as Measured by Letter-Word Identification Test	32
Writing as Measured by the Spelling Test	33
Mathematics as Measured by the Applied Problem Test	33
What Factors Help Hmong Children’s School Readiness?	34
What Factors Hinder Hmong Children’s School Readiness?	40
Conclusion	44
Recommendations	46
References	52

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Executive Summary

The St. Paul Public School System has more Hmong children than any other district in the state of Minnesota. The Hmong are a strong ethnic refugee population that represents some of the most economically disadvantaged populations in the United States. By exploring the conditions that impact Hmong families and the learning and context of Hmong pre-kindergartners, we unravel the complexity of previous research on linguistically isolated groups and children's development. Our primary focus is to find data that can guide policy makers in meeting the needs of this and similar populations, too often underrepresented in policy.

In order to understand the learning and living context of Hmong children and examine Hmong children's school performance, we analyzed data from a variety of sources. The quantitative component of our work comes from the 2000 Bureau of Census, the St. Public School System (SPPS), Resources for Child Caring in Ramsey County, the Minnesota Department of Human Services, and Project Early Kindergarten (PEK). The qualitative component is the result of ten focus groups with Hmong parents, grandparents, child care providers, educators, and interviews with leading scholars and community workers.

Some of our crucial findings:

- Despite the thirty years of immigration history in America, many Hmong families still struggle with the challenges of language and poverty and this has impacted their children's learning.
- While most Hmong children do not enroll in formal child care settings, there are 140 licensed child care providers in Ramsey County and two child care centers that serve Hmong and other children.

- Hmong children are rated by teachers and providers as the most ready to learn across racial and demographic lines.
- The PEK data suggests that Hmong children need more encouragement in vocabulary and mathematics in order to perform on the same levels as Caucasian children.
- Factors that help and hinder Hmong children's school readiness include: social-emotional development, valuation of children's education, parental education, perceived shyness, dual-language deficiency, and lack of parental involvement.

An awareness and attention to these factors will afford Hmong children a more productive learning environment.

During the course of our research, we came across two issues that warrant attention from policy makers. Most Hmong children in the St. Paul Public school programs come to the school settings automatically considered as English Language Learners (as with other non-English native speaking groups). While we cannot definitively conclude what the disadvantages and/or advantages to such categorization, it is important that we examine the system to see whether this policy perception is helping or hurting the progress of children. While Hmong children are the largest students in the school system, the numbers of licensed classroom Hmong teachers are heavily disproportionate. Most of the adults in the research expressed that Hmong children lack cultural role models within the educational context. A closer examination of these two issues will help us understand and work on policies that will be effective in supporting the learning experience of Hmong children and others.

Base on our findings, we recommend:

- Policy makers re-examine the ways in which we work with disadvantaged communities and find ways to ensure all children have access to early quality care and education because the majority of Hmong children don't.
- Policy makers evaluate current policies that provide adult educational opportunities (and/or incentives) for parents (and adults who care for children) to continue their education because children who come from families where both parents have high school diplomas have an educational advantage over those who don't.
- Child care providers, particularly those who operate within their homes, participate in continuing education opportunities to gain exposure to a variety of curricula and teaching pedagogies in a systematic way.
- The burden of responsibility must be re-appropriated to Hmong parents and alleviated from grandparents and the elderly. Parents must ensure that children can learn by allocating more time and more consciousness to the job of raising strong learners.
- The Hmong and English dual-language deficiency among Hmong children must be researched, evaluated, and resolved before it affects too many children. Although there are no studies on the long-term effect of the dual-language deficiency in the Hmong community, we know from other communities that children who have developed strong command of two languages tend to perform better as they progress educationally.

This report and its implications on the circles and networks of adult and systemic influences on the lives of Hmong children is a leap into the chasm of the achievement gap for St. Paul, Minnesota and the rest of the nation beyond myths of an Asian “model minority” that simply doesn't hold for all Asian groups.

Introduction

The achievement gap between racial/ethnic minorities and Caucasian students has gained the attention of a nation. In families and communities across the country, concerned adults are wondering whether our children are ready for schools and whether schools are doing their best to prepare our children for lifelong learning. In Minnesota, various reports have been produced to investigate different aspects of school readiness: the impact of child care centers (Minnesota Department of Human Services, 2005), Head Start Programs (Mueller, Gozali-Lee, & Sherman, 1993), and school sponsored pre-kindergarten programs (Heinrichs, 2005a, 2005b; Heinrichs & Fitzgerald, 2005). However, none of these reports have examined exclusively or comparatively the conditions of learning for Hmong pre-kindergarteners, an important population within Minnesota and its schools. Too many times when scholars look at racial/ethnic differences in school readiness, there is heavy bias on groups with more visibility, such as Hispanic, African American, and American Indian students. Too often, Asian American students have been stereotyped as the “model minority” and therefore the achievement gap may not apply to them (Lee, 1994; Um, 2000). Hmong, as an ethnic minority and refugee population, presents an important perspective on the issues and challenges facing specific groups within and beyond the Asian “model minority” conception and the chasms of an achievement divide that exists in Minnesota and the rest of the nation.

We would not be the first to contend that not all Asians are alike nor do they share the same opportunities in this country, particularly when looking at the newest Southeast Asian groups, including the Hmong (Hamilton-Merritt, 1993; Rumbaut, 1989). For example, recent research with high school and college students found that not all Asian students fit into the “model minority” ideal; the fact is that not every Asian student is excelling in school (Lee, 2001;

Um, 2000). More strikingly, the research for pre-kindergarten students is consistent with those of older students. Mueller, Gozali-Lee, and Sherman (1993) found in their study with Head Start students in Ramsey County, Minnesota that most Hmong children follow behind their peers on the mathematics achievement tests—when the “model minority” myth would lead to different conclusions.

At present, substantially few research studies has been done on young Hmong children, particularly those who are in the process of preparing for school. The purpose of this study is threefold. First, we investigate the current conditions that surround Hmong children in the city of St. Paul. Next, we examine how Hmong children are doing in school compared to other racial/ethnic students. Finally, we highlight factors that help and hinder Hmong children’s school readiness based on a series of focus groups with parents, grandparents, child care providers, and educators. We want to understand the different facets of Hmong children’s lives and target learning zones and learning patterns that are integral or challenging to their success in schools. We want a holistic portrait of Hmong children so that we can successfully demystify the “model minority” myth and bring the realities of an achievement divide closer to those who are falling into the chasm.

Methods

To understand the learning and living context of Hmong children and examine Hmong children’s school performance, we analyzed 2000 Bureau of the Census Data, trend and staff data from the St. Public School System (SPPS), child care provider data from Resources for Child Caring in Ramsey County, Minnesota Department of Human Services and Project Early Kindergarten (PEK). In order to understand the influences that surround Hmong early learners,

we conducted ten focus groups with Hmong parents, grandparents, child care providers, and educators.

The PEK Data

The PEK project was funded by the McKnight Foundation to close the achievement gap for low-income, English Language Learners, and Special Education students (Mueller et al., 2006). PEK began operating in ten St. Paul schools in the fall of 2005. We requested raw data with encrypted students' identification from the Department of Research, Evaluation, and Assessment at SPPS. Dr. Xiong and his team of research students analyzed the data. The PEK data included 965 students from two cohorts (2005 and 2006), with a total of 196 Hmong students. Specifically, sixty-four Hmong students attended PEK, began kindergarten in fall 2006 (cohort 1); 67 were kindergarten classmates of cohort 1, without attending PEK; and 65 attended PEK in the fall of 2006 (cohort 2). Students in cohort 1 were tested twice in the fall 2005 and the fall 2006 while students in cohort 2 were tested once in the fall 2006 using the same measures.

Focus Group Data

Participants were recruited from the Hmong Child Care Network, non-profit organizations, and child care centers between April and June 2007. All focus groups were conducted by two experienced facilitators in Hmong and English or combinations thereof depending on the group. All focus groups were held in public places and lasted between one hour and a half to two hours. All focus group discussions were audio taped and transcribed for analyses.

Focus group data were based on three Hmong parent groups, one Hmong grandparent group, two Hmong home-based child care provider groups, and three Hmong and non-Hmong educator groups. One face-to-face interview with a center-based director was also conducted due

to the rarity of center-based child care providers in the Hmong community. A total of 46 participants (five men and 41 women, ages ranged from 25 to 54, with a mean of 39.9; SD = 11.4 years) were involved in the focus groups. All participants, except one educator, were Hmong, belonged to the first generation, were married, and have lived in the United States for more than 20 years. More than 50% of the participants have less than a high school diploma; about 16% of the participants have a college degree; the majority were female (Figure 1). Focus group participants were on entirely voluntary basis; calls for the focus groups were disbursed to a variety of agencies in the early childhood field.

