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Supporting Implementation Fidelity for a State-Level Grant Program: A Three Tier Model

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Paper presented at the 2012 Annual Meeting of the American Evaluation Association in Minneapolis,

MN.

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#### Abstract

Implementation fidelity is a pivotal part of understanding the impact of large scale initiatives. Ensuring a cohesive plan for collecting, analyzing and using data for implementation is the foundation for an effective program. This round table will discuss the effective evaluation of a three-tier implementation fidelity model of a state EETT program. As part of the technical support for data collection, the grant conducted full-day training sessions to address three needs: logic model training, regional support system director training, and performance assessment training. The multi-tiered support model was very successful in promoting the implementation fidelity of the evaluation activities. Participating districts (n=70) completed on average 85% of the data collection requirements of the grant (includes performance products and surveys across students, teachers, principals, and district staff). Implementation fidelity was consistent across grant types with ARRA grants completing 77%, EETT completing 79%, and SRTT completing 82% of evaluation requirements on average.

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# Background

Implementation fidelity is a pivotal part of understanding the impact of large scale initiatives and how "faithfully" the pre-stated model has been realized in practice (Carroll et al, 2007; Cordray, 2007). Ensuring a cohesive plan for collecting and using data for implementation is the foundation for an effective program. Articulating meaningful classroom implementation goals involves a process of considering the theories, practices, and systems influencing long-term outcomes (Borko, 2004; Chatterji, 2004).

Adherence addresses whether program components are delivered as prescribed. Exposure levels to the program content, the quality of the delivery in terms of the theory-based ideal for processes and content, the participants' responsiveness, and unique features of the program that make it distinguishable from other programs also must be considered (Dane & Schneider, 1998; Carroll et al, 2007). Logic models, theories of change, and systems thinking can work together in the development of comprehensive frameworks for addressing implementation fidelity.

This paper discusses the effective evaluation of implementation at three levels of a state EETT program. The Illinois EETT model employed three levels of monitoring at the state level to improve the implementation fidelity across grantees. First, one of three state program consultants was assigned to monitor the fiscal and program evaluation activities of the districts using reports generated from the Illinois Data Portal to track the data collection activities. These program consultants completed monitoring visits to audit technology implementation. Second, one state program consultant was designated to monitor and support all of the evaluation requirements of the federal EETT program. Third, external evaluation staff supported both levels of state program consultants to provide technical and progress reporting support throughout the data collection period.

As part of the technical support for data collection, the grant conducted full-day training sessions to address three needs: logic model training, regional support system director training, and performance assessment training. The multi-tiered support model was very successful in promoting the implementation fidelity of the evaluation activities. Participating districts completed on average 85% of the data collection requirements of the grant (includes performance products and surveys across students, teachers, principals, and district staff). Implementation fidelity was consistent across grant types with ARRA grants completed 77%, EETT completing 79%, and SRTT completing 82% of evaluation requirements on average.

### **Evaluation Methodology**

### **Approach**

The EvalSolutions EETT evaluation plan for managing the data collection and meeting the three Illinois Enhancing Education Through Technology (EETT) project goals leverages resources from the Illinois Data Portal (IDP) and aligns them with Illinois EETT, EETT ARRA, and other state initiatives, including the Partnership for 21st Century Skills.

Working in partnership with the Area 5 Learning Technology Center, the EvalSolutions EETT evaluation provided intensive training to support the use of the Illinois Data Portal and promote implementation fidelity by EETT grantees while LEAs execute the evaluation framework.

The evaluation data collected through the Logic Model, Action Plan, IDP and Lesson

Plan/Student Product analyses was used to address the state and federal reporting requirements for the

Illinois EETT program. This reports reflects the longitudinal assessment of growth in reaching the

program goals.

The EvalSolutions EETT evaluation, in partnership with Censeo Group and TA Consulting, also incorporated the development of nine case studies of EETT grantees using classroom observation, interviews, and reviews of extant data.

The evaluation is directed by Dr. Elizabeth Oyer, EvalSolutions Inc. (www.evalsolutions.com), with case study evaluation support provided by Dr. Tom Clark, Director of TA Consulting, and Dr. Tania Jarosewich, the President of Censeo Group.

# Scope

The Illinois EETT state evaluation assessed the degree to which technology resources (connectivity, hardware, and software) have been effectively leveraged to implement and support instructional models that integrate teacher and student technology use in order to realize student outcomes, parent / community outcomes, and sustained practices. This evaluation report focuses on the progress of local grants toward using and supporting new technologies through professional development activities to establish in 2010-2011 and summative teacher and student outcomes. Student data reported in 2009-2010 was used to establish baselines for 2010-2011 analyses.

## **Unit of Analysis**

Data were collected at the student and teacher level for Title II-D, ARRA, and ARRA-SRTT grantees.

# **Evaluation Parameters**

This report includes comprehensive data related to the goals and objectives of local grants, progress and implementation fidelity of local grants, and teacher and student outcomes, including selfreport surveys, performance assessment data, proficiency test data, and achievement data.

#### **Evaluation Rationale**

The focus of this report is based on the timing of funding and legitimate expectation of program elements to impact teachers and students. Local grants funded under Title II-D had the most time to purchase technology and participate in preliminary training in 2009-2010. ARRA and ARRA-SR grantees were able only to purchase equipment and execute preliminary training activities for staff for 2009-2010. In total 69 grant programs implemented activities in 2010-2011.

