# Canaseraga Central School District District Technology Plan



4-8 Main Street
Canaseraga, NY 14822
607-545-6421
607-545-6265 fax

#### **Contact Person:**

Kristi Briggs/Craig Kaczmarek 607-545-6421 x310 kbriggs@ccsdny.org ckaczmarek@ccsdny.org

www.ccsdny.org/techplan

July 2015-June 2018

# **Table of Contents**

Table of Contents	1
Introduction	2
Technology Philosophy	3
Technology Vision Statement	3
GOALS:	3
I. CURRICULUM	4
Element A. Curriculum Integration	4
Element B. Student Achievement:	9
Element C. Technology Delivery:	9
Element D. Parent Communications & Community Relations:	9
II. PROFESSIONAL DEVELOPMENT	10
Element E. Professional Development	10
III. INFASTRUCTURE, HARDWARE, TECHNICAL SUPPORT, AND SOFTWARE	10
Element F: Infrastructure Needs/Technical Specification, and Design	10
Element G: Inventory	11
Element H: Increase Access	13
IV. MONITORING AND EVALUATING	13
Element I: Evaluation	13
Element J: Acceptable Use Policy	13

#### Introduction

Canaseraga Central School District is a small, rural public that is located in Allegany County, New York. The school enrollment is about 250 students in Pre-K through 12<sup>th</sup> Grade and a faculty of 35. All grades are taught in one school building and the average class size is about 18 per grade level. CCS is a high needs school with approximately 55% of the students receiving free or reduced lunch.

This technology plan conforms to the schools mission statement "We believe that our responsibility is to provide all students with an opportunity to learn, achieve, and become responsible, productive members of society." All staff embraces this perspective and work diligently to find creative teaching methods to prepare our students for their future.

The plan is available for viewing on the district website or upon request at the district office.

The committee responsible for this plan is shown on the table below:

Name	Title
Chad Groff	Interim Superintendent
Shannon Gilbert	Building Principal
Kristi Briggs	Ed. Technology Specialist/Tech. Coordinator
Craig Kaczmarek	Math Intervention/ Technology Coordinator
Chris Charlier	Erie 1 BOCES Senior Technician
Anton Flint	Erie 1 BOCES Technician
Bryan Lewis	6 <sup>th</sup> Grade Teacher
Julie Kurtz	Library/Media Specialist
Jeff Howard	4 <sup>th</sup> Grade Teacher
Alyn Simpson	Social Studies
Vicki Watkins	Kindergarten Teacher
Kathy Macomber	Business Teacher/E-rate
Emilie Carney	Community Member

# **Technology Philosophy**

Canaseraga Central School has a technology philosophy that is based on problem solving skills, cooperative peer relationships, learning by doing and respect for all. This plan has developed over time through the input and collaboration of many staff members. It has become increasingly necessary to integrate technology into all aspects of education and keep up with future demands. Online lessons, games, manipulatives, videos etc. provide a "different" way for students to learn. The upcoming implementation of PARCC is demanding that all schools be prepared to provide all of its students with the necessary training, equipment and preparation.

## **Technology Vision Statement**

Canaseraga Central School is to provide all students with instruction in, and access to the most current technologies being used in the world around them to facilitate their learning and preparation for their future as lifelong learners. We promote using technology to empower students to maximize their full potential by using multiple platforms and preparing them to be college and career ready.

#### **GOALS:**

- 1. Students will use technology to demonstrate learning and communicate in a digital world.
- 2. Teachers will use technology to support and enhance student learning.
- 3. Provide faculty/staff with technology professional development to develop learning opportunities for students and collaborate with colleagues in a learning community.
- **4.** Continually maintain, update, improve district technology infrastructure, telecommunications, hardware and software.
- **5.** Enhance the relationship between the school and community by providing opportunities for residents and community members to access information about technology.

