Ready Educators Quality Improvement Pilot: Outcome Evaluation

FINAL REPORT

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Table of Contents

Preface

This report is the second report from the Ready Educators Quality Improvement Pilot (REQIP). This report provides an *outcome evaluation* of REQIP, with an emphasis on child outcomes, as well as observations of the REQIP educators, and documentation of progress at both the program and system level. The Year One Report provided a *process evaluation* of the implementation of REQIP, with information about recruitment, the work of the Quality Improvement Partner (QIP) and the Technical Assistance Providers (TAPs), and program progress over the initial months; both reports can be downloaded at http://thrivein5boston.org/ready-educators/.

Introduction

Thrive in 5 is a citywide effort, launched in 2009 and co-led by the Mayor's Office, City of Boston, and United Way of Massachusetts Bay and Merrimack Valley (United Way), to ensure that all children from birth to age five have the resources needed to succeed in school and in life. Working with parents and their communities in concert with multiple cross-sector partners, *Thrive in 5* is directly aligned with and strives to advance the strategic goal that "all children start school ready to learn."

The **Ready Educators** multi-year strategy seeks to advance early care and education programs in Boston to the highest level of quality. Quality is defined as the ability of the program to identify the needs of children, to provide appropriate resources and supports to meet those needs, and to demonstrate measurable improvement in child outcomes.

The Ready Educators Quality Improvement Pilot (REQIP) was a part of *Thrive in 5*'s citywide **Ready Educators** strategy. The pilot provided technical assistance and support to early education and care programs in centers and family child care homes that serve children from birth to age five.

I. What is REQIP?

The REQIP theory of change posits that, to meet the goal of improved child outcomes, programs need to build "sustainable independent capacity to operationalize a ***continuous quality improvement process*** (CQI)." As the Pilot was envisioned, CQI involved the development of a ***Program Improvement Plan*** (PIP) through an assessment based on child-level and program data and with support from a ***Quality Improvement Partner*** (QIP). The PIP would then serve as the basis for technical assistance to meet the goals of the PIP, followed by a re-assessment using program and child-level data. This CQI process would be sustained over time, in an ongoing continuous loop.

Over the two years of REQIP, this model provided important structure to the work of the QIP (Dr. Wendy Wagner Robeson and also, in year one, Dr. Joanne Roberts). The QIP was in regular communication with both programs and **technical assistance providers** (TAPs), to ensure the matching of program needs with TAP competencies and availability. The PIPs proved to be important guides for program staff and the QIP in identifying needs and charting progress.

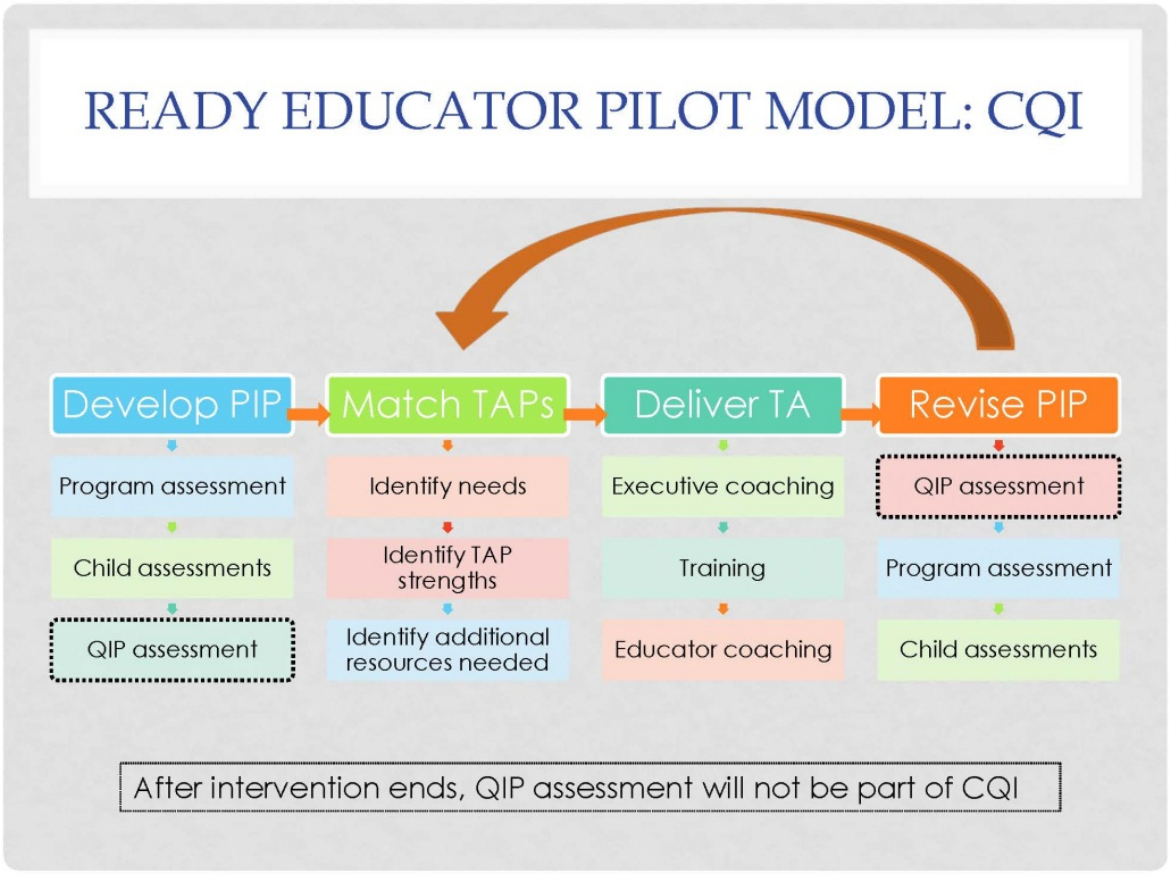


Figure 1. Ready Educator Quality Improvement Pilot Model

Trajectory of Change. Early in year one, the QIP realized that, while the majority of Boston programs reported conducting child assessments, these assessments were used primarily to screen for children in need of referrals for additional services. Among those programs that collected data that could potentially be used for CQI, we found that directors and educators were unsure how to use that data to inform practice. This led to a revision of the model to recognize the different stages through which programs progress in developing the capacity to effectively use child (and program) assessments to improve practice, and thereby improve child outcomes (see Figure 2). The PIPs have been structured to identify the technical assistance needed to support program advancement through these stages by recognizing a sequence of technical assistance: beginning with training and coaching on child development, developmentally-appropriate practice, and curriculum (stage 1); followed by training and coaching on conducting child assessments (stage 2); training and coaching on how to use assessments to inform practice (stage 3); and ending with training and coaching on CQI (stage 4).

