

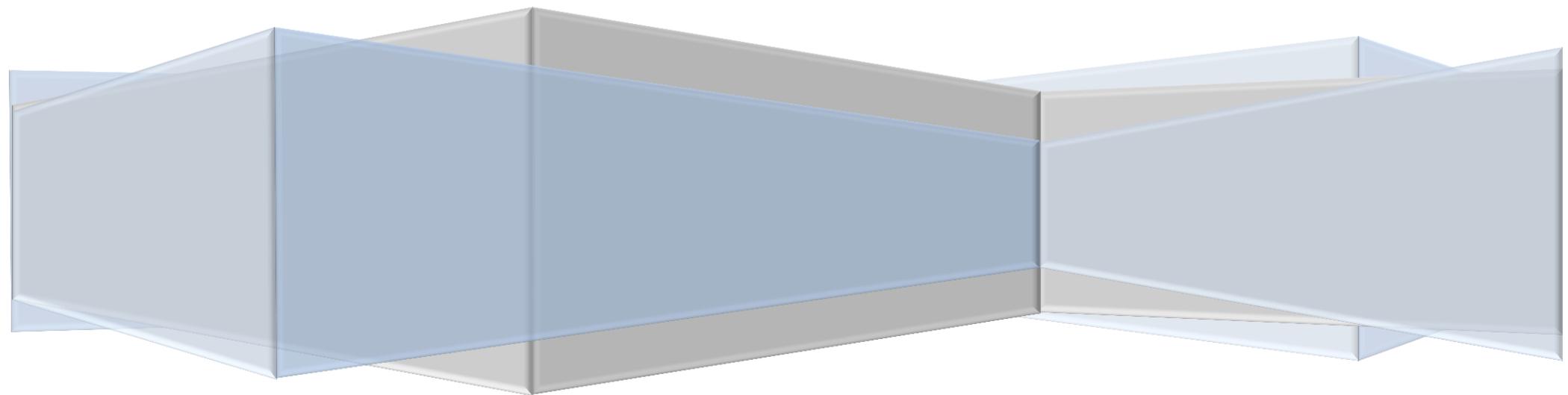
Kelso School District

K-5 Tech Skills Scope and Sequence

Tech Skills aligned with the Common Core Standards

Created by the Elementary Tech Literacy Subcommittee

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Sources:

While this team is responsible for the final document, the following sources were used as guides and resources:

SBAC Tech Skills Checklist, Middletown Public Schools, Middletown Conn.,

http://www.middletownschoools.org/uploaded/Curriculum/Educational_Technology/SBACTech/SBAC_Tech_Skills_Checklist.pdf

Standards Crosswalk: Common Core and Educational Technology (K-2, 3-5), OSPI, Washington,

<https://www.k12.wa.us/EdTech/Standards/edtechcoresubjects/CCSS.aspx>

USD 473 Tech Skills, Brenda Lemon, Chapman Kansas, <http://www.livebinders.com/play/play?id=339110>

K-5 Technology Skills Scope and Sequence

In a society that increasingly relies on technology for day-to-day tasks, it is important that our students are exposed to a variety of learning experiences with technology. Just as it is important to learn the foundational skills in any subject area, it is also important that our students have a basic level of technology proficiency. This includes basic keyboarding skills.

The following document provides a list of recommended technology skills that students should develop at each grade level. It is the hope that as students build skills, they will be better prepared to take online assessments as well as to fully utilize technology as a learning tool. It is best to teach these skills in the context of engaging activities that address learning standards. Skills can be introduced by a specialist if that is available at the school, but students will learn best if the skills are reinforced in the classroom setting.

In addition to the specific technology skills, each grade level has a listing of Common Core standards that incorporate digital tools. Next to each standard is a matching set of technology skills that could be used to address that standard.

