Ashland Elementary School

Technology Plan

2014-2015
2015-2016
2016-2017

Ashland School District
SAU #2

Plan Date: July 1, 2014
School Board Approval: September 16, 2014

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I. Introduction

A. Technology Planning Committee Membership

Members of the Ashland School Technology Committee:

Deb Boyer, Parent
Ryley Ameden, Technology Coordinator
Shannon Bartlett, Principal
Sarah Davis, Library Media Specialist / Title I Project Manager
Brendan Dowd, Music K-8 / Computers K-5
Terry Downing, Math Intermediate – Middle Tier
Teresa Merrifield, Art K-8 / FACS Middle Tier / Computers K-5
Joanne O'Connor, Middle Tier English / Computers K-2
Ian Pollard, P. E. K-8 / H. E. Middle Tier / Computers K-5
Carrie Sanborn, Guidance Director

B. School Board Approval

The 2014-2017 Ashland School District Technology Plan received the approval of the Ashland School Board in September 2014.

C. District Mission Statement

Ashland Elementary School, through its vision, leadership, and programs, will provide a network of services for learning about and implementing developmentally appropriate practices for children.

We believe . . .

- The education of children is a community effort.
- Each child has particular intellectual, physical, emotional, and social needs that require appropriately responsive school programs, policies and practices.
- Those who serve young children continually need specialized preparation in order to understand and respond to the particular needs of each child.

Ashland Elementary School will use and develop methods to assist the students in meeting education's evolving demands.

D. District Demographic Description

The Town of Ashland (pop. 2,076) is located near the geographic center of New Hampshire in Grafton County (pop. 89,181). This rural school district consists of one school with 165 students in grades K-8. For grades K-8, Ashland is a member of School Administrative Unit #2, with administrative offices in Meredith. For grades 9-12, Ashland students attend Plymouth Regional High School. Ashland is a member of School Administrative Unit #48, with administrative offices in Plymouth. Ashland Elementary School holds "Approval with Distinction" status according to NH State Minimum Standards. The District's comprehensive

curricula are continually updated, and are aligned with national and state standards. Ashland Elementary School is staffed by 22 professionals and several support staff. Included in this number are teachers for special education, physical education, music, art, educational technology, vocational education, consumer and family science, health, Title I, and library. Ashland Elementary School has an ongoing relationship with Plymouth State University. This partnership benefits both educational environments with regard to course development, workshops, placement of methods students, and practical experience for student teachers.

E. Technology Vision

In accordance with the District Mission, Ashland Elementary School will ensure the implementation of educational technology that is appropriately integrated into instruction and management to increase student learning, enhance the teaching process, and improve the operations of the school system. Regular professional development opportunities in technology are offered to all staff members.

II. Goals

A. Access to Technology Resources

1. Ensure accessibility to support learners, instructional practices and assessment.
2. Increase technology tools to achieve 1:1 personal learning device ratio.
3. Manage student data and monitor student progress with upgrades to current systems and new applications.
4. Maintain sufficient technical support to meet increasing technology demands.

B. Technology Literacy

Integrate technology tools consistently and effectively to support student learning and increase achievement.

C. Professional Development

Plan and participate in professional learning opportunities that improve technology skills and the application of technology resources to impact student learning.

D. Community Involvement

Provide training for parents to access and employ technology resources that increase communication and support of their children's learning.

III. Action Plans

A. Access to Technology Resources Action Plan

This action plan describes current and planned technology resources that provide technology access for all students and teachers. All classrooms, offices, the computer lab, and the library media center have networked computers with high speed Internet access. Currently, we supply personal learning devices to students in grades 6-8. Classrooms share a small bank of Kindle Fire tablets and Google Chromebooks in kindergarten through grade 5. We will increase our ratio of personal learning devices throughout the school.

Based on the staffing formula provided by the NH Department of Education, sufficient technology support personnel are provided to ensure attainment of the instructional goals (112/300+0/100=.37). The current Technology Coordinator position is .4 FTE (52 week year). Contracted services account for an additional .05 FTE.

Currently, computers are replaced on a six year rotational schedule, while other technology assets are replaced as needed. The following action plan to expand access to technology resources includes improvements to infrastructure, increased onsite technical support and the acquisition of hardware, software, services, print resources, and other electronically delivered learning materials. These steps are designed specifically to afford students the opportunity to increase their technology use, improve their capabilities and supplement their learning. They will also allow teachers to provide innovative educational experiences and through greater engagement, improve student achievement.

Goal A1: *Ensure accessibility to support learners, instructional practices and assessment.*

A1. Strategies to ensure accessibility to support learners:

a) Increase broadband strength
b) Eliminate daisy-chain set up of existing WIFI access points to increase WIFI capacity and strength of signal
c) Upgrade to access points that successfully function within a concrete structure
d) Increase total number of access points throughout school building
e) Add additional server to manage greater accessibility demands
f) Increase total number of network IP addresses available
g) Establish a four year leased equipment replacement cycle
h) Replace Computer Lab devices with leased equipment
i) Maintain industry-set standards for network safety and security

j) Employ safe and secure group management system(s) for 1:1 devices
k) Provide wireless printing capabilities for mobile devices
l) Purchase and deploy apps that improve organizational skills (e.g. MyHomeworkApp, Teachers.io)
m) Purchase and deploy apps that increase productivity (e.g. Notability, Google Drive, Evernote)
n) Purchase and deploy apps that encourage independent learning (e.g. iTunesU, Show Me, Educreations, Khan Academy)
o) Purchase and deploy apps that increase learner technology skills (e.g. Prezi, Keynote, iMovie, ScribblePress, NearPod)
p) Purchase and deploy curriculum-based programs and apps designed to meet a specific learner needs (e.g. DreamBox Math, Read 180, Interactive Telling Time, Multiplication Genius, Phonics Island, Painless Spelling Challenge, LanguageTreks)
q) Provide access to free eBooks and audiobooks through NH Downloadable Library system
r) Increase eBook library