Figure 1. Sample Characteristics (n=46)

Variables	Parents	Grandparents	Teachers	Childcare Providers	Total
Total (N)	20	5	11	10	46
Gender					
Male	1	2	2	0	5
Female	19	3	9	10	41
Age group					
Mean	36.4	53.5	40.5	38.4	39.9
SD	11.1	8.4	11.9	9.1	11.4
Birth Place					
Laos/Thailand	19	5	9	10	35
The U.S.	1	0	2	0	3
Years in the U.S.					
Mean (SD)	17.4 (7.9)	22.0 (8.2)	24.7 (6.4)	22.3 (6.4)	21.2 (7.5)
Employment status					
Employed	8	1	6	9	24
Unemployed	5	3	0	0	8
Education					
Less than high school	7	4	0	0	11
High school diploma	5	0	1	3	9
Some college/college degree	1	1	10	5	17

* Total n does not match the count in each cell due to missing values.

Ecological Theoretical Framework

Dr. Urie Bronfenbrenner's 1977 ecological theoretical framework is most useful in studying the life conditions of Hmong children and its impact on their scholastic performance. Dr. Bronfenbrenner was interested in how environmental contexts shaped and informed children's development. His premise is that children do not exist in vacuum settings; instead, they are influenced by a constellation of social networks, neighborhoods, schools, and local and national policies. Dr. Bronfenbrenner's theoretical framework has been supported by various contemporary studies that show how children's school readiness can be traced to their family's socioeconomic status and neighborhood conditions (Duncan & Magnuson, 2005), early education programs, including child care and preschool opportunities (Magnuson & Waldfogel, 2005). For example, a child who grows up in a family where both parents do not have a high school diploma will be more likely to have limited access to quality early preschool before kindergarten, and is likely to live in a neighborhood where crime is prevalent. These conditions will likely, though not necessarily, give rise to poor developmental adaptation, including cognitive development delays (Sameroff, Seifer, Baldwin, & Baldwin, 1993).

Using this framework, an analysis of the conditions governing Hmong children's learning contexts and influences was conducted for Hmong pre-kindergartners in St. Paul.

Conditions of Hmong Families in St. Paul, Minnesota

Minnesota is home to approximately one quarter of the nation's Hmong population (41,800), and St. Paul is home to the largest Hmong population in Minnesota (24,389). Indeed, St Paul, Minnesota is part of a metropolitan area estimated to have the largest urban Hmong population in the world (Minneapolis Foundation, 1999).

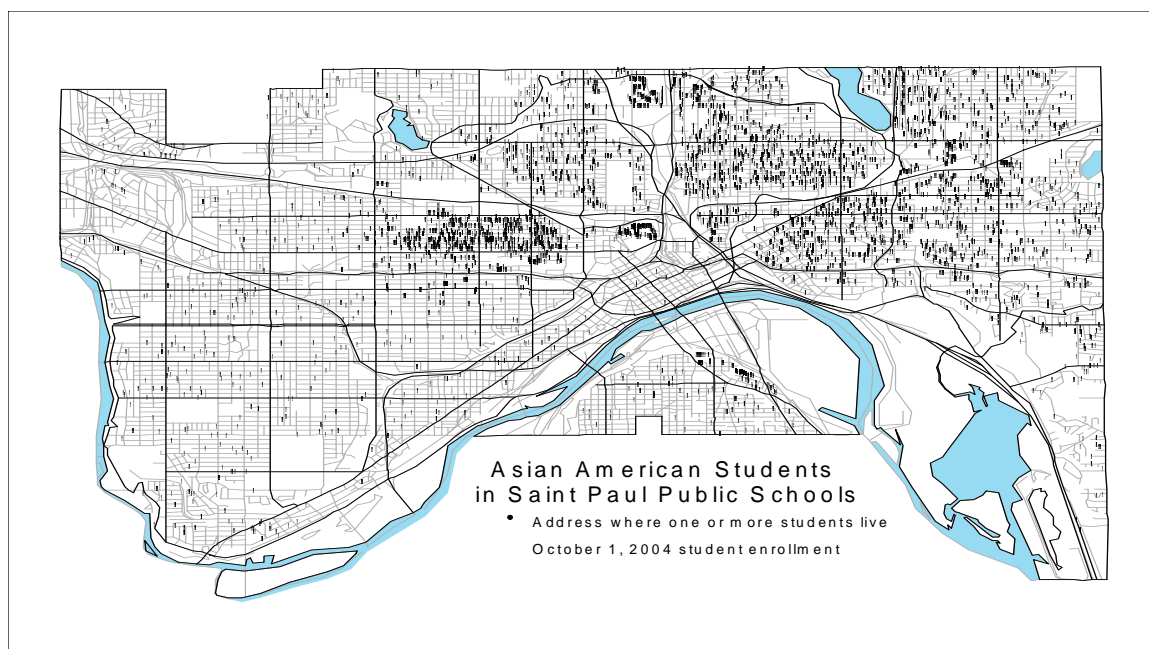
The majority of Hmong are concentrated in four neighborhoods in St. Paul: Thomas-Dale, Dayton's Bluff, Payne-Phalen, and the Greater East Side. Overall, Hmong share 9.5% of the St. Paul population and make up 69% of the Asian population in the city (Table 1 and Graph 1). The Hmong are the youngest population in the city, with a median age of 15.6 years compared to the city's median age of 31 years; over half of the Hmong population is under the age of 19 (U.S. Census Bureau, 2000).

Table 1. Population by race in the city of St. Paul, Minnesota

Race	Population	Percentage	U.S.
Caucasian	172,922	66.1%	74.7%
African American	35,856	13.7%	12.1%
American Indian/Alaska Native	1,897	0.7%	0.8%
Asian	35,324	13.5%	4.3%
Native Hawaiian & Other Pacific Islander	87	0.0%	0.1%
Some other race	9,065	3.5%	6.0%

Source: U.S. Bureau of the Census, 2000. Retrieved from www.chicagofed.org/cedri/files/hmong_tracts.xls

Graph 1. Hmong Residents in St. Paul



Note. Each dot represents one person in the area. Source: St. Paul Public Schools, 2007.

While the Hmong in St. Paul have contributed to the socio-political structures of the city, the majority of the people still face grave socio-economic challenges. Economically, the Hmong community is among the poorest citizens in St. Paul, with a median household income of only \$35,546 when compared to the median household income of the city (\$48,925). Table 2 shows that Hmong has the highest proportion of family income below the federal poverty line (33.9%) compared to Caucasian (3.4%), African American (19.2%), and the Asian-non-Hmong group² (25.8%). In addition, their median home value (\$93,200) is the lowest compared to other racial and ethnic groups even though they have the second highest homeownership rate in the area

Table 2. Percentage of Household Income below the Poverty Line in St. Paul, Ramsey and Hennepin Counties, MN by Race

	Caucasian	African American	Hispanic	American Indian	Asian-non Hmong	Hmong
St. Paul	3.4	19.2	12.8	17.8	25.8	33.9
Ramsey County	2.6	18.7	12.3	14.1	12.6	31.9
Hennepin County	1.7	19.5	12.7	20.2	6.3	33.7

Source: U.S. Census Bureau, 2000.

(Mind the Gap, 2005). Being economically disadvantaged, the majority of Hmong in St. Paul tend to concentrate in poorer neighborhoods. Seventy percent of the Asian population in the poorest St. Paul neighborhoods is Hmong. In the Thomas-Dale neighborhood, for example, the median household income of residents is \$14,211 compared to the overall Minnesota household income of \$47,111 (U.S. Census of the Bureau, 2000).

The poverty of the Hmong population can be attributed to several factors, most of which have to do with low educational histories and employment status. Although the national employment rate is down from 1990, the percentage of Hmong adults who are not in the labor force compared to other groups is disheartening. In 2000, approximately 47 percent of the

² Hereafter, Asians who are not Hmong will be referred to as Asian.

Hmong adults were not in the labor force compared with 29 percent of Minnesota's adults. Similarly, the Wilder Research Center (2000)³ found that 55 percent of the Hmong respondents reported to being unemployed compared with 27 percent Hispanic and 43 percent Somali respondents. When asked about the employment status of the respondents' spouses, Hmong respondents reported more unemployment (55%) than Hispanic (24%) and Somali (25%) respondents.

Even among those who are employed, the Hmong tend to hold jobs in low-paying occupations compared to other racial and ethnic groups. According to the U.S. Census Bureau (2000), the majority of Hmong hold jobs considered low-paying. Only four percent of the Hmong in the Twin Cities have jobs in high-paying occupations, such as management, legal, computer and math, architecture, and healthcare fields with annual salaries ranging from \$60,000 to \$97,000, compared to other racial/ethnic groups in the area, especially Asian (24%) and Caucasian (20%) adults. Comparatively, the Hispanic population shared seven percent and African Americans shared 11 percent of the high-paying occupations in the Twin Cities (Mind the Gap, 2005).

