
Pennsylvania Department of Education



COMMONWEALTH OF PENNSYLVANIA
DEPARTMENT OF EDUCATION
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Educational Technology Report

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Entity: Mechanicsburg Area SD

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Needs Assessment

Needs Assessment Narrative

Mechanicsburg Area School District was successful in its completion of its previous technology plan.

Mechanicsburg Area School District has always endeavored to create an educational environment that is enhanced by the use of technology. It is not the goal of Mechanicsburg Area School District to invent new practice for the sake of educational innovation. Rather, the district will endeavor to build upon established research in the field of educational technology. The needs assessment data in conjunction with feedback from the administrative team will serve to help shape the direction of the following technology plan.

Ultimately, it is not the goal of this technology plan to implement technology for its own sake. Rather, our goal supports our vision to foster educational excellence, community strength, and student achievement. When technology is appropriate to foster these aims, this plan will detail our efforts. Technology offers opportunity and practice that is unavailable through any other means. While we have a duty as educators to ensure that our children possess a technological fluency to be productive in their future citizenship, it remains our primary goal to promote student achievement and utilize technology whenever appropriate.

Teachers:

A majority of the Mechanicsburg Area School District instructional staff expressed that the current access to technology is sufficient to meet their professional needs, that technology is essential in the delivery of their curriculum, and that there is enough technology present to meet student demand. There was significant indication that the existing technology is well supported and that response time for technical support is exceptional. A majority indicated they utilize email regularly to communicate with parents. A majority of the staff indicated they would be willing to utilize new technology if they had an instructional support person in the classroom.

The instructional staff also had an opportunity to provide narrative feedback regarding technology.

Highlights from this section include:

- increased access to student computers (especially laptops)
- LCD projectors in each classroom
- elementary keyboarding instruction
- increased technology professional development for teachers
- increased instructional support personnel/technology mentors
- remote/home access to school files
- increased access to SMART Boards

Parents/Community Members:

Community members were given the opportunity to provide their perceptions of technology utilization in the district. The general consensus is that technology needs to be more consistent and pervasive in all classrooms and at all levels. The instructional staff needs to be provided with professional development so that technology usage in the classrooms becomes a regular part of doing business. Another point made was the effectiveness of having an Elementary Instructional Advisor to act as an integration specialist and the need for an additional one for the secondary level.

Summary:

- Integrated Technology — It was very clear that this technology plan will not be about technology. The entire purpose will be to support student achievement. To that end, the goal of this plan will be to enhance existing programs, extend future opportunities and provide a fiscally and technologically sound infrastructure for the future of our learning community.
- Increased access to resources — While this technology plan will not be driven from an equipment implementation, increased access to appropriate tools for students and teachers is necessary.
- Infrastructure — If student and teacher access is to be increased, attention will be paid to the required infrastructure as well as the needed support.
- Professional Development - A comprehensive technology professional development plan is necessary to build our technology integration professional capacity.

Goals and Strategies

Goal: 1. DIVERSITY OF ALL LEARNERS

Description: Build a rigorous curriculum and use relevant instructional strategies that challenge all learners at their level of ability, and speak to the uniqueness of individuals within cultures, ethnicities, religions, lifestyles and disabilities. Build relationships with each child by focusing on his/her physical, social, emotional, and academic wellbeing, to address citizenship within the learning community and academic readiness.

Strategy: D1 Curriculum

Activities:

Activity	Description	
Creating 21st Century Classrooms	Explore technology solutions to support curriculum and instructional practices that are reflective of the world outside of school. This could include a one-to-one student-computer ratio and pervasive Internet access.	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: 2008/09	\$310,000.00

Activity	Description	
Digital Literacy Curriculum	Create and integrate a digital literacy curriculum across all grade levels. Examples could include Internet safety and information ethics.	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: 2009/10	TBD

Activity	Description	
Educational Technology Standards for Teachers-PD	Implement technology literacy plan based on National Educational Technology Standards (NETS)	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: 2008/09	TBD

Strategy: D2 Instruction

Activities:

Activity	Description	
Educational Technology Resources	Utilize technology resources to enhance the cultural diversity of instructional materials available to students and teachers such as: access to international media sources; participation in global collaboration projects; exposure to diverse economic and political systems.	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: 2008-09	TBD

Activity	Description	
Educational Technology Resources - Applications	Continue to provide access to relevant instructional software and web-based applications such as PLATO, Study Island, Turn-it-In, Larson Math, and Inspiration.	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: 2008/08	\$300,000.00

