December 1, 2012

Dear Gov. Perry, Lt. Gov. Dewhurst, Speaker Straus, Chairman Patrick, Chairman Pitts, Chairman Williams, Sen. Zaffirini, Commissioner Williams, Members of the Legislative Budget Board, and Members of the Texas Legislature:

Since our inception as the Center for Improving the Readiness of Children for Learning and Education (CIRCLE), the Children's Learning Institute (CLI) at The University of Texas Health Science Center at Houston has developed and implemented the Texas School Ready! (TSR!) Project has served over 350,000 at-risk children.

The Children's Learning Institute is unique in the range of research and programs represented and its philosophical commitment to ensuring real and lasting change for young children and families. Since 2005, CLI has received over \$150 million dollars in competitive research grants to study and implement various approaches to child development and played a critical role in reforming how early childhood educational practice supports school readiness. None of this would have been possible without the support and leadership of the Texas Executive and Legislative branches.

It is with great pleasure that I share with you some exciting results pertaining to the *Texas School Ready! Project*, for FY 2013. The *Texas School Ready! Project* is the result of ten years of grant funded work from the Institute of Education Sciences (IES), National Institutes of Health (NIH), United States Department of Education (USDOE), the Texas Education Agency (TEA) and the Texas Workforce Commission (TWC) to prioritize "school readiness" for vulnerable children in Texas. Pursuant to Section 29.160, subsection (e), of Senate Bill 76 of the 78th Legislative Session, and House Bill 1, General Appropriations Act, Article III Rider No. 41 and Article VII Rider 27 of the 81<sup>st</sup> Legislative session, the Children's Learning Institute is pleased to present the following annual report for your review: *The Texas School Ready! Project*: Preparing Young Texans to Learn.

Should you have any questions about the details contained in this report, please contact my Director of State Initiatives, Dr. John Gasko at 713.500.3245 or <a href="mailto:John.W.Gasko@uth.tmc.edu">John.W.Gasko@uth.tmc.edu</a>. Additionally, please do not hesitate to call on me at anytime.

Sincerely,

Susan H. Landry, Ph.D.

Executive Director

Michael Matthew Knight Memorial Professor

Albert and Margaret Alkek Endowed Chair in Early Childhood

Su a Handry



#### Learning from science.

#### CLI Accomplishments

Designated the **State**Center for Early
Childhood
Development by
Governor Rick Perry

Serving **40,000 at-risk children** statewide through the Texas School Ready! Project (TSR!) in FY 2013.

Leading Institute at UT
Health Science Center at
Houston in securing
competitive grants,
such as National Institute
of Health funding;
received \$88 million in
federal grants and \$98
million in state and
private grants since 2005

Developed and successfully implementing one of the nation's first research-based quality improvement model for family child care.

Established the **Dan L. Duncan Children's Neurodevelopmental Clinic** in 2008

Collaborated with researchers and educators from around the nation to revise and update the Texas Pre-Kindergarten Guidelines, 2008

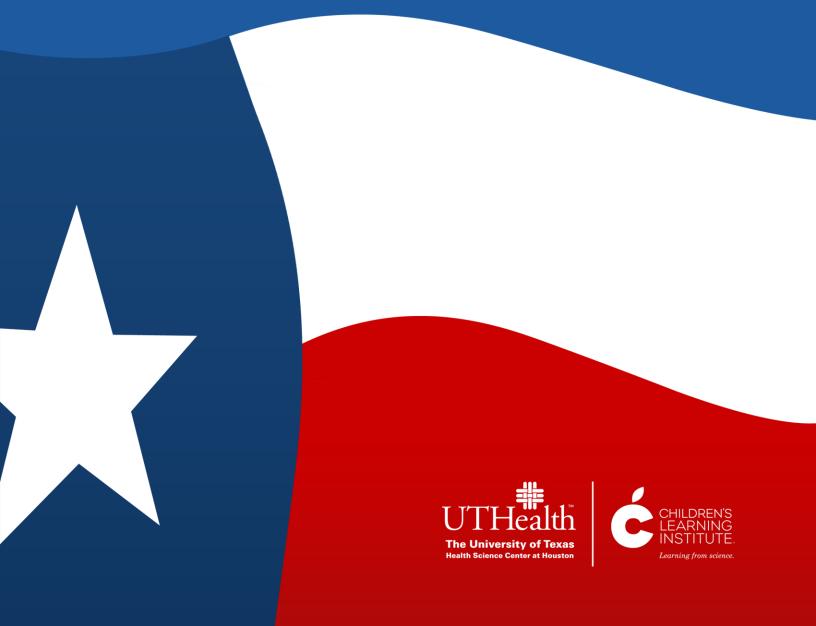
Nationally recognized for advancing research in brain behavior. CLI's neuroscience lab is a leader in the

is a leader in the development of new techniques for imaging young children with learning problems.



# The Texas School Ready! Project: Preparing Young Texans to Learn

Fiscal Year 2012



#### **Table of Contents**

Texas School Ready! Project (TSR!)
Project Improvements and Innovations4
Future Project Goals6
Appendix 1: Texas School Ready! Project: Statewide Grantees
Appendix 2: Children's Learning Institute: FY 2012 Financial Expenditures
Appendix 3: Texas School Ready! Project Results: Child Progress Monitoring
<b>Appendix 4:</b> Texas School Ready! Project Instructional Improvement: Performance Measurement
Appendix 5: Texas School Ready! Project: Research Summary from the Journal of Educational

**Appendix 6:** An experimental study evaluating professional development activities within a state funded pre-kindergarten program. Research paper published in Reading and

Writing: An Interdisciplinary Journal, 24(8). September, 2011.

Psychology

Pursuant to Texas Education Code, Subchapter E, Section 29.160 (e) and Senate Bill 1, General Appropriations Act, Article III, Education, Texas Education Agency Rider No. 41 and Article VII, Business and Economic Development, Texas Workforce Commission Rider No. 27 of the 81<sup>st</sup> Legislative Session, the Children's Learning Institute at the University of Texas Health Science Center at Houston is pleased to present the following report:

#### The Texas School Ready! Project: Preparing Young Texans to Learn

#### **Introduction and Overview**

The *Texas School Ready! Project* is the result of ten years of grant funded work from the Institute of Education Sciences (IES), National Institutes of Health (NIH), United States Department of Education (USDOE), the Texas Education Agency (TEA) and the Texas Workforce Commission (TWC) to prioritize "school readiness" for disadvantaged children in Texas. The *Texas Early Education Model (TEEM)*, the original initiative associated with this project, was developed to ensure this priority is realized throughout the state through a focus on increasing children's school readiness through research-based curriculum, classroom resources, technology-driven child progress monitoring, teacher/staff professional development with mentoring, and program evaluation. The project integrates public school programs with federal Head Start programs and community-based child care (including for-profit, non-profit, faith-based and federally subsidized settings) in order to support the school readiness of at-risk 3 and 4 year-old children.

The *Texas School Ready! Project* is driven by the following assumptions:

- Early childhood is a critical period for building school readiness skills in language, literacy, mathematics, social, emotional and cognitive development.
- Cognitive readiness can be achieved in ways that support the whole child.
- Research-based, comprehensive curricula are essential classroom tools.
- Responsive teaching promotes social and cognitive development.
- Progress monitoring linked to changes in instruction better assures school readiness.
- Effective professional development with on-going mentoring for teachers assures goals are achieved.

Working with these assumptions, and through the implementation and sustainability of quality programs, the *Texas School Ready! Project* strives to ensure that disadvantaged children arrive at kindergarten well prepared and ready to succeed.

### Texas School Ready! Project (TSR!)

We know that literacy is a prerequisite to full participation in American society. Historically speaking, throughout the nation and particularly in Texas, young children from disadvantaged backgrounds read and write at levels so low when they enter school that they become at-risk for educational failure. As a result, achievement gaps between at-risk and non-at-risk student populations start early and, as history suggests, continue throughout the course of many of these students' education experiences.

Historically speaking, throughout the nation and particularly in Texas, young children from disadvantaged backgrounds read and write at levels so low when they enter school that they become at-risk for educational failure.

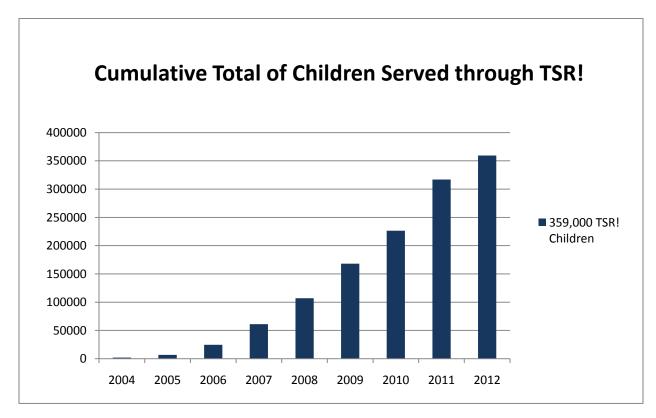
The *Texas School Ready! Project* was developed and implemented to meet this reality head-on and find community-based solutions to inequitable levels of school readiness. Since 2003, when TEFM we

inequitable levels of school readiness. Since 2003, when TEEM was initially piloted statewide, local communities have advanced substantially toward collaborative efforts to address the need to effectively prepare children for school success.



#### Growth

Since the project began, communities across the state have responded by rethinking the way they prepare their youngest Texans for school. Community-based partnerships have been developed and required to implement coherent, comprehensive, cost-conscious and scientifically research-based approaches toward school readiness. In Fiscal Year 2004, the first year of the project, there were 11 community-based grantees throughout the state serving 2,140 children. In Fiscal Year 2012, through a combination of TEA Rider 41 and TWC Rider 27 funding, there were 28 grantees along with LEAs implementing the TSR model through their PKES<sup>1</sup> grant program serving over 42,000 children. Since 2004, almost 360,000 Texas children have participated in classrooms administering the Texas School Ready! program. During the 2012 implementation year, TSR! cost an average of \$367 per student; a small investment for such tremendous returns when children arrive at school ready to learn. A report of TSR! expenditures for fiscal year 2012 is provided in Appendix 2.



#### **Effectiveness**

Success in early literacy is indicative and predictive of later literacy achievement, and what children learn early in their education makes school success possible. A preponderance of research suggests that children who perform well in the following literacy domains continue to do well into high school: Phonological Awareness, Vocabulary Development, and Letter

\_

<sup>&</sup>lt;sup>1</sup> Funds used under the Tier 3 PKES Technical Assistance Program for Fiscal 2012 were funds remaining unexpended from Fiscal 2011.

Knowledge. The Texas School Ready! Project emphasizes developmentally appropriate assessments and on-going child progress monitoring in these domains and has found that thousands of disadvantaged children across the state have demonstrated substantial strides towards the goal of school readiness. Appendix 3 included in this report depicts statewide child progress results on key literacy assessments throughout the course of the pre-k year. These results indicate that children who participate in TSR! classrooms demonstrate significant gains on key predictors of early literacy. Instructional quality is the most influential school based predictor of growth in these child skills. Appendix 4 included in this report depicts improvement in observed instructional quality, for a randomly selected group of year 1 TSR! teachers, across a broad range of instructional areas that support early literacy development. These findings show that with a few months of participation in TSR!, teachers improve their ability to deliver quality language and literacy instruction. The key to these gains is the TSR! approach (see Appendix 5 for a summary of a recently published research paper by the prestigious Journal of Educational Psychology that describes the efficacy of the TSR! model, and Appendix 6 for a description and evaluation for scaling up a comprehensive early childhood teacher professional development program), which helps teachers and other early childhood professionals to provide learning activities that are age appropriate and effective for disadvantaged children.

#### **FY 2012 Project Improvements and Innovations**

During FY 2011, the Children's Learning Institute, designated the State Center for Early Childhood Development by the Texas Governor, identified several project improvement goals, based on emerging evidence from research and stakeholder feedback. In FY 2012, the Institute was successful in accomplishing:

#### Goal:

Increase access to the *Texas School Ready! Project* to more early childhood programs in typically underserved rural communities. There is considerable demand for access to quality improvement initiatives in rural communities, yet there are critical challenges to providing services to these schools, including: (a) difficulty recruiting highly qualified local mentors, (b) too few teachers in rural communities to warrant hiring of mentoring staff, and (c) rising travel expenses.

#### **Result:**

Adapted TSR! to a remote service delivery model and are prepared to scale up service to additional rural communities. In 2011 and 2012 many children and their teachers benefited from the TSR! through a distance-learning approach that allows teachers new flexibility to participate in eCIRCLE professional development coursework remotely, and to receive individualized feedback and mentoring based on routine video recordings of their own teaching. Communicating with teachers via Skype, web-postings, and by phone, TSR! mentors provide feedback on planned video-recorded lessons, offer guidance, share videos of effective teaching, and set goals for the coming weeks. By eliminating the costs (e.g., fuel and driving time) associated with mentor travel to schools in rural areas we improved the cost-effectiveness of the model, increasing the CLI's capacity to serve additional classrooms.

#### Goal:

Develop a technical assistance strategy to improve the sustainability of the model through targeted training and support for TSR! school leaders. School leaders play a critical role in driving instructional change, and many leaders need training to better understand how to identify and promote effective early childhood practices. Building early childhood instructional leadership skills will improve involvement among school leaders while actively enrolled in the program as well as strengthening their ability to sustain the model when participation ends.

#### **Result:**

A Leading School-wide Improvement professional development on-line course, and TSR!-linked Administrator Classroom Observation Tool (A-COT) were developed, and training is now underway. School leaders learn to recognize high quality preschool instruction across critical areas including, print and letter knowledge, phonological awareness, written expression, and social and emotional development. TSR! school leaders engage in web-based interactive practice, using the A-COT to identify effective teaching, followed by training to help leaders learn how to leverage this data in their communication and goal setting practices with teachers.

In addition, throughout FY 2012, CLI continued to improve existing components and developed several innovations to the project, including:

- Develop and extend our capacity to provide online professional learning resources for early childhood educators and school leaders, including building a catalogue of training modules covering key instructional areas related to children's social and cognitive development to be accessed through Project Share.
- Develop our capacity to conduct an initial needs assessment for grantees that assists CLI in making decisions about optimal service delivery, and cost-effectiveness, for each community. In particular, the CLI is working to expand online offerings and remote support to communities and schools with the technological capacity and foundational knowledge to fully engage in TSR! through online delivery.
- Extended the use of *Developing Talkers*, and its Spanish counterpart, *Hablemos Juntos*, a series of read aloud lessons targeting language and literacy growth. These lessons, embedded in a Pre-kindergarten Response to Intervention (P-RTI) framework, were piloted in TSR! classrooms in 2011 with children receiving these supports showing significant gains in vocabulary learning. Continuing efforts to improve the effectiveness of teacher training in the use of these strategies and lessons is underway.
- Developed an online professional development course, Discovering Early Childhood Science, to support TSR! teachers in learning to provide high quality language instruction in combination with age appropriate science activities and lessons.
- Further developed the *Texas School Ready!* On-Line Monitoring System (TOMS) to assist local communities to track performance metrics at the local level in order to better support school readiness outcomes.
- Revised and updated existing eCIRCLE on-line professional development module for mentors in order to include more current research and better video examples of key mentoring support strategies. Enhanced the content of the mentoring course to help

- mentors improve their understanding of data-driven decision making, using both teacher and child progress monitoring data.
- Improved and Implemented the Classroom Observation Tool (COT), accessed on-line through the TOMS system, to facilitate improvements to the ways that project mentors and coordinators work with teachers to improve their instructional strategies in working with young learners. In particular, the tool has been strengthened to better support classrooms with English Language Learners, build stronger math instruction skills, and to improve the connection between COT data and teacher-mentor goal setting practices.
- Extended the use of video mentoring and reflection strategy where project mentors and coordinators videotape teachers in their classroom environments to help them reflect and improve their instructional strategies and understand how to better support and scaffold children's language and oral responses.
- Extended the use of video reflection as a TSR! mentor professional development strategy where mentors videotape themselves while working with a teacher and share their video in collaboration with other mentors and CLI staff to receive feedback and guidance to improve mentoring skills and program fidelity.
- Developed and conducted a high-level research and training summit to educate public stakeholders in Texas, especially early childhood leaders and practitioners, about how to improve school readiness outcomes for young learners.
- Developed and will pilot several distance learning models to improve access to the high quality professional development offered through eCIRCLE to all early childhood teachers.
- Improved and enhanced the *TSR! Beat*, the Center's bi-monthly newsletter, to include more teacher activities, ideas, and suggestions to utilize in their classrooms.

#### **Future Project Goals**

The *Texas School Ready! Project* has the following current and future goals:

- Continue to increase the numbers of communities and classrooms participating in the project; the current waitlist includes over 400 classrooms, which does not reflect actual demand.
- Continue to streamline the project, including the provision of additional on-line tools, and also posting and sharing of materials through TEA Project Share.
- Continue to reduce the cost of the project per student through innovations, cost savings and other measures.
- Continue to seek federal and private research grants to test/validate long distance coaching approaches.

For questions regarding information contained in this report, or questions about the work of the Children's Learning Institute please contact Dr. John Gasko, Director, Statewide Initiatives, at 713.500.3245 or by email at John.W.Gasko@uth.tmc.edu.

# **Appendix 1:**

Texas School Ready! Project: Statewide Grantees

2011-2012 Texas School Ready! (TSR) Project grantees and numbers of classrooms by type: childcare, Head Start, ISD pre-kindergarten

**Classroom Funding** 

TSR

Region	Community	ChildCare	HeadStart	Non-Profit	PreK	Grand Total
Various	CLI - REMOTE	10	15		1	26
1	PKES3 - Pharr-San Juan-Alamo ISD		18			18
16	TSR - Amarillo College	25	10			35
13	TSR - Austin ISD	58	65		37	160
5	TSR - Beaumont ISD	54	27		17	98
3	TSR - CAC Victoria	13	8			21
20	TSR - Carrizo Springs HA	5	55			60
11	TSR - Child Care Associates	43	37			80
10	TSR - Child Care Group	46	52		8	106
12	TSR - EOAC Waco	30	43		17	90
20	TSR - Family Service Association	52	99		8	159
4	TSR - Kids R Kids	209	70	10	13	302
15	TSR - Mason	20	13			33
18	TSR - Region 18 ESC	57	8	1	8	74
19	TSR - Region 19 ESC - HS	53	29	1	36	119
2	TSR - Region 2 ESC	23	37		5	65
7	TSR - Region 7 ESC	65	29	6	23	123
8	TSR - Region 8 ESC	56	30	6	18	110
9	TSR - Rolling Plains HS	8	20		1	29
6	TSR - Sam Houston SU	35	19			54
1	TSR - TMC Laredo	43	12			55
1	TSR - TMC McAllen	27	42			69
1	TSR - WS Cameron	49	44		24	117
12	TSR - WS for Central TX	63	15	2	17	97
17	TSR - YWCA Lubbock	22	17			39
	<b>Grand Total</b>	1066	814	26	233	2139

# 2011-2011 Pre-kindergarten Early Start, Tier 3 grantees implementing Texas School Ready! (TSR) Project and numbers of classrooms by type: childcare, Head Start, ISD pre-kindergarten

**Classroom Funding** 

PKES3

Region	Community	PreK	Grand Total
11	PKES3 - Fort Worth ISD	31	31
20	PKES3 - Harlandale ISD	31	31
1	PKES3 - La Joya ISD	8	8
1	PKES3 - Pharr-San Juan-Alamo ISD	53	53
6	TSR - Amarillo College	1	1
5	TSR - Beaumont ISD	14	14
10	TSR - Child Care Group	8	8
20	TSR - Family Service Association	1	1
4	TSR - Kids R Kids	3	3
18	TSR - Region 18 ESC	19	19
19	TSR - Region 19 ESC - HS	9	9
2	TSR - Region 2 ESC	8	8
7	TSR - Region 7 ESC	16	16
8	TSR - Region 8 ESC	4	4
9	TSR - Rolling Plains HS	4	4
1	TSR - TMC McAllen	1	1
1	TSR - WS Cameron	10	10
12	2 TSR - WS for Central TX	3	3
	<b>Grand Total</b>	224	224

# **Appendix 2:**

Children's Learning Institute: FY 2012 Financial Expenditures

<b>Program Funding and Expenditures During Fisca</b>	l Year 2012			
Texas School Ready! Project				
Funding Awarded Fiscal Year 2012		\$ 15,200,000.00		
Texas Education Agency Award 121044037110001	\$ 3,500,000.00			
Texas Workforce Commission (Flow thru from TEA) 120914017110001	\$11,700,000.00			
Funding Carried Forward from Fiscal Year 2011		\$ 3,963,447.40		
Texas Education Agency Award 111044017110001	\$ 2,019,581.18			
Texas Workforce Commission (Flow thru from TEA) 110914017110001	\$ 1,943,866.22			
Total Funding Available for Texas School Ready! Project Fiscal	Year 2012		\$ 19,163,447.40	
Expenditures for Fiscal Year 2012		\$ 10,318,435.61		
Texas Education Agency Award 121044037110001	\$ 1,297,018.40			
Texas Workforce Commission (Flow thru from TEA) 120914017110001	\$ 9,021,417.21			
<b>Expenditures from Funding Carried Forward from Fiscal Year</b>	2011	\$ 3,955,050.40		
Texas Education Agency Award 111044017110001	\$ 2,011,184.18			
Texas Workforce Commission (Flow thru from TEA) 110914017110001	\$ 1,943,866.22			
Total Expenditures for Texas School Ready! Project - Fiscal Yea	r 2012		\$ 14,273,486.01	
Unexpended Remaining to be Carried Forward into Fiscal Year	2013			\$ 4,889,961.39

	COM	Μ	UNITY				
COMMUNITY NAME	TEA - 7896		TEA 8710		TWC - 7994	TWC - 8600	TOTAL
TSR - Amarillo College	\$ 62,039.66	\$	3,750.01	\$	37,469.99	\$ 220,292.71	\$ 323,552.36
TSR - Austin ISD	\$ 115,343.11	\$	88,977.84	\$	114,591.55	\$ 455,391.56	\$ 774,304.06
TSR - Beaumont ISD	\$ 101,055.92	\$	56,957.47	\$	84,475.15	\$ 376,194.23	\$ 618,682.77
TSR - Carrizo Springs HA	\$ 13,548.14	\$	3,003.08	\$	8,546.99	\$ 143,803.92	\$ 168,902.13
Carrizo Springs ISD -Asso. w/ Carrizo Spring HA	\$ 5,671.49	\$	-	\$	7,112.59	\$ 65,959.53	\$ 78,743.61
TSR - Child Care Associates	\$ 72,722.16	\$	4,994.99	\$	59,664.39	\$ 262,101.84	\$ 399,483.38
TSR - Child Care Group	\$ 63,803.11	\$	43,730.37	\$	42,984.40	\$ 400,421.89	\$ 550,939.78
Collab for Children - Asso. w/ Kids R Kids	\$ 12,708.18	\$	1,192.68	\$	4,700.28	\$ 10,286.85	\$ 28,887.99
College Station ISD-Asso. w/ Sam Houston State University	\$ 17,899.68	\$	943.04	\$	11,572.92	\$ 8,273.77	\$ 38,689.42
Crystal City ISD - Asso. w/ CS House Authority	\$ 26,463.45	\$	-	\$	79,390.35	\$ -	\$ 105,853.80
Dallas ISD - Asso. w/ Child Care Group	\$ 16,278.90	\$	-	\$	1,653.26	\$ -	\$ 17,932.16
TSR - Education Service Center, Region 2	\$ 27,448.62	\$	14,240.98	\$	39,410.91	\$ 203,924.46	\$ 285,024.97
TSR - Education Service Center, Region 7	\$ 134,369.11	\$	90,472.43	\$	203,421.32	\$ 487,241.24	\$ 915,504.11
TSR - Education Service Center, Region 8	\$ 122,125.14	\$	31,209.00	\$	106,526.89	\$ 455,166.06	\$ 715,027.09
TSR - Ed. Service Ctr. Region 10 - Asso. w/ Child Care Group	\$ 21,561.59	\$	-	\$	11,648.94	\$ -	\$ 33,210.53
Ed. Service Ctr. Region 12 - Asso. w/ EOAC Waco	\$ -	\$	9,859.58	\$	-	\$ 61,700.57	\$ 71,560.15
TSR - Education Service Center, Region 18	\$ 58,565.39	\$	14,916.00	\$	79,646.85	\$ 297,317.10	\$ 450,445.34
TSR - Education Service Center, Region 19 Head Start	\$ 77,687.88	\$	43,341.33	\$	65,140.74	\$ 236,538.65	\$ 422,708.60
TSR - Family Service Association	\$ 46,324.99	\$	36,251.73	\$	58,317.32	\$ 536,890.20	\$ 677,784.25
Fort Worth ISD-Asso. w/ Child Care Associates	\$ -	\$	11,432.23	\$	-	\$ 2,648.81	\$ 14,081.03
Galveston ISD - Asso. w/ Kids R Kids	\$ -	\$	-	\$	-	\$ 5,098.44	\$ 5,098.44
Harlandale ISD (FY2011 Community)	\$ 26,791.09	\$	9,519.96	\$	1,357.42	\$ 383.54	\$ 38,052.00
Houston ISD (Entered August 2012 and will continue for FY2013)				\$	7,352.69		\$ 7,352.69
TSR - Kids R Kids	\$ 142,114.44	\$	52,705.59	\$	148,259.82	\$ 978,081.67	\$ 1,321,161.53
La Joya ISD - Asso. w/ TMC McAllen	\$ -	\$	881.53	\$	-	\$ -	\$ 881.53
TSR - Mason ISD	\$ 11,071.80	\$	2,266.33	\$	11,562.16	\$ 140,270.72	\$ 165,171.01
Pharr,SanJuan-Alamo ISD	\$ -	\$	30,556.38	\$	-	\$ 29,438.30	\$ 59,994.68
TSR - Rolling Plains HS	\$ 24,848.40	\$	21,197.64	\$	15,947.73	\$ 134,271.72	\$ 196,265.49
San Angelo ISD - Asso. w/ Mason ISD	\$ 56.16	\$	-	\$	255.84	\$ 1,396.05	\$ 1,708.05
San Antonio ISD - Asso. w/ Family Services	\$ 32,933.56	\$	1,320.21	\$	97.27	\$ 4,803.12	\$ 39,154.16
TSR - Sam Houston State University	\$ 51,103.87	\$	1,046.37	\$	36,108.29	\$ 105,465.99	\$ 193,724.53
San Jacinto College - Asso. w/ Kids R Kids	\$ -	\$	2,210.66	\$	3,595.54	\$ 21,885.35	\$ 27,691.54
Temple ISD - Asso. w/ WS of Central Texas	\$ -	\$	17,198.45	\$	-	\$ 23,413.42	\$ 40,611.87
TSR - Texas Migrant Council Laredo	\$ 15,619.61	\$	2,089.94	\$	55,187.00	\$ 218,651.40	\$ 291,547.96
TSR - Texas Migrant Council McAllen	\$ 10,040.17	\$	7,355.94	\$	31,613.78	\$ 225,202.50	\$ 274,212.40
TSR - CAC Victoria	\$ 47,751.38	\$	2,029.44	\$	32,785.85	\$ 117,996.54	\$ 200,563.21
TSR - EOAC Waco	\$ 23,523.12	\$	30,091.05	\$	68,930.25	\$ 148,262.64	\$ 270,807.06
TSR - Workforce Solutions Cameron	\$ 86,158.81	\$	85,524.25	\$	126,510.18	\$ 343,372.15	\$ 641,565.38
TSR - Workforce Solution of Central Texas	\$ 119,016.24	\$	37,973.06	_	117,938.87	\$ 304,638.64	579,566.81
TSR - YWCA Lubbock	\$ 53,591.90	\$	2,202.50	\$	60,029.17	\$ 177,812.27	\$ 293,635.85
Remote Classrooms	\$ 13,788.90	\$	3,124.17	\$	24,166.67	\$ 94,552.20	\$ 135,631.95
Community Expenses	\$ 79,930.16	\$	76,839.91	\$	74,738.44	\$ 207,671.14	 439,179.65
Sub - Total	\$ 1,733,956.16	\$	841,406.15	\$	1,832,711.81	\$ 7,506,821.22	\$ 11,914,895.34
	INFRAS	T	RUCTUR	E			
Description	TEA - 7896		TEA 8710		TWC - 7994	TWC - 8600	TOTAL
Salaries and fringes	\$ 62,218.43	\$	217,517.84	\$	46,894.32	\$ 778,727.17	\$ 1,105,357.76
Professional and Contracted Services	\$ 221.40	\$	58,990.06	\$	1,446.58	\$ 278,875.60	\$ 339,533.64
Supplies and Materials	\$ 426.49	\$	8,590.38	\$	637.67	\$ 72,326.73	\$ 81,981.27
Other Operating Costs	\$ 1,014.83	\$	3,484.83	\$	175.64	\$ 35,402.13	\$ 40,077.43
Sub-Total	\$ 63,881.15	\$	288,583.11	\$	49,154.21	\$ 1,165,331.63	\$ 1,566,950.10
TOTAL Direct Costs	\$ 1,797,837.31	\$	1,129,989.26	\$	1,881,866.02	\$ 8,672,152.85	\$ 13,481,845.44
TOTAL Indirect Costs	\$ 213,346.87	\$	167,029.14	\$	62,000.20	\$ 349,264.36	791,640.57
TOTAL	\$ 2,011,184.18	\$	1,297,018.40	\$	1,943,866.22	\$ 9,021,417.21	\$ 14,273,486.01