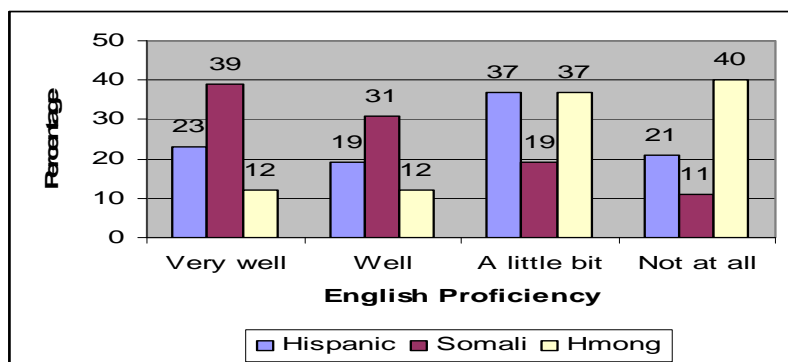
The educational levels of Hmong adults in different data sources reflect the same disadvantage. On average, the rate of adults who have a high school degree for Hmong is 45% compared to 93% of Caucasian adults in the Twin Cities. When comparing the Hmong with other ethnic groups, they are the least educated group in the area; Mexican Americans were the

³ The Wilder Research Center conducted a study using a probability sample in Ramsey County that included 276 Hmong who were 18 years old and up, along with Hispanic, Russian, and Somali immigrants, to learn about their experiences in Minnesota. The report can be found at www.wilder.org.

second least educated group, with 57% high school graduates (Mind the Gap, 2005). Consistent with the U.S. Census of the Bureau report, the Wilder Research Center (2000) study found a similar trend where only 17% of the Hmong respondents reported having a high school diploma compared to Hispanic (19%) and Somali (25%).

Given what is known about the educational level of the Hmong, it is not surprising to find that 77 percent of the Hmong adults surveyed reported that they could only speak English “a little bit” or “not at all” compared to 58 percent Hispanic and 30 percent Somali respondents (see Graph 2; Wilder Research Center, 2000). They are also the least to take English language classes to improve their English skills (17%) compared to Somali (51%) and Hispanic (21%). As a consequence, 35 percent of the Hmong stated that the language barrier was one of the stresses of living in Minnesota compared to only 15 percent Hispanic and 21 percent Somali (Wilder Research Center, 2000).

Graph 2. English Language Proficiency of Hispanic, Hmong and Somali in St. Paul



These demographics reveal the economic disparities of the Hmong in St. Paul. We know that the majority of the Hmong children grow up in low-income households, in homes with lower market values and with parents and adults who are either unemployed or in low-paying, low-skilled occupations.

Hmong Formal Child Care

Formal child care has played a significant role in socializing children (Shonkoff & Phillips, 2000). However, the quality and characteristics of child care settings varies depending on the type of the setting. According to the National Institute of Child Health and Human Development (NICHD), there are typically three types of child care that are available to families: the center-based care, the home-based care, and the informal home care or the friend, family, and neighbor (FFN) care. When measuring the quality of care, researchers tend to look at both structural and process indices. For example, structural indices include group size and provider education and experiences, and process indices include the child care environment (i.e., structure and safety), provider's sensitivity to children's developmental needs, and the extent to which the provider engages in children's cognitive development. On the average, NICHD found that center-based providers tend to have higher education compared to home-based care providers and FFN care providers. Conversely, child-provider ratio and group size are greater for formal care compared to FFN care (Kontos, Howes, Shinn, & Galinsky, 1995). It is important to note that the formal child care structure is new for many in the Hmong population, an adult population that consists of primarily first and one and a half generation refugees.

In this report, we examined both the structure and process indices of the Hmong child care setting. Structure indices we examined include Hmong providers' education and experiences using data from Resource for Child Caring and Minnesota Department of Human Services. Process indices examined in this report were based on focus group data looking at the ways in which providers engaged in children's social and cognitive development.

Structure Indices

In the seven county metro areas, approximately 140 Hmong child care providers were identified⁴. More than half of the child care providers (66%) reside in Ramsey County, with the majority in the city of St. Paul; the remaining 34 percent of the Hmong providers are located across Hennepin (28%), Washington (5%), and Dakota (1%) counties. Data obtained from the Department of Human Services⁵ show that approximately a third of Hmong providers have their high school diploma/GED⁶. Additionally, that the group is the least likely to have a four-year degree (3%)⁷ compared to other ethnic groups (Table 2). Anecdotally, we know that there are a proportion of Hmong care providers who do not have their high school diploma/GED in the Twin Cities; we speculate that these providers fell into the “no responses” category due to language barrier or other factors (Table 3).

Table 3. Child Care Providers’ Education by Race/Ethnicity⁸

Education	Hmong	Other Asian	Hispanic	African Immigrant	African American	Caucasian	American Indian
High School Diploma/GED	33 (29.5%)	20 (32.3%)	39 (44.8%)	10 (25.6%)	118 (44.4%)	5258 (52.3%)	31 (54.4%)
2-Year College or Associate Degree	19 (17.0%)	15 (24.2%)	16 (18.4%)	13 (33.3%)	101 (10.9%)	2449 (24.4%)	16 (28.1%)
Bachelor or Higher Degree	3 (2.7%)	22 (35.5%)	23 (26.4%)	8 (20.5%)	29 (10.9%)	2077 (20.7%)	8 (14.0%)
No Responses	57 (50.9%)	5 (8.1%)	9 (10.3%)	8 (20.5%)	18 (6.8%)	264 (2.7%)	2 (5.7%)

Source: Minnesota Department of Human Services, 2006.

⁴ Data obtained from Resources for Child Caring at www.resourcesforchildcare.org.

⁵ Data obtained from the Department of Human Services (2006).

⁶ Data obtained from the Resources for Child Caring (RCC) show 51.4% providers reported of having a high school diploma/GED.

⁷ Data obtained from the RCC show 5% providers reported of having a BA/BS or higher.

⁸ Interpret the data with caution since the “No Responses” category for the Hmong group contains a significant higher proportion of providers than the other groups.

We also examined child care providers' experiences and their education compared with other racial/ethnic groups to determine the measurable qualities of Hmong child care. Table 4 shows that Hmong providers have the least experience in the business (74%), second to African immigrant child care providers (89%)⁹. Ninety four percent of the Hmong providers have worked in the child care business for ten years or less compared to 68% of the Caucasian American and 38% of African American providers who reported being in the business for more than ten years. In general, African American, Caucasian, and American Indian child care providers have the most experience in the business. This is not surprising because they have longer histories in Minnesota. Conversely, African immigrants, Hmong, and other Asian group have the least formal and documented experience in the child care business because of their histories.

Table 4. Child Care Providers' Experiences by Race/Ethnicity

Experience	Hmong	Other Asian	Hispanic	African Immigrant	African American	Caucasian	American Indian
0-5 years	71 (74%)	26 (46%)	40 (48%)	27 (75%)	89 (35%)	3191 (32%)	22 (39%)
6-10 years	19 (20%)	15 (26%)	16 (19%)	5 (14%)	67 (27%)	2143 (22%)	15 (26%)
11 or more years	6 (6%)	16 (28%)	27 (33%)	4 (11%)	97 (38%)	4566 (46%)	20 (35%)

Source: Minnesota Department of Human Services, 2006.

Process Indices

The two focus group discussions with home-based child care providers and an interview with a center-based child care provider, presented a strong cohesive professional group who communicated a strong sense of regard for their work. The group expressed a desire to see the

⁹ A likely explanation is the fact that most African immigrants came to Minnesota later than the Hmong (Wilder Research Center, 2000)

children under their care learn and excel in school. They communicated an awareness and conscious effort to help children and parents in the transition from informal to formal education through practices of routines and proper discipline. One provider said, “Parents don’t have schedule and routines for their children, especially for newly arrived parents. But after their children spend a year in our daycare they have become nicer.” Other providers discussed wanting to work with parents to ensure there’s consistency between the children’s homes and the day care settings to teach children the significance of smooth transitions. The groups expressed a consistent regard for the communication between parents and providers as the key to building successful professional relationships: a dynamic, continuous dialogue on the needs of the children, the interactions between the children and the rules for proper discipline and accord.

Through practices of discipline, the care providers discussed the flow of behavior and change from the care setting to the home and its impact on Hmong children and adults. Some care providers expressed that despite their efforts to discipline the children in the day care setting, the discipline practice was not reinforced consistently at home. One care provider said that inconsistency was not a major concern because she believes strongly in the ability of care providers in correcting children’s behaviors. Another provider talked about how some parents changed their parenting practices (i.e., spanking) as a result of what providers taught the children in the child care setting. She shared how her children reported when their parents spanked them, and how they went back to the home and told their parents that according to the teacher, “You’re not supposed to do that.” As a result, parents changed their discipline behaviors in accordance with day care approaches.

In addition to the examination of providers’ motivations and commitment to making a positive difference in Hmong children’s lives, we also analyzed the discussions regarding goals,

routines, curricula, and discipline in order to determine the quality of the child care provider settings.

Goal

We wanted to examine providers' goals for their child care work since most child care settings are formulated around a business model: financial gains, business sustainability, and clientele. Most of the providers in the focus groups expressed more interest in the children they were working with and less of the conversation was focused on the financial elements of their work. Much of the discussion revolved around the challenges and conditions of creating environments with strong foundations in the Hmong language and a curriculum that involves English, teaching children the English alphabets, numbers, colors, shapes, and animals. There were repeated discussions on the shift from day care to kindergarten. School readiness is the forethought of many of the child care providers we talked with. One provider said, "Our goal is to teach children the alphabets, the possibility of drawing and numbers...we hope that by the time they enter school [kindergarten], they would know their name, address, phone number, their ABC's and 123's."