Activity	Description	
Educational Technology Resources - Equipment/Infrastructure	Increase access to instructional technology systems such as: classroom multimedia systems; mobile laptop carts; district-wide wireless access; classroom response systems; remote access to network resources for staff and students.	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: 2008/09	\$775,000.00

Strategy: D3 Assessment

Activities:

Activity	Description	
Data Collection and Reporting - Technology	Expand the use of applications like Tableau to collect, manage, and aid in making data driven decisions.	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: Ongoing.	\$11,500.00

Activity	Description	
Data Decision Making - Technology	Professional development that will enable teachers to design and evaluate alternative methods of assessment utilizing technology such as: podcasts, blogs, wikis, digital media projects.	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: 2008/09	\$60,000.00

Activity	Description	
Progress Reporting – Technology – Web-based SIS	Implement a web-based system for all grade levels for electronic grade and progress reporting.	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: 2009 Finish: 2010	\$200,000.00

Strategy: D4 Intervention

Activities:

Activity	Description	
Catching Kids Up - Technology	Professional development that will enable teachers to use technology to differentiate instruction to meet individual student needs such as: text-to-	

	speech, translation tools, and other universal access features.	
Person Responsible	Timeline for Implementation	Resources
Bruce Gordon	Start: 2008/09	\$60,000.00

Goal: 5. FOUR-YEAR GRADUATION RATE

Description: Graduation rate will remain at 90% or higher.

Strategy: G1 Curriculum

Activities:

Activity	Description	
Creating Cyber Options	Explore and develop cyber options within the high school.	
Person Responsible	Timeline for Implementation	Resources
Mark Leidy	Start: 2008/09	TBD

Staff Development

In order for the teaching faculty to be effective at integrating technology, the administration must be able to build capacity for such action in the staff. Therefore, it is critical that the administrative team participate in active professional development for administrative functions regarding technology. Administrators, with appropriate guidance, must develop the ability to identify areas where technology could be infused to promote learning. Principals must also be able to recognize ineffective utilization of technology and provide guidance for professional growth. Staff development is essential to the success of integrated technology. There are several critical areas of focus for successful staff development related to technology usage. A staff technology literacy plan will be developed. Teachers must also have the opportunity to learn instructional best practices on the utilization of these technologies as well as instruction on what is acceptable and safe. Simply using technology is not effective practice.

The District will sponsor a comprehensive approach to technology staff development based on the National Educational Technology Standards for Teachers. Teachers will be identified according to a system that identifies their current level of professional technology expertise. The goal of this system is to promote the opportunities for student achievement through the teacher’s use of technology resources.

Teachers will self-identify as being in one of the following four levels:

Level One — Personal Skill Building: The teacher is new to the utilization of technology in the classroom. Instruction is needed in fundamentals of computer usage such as opening, closing, and saving files, printing, and using the Internet and e-mail. Because understanding and utilizing district resources is included at this level, all new teaching staff will start at level one.

Level Two — Instructional Productivity: The teacher has been using technology for professional reasons for some time. The teacher is comfortable with the basic operations of email, word processing and the Internet for preparing classroom materials and communicating with other stakeholders. A teacher at level two will be focused on how to use additional available resources, basic technology support, and becoming comfortable with the daily use of technology.

Level Three —Teacher Integration: The teacher at level three has been successfully using technology for several years at work and at home. They can properly format and edit documents, troubleshoot basic support issues and work comfortably in several applications in addition to word processing and email. The level three teacher will be working on learning methods to improve student learning and how to generate unique student learning opportunities utilizing available district resources.

Level Four —The Integrated Student: The level four teacher is very comfortable with many personal and professional technologies. This teacher often plays the role of facilitating the student use of technology to enhance individualized instruction and critical thinking. Technology usage in the level four teacher’s classroom is pervasive and pedagogically sound. The level four teacher’s professional development will center on exploring new opportunities and mentoring other teachers in the practice of integrated teaching. The District will continue its technology cadre program, where each year a group of exceptional teachers will be identified who are experts in the art of teaching. These teachers do not have to be technology experts. These teachers will participate in extensive staff development throughout the academic year that promotes the integration of technology into the curriculum. A key component of this extensive training will be mentoring skills. Each member will then serve as an integration resource person for his/her grade level or area.