#### I. CURRICULUM

#### **Element A. Curriculum Integration**

**GOAL 1** – Students will use technology to demonstrate learning and communicate in a digital world. **ACTIVITIES/WHAT** WHO/HOW WHEN **EXISTING EVALUATION** D-Develop **RESOURCES** I-Implement O-Ongoing 14-15 15-16 17-18 18-19 Monitor the use of collaborative Students use technology to communicate and Classroom D 0 0 **Fdmodo** collaborate with others as a means for Teachers/ Tech. Google Drive tools. Bi-monthly technology Google Classroom demonstrating learning or constructing new Coordinators meetings. Dropbox meaning. Students use technology to effectively access, D 0 0 **EngageNY** Monitor integration of Common Classroom critically evaluate and select appropriate Teachers/ Tech. curriculum with Core learning standards and information in order to demonstrate course Coordinators iPad deployment. creation of common benchmark specific learning. assessments that measure critical learning via technology. Students utilize technology as a means of iXL Classroom D 0 0 Monitor interventions that are Teachers/ Tech. technology based and explore academic intervention to close the gaps in Buzzmath their learning. Coordinators Skoolbo new resources as they become **Spelling City** available. Students digitally create, store, and retrieve Classroom D D 0 **Technology Coordinators will** Adobe Voice products that demonstrate understanding of Teachers monitor technology at all grade the learning standards. levels. Continually promote parent and student Technology Coordinators will hold Guidance 0 eSchool 0 0 Counselor/Tech. trainings on Parent Portal and the access via the Internet to student assessment. Parent Portal grading and course info. Coordinators **Fdmodo** features to parents. Class Dojo

**GOAL 2** – Teachers will use technology to support and enhance student learning.

ACTIVITIES/WHAT	WHO/HOW	WHEN D-Develop I-Implement O-Ongoing			D-Develop I-Implement O-Ongoing			D-Develop I-Implement			D-Develop I-Implement			D-Develop I-Implement			D-Develop I-Implement			D-Develop I-Implement			D-Develop I-Implement			D-Develop I-Implement			D-Develop I-Implement			D-Develop I-Implement		EXISTING RESOURCES	EVALUATION																		
		14-15	15-16	17-18	18-19																																																
Teachers will integrate iPads into their daily classroom practices.	Classroom Teachers/ Tech. Coordinators	I 	D	0	0	iPads	Provide professional development opportunities.																																														
Teachers will create a personal professional learning network as self-directed professional development to enhance practice.	Classroom Teachers/ Tech. Coordinators	D	I	0	0	Edmodo Twitter My Big Campus	Provide professional development opportunities.																																														
Teachers and staff demonstrate positive digital citizenship.	Classroom Teachers/ Tech. Coordinators/State Troopers	I	0	0	0	Netsmartz	Provide professional development opportunities.																																														

**GOAL 3** – Provide faculty/staff with technology professional development to develop learning opportunities for students and collaborate with colleagues in a learning community.

ACTIVITIES/WHAT	WHO/HOW WHEN			EXISTING	EVALUATION		
,	,	D-Develop I-Implement O-Ongoing				RESOURCES	
		14-15	15-16	17-18	18-19		
Create teacher training program that will include accessing web based tools for curriculum and instruction design.	Curriculum Coordinator/Principal	I	I	0	0	engageNY	Bi-Monthly Technology Meetings
Train teachers to effectively use Safari Montage or other identified video outlets.	Tech. Coordinators	D	I	0	0	Safari Montage	Provide professional development opportunities.
Create professional development instruction on flipping the classroom.	Classroom Teachers/ Tech. Coordinators	D	D	I	0	Online Resources	Provide professional development opportunities.
Redesign the Canaseraga website to deliver a user-friendly means for communicating with parents and community as well as intranet for staff collaboration with sharing resources	Webmaster	D	I	0	0	Online Resources	Bi-Monthly Technology Meetings

**GOAL 4**—Continually maintain, update, improve district technology infrastructure, telecommunications, hardware and software.