A1. Strategies to ensure accessibility to support instructional practices:

a) Replace staff computers with leased equipment
b) Subscribe to professional journals and listservs
c) Acquire library resources in support of best practices for K-8 education including DVDs, eBooks and online subscriptions
d) Purchase curriculum-aligned eTextbooks
e) Purchase and deploy apps that support current instructional practices (e.g. Kindle, iBooks, Graphing Calculator, Interactive Periodic Table, Zombie Grammar Force, The Human Skeletal System, Spell Board, Political Time Machine, MobyMax)
f) Purchase and deploy apps that increase teacher productivity (e.g. Notability, Google Drive, Evernote)
g) Purchase and deploy apps that provide opportunities for integrated educational experiences (e.g. Comic Life-ELA/ART, Powers of Minus Ten-Science/Math)
h) Purchase subscriptions to web-based educational videos, collections, artifacts, and information research tools (e.g. YouTube for Education, MoreStarfall)
i) Purchase and deploy apps that allow teacher and learner collaboration (e.g. Edmodo, Google Drive, Kidblog, NearPod, Reflector App)
j) Continue to use adaptive assessment data to inform instruction and target individual learner needs
k) Purchase MacBooks for specific learning modules (graphic design) and for customized eTextbook creation opportunities for teachers

A1. Strategies to ensure accessibility to support assessment:

a) Upgrade to web-based adaptive assessment services for Reading, Math, Science, and Language Usage
b) Administer adaptive assessments at least twice per school year
c) Purchase and deploy apps that allow teachers to collect instant data/feedback from students to inform instruction (e.g. Nearpod, Socrative, Insight 360)
d) Meet tech readiness requirements for upcoming computer-based state testing

Goal A1 Acquisition Plan /First Year (2014-2015)

1. Increase broadband service
2. Upgrade existing WIFI access points
3. Increase total number of access points
4. Add additional server
5. Increase number of available IP addresses
6. Establish a 4-year leased equipment replacement cycle
7. Replace existing Computer Lab computers with leased equipment
8. Add new software to computer lab as needed
9. Continue to provide adaptive assessment services
10. Purchase technology integrated curriculum programs to meet learner needs (e.g. Math in Focus, Reading Street)
11. Purchase curriculum-aligned eTextbooks
12. Purchase curriculum-related software, including online subscriptions
13. Purchase apps in support of learners, instructional practices and assessment
14. Subscribe to professional journals and acquire library resources
15. Increase eBook library to support all content areas
16. Purchase MacBooks for specific learning modules and customizing eTextbooks
17. Purchase air-port wireless printers for middle tier

Goal A1 Acquisition Plan /Second Year (2015-2016)

1. Upgrade to web-based adaptive assessment service
2. Purchase air-port wireless printers for Intermediate tier
3. Purchase technology-integrated curriculum programs to meet learner needs
4. Purchase curriculum-aligned eTextbooks
5. Purchase curriculum-related software, including online subscriptions
6. Purchase apps in support of learners, instructional practices and assessment
7. Subscribe to professional journals and acquire library resources
8. Increase eBook library

Goal A1 Acquisition Plan /Third Year (2016-2017)

1. Continue to provide web-based adaptive assessment services
2. Purchase air-port wireless printers for Primary tier
3. Purchase curriculum-based programs to meet learner needs
4. Purchase curriculum-aligned eTextbooks
5. Purchase curriculum-related software, including online subscriptions

6. Purchase apps in support of learners, instructional practices and assessment
7. Subscribe to professional journals and acquire library resources
8. Increase eBook library

Goal A2: *Increase technology tools to achieve 1:1 personal learning device ratio.*

A2. Strategies to increase technology tools:

a) Purchase additional mobile devices so as to increase existing ratio in intermediate and primary classrooms over the next 3 years
b) Upgrade devices in two mobile COW (Computer on Wheels) carts
c) Establish and increase banks of classroom computers
d) Purchase mobile devices for staff
e) Replace or upgrade existing equipment as necessary

Goal A2 Acquisition Plan /First Year (2014-2015)

1. Establish banks of computers in Primary and Intermediate classrooms
2. Purchase one mobile device for each Primary tier classroom
3. Purchase mobile devices for Middle Tier staff
4. Replace or upgrade additional equipment as necessary

Goal A2 Acquisition Plan /Second Year (2015-2016)

1. Upgrade devices in mobile COW (Computer on Wheels) cart #2 with leased equipment
2. Expand banks of classroom computers in Primary and Intermediate classrooms
3. Replace existing iPad2 devices in Middle Tier with updated devices
4. Purchase additional iPad devices for Middle Tier students as necessary
5. Transfer existing iPad 2 devices to Intermediate Tier classrooms
6. Increase mobile devices in Primary Tier classrooms
7. Replace or upgrade additional equipment as necessary

Goal A2 Acquisition Plan /Third Year (2016-2017)

1. Purchase additional iPad devices for Middle Tier students as necessary
2. Upgrade devices in mobile COW (Computer on Wheels) cart #1 with leased equipment
3. Replace or upgrade additional equipment as necessary

Goal A3: *Manage student data and monitor student progress with current systems and new applications.*

A3. Strategies to manage student data:

a) Maintain and update a student information management system
b) Commission the creation of electronic portfolio software that includes standards-based learning outcomes

c) Commission the creation of a secure, web-based portal that contains an electronic portfolio (ePortfolio) for each student
d) House individual academic performance reports and assessment data in student ePortfolios
e) Maintain student ePortfolios
f) Provide viewing access of student ePortfolios to parents/guardians
g) Expand web-based portal capabilities to include features such as electronic student registration, online payment options, parent surveys

A3. Strategies to monitor student progress:

a) Install computer lab management software that allows teacher to administer, control and monitor activity on student lab computers.
b) Collect evidence of student learning in student ePortfolios
c) Create in-house system to track, monitor and report individual student progress through state and national curriculum standards