KINDERGARTEN BASIC OPERATION SKILLS

Basic Operation Skills/Mouse Skills

- Know the basic care of technology
 - (handling laptops, keyboard, mouse, etc.)
- Understand correct posture
 - (feet on floor, shoulders parallel to the screen)
- Maneuver a mouse
 - (hand position, cursor awareness on the screen, place cursor on specific location on the screen, left click, single click to select, double click to open, drag & drop items on the screen)
- Launch an application by activating an icon
 - Open and close windows
- Exit an application
- Use a scroll bar
 - Move up and down on a screen
 - Move left and right on a screen
- Maximize and minimize a window

Keyboarding Skills

- Identify letters and numbers on the keyboard
- Understand basic use of the keyboard
 - (enter key, space bar, number pad, backspace/delete, shift)

Navigation Skills

- Access a teacher-selected website from a shortcut or a bookmark and navigate the website
- Use arrows to navigate through screens (e.g. turning pages of online books)
- Uses audio icons
- Know when to ask for assistance

Assessment Specific Skills

- Know when and how to select multiple answers to a question

Kindergarten Common Core Standards	Related Technology Skills
<p>W.K.6 With guidance and support from adults, explore a variety of digital tools to produce and publish writing, including in collaboration with peers.</p>	<ul style="list-style-type: none"> • Know how to use the mouse and keyboard • Identifies letters, numbers, and functions on the keyboard (note: students are not expected to use correct fingering) <ul style="list-style-type: none"> ○ Enter/return key, space bar, number pad, backspace key, shift to capitalize, locate and type punctuation keys by using shift key • Operate educational software & navigate websites • Collaborate with peers using technology as an aid • Utilize and navigate software menus, icons, and toolbars
<p>W.K.7 Participate in shared research and writing projects (e.g., explore a number of books by a favorite author and express opinions about them).</p>	<ul style="list-style-type: none"> • Students will be introduced to online text to learn and later locate relevant information • Be able to access and navigate a teacher selected website • Use grade appropriate websites to enhance curriculum
<p>W.K.8 With guidance and support from adults, recall information from experiences or gather information from provided sources to answer a question.</p>	<ul style="list-style-type: none"> • Express ideas to an audience using technology tools (PowerPoint, Kidpix, Word) • Use online resources to read and gather information with teacher assistance
<p>SL.K.2 Confirm understanding of a text read aloud or information presented orally or through other media by asking and answering questions about key details and requesting clarification if something is not understood.</p>	<ul style="list-style-type: none"> • Use a document camera to project a book from an online source. • Can use an audio & video toolbar to: play, stop, pause, rewind, and adjust volume
<p>SL.K.5 Add drawings or other visual displays to descriptions as desired to provide additional detail.</p>	<ul style="list-style-type: none"> • Operate educational software (Kidspiration, clipart, paint) • Manipulate digital objects (drag and drop, resize, move)

FIRST GRADE BASIC OPERATION SKILLS

Basic Operation/Mouse Skills

- Know the basic care of technology
 - (handling laptops, keyboard, mouse, charging devices properly etc.)
- Understand correct posture
 - (feet on floor, shoulders parallel to the screen)
- Turn on and shutdown the computer or device
- Login/log out
- Maneuver a mouse
 - (hand position, cursor awareness on the screen, place cursor on specific location on the screen, left click, single click to select, activate drop-down menus, double click to open, drag and drop items on the screen)
- Launch an application by activating an icon
 - Open and close windows
- Exit an application
- Use a scroll bar
 - Move up and down on a screen
 - Move left and right on a screen
- Maximize and minimize a window

Keyboarding Skills

- Identify letters and numbers on the keyboard
- Use two hands on the keyboard, preferably on home row
- Understand basic use of the keyboard
 - (enter key, space bar, number pad, backspace/delete, shift, tab)

Navigation Skills

- Access a teacher-selected website from a shortcut or a bookmark and navigate the website
- Use arrows to navigate through screens (e.g. turning pages of online books)
- Uses audio icons
- Know when to ask for assistance

