

# **Teaching School Board Members about Reform Governance: Evaluation of the Texas Institute for School Board Training**

## **Research Summary**

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### **1. BACKGROUND AND CONTEXT**

Low academic performance has been widely recognized as a problem for at least two and a half decades, since *A Nation at Risk (National Commission on Excellence in Education, 1983)* sounded a call of alarm in 1983. Since then, policymakers and educators have tried hundreds of reform ideas, including teacher professional development, class-size reduction, raised graduation requirements, comprehensive school reform, high-stakes testing and innumerable reading and math programs. But few reforms have succeeded in producing substantial and sustained improvement in academic achievement.

#### **School Boards May Contribute to the Low-Academic-Achievement Problem**

Increasingly, policymakers have identified traditionally organized, heavily bureaucratized school districts as one source of the low academic achievement. School boards, particularly in ethnically diverse communities, contribute to low academic achievement by what they fail to do, e.g. do not keep school districts on course, do not as the governing body stay focused on student achievement, etc. (Finn & Kegan, 2004). Policymakers, as a result, are debating the value of school boards and rethinking whether another leadership structure, i.e. school districts governed by the mayor, would be more effective at governing public schools.

School boards often do resemble dysfunctional families whose members represent the stubborn and competitive factions that divide communities. A 1992 report found that school boards failed to establish a climate of change and orchestrate a coherent strategy for reforming America's public schools (Danzberger, et al, 1992). Specifically, the report asserted that boards were not providing far-reaching or politically risk-taking leadership for education reforms and they had become another level of administration, often micromanaging the school district. Moreover, according to the report, boards did not exercise adequate policy oversight, nor did they have adequate processes for accountability and for communicating with the public about schools and the school system. They showed little capacity to develop positive and productive lasting relationships with their superintendents and paid little or no attention to their governance performance and to their needs for on-going development of their capacity to govern.

#### **Education Reforms Have Diminished the Power of School Boards**

Some trends in public education reform in the last two decades have tended to diminish the power of school boards. Site-based management took hold in the late 1980's, and weakened school boards and districts' central office. By the mid1990s, in cities such as Baltimore, Boston, Chicago, Cleveland, Detroit, and New York, mayors assumed control of school districts, appointing boards

that were frequently little more than window dressing. Moreover, choice-based reforms threaten to limit governmental power more generally and empower parents.

The latest policy trend threatening the autonomy of local school boards is the recent push for standards and accountability, epitomized by the 2002 No Child Left Behind Act, a federal statute that requires schools to administer standardized tests every year to students in grades three through eight. Schools that fail to demonstrate adequate yearly progress toward proficiency (as defined by the states) are subject to sanctions ranging from the potential loss of students to the eventual reconstitution of their operations.

Whatever their role, school boards typically retain a lot of practical power over the day-to-day functioning of schools. They select superintendents, set expectations, approve budgets, oversee major management systems and processes, approve and sometimes create the policy framework within which the district operates, approve contracts and usually personnel appointments, and significantly influence district culture. All of these activities help establish the overall vision and strategic direction of the school district. However, boards also have a strategic leadership role in helping schools focus on and support student achievement, which many boards do not perform very well. To strategically lead a school district, boards have the authority to develop a strategic plan, establish performance criteria for the superintendent, and implement structural changes to the district to improve the delivery or content of education. Because of these wide-ranging responsibilities, boards continue to be a major leverage point for effecting overall district transformation. Despite their power, however, a lot of boards do not demonstrate the kind of leadership and perform the role needed to improve student achievement.

### **Training for Board Members May Improve Governance and Student Achievement**

One option is to improve how school boards currently govern school districts by providing boards with professional training. Through professional training, school board members could gain a clearer understanding of their purpose as a governing body, e.g. to strategically lead by setting a reform vision, maintaining a district-wide focus not based on constituents or special populations, focusing the activities and the policies of the district on improving student achievement, evaluating the superintendent based on concrete district performance goals, etc. Professional training on this unique leadership role of a school board could increase board focus on the achievement and learning of students and improve board members' ability to keep school districts focused on student learning.

Professional training may also be one of the only viable options that policymakers, superintendents and board members have for equipping *all* board members with the knowledge they need to effectively govern because, since boards are democratically elected, board members may come into the position with varying levels of education, training, and experience. Board members start out with varying abilities and knowledge of their role and how to govern. Training board members can play an important role by helping boards understand what they can do to support student achievement and teaching them how to perform leadership and policymaking activities, over and above the activities related to the day-to-day functioning of the school district.

Board members need training, in general, on the basic and vital aspects of governance and reform. Effective, in-depth, and targeted professional training has the potential not only to standardize, but also to improve the knowledge base and leadership skills of all school board members. This type of

in-depth training could be the vehicle for providing valuable guidance to school board members and boards on how to lead a school system – school board together with the school district – to produce substantial and sustained improvements in student learning and academic achievement.

The Center for Reform of School Systems (CRSS), a Texas not-for-profit corporation partially supported by the Houston Endowment, has developed a professional training program for newly elected school board members, called the Texas Institute for School Boards. The training is based on a conceptual framework of “reform governance” (McAdams, 2006), i.e., governance focused on whatever reforms are appropriate to improve student academic achievement. Started in 2002, the Texas Institute training provides first-time school board members with an induction experience that focuses on the theory and practice of urban school district improvement and the policy-level roles and responsibilities of urban school board members.

### **Research Evaluates Effects of Texas Institute**

To understand the value of professional training for school board members, the Houston Endowment contracted with Evaluation & Research Services to conduct a large-scale evaluation of the effectiveness of a professional board training offered to new school board members in Texas since 2002, i.e. the Texas Institute for School Boards. The purpose of the evaluation was to assess the linkages from the training and its reform governance model to changes in school board behavior that could lead to improved district performance and to improved student achievement.

Because the ultimate goal of the Texas Institute training is to improve student achievement, any measurable effect will be evident after the completion of the evaluation. This research summary seeks to provide formative feedback on *intermediate* goals that might lead to improvement in student achievement. The intermediate goal is to improve the reform governance of urban school boards in Texas. Accordingly, the evaluation questions that underlie this research touch on not only the Texas Institute training’s effect on school board members’ actions and beliefs, but also collectively on school boards’ governance and adherence to the reform governance model. This research summary report is not able to provide a rigorous estimate of the Texas Institute training’s efficacy in achieving its *ultimate goal* – improved student achievement.

