



Novato Unified School District

Technology Review

March 20, 2009

Joel D. Montero
Chief Executive Officer



March 20, 2009

Jan La Torre-Derby, Superintendent
Novato Unified School District
1015 7th Street
Novato, CA 94945

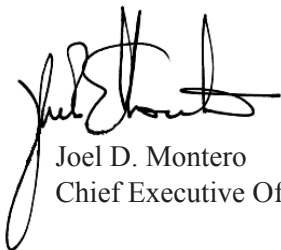
Dear Superintendent La Torre-Derby:

In September 2008, the Novato Unified School District entered into an agreement with the Fiscal Crisis and Management Assistance Team (FCMAT) for a study that would perform the following:

1. Examine the steps taken during the planning and execution of student system conversion. Provide recommendations that, if implemented, will enable the district to comply with industry standards for software conversions in the future.
2. Assess the design, stability, management, and ongoing maintenance of the district's student system. Assist the district in developing procedures to ensure data quality; starting with data input and ending with data reporting, assessment, and decision making. Provide recommendations for improvement.
3. Evaluate the district's overall technology network for both instruction and operations applications and provide recommendations to ensure customer satisfaction and operational efficiency.
4. Provide sample policies and protocols for effective data management.
5. Review the organizational structure, staffing levels, roles and responsibilities, and levels of supervision and evaluation within the Technology Department, and provide recommendations for improvements.

FCMAT visited the district to conduct fieldwork, interview staff, and review information. This report is the result of that effort. Thank you for allowing us to serve you, and please give our regards to all the employees of the Novato Unified School District.

Sincerely,



Joel D. Montero
Chief Executive Officer

FCMAT

Joel D. Montero, Chief Executive Officer

1300 17th Street - CITY CENTRE, Bakersfield, CA 93301-4533 • Telephone 661-636-4611 • Fax 661-636-4647
422 Petaluma Blvd North, Suite. C, Petaluma, CA 94952 • Telephone: 707-775-2850 • Fax: 707-775-2854 • www.fcmat.org
Administrative Agent: Larry E. Reider - Office of Kern County Superintendent of Schools

Table of Contents

Forewordiii

Introduction I

Executive Summary 3

Findings and Recommendations 7

Leadership and Communication..... 7

Organization and Staffing 11

System Conversion/Data Migration..... 15

Data Governance 19

Instructional Technology 25

Administrative Technology 29

Appendices31

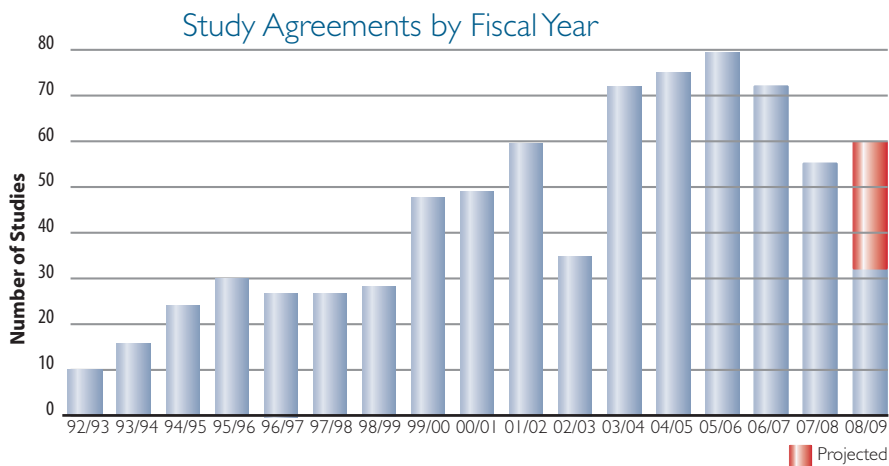
Foreword - FCMAT Background

The Fiscal Crisis and Management Assistance Team (FCMAT) was created by legislation in accordance with Assembly Bill 1200 in 1992 as a service to assist local educational agencies (LEAs) in complying with fiscal accountability standards.

AB 1200 was established from a need to ensure that LEAs throughout California were adequately prepared to meet and sustain their financial obligations. AB 1200 is also a statewide plan for county offices of education and school districts to work together on a local level to improve fiscal procedures and accountability standards. The legislation expanded the role of the county office in monitoring school districts under certain fiscal constraints to ensure these districts could meet their financial commitments on a multiyear basis. AB 2756 provides specific responsibilities to FCMAT with regard to districts that have received emergency state loans. These include comprehensive assessments in five major operational areas and periodic reports that identify the district's progress on the improvement plans.

In January 2006, SB 430 (charter schools) and AB 1366 (community colleges) became law and expanded FCMAT's services to those types of LEAs.

Since 1992, FCMAT has been engaged to perform nearly 750 reviews for local educational agencies, including school districts, county offices of education, charter schools and community colleges. Services range from fiscal crisis intervention to management review and assistance. FCMAT also provides professional development training. The Kern County Superintendent of Schools is the administrative agent for FCMAT. The agency is guided under the leadership of Joel D. Montero, Chief Executive Officer, with funding derived through appropriations in the state budget and a modest fee schedule for charges to requesting agencies.



Total Number of Studies.....743

Total Number of Districts in CA 982

- Management Assistance..... 705 (94.886%)
- Fiscal Crisis/Emergency.....38 (5.114%)

Note: Some districts had multiple studies.

- Districts (7) that have received emergency loans from the state. (Rev. 1/22/09)

Introduction

Located in the North Bay region of the San Francisco Bay Area, the Novato Unified School District serves more than 8,000 students at three high schools, three middle schools, eight elementary schools, a K-12 independent study program, and a K-8 charter school. The district enjoys high levels of parent involvement and employs approximately 800 classified and certificated staff members.

In September 2008, the district office and the Fiscal Crisis and Management Assistance Team (FCMAT) entered into an agreement for FCMAT to perform the following:

1. Examine the steps taken during the planning and execution of student system conversion. Provide recommendations that, if implemented, will enable the district to comply with industry standards for software conversions in the future.
2. Assess the design, stability, management, and ongoing maintenance of the district's student system. Assist the district in developing procedures to ensure data quality; starting with data input and ending with data reporting, assessment, and decision making. Provide recommendations for improvement.
3. Evaluate the district's overall technology network for both instruction and operations applications and provide recommendations to ensure customer satisfaction and operational efficiency.
4. Provide sample policies and protocols for effective data management.
5. Review the organizational structure, staffing levels, roles and responsibilities, and levels of supervision and evaluation within the Technology Department, and provide recommendations for improvements.

Study Team

The study team was composed of the following members:

Andrew Prestage
FCMAT Management Analyst
Bakersfield, CA

Lisa Hayes
Implementation Specialist
California School Information Services
Modesto, CA

Nancy Sullivan
Special Projects Administrator
California School Information Services
Sacramento, CA

Chuck Berridge*
Implementation Manager
Eagle Software
San Marcos, CA

William Gillaspie, Ed.D.
FCMAT Chief Management Analyst
Roseville, CA

Leonel Martínez
FCMAT Public Information Specialist
Bakersfield, CA

*As a member of this study team, this consultant was not representing his employer but was working solely as an independent contractor for FCMAT.

Study Guidelines

FCMAT visited the district October 15-17, 2008 to interview employees, collect data and review information. This report is the result of those activities.

Executive Summary

In 2007, the Novato Unified School District embarked upon plans to replace its aging student information system (SIS) and recruit a new Director of Information Technology (IT). Under the direction of an Interim Director of Information Technology (IT), the SIS system alternatives were narrowed based on district requirements, and 40-50 staff members from across the district were invited to attend a daylong evaluation of the selected SIS.

Control of the project was transferred when the permanent IT Director was selected. District administrators hoped that the new director's instructional background would prove beneficial as the district progressed through the SIS conversion steps.

One of the new director's first actions was to fill a vacant systems position in the IT Department. In what appeared to be an excellent match for the position, the selected individual possessed SIS conversion experience, and had guided a former school district onto the same SIS as the one selected by Novato Unified.

