

## **Forming Early Learning Habits: Newark ParentChild+ Families and Their Toddlers Redefine Their Homes as Learning Environments**

**By**

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## TABLE OF CONTENTS

Acknowledgements	v
Foreword	vi

### CHAPTERS

I.	Context and emerging themes	2
II.	Unpacking home visits	13
III.	Building blocks of Newark ParentChild+	23
	References	31

### APPENDICES

Appendix I: Methods	32
Appendix II: New Jersey Early Learning Standards	33

## INDEX OF TABLES

Table I: Snapshot of team _____	5
Table II: Mapping Indicators _____	24
Table II: Interview sample _____	32

## INDEX OF GRAPHS

Graph I: Families – Race/ethnicity and languages spoken _____	5
Graph II: Families by ward _____	6
Graph III: Family income _____	6
Graph IV: Age of children in program _____	7
Graph V: Source of referral _____	7
Graph VI: Changes in Child Behavior Traits assessment _____	8
Graph VII: Changes in CBT for sub-groups _____	9
Graph VII: Changes in Parent and Child Together assessment _____	9
Graph IX: Changes in PACT for sub-groups _____	10

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Pritha Gopalan  
Senior Research and Evaluation Officer  
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August 1, 2019

## Foreword

Can we make the invisible visible?

On behalf of the staff and Board of Directors of the Newark Trust for Education, I am proud to share our work with eighty-seven toddlers and their families as captured in this paper, *Forming Early Learning Habits: Newark ParentChild+ Families and Their Toddlers Redefine Their Homes as Learning Environments* by our Senior Research and Evaluation Officer, Pritha Gopalan. The Trust began this work in the summer of 2018 as part of our mission to partner with schools, communities, and parents to promote and establish favorable conditions for learning. We believe that our young people are continually learning. They learn in each of the environments in which they exist: their homes, their communities, and their schools. Often times, however, the vision and expectations for learning are not clear or consistent across multiple environments. Consequently, our young people have to answer to different expectations, juggle different rules and regulations.

What would it look like to align conditions for learning across multiple environments?

The work of the Trust-ParentChild+ collaboration focuses on engaging toddlers in reading and play activities in their homes. Through twice-weekly, thirty-minute visits, our Early Learning Specialists collaborate with the primary caregiver to introduce books and toys into the home. A critical feature of the program is that the families can keep these books and toys. What has been interesting to watch is how the home environment begins to change; how caregivers, while integrating the new elements provided by the program, build on and name elements already present in the home as essential to learning. They notice how toddlers start to use a storage bin that is provided with the program to organize their books and toys. They see the child becoming more independent: putting materials away, searching for a toy, engaging adults in previously learned play activities, or asking siblings to read to her. Through these early observations, the Trust has become interested in exploring the idea of what we believe to be a continuum of understanding that is growing apparent across the homes in which we work. A continuum we believe can be applied not only to the home but to the other environments our young people experience.

This first point on the continuum begins with what we are labeling an *awareness of learning*. It is an awareness that children are continually learning and that they can learn from everything around them. In essence, every item in the home and activity is a learning opportunity: a walk to the store or time spent in a supermarket provides ample material and countless opportunities to engage the child in learning activities. That learning is not separate from day-to-day living, not different from play.

We are calling the next point on the continuum an *emphasis on learning*. It is an environment in which caregivers understand that learning is about making visible the invisible. What color is that car? Is it the same color as that other car? Is it bigger or smaller than the green car? Do you think you could run as fast as that car? Color, size, comparison, pace of movement - all building blocks of knowledge that help children make sense of their world - are present and available for exploration at all times.

Finally, we are naming the endpoint on the continuum a *culture of learning*. In this environment children, parents, and other family members observe, question, search for answers, present to each other what they see and think, and invite each other to critique their thoughts, no matter the age of the family member.

Can we agree that it is our shared responsibility as adults in the community to create alignment across the multiple environments?

The Trust sees examples of families at each of these points on the continuum. We are intrigued by understanding how families move through the continuum. Can WE make the invisible visible? Can we help the families with which we work intentionally move through these phases? Can we accelerate the process? Furthermore, we know that community organizations, civic organizations, and schools are key actors in this process. Can our community come to a common understanding that learning occurs in every environment in which children participate? Can we work toward a shared culture of learning that is known, promoted, and, consequently, accessible to all of our young people?

We hope that you enjoy and learn from this paper, and encourage you to reach out to us with your responses to these ideas.

Ronald Chalusán Batlle  
Executive Director  
Newark Trust for Education

August 1, 2019

*“Every week brings something new. A new adventure. A new experience.”*

- Grandmother

*“We call it school. She’ll put on her book bag, sit in the living room, and wait for the book or toy to come out. When it’s a book, she lets the teacher read it first. Then she takes it and lays on her stomach and reads the book. Then she brings it to us, and we read it together.”*

- Mother

*“The books are bilingual. I can easily give them to my mom and she can read them to the baby. Spanish-influenced activities that help us teach in both languages.”*

- Mother

*“The fact that he can learn things here (at home) that he would learn at school is what makes it meaningful.”*

- Mother

## I. Context and Emerging Themes

ParentChild+<sup>1</sup> is a parenting and early learning program for parents, caregivers and their toddlers developed by Dr. Phyllis Levenstein, a clinical psychologist, in 1979. The program has four objectives:

1. Increase school readiness and school success
2. Support reading and play activities in the home
3. Build language, literacy, and learning-rich home environments
4. Support the development of social-emotional skills so children enter school ready to be successful students.

ParentChild+ is a home visiting program for toddlers and parents, where a trained representative visits the family twice a week for a half hour each time, introduces an educational book or toy termed a Verbal Interaction Stimulus Material (VISM) each week, and uses the VISM to model positive interaction, teaching techniques, and creative play. ParentChild+ is implemented in two cycles of 23 weeks, and most families receive over 90 half hour educational home visits by the same home visitor over the course of a year. Two unique features of the program are that each book is paired with a toy so that the toddler learns a theme (e.g., dinosaurs) for a fortnight, and that the books and toys remain with the family in their home. The home visitor shares a VISM guide for each book and toy with the parent or caregiver that helps them mine the educational content of each through creative and interactive activities. The program provides a storage bin to organize the collection of books and toys that the family builds over 46 weeks. ParentChild+ has strict documentation requirements. The home visitor must complete a record for every visit; conduct pre- and post- tests of children's learning and behavior – the Child's Behavior Traits (CBT) assessment, and parent-child interaction – the Parent and Child Together (PACT) assessment during each cycle; and collect other family data over the course of the program. ParentChild+ has been implemented in 15 states within the United States and internationally.<sup>2</sup>

### Review of research on ParentChild+

Internal and third- party researchers have assessed the effectiveness of ParentChild+ in advancing early learning, especially receptive and expressive language, over the last three decades. A review of five quantitative studies conducted since 2000 indicates that ParentChild+ shows promise in closing learning gaps between students from higher and lower economic backgrounds. Three of the five studies, however, are with small non-random samples or samples that experienced significant attrition over the course of study. Comparisons in these three studies were not matched. Specifically:

1. A study published by the founder of ParentChild+ and her team in 2002, shows that 84 ParentChild+ graduates enrolled in first grade in South Carolina public schools outperformed students from similar socio-economic backgrounds who were not in the program by almost 10 points on the state-administered Cognitive Skills Assessment Battery (Levenstein et al., 2007).
2. A study by a New York University team in 2007 compared 78 ParentChild+ graduates from lower socio-economic backgrounds with 57 of their peers from higher socio-economic backgrounds. The study, set in Long Island, NY, showed no gap in socio-emotional competence and readings skills between the two groups. The measures used were drawn from established instruments such as the Peabody Picture

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<sup>1</sup> Formerly known as Parent Child Home Program.

<sup>2</sup> See [parentchildplus.org](http://parentchildplus.org) for more information on the history and reach of ParentChild+.

Vocabulary Test. Though ParentChild+ graduates fared less well on standardized tests compared to their comparison group, they scored appropriately for their grade level. (Allen, Sethi & Astuto, 2007).

3. An experimental study conducted by Astuto and Allen (n.d.) with two randomized cohorts of children in Long Island, NY, showed that the combined sample of over 500 children improved significantly on auditory learning scores measured by the Pre-school Language Scale – 4 (PLS-4), as compared to the matched control group. There were no significant differences in socio-emotional competence, as measured by questionnaires administered to parents.
4. A version of ParentChild+ called HABLA experimented with a two-year version of the program in a Spanish-speaking community in Southern California. Children were tested at baseline, at the end of the first year, and at the end of the second year. Attrition was high, with the sample of over 500 children falling to 183 at the end of year 2. The study found moderate treatment effects between baseline and the first year, and between the first year and the second year on the PLS-3 and PLS-4 (Mann, 2014). This study did not include comparisons – the group was compared to itself over two years.
5. A recent study in Washington state used a quasi-experimental design to assess whether 214 ParentChild+ grads, who were each matched with 3 comparisons, outperformed them on the WA Kindergarten Inventory of Developing Skills (WAKIDS) and Washington English Language Proficiency Assessment (WELPA). ParentChild+ graduates displayed greater Kindergarten readiness on WAKIDS, and better English language proficiency, in relation to their comparison group. Over the long term, they also outperformed the comparison group on standardized Grade 3 Reading and Math tests, and also scored higher than the state average in the Grade 3 Math test (ORS Impact, 2016).

All five studies indicate that ParentChild+ positively influenced early language development in participating children. Of these, the third and fifth study, which adhere to reasonable standards of research rigor for studies of effectiveness, demonstrate that ParentChild+ promotes language development. The Washington study also indicates that there are longer-term effects, as ParentChild+ graduates continued to demonstrate strong academic performance in Grade 3. There is less evidence that ParentChild+ influences socio-emotional outcomes. Clearly, further experimental research is needed to firmly establish that ParentChild+ is effective in improving early learning and socio-emotional competence. These studies did not measure program effects on parent-child interaction or parents' capacity to teach.

### **Newark Trust for Education-ParentChild+ collaboration**

As part of its larger early learning strategy, the Newark Trust for Education (NTE), an educational intermediary organization in Newark, NJ, with the support of the Chan-Zuckerberg Initiative, began implementing ParentChild+ on a cost-free basis with low income families of children in the age range of 16-30 months in all five wards of Newark in Spring 2018. Currently a team of 2 coordinators and 6 home visitors, termed Early Learning Specialists (ELS), serve 87 children and their families,<sup>3</sup> who enrolled in ParentChild+ on a rolling basis since May 2018. As required by the national program, each ELS visits families in her caseload twice a week for half an hour each time, and introduces an educational book or toy each week, that remains with the family. The families are predominantly African American or Hispanic, and include African immigrants and Portuguese speakers. At present a handful of families have completed both cycles of the program, while the majority of families are either completing the first cycle or have begun the second cycle. This qualitative study seeks to capture families' perspectives at the end of Cycle I, of whether and how the program fit into and changed

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<sup>3</sup> Including 3 sets of twins or siblings.

families' regular routines, interactional culture, toddlers' learning and socio-emotional development, and families' preparation for pre-Kindergarten. The study was conducted over three months from March to June 2018. Methods of study included a review of program data (demographics, training documents and videos, educational materials and guides to materials, and home visit records), interviews with coordinators, ELSs, a representative sample of 22 parents/caregivers, and the national ParentChild+ research team, and analysis of the first cycle of ELSs' home visit records of the same 22 families.<sup>4 5</sup>

### Newark ParentChild+ at a glance

The Newark Trust for Education is an educational intermediary working in partnership with the city and school district to strengthen early learning and K-12 public education in Newark. Existing early childhood home visiting programs in Newark are focused on maternal and child health, and children's overall development. The Trust reviewed the following programs while developing its early learning strategy:

- **Healthy Start** for pregnant women and parents with children up to two years of age supporting linkages to social services, psycho-social assessments and counseling, and child development.
- **Healthy Families** serving pregnant women and children from birth to one. The program is focused on prenatal health and positive parent-child interaction.
- **Parents as Teachers** for children from birth to two, supporting early development, learning, and health by engaging their parents as informed caregivers.
- **Nurse-Family Partnership** supporting women experiencing their first pregnancy in preventive health, prenatal health, and positive child development post-partum.
- **ParentChild+** serving children from 16 months to four years of age in early literacy, verbal development, and socio-emotional development, and positive parent-child interaction.