			CO	MMUN	ITY			
	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
TSR	- Amarillo College	23076	\$ 62,039.66	\$ 3,750.01	\$ 37,469.99	\$ 220,292.71		\$ 323,552.36
	Professional Services Agreements (PSA)					3,636.30	3,636.30	
	Salaries - Project Managers		1,141.71	155.44	1,713.80	9,321.46	12,332.42	
	Salaries - Program Managers		3,186.24	965.11	3,740.34	76,714.95	84,606.64	
	Salaries - Field Staff			72.04	-	49,407.62	49,479.66	
	Training Supplies and Materials					96.51	96.51	
	FS Pre-K Texas System		37,781.01		12,163.27		49,944.28	
Curric	Pre-K Opening the World		885.05		263.71	2,680.46	3,829.22	
Cu	Bilingual Manuals		554.41		335.19		889.60	
	Early Childhood Study		966.73		1,874.10	10,383.18	13,224.01	
	Progress Monitoring Licenses			1,010.77		9,221.87	10,232.64	
	eCIRCLE Professional Dev Licenses			1,436.57		14,395.12	15,831.69	
	Early Learners Read Aloud Kits		4,748.71		1,499.59		6,248.31	
	Classroom Start Up Kit		1,675.99		1,055.88		2,731.88	
Kits	Take Home Library Backpacks		6,331.67		5,573.53		11,905.20	
	School Readiness Kits		4,768.12		9,250.57		14,018.69	
	PRTI related			110.07		2,264.28	2,374.36	
	Travel					6,632.89	6,632.89	
	Teacher Training					2,437.05	2,437.05	
	Postage and Shipping					499.02	499.02	
	Substitute Teacher Reimbursement					1,602.00	1,602.00	
	Teacher Incentive					31,000.00	31,000.00	
<b>TSR</b>	- Austin ISD	23057	\$ 115,343.11	\$ 88,977.84	\$ 114,591.55	\$ 455,391.56		\$ 774,304.06
	Professional Services Agreements (PSA)		5,809.45		6,819.79		12,629.24	
	Salaries - Project Managers		627.48	3,335.03	1,122.25	20,288.52	25,373.27	
	Salaries - Program Managers		3,114.20	10,294.60	3,655.77	66,334.35	83,398.92	
	Salaries - Field Staff		1,084.55	42,327.83	1,273.18	203,407.30	248,092.86	
	Training Supplies and Materials			359.94		868.28	1,228.22	
	Big Day for Pre-K		20,478.13	1,816.14	22,534.81	13,675.89	58,504.96	
ic	FS Pre-K Texas System		2,655.05		48,825.99	9,535.69	61,016.72	
Curric	Pre-K Opening the World		44,366.90	1,271.60		1,179.09	46,817.59	
C	Teaching Strategies System for Pre-K					6,717.76	6,717.76	
	Bilingual Manuals		2,131.03	1,781.76	1,288.37	1,428.26	6,629.42	
	eCIRCLE Professional Dev Licenses			4,850.75		33,952.01	38,802.76	
	Early Learners Read Aloud Kits		10,387.81		3,280.36		13,668.18	
	Classroom Start Up Kit		1,780.71	6,076.78	1,501.79	6,284.92	15,644.20	
Kits	Take Home Library Backpacks		18,995.01		16,720.59		35,715.61	
	School Readiness Kits		3,901.19		7,568.65		11,469.84	
	PRTI related			121.08		93.35	214.43	

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
	Travel			492.84		5,296.48	5,789.32	
	Postage and Shipping		11.61	570.20		1,430.35	2,012.16	
	Copies			4.28		14.32	18.60	
-	Substitute Teacher Reimbursement					5,025.00	5,025.00	
	Teacher Incentive			15,675.00		79,860.00	95,535.00	
TSR	- Beaumont ISD	23038	\$ 101,055.92	\$ 56,957.47	\$ 84,475.15	\$ 376,194.23		\$ 618,682.77
	Professional Services Agreements (PSA)		11,563.99	34,670.53	32,624.39	225,900.45	304,759.36	
	Salaries - Project Managers		627.48	2,871.83	1,122.25	13,754.93	18,376.48	
	Let's Begin 2009 Complete		2,210.51		713.18	396.00	3,319.68	
8	Big Day for Pre-K		41,104.98	1,031.90	14,231.70	14,813.15	71,181.72	
Curriculum	FS Pre-K Texas System				3,255.07	152.72	3,407.79	
rric	Bilingual Manuals		1,074.18	550.73	649.42	357.06	2,631.39	
Cu	Pre-K Opening the World		885.05		263.71	2,680.46	3,829.22	
	Progress Monitoring Licenses		\$3,035.73	4,378.92	648.50	20,178.80	28,241.96	
	eCIRCLE Professional Dev Licenses			4,124.78		26,098.32	30,223.10	
	Early Learners Read Aloud Kits		13,652.55		4,311.33		17,963.89	
	Classroom Start Up Kit		2,818.06	2,183.84	1,321.32	2,258.64	8,581.86	
Kits	Take Home Library Backpacks		20,182.20		17,765.63		37,947.83	
	School Readiness Kits		3,901.19		7,568.65		11,469.84	
	PRTI related			99.07		76.38	175.44	
	Teacher Training					2,137.66	2,137.66	
	Postage and Shipping			45.88		1,087.66	1,133.54	
	Substitute Teacher Reimbursement					8,175.00	8,175.00	
	Teacher Incentive			7,000.00		58,127.00	65,127.00	
<b>TSR</b>	Carrizo Springs House Authority	23050	\$ 13,548.14	\$ 3,003.08	\$ 8,546.99	\$ 143,803.92		\$ 168,902.13
	Professional Services Agreements (PSA)		209.78		629.35	69,817.80	70,656.93	
	Salaries - Project Managers		418.47	-	795.75	7,521.73	8,735.94	
Cur	Early Childhood Study		4,869.32		1,801.94		6,671.26	
5	Bilingual Manuals		329.18		199.02		528.20	
	Progress Monitoring Licenses						-	
	eCIRCLE Professional Dev Licenses			2,760.92		30,244.73	33,005.65	
	Early Learners Read Aloud Kits		2,671.15		843.52		3,514.67	
Kits	Classroom Start Up Kit		301.48		97.27		398.75	
$\mathbf{X}$	Take Home Library Backpacks		4,748.75		4,180.15		8,928.90	
	PRTI related			242.16		186.70	428.86	
	Postage and Shipping					557.96	557.96	
	Substitute Teacher Reimbursement					150.00	150.00	
	Teacher Incentive					35,325.00	35,325.00	
Carı	rizo Springs ISD-Asso. w/ Carrizo Spring HA	23051	\$ 5,671.49	\$ -	\$ 7,112.59	\$ 65,959.53		\$ 78,743.61
	Professional Services Agreements (PSA)		5,671.49		7,112.59	65,879.93	78,664.01	
	Postage and Shipping					79.60	79.60	

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
TSR	- Child Care Associates	23044	\$ 72,722.16	\$ 4,994.99	\$ 59,664.39	\$ 262,101.84		\$ 399,483.38
	Professional Services Agreements (PSA)		1,987.29		6,092.95	92,577.56	100,657.80	
	Training Supplies and Materials					80.61	80.61	
	Salaries - Project Managers		402.92	83.90	1,146.76	11,651.64	13,285.23	
	Salaries - Program Managers		3,750.85	215.64	3,903.93	67,394.20	75,264.62	
日日	Big Day for Pre-K		13,023.36	206.38		2,962.63	16,192.37	
	Bilingual Manuals		658.37	-	398.03	609.11	1,665.51	
Curriculum	Let's Begin 2009 Complete		3,155.68		2,545.50	792.00	6,493.18	
ر ت	FS Pre-K Texas System		22,714.15		18,890.62	458.16	42,062.93	
	Progress Monitoring Licenses						-	
	eCIRCLE Professional Dev Licenses			2,753.50		31,131.49	33,885.00	
	Early Learners Read Aloud Kits		7,123.07		2,249.39		9,372.46	
	Classroom Start Up Kit		1,890.60	1,519.19	1,228.15	1,571.23	6,209.17	
Kits	Take Home Library Backpacks		11,080.42		9,753.68		20,834.10	
	School Readiness Kits		6,935.45		13,455.38		20,390.83	
	PRTI related			176.12		2,950.87	3,126.99	
	Travel			40.25		1,909.65	1,949.90	
	Teacher Training					1,750.00	1,750.00	
	Shipping and Postage					1,820.69	1,820.69	
	Substitute Teacher Reimbursement					1,442.00	1,442.00	
	Teacher Incentive					43,000.00	43,000.00	
TSR	- Child Care Group	23042	\$ 63,803.11	\$ 43,730.37	\$ 42,984.40	\$ 400,421.89		\$ 550,939.78
	Professional Services Agreements (PSA)		1,125.27		2,284.64	8,576.79	11,986.70	
	Salaries - Project Managers		627.48	1,389.60	1,122.25	15,646.23	18,785.55	
	Salaries - Program Managers		3,755.72	6,810.25	3,608.41	73,631.50	87,805.88	
	Salaries - Field Staff		(65.69)	23,726.30	(131.39)	168,026.39	191,555.61	
	Training Supplies and Materials			19.87		216.06	235.93	
ic	Big Day for Pre-K		20,552.49	1,651.03	4,545.45	23,701.04	50,450.01	
Curric	Bilingual Manuals		848.95	291.56	513.25	189.03	1,842.80	
5	Pre-K Opening the World		1,770.10		527.42	5,360.92	7,658.44	
	eCIRCLE Professional Dev Licenses			3,598.32		30,544.74	34,143.06	
	Early Learners Read Aloud Kits		11,871.79		3,748.99		15,620.77	
	Classroom Start Up Kit		1,734.69	1,614.14	1,899.06	1,669.43	6,917.33	
Kits	Take Home Library Backpacks		15,829.18		13,933.83		29,763.01	
	School Readiness Kits		5,635.05		10,932.50		16,567.55	
	PRTI related			374.25		3,920.90	4,295.16	
1	Travel		118.10	255.04		3,607.81	3,980.95	
	Postage and Shipping					936.55	936.55	
	Substitute Teacher Reimbursement					1,612.00	1,612.00	
	Teacher Incentive			4,000.00		62,782.50	66,782.50	

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total		Total
Colla	borative for Children-Asso. w/ Kids R Kids	23037	\$ 12,708.18	\$ 1,192.68	\$ 4,700.28	\$ 10,286.85		\$	28,887.99
	Professional Services Agreements (PSA)		12,708.18		4,700.28		17,408.46		
	eCIRCLE Professional Dev Licenses			1,192.68		10,286.85	11,479.53		
Colle	ge Station ISD-Asso. w/ Sam Houston SU	23070	\$ 17,899.68	\$ 943.04	\$ 11,572.92	\$ 8,273.77		\$	38,689.42
	Professional Services Agreements (PSA)		8,784.59		7,249.23		16,033.82		
	Early Childhood Study		2,434.66		1,026.77		3,461.43		
Curri	FS Pre-K Texas System		5,397.29		1,737.61		7,134.90		
	Big Day for Pre-K				1,285.20		1,285.20		
	eCIRCLE Professional Dev Licenses			943.04		8,273.77	9,216.82		
-	Progress Monitoring Licenses		1,283.15		274.11		1,557.25		
Cryst	tal City ISD-Asso. w/ Carrizo Spring HA	23052	\$ 26,463.45	\$ -	\$ 79,390.35	\$ -		\$	105,853.80
	Professional Services Agreements (PSA)		26,463.45		79,390.35		105,853.80		
Dalla	s ISD-Asso. w/ Child Care Group	23058	\$ 16,278.90	\$ -	\$ 1,653.26	\$ -		\$	17,932.16
	Professional Services Agreements (PSA)		15,977.42		1,555.99		17,533.41		,
	Classroom Start Up Kit		301.48		97.27		398.75		
TSR	- Education Service Center, Region 2	23035	\$ 27,448.62	\$ 14,240,98	\$ 39,410.91	\$ 203,924.46		\$	285,024.97
	Professional Services Agreements (PSA)		224.34	3,548.11	25,331.75	118,601.80	147,706.00	·	
-	Salaries - Project Managers		428.75	2,020.73	781.56	15,818.24	19,049.28		
J.	Bilingual Manuals		329.18		199.02	20,000	528.20		
	Progress Monitoring Licenses		13,379.13	2,879.98	2,858.09	13,271.44	32,388.65		
	eCIRCLE Professional Dev Licenses		20,077720	2,520.20	_,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	19,500.68	22,020.88		
	Take Home Library Backpacks		8,635.30	2,020.20	8,834.62	27,00000	17,469.91		
S	Classroom Start Up Kit		5,000.00	474.75	3,00	491.01	965.76		
Kits	PRTI related			297.20		.,	297.20		
	Early Learners Read Aloud Kits		4,451.92		1,405.87	229.13	6,086.92		
	Postage and Shipping		1,10202		2,100107	565.48	565.48		
-	Substitute Teacher Reimbursement					3,778.68	3,778.68		
-	Teacher Incentive			2,500.00		31,668.00	34,168.00		
TSR.	- Education Service Center, Region 7	23040	\$ 134,369.11	\$ 90,472,43	\$ 203,421,32		2 1,2 2 2 1 2	\$	915,504.11
	Professional Services Agreements (PSA)		11,516.25	1,105.66	14,075.43	9,053.78	35,751.12		, , , , , ,
	Salaries - Project Managers		627.48	3,427.67	1,122,25	16,505.91	21,683.30		
	Salaries - Program Managers		2,843.50	12,922.17	4,447.53	65,741.77	85,954.97		
-	Salaries - Field Staff		_,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	51,284.14	.,	217,790.95	269,075.09		
	Training Supplies and Materials			5.30		106.66	111.96		
	Let's Begin 2009 Complete		17,043.75		53,270.86	9,108.00	79,422.61		
ric	Big Day for Pre-K		1,017.45	619.14	23,823.45	8,887.89	34,347.93		
Curric	Bilingual Manuals		1,039.53	1,295.83	628.47	1,187.14	4,150.97		
	FS Pre-K Texas System		40,714.09	, , , , ,	43,925.20	, ,,,,,,	84,639.29		
	Progress Monitoring Licenses		,	2,938.29	,,	26,807.75	29,746.04		
	eCIRCLE Professional Dev Licenses			4,311.77		26,038.63	30,350.39		
	Early Learners Read Aloud Kits		15,730.12	.,	4,967.41		20,697.52		
	Classroom Start Up Kit		6,936.42	2,848.49	4,916.70	2,946.06	17,647.67		

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
Kits	Take Home Library Backpacks		16,527.66		12,517.38		29,045.04	
	PRTI related			264.18		203.67	467.85	
	School Readiness Kits		20,372.88		39,525.17		59,898.05	
	Travel			3,649.97	201.47	15,414.43	19,265.87	
	Postage and Shipping			119.83		2,214.40	2,334.23	
	Substitute Teacher Reimbursement			180.00		5,384.20	5,564.20	
	Teacher Incentive			5,500.00		79,850.00	85,350.00	
<b>TSR</b>	- Education Service Center, Region 8	23041	\$ 122,125.14	\$ 31,209.00	\$ 106,526.89	\$ 455,166.06		\$ 715,027.09
	Professional Services Agreements (PSA)		13,408.87	6,890.50	18,661.70	266,769.12	305,730.19	
	Salaries - Project Managers		627.48	1,945.43	1,122.25	15,646.23	19,341.39	
	Big Day for Pre-K		6,511.68		1,285.20		7,796.88	
	We Can! Classroom Kits		2,198.75	1,683.69	3,973.36		7,855.80	
ျ	Early Childhood Study Texas		6,767.10	515.96	13,118.71	2,405.47	22,807.23	
Curric	FS Pre-K Texas System		33,736.42		21,737.96	,	55,474.38	
5	Bilingual Manuals		606.39		366.61		973.00	
_	Let's Begin 2009 Complete		7,576.70		3,971.85	1,584.00	13,132.55	
	Pre-K Opening the World		11,456.37	158.95	7,721.52	98.26	19,435.10	
	Progress Monitoring Licenses		,	7,263.46	.,.	66,268.77	73,532.22	
	eCIRCLE Professional Dev Licenses			3,117.39		23,505.59	26,622,98	
	Early Learners Read Aloud Kit		12,168.58	2,	3,842.71		16,011.29	
	Classroom Start Up Kit		6,734.49	1,898.99	5,984.89	1,964.04	16,582.41	
Kits	Take Home Library Backpacks		12,096.48	,,,,,,,	8,761.87	,	20,858.35	
<u>                                    </u>	PRTI related		22,070110	220.15		169.73	389.88	
	School Readiness Kits		8,235.84		15,978.26		24,214.11	
	PRTI related		0,2000			908.09	908.09	
	Postage and Shipping			14.48		606.77	621.25	
	Substitute Teacher Reimbursement					300.00	300.00	
	Teacher Incentive			7,500.00		74,940.00	82,440.00	
TSR	- ESC 10-Asso. w/Child Care Group	23043	\$ 21,561.59	\$ -	\$ 11,648.94	\$ -	62,116.60	\$ 33,210.53
	Professional Services Agreements (PSA)		15,308,56		11,475.11		26,783.67	+,=====
	Progress Monitoring Licenses		813.70		173.83		987.53	
	Teacher Incentive		5,439.33		1.3.03		5,439.33	
ESC	212-Associated with Waco ISD	23072	-	9,859.58	_	61,700.57	5,157.55	\$ 71,560.15
LbC	Professional Services Agreements (PSA)	20072				18,380.78	18,380.78	71,500.13
ric	Pre-K Opening the World					3,829.22	3,829.22	
Curric	Bilingual Manuals			316.25		4,279.00	4,595.25	
)	Postage and Shipping			43.33		1,794.57	1,837.90	
	Teacher Incentive			9,500.00		33,417.00	42,917.00	
TSR	a - Educaction Service Center, Region 18	23048	\$ 58,565.39	\$ 14.916.00	\$ 79.646.85	\$ 297,317.10	42,917.00	\$ 450,445,34
101	Professional Services Agreements (PSA)	230-10	9,631.72	5,151.62	37,660.65	195,572.76	248,016.75	Ψ <u>του, του τ</u>
	Salaries - Project Managers		1,141.71	4,196.90	1,713.80	14,688.37	21,740.79	

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
	Pre-K Opening the World		830.87		263.71	2,680.46	3,775.04	
	Let's Begin 2009 Complete		2,210.51		713.18		2,923.68	
Curric	Big Day for Pre-K		1,017.45		5,830.65		6,848.10	
Cm	FS Pre-K Texas System		10,794.58		3,475.22		14,269.79	
	Bilingual Manuals		866.27		523.73		1,390.00	
	Early Childhood Study				1,026.77	1,526.97	2,553.74	
	eCIRCLE Professional Dev Licenses			5,380.35		38,627.59	44,007.94	
	Early Learners Read Aloud Kits		9,497.43		2,999.19		12,496.62	
	Classroom Start Up Kit		1,808.90		583.61		2,392.50	
Kits	Take Home Library Backpacks		15,997.84		15,605.77		31,603.61	
	School Readiness Kits		4,768.12		9,250.57		14,018.69	
	PRTI related			187.13		2,959.35	3,146.48	
	Postage and Shipping					1,292.60	1,292.60	
	Substitute Teacher Reimbursement					2,850.00	2,850.00	
	Teacher Incentive					37,119.00	37,119.00	
TSF	- Education Service Center, Region 19 - HS	23049	\$ 77,687.88	\$ 43,341.33	\$ 65,140.74	\$ 236,538.65		\$ 422,708.60
	Professional Services Agreements (PSA)		8,745.70	19,603.48	23,645.80	121,139.72	173,134.70	
	Salaries - Project Managers		418.47	2,047.90	795.75	9,467.00	12,729.12	
3	Big Day for Pre-K		38,984.40	206.38	12,474.00	2,962.63	54,627.41	
Curric	Let's Begin 2009		945.17		1,832.33	3,564.00	6,341.50	
Ü	Bilingual Manuals		641.04		387.56	4,279.00	5,307.60	
	Progress Monitoring Licenses		993.65	1,316.35	212.27	12,009.87	14,532.15	
	eCIRCLE Professional Dev Licenses			4,447.00		23,748.73	28,195.73	
	Early Learners Read Aloud Kits		7,419.87		2,343.12		9,762.98	
	Classroom Start Up Kit		2,337.65	2,278.79	2,093.60	2,356.85	9,066.89	
Kits	Take Home Library Backpacks		12,433.81		12,105.75		24,539.56	
_	PRTI related			220.15		169.73	389.88	
	School Readiness Kits		4,768.12		9,250.57		14,018.69	
	Travel					1,350.37	1,350.37	
	Teacher Training					850.00	850.00	
	Postage and Shipping			221.27		1,502.75	1,724.02	
	Substitute Teacher Reimbursement					4,296.00	4,296.00	
	Teacher Incentive			13,000.00		48,842.00	61,842.00	
TSF	R - Family Service Association	23053	\$ 46,324.99		\$ 58,317.32			\$ 677,784.25
	Professional Services Agreements (PSA)		8,390.88	22,752.02	18,830.62	168,190.86	218,164.38	, , , , ,
	Salaries - Project Managers	1	418.47	460.78	795.75	19,063.69	20,738.68	
	Salaries - Program Managers	1	3,891.29	1,497.95	3,450.80	69,349.16	78,189.20	
	Salaries - Field Staff	1		,	,	108,433.49	108,433.49	
	Training Supplies and Materials	1				164.63	164.63	
	Early Childhood Study	1		515.96	1,285.20	2,405.47	4,206.63	
ic	Bilingual Manuals		970.22	259.17	586.58	399.07	2,215.04	

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
Curr	Let's Begin					1,980.00	1,980.00	
0	We Can! Classroom Kits					6,591.10	6,591.10	
	Big Day for Pre-K		1,017.45	1,031.90	1,975.05	14,813.15	18,837.54	
	Progress Monitoring Licenses		2,081.20	470.13	444.59	4,289.24	7,285.16	
	eCIRCLE Professional Dev Licenses			4,162.74		43,006.27	47,169.01	
	Early Learners Read Aloud Kits		8,607.05		2,718.01		11,325.06	
	Classroom Start Up Kit		1,236.44	1,519.19	2,150.44	1,571.23	6,477.30	
Kits	Take Home Library Backpacks		11,476.15		10,102.03		21,578.18	
	PRTI related			484.33		373.40	857.73	
	School Readiness Kits		8,235.84		15,978.26		24,214.11	
	Travel			59.32		1,610.63	1,669.95	
	Copies					68.20	68.20	
	Postage and Shipping			38.26		1,515.62	1,553.88	
	Substitute Teacher Reimbursement					450.00	450.00	
	Teacher Incentive			3,000.00		92,615.00	95,615.00	
Fort	Worth ISD- Asso. w/ Child Care Associates	23064	\$ -	\$ 11,432,23	\$ -	\$ 2,648.81		\$ 14,081.03
	Salaries - Project Managers			2,517.08	•		2,517.08	, , , , , , , , , , , , , , , , , , , ,
	Salaries - Program Managers			6,469.16			6,469.16	
C	FS Pre-K Texas System			660.03		2,639.96	3,299.99	
	eCIRCLE Professional Dev Licenses			1,769.83		,	1,769.83	
	Postage and Shipping			16.13		8.85	24.98	
Galv	eston ISD - Asso. w/ Kids R Kids	23160	\$ -	\$ -	\$ -	\$ 5,098.44		\$ 5,098.44
	Salaries - Project Managers				•	3,244.76	3,244.76	, , , , , , , , , , , , , , , , , , , ,
	eCIRCLE Professional Dev Licenses					1,853.68	1,853.68	
Harl	andale ISD (FY2011 Community)	23078	\$ 26,791.09	\$ 9,519.96	\$ 1,357.42	\$ 383.54		\$ 38,052.00
ı	Professional Services Agreements (PSA)		23,614.52		678.83		24,293.35	
	Salaries - Project Managers		·	1,587.13			1,587.13	
	Salaries - Program Managers			5,159.60			5,159.60	
	Progress Monitoring Licenses		3,176.57		678.59		3,855.15	
	Teacher Incentive		·			375.50	375.50	
	eCIRCLE Professional Dev Licenses			1,828.82			1,828.82	
	Substitute Teacher Reimbursement			917.00			917.00	
	Postage and Shipping			27.41		8.04	35.45	
	ston ISD (Entered FY2012 and will continue Y2013)	23160	\$ -	\$ -	\$ 7,352.69	\$ -		\$ 7,352.69
	Early Childhood Study				7,352.69		7,352.69	
<b>TSR</b>	- Kids R Kids Group	23068	\$ 142,114.44	\$ 52,705.59	\$ 148,259.82	\$ 978,081.67		\$ 1,321,161.53
	Salaries - Project Managers		402.92	1,174.64	1,146.76	34,954.93	37,679.25	
	Salaries - Program Managers		2,185.80	2,036.63	5,100.21	78,727.75	88,050.39	
	Salaries - Field Staff		1,452.65	28,129.38	2,571.45	545,225.53	577,379.01	
	Training Supplies and Materials		, , , , , ,	306.52	,- : - : -	3,203.40	3,509.92	
	Early Childhood Study		5,334.85	1,031.92	6,649.08	4,810.94	17,826.78	