Figure 2. Trajectory of Change

	Stage 1	Stage 2	Stage 3	Stage 4
Progress towards CQI	No child assessments in place, not ready to implement child assessments	Program understands importance of assessments. Ready to begin to implement child assessments	Conducting child assessments on a regular basis	Using child assessments to inform classroom instruction and support CQI
TA needed	Training and coaching on child development, developmentally-appropriate practice, and curriculum	Training and coaching on conducting child assessments	Training and coaching on how to use assessments to inform practice	Training and coaching on CQI
Number of Programs in Pilot in Year 1	2 centers	5 FCC homes, 3 centers	4 centers	1 center
Proposed assessment of program progress	QIP conducts child & program (ERS) assessments	QIP conducts child & program (ERS) assessments; Program conducts child assessments and family program assessments with involvement of TAPs/QIP	Program conducts child assessments and family program assessments; QIP conducts program (ERS) assessments with involvement of program administrator	Program staff conduct child and program assessments, and family program assessments

Technical Assistance. The REQIP approach to technical assistance is grounded in research on effective innovations. While the REQIP model focuses on CQI – continuous quality improvement – the Trajectory of Change recognizes that CQI requires two precursors: an understanding of child development, and the knowledge and skills to implement best practices in early care and education. However, CQI and its precursors cannot flourish in a vacuum; such innovative practices require capacities at the individual educator level, as well as at the organizational and community levels. At the educator level, educators with training and experience are more likely to have the capacity to implement high quality practices, such as CQI. In addition, low turnover is important to maintain the implementation of quality practices (Greenhalgh, Robert, MacFarlane, Bate, and Kyriakdou, 2004). At the organizational level, organizations that have funding available to support more than basic operations, and have effective leadership that buys in to the innovation, are more likely to be able to support best practices of their educators (Greenhalgh, et al., 2004). At the community level, effective innovation is aided by a policy environment that supports the innovation (Greenhalgh, et al., 2004), such as Quality Rating and Improvement System (QRIS) policies in ECE. Finally, implementation of an innovation is more likely when the change agent – in REQIP, the Quality Improvement Partner (QIP) – is able to facilitate connections among organizations (Greenhalgh, et al., 2004), such as between ECE programs and technical assistance providers, as well as potential funders.

REQIP provided two types of professional development for ECE educators: training and classroom coaching. While training in specific practices is important to the implementation of best practices, coaching is also necessary to support the skill-development among individual educators. In addition, REQIP provided technical assistance with classroom environments and curriculum materials, necessary tools to support the educators. At the organizational level, REQIP provided executive coaching for center administrators, and for the family child care system administrator, to support greater financial stability and administrative practices that would reduce turnover and support educators. We describe each of these types of technical assistance below.

Finally, at the community level, REQIP aligned the program improvement plans (PIPs) with the Massachusetts QRIS standards, to support program and educator buy-in and potentially leverage funding. In addition, the QIP identified effective technical assistance providers and organizations, and supported the matching of these resources with individual program and educator needs.

Training. Table 1 provides an overview of the training provided. Highlights include the training of 35 to 37 FCC educators on curriculum and assessments; literacy training for 37 educators; STEM training for 59 educators; and training by Teaching Strategies on Creative Curriculum® , a necessary precursor to training on GOLD® assessments, to four programs serving preschoolers and two programs serving infants and toddlers.

Because some educators attended multiple trainings, it is not possible to give a total number of unique educators who received training across all topics, but using the highest number of

educators at each program for any training, we would estimate a minimum of 189 unique educators in centers and 37 FCC educators, received training in one or more topics.

Coaching. The other form of professional development offered to ECE educators was coaching, which NAEYC (2011) defines as: "A relationship-based process led by an expert with specialized and adult-learning knowledge and skills, who often serves in a different professional role than the recipients(s). Coaching is designed to build capacity for specific professional dispositions, skills, and behaviors and is focused on goal setting and achievement for an individual or group." Coaching is, by definition, labor intensive. REQIP offered over 350 hours of coaching to 48 (unique) educators in centers and four FCC educators. Among the total 52 unique educators who received coaching, 47 received coaching on curriculum topics and 19 received coaching on using assessments. While there were multiple challenges in identifying and matching TAPs with programs, the QIP and programs report that almost all training was high quality and well-received, and much of the coaching was high quality and effective.

Table 1. Training

Training Topic	Number of programs	Number of Educators	Number of Team Leaders, Administrators, etc.
***Curriculum Training**:*			
Developmentally Appropriate Practice: Infants & Toddlers	2	16	2
Developmentally Appropriate Practice: Preschoolers	1	3	1
Infant/Toddler Curriculum	1	7	
FCC Curriculum	35	35	4
Lesson Planning	1	30	3
Literacy	3	37	5
STEM	3	59	3
Massachusetts Curriculum Guidelines: Centers	4	89	17
Massachusetts Curriculum Guidelines: FCCs	37	37	2
Creative Curriculum ™ Infants & Toddlers	2	Not available	
Creative Curriculum ™ Preschool	7	Not available	
***Using Assessments**:*			
Introduction to Using Assessments in Centers	4	92	4
Introduction to Using Assessments in FCCs	36	36	4
Observing & Recording in the Classroom	1	13	2
Relationships:			
Social Emotional Development	1	16	
Classroom Management	2	33	
Other:			
Working with Diverse Families & Children	2	47	1
Health & Nutrition	1	12	
NAEYC Code of Ethical Conduct	1	56	

Classroom environments and curriculum materials. Educators need classrooms and FCC homes with the materials and furnishings that support age-appropriate curriculum practices, and classrooms and FCC homes need to be arranged in ways that facilitate children's learning. REQIP TAPs provided consultation to three centers and four FCC homes on materials and furnishings, space arrangement, as well as funds for materials. REQIP also provided environmental consultation to ten centers and four FCC homes. The environmental consultation focused on bringing classrooms up to QRIS standards at Level 2 or higher, and bringing gross motor indoor space in line with QRIS standards.

Executive coaching. REQIP provided several types of resources and support at the program level including executive or administrative coaching, and assistance in leveraging other funding sources. Seven of the programs and the FCC system, received executive coaching. Executive coaching addressed the development of Individual Professional Development Plan (IPDP) forms and other forms required by QRIS; the implementation of the QRIS-required family survey, Strengthening Families; as well as staff supervision, curriculum development, and program management including fiscal management.

The Year One Report, available at http://thrivein5boston.org/ready-educators/, provides a detailed process evaluation of the QIP's activities, the TAPs, and of the technical assistance that REQIP provided to participating programs and educators, as well as the lessons learned during the first year of REQIP.

II. Outcome Evaluation of REQIP Pilot

The outcome evaluation consisted of child assessments, classroom assessments, and program-level assessments.

A. Program-level Assessments

Programs were jointly assessed three times each year, by the QIP and the program administrator, for centers and the family child care system, or by the QIP and the provider, for family child care homes. These assessments were summarized on the Program Improvement Plans (PIPs) for each program and family child care home. The PIPs were aligned with the Massachusetts Quality Rating and Improvement System (QRIS), and included selected items from the QRIS that were judged to be key indicators of quality, and that could be addressed by technical assistance. The PIPs were used by the QIP to identify needs and match appropriate technical assistance (see the Year One Report for more on this process). By comparing the initial PIP, completed in the fall of 2013, with the final PIP, completed in the summer and fall of 2015, we can evaluate the changes at the program level on key variables important to quality, and to advancement through Massachusetts' QRIS. We discuss the results for specific items in selected standards, separately for centers and family child care homes.

Centers. Table 2 summarizes the results for the eight centers that participated in REQIP for two years. We found program-level improvement on multiple items. In addition, of the eight centers, one is applying for Level 3 in QRIS and a second center plans to apply once they are back in their building after renovations.

1A. Curriculum and Learning: Curriculum, Assessment, and Diversity
At the start of REQIP, the initial PIPs indicate that most centers met the Level 3 item, "Staff include parental input in the progress reports." The greatest area of improvement under this standard was in completing required professional development (PD) in curriculum, screening and assessment, as well as on the Massachusetts Guidelines, documenting children's progress, and working with diverse children and children from diverse families.

1B. Curriculum and Learning: Teacher-Child Relationships and Interactions
Some centers met two items under this standard at the start of REQIP; five additional centers met these items after participating in REQIP training and coaching.

2. Safe, Healthy Indoor and Outdoor Environments
While REQIP focused on healthy and safe indoor and outdoor environments, providing consultation on the indoor and outdoor environment, only two centers demonstrated "healthy, safe and clean indoor and outdoor environments." Centers were limited by their older buildings and by the expense of improving bathrooms and outdoor spaces. Several centers continue to work on this standard, and one center will soon move back into their extensively renovated space. REQIP was more successful in raising program awareness of the needed changes, and in

providing training to meet the item on working with children with special diets, allergies and feeding issues.