The discussion we had with the center-based provider illustrated and confirmed the commitment to the improvement of children's learning. In our conversation with her, we learned that the provider is highly committed to the children she cares for and is innovative and proactive in her approach to getting children ready for kindergarten. She employs a curriculum derived from the SPPS curriculum and was mentored by two individuals from SPPS during the period of our study. When we visited the graduation celebration of her 2007 class, we were impressed by what her children could do. For example, most of the five year old children read complete

paragraphs without help and most of her non-Hmong students could sing children's songs in Hmong and all the children could do so in English interchangeably.

Routines

Defined and expressed routines are not typical practice in Hmong families. Studies have shown that Hmong parents are more relaxed and indulgent during the early years of children's lives (Morrow, 1989; Xiong, Detzner, & Rettig, 2001). However, in the transition from the family environment to the day care setting, Hmong providers reported that they "have to adopt the structure required by the county to operate a day care setting." All of the providers we talked to reported that they have their own routines. All the routines include daily nap time, meal time and play time. A sample routine for a Hmong home-based child care operation looks like the following: the first child arrives at 3:30 in the morning; the last one comes at 9:00 AM; breakfast or snack is served for all the children at this time, the children get to watch *Dora and Diego* for ten minutes while the dishes are cleared; there is scheduled reading time; the children play for an hour—they get to choose if they want to draw or color; lunch time is set at noon; an hour of play is scheduled in; a designated nap time of one to two hours; a light snack is served; the formal work day comes to a close; the parents come to pick up the children. While the particular activities vary, the structure of the day is set and the children know what to expect and what is expected of them throughout the day.

Curriculum

Most of the providers use written lessons with the children under their care and employ diverse curriculums. Of all the providers who participated in the focus groups, for example, only two mentioned using an existing curriculum. The rest of the participants said they adopted and used lessons they prepared as a part of the licensure requirement for child care in Ramsey

County. One provider said, “I follow all the themes from the ‘Doors to Discover’ Curriculum. My children love it, and they follow through with me. It is friendly for different age groups and the curriculum leaves it up to the teacher to adjust the learning materials and styles to fit the needs of the children.” While the curricula differ, most providers share the same goals for what they want their children to know: sight words, write short sentences, and understand the meanings behind signs and symbols. The providers communicated an understanding that Hmong children learn best by seeing and doing; therefore, they used a variety of visualizations and learning by example to assist in their lesson plans. They were adamant that others know that their child care services are not limited to babysitting. One provider said, “A day care does more than babysit. There is a perception that day cares are only for babysitting. It is about the idea for learning.”

Discipline

We also examined how providers work with children in difficult situations as another indicator of providers’ level of engagement with children and to see ways of coping and maintaining accord. We found that most providers mentioned a variety of strategies usually employed in the classroom including: time-out, isolating the child from the play circle, letting the child go last during lunch or snack time, taking away the outdoor play privilege by having the child stay inside. Some of the providers said that providers should work closely with the naughty (or difficult) children. One provider said, “You should sit close to the one who is the naughtiest.” Another provider said, “Have the naughty one go last a few times and remind him/her why they are going last. Children learn quickly why they get to go last.” These conversations have shown that the participants have adopted new sets of parenting skills through their child care work to be responsive and effective.

In summary, we found that most Hmong child care providers tend to have lower education and only a handful of them have advanced degrees compared to other ethnic providers. Given their recent resettlement in Minnesota, Hmong are the least experienced in the business compared to the more established communities, such as Caucasians, African Americans, and American Indians. If provider education and experiences are used as the main criteria¹⁰ to determine child care quality, then certainly the result of this analysis shows that the existing Hmong child care networks are still in great need of significant improvement. However, when we examined the process indices we found that Hmong providers are committed to their work, wanted to make a positive difference in the lives of children, were actively engaged with their children in the learning process, and used a variety of age appropriate lessons and/or curricula to challenge their children.

Conditions of Hmong in St. Paul Public School System (SPPS)

Hmong Students in SPPS

St. Paul Public School (SPPS) is home to the largest Hmong student body in the state, with approximately 10,590 students enrolled each year. It is four times larger than the Hmong student body in the Minneapolis Public Schools, which ranks second in the state. SPPS housed 49 elementary schools, nine junior high and middle schools, and seven senior high schools, along with several alternative schools, learning centers, and other special sites and miscellaneous programs. SPPS also offer 28 different school locations across the city for four years old children who turn four by September 1st of every year. The student population as of October 2006 was

¹⁰ For more research on the relationship between teacher's and provider' level of education and classroom quality, please refer to the following articles: Arnett, 1989; McMullen & Alat, 2002; and Phillipsen et al., 1997.

40,543; 74 percent of the students are students of color, and about a half of the student body comes from homes where a language other than English is spoken (Table 5).

Table 5. Home Language Distribution by Grade Level (2006)

Home Language	Elementary Schools	Junior High/Middle Schools	Senior High Schools	Alternative Schools
English	57%	53%	53%	70%
Hmong	23%	30%	30%	15%
Spanish	11%	10%	8%	8%
Other Language	8%	7%	9%	7%
Second Language	43%	47%	47%	30%
Students of Color	83%	77%	74%	--

In the K-12 level, Hmong students make up about 30% of the student body. However, at the pre-kindergarten level Hmong students are one of the largest ethnic groups, consisting of 25 to 37 percent of the student body in 2005-2007 and make up 86% of the Asian student population (Tables 6 and 7).

Table 6. Enrollment Trends of Four-Year-Old Enrolled in the School Readiness and Community Kindergarten Programs by Race/Ethnicity

Race	2000 – 2001	2001 - 2002	2002 - 2003	2003 – 2004	2004 - 2005	2005 - 2006
American Indian	0%	1%	1%	2%	2%	2%
Asian (non-Hmong)	6%	8%	7%	6%	7%	8%
Hispanic	22%	21%	26%	22%	23%	24%
African American	15%	21%	23%	24%	20%	23%
Caucasian	11%	12%	15%	13%	12%	6%
Hmong	45%	37%	29%	33%	36%	37%
N	401	470	536	570	600	544

Source: Research, Evaluation and Assessment, SPPS, 2006-2007.

Note. This table does not include all 4 year olds across SPPS. Data for Community Kindergarten were not completed at the time of the analysis. See Table 7 for the completed Community Kindergarten data, which arrived prior to the publication of the report.

Table 7. Enrollment Trends of Four-Year-Old Enrolled in the Community Kindergarten Program by Race/Ethnicity

Race	2001 – 2002	2002 - 2003	2003 - 2004	2004 – 2005	2005 - 2006	2006 - 2007
Asian (non-Hmong)	38	45	46	62	108	65
	7%	7%	7%	6%	10%	6%
Hispanic	70	106	133	178	221	177
	12%	16%	19%	17%	20%	17%
African American	88	129	147	270	263	280
	15%	20%	21%	25%	23%	27%
Caucasian	231	198	198	290	264	228
	40%	30%	28%	27%	23%	22%
Hmong	167	175	172	242	251	252
	29%	27%	24%	23%	22%	25%
Total Served	581	659	705	1064	1131	1020

Note. The percentage may not add up to 100% due to rounding estimates. The chart does not include *all* 4 year olds across SPSS.

Source: Research, Evaluation and Assessment, SPPS, 2006-2007.

Currently, close to 80% of the four-year-old students enrolled in SPPS are students of color (Table 7). Eighty-five percent of the students in SPPS are considered poor because they qualify for free and reduced price meals. Eighty-six percent of Hmong students are qualified for free or reduced meals as compared to other Asian (76%) and Caucasian American students (66%).

Hmong Staff in SPPS

In SPPS, pre-kindergarten programs serve over 80 percent of students of color and over 50 percent students of color are of Hmong and Hispanic descents. We wanted to examine whether or not these children have sufficient adult role models who share a common background and language in the classroom. Staff composition data of SPPS¹¹ show only one Hmong licensed teacher retained across six years span, from 2003 to 2007, and to date there is no Hispanic

¹¹ Staff composition data were obtained from the directors of the pre-k programs from SPPS (2006).

licensed teacher. There are currently three African American licensed teachers and three teaching assistants on the payroll. There are more Hmong teaching assistants on the staff, but that number seems to be declining year after year (Table 8).

Table 8. Staff Composition of School Readiness and Community Kindergarten Programs, St. Paul Public Schools

Race	Staff	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007
Caucasian	Licensed Teacher	17	17	16	15	12
	Teaching Assistant	9	10	6	2	2
African American	Licensed Teacher	4	4	3	3	3
	Teaching Assistant	1	1	1	3	3
Hispanic	Licensed Teacher	1	0	0	0	0
	Teaching Assistant	3	2	1	0	0
Hmong	Licensed Teacher	1	1	1	1	1
	Teaching Assistant	8	7	9	7	6
Somali	Licensed Teacher	0	0	0	0	0
	Teaching Assistant	0	1	0	0	0
Other	Licensed Teacher	0	0	0	0	0
	Teaching Assistant	0	1	1	1	0

Source: Research, Evaluation and Assessment, SPPS, 2007.

