

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES KINDERGARTEN - FOUR

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Language Arts

Identify the wide variety of current media formats: videos, magazines, software, cassettes, CDs, DVDs, books, newspapers, Internet

Kindergarten: Introduce formats
Grade One: Develop knowledge of formats
Grade Two: Assess proficiency
Grades Three & Four: Maintain proficiency

Recognize the common organizational characteristics of print media

Kindergarten: Introduce: Title Page/Author
Grade One; Introduce: Table of Contents
Grade Two: Introduce: Index, Copyright Info
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Identify and define basic computer terminology

Kindergarten: Introduce: cursor, startup/shutdown
Grade One: Introduce: hardware/software
Grade Two: Introduce: file, memory
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Identify and explain the functions of the components of a computer system

Kindergarten: Introduce: mouse, keyboard, monitor
Grade One: Introduce: CPU, printer
Grade Two: Assess proficiency
Grade Three: Maintain proficiency
Grade Four: Maintain proficiency

Demonstrate the correct use of input devices

Kindergarten: Introduce: mouse keyboard
Grade One: Assess proficiency
Grade Two: Maintain proficiency
Grade Three: Maintain proficiency
Grade Four: Maintain proficiency

Develop touch keyboarding techniques using both hands

Grade Three: Introduce touch keyboarding
Grade Four: Assess proficiency

Save and backup files on a computer hard drive, storage medium, or server

Grade Three: Introduce concept
Grade Four: Assess proficiency

Identify and define basic word processing terminology	Grade Three: Introduce open, save, file, window, document, cut, copy, paste Grade Four: Assess proficiency
Produce a document using a word processing program	Grade One: Introduce Grade Two: Develop skills Grade Three: Assess proficiency
Edit a word-processed document using a spell checker	Grade Three: Introduce concept Grade Four: Assess proficiency
Demonstrate text editing to produce a finished product	Grade Three: Introduce concept Grade Four: Assess proficiency
Explore special formatting features of a word processing program	Grade Three: Introduce concept Grade Four: Assess proficiency
Access information using common electronic reference sources	Grade Three: Introduce concept Grade Four: Assess proficiency
Demonstrate the use of still and video cameras and scanners Operate basic audio and video equipment to listen to and view programs	Grade Four: Introduce and assess proficiency Kindergarten: Introduce audio equipment Grade One: Introduce video equipment Grade Two: Assess proficiency Grade Three: Maintain proficiency Grade Four: Maintain proficiency
Differentiate among the common types of computer software	Grade Three: Introduce and assess proficiency
Describe the purpose and use of a virus detection program	Grade Four: Introduce and assess proficiency
Demonstrate how to open and run a program from local device or network	Grade Three: Introduce Grade Four: Assess proficiency
Create, save, move, copy, retrieve, and delete electronic files	Grade Three: Introduce Grade Four: Assess proficiency
Incorporate graphics, pictures, and sound into another document	Grade Four: Introduce and assess proficiency
Generate, send, retrieve, save, and organize electronic messages	Grade Three: Introduce Grade Four: Assess proficiency
Log on and view information from preselected sites on the Internet	Grade Three: Introduce Grade Four: Assess proficiency

Use the functions of a web browser to navigate and save websites

Grade Four: Introduce and assess proficiency

Use draw, paint, or graphics software to create simple signs, posters, etc.

Grade Four: Introduce and assess proficiency

Plan a multimedia production using an outline or storyboard

Grade Four: Introduce and assess proficiency

Evaluate the multimedia production and make suggestions for improvement

Grade Four: Introduce and assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
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GRADES KINDERGARTEN - FOUR

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Language Arts

Evaluate possible sources based on currency, genre, and relevance to topic	Grade Two: Introduce Grade Three: Develop Grade Four: Assess proficiency
Select more than one resource when appropriate	Grade Three: Introduce and develop Grade Four: Assess proficiency
Recognize that materials in the school library media center are organized in a systematic manner	Kindergarten: Introduce Grade One: Develop Grade Two: Develop Grade Three: Assess proficiency Grade Four: Maintain proficiency
Locate materials using the classification system of the school media center	Grade One: Introduce Grade Two: Develop Grade Three: Develop Grade Four: Assess proficiency
Identify and use printed or electronic catalogs to access materials	Grade Three: Introduce Grade Four: Assess proficiency
Use the index or table of contents to locate specific information	Grade Two: Introduce Grade Three: Assess proficiency Grade Four: Maintain proficiency
Choose resources appropriate to their interests, abilities and information need	Grade Two: Introduce Grade Three: Develop Grade Four: Assess proficiency
Take notes or record information in their own words	Grade Three: Introduce Grade Four: Assess proficiency
Record the sources of information as notes are taken	Grade Four: Introduce and assess proficiency
Recognize the need to identify the author of any information copied verbatim	Grade Four: Introduce and assess proficiency

Arrange notes to help answer the information problem or question

Grade Three: Introduce
Grade Four: Assess proficiency

Organize information using simple outlining techniques

Grade Four: Introduce and assess proficiency

List basic bibliographic sources for information used

Grade Four: Introduce and assess proficiency

Identify new information and integrate it with prior knowledge

Grade Three: Introduce
Grade Four: Assess proficiency

Search for information by keyword, author, title, and topic or subject

Grade Two: Introduce author and title
Grade Three: Introduce topic, subject, keyword
Grade Four: Assess proficiency

Locate information from preselected Internet sites and web pages

Grade Three: Introduce
Grade Four: Assess proficiency

Identify the audience for the product or presentation Grade Three: Introduce

Grade Four: Assess proficiency

Identify the purpose of the product or presentation (entertain, inform, etc.)