Budget

Summary: Potential Funding Distribution

Goal: 1. DIVERSITY OF ALL LEARNERS

Build a rigorous curriculum and use relevant instructional strategies that challenge all learners at their level of ability, and speak to the uniqueness of individuals within cultures, ethnicities, religions, lifestyles and disabilities. Build relationships with each child by focusing on his/her physical, social, emotional, and academic wellbeing, to address citizenship within the learning community and academic readiness.

D1 Curriculum	2009-2010	2010-2011	2011-2012	Total	Funding Source
Creating 21st Century Classrooms (Increased student access to Tech.)	\$0.00	\$50,000.00	\$50,000.00	\$100,000.00	General Fund Budget – Tech.
Creating 21st Century Classrooms	\$10,000.00	\$10,000.00	\$10,000.00	\$30,000.00	General Fund Budget – Tech.

D2 Instruction	2009-2010	2010-2011	2011-2012	Total	Funding Source
Educational Technology Resources – Applications (PLATO; Study Island; United Streaming)	\$50,000.00	\$50,000.00	\$50,000.00	\$150,000.00	General Fund Budget – Tech.
Educational Technology Resources - Equipment/Infrastructure (Staff Remote Access)	\$25,000.00	\$50,000.00	\$50,000.00	\$125,000.00	General Fund Budget – Tech.
Educational Technology Resources - Equipment/Infrastructure (District wireless)	\$100,000.00	\$100,000.00	\$0.00	\$200,000.00	General Fund Budget – Tech.
Educational Technology Resources - Equipment/Infrastructure (LCD; Classroom Resp.)	\$150,000.00	\$150,000.00	\$0.00	\$300,000.00	General Fund Budget – Tech.

D3 Assessment	2009-2010	2010-2011	2011-2012	Total	Funding Source
Data Collection and Reporting - Technology	\$2,000.00	\$2,000.00	\$2,000.00	\$6,000.00	General Fund Budget – Tech.
Data Decision Making – Technology: Prof. Dev.	\$10,000.00	\$10,000.00	\$10,000.00	\$30,000.00	General Fund Budget – Tech.
Progress Reporting – Technology – Web based Student Info. Sys.	\$0.00	\$40,000.00	\$40,000.00	\$80,000.00	General Fund Budget – Tech.

D4 Intervention	2009-2010	2010-2011	2011-2012	Total	Funding Source
Catching Kids Up – Technology: Prof. Dev.	\$10,000.00	\$10,000.00	\$10,000.00	\$30,000.00	General Fund Budget – Tech.

Monitoring

The overall monitoring of the District’s progress in the implementation of the Technology Plan will be a coordinated effort between the building leadership, the central office administration and the technology team. Each area leader will be responsible for his or her respective areas and all administrative staff will need to have a clear understanding of the scope and design of this plan.

Teacher progress in technology integration will be monitored using the four level system that will be used to help move teachers from individual usage to integrated learning. Feedback from staff development sessions and annual surveys of the staff will be used to garner the effectiveness of the training.

The Technology Coordinator will coordinate all budgeting and fiscal planning for the elements contained within the plan in conjunction with building leadership and central office input. The annual budget will be used by the Technology Coordinator as a measure of the progression of the plan elements that require significant fiscal expenditure. Historically, the District has had an active Technology Committee comprised of teachers, administrators and community members. This committee will continue to meet monthly throughout the academic year to evaluate the progress of the District in the implementation of the Technology Plan and to make changes as needed. These meetings will be facilitated by the Technology Coordinator.

Evaluation

Critical to the success of this program will be the Technology Committee’s annual examination of this plan’s progression as described in the previous section. The outcome of this annual meeting will be summarized in a report to be delivered to the Superintendent each year. This information will be used in the following year’s budget development process. Each activity within the plan has an associated level of achievement or action. The responsible party indicated will evaluate and adjust as needed. The Technology Coordinator will coordinate these activities along with the members of the Technology Department. This plan will also serve as an active and fluid document that will reflect developments in available technologies and recommended best practice. It will be the role of the Technology Committee under the direction of the Technology Coordinator to apprise this committee of developments in technology, protocol, and policy that may have bearing on this process. It is the intention of this plan to utilize integrated technology in an effort to foster a safe, effective, and rich educational experience for the students of Mechanicsburg. To that end,

the final measure of our success will not be the completion of the individual elements of the plan, but the academic achievement of our children. All stakeholders must achieve proficiency and acquire the expertise needed in the application of technology needed to promote student achievement.