ACTIVITIES/WHAT	WHO/HOW	D-Develo	WHEN D-Develop I-Implement O-Ongoing			D-Develop I-Implement O-Ongoing			D-Develop I-Implement O-Ongoing			D-Develop I-Implement O-Ongoing			D-Develop I-Implement O-Ongoing			D-Develop I-Implement O-Ongoing		EXISTING EVALUATION RESOURCES	EVALUATION								
		14-15	15-16	17-18	18-19																								
Teacher Laptops	BOCES Tech./	0	0	0	0	Online	Bi-Monthly Technology Meetings																						
	Administration					Resouces																							
iPads	BOCES Tech./	D	I	0	0	Online	Bi-Monthly Technology Meetings																						
	Administration					Resources																							
SMARTBoards	BOCES Tech./	0	0	I	0	Online	Bi-Monthly Technology Meetings																						
	Administration					Resources																							
Software	Technology	D	I	0	0	Online	Bi-Monthly Technology Meetings																						
	Coordinators					Resources																							
iPad Apps	Technology	D	I	ı	0	Online	Bi-Monthly Technology Meetings																						
	Coordinators					Resources																							

**GOAL 5**— Enhance the relationship between the school and community by providing opportunities for residents and community members to access information about technology.

ACTIVITIES/WHAT	WHO/HOW				D-Develop I-Implement				EXISTING RESOURCES	EVALUATION
		14-15	15-16	17-18	18-19					
Create a community technology program such	Technology	D	I	0	0	Technology	Bi-Monthly Technology Meetings			
as a monthly technology information session.	Coordinators					Resources				
	/Administration									
Promote the school's social media sites to the	Webmaster	D	I	0	0	Online	Bi-Monthly Technology Meetings			
community.						Resources				

#### **Element B. Student Achievement:**

Canaseraga Central School provides numerous opportunities for students to learn, participate and integrate technology into their own learning. Technology instruction begins in Pre-Kindergarten and continues through graduation. The Common Core Learning Standards and International Society for Technology in Education (ISTE) Standards will be used as a guide in the instruction of technology education in the content areas. Laptop carts, iPads, SMARTBoards and streaming video, Microsoft Office products and Google Apps for Education are used across all curriculum areas. Technology integration will be evaluated each year to determine which professional development opportunities could be explored in the future.

# **Element C. Technology Delivery:**

Students in grades Pre-K through 6<sup>th</sup> grade as well as 8<sup>th</sup> and 10<sup>th</sup> grade receive formal computer instruction provided in the computer lab. The school is equipped with school wide wireless internet access. For the 2014-2015 school year, students in grades 3-7 will be receiving instruction through the use of a 1:1 iPad program to expand to a 1:1+ program in which students can experience across multiple platforms. In the future, we look to explore more online classes for high school students to offer more opportunities.

# **Element D. Parent Communications & Community Relations:**

The district website is available to promote parent involvement and increase communications with the parents and community. District events, athletic events, classroom webpages, breakfast/lunch menus, district forms, student code of conduct, community newsletters, Board of Education meeting minutes and other important information is contained on the website. ParentPortal through eSchool is available for parents to access their child's academic information which includes grades, schedules and attendance. Parents and community member's collaborated together with school staff while this plan was being formulated. The Canaseraga Chronicle is a monthly school newsletter that communicates school news to the community. This newsletter is printed and mailed and also found in a digital form on the district website. In addition throughout the 2014-2015 school year, we will introduce Technology Tuesdays. This will be a monthly class in which parents and community members can come into the computer lab and learn about new technologies and have assistance with technology.

#### II. PROFESSIONAL DEVELOPMENT

#### **Element E. Professional Development**

Professional development for technology integration is a process for on-going professional growth and development to help teachers and other staff members become more effective in their jobs. The focus is on the subject matter the teachers will be teaching and how technology can support student learning. Recognizing the needs of learners, professional development opportunities take many forms to give educators the authority and resources to take charge of their learning based upon interest and need, and are designed to integrate with real work experiences. The evaluation of technology integration professional development includes multiple measurement tools with special emphasis on measurements that show the impact on teacher's practices and student learning. Professional development for technology integration is designed to support the core assumptions about high quality professional development from the ISTE Standards and is aligned with the Common Core Standards. When preparing for professional development the NETS Rubrics for students, teachers and administrators are commonly referenced.