Goal A3 Acquisition Plan /First Year (2014-2015)

1. Maintain and update student information management system
2. Commission the creation of electronic portfolio software that includes standards-based learning outcomes
3. Commission the creation of a secure, web-based portal that contains an electronic portfolio (ePortfolio) for each student

Goal A3 Acquisition Plan /Second Year (2015-2016)

1. Purchase computer lab management software that allows central administration, control and monitoring of student lab computers.
2. Update ePortfolio software
3. Improve ePortfolio capabilities
4. Increase ePortfolio evidence storage capacity
5. Expand features of web-based portal to include features such as electronic registration capabilities, online payment options and parent surveys

Goal A3 Acquisition Plan /Third Year (2016-2017)

1. Maintain and house ePortfolio software
2. Improve ePortfolio capabilities
3. Expand features of web-based portal

Goal A4: *Maintain sufficient technical support to meet increasing technology demands.*

A4. Strategies:

a) Increase onsite Technology Support position from .5 to 1 FTE
b) Add new Technology Integrator FTE position

c) Continue contracted services for additional support as needed

Goal A4 Acquisition Plan/First Year (2014-2015)

1. Increase Technology Support position from .5 to 1 FTE
2. Continue contracted services for additional support

Goal A4 Acquisition Plan/Second Year (2015-2016)

1. Maintain full time Technology Support position
2. Add Technology Integrator credentialed position at .5 FTE
3. Continue contracted services for additional support

Goal A4 Acquisition Plan/Third Year (2016-2017)

1. Maintain full time Technology Support position
2. Increase .5 Technology Integrator credentialed position to 1 FTE
3. Continue contracted services for additional support

Goal A-Access to Technology Resources: *Assessment of current services, hardware, software and other services needed to improve education services*

Current Resources:

- Microsoft Office 2010 Professional Plus
- Hosted student information system (Web2School)
- Web-hosted library catalog, available to the public
- Health information database (SNAP)
- Student assessment database and online reporting system (NWEA)
- Online subscriptions
- Limited internet connectivity in all areas of the school
- Professional journals and professional library collection
- E-mail
- Website

Current Support and Services:

- Onsite Technology Support person provides support, performs basic maintenance and trouble shoots tech issues.
- Contracted outside service provides additional support as needed.
- Support agreements with software companies are purchased or renewed as applicable.
- Specific maintenance contracts include Follett, Web2School, SonicWall, SNAP, Microsoft, and LunchTime.
- Broadband service provided by Time Warner Cable (one high speed DSL line with 3000 Kb and fixed IP).
- Office 365 provides email and cloud-based individual and team sites.

Hardware:

- One LAN comprised of four 24-port SMC gigabit switches connected to the computer lab and one or more drops in each classroom (Switches are provided in other spaces to accommodate additional computers and printers as necessary)
- Nine wireless access points (802.11g) strategically located to provide wireless coverage throughout the school, including the gym
- One HP ML350-G6 server running MS Windows 2008 R-2 and Hyper-V with mirrored hot swap drives, power supplies, and network attached storage for backup
- 32 core 2 duo PCs/Laptops (Windows 7) for staff leased prior to SY1314
- 19 station computer lab with projector, document camera, and interactive whiteboard
- 4 telephone lines
- Phones and phone services upgraded in SY 1213 to include staff directory, voice mail, message waiting, call back and conference calling features
- ISP's –provided by Verizon and Time Warner Cable
- 2 COW (Computers on Wheels) carts with 16-20 laptop computers (Windows 7) and a printer on each
- 44 Google Chromebooks with Chrome OS
- 54 iPad2 devices
- Multiple networked multifunction printers
- 20 computer projectors with interactive whiteboards
- 23 digital cameras and 2 digital movie cameras
- Classroom televisions, DVD players, and other audiovisual equipment
- 4 microscopes with computer interface
- 4 document cameras
- 10 AlphaSmarts
- 1 Macbook Pro

Data - Connectivity

Current connectivity capabilities and plans support the District Education Improvement Plan's goals centered on communication, curriculum, professional development, and facilities by providing the connections necessary to make technology access available for all users.

Current capability (see Figure 1 on page 11)

