

**Family Literacy Project:
Evaluation Report
January 2013**

Department of Data Management, Planning, and Program Evaluation
Dr. Robert J. Rodosky, Executive Director

Family Literacy Project: Executive Summary

Program Description/Goals:

The Family Literacy Project is a partnership between Jefferson County Public Schools and the National Center for Family Literacy to support literacy skills in students and families. The Family Literacy Project (FLP) serves between 150 and 200 children each year, and is housed at 1 of 3 different locations (Americana, McFerran Elementary, and LEAF-Buechel). The program serves a unique population with 76% Hispanic/Latino and 18% Black/African-American, most of whom are immigrants learning to speak English. The current report examines the outcomes of students who have participated in the Family Literacy Project in 2010, 2011, and/or 2012. The multi-faceted approach consists of the following four components: children's education, parent education, parent and child together time, and adult education.

Parent Participation

- Given the population served is typically a hard-to-reach population, the participation level from families is high. By the end of the program, participants have an average of almost 30 hours of parent/child together time (PACT), over 30 hours of parent education, and over 200 hours of adult education.

Student Outcomes

- Attendance: There was a significant difference in attendance between treatment and comparison group, $t(262) = 2.89, p < .05$ for younger students. Participants missed fewer days than non-participants.
- Behavior: No significant differences were found in behavior between the treatment group and comparison group. Overall this group of students exhibited very few behavior problems.
- Kindergarten: No significant differences were found on the Brigance. Overall, very few students were deemed "ready" for kindergarten. About 8% of the comparison group and 7% of the treatment group scored at the "ready" for kindergarten level.
- Achievement for 3rd grade through 8th grade: Treatment students showed slightly higher performance in Reading, $t(68) = 1.12, p < .10$ (marginal significance), but no difference in Math.

Summary and Recommendations:

- Overall, the participants of the Family Literacy project showed some benefits from the program in terms of early school attendance and later academic achievement.
- Though the Brigance data did not show increased kindergarten readiness, the Brigance is meant as a screener and may not be a sensitive enough measure for students who are learning English.
- ESL is JCPS' fastest growing population. It is recommended that the program continues, and in the future because of the program's focus on younger students, participants in the Family Literacy Project benchmark student skills at the younger ages to ensure increased preparedness for kindergarten. Given this was the first year of the Brigance test, this year's data could serve as a baseline for monitoring and guiding continuous improvement and should be used in combination with other measures of student success (e.g., teacher reports, parent reports).

Department of Data Management, Planning, and Program Evaluation
Dr. Robert J. Rodosky, Executive Director

Background on Family Literacy Project

The Family Literacy Project is a partnership between Jefferson County Public Schools and the National Center for Family Literacy to support literacy skills in students and families. The project is comprised of a four-component approach to improving literacy in young students. The multi-faceted approach consists of the following four components:

- 1) Children's Education- encompasses opportunities for literacy development and learning are provided for young children,
- 2) Parent Education Sessions- instruction to parents about their children's literacy development,
- 3) Parent and Child Together (PACT) - regularly scheduled time for parents and children to participate in interactive literacy experiences in a supportive environment, and
- 4) Adult Education- further parents' educational skills through GED work, skill building, and/or English as a Second Language classes.

Each component is a research-based strategy in supporting student skills. First, high quality early childhood education has shown to impact students in multiple domains. Landmark studies such as the Perry Preschool High/Scope Study and the Carolina Abecedarian Study and have powerfully demonstrated the long term beneficial effects of early childhood programs on the cognitive, social and emotional development of children from at-risk backgrounds (Campbell & Ramey, 1994; Schweinhart & Weikart, 1998). Together these factors have motivated policymakers to make early childhood initiatives a priority, especially for children who may be at risk for later school failure.

Second, parent involvement in their children's education is a key predictor of student's academic and behavioral outcomes. Studies have repeatedly shown the robust connection between parent-child shared reading interactions, parent involvement in providing early literacy materials and experiences, and children's literacy and language skills (Sénéchal, 2006; Sénéchal & LeFevre, 2002).