The Trust determined that ParentChild+ was most aligned with its focus on early learning as a foundation for K-12 success. The Newark ParentChild+ initiative was developed in early 2018 with funding from the Chan-Zuckerberg Initiative, and the support of Newark Public Schools. The Trust was committed to customizing the ParentChild+ program to Newark's culturally and linguistically diverse population. An early step in the process was recruitment of program coordinators for English- and Spanish-speaking groups. The first coordinator hired by the Trust is a Newark native with experience in family services. She recruited and trained three ELSs over Spring 2018 to work with English-speaking families in the Central, South and West wards. The second coordinator, a bilingual English-Spanish speaker with experience in counseling and family services, was hired in Summer 2018. She recruited and trained 3 ELSs to work with Spanish- and Portuguese-speaking families in the North and East wards respectively. Coordinators developed VISM schedules in English, Spanish, and Portuguese for two cycles of 23 weeks each. VISM schedules included paired books and toys on topics such as transport, farm animals, musical instruments, family, helpfulness, and self-expression. Coordinators ensured that the books and toys were representative of the cultural and linguistic backgrounds of participating families. They developed VISM guides for each book and toy that listed interactive and creative ways of engaging the child in developing verbal, cognitive, and socio-emotional skills, as well as fine and gross motor skills.<sup>6</sup>

While both coordinators serve a few families directly, their role is largely to recruit families, supervise the work of ELSs, and manage documentation and reporting. ELSs spend the majority of their time on direct service to

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<sup>4</sup> See Appendix I for details on methods of the study.

<sup>5</sup> Names of team members and program participants are withheld to protect their identity.

<sup>6</sup> Chapter III includes examples of VISM schedules, book-toy pairings, and VISM guides.

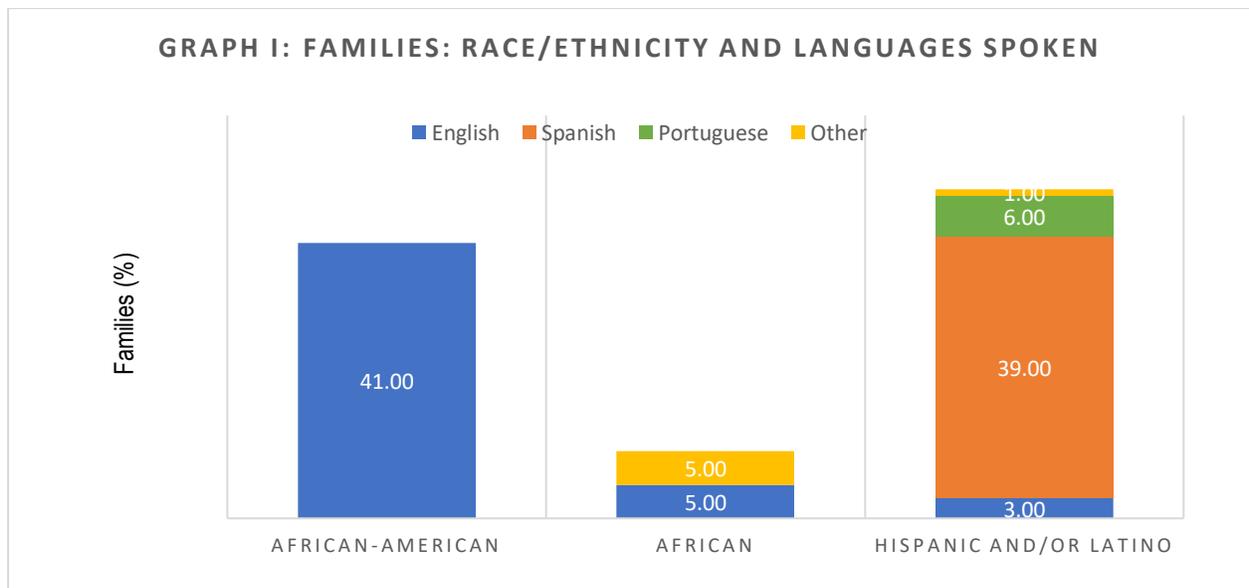
families, in addition to documentation of visits, and participation in a regular schedule of meetings and professional development.

**Table I: Snapshot of Team**

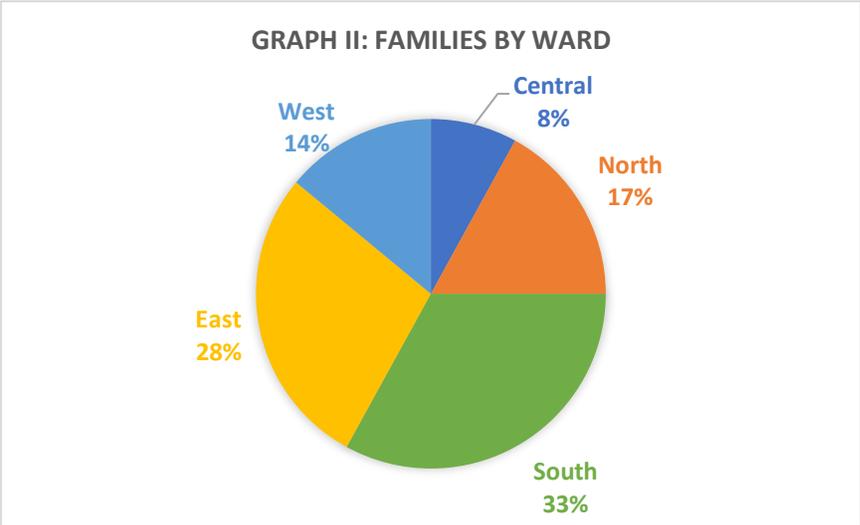
Role	Background	Children served	FT/PT
Coordinator 1	B.A. Sociology with experience in maternal and child health and alternative education. English speaker.	3	Full time
Coordinator 2	B.A. Psychology with experience in counseling and family intervention services. English and Spanish.	3	Full time
ELS 1	Experience in public administration, community health, educational advocacy, community volunteering. English speaker.	16	Full time
ELS 2	Worked as educational aide in public elementary schools, parent advocate, and prenatal health home visitor. English.	12	Full time
ELS 3	Served in family services and as a school aide. English speaker.	16	Full time
ELS 4	Worked in child and family services, casework, counselor, and community health. English, Creole, and Spanish.	14	Full time
ELS 5	Past experience as a school aide and job coach to youth. Active with children in church. English, Portuguese, and Spanish.	15	Full time
ELS 6	Early learning, social work, family advocacy. English and Spanish.	8	Part time

**Families**

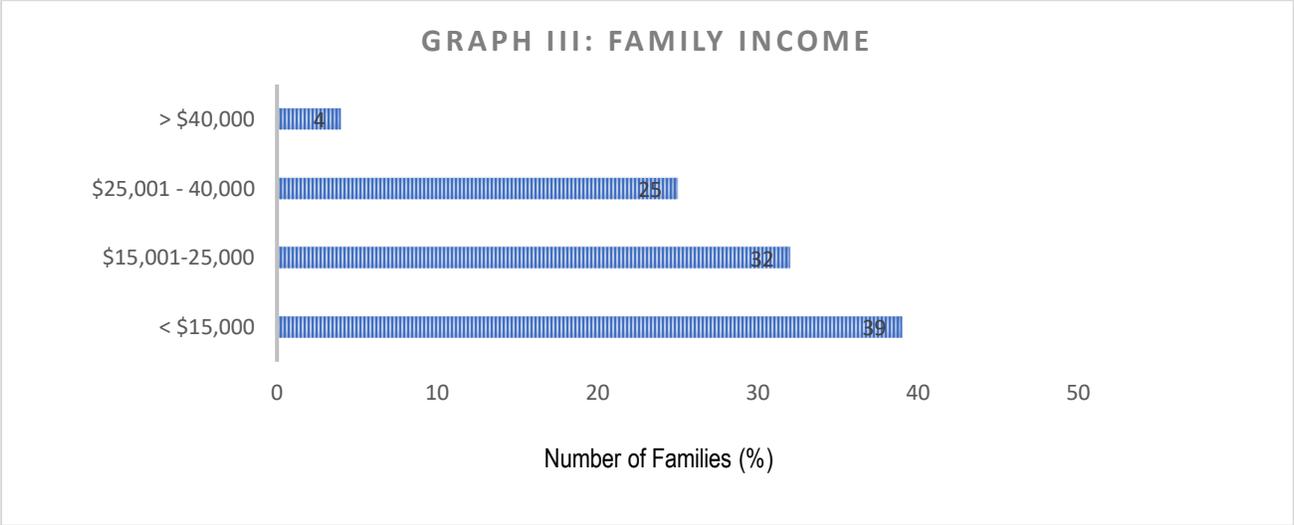
The following graphs are drawn from program data and describe the demographics of the 84 families in the Newark ParentChild+ program. What emerges is a picture of a set of families that are diverse in terms of language and race/ethnicity, but similar in terms of economic and educational backgrounds.



English and Spanish are the predominant languages. English-speaking groups include African and African American families. African families hail from many regions including West Africa and Nigeria. Spanish-speaking families include bilingual and mono-lingual families hailing from Puerto Rico, countries such as Mexico, Guatemala, and Ecuador, as well as American-born Latinos (above). Six percent of families speak Portuguese and are of either Portuguese or Brazilian origin. A third of the families are from the South Ward of Newark and speak English, and almost 30% are from the East Ward and speak Spanish. The remaining families are spread over the Central, North and West wards of the city (below).

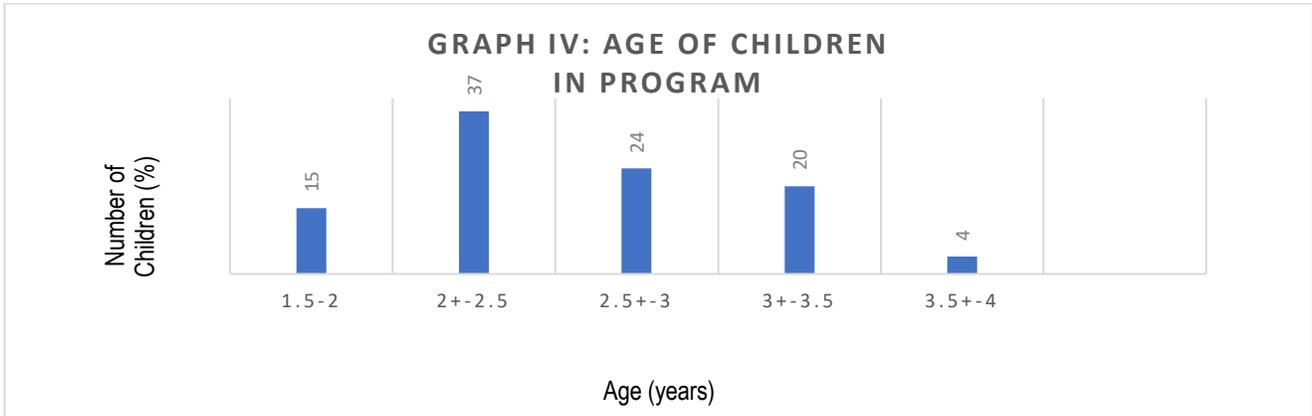


In terms of economic level, more than 70% of families earn less than \$25,000 a year (below), and 82% report receiving government assistance.