Assessment Specific Skills

- Know when and how to select multiple answers to a question

First Grade Common Core Standards	Related Technology Skills
RI.1.1 & RI.1.1 Ask and answer questions about key details in a text.	<ul style="list-style-type: none"> • Discuss the content of a website (e.g. who made this website and why?)
RI.1.5 Know and use various text features (e.g., headings, tables of contents, glossaries, electronic menus, icons) to locate key facts or information in a text.	<ul style="list-style-type: none"> • Use basic navigation skills to gather information • Use online text features to navigate a website
W.1.6 With guidance and support from adults, use a variety of digital tools to produce and publish writing, including in collaboration with peers.	<ul style="list-style-type: none"> • Turn a computer/device on and off, use the mouse and keyboard • Identifies letters, numbers, and functions on the keyboard. (note: students are not expected to use correct fingering) <ul style="list-style-type: none"> ○ enter/return key, space bar, number pad, backspace key, shift to capitalize, locate and type punctuation keys by using shift key • Operate educational software & navigate websites • Collaborate with peers using technology as an aid • Utilize and navigate software menus, icons, and toolbars
W.1.7 Participate in shared research and writing projects (e.g., explore a number of "how-to" books on a given topic and use them to write a sequence of instructions.)	<ul style="list-style-type: none"> • Students will be introduced to online text to learn and later locate relevant information. • Be able to access the Internet and navigate a teacher selected website • Use grade appropriate websites to enhance curriculum
W.1.8 With guidance and support from adults, recall information from experiences or gather information from provided sources to answer a question.	<ul style="list-style-type: none"> • Express ideas to an audience using technology tools (Powerpoint, Kidpix, Word) • Use online resources to read and gather information with teacher assistance
SL.1.2 Ask and answer questions about key details in a text read aloud or information presented orally or through other media.	<ul style="list-style-type: none"> • Use a document camera to project a book from an online source. • Can use an audio & video toolbar to: play, stop, pause, rewind, and adjust volume
SL.1.5 Add drawings or other visual displays to descriptions when appropriate to clarify ideas, thoughts, and feelings.	<ul style="list-style-type: none"> • Manipulate digital objects (drag and drop, resize, move) • Operate educational software (Kidspiration, clipart, paint)

SECOND GRADE BASIC OPERATION SKILLS

Basic Operation Skills/ Mouse Skills

- Properly login/logout of computer
- Maneuver a mouse
 - Locate cursor, single click to select, activate drop-down menus, double click to open, drag and drop items on the screen, activate right-click menus
- Exit a program
- When program is running can return to main menu
- Can access help features
- Maximize and minimize a window
- Scroll in multiple windows
- Care for technology properly

Keyboarding Skills

- Can locate and type letters
- Understand basic use of the keyboard
 - enter key, space bar, number pad, backspace/delete, shift, tab
- Type using two hands
- Can locate and type punctuation keys
- Use shift key for capitalization and punctuation
- Use correct posture (shoulders parallel to screen, both feet on floor)

Word Processing Skills

- Use cursor to type/insert/edit text in specific location/field
- Locate and enter appropriate punctuation
- Copy/Paste text/image
- Make additional revisions to typed piece (identifies misspelled words and chooses appropriate correction)
- Can undo/redo last entry
- Format text (font, size)
- Save document/project specifying file name and location (Save As)
- Open a saved document

Navigation Skills

- Can use audio/video tool bar to play, stop, pause, rewind & adjust volume
- Identify symbols for moving forward and back between screens.

Assessment Specific Skills

- Access and follow directions
- Click in text box to type
- Click hyperlinks (underlined text) to activate link
- Understand and appropriately use Zoom In/Zoom Out features
- Can delete objects and numbers
- Can access information button
- Can appropriately navigate and enter equation
- Know when and how to select multiple answers to a question
- Can draw line segments/arrows/shapes

Second Grade Common Core Standards	Related Technology Skills
<p>RL.2.7 Use information gained from the illustrations and words in a print or digital text to demonstrate understanding of its characters, setting, or plot.</p>	<ul style="list-style-type: none"> • Navigate a story-book in an electronic or audio format
<p>RI.2.5 Know and use various text features (e.g., captions, bold print, subheadings, glossaries, indexes, electronic menus, icons) to locate key facts or information in a text efficiently.</p>	<ul style="list-style-type: none"> • Use basic navigation skills to gather information • Use online text features to navigate a website
<p>W.2.6 With guidance and support from adults, use a variety of digital tools to produce and publish writing, including in collaboration with peers.</p>	<ul style="list-style-type: none"> • Use slide presentation software (Google Drive, PowerPoint) to create a simple presentation (5 slides).. • Create a simple word processing document • Use appropriate multimedia or online resources to gather needed information. • Create presentations using online tools (Voicethread, PhotoPeach, Kerpoof, iPad apps, etc.)
<p>W.2.7 Participate in shared research and writing projects (e.g., read a number of books on a single topic to produce a report; record science observations.</p>	<ul style="list-style-type: none"> • Explore a variety of online websites that showcase narrative and expository text. • Conduct keyword and/or subject searches on the library catalog and online sources to locate needed materials • Research a topic using teacher selected websites • With teacher assistance, cite sources for technology projects
<p>W.2.8 Recall information from experiences or gather information from provided sources to answer a question.</p>	<ul style="list-style-type: none"> • Gather information using teacher-selected digital resources
<p>SL.2.2 Recount or describe key ideas or details from a text read aloud or information presented orally or through other media</p>	<ul style="list-style-type: none"> • Respond to a class discussion electronically (e.g., eInstruction, Smartboards, eboards)
<p>SL.2.5 Create audio recordings of stories or poems; add drawings or other visual displays to stories or recounts of experiences when appropriate to clarify ideas, thoughts, and feelings</p>	<ul style="list-style-type: none"> • Create projects with multimedia sources (video, photo, audio) • Use simple graphing software to record the results of a survey in class • Use concept-mapping software with teacher assistance (e.g Kidspiration)
<p>L.2.4e Use glossaries and beginning dictionaries, both print and digital, to determine or clarify the meaning of words and phrases.</p>	<ul style="list-style-type: none"> • Use software embedded dictionary tools • Use hyperlinks in existing online text • Use an online dictionary/thesaurus