There were high expectations for a smooth conversion, which did not materialize because of problems that included the following:

- With no direct IT management background, the permanent IT Director was forced to rely heavily on the newly hired Systems Supervisor for conversion management and guidance.
- Although the new Systems Supervisor had successfully managed a similar conversion in another school district, the system that the district converted *from* was not the same as the legacy system used by the Novato Unified. As a result, other IT staff members mistakenly assumed that the staff members handling the conversion had the knowledge required for the task.
- No communication feedback was provided to allow IT staff members to know whether their assumptions about client needs were correct.
- Differing ideologies formed in the IT Department when legacy SIS support staff objected to the conversion to the Aeries student information system. Some staff members perceived that many legacy SIS support staff members undermined department efforts to complete the project. The two Student System Technicians responsible for supporting the legacy SIS believed they were excluded from critical decision-making or student system migration activities needed to make the transition.

- Effective verbal and written communication channels between the IT Department and other departments and sites were never developed.
- Despite vendor warning to avoid a mid-year conversion, the IT Department moved forward with a mid-year conversion.
- Assumptions about the scope and complexity of the work were not communicated adequately or checked for validity.
- Project risks were not identified and risk mitigation strategies were never developed.
- There was no detailed analysis of end-user hardware requirements, so the resources needed to upgrade staff computers were never identified.
- To reduce costs, the IT Director opted to purchase a previously created data conversion program from another district that had conducted a similar conversion. Although less expensive and quicker than developing a data conversion program from scratch, the long-term costs of data conversion errors many times proved to be more costly to the district.
- No mechanism was established for tracking and prioritizing SIS ongoing problems during conversion.
- Some system conversion activities were performed by IT staff members who did not have an in-depth understanding of the needs of SIS users.
- No written implementation plan was developed, resulting in a lack of common understanding regarding the tasks that needed to be completed, the success criteria, the testing that needed to be performed to ensure data was accurately converted, and the checks and balances needed to monitor progress and make any necessary adjustments. An effective implementation plan would have included milestones for each month of conversion.
- A clear understanding of roles and responsibilities was never developed (e.g., What data reports are sites responsible for reviewing and verifying? What reports should special education, GATE, and other district administrators review for accuracy?)
- Basic project management practices for a student system conversion were not followed. These included documenting scope of projects, time line, and resources at the beginning of the project so that all involved had a common understanding, identifying risks and working to avoid or mitigate implementation issues.

To address these problems, the Coordinator of Communications and Data recently established a data management team (DMT) to develop procedures for data management and address ongoing issues with the SIS conversion.

The district also transferred its financial/HR software system from SCHOOL/3000 developed by Quintessential School Systems to a new version with an updated user interface, QSS Control Center (QCC). This process appears to be disorganized similarly to the conversion of the student system. As of this review, there was no written implementation plan, including the lack of defined time lines, training schedules, identified targets or milestones for implementing subsystems, or specific identified responsibilities. The IT staff and the system users expressed frustration regarding the lack of understanding of roles and responsibilities for the process, but there was no apparent effort to create coherent structure for orderly implementation.

FCMAT believes that the IT Department efforts to accomplish a successful SIS conversion were unsuccessful because of a lack of project management, effective communication channels, and infighting within the department. If these problems are not resolved, similar problems will likely result with the district's migration to the graphical version of its financial/human resources system.

Findings and Recommendations

Leadership and Communication

The district's strategic technology plan is not used to provide direction for the Information Technology (IT) Department or as a resource to guide the integration of technology into the curriculum to improve student performance. The plan does not reflect the district's vision and goals for technology initiatives, limiting its usefulness and credibility as a guiding document. The technology plan provides minimal guidance to sites on how to articulate technology and its functions to help attain district instructional goals. Site technology plans are not coordinated with the district's overall plan. The plan lacks an equipment replacement strategy and does little to increase awareness of the gap between what users want and what the district can afford.

The IT Department lacks effective communication channels with the Curriculum and Instruction (C&I) Division that would permit discussion and agreement on priorities for the allocation of limited technology resources. Curriculum and Instruction administrators expressed frustration that scheduled meetings with IT staff are too often preempted and are not structured to provide for collaborative decision-making.

C&I administrators commented that project meetings requiring extensive collaboration with the IT Department are often attended by one IT staff member instead of having more appropriate involvement by a larger IT support group. Lack of extensive participation by the IT support staff has hindered the decision-making process during planning meetings. As a result, discussion topics often focus on responding to problems rather than on planning and prioritization.

Project implementations have suffered from a lack of early collaboration and communication between instruction and technology. For example, insufficient collaboration resulted in problems when the annual parent survey was first launched as an online survey tool. Staff members spent considerable time developing work-arounds and fixing problems within the data responses. In retrospect, many of the problems could have been avoided with sufficient collaboration at the outset of the project by reaching a consensus and working as a team.

Technology support staff members indicated that although IT Department meetings were scheduled on a biweekly basis, they were often cancelled or rescheduled. Printed agendas were not made available to guide meeting progress and measure the department's performance.

The Coordinator of Communication and Data recently established a Data Management Team (DMT) to improve communications and develop procedures for data management. The DMT is not under the direction of the IT Director. The IT Director should be responsible for assisting and coordinating with the DMT. A skilled facilitator should guide DMT meetings rather than having the IT Director provide both the leadership and facilitation.

Recommendations

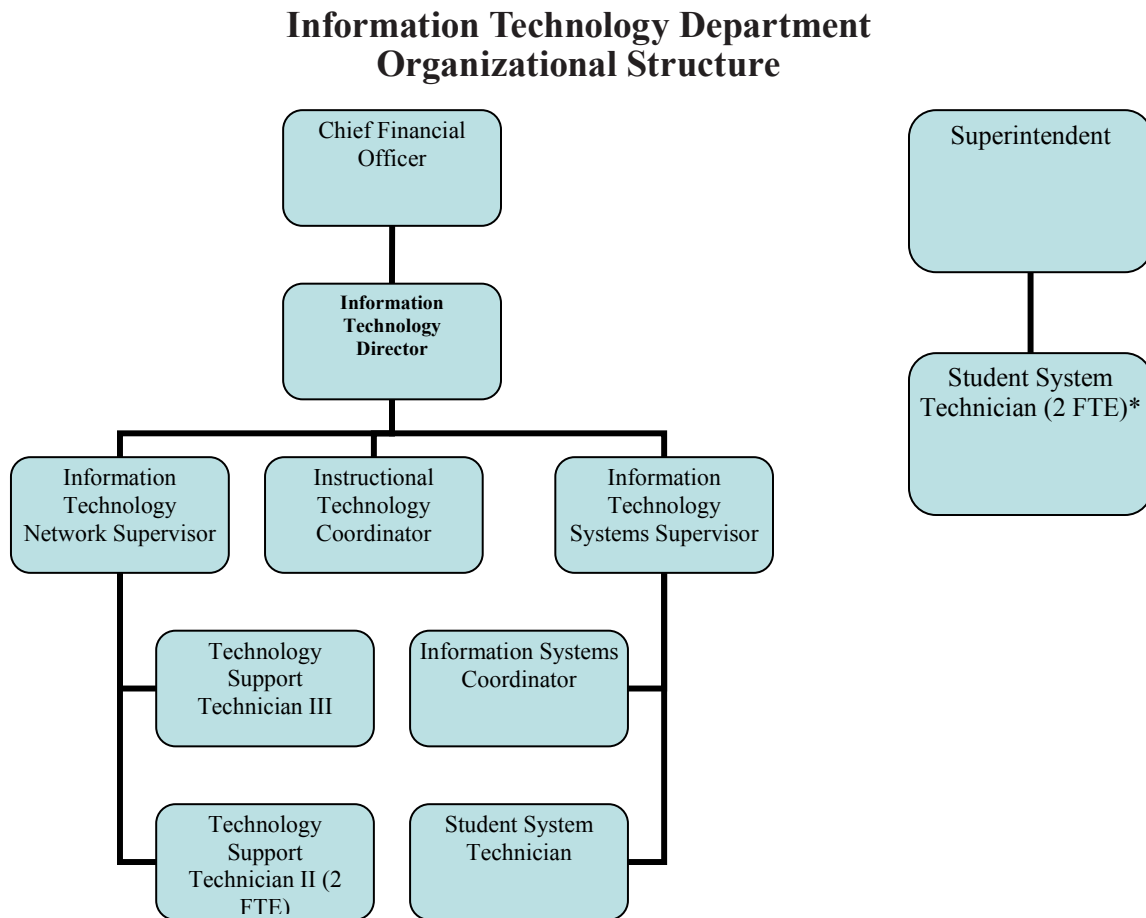
The district should:

1. Assign the Technology Committee to create a new five-year strategic technology plan. Development of the new technology plan should include input from classified, certificated, and management personnel; parents, community members and student representatives. A list of committee responsibilities should be developed, including the following:
 - Reviewing the goals and objectives of the Technology Services Department.
 - Exploring available funding resources.
 - Exploring available educational systems.
 - Creating and reviewing site technology plans.
 - Submitting a proposed technology plan and budget to the Governing Board for consideration.
2. Establish a site-based technology committee at each school site. The site-based technology committees should be comprised of representatives from site administration, instructional, classified, and community member groups. The committees should be responsible for revising site-based technology plans to align with the overall goals and objectives contained in the districtwide technology plan. One member of each site committee should attend the district technology committee meetings.
3. Ensure that the IT Director places a high priority on communications with other district office and site administrators.
4. Improve communications between IT and Curriculum and Instruction staff. Meetings should be conducted weekly. Meeting discussions should focus primarily on prioritization of technology resources to support instruction.
5. Ensure that meetings regarding C&I projects that will require the extensive involvement of IT support staff are attended by all appropriate support staff members.

6. Ensure that IT support staff members are involved from the outset of technology project implementations. Early participation of the IT support staff should make technology implementations go more smoothly and reduce the number of post-implementation problems that must be resolved.
7. Ensure that IT Department meetings are conducted biweekly and are not cancelled. Agendas should be e-mailed to all technology support staff members in advance. The staff should be invited to submit agenda items for inclusion on the agenda to encourage participation and communication.
8. Continue to leverage the Data Management Team to improve communications and develop procedures for data management. DMT meetings should be conducted under the direction of a skilled facilitator. The IT Director should plan meetings and debrief with the facilitator afterward and should be responsible for fostering an atmosphere in which concerns at all levels of the district are heard and addressed.

Organization and Staffing

In October 2008, administrative oversight of the IT Department was reassigned from the Superintendent to the Chief Financial Officer in the Division of Business Services. Comprised of 11 positions, the organizational structure of the IT Department is depicted below.



**One of these two staff members retired in December, 2008. The district will not replace this staff member as it was only a temporary position.*

Based on position and salary schedule information obtained during fieldwork, the IT Department salary expense for 2007-08 was approximately \$630,000.

Some technology support staff members do not report to the IT Department. Each of the district's eight elementary school sites has independently hired a part-time Technology Support Technician I to assist with support requests. Site-based technology support staff members report to site administrators and have varying responsibilities. There is no comprehensive plan or reporting structure to ensure that technology support is aligned, organized and maximized to effectively serve the district's technology needs. The 2007-08 salary expense for these positions was approximately \$120,000. Information on funding sources for these positions is presented below.

Funding Sources: Other Technology Support Salaries

School Library Improvement Block Grant	73.16%	\$87,263.00
Title 1	4.24%	5,052.00
PTA	22.61%	26,968.00

Citing personnel differences in the IT Department, two technology support staff members recently requested and were granted transfers to the Superintendent's office. Although department morale improved, the transfers did not address the underlying issues that caused the tension between these staff members and the rest of the IT Department. One of the two staff members who transferred to the Superintendent's office retired effective December 30, 2008.

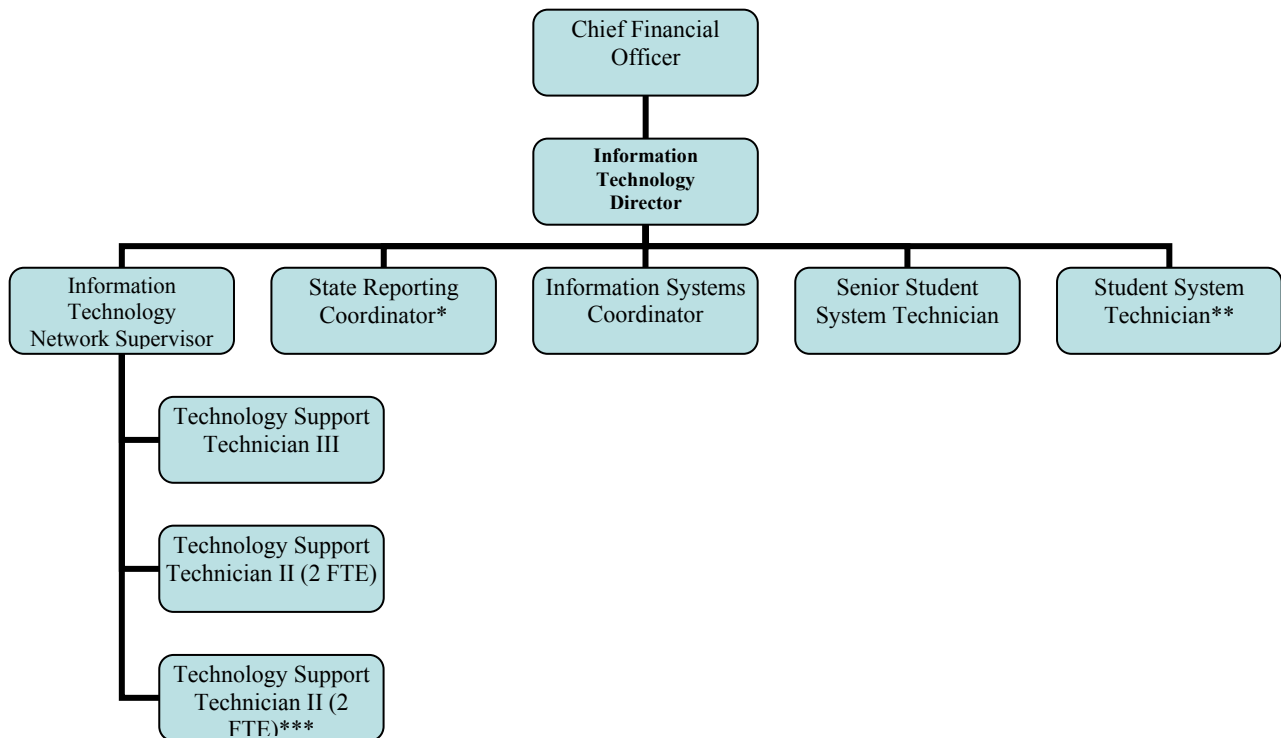
The district's student information system (SIS) functions are not allocated efficiently. For example, one staff member performs state reporting functions such as importing, validating, correcting, and sending student data; viewing status of error reports and making necessary corrections, and certifying the data submission, indicating that it is accurate and complete. Another staff member performs SIS management functions. These functions include ensuring that the SIS is being used in a consistent manner with regard to entry of data into modules such as scheduling, testing, grading, transcripts, and student demographics. The functions performed by the two staff members frequently overlap. In some larger school districts, a single staff member performs both. These functions are closely interrelated and will likely require additional support within the next year due to the increasing complexity associated with state reporting requirements. Many districts have consolidated these various functions under a single district position.

Some staff members expressed frustration that the instructional technology coordinator's time was being taken up by server support functions, leaving less time for instructional technology application support. To address these concerns, the Instructional Technology Coordinator was transferred from the IT Department to the Division of Curriculum and Instruction in January, 2009.

The IT Department lacks a support schedule that assigns support technicians to specific sites. As a result, site administrators indicated that they do not know in advance when IT staff members will be on site to perform requested services. Site support should be scheduled, and site administrators should be informed of the schedule in advance.