The evaluation was conducted in two phases. The first phase of research, published in *Reform Governance: how has it influenced Texas school board members and their school boards* (Quigley, 2007), found that efficient board operations and a focus on board roles, responsibilities, and relationships were most associated with boards enacting reform policy. Moreover, Quigley (2007) found that the Texas Institute training did influence individual participant’s policy-making actions and beliefs about children’s ability to perform and about the importance of the superintendent-board relationship. However, the training did not significantly influence the functioning of a board as a whole, esp. in terms of codifying reform policy. The second phase of this exploratory research, published in *Teaching School Boards about Leadership and Strategic Policymaking: The Texas Institute Training and Lessons Learned* (Quigley, 2008), found that the Texas Institute training influenced how boards as a whole govern – they maintain focus, work as a team, and operate professionally and efficiently in meetings – and not just how individual school board members behave. The trained was most successful at teaching the importance of core beliefs and commitments, defined roles and responsibilities, good working relationships, and efficient operating procedures, which are the basic foundation for good governance. But the influence of the Texas

Institute training was not reported as sufficient to move boards further into the mode of reform governance where their focus and (more importantly) actions are on policy making, strategizing and developing methods of reforming education and pushing school districts to improve student achievement and close the achievement gap. This research summary provides details on both phases of the evaluation, discusses the research findings, and provides recommendations.

The uniqueness of educational settings implies that no single study is likely to yield conclusive evidence about the influence of training on governance or student achievement. However, this study is important in that it provides information about the effects of school board training programs and may have larger implications for the role of school boards in improving student achievement.

## **EVALUATION APPROACH AND METHODS**

Evaluation & Research Services chose to integrate a broad base comparison group approach with an in-depth comparative case-study approach using both quantitative and qualitative methods. The broad based comparison group approach examines the behavioral differences of school board members trained (and not trained) at the Texas Institute training across all of the 44 large, suburban and urban school boards targeted by CRSS, while the in-depth cross-comparative approach qualitatively isolates the general factors associated with effective and non-effective reform governance and participation in the Texas Institute training in six case study school boards.

Choosing this combined broad-based and in-depth approach allows us to both (1) describe the variation in influence the Texas Institute training has had on trained vs. non-trained board members across the universe of large, suburban and urban school boards in Texas, and to test for the statistical significance of these differences and (2) describe in detail the variation in influence the Texas Institute training has had in boards where the reform governance modeling is working and not working, and to test (in some cases) for the statistical significance of these differences. “Working” is defined as a school board with members that were directing their school district on a path of reform; “non-working” is defined as a school board where the members were exhibiting leadership, but there was not yet evidence that a reform policy agenda was taking hold. The analysis in both phases of research is also a formative evaluation on intermediate outcomes, not a summative evaluation on the effect of the Texas Institute training on student achievement gains.

The first phase of the evaluation research collected self-report survey data on all the school board members and superintendents in the 43 target districts, which include two types of school board members – those trained (and not trained) by the Texas Institute training. The survey data collection was designed to measure not only interim outcomes but also the key mechanisms and processes described in the Texas Institute training and Reform Governance model – core beliefs and commitments; roles, responsibilities, and relationships; basic school board building blocks and operation; theories of action; and reform policy. Surveys were administered from September to December 2006 via mail and web to all superintendents, school board members, and school board service personnel in the targeted 42 large urban school districts in Texas (43 target districts minus the pilot district). The survey was sent to 309 school board members, 42 superintendents, and 42 school board service personnel. Prior to sending out the survey, an advance notification letter was mailed out by the Houston Endowment and a list serve announcement was sent out to all Texas Institute training attendees (2002-2006) by CRSS. Two reminder letters were sent in October and then follow-up phone calls were made in late November and early December. From a total of 309

school board members, 185 responded with a response rate of 60 percent. From a total of 42 superintendents, 29 responded with a response rate of 69 percent. From a total of 42 school board service personnel, 19 responded with a response of 45 percent.

The second phase of the evaluation research selected six case study boards – three working and three non-working boards. Researchers conducted semi-structured interviews to elicit information from board members and superintendent on their experiences. We conducted two sets of interviews. The first set of interviews was only with the superintendent and the school board president on each of the six boards for a total of 12 initial interviews. These interviews were conducted in November and December of 2007 and confirmed our initial judgment as to whether the boards were working or non-working boards, i.e., verify that our designation of working and non-working was valid. We had a 100 percent response rate from the interviewees. The second set of semi-structured interviews aimed to capture the perspectives of all board members and the superintendent from each of the case study districts, i.e., the seven school board members and the superintendent (i.e., the full “team of eight”). These interviews were the main data collection exercise in the second phase of the research. They were conducted in the spring of 2008 with the full board and the superintendent in the six case study districts (N=47; one school district only had six board members). We had 100% response rate and the interviews lasted from 45-75 minutes with two researchers, one designated as the principal interviewer and the other as a notes taker. The snapshot of these boards was taken after 78 percent (32 of the 41) of school board members and 83 percent (five out of the six) of superintendents had attended the Texas Institute training at various times since 2002. In this report, we will be using the term “school board” or “board” to refer to the “team of eight” which includes all of the school board members and the superintendent.

## **ANALYSIS**

Using the survey data collected during the first phase of research, researchers conducted correlational and regression analysis to test the influence of participation, the influence of the building blocks of the reform governance model and the influence of training a percent of school board members on a school board on the codification of reform policies controlling for external factors. T-tests were calculated to examine the statistical difference between the behaviors and actions of school board members trained and not trained by the Texas Institute training. These analyses were run on the school board member level data (N=185). There are 88 school board members who have attended the Texas Institute training from 2002-2006 and 97 that have not attended.

To analyze the survey data at the school board level, the school board member level data was aggregated into school board level data by calculating the median (given the small sample sizes) of the school board member and superintendent responses for each school board. Each set of school board data were also analyzed for completeness, i.e. at least half of the trained and untrained school board members on the school board needed to have responded to the school board member survey. If this criterion was met (or exceeded) then the school board data was included in the analyses. Seven school boards had insufficient data to be included in the analyses; the pilot board was also not included. The analysis sample included 35 school boards.

To identify themes in the interview data, researchers utilized a staged technique described by Lincoln and Guba (1985) and elaborated on by Ryan and Bernard (2003). Then using the classic comparative case study design approach, we described and compared two groups and tested (in

some cases) whether one group differed from the other. We examined the degree to which common themes and indicators were present for each person interviewed. We examined the patterns overall, at the individual school board level, and at the working vs. non-working board level. As we examined these patterns, it became clear that the pattern of variation at the individual school board level was reflected in the working vs. non-working groupings. Therefore, we only report the overall percentages and the working vs. non-working comparisons. Appendix A provides more detail on the evaluation design, data collection approach, methods and analysis.

