

# Diocese of Savannah Technology Curriculum

2002  
Revised August, 2009



# Diocese of Savannah Technology Curriculum

## Philosophy Statement

The Diocese of Savannah is committed to teaching students how to use current technology while embracing Gospel values in the teachings of the Catholic Church. Through integration and application of technology within the curriculum, students will be prepared to participate in the global community for the betterment of self and others. Technology teachers in Catholic schools help students develop a sense of responsibility to improve the lives of others through an awareness of the ethical and societal issues involved in the use of technology. Students who acquire technology skills in this environment will become self-directed learners who can independently and cooperatively apply technology to solve problems and make ethically informed decisions. Technology should be used in every classroom environment to enhance, enrich, and extend the existing curriculum. The classroom teacher, the media specialist and the technology coordinator should collaborate to maximize the effective use of technology in support of the Diocesan curriculum.

<b>Georgia Standards Overview</b>		
<p><b>Standard 1: Fundamentals of Technology</b></p> <p>Students understand the operations and function of technology systems and are proficient in the use of technology.</p>	<p>Pre-K - Grade 1 Grades 2-3 Grades 4-6 Grades 7-8</p>	<p>Page 3 Page 8-9 Page 15 Page 23-24</p>
<p><b>Standard 2: Social and Ethical Implications of Technology</b></p> <p>A student recognizes the appropriate uses of information and information technology.</p>	<p>Pre-K - Grade 1 Grades 2-3 Grades 4-6 Grades 7-8</p>	<p>Page 4 Page 10 Page 16-17 Page 25-26</p>
<p><b>Standard 3: Technology as a Productivity Tool</b></p> <p>Students use technology tools to enhance learning, to increase productivity and creativity, to construct technology enhanced models, to prepare publications and to produce other creative works.</p>	<p>Pre-K - Grade 1 Grades 2-3 Grades 4-6 Grades 7-8</p>	<p>Page 5 Page 11 Page 18-19 Page 27-29</p>
<p><b>Standard 4: Technology as a Communication Tool</b></p> <p>Building on productivity tools, students collaborate, publish and interact with peers, experts and other audiences by using telecommunications and media.</p>	<p>Pre-K - Grade 1 Grades 2-3 Grades 4-6 Grades 7-8</p>	<p>Page 6 Page 12 Page 20 Page 30</p>
<p><b>Standard 5: Technology as a Research Tool</b></p> <p>Students utilize technology based research tools to locate and collect information pertinent to the task, as well as evaluate and analyze information from a variety of sources.</p>	<p>Pre-K - Grade 1 Grades 2-3 Grades 4-6 Grades 7-8</p>	<p>Page 7 Page 13 Page 21 Page 30</p>
<p><b>Standard 6: Technology as a Problem Solving/Decision Making Tool</b></p> <p>Students use technology to make and support decisions in the process of solving real-world problems.</p>	<p>Pre-K - Grade 1 Grades 2-3 Grades 4-6 Grades 7-8</p>	<p>N/A Page 14 Page 22 Page 32</p>
<p><b>Appendixes</b></p> <p>Basic Procedure Checklist, Word Processing Checklist, Spreadsheet Checklist, Presentation/Graphics Checklist, Presentation/Graphics Rubric, Keyboarding Rubric</p>		<p>Pages 34-39</p>

**Basic Fundamentals of Technology - Grades Pre-K - 1**

**Corresponding GA Standard: K-1:5, 1-1:5**

**COMPETENCY GOAL: Students understand the operations and function of technology systems and are proficient in the use of technology.**

**VALUES AND BENEFITS:**

- Self-directed, continuous learning
- Enhanced personal growth

**VOCABULARY:** mouse, keyboard, monitor, toolbar, menu, window, folder, shift, delete, backspace, spacebar, arrow keys, icon, scanner, camera, spreadsheet, word processor, cassette player, CD player versus DVD versus video tape, video camera, CPU, printer, remote control, microphone, icon, disk, disk drive, software, headphones, bar code reader, cables, outlets, projector

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p>1. Communicate about technology using developmentally appropriate and accurate terminology</p> <p>2. Use input devices and output devices successfully to operate technologies</p> <p>3. Demonstrate functional operation of technology components</p> <p>4. Understand uses of Technology and communication tools in the home and in the community.</p>	<p><b>1</b> Use basic vocabulary related to technology</p> <p><b>1.1</b> Identify the components of a computer (e.g., mouse, keyboard, monitor, CPU, printer)</p> <p><b>2</b> Implement start up and shut down procedures of basic technology components (e.g., computers, tape recorders, cassette players, VCRs)</p> <p><b>2.1</b> Use devices to complete a task (e.g., mouse, keyboard, printer)</p> <p><b>3</b> Exhibit correct ergonomic use of technology (e.g., correct posture)</p> <p><b>3.1</b> Use multimedia resources (e.g., educational software)</p> <p><b>3.2</b> Access information sources (e.g., CD-ROMs, pre-bookmarked internet sites)</p> <p><b>3.3</b> Understand proper hygiene when using technology equipment</p> <p><b>4</b> Understand safety precautions concerning sharing personal information.</p>	<p>Observation: mouse control - drag and drop</p> <p>Observation: mouse control - control position; one click</p> <p>Color a picture of computer, or label computer parts</p>	<p>Math and literacy activities at: <a href="http://www.internet4classrooms.com/month2month.htm">www.internet4classrooms.com/month2month.htm</a></p> <p><a href="http://www.littleg.com/shockwave/loading.html">www.littleg.com/shockwave/loading.html</a></p> <p>I Spy Jr. (<a href="http://www.scholastic.com">www.scholastic.com</a>)</p> <p>Claris Works for Kids (Mac) or Kids Pix (PC)</p> <p>GA United Streaming ( free availability)</p>

<b>Social and Ethical Implications of Technology Grades Pre-K - 1</b>	<b>Corresponding GA Standard: K-9,1-10</b>
<b>COMPETENCY GOAL:</b> Students understand the social, ethical and human issues related to using technology in their daily lives and demonstrate responsible use of technology systems, information and software.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Cultivation of ethical and responsible behavior <input type="checkbox"/> Respect for the work of others	

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
<p>1. Work cooperatively and collaboratively when using technology in the classroom</p> <p>2. Practice responsible use of technological devices</p> <p><i>Grades: K and 1 only:</i></p> <p>3. Demonstrate respect for other students while using technology</p> <p>4. Practice responsible use of software and equipment.</p>	<p><b>1</b> Demonstrate respect for other students while using technology (e.g., take turns, share resources)</p> <p><b>1.1</b> Demonstrate appropriate behavior when using technology (e.g., using only your documents or folders)</p> <p><b>2</b> Operate equipment to ensure equipment is not harmed (e.g., do not bang on keys; no food or objects near equipment; care for disks and CD -ROM; use proper shut down procedures)</p> <p><b>2.1</b> Recognize that damaging school equipment is destroying public property</p> <p><b>3</b> Recognize that changing someone's work without permission is unacceptable</p> <p><b>4</b> Describe and practice respect for other students while using technology (do not copy software or documents without permission; do not erase or damage files)</p> <p><b>4.1</b> Use equipment appropriately</p>	<p>Observation</p> <p>Post rules</p>	<p>Log in/out of individual user name or group name to the network</p>

<b>Technology as a Productivity Tool - Grades Pre-K - 1</b>	<b>Corresponding GA Standard: K-6:7, 1-6:8</b>
<b>COMPETENCY GOAL:</b> Students use technology tools to enhance learning, to increase productivity and creativity and to construct technology - enhanced models, prepare publications and produce other creative works.	
<b>VALUES AND BENEFITS:</b>	
<input type="checkbox"/> Improved academic performance <input type="checkbox"/> Adaptable to student learning needs	