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
	We Can! Classroom Kits					6,591.10	6,591.10	
	Big Day for Pre-K		28,695.67	1,238.27	21,627.47	17,775.78	69,337.19	
Curriculum	Let's Begin 2009				5,555.00	1,188.00	6,743.00	
	Teaching Strategies System for Pre-K					16,794.40	16,794.40	
ರ	Pre-K Opening the World		2,655.26		5,147.68	3,829.22	11,632.16	
	Bilingual Manuals		2,858.69	874.68	1,728.31	1,344.24	6,805.93	
	FS Pre-K Texas System		11,022.27		25,632.80	610.88	37,265.95	
	Progress Monitoring Licenses		4,068.51	656.84	869.13	3,026.82	8,621.29	
	eCIRCLE Professional Dev Licenses			5,334.35		57,980.63	63,314.97	
	Early Learners Read Aloud Kit		28,789.08		9,091.29		37,880.37	
	Classroom Start Up Kit		2,825.56	2,278.79	3,281.32	2,356.85	10,742.51	
Kits	Take Home Library Backpacks		38,385.76		33,789.53		72,175.29	
	School Readiness Kits		13,437.43		26,069.80		39,507.22	
	PRTI related			539.37		11,857.79	12,397.15	
	Travel			1,779.21		22,906.32	24,685.53	
	Office space			2,700.00			2,700.00	
	Postage and Shipping					1,115.11	1,115.11	
	Substitute Teacher Reimbursement					6,762.00	6,762.00	
	Teacher Incentive			4,625.00		157,020.00	161,645.00	
La J	oya ISD- Asso. w/ TMC-McAllen	23083	\$ -	\$ 881.53	\$ -	-		\$ 881.53
	Salaries - Project Managers			409.58			409.58	
	eCIRCLE Professional Dev Licenses			471.95			471.95	
TSR	- Mason ISD	23046	\$ 11,071.80	\$ 2,266.33	\$ 11,562.16	\$ 140,270.72		\$ 165,171.01
	Professional Services Agreements (PSA)					35,637.98	35,637.98	
	Salaries - Project Managers		402.92	-	1,146.76	4,277.19	5,826.86	
	Salaries - Field Staff		1.73	368.86	7.85	49,937.47	50,315.91	
ic	Bilingual Manuals		381.16		230.44		611.60	
Curric	Big Day for Pre-K				1,285.20		1,285.20	
	Pre-K Opening the World		1,327.63		2,573.84	7,802.94	11,704.41	
	eCIRCLE Professional Dev Licenses			1,809.41		18,808.63	20,618.03	
	Early Learners Read Aloud Kit		3,561.54		1,124.70		4,686.23	
	Classroom Start Up Kit		214.61		172.27		386.88	
Kits	Take Home Library Backpacks		4,748.75		4,180.15		8,928.90	
	PRTI related			88.06		67.89	155.95	
	School Readiness Kits		433.47		840.96		1,274.43	
	Teacher Training					1,750.00	1,750.00	
	Postage and Shipping					171.34	171.34	
	Substitute Teacher Reimbursement					817.29	817.29	
-	Teacher Incentive					21,000.00	21,000.00	

	Description	Class Code	T	EA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
TSR	- Pharr,SanJuan-Alamo ISD	23084	\$	-	\$ 30,556.38	\$ -	29,438.30		\$ 59,994.68
	Postage and Shipping				49.97		313.42	363.39	
	Salaries - Project Managers				2,713.47	-	2,204.64	4,918.12	
	Professional Services Agreements (PSA)				21,387.45		16,380.00	37,767.45	
	Teacher Incentive				1,000.00		6,751.00	7,751.00	
	eCIRCLE Professional Dev Licenses				3,126.70		1,432.39	4,559.09	
	Classroom Start Up Kit				2,278.79		2,356.85	4,635.64	
<b>TSR</b>	- Rolling Plains Head Start	23071	\$	24,848.40	\$ 21,197.64	\$ 15,947.73	\$ 134,271.72		\$ 196,265.49
	Salaries - Project Managers			1,141.71	777.20	1,713.80	7,909.12	11,541.84	
	Salaries - Field Staff			(126.41)	10,510.60	(91.52)	66,898.99	77,191.66	
္	FS Pre-K Texas System			17,076.88		8,467.89	2,567.68	28,112.46	
Curric	Bilingual Manuals			155.93	842.29	94.27	1,750.50	2,842.99	
5	Big Day for Pre-K				206.38		2,962.63	3,169.01	
	Progress Monitoring Licenses						·	-	
	eCIRCLE Professional Dev Licenses				1,451.83		12,806.24	14,258.07	
	Early Learners Read Aloud Kits			2,077.56		656.07		2,733.64	
	Take Home Library Backpacks			2,770.11		2,438.42		5,208.53	
Kits	School Readiness Kits			1,300.40		2,522.88		3,823.28	
<u> </u>	Classroom Start Up Kit			452.22	189.90	145.90	196.40	984.43	
	PRTI related				110.07		1,083.76	1,193.84	
	Training Supplies and Materials						190.06	190.06	
	Travel				901.23		5,951.93	6,853.16	
	Postage and Shipping				133.13		785.40	918.53	
-	Substitute Teacher Reimbursement				75.00		402.00	477.00	
	Teacher Incentive				6,000.00		30,767.00	36,767.00	
San	Angelo ISD-Asso. w/ Mason ISD	23045	\$	56.16	\$ -	\$ 255.84	\$ 1,396.05		\$ 1,708.05
	Professional Services Agreements (PSA)			56.16		255.84	876.90	1,188.90	
	Postage and Shipping						222.22	222.22	
	Travel						296.93	296.93	
San	Antonio ISD-Asso. w/ Family Services	23079	\$	32,933.56	\$ 1,320.21	\$ 97.27	\$ 4,803.12		\$ 39,154.16
	Professional Services Agreements (PSA)			32,625.09				32,625.09	
Kit	Classroom Start Up Kit			301.48		97.27		398.75	
X	Big Day for Pre-K				1,197.00		4,788.00	5,985.00	
	Postage and Shipping			6.99	123.21		15.12	145.32	
<b>TSR</b>	- Sam Houston State University	23039	\$	51,103.87	\$ 1,046.37	\$ 36,108.29	\$ 105,465.99		\$ 193,724.53
	Professional Services Agreements (PSA)			35,991.41		25,010.98	56,193.26	117,195.65	
	Salaries - Project Managers			428.75	-	781.56	14,405.90	15,616.21	
nlu n	Pre-K Opening the World					3,829.22		3,829.22	
Curriculu	Bilingual Manuals						861.16	861.16	
Cm	Let's Begin 2009 Complete			8,842.04		2,852.70	2,772.00	14,466.74	
	eCIRCLE Professional Dev Licenses				947.31		12,885.73	13,833.03	
	Early Learners Read Aloud Kit			2,374.36		749.80		3,124.15	
its	Classroom Start Up Kit			301.48		97.27		398.75	

	Description	Class	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
21	±	Code		12.10.110		2110 0000	5 5.10 = 5 5 6.1	20007
-	Take Home Library Backpacks		3,165.84	00.07	2,786.77	520.42	5,952.60	
	PRTI related			99.07		530.42	629.49	
	Travel					293.24	293.24	
	Postage and Shipping					549.29	549.29	
a	Teacher Incentive			A	<b>*</b> • • • • • • • • • • • • • • • • • • •	16,975.00	16,975.00	A
San	Jacinto College - Asso. w/ Kids R Kids	23069	\$ -	\$ 2,210.66	\$ 3,595.54	\$ 21,885.35		\$ 27,691.54
	Professional Services Agreements (PSA)				3,595.54	1,812.50	5,408.04	
	eCIRCLE Professional Dev Licenses			2,210.66		20,072.85	22,283.50	
Tem	ple ISD- Asso. w/ WS of Central TX	23074	\$ -	\$ 17,198.45	\$ -	\$ 23,413.42		\$ 40,611.87
	Professional Services Agreements (PSA)			16,286.61		23,413.42	39,700.03	
	Postage and Shipping			81.84			81.84	
	Substitute Teacher Reimbursement			830.00			830.00	
<b>TSR</b>	- Texas Migrant Council-Laredo	23033	\$ 15,619.61	\$ 2,089.94	\$ 55,187.00	\$ 218,651.40		\$ 291,547.96
	Professional Services Agreements (PSA)		776.64		40,275.05	150,878.60	191,930.29	
	Salaries - Project Managers		418.47	-	795.75	7,002.99	8,217.20	
Curr	Bilingual Manuals		294.53		178.07		472.60	
Cn	Big Day for Pre-K		10,581.48		7,900.20		18,481.68	
	eCIRCLE Professional Dev Licenses			1,836.77		20,036.08	21,872.84	
	Early Learners Read Aloud Kit		296.79		93.72		390.52	
	Classroom Start Up Kit		597.79		914.08		1,511.88	
Kits	Take Home Library Backpacks		395.73		348.35		744.08	
<u> </u>	PRTI related			253.17		195.19	448.36	
_	School Readiness Kits		2,167.33		4,204.81		6,372.13	
	Postage and Shipping		,		,	571.55	571.55	
	Travel		90.85		476.98		567.83	
	Substitute Teacher Reimbursement					2,400.00	2,400.00	
	Teacher Incentive					37,567.00	37,567.00	
TSR	- Texas Migrant Council-McAllen	23063	\$ 10.040.17	\$ 7,355.94	\$ 31,613.78	·	21,001100	\$ 274,212.40
	Professional Services Agreements (PSA)	2000	2,176.65	4,472.28	15,962.15	134,487.69	157,098.77	Ψ 271,212110
	Salaries - Project Managers		418.47		795.75	8,688,89	9,903.11	
E	Bilingual Manuals		467.79	485.94	282.81	0,000.09	1,236.54	
Curr	Big Day for Pre-K		4,337.55	103.51	9,705.15		14,042.70	
	Progress Monitoring Licenses		62.59		13.37		75.96	
	eCIRCLE Professional Dev Licenses		02.39	2,045.49	13.37	22,891.22	24,936.71	
	Early Learners Read Aloud Kit		296.79	2,043.49	93.72	22,691.22	390.52	
-	Classroom Start Up Kit		150.74		48.63		199.38	
Kits	Take Home Library Backpacks		395.73		348.35		744.08	
<b>3</b>	PRTI related		395.73	252.24	348.33	271.56		
	School Readiness Kits		1.722.06	352.24	2 262 24	271.56	623.80	
			1,733.86		3,363.84	2.250.12	5,097.71	
	Teacher Training					2,378.13	2,378.13	
	Postage and Shipping					1,485.00	1,485.00	

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
	Substitute Teacher Reimbursement					3,000.00	3,000.00	
	Teacher Incentive				1,000.00	52,000.00	53,000.00	
TSR.	- CAC Victoria	23036	\$ 47,751.38	\$ 2,029.44	\$ 32,785.85	\$ 117,996.54		\$ 200,563.21
	Professional Services Agreements (PSA)		17,786.81		14,676.82		32,463.63	
	Salaries - Project Managers		428.75	-	781.56	5,649.37	6,859.68	
	Salaries - Field Staff		(95.10)	468.22	(81.02)	60,415.58	60,707.68	
	Training Supplies and Materials		56.70		100.82	268.72	426.24	
8	Early Childhood Study		2,434.66		1,026.77		3,461.43	
l ala	Pre-K Opening the World		4,479.43		1,318.55	13,402.30	19,200.28	
Curriculum	Bilingual Manuals		277.21		167.59	,	444.80	
رة ا	Teaching Strategies System for Pre-K		9,886.10		3,189.54		13,075.64	
	eCIRCLE Professional Dev Licenses		,	1,506.18	,	14,661.03	16,167.21	
	Early Learners Read Aloud Kit		2,671.15	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	843.52	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	3,514.67	
	Classroom Start Up Kit		684.67		839.08		1,523.75	
Kits	Take Home Library Backpacks		5,540.21		4,876.84		10,417.05	
<b>×</b>	PRTI related		2,010.22	55.04	.,	42.43	97.47	
	School Readiness Kits		2,600.79		5,045.77		7,646.56	
	Travel		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		.,	6,622.96	6,622.96	
	Teacher Training					2,420.66	2,420.66	
	Postage and Shipping					613.49	613.49	
	Substitute Teacher Reimbursement					900.00	900.00	
	Teacher Incentive		1,000.00			13,000.00	14,000.00	
TSR.	- EOAC Waco	23091	\$ 23,523.12	\$ 30,091.05	\$ 68,930.25	\$ 148,262.64	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	\$ 270,807.06
	Professional Services Agreements (PSA)			24,515.22	5,211.51	117,860.20	147,586.93	+ =
	Salaries - Project Managers		402.92	1,426.35	1,146.76	11,061.69	14,037.71	
E	Bilingual Manuals		1,056.85	,	638.95	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	1,695.80	
Curr	Pre-K Texas System		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		29,295.59	1,374.47	30,670.07	
	eCIRCLE Professional Dev Licenses			2,198.96		16,911.61	19,110.58	
	Early Learners Read Aloud Kit		3,264.74	,	1,030.97	.,	4,295.71	
	Classroom Start Up Kit		1,875.09	949.50	3,386.79	982.02	7,193.39	
Kits	Take Home Library Backpacks		4,353.02		3,831.80		8,184.83	
12	PRTI related		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	44.03		33.95	77.98	
	School Readiness Kits		12,570.50		24,387.87		36,958.37	
	Postage and Shipping		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	38.70	38.70	
	Substitute Teacher Reimbursement			957.00			957.00	
TSR	- Workforce Solutions Cameron	23034	\$ 86,158.81	\$ 85,524.25	\$ 126,510.18	\$ 343,372.15		\$ 641,565.38
	Professional Services Agreements (PSA)		25,963.11	43,858.17	82,015.67	121,378.12	273,215.07	, , , , , , , , , , , , , , , , , , , ,
	Salaries - Project Managers		418.47	1,740.72	795.75	10,763.85	13,718.79	
	Salaries - Program Managers		1,164.13	13,865.69	6,111.58	65,560.75	86,702.15	
	Bilingual Manuals		606.39	777.50	366.61	420.08	2,170.57	
l m l	FS Pre-K Texas System		230.07		3,255.07	152.72	3,407.79	

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
rici	Pre-K Opening the World		13,205.90	348.10	1,684.85	294.78	15,533.63	
Curric	Big Day for Pre-K		16,343.46	1,651.03	6,444.90	23,701.04	48,140.43	
	Let's Begin 2009		7,576.70		12,304.35	7,920.00	27,801.05	
	Progress Monitoring Licenses		3,810.31	5,591.55	813.97	25,766.78	35,982.61	
	eCIRCLE Professional Dev Licenses			4,677.46		29,518.72	34,196.18	
	Early Learners Read Aloud Kit		5,342.30		1,687.04		7,029.35	
	Classroom Start Up Kit		2,731.18	1,424.24	1,396.32	1,473.03	7,024.77	
Kits	Take Home Library Backpacks		7,123.13		6,270.22		13,393.35	
	PRTI related			418.28		322.48	740.76	
	School Readiness Kits		1,733.86		3,363.84		5,097.71	
	Travel			227.09		1,804.25	2,031.34	
	Postage and Shipping		139.86	152.41		1,064.56	1,356.83	
	Substitute Teacher Reimbursement					600.00	600.00	
	Teacher Incentive			10,792.00		52,631.00	63,423.00	
TSF	R - Workforce Solutions of Central Texas	23073	\$ 119,016.24	\$ 37,973.06	\$ 117,938.87	\$ 304,638.64		\$ 579,566.81
	Professional Services Agreements (PSA)		22,451.16		7,089.83	10,559.97	40,100.96	
	Salaries - Project Managers		402.92	1,678.05	1,146.76	11,209.18	14,436.91	
	Salaries - Field Staff			11,362.83	-	139,394.46	150,757.29	
	Training Supplies and Materials					2,996.76	2,996.76	
	Pre-K Opening the World		29,677.67	953.70	7,721.52	589.56	38,942.45	
၁	Big Day for Pre-K		271.52	2,682.93	2,786.60	38,514.18	44,255.24	
Curric	Early Childhood Study Texas			1,547.87		7,216.41	8,764.28	
5	Bilingual Manuals		554.41	2,699.69	335.19	2,043.69	5,632.98	
	FS Pre-K Texas System		41,131.43	660.03	71,673.69	9,302.52	122,767.66	
	eCIRCLE Professional Dev Licenses			2,771.27		20,191.47	22,962.74	
	Early Learner Read Aloud Kit		6,232.69		1,968.22		8,200.91	
	School Readiness Kits		7,802.38		15,137.30		22,939.68	
Kits	Classroom Start Up Kit		2,181.74	4,557.58	2,764.51	4,713.69	14,217.52	
	PRTI related			176.12		135.78	311.90	
	Take Home Library Backpacks		8,310.32		7,315.26		15,625.58	
	Substitute Teacher Reimbursement			780.00		1,364.00	2,144.00	
	Travel			440.32		8,961.43	9,401.75	
	Postage and Shipping			162.66		520.54	683.20	
	Teacher Incentive			7,500.00		46,925.00	54,425.00	
TSF	R - YWCA Lubbock	23077	\$ 53,591.90	\$ 2,202.50	\$ 60,029.17	\$ 177,812.27		\$ 293,635.85
	Professional Services Agreements (PSA)		3,127.60		11,381.48	99,907.42	114,416.50	
	Salaries - Project Managers		1,141.71	-	1,713.80	10,733.81	13,589.32	
	Pre-K Opening the World		9,428.54		527.42	5,360.92	15,316.88	
Curr	Bilingual Manuals		519.76		314.24	168.03	1,002.03	
Cn	Big Day for Pre-K		1,086.09		11,146.41		12,232.50	
	Early Childhood Study		15,073.49		9,749.74	3,028.42	27,851.65	

	Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
	eCIRCLE Professional Dev Licenses			2,125.45		22,462.69	24,588.14	
	Early Learners Read Aloud Kit		5,935.89		1,874.49		7,810.39	
	Classroom Start Up Kit		1,995.32		1,674.06		3,669.38	
Kits	Take Home Library Backpacks		7,914.59		6,966.91		14,881.50	
	School Readiness Kits		7,368.91		14,296.34		21,665.25	
	RTI Related			77.05		2,511.25	2,588.30	
	Postage and Shipping				384.27	424.73	809.00	
	Substitute Teacher Reimbursement					564.00	564.00	
	Teacher Incentive					32,651.00	32,651.00	
Ren	note Classrooms		\$ 13,788.90	\$ 3,124.17	\$ 24,166.67	\$ 94,552.20		\$ 135,631.95
	Salaries		-	1,156.34	-	62,605.50	63,761.84	
	eCIRCLE Professional Dev Licenses			58.99		1,937.94	1,996.94	
r	Pre-K Opening the World		10,932.78	476.85		294.77	11,704.40	
Curr	FS Pre-K Texas System		1,770.03		13,020.26	5,440.81	20,231.10	
)	Big Day for Pre-K		1,086.09	825.52	11,146.41	11,850.52	24,908.53	
	Teacher incentive			500.00		10,672.61	11,172.61	
	Office Supplies			66.30		1,259.70	1,326.00	
	Shipping			40.17		490.36	530.53	
	Community Expenses		\$ 79,930.16	\$ 76,839.91	\$ 74,738.44	\$ 207,671.14		\$ 439,179.65
Pro	fessional and Contracted Services							
	Teacher Training			5,250.38		42,308.68	47,559.06	
	Web Based Training		76,413.60		73,586.40		150,000.00	
Sup	plies and Materials							
	Printing for communities			1,780.40			1,780.40	
	Training Supp & Materials			45,244.26		55,283.17	100,527.43	
	Teaching Strategies System for Pre-K		2,471.52		797.39		3,268.91	
	Bilingual Manual		103.95		62.85	2,401.30	2,568.10	
	Early Childhood Study Texas			515.96		2,405.47	2,921.43	
	Classroom Start Up Kit		904.45	1,424.24	291.80	1,473.03	4,093.52	
	RTI Related					19,717.55	19,717.55	
Oth	er Operating Costs							
	Professional Dev for Managers - Supplies			116.25		507.96	624.21	
_	eCIRCLE Professional Dev Licenses			6,000.00		24,000.00	30,000.00	
	Professional Development - Travel			13,247.40		1,425.08	14,672.48	
	Professional Dev - Miscellaneous Service Expense			3,177.82			3,177.82	
	Professional Dev - Accomodations					27,638.49	27,638.49	
	Travel		12.24			28,912.68	28,924.92	
	Postage and Shipping		24.40	83.20		1,597.73	1,705.33	
	SUB - TOTAL		\$ 1,733,956.16	\$ 841,406.15	\$ 1,832,711.81	\$ 7,506,821.22		\$ 11,914,895.34

Description	Class Code	TEA - 7896	TEA 8710	TWC - 7994	TWC - 8600	Sub-Total	Total
	INI	FRASTR	RUCTUF	RE-Expe	nses		
Salary and fringes		\$ 62,218.43	\$ 217,517.84	\$ 46,894.32	\$ 778,727.17		\$ 1,105,357.76
Directors		5,960.66	22,875.76	9,366.02	171,479.31	209,681.75	
Project Manager		3,077.89	21,207.99	18,876.86	188,520.72	231,683.46	
Regional Project Managers		8,172.87				8,172.87	
Administrative Support Staff		32,980.92	115,534.20			148,515.12	
Other support		3,882.27	13,430.65	8,867.97	121,949.41	148,130.30	
Faculty Support		1,966.89	3,557.52	1,243.00	23,481.43	30,248.84	
TOMS - Help desk		2,519.19				2,519.19	
Research Assistant		1,779.43	14,773.11	3,163.59	78,045.98	97,762.11	
Data Analysis Group		1,878.31	26,138.61	5,376.88	195,250.32	228,644.12	
Professional and Contracted Services		\$ 221.40	\$ 58,990.06	\$ 1,446.58	\$ 278,875.60		\$ 339,533.64
TOMS - PreK summit			576.00			576.00	
TOMS - Online monitoring system			13,920.92		85,464.08	99,385.00	
Video upload - coding related			1,221.60			1,221.60	
Long Distance Calls		130.62	2.37			132.99	
Conference Calls		90.78	304.37	161.38	3,337.02	3,893.55	
Curriculum Training				1,285.20		1,285.20	
AV Equipment & Materials			3,934.18			3,934.18	
Pre-K Summit			39,030.62		177,945.50	216,976.12	
Storage					12,129.00	12,129.00	
Supplies and Materials		\$ 426.49	\$ 8,590.38	\$ 637.67	\$ 72,326.73		\$ 81,981.27
Desktop, laptop & printer for Managers and Field Staff		204.51	7,553.22	363.58	39,973.96	48,095.27	
Software		81.63	728.80	145.12	5,041.52	5,997.07	
TSR! Office Supplies		140.35	308.36	128.97	2,356.68	2,934.36	
Video upload project for TSR! Communities					24,954.57	24,954.57	
Other Operating Costs		\$ 1,014.83	\$ 3,484.83	\$ 175.64	\$ 35,402.13		\$ 40,077.43
Travel		90.69	3,347.85	174.32	17,504.99	21,117.85	
Сору		0.14			13,725.18	13,725.32	
Postage and Shipping of Kits			136.98	1.32	3,414.96	3,553.26	
Parking		924.00			757.00	1,681.00	
SUB-TOTAL	,	\$ 63,881.15	\$ 288,583.11	\$ 49,154.21	\$ 1,165,331.63		\$ 1,566,950.10

COMMUNITIES + INFRASTRUCTURE													
TEA - 7896 TEA - 8710 TWC - 7994 TEA - 8600 Total													
TOTAL Direct Costs	\$ 1,	797,837.31	\$	1,129,989.26	\$	1,881,866.02	\$	8,672,152.85		\$	13,481,845.44		
TOTAL Indirect Costs	\$	213,346.87		167,029.14	\$	62,000.20	\$	349,264.36		\$	791,640.57		
TOTAL Project Costs	\$ 2,01	11,184.18	\$	1,297,018.40	\$	1,943,866.22	\$	9,021,417.21		\$	14,273,486.01		

#### Texas School Ready! Project Community Expenditure Description

**Community** - A collection of public schools, Head Start programs, and licensed child care facilities participating in the TSR! project under the leadership of a local LEA or community agency (e.g. Austin ISD, Region 7 ESC, Family Services Association, etc.)

**Project Managers** – An early childhood expert employed by the University of Texas to provide leadership and support to the TSR! project; part of the role of the project manager is to:

**Program Manager** – An early childhood expert employed by the University of Texas (CLI) to provide field-based support for the TSR! project. Specifically, the eight Technical Assistance Specialists:

- act as liaisons between CLI and lead agencies
- provide technical assistance to lead agencies and LEAs in their assigned regions
- train and support coordinators in their assigned regions
- train and support mentors in their communities
- provide training/professional development to classroom teachers
- provide teachers with mentoring and support
- collect data and submit reports

**Coordinators (Field Staff)** – Employed by the University of Texas (CLI) to oversee the implementation of the TSR! project within a particular community. Coordinators for TSR:

- act as liaisons between the lead agency and local partners
- train and support mentors in their communities
- provide training/professional development to classroom teachers
- provide teachers with mentoring and support
- collect data and submit reports

**Mentors (Field Staff)** – Employed by the University of Texas (CLI) to work with an assigned group of early childhood teachers within a particular community to:

- provide training/professional development to classroom teachers
- provide teachers with mentoring and support
- collect data and submit reports

**Professional Services Agreement (PSA)** –Professional Services Agreements are contracts between CLI and vendors who provide various services (e.g. reimbursement of coordinators/mentors' salary/fringe and associated costs, consultants to provide training to teachers, etc.) in order to successfully implement the TSR! project.