# III. INFASTRUCTURE, HARDWARE, TECHNICAL SUPPORT, AND SOFTWARE

#### Element F: Infrastructure Needs/Technical Specification, and Design

With the completion of our capital project Canaseraga Central School has updated our infrastructure to include Gigabyte Broadband Internet as well as school-wide wireless Internet access. The goal of Canaseraga Central School is to have computer access for students to utilize during the day. Computer labs, laptop carts and iPads are readily available for student use. Erie 1 BOCES technicians maintain our computer network and infrastructure. During the technology committee meetings we will evaluate our current technology and decide which devices/tools need to be replaced or repaired. The table below is the current inventory of Canaseraga Central School and the planned acquirement/replacement schedule.

# **Element G: Inventory**

Inventory	Computer	Classrooms	Library	Admin.	Future Acquisitions			
inventory	Labs	Classicoms	Library	Offices	Year 1	Year 2	Year 3	
Desktops	2	64	1	21				
Laptops	44	156	16	1				
iPad Air	1	17		2	25	25	25	
iPad 4th Generation		110						
iPad 2nd Generation		6						
Number of computers listed above that are internet ready	ALL	ALL	ALL	ALL	ALL	ALL	ALL	
Number of computers listed above that are equipped for multimedia	ALL	ALL	ALL	ALL	ALL	ALL	ALL	
Peripheral Devices								
Printers	3	5	1	11	2	2	2	
Scanners	2	2	1					
Projection Devices	2	8			10	10	10	
SMARTBoards		26	1		5	5	5	
TV		2						
VCR/DVD Players		3						
Copier			1	6				
Digital Camera								
SMARTable		2						

Software				
Microsoft Office 2013				
Vision Softwear	2			
BrainPop				
iPad Apps (Paid)				
Notability				
Timed Test				
Garage Band				
iPad Apps (Free)				
Google Drive				
Gmail				
Spelling City				
iXI				
BuzzMath				
5 Dice				
Socrative				
Edmodo				
Calculator				

**Element H: Increase Access** 

Technology has been an integral part of making students, college and career ready. The goal of Canaseraga Central School is to have computer access for students to utilize during the day. Computer labs, laptop carts and iPads are readily available for student use. The public library in town has computers with internet access as well as wireless internet for families that do not own a computer or have internet access.

#### IV. MONITORING AND EVALUATING

**Element I: Evaluation** 

The execution of this action plan will be monitored by administration and all other parties involved and should be reported back to the technology committee that this plan is being met. This plan will be evaluated on an annual basis by the technology committee. Any unmet goals will be addressed through the technology committee discussion. The committee will use staff/student survey results, feedback from community members and faculty best practices to drive our plan as we look towards the future.

#### **Element J: Acceptable Use Policy**

Every district owned device is filtered through Light Speed provided by Erie 1 BOCES. The computer labs have access to Visions monitoring software. The AUP (Acceptable Use Policy) that was revised and approved by the Board of Education in August 2014.

#### Attachments:

AUP (Acceptable Use Policy)
Superintendent Assurance Document signed by Superintendent
470 form

# Acceptable Use Policy

# Canaseraga Central School



# CCS Student Computer, Network, Internet, & iPad Acceptable Use Policy

Dear Parents and Students,

We are very excited to let you know about exciting technology opportunities CCS students will have in a variety of grade levels and classes this year! We will be using numerous web-based programs and technology platforms. This includes desktops, laptops, & iPads. The focus of this initiative is to provide tools and resources to the 21<sup>st</sup> Century Learner. Canaseraga Central School has set a technology goal to empower our students by maximizing their full potential and preparing them to be **College and Career Ready**. Students will be allowed to use these tools in the classroom after returning this required agreement. Students will be expected to follow the attached updated Acceptable Use Policy for the district's computer network and the Internet. Students and parents should be aware that technology provided by the district will be monitored and the contents can be viewed at any time. Due to ever changing technology, Canaseraga Central School reserves the rights to modify the terms of this AUP at any given time. Revisions can be found on the district website.