Several IT staff members expressed a desire for cross-training to build internal capacity in the department. Cross-training should be performed among student system support staff members to transfer student system knowledge. Professional development and cross-training should also be performed between technology support staff to build comparable skill sets and develop capacity among those positions.

FCMAT's proposed IT Department organizational structure is as follows.



* Reclassification of Student System Technician

** The staff member who filled this position retired in December, 2008. Although the position was only temporary, it should remain on the organization chart.

*** These two new positions take the place of the eliminated site-based Technology Support Technician I positions.

Recommendations

The district should:

1. Continue to align the IT Department within the Division of Business Services, reporting to the Chief Financial Officer.
2. Keep the Instructional Technology Coordinator position in the Division of Curriculum and Instruction. This will allow the Instructional Technology Coordinator to better focus on instructional technology support and professional development.
3. Return the one remaining position that was transferred to the superintendent's office to the IT Department. The underlying issues causing the tension between this staff member and the rest of the IT Department should be addressed and resolved.

4. Create a new position titled State Reporting Coordinator and reassign the Student System Technician currently performing state reporting functions to fill the new position. The State Reporting Coordinator should assume responsibility for all state reporting and SIS management functions. By consolidating these various functions under a single staff member, the district will be able meet state reporting requirements while improving the delivery of SIS support.
5. Reclassify one of the two remaining Student System Technician positions as Senior Student System Technician. Creation of this position will provide a professional growth path within the student systems support area.
6. Keep the Student System Technician vacancy (created by the recent retirement) on the organization chart pending further analysis of student system functions and availability of funds to fill the position.
7. Consider creating two new full-time Technology Support Technician II positions, bringing the total number of Technology Support Technician II positions to four. Given the state's fiscal crisis, this recommendation should be implemented as funding becomes available. The annual salary expense associated with the two new positions is approximately \$60,000. All Technology Support Technician II positions should report to the Information Technology Network Supervisor.
8. Consider eliminating all Technology Support Technician I positions. Technology Support Technician I personnel should be encouraged to apply for one of the two new Technology Support Technician II positions, if interested. If the district opts to implement recommendations seven and eight, the total number of district personnel responsible for providing technology support services would decrease by six positions, from 19 to 13. The salary savings associated with these recommendations could be used to fund the other staffing recommendations included in this section.
9. Develop and publish a site support schedule that ensures site administrators know in advance when IT staff members will be on site to perform requested services.
10. Establish a scheduled support strategy that assigns support technicians to specific sites on particular days each week. For example, each comprehensive high school should be assigned a dedicated technician. At the middle-school level, one technician can handle two or three sites. At the elementary school level, each technician can be assigned to support three to four sites.
11. Develop cross-training opportunities for student system support staff to transfer student system knowledge. Cross-training should also be performed between technology support staff to build comparable skill sets and develop capacity.

System Conversion/Data Migration

In 2007 the district began transferring its data from the QSS Student/3000 student information system (SIS) to Eagle Software's Aeries system. Personnel and personality issues compounded by the lack of an implementation plan affected efforts in project management data conversion and verification. A lack of effective project management oversight and experienced technology support staff hampered project progress and data conversion. As a result, significant institutional knowledge was not available to the newer staff members who had primary responsibility for data conversion.

The following factors contributed to problems encountered during the conversion:

- There was no designated project manager to provide the necessary leadership.
- Primary responsibility for the conversion effort was handled by a staff member who was not familiar with the QSS Student/3000 data structure as used at Novato Unified.
- IT Department staff members who had been trained and supported the QSS Student/3000 opposed changing student information systems and did not support the project.

Because of the lack of a Project Manager to provide the necessary leadership in a conversion process of this magnitude, duties that would normally have been performed by this position were distributed among other district office administrators. As a result, no one employee had the overarching responsibility for the project and this bifurcated organizational structure led to decision-making conflicts that delayed the success of the implementation.

Two relatively new staff members (the IT Director and Supervisor) were given responsibility for the project and allowed to plan and implement the conversion in near isolation. Few if any steps were taken to ensure they had an adequate understanding of the project's scope and complexity. These staff members had project management and technical responsibilities without adequate time to perform both functions. Furthermore, the division among IT staff members who supported and opposed the project implementation worsened during the course of the project.

Many users indicated that a mid-year conversion contributed to the difficulties. Although some districts have conducted successful mid-year conversions, they typically did not have the range of issues that Novato Unified is facing and initiated the process with a detailed and structured project implementation plan.

An experienced project manager was not hired during implementation, significantly reducing the district's ability to complete a successful conversion. Industry standard project management practices were not followed, a written implementation plan was

never developed, and an environment that encouraged collaborative problem-solving was not fostered. The conversion was hindered by a lack of project scope documentation, detailed time lines, defined roles and responsibilities, and alignment of available resources with stated goals. The district should assign a project manager to organize, document and guide the remaining conversion activities to get the project back on track and completed in a timely manner.

There was little discussion about the specific roles and responsibilities of staff members involved with the conversion or what they needed to make the transition successful. No means or written documentation were developed to monitor implementation or provide ongoing feedback. This feedback could have helped the district make improvements, develop an action plan, assign tasks, define required resources, develop a time line, and determine how progress reports are shared with the involved parties. As a result, these parties did not have a common understanding of the tasks to be completed, the criteria for success, the testing to ensure data was accurately converted, or the checks and balances needed to monitor progress and make adjustments.

The IT staff member who was assigned responsibility for data conversion and training had prior experience with the newly acquired Aeries software, but no direct experience with the district's current student information system for QSS Student/3000. During data conversion, the IT Department used a QSS data-extraction program developed for another school district that had conducted a similar conversion. This program was the likely source of several system conversion problems. In the student tracking module, some students attended more than one school, but only the courses they took at their last school appeared in the Aeries SIS. Many students were missing from some schools in the Aeries data conversion, and others were assigned to schools that they had never attended or had not attended for years. Many problems were not discovered until the converted data was released to end users or exported to external online applications. An effective conversion would have included a parallel validation of both systems' data to determine the accuracy of the student database.

Although some of the problems were known to the IT Department as early as November 2007, the conversion continued as scheduled. There was little effort to correct data problems before the data conversion was completed and little effort to verify converted data before it was released to the end users. Attributes of the courses taught in higher grades were poorly managed in the QSS database. All the errors were converted, and none of the missing information was entered until students and parents began asking why transcripts were incorrect. Many students have had difficulties with post-secondary applications because of inaccurate transcripts from Novato Unified.

The 2008-09 school year opened with schools using the Aeries SIS databases that were known by IT Department staff to contain incorrect data. Transcripts were incomplete, especially for students who had been in more than one school over the years. At the time

of FCMAT fieldwork, the district hired a substitute employee to check the transcript of every current student for missing or inaccurate data. Transcripts for former students are printed from the QSS Student/3000 SIS due to the inaccurate data on the district's newly installed Aeries student information system..

The district initially planned to convert elementary school data first and “go live” in February, 2008. However, despite the identified difficulties experienced regarding the converted data, the implementation and conversion schedule was not changed, and the migration moved on to the more-complex secondary schools without the source of the problems being identified or corrected.

The IT Department had either insufficient hardware to store Aeries data or insufficient knowledge of how to manage the SQL server that stored the data. The district has sufficient disk space to store eight weeks of SQL transaction logs, which can take more space than an entire SQL database if not properly managed. Data more than eight weeks old gets deleted, making it impossible to revert SQL transactions to a particular date and time to correct major data errors.

Many users indicated that the new SIS takes an excessive amount of time to start, and some table formats download repeatedly. These are known problems with the SQL version of Aeries, and the solution is either not being used or is not being applied often enough. These problems can easily be eliminated by performing a weekly maintenance cleanup on the SIS databases. End users indicated they have had many SQL security problems because they were not asked what SIS data they maintain or what SQL permissions and rights they require before they started using Aeries.