Grade Three: Introduce
Grade Four: Assess proficiency

Recognize the three common types of communication or presentation modes

Grade Two: Introduce
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Choose a presentation format (e.g. speech, paper, video)

Grade Four: Introduce and assess proficiency

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GRADES KINDERGARTEN - FOUR

Standard C: Independent Learning

Students will apply information and technology skills to issues of personal and academic interest by actively and independently seeking information; demonstrating critical and discriminating reading, listening, and viewing habits; and, striving for personal excellence in learning and career pursuits.

Benchmark

Language Arts

Identify topics of interest and seek relevant information about them

Kindergarten: Introduce
Grade One: Develop
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Recognize that information can be used to make decisions or satisfy personal interest

Grade One: Introduce
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Recognize that accurate information is basic to sound decisions

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Choose fiction and other literature of personal interest

Kindergarten: Introduce
Grade One: Develop
Grade Two: Assess proficiency
Grade Three: Maintain proficiency
Grade Four: Maintain proficiency

Recognize that award winning books reflect literary and artistic excellence

Kindergarten: Introduce
Grade One: Develop
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Relate literature and other creative expressions of information to personal experiences

Kindergarten: Introduce
Grade One: Develop
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Compare personal interpretations of literature and other creative expressions

Kindergarten: Introduce

with those of others

Grade One: Develop
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Choose materials at appropriate developmental levels

Kindergarten: Introduce
Grade One: Develop
Grade Two: Assess proficiency
Grade Three: Maintain proficiency
Grade Four: Maintain proficiency

Identify topics suitable for independent learning or in-depth exploration

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Establish goals and determine steps for completing project

Grade Three: Introduce
Grade Four: Assess proficiency

Assess progress and quality of work

Grade One: Introduce
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Contribute to group or classroom decisions about learning objectives

Grade One: Introduce
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Identify materials that reflect diverse perspectives

Grade Three: Introduce
Grade Four: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
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GRADES KINDERGARTEN - FOUR

Standard D: The Learning Community

Students will demonstrate the ability to work collaboratively in teams or groups, use information and technology in a responsible manner, respect intellectual property rights, and recognize the importance of intellectual freedom and access to information in a democratic society.

Benchmark

Language Arts

Differentiate between copying and summarizing

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Recognize that reports or articles they write must be in their own words

Grade Three: Introduce
Grade Four: Assess proficiency

Share information and ideas with others

Kindergarten: Introduce
Grade One: Develop
Grade Two: Assess proficiency
Grade Three: Maintain proficiency
Grade Four: Maintain proficiency

Respect the ideas of others

Kindergarten: Introduce
Grade One: Develop
Grade Two: Assess proficiency
Grade Three: Maintain proficiency
Grade Four: Maintain proficiency

Acknowledge the right of classmates to express opinions different from their own

Kindergarten: Introduce
Grade One: Develop
Grade Two: Assess proficiency
Grade Three: Maintain proficiency
Grade Four: Maintain proficiency
Grade Four: Introduce and assess proficiency

Explain the concept of intellectual property rights

Grade Four: Introduce and assess proficiency

Describe how copyright protects the right of an author or producer to control the distribution, performance, display, or copying of original works

Explain why the use of all or parts of another person's work requires prior permission or citation

Grade Four: Introduce and assess proficiency

Recognize that a quoted work must be stated in the author's exact words

Grade Four: Introduce and assess proficiency

List sources quoted verbatim and visuals used in a presentation

Grade Four: Introduce and assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
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GRADES FIVE - EIGHT

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Language Arts

Identify the various organizational patterns used in reference books

Grade Five: Introduce and assess proficiency
Grade Six: Maintain proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Use electronic encyclopedias, almanacs, indexes, and catalogs to retrieve and select information

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Demonstrate touch keyboarding skills at 20-25 wpm

Grade Five: Assess proficiency
Grade Six: Assess proficiency
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Explain the use of basic word processing functions (menu, tool bar, dialog boxes, radio buttons spell checker, thesaurus, page layout, headers and footers, word count, tabs)

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Use the thesaurus function of a word processing program

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Move textual and graphics data from one document to another

Grade Five: Introduce
Grade Six: Assess proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Use graphics software to import pictures, images, and charts into documents

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Use a graphical organizer program to construct outlines or webs that organize ideas and information

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Compose a report using advanced text formatting and layout styles

Grade Seven: Introduce
Grade Eight: Assess proficiency

Incorporate database and spreadsheet information in word-processed documents

Grade Seven: Introduce
Grade Eight: Assess proficiency

Send an e-mail message with an attachment to several persons simultaneously

Grade Seven: Introduce and assess proficiency
Grade Eight: Maintain proficiency

Identify and define computer and networking terms (modem, file server, client station, LAN, WAN, Internet/Intranet, data storage device)

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Organize and backup files on a computer disk, drive, server, or other storage device

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Recognize and solve routine computer hardware and software problems

Grade Seven: Introduce
Grade Eight: Assess proficiency

Scan, crop, and save a graphic using a scanner, digital camera, or other digitizing equipment

Grade Seven: Introduce
Grade Eight: Assess proficiency

Capture, edit, and combine video segments using a multimedia computer with editing software or a video editing system

Grade Seven: Introduce
Grade Eight: Assess proficiency

Describe the operating and file management software of a computer (desktop, file, window, folder, directory, pull-down menu, dialog box)