3A. Work Force Qualifications and Professional Development: Designated Program Administration Qualifications and PD
Most of the program administrators had the required BA and coursework, and had an IPDP (Individual Professional Development Plan) in place, at the start of REQIP.

3B. Work Force Qualifications and Professional Development (PD): Program Staff Qualifications and PD
This is a standard where most of the centers continue to work to meet the items. However, two centers have reached the goal of 50% of their educators holding BAs, and two centers brought their staff IPDPs in line with QRIS requirements.

4. Family and Community Engagement
Most of the centers met selected items on communication and community engagement at the start of REQIP; others improved in this standard through executive coaching from REQIP. REQIP also provided technical assistance to support two programs to implement the Massachusetts Strengthening Families Self-Assessment; three centers supported their educators' efforts to work directly with families to support children's learning at home through activities that build on the program's curriculum.

5A. Leadership, Management & Administration: Management & Administration and *5B. Leadership, Management & Administration: Supervision*
Most centers that remained in REQIP for two years met these items under this standard, with the exception of paid planning time for educators. In addition, the two centers that closed after the first year had significant challenges in this standard, which contributed to their closures.

Table 2. Analysis of PIP Items for Centers (N=8)

QRIS STANDARDS and ITEMS	N met item at initial PIP	N met item at final PIP	Total centers that met item
1A. Curriculum and Learning: Curriculum, Assessment, and Diversity			
PD in curriculum, screening and assessment (L2/L3)		7	7
Staff include parental input in the progress reports (L3)	7		7
Program uses assessment to set goals for individual children (L3)	3	2	5
Staff has received formal PD in the curriculum; MA Guidelines; documenting children's progress; and working with diverse children and children from diverse families (L3)	1	7	8
Staff demonstrate language and literacy skills and provide a model for children (L3)	4	2	6
1B. Curriculum and Learning: Teacher-Child Relationships and Interactions			
Staff engage children in meaningful conversations and support language development (L3)	2	5	7
Educators are provided with opportunities to use outside consultants to assist in implementing strategies that support positive relationships/interactions (L3)	3	5	8

Table 2. Analysis of PIP Items for Centers (N=8)			
QRIS STANDARDS and ITEMS	**N met item at initial PIP**	**N met item at final PIP**	**Total centers that met item**
2. Safe, Healthy Indoor and Outdoor Environments			
Demonstrates healthy, safe and clean indoor and outdoor environments (L2/L3)		2	2
Program, with parental consent, conducts health screenings (L3)	5	1	6
PD on how to work with children with special diets, allergies and feeding issues (L3)	3	4	7
3A. Work Force Qualifications and Professional Development: Designated Program Administration Qualifications and PD			
Administrator has a BA (L2/L3)	7		7
Administrator has IPDP (L2/L3)	6	1	7
Administrator has 9 college credits in administration, leadership and management (L3)	6		6
Has 24 credit hours in ECE, child development, education or SPED OR has a plan in place for credits (L3)	5	1	7
3B. Work Force Qualifications and Professional Development: Program Staff Qualifications and PD			
All educators have IPDP in-line with QRIS (L2/L3)	5	2	7
50% of FT educators have a BA (L2)	2	2	4
75% of FT educators have BA (L3)	1		1
4. Family and Community Engagement			
Program maintains ongoing communication with the school/early intervention program, CFCE grantee, mental health providers (L2)	7	1	8
Program participates in community events (L2)	7		7
Program completes Strengthening Families Self-Assessment and uses data (L2)	2	2	4
A daily two way communication system is available between the educators and families (L3)	7		7
Families are encouraged to volunteer in the program, to assist in the classroom (L3)	6	1	7
Program ensures that there are translators available, as needed, (L3)	5	1	6
Program participates in local community group (L3)	7		7
Program ensures young children and their families have access to developmental, mental health, health and nutrition services (L3)	6	1	7
REQIP Goal: educators work directly with families to support children's learning at home through activities that build on the program's curriculum		3	3
5A. Leadership, Management & Administration: Management & Administration			
Communication and updates on the program are provided to educators and families (L2)	6	1	7
Program has a written business plan (L2)	6		6
Program has a written admissions policy that promotes an awareness and respect (L2)	6	1	7
Staff are paid for planning time (L2)	4		4
Program tracks and monitors Absences, contacts families when absent more than 20% /month (L3)	7		7
Program has a quarterly review of accounting and bookkeeping by an independent party (L3)	6		6
Program director, staff and family evaluate program (L3)	5	1	6

Table 2. Analysis of PIP Items for Centers (N=8)			
QRIS STANDARDS and ITEMS	**N met item at initial PIP**	**N met item at final PIP**	**Total centers that met item**
Results of the annual survey used to develop program improvement plan (L3)	6		6
Program tracks and monitors teacher turn over and has plan for addressing turn over	6		6
5B. Leadership, Management & Administration: Supervision			
Annual Staff Evaluation (L2)	6		6
Feedback to staff monthly (L2)	6		6
Three types of communication monthly to communicate with educators (L3)	5	1	6
Educators receive at least one benefit (L3)	7		7
The program has a system to support the career development of staff through a career ladder (L3)	7		7
Staff are given feedback that give examples of best practice 2 times a month (L3)	7		7
Staff salary scales reflect the educational levels, experience and performance levels, as determined by evaluations (L3)	7		7

Family Child Care. We summarize below the results for the family child care system (FCC system), and the three FCC educators that participated in REQIP for two years. After participating in REQIP, one REQIP provider has attained Level 3 in the QRIS system, and a second provider is applying for review.

1A. Curriculum and Learning: Curriculum, Assessment, and Diversity

At the start of REQIP, the initial PIPs indicate that the FCC system, and the REQIP FCC educators, included parental input in the progress reports, and used assessments to set goals for individual children. However, FCC educators needed additional training on using the curriculum and assessments effectively; REQIP worked with the system to provide this training to most of the system educators, and provided coaching for the REQIP FCC educators. By the final PIP, two of the three REQIP FCC educators "demonstrate[d] language and literacy skills and provide[d] a model for children," meeting one of the QRIS items in this standard. In addition, REQIP provided training to all system educators on the Massachusetts Guidelines, documenting children's progress, and working with diverse children and children from diverse families. The QIP also contracted for training in Spanish on the online child assessment tool, *Teaching Strategies GOLD*, and coaching to REQIP FCC educators.

2. Safe, Healthy Indoor and Outdoor Environments

REQIP executive coaching supported the FCC system to develop an assessment form to monitor indoor and outdoor environments. By the final PIP, two of the three REQIP FCC educators were able to "Demonstrate healthy, safe and clean indoor and outdoor environments," and all three FCC educators offered health screenings. In addition, REQIP provided training on working with children with special diets, allergies and feeding issues for all educators in the FCC system.

3. Work Force Qualifications and Professional Development
REQIP executive coaching supported the FCC system to revise their IPDP form to be in line with QRIS requirements, and all three REQIP FCC educators had an up-to-date IPDP by the final PIP.

4. Family and Community Engagement
The FCC system provides opportunities for educators to coordinate with other providers in the system and share resources and to "have written collaborative agreements with EIA [early intervention agency], LEA [local educational agency], mental health, health, dental health, program health consultant, USDA Food and Nutrition program that specifics the responsibilities and duties of each entity in supporting children and families," meeting two items under this standard for FCC educators. Two of the REQIP educators began REQIP meeting several of the items addressing family and community engagement; the third REQIP provider met them after participating in REQIP.