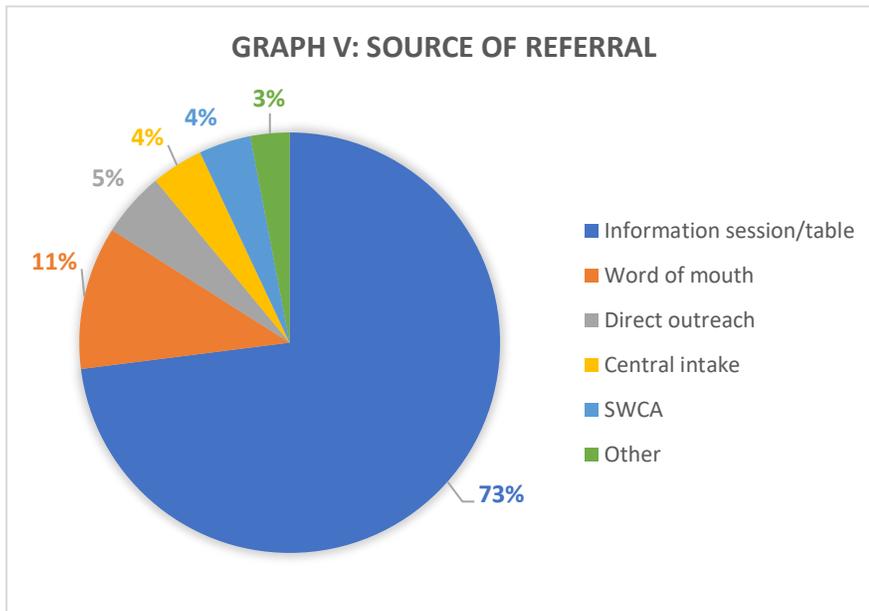
Families tend to have low levels of education - less than 40% of respondents report that they graduated high school. About 10% of participating parents are single parents.

Toddlers vary in age between 1.5 and 4 years of age, with over 80% of children falling into the 2-3.5 age range. The program requires that children are between 16-30 months of age at enrollment.



Most toddlers routinely participated in Newark ParentChild+ with their mothers. Around 20% of fathers participated in home visits, either taking turns or in tandem with the other parent. About 8% of families had grandmothers and other relatives routinely taking the lead in home visits.

### Enrollment



The team made itself visible at health fairs, community events, library events, and other events in Newark in the early stages of the program. Almost three-fourths of the families enrolled in the program at these events. About 11% of families were referred by program participants, another 5% were contacted directly by the team, and the remaining were referred through local public and nonprofit entities.<sup>7</sup> Newark ParentChild+ set a target of 100 families for its first year (2018-2019). A coordinator said: “It was a boots-on-the-ground effort. Health clinics, parks, supermarkets, laundromats, carnivals and festivals, daycares, libraries events for young children. I would introduce

myself and get into a quick spiel about the program, and that you get free books and toys. Then the hook is the twice weekly home visits. Going to preschool is fine, but they can learn before that”. The program successfully enrolled 89 families and 92 children, of which 84 families and 87 children are still with the program. Of the 5 families that discontinued, most relocated, and a few parents found full time employment that precluded participation in home visits.

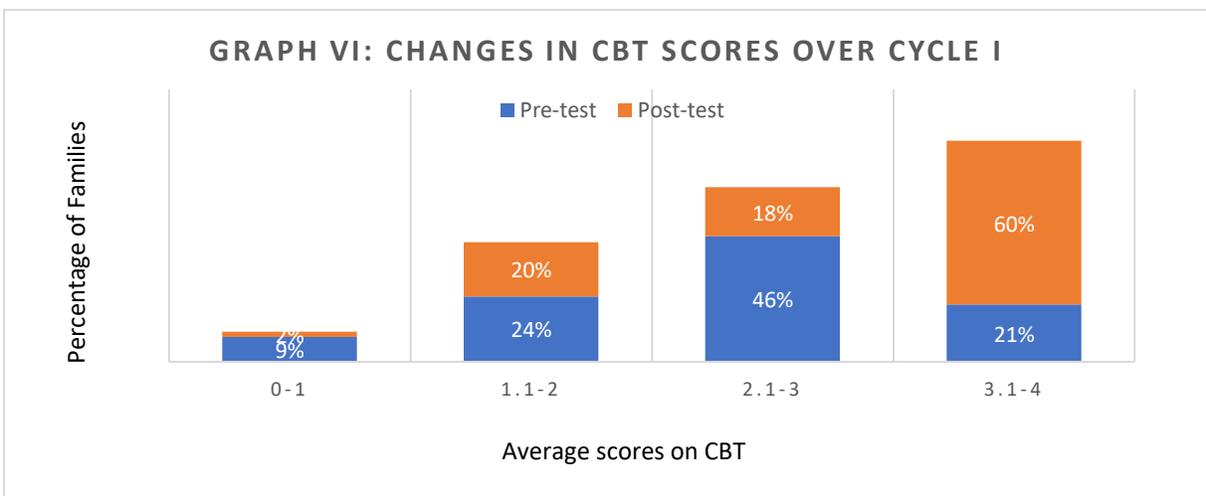
<sup>7</sup> Central intake refers to a NJ partnership for maternal and child health. SWCA is the South Ward Community Association.

## Emerging themes

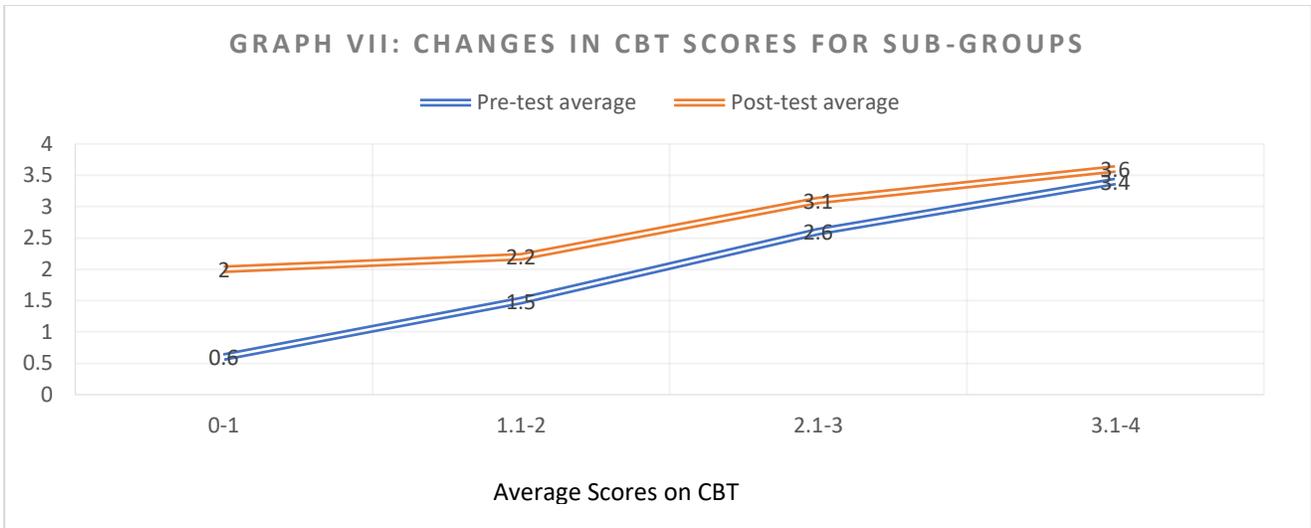
This section examines quantitative and qualitative data on Newark ParentChild+ to surface key themes emerging from Cycle 1, which 79 of the 87 toddlers have completed. The first part reports on changes in CBT and PACT scores; and the second on the emerging theme of the learning continuum. Overall, the first cycle was very successful in terms of families developing early learning habits, as measured by changes on the CBT and PACT, as well as analysis of interview and program data. It must be stated that the CBT and PACT are observational assessments conducted by ELSs with families they serve, and not by neutral observers.

### *Child's Behavior Traits*

The CBT assessment measures 20 indicators capturing how the child interacts and plays, including a systematic approach, focus, description, expression, creativity, awareness of and compliance with family rules, prosocial behaviors, pride at completing an activity, trouble shooting, initiation of play, safe play, sharing, and self-control. The five-point scale ranges from 0-4, including 0-Never; 1-Rarely; 2-Sometimes; 3-Often; and 4-Always. The scale was reduced to four points, clubbing Never and Rarely into Never/Rarely because of a small number of responses. Graphs VI and VII show that toddlers demonstrated considerable improvement on the CBT, with 78% of toddlers' play, verbal and interactional behaviors in the Often-Always range by the end of Cycle I.



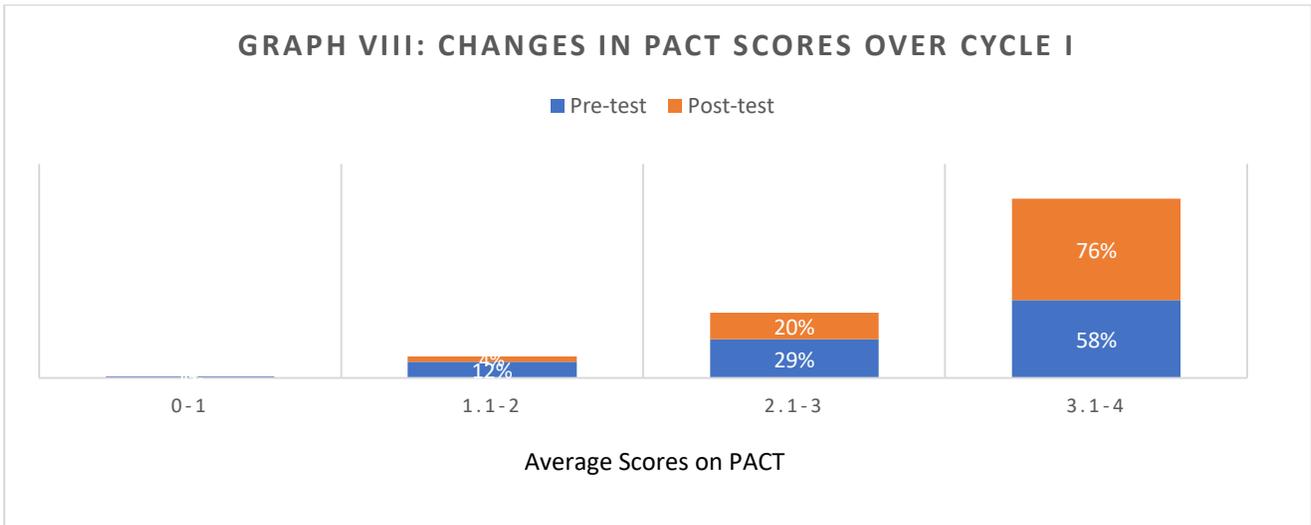
- **Pre-test:** A third of toddlers scored below 2 on average on the CBT during the pre-test. The majority of toddlers (79%) scored below 3. Just over 20% of toddlers scored at the highest level on the CBT.
- **Post-test:** By the end of Cycle I, 60% of toddlers scored in the highest category, and 78% scored over 2, indicating that *toddlers more frequently displayed traits such as stronger description, creativity, prosocial behaviors, and improved expression and focus.*



The above chart shows that, on average, toddlers that scored between 0-1 on the CBT pre-test improved to 2 on the post-test, toddlers that scored between 1.1-2 improved from 1.5 to 2.2; toddlers that scored 2.6 improved to 3.1; and toddlers that scored 3.4 improved to 3.6. Thus, all sub-groups on the post-test displayed **increased frequency of behaviors such as initiation of play, systematic play, rich description and expression, help-seeking, mood control, creativity, and sharing, and 78% were in the Often-Always range (over 3.1).**