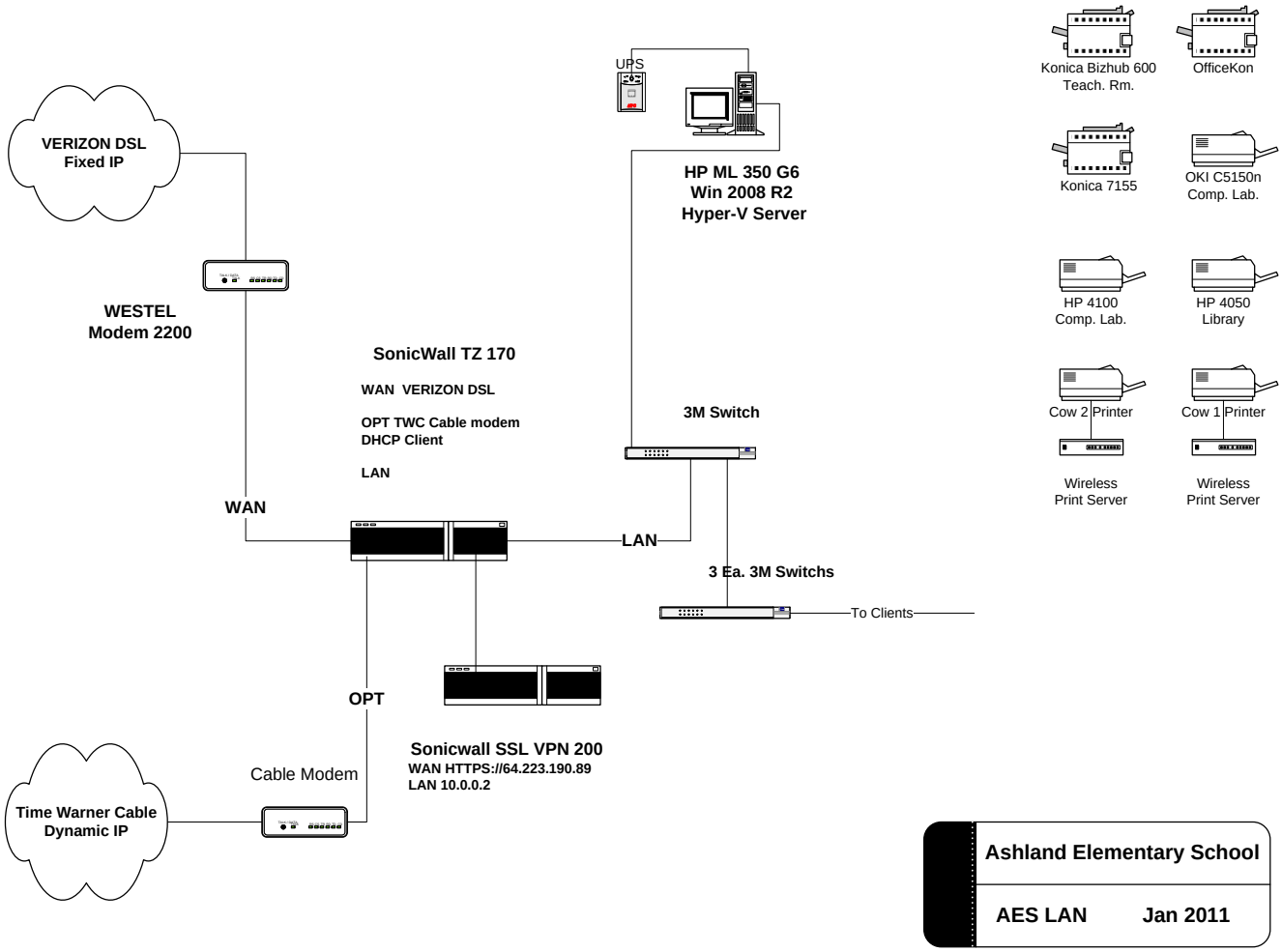
a) One high speed DSL line with 3000 Kb and fixed IP
b) One LAN comprised of 4 24-port SMC gigabit switches connected to the computer lab and one or more drops in each classroom (Switches are provided in other spaces to accommodate additional computers and printers as necessary)

c) Wireless access points (802.11g) strategically located to provide wireless coverage throughout the school
d) Maintenance performed by the Technology Coordinator or computer service center when required
e) Network capable computers: 90+ core 2 duo PC/Laptops with Windows 7; 20 Google Chromebooks with ChromeOS
f) HP ML350-G6 server running MS Windows 2008 R-2 and Hyper-V with mirrored hot swap drives, power supplies, and network attached storage for backup
g) 4 telephone lines
h) ISP's – Verizon and Time Warner Cable
i) Maintenance contracts with Follett, Web2School, SonicWall, SNAP, Microsoft, and LunchTime

Goal A: Access to Technology Resources-Funding Sources

1. School District Budget
2. Federal Grants
3. E-Rate

Figure 1. Network Connectivity Diagram



B. Technology / ICT Literacy Action Plan

1. Professional development strategy

The following interdependent strategies are part of the curriculum process that provides all teachers with the skills and information they need to effectively integrate technology into curriculum and instruction in order to increase student achievement and technology literacy:

a) Technology component as part of teachers' Individual Professional Development Plan
b) Professional development opportunities in technology (e.g., integration, use of technology, distance learning)
c) Peer education and collaboration among faculty

2. Information and Communication Technology (ICT) Literacy Program

Ashland Elementary School has taken steps to improve academic achievement by aligning the K – 8 Educational Technology Curriculum Framework with the ICT Standards as well as the International Society for Technology in Education (ISTE) Standards.

During the 2013-2014 school year, Ashland Elementary School implemented a standards-based online digital portfolio for each student K-8 that includes all content areas with ICT standards embedded throughout. Student selected evidence and associated reflections will become an integral part of each digital portfolio. Ongoing, authentic assessment of student learning outcomes through multiple formative and summative assessment instruments are aligned with State and District content and performance standards.

AES digital portfolios include the following components:

a) Basic operations and concepts
b) Social, ethical, and human issues
c) Technology productivity tools
d) Technology communications tools
e) Technology research tools
f) Technology problem solving and decision-making tools

AES digital portfolios are web-based allowing parent access at any time. In addition, a summary of digital student performance is provided to parents each trimester. Digital portfolios of graduating 8th grade students will contain evidence of competency in ICT Literacy Standards.

Students are provided with the following in a developmental continuum:

a) Direct instruction in the ethical and responsible use of technology tools
b) Tools to gather, evaluate, and synthesize information, to make informed and ethical decisions
c) Primary and Intermediate Computer instruction
d) Technology integration within all content areas
e) Practice and progress monitoring using adaptive software (e.g., Dreambox Math)
f) Distance education opportunities (e.g., VLACS, Rosetta Stone)
g) Educational apps on 1:1 devices

3. Innovative Learning Strategies

a) Distance learning opportunities such as virtual field trips, online visits to other schools, and interactive communications with remote experts
b) Interactive website exploration

c) Parent and community communication, such as a message notification service
d) Access to technology training through distance learning
e) Cloud-based curriculum access for all stakeholders
f) Software and/or web-based foreign language learning opportunities

4. Services

Technology integration services are provided to teachers at a level above the minimum recommendation according to the staffing formula. The equivalent of 1 FTE technology staff serves 35 FTE staff. Contracted and in-house services supplement as needed.