THIRD GRADE BASIC OPERATION SKILLS

Basic Operation Skills and Mouse Skills

- Properly login/logout of computer
- Maneuver a mouse
 - Activate right-click menu
 - Uses mouse to highlight text on screen
 - Click and Drag
- Exit a program
- When program is running can return to main menu
- Can access help features
- Open a window
- Minimize and maximize a window
- Scroll in multiple windows
- Care for technology properly

Keyboarding Skills

- Enters characters with reasonable speed (5-15 wpm) using home row and correct finger placement
- Understand basic use of the keyboard
 - enter key, space bar, number pad, backspace/delete, shift, tab
- Can locate and type punctuation keys
- Use shift key for capitalization and punctuation
- Use correct posture (shoulders parallel to screen, both feet on floor)

Word Processing Skills

- Use cursor to type/insert/edit text in specific location or field
- Locate and enter appropriate punctuation
- Copy/paste text and images
- Make additional revisions to typed piece (identify misspelled words and choose appropriate correction)
- Can undo/redo last entry
- Format text (font, color, size, spacing, alignment etc.)
- Save document/project specifying file name and location (Save vs. Save As)
- Open saved document

Navigation Skills

- Can use audio/video toolbar to play, stop, pause, rewind and adjust
- Identify symbols for moving forward and back between screens

Assessment Specific Skills

- Access and follow directions
- Click in text box to type
- Flag questions to be reviewed later
- Click hyperlinks (underlined text) to activate link
- Understand and appropriately uses Zoom In/Zoom Out features
- Can delete objects and numbers
- Can access information button
- Know when and how to select multiple answers to a question
- Can appropriately navigate and enter equations
- Can create graph
- Can draw line segments

Third Grade Common Core Standards	Related Technology Skills
<p>RI.3.1 & RI.3.1 Ask and answer questions to demonstrate understanding of a text as the basis for the answers.</p>	<ul style="list-style-type: none"> • Build background knowledge and generate questions by viewing multimedia (including websites, online texts, presentations, ebooks)
<p>RI.3.5 Use text features and search tools (e.g., key words, sidebars, hyperlinks) to locate information relevant to a given topic efficiently.</p>	<ul style="list-style-type: none"> • Utilize a web search engine using effective search strategies • Navigate within an online database (Destiny, Renplace) • Utilize navigation tools (menus, links, sidebars, tabs, etc.) to find information on a website • Evaluate information for reliability and relevance to the topic being researched from Internet resources
<p>W.3.6 With guidance and support from adults, use technology to produce and publish writing (using keyboarding skills) as well as to interact and collaborate with peers.</p>	<ul style="list-style-type: none"> • Collaborate with other students by using a variety of tools • Incorporate multi-media into projects (images, clipart, sounds) • Utilize correct formatting within word processing document • Save document specifying file name and location
<p>W.3.7 Conduct short research projects that build knowledge about a topic.</p>	<ul style="list-style-type: none"> • Gather information using selected digital resources and effective search techniques • Organize information using digital tools • Cite online sources used in research by providing “works cited” references (simple citing of weblink is appropriate at this level)
<p>W.3.8 Recall information from experiences or gather information from print and digital sources; take brief notes on sources and sort evidence into provided categories.</p>	<ul style="list-style-type: none"> • Research a topic, take notes in a graphic organizer • Evaluate information, from digital sources, based on relevance and reliability • Correctly site research documentation within a works cited page
<p>SL.3.2 Determine the main ideas and supporting details of a text read aloud or information presented in diverse media and formats, including visually, quantitatively, and orally.</p>	<ul style="list-style-type: none"> • Engage in a variety of experiences with online material (ebooks, audio books, video stories, etc.)
<p>SL.3.5 Create engaging audio recordings of stories or poems that demonstrate fluid reading at an understandable pace; add visual displays when appropriate to emphasize or enhance certain facts or details.</p>	<ul style="list-style-type: none"> • Use a voice recorder (Garage Band, Voicethread.com, Powerpoint, iPad, PC sound recorder) to record students reading from text • Test reading fluency using an audio recording device (iPods, etc.)