## **RESULTS: DIFFERENCES IN BOARD MEMBERS TRAINED AND NOT TRAINED AT THE TEXAS INSTITUTE TRAINING**

By comparing the background characteristics of the two groups of board members across the 43 districts in Texas, we found that those trained by the Texas Institute training (n=88) and those not trained (n=97) are very similar prior to their attendance at the Texas Institute training. Significantly more Texas Institute trained school board members (as compared to those not trained by the Texas Institute training) are male: 67 percent vs. 55 percent. However, the two groups are similar in age, education background, race, and employment. The two groups of school board members also have a similar distribution of when they were first elected as board members as well as similar percentages elected at-large vs. single member districts, or ran against an incumbent. The two groups of school board members also had similar percentages of their election contributions coming from the business community, parent groups, PACs, unions, and their own personal wealth. This similarity prior to attendance establishes the validity of comparing the two groups and allows for making inferences concerning the influence of the Texas Institute training on their beliefs and actions.

By comparing the board members who were trained and not trained at the Texas Institute training, the differences suggest that the Texas Institute training influences the intensity of its participants' core beliefs in two areas: children's ability to perform at or above grade level and the importance of defining an appropriate superintendent-school board relationship within the governance structure of a school board, including the expectation that the superintendent is a co-leader of reform. The Texas Institute training appears to also influence specific policymaking behaviors in school board members centered on reform, such as seeking outside expert advice on reform strategies, deliberating, voting on and/or adopting reform policies and strategies. These types of behaviors are key aspects emphasized in the Reform Governance model and the Texas Institute training – core beliefs and commitments; roles, responsibilities and relationships; and reform policy – that can possibly strengthen a school board's role in both approving and creating a policy framework within which the district operates.

Furthermore, the Texas Institute trained school board members rated other school board trainings more harshly than the school board members who had not attended the Texas Institute training. And in terms of all of the training that they had received, the Texas Institute trained school board members felt that the training they had received had been useful to their work as a school board member and they valued their training on governance and reform strategy most highly. In terms of future training, the Texas Institute trained school board members also expressed different needs in terms of the types of topics that they would find most useful to them in their work as a school board member. They wanted more training on policy implementation and oversight, governance, and school board operations.

## **RESULTS: COMPARING WORKING AND NON-WORKING BOARDS**

By comparing in-depth how working and non-working boards govern, we can identify what behaviors and beliefs are found in boards that are directing their school districts on a path of reform. These characteristics provide information that is potentially important to understanding how boards move from exhibiting leadership without evidence that a reform policy agenda is taking hold to successfully directing school districts toward reforms that improve student achievement.

The main difference in working boards and non-working boards are that working boards are more active in policy development and have clear theories of action for change for their districts. We found some key differences in the working and non-working boards that highlight what actions board engage in when they are directing their districts toward reform and improving student achievement. Board members and superintendents in the working and non-working boards had very similar core beliefs and commitments about children's ability to perform at or above grade level, but the working boards had taken the next step and actually formalized their core beliefs and commitments into policy. They differ the most in that more board members and superintendents on working boards feel that they are active in policy development, they are ensuring that reform policies are codified, and they communicate their goals, plans, and policies to the community. Working boards also differ from non-working boards in that working boards have a clear theory of action for change for their districts to improve student achievement and close the achievement gap. Working boards also believe that they treat themselves and their superintendent with respect, and they do not have fixed factions.

We found several similarities in the working and non-working boards. The members of working and non-working boards tended to feel similarly about having efficient board meetings focused on student achievement, about exercising their oversight management responsibilities for the district, about having an aligned curriculum and monitoring student data, and about being diligent in monitoring the implementation of policies. Working and non-working boards were also similar in their ability to maintain a close relationship of trust with the superintendent. They both understand that their role is to govern, not manage, and to provide necessary constituent service.

## **RESULTS: INFLUENCE OF REFORM GOVERNANCE MODEL ON CODIFYING POLICY**

The correlational and regression results from analyzing the survey data indicate that two of the three main elements of the reform governance model – roles, responsibilities and relationships and school board operations, but not core beliefs – are independently associated with the codification of reform policies by a school board. The functioning of a board – either in terms of the roles, responsibilities, and relationships, or the operation of school board meetings, or evaluating the superintendent regularly – seem to be more influential than the core belief of the school board that all children can perform at or above grade level or of the possibility of eliminating the achievement gap in shaping a reform policy and getting it codified into policy.

Influencing a school board's governance appears to be more complex than increasing the number of trained members. Neither metric – the current penetration rate or overtime coverage measure – was significant in the multiple regression models, even controlling for district size, district performance, the rating of the superintendent and civic support. These regression findings imply that school boards with none, a mix, or a majority of school board members trained by the Texas Institute training (either measured as a current status or as a accumulative coverage measure) have the same

likelihood of codifying reform policies and functioning effectively in their school board roles and in their operations. This finding may be partially explained by the fact that several of the targeted school boards that have none or very few (up to 30 percent) of their school board members trained by the Texas Institute training reported having positive core beliefs about children performing at grade level, belief in the possibility of eliminating the achievement gap, efficient board operations, and effective roles, responsibilities and relationships among the team of eight.

Moreover, comparing the two metrics, the overtime coverage measure has a stronger influence than the current status penetration rate, albeit not a significant influence. Both measures also explain a similar amount of variation in the model overall. Given that more information is contained in the overtime coverage measure, it has a higher correlation with presence of a fixed faction, and it has a higher level of sensitivity in the model, it is a preferred metric for measuring influence of the Texas Institute training.

We also found that the bivariate associations indicate that the higher the percent of Texas Institute trained board members (currently or overtime), or the increased presence of core beliefs, or the increased presence of effective roles and responsibilities, significantly lower the presence a fixed faction on a board. These influences, however, on reform policy codification were not significant, i.e. they did not have a significant independent association with reform policy codification in the multiple regression models.

Overall, these findings indicate that the percent of Texas Institute trained board members on a given school board (current or accumulatively overtime) significantly influences the presence of a fixed faction on a board, but does not contribute significantly – directly or indirectly – to more effective operations, core beliefs, roles and responsibilities, or reform policy codification. This suggests that there is not a so-called current or overtime percentage of how many school board members it takes to launch a district onto the path of reform. Instead, more effective school board operations and more effective roles and responsibilities of the school board members (regardless of the numbers of members trained) is what significantly influences the codification of reform policies within a given a district.

## **RESULTS: INFLUENCE OF TX INSTITUTE TRAINING ACCORDING TO BOARDS**

According to the majority of superintendents and school board members, the Texas Institute training provided knowledge to board members that is essential to strategically leading a district toward reform. The Texas Institute training and the reform governance model increased boards' knowledge of governance roles, relationships and responsibilities. Specifically, the Texas Institute training influenced both the working and non-working boards by increasing their knowledge of the role of the superintendent, their role as board members, the responsibilities of the team of eight, and how to work as a team.

