

## Summary of Striving Readers Projects: Targeted Interventions for Struggling Readers

**Table 7: Impacts of Interventions on All Struggling Readers<sup>i</sup>**

Reading Test (Source)	Areas Covered by Test	Impact on Reading Test Scores in Standard Deviation Units <sup>ii</sup>	Impact on Reading Test Scores in Percentile Units <sup>iii</sup>	Is Impact on Reading Test Scores Different than Zero (statistically significant)? <sup>iv</sup>	Minimum Impact in Standard Deviation Units that Study can Measure with Confidence <sup>v</sup>	Grade Level in Impact Analysis	Sample Size in Impact Analysis
<b>Chicago Public Schools, IL</b>							
<i>Chicago Striving Readers English Language Arts Curriculum<sup>vi</sup></i>							
Illinois Standard Achievement Test (State)	Vocabulary, Reading Strategies, Comprehension, and Literature	.20	Treatment students are in 48 <sup>th</sup> percentile, control students are in 44 <sup>th</sup> percentile of nationally normed sample <sup>vii</sup>	No	.36	6 <sup>th</sup>	225 Treatment students in Tier 2 and 246 Control students in Tier 2 in 62 schools <sup>viii</sup>
<i>Chicago Striving Readers English Language Arts Curriculum and Achieving Maximum Potential (AMP) After School Program<sup>ix</sup></i>							
Illinois Standard Achievement Test (State)	Vocabulary, Reading Strategies, Comprehension, and Literature	.10	Treatment students are in 23 <sup>rd</sup> percentile, control students are in 21 <sup>st</sup> percentile of nationally normed sample <sup>x</sup>	No	.21	6 <sup>th</sup>	549 Treatment students in Tier 3 and 561 Control students in Tier 3 in 63 schools

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<b>Danville School District, KY</b>							
<i>Learning Strategies Curriculum</i>							
Group Reading Assessment Diagnostic Evaluation (External test publisher)	Vocabulary, Comprehension, Oral Language	.10	Treatment students are in 16 <sup>th</sup> percentile, control students are in 14 <sup>th</sup> percentile of nationally normed sample	No	.20	6 <sup>th</sup>	317 Treatment and 266 Control students in 12 middle schools
Group Reading Assessment Diagnostic Evaluation (External test publisher)	Vocabulary, Comprehension, Oral Language	.11	Treatment students are in 18 <sup>th</sup> percentile, control students are in 17 <sup>th</sup> percentile of nationally normed sample	No	.20	9 <sup>th</sup>	365 treatment and 315 control students in 11 high schools
<b>Memphis City Schools, TN</b>							
<i>Read 180 Enterprise Edition</i>							
Iowa Test of Basic Skills (External test publisher)	Total Reading	.03	Both treatment and control students score in the 9 <sup>th</sup> percentile of nationally normed sample	No	.15	6 <sup>th</sup> -8 <sup>th</sup>	987 Treatment and 1446 Control students in 8 schools
Tennessee Comprehensive Assessment Program (State)	Reading and Language Arts	.01	Not available	No	.14	6 <sup>th</sup> -8 <sup>th</sup>	987 Treatment and 1446 Control students in 8 schools

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<b>Newark Public Schools, NJ</b>							
<i>Read 180 Enterprise Edition</i>							
Stanford Achievement Test (External test publisher)	Language Arts	.05	Treatment students are in the 9 <sup>th</sup> percentile, control students are in the 6 <sup>th</sup> percentile of nationally normed sample	No	.16	6 <sup>th</sup> -8 <sup>th</sup>	934 Treatment students in 10 schools and 838 Control students in 9 schools
Stanford Achievement Test (External test publisher)	Comprehension	.07	Treatment students are in the 13 <sup>th</sup> percentile, control students are in the 9 <sup>th</sup> percentile of nationally normed sample	No	.20	6 <sup>th</sup> -8 <sup>th</sup>	934 Treatment students in 10 schools and 838 Control students in 9 schools
Stanford Achievement Test (External test publisher)	Vocabulary	.08	Treatment students are in the 9 <sup>th</sup> percentile, control students are in the 8 <sup>th</sup> percentile of nationally normed sample	No	.15	6 <sup>th</sup> -8 <sup>th</sup>	934 Treatment students in 10 schools and 838 Control students in 9 schools

Reading Test (Source)	Areas Covered by Test	Impact on Reading Test Scores in Standard Deviation Units <sup>ii</sup>	Impact on Reading Test Scores in Percentile Units <sup>iii</sup>	Is Impact on Reading Test Scores Different than Zero (statistically significant)? <sup>iv</sup>	Minimum Impact in Standard Deviation Units that Study can Measure with Confidence <sup>v</sup>	Grade Level in Impact Analysis	Sample Size in Impact Analysis
<b>Ohio Department of Youth Services (students in juvenile correction facilities)</b>							
<i>Read 180 Enterprise Edition</i>							
Scholastic Reading Inventory Assessment (Scholastic, developer of Read-180)	Reading Comprehension	.17	Treatment students are in 13 <sup>th</sup> percentile, control students in 11 <sup>th</sup> percentile of nationally normed sample	Yes	.16	9 <sup>th</sup> -12 <sup>th</sup>	409 Treatment and 347 Control students in 7 facilities
<b>Portland School District, OR</b>							
<i>Xtreme Reading Strategic Instruction Model</i>							
Group Reading Assessment Diagnostic Evaluation (External test publisher)	Vocabulary, Comprehension	.29	Treatment students are in 22 <sup>nd</sup> percentile, control students are in 13 <sup>th</sup> percentile of nationally normed sample	Yes	.10	7 <sup>th</sup> -8 <sup>th</sup>	209 Treatment and 234 Control students in 5 middle schools (Yr 1); 3 middle schools and 2 K-8 schools (Yr 2)
Group Reading Assessment Diagnostic Evaluation (External test publisher)	Vocabulary, Comprehension	.01	Both treatment and control students score in the 14 <sup>th</sup> percentile of nationally normed sample	No	.13	9 <sup>th</sup> -10 <sup>th</sup>	174 Treatment and 232 Control students in 4 schools