**Curriculum** - Classrooms are equipped with a state-approved set of books, materials, and instructions, called a curriculum, to guide classroom teachers in lesson planning and activities to enhance students' learning in all subject areas at the prekindergarten level.

**Classroom Kits** – Various kits of select instructional materials are provided teachers participating in the TSR! project. These kits consist of a classroom start-up kit that focuses on classroom management and routines, a school readiness kit plus supplemental materials, PRTI kits, take home library kits, Early Learner Read Aloud kits, parent bags, etc, to enhance students' literacy skills that are facilitated by classroom teachers and parents.

**Travel** - Community field staff and SCECD project management staff travel to various communities and classrooms within the community to support and mentor teachers.

**Professional Development (PD) Licenses** - CLI purchases the PD licenses for target teachers so they are able to participate in the eCIRCLE on line professional development sessions. Teachers have access to the course content, discussion platforms and supportive resources.

**Progress Monitoring (PM) Licenses** - CLI purchases PM licenses so target teachers can use mCLASS to assess students' progress (in letter recognition, vocabulary, phonological awareness, and math) up to 3 times a year and use the results to guide classroom instructions in order to enhance student learning and be ready for Kindergarten

**Training of Trainers** – Sessions of professional development provided by or attended by TSR! project staff to enhance job related knowledge and skills.

**Training Institute** - Multi-day (usually between 2 and 5 day) training provided to TSR! project field staff regularly (once or twice per year) to enhance their mentoring skills and to ensure proper implementation of the project.

**Teacher Training** – Teachers participating in their first year of the training model participate in three full days of teacher professional development and training; specifically, teachers attend the 2-day CIRCLE training and the 1-day progress monitoring training. Additionally, teachers in the first and second year of the professional development and training model attend up to 20, 2 hour eCIRCLE sessions throughout the year, usually after the work day has ended.

**Substitute teacher reimbursement** - Teachers who participate in the TSR! project are required to attend 3 full days of training – 2 days for CIRCLE training and 1 day for Progress Monitoring training. CLI reimburses up to \$75/day to schools that provide substitute teachers so the teachers can attend the trainings.

**Teacher Incentive-** Teachers participating in the first and second year of the professional development and training model are eligible to earn up to \$1,000 in incentive pay for participating in the eCIRCLE professional development sessions throughout the school year and working with the assigned mentor in implementing the TSR! project in the teacher's classroom.

Remote Classrooms- Remote Classrooms consist of 20 classrooms located in remote geographical areas in Texas. The TSR! Project is working to expand its capacity to serve all qualifying classrooms across Texas. As distance to and from a training location for face to face meetings has been prohibited by distance, a remote condition has been provided currently accommodating 20 classrooms located in geographically remote areas across Texas. These classrooms are grouped into a remote 'community', assigned a mentor who interacts with them online using the eCIRCLE professional development course platform and uploaded video from the teacher's classroom. Teleconferencing connects the mentor and the teacher across distance to ensure the best practices of TSR! Are available to all teachers and children.

### Texas School Ready! Project Infrastructure Expenditure Description

**Directors** — Serve as the leadership for the TSR! project and work closely with all stakeholders (legislators, TEA, TWC, etc.) to provide direction and oversight of the project's implementation. Directors support project management staff in the overall management of the TSR! project.

**Project Managers** – An early childhood expert employed by the University of Texas to provide leadership and support to the TSR! project; part of the role of the project manager is to:

- create and provide training to enable the field staff to be more effective in mentoring teachers
- create and provide training modules for field staff to deliver to teachers
- provide support and guidance to field staff and lead agencies
- create appropriate materials for pre-K classrooms
- provide materials and equipment to field staff and classroom teachers

- collect data and generate reports
- monitor and ensure financial accountability

Other Support - Other support personnel provide specialized service to the TSR! Project.

**Faculty Support** – CLI faculty provide their knowledge and expertise to the TSR! Project in the design, creation, and delivery of high quality training and professional development for TSR staff; help in the interpretation of research data and findings toward improving the TSR project.

**Research Assistant** – Supports TSR management team and staff in the development and implementation of mentor and teacher training.

**Data Analysis Group** – Oversees the capture of progress monitoring data, ensure data reliability, manage multiple databases, provide data reporting, and assist in the development and enhancement to data systems and processes.

**Texas School Ready! Online Monitoring System (TOMS)** – TOMS is the online, web-based system for collecting/tracking school/classroom/teacher/student data from the participating TSR communities. The TOMS generates reports for the TSR! project.

**Prekindergarten Summit** – The TSR! summits bring together early childhood education practitioners, thought-leaders, policymakers and researchers to raise awareness of proven best practices in early childhood education. A unique feature of the TSR! pre-kindergarten summits sponsored by CLI is the partnership with KLRU Public Broadcasting Systems (PBS) to host viewing sites regionally through their multiple affiliates across the state. All attendees are able to view the speakers and panels via remote feeds from a central location, and then are able to submit questions and be included in discussions in real time. Two such summits were conducted during FY 2011.

**Remote Video Upload Project**- provides for the introduction of videotaping for reflection as a mentoring tool. Field staff receives a video camera and training in the use of video reflection and feedback techniques to enhance mentoring efforts. Additionally, teachers assigned to the remote mentoring condition also use a camera to upload classroom video samples of instruction and interaction with children. These videos are used by the remote mentor to guide the teacher's reflection and set goals for change.

Indirect Costs – These expenditures reflect costs associated with the support and oversight provided to the project by the University of Texas Health Science Center at Houston. The Texas Education Agency and the Texas Workforce Commission allow a maximum of 15% or 5% in indirect charges, depending on the program and funds source. These expenditures are used to recapture costs such as office space, equipment, contract services, legal services, human resources, information technology, procurement, and accounting.

The above expenditure description will also apply to the Pre-Kindergarten Early Start Grant

Program Funding and Expenditures During Fiscal Year 2012											
Pre-Kindergarten Early Start Grant											
Funding Awarded Fiscal Year 2012		\$	-								
		Φ.	1 200 5 60 20								
Funding Carried Forward from Fiscal Year 2011		\$	1,398,568.28								
Texas Education Agency Award 100238027110001	\$ 1,057,684.56										
Texas Education Agency Award 110238027110001	\$ 340,883.72										
Total Funding Available for Texas School Ready! Proj	ect Fiscal Year 2012			\$ 1,398,568.28							
<b>Expenditures from Funding Carried Forward from Fi</b>	scal Year 2011	\$	1,293,873.89								
Texas Education Agency Award 100238027110001	\$ 993,028.60										
Texas Education Agency Award 110238027110001	\$ 300,845.29										
Total Expenditures for Texas School Ready! Project -	Fiscal Year 2012			\$ 1,293,873.89							
Unexpended					\$ 104,694.39						

<sup>\*</sup> Funds used under the Tier 3 PKES Technical Assistance Program for Fiscal Year 2012 were funds remaining unexpended from Fiscal Year 2011

CC	M	MUNITY	•		
COMMUNITY NAME		TEA - 7897		TEA - 7898	TOTAL
Amarillo College	\$	1,315.86	\$	479.07	\$ 1,794.93
Austin ISD (FY2011 Community)	\$	53,548.07	\$	-	\$ 53,548.07
Beaumont ISD	\$	47,083.70	\$	14,007.70	\$ 61,091.40
Child Care Associates - Asso. w/ Fort Worth ISD	\$	8,908.02	\$	2,862.56	\$ 11,770.58
Child Care Group	\$	14,094.70	\$	4,272.46	\$ 18,367.15
College Station ISD (FY2011 Community)	\$	4,661.39	\$	1,461.48	\$ 6,122.87
Dallas ISD - Asso. w/ Child Care Group	\$	28,992.69	\$	8,101.16	\$ 37,093.85
Education Service Center, Region 2	\$	54,463.71	\$	17,162.42	\$ 71,626.13
Education Service Center, Region 7	\$	25,091.87	\$	7,447.48	\$ 32,539.35
Education Service Center, Region 8	\$	10,125.86	\$	2,727.74	\$ 12,853.60
Edu. Serv. Center 10 - Asso. w/ Child Care Group	\$	1,406.00	\$	444.01	\$ 1,850.01
Education Service Center, Region 12	\$	15,034.53	\$	4,747.74	\$ 19,782.27
Asso. w/EOAC Waco (FY2011 Community					
Education Service Center, Region 18	\$	42,532.43	\$	13,433.02	\$ 55,965.46
Edu. Serv. Center, Region 19	\$	20,307.69	\$	6,347.04	\$ 26,654.72
Family Service Association	\$	5,699.91	\$	1,717.87	\$ 7,417.78
Fort Worth ISD	\$	109,079.85	\$	42,445.85	\$ 151,525.70
Harlandale ISD	\$	59,661.13	\$	19,604.34	\$ 79,265.47
Higgs ISD - Asso. w/ Family Services	\$	6,075.59	\$	1,918.60	\$ 7,994.19
Kids R Kids Group	\$	6,051.54	\$	1,947.76	\$ 7,999.31
La Joya ISD	\$	26,024.95	\$	7,299.46	\$ 33,324.40
Pharr-San Juan-Alamo ISD	\$	136,864.01	\$	44,506.78	\$ 181,370.78
Rolling Plains - Region 9 Area	\$	5,861.84	\$	1,766.83	\$ 7,628.67
Texas Migrant Council	\$	20,928.70	\$	6,648.00	\$ 27,576.70
CAC Victoria (FY2011 Community)	\$	575.03	\$	(10.48)	\$ 564.55
Workforce Solutions Cameron	\$	30,964.71	\$	9,448.33	\$ 40,413.04
Workforce Solutions of Central Texas	\$	6,779.61	\$	2,053.12	\$ 8,832.72
YWCA Lubbock (FY2011 Community)	\$	21,551.42	\$	6,805.72	\$ 28,357.14
Community Expenses	\$	71,745.86	\$	22,660.21	\$ 94,406.07
Sub - Total	\$	835,430.65	\$	252,306.27	\$ 1,087,736.92
INFR	AS	TRUCTU	RF	C	
Description		TEA - 7897		TEA - 7898	TOTAL
Salaries and Fringes	\$	25,484.60	\$	9,078.83	\$ 34,563.43
Professional and Contracted Services	\$	274.34	\$	-	\$ 274.34
Supplies and Materials	\$	306.14	\$	96.68	\$ 402.82
Other Operating Costs	\$	2,008.16	\$	123.31	\$ 2,131.47
Sub-Total	\$	28,073.24	\$	9,298.82	\$ 37,372.06
					· · · · · · · · · · · · · · · · · · ·
TOTAL Direct Costs	\$	863,503.89	\$	261,605.09	\$ 1,125,108.98
TOTAL Indirect Costs	\$	129,524.71	\$	39,240.20	\$ 168,764.91
TOTAL	\$	993,028.60	\$	300,845.29	\$ 1,293,873.89

COM	TN/I	TN	MTV				
COM		Jľ					
Description	Class Code	Т	EA - 7897	TEA - 7898	Sub-Total		Total
Amarillo College	23076	\$	1,315.86	\$ 479.07		\$	1,794.93
Salaries - Project Managers			65.29	22.71	88.00		,
Salaries - Program Managers			429.24	214.59	643.83		
Progress Monitoring Licenses			359.68	113.58	473.26		
Travel			16.37	8.19	24.56		
eCIRCLE Professional Dev Licenses			65.278	-	65.28		
Teacher Incentive			380.00	120.00	500.00		
Austin ISD (FY2011 Community)	23057	\$	53,548.07	\$ -		\$	53,548.07
Professional Services Agreements (PSA)	20007	Ψ	53,548.07	Ψ _	53,548.07	Ψ	20,2 10107
Beaumont ISD	23038	\$	47,083.70	\$ 14,007.70	33,340.07	\$	61,091.40
Salaries - Project Managers	23030	Ψ	476.60	190.64	667.24	Ψ	01,071.40
Professional Services Agreements (PSA)			38,708.79	11,611.46	50,320.25		
Progress Monitoring Licenses			1,664.41	525.61	2,190.02		
eCIRCLE Professional Dev Licenses			913.889	-	913.89		
Teacher Incentive	22011	ф.	5,320.00	1,680.00	7,000.00	ф.	44
Child Care Associates - Asso. w/ Fort Worth ISD	23044	\$	8,908.02	\$ 2,862.56		\$	11,770.58
Salaries			8,748.88	2,812.16	11,561.04		
Travel			159.14	50.40	209.54		
Child Care Group	23042	\$	14,094.70	\$ 4,272.46		\$	18,367.15
Salaries - Project Managers			238.30	95.32	333.62		
Salaries - Program Managers and Field Staff			7,270.87	2,256.64	9,527.51		
Professional Services Agreements (PSA)			715.00	238.00	953.00		
Progress Monitoring Licenses			2,888.00	912.00	3,800.00		
Travel			86.58	-	86.58		
eCIRCLE Professional Dev Licenses			456.944	=	456.94		
Teacher Incentive			2,439.00	770.50	3,209.50		
College Station ISD (FY2011 Community)	23070	\$	4,661.39	\$ 1,461.48		\$	6,122.87
Professional Services Agreements (PSA)		T .	4,661.39	1,461.48	6,122.87	7	3,22233
Dallas ISD - Asso. w/ Child Care Group	23058	\$	28,992.69	\$ 8,101.16	3,222.31	\$	37,093.85
Professional Services Agreements (PSA)	25050	Ψ	28,992.69	8,101.16	37,093.85	Ψ	31,075.05
Education Service Center, Region 2	23035	\$	54,463.71	\$ 17,162.42	37,073.03	\$	71,626.13
Salaries - Project Managers	23033	φ	522.34	181.70	704.03	φ	71,020.13
Professional Services Agreements (PSA)			48,706.48	15,492.54	64,199.02		
Progress Monitoring Licenses			1,094.67	345.69			
eCIRCLE Professional Dev Licenses					1,440.36		
			522.222	-	522.22		
Tango License			578.00	182.50	760.50		
Teacher Incentive		_	3,040.00	960.00	4,000.00		
Education Service Center, Region 7	23040	\$	25,091.87	\$ 7,447.48		\$	32,539.35
Salaries - Project Managers			544.69	217.87	762.56		
Salaries - Program Managers and Field Staff			13,687.91	4,150.80	17,838.71		
Progress Monitoring Licenses		<u> </u>	2,818.86	890.17	3,709.03		
Travel			90.69	28.64	119.33		
eCIRCLE Professional Dev Licenses			1,109.722		1,109.72		
Teacher Incentive			6,840.00	2,160.00	9,000.00		
Education Service Center, Region 8	23041	\$	10,125.86	\$ 2,727.74		\$	12,853.60
Salaries - Project Managers			102.13	40.85	142.98		
Professional Services Agreements (PSA)			8,219.48	2,178.97	10,398.45		
Progress Monitoring Licenses			468.42	147.92	616.34		
eCIRCLE Professional Dev Licenses			195.833	-	195.83		
Teacher Incentive			1,140.00	360.00	1,500.00		
Edu Serv Center, Region 10 - Asso. w/ Child Care Group	23043	\$	1,406.00	\$ 444.01		\$	1,850.01
Professional Services Agreements (PSA)		T	1,406.00	444.01	1,850.01	4	2,020101
Edu Serv Center, Region 12-Associated with EOAC Waco (FY2011 Community)	23072		15,034.53	4,747.74	2,000.01	\$	19,782.27
Professional Services Agreements (PSA)	23012		15,034.53	4,747.74	19,782.27	Ψ	17,102.21
	22040	Ф	· · · · · · · · · · · · · · · · · · ·		17,104.41	Ф	55 OCE AC
Education Service Center 18	23048	\$	42,532.43	\$ 13,433.02	1 (70 00	\$	55,965.46
Salaries - Project Managers Professional Services Agreements (PSA)		-	1,240.55	431.53	1,672.08		
		1	23,216.13	7,394.86	30,610.99		
Assessment Software			964.00	305.00	1,269.00		

	C/A						
Description	Class	T	EA - 7897	TEA - 7898	Sub-Total		Total
Teacher Incentive	Code		16,549.00	5,226.00	21,775.00		
eCIRCLE Professional Dev Licenses			326.389	3,220.00	326.39		
Progress Monitoring Licenses			236.36	75.64	312.00		
Education Service Center 19 - HS	23049	\$	20,307.69	\$ 6,347.04	312.00	\$	26,654.72
Salaries - Project Managers	25047	Ψ	998.67	310.85	1,309.52	Ψ	20,034.72
Professional Services Agreements (PSA)			15,319.00	5,106.00	20,425.00		
Progress Monitoring Licenses			1,045.57	330.18	1,375.75		
eCIRCLE Professional Dev Licenses	+		1,044.444	330.10	1.044.44		
Teacher Incentive			1,900.00	600.00	2,500.00		
Family Service Association	23053	\$	5,699.91	\$ 1,717.87	2,300.00	\$	7,417.78
Salaries - Project Managers	23033	Ψ	110.96	34.54	145.50	Ψ	7,417.70
Salaries - Program Managers and Field Staff			1,052.19	271.28	1,323.47		
Professional Services Agreements (PSA)			3,924.19	1,239.22	5,163.41		
Progress Monitoring Licenses			167.29	52.83	220.12		
eCIRCLE Professional Dev Licenses	-		65.278		65.28		
Teacher Incentive	+		380.00	120.00	500.00		
	22064	ф			300.00	Φ	151 525 50
Fort Worth ISD	23064	\$	109,079.85	. ,		\$	151,525.70
Salaries - Project Managers	_	<b> </b>	1,597.07	552.90	2,149.97		
Professional Services Agreements (PSA)		<u> </u>	79,826.16	32,265.47	112,091.63		
Postage and Shipping			17.88	17.88	35.76		
eCIRCLE Professional Dev Licenses			4,838.733	2,409.600	7,248.33		
Teacher Incentive			22,800.00	7,200.00	30,000.00		
Harlandale ISD	23078	\$	59,661.13	\$ 19,604.34		\$	79,265.47
Salaries - Project Managers			3,439.86	1,070.72	4,510.58		
Salaries - Program Managers and Field Staff			5,139.96	1,541.71	6,681.67		
Professional Services Agreements (PSA)			24,897.30	7,862.31	32,759.61		
eCIRCLE Professional Dev Licenses			4,904.011	2,409.60	7,313.61		
Teacher Incentive			21,280.00	6,720.00	28,000.00		
Higgs ISD - Asso. w/ Family Services	23085	\$	6,075.59	\$ 1,918.60		\$	7,994.19
Professional Services Agreements (PSA)			6,075.59	1,918.60	7,994.19		
Kids R Kids Group	23068	\$	6,051.54	\$ 1,947.76		\$	7,999.31
Salaries - Project Managers			309.11	107.01	416.12		
Salaries - Program Managers and Field Staff			3,395.65	1,201.85	4,597.50		
Progress Monitoring Licenses			458.75	145.75	604.50		
Travel			41.64	13.15	54.79		
eCIRCLE Professional Dev Licenses			326.389	-	326.39		
Teacher Incentive			1,520.00	480.00	2,000.00		
La Joya ISD	23083	\$	26,024.95	\$ 7,299.46		\$	33,324.40
Salaries - Project Managers			887.71	276.32	1,164.02	·	
Professional Services Agreements (PSA)			20.813.50	5.372.66	26,186,16		
eCIRCLE Professional Dev Licenses			1,283.742	690.48	1,974.22		
Teacher Incentive			3,040.00	960.00	4,000.00		
Pharr-San Juan-Alamo ISD	23084	\$	136,864.01	\$ 44,506.78	,	\$	181,370.78
Salaries - Project Managers		Т.	5,992.01	1,865.13	7,857.14	т	
Professional Services Agreements (PSA)			103,958.43	32,664.77	136,623.20		
Teacher Incentive			18,494.00	5,840.00	24,334.00		
eCIRCLE Professional Dev Licenses			8,419.564	4,136.88	12,556.44		
Rolling Plains/ Region 9 area	23071	\$	5,861.84	·	12,330.11	\$	7,628.67
Salaries - Project Managers	25071	Ψ	261.17	90.85	352.02	Ψ	7,020.07
Salaries - Program Managers and Field Staff	-		3,368.56	1,029.08	4,397.64		
Training Supplies and Materials	-	1	40.07	13.35	53.42		
Progress Monitoring Licenses	-		754.55	241.45	996.00		
Travel	-	1	101.66	32.10	133.76		
eCIRCLE Professional Dev Licenses	-	1	195.833	52.10	195.83	-	
Teacher Incentive	-	1	1,140.00	360.00	1,500.00	-	
	23033	\$	20,928.70		1,500.00	\$	27,576.70
Texas Migrant Council Professional Services Agreements (PSA)	23033	Φ	20,928.70	\$ <b>6,648.00</b> 6,648.00	27,576.70	Φ	21,570.70
Community Action Committee Victoria (FY2011 Community)	22026	ø			27,370.70	Ф	ECAEE
Salaries - Field Staff	23036	\$	575.03		(44.02)	\$	564.55
Professional Services Agreements (PSA)			(33.55)	(10.48)	(44.03)		
Professional Services Agreements (PSA)			608.58	-	608.58		

Description	Class Code	1	TEA - 7897	TEA - 7898	Sub-Total	Total
Workforce Solutions Cameron	23034	\$	30,964.71	\$ 9,448.33		\$ 40,413.04
Salaries - Project Managers			1,109.63	345.39	1,455.03	
Salaries - Program Managers and Field Staff			1,124.26	450.06	1,574.32	
Professional Services Agreements (PSA)			19,440.35	5,945.80	25,386.15	
Progress Monitoring Licenses			4,392.41	1,387.08	5,779.49	
eCIRCLE Professional Dev Licenses			718.056	-	718.06	
Teacher Incentive			4,180.00	1,320.00	5,500.00	
Workforce Solutions of Central Texas	23073	\$	6,779.61	\$ 2,053.12		\$ 8,832.72
Salaries - Project Managers			154.56	53.51	208.06	
Salaries - Program Managers and Field Staff			626.49	187.78	814.27	
Professional Services Agreements (PSA)			4,217.45	1,331.83	5,549.28	
eCIRCLE Professional Dev Licenses			261.111	ı	261.11	
Teacher Incentive			1,520.00	480.00	2,000.00	
YWCA Lubbock (FY2011 Community)	23077	\$	21,551.42	\$ 6,805.72		\$ 28,357.14
Professional Services Agreements (PSA)			21,551.42	6,805.72	28,357.14	
Community Expenses	23030	\$	71,745.86	\$ 22,660.21		\$ 94,406.07
Professional and Contracted Services						
Teachscape - Course Development for all teachers professional development			71,172.88	22,475.64	93,648.52	
Other Operating Costs						
Travel - Airfare			380.79	132.83	513.62	
Travel - Miscellaneous			192.19	51.74	243.93	
SUB - TOTAL		\$	835,430.65	\$ 252,306.27		\$ 1,087,736.92

INFR	<b>EASTR</b>	U	CTUF	RE				
Salaries and fringes	23062	\$	25,484.60		078.83		\$	34,563,43
Directors		T	10,659.52	. ,	,477.26	14,136.78	7	0 1,0 000 10
Project Manager			5,948.75	2	,069.07	8,017.82		
Administrative Support Staff			8,876.33	3	,532.50	12,408.83		
Professional and Contracted Services		\$	274.34	\$	-		\$	274.34
Long Distance Calls			274.34		-	274.34		
Supplies and Materials		\$	306.14	\$	96.68		\$	402.82
Desktop, Laptop, Printer, and Accessories			306.14		96.68	402.82		
Other Operating Costs		\$	2,008.16	\$	123.31		\$	2,131.47
Travel			106.82		33.15	139.97		
Copy			1,901.34		90.16	1,991.50		
SUB-7	ΓOTAL	\$	28,073.24	\$ 9,	298.82		\$	37,372.06

COMMUNITIES + INFRASTRUCTURE									
	TEA - 7897								
TOTAL Direct Costs	\$ 863,503.89	\$ 261,605.09	\$ 1,125,108.98						
TOTAL Indirect Costs	\$ 129,524.71	\$ 39,240.20	\$ 168,764.91						
TOTAL Project Costs	\$ 993,028.60	\$ 300,845.29	\$ 1,293,873.89						

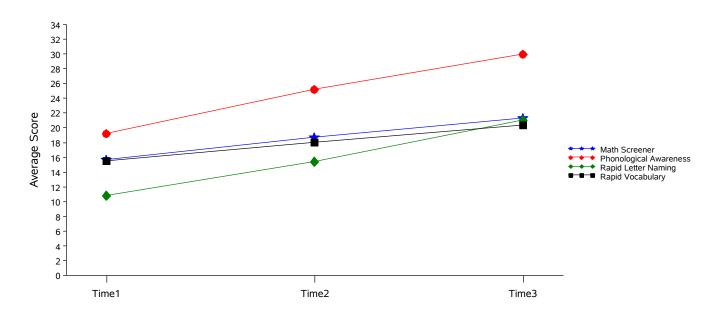
# **Appendix 3:**

Texas School Ready! Project Results: Child Progress Monitoring

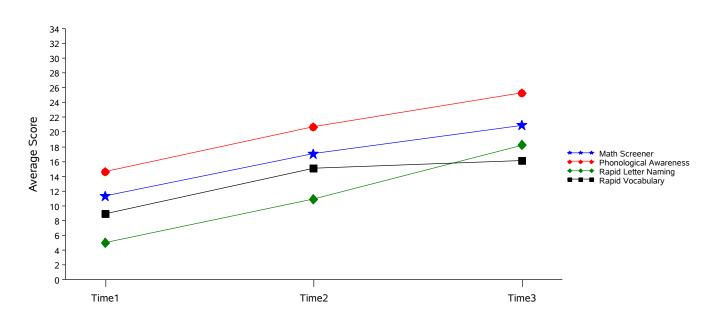
# 2012 Texas School Ready! Progress Monitoring Results

Progress monitoring of children's reading readiness is a key feature of the TEEM/Texas School Ready! model. The two graphs below depict progress monitoring results across three distinct time periods during FY 2012 and demonstrate gains that children made in their progress towards school readiness. The scores include progress in Letter Knowledge, Phonological Awareness, Vocabulary, and Mathematics. All scores are further broken down for tests given in English and Spanish. These four scores are important indicators that correlate highly with a child's success upon kindergarten entry and longer term academic success. The more that young learners have an early mastery of letters, words, sounds, and math, the better they tend to do in school as they progress into the upper elementary grades and beyond.