B. Classroom Assessments

REQIP used Environmental Rating Scales assessments[1] to assess the quality of classroom and family child care practices. The QIP conducted assessments four times over the course of REQIP: mid-year and summer of Year One and Year Two. At each assessment, two to three classrooms in each center were observed, a preschool and an infant or toddler classroom, or, when that was not possible, two classrooms serving the same age group. When staffing and staff attrition allowed, the same classrooms were observed at multiple assessments. Each family child care program participating in REQIP was observed at each assessment.

Preschool classrooms

Table 3 presents the ECERS-R scores for preschool classrooms for Year 2: Summer 2015; each classroom is identified by the CQI stage of the program, as assessed at the beginning of REQIP.

By the end of Year 2, when centers had participated in REQIP for two years, all but one observed preschool classroom had a Space & Furnishings ECERS subscale score of 3.0 or higher; nine classrooms had scores of 4.0 or higher. All preschool classrooms had Language & Reasoning ECERS subscale scores of 3.0 or higher; seven out of 12 classrooms had Language & Reasoning ECERS subscale scores equal to 5.0 or higher. All observed classrooms had Parents & Staff ECERS subscale scores higher than 4.0.

QRIS Standards. To provide a benchmark for these scores, we compared them to QRIS standards. QRIS level is not determined solely by Environmental Rating Scales scores; however, Environmental Rating Scales scores are an important part of the QRIS system. For a program to move to a higher QRIS level, all of their classrooms must meet the specific Environmental

[1] The Environmental Rating Scales (ERS) used include the Early Childhood Environment Rating Scale-Revised (ECERS-R; Harms, Clifford, & Cryer, 1998) for preschool classrooms, the Infant/Toddler Environment Rating Scale (ITERS; Harms, Cryer, & Clifford, 1998) for infant and toddler classrooms, and the Family Child Care Environment Rating Scale, Revised Edition (FCCERS-R; Harms, Cryer, & Clifford, 2007) for family child care homes.

Rating Scales score requirements for a given level. With those caveats, we consider Table 3 again; ECERS scores that meet QRIS Level 2 items are shaded in blue, those that meet Level 3 are shaded in orange, and those that meet Level 4 are shaded in green.

It is important to note that classrooms may meet the QRIS Environmental Rating Scales items in one area but not in others. However, classrooms have to meet standards on all scales, and all classrooms must do so, for programs to advance in QRIS. Two classrooms (see Table 3) meet QRIS level 4 Environmental Rating Scales items on all subscales (all green-shaded cells); However, in Program 2, the second classroom meets QRIS level 3, but not level 4. Program 7 has two classrooms that meet QRIS level 3, but one classroom that does not meet QRIS level 2 (because the score on Interactions is lower than 3.0). Three programs (Programs 3, 4 and 6) meet QRIS level 2 Environmental Rating Scales items.

Table 3. Classroom ECERS-R Year 2: Summer 2015

Required ECERS-R Scores	Space & Furnishings	Personal Care	Language	Activities	Interactions	Program Structure	Parents & Staff
QRIS Level 2	2	2	3	3	3	3	2
QRIS Level 3	3	3	4	4	4	4	3
QRIS Level 4	4	4	5	5	5	5	4
Program 1, CQI 2	4.50	3.50	5.50	4.40	6.20	4.00	4.60
Program 2, CQI 2	5.75	4.00	5.00	5.60	6.00	5.75	6.16
Program 2, CQI 2	5.88	4.00	6.00	4.70	6.40	6.00	6.16
Program 3, CQI 2	5.16	2.33	3.75	3.33	3.20	3.33	6.66
Program 1, CQI 3	2.87	3.00	4.50	4.10	6.40	5.00	7.00
Program 1, CQI 3	3.25	2.00	3.25	4.80	3.00	3.33	7.00
Program 5, CQI 3	4.00	4.00	6.25	6.00	5.60	7.00	6.83
Program 6, CQI 3	4.50	2.33	5.50	3.70	4.40	3.66	6.00
Program 7, CQI 3	4.75	3.67	4.50	4.22	2.67	3.67	6.83
Program 7, CQI 3	3.87	4.60	5.50	4.22	6.40	4.33	6.83
Program 7, CQI 3	5.25	4.33	6.00	4.90	6.20	6.33	6.83
Program 8, CQI 4	5.00	3.33	4.25	5.20	4.00	6.66	6.33
N at QRIS Level 2	1	3	2	2	2	4	0
N at QRIS Level 3	2	4	3	7	2	2	0
N at QRIS Level 4	9	5	7	3	9	6	12

Infant & Toddler Classrooms

Table 4 presents the ITERS scores for infant and toddler classrooms for Year 2: Summer 2015, after two years in REQIP; each classroom is identified by the CQI stage of the program. All observed infant/toddler classrooms had Space & Furnishings, and Parents & Staff, ITERS subscale scores of 4.0 or higher. All but one infant or toddler classroom had Listening & Talking ITERS subscale scores of 4.0 or higher.

QRIS Standards. To provide a benchmark, we examined the data on Year 2: Summer 2015 ITERS scores relative to QRIS standards. As noted above, QRIS level is not determined solely by Environmental Rating Scales scores; however, Environmental Rating Scales scores are an important part of the QRIS system. In Table 4, ITERS scores that meet QRIS Level 2 standards are shaded in blue, those that meet Level 3 are shaded in orange, and those that meet Level 4 are shaded in green.

If we consider each ITERS scale separately, the majority of observed infant or toddler classrooms meet or exceed QRIS Level 3 on each subscale. However, classrooms have to meet standards on all scales for programs to advance in QRIS. One program has an infant or toddler classroom that meets or exceeds the Environmental Rating Scales requirements for QRIS Level 4 (no white-, orange- or blue-shaded scores) on all ITERS scales. An additional two programs have at least one classroom that meets or exceeds the Environmental Rating Scales requirements for QRIS Level 3 (only orange- and green-shaded cells). One of these programs (Program 6) has a second classroom that only meets QRIS Level 2 on the Activities subscale, even though it meets Level 3 or 4 on the other subscales.

Table 4. Classroom ITERS scores Year 2: Summer 2015

	Space & Furnishings	Personal Care	Listening & Talking	Activities	Interactions	Program Structure	Parents & Staff
QRIS Level 2	2	2	3	3	3	3	2
QRIS Level 3	3	3	4	4	4	4	3
QRIS Level 4	4	4	5	5	5	5	4
CQI 2, Program 2	4.00	2.33	4.33	3.22	4.00	2.25	5.57
CQI 3, Program 3	6.20	4.17	6.66	6.00	6.25	4.33	6.00
CQI 3, Program 4	4.40	2.50	6.00	5.33	7.00	4.50	6.43
CQI 3, Program 4	4.20	4.50	6.33	4.37	6.25	6.33	6.43
CQI 3, Program 5	4.20	2.33	3.66	3.22	4.00	1.75	5.71
CQI 3, Program 6	5.40	5.33	4.33	3.86	6.00	6.66	6.57
CQI 3, Program 6	6.00	4.66	5.00	4.44	5.75	5.00	6.57
CQI 4, Program 7	5.00	5.66	6.00	5.66	6.75	7.00	6.29
N at Level 2	0	0	2	2	2	2	0
N at Level 3	0	3	1	3	0	0	0
N at Level 4	8	5	5	3	6	4	8

Improvements in Environmental Rating Scales scores over the course of REQIP

In this section, we examine changes in Environmental Rating Scales scores from mid-year Year 1 to summer Year 2. We have limited these analyses to those classrooms and teachers that were observed at both time points, so that we are comparing apples to apples, rather than apples to oranges. When we conducted Year 2 observations, our priority was to observe in the same

classrooms observed in Year 1, because our work with educators included bringing the classroom physical environment into compliance. However, when we scheduled Year 2 observations, we found that, in some programs, educators had left the centers or moved to other classrooms and, sometimes, to other age groups. In addition, one center had merged with another center, creating all new classrooms.