Many district computers do not meet the SIS vendor's minimum system specifications. A training schedule was developed, but many users indicated that they did not receive adequate training to use the new SIS effectively. Training issues included the following:

- Site administrators received only Aeries Basic Overview training (recommended by the vendor for all users).
- Elementary school clerks received no training on the system's discipline tracking capability and learned after the 2008-09 school year began that they were expected to use this function instead of the paper-based procedures used in the past.
- Registrars and attendance clerks were not included in the original training sessions conducted by the vendor.
- School counselors commented that their Aeries training was scheduled with little concern for their schedules at the school and the impact that their absence would have on the offices.

- The middle schools were told just before school began that they would be using the system to perform period attendance. School personnel have had no training on master schedule maintenance other than the brief coverage in Basic Overview training.
- The vendor conducted one session of Train-the-Trainers for eight or fewer Novato Unified teachers on the Aeries Browser Interface (ABI), the Aeries module used by teachers for grades (including grade books) and for reporting absences. Other teachers had difficulty using the ABI Gradebook and requested additional training, but none has been offered.

Some job-alike training meetings have been held to facilitate communication, and most staff members expressed interest in additional meetings of this type. These meetings would allow registrars and attendance clerks to discuss common concerns and user issues. Information-sharing resources such as shared folders have not been established to allow users to share files, tip sheets, queries and other SIS information. Several staff members indicated that the SIS training provided by IT support staff was not role or job specific.

Training topics were not well communicated, and it appears that the training schedule did not consider potential conflicts in attendees' schedules. New user and refresher training sessions have not been developed to further enhance the district's training requirements. The IT Director should begin holding job-alike meetings, providing shared folders and improving training. Training for the staff member responsible for attendance accounting is an immediate concern and should be provided as soon as possible due to the potential fiscal impact on the district's attendance reporting requirements.

Recommendations

The district should:

1. Assign a project manager to organize, document and guide remaining conversion activities to get the project back on track.
2. Create additional job-alike training meetings to facilitate communication.
3. Provide shared folders to allow users to share files, tip sheets, queries, and other SIS information.
4. Ensure that training for the staff member responsible for attendance accounting is provided as soon as possible.

Data Governance

Data governance is defined as a quality control discipline for assessing, managing, using, improving, monitoring, maintaining, and protecting organizational information. It is a system of decision rights and accountabilities for information-related processes, executed according to agreed-upon models that describe who can take what actions with information. This includes when the action should be taken, under what circumstances, and using what methods.

Data governance is a system that provides district stakeholders with a role in the decision-making process. The first step in implementing data governance is identifying the organization's data assets and the data managers who have primary responsibility for the use, accuracy, and maintenance of the data. The data managers form the core of the data management team (DMT). Team members should understand the use of data and technology to support district goals and operational needs, the data needed to comply with state and federal laws and reporting requirements, and the needs of students, staff, parents and the board. The DMT has shared responsibility for the overall data needs of the organization, including establishing data standards and procedures, specifying systems of record for data elements, determining data storage and archiving standards, setting controls and audit procedures, and protecting the security and confidentiality of all data. Taking this team approach will keep the IT Department from making decisions in isolation.

The district recently formed a data management team that is developing data governance structures. Most of the constituencies that have expertise in those areas are included on the team. The Coordinator of Communications and Data took the initiative to form the team, and is responsible for convening team meetings, establishing priorities and managing the team's work. The IT Director participates as a member of the team.

A written procedures manual for the Aeries student information system is under development by the Student Support technician. The manual will be customized for the district's implementation of Aeries. Concerns were expressed that this effort is being performed in isolation, without input from site staff. Procedures manuals from the vendors are available to the users of SCHOOL/3000 and the QCC, however users expressed frustration that the manuals were almost unusable in their current form because they are excessively technical, long and confusing.

Several data problems may have been avoided if a data governance structure and suitable documentation were in place earlier. The problems had multiple root causes, including the failed data conversion, a mutual lack of understanding between the district technology users and technology staff, the lack of consistent processes, a breakdown in communications between and across departments, and lack of a culture that makes users responsible for validating data. An incomplete understanding of mission critical

and functional requirements, ineffective communication skills, staff turnover, morale and management issues and an inadequate sense of urgency in addressing them also contributed to the problems. When system and data problems were identified, no process was in place for raising and tracking issues and no consistent procedures for resolution and feedback. Other problems discovered included the following:

- Several staff members reported that they did not have confidence in the attendance reporting process. Attendance calendars and codes were set up without consultation or a clear understanding of the potential implications for making errors. Additionally, a unilateral decision was made by the IT Department to convert from daily to period attendance for the secondary schools. The staff was unsure how to use the new system and what reports were to be used for verification, resulting in inconsistent attendance procedures throughout the district. Some teachers do not have reliable access to workstations for attendance purposes.
- Data submitted for the 2007-08 STAR pre-ID process was incomplete, leading to problems with document distribution at testing time, and inaccurate Adequate Yearly Progress (AYP) calculations. The latter resulted in the withholding of the district's Academic Performance Index (API) results until the problems can be corrected. Deadlines for submitting data for the 2008-09 CAHSEE and CELDT pre-ID processes were missed, which required a significant manual effort to prepare documents in time for testing. Due to the errors in the assessment results, sites were not able to apply for Distinguished School honors. There is also a concern about whether this could affect the upcoming WASC review for Novato High.
- District and site staff reported that some teachers were not aware of how to use the grade book program, which resulted in some students receiving failing grades because they were not dropped from classes. Grade confirming reports were run after transcript data was processed, resulting in grades that could not be verified before becoming final.
- Following the data conversion, transcripts were not verified. Transcript errors mistakenly reported students as deficient in credit and requirements. Once errors were detected in transcripts, a systematic process was not established for reviewing and correcting them. When problems were manually corrected, additional errors were uncovered. Additional staff members were hired to perform manual reviews, and many hours were spent reconciling transcript data to resolve errors.
- Similar data conversion errors in special program data were reported in for students in English Learner, Gifted and Talented Education (GATE) and Title I programs, which also required additional research, reviews and corrections.

- Course numbers are not consistent throughout the district. Sites reuse the same local course numbers for different courses. Unless addressed, this inconsistency will pose a problem to the district when the State implements the California Longitudinal Pupil Achievement Data System (CALPADS) next year since the same course may be reported differently in different schools.
- The process of migrating the financial/HR system from SCHOOL/3000 to a new version with an updated user interface, QCC appears to be disorganized similarly to the conversion to the student system. As of this review, there was no written plan, defined time lines, training schedule, targets for implementing subsystems, or specific identified responsibilities. The IT staff and the system users expressed frustration regarding the lack of understanding of roles and responsibilities for the process, but there was no apparent effort to create coherent structure for orderly implementation.
- Training on the new student information system was scheduled by the IT Department, but there was no coordination of this schedule. Some training was scheduled at times that conflicted with school schedules. Site staff members expressed frustration that the training was not more role specific and indicated that since some of the training did not apply to them, they wasted time attending training on features they would never use.
- The site and program staff reported they were unclear about the procedures used for data governance and that priorities of the IT Department with respect to data governance were unclear. Staff members also reported that decisions appeared to be made in isolation, and there was no transparency in the process.
- There is no consistent process for managing change or requests for assistance from the IT Department. Requests for technical assistance and troubleshooting for the information systems come to the IT Department via e-mail and individual contacts, but there is no single tracking mechanism that captures all issues. Technical problems are documented through a work order system, SchoolDude, and managed by the network group. All questions regarding the student information system go through the manager of the system, and all questions regarding the financial/HR system go through a single support staff member. Staff reported that this resulted in a bottleneck, and that although the Information Technology Department tried to be responsive to requests for assistance, they were at times backlogged. Staff also reported inconsistent follow-through and that requests were occasionally lost in the system. For example, one principal reported that her computer was not working, and a replacement was ordered, but the request was lost.