We examined the staff composition in Project Early Kindergarten (PEK),¹² implemented in ten St. Paul schools in 2005. While most PEK classrooms have a Hmong ELL support staff, there's only one licensed teacher and one teaching assistant per school. The diversity profile of the program is as follows: one licensed Hmong teacher, one African American teaching assistant, one East Indian teaching assistant, and one Hispanic teaching assistant. The rest of the licensed teachers and teaching assistants are Caucasians and of other race and ethnicities. Similarly, the staff composition data from the Early Childhood Family Education (ECFE) program operated by SPPS also provides the same patterns of racial and ethnic composition of

¹² Project Early Kindergarten (PEK) was funded by the McKnight Foundation to close the achievement gap for low-income, English Language Learner, and Special Education students. The PEK began operating in 10 St. Paul schools in the fall of 2005.

the staff: Caucasians make up more than 70 percent of the people employed in the SPPS system (Table 9).

Table 9. Staff Composition of Early Childhood Family Education Program, 2006-2007

Race	Staff	Number	Percentage
Caucasian	Licensed Teacher	26	76%
	Support Staff ¹³	36	61%
African American	Licensed Teacher	4	12%
	Support Staff	9	15%
Hispanic	Licensed Teacher	2	6%
	Support Staff	6	10%
Asian	Licensed Teacher	1	3%
	Support Staff	7	12%
American Indian/Alaskan Native	Licensed Teacher	1	3%
	Support Staff	1	2%
Other	Licensed Teacher	0	0%
	Support Staff	0	0%

Source: St. Paul Public Schools, 2007.

Note. The Asian group comprised all Hmong staff, including the licensed teacher.

There is vast disparity between the student racial and ethnic profiles and that of the adults leading them in education. The shortage of racial and ethnic licensed teachers and teaching assistants is a dilemma for SPPS considering that over 80 percent of the student population is students of color and over 50 percent of them are English Language Learners. The school system is well aware of the disproportionate representation of teachers, in terms of racial and ethnicity diversity, within the different schools and programs.

Hmong Children's School Readiness

We examined Hmong children's school readiness by using data from Project Early Kindergarten. Data from PEK included 965 students from cohort 1 and cohort 2 (Table 10). As can be seen in Table 8, African American (n=306) is the largest group and Hmong is the second

¹³ Support staff includes educational assistant, teaching assistant and curriculum and educational specialists.

largest group (n=196) in the study. Specifically, sixty-four Hmong students who attended PEK, began kindergarten in fall 2006 (cohort 1); 67 were kindergarten classmates of cohort 1, without attending PEK; and 65 attended PEK in the fall of 2006 (cohort 2). Students in cohort 1 were tested twice in the fall 2005 and the fall 2006 while students in cohort 2 were tested once in the fall 2006 using the same measures. The gender of Hmong students were 57 percent females and 43 percent males. Seventy six percent of the Hmong students are eligible for free and reduced price meals and all of them are considered English Language Learners.

Table 10. PEK Sample Characteristics

Cohort	American Indian	Non-Hmong Asian	Hispanic	African American	African Immigrant	White	Hmong	Total
PreK 2006	13	13	52	109	19	57	65	328
K 2006 (PreK)*	8	9	54	70	11	54	64	270
K 2006 (No PreK)**	19	12	57	127	18	67	67	367
Total	40	34	163	306	48	178	196	966

Source: Research, Evaluation and Assessment, SPPS, 2007.

School Readiness: Vocabulary Skills

Vocabulary skills are important measures of children's future successes at the K-12 level. Studies show that ethnic minority children tend to follow behind white, middle class children in assessments of language. In this report, vocabulary skills were measured by using the Peabody Picture Vocabulary Test –III (Dunn & Dunn, 1997)¹⁴, and the test was administered in English to all children in the program. The results of the test show that on average ethnic minority children (i.e., Asian, Hispanic, African immigrant, and Hmong) scored significantly lower than Caucasian children (Table 11). Within the ethnic minority population, American Indian and African

¹⁴ The Peabody Picture Vocabulary Test is used to assess children's IQ and general cognitive abilities.

American students performed above the group average (mean = 87.6). Hmong students scored the lowest, followed by Hispanic and African immigrant students. Specifically, 82 percent of the Hmong students scored below the national average compared to only 17 percent Caucasian students. Only ½ percent of the Hmong students scored above the national average on the test compared to 29 percent Caucasian students. It is evident that Hmong students need to improve their vocabulary skills in performance assessments. While it is entirely possible that language is a factor in the results of the test, and because of the language of testing the results may not be a true and accurate assessment of Hmong children’s abilities, these scores however suggest that socialization and educational agents who work with Hmong children may need to pay closer attention to the challenge of vocabulary building.

Table 11. Peabody Picture Vocabulary Test Score¹⁵

Race	N	Mean	Standard Deviation	Minimum	Maximum
American Indian	40	96.4 ^a	12.7	63	130
Non-Hmong Asian	34	88.2 ^a	24.8	33	124
Hispanic	163	84.7 ^a	16.0	30	116
African American	306	90.8 ^a	12.8	23	123
African Immigrant	48	85.7 ^a	16.5	35	110
White	178	101.5 ^a	14.2	58	136
Hmong	196	71.2	18.3 ^a	34	128
Total	965	87.6	18.4	23	136

^a The mean difference from the Hmong group is significant at the .05 level.

Reading, Writing, and Mathematic Skills

Reading, writing, and mathematic skills were measured using the Woodcock-Johnson Tests of Achievement III (Woodcock, McGrew & Mather, 2001). The Woodcock-Johnson tests

¹⁵ The Peabody Picture Vocabulary test score is based on a standard score of a national normative sample with a mean of 100 and a standard deviation of 15.

consist of three subscales: Letter-Word Identification, Spelling, and Applied Problems. In order to compare Hmong with other racial/ethnic students in the program, we categorized students' scores into three groups: above average (a score of 111 or above), average (a score of 90 through 110), and below average (a score of 89 or lower).

Reading as Measured by Letter-Word Identification Test

Our analyses show that 61 percent of the Hmong students' scores were in the average category, 10 percent scored above average, and about 29 percent scored below average on the Letter-Word Identification test. As a group, Hmong students' mean score (mean = 96.0) is lower than the overall group average (mean = 98.2). However, their mean is somewhat higher than American Indian and Hispanic students (Table 12). Although Hmong students' mean score is lower than the overall group average, their scores are not significantly different from the scores of other language minority students (i.e., Hispanic and African immigrant). The only language minority group that has the largest proportion of above average score and the highest mean score (mean = 108.9) are non-Hmong Asian students. Despite similar family characteristics, this group is outperforming Hmong and other minority groups. More research is needed to formulate a substantive conclusion.

Table 12. Letter-Word Identification

Score Category	American Indian	Non-Hmong Asian	Hispanic	African American	African Immigrant	White	Hmong	Total
High (111+)	7.5%	47.1%	9.4%	15.1%	20.8%	23.7%	10.3%	15.9%
Average (90-110)	55.0%	38.2%	61.9%	57.2%	54.2%	61.0%	61.0%	58.6%
Low (below 89)	37.5%	14.7%	28.8%	27.6%	25.0%	15.3%	28.7%	25.6%
N	40	34	160	304	48	177	195	958
Mean	93.4	108.9 ^a	95.6	97.2	99.9	103.2 ^a	96.0	98.2

^a The mean difference from the Hmong group is significant at the .05 level.

Writing as Measured by the Spelling Test

Hmong students are doing better in spelling compared to the Letter-Word Identification Test (Table 13). Overall, Hmong students' mean score is the third highest among the groups tested. While more encouraging, the data also shows that most of the Hmong students' scores (66%) fell into the average category although only 19 percent of the Hmong students scored below average on the test. About 16 percent of the students scored above average compared to African American (15%), Hispanic (15%) and American Indian (18%). Asian students who are not Hmong scored the highest on the test, with a mean score of 107.9, compared to Caucasian students (mean = 102.5) while American Indian students scored the lowest on the test, followed by African American students.

Table 13. Spelling

Score Category	American Indian	Non-Hmong Asian	Hispanic	African American	African Immigrant	White	Hmong	Total
High (111+)	17.5%	44.1%	15.3%	15.1%	20.8%	28.7%	15.9%	19.2%
Average (90-110)	40.0%	50.0%	57.1%	54.3%	56.3%	55.1%	65.6%	56.5%
Low (below 89)	42.5%	5.9%	27.6%	30.6%	22.9%	16.3%	18.5%	24.2%
N	40	34	163	304	48	178	195	962
Mean	94.6	107.9 ^a	97.1	95.6 ^a	97.0	102.5 ^a	98.6	98.2

^a The mean difference from the Hmong group is significant at the .05 level.

Mathematics as Measured by the Applied Problem Test

Hmong students performed poorly on the Applied Problem Test (Table 14). More than half of the Hmong students (62%) scored below average (90 – 110). Only four percent of the students had a score that was above average (111+) compared to 16 percent Caucasian and six

percent Asian students. Across all student groups, Hmong students' mean score is the lowest (mean = 84.2). On average, Hmong students' scores are 16 points behind the Caucasian group and 10 points behind the Asian group. Although it is clear from this data set that mathematics is a weak subject for Hmong students and that this finding is consistent with other studies (Mueller et al., 1993), additional research is needed before making a definitive conclusion since this test requires some English language skills to perform.