#### Terms and Conditions of the Technology and Internet Acceptable Use Policy

The Canaseraga Central School network provides access to a wealth of technological resources for the educational advancement of the Canaseraga community. All members of the community are expected to act in a responsible manner when using these resources, just as they would in any aspect of their daily conduct at Canaseraga Central School. Our Code of Conduct sets the standard for behavior of all members of the Canaseraga Central School—students, faculty, administrators, staff, alumni, and parents. These codes are not meant to be a system of rules and regulations, but rather a guide for living an ethical life. A true understanding of the codes informs all aspects of our lives, and so they should be at the core of good decision making whether we are in school or away from school.

Technology has an ever-changing landscape, and new resources present themselves continually. When we engage in the use of Canaseraga Central School's network, the moral and ethical standards established by the Code of Conduct guide us in its appropriate use, rather than the capabilities or potential applications of the software, computing tools, and devices that we may use. In the online environment, our actions reach far beyond the walls of Canaseraga Central School, and the consequences of these actions may have far-reaching effects.

#### Scope

This policy applies to all members of the Canaseraga community—students, faculty, administrators, staff, alumni, parents, volunteers, adjuncts, coaches, and others—who access Canaseraga Central School's network using school owned or personally owned equipment, including wireless devices.

#### A. Expectations

- 1. Access to the Canaseraga's network is a privilege intended to facilitate education, school-related communication, research, and other school business. CCS reserves the right to limit or prohibit user access to the network in its efforts to maximize network use for academic purposes or as a result of violation of the Acceptable Use Policy.
- 2. All users are responsible for appropriate use of the Canaseraga Central School's technological resources, which include the computer network, computer labs, hardware peripherals, iPads, audio-visual systems, digital boards, communication systems, databases, etc.
- 3. All computers and personal electronic devices owned by individual members of the community and used on school grounds are subject to this policy.
- 4. Illegal activities utilizing the Canaseraga Central School network—such as drug or alcohol related activities; threatening the safety of another; vandalism; libel; gambling; promoting a pyramid scheme; distributing obscenities; receiving, transmitting, or possessing child pornography; infringing copyrights; making threats—are strictly forbidden and may be reported to the authorities.

#### **B. Good Network Citizenship**

All users should practice acceptable online etiquette, including but not limited to:

- 1. Be polite and use appropriate language in written and voice communication.
- 2. Use the network, computer systems, and communication tools in constructive ways.
  - a) Only use computers/iPads, other electronic hardware, file systems, and network resources that are authorized for your use. When in doubt, ask permission first.
  - b) Do not be disruptive to others or discriminatory in any way.
  - c) Do not attempt to tamper with the equipment or subvert or impair the operations of the network.
  - d) Access only appropriate material(s). Do not transmit or attempt to access offensive or obscene material.
- 3. Use legally obtained software only.
- 4. *Use your own login and credentials and not another's*. Do not misrepresent yourself online. Respect the privacy of other people's files and email.
- 5. Use of a computer or communication tool to harass or threaten another clearly violates this policy.
- 6. Respect academic rules regarding proper documentation and potential plagiarism concerns. When in doubt, consult a teacher or librarian.

#### C. Responsible Use of the Canaseraga Central Network

1. Online entertainment activities such as video game playing, video and audio streaming, and instant messaging compete with academic uses of network resources and are prohibited on

- school or personally owned equipment in the libraries, computer labs, and classrooms without teacher permission.
- Users will respect all copyright, trademark, and other laws governing intellectual property.
   No software may be installed, copied, or used on School equipment except as permitted by law. All software license provisions must be strictly adhered to.