- There is no clearly established process to facilitate communication between IT support staff and system users. Defined processes typically result in an iterative requirements phase to vet requirements, create a common understanding between IT and end users of the requirements, and the time and resources needed to complete the work. For example, selection of Zoomerang for the parent survey typifies the need for a formal process. With no structure through which the request could be processed, IT the support staff was unable to identify the resources needed, lead time required, or necessary follow-up support requirements. As a result, the requirements and responsibilities were not fully understood by IT or users prior to implementation. IT staff members believed they had completed the assigned task, while the curriculum staff perceived that it was left to handle much more of the technical support associated with the survey than expected. Curriculum staff members expressed frustration that the IT staff members did not inform them of alternatives that could have been used for the survey.
- Staff members in the IT Department lack a comprehensive understanding of district operations and procedures, which limits their ability to leverage the capabilities of the existing information and technology resources.
- IT resources were constrained by lack of strong interpersonal relationships on which to build and generate understanding. As a result, lack of support, lack of supervision, lack of trust, morale problems and disruptive behaviors ultimately posed obstacles to successful conversion.

Recommendations

The district should:

1. Assign the DMT to establish documented procedures and consistent data standards regarding problems such as inconsistent coding of the same data at different school sites. These procedures should include the following:
 - Clear definition of the roles, responsibilities and expectations of school sites staff members as opposed to district office staff members. These roles should call for the end users to be involved in the development of procedures as well as in the review of procedures before they are submitted for approval.
 - Clear definition of the process used to approve policies and procedures.
 - The process for developing, vetting, and implementing data standards throughout the district. This process must include district as well as site staff and ensure that the same data are consistently coded at all school sites.

- The data reports that sites are responsible for reviewing for accuracy and verifying, as well as a sign-off procedure to document they have completed the verification.
 - Which data reports program administrators (e.g. special education, GATE and others) are responsible for reviewing for accuracy and verifying, as well as a sign-off procedure to document they have completed the verification.
 - Strategies and methods for improving communication between IT staff members and school site staff regarding what the issues are and what is being done to resolve them. The methods used should result in a development of a common understanding among departments of the overarching goals of data management, and priorities. This should include all projects, issues and new requirements and should identify priorities, status, requestor and/or requirement, primary contact in IT, resources needed, estimated time lines, and any issues, constraints or policies that may affect the outcome. The methods should promote transparency in data governance, and provide continuity of operations when turnover occurs.
 - Identification of systems of record and how systems are integrated to avoid redundant data entry
 - The steps taken to ensure confidentiality of the data, including who can take what action, when, under what circumstances, and using what methods.
2. Assign the DMT to review the requirements for CALPADS reporting, identify any gaps between what is currently collected and what will be required under CALPADS, and make plans for bridging the gap.
 3. Assign the DMT to inventory current local needs (e.g. attendance, grades, scheduling, and assessments) for data and develop a plan and process to collaboratively address any identified gaps.
 4. Consider adopting project management methodologies, including development of a project plan and project schedule at the outset of a project, use of a standard process for reporting progress, risk identification and mitigation, and development of a project closeout report at the conclusion of a project. This process should include the following:

- The project plan will document the scope of the project and roles and responsibilities of those involved, as well as success criteria that will be used to evaluate the success of the project.
- The schedule will document the specific tasks that need to be completed, the time required to complete each of the required tasks, and the resources required to complete these tasks.
- The standard process for reporting progress will formalize the method to report progress and improve the transparency of project status information. This process should be detailed enough that those reading the report understand whether each phase the project is on track, whether any new risks have been identified, and whether any issues require management assistance.
- Risks should be identified at the outset of each major project and should be reviewed by the stakeholders, including IT and program staff, at least monthly. Strategies for mitigating risks should be identified and used if a risk occurs.
- The project closeout report should review whether the success criteria were met, what went well and what did not, and what could be improved in the future. The report should be developed collaboratively by those involved in the project not to assign blame, but to identify how future efforts can be improved based on the lessons learned from previous projects. The project closeout report also provides a time for all stakeholders to come together and develop a common understanding of the project's strengths and weaknesses. This activity can enhance communication and facilitate the development of common expectations in future projects.

The use of project management methodologies helps with setting expectations before projects begin by identifying project scope, target dates for completion, and constraints. Status reporting as the project progresses facilitates communications between district and site users and the IT Department. Sample templates for the project plan, schedule, weekly status reports, and project closeout reports are attached as Appendix A to this report.

5. Continue to leverage the expertise, experience and skills of the Coordinator of Communications and Data, and hold the IT Director responsible for leading the data governance effort.

Instructional Technology

During FCMAT fieldwork, the district's Instructional Technology Coordinator was transferring from the IT Department to the Division of Curriculum and Instruction. This position is responsible for training site staff on instructional technology and for supporting staff use of technology to promote student learning and achievement. The coordinator attempted to leverage his time by recruiting a single instructional leader at each school site to work with teachers. He also worked with the sites to develop site technology plans for a K-12 skills continuum. The efforts of this position have been hampered by the following:

- The position was responsible for reconciling the problems with the data in Data Director and spent considerable time in this effort in the past year.
- The position was responsible for managing the back-end of the instructional technology systems, a task that required a significant amount of time.
- Elementary sites are required to purchase their own technology out of their site budgets. This results in inconsistencies between sites. Site and district staff expressed concern over the inequities that resulted from this policy.
- None of the teachers have a release period or receive a stipend for work on instructional technology issues. The Instructional Technology Coordinator expressed concern regarding teacher burnout. To avoid burnout, the coordinator worked with different teachers on different programs, requiring the coordinator to work with several lead teachers at each site.
- There is no mechanism for matching what a site wants with available resources and developing a common understanding of how IT would meet needs over time. Site staff members were complimentary about the work the Instructional Technology Coordinator had completed, but indicated they wanted more of his time at sites and less at the district office. Site staff members also indicated they wanted the data issues in Data Director resolved as quickly as possible but did not appear to acknowledge the gap between their desire for accurate data and the ability of the Instructional Technology Coordinator to provide requested support.
- Some sites were developing their own technology trainings for teachers. It was unclear whether mechanisms were in place to leverage these site resources to benefit the entire district. Without such mechanisms, inequities between sites will grow over time.
- Neither the teachers nor the Instructional Technology Coordinator had time to work on infusing the K-12 skills continuum into classroom learning activities.

Many instructional staff members indicated a desire for more professional development and training opportunities. The IT Director has not worked with the Instructional Technology Coordinator to ensure that site training requirements are aligned with available resources or to develop a common understanding of how technology might be used to meet the increasing need for technology training. Because there is no central, organized delivery of teacher training, some school sites have opted to develop and obtain teacher training resources independently. As a result, the ability to use technology for student learning and staff productivity is minimal at best.

Excellent examples of using technology to facilitate instruction can be found throughout the district. In most cases, these are the result of individual teacher efforts rather than districtwide-coordinated instructional technology efforts. To leverage individual efforts, the district's technology committee should identify one or more lead technology teachers at each school site. The district should consider negotiating for the lead technology teachers to have a release period or stipend to support instructional technology growth, with a focus on incorporating technology in the curriculum and working with teachers on the use of the Accelerated Reader, Data Director, and Aeries Gradebook applications. An instructional technology committee composed of all lead technology teachers and chaired by the instructional Technology Coordinator should be established. The instructional technology committee should meet monthly, focus on encouraging the use of technology in the classroom and ensuring that instructional technology is aligned with state standards.

Teacher workstations are antiquated and not capable of running Data Director and other new adoptions. A needs assessment should be conducted to identify equipment to be upgraded or replaced.

Some site administrators expressed frustration that they have to use PTSA funds and depend on contributions to purchase new computers. In addition, they expressed frustration that they have to use those funds to hire site technology support.

The district's instructional technology coordinator performs server support functions for some of the instructional technology applications. These responsibilities should be transferred to IT support staff so that the instructional technology coordinator can concentrate on working with teachers.