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Use a graphics program to create or modify detail to an image or picture

Grade Seven: Introduce
Grade Eight: Assess proficiency

Organize Internet bookmarks by subject or topic

Grade Seven: Introduce and assess proficiency
Grade Eight: Assess proficiency

Design and deliver a multimedia presentation, analyze effectiveness, and determine the criteria to judge quality

Grade Seven: Introduce
Grade Eight: Assess proficiency

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GRADES FIVE - EIGHT

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Language Arts

Identify relevant sources of information including print, nonprint, electronic, human, and community resources

Grade Five: Introduce
Grade Six: Assess proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Evaluate possible sources of information based on criteria of timeliness, genre, point of view, bias, and authority

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Select multiple sources that reflect differing or supporting points of view

Grade Seven: Introduce
Grade Eight: Assess proficiency

Examine selected resources for pertinent information using previewing techniques to scan for major concepts and keywords

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Differentiate between primary and secondary sources

Grade Seven: Introduce
Grade Eight: Assess proficiency

Distinguish between fact and opinion; recognize point of view or bias

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Determine if information is timely, valid, accurate, comprehensive, and relevant

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Locate indicators of authority for all sources of information

Grade Five: Introduce
Grade Six: Assess proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Use note taking strategies including summarizing and paraphrasing

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Record concise notes in a prescribed manner, including bibliographic info

Grade Seven: Introduce
Grade Eight: Assess proficiency

Gather and synthesize information as needed

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Draw conclusions to address the problem or question

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Select a presentation format appropriate to the topic, audience, purpose, content, and technology available

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Develop an original product or presentation which addresses the information problem or question

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Use Boolean operators with human or programmed guidance to narrow or broaden searches

Grade Eight: Introduce and assess proficiency

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GRADES FIVE - EIGHT

Standard C: Independent Learning

Students will apply information and technology skills to issues of personal and academic interest by actively and independently seeking information; demonstrating critical and discriminating reading, listening, and viewing habits; and, striving for personal excellence in learning and career pursuits.

Benchmark

Language Arts

Identify information appropriate for decision-making and personal interest

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Relate literature and creative expressions of information to other literature and other creative expressions of information

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Choose materials at appropriate developmental levels

Grade Five: Maintain proficiency
Grade Six: Maintain proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Identify and select materials that reflect diverse perspectives

Grade Five: Maintain proficiency
Grade Six: Maintain proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Identify characteristics of common literary forms

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Recognize how words, images, sounds, and illustrations can be constructed to convey specific messages, viewpoints, and values

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Participate in decisions about group and classroom projects and learning objectives

Grade Five: Maintain proficiency
Grade Six: Maintain proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

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GRADES FIVE - EIGHT

Standard D: The Learning Community

Students will demonstrate the ability to work collaboratively in teams or groups, use information and technology in a responsible manner, respect intellectual property rights, and recognize the importance of intellectual freedom and access to information in a democratic society.

Benchmark

Language Arts

Collaborate with others to identify information needs and seek solutions

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Demonstrate acceptance to new ideas and strategies from workgroup members

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Cite the source for words which are quoted verbatim and for pictures, graphics, and audio or video segments which are used in a product or presentation

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
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GRADES NINE - TWELVE

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Language Arts

Demonstrate proper keyboarding mechanics and touch type accurately

Grade Nine: Assess proficiency 30-35 wpm
Grade Ten: Maintain proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Use an integrated program or applications suite to complete an assignment

Grade Nine: Introduce and develop
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Proofread and edit a document using functions of the word processing program

Grade Nine: Assess proficiency
Grade Ten: Maintain proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Use desktop publishing and graphics to produce page layouts in different formats (brochure, tri-fold, newsletter)

Grade Nine: Introduce and develop
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Analyze data from a database and present conclusions in a document/report

Grade Nine: Introduce and develop
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Produce a multimedia program using text, graphics, moving images & sound

Grade Nine: Introduce and develop
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Develop a document or file for inclusion into a website or web page

Grade Nine: Introduce and Develop
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Determine criteria for judging the delivery, pacing, focus, and technical

Grade Ten: Introduce and develop

quality of a production or presentation

Grade Eleven: Develop
Grade Twelve: Assess proficiency

Use a camcorder, VCR, multimedia computer, or editing equipment to produce a short video program

Grade Ten: Introduce and develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Use desktop or video conferencing equipment and systems

Grade Eleven: Introduce and develop
Grade Twelve: Assess proficiency

Demonstrate how to import and export text, graphic, sound, movie and video files

Grade Nine: Introduce and develop
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Use desktop conferencing, e-mail, or groupware to communicate with others regarding assignments or class projects

Grade Twelve: Introduce and assess proficiency

Participate in an on-line discussion group or listserv appropriate to a topic

Grade Twelve: Introduce and assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
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GRADES NINE - TWELVE

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Language Arts

Conduct a preliminary search to determine if the research questions or thesis statement is clear and searchable; refine and revised as needed

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Identify a full range of appropriate and available information from local, national, and global sources

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Determine and apply evaluative criteria to prioritizing potential sources

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Pursue a variety of resources reflecting differing points of view, cultures, and disciplines

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Evaluate information for stereotyping, prejudice, and misrepresentation

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Distinguish among fact, opinion, point of view and inference

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Determine if sources are authoritative, valid, reliable, accurate, relevant, and comprehensive

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Evaluate graphic images for misleading presentation and manipulated data