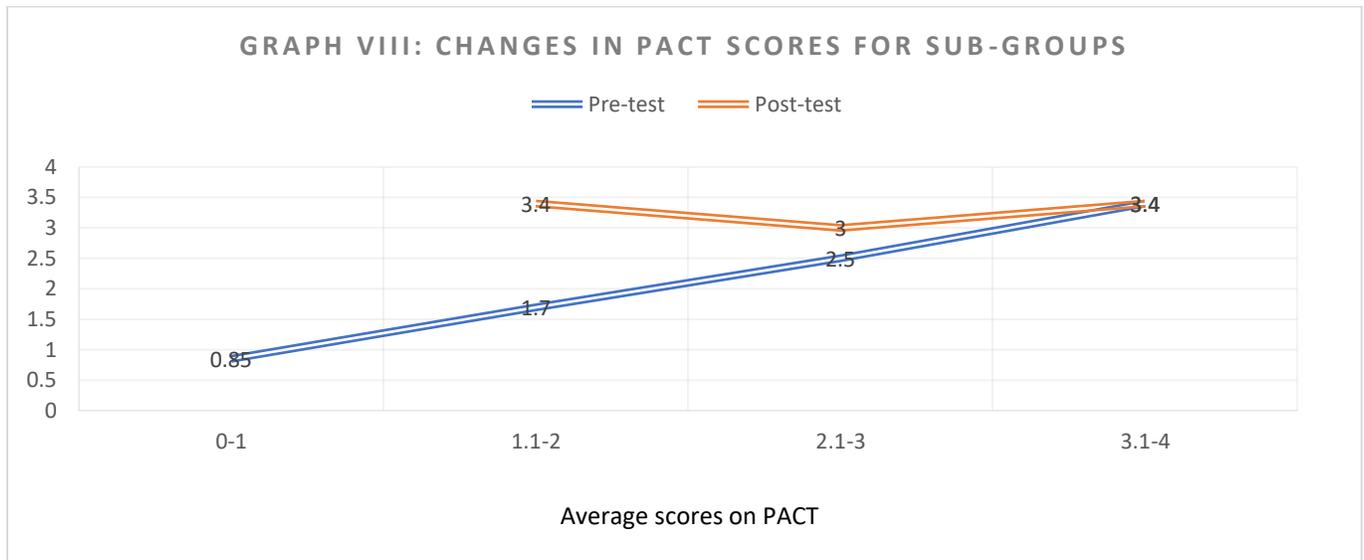
#### ***Parent and Child Together***

The PACT assessment measures parent-child interactions on 20 indicators including parental guidance, displays of affection, approval, positive tone, encouragement, consistency, scope for independent actions of child, firmness, and verbal interaction (e.g., conversation, disciplining). Similar to CBT, the five-point scale measures frequency of each behavior on a scale of Never to Always. Similar to the analysis of CBT scores, Never and Rarely were clubbed due to a small number of responses on both pre-test and post-test. Results show that 96% of parents/caregivers frequently displayed positive interaction by the end of Cycle I.



Similar to CBT scores, PACT scores, assessing parent-child interactions, also improved dramatically over Cycle I:

- **Pre-test:** Seventy six percent of parents scored between 3.1 and 4 on PACT in the post-test, compared to 58% on the pre-test.
- **Post-test:** Ninety six percent of parents scored over 2.1 on the post-test, as compared to 87% on the pre-test, showing that ***an overwhelming majority of parents frequently displayed positive interactional behaviors with their toddlers by the end of Cycle I.***



Post-test results on PACT are considerably higher for the group that scored 1.7 on average on the pre-test. They doubled their score to 3.4. The subgroup that scored an average of 2.5 on the pre-test improved to 3. The group of parents that averaged 3.4 on the pre-test maintained that score on the post-test. No parents scored less than 1 on the post-test. ***Positive parent-child interaction on the post-test was mostly in the range of Often to Always, indicating that such interaction was routine in 96% of families.***

### Learning continuum

Findings of the qualitative component of the study also indicate that Newark ParentChild+ contributes to changes in perspectives and routines in the majority of participating families, and supports learning for toddlers in the following ways:

#### ***Value added by Newark ParentChild+ to family interaction and early learning***

- Most parents/caregivers view their home as a site rich in learning possibilities, and are developing identities as first teachers to their toddler;
- They establish routines with their toddler, and parents and siblings regularly make time to read and play with their toddler;
- They find opportunities to connect what the toddler sees and says outside the home (on walks, in the park etc.) with what they have learned in the home;
- They recognize their toddler's thirst to learn and do things independently, and provide them space and time to explore, dress, eat, and play independently.

## Challenges

- A few families reported that ELSs were sometimes late or irregular with home visits.
- A few ELSs tended to do a weekly one hour visit instead of two half hour visits due to scheduling issues faced by families.
- A few parents treated home visit as an opportunity to catch up on chores.

Three levels of participation emerge, falling along a learning continuum:

### 1. A culture of learning in the case of families that embraced the program fully and made it their own.

*“We sit together and teach and learn together. I teach togetherness. My teenage daughter will read the book and everybody takes a turn going over the book and toy with the toddler. Every day of the week. We read or she reads. She knows some of the words and can go over the pictures.” – Mother*

*“The guide is excellent. You pick up a toy, you don’t know how educational it can be. If she gets bored with a toy, I can go to the guide and find something else to do with it. I was involved with my three other children, but I did not know how to teach them.” – Mother*

- In this case, the entire family engages with the toddler in using VISMs to read, play, and have fun together. The ELS is energetic and empathetic, and regularly provides the parent with stimulating VISM guides and the toddler with thoughtful and fun book and toy pairs. In this home, the books and toys are arranged in a corner of the living room, or another room designated as a “learning area.” The toddler’s schedule is regularized with clear times set aside, e.g., on waking up and before going to sleep, to play and read. The parent uses the VISM guides to develop new ways of teaching the toddler during the day, routinely engaging with the VISMs, talking with the child about other objects around the house, on walks through the neighborhood, visits to the grocery store, and other regular activities. Toddlers with older siblings engage them when they come home from school with playing with a new VISM or revisiting an old one. The parent or caregiver joins in these interactions, encouraging the children to create stories, sing, dance, and make connections. The ELS continues to regularly provide substantive ideas and models a wide variety of methods to teach and engage the child. Some parents even carve out a time for the family to have fun learning together, e.g. “circle time,” a few times a week. Every member of the family speaks to the toddler in full sentences, bringing in words the toddler is exposed to through the program, allowing the toddler time to express his or her thoughts and feelings, and fully engage in an exchange. In such families, the toddler is allowed to help set the table, clean up, and has freedom to eat and dress independently, even if it takes more time and the outcome is less than perfect. Grandparents ask to read and play with the children when they visit. The parent/caregiver fully believes that the child has a great capacity to learn, and can focus and complete activities. The child displays great interest in reading, play, and verbal interaction with the family, initiates reading and play, wants to complete an activity with a book or toy, participates in chores and activities (as age-appropriate), and helps keep the collection of books and toys organized. The child is also open to interacting with new adults and peers. If the child is close to 3 years of age, the parent has already researched several Pre-K options in the local area, completed paperwork, and is ready to enroll the child in a suitable school. The television and electronic media are not in use when the family is reading and playing with the toddler. The family’s culture of learning is imbued with a sense of fun and adventure.

### 2. An emphasis on learning in the case of families that have embraced some parts of the program.

*“She turns the TV off and sits with her toys and books before \_\_\_ (ELS) comes. Before she would just play with the toys, but now she points out things. Like the toy fruit and the fruit in the fridge.” – Mother*

*“We just moved house, and that was the first book he pulled out from the bin - Good Night Moon. It is part of his good night routine. We say goodnight to everything in the room. Sometimes he brings three books to me and asks me to read. We keep his things in a separate area, a learning area.” – Mother*

- The books and toys are organized in a designated area where the parent and child read and play together. The toddler’s routine includes reading and play time almost every day. Siblings sometimes join them. The parent uses the VISM guides when he/she notices that the toddler is bored with a toy. The ELS and parent regularly discuss ways of engaging the toddler in different ways. The parent regularly points to food items, objects on TV, and in the neighborhood or park that are related to what the child is reading about. The parent mostly speaks in full sentences and encourages siblings and visiting family to also engage the child in conversation. The toddler has opportunities to help with chores, dress, and eat independently. The parent believes that the child is ready for a broader scope of activity, and can focus and complete activities in the right circumstances. The child in turn responds to the parent’s verbal cues, initiates reading and play, is ready for the ELS when she arrives, and helps keep the VISMs in one place. The ELS encourages the parent and child, and helps them strengthen their routine and enrich their interaction. The parent is actively looking into Pre-K options in the local area. The family’s emphasis on learning is an important part of their routine and interaction.

**3. A growing awareness of learning possibilities** in the case of families who have limited engagement with the program:

*“I’ve learned that they can learn from books and toys, even with toys they already have. I have learned that images that we have around us are a means of learning.” – Mother*

- The books and toys are mostly placed in the bin and the toddler is encouraged to retrieve and place them back there. The parent reads and plays with the child once or twice a week. Siblings sometimes join the parent-child dyad. The parent relies on the ELS to teach activities from VISM guides and mostly observes or uses the time of the home visit to complete chores. The ELS sometimes misses a few sessions or combines sessions for various reasons, including issues related to the ELS’ schedule, parent’s work schedule, or the child’s health. The parent sometimes points to objects and sings and talks to the child. The parent sometimes provides time and opportunities for the toddler to dress, eat, and play independently. The child enjoys reading and playing and fully engages with the ELS during each visit. The ELS encourages the child to make up stories, dance, sing, and pretend play. The parent is interested in exploring Pre-K opportunities and is making efforts to compile information on local options. The family understands that the child is interested in learning, and with more support from the program can develop the skills to fully engage the child.

In sum, Chapter I described the context of the program and fleshed out patterns and themes emerging from the study. Chapter II unpacks the home visit from the perspective of ELSs and parents/caregivers. The final chapter, Chapter III presents the building blocks of the initiative including a logic model for the initiative and examples of program materials. This chapter also serves as a reference for program terms used throughout this paper.

## II. Unpacking Home Visits

The home visit is at the center of ParentChild+. Critical elements influencing the home visit are:

- A. The **VISM schedule**, which varies for English, Spanish, and Portuguese speakers and determines the order of paired books and toys that the family receives over each cycle. Themes that guide the creation of the schedule include recognition of alphabets and sounds, numbers up to 10, colors, animals, common verbs, family relationships, objects in daily life (food, transport), going to school, and expressing feelings. VISM schedules are developed for each 23-week cycle. VISM schedules in English and Spanish are included in Chapter III. An example of a book and toy pair is *Where is Spot?* And the farm peg puzzle that has many of the same animals and birds as the book. Similarly, the Spanish VISM schedule pairs the bilingual book *Dogs/Perritos* with magnetic numbers, as the book is about different types and numbers of dogs. Newark ParentChild+ coordinators developed all three VISM schedules, basing them on early learning indicators provided by ParentChild+ for language development, motor skills development, imaginative play, and socio-emotional development. Parents uniformly noted that the toys and books are high quality, and bilingual parents appreciated the books in Spanish and English.
- B. The **VISM guides** for each book and toy explain key concepts and suggest creative and interactive activities for the parent/caregiver to do with the child after the visit. Pictures of paired books and toys are included in English (with the guide), Spanish, and Portuguese in Chapter III to illustrate the fortnightly approach of dwelling on a theme, such as dinosaurs, and learning and reviewing vocabulary and concepts for two weeks. ELSs considered the guides a central piece of the visit, and most parents/caregivers use them as a ready reference when teaching or reviewing a book or toy. A parent said of the paired VISMs: “First she (ELS) brought us the *Wheels on the bus* book. We read it and learned the song. Then she brought us the toy. A bus with seven students and a teacher. Kids can get off the bus and on again. Stop sign on the bus. A bus driver. You can drive the bus around the house. She (child) learned its color and how it is related to school. When we were outside, she saw the sign and said Stop!”
- C. A **contract** between Newark ParentChild+ and the parent/caregiver where the latter agrees to the schedule of home visits and undertakes to be present and participate in sessions with the child.
- D. The **half hour home visit**, during which the ELS demonstrates positive interaction between parent and child, exposes the parent to varied teaching approaches, and answers any questions. Two home visit records, one for a visit introducing a toy, and a second reviewing a book, are included in Chapter III to provide a picture of what the visit looks like, and some of the activities that the ELS, parent/caregiver, and toddler engage in. In a few cases, due to scheduling conflicts or preferences of the family, the ELS did weekly hour-long visits in place of two half hour visits spread over the week. This is a design/fidelity issue meriting further study.
- E. Each family receives a **storage bin** for books and toys provided by the program, so that the family can build their collection and maintain it in an organized manner. This also allows the child to easily retrieve and place back a toy or book on their own. Several parents mention that this feature has enabled their child to independently keep his or her collection of toys and books organized.