Besides the Texas Institute training and reform governance model increasing board knowledge of governance roles, relationships and responsibilities, the training provided motivation and focus which then lead to changes in overall board behavior. We found that the Texas Institute training increased board member awareness of the need to have a strategic vision and a set of strategies to improve how the school district educates all children, a.k.a., a theory of action. The Texas Institute also increased board accountability for their vision and long-term strategic plan (primarily by underscoring their responsibilities) and provided motivation and hope that “*change can be done*” (within real live case examples). These changes in turn lead to and motivated board behavior

change – increased board unity and teamwork, decreased micromanagement, more focus on achievement, learning, and policy (setting, reviewing, and aligning), improved operating procedures, improved policymaking processes, increased discussions about change to the districts, and the use of a common language related to governance.

We also found some different perceptions in the working and non-working boards. The working boards distinguish themselves in that they also perceived the influence of the Texas Institute training to be primarily on their “*adoption of core beliefs*,” “*focus on long-term strategic vision and theory of action*” and their “*adoption of reform policies*.” Non-working boards perceived the influence of the Texas Institute training to be mostly on their “*knowledge of the role of a board member*,” “*knowledge of how to manage relationships*,” and “*holding their superintendent accountable for ‘how’ to run the district*.”

In terms of the training itself, the majority of attendees found several aspects of the training beneficial. Attendees valued the case study method, the networking at the Institute training and with alumni, the modeling of good civil behavior and good board governance, and the guidelines, next steps, and solutions that were discussed pertaining to their board’s current issues.

### **RESULTS: MOST COMMON FACTORS OF SUCCESS, CHALLENGES AND NEEDS**

According to the superintendents and school board members, several factors helped improve their governance. The main factor that helped improve board governance was turnover in the team of eight including the hiring of an experienced superintendent. In the non-working boards, board member turnover, and not a change in the superintendent, was reported as the primary leverage for change because board member turnover eliminated members on the board who had very strong and stubborn personal agendas.

Besides the improvements that come along with a change in members on the team of eight, leadership is key. Boards mentioned that when a board as a whole focuses on governing, and not micromanaging, they are better able to lead and set a vision. This is known in the reform governance model as ‘not crossing the management line’. This focus on the management line was attributed to the Texas Institute training by half of those who mentioned it.

Board members and superintendents mentioned that teamwork and board unity lead to better governance. As described by the board members and superintendents in both working and non-working boards, these two factors appear to play a key role in implementing a change agenda and staying focused on an improvement plan.

Boards mentioned several barriers in their efforts to improve student achievement – those external to the board and those related to governing. The external barriers mentioned most often were: the lack of community trust either past or current; being in a community that is apathetic or has low expectations for their students and families; tight budgets; inequities in school facilities throughout the district; and the need for bond funds to improve the facilities.

Board members and superintendents mentioned several barriers related to effective board governance. They indicated that personal agendas, not have a strong desire to change, and being reactionary instead of thinking strategically and maintaining a district-wide focus were the largest barriers to improving board governance. Most often boards described that when personal agendas were at work, teamwork and

governance for the good of all students was not possible. They discussed how a strong desire to change was paramount in maintaining the motivation and urgency required to tackle difficult problems. They said it was sometimes easier to deny that a problem exists. Boards also mentioned the barrier of spending too much time on mundane, non-strategic issues, i.e., being too reactionary, instead of spending time on district-wide strategic issues. In addition, boards mentioned the need to have change-minded leadership at the district and on school campuses as a challenge.

Non-working boards mentioned two additional challenges. Non-working boards were challenged primarily by shallow dialogue between their board and their superintendent/administration and by faction voting within their board. Faction voting stymies board progress and signals to everyone – public, school district, and board members – the divisive nature of the board. Faction voting is many times also along racial or socio-economic lines, representing the culture diversity of the community within which boards are based. In addition, the superintendent – board relationship is vital to the governance ability of a board, since the superintendent implements the policies of the board and manages how a district implements board decisions.

Working and non-working boards had similar needs. Both working and non-working boards mentioned the need to develop clear theories of action and actively engaging in policy development. Specifically, this means that they both need to have strategic discussions defining the “how” of changing and improving student learning and performance. They both realize the importance of focusing on policy, reviewing policies, and aligning policies and practice, but admitted they need to perform these tasks in an active, on-going systematic manner. They also both need to set specific goals and benchmarks for their superintendent that are aligned with policies in order to hold the superintendent accountable for change. They need to systematically monitor district functions, rather than having the district report to them in an ad hoc fashion.

Boards also mentioned the need for better communication with the public, either in having any community voice (non-working boards) or engaging all stakeholders (working boards).

## **LIMITATIONS**

In weighing these findings, certain limitations should be considered. At the same time, the value of this research should be kept in mind since little research has addressed this important topic and population. First, there are issues of generalizability. The survey findings may not be generalizable beyond urban and suburban Texas school boards. The confidence in our survey data findings comes from surveying the universe of school board members in the largest 44 districts and with a good sample of both trained and non-trained school board members. In addition, the small sample size of the case-study findings challenges our ability to generalize more broadly about the influence of the Texas Institute training for all boards in Texas and to find complex patterns and nuances. However, the intent of the case-study research was not to generate formal models to predict the influence of the Texas Institute training. The confidence in our case study findings comes from the degree to which the patterns appear among our diverse sample of school boards rather than from a larger and more statistically representative sample. We believe that the combination of a broad survey of trained and non-trained school board members coupled with a purposeful diverse sampling strategy of case-study boards along with the comprehensive conceptual framework to guide our interviews and the semi-structured format allowing for school board members and superintendents to describe

their experiences in their own words resulted in an appropriate and cost-effective approach for meeting the goals of the evaluation.

Second, the measures from the survey data used in this study were original. Although this was necessary in the context of the current research, to the extent that a different set of measures might better operationalize the constructs of interest, additional research is needed.

Finally, the use of recall data to identify behavioral patterns poses a number of challenges. It is possible that hindsight and social desirability may have affected school board member or superintendent responses and that they may have confused some of the details in remembering past events. Our sense, however, is that the school board members and superintendents (especially those that did not attend the Texas Institute training or were considered in a fixed faction) were very forthcoming and candid with their opinions, experiences and value of the Texas Institute training. The fact that many of them talked freely in the interviews of the divisiveness, micro-management issues, troubles with the community, etc make clear that they had few problems talking about sensitive issues. We also had a high survey response rate from the 43 target districts (60 percent for school board members and 69 percent for superintendents) and a good mix of responses across both trained and non-trained school board members and superintendents. We were also able to interview all school board members and superintendents – trained and non-trained by the Texas Institute training – in the six case study boards. We encouraged school board members and superintendents to tell their stories in their own words and, more often than not, prompted them for more details and a fuller understanding of their experiences rather than asking them to give rationalizations for their behavior or opinions. Further, whenever interviewers saw inconsistencies, they asked for clarification. This often resulted in not only a more in-depth understanding of both the situation, but also more insight into the kinds of rules and schema the board members and superintendents were working from.