### Monitoring Reading Readiness in English



### Monitoring Reading Readiness in Spanish



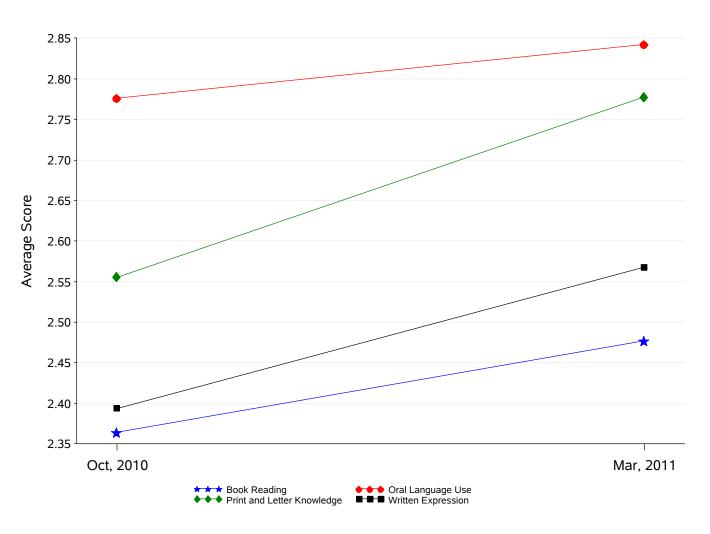
# **Appendix 4:**

Texas School Ready! Project Instructional Improvement: Performance Measurement

# 2011 Texas School Ready! Instructional Improvement Performance Measurement

Periodic observational review of teacher performance in TSR! classrooms provides critical information about the impact of the program on the workforce TSR! works to build. Quality instruction in the context of responsive teacher-child interactions is key to children's school readiness. The graph below depicts change in instructional quality among randomly selected year 1 teachers from fall to spring across four areas of early literacy instruction, including: book reading, oral language use, print and letter knowledge, and written expression. These graphs demonstrate that, within a few months, teachers participating in the TSR! program show improvements in the quality of instruction provided across a broad range of areas known to predict child learning.

# Instructional Quality



# **Appendix 5:**

Texas School Ready! Project: Research Summary from the Journal of Educational Psychology

# Study of the Effectiveness of Professional Development For Teachers of At-Risk Preschoolers<sup>1</sup>

### Children's Learning Institute UT Health Science Center at Houston

Susan H. Landry, Jason Anthony, Paul R. Swank, and Pauline Monseque-Bailey

Many states estimate that half of their students begin kindergarten without the foundational skills necessary to have a good chance of succeeding in school. Scientific research continues to show that a child's experiences *before* elementary school directly impact brain development in ways that affect later learning, behavior, and physical and mental health. Children from families at poverty levels of income, because of life stresses, psychological distress, and poor parental role models, are at the *highest risk* for not engaging in experiences that are most likely to promote school readiness, including those that advance a child's language and literacy development.

Quality early childhood education is the primary means for overcoming these deficiencies and giving children from low-income backgrounds an opportunity to start kindergarten with the skills necessary to succeed.<sup>4</sup> Research evidence shows that children from impoverished backgrounds who are supported by teachers trained in instructional strategies that promote key foundational skills can demonstrate average levels of development by the time they enter kindergarten.<sup>5</sup> Because low-income families tend to rely on early childhood programs that accept federal subsidy<sup>6</sup>, it is critical that these programs promote the best possible learning for young children and school readiness.

There is often a serious mismatch between the preparation of early childhood educators and the preparation needed to optimize classroom practices. However, effective professional development has been shown, even with early childhood educators lacking a formal educational background, to improve early childhood program quality. Therefore, *comprehensive professional development* for early childhood educators may be a key element in ensuring that at-risk preschool students have access to teachers with a deep understanding of research-based instructional practices who can prepare them for school success.

### **Study Description**

The primary objective of this study was to demonstrate that teachers serving low-income children in three types of early childhood education programs—subsidized childcare, Head Start, and public school prekindergarten—could be directed through high-quality training to use effective instructional practices that promote children's development of language and literacy.

The study was conducted in four states—Florida, Maryland, Ohio, and Texas—during the 2004-2005 and 2005-2006 school years. Study participants included 262 early childhood educators in 158 schools. The following table summarizes the demographic characteristics of the participating preschool teachers and classrooms.

<sup>&</sup>lt;sup>1</sup> Published in Volume 101 (No. 2), 2009, Journal of Educational Psychology.

# **Classroom and Teacher Characteristics by Study Site**

Characteristic	Florida (65 teachers)	Maryland (59 teachers)	Ohio (65 teachers)	Texas (73 teachers)
Classroom type (%)				
Public school	0	74	0	38
Head Start	27	26	100	37
Child Care	73	0	0	25
Language of instruction (%)				
English	40	96	100	85
Spanish	60	4	0	15
Length of day (%)				
Full day	88	96	35	77
Half day	12	4	65	23
Teacher education (%)				
High school/CDA	97	0	26	23
2-year college	3	0	40	30
4 or more years college	0	100	34	47
Teacher ethnicity (%)				
African American	19	53	37	6
Caucasian	6	42	60	22
Hispanic	75	5	3	72
PreK Teaching Experience				
Mean years	7.31	6.00	8.55	8.15
Note. CDA = Child				
development associate				

This multisite study specifically tested the effectiveness of four professional development programs that were developed using scientifically based research and models of successful professional development. To measure the effectiveness of the professional development programs, schools were randomly assigned to *one of five* conditions—"business as usual" (control group) or to one of the four professional development programs.

Teachers in the study, including those in the control group, were required to follow a published curriculum—but not any particular published curriculum—that built-in a scope and sequence for language and literacy learning activities to be used in a purposeful but playful way.

In addition, children from each study classroom were randomly selected to participate in pre- and post-assessments to determine the effectiveness of each professional development model. Across the four sites, 1,786 children were assessed. About 42 percent of the children were Hispanic, 34 percent were African American, 17 percent were Caucasian, 2 percent were Asian, and 5 percent were other.

All four professional development programs had a set of common components, which included year-long, facilitated small-group training using an online course, eCIRCLE, developed by the Children's Learning Institute at the UT Health Science Center at Houston. This course emphasizes language and literacy instruction, practice of learned material in the classroom, and participation in online message boards with fellow teachers. All four programs also required

teachers to use the same supplemental curricula and associated materials and the same curriculum based measures to assess student progress.

The programs differed in whether they included regularly scheduled in-classroom mentoring with a trained facilitator and detailed feedback on progress monitoring data that provided recommendations for grouping children and for instructional activities included in the supplemental curriculum. Specifically, schools participated in one of these four professional development conditions:

- Teachers received both *in-classroom mentoring* and *detailed*, instructionally linked feedback concerning children's progress in language and literacy using a personal digital assistant (PDA) version of an assessment (C-PALLS) for early childhood phonological awareness, language and literacy.
- Teachers received *no mentoring* but did receive the *detailed*, instructionally linked feedback on children's progress using the PDA version of C-PALLS.
- Teachers received *in-classroom mentoring* but only *limited* feedback on children's progress, which was not linked to curricular activities.
- Teachers received *no mentoring* and only *limited* feedback on children's progress.

#### **Teacher and Student Results**

The impact of the different professional development approaches on teaching and student learning were measured using multiple assessments. Teachers were rated before and after the completion of the professional development program using The CIRCLE-Teacher Behavior Rating Scale (TBRS).<sup>8</sup> The TBRS rates the quality and frequency of specific teaching behaviors in the classroom including activities related to book reading, oral language development, print and letter recognition, written expression, and phonological awareness. Student learning was measured using the Expressive One-Word Picture Vocabulary Test<sup>9</sup>, Preschool Language Scale—Fourth edition<sup>10</sup>, Developing Skills Checklist<sup>11</sup>, and the Preschool Comprehensive Test of Phonological and Print Processing<sup>12</sup>. These assessments measure a preschooler's expressive vocabulary, language development, and phonological and print awareness.

The most powerful of the four professional development approaches for improving the overall quality of teaching and specifically the quality and frequency of instruction of early writing, phonological awareness, letter knowledge, and shared reading was the most comprehensive approach that included *in-classroom mentoring* and *detailed* instructionally linked feedback. The differences between teachers in this group and those without the professional development program were highly significant, and the effectiveness was seen across all four sites. In short, teachers who received comprehensive professional development became better teachers.

Not only was the most comprehensive professional development effective in improving the quality of teaching and classroom environments, but it was also effective in promoting children's learning. Students of these teachers graduated with better language comprehension, more advanced phonological awareness, larger breadth of expressive vocabulary, and more print and letter knowledge than children in the control group. The effects were significant and showed meaningful improvements in children's readiness for kindergarten.

It is notable that children's learning outcomes were significantly improved through professional development of hundreds of teachers rather than through costly and labor-intensive direct intervention with thousands of children.

The use of *technology* was an important key to the success of the professional development. Not only was the eCIRCLE training delivered to all four professional development groups online, but some of the most robust findings from the study were tied to the use of the PDA-based progress monitoring tool. The PDA version provided teachers with immediate feedback about children's learning from one assessment to the next, provided comparisons across multiple skill areas for each child, recommended how to group children into small groups, and identified specific instructional activities to use with smaller groups of children. All of this consistently resulted in improvements in teachers' instruction and children's learning.

### **Challenges to Implementing Program Broadly**

This study brought to light several challenges to executing an early childhood educator professional development program more broadly. It is critical that these challenges be addressed as part of any effort to broaden the availability of comprehensive professional development for preschool teachers.

- Staff at all levels, including superintendents, directors, coordinators, and teachers, must be committed and supportive of the program. A thorough explanation of the intervention, including a discussion of the demands on a teacher's time and the level of commitment required to achieve effects, is critical.
- Local and centralized technology support must be provided because of the extensive use of technology to deliver this professional development program. The study not only encountered minor problems with the technology platform and locating computer labs for group sessions, but also found a need to train some teachers to work with computers and PDAs.
- Some oversight and communication among project managers and facilitators is essential in order to ensure fidelity of program implementation and maximize effectiveness.
- Curriculum used in the classroom must have a strong focus on emergent literacy
  and have a scope and sequence of instructional activities that parallels the
  objectives in the online courses even though a specific, mandated curriculum is
  not required.

#### **Future Directions**

This study demonstrated impacts on teachers' behavior, classroom environments, and children's learning within the same year that teachers received the professional development. The learning outcomes for the children in some areas, such as vocabulary and phonological awareness were sometimes small, so it will be important to assess effects of the professional development programs after teachers participate for a second year. This will determine whether another "dose" provides an opportunity for teachers to hone their skills, which may result in even better student learning results.

The study was unable to determine if the effectiveness of the professional development program varied by teacher education (high school/child development associate, 2-year college, 4 or more years of college) because of the limited sample of classrooms at each study site. However, the study anecdotally found that the least competent teachers required the more comprehensive professional development to change their instructional practices to an extent that increased student learning. Identification of recommended dosage levels for teachers of different

competence levels is an important issue to examine since it will help ensure that resources earmarked for professional development are most effectively allocated.

#### **Conclusions**

- The most powerful of the four professional development approaches for improving the overall quality of preschool teaching and student learning was the most comprehensive approach that included in-classroom mentoring and detailed instructionally linked feedback.
- Comprehensive professional development provided to preschool teachers can significantly improve children's learning outcomes at a lower cost than providing costly, direct intervention to children once they reach elementary school.
- Technology was an important key in successfully and cost-effectively delivering
  professional development to preschool teachers and in providing them with
  immediate feedback about children's progress and instructional needs, which
  resulted in improved teacher instruction and children's learning.
- Comprehensive professional development can have an immediate impact on preschool teachers' behavior, classroom environments, and children's learning.

#### **Footnotes**

```
<sup>1</sup>Highlighting NAEP 2003 (2003); Zill & West (2001).

<sup>2</sup>DiPietro (2000); Landry et al. (2001); Neville et al. (1998).

<sup>3</sup>Hart & Risley (1995); Neuman (1996).

<sup>4</sup>Bowman et al. (2001); Snow et al. (1998).

<sup>5</sup>Landry et al. (2001).

<sup>6</sup>Phllips et al. (1994).

<sup>7</sup>Howes, Phillips, & Whitebook (1992); Kontos, Howes, & Galinsky (1997).

<sup>8</sup>Landry et al. (2000)

<sup>9</sup>Brownell (2000)

<sup>10</sup>Zimmerman, Steiner & Pond (2002)

<sup>11</sup>Developing Skills Checklist (1990)
```

### References

<sup>12</sup>Lonigan et al. (2003)

Bowman, B.T., Donovan, M.S., & Burns, M.S. (Eds.). (2001). *Eager to learn: Educating our preschoolers*. Washington, DC: National Academy Press.

Brownell, R. (2000). *Expressive One-Word Picture Vocabulary Test*. Novato, CA: Academic Therapy. *Developing Skills Checklist*. (1990). Monterey, CA: CTB/McGraw-Hill.

DiPietro, J.A. (2000). Baby and the brain: Advances in child development. *Annual Review of Public Health*, 21, 455-471.

Hart, B., & Risley, T.R. (1995). *Meaninful differences in the everyday experiences of young American children*. Baltimore: Paul H. Brookes.

Highlighting NAEP 2003. (2003). *National Assessment for Educational Progress Oregon*, *1*(1), 1. Retrieved July 17, 2007, from http://www.ode.state.or.us/initiatives/naep/naepnews\_vol01num01.pdf

Howes, C., Phillips, D., & Whitebook, M. (1992). Thresholds of quality: Implications for the social development of children in center-based child care. *Child Development*, 63, 449-460.

Kontos, S., Howes, C., & Galinsky, E. (1997). Does training make a difference to quality in family child care? *Early Childhood Research Quarterly*, 43, 351-372.

- Landry, S.H., Crawford, A., Gunnewig, S., & Swank, P.R. (2000). *The CIRCLE-Teacher Behavior Rating Scale*. Unpublished research instrument.
- Landry, S.H., Smith, K.E., Swank, P.R., Assel, M.A., and Vellet, S. (2001). Does early responsive parenting have a special importance for children's development or is consistency across early childhood necessary? *Developmental Psychology*, *37*, 387-403.
- Lonigan, C.J., Wagner, R.K., Torgesen, J.K., & Rashotte, C.A. (2003). *Preschool Comprehensive Test of Phonological and Print Processing*. Austin, TX: PRO-ED.
- Neuman, S.B. (1996). Children engaging in storybook reading: The influence of access to print resources, opportunity, and parental interaction. *Early Childhood Research Quarterly*, 11, 495-513.
- Neville, H.J., Bavelier, D., Corina, D., Rauschecker, J., Karni, A., Lalwani, A., et al. (1998). Cerebral organization for language in deaf and hearing subjects: Biological constraints and effects of experience. *Proceedings of the National Academy of Sciences of the United States of America*, 95, 922-929.
- Phillips, D.A., Voran, M., Kisker, E., Howes, C., & Whitebook, M. (1994). Child care for children in poverty: Opportunity or inequity. *Child Development*, 65, 472-492.
- Snow, C.E., Burns, M.S., & Griffin, P. (Eds.). (1998). *Preventing reading difficulties in young children*. Washington, DC: National Academy Press.
- Zill, N., & West, J. (2001). *Entering kindergarten: A portrait of American children when they begin school* (NCES 2001-035). Washington, DC: U.S. Department of Education, Office of Educational Research & Improvement.
- Zimmerman, I.L., Steiner, V.G., & Pond, R.E. (2002). *Preschool Language Scale—Fourth edition*. San Antonio, TX: Psychological Corporation.

# **Appendix 6:**

An experimental study evaluating professional development activities within a state funded pre-kindergarten program

# An experimental study evaluating professional development activities within a state funded pre-kindergarten program

Susan H. Landry · Paul R. Swank · Jason L. Anthony · Michael A. Assel

Published online: 8 June 2010

© Springer Science+Business Media B.V. 2010

**Abstract** This paper describes the implementation and evaluation for scaling up a comprehensive early childhood teacher professional development program into 11 communities across 2 years with funding through state legislative actions. The comprehensive program had four major components based on results from a previous multi-condition random assignment study across four states. The previous results demonstrated that the most optimum approach for supporting children's school readiness included: (1) teacher on-line professional development with facilitation, (2) classroom mentoring, (3) implementation of a research-based curriculum, and (4) technology-driven progress monitoring that informed instruction. The comprehensive professional development program was evaluated in a new state program designed to bring childcare, Head Start, and public school pre-kindergarten together into integrated partnerships. In Year 1, 220 teachers serving 3834 children were randomly assigned to either receive the comprehensive program or not. Teachers who served as controls in Year 1 received the program in Year 2, and those who received the program in Year 1 participated for an additional year in Year 2, allowing for examination of the effects of one versus 2 years of participation. The program improved teachers instructional practices relative to controls, and a second year of participation resulted in greater gains in children's language and literacy. Results support the need for well-integrated, comprehensive professional development for early childhood educators.

**Keywords** Early education  $\cdot$  Professional development  $\cdot$  Pre-kindergarten  $\cdot$  State initiative  $\cdot$  Early reading

Department of Pediatrics, Children's Learning Institute, The University of Texas Health Science Center, 7000 Fannin, Ste. 2300, Houston, TX 77030, USA

center, 7000 Familin, Stc. 2500, Houston, TX 77050, OS

e-mail: susan.landry@uth.tmc.edu



S. H. Landry ( ) · P. R. Swank · J. L. Anthony · M. A. Assel

#### Introduction

Understanding how to provide young children with an early foundation in school readiness skills is becoming a primary goal of many states in order to decrease the high incidence of school failure and drop-out, particularly for children from low income homes (Kauerz, 2008; National Assessment for Educational Progress-NAEP, 2003; National Research Council, 2001). States estimate that as many as half of their children, particularly those from low socioeconomic (SES) backgrounds and/or learning English as a second language (ESL), are entering kindergarten programs without the basic foundational skills necessary for them to succeed (NAEP, 2003). Discrepancies between early skills for children from low SES versus more advantaged families are known to persist through formal schooling (National Center for Education Statistics, 2001a, b; National Research Council, 2001). Evidence from longitudinal intervention studies demonstrates that there is a long lasting positive influence of quality early childhood education (Campbell, Ramey, Pungello, Sparling, & Miller-Johnson, 2002; Reynolds, Ou, & Topitzes, 2004; Schweinhart, Barnes, & Weikart, 1993) and results from a number of recent studies provide information about key characteristics of a quality program (e.g., Assel, Landry, Swank, & Gunnewig, 2006; Bierman et al., 2008; Hindson et al., 2005; Vasilyeva, Huttenlocher, & Waterfall, 2006; Wasik, Bond, & Hindman, 2006). As many states are seeking solutions for how to provide children from lowincome backgrounds with a quality early education (Kagan & Rigby, 2003; Kauerz, 2008) recent empirical evidence can inform these efforts.

For young children, a quality education includes teachers being skilled in the use of instructional approaches that are sensitive to the child's developmental needs and expose them to experiences with language, emergent literacy, and math within a responsive environment that supports social-emotional development (Burchinal et al., 2008; Hirsh-Pasek & Burchinal, 2006; Landry, 2008). Recent research has demonstrated that children need to enter kindergarten ready to learn academic skills. This includes an understanding and use of vocabulary, complex oral language, and early writing (National Institute for Literacy, 2007). Specific skills include phonological awareness, phonological short-term working memory, and the efficient use of phonological representations of words (Anthony, Williams, McDonald, & Francis, 2007; Anthony et al., 2006). Letter knowledge including naming letters and knowing that they are associated with sounds is also a critical foundation skill (NIL, 2007). It is now accepted that teachers trained in instructional strategies that expose children to experiences with emergent literacy skills are more likely to have students who show cognitive gains that carry into kindergarten (Whitehurst & Lonigan, 1998; Zevenbergen et al., 1997). This body of research directly informed the development of the professional development examined within this report.

The importance of this is highlighted in a recent report where data from six longitudinal data sets that examined the estimated links between three key elements of school readiness (i.e., school-entry academic, attention, social-emotional) and later reading and math achievement across children 8–14 years of age is described (Duncan et al., 2007). In all six studies, the strongest predictors were early academic skills followed by attention skills. Further support of the importance of early



language and literacy skills for reading success comes from a newly released national report (National Early Literacy Panel, 2008). This large meta-analysis demonstrates that young children's language skills, including vocabulary and complex language, as well as early literacy abilities, specifically phonological awareness and letter knowledge, are associated with better reading outcomes in elementary school. Thus, in finding solutions to better preparing children for school, it would appear that attention needs to be given to training teachers in instructional practices that support children's learning of these skills.

#### Issues in professional development

While early childhood educators may not always possess the formal educational background to prepare them for the classroom, effective professional development has been shown to improve the quality of early childhood programs (Howes, Phillips, & Whitebook, 1992; Kontos, Howes, & Galinsky, 1997). However, access to effective professional development has not kept up with the increased acknowledgement of its significance. For example, the Committee on Early Childhood Pedagogy found that for the most part, professional development for early childhood teachers tends to be limited, inconsistent, and fragmented (National Research Council, 2001). There are additional challenges in the early childhood field when attempting to implement meaningful and ongoing changes in teacher practices, including staff turnover, few funds for substantial professional development efforts, and uncertainty around appropriate learning goals for teachers (Dickinson & Brady, 2005).

Conceptual and research models describe the need for a comprehensive set of supports (e.g., professional development, research based curriculum) in order for teachers to assure children develop a range of cognitive and social skills necessary for later school success (Barnett, 2003; Hyson, 2003; Gallagher, Clifford, & Maxwell, 2004; National Association for the Education of Young Children-NAEYC, 2008a; Sullivan, 1999). However, inconsistency has been found across many elements of available professional development programs, including content, approach, duration, and quality (Dickinson & Brady, 2005). Adding to the incoherence, professional development programs frequently occur with no conceptual framework to adequately define teacher development so that determining goals, choosing instructional strategies, and evaluating outcomes is difficult (e.g., Little, 1994; Miles, 1995). The lack of integration, or connection, across professional development experiences compromises teachers' ability to transfer these experiences into effective classroom practices. To further support good implementation, teachers need learning over time, practice within the classroom, and follow-up of these efforts (Smylie, Allensworth, Greenberg, Harris, & Luppescu, 2001), characteristics that are often lacking in professional development for early childhood teachers.

Guidelines for early childhood professional development exist, such as a position statement developed by the NAEYC (2008a), that support the need for early childhood teachers to understand the role of curriculum content, optimal conditions



under which young children learn, and the ability to engage in reflection of one's teaching practices (NAEYC, 2008a; National Research Council, 2001). Other guidelines address program delivery characteristics, for example that activities must be sustained and that participation be collective, the importance of being responsive and sensitive to individual differences in children's learning and the role of the home environment and cultural backgrounds in the learning process (NAEYC, 2008a; National Association of Child Care Professionals, 2008).

While establishing standards of quality is facilitated by these types of guidelines; they do not detail facets of teacher change, nor elucidate how teachers gain skills in specific domains. For example, even those teachers who are fairly well-qualified, but obtained their education before the mid-1990s, have an understanding of early literacy development that is limited, since what is known in this field has grown vastly in the past two decades (e.g., Dickinson & Neuman, 2005; Sulzby & Teale, 1991).

#### Theoretical framework for proposed professional development

Our professional development program was guided by an approach that is systematic and connected to solid practices of effective teacher development. Based on research describing effective elements of professional development programs, we attended to teacher's attitudes and beliefs about the content that should be incorporated within a preschool classroom. Based upon this theoretical framework, it was expected that attention to teachers' beliefs that might be at odds with our professional development model would allow teachers and staff to address these areas and work through resistance and be more accommodating to new learning (Bereiter, 1972; Richardson, Anderson, Tidwell, & Lloyd, 1991; Speck, 1996). We also recognized teachers' existing knowledge of childdevelopment theory and expectations about children. We incorporated models for teachers to construct knowledge with opportunities for exploration and questioning so that the incorporation of new knowledge into their teaching practices was more likely. Our framework provided support for teachers to work with others in their field for fuller engagement with ideas and materials. It also assured time for practicing new skills in a way that recognized teachers as adult learners and as professionals, utilizing their current expertise. This was done in an effort to allow teachers to become fully competent in the new content and strategies that would better ensure teachers were able to put them into practice (e.g., Bransford, Brown, & Cocking, 2000; Corcoran, 1995; Kennedy, 1997; Elmore, 2002; Learning First Alliance, 2000; Putnam & Borko, 2000). This framework was expected to promote a high level of intellectual engagement in the subject matter by giving teachers the opportunity to understand theory and rationales for new practices, as well as participation in collaborative problem solving, and learning in authentic contexts.

Some models of professional development also describe how the availability of an on-going coach or mentor can support teachers to try new instructional approaches that have been presented in their professional development training (International Reading Association & NAEYC, 1998; Spodek, 1996). This has



improved teacher-child interactions (Corsini & Caruso, 1989; Epstein, 1993) and through the availability of a network of support decreased feelings of isolation (Hayes, Palmer, & Zaslow, 1990).

#### Empirical support for approach of the current study

Prior to conducting the current study, an empirical study was conducted to determine the added benefit of combining multiple types of support to facilitate early childhood teachers' instructional practices (Landry, Anthony, Swank, & Monsegue-Bailey, 2009). In this previous study, three components, highlighted in the literature as important for early childhood teachers, were tested in a multicondition, random assignment approach. These included mentoring, progress monitoring that informs instruction, and web-based professional development with a facilitator. A control "business as usual" condition was compared to four conditions that all included an on-line professional development approach that has been shown to facilitate change in teachers' behaviors and children's outcomes. Across the four professional development on-line conditions, mentoring versus non-mentoring was crossed with a standard paper/pencil approach to assessing children's learning across the year versus a progress monitoring system that provided feedback to the teacher regarding child needs and instructional ideas through the use of a personal digital assessment (PDA) system. The study allowed for assessment of the combination of these components on teaching behaviors and children's outcomes. The results demonstrated that the most optimum approach for supporting children's school readiness included teacher on-line professional development with facilitation and classroom mentoring as well as the use of technology-driven progress monitoring that informed instruction.

Previous studies have demonstrated the efficacy of research-based curriculum that includes scope and sequence of comprehensive language and literacy instructional practices on children's outcomes (e.g., Preschool Curriculum Evaluation Research Consortium-PCER, 2008). Thus, with a conceptual framework supported by the early childhood literature and recent empirical evidence for the importance of combining training and resources, the impact of scaling up a comprehensive professional development program on teacher and child outcomes was evaluated in 11 communities across a large state.