5. Timeline for Technology Integration

2014-2015

a) Review new Tech Plan goals and ICT and ISTE standards with all staff
b) Review recently revised AES Educational Technology Curriculum Outcomes
c) Provide professional development in innovative teaching practices through the integration of technology tools
d) Improve technology integration in all content areas
e) Expand technology use to improve instruction and increase student learning

2015-2016

a) Review Tech Plan goals and ICT and ISTE standards with all staff
b) Review AES Educational Technology Curriculum Outcomes
c) Increase professional development in innovative teaching practices through the integration of technology tools
d) Improve technology integration in all content areas
e) Expand technology use to improve instruction and increase student learning

2016-2017

a) Review Tech Plan goals and ICT and ISTE standards with all staff
b) Review AES Educational Technology Curriculum Outcomes
c) Increase professional development in innovative teaching practices through the integration of technology tools
d) Improve technology integration in all content areas
e) Expand technology use to improve instruction and increase student learning
f) Review, assess, and revise Technology Plan

6. Support Resources

The in-house Technology Support position and outside experts, including trainers and vendor technical support, are utilized to ensure effective use of technology.

The Internet is available in every area of the school including classrooms, the computer lab, the COWs, and the library media center. The library media

center acquires and circulates a professional collection that includes technology materials.

A student information system has been updated and customized. Extensive training and technological support are included in this package. The student database provides effective information, communication, reporting, scheduling, and planning for the entire school system.

7. <u>Data - Technology Literacy</u>

Technology literacy data is generated through:

a) Teacher observation process
b) Weekly progress reports generated by software such as Type to Learn
c) Classroom assessments including tests, projects, rubrics, observations, and conferences
d) State level NECAP and Smarter Balanced assessments, locally NWEA assessment and other assessment tools
e) Digital portfolios

C. Professional Development Action Plan

1. Professional Development Overview

At Ashland Elementary School, we believe it is our professional responsibility to become more efficient and effective in educating our students. The integration of technology allows us to improve our instructional practices, and provide unlimited learning opportunities. Personalizing these opportunities based on the unique needs and interests of our students will motivate and challenge them, which will ultimately increase their rate of success. Professional development at Ashland Elementary School focuses on improving our integration of technology in direct support of a newly implemented customized learning approach across all content areas.

The Ashland Professional Development Master Plan (PDMP) provides the opportunity for staff to participate in technology training, as well as a process for assessment and application of learning.

Technology-related professional development is ongoing and sustained. Teachers, administrators, and support staff participate in training in the effective use of technology whether it's for the classroom, the library media center, the office, or the cafeteria.

2. Professional Development Needs

Professional development needs are identified by:

a) Review of relevant research in professional journals and on professional websites by teachers, the Technology Coordinator, and the Technology Team
b) District goals
c) Student performance and assessment
d) Staff surveys

3. Professional Development Activities

Professional development activities for all staff including teachers, administrators, the library media specialist, and support staff include:

a) In-service workshops to enhance technology integration that include the use of apps, the Internet for e-mail and research, operation of digital cameras, classroom web page design and use, online assessments, use of interactive whiteboards and document cameras, as well as other topics
b) Mentoring– more highly trained staff members train others and become partners in initiatives
c) Seminars and workshops
d) OPEN NH NHPTV e-learning for educators
e) Surveys to evaluate staff training and needs
f) In-house training

g) Training in use of Performance Tracker, NWEA data analysis
h) Webinars
i) Interactive whiteboard training
j) Training sessions for student assessments and online digital portfolios
k) Graduate and collegiate courses
l) Job-embedded projects (activities done during the school day that expand knowledge and/or skills)
m) Observations / On-site visits
n) Partnerships / Study groups
o) Participation in professional networks
p) Independent study

4. Sources of Training and Technical Support

a) NH State Department of Education
b) University of New Hampshire
c) NH State Library
d) Plymouth State University
e) NHSTE (NH Society for Technology in Education)
f) NHEON (NH Educators Online)
g) NHEMA (NH Educational Media Association)
h) NHPTV (NH Public Television) / OPEN NH
i) Ashland Elementary School Technology Team
j) Ashland Elementary School Professional Development Committee
k) Ashland Teaching Staff
l) Performance Tracker
m) Technical support from Web2School, Follett, Pearson, NWEA (Northwest Evaluation Association), and others
n) Training videos and online tutorials
o) Webinars and web-based trainings

5. Training Timeline

Ongoing onsite technology training is provided to all staff. In-school experts are trained as needed, providing tech support to their colleagues. All staff members participate in annual training sessions regarding assessment, student digital portfolios, and other customized learning initiatives.

Teachers are also expected to attend conferences and workshops. Staff members annually attend the Christa McAuliffe Technology Conference. Funds and release time are provided for these endeavors.

Some of the innovative solutions to scheduling and staffing problems include:

a) Teachers meet with the tech coordinator for training and problem solving purposes.
b) Technology workshops are conducted for staff members before and after school.

c) Substitute teachers provide release time for teacher training.
d) Selected teachers receive intensive training and then become mentors to their colleagues.
e) Webinars and other online trainings provide flexibility to teaching schedules and budget restraints.

6. Data - Professional Development

Professional Development data is maintained through MyLearningPlan. Teachers follow the process outlined in the Professional Development Master Plan and are responsible for submitting professional development continuing education units to the principal for approval. This process includes the gathering of specific data on activities, needs, and hours completed. Technology literacy and integration goals and expectations are included in this plan for every teacher. Administrators and support staff are included in all professional development opportunities and initiatives.

