Digital Applications and Responsibility

Digital Applications and Responsibility prepares students to use technology in an effective and appropriate manner in school, in a job, or everyday life. Students develop skills related to word processing, spreadsheets, presentations, and communications software. Students learn what it means to be a good digital citizen and how to use technology, including social media, responsibly. Students expand their knowledge of how to use digital devices and software to build decision-making and problem-solving skills. Students should be provided with the opportunity to seek industry-recognized digital literacy certifications.

- **DOE Code:** 4528
- **Recommended Grade Level:** Grade 9-12
- **Recommended Prerequisite:** None
- **Credits:** 2 semester course, 1 credit per semester, 2 credits maximum
- **Counts as a Directed Elective or Elective all diplomas**

**Dual Credit**

This course provides the opportunity for dual credit for students who meet postsecondary requirements for earning dual credit and successfully complete the dual credit requirements of this course.

**Career and Technical Student Organizations (CTSOs)**

Career and Technical Student Organizations are considered a powerful instructional tool when integrated into Career and Technical Education programs. They enhance the knowledge and skills students learn in a course by allowing a student to participate in a unique program of career and leadership development. Students should be encouraged to participate in Business Professional of America, DECA, or Future Business Leaders of America, the CTSOs for this area.

**Content Standards**

**Domain – Technology as a Planning and Productivity Tool**

**Core Standard 1** Students integrate technology to arrange materials and solve problems efficiently.

**Standards**

- **DAR-1.1** Apply technology as a means to create business, industry, and professional tasks and develop strategies for solving problems
- **DAR-1.2** Use appropriate technology to plan, develop, edit and present material to different types of audiences both in a group or individually (i.e., paper, web page, multimedia presentation, publications, speech, hypermedia, etc.)
- **DAR-1.3** Integrate information and communication technology to analyze a real-world problem, design and implement procedures to monitor information, set timelines, and evaluate progress toward the solution
- **DAR-1.4** Using appropriate handling and use of supplies and equipment, practice respectful and responsible use of technology through abiding by the professional practices
- **DAR-1.5** Apply an understanding of plagiarism and fair use; respect copyright laws of information producers such as authors and artists, including website developers
Domain – Document Processing

Core Standard 2 Students design documents by using complex features of software to develop advanced documents that are user-friendly.

Standards
DAR-2.1 Create and manage master documents and subdocuments by using various edit tools, formatting tools, and templates
DAR-2.2 Use advanced features to create combo boxes, macros, newsletters with mastheads, multi-column brochures, multi-page books, forms wizards, composition, table of contents, and mail merge
DAR-2.3 Explain the use of various document types and how they related to different situations (school, work, home, etc)
DAR-2.4 Demonstrate saving, opening, and finding files in various formats and the ability to follow instructions

Domain – Spreadsheet Software

Core Standard 3 Students apply concepts of spreadsheet software to organize and manipulate data.

Standards
DAR-3.1 Use industry terminology when using spreadsheet software
DAR-3.2 Apply relative, absolute, mixed cell references and advanced features (i.e. naming ranges; track, accept and reject changes; formatting, filtering and protection) in formulas and printing
DAR-3.3 Create and evaluate formulas and functions; customize formats; pivot tables and charts; and edit and run command buttons, macros and macros with buttons
DAR-3.4 Edit and label chart components (i.e. axis, legends, titles, and databases)
DAR-3.5 Link and merge worksheets/workbooks; importing and exporting data to and from spreadsheets

Domain – Presentation Software

Core Standard 4 Students create a variety of multi-media presentations using appropriate design principles to communicate in a professional manner.

Standards
DAR-4.1 Demonstrate how electronic presentations are created
DAR-4.2 Apply Industry design guidelines to create, manipulate and enhance visual presentations
DAR-4.3 Demonstrate presentation skills by creating well-organized, audience-appropriate presentations such as informative, entertaining, instructional, while using proper public speaking techniques
DAR-4.4 Create a stand-alone presentation with video, embedded objects, specialized features, by modifying and designing templates

Domain – Database Software

Core Standard 5 Students synthesize database management concepts to manage, evaluate, and organize information in an effective manner.

Standards
DAR-5.1 Create database objects such as tables, forms and queries
DAR-5.2 Use advanced functions to filter, extract, and split databases and cross reference
DAR-5.3 Use a database application software to create or modify a database structure, enter records in a database, create reports, sort and index a database

Domain – Internet Tools
Core Standard 6 Students establish communication and collaboration skills using the internet and social media to increase global awareness.

Standards
DAR-6.1 Construct basic HTML5 coding
DAR-6.2 Apply and adapt best practices for internet research
DAR-6.3 Investigate the effects of social media tools on society
DAR-6.4 Explain concepts of internet privacy and security

Domain – Technology Assessment
Core Standard 7 Students apply technology concepts to take industry standard certifications.

Standards
DAR-7.1 Investigate industry-based certifications within the information technology industry
DAR-7.2 Take computer-based narrative tests and computer adaptive timed tests for topic remediation and support

Domain – Functions on Technology
Core Standard 8 Students connect functions of technology with computer hardware and software so they make decisions about computer technology.

Standards
DAR-8.1 Identify the principle hardware components of a microcomputer and describe their functions
DAR-8.2 Use operating system utilities to control the operation of the computer
DAR-8.3 Investigate security risks and how to prevent or resolve security issues
DAR-8.4 Recognize and explain compatibility issues and common errors
DAR-8.5 Assess the risk associated with upgrading technology
DAR-8.6 Identify preventative maintenance products and techniques
DAR-8.7 Establish knowledge of computer technology in relationship to networks