#### The present study

The present study involved scaling up a comprehensive professional development program for early childhood educators across three types of service delivery systems (i.e. Public school, Head Start, Childcare) in 11 communities. These are the three types of programs funded in the United States to provide preschool for low-income children. It was not the study intent to examine for the differential effectiveness of the professional development for the three service delivery agencies as funding was not appropriated to examine this question. Instead, the state model stressed integration among service delivery programs, and community partners were encouraged to put state-funded, degreed, public school teachers in Head Start and



subsidized childcare classrooms. The program components were guided by a conceptual framework informed by the current early childhood professional development literature (e.g., Bransford et al., 2000; Putnam & Borko, 2000) and empirical evidence from our previous random assignment study (Landry et al., 2009). Key characteristics of the framework that guided the development of the program included: (1) a comprehensive set of teacher supports that have clearly identified connections that inform teachers in how to plan and implement language and literacy instructional activities, (2) a comprehensive scope and sequence of learning activities that support teachers to carry out an effective program, and (3) progress monitoring approaches that inform teachers about individual learning needs and appropriate small group practices. Two constraints on the research design were necessarily imposed by the study being part of a state funded initiative. The first constraint that was dictated by the state was that all teachers in the demonstration project must be provided with some level of professional development by the end of the 2 year project. The second constraint was that implementation began in the middle of the school year (December) during the first year of the project because that was when state funds were allocated to the project.

The *first objective* was to examine the effectiveness of the program in terms of change in teachers' instructional practices. To address this objective, teachers in Year 1 were randomly assigned to control or intervention conditions and the change in their instructional practices over the course of the Year 1 intervention were compared. For the first objective, we hypothesized that teachers receiving the professional development program would show significantly greater gains in language and literacy instructional practices compared to teachers in the control condition. Because the implementation in Year 1 was constrained to only 4.5 months, we did not expect the program to benefit child outcomes (e.g., language and literacy skills), although an evaluation of these outcomes was conducted.

The *second objective* was to determine if more exposure to the program resulted in greater improvements in teachers' instruction and greater improvements in children's language and literacy outcomes. This objective was addressed in Year 2 by having teachers who were trained in Year 1 receive an additional year of the program in Year 2 and by having teachers who were controls in Year 1 receive the program for the first time in Year 2. We hypothesized that professional development of increasing length would lead to greater gains in teacher practices and thus improve child language and literacy outcomes.

Finally, the *third objective* (a within group analysis) was to examine the impacts of the program on instructional practices and child outcomes within the group of teachers who were controls in Year 1 and who later participated in the program in Year 2. We hypothesized that teachers who received the program in the second year would show greater gains in their instructional practices compared to the gains they showed within the first year of the study and this would lead to greater gains in children's outcomes during the second year. The research design as related to the three study objectives is summarized in Fig. 1.



		Schoo	l Year
Number of Years in PD Program by End of Year	Label for Study Condition	2003/2004	2004/2005
0	control teachers	Group 1 <sup>a,c</sup>	
1	1st year program teachers	Group 2 a	Group 1 b,c
2	2 <sup>nd</sup> year program teachers		Group 2 b

Tracking of two groups of teachers across experimental conditions and time.

**Fig. 1** Illustration of study objectives and group comparisons. *Note*. Teachers were randomly assigned to Group 1 or Group 2 in late 2003. <sup>a</sup> Between group comparison to address objective 1. <sup>b</sup> Between group comparison to address objective 2. <sup>c</sup> Within group comparison to address objective 3

#### Methods

#### **Participants**

#### Communities

A request for applications was opened in September 2003 for communities interested in participating in the professional development program. All applicants had to meet certain criteria. Programs were required to bring together a leadership committee that crossed three early childhood programs that serve low-income children (i.e., Head Start, subsidized childcare, school district) into a partnership to identify common school readiness goals (e.g., all agreed to use the same curriculum). Programs also had to identify a lead agency to coordinate offices for program coordinators and mentors and agree to random assignment of 20 classrooms within the partnership to "business as usual" vs. participation in the program with stratification across the three types of classrooms. In addition, the community partnership had to agree to use a research-based language and literacy curriculum from the state approved list. The partnership also was required to use the professional development model including the progress monitoring system, a facilitated on-line course, and in-classroom mentoring. Finally, they had to agree to participate in training for multiple levels of partners within the community (i.e., leadership, mentor, teacher), and in meetings throughout the year to ensure effective implementation. Of the 17 communities that applied, 11 met the above criteria and were accepted into the first year of the program.

In addition, an Advisory Panel, mandated by the state legislation, was comprised of the key state agencies involved with young children (e.g., the Head Start collaborative office, State Department of Family and Protective Services) assisted with program oversight. The State Center also developed a resource panel comprised of national early childhood experts to inform and advise the project.



#### Classrooms

Each of the 11 community partnerships recruited 20 classrooms to participate, for a total of 220 classrooms in Year 1. Community partners were instructed to recruit only one classroom per building to avoid spillover and compensatory rivalry effects. Community partners were also instructed to recruit classrooms from all three service delivery systems. Within community partnership, half of the recruited classrooms from each service delivery system were randomly assigned by the investigators to receive the comprehensive professional development program and the other half served as control classrooms. Because partnerships sometimes had an uneven number of classrooms from a given service delivery system, we occasionally had to balance the assignments across partnerships. For example, if a community partner had five Head Start classrooms and five childcare classrooms, one program type would be allocated three control classrooms and two intervention classrooms and the other program type would be allocated three intervention and two control classrooms. These assignments would subsequently be balanced by those for another community partner who had an uneven number of Head Start classrooms and child care classrooms. Table 1 provides a summary of the participating community partnerships and type of settings within each partnership.

Although 220 classrooms were randomized, teachers from 7 classrooms dropped out of the project in Year 1 (see Table 2). In addition, there was teacher turnover during the first half of the school year, i.e., prior to initiation of the professional development program, in 13 classrooms. These 13 classrooms were retained and the new teachers from these classrooms were given their classroom's original assignment.

Teachers who participated in the evaluation in Year 1 were invited to continue to participate in Year 2 in order to address our second objective. As reported in Table 2, 209 teachers desired to continue their participation in Year 2. Teacher turnover during the summer or the first two months of the school year resulted in

**Table 1** Type of classrooms in the eleven community partnerships at completion of Year 1

ISD Independent School
District, 82% of these
partnerships placed district
degreed teachers into childcare
and/or Head Start classrooms,
anonymity of community
partners was maintained for
purposes of the blind review
process

Community	ISD	Head start	Child care
Partnerships			
Community 1	14	2	4
Community 2	10	3	6
Community 3	9	5	5
Community 4	4	3	13
Community 5	6	6	8
Community 6	8	8	4
Community 7	7	8	5
Community 8	8	7	5
Community 9	9	6	3
Community 10	6	8	4
Community 11	9	3	7
n	90	59	64



**Table 2** Number of teachers and children participating in Years 1 and 2

Teachers replaced in a target classroom received training but no teachers were replaced after Dec. of the study year. If teachers were dropped, then children in that classroom were necessarily dropped as well. Teachers and children who were dropped were excluded from analyses

	Year 1		Year 2		
	Pre	Post	Pre	Post	
Teachers					
Full sample	220		214		
Remained		200		203	
Replaced		13		6	
Dropped		7		5	
Observed sample	99		96		
Remained		85		79	
Dropped		14		17	
Children					
Observed sample	1427		1571		
Remained		1264		1328	
Dropped		163		243	

replacement of 6 teachers from among the 209 teachers who had hoped to continue to participate.

#### **Teachers**

Of the teachers who participated in the Year 1 evaluation that addressed Objective 1, 107 served as controls and 106 served as 1st year program teachers. Table 3 summarizes the educational experience of these teachers separately for each condition. There were no significant group differences in years of experience, educational attainment, certification in early childhood, or class size (see Table 3). The majority of teachers were female, i.e., 98%. The teachers in Year 1 were ethnically diverse; 48.5% Hispanic/Latino, 22% African American, 27% White, and 2.5% self reported as "other".

In Year 2, there were 209 teachers whose participation addressed our second objective, with 126 teachers receiving the professional development program for the first time (i.e., 1st year program teachers), and 83 receiving a second year of the program (i.e., 2nd year program teachers). The ethnic breakdown of teachers in Year 2 was similar to that in Year 1; 46% Hispanic/Latino, 20% African-American, 31.5% White, and 2.5% Other.

Our third objective was addressed with a subset of teachers who served as controls in Year 1 and then as 1st year program teachers in Year 2. From the original pool of 107 teachers who served as controls in Year 1, nearly half were randomly selected to be observed in Year 1. Of the teachers observed in Year 1, 14 were among the 79 teachers randomly selected for observations in Year 2. Thus, objective 3 was addressed with 14 teachers who provided observation data in both years. All of these teachers were female. Most of these teachers were Hispanic/Latino (71%) and the remaining teachers were split evenly between African American and



**Table 3** Characteristics of classrooms and teachers in Year 1 by Objective 1 study condition

	Controls	Targets	df	$t/\chi^2$	p
Classroom					<u>_</u>
Class size $M$ (SD)	17.86 (3.95)	17.74 (4.23)	1,172	.19	.848
Teacher					
Yrs experience $M$ (SD)	5.59 (4.90)	7.09 (7.21)	1,172	2.65	.104
Education level (%)			4	2.29	.682
High school diploma	7	10			
Child development associate	16	21			
Associate degree	15	13			
Bachelor degree	33	42			
Postgraduate degree	6	13			
Early childhood Ed. Cert (%)			1	.09	.760
Yes/No	34/43	46/53			
n	76	99			

Teacher data was available for 80% of classrooms

White/non-Hispanic. Thus, the subset of teachers who provided data for Objective 3 was very similar to the full sample of teachers who provided data for Objectives 1 and 2.

#### Children

The 213 classrooms enrolled in Year 1 served 3834 children, and the 209 classrooms enrolled in Year 2 served 3150 children. Each year, up to 8 children with parental consent for testing were randomly selected from each classroom to provide assessment data. Thus the sample of children in Year 1 was comprised of 1264 children, and the sample in Year 2 was comprised of 1328 children (see Table 2).

Because the Year 1 evaluation of program effects on child outcomes yielded null results as expected by the short duration of the program in Year 1, we primarily report the demographic characteristics of children who participated in Year 2. More specifically, this sample of 1328 children, who provided data to address Objective 2, was relatively balanced by gender (51% female) and was ethnically diverse; 68% Hispanic/Latino, 19% African American, 12% Caucasian, and 1% "other". The Year 2 sample averaged four and half years of age at pretest. Table 4 reports demographics of the Year 2 sample disaggregated by study condition. There were no significant differences in age, gender, ethnicity, or language of testing between children whose teachers were in their first year of the professional development program and children whose teachers were in their second year of the professional development program, Fs = .00 to 1.24; ps = >.20 (see Table 4). Children enrolled in Head Start, public pre-Kindergarten, and childcare programs within the 11 communities that participated in the current project were culturally diverse and from low-income families.



	1st ye	year teacher $2$ nd year teacher $df$ $F$		2nd year teacher			F	p	
Age at pretest (years) <sup>a</sup>									
M (SD)	4.4	.4	802	4.4	.4	528	1,1328	-1.24	.21
Gender (%)							1,1076	.00	.99
Male/female	48.8/51.2		49.1/5	49.1/50.9					
Ethnicity (%)							3,1074	.04	.99
African American	19.5			18.5					
Hispanic/Latino	66.8			68.5					
Caucasian	12.1			12.0					
Other	1.6			1.0					
Language of testing (%)							1,1086	1.53	.22
Spanish/English	20.8/	79.2		13.6/8	36.4				
n	800			527					

**Table 4** Characteristics of children in Year 2 sample separated by Objective 2's study conditions

Data are for 96% of children evaluated at both pretest and posttest unless otherwise indicated

Table 2 reports the numbers of randomly selected children who remained in the study and who were lost to attrition each year. Within the Year 2 sample, there were no significant differences between study conditions in terms of the proportion of children who dropped versus remained in the study, based on a nonlinear mixed model that accounted for nesting, t(df = 1297) = .77; p = .442.

The children whose teachers were in the control condition in Year 1 and were in the 1st year program condition in Year 2 represent two independent groups of children (Objective 3). Therefore, we compared demographics between the groups to determine if they were similar. They had similar breakdowns on race/ethnicity,  $\chi^2(3, n=203)=3.80; p=.28$  (.30 by exact test), and gender,  $\chi^2(1, n=203)=.15; p=.70$  (.78 by exact test).

Description of professional development program components

#### Online professional development program

The genesis of the online professional development program was the face-to-face training workshops developed in a prior study conducted within Head Start centers across Texas (Landry, Swank, Smith, Assel, & Gunnewig, 2006). Given the challenge of scaling up the professional development program across multiple communities, the previously developed multiple day workshops were adapted to be appropriate for an online application, called eCIRCLE. The nine courses covered the following topics: (1) Classroom management, (2) Best practices/responsive teaching, (3) Setting the stage for children's talk, (4) Reading aloud, (5) Phonological awareness, (6) Letter knowledge, (7) Mathematics, (8) Written expression, and (9) Language development. Within each course current research-based instructional practices were included. For example, in the phonological



<sup>&</sup>lt;sup>a</sup> Data are for all children with pretest data

awareness course, teachers are presented with the stages of phonological development with rationale for the scope and sequence of activities that are appropriate within a pre-K setting. In addition, they view teachers engaging in age-appropriate phonological awareness instruction via video clips with teacher commentaries on why particular activities and materials are selected. Assessment practices to monitor progress are also discussed along with follow-up activities that meet the needs of individual learners are high-lighted. A similar approach is used in the other courses.

Consistent with theoretical frameworks, the online course involved: (a) smallgroup interactive learning facilitated by a trainer, (b) extensive videotaped modeling of content related activities and expert commentaries that allowed teachers to see examples in realistic contexts that were relevant to their classroom experiences, (c) interactive engagement with online coursework and online assessments of knowledge, (d) opportunity for independent review of all course contents, (e) opportunity for practicing specific skills within the small group (e.g., role playing, development of lesson plans), (f) practice of specific instructional activities in one's own classroom, (g) teacher postings of classroom experiences, and (h) trainer review of postings and feedback. The eCIRCLE online professional development was developed to provide teachers with the appropriate balance between implementing developmentally appropriate activities that are teacher-directed and designed to foster development of specific skills and implementing activities that are child-directed and designed to allow children to enhance mastery and breadth of skills through active exploration. By acknowledging and working within teachers' existing philosophies of instructional practices, it was expected that the program would be more effective in facilitating a high fidelity of implementation. Teachers in the target condition attended bimonthly small group eCIRCLE sessions (n = about 16 teachers) that were facilitated by trained and experienced early childhood educators.

Research has indicated that adults will learn most effectively when they are intellectually engaged in the subject matter through opportunities to understand the theory and rationale for new instructional practices and the learning is situated in authentic contexts (i.e., demonstrating techniques with teachers in classroom settings). It is also important to provide opportunities to do collaborative problem solving and practice specific skills with learning experiences extended over time (e.g., Bransford et al., 2000; Elmore, 2002; Putnam & Borko, 2000).

Based on current research, professional development for early childhood educators has moved from a predominate focus on child-centered approaches to one in which children have opportunities for both self-directed discovery, and times when they are presented with explicit information about vocabulary, number concepts, and letters in a more teacher-directed approach (e.g., NAEYC, 2008b). Professional development often does not provide teachers with current information and the level of specification in their training needed to effectively present and sequence activities in ways that integrate child and teacher directed learning. The on-line program was developed to provide teachers with the appropriate balance. This included implementing developmentally appropriate activities that are teacher-directed and designed to foster development of specific skills, and activities that are child-directed and designed to allow children to enhance mastery and breadth of



skills through active exploration. What distinguishes the pedagogy of the online professional development model in this study is the goal of providing a balance between implementing teaching strategies based on research regarding school readiness and what developmental research indicates about how children learn most effectively.

In general, in our professional development model teachers learned a set of five key elements: (1) consistent use of a responsive interaction style to support learning, (2) content that builds cognitive and social skills, (3) to plan and sequence input and learning activities so that children build concepts, (4) a balance of teaching strategies between teacher vs. child directed, and (5) flexible groupings where instruction occurs in small and large group activities (Landry, 2008). Because teachers had to attend the on-line course after hours, each was provided a \$750 stipend once the course was completed for that year. Paraprofessionals (e.g., aides, teacher assistants) that attended at least some of the course received \$250. Other incentives for teachers and staff included coordination with teacher training colleges to allow for college credit for the professional development program.

#### In-classroom teacher mentoring

Mentoring is thought to provide teachers with opportunities to try new approaches with guided support and a knowledge resource without concerns regarding the mentor having a supervisory role (Eisenhower National Clearinghouse for Mathematics and Science Education, 1998). In this demonstration project, mentoring included planning for 3 h of daily cognitive readiness activities in planful, purposeful, but playful ways, classroom demonstration of how to implement activities effectively, and side by side coaching. The goal was to provide individualized coaching support that met the learner's needs which may be important for early childhood teachers who vary in education and training. Mentors provided the following types of support to teachers in the intervention condition: helping with classroom arrangement, modeling instruction, supporting instructional planning including lesson plans, and reflective follow-up during meetings where CIRCLE "Glows and Grows" reports were provided. Facilitators mentored each teacher twice per month during the first and second year of the project for two hours per visit. Part of the mentor's role was to support teacher's independence in planning, provision of effective instruction, and use of data to guide instruction.

#### Progress monitoring by teachers

The progress monitoring system was implemented with the use of Personal Digital Assistant (PDA) technology to assist the teacher in receiving systematic guidelines in the assessment procedures. Evaluation of child skills in the areas of letter knowledge, vocabulary, and phonological awareness are included in the progress monitoring system. The system was designed to be used three times across an academic year (i.e., fall, winter, and spring). Teachers are provided a time window of 2–3 weeks to complete the assessments on all children enrolled in their classrooms. The 3-week window is used during the initial progress monitoring data



collection wave given that teachers have to become comfortable using the PDA system and subsequent data collection waves occurred across a 2 week window. Due to the starting the project during the winter in Year 1, progress monitoring activities were completed two times (i.e., winter and spring). Most children can complete the 3 measures (i.e., Letter Naming, Vocabulary, and Phonological Awareness) in less than 10 min.

The system included evaluation of children's vocabulary and letter knowledge using a 60 s fluency method. Using a flip chart booklet, children were shown pictures of objects and actions and asked to name them. This same approach was used with pictures of letters, upper and lower-case. The PDA cued teachers to move forward with the next item after a certain number of seconds when the child had not answered. Three separate stimulus booklets were used across the year to assure that the children saw different pictures and letters at each assessment point. Each of the three vocabulary booklets contained 70 pictures and the three letter knowledge booklets included a separate random order of the upper and lower case letters. The system also included individual child assessment of phonological awareness by asking the child to demonstrate knowledge of rhyming words, sentence segmenting, alliteration, separating words into syllables, and onset rime. For each of the three skill areas, the teacher was cued to input the child's response as either correct or incorrect. The PDA also allowed the teacher to make observations of a child's social and early writing skills as well as a checklist of the classroom environment. The teachers' instructional activities were not directly linked to the items assessed with the PDA approach but rather included a large array of activities in each language and literacy area to promote general growth in these skills that would be expected to translate into higher skills across the year.

An advantage to the technology approach is that the teacher received immediate feedback about an individual child's growth in each skill, how to group children for more effective learning, and specific activities to use with different groups of children. Grouping of children according to learning needs is known to maximize instructional impact (e.g., National Research Council, 2001; Leeper & Witherspoon, 1984). Progress monitoring measurements are sensitive to change within and across children, and assist teachers in focusing on learning outcomes as they are shown to correlate with standardized measures of comparable child skills and have good inter-rater reliability (Landry et al., 2009).

State approved language and literacy curricula and classroom materials

At the time of program implementation, the state had an approved list of pre-kindergarten curricula selected by a panel of experts for state adoption. This included seven language and literacy curricula from which classroom participants could choose. The majority of the classrooms chose to use Building Language and Literacy (Scholastic Inc., 2003), Let's Begin with the Letter People (Abrams & Co., 2003), or DLM Childhood Express (SRA/McGraw-Hill, 2003). Other curricula used in a smaller number of classrooms included Doors to Discovery (Wright Group/McGraw, 2002), Pebble Soup (Rigby/Harcourt, 2002), and We Can! (Sopris West, 2003). In addition to the curriculum, each classroom was provided with a set of



materials to organize the classroom and a School Readiness kit (i.e., series of small containers filled with literacy rich manipulatives and books).

#### Design and evaluation procedures

#### Mentor and teacher fidelity

To assure fidelity of the mentor's implementation of the program, the following procedures were put in place. A five-day training for mentors was first conducted and covered all aspects of the program (e.g., ordering materials, teacher mentoring, weekly teacher observation, teacher training, progress monitoring, and external observations and child testing). At the beginning of the year, a Classroom Environmental checklist was completed on every program classroom and was discussed on follow up visits. Monthly conference calls were conducted with focused agendas between State Center management staff and mentors.

Teacher fidelity was evaluated by the 11 mentors submitting monthly reports of success and challenges in the key program components and "Glows and Grows" reports of their visits with each program teacher plus a mentoring log where the activity in the classroom was coded. In addition, two fidelity visits to observe the teacher mentor process were completed by investigators across Year 1 and three across Year 2 at each of the 11 sites. If a teacher or mentor was perceived as being less than effective, an additional visit was made. Communication between the investigators and community partnerships as well as the mentors occurred throughout the year. Finally, the mentors and community partnership leaders participated in a 2-day meeting at the State Center three times during each year for additional training and problem solving.

#### Evaluation of teacher outcomes

Eighty-five randomly selected teachers were observed at the beginning and end of the program in Year 1 (Objective 1). This same process was repeated in Year 2 and 79 teachers were observed at pre and post program implementation (Objective 2). Classroom observations occurred during winter and spring during Year 1 and fall and late spring for Year 2. Because the random selection for observations was repeated each year, a smaller number of teachers (n=14) had post-program implementation observations when they were control classrooms in Year 1 and in program classrooms in Year 2 (Objective 3).

#### Evaluation of child outcomes

In Year 1, 639 children from control classrooms completed pre and post testing as did 626 children from 1st year teacher program classrooms. In Year 2, 800 children had 1st year teachers and 527 children had 2nd year teachers. There were fewer children for 2nd versus 1st year teachers because communities were only allowed to replace 2nd year teachers who did not return in Year 2 with 1st year program teachers. This was necessary to address Objective 2.



Assessment of children also occurred by research staff blind to the classroom treatment condition. Assessors were trained to spend time talking with each child in a playful manner to help them become comfortable before initiating the assessment process. Children took breaks for toileting, snacks, and/or to allow movement as needed on a per child basis. Consequently, testing sessions ranged from 10 to 30 min in length, and multiple testing sessions were encouraged if needed. Testing of a given child was usually completed in a single day. For classrooms employing bilingual instruction with children whose home language was Spanish, the teacher was interviewed using a systematic set of questions for each of the children selected for testing. From this information, a determination was made as to whether to assess individual children in Spanish or English.

#### Measure of teacher behaviors

The Teacher Behavior Rating Scale (TBRS) (Landry, Crawford, Gunnewig, & Swank, 2000) was used to evaluate change in teaching behaviors in intervention and control classrooms. The Teacher Behavior Rating Scale contains 10 subscales and a total of 54 individual items that were rated on a 5 point scale. The TBRS includes the following subscales: (1) responsive teaching practices, (2) centers, (3) lesson plans, (4) oral language, (5) book reading, (6) print & letter knowledge, (7) written expression, (8) phonological awareness, and (9) team teaching. Each subscale contains between two items (i.e., Phonological Awareness subscale) and nine items (i.e., Book Reading subscale). For example, the Oral Language subscale contains seven items and evaluates the ability of teachers to speak clearly and use grammatically correct sentences, ability to model how to express ideas in complete sentences, use of scaffolding language, use of thinking questions, relating previously learned material or concepts to a classroom activity, encouragement of language development throughout the observation, and engaging children in conversations that involve turn taking. Items are scored on a 5-point scale with ratings of 1 indicating very low quality interactions and ratings of 5 indicating frequent high quality teacher-child interactions. Within the emergent literacy and language areas, TBRS subscales scores that are close to 1 indicate that there is little to no instruction or interaction occurring that is tied to TBRS concepts (e.g., Phonological Awareness, Print and Letter Knowledge). Ratings of 2 represent infrequent moderate quality interactions or instruction, or more frequent low quality interactions with students (e.g., not engaging for children). In these classrooms, teachers are referencing or presenting early academic concepts to students across TBRS content areas. TBRS scores in the 3 and above range indicate more frequent, moderate quality interactions that engage children. These teachers not only present early academic content but do so in a way that allows children more opportunities to interact verbally and manipulate materials that are linked to learning goals. To obtain subscale scores, scores on individual items are averaged across each subscale. The TBRS Total score represents average of ratings across all items on the entire measure. Appendix A provides a description of the types of questions contained within each TBRS subscale.



The TBRS was designed during a prior professional development project in order to have a measure that documented the specific language and literacy instructional practices shown by recent research to be important for later reading competence (Assel, Landry, & Swank, 2007). The TBRS also provides attention to responsive teaching practices, quality of language input, as well as classroom organization and effectiveness in helping children with routines that provide support for behavioral regulation. Individuals participating in the professional development program were not provided with copies of the TBRS during any phase of the current project. In past professional development projects that have used the TBRS, effect sizes (i.e., Cohen's d) obtained on TBRS subscales in intervention classrooms as compared to control classrooms have been in .5 to 1.0 range (Landry et al., 2006). Inter-rater reliability for the TBRS using generalizability coefficients was high, ranging from .80 to .98 (Mitchell, 1979). Internal consistency also was high, .96. Although significant correlations between subscales are found, these were not so high that the information was redundant. Validity was established by examining gains in teacher scores with gains in child scores on standardized measures of language and literacy. Prior predictive validity research on the TBRS (Assel et al., 2007) has demonstrated that the teacher scores on the TBRS are correlated with child outcomes at high levels. Specifically, the correlations between the TBRS total score and child language outcomes were .60 and .63 when language outcomes were evaluated with the Preschool Language Scale—4 (Zimmerman, Steiner, & Pond, 2002) and the Expressive Vocabulary Test (Brownell, 2000). In addition, the correlation between the TBRS Total score and child scores on the Woodcock Johnson—III Letter Word Identification subtest was .51 (Woodcock, McGrew, & Mather, 2001).

#### Measures of child outcomes

To provide further assessment of the professional development program, children's gains in language and literacy skills were obtained using a group of standardized measures that have been used in other evaluations of early childhood intervention effectiveness (e.g., PCER, 2008).