#### **D. Electronic Communications**

- 1. The contents of any electronic communications, including email, instant messaging, blogs, wikis, and social networking sites should be composed with utmost care. Because many of these tools occupy online public spaces, the potential to bring harm to oneself, to others, and to CCS must be recognized, as recipients may forward messages to locations where there is no control over future dissemination. Please respect the rules and regulations required of any communication representing The Canaseraga Central School in the electronic environment.
- 2. CCS reserves the right to review network usage and access data files, email, voicemail, and other communications utilizing the Canaseraga Central School network. Accordingly, members of the Canaseraga Central School community should have no expectation of privacy with respect to any such usage, files, or communications.
- 3. All users must respect and value the privacy of others, behave ethically, and comply with all legal restrictions regarding the use of electronic data. All users must also recognize and avoid violating or infringing the intellectual property rights of others.

#### E. Safety

- 1. In the interest of safety, all users are instructed never to divulge personal information (address, phone number, Social Security number, photographs, etc.) over the Internet to anyone they do not know.
- 2. Users should keep their passwords secure and never share passwords with others.
- 3. Using online resources to threaten, intimidate, or harass an individual or group will not be tolerated and will be subject to disciplinary action that might lead to dismissal.
- 4. Using electronic communication tools to invade an individual's privacy, harass an individual, or offend an individual could result in criminal and/or civil action.
- 5. We recognize that social media is a way that students connect with the global community and that it can be used for instruction. Normal school rules of etiquette and conduct spelled out in the student handbook apply to student social media use, including rules applying to bullying and harassment.

#### F. Damages

1. In the event that technology is damaged due to negligence, acts of vandalism or stolen, parents/guardians are responsible to pay for damages in the same way they would be responsible for lost, stolen or damaged textbooks or other instructional materials.

Please keep this copy in a safe place for your records.

**STUDENT:** 

#### **REQUIRED SIGNATURES** (updated August 2014)

#### Please sign and return this page YOUR HOMEROOM TEACHER by September 12, 2014.

Parent signature is required for all students; however student signature is not required for grades PK-3. Beginning in the 2014-2015 school year, this AUP will be binding for the duration of the students' attendance at CCS. Upon entering  $4^{th}$  Grade, the student will be required to resubmit this form with a parent and student signature.

**STUDENT-USER:** I understand that before I am allowed to use school technology (computers/iPads) or the Internet I must agree to follow the rules and guidelines described in this document. These include using the Internet appropriately, respecting other students' work, taking care of the technology hardware and software and reporting anything that may go wrong on the computer to a teacher or administrator. I agree that it is ultimately my responsibility to make good choices when I use the technology at CCS. Should I commit any violation or in any way misuse my access to the Canaseraga Central School's computer network and the Internet, I understand and agree that my privilege may be revoked and disciplinary action may be taken against me.

the computer network and the	e Internet.	
PARENT/GUARDIAN:		
PARENT/GUARDIAN:		
Parent's Name/ (print)	Signature	Date
Guardian	Jighatare	Dute



International Society for Technology in Education

# ISTE Standards Students

## 1. Creativity and innovation

Students demonstrate creative thinking, construct knowledge, and develop innovative products and processes using technology.

- Apply existing knowledge to generate new ideas, products, or processes
- b. Create original works as a means of personal or group expression
- Use models and simulations to explore complex systems and issues
- d. Identify trends and forecast possibilities

#### 2. Communication and collaboration

Students use digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning of others.

- Interact, collaborate, and publish with peers, experts, or others employing a variety of digital environments and media
- Communicate information and ideas effectively to multiple audiences using a variety of media and formats
- Develop cultural understanding and global awareness by engaging with learners of other cultures
- d. Contribute to project teams to produce original works or solve problems

## 3. Research and information fluency

Students apply digital tools to gather, evaluate, and use information.