D. Community Collaboration Action Plan

1. Activities to Promote Parent Involvement and Communication

The Ashland community has shown support by approving the technology budget every year since the budget's inception. The School Board supports the use of technology as a teaching tool and as a management tool. Hardware, software, technology support, and training continue to be integral components of the technology plan. Ashland Elementary School has applied for and received funds through REAP, E-Rate, and other sources. Future funding through grants will be sought in order to supplement the school budget.

a) Community members are invited to visit the computer lab and classrooms during Open House, parent-teacher conferences, kindergarten registration, and other special events.
b) Many school community members communicate with the school through email. Nearly all AES parents receive daily notices through email in addition to frequent communications from staff members.
c) Parents are able to access their students' web-based electronic portfolios which contain assessment information and evidence of student learning.
d) Through the school webpage, parents and others can access general information, school news, email addresses, curriculum materials, online library catalog, online textbooks and literature, weekly notes, syllabi, sports schedules, pictures, and more.
e) The Ashland Town Library shares resources with the school. Through a collaborative effort, the town library received a Children's Literacy Foundation (CLiF) grant that will bring literacy programs and resources to both the school and the town.

f) The school facility is used for many public meetings. During these meetings, the school's technological capabilities are often utilized.

2. Collaboration with Adult Literacy Providers

There are no adult literacy programs in the Town of Ashland. Laconia and Plymouth Adult Education programs have been contacted in the past to determine the feasibility of sharing Ashland's facilities. There has been no interest in pursuing a collaborative initiative. Adults from Ashland make use of the programs in Laconia and Plymouth.

3. Data - Community Collaboration

a) Technology budget and grant funds records are maintained by the SAU 2 Business Office, the principal, and the Technology Coordinator.
b) Teachers keep written records of parent contacts.
c) Parents' email addresses are listed in the student database where they are available to staff members.
d) The Technology Coordinator collects and reports information on the use of the school website.
e) Families are surveyed to determine the level of Internet access and technology capabilities available to students at home.

IV. Budget

A. Projected Costs

2014-2015
School District Budget

Tech Support salary	$ 18,720.	6 hrs/day-5 days/wk (200 days/yr)
Contracted repairs/services	$ 16,100.	Repairs, training, and ISP charges
Repairs	$ 1,500.	Repair parts
Supplies	$ 2,205.	Printer cartridges, ribbons, disks, etc.
Replacement equipment	$ 15,000.	Replace Computer Lab computers, printers, A/V, and network equipment
Software and books	$ 5,300.	Software upgrades, professional materials, etc.
New Equipment	$ 4,000.	Mac Books, Air Port Printers, additional Access Points
Total	**$62,825.00**	

2014-2015
(Grant and E-Rate Funds)

	E-Rate	Grants
Replacement computers	$ 3,500.	
Additional tablets, individual learning devices		$ 3,000.
Professional development		$ 2,500.
Total	$ 3,500.	$ 5,000.

2015-2016
School District Budget

Tech Support salary	$ 24,570.	6 hrs/day-5 day/wk (220 days/yr)
Tech Integrator Position	$ 22,850.	Teacher Contract-.5 FTE (B-10)
Contracted repairs/services	$ 6,000.	Repairs, training, and ISP charges
Repairs	$ 2,000.	Repair parts
Supplies	$ 2,400.	Printer cartridges, ribbons, disks, etc.
Replacement equipment	$ 15,000.	Replace older devices, computers, printers, A/V, and network equipment
Software and books	$ 5,500.	Software upgrades, professional materials, etc.

New Equipment	$ 5,000.	iPads, additional classroom computers
Total	**$83,320.00**	

2015-2016
(Grant and E-Rate Funds)

	E-Rate	Grants
Replacement computers	$ 3,500.	
Additional tablets, individual learning devices		$ 2,000.
Professional development		$ 2,500.
Total	$ 3,500.	$ 4,500.

2016-2017
School District Budget

Tech Support salary	$ 25,303.	6 hrs/day-5 day/wk (220 days/yr)
Tech Integrator Position	$ 47,278.	Teacher Contract-1 FTE
Contracted repairs/services	$ 4,000.	Repairs, training, and ISP charges
Repairs	$ 2,500.	Repair parts
Supplies	$ 2,500.	Printer cartridges, ribbons, disks, etc.
Replacement equipment	$ 15,000.	Replace older devices, computers, printers, A/V, and network equipment
Software and books	$ 6,000.	Software upgrades, professional materials, etc.
New Equipment	$ 5,000.	iPads, additional classroom computers
Total	**$107,581.00**	

2016-2017
(Grant and E-Rate Funds)

	E-Rate	Grants
Replacement computers	$ 3,500.	
Additional tablets, individual learning devices		$ 2,000.
Professional development		$ 2,000.
Total	$ 3,500.	$ 4,000.

B. Coordination with Grant Funds / Technology Budget Information

School Year	*Income Source*	*Amount*	*Details*
2014-2015	School District	$ 62,825.	
	Grant	$ 5,000.	Professional development Tablets & devices
	E-Rate refund	$ 3,500.	Replacement computers
Total 2014-2015		$ 71,325.	
2015-2016	School District	$ 83,832	
	Grant	$ 4,500.	Professional development Tablets & devices
	E-Rate	$ 3,500.	Replacement computers
Total 2015-2016		$ 87,270.	
2016-2017	School District	$107,581.	
	Grant	$ 4,000.	Professional development Tablets & devices
	E-Rate	$ 3,500.	Replacement computers
Total 2016-2017		$115,081.	