Preschool classrooms. Table 5 presents the average change in ECERS scores over three different time periods: Year One (from mid-year 2014 to summer 2014); Year Two (from mid-year 2015 to summer 2015); and over the two years, from mid-year 2014 to summer 2015. We see interesting patterns of change in ECERS scores in the preschool classrooms. In Year One (2013-2014), we see an average change of more than one-half a point on the total ECERS 7-point scale. The greatest average change scores are on Space & Furnishings, Interactions and Program Structure. In the second year (2014-2015), we see a similar pattern of change, with an average change of one-half of a point on the total ECERS 7-point scale. The greatest average change scores are on Space & Furnishings, and Activities. Among those seven teachers observed both at mid-year 2014 and at the summer 2015 observations, we see an average change of .74 points on the Total ECERS score, with the greatest changes in Space & Furnishings, Language-Reasoning, Interactions and Program Structure.

Table 5. Average Change in Scores, Among Teachers Observed at T1 and T2

T1	T2	N Teachers	Total ECERS	Space & Furnishings	Personal Care	Language-Reasoning	Activities	Interactions	Program Structure	Parents & Staff
Mid14	End14	9	0.61	1.19	0.59	0.39	0.47	0.78	0.92	0.21
Mid15	End15	10	0.54	0.91	0.46	0.13	0.85	0.33	0.42	0.34
Mid14	End15	7	0.74	1.02	0.54	0.71	0.74	1.31	0.98	0.14

When we consider change among individual teachers, we see that change is widespread (see Figure 3). In the first year (Mid14 and End14 observations), six of the nine teachers showed improvements in total ECERS scores over the year. In the second year (Mid15 and End15 observations), eight of the 10 teachers showed improvement in total ECERS scores over the year, and a 9th teacher had scores over 5.0 at both observations, an increase over their scores in Year One (Program 2, Teacher 2).

Infant and toddler classrooms. Table 6 presents the average change in ITERS scores over three different time periods: Year One (from mid-year 2014 to summer 2014); Year Two (from mid-year 2015 to summer 2015); and over the two years, from mid-year 2014 to summer 2015.

In Year One (2013-2014), we see an average change of more than one-half a point on the total ITERS 7-point scale. The greatest average change scores are on Space & Furnishings, Personal Care and Activities. In the second year (2014-2015), we see minimal change in the Total ITERS score, but change of 0.88 on Personal Care and 0.48 on Activities. Among the three teachers observed both at mid-year 2014 and at the summer 2015 observations, we see an average change of .81 points on the Total ITERS score, with the greatest changes in Space & Furnishings, Personal Care and Activities. The low change scores in Year Two, combined with the high

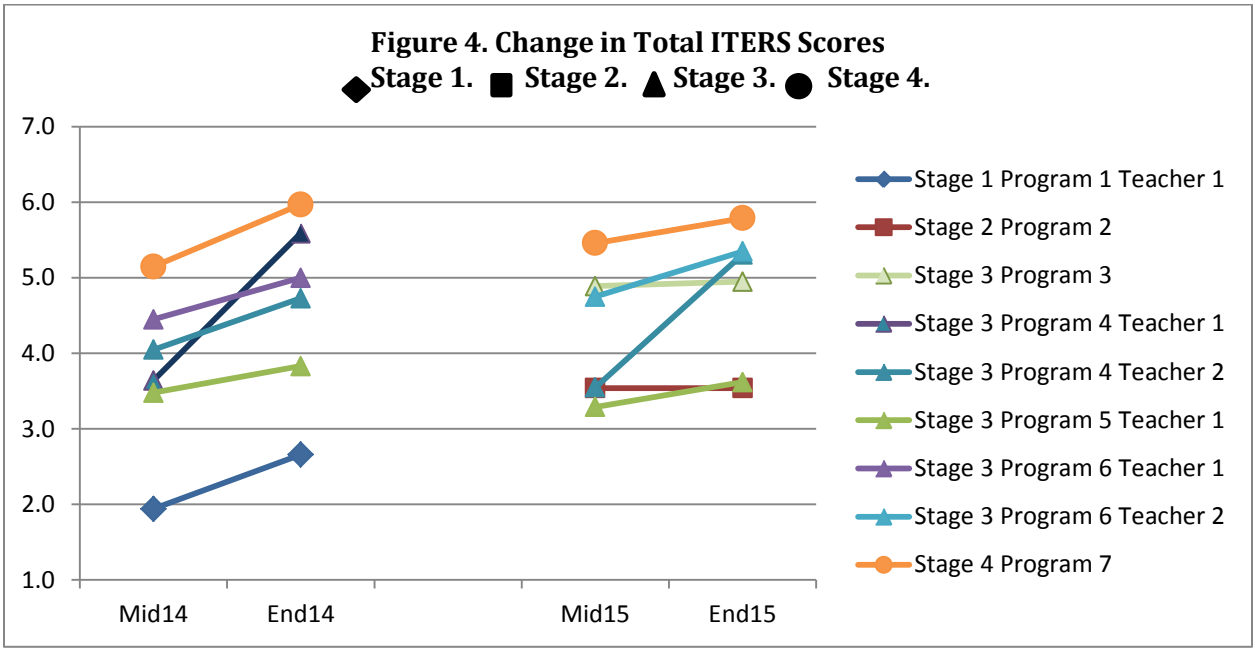
change scores in Year One and among educators who participated in both years, raises the question of the role of turnover, or of the importance of individual educators training and skills.

Table 6. Average Change in ITERS Scores, Among Teachers Observed at T1 and T2

T1	T2	N Teachers	Total ITERS	Space & Furnishings	Personal Care	Listening & Talking	Activities	Interactions	Program Structure	Parents & Staff
Mid14	End14	8	0.65	1.55	0.83	0.50	0.68	0.25	(0.17)	0.27
Mid15	End15	7	0.03	0.20	0.88	(0.43)	0.48	(0.29)	(0.13)	(0.23)
Mid14	End15	3	0.81	1.00	1.06	0.78	1.24	0.83	0.61	0.10

When we consider change among individual teachers, we see that change is widespread (see Figure 4). In the first year (Mid14 and End14 observations), all six of the teachers showed improvements in total ITERS scores over the year. In the second year (Mid15 and End15 observations), four of the six teachers showed improvement in total ITERS scores over the year, and a 5th teacher had scores just under 5.0 at both observations (Program 3). The three teachers with scores in both years are Program 4, Teacher 2; Program 5, Teacher 1 and Program 7 (the CQI Stage 4 program).

Figure 4. Change in Total ITERS Scores



Family Child Care Educators. Table 7 presents the average change in FCCERS scores over two different time periods: Year One (from mid-year 2014 to summer 2014); and over the two years, from mid-year 2014 to summer 2015.

In Year One (2013-2014), we see an average change of only 0.21 points on the total FCCERS 7-point scale. However, among the three educators who remained in REQIP for both years and observed both at mid-year 2014 and at the summer 2015 observations, we see an average change of 2.30 points on the Total FCCERS score, with the greatest changes in Personal Care, Listening & Talking, Activities and Program Structure. As with the infant/toddler teachers, those

educators who complete two years in REQIP show the greatest gains; however, those educators who stay for two years also reflect those with the personal, organizational and community resources needed to stay in the early care and education field.