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p>1. Utilize technology tools to facilitate writing and drawing process with teacher guidance.</p> <p><i>Grade 1 only:</i></p> <p>2. Use prescribed technology tools for publishing and presenting</p> <p><i>Grades K and 1 only</i></p> <p>3. Use technology to create charts and graphs with teacher guidance.</p>	<p><b>1</b> Create a picture story using a drawing program with support from teacher, family members or student partner</p> <p><b>1.1</b> Use a drawing program to add name and words to illustrations</p> <p><b>2</b> Use a pre -designed template or stationery to publish a document (e.g., newsletter, greeting card, certificate)</p>	<input type="checkbox"/> Match upper/lower case letters <input type="checkbox"/> Write the alphabet <input type="checkbox"/> Practice writing their name(s) <input type="checkbox"/> Have students make cards for holidays	<p>Paint</p> <p>Claris Works for Kids (Mac) or Kids Pix (PC)</p> <p>Kidspiration</p> <p>Learn to Read at Starfall  <a href="http://www.literacycenter.net">www.literacycenter.net</a>  <a href="http://www.starfall.com">www.starfall.com</a>  <a href="http://www.janbrett.com">www.janbrett.com</a>  <a href="http://www.pbskids.org">www.pbskids.org</a></p> <p>Bailey's Book House Software          Millie's Math House Software          (<a href="http://www.edmark.com">www.edmark.com</a>)</p> <p><a href="http://www.enchantedlearning.com">www.enchantedlearning.com</a>  <a href="http://www.rif.com">www.rif.com</a>          Best Math Program Ever          Best Reading Program Ever          (Simon &amp; Schuster Interactive)          Thinkin' Things Collection 1 &amp; 2          (<a href="http://www.edmark.com">www.edmark.com</a>)          Graph Club</p>

<b>Technology as a Communication Tool - Grades Pre-K - 1</b>	<b>Corresponding GA Standard: 1-9</b>
<b>COMPETENCY GOAL:</b> Building on productivity tools, students will collaborate, publish and interact with peers, experts, and other audiences using telecommunications and media.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Collaborative problem solving <input type="checkbox"/> Project-based learning	<b>VOCABULARY:</b> e-mail

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
Grade 1 only: 1. Use technology to gather information 2. Communicate with others and express ideas.	<b>1</b> Communicate information electronically with support from teachers, family members or student partners (e.g., online projects, epals, etc.)		<a href="http://www.epals.com">www.epals.com</a>  <a href="http://www.kids-learn.org">www.kids-learn.org</a>

<b>Technology as a Research Tool - Grades Pre-K - 1</b>	<b>Corresponding GA Standard: 1-11,12</b>
<b>COMPETENCY GOAL:</b> Students use technology -based research tools to locate and collect information pertinent to the task, as well as evaluate and analyze information from a variety of sources.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Improved organization and planning (WebQuests, etc.) <input type="checkbox"/> Increased quality and quantity of resources	<b>VOCABULARY:</b> Web page, websites, URL's , Encyclopedias

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
Grade 1 only: 1. Use basic research techniques with teacher guidance  2. Utilize appropriate software or tools in problem solving	<b>1</b> Identify potential sources of information about a topic (e.g., Web pages, CD -ROMs)  <b>2</b> Identifies technology tools to find current information to solve problems	Observe student's use with teacher guidance  Find the current population of a specific city, country.	<a href="http://www.abc.net.au/schoolstv/animals/">www.abc.net.au/schoolstv/animals/</a> <a href="http://www.enchantedlearning.com">www.enchantedlearning.com</a> <a href="http://www.discoverykids.com">www.discoverykids.com</a> <a href="http://www.zooweb.com">www.zooweb.com</a> <a href="http://kids.msfc.nasa.gov">http://kids.msfc.nasa.gov</a>
<b>Fundamentals of Technology - Grades 2- 3</b>		<b>Corresponding GA Standard: 2-1:5, 3-1:5</b>	



<b>COMPETENCY GOAL:</b> Students understand the operations and function of technology systems and are proficient in the use of technology.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Self-directed, continuous learning <input type="checkbox"/> Enhanced personal growth	<b>VOCABULARY:</b> CPU, Monitors, Keyboard, Mouse, Printer, Headphones, Fax, Speakers, CD-ROM, Internet, Telephone, Point, Click, Reboot, Shut Down, Drag, Minimize, Maximize

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p>1. Communicate about internal technology operations using developmentally appropriate and accurate terminology</p> <p>2. Demonstrate functional operation of technology components</p>	<p><b>1</b> Use basic vocabulary related to internal operations of the technology (e.g. CPU, Monitor, Keyboard, Mouse, Printer, Headphones, Fax, Speakers, CD-ROM, Internet, Telephone, Point Click, Reboot, Shut Down, Drag, Minimize, Maximize</p> <p><b>1.1</b> Demonstrate correct ergonomic use of technology (e.g., correct posture, hand and feet position, proper height of keyboard, proper lifting and moving of equipment)</p> <p><b>2.1</b> Use multimedia resources (e.g., interactive books, educational software)</p> <p><b>2.2.</b> Access information sources (e.g., CD -ROMS, encyclopedias, dictionaries, pre – bookmarked internet sites)</p> <p><b>2.3</b> Communicate electronically under appropriate supervision (e.g., video, audio, email)</p>	<p>See Keyboarding Rubric for scoring posture, hand and feet position, proper height of keyboard, etc.</p> <p>Demonstrate use of interactive books, educational software and elementary multimedia encyclopedias</p> <p>Pre-bookmarked Internet sites- for 2<sup>nd</sup> grade. 3<sup>rd</sup> grade can type in internet sites. Software from CD -ROM</p>	<p>Computer &amp; Internet Dictionary by Philip Margolis, creator of  <a href="http://www.pcwebopedia.com">www.pcwebopedia.com</a>  <a href="http://www.dictionary.com">www.dictionary.com</a></p> <p>Type to Learn, Jr. Type to Learn (3<sup>rd</sup> grade) Ultra Key (2<sup>nd</sup> and 3rd grade)</p> <p><a href="http://www.learningplanet.com">www.learningplanet.com</a>  <a href="http://www.pbskids.org">www.pbskids.org</a>  <a href="http://www.multiplication.com">www.multiplication.com</a>  <a href="http://www.brainpop.com">www.brainpop.com</a></p> <p>Oregon Trail Math Blaster</p>

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p><b>Basic Skills Fundamentals of Technology - Grades 2-3 Continued</b></p> <p>3. Use developmentally appropriate technology resources to access information and communicate electronically</p>	<p><b>3.</b> Operate keyboard and other common input and output devices (including adaptive devices for special needs when necessary)</p> <p>(a) Use device in response to software (e.g., point and click, arrow and enter/return keys)</p> <p>(b) Use keyboard effectively (e.g., knows locations and functions of keys; begins touch-typing strategies by grade three)</p> <p><b>3.1</b> Retrieve and save information</p> <p><b>3.2</b> Print documents, text or image</p>		

<b>Social and Ethical Implications of Technology - Grades 2- 3</b>	<b>Corresponding GA Standard: 2-11, 3-11:13</b>
<b>COMPETENCY GOAL:</b> Students understand the social, ethical and human issues related to using technology in their daily lives and demonstrate responsible use of technology systems, information and software.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Cultivation of ethical and responsible behavior <input type="checkbox"/> Respect for the work of others	

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
<p>1. Demonstrate respect for other students while using technology</p> <p>2. Practice responsible use of Software</p> <p>3. Discuss common uses of technology in daily life and the advantages and disadvantages those uses provide</p> <p>4. Describe use of technology in the environment around them (e.g., computer in the grocery store)</p> <p>5. Describe basic care of computers</p> <p>6. Discuss the basic understanding of personal safety on the computer.</p>	<p><b>1.</b> Describe and practice respect for other students while using technology (e.g., allow peers to work uninterrupted; do not erase or damage files, documents or projects)</p> <p><b>2.</b> Use equipment appropriately (e.g., use for assignments and school work versus personal pleasure)</p> <p><b>2.1</b> Describe and practice legal and ethical behaviors when using technology (e.g., do not copy, alter, delete, or move another person’s work)</p> <p><b>3.</b> Demonstrate and practice safe and correct security procedures (e.g., protect password)</p> <p><b>3.1</b> Describe 3 to 5 uses of technology in daily life</p> <p><b>4.</b> Discuss positive and negative impact of technologies such as television and computers on daily life (e.g., negative health impacts; safe Internet use- such as knowing what information is safe to share when using email or “chatting” with strangers)</p> <p><b>5.</b> Trouble shooting (e.g., headphones are too loud, software stops running/freezes</p> <p><b>6.</b> What one can/cannot share online</p>	<p>Observe student interaction and discuss appropriate respect versus inappropriate (disrespect for others)</p> <p>Evaluate student use of equipment and verbalize legal/ethical behaviors</p> <p>Assess student demonstrations of security procedures</p> <p>Quantify and share student responses</p> <p>Observe participation of students in discussion of impacts of technology</p>	<p>Get a Web License:  <a href="http://pbskids.org/license">http://pbskids.org/license</a>  <a href="http://www.cybersmartkids.com.au/">http://www.cybersmartkids.com.au/</a></p> <p>Adventures in Internet Safety  <a href="http://home.disney.go.com/guestservices/safety">http://home.disney.go.com/guestservices/safety</a>  <a href="http://www.becybersmart.org">www.becybersmart.org</a></p>