Table 14. Applied Problem (Mathematics)

Score Category	American Indian	Non-Hmong Asian	Hispanic	African American	African Immigrant	White	Hmong	Total
High (111+)	7.7%	6.3%	3.1%	5.6%	4.2%	15.9%	3.8%	6.8%
Average (90-110)	53.8%	59.4%	51.9%	53.6%	41.7%	71.0%	34.1%	52.3%
Low (below 89)	38.5%	34.4%	45.1%	40.7%	54.2%	13.1%	62.2%	40.9%
N	39	32	162	302	48	176	185	944
Mean	94.4 ^a	93.8 ^a	89.8 ^a	91.7 ^a	88.4	100.3 ^a	84.2	91.5

^a The mean difference from the Hmong group is significant at the .05 level.

What Factors Help Hmong Children's School Readiness?

The focus group data across the nine groups found several themes regarding what helps and hinders Hmong children's school readiness. All analyses are based on procedures advocated by Richard Krueger and Mary Casey (2001).

Children's Social-Emotional Development

The most salient positive attribute of Hmong children that helps them learn is their high social-emotional development. According to the participants in the focus group discussions, Hmong children are obedient, eager to learn, responsible, and kind. They are more mature, cooperative, and have a higher level of self control when compared to other groups. They are able to share with other students without having to be reminded by the educator/provider, and

they are less likely to engage in problem behaviors that disrupt the class. One provider said, “They are self-sufficient and reliable. They are more independent. They can watch after themselves.” This finding is consistent with past research on Hmong children.¹⁶ We suspect that since Hmong children grow up in homes with bigger family sizes (i.e., 6.27 persons per household) than the majority of their American counterparts (i.e., 2.59 of U.S. households)¹⁷ most Hmong children have more immediate experience in building close relationships and kin networks than mainstream children. In negotiating familial relationships, they have more “testing ground” to understand and work collaboratively with others to develop strong emotional and social skills.

The result of strong social-emotional development may explain why so many Hmong children are not enrolled in the district’s special education program. Data listed in Table 15 show that Hmong pre-kindergarten children are the least likely to be enrolled in the special education program (mean = 10%) compared to African American (mean = 33%) and Caucasian (mean = 34%) students. Likewise, data from the PEK’s first cohort supports this finding. Specifically, the result of that data show that according to teacher’s ratings, Asian students, mostly Hmong, have the lowest rate of problem behaviors compared to other racial/ethnic students (Wilder Research Center, 2007).

Table 15. Trends of 4-Year-Old Early Childhood Special Education by Race

Race		2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007
Caucasian	Enrollment	105	92	118	97	129	107
	% Special Education	38%	37%	36%	30%	30%	30%

¹⁶ Mueller, D.P. (1996). Early School Performance of Hmong Children in Comparative Context.

¹⁷ Pfeifer, M. E. (2005). *The State of Hmong-American Studies Presentation*. Fresno, California: Hmong National Conference.

African American	Enrollment	95	80	103	117	134	116
	% Special Education	35%	32%	33%	36%	31%	33%
Hispanic	Enrollment	40	33	51	53	84	71
	% Special Education	15%	13%	16%	16%	20%	20%
Hmong	Enrollment	21	26	23	35	45	34
	% Special Education	8%	10%	7%	11%	11%	10%
Other Asian	Enrollment	5	12	8	13	21	12
	% Special Education	2%	5%	3%	4%	5%	3%

Source: Early Childhood Family Education, St. Paul Public Schools, 2007.

Valuing Children's Education

The high value Hmong families place on children's education has been documented in various studies and is a strong factor in the success of children's educational achievement (Detzner, Xiong, & Eliason, 1999; Xiong & Lee, 2005). Xiong and Lee (2005) interviewed over 300 parents and found that most respondents wanted "to spend more time with their children, teach them the 'basics,' so that they can recognize letters, colors, numbers, and carry out some self care tasks."¹⁸ The results of our focus groups also support these earlier studies. For example, all participants across different focus groups agree that most Hmong parents value their children's education. They play an active role in their children's school readiness. For example, participants from the educator and provider focus groups talked eloquently about how ready Hmong children were when they arrived at school or at the child care setting. They were "dressed in appropriate clothes, well fed, and come to class awake and ready to learn." According to the participants, there were few Hmong children who did not come to class ready,

¹⁸ Xiong, Z. B. & Jesse Kao Lee (2005). *Hmong Early childhood Education Needs Assessment Report*. St. Paul, Minnesota: Ready4K.

and most of these children tend to belong to the newly arrived refugees from Wat Tham Krabok, Thailand in 2004 (Hang et al., 2004).

Parent Education

Parent's level of education serves as one of the most robust predictors in children's learning and performing in school. We found that there are significant proportions of Asian, African American, and Caucasian parents who have attained at least a Bachelor Degree or higher compared to Hmong, Hispanic, and American Indian parents (Table 16). Studies show that children who come from families where parents have less than a high school diploma tend to perform more poorly compared to children who come from families where parents have a college education (Jenkins, 1997; Minnesota Department of Education, 2007).

Table 16. Levels of Education by Race/Ethnicity

Education	Parent	American Indian	Asian	Hispanic	African American	African Immigrant	White	Hmong
< 12 Grade	Male	32.3%	26.7%	33.8%	13.0%	12.2%	8.9%	34.0%
	Female	22.2%	27.6%	42.6%	15.3%	12.5%	9.0%	26.3%
H.S. Diploma	Male	38.7%	23.3%	32.4%	34.5%	53.7%	29.3%	29.5%
	Female	44.4%	31.0%	43.4%	45.4%	32.5%	39.3%	29.6%
College Degree	Male	29.0%	50.0%	33.8%	52.5%	34.1%	61.8%	36.5%
	Female	33.3%	41.4%	14.0%	39.3%	55.0%	51.7%	44.1%

Note. N = The sample size ranged between 718 for the fathers to 774 for the mothers; the percentages add up to 100% in accordance with gender.

There is a positive correlation between the level of parent education and children's test scores (Table 17). For example, in the Hmong group students who have a mother with a college degree scored 23 points more than students whose mother has less than a high school diploma. Similarly, the difference for Hmong father is 17.5 points between those who have a college educated father and those who have a father without a high school diploma.

Table 17. Relationships between Parent Education and Children's Peabody Vocabulary Test Scores by Race/Ethnicity

Education	Parent	American Indian	Asian	Hispanic	African American	African Immigrant	White	Hmong
< 12 Grade	M	95.4	87.6	80.3	87.4	80.6	93.1	58.8
	F	83.3	79.3	82.1	90.1	84.2	98.6	61.1
H.S. Diploma	M	95.8	65.9	87.8	90.8	84.7	102.2	77.4
	F	97.2	73.9	87.0	90.2	77.8	100.4	76.1
College Degree	M	98.8	99.2	88.3	93.4	91.1	104.2	81.9
	F	105.6	99.6	87.9	94.4	88.9	106.5	78.6

Note. N = The sample size ranged between 718 for the fathers to 774 for the mothers.

When we look at the test scores for the Woodcock-Johnson Tests of Achievement's Applied Problem Test, a test that the majority of Hmong students did poorly on, we observed a similar linear relationship between parent education and children's test scores, even though the gain is not as substantial as in the Peabody Vocabulary Test scores. For example, the difference between a college graduated mother and a mother without a high school diploma is 9 points, and a difference between a mother who does not have a high school diploma and a high school graduated mother is 5 points. The same result is found between father's level of education and children's performance (Table 18.) It is clear that the educational levels of parents have substantial impact on the test scores of children. We know that parental educational attainment is directly linked to employment and the socio-economic statuses of families, and thus more resources and exposure to learning.

Table 18. Relationships between Parent Education and Children's Applied Problem Test Scores by Race/Ethnicity

Education	Parent	American Indian	Asian	Hispanic	African American	African Immigrant	White	Hmong
< 12 Grade	M	93.7	91.5	86.8	92.4	79.4	98.4	78.4
	F	80.7	85.4	88.3	91.7	92.6	99.7	79.6
H.S. Diploma	M	95.2	87.0	91.4	89.6	89.6	102.1	86.5
	F	99.2	94.0	91.0	91.0	82.5	101.0	88.2
College Degree	M	96.8	98.1	91.8	94.5	90.2	101.3	90.3
	F	100.0	95.8	87.8	94.5	88.6	102.8	87.4

Note. N = The sample size ranged between 718 for the fathers to 774 for the mothers.