FOURTH GRADE BASIC OPERATION SKILLS

Basic Operation Skills/ Mouse Skills

- Properly login/logout of computer
- Maneuver a mouse
 - Activate a right click menu
 - Uses mouse to highlight text on screen
- Can navigate between multiple programs and the desktop
- Can access help features
- Scroll in multiple windows
- Care for technology properly

Keyboarding Skills

- Enters characters with reasonable speed (15-25 wpm) using home row and correct finger placement
- Use tab key
- Can locate and type punctuation keys
- Use shift key to appropriately capitalize letters
- Use correct posture (shoulders parallel to screen, both feet on floor)

Word Processing Skills

- Use cursor to type/insert/edit text in a specific location or field
- Locate and enter appropriate punctuation
- Copy/paste text and images
- Make additional revisions to typed piece (identifies misspelled words and chooses appropriate correction) Can undo/redo last entry
- Format text (font, color, size, spacing, alignment etc.)
- Save document/project specifying file name and location (Save vs. Save As)
- Open saved document

Navigation Skills

- Can use audio/video toolbar to play, stop, pause, rewind and adjust
- Identify symbols for moving forward and back between screens

Assessment Specific Skills

- Access and follow directions
- Flag questions to be reviewed later
- Click hyperlinks (underlined text) to activate link
- Understand and appropriately uses Zoom In/Zoom Out features
- Can access information button
- Know when and how to select multiple answers to a question
- Can appropriately navigate and enter equation
- Can create graph
- Can draw line segments

Fourth Grade Common Core Standards	Related Technology Skills
<p>RI.4.7 Interpret information presented visually, orally, or quantitatively (e.g., in charts, graphs, diagrams, time lines, animations, or interactive elements on Web pages) and explain how the information contributes to an understanding of the text in which it appears.</p>	<ul style="list-style-type: none"> • Discriminate webpage elements in order to understand the text <ul style="list-style-type: none"> ○ Identify/ignore advertising ○ Navigate menus/hyperlinks ○ Interact with webpage elements
<p>W.4.7 Conduct short research projects that build knowledge through investigation of different aspects of a topic.</p>	<ul style="list-style-type: none"> • Gather information using selected digital resources and effective search techniques • Organize information using digital tools • Cite online sources used in research by providing “works cited” references (simple citing of weblink is appropriate at this level)
<p>W.4.2.a Introduce a topic clearly, provide a general observation and focus, and group related information logically; include formatting (e.g., heading), illustrations, and other multimedia when useful to aiding comprehension.</p>	<ul style="list-style-type: none"> • Use presentation software or online tools to share about a topic • Include multimedia in presentations when useful
<p>W.4.6 With some guidance and support from adults, use technology, including the Internet, to produce and publish writing as well as to interact and collaborate with others; demonstrate sufficient command of keyboarding skills to type a minimum of one page in a single sitting.</p>	<ul style="list-style-type: none"> • Collaborate with other students by using a variety of tools to digitally peer edit and/or provide feedback • Incorporate multi-media into projects (images, clipart, sounds) • Utilize correct formatting within word processing documents • Use effective keyboarding techniques
<p>W.4.8 Recall relevant information from experiences or gather relevant information from print and digital sources: take notes and categorize information, and provide a list of sources.</p>	<ul style="list-style-type: none"> • Research a topic using online primary and secondary sources (ex. Library of Congress) ,take notes in a graphic organizer • Evaluate information, from digital sources, based on relevance and reliability • Correctly site research documentation within a works cited page
<p>SL.4.5 Add audio recordings and visual displays to presentations when appropriate to enhance the development of main ideas or themes.</p>	<ul style="list-style-type: none"> • Add audio, video, or pictures into a presentation. • With assistance, choose the most appropriate format for presenting information by identifying an audience, and considering length of presentation and type of information to share.
<p>L.4.4.c Consult reference materials (e.g., dictionary, glossary, thesaurus), both print and digital, to find the pronunciation and determine or clarify the precise meaning of key words and phrases.</p>	<ul style="list-style-type: none"> • Use online and digital reference materials e.g. dictionary, thesaurus, etc. • Utilize hyperlinks in existing online text to clarify meaning of key words or activate audio.