<b>Technology as a Productivity Tool – Grades 2- 3</b>	<b>Corresponding GA Standard: 2-6: 9, 3-6:9</b>
<b>COMPETENCY GOAL:</b> Students use technology tools to enhance learning, to increase productivity and creativity and to construct technology – enhanced models, prepare publications and produce other creative works.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Improved academic performance <input type="checkbox"/> Adaptable to student learning needs	

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p>1. Use technology writing or drawing tools for communicating and illustrating</p> <p>2. Use technology tools for data collection and basic analysis</p> <p>3. Use technology tools for publishing and presenting information</p> <p>4. Use appropriate keyboarding to learn proper finder techniques.</p> <p>5. Use computer drawing to enhance graphics on computer.</p>	<p><b>1.</b> Use word processing to create a document and, where developmentally appropriate, use editing tools</p> <p><i>3<sup>rd</sup> Grade Only</i></p> <p><b>1.</b> Insert a graphic into a word processing document</p> <p><b>2.</b> Perform simple data analysis (e.g., teach graphing without Excel)</p> <p><b>3.</b> Use a pre-designed template or stationery to publish a document (e.g., newsletter)</p> <p><b>4.</b> Teach basic keys (e.g., home row)</p> <p><b>4.1</b> Begin formal keyboard training</p> <p><b>5.</b> Create pictures to go along with assignments in Paint It or Kids Pix</p>	<p>Students write stories and essays</p> <p>Students research and write skits</p> <p>Write news articles, flyers, newsletters</p> <p>Evaluate completeness of documents and projects</p>	<p>Microsoft Office Online:  <a href="http://www.abbyandtess.com">www.abbyandtess.com</a></p> <p>Microsoft Kids:  Paint It</p> <p>Kids Pix</p> <p>Image Writer</p>

<b>Technology as a Communication Tool – Grades 2- 3</b>	<b>Corresponding GA Standard: 2-10, 3-10</b>
<b>COMPETENCY GOAL:</b> Building on productivity tools, students will collaborate, publish and interact with peers, experts, and other audiences using telecommunications and media.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Collaborative problem solving <input type="checkbox"/> Project-based learning	<b>VOCABULARY:</b> Webpage, fax machine

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p>1. Communicate with others using telecommunications, with support from teachers, family members, or student partners</p> <p>2. Use technology tools for individual and collaborative communication activities to share products with audiences inside and outside the classroom</p>	<p><b>1.</b> Communicate information electronically with support from teachers, family members, or student partners (e.g., Web page, fax machine)</p> <p><b>2.</b> Plan, design, and present an academic product to classroom or community (e.g., slide show, progressive story, drawings, story illustrations, digital images)- 3<sup>rd</sup> grade</p>	<p>Evaluate student communication skills using electronic means</p> <p>Observe student presentations for accuracy, completeness, appropriateness, creativity</p>	<p><a href="http://www.flatstanley.com">www.flatstanley.com</a></p> <p>Kid Pix</p>

<b>Technology as a Research Tool – Grades 2- 3</b>	<b>Corresponding GA Standard: 2-12, 3-13</b>
<b>COMPETENCY GOAL:</b> Students use technology –based research tools to locate and collect information pertinent to the task, as well as evaluate and analyze information from a variety of sources.	
<b>VALUES AND BENEFITS:</b>	
<input type="checkbox"/> Improved organization and planning (WebQuests, etc.) <input type="checkbox"/> Increased quality and quantity of resources	

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
1. Locate information from electronic sources	<ol style="list-style-type: none"> <li>1. Identify potential sources of information about a topic (e.g., video tape, Web pages, CD-ROMs)</li> <li>2. Locate information in a resource selected by a teacher (e.g., Web page, CD -ROM)</li> <li>3. Locate websites and discuss if they are valid websites. Based on facts? It is current information?</li> </ol>		<a href="http://www.yahooligans.com">www.yahooligans.com</a> <a href="http://www.ithaki.net/kids/">www.ithaki.net/kids/</a> <a href="http://www.britannica.com">www.britannica.com</a> Encyclopedia of Nature Encyclopedia of Science

<b>Technology as Problem Solving/Decision Making Tool - Grades 2- 3</b>	<b>Corresponding GA Standard: 2-13, 3-14</b>
<b>COMPETENCY GOAL:</b> Students use technology to make and support decisions in the process of solving real -world problems.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Interactive value of technology <input type="checkbox"/> Increased availability of resources (universities, expert systems, etc.)	

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
<p>1. Use technology resources for problem-solving, self-directed learning, and extended learning activities</p>	<p><b>1.</b> Based on a class -defined problem, use technology to:</p> <ul style="list-style-type: none"> <li>a) collect data</li> <li>b) interpret data</li> <li>c) express a solution to the problem</li> </ul> <p><b>1.1</b> Based on a problem selected by the student, use technology to :</p> <ul style="list-style-type: none"> <li>a) collect data</li> <li>b) interpret data</li> <li>c) express a solution to the problem</li> </ul>	<ul style="list-style-type: none"> <li>a) Quantify amount and quality of data collected in response to class-defined or student selected problem</li> <li>b) Identify student's data interpretation and the technology tools used</li> <li>c) Have student verbalize solution and then use word -processing or presentation software to express solution</li> </ul>	<p>Microsoft Word, Excel, PowerPoint</p> <p>Internet or software resources</p>

<b>Fundamentals of Technology - Grades 4- 6</b>	<b>Corresponding GA Standard: 4-1:5. 5-1:5. 6-1:5</b>
<b>COMPETENCY GOAL:</b> Students understand the operations and function of technology systems and are proficient in the use of technology.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Self-directed, continuous learning <input type="checkbox"/> Enhanced personal growth	<b>VOCABULARY:</b> USB, parallel, serial, scanning, OCR, network Internet, Intranet, LAN, WAN, Ethernet, firewall, server, TCP -IP, peripheral devices, on-line help, search engine, domain, http, www, wifi, hotspot

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
<p>1. Communicate about technology using developmentally appropriate and accurate terminology</p> <p>2. Demonstrate increasingly sophisticated operation of technology components</p> <p>3. When a system is not working properly, demonstrate understanding of hardware, software and connectivity problem solving processes</p>	<p><b>1.1</b> Use basic vocabulary related to technology</p> <p><b>1.2</b> Use basic vocabulary related to systems</p> <p><b>2</b> Use touch typing strategies to reach a minimum of 15 Words Per Minute (WPM) while meeting school -identified standard for accuracy (4<sup>th</sup>-15, 5<sup>th</sup>-20, 6<sup>th</sup>-25)</p> <p><b>2.1</b> Retrieve and save information remotely (e.g., network servers, Internet, Intranet, peripheral devices)</p> <p><b>3</b> Demonstrate functional operation of technology devices (e.g., presentation devices, digital cameras, scanners, document cameras, scientific probes)</p> <p><b>3.1</b> Use troubleshooting strategies to solve</p> <ol style="list-style-type: none"> <li>1. Application problems</li> <li>2. Hardware problems</li> <li>3. Basic connectivity problems</li> </ol>	<p>Keyboarding Rubric (Appendix)</p> <p>Per teacher observation</p> <p>Per teacher observation</p>	<p><a href="http://www.intel.com/education/journey/index.htm">http://www.intel.com/education/journey/index.htm</a></p> <p>Software:  Mavis Beacon Teaches  Type to Learn (Sunburst)  Ultra Key Or Teacher Created  Drills  Typing Instructor Deluxe  <a href="http://www.bbc.co.uk/schools/typing/">http://www.bbc.co.uk/schools/typing/</a></p>