Grade Ten: Introduce
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Determine authorship for all resources and identify points of agreement and disagreement among sources

Grade Ten: Introduce and develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Organize information in systematic manner for unity, coherence, clarity and emphasis

Grade Nine: Introduce and develop
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Interpret new information to formulate ideas which address the question or problem using comparison, evaluation, inference, and generalization skills

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Synthesize new ideas, evidence, and prior knowledge to address the problem or question

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Draw conclusions and support them with credible evidence

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Use different search strategies for bibliographic citations, abstracts, and full-text resources in electronic formats

Grade Eleven: Introduce
Grade Twelve: Assess proficiency

Construct effective electronic and manual searches using keywords, phrases, Boolean logic, and limiters

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Use data-gathering strategies that include summarizing, paraphrasing, comparing, and quoting

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Follow standardized note taking processes and compile bibliographic information in an approved format

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Credit sources for all quotations, visuals, major ideas, and specific facts or data using accepted citation formats

Compile a bibliography in a format stipulated by an accepted style manual

Develop a product or presentation that utilizes the strengths of the medium and supports the conclusions drawn in a research effort

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES NINE - TWELVE

Standard C: Independent Learning

Students will apply information and technology skills to issues of personal and academic interest by actively and independently seeking information; demonstrating critical and discriminating reading, listening, and view habits; and, striving for personal excellence in learning and career pursuits.

Benchmark

Language Arts

Recognize that core lists of classics and recommended titles
For precollege reading provide for a well-rounded literary background

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Evaluate how words, images, sounds, and illustrations are constructed
to convey specific messages, viewpoints, and values to shape attitudes
and influence action

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Develop and apply criteria for judging success of learning projects

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
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GRADES NINE - TWELVE

Standard D: The Learning Community

Students will demonstrate the ability to work collaboratively in teams or groups, use information and technology in a responsible manner, respect intellectual property rights, and recognize the importance of intellectual freedom and access to information in a democratic society.

Benchmark

Language Arts

Collaborate with others to design and develop information products and solutions

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Incorporate effective group processes and shared decision-making in project development

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Recognize the legal consequences of plagiarism and the need for personal authenticity in their work

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Explain conditions under which permission must be obtained for the use of copyrighted materials

Grade Ten: Introduce
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Describe how to correspond with authors, publishers, or producers to obtain permission to use copyrighted materials in their work

Grade Eleven: Introduce and develop
Grade Twelve: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
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GRADES KINDERGARTEN - FOUR

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Mathematics

Identify a spreadsheet and explain basic spreadsheet terms	Grade Four: Introduce and assess proficiency
Use a prepared spreadsheet template to enter and edit data, and to produce and interpret a simple graph or chart	Grade Four: Introduce and assess proficiency
Solve problems using the basic four arithmetic functions of a calculator when appropriate	Grade Four: Introduce and assess proficiency
Use a prepared database template to enter and edit data and locate records	Grade Four: Introduce and assess proficiency

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GRADES KINDERGARTEN - FOUR

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Mathematics

Formulate initial questions to define what additional information is needed

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Determine a specific focus for the information search questions

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Locate materials using the classification system of the school media center

Grade One: Introduce
Grade Two: Develop
Grade Three: Develop
Grade Four: Assess proficiency

Determine if information is relevant to the information question

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Select information applicable to the information question

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Apply the information gathered to solve the information problem or question

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

List steps to follow in carrying out an information search

Grade Three: Introduce
Grade Four: Assess proficiency

Determine timeliness and validity of information sources

Grade Four: Introduce and assess proficiency

Recognize that graphics and images can be used to convey a message

Grade Two: Introduce
Grade Three: Assess proficiency

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GRADES KINDERGARTEN - FOUR

Standard C: Independent Learning

Students will apply information and technology skills to issues of personal and academic interest by actively and independently seeking information; demonstrating critical and discriminating reading, listening, and viewing habits; and, striving for personal excellence in learning and career pursuits.

Benchmark

Identify topics of interest and seek relevant information about them

Mathematics

Kindergarten: Introduce

Grade One: Develop

Grade Two: Develop

Grade Three: Assess proficiency

Grade Four: Maintain proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES FIVE - EIGHT

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Mathematics

Use graphics software to import pictures, images, and charts into documents

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Incorporate database and spreadsheet information in word-processed documents

Grade Seven: Introduce
Grade Eight: Assess proficiency

Design and deliver a multimedia presentation, analyze effectiveness, and determine the criteria to judge quality

Grade Seven: Introduce
Grade Eight: Assess proficiency

Use simple graphing calculator functions to solve a problem

Grade Seven: Introduce
Grade Eight: Assess proficiency

Construct a simple spreadsheet, enter data, and interpret the information

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Plot and use different types of charts and graphs (line, bar, stacked, scatter diagram, area, pie charts, pictogram) from a spreadsheet program

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Classify collected data and construct a simple database by defining fields, entering and sorting data, and interpreting the data

Grade Seven: Introduce
Grade Eight: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES FIVE - EIGHT

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Mathematics

Evaluate possible sources of information based on criteria of timeliness, genre, point of view, bias, and authority

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Select multiple sources that reflect differing or supporting points of view

Grade Seven: Introduce
Grade Eight: Assess proficiency

Examine selected resources for pertinent information using previewing techniques to scan for major concepts and keywords

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Differentiate between primary and secondary sources

Grade Seven: Introduce
Grade Eight: Assess proficiency

Distinguish between fact and opinion; recognize point of view or bias

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Determine if information is timely, valid, accurate, comprehensive, and relevant

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Gather and synthesize information as needed

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Draw conclusions to address the problem or question

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Select a presentation format appropriate to the topic, audience, purpose, content, and technology available

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Develop an original product or presentation which addresses the information problem or question

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Use Boolean operators with human or programmed guidance to narrow or broaden searches

Grade Eight: Introduce and assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES FIVE - EIGHT

Standard C: Independent Learning

Students will apply information and technology skills to issues of personal and academic interest by actively and independently seeking information; demonstrating critical and discriminating reading, listening, and viewing habits; and, striving for personal excellence in learning and career pursuits.

