

# Directions for Interpreting the Minimum Required Content

1. **CONTENT STANDARDS** are statements that define what students should know and be able to do at the conclusion of a course or grade. Content standards in this document contain minimum required content. The order in which standards are listed within a course or grade is not intended to convey a sequence for instruction. Each content standard completes the phrase “*Students will.*”

*Students will:*

Critique digital content for validity, accuracy, bias, currency, and relevance.

(Computer Applications – Content Standard 11)

2. **BULLETS** denote content that is related to the standards and required for instruction. Bulleted content is listed under a standard and identifies additional minimum required content.

*Students will:*

Identify common hardware and software problems..

- Determining basic troubleshooting strategies to correct hardware and software problems

(Third-Fifth Grade – Content Standard 3)

3. **EXAMPLES** clarify certain components of content standards or bullets. They are illustrative but not exhaustive.

*Students will:*

Describe advances in technology and the effects of each on the workplace and society.

Examples: agriculture, manufacturing, medicine, warfare, transportation, communication, education

(Sixth-Eighth Grade – Content Standard 10)

## **Third – Fifth Grade Overview**

Students in Grades 3-5 begin to expand their horizons and exercise more independent thought and action. Many opportunities to utilize technology should be provided for students to work collaboratively and independently to accomplish authentic tasks. Research conducted through digital communities and interaction with experts in specialized fields of study sharpens skills needed across all curriculum areas, including data analysis, problem solving, reading for meaning, organizing information, and drawing conclusions. Students begin to use digital resources more independently to conduct searches required for completing task assignments. This naturally leads to discussion of safe, legal, and ethical use of information and judgments as to the value of information found in digital sources.

Activities using information drawn from digital sources lend structure to projects while remaining open-ended enough to encourage critical thinking and allow for pursuit of individual interests. Students at this age are becoming more literate regarding the use of a variety of technology that enables them to express themselves through original compositions and illustrations.

A technology-infused curriculum cultivates an atmosphere rich with motivation and interest in which students thrive intellectually and emotionally. Technology and academic skills mastered at this level provide the basis for future learning experiences.

# Third – Fifth Grade

## Technology Operations and Concepts

Students will:

1. Use input and output devices of technology systems.  
Examples: input—recording devices, keyboards, touchscreens  
output—printers
  - Demonstrating ergonomics relative to technology systems
  - Demonstrating correct keyboarding techniques
  - Demonstrating safe removal of storage media
2. Use various technology applications, including word processing and multimedia software.
  - Using navigational features commonly found in technology applications
  - Identifying digital file types
3. Identify common hardware and software problems.
  - Determining basic troubleshooting strategies to correct hardware and software problems
4. Identify various operating systems of technology devices.

## Digital Citizenship

5. Practice safe use of technology systems and applications.  
Examples: protecting personal information online, avoiding inappropriate sites, exiting inappropriate sites
6. Describe social and ethical behaviors related to technology use.  
Examples: social—developing positive attitudes towards using technology collaboratively  
ethical—citing sources of text and digital content, avoiding plagiarism, avoiding manipulation of others' work without permission
  - Describing the global nature of the Internet
  - Following local acceptable use policies regarding technology
  - Identifying intrusive applications, including worms, viruses, spyware, and pop-up advertisements
7. Explain the influence of technology on society.  
Examples: multiple digital communities, medical and agricultural advancements

## **Research and Information Fluency**

8. Collect information from a variety of digital sources.  
Examples: online libraries, multimedia dictionaries
  - Using technology tools to organize information
  - Demonstrating efficient Internet search strategies  
Example: keyword search
  - Evaluating electronic resources for reliability based on publication date, bias, accuracy, and source credibility
9. Use technology tools to organize, interpret, and display data.  
Examples: spreadsheets, databases, electronic graphing tools

## **Communication and Collaboration**

10. Use digital environments to collaborate and communicate.  
Examples: publishing online journals, sharing presentations, contributing to online discussions, communicating with experts
  - Producing digital works collaboratively  
Examples: developing shared writing projects and group multimedia projects

## **Critical Thinking, Problem Solving, and Decision Making**

11. Use digital tools to analyze authentic problems.  
Examples: electronic graphing tools, concept mapping software

## **Creativity and Innovation**

12. Create a product using digital tools.  
Examples: products—digital story, podcast, digital artwork