<b>Social and Ethical Implications of Technology - Grades 4- 6</b>	<b>Corresponding GA Standard: 4-11:13, 5-11:13, 6-12-15</b>
<b>COMPETENCY GOAL:</b> Students understand the social, ethical and human issues related to using technology in their daily lives and demonstrate responsible use of technology systems, information and software.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Cultivation of ethical and responsible behavior <input type="checkbox"/> Respect for the work of others	<b>VOCABULARY:</b> Cyber bullying, MP3, piracy, shareware, computer viruses, copyright laws, chat rooms, privacy, PDA, Moore’s Law, webcam

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
<p>1. Discuss basic issues related to responsible use of technology and information and describe personal consequences of inappropriate use</p> <p>2. Exhibit legal and ethical behaviors when using technology and information and discuss consequences of misuse</p>	<p><b>1</b> Explain the purpose of an Acceptable Use Agreement / Policy and the consequences of inappropriate use</p> <p><b>1.1</b> Describe and practice safe Internet/Intranet usage</p> <p><b>1.2</b> Describe and practice "netiquette" when using the Internet and electronic mail</p> <p><b>1.3.</b> Cyber Bullying</p> <p><b>2</b> Follow the rules for deciding when permission is needed for using the work of others</p> <p><b>2.1</b> Obtain permission to use work of others</p> <p><b>2.2</b> Provide complete citations from electronic media</p>	<p>Interactive Exercise - Get a Web License--  <a href="http://pbskids.org/license">http://pbskids.org/license</a></p> <p>Review and discuss the social and emotional implications of Cyber Bullying</p> <p>Include permission letter(s) in at least one product during the year</p>	<p>Review Diocese of Savannah Computer &amp; Information Resources Acceptable User Policy</p> <p><a href="http://www.cybersmartkids.com.au/">www.cybersmartkids.com.au/</a></p> <p>Internet Safety Section --  <a href="http://www.internet101.org/">www.internet101.org/</a>  <a href="http://www.protectkids.com/youthsafety/index.htm">www.protectkids.com/youthsafety/index.htm</a></p> <p>MLA Style Electronic Formats --  <a href="http://www.westwords.com/guffey/mla.html">www.westwords.com/guffey/mla.html</a></p> <p>Copyright Bay and Fair Use Harbor --  <a href="http://www.stfrancis.edu/cid/copyrightbay/index.htm">www.stfrancis.edu/cid/copyrightbay/index.htm</a></p>

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p><b>Social and Ethical Implications of Technology - Grades 4-6 Continued</b></p> <p>3. Demonstrate knowledge of current changes in technologies and effect those changes have on the workplace and society</p>	<p><b>2.3</b> Explain copyright laws and "fair use" Guidelines (stealing)</p> <p><b>2.4</b> Describe copyright guidelines for multimedia creation and Internet development</p> <p><b>2.5</b> State personal consequences (e.g., fines, loss of privileges, grade reduction, academic probation) related violations of:</p> <ul style="list-style-type: none"> <li>(a) Copyright (e.g., sheet music, prerecorded music, print, video, images)</li> <li>(b) Password security</li> <li>(c) Privacy (e.g., student files on a network, CD's flash drive and hard drive)</li> <li>(d) Internet usage (e.g., inappropriate postings, accessing inappropriate material)</li> </ul> <p><b>2.6</b> Discuss the negative impact of unauthorized intrusions</p> <p><b>2.7</b> Including PDA's cell phones and webcam</p> <p><b>3</b> Compare information technologies from past to present and describe the implications of computer power doubling every 18 months (Moore's Law) (e.g., size, speed, cost)</p> <p><b>3.1</b> Describe the impact of technology use on individuals at home and in the workplace</p> <p><b>3.2</b> Discuss the social implications of the "digital divide"</p>	<p>Annually, Bi-annually, or Quarterly review of acceptable use policy</p> <p>Review and discuss examples of technology copyright issues in multiple industries from overview at: <a href="http://www.benedict.com/">http://www.benedict.com/</a></p> <p>Review and discuss impacts of Technology through various Online Exhibits and Archives at: <a href="http://www.thetech.org/exhibits/online/">www.thetech.org/exhibits/online/</a></p> <p>Participate in PBS Digital Divide Project found at: <a href="http://www.pbs.org/digitaldivide/">http://www.pbs.org/digitaldivide/</a></p>	<p>Security and Ethics Unit at <a href="http://www.kidzonline.com/TechTraining/">www.kidzonline.com/TechTraining/</a></p> <p><a href="http://www.pbs.org/wgbh/amex/telephone/timeline/">www.pbs.org/wgbh/amex/telephone/timeline/</a></p> <p>Science Odyssey <a href="http://www.bps.org/wgbh/aso/">http://www.bps.org/wgbh/aso/</a></p> <p>AZ Standards Recommended links: <a href="http://literacy.kent.edu/Oasis/Workshops/copytoc.html">http://literacy.kent.edu/Oasis/Workshops/copytoc.html</a> and <a href="http://www.copyright.gov/circs/">http://www.copyright.gov/circs/</a></p>

<b>Technology as a Productivity Tool - Grades 4- 6</b>	<b>Corresponding GA Standard: 4-6:9, 5-6:9, 6-6:11</b>
<b>COMPETENCY GOAL:</b> Students use technology tools to enhance learning, to increase productivity and creativity and to construct technology - enhanced models, prepare publications and produce other creative works.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Improved academic performance <input type="checkbox"/> Adaptable to student learning needs	<b>Vocabulary:</b> Toolbar, Excel definitions, cells, columns, rows, predictions, graphs

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p>1. Use formatting capabilities of technology tools for communicating and illustrating</p>	<p><b>1</b> Use word processing editing tools to revise a document</p> <p><b>1.1</b> Design a word processing document with graphical elements</p>	<p>Word Processing Checklist (Appendix)</p> <p>Microsoft Word Templates (Newsletters, letters, reports, etc.)  <a href="http://office.microsoft.com">http://office.microsoft.com</a></p> <p>Demonstrate use of cut and paste, tabs and margins, font size, font style, delete and undo, selecting, spell check, click and drag</p> <p>Demonstrate beginner skills in using clip art, digital photographs, symbols, text wrap, cropping, sizing, and other drawing tools</p>	<p>Microsoft Word Publisher (optional)</p> <p>Word Processing Help in menu bar or icons</p> <p>Kidspiration or Inspiration</p> <p>See documentation of instrument or Web site help on Internet</p> <p>On-line weather cams at <a href="http://www.wetterklima.de/cams/camera_ngl.htm">www.wetterklima.de/cams/camera_ngl.htm</a></p>
<p>2. Use a variety of technology tools for data collection and analysis</p>	<p><b>2</b> Use technology devices to collect and record Data</p>		

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p><b>Technology as a Productivity Tool - Grades 4-6 Continued</b></p> <p>3. Publish and present information using technology tools</p> <p>4. Use technology tools to support system analysis and modeling</p>	<p><b>2.1</b> Create and use a spreadsheet to analyze data</p> <p><b>2.2</b> Create a database with multiple fields to manipulate data in a variety of ways</p> <p><b>3</b> Design and create a multimedia presentation or Web page using multiple digital sources</p> <p><b>3.1</b> Publish or present the above production</p> <p><b>4</b> Manipulate several variables in a computer simulation to reach a desired outcome</p>	<p>Spreadsheet Checklist (Appendix)</p> <p>Begin use of spreadsheets, Access, or Excel to analyze data (e.g., formulas, charts, graphs)</p> <p>(OPTIONAL) Demonstrate use of a database with multiple fields to manipulate data (e.g., sort, merge, list, report)</p> <p>Create a multimedia presentation or Web Page using at least one digital source (e.g., camera, video, scanner, Audio, Internet)</p> <p>Students create simple spreadsheet designed to demonstrate manipulation of a variable</p>	<p>Excel, Access, Graph Club, PowerPoint</p>