Benchmark

Establish goals and develop a plan for completing projects on time and within the scope of the assignment

Mathematics

Grade Five: Introduce

Grade Six: Develop

Grade Seven: Develop

Grade Eight: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES NINE - TWELVE

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Mathematics

Use an integrated program or applications suite to complete an assignment	Grade Nine: Introduce and develop Grade Ten: Assess proficiency Grade Eleven: Maintain proficiency Grade Twelve: Maintain proficiency
Analyze data from a database and present conclusions in a document/report	Grade Nine: Introduce and develop Grade Ten: Assess proficiency Grade Eleven: Maintain proficiency Grade Twelve: Maintain proficiency
Construct a spreadsheet, enter data into cells, use mathematical functions to manipulate/process data, generate a chart or graph, and interpret the results	Grade Nine: Introduce Grade Ten: Develop Grade Eleven: Assess proficiency Grade Twelve: Maintain proficiency
Use desktop or video conferencing equipment and systems	Grade Eleven: Introduce and develop Grade Twelve: Assess proficiency
Use desktop conferencing, e-mail, or groupware to communicate with others regarding assignments or class projects	Grade Twelve: Introduce and assess proficiency
Participate in an on-line discussion group or listserv appropriate to a topic	Grade Twelve: Introduce and assess proficiency
Use a computer and graphical organizer software to generate modifiable flow charts, project time lines, organizational charts, or calendars	Grade Ten: Introduce and develop Grade Eleven: Assess proficiency Grade Twelve: Maintain proficiency
Gather and organize statistical or survey data using e-mail, listservs, or on-line news or discussion groups	Grade Ten: Introduce and develop Grade Eleven: Assess proficiency Grade Twelve: Maintain proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES NINE - TWELVE

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Analyze and relate information using a variety of relational techniques (graphic organizers, database reports, spreadsheet charts, graphs)

Interpret new information to formulate ideas which address the question or problem using comparison, evaluation, inference, and generalization skills

Develop a plan to obtain needed information using a variety of research and investigative strategies (interviews, questionnaires, experiments, surveys)

Synthesize new ideas, evidence, and prior knowledge to address a problem

Draw conclusions and support them with credible evidence

Mathematics

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES KINDERGARTEN - FOUR

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Science

Identify and use simple search engines and directories

Grade Three: Introduce
Grade Four: Assess proficiency

Log on and view information from preselected sites on the Internet

Grade Three: Introduce
Grade Four: Assess proficiency

Use the functions of a web browser to navigate and save websites

Grade Four: Introduce and assess proficiency

Use draw, paint, or graphics software to create simple signs, posters, etc.

Grade Four: Introduce and assess proficiency

Use a prepared spreadsheet template to enter and edit data, and to produce and interpret a simple graph or chart

Grade Four: Introduce and assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES KINDERGARTEN - FOUR

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Science

Identify the information problem or question to be resolved	Grade Two: Introduce Grade Three: Develop Grade Four: Assess proficiency
Determine what is already known about the information problem or question	Grade Two: Introduce Grade Three: Develop Grade Four: Assess proficiency
Formulate initial questions to define what additional information is needed	Grade Two: Introduce Grade Three: Develop Grade Four: Assess proficiency
Identify possible sources of information	Grade Two: Introduce Grade Three: Develop Grade Four: Assess proficiency
Locate materials using the classification system of the school media center	Grade One: Introduce Grade Two: Develop Grade Three: Develop Grade Four: Assess proficiency
Identify new information and integrate it with prior knowledge	Grade Three: Introduce Grade Four: Assess proficiency
Apply the information gathered to solve the information problem or question	Grade Two: Introduce Grade Three: Develop Grade Four: Assess proficiency
Identify the audience for the product or presentation	Grade Three: Introduce Grade Four: Assess proficiency
Identify the purpose of the product or presentation	Grade Three: Introduce Grade Four: Assess proficiency
Choose a presentation format	Grade Four: Introduce and assess proficiency
Develop a product or presentation to communicate the results of the research	Grade Four: Introduce and assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES KINDERGARTEN - FOUR

Standard C: Independent Learning

Students will apply information and technology skills to issues of personal and academic interest by actively and independently seeking information; demonstrating critical and discriminating reading, listening, and viewing habits; and, striving for personal excellence in learning and career pursuits.