C. Budget Narrative and Timeline

2014-2015

Replace 20 computers in the computer lab.
Increase access to technology by increasing number of devices available
Increase internet access by adding more WIFI Access Points
Increase broadband service
Add another server
Increase IP addresses
Target Professional Development to improve technology integration
Build banks of classroom computers
Purchase wireless printers for Middle Tier
Increase Technology Support position
Commission creation of student ePortfolio software and web-based information portal
Increase eBook library
Purchase MacBooks for graphic design and eTextbook creation

2015-2016
Upgrade to web-based adaptive assessment service
Replace laptops on COW Cart #2 with leased devices
Purchase technology integrated curricula and applications to meet learner needs
Increase number of mobile devices
Increase number of devices in banks of classroom computers
Increase Technology Support position
Add Technology Integrator position at .5 FTE
Purchase computer lab management software
Deploy Student ePortfolio software
Purchase wireless printers for Intermediate Tier
Increase eBook Library

2016-2017
Replace laptops on COW Cart #1 with leased devices
Purchase technology integrated curricula and applications to meet learner needs
Maintain and house ePortfolio software
Improve ePortfolio software and increase storage capacity
Expand features of web-based information portal
Increase Technology Integrator position to 1 FTE

V. Evaluation

A. Technology Plan Assessment

The Technology Team consists of administrative and professional staff members, and meets monthly. The Team monitors progress on the Technology Plan and recommends revisions as needed. Progress on the Technology Plan is overseen by the Technology Coordinator and the Technology Team. Data identified in the data sections of this plan is analyzed on a continuous basis.

Progress is monitored through:
a) Monthly meetings of the Technology Team
b) School Board meetings
c) Parent communications
d) Periodic staff updates

Recommendations and revisions are made by the Technology Team during meetings as new developments and opportunities arise. Action is ongoing in response to analysis and review.

B. Evaluation Timeline

The development, implementation and assessment of the Technology Plan are integral parts of an ongoing cycle. The Technology Committee and the administration are responsible for overseeing this project in conjunction with all aspects of the school programs under the umbrella of the District Education Improvement Plan.

October 2013 – May 2014
Development of new Technology Plan
August 2014
Presentation of 2014-2017 Technology Plan to School Board
September 2014 - July 2017
Technology Plan goes into effect
August 2014
Presentation of 2014-2017 Technology Plan to Ashland Elementary staff
September 2014 – June 2015
Year 1 implementation of Technology Plan
May 2015
Evaluation/Annual assessment of progress
September 2015 – June 2016
Year 2 implementation
May 2016
Evaluation/Annual assessment of progress
September 2016 – June 2017
Year 3 implementation
October 2016 – May 2017
Development of new Technology Plan
May 2017
Evaluation/Annual assessment of progress
July 2017
2017-2020 Technology Plan goes into effect

C. Hardware and Support Evaluation

Evaluation of hardware needs is ongoing. During the Technology Team monthly meetings, hardware needs including purchases, maintenance, and use are evaluated in order to make decisions and plan for the future. The current computer to student ratio is better than 2:1 which sufficiently meets the present needs of the students. This is augmented by additional laptops and tablets resulting in an effective 1:1 ratio. Technology support is adequate to support existing technology and planned acquisitions.

D. Connectivity Evaluation

Technological systems are used to communicate within the school building, with the community, and with the outside world. The high speed DSL line has been upgraded to better facilitate access for all users. The NH Department of Education Tech Readiness Tool was completed in anticipation of upcoming computerized statewide testing. Parents complete a connectivity survey upon registration.

E. Technology Literacy Evaluation

Ashland Elementary School has created a technology curriculum map aligned to the NH Information and Communication Technologies Literacy Standards and the ISTE National Educational Technology Standards.

F. Professional Development Evaluation

Professional development activities focus on technology integration across all content areas. They are tracked through MyLearningPlan and evaluated in accordance with the Ashland Professional Development Master Plan.

G. Community Collaboration Evaluation

Funding for the Technology Plan is proposed annually to the Ashland School Board for their approval. The present level of funding adequately meets expected needs for the 2014-2015 school year. Community members have visited the school to view student work and to see the school facilities. Parents' email addresses are included in the student information system database. Parents use the school website to access information and online textbooks, and to view their children's electronic portfolios.

VI. Policies and Procedures

A. Children's Internet Protection Act (CIPA) / Security Policy

CIPA Compliant Security Policy:

1. Firewall: SonicWall TZ-170 protects entire school LAN
2. Filtering: CyberPatrol filter on SonicWall protects all computers
3. Proxy server: N/A
4. LAN based security: Windows 2008-R2 server with AVG corporate edition of anti-virus software
5. Data backup methods: Network back up to another server daily
6. Facility security: computer lab locked, school building locked
7. COPA compliance
8. Passwords: multilevel passwords used where applicable, passwords required to log on network, passwords used for specific programs
9. E-mail: Staff and middle school students only
10. Computer use: Student use with staff supervision
11. Network access: Student use with staff supervision, student access denied in some applications

B. Student and Staff Acceptable Use Policy INSTRUCTION 6142.1

Internet Acceptable Use

The Internet is an electronic communications network which provides vast, diverse, and unique resources. Our goal in providing this service to teachers, staff, and ultimately students, is to promote educational excellence in the Ashland School District, facilitate resource sharing, innovations, and communication.

The District supports resources that will enhance the learning environment that is consistent with the educational mission, goals, and policies of the School District. With access to computers and people all over the world, also comes the availability of material that may not be considered to be of educational value in the context of the school setting. There may be some material or individual communications which are not suitable for the educational environment. The Ashland School District has taken precautions to restrict access to inappropriate materials. However, it is impossible to control all materials on a global network and an industrious user may discover inappropriate information.

Guidelines

Internet access is coordinated through a complex association of government agencies and regional networks. The operation of the Internet relies heavily on the proper conduct of the users, who must adhere to strict guidelines. Internet

access is a privilege, not a right. If a user violates any of the acceptable use provisions outlined in this document, his/her account will be terminated and future access may be denied. Some violations may also constitute a criminal offense and may result in legal action. Any user violating these provisions, applicable state and federal laws, or posted classroom and District policies, is subject to District disciplinary action.

1) Acceptable Use

· Must be in support of education and research consistent with District policy.
· Must be consistent with the rules appropriate to any network being used/accessed.
· Unauthorized use of copyrighted material is prohibited.
· Accessing, or attempting to access threatening or obscene material is prohibited.
· Distribution of material protected by trade secrets is prohibited.
· Use for commercial activities is not acceptable.
· Product advertisement or political lobbying is prohibited.