Recommendations

The district should:

1. Keep the Instructional Technology Coordinator position in the Division of Curriculum and Instruction.

2. Assign the technical maintenance of instructional technology systems to another staff member in the IT Department. This will provide the Instructional Technology Coordinator with more time to work with teachers.
3. Use project management methodologies to develop a common understanding of the work to be completed, the schedule for this work, and the resources required to complete it.
4. Identify a single instructional leader at each school site to work with teachers on instructional technology, and negotiate a stipend for these teachers if possible. The district should hold monthly meetings with this group of lead technology teachers, which should be named the Instructional Technology Committee to make it clear that the focus is on instructional technology, not administrative issues. The Instructional Technology Coordinator should chair these meetings and the committee should focus on encouraging the use of technology in the classroom and using technology to support student's mastery of state standards. The recently developed K-12 skills continuum should be used in this process. The work of the committee should focus on students, and communication and oversight responsibilities should in place to ensure the focus is not diverted to issues regarding system administration.
5. Leverage site resources for teacher training to benefit the entire district.
6. Examine the process for site acquisition of technology and determine whether the district can adopt a more equitable process. For example, some districts pool parent contributions and allocate these contributions to schools based on enrollment to ensure equal access to these contributions. The district should also investigate alternative funding sources for the purchase of new computer equipment and hiring of technology support staff.

Administrative Technology

Several SIS users indicated that access to the Aeries SIS is unreliable and sometimes slow, and that the age of user computers may be a contributing factor. IT support staff members have attended hardware migration planning meetings, but have not shared specific action items or developed a hardware migration plan to address performance issues. The IT Department should conduct a hardware assessment to determine which computer equipment does not meet minimum specifications for use with the Aeries SIS.

The district's new graphical version of the financial information system is online and available; however, most users continue to access the legacy version of the financial information system because they are unaware that the new version is available and lack information regarding its capabilities. The district is several releases behind in installing the new financial system's updates.

The position control module of the financial system is not being used. Some computers are not capable of running the new graphical financial system. Although IT staff members have attended hardware migration planning meetings, little information has been shared with users regarding a time line to make the necessary upgrades.

Recommendations

The district should:

1. Conduct a hardware assessment to determine which computer equipment does not meet minimum specifications for use with the Aeries SIS. If replacement equipment is needed, funds should be budgeted and allocated to the proper sites as soon as possible.
2. Make all financial system users aware of the availability of the new graphical version of the software. Provide assistance and training to users on the graphical version to increase use. The district should determine a deadline beyond which the legacy version of the financial system will no longer be available.
3. Ensure that the IT Department remains up to date with installing new releases and software updates of the financial system.
4. Consider implementing the position control module of the financial system. The position control module would enable the district to take full advantage of the financial system by integrating the general ledger, budget, human resources, and payroll modules.

Appendix

- A. *Sample Project Management Documents*
- B. *Study Agreement*

Appendix A

Sample Project Management Documents

Project Name
CR#

Project Plan
for

California School Information Services

Version 0.x

Date

Document Change History

Revision History	Date	Description	Creator
Final Version 1.0		Sign off by Russ Brawn	
Version 0.1		Created draft document.	

Project Approvals

The following signature represents the approval of the Project Plan. Future changes to the Project Plan must be agreed to in writing and approved by CSIS management.

Date of Approval:	
Name:	Russ Brawn
Title:	CSIS COO

Table of Contents

1.	Introduction	4	
1.1	Purpose	4	
2.	Project Definition	4	
2.1	Project Information	4	
2.2	Program Charter	4	
2.3	Project Scope Statement	4	
2.4	CSIS Deliverables and Responsibilities	4	
2.5	Project Milestones	4	
2.6	Project Goals and Success Criteria	4	
3.	Project Approach and Schedule	4	
3.1	Project Schedule	4	
3.2	Change Authorization	4	
3.3	Assumptions and Constraints	4	
3.4	Project Tools	4	
4.	Management Plans and Policies	4	
4.1	Risk Management Plan	4	
4.2	Change Management Plan	4	
4.3	Communication Plan	4	
4.4	Security Policy	4	
4.5	Quality Policy	4	
5.	Project Reporting	4	
5.1	Project Status Reporting	4	
5.2	Project Risk and Issue Reporting	4	
6.	Project Organization	4	
6.1	Team Roles and Responsibilities	4	
6.2	Team Roles and Responsibilities	4	

1. Introduction

1.1 Purpose

The project plan provides the direction for the XXXX project and defines how change will occur during the project.

2. Project Definition

2.1 Project Information

- Project Title:
- Project Acronym:
- CSIS Sponsor:
- CSIS Manager Lead:
- CSIS Project Phase Leads:
 - Preparation and Requirements:
 - Development:
 - Testing
 - Training, and Implementation:
- CSIS Project Manager:
- ***Proposed Start Date:***
- Proposed End Date:

2.2 Program Charter

Please refer to the CSIS program charter version 2.0 dated January, 2005 located on the CSIS Web site at: <http://www.csis.k12.ca.us/library/CSIS-Prgm-Charter-v2-0.pdf>

Project Scope Statement

[Insert description of the project scope here, including, if possible the Change Request numbers that will be included in the project. Also include what will NOT be included in scope if applicable.]

2.3 CSIS Deliverables and Responsibilities

2.4 Project Milestones

Please refer to the XXXX CRxxxxx project schedule v 1.0 for detailed tasks and deliverables.

2.5 Project Goals and Success Criteria

Project Goal	Success Criteria	Measurement Instrument

At the end of the project, these success criteria shall be evaluated individually and used collectively to evaluate whether the project met its overarching goal of XXXXXXXX.

3. Project Approach and Schedule

3.1 Project Schedule

Refer to Project Name CR# Project Schedule.

3.2 Change Authorization

For the CSIS Change Management process refer to CSIS Change Management Policy found on the CSIS Web site at <http://www.csis.k12.ca.us/library>

Assumptions and Constraints

This project plan is based upon the following assumptions:
[insert list]

3.3 Project Tools

1. MS Project
1. MS Office
2. Adobe Acrobat
3. SharePoint
4. Alexsys Team
5. PVCS

4. Management Plans and Policies

4.1 Risk Management Plan

Refer to CSIS Risk Plan found in SharePoint.

4.2 Change Management Plan

Refer to CSIS Change Management Policy found on the CSIS website at <http://www.csis.k12.ca.us/library/>.

4.3 Communication Plan

Refer to the External Communication Policy for CSIS which can be found on the CSIS website at <http://www.csis.k12.ca.us/library/>.

4.4 Security Policy

Refer to the CSIS Privacy and Confidentiality Procedure found on the CSIS website at <http://www.csis.k12.ca.us/library/>.

4.5 Quality Policy

Refer to the Quality Policy for CSIS which can be found on the CSIS website at <http://www.csis.k12.ca.us/library/>.

5. Project Reporting

5.1 Project Status Reporting

Project schedule task status reporting will be reviewed at the team meetings. The team will review the tasks during team meetings to update with percent complete and add any notes. The Project Manager will keep the schedule updated.

If deliverable dates within the project schedule need to be changed the Phase Lead will take this information to CSIS managers for a decision on how to proceed.

5.2 Project Risk and Issue Reporting

The Phase Lead will collect, track and document all project risks and issues reported by the project team. The Project Manager will log all risks and issues into Alexsys Team. Refer to the CSIS Risk SOP found in SharePoint for more information. The team meeting agenda will include a time for risks and issues to be reported. The Phase Lead will report any risks or issues to management during the Managers' meetings each week.

6. Project Organization

6.1 Team Roles and Responsibilities




The following lists the project team members:

Project Team Member	
Project Phase Leads	
Requirements:	
Development:	
Testing:	
Training, Implementation and	
Evaluation:	
Project Manager	
Requirements	
Information Systems	
Client Support	
Communications and Projects	
CDE Representatives	

6.2 Team Roles and Responsibilities

For a description of team member roles and responsibilities, refer to the Project Team SOP.