Benchmark

Science

Identify topics of interest and seek relevant information about them

Kindergarten: Introduce
Grade One: Develop
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES FIVE - EIGHT

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

<u>Benchmark</u>	<u>Science</u>
Use graphics software to import pictures, images, and charts into documents	Grade Six: Introduce Grade Seven: Assess proficiency Grade Eight: Maintain proficiency
Incorporate database and spreadsheet information in word-processed documents	Grade Seven: Introduce Grade Eight: Assess proficiency
Design and deliver a multimedia presentation, analyze effectiveness, and determine the criteria to judge quality	Grade Seven: Introduce Grade Eight: Assess proficiency
Construct a simple spreadsheet, enter data, and interpret the information	Grade Six: Introduce Grade Seven: Assess proficiency Grade Eight: Maintain proficiency
Plot and use different types of charts and graphs (line, bar, stacked, scatter diagram, area, pie charts, pictogram) from a spreadsheet program	Grade Six: Introduce Grade Seven: Develop Grade Eight: Assess proficiency
Classify collected data and construct a simple database by defining fields, entering and sorting data, and interpreting the data	Grade Seven: Introduce Grade Eight: Assess proficiency
Use basic content-specific tools (environmental probes, measurement sensors) to provide evidence/support in a class project	Grade Seven: Introduce Grade Eight: Assess proficiency
Incorporate database and spreadsheet information (charts, graphs, lists) in word-processed documents	Grade Seven: Introduce Grade Eight: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES FIVE - EIGHT

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Science

Identify the information problem or question to be resolved

Grade Five: Introduce
Grade Six: Assess proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Relate what is already known to the information need

Grade Five: Introduce
Grade Six: Assess proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Formulate general and specific research questions using a variety of questioning skills

Grade Five: Introduce
Grade Six: Assess proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Revise and narrow the information questions to focus on the information need

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Evaluate possible sources of information based on criteria of timeliness, genre, point of view, bias, and authority

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Select multiple sources that reflect differing or supporting points of view

Grade Seven: Introduce
Grade Eight: Assess proficiency

Examine selected resources for pertinent information using previewing techniques to scan for major concepts and keywords

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Gather and synthesize information as needed

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Draw conclusions to address the problem or question

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Select a presentation format appropriate to the topic, audience, purpose, content, and technology available

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Develop an original product or presentation which addresses the information problem or question

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Use Boolean operators with human or programmed guidance to narrow or broaden searches

Grade Eight: Introduce and assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES NINE - TWELVE

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

<u>Benchmark</u>	<u>Science</u>
Use draw, paint, graphics, or presentation software to visually communicate ideas	Grade Nine: Introduce Grade Ten: Assess proficiency Grade Eleven: Maintain proficiency Grade Twelve: Maintain proficiency
Use an integrated program or applications suite to complete an assignment	Grade Nine: Introduce and develop Grade Ten: Assess proficiency Grade Eleven: Maintain proficiency Grade Twelve: Maintain proficiency
Analyze data from a database and present conclusions in a document/report	Grade Nine: Introduce and develop Grade Ten: Assess proficiency Grade Eleven: Maintain proficiency Grade Twelve: Maintain proficiency
Construct a spreadsheet, enter data into cells, use mathematical functions to manipulate/process data, generate a chart or graph, and interpret the results	Grade Nine: Introduce Grade Ten: Develop Grade Eleven: Assess proficiency Grade Twelve: Maintain proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES NINE - TWELVE

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Science

Analyze and relate information using a variety of relational techniques (graphic organizers, database reports, spreadsheet charts, graphs)

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Interpret new information to formulate ideas which address the question or problem using comparison, evaluation, inference, and generalization skills

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Develop a plan to obtain needed information using a variety of research and investigative strategies (interviews, questionnaires, experiments, surveys)

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Synthesize new ideas, evidence, and prior knowledge to address a problem

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Draw conclusions and support them with credible evidence

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Determine the audience and purpose for communicating the information

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Develop a product or presentation that utilizes the strengths of the medium and supports the conclusions drawn in a research effort

Grade Nine: Introduce
Grade Ten: Develop

Grade Eleven: Develop
Grade Twelve: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES KINDERGARTEN - FOUR

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Social Studies

Access information using common electronic reference sources

Grade Three: Introduce concept
Grade Four: Assess proficiency

Use a prepared database to enter and edit data and to locate records

Grade Four: Introduce and assess proficiency

Use draw, paint, or graphics software to create simple signs, posters, etc.

Grade Four: Introduce and assess proficiency

Create and present a short video or hypermedia program

Grade Four: Introduce and assess proficiency

Log on and view information from preselected sites on the Internet

Grade Three: Introduce
Grade Four: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES KINDERGARTEN - FOUR

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Social Studies

Identify the information problem or question to be resolved

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Determine what is already known about the information problem or question

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Formulate initial questions to define what additional information is needed

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Identify possible sources of information

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Locate materials using the classification system of the school media center

Grade One: Introduce
Grade Two: Develop
Grade Three: Develop
Grade Four: Assess proficiency

Identify new information and integrate it with prior knowledge

Grade Three: Introduce
Grade Four: Assess proficiency

Apply the information gathered to solve the information problem or question

Grade Two: Introduce
Grade Three: Develop
Grade Four: Assess proficiency

Identify the audience for the product or presentation

Grade Three: Introduce
Grade Four: Assess proficiency

Identify the purpose of the product or presentation

Grade Three: Introduce
Grade Four: Assess proficiency

Choose a presentation format

Grade Four: Introduce and assess proficiency

Develop a product or presentation to communicate the results of the research

Grade Four: Introduce and assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES KINDERGARTEN - FOUR

Standard C: Independent Learning

Students will apply information and technology skills to issues of personal and academic interest by actively and independently seeking information; demonstrating critical and discriminating reading, listening, and viewing habits; and, striving for personal excellence in learning and career pursuits.