### **Objectives and Questions**

## Objectives

The goal of the state evaluation was to examine the implementation and output of the EETT through a mixed-methods research design that includes collection and analysis of both qualitative and quantitative data. The evaluation examines funded grants' progress toward four overarching goals:

- Increasing teacher effectiveness;
- Using advanced technology systems to collect, manage, and analyze data in order to track student progress from pre-K through college and career and foster continuous improvement;
- Implementing technology-enhanced strategies that support rigorous college- and career-ready, internationally benchmarked standards, supplemented with high-quality assessments that are valid and reliable for all students, including limited English proficient students and students with disabilities; and
- Targeting intensive support to high-poverty, high-need LEAs to improve access to and the effective use of advanced technologies to turn around the lowest-performing schools.

These goals focus the evaluation activities on measurable project activities that can be examined for future policies and practices throughout the state to understand the impact of EETT funds in Illinois.

### Key Questions for Year 2 Reports (2010-2011):

- 1. What is the quality of the technology integration and support as measured by teacher, administrator, parent, and student surveys, classroom observations, and lessons focused on student technology products?
- 2. How do preconditions (like technology use) predict student achievement and technology proficiency outcomes as measured by state tests, technology proficiency tests, and student performance assessments?
- 3. How has the state support impacted the implementation fidelity across grants?
- 4. What are model practices and lessons learned that can inform policies to leverage and support technology in Illinois schools based on case studies of exemplar programs? (See Illinois EETT Case Study Report).
- 5. What are model practices and lessons learned that can inform policies in general from the EETT program? (See Illinois EETT White Paper).

### **Data Sources**

Data collection for the EETT program is centered around the Illinois Data Portal (IDP). The IDP is a data collection and reporting portal used by Illinois districts for technology and school improvement planning. It houses a series of surveys for school improvement planning as well copyrighted Nextsteps surveys. In addition, the portal has two multiple choice assessments for technology proficiency (VA DOE and TRAILS reference). Finally, the portal includes data collection systems to support student performance assessments, and teacher performance assessments for basic proficiency, and classroom observation.

Stakeholder Surveys

Nextsteps Community Technology Survey - Tool 5

Nextsteps Home/School Connection Survey - Tool 12

Nextsteps Principal Survey – Tool 29

Nextsteps Student Technology Survey Parts 1-3 – Tool 8

Nextsteps Teacher Survey Parts 1-4 – Tool 7

Nextsteps Technology Policies & Procedures Analysis – Tool 13

**Assessments** 

Illinois Standards Achievement Test

Prairie State Achievement Exam

Student Technology Proficiency Test (5th & 8th Grades)

*Performance Instruments* 

Lesson Profile & Student Product Rating (Rubric Adapted from ISTE Hypersig)

Revised TIMMS Technology Integration Classroom Observation Log

Participating principals, teachers, and students completed the data collection instruments as appropriate. Districts identified target students for intensive curriculum interventions for the performance assessment.

#### Results

How has the state support impacted the implementation fidelity across grants?

The Illinois EETT model employed three levels of monitoring at the state level to improve the implementation fidelity across grantees.

At the level closest to the district contacts, one of three ISBE program consultants was assigned to monitor the fiscal and program evaluation activities of the districts. These consultants used reports generated from the Illinois Data Portal to track the data collection activities at the district and grant program levels. In addition, program consultants completed monitoring visits for a brief view of technology implementation by the districts. At the next level, one ISBE program consultant was designated to monitor and support all of the evaluation requirements of the Illinois EETT program with special focus on the ARRA and SRTT reporting requirements. Finally, an external evaluation staff supported both levels of ISBE program consultants to provide technical and progress reporting support throughout the data collection period.

As part of the technical support for data collection, the grant conducted full-day training sessions to address three needs:

Logic Model Training. District grant leaders participated in logic model training to align the district grant with the overarching state goals, assign staff to tasks, rate their current status, and make plans for supporting the implementation fidelity.

LTC Director Training. Directors from all of the Learning Technology Centers in Illinois participated in training sessions to support the use of the Illinois Data Portal from user management through data collection and reporting. The training provided special focus on trouble-shooting and use of the performance assessment functionality.

Performance Assessment Training. District grant leaders participated in training for use of performance assessment to complement survey and test data. The training incorporated the alignment of data sources on the Illinois Data Portal with NETS, and Bloom's Digital Taxonomy. In addition, the training provided opportunities and tools to plan and assess the alignment of learning objectives with instructional activities and the planned performance assessment.

## **Data Completion**

The multi-tiered support model was very successful in promoting the implementation fidelity of the evaluation activities. Participating districts completed on average 85% of the data collection requirements of the grant (includes performance products and surveys across students, teachers, principals, and district staff). Implementation fidelity was consistent across grant types with ARRA grants completed 77%, EETT completing 79%, and SRTT completing 82% of evaluation requirements on average.

Average Percent of Evaluation Requirements Completed by District & Grant Type 120 100 100 82 79 77 80 60 40 20 0 ARRA EETT **SRTT** ARRA&SRTT

Figure 1. Evaluation Requirement Completion by Grant

Discussion

The Illinois EETT model employed three levels of monitoring at the state level to improve the implementation fidelity across grantees. The multi-tiered support model was very successful in promoting the implementation fidelity of the evaluation activities. Participating districts completed overall 85% of the data collection requirements of the grant (includes performance products and surveys across students, teachers, principals, and district staff). Implementation fidelity was consistent across grant types with ARRA grants completed 77%, EETT completing 79%, and SRTT completing 82% of evaluation requirements on average.

The keys to the successful support encompassed several elements, beginning with a clearly articulated plan with tools to provide on-time information, strong leadership to support, encourage, and promote the importance of implementation fidelity, and persistent, sustained support from the state staff. Although the scale of the program allowed for state staffing to be specialized and focused on evaluation elements unlike other programs, the lessons learned are exportable. Evaluators and state program staff can work together to create and execute articulated plans to promote and increase implementation fidelity.

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