FIFTH GRADE BASIC OPERATION SKILLS

Basic Operation Skills/Mouse Skills

- Properly login/logout of computer
- Maneuver a mouse
 - Activate a right click menu
 - Uses mouse to highlight text on screen
- Can navigate between multiple programs and the desktop
- Can access help features
- Scroll in multiple windows
- Care for technology properly

Keyboarding Skills

- Enter characters with reasonable speed (20-30 wpm) using home row and correct finger placement
- Use tab key
- Can locate and type punctuation keys
- Use shift key to appropriately capitalize letters
- Use correct posture (shoulders parallel to screen, both feet on floor)

Word Processing Skills

- Use cursor to type/insert/edit text in specific location or field
- Copy/paste text and images
- Locate and enter appropriate punctuation
- Make additional revisions to typed piece (identify misspelled words and choose appropriate correction)
- Can undo/redo last entry
- Format text (font, color, size, spacing, alignment etc.)
- Save document/project specifying file name and location (Save vs. Save As)
- Open saved document

Navigation Skills

- Can use audio/video toolbar to play, stop, pause, rewind and adjust
- Identify symbols for moving forward and back between screens

Assessment Specific Skills

- Access and follow directions
- Flag questions to be reviewed later
- Click hyperlinks (underlined text) to activate link
- Understand and appropriately uses Zoom In/Zoom Out features
- Can access information button
- Understand when more than one answer is possible
- Can appropriately navigate and enter equation
- Can create graph
- Can draw line segments

Fifth Grade Common Core Standards	Related Technology Skills
<p>RI.5.7 Draw on information from multiple print or digital sources, demonstrating the ability to locate an answer to a question quickly or to solve a problem efficiently.</p>	<ul style="list-style-type: none"> • Use appropriate search strategies to find information on the Internet. • Understand the basic search query process utilized by Google and other search engines. • Know which sites are appropriate for the information needed.
<p>W.5.6 With some guidance and support from adults, use technology, including the Internet, to produce and publish writing as well as to interact and collaborate with others; demonstrate sufficient command of keyboarding skills to type a minimum of two pages in a single sitting.</p>	<ul style="list-style-type: none"> • Collaborate with other students by using a variety of tools to digitally peer edit and/or provide feedback • Incorporate multi-media into projects (images, clipart, sounds) • Utilize correct formatting within word processing documents • Use effective keyboarding techniques • Publish written works online when appropriate
<p>W.5.7 Conduct short research projects that use several sources to build knowledge through investigation of different aspects of a topic.</p>	<ul style="list-style-type: none"> • Research a topic using online primary and secondary sources (ex. Library of Congress) • Organize information using digital tools • Cite online sources used in research by providing “works cited” references (simple citing of weblink is appropriate at this level) • Verify accuracy of information found (e.g., current and appropriate, according to copyright date and authority, bias present).
<p>W.5.2.a Introduce a topic clearly, provide a general observation and focus, and group related information logically; including formatting (e.g., headings), illustrations, and multimedia when useful to aiding comprehension.</p>	<ul style="list-style-type: none"> • Use presentation software or online tools to share about a topic • Include multimedia in presentations when useful
<p>SL.5.5 Include multimedia components (e.g., graphics, sound) and visual displays in presentations when appropriate to enhance the development of main ideas or themes.</p>	<ul style="list-style-type: none"> • Utilize multimedia (images, audio, video) to aid in a presentation • With assistance, choose the most appropriate format for presenting information by identifying an audience, and considering length of presentation and type of information to share. • Include a graph/chart or infographic to illustrate a concept
<p>L.5.4.c Consult reference materials (e.g., dictionary, glossary, thesaurus), both print and digital, to find the pronunciation and determine or clarify the precise meaning of key words and phrases.</p>	<ul style="list-style-type: none"> • Use online and digital reference materials e.g. dictionary, thesaurus, etc. • Utilize hyperlinks in existing online text to clarify meaning of key words or activate audio.