<b>Technology as a Communication Tool - Grades 4- 6</b>	<b>Corresponding GA Standard: 4-10, 5-10, 6-12:14</b>
<b>COMPETENCY GOAL:</b> Building on productivity tools, students will collaborate, publish and interact with peers, experts, and other audiences using telecommunications and media.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Collaborative problem solving <input type="checkbox"/> Project-based learning	<b>Vocabulary:</b> PowerPoint, multimedia, projectors, LCD, interactive boards, and graphic tablet

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p>1. Use telecommunications efficiently and effectively to access remote information and communicate with others in support of facilitated and independent learning</p> <p>2. Use technology tools for individual and collaborative writing, communication and publishing activities to create curricular related products for audiences inside and outside the classroom</p> <p>3. Collaboratively use telecommunications and online resources</p>	<p><b>1</b> Communicate independently via e-mail, Internet (Optional videoconference with people in a remote location)</p> <p><b>2</b> Plan, design and present an academic product using technology tools</p> <p><b>3</b> Request collaborative exchanges among people in local and/or remote locations</p> <p><b>3.1</b> Communicate electronically to collaborate with experts, peers and others to analyze data and/or develop an academic product</p> <p><b>3.2</b> Present an academic product to share data and/or solutions</p>	<p>Communicate with teachers and peers through Intra/Internet</p> <p>Presentation/Graphics Checklist (Appendix)</p> <p>Incorporate collaborative exchange with students in another state or country into social studies, language, etc. project each year</p>	<p><a href="http://www.epals.com">www.epals.com</a></p> <p>HyperStudio Smart Board ACTIVBOARD</p> <p><a href="http://www.epals.com/">http://www.epals.com/</a></p> <p>Microsoft PowerPoint</p> <p>Multimedia Educational Resource for Learning and Online Teaching <a href="http://www.merlot.org">www.merlot.org</a></p> <p>(teacher resource for locating sources for collaborative exchange)</p>

<b>Technology as a Research Tool - Grades 4- 6</b>	<b>Corresponding GA Standard: 4-13, 5-13, 6-16</b>
<b>COMPETENCY GOAL:</b> Students use technology -based research tools to locate and collect information pertinent to the task, as well as evaluate and analyze information from a variety of sources.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Improved organization and planning (WebQuests, etc.) <input type="checkbox"/> Increased quality and quantity of resource	<b>VOCABULARY:</b> Boolean logic, plagiarism, work cited, MLA, APA

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
1. Locate information from electronic resources	<b>1</b> Identify electronic research resources <b>1.1</b> Define subject searching and devise a search strategy to locate information using available electronic research resources <b>1.2</b> Explain the difference between subject and keyword searching <b>1.3</b> Construct keyword searches including basic Boolean logic using available electronic research resources <b>1.4</b> Identify the author, copyright date and publisher of information located in electronic Internet resources	Online WebQuest on General Web Search Tools: <a href="http://www.kn.pacbell.com/wired/21stcent/lgensearch.html">www.kn.pacbell.com/wired/21stcent/lgensearch.html</a>  Demonstrate beginner skills in subject searching on child appropriate search engine	On-line encyclopedias: <a href="http://www.worldbook.com">www.worldbook.com</a> <a href="http://www.encyclopedia.com">www.encyclopedia.com</a> (Britannica) <a href="http://school.eb.com">http://school.eb.com</a>  <a href="http://www.refdesk.com">www.refdesk.com</a>  Kathy Schrock's Guide for Educators (PowerPoint lessons available) <a href="http://school.discovery.com/schrockguide/shows.html">http://school.discovery.com/schrockguide/shows.html</a>
2. Evaluate the accuracy, relevance, appropriateness, comprehensiveness and bias of electronic information sources	<b>2</b> Create citations for electronic research sources following a prescribed format <b>2.1</b> Gather research from a variety of electronic sources and identify the most appropriate information for answering the research question <b>2.2</b> Obtain permission, when appropriate, to use the work of others <b>2.3</b> Identify the components of a URL to determine the source of information <b>2.4</b> Identify the author of the information found from electronic resources and determine whether the author is an authority, displays bias and is a primary or secondary source		(kids) <a href="http://www.askkids.com/">http://www.askkids.com/</a>   <a href="http://www.apastyle.org/electmedia.html">http://www.apastyle.org/electmedia.html</a>

<b>Technology as Problem Solving/Decision Making Tool - Grades 4- 6</b>	<b>Corresponding GA Standard: 4-14, 5-14, 6-17</b>
<b>COMPETENCY GOAL:</b> Students use technology to make and support decisions in the process of solving real -world problems.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Interactive value of technology <input type="checkbox"/> Increased availability of resources (universities, expert systems, etc.)	<b>VOCABULARY:</b> Expert systems, artificial intelligence, wizard

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
1. Determine when technology is useful and select and use the appropriate tools and technology resources to solve problems	<b>1</b> Based on a problem selected by the student, identify and use appropriate technology tools to <ul style="list-style-type: none"> <li>a) collect data</li> <li>b) interpret data</li> <li>c) develop a solution to the problem</li> <li>d) present findings</li> </ul>	<p>Students explore advantages of expert system resources in the field of health at Web sites that articulate how these resources benefit society (e.g. Global warming, pollution, health issues, technology related issues like Cyber bullying)</p> <p>Students develop thesis statement, what they hope to accomplish and a list of terms prior to beginning research on the Internet</p>	<p><a href="http://www.seaturtle.org/tracking/">http://www.seaturtle.org/tracking/</a></p> <p><a href="http://www.epals.com/">http://www.epals.com/</a></p>

<b>Fundamentals of Technology - Grades 7- 8</b>	<b>Corresponding GA Standard: 7-1:5, 8-1:5</b>
<b>COMPETENCY GOAL:</b> Students understand the operations and function of technology systems and are proficient in the use of technology.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Self-directed, continuous learning <input type="checkbox"/> Enhanced personal growth	<b>VOCABULARY:</b> USB, scanning, network, infrastructure, Internet, Intranet, LAN, WAN, Ethernet, firewall, server, TCP-IP, peripheral devices, on-line help, use documentation

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p>1. Identify technology tools using developmentally appropriate and accurate terminology</p> <p>2. Manipulate the system capabilities and data</p> <p>3. Implement appropriate maintenance of all technology components</p> <p>4. Demonstrate increasingly sophisticated operation of technology components</p>	<p><b>1</b> Use basic vocabulary related to technology  <b>1.1</b> Use basic vocabulary related to systems</p> <p><b>2</b> Carry over skill from one application to another  <b>2.1</b> Carry over use of equipment from one brand to another</p> <p><b>3</b> Give students the opportunity to utilize, clean and store all technology equipment</p> <p><b>4</b> Use touch typing strategies to reach a minimum of 25 adjusted Words Per Minute  <b>4.1</b> Retrieve and save information remotely to network servers, Internet, Intranet, peripheral devices  <b>4.2</b> Demonstrate functional operation of technology devices (e.g., presentation devices, digital cameras, scanners, document cameral, scientific probes)</p>	<p>By end of Grade 8, meet school-identified standard for Words Per Minute and Accuracy Grading Scale</p> <p>Demonstrate how to access network servers, Internet, Intranet and peripheral devices</p> <p>Demonstrate the use of presentation devices, digital cameral, scanners, document cameras, scientific probes</p>	<p>Computer &amp; Internet Dictionary 3<sup>rd</sup> Edition by Philip E. Margolis  <a href="http://www.pcwebopedia.com">www.pcwebopedia.com</a> or online: <a href="http://www.dictionary.com">www.dictionary.com</a></p> <p>Keyboarding software such as Type to Learn, Mavis Beacon, UltraKey</p> <p>Timed 2or 3 minute typing tests</p> <p>20<sup>th</sup> Century Typewriting, 9<sup>th</sup> Edition by Lessenberry, Crawford, Erickson</p> <p>How the Internet Works 7<sup>th</sup> Edition by Preston Gralla</p> <p>How Computers Work 7<sup>th</sup> Edition by Ron White  <a href="http://www.kids-online.net">www.kids-online.net</a>  <a href="http://www.intel.com">www.intel.com</a></p>



OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p><b>Fundamentals of Technology - Grades 7- 8 Continued</b></p> <p>5. When a system is not working properly, demonstrate understanding of hardware, software and connectivity problem solving processes</p>	<p><b>5</b> Use troubleshooting strategies to solve</p> <ol style="list-style-type: none"> <li>1. Application problems</li> <li>2. Hardware problems</li> <li>3. Basic connectivity problems</li> </ol>	<p>Show troubleshooting strategies to solve application, hardware, and basic connectivity problems through the use of file management strategies, online help strategies, software documentation, help menus and collaboration with others</p>	<p>Help features in menu bar or icon options for application software</p> <p>And/or</p> <p>Documentation on how to contact technical support or on-line FAQ</p> <p>And/or</p> <p>Identify online user-net or list-serve groups for possible assistance</p>

<b>Social and Ethical Implications of Technology - Grades 7- 8</b>	<b>Corresponding GA Standard- 7-14&amp;15, 8-16&amp;17</b>
<b>COMPETENCY GOAL:</b> Students understand the social, ethical and human issues related to using technology in their daily lives and demonstrate responsible use of technology systems, information and software.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Cultivation of ethical and responsible behavior <input type="checkbox"/> Respect for the work of others	

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
<p>1. Discuss basic issues related to responsible use of technology and information and describe personal consequences of inappropriate use</p> <p>2. Exhibit legal and ethical behaviors when using technology and information and discuss consequences of misuse</p>	<p><b>1</b> Explain the purpose of an Acceptable User Agreement / Policy and the consequences of inappropriate use</p> <p><b>1.1</b> Describe and practice safe Internet/Intranet usage</p> <p><b>1.2</b> Describe and practice "netiquette" when using the Internet and electronic mail</p> <p><b>2</b> Follow the rules for deciding when Permission is needed for using the work of others</p> <p><b>2.1</b> Obtain permission to use work of others</p> <p><b>2.2</b> Provide complete citations from electronic media</p>	<p>Explain/discuss why Acceptable User Agreement is important</p> <p>Rationalize what is inappropriate or harmful material; avoid revealing personal information; follow Diocesan Acceptable Use Policy</p> <p>List in detail appropriate versus inappropriate behavior while using the Internet or E-mail</p> <p>Determine if an Internet site specifies whether permission is required to copy or use its information, including photographs</p>	<p>Review Diocesan Computer &amp; Information Resources Acceptable Use Policy</p> <p><a href="http://www.cybersmartkids.com.au/">http://www.cybersmartkids.com.au/</a></p> <p>and</p> <p><a href="http://www.copyright.gov/circs/">http://www.copyright.gov/circs/</a></p>

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p><b>Social and Ethical Implications of Technology - Grades 7-8 Continued</b></p> <p>3. Demonstrate knowledge of current changes in technologies and effect those changes have on the workplace and society</p>	<p><b>2.3</b> Explain copyright laws and "fair use" guideline</p> <p><b>2.4.</b>Describe copyright guidelines for multimedia creation and Internet development</p> <p><b>2.5</b> State personal consequences (e.g., fines, loss of privileges, grade reduction, academic probation) related violations of:</p> <p>(a) Copyright (e.g., sheet music, prerecorded music, print, video, images)</p> <p>(b) Password security</p> <p>(c) Privacy (e.g., student files on a network, floppy disk and hard drive)</p> <p>(d) Internet usage (e.g., inappropriate postings, accessing inappropriate material)</p> <p><b>2.6</b> Discuss the negative impact of unauthorized intrusions</p> <p><b>3</b> Compare information technologies from past to present and describe the implications of computer power doubling every 18 months (Moore's Law) (e.g., size, speed, cost)</p> <p><b>3.1</b> Describe the impact of technology use on individuals at home and in the workplace</p> <p><b>3.2</b> Discuss the social implications of the "digital divide"</p>	<p>Explain/discuss why students should respect and follow all copyright laws</p> <p>Explain and illustrate age appropriate standardized reference formats for citing sources of information</p> <p>Review guidelines in relationship to print, video, computer software, multimedia project and music</p> <p>Warrant consequences such as fines, loss of privileges, grade reduction, academic probation in regards to violations of copyright laws, password security, privacy and Internet usage</p> <p>Show how to find computer information which pertains to a computer's processing speed, RAM, hard drive space and cost</p> <p>Compare and contrast technologies used in a home versus a workplace in regards to how a computer has replaced the TV for some individuals; free time is spent using technology versus outdoor activities; jobs have been created and/or eliminated due to technology advances; possible infringement of privacy</p> <p>Present/discuss pros and cons of homes and schools with much technology and connectivity versus those with less or none</p>	<p>Review Diocese of Savannah Computer &amp; Information Resources Acceptable Use Policy</p> <p>A History of Modern Computing 2<sup>nd</sup> Edition (History of Computing) by Paul E. Ceruzzi</p> <p><a href="http://www.pbs.org/wgbh/amex/television/timeline/">www.pbs.org/wgbh/amex/television/timeline/</a></p> <p><a href="http://www.thetech.org">www.thetech.org</a></p>

<b>Technology as a Productivity Tool - Grades 7- 8</b>	<b>Corresponding GA Standard: 7-6:11, 8 6:12</b>
<b>COMPETENCY GOAL:</b> Students use technology tools to enhance learning, to increase productivity and creativity and to construct technology - enhanced models, prepare publications and produce other creative works.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Improved academic performance <input type="checkbox"/> Adaptable to student learning needs	

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
<p>1. Use formatting capabilities of technology tools for communicating and illustrating</p>	<p><b>1</b> Use word processing editing tools to revise a document</p> <p><b>1.1</b> Design a word processing document with graphical elements</p>	<p>Explain and review the Word Processing Checklist (Appendix)</p> <p>Routinely demonstrate use of cut and paste, tabs and margins, font size, font style, delete and undo, selecting, spell check, click and drag</p> <p>Routinely demonstrate skill in using clip art, digital photographs, symbols, text wrap, cropping, sizing, and other drawing tools</p> <p>Explain and demonstrate at least one example for the following devices in recording data: collection science probe, graphing calculator, PDA (personal digital assistant), alternative keyboards, Webcams, GPS and Internet</p>	<p>Microsoft Word</p> <p>Word Processing Help in menu bar or Icons</p> <p>See documentation of instrument or Web site help on Internet</p> <p>On-line weather cams at</p>
<p>2. Use a variety of technology tools for data collection and analysis</p>	<p><b>2</b> Use technology devices to collect and record data</p> <p><b>2.1</b> Create and use a spreadsheet to analyze data</p> <p><b>2.2 (OPTIONAL)</b> Create a database with multiple fields to manipulate data in variety of ways</p>	<p>Explain and review the Spreadsheet Checklist (Appendix)</p> <p>Routinely use spreadsheets to analyze data (e.g., formulas, charts, graphs)</p> <p>(OPTIONAL) Demonstrate use of a database with multiple fields to manipulate data (e.g., sort, merge, list, report)</p>	<p>Microsoft Excel</p> <p>(OPTIONAL) (if software is available) Microsoft Access or File Maker Pro</p>