#### Child vocabulary

The Expressive One-Word Picture Vocabulary Test (EOWPVT) (Brownell, 2000) was used to measure children's oral language skills. The EOWPVT measures children's ability to correctly label an action or concept depicted for individuals 2–18 years of age and has English and Spanish versions. Examinees are presented with stimulus pages containing an individual color picture and asked to correctly label each picture. Internal consistency values for 2- to 5-year-olds range from .96 to .98 for split-half values (corrected) and from .93 to .95 for Cronbach's alpha values. Test–retest reliabilities over a 20-day interval are .88 and .89 for 2- to 4-year-olds and 4- to 7-year-olds, respectively. A number of studies show concurrent validity with correlations ranging from .64 to .87 with other language measures and from .67 to .90 with other specific measures of vocabulary (Brownell, 2000).



#### Child composite language

The English and Spanish versions of the Preschool Language Scale—4th Ed. (PLS-4) (Zimmerman et al., 2002) were used to assess complex receptive language development. This measure has been highly sensitive to demonstrating change in young children's language development in relation to teacher enhancement projects (e.g., (Landry et al., 2009). Six day test–retest reliability for the Auditory Comprehension Scale is .87 and .95. Internal consistency ranges from .91 to .93. Validity for the PLS-4 also has been established through correlating with other measures of language and accurately identifying children with differences in language development (Zimmerman et al., 2002).

#### Child phonological awareness

The Elision subtest of the Preschool Comprehensive Test of Phonological and Print Processing (Pre-CTOPPP) (Lonigan, Wagner, Torgesen, & Rashotte, 2003) was used in Year 1 to measure phonological awareness. It was designed as a downward extension of the Comprehensive Test of Phonological Processing (Wagner, Torgesen, & Rashotte, 1999). This subtest measures children's ability to identify or produce a target word resulting from the deletion of a part of a stimulus word. Initial items require children to delete a one- or two-syllable word from a compound word (e.g., seesaw without see). Middle items require deletion of a syllable from a word (e.g., candy without /di/), and final items require removal of a phoneme from a word (e.g., lamp without /p/).

In Year 2, because of difficulty finding basal levels with the young children in the study on the Elision subtest of the Pre-CTOPPP, the Auditory subscale from the Developing Skills Checklist was used (CTB/McGraw-Hill, 1990). This subtest evaluates a range of phonological processing skills including rhyming, syllabication, and alliteration and provides raw scores and percentages. Internal consistency of the Auditory subscale for pre-kindergarten aged children was .84 (Kuder-Richardson Formula 20). The mean score of the Auditory subtest for the standardization sample was 12.78 (out of 21 possible items) with a standard error of measurement of 1.87 (CTB/McGraw-Hill, 1990).

#### Child letter & print knowledge

The Pre-CTOPPP (Lonigan et al., 2003) was used to assess print knowledge. The Print Knowledge subtest assesses children's knowledge of print concepts, letter discrimination, word discrimination, letter-name knowledge and letter-sound knowledge. Internal consistency for the Print Awareness subtest is moderate to high for 3 to 5-year-old children (i.e., alphas .89 to .95, respectively) as is test-retest reliabilities (.50 to .90), and validity coefficients (>.43) (Lonigan et al., 2003).



#### Results

Data analyses: examination of missing data

As across the two years of the study there was some loss of teachers and children from pre to post-testing, multilevel analyses were used to examine if there were differences in pretest scores between those with and without posttest data. From the randomly selected subset of teachers to be observed, there were 99 teachers observed at least one time during the first year and 85 who were observed at least twice (Objective 1). There was no significant difference in the proportion of first year (7.8%) and control (20.8%) teachers who had one versus two observations in Year 1,  $\chi^2(1, n = 99) = 3.44$ ; p = .064. There also were no difference between groups on education level,  $\chi^2(4, n = 82) = .83$ ; p = .935 (.937 by exact test), program type,  $\chi^2(3, n = 58) = 2.24$ ; p = .524 (.552 by exact test), race/ethnicity,  $\chi^2(3, n = 82) = 4.86$ ; p = .182 (.198 by exact test), or gender,  $\chi^2(1, n = 82) = 1.60$ ; p = .205 (.501 by exact test).

In Year 2, 96 teachers were observed at least once and 79 who were observed at least twice (Objective 2). There was no significant difference in the proportion of first year or second year teachers who had one versus two observations during the year,  $\chi^2(1, n = 96) = 1.49$ ; p = .222. Of those with data at both pre and post, there was no difference in the breakdown by education,  $\chi^2(4, n = 78) = 2.71$ ; p = .607 (.632 by exact test), race/ethnicity,  $\chi^2(2, n = 78) = 1.18$ ; p = .757 (.947 by exact test), or by gender,  $\chi^2(1, n = 78) = .21$ ; p = .650 (.849 by exact test).

For the second year of the project, children with and those without posttest data demonstrated equivalent abilities on all pretest measures except the Pre-CTOPPP Print Awareness, for which children with posttest data demonstrated higher scores, t(385) = 2.32, p < .05. However, the effect size for this difference was only .15 standard deviations. Thus, the missing as compared to available data appears to be mostly at random.

Data analyses for examining three objectives

#### Teacher behaviors

For Objective 1, analysis of covariance (i.e., ANCOVA) was used to examine differences between the 85 teachers with pre and post data on post-test TBRS scores, controlling for pre-test TBRS scores. To address Objective 2, ANCOVAs were used to assess the extent to which more experience with the program made a difference in teaching behaviors between two independent groups of teachers (n = 79), those who were 1st year teachers versus those who were 2nd year teachers, controlling for pre-test TBRS scores. For Objective 3, analysis of variance (i.e., ANOVA) examined post-test differences on the TBRS between teachers (n = 14) who were randomly assigned as control teachers in Year 1 to those same teachers who became 1st year program teachers in Year 2.



#### Child skills

Child testing occurred during winter and spring of Year 1 and fall and spring of Year 2. The children in Year 1 vs. Year 2 classrooms were different and thus, the student observations were independent across years and nested within classrooms, that is, the design is multilevel. To handle the nesting we used a general linear mixed models analysis via SAS Proc Mixed (SAS, 2007). Mixed models include those models referred to as hierarchical linear models (HLM) plus many others. Thus, the nesting of children into classrooms is controlled. We did not expect differences for child outcomes in Year 1 given the short time period and analyses confirmed these expectations (Objective 1). For Objective 2, multilevel ANCOVAs examined post-test child scores with the pretest, age at pre-test, language of testing (English or Spanish), and time between assessments used as covariates/moderator. Interactions among covariates and treatment conditions were retained if significant. Any variable or interaction that was nested within a significant interaction was retained in the model. Treatment condition (first vs. second year of program participation) was the independent variable. For Objective 3, the multilevel ANOVA analyses were conducted using posttest data only for the children of control teachers in Year 1 and children of those same teachers who were 1st year teachers in Year 2. The two groups of students did not differ on race/ethnicity,  $\gamma^2(3,$ n = 1017) = 4.64; p = .20, or on gender,  $\gamma^2(1, n = 1015) = .49$ ; p = .484. For all analyses, only the final models are presented.

#### Significance of the program effects

To evaluate the significance of the program results, effects sizes are reported as Cohen's d (Cohen, 1988). This statistic is determined by obtaining the differences between groups' post-test scores after partialing covariate effects and dividing by the pooled standard deviations at pre-test. This has the advantage of not depending on the sample size for the model being tested (Raudenbush & Liu, 2001). The practical significance for effect sizes are: small, d = .20; moderate, .50, and large, .80 (Cohen, 1988).

#### Objective 1: Effect of Program on Teaching Behaviors

Before comparing groups on the outcomes, we examined for group differences on the TBRS pretest scores. The program group was significantly higher than controls only for the written expression, F(1, 83) = 5.13; p = .026, effect size = .50). Appendix B provides the Means (SD) and statistics for all the pretest TBRS scores. When examining for the effects of the program, pre to post-test significant differences were found on most of the TBRS subscales in favor of program teachers relative to control teachers. The results are summarized in Table 5, illustrated in Fig. 2, and model parameters provided in Appendix C. With just 4 months of the program in Year 1, 1st year program teachers showed greater gains in their use of language-building activities including the quality of their book reading, general conversations with children, and the use of oral language activities to build these



	Objectiv	re 1			Objective	e 3	
	df	F	p	d	F	p	d
Teaching behaviors							<u></u>
Total	1, 82	19.74	.0001	.84	32.60	.0001	1.71
Language							
Book reading	1, 79	9.27	.003	.57	39.56	.0001	2.27
Oral language	1, 82	5.89	.017	.40	57.61	.0001	2.04
Emergent literacy							
Phonolog awareness	1,82	9.10	.003	.66	27.98	.0001	2.45
Print knowledge	1,82	25.16	.0001	1.03	25.50	.0002	1.98
Written expression	1, 81	3.36	.071	.39	3.61	.0793	.55
Responsive teaching pr	actices						
Total	1, 82	9.78	.002	.56	40.32	.0001	2.21
Classroom organization	ı						
Centers	1, 81	8.48	.005	.63	19.18	.0007	1.22
Lesson plans	1, 79	6.15	.015	.59	19.36	.0007	1.45

**Table 5** Summary of changes on the teacher behavior rating scale for Objectives 1 and 3

For Objective 3, all df = 1, 13

skills. Small to moderate effect sizes were found. More positive gains also were found in emergent literacy instructional practices including phonological processing and print knowledge activities with moderate to large effect sizes. In addition, teachers who received the professional development program showed better responsive teaching practices, organization of their centers, and the use of lesson plans. These program effects were moderate with a large effect size found for differences on the total TBRS score.

Objective 2: Effect of Length of Program Participation on Teaching Behaviors and Child Skills

In Year 2, teachers who were in the control condition during year one moved into the program (i.e., 1st year teachers) while teachers who were in the program during Year 1 continued to receive more training (i.e., 2nd year program teachers). This design allowed us to compare the quality of instruction between teachers who differed in the amount of program participation. A similar comparison could be made of child outcomes between children with teachers in their second versus first year of the program.

#### Comparison of teaching behaviors

Pretest differences were found in favor of the 2nd year teachers for book reading, F(1, 95) = 9.41; p = .003, effect size = .63, and centers, F(1, 95) = 6.88; p = .01. Appendix B reports the Means (SD), and test statistics for comparisons of pretest TBRS scores between 1st and 2nd year teachers. No statistically



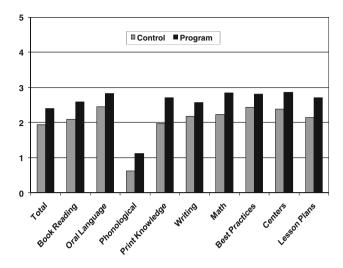


Fig. 2 Comparison of teaching behaviors for control versus 1st year teachers (Objective 1)

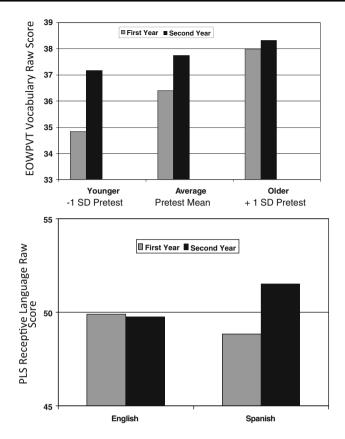
significant post-test differences on the TBRS subscales were observed between 2nd and 1st year program teachers. Effect sizes ranged from .01 to .53.

#### Comparison of child skills

We examined the Year 2 data for group differences in children's pretest scores before analyzing the Year 2 data for treatment effects. Appendix D reports means, standard deviations and test statistics for comparison of pretest scores between children with 1st year program teachers and those with 2nd year teachers. There were no statistically significant differences on any of the language or literacy measures at pretest, with effect sizes ranging from—.06 to .09. Next, we examined effects of the intervention on child outcomes. Appendix E provides the parameter estimates of models that describe the effects of amount of teacher participation in the program on children's language and emergent literacy outcomes.

*Vocabulary*. The final model for children's vocabulary skills revealed a significant effect of the length of their teachers' program participation that depended upon age at pretest, F(1, 1061) = 4.73; p < .03, effect size = .16. That is, children of 2nd year teachers demonstrated larger vocabularies at the post test and this was especially true for younger children (Fig. 3, top). In addition, the program effect was dependent upon pretest and the language of testing, F(1, 1061) = 4.29; p < .04; effect size = .35. In other words, having a teacher who was in their second year of the program was particularly beneficial for the vocabulary development of English language learners who had low vocabulary at the beginning of the year.





**Fig. 3** Effects of teachers' length of program participation on children's expressive vocabulary by age (top). Complex receptive language by test language is shown at the bottom (Objective 2)

Complex language. A positive, significant, main effect was found for amount of teachers' participation in the program on children's complex language, F(1, 1107) = 14.44, p = .0002. However, this depended on the pretest score and age at pretest, F(1, 1107) = 19.49; p < .0001, as well as the language of testing, F(1, 1107) = 11.41, p = .0008. Figure 3 (bottom) illustrates the interaction with test language. Children tested in English had high post-test scores regardless of the amount of teacher training but those tested in Spanish had higher posttest scores if their teachers were in the second year of training, effect size = .34. With regard to the interaction with pretest scores, the findings show that the second year of teacher preparation was especially beneficial for younger children who were also higher on the pretest and for older children who were lower on the pretest, effect size = .44.

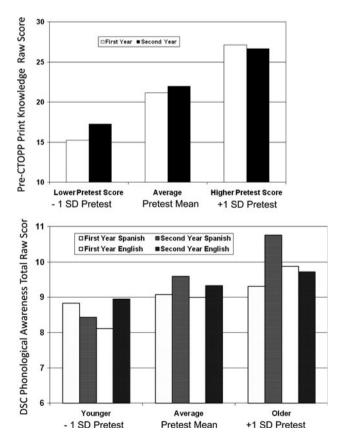
Letter and print knowledge. Significant differences also were found for the print knowledge total score but this was dependent on children's pretest scores, F(1, 1118) = 9.29, p < .003, effect size = .34 (Fig. 4). The finding indicated that the posttest scores were significantly higher for children who had teachers in their



second year of the program relative to children who had teachers in their first year of the program, but this was particularly true for those children who showed lower scores at the pretest. Thus, the effect of the second year of training seemed to be particularly important for children with lower print knowledge skills at the beginning of the year.

*Phonological awareness.* On the Developing Skills Checklist phonological awareness subtest there was a significant group by age by language of testing interaction, F(1, 1116) = 6.13; p < .02 (Fig. 4). Children tested in Spanish, particularly those who were older at the beginning of the year, had higher posttest scores if their teacher was in their second year of training, effect size = .50. Conversely, children of 2nd year teachers who were tested in English seemed to do better if they were younger at the beginning of the year, effect size = .26 (Fig. 4). Objective 3: Comparison of the Same Teachers without and with the Program

Across the 2 years, there were some teachers who were in the control condition in year 1 and who participated in the program in year 2. These teachers had two



**Fig. 4** Effects of teachers' length of program participation on children's print knowledge (*top*) and phonological awareness (*bottom*) skills (Objective 2)



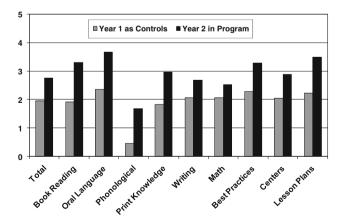
different cohorts of children who could be compared; children in control classrooms in Year 1 (n=491) and children in program classrooms in Year 2 (n=506). Differences were compared on post-test TBRS data and post-test child data. Thus, while the TBRS analyses were based on 14 randomly selected teachers with data across both years, the child outcomes were based on all children tested in control classrooms for Year 1 and first year program classrooms in Year 2. Model parameters are provided in Appendix F for comparison of teaching behaviors and in Appendix G for child outcomes.

#### Comparison of teaching behaviors

The comparison of teaching behaviors for the same teachers as control vs. first year program teachers showed similar, but stronger effects than the teaching results for Objective 1 (Table 5; Fig. 5). Large effect sizes were found for language building, book reading, and emergent literacy activities, phonological awareness and print and letter knowledge. Teachers who participated in the professional development program demonstrated more responsive teaching practices, for which there was a large effect size as well as a large effect size for the total TBRS score.

#### Comparison of child vocabulary and complex language

Results based on the EOWPVT indicated that the scores for the children who were taught by teachers after they participated in the program were significantly higher than scores for the children under the control condition, F(1, 904) = 17.90; p < .0001, and that this depended upon the age of the child, F(1,904) = 5.63; p < .02, effect size = .26 (Fig. 6). The greatest differences in vocabulary between the groups were found among older children. No significant differences were found for children's complex receptive language.



**Fig. 5** Comparison of teaching behaviors for the same group of teachers when control teachers versus 1st year teachers (Objective 3)



### Comparison of child print knowledge and phonological awareness

The main effect of teacher participation in the program was significant on children's Print knowledge total score, F(1, 918) = 4.93; p < .03, effect size .11. The results indicated that the children tested while their teachers were in the control condition scored significantly lower than children tested when their teachers were participating in the program. A similar model resulted when only the letter sounds score was analyzed, F(1, 918) = 4.06; p < .05; effect size = .10. Again, the children had higher scores when their teachers were participating in the program versus when they were controls (see Fig. 6). The program effects were even larger for naming letters, F(1, 916) = 14.31; p = .0002; effect size = .20 (see Fig. 6). No significant differences were found for child phonological awareness skills.

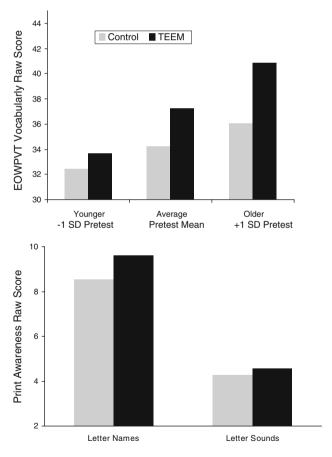


Fig. 6 Comparion of children's vocabulary skills (top) and print knowledge (bottom) for children with teachers in control classrooms versus 1st year of the program (Objective 3)



#### Discussion

The need to find effective solutions for providing quality early childhood programs for children from low income backgrounds is great. The challenge of implementing effective programs to meet this need is even greater. This study evaluated a comprehensive set of professional development supports to determine if they could be effective in promoting greater gains in early childhood teachers' instructional practices in language and early literacy as well as responsive teaching practices. Based on the results of a recently completed, federally-funded, study across communities in four states, an educational model was adopted that included four key components (Landry et al., 2009). In this previous study, professional development using an on-line facilitated, intensive set of pre-kindergarten courses was found to support strong changes in pre-kindergarten teachers' instructional practices, particularly when it was paired with a classroom mentor, and a PDA progress monitoring system that provided immediate feedback describing children's progress in key language and literacy skills and information about appropriate instructional activities. In this previous study, curriculum could not be a controlled aspect of the design. However, a research based language and literacy curriculum was included as a key component in the program described in this report. Support for the decision to include the use of a state approved research based curriculum came from a recent experimental study where curriculum was a design feature and found to be an important factor in understanding gains in children's language and literacy skills (Assel et al., 2006; PCER, 2008).

Objective 1: Comparison of Year 1 Effects for Program versus Control Teachers

Results show evidence that the educational components are effective in promoting greater change in the program teachers' instructional practices when compared to the control teachers. Greater gains with moderate to large effect sizes were found for the program teachers in the initial 4-month training period across most of the subscales of the TBRS. Evidence of the program's effectiveness was found in the quality of classroom practices such as responsive teaching techniques, organizing the classroom into learning centers and in the development of lesson plans to include key language and literacy activities that showed an understanding of scope and sequence. Some of the greatest gains were found in school readiness emergent literacy instructional activities. For example, program teachers were observed to implement more activities that supported children's development of early literacy skills such as print and letter knowledge. Another key predictor of early reading success, oral language development, also showed differences where program teachers outperformed control teachers. While the changes in instructional practices related to language building activities were smaller than the change in emergent literacy practices, this is an instructional area that previously has been found to be more resistant to change in early childhood teachers' practices. It is, therefore, encouraging that in a 4-month period small to moderate effects could be achieved. A previous study showed that the mentoring component was particularly helpful in



supporting teachers' use a greater amount of language scaffolding techniques and richer vocabulary (Landry et al., 2009).

#### Objective 2: Effects of Amount of Time Teachers Participated in the Program

### Change in teaching behaviors

Although the amount of time a teacher participated in the program was expected to result in differences in instructional practices, no differences were found. The teacher observation measure (TBRS) used in this study attempted to capture both quantity and quality of teaching instruction with a single score. A more recent version of this measure discriminates these two important aspects of teaching by having a quantity and a quality score for each item. Results of a recent study using this revised version documented differences across the two aspects. For example, differences were sometimes found across groups of teachers' behaviors for quantity but not quality (Landry et al., 2009). It might be expected that teachers in the second year of the program were similar in the amount of activities used with children across the different skill areas compared to those in their first year of training. However, the manner in which activities were implemented may have been at a different level of quality. This would help explain why some differences were found in the children's language and literacy outcomes related to the amount of program participation the children's teachers had received

#### Change in child skills

Differences in the amount of teachers' exposure to the program were apparent when examining the children's development of language and early literacy skills. While a positive effect of additional teacher participation was seen for all skills evaluated, these often were dependent upon the child's age and language of assessment. For example, there were stronger language skills, both for vocabulary and complex language, for children whose teachers were in their second year of the program. However, gains in vocabulary were significant for children who were younger at the beginning of the school year and, for both vocabulary and complex language, for those evaluated in Spanish. As children tested in Spanish would be learning English as a second language and had a limited amount of English at the beginning of the school year, they might be considered as children who needed the most support from teachers to develop language skills. This could be expected to be true for younger children as well. Thus, the results suggest that the teachers who had more mentoring and more exposure to the on-line facilitated courses were better prepared to assist those children who typically require more specialized support.

The two aspects of emergent literacy that have been found to be unique predictors of reading from the recently released National Early Literacy Panel



report (2008), also showed greater increases if children's teachers were in their second year of the program. For letter-sound correspondence this finding was strongest for children who were lower at the pretest (i.e., beginning of the school year) while gains in print discrimination skills were larger for English language learners (ELL). The effect of amount of teacher participation also was seen for phonological awareness skills where age at pretest and language of assessment moderated the effects. Again, effects were found for younger children and for ELL. This may occur because of the complexity of phonological awareness such that a more experienced teacher is better able to implement the type of activities needed to support younger and ELL children's learning of this skill. These findings suggest that although changes in teachers' instructional practices may occur within the first year of implementing a professional development program, the effect of the programmatic change on children's development of new skills may not be apparent until the teachers have enough exposure to the fully integrated program that will have the potential to support learning for the children of greatest need.

Objective 3: Effect of Program on Teaching Behaviors and Child Skills—Comparison of the Same Teachers across Two Years and Different Classrooms of Children

The design of this experimental evaluation allowed for comparison of a small group of teachers who had been randomly selected for evaluation in year 1 as control teachers and again in year 2 as program teachers. The differences in these teachers' school readiness instructional practices before and after the program were found in almost all areas of teaching and the improvements were strong after teachers had support from the program. The different groups of children in these teachers' classrooms across the two years also showed differences in their language and emergent literacy gains across the school year. Gains in naming letters were greater for those children who were in classrooms with the teachers who had the program. Also, vocabulary development was greater for children whose teachers had the program compared to children when the teachers were controls. Children who were older at the beginning of their pre-kindergarten school year and their teachers had the program showed the biggest advantage on vocabulary growth. It may be that the older children within 3 and 4 year old classrooms are ready to benefit more than younger children from exposure to quality language and literacy instructional activities. However, this does not appear to be the case for children with more experienced teachers. As the benefit of a second year of the program (Objective 2) often showed effects, particularly for children who were younger and for ELL, it may be that the older age effect and absence of ELL seen for Objective 3 is related to teachers being in their first year of the program.



### Study limitations

There are limitations to this experimental evaluation of a state funded, prekindergarten demonstration program. For example, the flow of funding allowed for only 4 months, rather than the full school year for the evaluation of the Year 1 program. Thus, while there were strong teacher findings across this period, we were not able to detect significant differences in children's early academic competencies during the first year of implementation. Also, as the state required that by Year 2 all teachers receive the program, it was not possible to evaluate over the second year effects for program versus control teachers and children. While a high percentage of teachers who were initially enrolled remained in the project (i.e., 91%), one potential limitation of this work surrounds the fact that the large scope of the project did not allow for exit interviews to be conducted with those teachers who left early. However, a 9% attrition rate in a sample that includes a majority of childcare and Head Start classrooms would appear to indicate that, at the minimum, the professional development program did not lead to attrition rates that were greater than what is typically expected in Head Start and child care classes across an academic year. The attrition within the study can be put into perspective given that the National Center for Education Statistics reports an attrition rate of 17% for teachers working in elementary and secondary schools across the academic year ending in 2004 (National Center for Education Statistics, 2008). It also must be noted that this study may not generalize to other pre-kindergarten populations because of the high proportion of Spanish-speaking children enrolled. Another limitation is that the study only follows children through the end of pre-kindergarten. A future objective will be to examine longer term effects of the program as children move into formal schooling. All of the 11 community partnerships had Head Start, public school, and subsidized childcare classrooms. However, the scope of this study did not allow for examination of differential effectiveness of the program across these three types of service delivery within communities. Thus, it will be important for future research to evaluate the extent to which the comprehensive set of professional development supports are equally effective for different types of early childhood programs. In spite of this, given the effectiveness of the program on teacher and child outcomes with each type of service delivery program represented, the results do suggest that within integrated partnerships this type of professional development approach has promise.

**Acknowledgments** This work would not have been possible without the efforts of our trainers, mentors, teachers, and research associates.

#### Appendix A

See Table 6.



Table 6 Description of TBRS content areas and sample question

Subscale	# of items	Sample question
Book reading	9	Vocabulary words are combined with pictures or objects when preparing to and/or reading books aloud
Centers	7	Materials, activities, and objectives follow the current theme and are linked to learning goals (exciting and obvious theme = high; look for appropriate rotation of seasonal items, and refreshing of materials)
Dynamic assessment	3	Recent dated documentation of children's developmental progress across all emergent literacy areas through the use of cognitive checklists/ assessments
Responsive teaching	9	Uses encouragement and positive feedback that provides children specific information regarding what they are doing well
Lesson plans Portfolios	2	Lesson plan shows strong thematic connection in written lesson plans (detailed information that ties theme related material to learning objectives
Oral language	7	Uses "thinking" questions (open-ended, "why", "how") or comments to support children's thinking or activity of interest
Phonological awareness	2	Overall quality of PA instruction is evaluated within the first PA item. The second item allows classroom observers to indicate the specific type of PA activity that was observed (e.g., Listening, Rhyming, Alliteration, Sentence Segmenting, Syllable Blending and Segmenting, Onset-Rime, and Phoneme Blending)
Print knowledge	7	Discusses concepts about print (text contains letters, words, sentences, reading progresses left to right, top to bottom, etc.)
Team teaching (if applicable)	5	Teacher and assistant work together so that small groups of children receive ongoing instruction in center activities, small group activities, and read-alouds
Written expression	3	Provides children with a variety of opportunities and materials to engage in writing (e.g., journals, response to literature)

## Appendix B

See Table 7.