- a. Plan strategies to guide inquiry
- Locate, organize, analyze, evaluate, synthesize, and ethically use information from a variety of sources and media
- Evaluate and select information sources and digital tools based on the appropriateness to specific tasks
- d. Process data and report results

# Critical thinking, problem solving, and decision making

Students use critical thinking skills to plan and conduct research, manage projects, solve problems, and make informed decisions using appropriate digital tools and resources.

- Identify and define authentic problems and significant questions for investigation
- Plan and manage activities to develop a solution or complete a project
- Collect and analyze data to identify solutions and/or make informed decisions
- d. Use multiple processes and diverse perspectives to explore alternative solutions

# 5. Digital citizenship

Students understand human, cultural, and societal issues related to technology and practice legal and ethical behavior.

- Advocate and practice safe, legal, and responsible use of information and technology
- Exhibit a positive attitude toward using technology that supports collaboration, learning, and productivity
- Demonstrate personal responsibility for lifelong learning
- d. Exhibit leadership for digital citizenship

# 6. Technology operations and concepts

Students demonstrate a sound understanding of technology concepts, systems, and operations.

- Understand and use technology systems
- Select and use applications effectively and productively
- c. Troubleshoot systems and applications
- d. Transfer current knowledge to learning of new technologies

Standards+S © 2007 International Society for Technology in Education.

ISTE® is a registered trademark of the International Society for Technology in Education.

If you would like to reproduce this material, please contact permissions@iste.org.



Connected learning.Connected world."



International Society for Technology in Education

# ISTE Standards Teachers

Effective teachers model and apply the ISTE Standards for Students (Standards \*S) as they design, implement, and assess learning experiences to engage students and improve learning; enrich professional practice; and provide positive models for students, colleagues, and the community. All teachers should meet the following standards and performance indicators.

# Facilitate and inspire student learning and creativity

Teachers use their knowledge of subject matter, teaching and learning, and technology to facilitate experiences that advance student learning, creativity, and innovation in both face-to-face and virtual environments.

- a. Promote, support, and model creative and innovative thinking and inventiveness
- Engage students in exploring real-world issues and solving authentic problems using digital tools and resources
- Promote student reflection using collaborative tools to reveal and clarify students' conceptual understanding and thinking, planning, and creative processes
- Model collaborative knowledge construction by engaging in learning with students, colleagues, and others in face-to-face and virtual environments

# 2. Design and develop digital age learning experiences and assessments

Teachers design, develop, and evaluate authentic learning experiences and assessments incorporating contemporary tools and resources to maximize content learning in context and to develop the knowledge, skills, and attitudes identified in the Standards\*S.

- Design or adapt relevant learning experiences that incorporate digital tools and resources to promote student learning and creativity
- Develop technology-enriched learning environments that enable all students to pursue their individual curiosities and become active participants in setting their own educational goals, managing their own learning, and assessing their own progress
- Customize and personalize learning activities to address students' diverse learning styles, working strategies, and abilities using digital tools and resources
- d. Provide students with multiple and varied formative and summative assessments aligned with content and technology standards, and use resulting data to inform learning and teaching

# 3. Model digital age work and learning

Teachers exhibit knowledge, skills, and work processes representative of an innovative professional in a global and digital society.

- Demonstrate fluency in technology systems and the transfer of current knowledge to new technologies and situations
- Collaborate with students, peers, parents, and community members using digital tools and resources to support student success and innovation

- Communicate relevant information and ideas effectively to students, parents, and peers using a variety of digital age media and formats
- Model and facilitate effective use of current and emerging digital tools to locate, analyze, evaluate, and use information resources to support research and learning

# Promote and model digital citizenship and responsibility

Teachers understand local and global societal issues and responsibilities in an evolving digital culture and exhibit legal and ethical behavior in their professional practices.

- Advocate, model, and teach safe, legal, and ethical use of digital information and technology, including respect for copyright, intellectual property, and the appropriate documentation of sources
- Address the diverse needs of all learners by using learner-centered strategies providing equitable access to appropriate digital tools and resources
- Promote and model digital etiquette and responsible social interactions related to the use of technology and information
- Develop and model cultural understanding and global awareness by engaging with colleagues and students of other cultures using digital age communication and collaboration tools

# Engage in professional growth and leadership

Teachers continuously improve their professional practice, model lifelong learning, and exhibit leadership in their school and professional community by promoting and demonstrating the effective use of digital tools and resources.