A general pattern over the course of 23 weeks is that children were initially reluctant to interact with the ELS, and some of them refused to engage with the ELS for the first few visits. A few children immediately bonded with their ELS. One mother said about the first visit: “She clung to her (ELS) and wouldn’t let her go.” ELSs

usually spent time during early visits working with the parent/caregiver on the VISM guide to help them appreciate and try out different ways of using the toys and books. Typically, after the first two to three weeks, children began to get excited about activities related to their new books and toys. ELS could then begin to work with them and their parents/caregivers on varied learning activities. While the majority of parents or caregivers report being highly engaged in the sessions, a few felt that it was a time to catch up on chores or relax, while a “teacher” worked with their child. Some parents with children experiencing speech delays or with developmental disabilities perceived the program as valuable, even if their children were not able to fully engage in the activities. All parents appreciated the quality of the toys, and valued having a collection of books.

Four major themes define the home visit, based on a review of home visit logs and interview data:

- 1. Strengths-based approach**
- 2. Parents/caregivers as teachers**
- 3. Children’s learning and development**
- 4. Involvement of siblings and family members in learning**

### **1. Strengths-based approach**

All eight home visitors touched upon building on positive cultures within families. A coordinator said: “We operate from a strengths-point of view. As part of the training I give ELSs a picture of a house in chaos. The mother is disheveled, the house is dirty, but the fridge is full of food, there are age-appropriate toys. I ask them - What are you going to focus on? We want to move off from an area of strength.” This positive approach informs every aspect of the work. During the hiring process, coordinators looked for candidates with cultural and linguistic backgrounds that matched the families they would work with, and who believed that all children can learn. ELSs were unanimous in their belief that parents wanted the best for their children and that children wanted to learn and were capable of learning. An ELS said: “My parents want their child to learn and be ready for school.” A coordinator added: “You see the parent having a conversation with the child. Identify the colors, they say, what do you see here. They are imaginative, they praise, they make it their own. We try to integrate with the parent’s style and family culture.”

The positive approach extended to the mode of teaching. ELSs unanimously emphasized the importance of making learning fun for parents and children. An ELS said: “Being able to focus on books and toys is exciting. Remember your childhood and play again. We play with the toys ourselves during our staff meetings. What do you want the family to experience during a home visit? Focus on the fun!” Almost all parents/caregivers remarked on this aspect as well: “Baby may be in a bad mood, but she (ELS) always comes in with a big smile and a lot of energy, and we get right into it.”

Humility and respect are cornerstones of the approach. A coordinator said: “Children are going to be won over with books and toys. Parents are going to be won over with respect. I’m walking in as family. They know I care and I’m there.” A mother said: “She (ELS) is becoming close. I hope we can remain friends after the program ends.” However, ELSs maintained boundaries when it came to participating in meals or intervening in familial issues. Home visit records show that some confided in their ELS about marital and other issues, and that ELSs were judicious in their response. On the other hand, many ELSs worked with coordinators to help parents find jobs and housing, and referred them to food pantries and other charitable organizations for clothing, furniture, and other goods, if they asked for the help.

In a few cases, ELSs note in home visit records that homes were not clean or that the number of people and noise in the house was not conducive to learning. However, home visit records also reveal that ELSs worked

around many challenges that families faced, for example, doing visits in a shelter where a family was staying temporarily, working with the parent and child on the floor in a home with no furniture, working with a parent and child in a day care center on occasions when the mother's schedule did not allow her to be home with the child, and working with a caregiver on occasions when the parent could not be present. A parent stated: "They were upfront about the visits being flexible with my schedule. That's what makes it work for me."

## **2. Parents/caregivers as teachers**

An ELS said: "Our role is to support not lead. The parent takes the lead. They lead and find their balance."

Another ELS stated: "I tell them - Don't turn on the TV. He is ready to learn, excited about what I'm going to pull out of my bag. Most of my parents are right there with me." The program has an explicit focus on supporting parents in becoming their child's first teacher. ELSs do this in a number of ways:

- Emphasize the VISM guide
- Model varied engaging activities and positive interaction
- Support organization
- Support routine

**VISM guide.** The paired VISM guides on the theme of dinosaurs (in Chapter III) illustrate activities such as vocabulary, sorting, and story-telling that support parents as they teach their toddlers. ELSs are emphatic about the value of the VISM guide. An ELS said: "The most important thing for me is to explain how the (VISM) guide works. Give them the guide sheet, explain how they can work with their child with the book or toy. Different things they can do to engage the child." Another ELS said: "The guide sheets on how to use the materials – that is the first thing we discuss– what vocabulary it will build, what action words to emphasize, what activities to do with it."

Parents are almost unanimous on how much they rely on the guide to teach their child:

"The guide is excellent. You pick up a toy, you don't know how educational it can be. If she gets bored with a toy, I can go to the guide and find something else to do with it. I was involved with my three other children, but I did not know how to teach them."

"That guide helps me on a daily basis. Helps me come up with a daily task for me to do with him to help him learn."

"I like the paper (VISM guide). It tells me what my part needs to be. It is the best way to teach the toy."

"It is my husband's first child. So, it (VISM guide) helps my husband have something to do with my son. They weren't doing much together."

**Modeling teaching and positive interaction.** Most parents report learning several strategies from ELSs including focusing on the story rather than the words, letting the child explore the toy or book in his or her own way first, dispensing with baby talk and speaking in full sentences to the child, asking the child to tell the story or play an imaginative game, and connecting concepts (colors, shapes, stories) from the books and toys with daily activities and objects. A mother summarized her experience: "I sat back and observed. Learned different techniques. It is a new experience. I have raised 10 kids but I can do something new for my daughter." Another mother said: "The fact that he can learn things here (at home) that he would learn at school is what makes it meaningful."

ELs summed up their ways of modeling teaching with parents:

“I watch the parent read with the child. I get the parent to point out the cover, the back, the colors, ask questions about the story. Let the child tell the story in their own words. Evaluate the pages – it is important for the child to see what the story is rather than the words. Then you work on the words and point out the words – that is sight memory for the child.”

“Some parents of two year olds think they need baby talk. That they can’t understand adult talk. In 23 weeks, we see them evolving into their child’s first teacher. There is more interaction with the child.”

An ELs talked about the spirit of the session:

“I don’t think they thought I’d be as silly as I was. Sitting on the floor and rolling around with the kid. Parents didn’t expect it to be so lighthearted.”

Parents perspectives are rich and varied in what they have adopted from the sessions, including ways of communicating, giving children space to explore and express themselves, being playful and educational at the same time, and addressing behavioral issues differently.

“I notice I walk around saying animal sounds and random words to her. We communicate completely differently now. I’m stepping back and letting her explore. She’s more independent, using her toys herself.

“I turn around and say read the book to mommy. Let mommy see the puppet. Show mommy what the puppet can do.”

“I show him the picture. I ask, what is this person doing? Tell me what’s happening in this picture?”

“I’ve learned that they can learn from books and toys, even with toys they already have. I have learned that images that we have around us are a means of learning.”

“I have more options available. I can give her puzzles, building blocks, the train! There’s magnets on the fridge and in the morning. We can talk about which is which, sing the ABCs.”

The mother of a child with a speech delay said:

“\_\_\_ (ELs) told me that his temper tantrums are about him trying to communicate something and I should ask him to point to what he wants.”

**Organization.** Most parents appreciated the toy bin provided by the program. The toy bin is a simple container made of durable cloth that can hold books and toys. Most families have allocated a space for it in their home. Parents reported that they make it a point to return toys and books to the bin after a session, and that children were independently doing the same.

Parents said:

“He has his box he received where he puts his books. He will bring me a book to read with him every day.”

“We just moved house, and that was the first book he pulled out from the bin - *Good Night Moon*. It is part of his good night routine. We say goodnight to everything in the room. Sometimes he brings three books to me and asks me to read. We keep his things in a separate area, a learning area.”

She knows she has to keep her things in the toy bin. Then she goes and gets it out.

“She knows that if she plays with the toys and puzzles that she should put them away. She goes ‘Clean up, Clean up.’ She puts everything back in its place. Like a vulture! She didn’t know this before.”

**Routine.** Several families also noted that the visits provided them with a weekly structure of learning, review, and exploration. Several parents said they observed stricter naptime, playtime, and bedtime routines. Many also noted that the child used less electronic media and watched less TV, as they played and read more. An ELS noted that parents were already seeing the benefits of routinizing learning: “One mom reads to the kids every night. Plays with the toys with them. She sees for herself how fast they grasp the colors, the counting. She sees the growth in her kids.”

Parents said:

“We are more organized, on a schedule”

“It used to be mommy come home from work, make lunch, do some activities. Now she asks, what are we reading today?”

“If it’s Tuesday, she knows \_\_\_ (ELS) is coming and has the book ready for her. On Thursday, she has it ready for her. She’s always ready for her.”

“He used to watch a lot of TV before. \_\_\_ (ELS) helped him get familiar with books. He’s excited – teacher coming, teacher coming. Always excited about her visit.”

My kid likes to learn. He’s yearning for it. He’ll go for his toy chest and take out books and here, here. Letting me know, do work with me.

“She turns the TV off and sits with her toys and books before \_\_\_ (ELS) comes. Before she would just play with the toys, but now she points out things. Like the toy fruit and the fruit in the fridge.”

Only a few parents stated that they participated minimally in sessions, and used the half hour to catch up on their work. A parent said:

“Sometimes I stay and observe, and sometimes I get chores done.”

Coordinators noted that parents who participated minimally either had low levels of literacy, or had children who received in-home early intervention services where an outside expert worked with the child while they

observed or did their chores. Both coordinators consistently encouraged such parents to play a more active role during home visits.

### **3. Children's learning and development**

The rationale for the program is to prepare parents to help their children develop language and regulate behavior in ways that support readiness for Pre-K. This section also addresses the need to further study ways in which the program plays out for families with children with developmental delays and disabilities.

**Pre-K readiness.** ELSs and parents/caregivers were certain that the program is preparing children for pre-school. ELSs noted that many of the children called them "teacher" and were confident that they would be ready to learn from another teacher in the future. An ELS said: "They are excited to see you when you come in. They're excited to see what they are going to learn about." A mother said: "She knows that in preschool there will be another teacher like \_\_\_ (ELS)." ELSs stated that the strength of the program was its integrated approach, and opportunities it provided for reinforcement. Parents were especially excited about their children's growing verbal competence and independence. A few parents also noted that their child was more focused and regulated his or her behavior better. The majority of parents with children approaching 3 years of age had begun the process of Pre-K enrollment. Many sought the help of the ELS in researching pre-K options. However, those with older children were familiar with the process, as well as with local and city-wide Pre-K options.

ELs and parents/caregivers emphasized that the program **integrated** socio-emotional, cognitive, verbal, and motor skills, and **reinforced** basic concepts such as colors, animals, shapes, alphabets, and numbers throughout the 23-week cycle.