Sample Weekly Status Report Template

Weekly Project Status Report				Date:	
Project Name:					
Phase Lead:					
Section 1 - Project Status below to be sent by COB on Monday					
Baseline dates have changed: (Double click box to select) Yes No					
Phase and Key Deliverables	Target Date (Bold) (Keep target date until change approved by mgmt.)	Actual Date (Bold)			
Issues/ Concerns / Proposed Date changes					
1. Preparation a. Project Plan Complete b. Project Schedule Complete 2. Requirements a. Publish DSR to website b. Requirements Handoff Complete 3. Development a. Build 1 Release to ST b. Build 2 Release to ST 4. Test a. Test Plan Complete b. Test Cases Complete c. Build 1 ST Complete d. Build 1 AT Complete e. Build 2 ST Complete f. Build 2 AT Complete 5. Train Publish Training Dates 6. Implement Open SS to LEAs 7. Closeout a. Draft Closeout Report Complete b. Final Closeout Report Complete					
Work activities from previous week (max 3 sentences)					
Proposed project schedule changes					

Risks requiring management attention (list by TEAM ID numbers)	
Issues requiring management attention.	
Proposed Next Steps to address risks and issues	
Section 2 - Document below all Actions/Decisions discussed during the CSIS Management Team Meeting	
Action/Decisions Required From the Team	
Actions/Decisions Required From Managers	

Sample Project Closeout Report Template

<Project Name> - Final Project Closeout Report

<date>

Change Request #

Phase Leads

Project Manager

Project Success Criteria (from the Project Plan)

Summary of how well the project did on meeting the project success criteria:

Summary of the input received for the closeout report

(include how input from LEAs, CDE, and CSIS staff, including those on and off-site staff who support LEA success, provided feedback)

Lessons Learned Based upon the Project Success Criteria

What went well?

What did not go as well as planned?

What could or should be changed?

Review of Project Phases:

(See CSIS Team SOP for suggested areas to discuss)

Preparation and Team Activities-

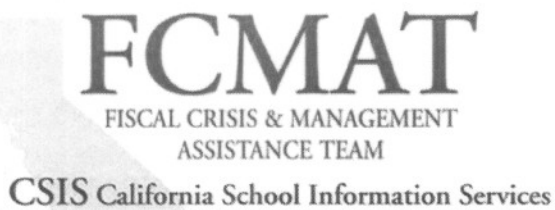
Requirements -

Development –

Testing –

Training and Documentation–

Implementation and Maintenance –



FISCAL CRISIS & MANAGEMENT ASSISTANCE TEAM
STUDY AGREEMENT
September 16, 2008

The FISCAL CRISIS AND MANAGEMENT ASSISTANCE TEAM (FCMAT), hereinafter referred to as the Team, and the Novato Unified School District, hereinafter referred to as the District, mutually agree as follows:

1. BASIS OF AGREEMENT

The Team provides a variety of services to school districts and county offices of education upon request. The District has requested that the Team provide for the assignment of professionals to study specific aspects of the Novato Unified School District operations. These professionals may include staff of the Team, County Offices of Education, the California State Department of Education, school districts, or private contractors. All work shall be performed in accordance with the terms and conditions of this Agreement.

2. SCOPE OF THE WORK

A. Scope and Objectives of the Study

The initial scope and objectives of this study are listed below. However, FCMAT proposes conducting a half day pre-review meeting at the District on September 30 at no cost, to meet with the Superintendent and appropriate staff to further refine the scope of work and anticipated deliverables. This agreement may be amended after the September 30 meeting, as necessary.

- 1) Examine the steps taken during the planning and execution of migrating the District's student data from the QSS to Aeries systems. Provide recommendations that, if implemented, will enable the district to comply with industry standards for software conversions in the future.
- 2) Assess the design, stability, management, and ongoing maintenance of the District's student system. Assist the District in developing procedures to ensure data quality; starting with data input and ending with data reporting, assessment, and decision making. Provide recommendations for improvement.
- 3) Evaluate the District's overall technology network for both

- instruction and operations applications and provide recommendations to ensure customer satisfaction and operational efficiency.
- 4) Provide sample policies and protocols for effective data management.
- 5) Review the organizational structure, staffing levels, roles and responsibilities, and levels of supervision and evaluation within the Technology Department, and provide recommendations for improvements.

B. Services and Products to be Provided

- 1) Orientation Meeting - The Team will conduct an orientation session at the District to brief District management and staff on the procedures of the Team and on the purpose and schedule of the study.
- 2) On-site Review - The Team will conduct on-site meetings at the District office to gather documentation and conduct interviews. The Team will request assistance from the District in setting up interview schedules with staff.
- 3) Progress Reports - The Team will hold an exit meeting at the conclusion of the on-site reviews to inform the District representatives of significant findings and recommendations to that point.
- 4) Exit Letter - The Team will issue an exit letter approximately 10 days after the exit meeting detailing significant findings and recommendations to date and memorializing the topics discussed in the exit meeting.
- 5) Draft Reports - Sufficient copies of a preliminary draft report will be delivered to the District administration for review and comment.
- 6) Final Report - Sufficient copies of the final study report will be delivered to the District following completion of the review.
- 7) Follow-Up Support – Six months after the completion of the study, FCMAT will return to the District, if requested, to confirm the District's progress in implementing the recommendations included in the report, at no costs. Status of the recommendations will be documented to the District in a FCMAT Management Letter.

3. PROJECT PERSONNEL

The study team will be supervised by Anthony L. Bridges, Deputy Executive Officer, Fiscal Crisis and Management Assistance Team, Kern County Superintendent of Schools Office. The study team may also include:

- A. Andrew Prestage, FCMAT Management Analyst
- B. Nancy Sullivan, FCMAT-CSIS Special Projects Administrator
- C. Lisa Hayes, FCMAT-CSIS Implementation Specialist
- D. Chuck Berridge, Aeries (at no cost to the District)
- E. Scott Sexsmith, FCMAT Technology Consultant

Other equally qualified consultants will be substituted in the event one of the above noted individuals is unable to participate in the study.

4. PROJECT COSTS

The cost for studies requested pursuant to E.C. 42127.8(d)(1) shall be:

- A. \$500.00 per day for each Team Member, while on site, conducting fieldwork at other locations, preparing and presenting reports, or participating in meetings.
- B. All out-of-pocket expenses, including travel, meals, lodging, etc. Based on the elements noted in section 2 A, the total cost of the study is ***estimated at \$15,000***. The District will be invoiced at actual costs, with 50% of the estimated cost due following the completion of the on-site review and the remaining amount due upon acceptance of the final report by the District.
- C. Any change to the scope will affect the estimate of total cost.

Payments for FCMAT services are payable to Kern County Superintendent of Schools-Administrative Agent.

5. RESPONSIBILITIES OF THE DISTRICT

- A. The District will provide office and conference room space while on-site reviews are in progress.
- B. The District will provide the following (if requested):
 - 1) A map of the local area
 - 2) Existing policies, regulations and prior reports addressing the study request
 - 3) Current organizational charts
 - 4) Current and four (4) prior year's audit reports
 - 5) Any documents requested on a supplemental listing

- C. The District Administration will review a preliminary draft copy of the study. Any comments regarding the accuracy of the data presented in the report or the practicability of the recommendations will be reviewed with the Team prior to completion of the final report.

Pursuant to EC 45125.1(c), representatives of FCMAT will have limited contact with District pupils. The District shall take appropriate steps to comply with EC 45125.1(c).

6. PROJECT SCHEDULE

The following schedule outlines the planned completion dates for key study milestones:

Orientation:	September 30, 2008
Staff Interviews:	October 15-17, 2008
Exit Interviews:	October 17, 2008
Preliminary Report Submitted:	to be determined
Final Report Submitted:	to be determined
Board Presentation:	to be determined
Follow-Up Support:	If requested

7. CONTACT PERSON

Please print name of contact person: Jan La-Torre Derby, Superintendent
Connie Benz, Marla Blackledge, or Kathy Marshall

Telephone (415) 897-4211 FAX _____

Internet Address jderby@nUSD.org

Jan La Torre Derby 9/24/08
 Jan La Torre-Derby, Superintendent Date
 Novato Unified School District

Barbara Dean
 _____ September 17, 2008
 Barbara Dean, Deputy Administrative Officer Date
 Fiscal Crisis and Management Assistance Team

In keeping with the provisions of AB1200, the County Superintendent will be notified of this agreement between the District and FCMAT and will receive a copy of the final report.