Lastly, parent educational attainment has shown to be a strong predictive factor in their child outcomes (Davis-Kean, 2005; Dearing, McCartney, & Taylor, 2002; Nagin & Tremblay, 2001). The impact of parent education is long-lasting. Dubow, Boxer, and Huesmann (2009) found that parental education at age 8 was predictive of the child's educational and occupational success 40 years later.

Program Structure

The Family Literacy Project (FLP) serves between 150 and 200 children each year, and is housed at 1 of 3 different locations (Americana, McFerran Elementary, and LEAF-Buechel). The current report examines the outcomes of students who have participated in the Family Literacy Project in 2010, 2011, and/or 2012. The data files from the program coordinator showed a total of 358 students. Out of the 358 students, a total of 245 (68%) were JCPS students in the 2012-2013 school year. The demographics of the 245 students are shown below. Most of the students (83%) were enrolled in preK through 5th grade in 2012-2013. Students were dispersed among 63 JCPS school, with the highest representations at Klondike (36), Slaughter (32), Rangeland (24), McFerran (13), and TJ Middle (12). These 5 schools comprised 47% of the FLP participants with data. Parent participation hours are also included in the charts below.

Race/Ethnicity	Count	Percentage
Asian	2	0.82%
Black/African-American	44	17.96%
Hispanic/Latino	185	75.51%
White/Caucasian	12	4.90%
2 or More Races	2	0.82%
Grand Total	245	100.00%

Gender	Count	Percentage
F	107	43.67%
M	138	56.33%
Grand Total	245	100.00%

At-Risk	Count	Percentage
Free/Reduced Lunch	239	97.55%
Paid Lunch	6	2.45%
Grand Total	245	100.00%

LEP	Count	Percentage
Not LEP	146	59.59%
LEP	99	40.41%
Grand Total	245	100.00%

Grade in 12-13	Count	Percentage
Preschool	35	14.29%
Kindergarten	31	12.65%
1	39	15.92%
2	32	13.06%
3	25	10.20%
4	27	11.02%
5	15	6.12%
6	17	6.94%
7	10	4.08%
8	8	3.27%
10	3	1.22%
11	2	0.82%
12	1	0.41%

Location	Count	Percentage
Hazelwood	41	16.73%
Leaf AM	79	32.24%
Leaf PM	100	40.82%
McFerran	25	10.20%
Grand Total	245	100.00%

Parent Participation	PACT-Total Hours	Parent Ed-Total Hours	Adult Ed/Child Ed-Total Hours
Americana	19	22	181
McFerran	37	38	228
Leaf	27	38	232

Evaluation Design

The report is utilizing a quasi-experimental approach looking at the relationship between time in the intervention and outcomes in the older grades, and a comparison group in the primary grades. Students were matched on gender, race/ethnicity, school, and lunch status. Student outcomes were examined from a multi-faceted approach including attendance, behavior, achievement, and grades. Because of the large range of ages and the type of data available, Kindergarten through 2nd grade was examined separately from 3rd grade and up. The primary evaluation questions were:

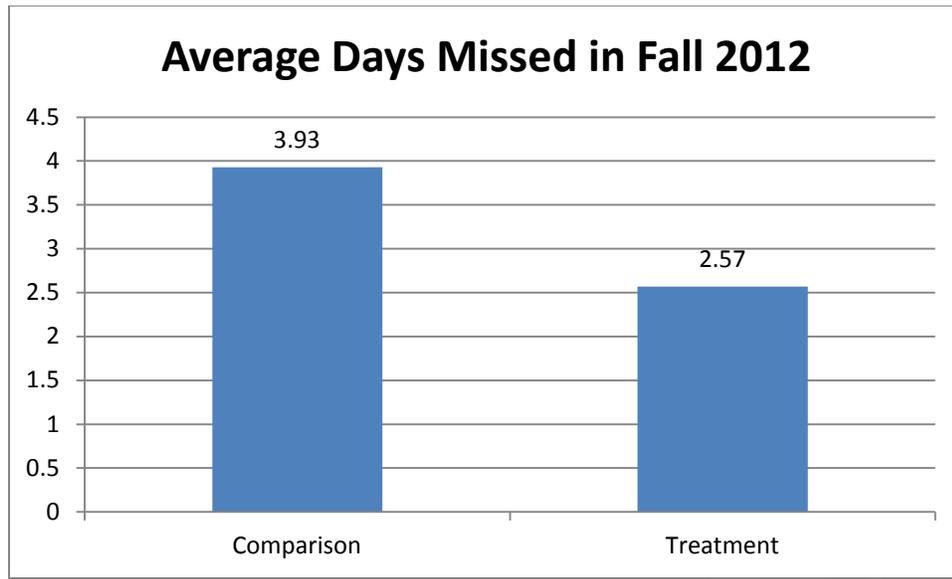
- 1) Did students who participated in the intervention differ from a matched comparison group of students in terms of attendance or behavior referrals?
- 2) Did students who participated in the intervention differ from a matched comparison group of students in terms of academic outcomes (e.g., achievement level, grades)?

Behavior data was extracted through Infinite Campus. Referrals are entered by schools into Infinite Campus and include events such as in- and out-of-school suspension, bus disturbances, and bullying. Attendance data was examined by looking at days absent in the first semester following the program (August-December 2012 data). For academic outcomes, the Brigance readiness screener was analyzed for the kindergarten level, CASCADE data for 1st and 2nd grade, K-PREP data for 3rd grade through 8th grade. First semester grades were also examined for students who were in 6th grade and up. Not enough high school students participated to be analyzed.

Outcomes: PreK- through 2nd Grade Students (n = 137)

- Attendance: Significant difference were found in attendance between treatment and comparison group, $t(262) = 2.89$, $p < .01$ See Figure 1. Participants were less likely to be absent than the comparison group.
- Behavior: No significant differences were found in behavior between the treatment group and comparison group.
- Kindergarten Readiness: No significant differences were found on the Brigance. Overall, very few students were deemed “ready” for kindergarten. About 8% of the comparison group and 7% of the treatment group scored at the “ready” for kindergarten level.
- Achievement: Using CASCADE data in 1st and 2nd grade, no significant differences were found in Reading and Math proficiency assessments between the treatment and comparison group.