## **DISCUSSION AND CONCLUSIONS**

In a democracy, no one can limit who is elected. Board members or school district administration or policymakers themselves can not control what type of people are elected as board members, so professional training is one of the only options that boards, superintendents and policymakers have for equipping all board members with the knowledge they need to govern. This evaluation has found that targeted professional training does influence individual board members behaviors and actions and contributes to changes in entire board behavior. The Texas Institute training for new board members (and its reform governance model) does start to address the need for more leadership by school boards and more focus on student achievement by training school board members on important aspects of governance and reform. Additional follow-on training for board members that focuses on policy development, methods of how to reform districts, and teamwork is still needed however over and above the Texas Institute training.

We found that both working and non-working board members and superintendents did attribute (partially and fully) entire board behavior changes to the Texas Institute training. The boards attributed to the Texas Institute training their decreased levels of micromanagement, increased board unity and teamwork, improved operating procedures, use of a common language around governance, and more of a focus on achievement and learning. Non-working boards also indicated that the Institute training helped them work as an entire board to put in place the mechanisms and expectations to hold their superintendent accountable for “how” to run the district, while working boards indicated that the

Institute training influenced them as a whole board by assisting them in also establishing and adopting core beliefs. These findings, however, contrast with findings from Quigley (2007) which did not find significant evidence that board behavior as a whole had changed, particularly in the area of boards developing, enacting or codifying reform policies (as a result of the Institute training or not). Quigley (2007) found that the Texas Institute had significantly influenced individual board member beliefs and behaviors. The training had intensified board member beliefs about children's ability to perform and about the importance of the superintendent-board relationship. The training had increased policy making actions centered on reform, such as seeking outside expert advice on reform strategies, deliberating and or voting on reform policies and strategies.

This difference in findings may be partially accounted for by the changes CRSS made to the Texas Institute curriculum based on the recommendations from the 2007 Quigley report. In July 2007, CRSS added more in-depth coverage and discussion of policy development, the theory of action for change, and reform policy to the Texas Institute curriculum. It is also possible that the difference in findings is partially attributed to the difference in methodologies used from one study to the next. The qualitative case study work using interviews may be more sensitive to identifying this type of whole board behavior change.

To build on these findings, the regression analysis found significant relationships between school board operations and roles, responsibilities and relationships, and the codification of reform policies indicating that these aspects of the reform governance model can promote good governance practices, specifically the developing and adopting of reform polices. This implies that the curriculum and training model of the Texas Institute training should emphasize these main areas of leadership and governance – efficient school board operations, and roles, responsibilities and relationships of board members, including teamwork.

To summarize, the findings from this evaluation indicate that the Institute training is helping individual board members with a minimum set of basic governance principles and policy making skills and is assisting boards (as a whole) who are equipped with varying governance abilities to focus on student learning, improve their operating procedures, use a common language around governance, work more as a team, and focus on governing not micromanaging the superintendent or district. The Texas Institute training is assisting boards (as a whole) to mature and reach a more sophisticated level of governance. Boards have moved from having personal agendas derail their unity and focusing on day-to-day operations (i.e. micromanaging) to discussing (and in some case adopting) core beliefs and commitments, running more efficient and respectful board meetings, having more discussions and a focus on district-wide issues and student achievement with a more well-rounded and defined understanding of their role and the role of the superintendent. Overall, the training appears to influence how boards as a whole govern – they maintain focus, work as a team, and operate professionally and efficiently in meetings – and not just how individual school board members behave.

These findings imply that the Texas Institute training does provide valuable information to school board members and has improved the knowledge base and leadership skills of entire boards. However, even after the majority of board members on a given board have attended the Texas Institute training, both working and non-working boards still specified a strong need for training in strategic, long-term planning and defining a theory of action for change. Non-working boards also voiced the need for more training in policy development and policymaking. Therefore, the Texas Institute training has been an

essential component in improving board governance, but it has not been adequate to assist boards in leading districts successfully toward meaningful reforms focused on sustained student achievement.

Based on these findings, we suggest the following recommendations:

*The Texas Institute training should continue their case study approach and focus on training newly elected board members.* Board members who have personal agendas and board members who do not focus on all students were the most commonly mentioned challenges that boards have while governing. As a result, training newly elected board members in the basics of good governance is appropriate and can reduce the likelihood that board members will fall into this type of single-minded, constituency driven behavior. The Texas Institute intense case-study method and reform governance model was considered valuable by board members and superintendents from boards with varying governance abilities, i.e., working and non-working boards, because it either introduced these basic concepts or reinforced them. The case-study approach to learning, the networking during and after training, the modeling of good governance by CRSS staff, and the structure of the training structured were highly valued by participants.

*The Texas Institute training should continue to focus on topics related to effective leadership and reform policies: core beliefs and commitments; theories of action for change; efficient basic operations; policy development and policy oversight; and roles, responsibilities, and relationships.* The Texas Institute training appears to improve the knowledge base of board members and superintendents in boards of varying leadership and governance capacity in terms of their roles and responsibilities; the importance of a board having and acting on a set of core beliefs and commitments; and the need for policy development aimed at district reform. Besides this transfer in knowledge, the Texas Institute training also assisted boards to become more efficient in their operating procedures and be able to focus more on their important work – student achievement. In many cases, the training empowered and motivated individual board members and superintendents to have the courage to try and take the necessary next steps in their districts. These elements – core beliefs and commitments, defined roles and responsibilities, good working relationships including teamwork, and efficient operating procedures – are the basic foundation for good governance. We found that there is a general need for this type of governance knowledge across a varied range of boards, one that the Texas Institute can address.

*The Texas Institute training curriculum should also add specific strategies that school board members can use to transform their board operations and roles, responsibilities, and relationships.* We found significant relationships between school board operations and roles, responsibilities and relationships, and the codification of reform policies indicating that these aspects of the reform governance model can promote good governance practices. This implies that CRSS should focus on these two areas and further refine the Texas Institute curriculum to provide school board members with specific strategies on *how* to transform a school board's operations, *how* to improve roles, responsibilities and relationships, as well as, include more specific information on *how* to reform a district, i.e. reform strategies.