Pre-K Program and Children's Learning

Recent studies have shown that children who have access to quality pre-kindergarten programs are more likely to outperform those who are without such opportunities. To contribute to this accumulative knowledge in the field, we analyzed the two sub-populations in cohort 1 across ethnic and racial groups using PEK data. Cohort 1 includes children in both of the experimental group (children who have been enrolled in a pre-kindergarten program for one year in the fall of 2005) and the control group (children who did not enroll in the pre-kindergarten program in the fall 2005 due to the birthday cutoff rule). We found that on average a year spent in a pre-kindergarten program helped Hmong children gained 6.5 points in the vocabulary assessment (Table 19) and 5.2 points for math (Table 20). Although this gain is moderate compared to Caucasian (8.5 points for vocabularies; 6.1 for math) and Hispanic (7.6 points for vocabularies) students, it demonstrates that pre-kindergarten education does have a significant impact on children's learning and test ability. This is consistent with other studies on the effects of early childhood education on children's learning and development (Reynolds and colleagues).

Table 19. Means and Standard Deviations of Peabody Test Scores by Race and Cohort

Race/Ethnicity	Sample Size	PreK 2006 (n = 328)	K 2006 (PreK) (n = 270)	K 2006 (No PreK) (n = 367)	Gain
American Indian	49	98.5	91.8	97.0	-5.2
Asian	34	85.0	92.0	88.8	+3.3
Hispanic	163	83.7	89.1	81.5	+7.6
African American	306	87.4	95.2	91.2	+4.0
African Immigrant	48	81.5	92.7	85.7	+7.0
White	178	99.9	106.9	98.4	+8.5
Hmong	196	68.7	75.8	69.3	+6.5
Total	965	85.3	91.4	87.0	+4.2

Note. K 2006 (PreK) is the experimental group; K 2006 (No PreK) is the control group. Gains were calculated by subtracting scores of the K 2006 (PreK) from scores of the K 2006 (No PreK).

Table 20. Means and Standard Deviations of the Applied Problem by Race and Cohort

Race/Ethnicity	Sample Size	PreK 2006 (n = 328)	K 2006 (PreK) (n = 270)	K 2006 (No PreK) (n = 367)	Gain
American Indian	49	98.	88.4	94.2	-5.8
Asian	34	96.5	93.9	91.4	2.5
Hispanic	163	88.2	91.7	89.4	2.3
African American	306	91.1	94.1	90.9	3.2
African Immigrant	48	84.0	94.7	89.3	5.4
White	178	101.9	102.9	96.8	6.1
Hmong	196	82.5	87.6	82.4	5.2
Total	965	91.0	93.7	90.3	3.4

Note. K 2006 (PreK) is the experimental group; K 2006 (No PreK) is the control group. Gains were calculated by subtracting scores of the K 2006 (PreK) from scores of the K 2006 (No PreK).

What Factors Hinder Hmong Children's School Readiness?

Shyness

Our analysis of the focus group data and the face-to-face interview¹⁹ found that many participants believed one of the hindering factors in Hmong children's learning in a formal,

¹⁹ We conducted nine focus groups with parents (three groups), grandparents (one group), child care providers (two home-based), and three educators/teachers, and one individual interview with a provider who operated the Hmong center-based child care between May and June 2007.

English only setting is shyness (or *txaj muag*). For example, several participants in various groups stated that some Hmong children are too shy to participate in classroom activities.

Because they display shy behavior they are more reluctant to take the initiative and be proactive, or ask questions from teachers and providers when they do not understand. According to the focus group participants, including Hmong parents and grandparents, the cultural shyness of Hmong children make them more hesitant to try to communicate in English and take educational and creative risks. One grandparent said, “They are too shy; they don’t have the confidence when they are in school.” A provider said, “Shyness prevents us from understanding if the child understands the lesson or not. It’s hard to tell.”

The focus group participants speculate that a Hmong child’s projected and perceived shyness originates from the home. They believe that shyness is a practice in the Hmong home. This is consistent with what studies have found about most Asian cultures, including the Hmong; shame and face saving are important socialization strategies used to sanction and shape behaviors, especially that of children (Xiong et al., 2005). These socialization strategies may have contributed to children’s shyness, which in turns serve as a hindering factor in Hmong children’s willingness to take risks, participate in group activities, and assert their individualism; however, it is important to note that this same practice may also be the reason why Hmong children are more self-disciplined, sociable and compliant. Therefore, shyness might have been misinterpreted by the participants as a hindering factor. One Caucasian teacher who reviewed our finding disagreed with this observation. She wrote: “It is likely that in Hmong homes, little children are instructed to be observers, with lots of scaffolding, and usually instructed by older siblings...while this is a traditional school model of learning, this observational strategy used by Hmong may be superior in certain situations...I have seen Hmong children confidently move

around the classroom and involve themselves in reading, art, etc. Hmong children have often demonstrated remarkable skills in the classroom.”

The extent of the impact shyness has on children’s development in the Hmong community is still a mystery. Future studies need to establish this relationship between shyness and children’s school readiness in this community in order to assist teachers, providers, and parents to maximally engage Hmong children in the formal, English only setting.

Dual-language Deficiency

Dual-language deficiency is a term used in this report to describe a child who lacks age appropriate language usage in either English or Hmong. One of the most pervasive concerns in the focus groups was the dual-language deficiency of Hmong children. Various participants in most of the focus groups believed that many Hmong children do not have an adequate command of both the Hmong and English languages. One participant said, “They cannot ask for assistance in either language.” The children are more likely to have problems comprehending English texts or articulate their ideas fully in either language. They are disadvantaged and marginalized from home and school. One grandfather said, “Our grandchildren know only about five percent Hmong. They don’t get it. They get frustrated. They are lost in the two languages. We understand this.” One provider said, “Hmong children’s incomplete commands of the language cause them to lose direction. They have a specific need for supplemental education, care, and training so that they do not fall behind.”

While dual-language deficiency is a phenomenon common to all children of immigrants where parents still speak the native language predominantly in the home, evidence shows that most immigrants will shift their home language to English by the third generation. Alba (2004) found that by the third generation between 75-90 percent or more of third-generation Asians

spoke only English in the home. Although we do not doubt the future of the language shift in the Hmong community, we are concerned about the integral identity and academic issues embedded in the loss of a native language. We share the focus group participants' worry about the current status of Hmong children and the urgency of a well-formulated response. How and in what ways can we best work to help Hmong children achieve their full potential without neglecting one or both of the languages they will need to succeed in a diverse world?

Parenting: Lack of Parental Involvement

Consistently, the focus group participants, including the parent and grandparent groups, talked of a lack of parental involvement in the lives of children. There is real concern that Hmong parents "are too busy with work, and they do not have time for their young children." One Hmong teacher said, "For Hmong parents, most of the time other [cultural and social] activities take up their time instead of spending time with their children." Consequently, Hmong parents fail to engage in one-on-one interactions with their young children at home. More importantly, many parents fail to get involved in their children's school activities. One educator said, "It is hard to get Hmong parents to attend school events and parenting classes." One child care provider stated: "Hmong parents don't know a lot about their children, so they are unable to tell us how their children are like at home." According to the focus group participants, Hmong parents tend to depend too heavily on the supervision and the engagement of child care providers, grandparents, and teachers in formally educating their children. The danger is when parents shortchange their own efforts. In discussions of cause, some of the participants expressed that the existence of a language barrier may play a role in the lack of involvement; many stated that children's learning at home, especially pre-kindergarten children's, "ranks very low in parents' priority list." Some of the parents offered their own explanations, "We are dumb;

we can't help our children at all." Other parents said, "We are too busy with work and community involvement," and that the Hmong family system is going through a turbulent stage at the moment where marital conflict and financial hardships take away essential parental attention from young children's learning.

Conclusion

The results of this study present a challenging and complex light on the issue of Hmong children and school readiness. Our findings are consistent with previous studies at the same time that it challenges conclusive assumptions on Hmong children's ability.

We found that most Hmong children are growing up in disadvantaged families. They come from a community where nine out of ten families are without a college educated adult and only four out of one hundred families have one parent employed in high paying occupations when compared with other racial/ethnic groups. They are among the poorest citizens living in our community, and many of them are concentrated in poor neighborhoods without adequate resources to provide strong education basis for young children. As children of immigrants, most are growing up in families where parents are more likely to be linguistically isolated from English. These factors explain some of the reasons why Hmong children have lower test scores. Prior studies have shown how parental education correlates with lower test scores for children. The linguistic isolation of Hmong parents may have contributed to the low scores on the Peabody Picture Vocabulary Test and Applied Problem (or math) Test. Despite the thirty years of immigration history in America, many Hmong families are still struggling with the challenges of language and poverty and this impacts their children directly.

While the education and economic conditions of Hmong families explain some of the challenges in the school readiness of Hmong children, it does not explain the full complexity of

Hmong children's abilities. Contrary to previous studies and despite living in highly disadvantaged families and lacking early formalized care and education, Hmong children were able to perform at a similar level or higher level than other ethnic minority students on the Woodcock-Johnson tests for reading and spelling. Specifically, we found that Hmong children were performing better than Hispanic and American Indian students on the Letter-Word Identification test and better than all of the other ethnic student groups, except the non-Hmong Asian group, on the Spelling test. Their ability to contextualize relationships in the written elements would contradict the realities of growing up in linguistically isolated homes; however, it is possible that the linguistic challenges faced by their parents have influenced Hmong children's attention to and focus on words.