Table 7. Average Change in FCCERS Scores

T1	T2	N Educators	Total ITERS	Space & Furnishings	Personal Care	Listening & Talking	Activities	Interactions	Program Structure	Parents & Provider
Mid14	End14	4	0.21	1.29	1.13	0.00	0.30	(0.12)	(1.67)	0.19
Mid14	End15	3	2.30	1.84	3.29	2.17	2.80	1.33	2.89	0.42

C. Child Outcomes

We gathered child assessment data on children participating in the pilot programs. The QIP tested children in Stage 1 and Stage 2 programs in the winter (late November, early December 2014) and again 6-7 months later, in the summer of 2015 (on average, children were tested 6.7 months later). For preschool-age children in centers, we used The Peabody Picture Vocabulary Test, Fourth Edition (PPVT-4; Dunn & Dunn, 2007), which measures oral vocabulary knowledge in children and provides an important indicator of children's school readiness. For children in family child care homes, and for toddlers in center care, we used The Preschool Language Scales, Fifth Edition (PLS-5; Zimmerman, Steiner, Pond, 2014) which is a comprehensive developmental language assessment that measures both receptive and expressive language in both English and Spanish. We present the results by CQI stage.

Preschool children in centers. Table 8 presents the results on the PPVT for preschool children in centers. At the time of the winter testing, the mean age of children in the Stage 1 program was 42.5 months (3 years, 6 months); the mean age of children in the Stage 2 programs was 51.1 months (4 years, 3 months). In the Stage 1 program, PPVT age equivalent scores were, on average, 3.5 months behind the child's chronological age. In the Stage 2 programs, the PPVT age equivalent score were, on average, 4 months behind the child's chronological age. Children in Stage 1 and Stage 2 programs started out at a developmental disadvantage, relative to their national peers.

Table 8. Mean (SD) PPVT Age-equivalent Scores for Children Enrolled in Stage 1 and Stage 2 Programs. All ages in months.

Stage	N children	Mean (SD) Chronological Age Nov.2014	Mean (SD) PPVT Age Equivalent Nov.2014	Mean (SD) Lag in Nov.2014 PPVT performance	Mean (SD) PPVT Age Equivalent Summer 2015	Mean (SD) Improvement in PPVT Age over 6.7 months
1	11	42.5 (6.0)	39.0 (10.4)	-3.5 months (8.7)	45.6 (11.8)	6.6 months (8.5)
2	31	51.1 (6.5)	47.5 (13.6)	- 4 months (13.0)	59.1 (13.9)	11.7 months (8.3)

When the children were tested again in the summer, on average 6.7 months later, the PPVT age-equivalent scores of the children in the Stage 1 program had improved by 6.6 months. In other words, the children in the Stage 1 program showed appropriate developmental progress between the first and second assessments. Teachers were able to maintain children's developmental growth, but were not able to provide an intervention that could close the achievement gap for these children. As we saw above, the Stage 1 program showed no improvement in classroom practices, and was required to close by the end of the pilot because of poor management.

In contrast, we found that preschool children in the Stage 2 programs showed progress beyond that expected because of their own development, increasing their PPVT age-equivalent scores by almost 12 months, over a 6.7 month time period. By the summer of that school year, the mean PPVT age-equivalent scores were comparable to the children's mean chronological age.

However, when we examine the scores of individual children, we can see that not all children had caught up to their chronological age peers (data not shown). For example, among Stage 2 children, 14 out of the 31 children had PPVT Age-Equivalent scores in the summer that lagged behind their chronological age - but among these 14 children, 8 had experienced improvements in PPVT equivalent age scores greater than the 6.7 months expected because of chronological development. Even for children who continue to lag behind their age-peers, the Stage 2 programs were able to foster important gains.

In the family child care homes and toddler classrooms in centers, we used the PLS-5 assessment of children's receptive language. In the toddler classrooms, most children aged out of the toddler classrooms into the preschool classrooms in their centers between the fall and summer assessments, so we are not able to analyze change in toddler PLS-5 scores. Ten FCC children were assessed in the fall and summer, with six months between the two assessments. We found that two of the FCC children showed increases in their age-equivalent PLS-5 scores, which would be expected based on typical developmental gains. However, six of the 10 FCC children assessed showed gains in their PLS-5 age-equivalent scores of more than the 6 months, indicating development beyond that expected based on the child's development.

III. Cost of Implementing REQIP Pilot

The costs associated with implementing the REQIP Pilot can be allocated to the following categories: 1. Start-up costs; 2. Evaluation costs; 3. Administrative activities; 4. QIP activities; and 5. Technical assistance costs.

1. Start-up costs

Start-up costs for REQIP included the costs of initial planning, of identifying and recruiting programs and educators, and of identifying and selecting technical assistance providers. These activities, from June – December 2013, cost $66,900 (direct labor costs, including fringe benefits, but not including indirect costs, travel or other direct costs).

2. Evaluation costs

Evaluation costs included conducting child assessments, conducting classroom Environmental Rating Scales assessments, completing analyses and preparing reports from the Wellesley Centers for Women (WCW) team. The costs for the evaluation conducted by the WCW team were $127,847 in direct labor costs, including fringe benefits. In addition, evaluation costs also included the time contributed by the programs in facilitating assessments, and by the TAPs in documenting their activities; these costs are not included in this report.

3. Administrative activities

Administrative activities included meetings with Thrive in 5, funders, and associated activities; communications with United Way with respect to payment of TAP invoices; meetings and communications with team members at WCW; and grants management activities. The administrative costs for the WCW team were $44,260 in direct labor costs, including fringe benefits.

4. QIP activities

The QIP is central to the REQIP model, responsible for working with programs and educators to identify needed technical assistance and prepare PIPs, identifying technical assistance providers (TAPs) who can meet those needs, matching programs/educators and TAPs, and then providing ongoing support to programs, educators and TAPs. The costs to develop the PIPs and revise them throughout REQIP were $26,291; the costs for all other QIP work were $36,406. Total QIP costs were $62,698.

5. Technical assistance costs

Over the two years of REQIP, the total expenses for technical assistance for centers was $150,508; in addition, REQIP expenses included $17,698 for Teaching Strategies curriculum materials and $4,555 for other materials. The total expenses for technical assistance for FCC educators and the FCC system was $47,174; in addition, REQIP expenses included $685 for

Teaching Strategies curriculum materials. The QIP and TAPs provided technical assistance to FCCs to generate grant awards to cover expenses for other materials.

Technical assistance costs are presented in Table 9, below, by CQI stage of the program at the beginning of REQIP. The average costs for programs at CQI Stage 2 were $17,212 in TA costs, $1,783 for Teaching Strategies curriculum materials, and $54 for other materials. The average costs for programs at CQI Stage 3 were slightly lower, with TA costs of $15,854 and Teaching Strategies curriculum materials costs of $1,014. However, there is a considerable range in costs among programs in each stage; the driver of TA costs for stage 2 and 3 programs is not CQI stage but rather the particular needs of the program. Similarly, the TA costs for the Stage 4 program are considerably lower than the average TA costs for Stage 2 and 3 programs, reflecting the fact that the Stage 4 program needed less TA.

Table 9. TA expenses per program, by CQI stage

Costs	CQI Stage	TA Costs	Curriculum Costs	Materials Costs
Average Costs (2 programs)	1	13,151	3,199	2,197
Range of Costs	1	12,605-13,697	2,269-4,128	0-4,393
Average Costs (3 programs)	2	17,212	1,783	54
Range of Costs	2	9,801-22,809	229-2,691	0-161
Average Costs (4 programs)	3	15,854	1,014	
Range of Costs	3	9,832-26,219	0-3,676	
Costs (1 program)	4	9,152	1,895	
FCC System	2	19,509	185	-
Average Costs (3 educators*)	2	8,125	100	
Range in Costs	2	5,375-10,400	100	

The two Stage 1 programs both closed before the end of REQIP; the average costs of $13,151 are, therefore, for a shorter time period than the average costs for programs at other CQI stages. In addition, REQIP provided materials valued at $4,393 to one of these programs. Given the fact that these investments were not sufficient to keep these programs open, let alone improve their quality or implement CQI, we do not recommend that programs at Stage 1 be included in interventions such as REQIP, whose goal is the implementation of CQI. These programs would benefit, instead, from interventions that focus on administration, management and leadership, to stabilize the programs and create the financial conditions necessary for programs to invest in qualified staff and in CQI models.