*The Texas Institute training should increase the amount of networking and informational support provided to school board members after the Institute training.*

The Texas Institute training could strengthen the support structure and networking component they provide to trained members. This support network should build up a set of resources that provide

case examples, tools, strategies, pitfalls to avoid, etc which allow school board members who have attended the Texas Institute training to share their experiences, but more importantly interact and learn from each other's successes and mistakes. Providing this type of information and support after school board members have left the Texas Institute training and return home to their school boards should help board members with the specific choices and steps to attempt in *implementing* the new governance concepts and practices. Continued contact and support from other board members at the Texas Institute training should also help school board members initiate and take more action toward creating and approving reform policies.

*Any follow up training to the Texas Institute training should be designed by CRSS and offered in several stand-alone training modules, so as to address the specific needs of boards.* Given that boards are in all states of healthy functioning and willingness to change and that as CRSS trains more boards the number of boards with higher levels of board functioning will increase, there is and will continue to be a growing need for training that focuses on defining the specifics of a theory of action and of policy development and oversight (as was seen in the working boards in the study). CRSS could develop several stand-alone training modules to address these training needs. The modules should be on:

- Policy development and policy making;
- District reform models and how to clearly define a theory of action for change based on a district's current structure, i.e., site-based management, centralized management, etc.;
- How to conduct a thorough policy review of district policies and guidelines with a focus on the role of school board members and the superintendent in the policy review process;
- Gaining community support and how to engage all stakeholders; and
- Basics of team building with a particular emphasis on how to gain consensus on major issues or core objectives with a focus on policy.

*To assist in targeting the specific needs of the boards with the CRSS training modules, CRSS may want to invest in the development and testing of a set of reform governance indicators as a diagnostic tool.* Further research would be needed to pilot and test a set of indicators with a larger pool of boards with a range of governance abilities alongside a set of cognitive interviews with a small subset of the boards included in the pilot. These data would enable the creation and design of a psychometrically sound and cognitively valid tool which could assess both the "readiness and willingness of a board to change" and the specific "maturity" level of a board in terms of its reform governance behavior. This type of diagnostic tool could be used to assess the needs of a board, target training and start discussions among board members and superintendents about next steps.

*CRSS should focus on boards where it has leverage through the Texas Institute and consider training discrete boards (i.e., full teams of eight) – either one board at a time or in groups of boards.* The interviews did not specify how many board members it takes to influence a board to work more successfully as a team, primarily because some non-trained board members may have basic governance skills and knowledge. However, in the absence of a valid tool that can identify an entire board's level of functioning or sophistication in reform governance principles, CRSS will have more opportunity to influence boards where (1) there are several newly elected board members, (2) over four members have been trained, or (3) the superintendent has been trained. In these districts where there is more of a potential to influence an entire board, CRSS should consider training discrete boards (i.e., full teams of eight) – either one board at a time or in groups of boards.

## REFERENCES

- Bernard, H. R. (2006). *Research methods in anthropology: Qualitative and quantitative approaches*. Lanham, MD: AltaMira Press.
- Conley, D. T. (2003). *Who Governs Our Schools? Changing Roles and Responsibilities*. New York and London: Teachers College Press.
- Crabtree, B. F. and Miller, W. L. (1992). A template approach to text analysis: Developing and using codebooks. In B. F. Crabtree and W. L. Miller (eds.) *Doing qualitative research* (pp. 93-109). Newbury Park, CA: Sage Publications.
- Danzberger, J. P. (1992). *Facing the Challenge: The Report of the Twentieth Century Fund Task Force on School Governance*. New York: The Twentieth Century Fund Press.
- Danzberger, J. P. & Kirst, M. (1992). *Governing Public Schools: New Times, New Requirements*. Washington, D.C.: Institute for Educational Leadership.
- Finn, C.E. & Keegan, L.G. (2005). *Lost at Sea*. Stanford, CA: Hoover Institution.
- Hess, F. M. (1998). *Spinning Wheels: the politics of Urban School Reform*. Washington, D.C.: Brookings Institution Press.
- Howell, W. G. (Eds.) (2005). *Besieged: School Boards and the Future of Education Politics*. Washington, D.C.: Brookings Institution Press.
- Lashway, L. (2002). *Using School Board Policy to Improve Student Achievement*. Eugene OR: ERIC Clearinghouse on Educational Management. No ed472183. Digest No. 163.
- Lincoln, Y. S. and Guba, E. G. (1985). Processing naturalistically obtained data. In *Naturalistic Inquiry* (pp.344-356). Beverly Hills: Sage Publications.
- McAdams, D. (2006). *What School Boards Can Do: Reform Governance for Urban Schools*. New York, NY: Teachers College Press.
- McQueen, K, McLellan, E., Kay, K. and Milstein, B. (1998). Codebook development for team-based qualitative analysis. *Cultural Anthropology Methods*, 10, 31-36.
- Miles, M.B., and Huberman, A. M. (1994). *Qualitative Data Analysis: An expanded sourcebook* (2<sup>nd</sup> Edition). Thousand Oaks, CA: Sage Publications.
- Muhr, T. (1991). Atlas/ti-A prototype for the support of text interpretation. *Qualitative Sociology*, 14(4), 349-371.
- National Commission on Excellence in Education. (1983). *A Nation at Risk: The Imperative for Educational Reform*. Washington, D. C.: U.S. Department of Education.

- Quigley, D. (2007). *Reform Governance: How Has It Influenced Texas School Board Members and their School Boards?* Los Angeles, CA: Evaluation & Research Services.
- Quigley, D. and Dembosky, J. W. (2008). *Teaching School Boards about Leadership and Strategic Policymaking: The Texas Institute Training and Lessons in Reform Governance.* Los Angeles, CA: Evaluation & Research Services.
- Ryan, G. and Bernard, H. R. (2003). Techniques to identify themes. *Field Methods*, 15(1), 85-109.
- Scriven, W. T. Cook, and D. Campbell. (2002). *Experimental and Quasi-Experimental Designs for Generalized Causal Inference.* New York: Houghton-Mifflin.
- Spradley, J. P. (1979). *The ethnographic interview.* New York: Holt, Rinehart and Winston.
- Stake, R. (2000). "Program evaluation, particularly responsive evaluation," in D. L. Stufflebeam, G. F. Madaus, and T. Kellaghan, eds., *Evaluation Models: Viewpoints on Education and Human Services Evaluation.* Boston: Kluwer.
- Willms, D. G., Best, J. A., Taylor, D. W., Raymond, G. J., Wilson, D. M. C., Lindsay, E. A., et al. (1990). A systematic approach for using qualitative methods in primary prevention research. *Medical Anthropology Quarterly*, 4 (4), 391-409.