ELs said:

"This week we sliced toy fruit and pretended to eat it. We pretend to share the fruit. We count the slices, discuss the colors of the fruit. The child is grabbing, holding, cutting. If it is a book, the child is turning pages, lifting flaps. Sometimes we read the book and sing the song and dance, as we did with Wheels on the Bus. Words, play skills, motor skills – we try to integrate everything."

"We were doing the bears in the band theme book and toy. For the book, I always point out the cover. Ask the child the color. Open the book. Go through every page and ask them what they see and I tell them what I see. I point out details. How many bears? What colors are they? What instruments are they playing? I pretend to be in a band with the child. We play the instruments and talk about type, size, shape, sound. Booming, tapping, clapping!"

"Most of the books are about numbers, colors, and animals. Repeating information so we can make sure the child is catching it."

Most parents found their children's **verbal development** remarkable:

"He wasn't talking before. He's really talking now."

"He says thank you, love you, take care – expresses himself. Learning so fast. Picking up many things."

“His vocabulary, expression, the way he interacts with other children – he is able to play with them.”

“Vocabulary has expanded crazy, crazy. At one point, she was pointing and calling colors and shapes. When we walk back from daycare, she pointed and said rock. How did she know rock?”

Many parents also noted that the child was rapidly growing more **independent**:

“Eating, using a cup, saucer, cutlery.”

“He puts his socks in his shoes.”

“If something is too high, she grabs a stool. She got a stool and helped me wash dishes one day.”

“He wants to do things by himself.”

Many parents also noted that the child could **focus** on an activity for longer periods of time:

“She sits for longer to listen to a story or to play or watch TV.”

“He doesn’t just want to play and watch TV. If he grabs a toy he observes its value.”

“She’s a lot more thorough with her description. Excited about books. She feels she can read the whole book. She wants to finish it.”

A few parents discussed **behavior regulation** as an outcome:

“She was aggressive. She’s calmed down a lot. Will see a kid outside and want to play. She now goes and says hi and hugs the kid.”

“He can share now when he plays.”

**Disabilities and delays.** ELSs and parents/caregivers brought up concerns regarding developmental delays in some of the children, which raise questions about the scope of the program. Previous studies show that the program has been implemented with children experiencing delays and disabilities. Several ELSs reported that some of the children in their caseloads displayed signs of autism or had verbal delays. In some families, parents were hesitant to acknowledge delays and disabilities, leading ELSs to question whether or not it was within their role to urge them to seek a professional opinion. Some of the children were already receiving services in their homes during the first cycle of the program. Most parents of children with delays stated that they found the program valuable because it taught them how to interact positively, be patient, and teach their children themselves. However, more in-depth research needs to be conducted to better understand children’s specific issues, and what the program represented for these families.

#### ***4. Siblings and extended family play a role in learning***

Perhaps the least documented area, in earlier studies of ParentChild+, is the engagement of the entire family, and even extended family in developing routines involving the books and toys. Almost all ELSs and parents/caregivers in Newark ParentChild+ reported that the program’s influence extended beyond the mother-

child dyad. Both noted that children drew in their grandparents, fathers, older siblings and cousins into reading and play activities. A mother described her family's new ways of interacting as being their "circle time." Almost all families that had older children stated that older siblings and the toddler read books and played with toys frequently each week. ELSs noted the same in their home visit records.

ELs said:

We're not just working with parent and child. We bring in other family members. Cousins were there when we did finger painting and were shocked that the kid didn't ask for Youtube to be on. The mom and kid had paint on each other.

"The older child also comes to sit with us. Older child encourages the younger child."

"I do the visits with the grandmother if the mother is at work."

Bilingual parents noted the value of the bilingual books for their families:

"I will read to him in Spanish and when my daughter comes home from school, she'll read to him in English."

"The books are bilingual. I can easily give them to my mom and she can read them to the baby. Spanish-influenced activities that help us teach in both languages."

Several parents mentioned that siblings read and play together with the VISMs:

"I read to them every night. She's ready for a book and she'll go get it and read with her five-year old brother."

"I read the book with his older brother after \_\_\_ (ELS) left. He kept talking and telling his older brother about the book, and saw that he was interested in the book. Now he takes all his books to his brother."

"My older daughter is learning to read. She reads to the baby (toddler)."

"She likes playing with the stacking set and the vegetable basket. Every day she reads the books with her sisters. They play with her."

"\_\_\_ (ELS) includes my 7-year old as well. She lets him read and includes him in arts and crafts projects too."

"My stepdaughter visits on Monday and Thursday. We try to read on those days with her."

A grandmother said:

"I read with my granddaughter. See monkey, monkey, I tell her. If she doesn't get it, I know I can't fix it, I let it go and come back to it later."

Some parents talk about reading and playing together being a routine family affair:

“We sit together and teach and learn together. I teach togetherness. My teenage daughter will read the book and everybody takes a turn going over the book and toy with the toddler. Every day of the week, we read or she reads. She knows some of the words and can go over the pictures.”

“The older kids come home from school and look at the guide and begin to practice it with \_\_\_\_ (toddler). Her dad comes home and she wants him to read the book.”

In sum, the home visit rests on a **strengths-based** approach. The home visit records attested to changing marital, work, and housing situations of some parents, and ELSs’ determination to support the families’ continuing engagement in the program despite some heavy odds. With regular home visits, **parents evolved as confident teachers** of their children. They consulted the VISM guides, imbibed varied techniques that ELSs modeled, as well as developed their own, emphasized organization, and developed routines that allowed their children the space, time, and support that bolstered their learning. Parents reported that the majority of children advanced in their **verbal development**, and grew more **independent**. Some parents reported that children displayed greater **focus** and prosocial **behavior**. Interestingly, the **culture of teaching and learning rippled out** from the mother-child dyad to siblings, fathers, grandparents, cousins and beyond. The next section revisits the scenarios presented in the introduction, and outlines the scope of a broader study of all 84 families in the program, including case studies of families on different points along the learning continuum.

Findings of the study indicate that Newark ParentChild+ is contributing to changes in perspectives and routines in the majority of participating families, and supporting learning for toddlers in the following ways:

#### ***Value added by Newark ParentChild+ to family interaction and early learning***

- Most parents/caregivers view their home as a site rich in learning possibilities, and are developing identities as first teachers to their toddlers;
- They establish routines with their toddler, and parents and siblings regularly make time to read and play with their toddler;
- They find opportunities to connect what the toddler sees and says outside the home (on walks, in the park etc.) with what they have learned in the home;
- They recognize their toddler’s thirst to learn and do things independently, and provide them space and time to explore, dress, eat, and play independently.

#### ***Challenges***

- A few families reported that ELSs were sometimes late or irregular with home visits.
- A few ELSs tended to do a weekly one hour visit instead of two half hour visits due to scheduling issues on the part of families.
- A few parents treat the home visit as an opportunity to catch up on chores.

#### **Redefining the home as a learning space, and the parent/caregiver as teacher**

This chapter demonstrated the prominent place the Newark ParentChild+ program has in families’ lives. ELSs adopted a strengths-based approach, parents and caregivers adopted several teaching strategies and ways of

organizing their homes and their routines that supported toddler's verbal and socio-emotional development. Pre-K readiness and enrollment in Pre-K is a goal that almost all parents and caregivers are working toward. The quantitative data show that toddlers developed stronger verbal, interactional, socio-emotional, and motor skills over Cycle I, and parents/caregivers strengthened their interaction with their toddlers – 78% of toddlers and 96% of parents/caregivers routinely displayed higher levels of positive learning and interactional behaviors on post-tests as against 67% and 87% on pre-tests, respectively.

Taken all around, Newark ParentChild+ is bridging the distance that schools and families' intentionally and unintentionally put between them, by strengthening families' perceptions of themselves as interesting and able teachers, and of their toddlers as engaged, independent learners who are ready for pre-school. While the national program is focused on parent-child dyads, the Newark implementation also captures the roles that siblings and grandparents – broader family networks - play in routinizing early learning within the home. The first chapter introduced three scenarios which define points along the learning continuum that the program has helped families establish:

1. ***Culture of learning***, where the program has struck deep roots in families' routines and interactions and extends beyond the parent-child dyad to siblings and grandparents. Parents are evolving into capable teachers and drawing on their surroundings to enrich toddlers' language and interaction. Toddlers are exploring language and making connections between their learning and the world around them. The home is organized, routines are established, and the child is able to independently find a book or toy, ask a sibling to read or play, and participate in small chores around the house. The child is ready in every sense for Pre-K, and the parent has made strides in identifying a suitable Pre-K for the child.
2. ***Emphasis on learning***, where the program has influenced routines and interactions in significant ways, and the family is actively using program materials to reinforce language, prosocial behavior, and independence in the child, in anticipation of Pre-K. The parent or caregiver has already set in motion the process of Pre-K enrollment and is aware of appropriate options in the local area.
3. ***Growing awareness of learning possibilities***, where the program has supported parents and caregivers in understanding the potential the home has as a site for early learning. They already grasp the role of books and toys in enriching language development, connections with the outside world, and how independence and socio-emotional competence can be fostered by giving the child space and time and a routine within which they can explore.

The learning continuum has several implications for the ongoing implementation of the program in Newark. The Trust plans to refine this concept through an in-depth mixed methods study planned for Fall 2019. The study will include a structured survey of all 84 families enrolled in the program, assessing their routines, organization, teaching activities, family interaction around learning, and the child's verbal and socio-emotional development. It will include open-ended interviews with a representative sample of 25% of the families on the same topics. Six families representing the three points on the continuum, will be selected for developing case studies. Samples will represent cultural and linguistic diversity among participants. The study will address the outcomes proposed in the logic model and the New Jersey Early Learning Standards. The objective of this study is to support efforts by the Trust to help parents advance to higher levels on the continuum, so that they have the capacity to develop rich home-based learning environments that boost their children's readiness for Pre-K and beyond. The study will also add value to the literature on early learning in diverse, low income, urban areas, and support early learning practice and policy aimed at closing gaps for underserved children.

### III. Building Blocks of Newark ParentChild+

This chapter presents critical elements of program design – the building blocks of the initiative – that determine the course of implementation. The first section presents the logic model, which was developed in collaboration with the team and draws on program materials and data including the ParentChild+’s pre- and post-tests – Child’s Behavior Traits (CBT) and Parent and Child Together (PACT). Outcomes in the logic model are correlated with the New Jersey Early Learning Standards (NJ Council for Early Learning 2013), the state-level guidelines for socio-emotional, cognitive, and verbal development for children from birth to three years of age. Other sections present the English and Spanish VISM schedules for a 23-week cycle, VISM guides for a book and toy pairing, and examples of home visit records for when a VISM is introduced, and when a VISM is reviewed.

#### Logic model

**Inputs:** NTE has been a part of Newark’s educational and community landscape since 2011. In the past 3 years, NTE partnered with the school district and the city on key initiatives such as Safe and Supportive Learning Environments and the South Ward Community Schools Initiative. NTE’s most recent work is focused on improving quality and access in early learning. NTE’s work is supported by national and local funders and has won the support of school and community stakeholders through its collaborative and customized initiatives. NTE is well-positioned to implement ParentChild+ in Newark due to its track record in educational and community initiatives, capacity to manage initiatives, and emphasis on cultural and linguistic relevance and competence.

**Activities.** Section II discussed the Newark ParentChild+ team, languages spoken, and caseloads. Training for coordinators at the national ParentChild+ headquarters included 3 days of intensive exposure to the materials, methods, and results of the program. Coordinators learned through demonstration sessions, reviewing videos of home visits, and relating elements of VISM to the book and toy pairings. Coordinators also were trained on using the PACT, CBT, and templates like the intake form and the home visit record. Coordinators conducted outreach, researched age-appropriate books and toys, ordered materials, and developed guides for each toy and book. In addition to recruiting ELSs, families, and preparing the sets of materials in each language, coordinators also train ELSs through a 16-hour intensive, monitor ELSs work with families, and trouble shoot issues that arise. Each coordinator also works directly with three families. Coordinators complete the Key Elements for Establishing Program (KEEP) form that tracks compliance with implementation once a year.