Benchmark

Social Studies

Identify topics of interest and seek relevant information about them

Kindergarten: Introduce
Grade One: Develop
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Compare their own interpretations of literature and other creative expressions

Kindergarten: Introduce
Grade One: Develop
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Recognize that information can be used to make decisions or satisfy personal interest

Grade One: Introduce
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Recognize that media can be constructed to convey specific messages, viewpoints, and values

Grade Three: Introduce
Grade Four: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES KINDERGARTEN - FOUR

Standard D: The Learning Community

Students will demonstrate the ability to work collaboratively in teams or groups, use information and technology in a responsible manner, respect intellectual property rights, and recognize the importance of intellectual freedom and access to information in a democratic society.

Benchmark

Social Studies

Define the concept of intellectual freedom	Grade Four: Introduce and assess proficiency
Identify examples of censorship	Grade Four: Introduce and assess proficiency
Recognize the importance of free and open access to information for all	Grade Four: Introduce and assess proficiency
Acknowledge the right of classmates to express opinions different than one's own	Kindergarten: Introduce Grade One: Develop Grade Two: Assess proficiency Grade Three: Maintain proficiency Grade Four: Maintain proficiency
Describe situations or conditions where information is repressed or restricted	Grade Four: Introduce and assess proficiency
Share information and ideas with others	Kindergarten: Introduce Grade One: Develop Grade Two: Assess proficiency Grade Three: Maintain proficiency Grade Four: Maintain proficiency
Respect the ideas of others	Kindergarten: Introduce Grade One: Develop Grade Two: Assess proficiency Grade Three: Maintain proficiency Grade Four: Maintain proficiency
Articulate workgroup goals and individual responsibilities within a group	Kindergarten: Introduce Grade One: Develop Grade Two: Assess proficiency Grade Three: Maintain proficiency Grade Four: Maintain proficiency

Participate in the development of individual and workgroup tasks & priorities

Grade Three: Introduce
Grade Four: Assess proficiency

Recognize that individual achievement is linked to the successful completion of workgroup projects

Grade Three: Introduce
Grade Four: Assess proficiency

Return all borrowed materials on time

Kindergarten: Introduce
Grade One: Develop
Grade Two: Assess proficiency
Grade Three: Maintain proficiency
Grade Four: Maintain proficiency

Employ proper etiquette in all forms of communication

Kindergarten: Introduce
Grade One: Develop
Grade Two: Develop
Grade Three: Develop
Grade Four: Assess proficiency

Recognize that altering or destroying another person's program or file constitutes unacceptable behavior

Kindergarten: Introduce
Grade One: Develop
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

Recognize the need for privacy of personal information

Kindergarten: Introduce
Grade One: Develop
Grade Two: Develop
Grade Three: Assess proficiency
Grade Four: Maintain proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES FIVE - EIGHT

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Social Studies

Use electronic encyclopedias, almanacs, indexes, and catalogs to retrieve and select information

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Use graphics software to import pictures, images, and charts into documents

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Compose a class report using advanced text formatting and layout styles

Grade Seven: Introduce
Grade Eight: Assess proficiency

Incorporate database and spreadsheet information in word-processed documents

Grade Seven: Introduce
Grade Eight: Assess proficiency

Design and deliver a multimedia presentation, analyze effectiveness, and determine the criteria to judge quality

Grade Seven: Introduce
Grade Eight: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES FIVE - EIGHT

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Social Studies

Formulate general and specific research questions using a variety of questioning skills

Grade Five: Introduce
Grade Six: Assess proficiency
Grade Seven: Maintain proficiency
Grade Eight: Maintain proficiency

Revise and narrow the information questions to focus on the information need

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Select multiple sources that reflect differing or supporting points of view

Grade Seven: Introduce
Grade Eight: Assess proficiency

Examine selected resources for pertinent information using previewing techniques to scan for major concepts and keywords

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Gather and synthesize information as needed

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Select a presentation format appropriate to the topic, audience, purpose, content, and technology available

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Develop an original product or presentation which addresses the information problem or question

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Use Boolean operators with human or programmed guidance to narrow or broaden searches

Grade Eight: Introduce and assess proficiency

Use note taking strategies including summarizing and paraphrasing

Grade Six: Introduce
Grade Seven: Develop
Grade Eight: Assess proficiency

Record concise notes in a prescribed manner, including bibliographic info

Grade Seven: Introduce
Grade Eight: Assess proficiency

Cite the source of specific quotations or visuals using footnotes, endnotes, citation formats

Grade Seven: Introduce Grade Eight: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES FIVE - EIGHT

Standard C: Independent Learning

Students will apply information and technology skills to issues of personal and academic interest by actively and independently seeking information; demonstrating critical and discriminating reading, listening, and viewing habits; and, striving for personal excellence in learning and career pursuits.

Benchmark

Recognize that accurate and complete information is basic to sound decisions in both personal and academic pursuits

Identify and select materials that reflect diverse perspectives

Social Studies

Grade Six: Introduce

Grade Seven: Assess proficiency

Grade Eight: Maintain proficiency

Grade Six: Introduce

Grade Seven: Develop

Grade Eight: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES FIVE - EIGHT

Standard D: The Learning Community

Students will demonstrate the ability to work collaboratively in teams or groups, use information and technology in a responsible manner, respect intellectual property rights, and recognize the importance of intellectual freedom and access to information in a democratic society.