## **APPENDIX A: DETAILS ON EVALUATION DESIGN AND METHODOLOGY**

This appendix provides details on the evaluation design and methodology for both phases of the evaluation.

### **EVALUATION DESIGN AND DATA COLLECTION STRATEGY**

*Broad-based comparison group approach.* The broad based comparison group approach examines the behavioral differences of school board members trained (and not trained) at the Texas Institute training across all of the 44 large, suburban and urban school boards targeted by CRSS.

Survey design. The first phase of the evaluation research collected self-report survey data on all the school board members and superintendents in the 43 target districts, which include two types of school board members – those trained (and not trained) by the Texas Institute training. This design assumes that the concern is to evaluate how *all* Texas Institute trained school board members in the 43 target districts – from the most to the least advantaged school districts – changed as a result of the Texas Institute training.

The survey data collection was designed to measure not only interim outcomes but also the key mechanisms and processes described in the Texas Institute training and Reform Governance model – core beliefs and commitments; roles, responsibilities, and relationships; basic school board building blocks and operation; theories of action; and reform policy. Three of the components of the Reform Governance model were not included in the survey instrument, because they are not the focus of the Texas Institute training – policy implementation and oversight; civic capacity; and transition. Similar questions were asked of superintendents and school board members to gain insight from the entire 8-(or 10-) member governance team. Some additional factual questions were then asked of the school board service personnel about the school board and district.

Pilot survey. A pilot test of the survey instrument was conducted in July 2006 with one school board in Texas that had been selected as part of a nationwide program to receive additional training on Governance. Given that they were going to receive additional training prior to our survey, they were not to be included in this study because of the contamination of the intervention. Several edits were made to the final survey and data collection process based on the pilot.

Fielding of survey. Surveys were administered from September to December 2006 via mail and web to all superintendents, school board members, and school board service personnel in the targeted 42 large urban school districts in Texas (43 target districts minus the pilot district). The survey was sent to 309 school board members, 42 superintendents, and 42 school board service personnel. Prior to sending out the survey, the Houston Endowment mailed an advance notification letter out and a list serve announcement was sent out to all Texas Institute training attendees (2002-2006) by CRSS. Two reminder letters were sent in October and then follow-up phone calls were made in late November and early December. From a total of 309 school board members, 185 responded with a response rate of 60 percent. From a total of 42 superintendents, 29 responded with a response rate of 69 percent. From a total of 42 school board service personnel, 19 responded with a response of 45 percent.

*In-depth cross-comparative approach.* The in-depth cross-comparative approach qualitatively isolates general factors associated with effective and non-effective reform governance and participation in the Texas Institute training in six case study school boards.

Case study design and selection. Given that we chose to use a cross-comparative case-study approach and to conduct a formative evaluation, the researchers made several key evaluation design decisions concerning the case studies. First, case studies needed to be selected that could represent both “working” and “non-working” boards, but also have similar numbers of trained board members. “Working” was defined by school board members who were directing their school districts on a path of reform, while “non-working” was defined by school board members who were exhibiting leadership, but there was not yet evidence that a reform policy agenda was taking hold. From the pool of 43 target districts, the researchers selected six boards to be used as case studies representing two distinct types of boards—three that were working boards and three that were non-working boards. This initial determination of working or non-working was primarily based on self-reported survey from school board members and superintendents (collected in the first phase of the research) that demonstrated (or not) the presence of key elements of CRSS’s reform governance model. This determination of working and non-working was then verified by interviews conducted with the school board president and superintendent (as part of the second phase of the research). To capture the influence of the Texas Institute training, the researchers made sure that a minimum of half of the school board members and superintendents in each of the case studies had participated in the Texas Institute training. Of the six case study boards, 32 of the 41 school board members and 5 of 6 superintendents had attended the Texas Institute training at various times from 2002 to 2007.

Second, we aimed to interview all of the board members and superintendent from each case study board in a given week to capture their experiences, information, and perspectives at a similar point in time. Emphasis was put on a 100% response rate to ensure capturing the full view of the board for the perspectives of all eight team members, including the superintendent. Third, to ensure that what board members and superintendents self-reported matched the characteristics and actions of their boards, researchers observed school board meetings and analyzed secondary documents.

Interviews. We used semi-structured interviews to elicit information from board members and superintendent on their experiences. We conducted two sets of interviews. The first set of interviews was only with the superintendent and the school board president on each of the six boards for a total of 12 initial interviews. These interviews were conducted in November and December of 2007 and were used to confirm or deny our initial judgment as to whether they were working or non-working boards, i.e., verify that our designation of working and non-working was valid. We had a 100 percent response rate from the interviewees. The second set of semi-structured interviews aimed to capture the perspectives of all board members and the superintendent from each of the case study districts, i.e., the seven school board members and the superintendent (i.e., the full “team of eight”). These interviews were the main data collection exercise in the second phase of the research. They were conducted in the spring of 2008 with the full board and the superintendent in the six case study districts (N=47; one school district only had six board members). We had 100% response rate and the interviews lasted from 45-75 minutes with two researchers, one designated as the principal interviewer and the other as a notes taker. In this report, we will be using the term “school board” or “board” to refer to the “team of eight” which includes all of the school board members and the superintendent.

Secondary data and observations. In addition to conducting the interviews, we collected additional factual information from school board presidents and their school board service personnel about the school boards and their districts via a six-page survey. We also worked with the school board service person to obtain copies of any reform policies mentioned in the initial interviews by the superintendents or school board presidents, and to obtain the meeting agendas, meeting notes, and DVD recordings of three regular board meetings for each school board.

## **EVALUATION METHODS AND ANALYSIS**

*Comparison group analysis strategy.* The comparison group data was analyzed to isolate general factors associated with participation in the Texas Institute training. To identify differences, we conducted correlational analysis and regression analysis to test the influence of participation, the influence of the building blocks of the reform governance model, and of training a percent of school board members on a school board (or of the accumulated number of school board services years held by a trained school board member) on the codification of reform policies controlling for external factors.

Measures of reform governance. All measures collected via the survey are original, but were derived from McAdams's Reform Governance model. The measures were self-report, and are scored so that a high score reflects higher levels of the construct measured. The metric used to analyze the survey data is the "Problem" vs. "Not a problem" score. A "Not a problem" score (or conversely a problem score) is a dichotomous measure derived from an item with multiple response categories, and is defined as 1=not a problem or 0= a problem. For example, with a 5-point response scale of poor to excellent, the responses *poor* and *fair* are considered a problem (coded = 0) and the responses of *good*, *very good* and *excellent* are considered not a problem (coded = 1). The "Not a problem" scores (percentages) are then analyzed. The measures included: a school board core beliefs and commitment measure (measured by 2-items; Cronbach's  $\alpha = 0.76$ ); roles, responsibilities and relationships measure (measured by sum of ten items; Cronbach's  $\alpha = 0.67$ ); school board operations measure (measured by sum of five items; Cronbach's  $\alpha = 0.66$ ); reform vision measure (one item); reform policy measure (one item); a penetration rate measure (percent of trained board members in a given board; derived from both the survey data and administrative data from CRSS) and an overtime coverage measure (percent of school board service months from July 2002 - December 2007 held by a school board member trained at the Texas Institute training; derived from administrative data from CRSS collected directly from school district offices, county election offices, and in a few cases on-line research).