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Oregon State Assessment Test (State)	Reading and Literature	.13	Treatment students in 22 <sup>nd</sup> percentile, control students in 18 <sup>th</sup> percentile of state normed sample	Yes	.09	7 <sup>th</sup> -8 <sup>th</sup>	273 Treatment and 257 Control students in 5 middle schools (Yr 1); 3 middle schools and 2 K-8 schools (Yr 2)
Oregon State Assessment Test (State)	Reading and Literature	-.05	Treatment students in 25 <sup>th</sup> percentile, control students in 28 <sup>th</sup> percentile of state normed sample	No	.12	10 <sup>th</sup>	160 Treatment and 170 Control students in 4 schools
<b>San Diego Unified School District, CA</b>							
<i>Strategies for Literacy Independence across the Curriculum</i>							
California Standards Test (State)	English Language Arts	.05	Treatment students in 29 <sup>th</sup> percentile, control students in 27 <sup>th</sup> percentile of state normed sample	No	.17	7 <sup>th</sup> -8 <sup>th</sup>	318 Treatment and 339 Control students in 4 middle schools
California Standards Test (State)	English Language Arts	.06	Treatment students in 33 <sup>rd</sup> percentile, control students in 32 <sup>nd</sup> percentile of state normed sample	No	.12	9 <sup>th</sup> -10 <sup>th</sup>	255 Treatment and 291 Control students in 4 high schools

Reading Test (Source)	Areas Covered by Test	Impact on Reading Test Scores in Standard Deviation Units <sup>ii</sup>	Impact on Reading Test Scores in Percentile Units <sup>iii</sup>	Is Impact on Reading Test Scores Different than Zero (statistically significant)? <sup>iv</sup>	Minimum Impact in Standard Deviation Units that Study can Measure with Confidence <sup>v</sup>	Grade Level in Impact Analysis	Sample Size in Impact Analysis
Degrees of Reading Power (External test publisher)	Reading Comprehension	.03	Treatment students in 35 <sup>th</sup> percentile, control students in 34 <sup>th</sup> percentile of nationally normed sample	No	.18	7 <sup>th</sup> -8 <sup>th</sup>	321 Treatment and 339 Control students in 4 middle schools
Degrees of Reading Power (External test publisher)	Reading Comprehension	.15	Treatment students in 50 <sup>th</sup> percentile, control students in 49 <sup>th</sup> percentile of nationally normed sample	Yes	.21	9 <sup>th</sup> -10 <sup>th</sup>	277 Treatment and 243 Control students in 4 high schools

### Springfield and Chicopee Public Schools, MA

#### Read 180 Enterprise Edition

Stanford Diagnostic Reading Test, 4 <sup>th</sup> Edition (External publisher)	Reading Comprehension	.11	Treatment students in 18 <sup>th</sup> percentile, control students in 16 <sup>th</sup> percentile of nationally normed sample	No	.18	9 <sup>th</sup>	128 Treatment and 114 Control students in 5 schools
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#### Xtreme Reading Strategic Instruction Model

Stanford Diagnostic Reading Test, 4 <sup>th</sup> Edition (External publisher)	Reading Comprehension	.16	Treatment students in 20 <sup>th</sup> percentile, control students in 16 <sup>th</sup> percentile of nationally normed sample	No	.19	9 <sup>th</sup>	105 Treatment and 114 Control students in 5 schools
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Source: Striving Readers Year 2 Evaluation Reports (available at: <http://www.ed.gov/programs/strivingreaders/performance.html>)

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- i Impact estimates for one year of intervention services for students new to the intervention in the 2006-07 or 2007-08 school year, except in San Diego, where impact estimates are for one year of intervention services for students new to the intervention in the 2007-08 school year.
  - ii Impact is measured in standardized effect size units using Glass'  $\Delta$ . A standardized effect size measures the difference in outcomes between treatment and control group students in standard deviation units. It is often used in social science research because it facilitates comparing findings across studies that have outcomes in different scales.
  - iii Percentiles were derived from conversion tables provided by external test publishers or by calculating normal curve equivalent (NCE) scores, which range from 1-99, with a mean of 50, and using a conversion table to obtain percentile units.
  - iv Statistical significance is measured at 95% confidence level, which is a conventional standard set for social science research.
  - v Abt Associates staff calculated the MDE by multiplying the standard error of the impact estimate by 2.8. This calculation produces the MDE for a two-tailed test with 80% power, and with an alpha level of .05, and accounts for clustering and for the inclusion of the covariates in the model.
  - vi Impact estimate for Chicago's Striving Readers English Language Arts Curriculum is for students reading below grade level (Tiers 2 and 3).
  - vii ISAT scores were converted to SAT-10 scores to produce percentiles. Therefore, SAT-10 is based on a nationally normed sample.
  - <sup>viii</sup> One of the treatment schools in CPS was not included in these analyses because there were no students in that school with complete data for the impact analysis.
  - ix Impact estimate for Chicago Striving Readers Language Arts Curriculum and After School Program (Achieving Maximum Potential) is offered is for 6th grade students reading more than one year below grade level (Tier 3).
  - <sup>x</sup> ISAT scores were converted to SAT-10 scores to produce percentiles. Therefore, SAT-10 is based on a nationally normed sample.