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p><b>Technology as a Productivity Tool - Grades 7-8 Continued</b></p> <p>3. Publish and present information using technology tools</p> <p>4. Use technology tools to support system analysis and modeling</p> <p>5. Present information using spreadsheet and tools</p>	<p><b>3</b> Design and create a multimedia presentation or Web page using multiple digital sources</p> <p><b>3.1</b> Publish or present the above production</p> <p><b>4</b> Manipulate several variables in a computer simulation to reach a desired outcome</p> <p><b>5.</b>Correctly identify parts of a spreadsheet</p> <p><b>5.1</b> Locate different cells and applications tools by name</p> <p><b>5.2</b> Gather, organize design a spreadsheet, edit and /or add to an existing spreadsheet</p> <p><b>5.3</b> Convert spreadsheet data to different kinds of graphs</p> <p><b>5.4</b> Add titles, axes labels, keys scale to graph produced from spreadsheet data</p> <p><b>5.5</b> Write spreadsheet formulas and place in the correct cells</p>	<p>Create a multimedia presentation or Web Page using at least one digital source (e.g., camera, video, scanner, CD-ROM, Internet)</p> <p>Publish a Web page or deliver multimedia presentation</p> <p>Explain and review Presentation/Graphics Rubric (Appendix)</p>	<p>Adobe Photoshop</p> <p>Microsoft PowerPoint</p> <p><a href="http://www.w3schools.com/">http://www.w3schools.com/</a></p> <p>Web-based publishing software such as: Adobe GoLive, Macromedia Dreamweaver or Microsoft FrontPage</p>

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p><b>Technology as a Productivity Tool - Grades 7-8 Continued</b></p> <p><b>6.</b> Use technology tools for brainstorming and organizing information</p> <p>7. Use web-authoring software to present and publish information</p>	<p><b>6</b> Realize that organizational software is a tool for personal concepts</p> <p><b>7</b> Develop a purpose for designing a web page</p> <p><b>7.1</b> Design a web page that accomplishes the above purpose</p>	<p>HTML Codes</p> <p>Photoshop</p> <p>Graphics software</p>	<p>Note Pad</p> <p>Word (Microsoft)</p>

<b>Technology as a Communication Tool - Grades 7- 8</b>	<b>Corresponding GA Standard: 7-12 &amp;13, 8 13:15</b>
<b>COMPETENCY GOAL:</b> Building on productivity tools, students will collaborate and interact with peers, experts, and other audiences using telecommunications and media.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Collaborative problem solving <input type="checkbox"/> Project-based learning	<b>VOCABULARY:</b> multimedia authoring, presentation software, digital camera, scanner, projection devices, OCR

Students will be able to:

OBJECTIVES	STRATEGIES	EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY	RECOMMENDED RESOURCES
<p>1. Use telecommunications efficiently and effectively to assess remote information and communicate with others in support of facilitated and independent learning</p> <p>2. Use technology for individual and collaborative writing, communication and publishing activities to create curricular related products for audiences inside and outside the classroom</p> <p>3. Collaboratively use telecommunication and online resources</p>	<p><b>1</b> Communicate independently via e-mail, Internet, and/or videoconferences with people in remote location</p> <p><b>2</b> Plan, design and present an academic product using technology tools</p> <p><b>3</b> Request collaborative exchanges among people in local and/ or remote locations</p> <p><b>3.1</b> Communicate electronically to collaborate with experts, peers and others to analyze data and/or develop an academic product</p> <p><b>3.2</b> Present an academic product to share data and/or solutions</p>	<p>Communicate with peers through Internet</p> <p>Participate in videoconferencing</p> <p>Explain and review Presentation/Graphic Checklist (Appendix)</p>	<p>Free on-line video conferences: Healthy States CSG's partnership to promote public health  <a href="http://www.healthystates.csg.org">www.healthystates.csg.org</a></p> <p><a href="http://fcit.usf.edu/telecom/chap1.htm">http://fcit.usf.edu/telecom/chap1.htm</a></p> <p><a href="http://www.epals.com">www.epals.com</a></p> <p><a href="http://www.askanexpert.com">www.askanexpert.com</a></p> <p>Microsoft PowerPoint  Adobe Photoshop  Adobe Illustrator</p>

<b>Technology as a Research Tool - Grades 7- 8</b>	<b>Corresponding GA Standard: 7-16, 8-18</b>
<b>COMPETENCY GOAL:</b> Students use technology-based research tools to locate and collect information pertinent to the task, as well as evaluate and analyze information from a variety of sources.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Improved organization and planning (WebQuests, etc.) <input type="checkbox"/> Increased quality and quantity of resources	

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
<p>1. Locate information from electronic resources</p>	<p><b>1</b> Identify electronic research resources</p> <p><b>1.1</b> Define subject searching and devise a search strategy to locate information using available electronic research resources</p> <p><b>1.2</b> Explain the difference between subject and keyword searching</p> <p><b>1.3</b> Construct keyword searches including basic Boolean logic using available electronic research resources</p> <p><b>1.4</b> Identify the author, copyright date and publisher of information located in electronic Internet resources</p>	<p>Identify electronic research sources</p>	<p>Georgia Public Library On-line  <a href="http://www.georgialibraries.org">www.georgialibraries.org</a></p> <p>On-line encyclopedias:  <a href="http://www.worldbook.com">www.worldbook.com</a>  <a href="http://www.encyclopedia.com">www.encyclopedia.com</a>  <a href="http://www.refdesk.com">www.refdesk.com</a></p> <p><a href="http://www.lib.berkeley.edu/TeachingLib/Guides/Internet/SearchEngines.html">www.lib.berkeley.edu/Teaching Lib/Guides/Internet/SearchEngines.html</a></p>
<p>2. Evaluate the accuracy, relevance, appropriateness, comprehensiveness and bias of electronic information sources</p>	<p><b>2</b> Create citations for electronic research sources following a prescribed format</p> <p><b>2.1</b> Gather research from a variety of electronic sources and identify the most appropriate information for answering the research question</p> <p><b>2.2</b> Obtain permission, when appropriate, to use the work of others</p> <p><b>2.3</b> Identify the components of a URL to determine the source of information</p> <p><b>2.4</b> Identify the author of the information found from electronic resources and determine whether the author is an authority, displays bias and is a primary or secondary source</p>	<p>Demonstrate proficiency in subject searching on multiple child - appropriate search engines</p>	<p><a href="http://owl.english.purdue.edu/handouts/research/r_mla.html">http://owl.english.purdue.edu/handouts/research/r_mla.html</a></p> <p><a href="http://literacy.kent.edu/Oasis/Workshops/copytoc.html">http://literacy.kent.edu/Oasis/Workshops/copytoc.html</a></p>



<b>Technology as Problem Solving/Decision Making Tool - Grades 7- 8</b>	<b>Corresponding GA Standard: 7-17, 8-19</b>
<b>COMPETENCY GOAL:</b> Students use technology to make and support decisions in the process of solving real -world problems.	
<b>VALUES AND BENEFITS:</b> <input type="checkbox"/> Interactive value of technology <input type="checkbox"/> Increased availability of resources (universities, expert systems, etc.)	

Students will be able to:

<b>OBJECTIVES</b>	<b>STRATEGIES</b>	<b>EXAMPLES OF CORRELATED ASSESSMENT/ACTIVITY</b>	<b>RECOMMENDED RESOURCES</b>
1. Determine when technology is useful and select and use the appropriate tools and technology resources to solve problems	<b>1</b> Based on a problem selected by the student, identify and use appropriate technology tools to <ul style="list-style-type: none"> <li>a) collect data</li> <li>b) interpret data</li> <li>c) develop a solution to the problem</li> <li>d) present findings</li> </ul>		Create a spreadsheet, generating charts and graphs  Present findings using appropriate medium (poster, banner, slideshow, video, word processing document, etc.)  Microsoft Word Microsoft Excel Microsoft PowerPoint