Figure 5 presents the costs for centers, by type of technical assistance. Training accounts for 44% of the costs of technical assistance for centers, and coaching for 29% of the costs. While coaching is labor intensive, compared to training, the hourly rates of coaches were typically lower than the hourly rates of trainers. In addition, in the REQIP model, training was a

necessary precursor to coaching, and the PIPs, drawing from the Massachusetts QRIS items, required training on a variety of topics. REQIP coaching was focused on literacy and language, and on general curriculum and assessments, to support the goals of improved classroom practices and implementation of CQI.

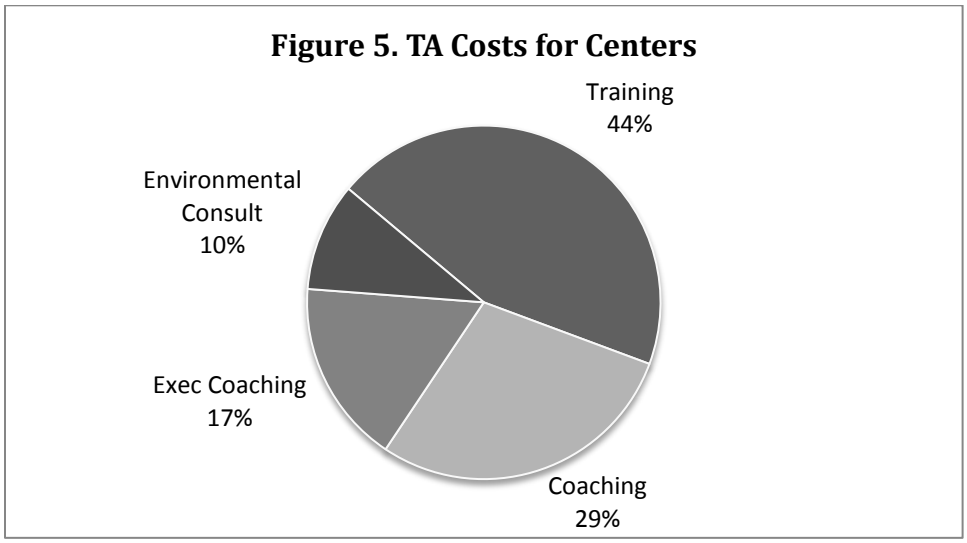
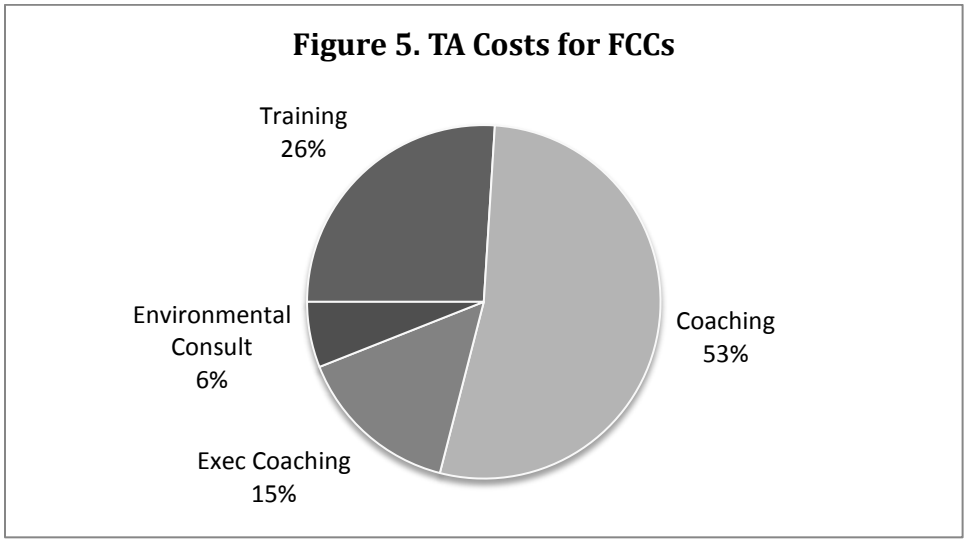


Figure 6 presents the costs for the family child care system and the REQIP family child care educators, by type of technical assistance. Training accounts for 26% of the costs of technical assistance for FCCs, and coaching for 53% of the costs. REQIP used coaching more heavily in FCC homes because all FCC educators were at CQI Stage 2, and needed technical assistance that addressed general curriculum practices, prior to moving to training and coaching on assessments and CQI.



IV. REQIP: Lessons Learned and Recommendations

Over the course of Ready Educators Quality Improvement Pilot, we have learned important lessons about factors necessary for a successful implementation. We tested each of these lessons as we went, adapting our practices, reviewing feedback, and evaluating our effectiveness. These are the most important lessons we learned:

1. Trajectory of Development of Continuous Quality Improvement. From the beginning of REQIP, the limited availability of child assessment data – critical for fully implementing the CQI model – has been a challenge. While the majority of Boston programs report conducting child assessments, these assessments are used primarily to screen for children in need of referrals for additional services. Among those programs that collected data that could potentially be used for CQI, we found that directors and educators were unsure how to use that data to inform practice. This led to recognition of the different stages through which programs progress in developing the capacity to effectively use child (and program) assessments to improve practice, and thereby improve child outcomes (see Figure 1, above). The PIPs were structured to identify the technical assistance needed to support program advancement through these stages by recognizing a sequence of technical assistance: beginning with training and coaching on child development, developmentally-appropriate practice, and curriculum (stage 1); followed by training and coaching on conducting child assessments (stage 2); training and coaching on how to use assessments to inform practice (stage 3); and ending with training and coaching on CQI (stage 4).

2. Programs Must Be Ready to Change. One of the most important lessons learned which will impact the scalability of the model, is that some programs are not ready to participate in REQIP. The two Stage 1 programs closed due to management issues and licensing violations. In moving forward, it is clear that the REQIP model should be utilized for those programs that are at Stage 2 or later of the Trajectory of Change: Ready for training and coaching on child assessments. Programs at Stage 1 also need technical assistance to get to Stage 2 but the intensity of that effort requires a higher level of resources than the REQIP model provides. Given the fact that the REQIP investments were not sufficient to keep these programs open, let alone improve their quality or implement CQI, we do not recommend that programs at Stage 1 be included in interventions such as REQIP, whose goal is the implementation of CQI. These programs would benefit, instead, from interventions that focus on administration, management and leadership, to stabilize the programs and create the financial conditions necessary for programs to invest in qualified staff and in CQI models.

3. Alignment of REQIP with State QRIS. While the REQIP theory of change posits that CQI is the heart of ongoing program quality improvement, we recognized from the start that CQI operates in the context of a policy framework in Massachusetts, exemplified by those factors that are part of the State's Quality Rating and Improvement System (QRIS). Therefore, we developed a template for Program Improvement Plans (PIP) that uses the QRIS framework to collect, organize and communicate a program's level of quality and areas needing improvement. The added benefit of this framework was the extent to which it motivated programs to participate

in the Pilot, along with the availability of technical assistance already aligned to the QRIS framework.

4. Technical assistance needs to be comprehensive, matched to program needs, and accessible. The REQIP approach to technical assistance is grounded in research on effective innovations. While the REQIP model focuses on CQI – continuous quality improvement – the Trajectory of Change recognizes that CQI requires two precursors: an understanding of child development, and the knowledge and skills to implement best practices in early care and education. However, CQI and its precursors cannot flourish in a vacuum; such innovative practices require capacities at the individual educator level, as well as at the organizational and community levels. At the educator level, educators with training and experience are more likely to have the capacity to implement high quality practices, such as CQI.