**Outputs.** Families began to enroll in the program in May 2018. Each family completed an intake form and signed a contract agreeing to participate in two cycles and be present in their home for each visit. The ELS conducts observation-based pre-tests in the early weeks of Cycle I and II. Every ELS completes a home visit record (HVR) after each visit with a family. Coordinators convene their teams on a weekly basis to address emergent issues and plan ahead. ELSs also conduct post-tests around 23 weeks and 46 weeks.

**Outcomes.** The grid below illustrates the considerable overlap between New Jersey Birth to Three Early Learning Standards and the indicators on the ParentChild+ CBT assessment. The CBT has 20 indicators (left) addressing play behaviors, interaction, language and cognitive development, rules and routines, expression, creativity, and behavior. The Early Learning Standards are (top): 1) Socio-emotional development; 2) Approaches to learning; 3) Language development; 4) Cognitive development, and 5) Physical and motor development. The text in the white cells identifies NJ early learning indicators (numbered A, B, C...) that match the indicators on the CBT. Appendix II presents a descriptive summary of indicators for each of the standards.<sup>8</sup>

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<sup>8</sup> Indicators on the PACT are not used in this analysis, as the NJ standards do not address them. Parent outcomes are represented on the logic model and are based on PACT indicators.

**Table II: Mapping Indicators from NJ Birth to Three Early Learning Standards and CBT**

CBT indicators	NJ Early Learning Indicators (Ages 0-3)				
	<i>I. Socio-emotional development</i>	<i>II. Approaches to learning</i>	<i>III. Language and communication</i>	<i>IV. Cognitive development</i>	<i>V. Physical and motor development</i>
1.Plays in systematic way				A. Exploration and discovery	A. Gross motor development
2.Smiles/laughs when playing	B. Self-awareness D. Relationships with peers and adults				B. Fine motor development
3.Does not hit/bite others	C. Self-regulation D. Relationships with peers and adults				
4.Can describe pics in book		A. Curiosity	B. Communicating and speaking C. Emergent literacy		
5.Initiates positive play	D. Relationships with peers and adults	C. Creativity D. Initiative			
6.Accepts/seeks help with play	D. Relationships with peers and adults	D. Initiative			
7.Cooperates with adults	D. Relationships with peers and adults				
8.Pretend play	D. Relationships with peers and adults	C. Creativity		D. Imitation & symbolic play	
9.Expresses strong feelings appropriately	C. Self-regulation			C. Problem solving	
10.Understands/completes activities that are developmentally appropriate		A. Curiosity B. Persistence	B. Communicating and speaking		A. Gross motor B. Fine motor
11. Asserts ownership over toys/books	C. Self-regulation		B. Communicating and speaking	B. Memory	A. Gross motor B. Fine motor
12.Follows family rules	A. Trust and emotional security C. Self-regulation	D. Initiative	B. Communicating and speaking	B. Memory	
13.Is creative during play	D. Relationships with peers and adults	C. Creativity		D. Imitation and symbolic play	A. Gross motor B. Fine motor
14.Tolerates frustration	C. Self-regulation D. Relationships with peers and adults	B. Persistence	B. Communicating and speaking	C. Problem solving	B. Fine motor
15.Expresses pride upon completing activity	B. Self-awareness		B. Communicating and speaking		
16.Interacts without hesitation	B. Self-awareness D. Relationships with peers and adults	D. Initiative		A. Exploration and discovery	
17.Shares and tolerates delays in needs being met	C. Self-regulation	B. Persistence	B. Communicating and speaking		C. Physical health
18.Avoids dangers	C. Self-regulation			C. Problem solving	A. Gross motor B. Fine motor C. Physical health
19.Moods are appropriate	C. Self-regulation	B. Persistence	A. Listening and understanding B. Communicating and speaking		C. Physical health
20.Attentive/concentrates for up to 3 min on activity	C. Self-regulation	A. Curiosity B. Persistence	A. Listening and understanding C. Emergent literacy	A. Exploration and discovery	

## Newark ParentChild+ Logic Model



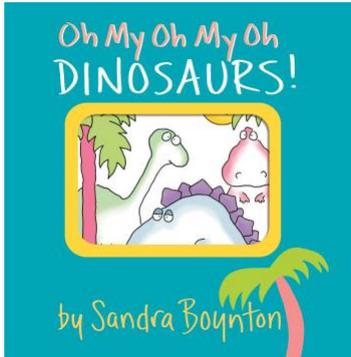
## Program Materials

### A. VISM schedules in English and Spanish

Week	Books and toys
Welcome	<b>Welcome Gift Toy Chest</b>
1	Where's Spot? By Eric Hill
2	Farm Peg Puzzle
3	On The Farm Bilingual Book
4	Toy Farm & Farm Animals
5	I Went Walking by Sue Williams
6	Blocks on Wheels
7	Wheels on the Bus by Raffi
8	Mighty Monkey Stacker Peg Set
9	Fiesta by Ginger Foglesong Guy
10	Art Kit
11	Goodnight Moon by Margaret Wise Brown
12	<b>Back to School Gift Bag</b>
13	Cows Can't Quack
14	Melissa & Doug Pound a Peg
15	Are You My Mother by P.D. Eastman
16	Attribute Beads
17	Cows Can't Jump
18	Melissa and Doug Color & Shape Sorter
19	School Bus by Donald Crews
20	Wooden Classic Toy School Bus
21	Feast for Ten by Catherine Falwell
22	Toy Dishes
23	Brown Bear, Brown Bear by Eric Carle

Week Semana	Book/ Toy Libro/ Juguete
1	A is for Airplane /A es para avion
2	Alphabet puzzle/ Rompecabeza de alfabeto
3	Quiet Loud /Silencio Ruidoso
4	Instruments/ Instrumentos
5	Dogs/ Perritos
6	Magnetic Numbers /Numeros Magneticos
7	Moo, Ba, La, La, La/ Muu, Bee, Asi Fue!
8	Farm puppets/ Marionetas
9	Where is Spot? / Donde esta Spot?
10	Hide and seek board/ Esconderse y buscar
11	A color of his own/Su propio color
12	Art kit/ Kit de arte
13	20 Big trucks/ 20 camiones grandes
14	Truck puzzle/ Rompecabeza de camiones
15	Cows can't jump/ Las vacas no pueden saltar
16	Lacing beads/ Cuentas de cordones
17	The Napping house/ La casa adormecida
18	Dough kit/ Kit de masa
19	Good night/Buenas noches a todo
20	School bus/ Autobus escolar
21	How did dinosaurs to go school/Cómo van a la escuela los dinosaurios?
22	Dino puzzle/ Rompecabeza
23	Opposites/Opuestos

## B. Paired book and toy – English VISM guides



Guide sheet: Book  
Oh, My Oh My Oh  
Dinosaurs!  
BY: Sandra Boynton

**Supporting Your Child's Development:** Sunbathing dinosaurs and artistic dinosaurs, dancing dinosaurs and volleyball-playing dinosaurs make

learning opposites fun! Gentle rhythm and rhyming, and colorful, humorous drawings and lively text will appeal to your child. Rhymes support your child's **phonemic awareness**, an important part of **reading readiness**. Predicting what will happen next supports your child's ability to **follow and tell a narrative**, also an important stage in **reading readiness**. Listening to rhyming sounds and being able to tell a story are components of **early literacy** and your child's **cognitive development**.

### Introduction of the book:

As you read the story, try some of these ideas to encourage your child to talk about the pictures:

- **Wait.** Turn to a page and pause for 5 to 10 seconds to give your child time to start to talk about it
- **Follow your child's lead.** Notice what your child is looking at or talking about and say something about that.
- **Comment and wait.** Make a comment about something your child is looking at and wait 5 to 10 seconds to give your child time to respond.
- **Respond and add a little more.** React warmly to your child's contributions to the conversation and add an idea or a new word.

Talk with your child about the names of the animals, shapes and colors in the book.



Guide sheet: Toy  
Dinosaur Chunky  
Puzzle  
By: Melissa and  
Doug

**Supporting Your Child's Development:** This chunky wood puzzle will support your child's **fine motor**

**development** and **hand-eye coordination**, as she/he fits each piece snugly into its accompanying board. Help your child with this task, only as needed – allow him/her to do as much by him/herself as he/she can. Name the pieces and help your child to name the pieces. By sorting the pieces into categories, your child will be advancing in her/his **cognitive** and **vocabulary development** from labeling items individually to being able to put particular words into groups, which is an advanced skill. It includes seven easy-grasp, chunky dinosaurs. Each piece has a matching picture underneath. The pieces stand upright for pretend play.

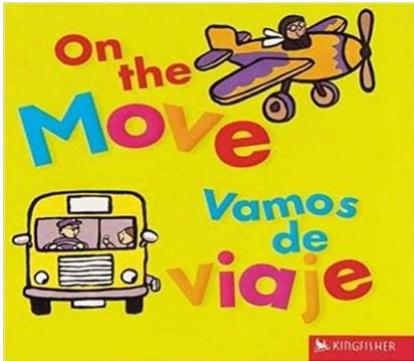
### Name and encourage your child to name:

- **New words:** Teranodon, ankylosaurus, apatosaurus, T-Rex, triceratops, stegosaurus, and hadrosaurus
- **Colors:** Green, yellow, orange, brown
- **Relationships:** Place the dinosaur **into** the board;
- **Textures:** The pieces are **smooth** on one side and **rough** on the other.
- **Causing things to happen:** When you press the piece down, it will fit into the board.
- **Describe your actions.** Invite the child to describe his or her actions.
- **Sorting and Matching:** Can you match the T-rex piece with its board? Let's put all the things that fly together.
- **Fitting:** Carefully fit the piece into the board.

### Fun activities:

- Trace the pieces with a pencil and make a book of "dinosaurs."
- **STORY TIME:** Give each dinosaur a name, a personality, and talk about where it lives, what it eats, and what it likes to do

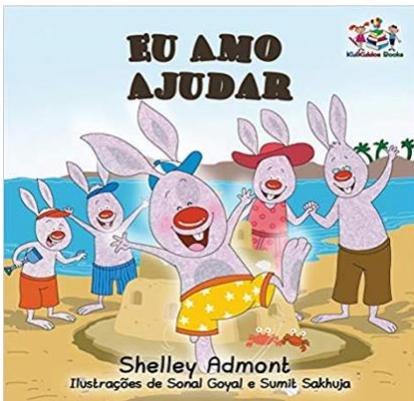
C. Examples of Book and Toy pairings in Spanish and Portuguese



A bilingual Spanish-English book about modes of transport that teaches movement verbs, and vocabulary related to vehicles and speed.



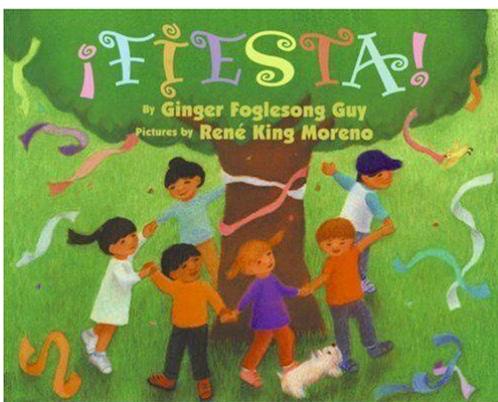
An 8-shaped rail track that the toddler can assemble. The toy improves hand-eye coordination, and offers the child many opportunities for pretend play.



A book in Portuguese about working together to solve problems and achieve a goal that helps everyone.



A set of toy dishes for pretend play in which the child helps the family set the table.