Benchmark

Social Studies

Explain the concept of intellectual freedom

Grade Six: Introduce
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Recognize that the free-flow of information contributes to an informed citizenry resulting in sound decisions for the common good

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Cite the source for words which are quoted verbatim and for pictures, graphics, and audio or video segments which are used in a product or presentation

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Assess proficiency
Grade Eight: Maintain proficiency

Identify examples and explain the implications of censorship in the U.S. and other countries

Grade Five: Introduce
Grade Six: Develop
Grade Seven: Develop
Grade Eight: Assess proficiency

Explain the importance of the principle of equitable access to information

Grade Eight: Introduce and assess proficiency

Compare and contrast freedom of the press in different situations and geographic areas

Grade Eight: Introduce and assess proficiency

Define the purpose of copyright and copyright law

Grade Eight: Introduce and assess proficiency

Identify what kinds of works of authorship can be copyrighted

Grade Eight: Introduce and assess proficiency

Explain and differentiate the purposes of a patent, trademark, and logo

Grade Eight: Introduce and assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES NINE - TWELVE

Standard A: Media and Technology

Students will select and use media and technology to access, organize, create, and communicate information for solving problems and constructing new knowledge, products, and systems.

Benchmark

Use an integrated program or applications suite to complete an assignment

Analyze data from a database and present conclusions in a document/report

Social Studies

Grade Nine: Introduce and develop
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Grade Nine: Introduce and develop
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
INFORMATION AND TECHNOLOGY CURRICULUM**

GRADES NINE - TWELVE

Standard B: Information and Inquiry

Students will access, evaluate, and apply information efficiently and effectively from a variety of sources in print, nonprint, and electronic formats to meet personal and academic needs.

Benchmark

Social Studies

Identify a full range of appropriate and available information from local, national, and global sources

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Pursue a variety of resources reflecting differing points of view, cultures, and disciplines

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Evaluate information for stereotyping, prejudice, and misrepresentation

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Distinguish among fact, opinion, point of view and inference

Grade Nine: Introduce
Grade Ten: Assess proficiency
Grade Eleven: Maintain proficiency
Grade Twelve: Maintain proficiency

Determine if sources are authoritative, valid, reliable, accurate, relevant, and comprehensive

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Evaluate graphic images for misleading presentation and manipulated data

Grade Ten: Introduce
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Determine authorship for all resources and identify points of agreement and disagreement among sources

Grade Ten: Introduce and develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Organize information in systematic manner for unity, coherence, clarity and emphasis

Grade Nine: Introduce and develop
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Interpret new information to formulate ideas which address the question or problem using comparison, evaluation, inference, and generalization skills

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Synthesize new ideas, evidence, and prior knowledge to address the problem or question

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Use data-gathering strategies that include summarizing, paraphrasing, comparing, and quoting

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Follow standardized note taking processes and compile bibliographic information in an approved format

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Credit sources for all quotations, visuals, major ideas, and specific facts or data using accepted citation formats

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Compile a bibliography in a format stipulated by an accepted style manual

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Develop a product or presentation that utilizes the strengths of the medium and supports the conclusions drawn in a research effort

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Evaluate how the research question or problem, search strategy, resources, and interpretation could have been expanded or modified

Grade Nine: Introduce - Grade Ten: Develop
Grade Eleven: Develop - Grade Twelve: Assess proficiency

**SCHOOL DISTRICT OF NORTH FOND DU LAC
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GRADES NINE - TWELVE

Standard C: Independent Learning

Students will apply information and technology skills to issues of personal and academic interest by actively and independently seeking information; demonstrating critical and discriminating reading, listening, and view habits; and, striving for personal excellence in learning and career pursuits.

Benchmark

Evaluate how words, images, sounds, and illustrations are constructed to convey specific messages, viewpoints, and values to shape attitudes and influence action

Develop and apply criteria for judging success of learning projects

Establish goals, plans, budgets, and timelines for completing projects

Articulate personal goals in pursuit of individual interests, academic requirements, and career paths

Social Studies

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Develop
Grade Twelve: Assess proficiency

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GRADES NINE - TWELVE

Standard D: The Learning Community

Students will demonstrate the ability to work collaboratively in teams or groups, use information and technology in a responsible manner, respect intellectual property rights, and recognize the importance of intellectual freedom and access to information in a democratic society.

Benchmark	Social Studies
Summarize how the basic principles of democracy relate to intellectual freedom	Grade Nine: Introduce Grade Ten: Develop Grade Eleven: Assess proficiency Grade Twelve: Maintain proficiency
Collaborate with others to design and develop information products and solutions	Grade Nine: Introduce Grade Ten: Develop Grade Eleven: Develop Grade Twelve: Assess proficiency
Incorporate effective group processes and shared decision-making in project development	Grade Nine: Introduce Grade Ten: Develop Grade Eleven: Develop Grade Twelve: Assess proficiency
Recognize the legal consequences of plagiarism and the need for personal authenticity in their work	Grade Nine: Introduce Grade Ten: Develop Grade Eleven: Develop Grade Twelve: Assess proficiency
Specify and detail workgroup goals and individual and subgroup responsibilities	Grade Nine: Introduce Grade Ten: Develop Grade Eleven: Assess proficiency Grade Twelve: Maintain proficiency

Finalize workgroup strategies, resources, budget, and timeline

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Allocate time for a project based on an inventory of the responsibilities of workgroup members

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Complete specific projects within a timeline and budget

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency

Critique completed projects and workgroup processes for future improvement

Grade Nine: Introduce
Grade Ten: Develop
Grade Eleven: Assess proficiency
Grade Twelve: Maintain proficiency