- Participate in local and global learning communities to explore creative applications of technology to improve student learning
- Exhibit leadership by demonstrating a vision of technology infusion, participating in shared decision making and community building, and developing the leadership and technology skills of others
- Evaluate and reflect on current research and professional practice on a regular basis to make effective use of existing and emerging digital tools and resources in support of student learning
- Contribute to the effectiveness, vitality, and selfrenewal of the teaching profession and of their school and community

Standards+T © 2008 International Society for Technology in Education.

ISTE® is a registered trademark of the International Society for Technology in Education.

If you would like to reproduce this material, please contact permissions@iste.org.



Connected learning.Connected world."

iste.org/standards



International Society for Technology in Education

# ISTE Standards Administrators

## 1. Visionary leadership

Educational Administrators inspire and lead development and implementation of a shared vision for comprehensive integration of technology to promote excellence and support transformation throughout the organization.

- Inspire and facilitate among all stakeholders a shared vision of purposeful change that maximizes use of digital-age resources to meet and exceed learning goals, support effective instructional practice, and maximize performance of district and school leaders
- Engage in an ongoing process to develop, implement, and communicate technology-infused strategic plans aligned with a shared vision
- Advocate on local, state and national levels for policies, programs, and funding to support implementation of a technology-infused vision and strategic plan

# 2. Digital age learning culture

Educational Administrators create, promote, and sustain a dynamic, digital-age learning culture that provides a rigorous, relevant, and engaging education for all students.

- Ensure instructional innovation focused on continuous improvement of digital-age learning
- Model and promote the frequent and effective use of technology for learning
- Provide learner-centered environments equipped with technology and learning resources to meet the individual, diverse needs of all learners

- Ensure effective practice in the study of technology and its infusion across the curriculum
- Promote and participate in local, national, and global learning communities that stimulate innovation, creativity, and digital age collaboration

## 3. Excellence in professional practice

Educational Administrators promote an environment of professional learning and innovation that empowers educators to enhance student learning through the infusion of contemporary technologies and digital resources.

- Allocate time, resources, and access to ensure ongoing professional growth in technology fluency and integration
- Facilitate and participate in learning communities that stimulate, nurture and support administrators, faculty, and staff in the study and use of technology
- Promote and model effective communication and collaboration among stakeholders using digital age tools
- d. Stay abreast of educational research and emerging trends regarding effective use of technology and encourage evaluation of new technologies for their potential to improve student learning

#### 4. Systemic improvement

Educational Administrators provide digital age leadership and management to continuously improve the organization through the effective use of information and technology resources.

- Lead purposeful change to maximize the achievement of learning goals through the appropriate use of technology and media-rich resources
- Collaborate to establish metrics, collect and analyze data, interpret results, and share findings to improve staff performance and student learning
- Recruit and retain highly competent personnel who use technology creatively and proficiently to advance academic and operational goals
- d. Establish and leverage strategic partnerships to support systemic improvement
- Establish and maintain a robust infrastructure for technology including integrated, interoperable technology systems to support management, operations, teaching, and learning

#### 5. Digital citizenship

Educational Administrators model and facilitate understanding of social, ethical and legal issues and responsibilities related to an evolving digital culture.

- Ensure equitable access to appropriate digital tools and resources to meet the needs of all learners
- b. Promote, model and establish policies for safe, legal, and ethical use of digital information and technology
- Promote and model responsible social interactions related to the use of technology and information
- Model and facilitate the development of a shared cultural understanding and involvement in global issues through the use of contemporary communication and collaboration tools

Standards\*A © 2009 International Society for Technology in Education. ISTE® is a registered trademark of the International Society for Technology in Education.

If you would like to reproduce this material, please contact permissions@iste.org.