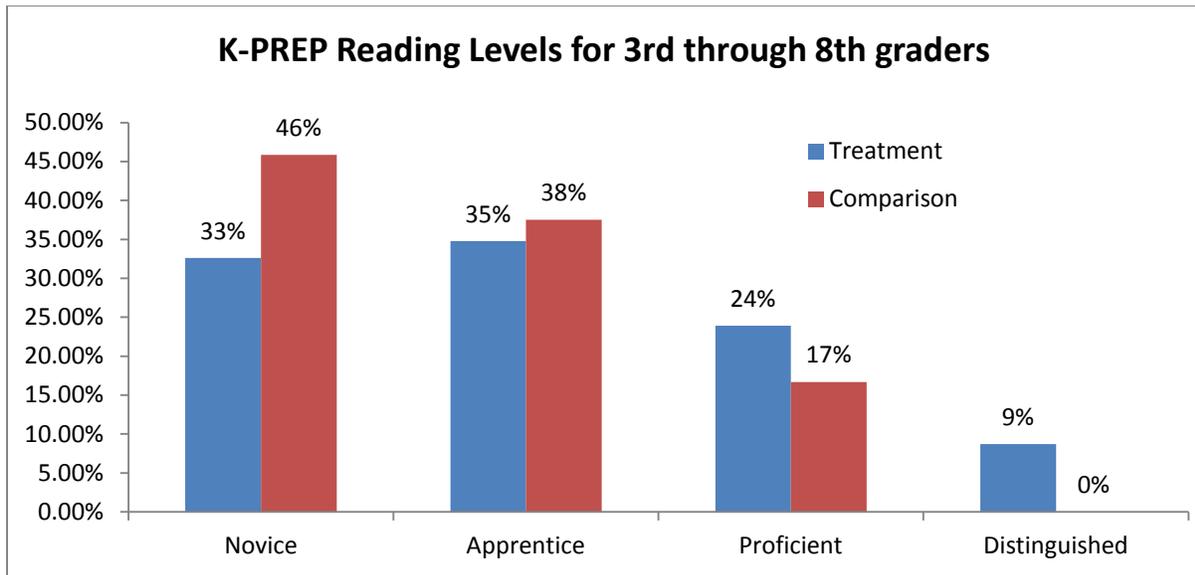
Figure 1. Absences by Group



Outcomes: 3rd through 8th Students (n = 101)

- Attendance: No significant differences were found in attendance between the treatment group and comparison group.
- Behavior: No significant differences in behavior between the treatment group and comparison group.
- Achievement: Treatment students showed slightly higher performance in Reading, $t(68) = 1.12$, $p < .10$ (marginal significance), but no difference in Math. See Figure 2 below for K-PREP reading data.
- Grades: No significant differences in grades. Both treatment and comparison groups maintained a GPA of over 3.0.

Figure 2. K-Prep Reading Levels by Group



Summary and Recommendations

- The purpose of this brief was to examine student outcomes from participants of the Family Literacy Project (FLP). Though the project is working with parent education and parent-child interactions, outcomes were focused only on students for this brief.
- Overall, the program served a wide variation of ages and in particular, a significant Hispanic/Latino population with over 75% of student participants from that one ethnicity, making this program unique from many other JCPS programs.
- Outcomes were examined in terms of achievement, attendance, behavior, and grades if available. Because of the wide variability of ages, younger students (K-2) were examined separately from older students.
- For younger students, the participants missed significantly fewer days of school than a comparison group. No significant differences were found in other areas (behavior, achievement). However, this particular group exhibited very few behavior issues.
- The Brigance data suggests that FLP participants were no different than non-participants in their kindergarten readiness level.
- For older students, FLP students who participated at a high level showed better academic achievement in terms of K-PREP scores in Reading than the comparison group. No differences were found in behavior, attendance, or grades in the older group of students.
- Overall, the participants of the Family Literacy project show some benefits from the program in terms of early school attendance and later academic achievement.
- It is recommended that the program continues, and in the future because of the program's focus on younger students, participants in the Family Literacy Project benchmark student skills at the younger ages to ensure increased preparedness for kindergarten. Given this was the first year of the Brigance test, this year's data could serve as a baseline for monitoring and guiding continuous improvement and should be used in combination with other measures of student success (e.g., teacher reports, parent reports).

References

- Campbell, F. A. & Ramey, C. T. (1994). Effects of early intervention on intellectual and academic achievement: A follow-up study of children from low-income families. *Child Development, 65*, 684-698.
- Davis-Kean, P. E. (2005). The influence of parent education and family income on child achievement: The indirect role of parental expectations and the home environment.
- Dearing E, McCartney K, Taylor BA. Change in family income matters more for children with less. *Child Development. 2001;72:1779–1793.*
- Nagin DS, Tremblay RE. Parental and early childhood predictors of persistent physical aggression in boys from kindergarten to High School. *Archives of General Psychiatry. 2001;58: 389–394.*
- Schweinhart, L. J. & Weikart, D. P. (1998). High/Scope Perry Preschool Project at age twenty-seven. In J. Crane (Ed.), *Social programs that work* (pp. 148-162). New York: Russell Sage Foundation.
- Sénéchal, M. (2006). Testing the home literacy model: Parent involvement in Kindergarten is differentially related to grade 4 reading comprehension, fluency, spelling, and reading for pleasure. *Scientific Studies of Reading, 10* (1), 59-87
- Sénéchal, M., & LeFevre, J. (2002). Parental Involvement in the Development of Children's Reading Skill: A Five-Year Longitudinal Study. *Child Development, 73*(2), 445.
- Chow, B.W. & McBride-Chang, C. (2003). Promoting language and literacy development through parent-child reading in Hong Kong preschoolers. *Early Education and Development, 14* (2), 233-248.