Table 7 Tests of teacher condition difference on TBRS scales at pretest in Years 1 and 2

					-				
TBRS subscale	Control teachers		Target	Target teachers			F	p	
	M	SD	n	M	SD	n			
Year 1									
Book reading	2.28	.80	37	2.57	.93	46	(1, 81)	2.24	.14
Centers	2.34	.82	38	2.57	.69	47	(1, 83)	1.98	.16
Dynamic assessment	.47	.49	38	.52	.47	47	(1, 83)	.21	.65
Responsive teaching	2.37	.78	38	2.58	.64	47	(1, 83)	1.79	.19
Lesson plans	2.16	.91	37	2.35	1.00	46	(1, 81)	.79	.38
Oral language	2.59	.92	38	2.80	.96	47	(1, 83)	1.01	.32



Table 7 continued

TBRS subscale	Contro	ol teache	rs	Target teachers			df	F	p
	M	SD	n	M	SD	n			
Phonological awareness	.82	.84	38	.96	.70	47	(1, 83)	.69	.41
Print	2.01	.78	38	2.22	.70	47	(1, 83)	1.65	.20
Team teaching	2.93	.88	27	2.75	1.06	35	(1, 60)	.43	.51
Written expression	1.99	.92	37	2.50	1.02	47	(1, 82)	5.13	.03
Total score	2.01	.58	38	2.15	.54	47	(1, 83)	1.63	.21
TBRS subscale	1st year teachers			2nd year teachers			df	F	p
	M	SD	n	M	SD	n			
Year 2									
Book reading	2.73	.69	43	3.17	.67	36	(1, 77)	8.27	.005
Centers	2.38	.55	43	2.66	.65	36	(1, 77)	4.32	.04
Dynamic assessment	.38	.38	43	.35	.35	36	(1, 77)	.19	.66
Responsive teaching	2.89	.57	43	2.95	.49	36	(1, 77)	.25	.62
Lesson plans	2.94	.88	43	3.01	.97	36	(1, 77)	.09	.76
Oral language	3.25	.63	43	3.36	.57	36	(1, 77)	.67	.42
Phonological awareness	1.55	.55	43	1.58	.64	36	(1, 77)	.05	.82
Print	2.68	.53	43	2.84	.64	36	(1, 77)	1.50	.23
Team teaching	2.87	.95	30	2.69	.83	28	(1, 56)	.61	.44
Written expression	2.29	.54	43	2.42	.58	36	(1, 77)	1.03	.31
Total score	2.38	.35	43	2.50	.44	36	(1, 77)	1.72	.19

# Appendix C

See Table 8.

**Table 8** Model parameters from the prediction of TBRS scores in year, control teachers versus 1st year teachers (Objective 1)

Effect	Estimate	SE	df	t value	p value
Book reading					
Intercept	1.8040	.2592	79	6.96	<.0001
Pretest	.3206	.0919	79	3.49	.0008
Group = Control	4986	.1638	79	-3.05	.0032
Centers					
Intercept	1.6514	.3020	81	5.47	<.0001
Pretest	.4928	.1095	81	4.50	<.0001
Group = Control	4838	.1662	81	-2.91	.0046



Table 8 continued

Effect	Estimate	SE	df	t value	p value
Responsive teaching pa	ractices				
Intercept	1.9420	.2386	82	8.14	<.0001
Pretest	.3514	.0869	82	4.04	.0001
Group = Control	3856	.1233	82	-3.13	.0024
Lesson plans					
Intercept	1.7475	.3170	79	5.51	<.0001
Pretest	.4279	.1187	79	3.60	.0005
Group = Control	5661	.2283	79	-2.48	.0153
Math					
Intercept	1.9725	.2641	81	7.47	<.0001
Pretest	.4051	.1082	81	3.74	.0003
Group = Control	6273	.2135	81	-2.94	.0043
Oral language					
Intercept	1.8644	.2495	82	7.47	<.0001
Pretest	.3535	.0813	82	4.35	<.0001
Group = Control	3729	.1535	82	-2.43	.0173
Phonological awarene	ss				
Intercept	1.0067	.1483	82	6.79	<.0001
Pretest	.1118	.1061	82	1.05	.2952
Group = Control	4871	.1615	82	-3.02	.0034
Print knowledge					
Intercept	1.8804	.2364	82	7.95	<.0001
Pretest	.3862	.0976	82	3.96	.0002
Group = Control	7256	.1447	82	-5.02	<.0001
Total score					
Intercept	1.3168	.2090	82	6.30	<.0001
Pretest	.5221	.0920	82	5.68	<.0001
Group = Control	4595	.1034	82	-4.44	<.0001
Written expression					
Intercept	1.6196	.2920	81	5.55	<.0001
Pretest	.4117	.1038	81	3.97	.0002
Group = Control	3811	.2080	81	-1.83	.0706

# Appendix D

See Table 9.



Table 9 Tests of group differences on children's scores at pretest in Year 2

	1st year teachers		2nd year teachers			df	F	p	
	$\bar{X}$	SD	n	$\bar{X}$	SD	n			
Year 2									
Print knowledge total	10.1	7.37	800	10.6	7.98	527	(1, 1325)	1.31	.25
PLS-IV Aud. Comp. RS	44.0	7.46	800	43.9	7.41	527	(1, 1325)	.05	.83
PLS-IV Aud. Comp. SS	85.8	13.6	770	85.0	13.6	507	(1, 1275)	1.09	.30
EOWPVT RS	28.4	12.2	772	28.9	12.8	507	(1, 1277)	.51	.48
EOWPVT SS	80.6	16.5	759	79.8	16.6	500	(1, 1257)	.75	.39
DSC auditory raw score	5.94	3.75	800	6.07	3.72	528	(1, 1326)	.40	.53
DSC auditory—percentiles	32.9	13.3	667	33.1	13.6	461	(1, 1126)	.02	.88

Aud. Comp auditory comprehension, RS raw score, SS standard score

## Appendix E

See Table 10.

**Table 10** Model parameters from the prediction of Year 2 children's outcomes comparing 1st year and 2nd year program teachers (Objective 2)

Effect	Estimate	SE	df	t value	p value			
Complex language								
Intercept	51.5872	.6423	203	80.32	<.0001			
Pretest	.6057	.0568	1107	10.66	<.0001			
Age	1.9878	.8205	1107	2.42	.0156			
Pretest × Age	1433	.0506	1107	-2.83	.0047			
Group = T1	-3.0128	.7655	1107	-3.94	<.0001			
$Pretest \times Group = T1$	0013	.0332	1107	04	.9682			
$Age \times Group = T1$	.1785	.5821	1107	.31	.7592			
$Pretest \times Age \times Group = T1$	.2744	.0621	1107	4.42	<.0001			
Test_Language = English	-1.7712	.6883	1107	-2.57	.0102			
Pretest × Test_Language = English	1727	.0547	1107	-3.16	.0016			
$Age \times Test\_Language = English$	1.6983	.7863	1107	2.16	.0310			
$Group = T1 \times Test\_Language = English$	2.8130	.8328	1107	3.38	.0008			
Time	.0163	.0176	1107	.93	.3527			
Pretest × Time	0046	.0028	1107	-1.67	.0955			
$Time \times Group = T1$	.0106	.0234	1107	.45	.6516			
$Pretest \times Time \times Group = T1$	.0075	.0032	1107	2.32	.0204			
Phonological awareness								
Intercept	9.5883	.5197	203	18.45	<.0001			
Age	2.6169	.9488	1116	2.76	.0059			
Group = T1	5189	.6215	1116	83	.4040			
$Age \times Group = T1$	-2.0796	1.1834	1116	-1.76	.0791			



Table 10 continued

Effect	Estimate	SE	df	t value	p value
Test_Language = English	2607	.5573	1116	47	.6400
$Age \times Test\_Language = English$	-1.7475	1.0206	1116	-1.71	.0871
$Group = T1 \times Test\_Language = English$	.1800	.6749	1116	.27	.7898
$Age \times Group = T1 \times Test\_Language = English$	3.1840	1.2858	1116	2.48	.0134
Pretest	.2066	.0269	1116	7.70	<.0001
Print knowledge					
Intercept	21.9127	.5024	203	43.62	<.0001
Pretest	.6321	.0432	1118	14.62	<.0001
Age	3.4210	.5342	1118	6.40	<.0001
Pretest × Age	3480	.0703	1118	-4.95	<.0001
Group = T1	7836	.6371	1118	-1.23	.2190
$Pretest \times Group = T1$	.1682	.0552	1118	3.05	.0024
Vocabulary					
Intercept	37.7239	1.1708	202	32.22	<.0001
Time	.0429	.0203	1061	2.12	.0343
Age	1.3015	.7943	1061	1.64	.1016
Group = T1	-2.5967	1.3985	1061	-1.86	.0636
$Age \times Group = T1$	2.2740	1.0460	1061	2.17	.0299
Pretest	.8241	.0973	1061	8.47	<.0001
$Pretest \times Group = T1$	2219	.1174	1061	-1.89	.0590
Test_Language = English	0423	1.2484	1061	03	.9730
$Pretest \times Test\_Language = English$	0241	.1008	1061	24	.8111
$Group = T1 \times Test\_Language = English$	2.5383	1.5060	1061	1.69	.0922
$\frac{Pretest \times Group = T1 \times Test\_Language = English}{}$	.2527	.1221	1061	2.07	.0386

## Appendix F

See Table 11.

**Table 11** Model parameters from the prediction of TBRS scores for the same teachers who were controls versus 1st year program teachers (Objective 3)

Effect	Estimate	SE	df	t value	p value
Book reading					
Intercept	3.3065	.1591	13	20.78	<.0001
Year 1 control teachers	-1.3828	.2198	13	-6.29	<.0001
Centers					
Intercept	2.8878	.0997	13	28.98	<.0001
Year 1 control teachers	8521	.1935	13	-4.40	.0007
Responsive teaching practices					
Intercept	3.2910	.1384	13	23.79	<.0001



Table 11 continued

Effect	Estimate	SE	df	t value	p value
Year 1 control teachers	-1.0053	.1583	13	-6.35	<.0001
Lesson plans					
Intercept	3.4921	.1938	13	18.02	<.0001
Year 1 control teachers	-1.2630	.2881	13	-4.38	.0007
Math					
Intercept	2.5238	.2257	13	11.18	<.0001
Year 1 control teachers	4524	.3123	13	-1.45	.1711
Oral language					
Intercept	3.6735	.1020	13	36.00	<.0001
Year 1 control teachers	-1.3163	.1735	13	-7.59	<.0001
Phonological awareness					
Intercept	1.6786	.1538	13	10.92	<.0001
Year 1 control teachers	-1.2143	.2294	13	-5.29	.0001
Print knowledge					
Intercept	2.9603	.1517	13	19.52	<.0001
Year 1 control teachers	-1.1270	.2233	13	-5.05	.0002
Total score					
Intercept	2.7564	.0836	13	32.99	<.0001
Year 1 control teachers	7963	.1394	13	-5.71	<.0001
Written expression					
Intercept	2.6825	.1800	13	14.90	<.0001
Year 1 control teachers	6111	.3209	13	-1.90	.0793

## Appendix G

See Table 12.

**Table 12** Model parameters from the prediction of children's outcomes for the same teachers who were controls versus 1st year program teachers (Objective 3)

Effect	Estimate	SE	df	t value	p value
Letter names					
Intercept	9.0022	.5694	76	15.81	<.0001
Test_Language = English	1.2132	.5843	916	2.08	.0381
Age	1.4827	.8172	916	1.81	.0699
Age × Test_Language = English	1.8919	.9152	916	2.07	.0390
Group = Control	-1.0669	.2820	916	-3.78	.0002
Letter sounds					
Intercept	4.5852	.1882	76	24.36	<.0001
Group = Control	3013	.1496	918	-2.01	.0443



Table 12 continued

Effect	Estimate	SE	df	t value	p value
Age	1.5907	.1960	918	8.11	<.0001
Print knowledge					
Intercept	21.4219	.6658	76	32.18	<.0001
Age	6.5231	.6912	918	9.44	<.0001
Group = Control	-1.1701	.5272	918	-2.22	.0267
Vocabulary					
Intercept	36.5639	1.5258	76	23.96	<.0001
Group = Control	-3.0278	.7157	904	-4.23	<.0001
Age	5.5247	2.2397	904	2.47	.0138
$Age \times Group = Control$	-4.0464	1.7056	904	-2.37	.0179
Test_Language = English	1.3837	1.5488	904	.89	.3719
$Age \times Test\_Language = English$	5.1823	2.3369	904	2.22	.0268

Subset of teachers were the same in control and 1st year program teacher conditions but teachers had two sets of children across the study years

#### References

- Abrams & Co., Pub. (2003). Let's begin with the letter people. Waterbury, CT.
- Anthony, J. L., Williams, J. M., McDonald, R., Corbitt-Shindler, D., Carlson, C. D., & Francis, D. J. (2006). Phonological processing and emergent literacy in Spanish speaking preschool children. *Annals of Dyslexia*, 56, 239–270.
- Anthony, J. L., Williams, J. M., McDonald, R., & Francis, D. J. (2007). Phonological processing and emergent literacy in younger and older preschool children. *Annals of Dyslexia*, 57, 113–137.
- Assel, M. A., Landry, S. H., & Swank, P. R. (2007). Are early childhood classrooms preparing children to be school ready? The CIRCLE teacher behavior rating scale. In L. Justice & C. Vukelich (Eds.), *Achieving excellence in preschool literacy instruction* (pp. 120–135). New York: Guilford Press.
- Assel, M. A., Landry, S. H., Swank, P. R., & Gunnewig, S. (2006). An evaluation of curriculum, setting, and mentoring on the performance of children enrolled in prekindergarten. *Reading and Writing: An Interdisciplinary Journal*, 20, 463–494.
- Barnett, S. W. (2003). Better teachers, better preschools: Student achievement linked to teacher qualifications. New Brunswick, NJ: National Institute for Early Education Research.
- Bereiter, C. (1972). An academic preschool for disadvantaged children: Conclusions from evaluation studies. In J. S. Stanley (Ed.), *Preschool programs for the disadvantaged: Five experimental approaches to early COMPREHENSIVE PROFESSIONAL DEVELOPMENT 463 childhood education* (pp. 1–21). Baltimore: Johns Hopkins University Press.
- Bierman, K. L., Domitrovich, C. E., Nix, R. L., Gest, S. D., Welsh, J. A., Greenberg, M. T., et al. (2008). Promoting academic and social-emotional school readiness: The Head Start REDI program. *Child Development*, 79, 1802–1817.
- Bransford, J., Brown, A., & Cocking, R. R. (Eds.). (2000). How people learn: Brain, mind, experience, and school. Committee on Developments in the Science of Learning, National Research Council. Washington, DC: National Academic Press.
- Brownell, R. (2000). Expressive one-word picture vocabulary test. Novato, CA: Academic Therapy. Burchinal, M., Howes, C., Pianta, R., Bryant, D., Early, D., Clifford, R., et al. (2008). Predicting child outcomes at the end of kindergarten from the quality of pre-kindergarten teacher-child interactions and instruction. Applied Developmental Science, 12, 140–153.
- Campbell, F. A., Ramey, C., Pungello, E. P., Sparling, J. J., & Miller-Johnson, S. (2002). Early childhood education: Young adult outcomes from the Abecedarian project. *Applied Developmental Science*, 6, 42–57.



Cohen, J. (1988). Statistical power analysis for behavioral sciences (2nd ed.). Hillsdale, NJ: Erlbaum. Corcoran, T. (1995). Helping teachers teach well: Transforming professional development. Retrieved online, Dec. 9, 2008 from the Consortium for Policy Research in Education. http://www.cpre.org.

- Corsini, D. A., & Caruso, G. (1989). High quality family day care: Financial considerations. ERIC Document #ED320707. Available from ERIC Document Reproduction Service.
- CTB/McGraw-Hill. (1990). Developing skills checklist. Monterey, CA: CTB/McGraw-Hill.
- Dickinson, D., & Brady, J. (2005). Toward effective support for language and literacy through professional development. In M. Zaslow & I. Martinez-Beck (Eds.), *Critical issues in early childhood professional development* (pp. 141–170). Baltimore: Brookes.
- Dickinson, D., & Neuman, S. B. (2005). *Handbook of early literacy research* (Vol. 2). Port Chester, NY: National Professional Resources, Inc.
- Duncan, G. J., Dowsett, C. J., Claessens, A., Magnuson, K., Huston, A. C., Klebanov, P., et al. (2007). School readiness and later achievement. *Developmental Psychology*, 43, 1428–1446.
- Eisenhower National Clearinghouse for Mathematics and Science Education. (1998). *Ideas that work science professional development*. Columbus, OH: The Ohio State University.
- Elmore, R. R. (2002). Bridging the gap between standards and achievement. *The imperative for professional development in education*. The Albert Shanker Institute.
- Epstein, A. S. (1993). *Training for quality: Improving early childhood programs through systematic inservice training*. Monographs of the High/Scope Educational Foundation, No. 9. Ypsilanti, MI: High/Scope Press.
- Gallagher, J. J., Clifford, R. M., & Maxwell, K. (2004). Getting from here to there: To an ideal early preschool system. *Early Childhood Research & Practice*, 6. Retrieved March 16, 2006 from www.ecrp.uiuc.edu.
- Hayes, J. L., Palmer, J. L., & Zaslow, M. J. (Eds.). (1990). Who cares for America's children? Panel on Child Care Policy. Washington, DC: National Academy Press.
- Hindson, B., Byrne, B., Fielding-Barnsley, R., Newman, C., Hine, D. W., & Shankweiler, D. (2005). Assessment and early instruction of preschool children at risk for reading disability. *Journal of Educational Psychology*, 97, 687–704.
- Hirsh-Pasek, K., & Burchinal, M. (2006). Mother and caregiver sensitivity over time: Predicting language and academic outcomes with variable- and person-centered approaches. *Merrill- Palmer Quarterly*, 52, 449–485.
- Howes, C., Phillips, D., & Whitebook, M. (1992). Thresholds of quality: Implications for the social development of children in center-based child care. *Child Development*, 63, 449–460.
- Hyson, M. (2003). Preparing early childhood professionals: NAEYC's standards for initial licensure, advanced, and associate degree programs. Washington, DC: National Association for the Education of Young Children.
- International Reading Association & National Association for the Education of Young Children. (1998). Learning to read and write: Developmentally appropriate practices for young children. *Young Children, July*, 30–46.
- Kagan, S. L., & Rigby, E. (2003). Policy matters: Improving the readiness of children for school. Recommendations for state policy. Washington, DC: Center for the Study of Social Policy.
- Kauerz, K. (2008). Learning from others: State efforts to expand services and build systems of early care and education. In A. R. Tarlov & M. C. Debbink (Eds.), *Investing in early childhood development* (pp. 85–112). NY: Palgrave Macmillan.
- Kennedy, M. (1997). The connection between research and practice. *Educational Researcher*, 26, 4–12.
  Kontos, S., Howes, C., & Galinsky, E. (1997). Does training make a difference to quality in family child care? *Early Childhood Research Quarterly*, 43, 351–372.
- Landry, S. H. (2008). Effective early childhood programs: Turning knowledge into action. In A. R. Tarlov & M. C. Debbink (Eds.), *Investing in early childhood development* (pp. 67–84). NY: Palgrave Macmillan.
- Landry, S. H., Anthony, J. L., Swank, P. R., & Monsegue-Bailey, P. (2009). Effectiveness of comprehensive professional development for teachers of at-risk preschoolers. *Journal of Educa*tional Psychology, 101, 448–465.
- Landry, S. H., Crawford, A., Gunnewig, S., & Swank, P. R. (2000). The CIRCLE-Teacher Behavior Rating Scale. Unpublished research instrument.
- Landry, S. H., Swank, P. R., Smith, K. E., Assel, M. A., & Gunnewig, S. (2006). Enhancing early literacy skills for pre-school children: Bringing a professional development model to scale. *Journal of Learning Disabilities*, 39, 306–324.



- Learning First Alliance. (2000). Every child reading: A professional development guide. Baltimore, MD: Association for Supervision and Curriculum Development.
- Leeper, S. H., & Witherspoon, D. B. D. (1984). Good schemes for young children (5th ed.). NY: MacMillan.
- Little, J. W. (1994). Teachers professional development in a climate of educational reform. US Department of Education.
- Lonigan, C. J., Wagner, R. K., Torgesen, J. K., & Rashotte, C. A. (2003). Preschool comprehensive test of phonological and print processing. Austin, TX: PROED.
- Miles, M. B. (1995). Forward. In T. Guskey & M. Huberman (Eds.), *Professional development in education: New paradigms and practices*. NY: Teachers College Press.
- Mitchell, F. (1979). Interobserver agreement, reliability, and generalizability of data collected in observational studies. *Psychological Bulletin*, 86, 366–370.
- National Assessment for Educational Progress. (2003). Highlighting NAEP 2003. National Assessment for Educational Progress. Retrieved July 17, 2007, from <a href="http://www.ode.state.or.us/initiatives/naep/naepnews\_vol01num01.pdf">http://www.ode.state.or.us/initiatives/naep/naepnews\_vol01num01.pdf</a>.
- National Association for the Education of Young Children. (2008a). National accreditation for early care and education programs. Retrieved on May, 2008 from http://www.naccp.org.
- National Association for the Education of Young Children. (2008b). Developmentally appropriate practices in early childhood programs serving children from birth through age 8. Retrieved on Dec, 9, 2008 from http://www.naccp.org/about/positions/dap1/asp.
- National Association of Child Care Professionals. (2008). Components of NAC accreditation Standards. Retrieved on May, 2008 from <a href="http://www.naccp.org">http://www.naccp.org</a>.
- National Center for Education Statistics. (2001a). *The nation's report card: Fourth-grade reading 2000*. Retrieved April 6, 2001, from http://nces.ed.gov/nationsreportcard/reading/results.
- National Center for Education Statistics. (2001b). The nation's report card: Mathematics 2000 (Rep. No. NCES 2001-517).
- National Center for Education Statistics. (2008). *The Condition of Education 2008* (NCES 2008-031). Retrieved April 17, 2009 from http://nces.ed.gov/fastfacts/display.asp?id=28.
- National Early Literacy Panel. (2008). Report of the national early literacy panel. Washington, DC: National Institute for Literacy.
- National Institute for Literacy. (2007). [Early literacy predictors of later reading outcomes]. Unpublished raw data from the National Early Literacy Panel. Louisville, KY: National Center for Family Literacy.
- National Research Council. (2001). Eager to learn: Educating our preschoolers. Washington, DC: National Academy Press.
- Preschool Curriculum Evaluation Research Consortium. (2008). Effects of preschool curriculum programs on school readiness (NCER 2008–2009). Washington, DC: National Center for Education Research, Institute of Education Sciences, U.S. Department of Education. Washington, DC: U.S. Government Printing Office.
- Putnam, R. T., & Borko, H. (2000). What do new views of knowledge and thinking have to say about research on teacher learning? *Educational Researcher*, 29, 4–15.
- Raudenbush, S., & Liu, X. (2001). Effects of study duration, frequency of observation, and sample size on power in studies of group differences in polynomial change. *Psychological Methods*, 6, 387–401.
- Reynolds, A., Ou, S., & Topitzes, D. (2004). Paths of effects of early childhood intervention on educational attainment and delinquency: A confirmatory analysis of the Chicago Child- Parent Centers. *Child Development*, 75, 1299–1328.
- Richardson, V., Anderson, P., Tidwell, D., & Lloyd, C. (1991). The relationship between teachers' beliefs and practices in reading comprehension instruction. *American Educational Research Journal*, 28, 559–586.
- Rigby/Harcourt. (2002). Pebble soup. Orlando, FL.
- SAS Institute Inc. (2007). SAS® 9.1.3 language reference: Concepts. Cary, NC: SAS Institute Inc.
- Scholastic, Inc. (2003). Building language and literacy. NY, New York.
- Schweinhart, L. J., Barnes, H. V., & Weikart, D. P. (1993). Significant benefits: The high/scope perry preschool study through age 27. Monographs of the High/Scope Educational Research Foundation 10. Ypsilanti, MI: High/Scope Press.
- Smylie, M. A., Allensworth, E., Greenberg, R. C., Harris, R., & Luppescu, S. (2001). Teacher professional development in Chicago: Supporting effective practice. Consortium on Chicago School Research.



- Sopris West. (2003). We can! Longmont, CO.
- Speck, M. (1996). Best practice in professional development for sustained educational change. ERS Spectrum (pp. 33–41).
- Spodek, B. (1996). The professional development of early childhood teachers. Early Child Development and Care, 115, 115–124.
- SRA/McGraw-Hill. (2003). The DLM childhood express. Columbus, OH.
- Sullivan, B. (1999). Professional development: The linchpin of teacher quality. ASCD Infobrief [Online]. Available: http://www.ascd.org/readingroom/infobrief/9908.html.
- Sulzby, E., & Teale, W. (1991). Emergent literacy. In R. Barr, M. Kamil, P. Mosenthal, & P. D. Pearson (Eds.), Handbook of reading research (Vol. II, pp. 727–758). New York: Longman.
- Vasilyeva, M., Huttenlocher, J., & Waterfall, H. (2006). Effects of language intervention on syntactic skill levels in preschoolers. *Developmental Psychology*, 42, 164–174.
- Wagner, R. K., Torgesen, J. K., & Rashotte, C. A. (1999). Comprehensive test of phonological processing. Austin, TX: PRO-ED.
- Wasik, B. A., Bond, M. A., & Hindman, A. (2006). The effects of a language and literacy intervention on Head Start children and teachers. *Journal of Educational Psychology*, 98, 63–74.
- Whitehurst, G. J., & Lonigan, C. J. (1998). Child development and emergent literacy. Child Development, 68, 848–872.
- Woodcock, R. W., McGrew, K. S., & Mather, N. (2001). Woodcock-johnson III tests of achievement. Itasca, IL: Riverside Publishing.
- Wright Group/McGraw. (2002). Doors to discovery. Bothell, WA.
- Zevenbergen, A. A., Whitehurst, G. J., Payne, A. C., Crone, D. A., Hiscott, M. D., Nania, O. C., et al. (1997). Outcomes of an emergent literacy intervention in Head Start homes and classrooms. *National Head Start Association Research Quarterly*, 1, 137–147.
- Zimmerman, I. L., Steiner, V. G., & Pond, R. E. (2002). *Preschool language scale* (4th ed.). San Antonio, TX: The Psychological Corporation.