Hmong children were rated by teachers and providers as the most ready to learn across racial and demographic lines. Teachers and child care providers are impressed by how mature Hmong children are in the social-emotional characteristics necessary for learning. Studies have found that children who possess these characteristics tend to be more ready for school (Denham et al., 1990; Eisenberg et al., 1996) and perform better academically later (Wooster & Carson, 1982; Agostin & Bain, 1997). Conversely, studies also suggest that children who are lacking these skills tend to face more difficult peer relationships and school adjustment later (Buhs & Ladd, 2001; Warden & Mackinnon, 2003). Teachers observed that most Hmong children come to school wanting to learn and that their parents value education and the tenets of transferring knowledge from one generation to the other as essential to the process of maturity.

While there are very real factors that help and hinder Hmong children's school readiness, there are some crucial statistics that must be critically examined beyond Hmong children and Hmong adults; the educational system itself. We found that all the Hmong children in the St.

Paul Public school programs come to the school settings automatically considered as English Language Learners (i.e., 100% ELL). While our focus group participants all communicate concern about a dual language deficiency, the school system only takes into account one: English. Bleakley and Chin (2004) found that children whose parents are with limited English are more likely to fall behind the same age group peers and are more likely to repeat a grade. They found that children's English ability is directly affected by their parents' English-language skills. For example, "for 5-year olds, for each unit increase in parental English-speaking ability, child's English-speaking ability increases by 0.519 units" (p. 14). However, Bleakley and Chin also concluded that despite parental English-language skills, "children will learn some English by age 7, learn to speak it well by age 8, and learn to speak it very well by age 13" (p. 14). If children from non-English speaking families are exposed to high quality education programs for several years, long enough for the child to be fluent in English, their chances of succeeding in multiple languages will increase. The linguistic scope must necessarily widen. Additionally, the lack of reflectivity in the staff composition in the St. Paul public schools and their student body is problematic. Children will do better when there are strong role models around them who reflect their linguistic and experiential backgrounds. Without sufficient representation of Hmong teachers, figures of authority and success, in the classroom, Hmong students lack crucial confidence and cultural guides within the educational context. These challenges are systemic but their examination is crucial to the issue of Hmong children's success in schools.

Recommendations

This is an exploratory study that investigates the economic and educational contexts of Hmong children's lives and attempts to learn from adults who care for young Hmong children. Our goal was to determine factors and characteristics that help or hinder Hmong children's

development and successful transition into formal education. Based on our findings, we propose the following recommendations:

1. Hmong children's performance will not be improved if their home conditions continue to be disadvantaged. Although solving the issue of poverty and literacy is beyond this report, we suggest that policy makers re-examine the ways in which we work with disadvantaged communities and find ways to ensure all children have access to early quality care and education (for more information on theoretical and program models, see CEED Early Report, 2007). It is disheartening to find that only 17 percent of Asian, mostly non-Hmong Asian, students have had formal early care and education prior to their entrance into the PEK. Most Hmong children have never been exposed to living/learning contexts outside of their homes consistently prior to pre-kindergarten. It is problematic to expect children to do well when they must begin in the process of catch-up. Hmong children enter school needing to not only gain a hold over language and literacy, numbers and problem solving techniques, but new cultural and social expectations of ability and expectations.
2. Children who have an advantageous edge in this report tend to come from families where parents have a high school diploma or higher compared to those whose parents have less than a high school diploma. We suggest that policy makers evaluate current policies that provide adult educational opportunities (and/or incentives) for parents (and adults who care for children) to continue their education. For example, our report found that on average a Hmong child who's parent has a high school diploma outperformed a child who is coming from a family where neither of his or her parents has a high school diploma by about 8 points. Research shows that better educated parents are more likely to be knowledgeable about their children's homework, provide children access to reading materials, and connect

their children to reading materials and other resources (Caplan, Choy, & Whitemore, 1992; Caplan, Whitemore, & Choy, 1989). Policies that focus on the expansion of adult education and perhaps reducing dropout rates in high school could help close the achievement gap and strengthen school readiness for children living in disadvantaged home.

3. Exposure to a variety of pre-kindergarten opportunities prior to kindergarten plays a significant role in children's school readiness. We found that Hmong children in the PEK program are the least likely to have any exposure to pre-kindergarten experiences before enrolling in the PEK program. As a result, Hmong children tend to perform poorer compared to the other Asian and Caucasian children. Although the explanation for why Hmong children perform poorer in certain subjects is still a mystery, we believe that exposing Hmong children to a rich literacy environment (i.e., providing access for participation in quality pre-kindergarten programs) will be beneficial to their school readiness since many Hmong children come from a home environment that is rich in oral stories but lacking in text literacy (Downing, Hendricks, Mason, & Olney, 1984).
4. Hmong formal child care settings play a significant role in developing Hmong children despite the fact that relatively few Hmong children enroll in them. Although we have found that most providers want to make a positive difference in the lives of children and give much of what they have in their toolkits, most providers need more access to effective curricula and age-appropriate materials to prepare children adequately for the learning standards of successful kindergarten. In addition, the care providers are often isolated and disconnected from one another. Few of them have access to ongoing mentorship and consulting services on the newest possibilities in child care. We suggest that providers, particularly those who operate within their homes, participate in continuing education opportunities to gain exposure

to a variety of curricula and teaching pedagogies in a systematic way. Specifically, opportunities that can go beyond licensing and the renewal of licensure system, programs that can sustain relationships year-round on a need basis such as those offered by Child Care Resource and Referral and Resources for Child Caring. Evidence has shown that providing more training for staff (and increasing salary) makes a difference in children's developmental outcomes (Helburn, 1995; Whitebook, Phillips, & Howes, 1992).

5. Parental involvement must be a top priority for Hmong parents. According to the National Scientific Council on the Developing Child, a collaboration of the nation's premier scholars and practitioners of child psychology and development, the biggest factor in the successful development of a child's brain and determination of success in school and peer settings is a young child's relationships to the people around him or her.²⁰ Many studies have concluded that children who have healthy, loving relationships with their parents are more likely to develop insights into other people's feelings, needs, and thoughts.²¹ Our focus groups show that Hmong parents are too busy working at jobs and within the community, often leaving young children in the care of grandparents. Since many grandparents have many children under their care and may not be able to drive, young children do not have access to new environments and gain exposure to a variety of learning opportunities. We suggest that the burden of responsibility must be re-appropriated to parents and alleviated from grandparents and the elderly. Parents must ensure that children can learn by allocating more time and more consciousness to the job of raising strong learners.

²⁰ National Scientific Council on the Developing Child. (in press). *Young Children Develop in an Environment of Relationships*.

²¹ Ibid.

6. The dual-language deficiency concern must be researched, evaluated, and resolved before it affects too many children. Although there are no studies on the long-term effect of the dual-language deficiency in the Hmong community, we know from other communities that children who have developed strong commands of two languages tend to perform better as they progress educationally. For example, we know that children who are versed in more than one language have distinct advantages over monolinguals across various task domains because the need to encode, interpret and associate words from two languages with a common concept of the world demands more advanced representation and attention.²² Given what is known in the bilingual literature, we believe that Hmong children must be exposed to a strong foundation of the Hmong language at home, both written and spoken preferably. Parents can build this foundation by spending more time talking with their children, expanding their vocabularies by involving stories and books, and minimizing non-children focused television time. Schools can help to strengthen children's bilingualism by providing bilingual programs, after-school enrichment opportunities, and summer language-focused programs for children to participate. It is imperative to be intentional with Hmong and other English Language Learner students since studies have shown that children who are fluent in their first language tend to do much better compare to those who are not.
7. Our focus group results show that Hmong children are making strong progress in the social-emotional domain and approach to learning. For example, we found that Hmong children are eager to learn, cooperative, and come to school ready to learn. They are more likely to follow directions and less likely to engage in problem behaviors. Although most studies support the relationship between social-emotional and academic performance, there is a possibility for

²² Bialystok, E. & Michelle M. Martin (2004). "Attention and inhibition in bilingual children: evidence from the dimensional change card sort task." *Developmental Science* 7:3, pp 325-339.

oversight on performance because of good behavior (Caplan, Choy, & Whitemore, 1992; Caplan, Whitemore, & Choy, 1989; Lee, 1996). We caution all teachers and providers to actively recognize that despite their high level of cooperation and compliance, Hmong children also need the attention, the challenge, and at times the special assistance other children receive. We suggest that teachers and providers who work with Hmong children be vigilant and aware of the culturally transferable skills between home and school, such things as task completion and a thorough clean up.

8. Children who are not fluent in English need to have a cushion to fall back on when facing new challenges. We believe that having more licensed Hmong teachers who know the culture of Hmong children and who can speak the Hmong language will be beneficial to children's adjustment and learning. Studies have shown that teacher's ability to engage with students play an important role in affecting children's learning (Sanders & Rivers, 1996); we believe that hiring more quality Hmong licensed pre-kindergarten teachers (and other teachers of color) will impact children's learning powerfully, particularly during this early stage of the child's learning process. More visible licensed Hmong teachers in the classroom can also increase parental involvement, which in turn benefits children's learning and self esteem.

Keeping these recommendations as policies that will impact Hmong children will help address some of the issues prevalent in the learning experiences of Hmong children and families in St. Paul, Minnesota.

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