A book in Spanish about how children prepare for a fiesta that teaches children to count in Spanish.



A basket of vegetables that children play with and learn names, colors, numbers, and talk about in the context of food for a fiesta.

**D. Home visit record – introduction of toy**

Child's Name: Y	Home Visitor's Name: G	
Date of Visit: N	Length of Visit: 40 MINS	Visits # X
Participating Adult: P	Others Present:	

**Notes/Concerns:** *Have there been any significant changes since the last visit? TODAY ELS PRESENTED "MIGHTY MONKEY PEG SET."*

*YES. MOM HAS BEEN WORKING CLOSELY WITH TODDLER. TODDLER IS DOING VERY WELL WITH RECOGNIZING COLORS & ANIMALS. TODDLER CAN SAY COLORS & ANIMALS ON HER OWN.*

**Review**

*Did the parent (or other family member) get to play or read to the child since the last visit? Describe.*

*YES. MOM STATED THAT SHE WORKS WITH TODDLER EVERYDAY & SHE ALSO BROUGHT TODDLER LEARNING ACTIVITY BOOKS TO TEACH HER COLORS. TODDLER KNOWS HER COLORS & RECOGNIZES ANIMALS, MOM STATED.*

*Describe the environment/atmosphere.*

*THE HOME IS CLEAN & ORGANIZED. THERE ARE ALSO TOYS & BOOKS VISIBLE DURING THE VISIT. TODDLER KNOWS WHERE TO GET HER TOYS & SHE ALSO PUTS THEM BACK WHEN LEARNING HAS ENDED.*

*What did you do to introduce/review the new toy, book, or activity?*

*ELS GREETED TODDLER WITH A SMILE & SOFT TOUCH. ELS SAT ON THE FLOOR & STATED TO TODDLER "GUESS WHAT? I HAVE SOMETHING FOR YOU." ELS PULLED OUT THE MIGHTY MONKEY PEG SET & STARTED SINGING "HOW MANY MONKEYS JUMPING ON THE BED.". ELS ASKED TODDLER WHAT KIND OF ANIMAL IT WAS. TODDLER ANSWERED "MONKEY." THEN ELS ASKED TODDLER TO SHOW HER ALL THE RED MONKEYS, BLUE, GREEN, ETC. TODDLER DID VERY WELL WITH RECOGNIZING EACH COLOR.*

*What was the child's reaction/participation?*

*TODDLER GREETED ELS AT THE DOOR, THEN SAT NEXT TO ELS ON THE FLOOR & ASKED "DO YOU HAVE A TOY?" ELS PULLED THE TOY OUT & TODDLER YELLED "YAAAAAY" THEN REACHED FOR IT. TODDLER & ELS OPENED THE TOY TOGETHER. TODDLER NAMED ANIMAL & RECOGNIZED THE COLORS BY SEPARATING THE MONKEY PEGS BY COLORS.*

*How did the parent/family member participate?*

*MOM SAT THERE & ALLOWED TODDLER TO DO THE ACTIVITY ON HER OWN UNLESS SHE SAW HER STRUGGLING WITH SOMETHING.*

**Rate the parent's level of verbal interaction: Check one**

Almost none       Small     Moderate      \*Large

**Rate the parent's level of encouragement/support of the child: Check one**

Almost none       Small     Moderate      \*Large

**Identify two strengths of the parent/child/family that you observed during the visit.**

1. TODDLER HAS OLDER SIBLING TO HELP WITH ACTIVITY.
- 2.

**Identify two areas that you would like to focus on in the future.**

- 1.
2. N/A

*Is there anything you would like to discuss regarding this visit at the weekly staff meeting?*

NO

*Is there anything you need to discuss in one-on-one supervision with the Coordinator regarding this visit?*

NO

**Home visit record – review of book**

Child’s Name: B

Home Visitor’s Name: T

Date of Visit: M

Length of Visit: 35 MINS

Visits #X

Participating Adult: P

Others Present: NO

**Notes/Concerns:** *Have there been any significant changes since the last visit?*

TODAY WAS A REVIEW “ON THE FARM” BOOK. WHEN ELS SANG “OLD MACDONALD HAD A FARM” TODDLER SANG AND HE CLAPPED HIS HANDS AFTER ELS FINISHED.

**Review**

*Did the parent (or other family member) get to play or read to the child since the last visit? Describe.*

YES, MOM STATED THAT SHE READS TO TODDLER EVERY NIGHT. MOM SANG THE SONG WITH TODDLER AS WELL.

*Describe the environment/atmosphere.*

THE HOME IS NEAT & ORGANIZED. TODDLER HAS LEARNING TOYS & BOOKS VISIBLE.

*What did you do to introduce/review the new toy, book, or activity?*

ELS GREETED TODDLER WITH A SMILE & A HUG. ELS STARTED SINGING “OLD MACDONALD HAD A FARM” AND TODDLER WAS ABLE TO SING MOST OF THE SONG TOO. WE LAUGHED AND CLAPPED TOGETHER.

*What was the child’s reaction/participation?*

TODDLER WAS WATCHING YOUTUBE ON THE TV WHEN ELS ENTERED THE HOME. ELS GREETED TODDLER WITH A SMILE AND HUG AND MOM TURNED THE TV OFF. MOM POINTED TO THE ANIMALS TOY BASKET AND ASKED TODDLER TO GET HIS NEW BOOK. TODDLER CAME BACK WITH THE RIGHT BOOK. MOM ASKED TODDLER TO HELP HER AND HE OPENED THE BOOK.

*How did the parent/family member participate?*

MOM SANG ALONG WITH ELS. MOM POINTED TO THE PICTURES AS TODDLER LOOKED THROUGH THE BOOK. MOM HELPED TODDLER IDENTIFY THE ANIMALS AND THE ANIMAL SOUNDS.

**Rate the parent’s level of verbal interaction: Check one**

Almost none                                      Small    Moderate                                      \*Large

**Rate the parent’s level of encouragement/support of the child: Check one**

Almost none                                      Small    Moderate                                      \*Large

**Identify two strengths of the parent/child/family that you observed during the visit.**

1. MOM IS VERY ENGAGING WITH TODDLER
2. MOM SHOWS PATIENCE AND LOVE TO TODDLER

**Identify two areas that you would like to focus on in the future.**

- 1.SUPPORT MOM WITH IMAGINATIVE PLAY
2. ENCOURAGE TODDLER WITH ANIMAL SOUNDS

*Is there anything you would like to discuss regarding this visit at the weekly staff meeting?*

NO

*Is there anything you need to discuss in one-on-one supervision with the Coordinator regarding this visit?*

NO

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# Appendix I

## Methods of the study

This qualitative study on Cycle I seeks to capture families’ perspectives on whether and how the program fit into and changed families’ regular routines, interactional culture, and preparation for pre-Kindergarten. The study was conducted over three months from March to June 2018. Methods of study included a review of program data (demographics, training documents and videos, lists of toys and books, and VISM guides), interviews with coordinators, ELSs, a representative sample of 22 parents/caregivers, and the national ParentChild+ team, and analysis of the first cycle (23 weeks) of home visit records of the same 22 families. The sample is as follows:

**Table III: Interview Sample**

Role	Number in sample	Level of participation in visit
Mother	20	100%
Grandmother	1	100%, sometimes with child’s mother
Father	1	Either father or mother does the visit

**Review of program data:** Review of 10 videos of home visits by ParentChild+ as well as the Newark ParentChild+ team. ParentChild+ videos were training videos of toddler-caregiver dyads working with the ELS. Newark ParentChild+ team videos were used by coordinators to shadow ELSs during home visits to review their work. Videos shed light on the structure of the visit, roles of parent/caregiver, ELS, and toddler, and types of early learning activities (language development, motor skills, pretend play, numeracy etc.).

**Interviews with team:** The lead coordinators were interviewed at the outset on historical factors and conceptual priorities that shaped Cycle I. Coordinators and ELSs were interviewed on: 1) recruitment, training, and program roll out, 2) early stages of implementation, development of materials, indicators of program quality, and documentation, 3) examples of positive parent-child interaction and early learning, and variations across the families, and 4) challenges, milestones, turning points, and other and takeaways.

**Interviews with parents:** Parents/Caregivers were interviewed once. Interviews were in English (15, including English and Bilingual Spanish speakers), Spanish (5), and Portuguese (2). Translators (students from a local university) helped conduct the interviews in Spanish and Portuguese. Topics included routines with the toddler before and after the program, perceptions on the materials, changes in toddler’s routines, speech, behavior with peers and adults, level of independence in daily activities, changes in parenting, preparation for Pre-K (access, enrollment, start date), and assessment of the quality of the ELS’s work, punctuality, and interactional style.

**Review of VISM schedules and guides:** VISM schedules in English, Spanish, and Portuguese were collected for Cycle I. Guide sheets for 20 book-toy pairings were coded for the content covered (such as alphabets, numbers, colors, animals, sounds, modes of transport), as well as the review activities (such as suggestions for story-telling, pretend play, reinforcement, songs, motor activities).

**Review of home visit records:** Home visit records of 22 families in the interview sample were coded for ELSs approach, parent roles and child’s language and socio-emotional indicators.

**Review of CBT and PACT pre- and post-assessments.** Data from the pre- and post- CBT and PACT (as of May 31, 2019), were tabulated, and changes in the data over Cycle 1 included in the analysis.

## Appendix II

### Summary of New Jersey Birth to Three Early Learning Standards<sup>9</sup>

# SUMMARY OF INDICATORS

#### III. Language Development and Communication

##### A. Listening and Understanding

- Shows interest in listening to sounds
- Listens with interest to language of others
- Responds to verbal communication of others
- Responds to nonverbal communication of others
- Understands gestures, words, phrases or questions

##### B. Communicating and Speaking

- Uses sounds, gestures or actions to express needs and wants
- Use consistent sounds, gestures, signs or words to communicate
- Imitates sounds, gestures, signs, words or phrases
- Uses sounds, signs, words or phrases for a variety of purposes
- Takes turns using language in simple back and forth conversations

##### C. Emergent Literacy

- Shows interest in songs, rhymes and stories
- Shows interest in photos, pictures and drawings
- Develops interest in and involvement with books and other print materials
- Begins to recognize and understand symbols such as those used in writing

#### IV. Cognitive Development

##### A. Exploration and Discovery

- Pays attention to people and objects
- Uses senses to explore people, objects and the environment
- Attends to colors, shapes, patterns or pictures
- Show interest and curiosity in new people and objects
- Makes things happen and watches for results or repeats action

##### B. Memory

- Shows ability to acquire new information and use it at a later time
- Recognizes familiar people, places and things
- Recalls and uses information in new situations
- Searches for missing or hidden objects

##### C. Problem-Solving

- Experiments with different uses for objects
- Shows imagination and creativity in solving problems
- Uses a variety of strategies to solve problems
- Applies knowledge to new situations

##### D. Imitation and Symbolic Play

- Observes and imitates sounds, gestures or behaviors
- Uses objects to represent other things
- Uses imitation or pretend play to express creativity and imagination

#### V. Physical and Motor Development

##### A. Gross Motor Development

- Moves body, arms and legs with coordination
- Demonstrates large muscle balance, stability, control and coordination
- Develops increasing ability to change positions and move body from place to place
- Moves body with purpose to achieve a goal

##### B. Fine Motor Development

- Uses hands to manipulate objects and make contact with people
- Develops small muscle control and coordination
- Demonstrates integration of the senses
- Uses different actions on objects
- Controls small muscles in hands when doing simple tasks

##### C. Physical Health and Well-Being

- Shows characteristics of healthy development
- Responds when physical needs are met
- Expresses physical needs non-verbally or verbally
- Participates in physical care routines
- Begins to develop self-help skills
- Begins to understand safe and unsafe behaviors

<sup>9</sup> Excerpted from <https://www.nj.gov/education/ece/guide/standards/birth/standards.pdf>