REQIP provided two types of professional development for ECE educators: training and classroom coaching. While training in specific practices is important to the implementation of best practices, coaching is also necessary to support the skill-development among individual educators. In addition, REQIP provided technical assistance with classroom environments and curriculum materials, necessary tools to support the educators.

To ensure that this technical assistance was accessible for educators in low-income communities, we worked with TAPs to offer training and coaching on-site – at the program or family child care home, during hours that were compatible with educators' schedules, such as program- or FCC system-scheduled professional development days, with substitute teachers available.

5. A Systemic Approach is Needed. A system approach includes thinking at the organizational level (the program or FCC system), as well as thinking about the larger community in which programs and educators are located. At the organizational level, organizations that have funding available to support more than basic operations, and have effective leadership that buys in to the innovation, are more likely to be able to support best practices of their educators (Greenhalgh, et al., 2004). We found that several programs lacked adequate materials and resources to support quality instruction, creating environmental challenges that were not factored into the model's original design. This led the QIP to incorporate leveraging of external funds, combined with Technical Assistance Provider (TAP) services, to support environmental changes necessary to foster quality programs. Other programs faced challenges with organizational structure and administrative policies that undermined program capacity for improvement. This led the QIP to incorporate a systemic approach to change, with consulting services to center directors and family child care system administrators to improve their capacity to supervise and support educators in the CQI process.

At the community level, the REQIP model requires TAPs who can provide the technical assistance needed by programs. While we found many excellent TAPs for REQIP, we also found that the current system of technical assistance faces many challenges. TAPs are funded either by government contracts or by fee-for-service work. Government contracts are for specific

services to particular clients; when these align with the needs of specific programs and educators, this is an important source of funding. However, when contracts are limited – in scope or in capacity – the TA provided is also limited. Within these TAP organizations, and others not receiving government contracts, many of the individual technical assistance providers are working on a fee-for-service basis, which means that many work for multiple TAP organizations, or hold other "day jobs" – this limits their capacity and availability.

In addition, effective innovation is aided by a policy environment that supports the innovation (Greenhalgh, et al., 2004), such as QRIS policies in ECE, and the mayor's office's provision of funding for materials for ECE programs and educators. Finally, implementation of an innovation is more likely when the change agent – in REQIP, the Quality Improvement Partner (QIP) – is able to facilitate connections among organizations (Greenhalgh, et al., 2004), such as between ECE programs and technical assistance providers, as well as potential funders. REQIP aligned the program improvement plans (PIPs) with the Massachusetts QRIS standards, to support program and educator buy-in and potentially leverage funding. In addition, the QIP identified effective technical assistance providers and organizations, and supported the matching of these resources with individual program and educator needs.

6. Turnover is a serious problem. As Greenhalgh and colleagues (2004), observe, low turnover is important to maintain the implementation of quality practices. We found considerable turnover among educators and administrators. Administrative turnover could affect stability, while educator turnover affected the maintenance of improvements in practices, as new educators needed to participate in training and receive coaching. In the short-run, any intervention needs to recognize that technical assistance needs to be on-going, and to incorporate new educators, as well as provide refreshers to continuing educators. In the long run, the early care and education system needs to be funded in ways that allow educators to make the salaries and experience the working conditions that reduce turnover, as well as maintain stable organizations that can continue to employ educators.

7. REQIP Contributed to Program Improvement. We found strong evidence of program improvement, as measured by program level data from the PIPs, classroom observations using the Environmental Rating Scales family of measures (ECERS, ITERS, FCCERS), and child outcomes. At the program level, we saw improvements in curriculum and learning, and in family and community engagement. At the classroom level, we saw improvements on all subscales of the ECERS, ITERS and FCCRS among programs and educators that stayed in REQIP for two years. At the child outcomes level, we found that preschool-age children in CQI Stage 2 programs started the school year at a developmental disadvantage, relative to their national peers, but by the end of the year eight out of 14 had caught up to age norms, and others had made significant improvement. Among family child care children, six out of 10 had shown gains beyond those expected based solely on developmental maturation.

8. Does CQI support quality early care and education? While REQIP clearly contributed to improved quality in the programs and family child care homes, REQIP was a comprehensive intervention that addressed programs and educators where they were on the trajectory of

change, with TA that addressed curriculum, as well as assessments and using assessments for CQI. The question remains whether CQI was an important factor in the improvements we saw. As Caronongan and colleagues (2015, pg. 12) note, "Recent literature reviews on the use of data for continuous quality improvement and assessment to individualize instruction in ECE settings similarly concluded that the research base in this area is underdeveloped (Akers et al., 2014; Derrick-Mills et al., 2014)."

One of the challenges with comprehensive interventions, such as REQIP, is that it is difficult to isolate the effects of any one component, such as training and coaching on CQI. In part, this is because high quality programs do everything at once – they have highly educated and trained educators in their classrooms or family child care homes, they have strong leadership and effective management and administration, and they have practice models that include best practices in their curriculum, as well as the use of child assessments to individualize classroom practices and contribute to continuous quality improvement. In addition, the REQIP model combined several innovative features – CQI, a central QIP to coordinate needs assessments and matching of TAPs, and the inclusion of coaching, executive coaching and environmental consulting with more traditional training as part of the available technical assistance.

While we cannot address the unique contributions of CQI, we can say that, in combination with these other features of REQIP, working with programs and FCC educators serving low-income, at-risk communities, in a policy environment that is supportive of these efforts, REQIP was able to make important improvements in program practices, and contribute to better outcomes for children enrolled in programs that were at Stage 2 or higher on the trajectory of change.

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Appendix: Classroom Assessments

Early Childhood Environment Rating Scale-Revised (ECERS-R)

The ECERS has been widely used for a number of years in the assessment of early childhood education environments. This 43-item scale is a rating of the resources available in an early childhood program, the teachers' use of these resources, and the teachers' interactions with the children. It is comprised of seven sub-scales that include Space & Furnishings, Personal Care Routines, Language-Reasoning, Activities, Interaction, Program Structure and Parents & Staff. Each scale consists of multiple items that must be passed to receive a given score. Each scale is scored on a seven-point scale, with benchmarks established for 1 = "Inadequate", 3 = "Minimal", 5 = "Good", and 7 = "Excellent". Programs that pass some of the items that are part of the items needed for a "3", but not all of them, are scored a "2" on that scale. Similarly, programs that fall between "Minimal" and "Good" are scored a "4", and programs that fall between "Good" and "Excellent" are scored a "6".

The Infant/Toddler Environment Rating Scale-Revised (ITERS-R)

The ITERS-R is a 39-item scale designed to be used to assess center-based infant and toddler care, and is similar to the ECERS in format. The ITERS-R is organized into seven scales: Space and Furnishings, Personal Care Routines, Listening and Talking, Activities, Interactions, Program Structure, and Parents and Staff.

The Family Child Care Environment Rating Scale-Revised (FCCERS-R)

The FCCERS-R, formerly known as the Family Day Care Rating Scale (FDCRS, 1989), was revised in 2007, based on current research, a content comparison of the original FDCRS with other assessments designed for similar age groups and settings, and additional tools describing family child care quality, and feedback from FDCRS users.

The FCCERS-R is a 38-item scale designed to be used to assess family child care homes, and is similar to the ECERS and ITERS in format. The FCCERS-R is organized into seven subscales: Space and Furnishings, Personal Care Routines, Listening and Talking, Activities, Interaction, Program Structure, and Parents and Provider. Since many family child care homes enroll children of multiple ages, the scale assesses programs serving children from birth through school-agers, up to 12 years of age, to determine the quality of care provided to each child's health and safety, cognitive and social emotional needs.