## Executive Summary Association of Alaska School Boards 2011 - 2012 "iPad for Literacy" project

The Association of Alaska School Boards, with the assistance of a legislative appropriation, implemented an "iPad for Literacy" demonstration project in Alaska House District 6. The intention of the project was to document increased student achievement in the areas of language acquisition and reading fluency for participating students. The program that was applied to both staff and students was a strategic combination of training in the implementation of accessible iPad technology, and professional development in the use of highly-effective teaching instruction that complimented powerful learner differentiated literacy software.

Nine school districts participated in the project and documented 824 active student users between grades 2 - 12. The formal assessment plan for the demonstration specified additional quantitive analyzes of 135 active third grade cohort users to further substantiate key findings and benefits to students.

An analysis of Alaska students participating in the study compared to nationwide averages substantiated statistical significance in students grade 2 - 12 at the p<.05 level (95% confidence). The subset of students in the third grade cohort demonstrated gains approaching three times the nationwide average.

Achieve3000 Solutions® was used to measure Lexile gains and usage totals. Lexile measures are recognized as the most widely used reading metrics for connecting learners of all ages with materials at the right level of challenge. Lexile is a numeric representation of an individual's reading ability and text's readability or difficulty.<sup>(1)</sup> National averages and expected gains for grade levels have been established and were used to compare the growth of students in the project.<sup>(2)</sup>

# Overall "iPad for Literacy" Student Key Findings Compared to the National Average

- All Students who participated in "iPad for Literacy" exceeded their expected Lexile growth by an average of 103 points more than doubling the expected growth norm.
- Students who participated in "iPad for Literacy" <u>at least twice a week</u> exceeded their expected Lexile growth by an average of 130 points - twoand-a-half times beyond the expected growth norm.
- Students in the "iPad for Literacy" project who were <u>behind in reading</u> by two or more grade levels improved on average 132 points - two-anda-half times the expected Lexile gains.
- Based on pre-and post-Lexile scores, 11% more students are on track for College and Career Readiness after participating in the project.



#### iPad for Literacy Overall Lexile Point Gains

# Third Grade Cohort "iPad for Literacy" Key Findings Compared to the National Average

- Third Grade Cohort students who participated in "iPad for Literacy" exceeded their expected Lexile growth by an average of 115 points more than third grade students on a nationwide level<sup>(3)</sup> more than doubling the expected growth norm.
- Third grade cohort students who participated in "iPad for Literacy" <u>at</u> <u>least twice a week</u> and averaged
  65%-90% on the multiple choice portion of the Five-Step Literacy Routine (i.e., applied themselves and focused on the activity) scored 292 points - and exceeded their expected Lexile growth by an average of 192 points beyond their nationwide peers - approaching three times beyond the established growth norm.
- Third grade cohort students in the "iPad for Literacy" project who were <u>behind in reading</u> by two or more grade levels (84 of the 135 participants) improved on average 143 points - two-and-a-half times the expected national Lexile gains.



### Third Grade Cohort Lexile Point Gains

• The amount of reading students do during out-of-school hours is a predictor of their inschool academic achievement.<sup>(4)</sup> Access to interesting, motivational technology and ability appropriate applications was deemed critical in promoting 62% of students in the "iPad for Literacy" project to log on during after-school hours. The students in the project logged on 6,281 times in after-school hours. The third grade cohort participants, on average, logged on 126 times compared to the national average of 47 times.

The success that students achieved in language acquisition and reading fluency correlates to increases in College and Career Readiness. It was deemed that the "iPad for Literacy" project fostered technology work-readiness skills, and increased time-on-task. Additional highlighted strengths of the project included: one-device-per-student access to interesting technology (iPads), software applications on the iPads that was not reliant on web-based access or internet speed, early training in software and reading instructional strategies, and on-going support in the project implementation.

- (1) Fry, Edward B. 2006. "Readability." Reading Hall of Fame Book. Newark, DE: International Reading Assn.
- (2) Expected gains are based on MetaMetrics' annual expected Lexile gains for third grade students.
- (3) An analysis of the impact of Achieve3000 on third grade HD6 project participants' Lexile growth, based on a nationwide comparison of n=95,522 third grade students using Achieve3000 Solutions.
- (4) MetLife Foundation Afterschool Alert. (2011, November). Literacy in afterschool: An essential building block for learning and development (Issue Brief No. 53). Washington, DC: Author.