2) Privileges

· Access to the Internet is not a right, but a privilege.
· Training will be provided for each individual applying for an account.
· Unacceptable usage will result in cancellation of the account.

3) Network Etiquette

· Be polite. Do not get abusive in your message to others.
· Use appropriate language. Do not use vulgar or obscene language.
· Do not reveal your personal address or the phone number of yourself or others.
· Electronic mail or any use of the Internet is not guaranteed to be private.
· System operators associated with the Internet have the ability to monitor all mail.
· Messages relating to or in support of illegal activities shall be reported to the authorities.
· Do not intentionally disrupt the network or other users.

4) Security

· If you identify a security problem, notify a system administrator immediately.
· Do not show or identify a security problem to others.
· Do not reveal your account password or allow another person to use your account.
· Do not use another individual's account without his/her permission.
· Attempts to log on as another user, without permission, will result in cancellation of privileges and may also result in disciplinary action.

· User must notify the District system administrator of any change in account information.
· User may be occasionally required to update registration, password, and account information in order to continue Internet access.

5) Vandalism/Harassment

· Vandalism and/or harassment will result in the cancellation of the offending user's account and shall result in disciplinary action.
· Vandalism is defined as any malicious attempt to harm or destroy data of another user, the Internet or other networks, or any associated hardware. This includes, but is not limited to, creating and/or uploading computer viruses.
· Harassment is defined as the persistent annoyance of another user or the interference in another user's work. This includes, but is not limited to, the sending of unwanted communications.

6) Penalties
· Any user violating these provisions, applicable state and federal laws or posted classroom and District rules, is subject to loss of network privileges and any other District disciplinary action, including criminal prosecution.
· School and District administrators will make the final determination as to what constitutes unacceptable use and their decision is final.
The Ashland School District makes no warranties of any kind, whether expressed or implied, for the service it is providing. The Ashland School District will not be responsible for any damages a user may suffer, including loss of data. The District will not be responsible for the accuracy or quality of information obtained through this Internet connection.

All terms and conditions as stated in this document are applicable to all users of the network. These provisions reflect an agreement of the parties and shall be governed and interpreted in accordance with the laws of the State of New Hampshire and the United States of America.

Adopted: 08/97
Revised: 04/11/01
Approved: 08/07/01
Reviewed: 03/02/04
Revised: 11/06/12
Reviewed: 11/05/13

C. Copyright and Fair Use Policy

Copyright Compliance (Ashland School Board Policy #6180)

The Ashland School District recognizes that federal law makes it illegal to uplicate copyrighted materials without authorization of the holder of the copyright, except

for certain exempt purposes. Severe penalties may be imposed for unauthorized copying or using audio, visual or printed materials and computer software, unless the copying or using conforms to the "fair use" doctrine. Under the "fair use" doctrine, unauthorized reproduction of copyrighted materials is permissible for such purposes as criticism, comment, news reporting, teaching, scholarship or research.

While the District encourages its staff to enrich the learning programs by making proper use of supplementary materials, it is the responsibility of District staff to abide by the District's copying procedures and obey the requirements of the law. Under no circumstances shall it be necessary for District staff to violate copyright requirements in order to perform their duties properly. The District cannot be responsible for any violations of copyright law by its staff.

Any staff member who is uncertain as to whether reproducing or using copyrighted materials complies with the District's procedures or is permissible under the law should contact the Superintendent. The Superintendent will assist staff in obtaining proper authorization to copy or use protected materials when such authorization is required.

D. Data Retention Policy STUDENTS 5124

Records: Policies and Procedures

DEFINITIONS
For the purposes of this policy, the Ashland School District has used the following definitions of terms:

- Student – any person who attends or has attended a school in the Ashland School District.
- Eligible student – a student or former student who has reached age 18 or is attending a post-secondary school.
- Parent – either natural parent of a student, a guardian, or an individual acting as a parent or guardian in the absence of the student's parent or guardian.

For the purposes of this policy and in accordance with FERPA, the term "educational record" is defined as all records, files, documents and other material containing information directly related to a student and maintained by the school district, or by such other agents as may be acting for the school district. Such records include, but are not limited to, handwriting, videotape, audiotape, electronic or computer files, film, print, microfilm and/or microfiche.

RETENTION
Records shall be retained in accordance with related laws and New Hampshire Department of Education regulations.

ANNUAL NOTIFICATION
A school district is required by Section 99.7 of the Family education Rights and Privacy Act (FERPA) regulations to provide parents annual notification of their FERPA rights. Such notification will be presented in a manner that is clearly understood.

Parents will be notified of their FERPA rights annually either by publication in their child's student handbook or by separate notice sent home with children.

PROCEDURE TO INSPECT EDUCATION RECORDS
Parents of students or eligible students may inspect and review the student's education records upon request as outlined by the following procedure:

Parents or eligible students must submit to the student's school principal a written request, which identifies as precisely as possible the record or records he or she wishes to inspect.

Parents are entitled to access their child's education records. If requested, access will be made available within a reasonable period of time, but in no case more than forty-five (45) days after the request has been made.

When a record contains information about students other than a parent's child or the eligible student, the parent or eligible student may inspect and review the portion of the record after any confidential information has been deleted.

If the record involves answers to a standardized test, the District will not provide a parent a copy of the standardized test questions.

FEES FOR COPIES OF RECORDS
The fee for copies will be determined by the SAU #2 office. The Ashland School District reserves the right to charge for copying time and postage.

DISCLOSURE OF EDUCATION RECORDS
The Ashland School District will disclose information from a student's education records only with the written consent of the parent or eligible student, except:

1. To school officials who have a legitimate educational interest in the records.

A School official is:

- A person employed by the district as an administrator, supervisor, instructor, or support staff member.

- A person employed by or under contract to the district to perform a special task, such as an attorney, auditor, medical consultants or therapists.

Replaced: #5125 “Release of Confidential Records”

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