Analysis of survey data. T-tests were calculated to examine the statistical difference between the behaviors and actions of school board members trained and not trained by the Texas Institute training. These analyses were run on the school board member level data (N=185). There are 88 school board members who have attended the Texas Institute training from 2002-2006 and 97 that have not attended.

To analyze the data at the school board level, the school board member level data was aggregated into school board level data by calculating the median (given the small sample sizes) of the school board member and superintendent responses for each school board. Each set of school board data were also analyzed for completeness, i.e. at least half of the trained and untrained school board members on the school board needed to have responded to the school board member survey. If this

criterion was met (or exceeded) then the school board data was included in the analyses. Seven school boards had insufficient data to be included in the analyses; the pilot board was also not included. The analysis sample included 35 school boards.

Correlations were calculated to examine the bivariate association between reform policy codification and school board core beliefs or school board roles and responsibilities or school board operations as well as the percent of Texas Institute trained board members (i.e. penetration rate), or the overtime coverage of Texas Institute training (measured by the percent of school board service months from July 2002 - December 2007 held by a school board member trained at the Texas Institute training) or whether there is a fixed faction on the school board. A fixed faction was defined as 'when certain members of the school board vote together as a block on almost all issues.

Furthermore, the independent variables of interest were regressed on the dependent variable (reform policy codification). The independent variables were entered into the model in blocks. First, we modeled the effect of school board core beliefs, roles and responsibilities, and operations, while also adjusting for number of schools in the school district, the percent of schools meeting their adequate yearly progress. Model 2 included controls for the school board members rating of the superintendent and civic support (measured by the proxy of a bond having passed between 2002 and 2006 with no bonds failing after a bond had passed). District size and student achievement were included in the models because the literature finds many differences in school district functioning according to size and achievement. The rating of the superintendent and civic support were included in the model because they are potential mediating factors according to the reform governance model. Model 3 added the percent of Texas Institute trained board members in a given district. Model 4 added the overtime coverage metric of Texas Institute trained board members. Models 5 and 6, respectively, added the interaction term of roles and responsibilities and of school board operations with the percent of Texas Institute trained board members to examine the moderating effect of the percent of Texas Institute trained board members on a given board.

Given that the dependent variable is dichotomous, logit regression models were also estimated. Estimates from the OLS and logit models were similar so only the results from the OLS models are reported given their ease of interpretation.

*Cross comparative case-study analysis strategy.* The comparative case-study data was analyzed to qualitatively isolate general factors associated with working and non-working reform governance and with participation in the Texas Institute training. To identify themes, we utilized a staged technique described by Lincoln and Guba (1985) and elaborated on by Ryan and Bernard (2003). Then using the classic comparative case study design approach, we described and compared two groups and tested (in some cases) whether one group differed from the other.

Coding of interview transcripts. First, we used text management software (*ATLAS.ti*) to mark contiguous blocks of transcript text that pertained to the *a priori* topic areas incorporated within the interview protocol based on the components of the reform governance model, known as structural coding (MacQueen et al., 1998). These structural codes were further refined through inductive reasoning in accordance with grounded theory approach (grounded theory is an inductive approach in which theory is developed from a specific set of data). That is, the "quotations" or excerpts of the

transcripts, tagged in connection with each of the main domains, were then reviewed to identify sub-themes and further refine the coding scheme.

Next, two team members pulled out and reviewed all the text associated with the domains that a priori aligned with each of the 14 indicators. For each indicator, the two team members studied the text associated with the domains and decided if a quote supported the full presence, partial presence or non-presence of the indicator (based on the rubric). Team members came to consensus about the extent of the presence of each of the indicators and assigned the quotes accordingly. To further validate several of the indicators, we reviewed the copies of any reform policies mentioned by the superintendent or school board president in the initial interviews to validate that the policies were truly aimed at fundamentally changing the district. We also watched DVDs of three regular board meetings for each school board and we read the meeting agendas and notes. Watching the board meetings and documenting various characteristics allowed us to validate the efficiency of the board meetings and witness the interactions of board members with each other and the superintendent. These observations were used to assess the validity of the self-reported interview comments about board member relationships and personalities, and about board meeting efficiency and content.

Analysis of interview themes. We examined the degree to which these themes and indicators were present for each person interviewed. For example, if one respondent mentioned a theme four times and another mentioned it once, the total number of quotes for the theme would be five, while the number of persons who mentioned the theme would be two. From the person counts, we calculated the overall and school board percentage of people who mentioned a theme, the full presence of an indicator or the partial presence of an indicator and then we calculated the percentages based on working and non-working boards by summing the total number of persons across the given set of boards. We examined the patterns overall, at the individual school board level, and at the working vs. non-working board level. As we examined these patterns, it became clear that the pattern of variation at the individual school board level was reflected in the working vs. non-working groupings. Therefore, we are only reporting the overall percentages and the working vs. non-working comparisons.

Differences between working and non-working boards. We examined the patterns across working and non-working boards. Then, we describe how working boards, for example, govern differently than non-working boards by elaborating on the self-reported evidence that the elements of reform governance exist within a school board, i.e., core beliefs and commitments; roles, responsibilities and relationships; school board operations; theories of action; policy development, and policy oversight; and reform policies (as defined by CRSS's model). This examination highlights which aspects of the reform governance model are more prominent in the working (vs. non-working) boards and in the process served as a validation method of the selection of the six case studies into the two distinct groups.

“T-tests” (in some cases) were calculated to examine the statistical difference between the percentages of people who mentioned a theme in the working boards vs. the non-working boards. The t-test assesses whether the means of two groups are statistically different from each other, or do not happen by chance. The p-value is the probability that the difference in the means is due to chance. The null hypothesis is rejected when the p-value is small, i.e. that the difference in means is not due to chance (and is therefore statistically significant or statistically different). In our analysis,

student's t-tests were used because they deal with the problems associated with inference based on "small" samples. Moreover, in some cases our samples are too small to reliably conduct the student t-test in which case, the p-value is still reported to indicate whether the means are distinct, but the results are flagged to indicate that small sample size is an issue.