### Appendix - Basic Procedure Checklist

<b>Pre-K - Grade 1</b>	<b>Grades 2 - 3</b>	<b>Grades 4 – 6</b>	<b>Grades 7 - 8</b>
Turn computer and peripherals on and off	Start and quit application Programs	Draft, save, retrieve, edit and print word processing files	Store and retrieve files on another computer on the network
Use mouse and keyboard	Print documents	Use correct hand for all function keys: space bar, enter, arrow keys, escape, backspace, caps lock, ctrl, alt, insert, delete	Troubleshoot some problems with hardware, connections, operating system, network, or software malfunction
Identify main parts of a computer: keyboard, mouse, and monitor	Know and routinely use all function keys: space bar, enter, escape, ctrl, alt, del, cap locks, backspace and arrow keys	Key the numeric keypad using correct fingering	Install and use most peripheral devices, including scanners and projectors
Locate and identify space bar, enter, escape, backspace, and arrow keys	Identify and use menus, toolbars, icons and dialog boxes	Create directories and folders	Perform basic system maintenance routines such as disk cleanup and disk defragmenter
State orally the proper care of a computer	Find and open files	Demonstrate understanding of pathnames and naming conventions	Understand and use a variety of file formats such as .exe, .PDF, .html, .jpeg, .gif, .zip
Log onto the network using User Name and Password	Identify and use available drives (hard drive, floppy, CD-ROM, network)	Move and delete files	
Locate web browser on desktop and visit bookmarked web sites	Use digital camera	Explain concept, purpose and components of a LAN	
Open, move, minimize, resize, scroll and close windows	Use right and left hand on the correct side of the keyboard	Demonstrate understanding of structure and use of URL	
	Know and routinely use home row keys with correct fingering	Successfully and efficiently find information using a search engine	
	Begin to use tab and shift keys	Customize the desktop	
	Visit web sites by typing in the address	Identify and use basic file formats such as .doc, .ppt, .txt, .xls	

## Appendix - Word Processing Checklist

<b>Pre-K - Grade 1</b>	<b>Grades 2-3</b>	<b>Grades 4-6</b>	<b>Grades 7 - 8</b>
Enter text into a document opened by teacher	Open a new or saved document	Identify all word processing screen elements	Customize toolbars for the task being performed
Use a word processor to compose simple text (e.g., name, grade, short sentence)	Use a word processor to compose a document using word wrap	Demonstrate use of major toolbars (menu bar, standard toolbar, formatting toolbar, page view choices, drawing toolbar, status bar)	Use advanced formatting options (e.g., superscript, columns, change case, bullets and numbering, etc.)
Identify some screen elements and their function (e.g., toolbar, work area, cursor, insertion point)	Describe some uses of word processing software	Locate and use shortcuts, including the select all command	Format a document using headers and footers, page numbers and page breaks
	Identify menu bar, standard toolbar and icons, and dialog boxes	Modify format of text including style, font, font size, appearance, and alignment	Use Format Painter to copy format to multiple sections of text
	Enter, delete, copy, cut and paste text	Use a template to create a letter, memorandum or report	Use Edit/Find/Replace to modify text
	Undo and redo changes to text	Select text through several options (mouse clicks, menu option, shortcuts)	Use advanced table options (e.g., sort, split table, convert text to table, modify table properties)
	Save a new or modified document	Format a page (page orientation, margins, etc.)	Generate a table of contents for a document
	Close a document	Format paragraphs using indents, line spacing, text alignment	Utilize Show/Hide text option to display non-printing characters such as tabs, paragraph marks, hidden text
	Print a document	Select appropriate page view for the task being performed	Insert a simple spreadsheet into a document
		Create bulleted and numbered lists	Use the Document Map to navigate document or report
		Select, cut, copy and paste information within and between documents	Modify AutoCorrect options
		Create and modify a table (simple style and auto format); add rows and columns to a table	Add hyperlinks within a file (using bookmarks) and external to a file (linking to application file or URL)
		Add clip art and images to a document; edit a graphic	Merge like documents; use Mail Merge option to merge document to external data source
		Use spelling/grammar check and Thesaurus	

### Appendix - Spreadsheet Checklist

Pre K – 1	Grades 2 - 3	Grades 4 – 6	Grades 7 - 8
Discuss and demonstrate simple uses of spreadsheet software	Use spreadsheet software to enter simple text and values into pre-formatted worksheet cells	Identify spreadsheet screen elements and their function	Use more advanced functions (e.g., Statistical, Date and Time, Financial, Logical) including Function arguments
	Identify some screen elements and their function (e.g., toolbar, menu bar, dialog boxes, worksheet)	Demonstrate use of major toolbars (menu bar, standard toolbar, formatting toolbar, Name Box, Formula Bar, worksheet, Sheet Tabs)	Move, copy and delete Sheets from Workbook
	Identify columns and rows	Locate and use shortcuts	Perform more complex sorts (by month or day, by multiple columns, by imported list)
	Find a cell by its column and row position	Identify cell ranges; select, copy, move and fill cells and ranges within worksheet	Import and export data
	Open, modify and save an existing workbook file	Modify and navigate Sheet Tabs	Utilize absolute values in formula cell reference
		Distinguish between text, values and formulas	Demonstrate proficiency in formatting worksheets(e.g., conditional formatting, AutoFormat, borders and shading, etc.)
		Change column width and row height	Use a spreadsheet template to create a Balance Sheet, Expense Statement, or Invoice
		Enter and modify data	
		Use AutoSum feature	
		Format text and numbers	
		Format cells and columns	
		Save a new or modified workbook	
		Print a worksheet as well as a selection from a worksheet	
		Use simple mathematical functions	
		Insert and delete rows and columns	
		Perform "fills" (AutoFill)	
		Perform simple ascending and descending sorts (numbers, alphanumeric)	
		Use Chart Wizard to create a graph of spreadsheet data; modify chart type (bar, line, pie, scatter)	
		Copy a chart to word processing or presentation application	

## Appendix - Presentation/Graphics Checklist

<b>Pre K – 1</b>	<b>Grades 2 – 3</b>	<b>Grades 4 – 6</b>	<b>Grades 7 – 8</b>
Enter text into a document opened by teacher	Open a new or saved presentation	Identify all presentation/graphics screen elements	Modify slide master to add element(s) to all presentation slides
Discuss and demonstrate simple uses of presentation/graphics software	For an existing presentation, modify color schemes and background colors	Demonstrate use of major toolbars (menu bar, standard toolbar, formatting toolbar, view choices, drawing toolbar, status bar)	Use advanced slide show options (e.g., Custom Animation Effects, Action Buttons, Narration, etc.)
	Prepare a presentation comprised of title slide and graphics pages (animals, planets, etc.)	Locate and use shortcuts	Add Header and Footer to a presentation
	Insert graphics (1) from clip art library (2) image from a file and (3) from Internet	Create a presentation using the AutoContent Wizard	Add speaker notes to a presentation
	Resize and reposition an object	Create a presentation using a template	Import spreadsheet data or word processing table to a presentation
	Use various drawing tools (AutoShapes, lines, oval, rectangle, text box, etc.) to create a drawing	Build a presentation from a blank presentation, inserting new slides, applying a design template and selecting slide layout appropriate to content	Add an organization chart page to a presentation
		Use slide sorter view to reorder slides in a presentation	Insert hyperlinks to a web source into a presentation
		Create a custom slide show using Animation Schemes, Custom Animation and Slide Transitions	Add a graph (chart) page to a presentation
		Layer, rotate, flip, group/ungroup objects	Format, position, and resize Placeholders
		Select several objects at the same time	Add hot spots or buttons
		Add sound to a presentation	
		Animate text and images	
		Change animation timing	

**Appendix - Presentation/Graphics Rubric**

	<b>Excellent</b>	<b>Satisfactory</b>	<b>Needs Improvement</b>	<b>Unsatisfactory</b>
<b>Student:</b>				
Accuracy of grammar, spelling and punctuation				
Clear expression of ideas				
Organization of presentation				
Appropriate slide layout(s) for page content				
Effective use of graphics, images, color, and text				
Use of transitions and custom animation				
Creativity and originality				
Sources cited and contain required information				
Overall effort				

### Appendix - Keyboarding Rubric

Keyboarding Mechanics	Always	Often	Sometimes	Seldom	Never
<b>Student:</b>					
Keeps feet flat on floor.					
Centers body behind keyboard (between G & H keys).					
Keeps back straight (lower back touching back of chair).					
Sits a comfortable distance from the keyboard (hand span from the waist).					
Relaxes arms with elbows close to body.					
"Hovers" hands over home row keys (no wrists resting on keyboard).					
Keeps eyes on copy (screen, text, etc.)					
Strikes keys with correct fingers.					
After striking a key, returns fingers to home row.					
Strikes space bar with thumb of right hand.					
Strikes Enter key with little finger of right hand.					
Shifts with opposite little finger.					