PROGRAM CONCENTRATION: Middle School Business and Computer Science
COURSE TITLE: Middle School Business and Computer Science Grade 8

COURSE DESCRIPTION:

Using project based instruction students are introduced to the principles of business in the 21st century while refreshing their keyboarding skills. This course should also help students to use computers effectively in their lives, thus providing a connection of computer science and business careers.

In this course, middle school students build a knowledge base of computer applications, information systems, internet safety, 21st century skills, and business and computer science careers of the 21st century.

Exposure to networking and programming will also be important threads in this course.

Competencies for the co-curricular student organization Future Business Leaders of America (FBLA) are integral components of the performance standards. FBLA activities should be incorporated throughout instructional strategies developed for the course.

KEYBOARDING:

Students will develop and apply keyboarding skills utilizing current technology.

MSBCS-BCSIII-1: Students will reinforce keyboarding techniques.

a) Identify and demonstrate appropriate techniques.
b) Identify ergonomic issues.
c) Refine touch method keyboarding speed and accuracy skills using the Alphanumeric and Numeric keypad.

ACADEMIC STANDARDS:

ELA8RC3 – The student acquires new vocabulary in each content area and uses it correctly.

NBEA NATIONAL STANDARDS:

Standard 1 – Use input technologies appropriately to enter and manipulate text and data.
KEYBOARDING UNIT:

SAMPLE TASKS:

- Students will do keying exercises everyday using proper technique (example: Microtype or approved textbook or typing software)
- Students will perform 3-minute timed writings.
- Students will demonstrate proper keying techniques during the use of all software applications (i.e. journal writing, business letters, spreadsheets, flyers, presentations, brochures, etc.).

21ST CENTURY SKILLS:

The student demonstrates an understanding of 21st century skills such as communication, problem solving, and critical thinking as relates to the business world.

MSBCS-BCSIII-2: The students will demonstrate effective communication skills used to succeed in the business world.

  a) Verbal Communication
  b) Written communication
  c) Bridging cultural differences and using differing perspectives to increase innovation and the quality of work.
  d) Explain the importance of proper etiquette for greeting and meeting people, dress code, attendance, and other workplace expectations.
  e) Differentiate between verbal and non-verbal

MSBCS-BCSIII-3: The students will demonstrate the ability to problem solve.

  a) Utilize brainstorming techniques
  b) Identify cause and effects.
  c) Understand how a process works.
  d) Understand the big picture and beyond yourself.

MSBCS-BCSIII-4: The students will exhibit critical thinking.

  a) Understanding the importance of making informed or educated decisions.
  b) Develop cohesive and logical reasoning patterns.
  c) Importance of accepting, rejecting or suspending judgment.
**ACADEMIC STANDARDS:**

*ELA8RC3* – The student acquires new vocabulary in each content area and uses it correctly.

*ELA8C1* – The student demonstrates understanding and control of the rules of the English language, realizing that usage involves the appropriate application of conventions and grammar in both written and spoken formats.

*M8RC1* – Students will enhance reading in all curriculum areas.

*S8CS6* – Students will communicate scientific ideas and activities clearly.

**NBEA NATIONAL STANDARDS:**

*Standard 1* – Assess personal skills, abilities, and aptitudes and personal strengths and weaknesses as they relate to career exploration and development.

*Standard 2* – Communicate in a clear, courteous, concise, and correct manner on personal and professional levels.

*Standard 3* – Apply basic social communication skills in personal and professional situations.

*Standard 4* – Use technology to enhance the effectiveness of communication.

*Standard 5* – Incorporate appropriate leadership and supervision techniques, customer service strategies, and personal ethics standards to communicate effectively with various business constituencies.

**21ST CENTURY SKILLS UNIT:**

**SAMPLE TASKS:**

- Interview local businesses about employability skills needed and performance reviews. ([www.dol.state.ga.us](http://www.dol.state.ga.us)) – job seekers, job search handbook – 12 chapters listed
- Guest speaker from the business community. (Talk about cultural differences, expectations, and proper etiquette)
- Fill-out an application from a local business.
- Have students debate controversial issues in the business world (speaking English, health issues, visual appearance, etc.)
- Have students engage in team building activities and have them present on their topics.
BUSINESS FOUNDATIONS:

Enhance a rudimentary understanding of business areas using a variety of computer applications.

MSBCS-BCSIII-5: The students will examine basics of accounting.

   a) Define credits and debits.
   b) Identify account types (assets, liabilities, Income and Expenses).
   c) Examine and create a balance sheet using a spreadsheet application.
   d) Examine and create an income statement using a spreadsheet application.

MSBCS-BCSIII-6: The students will examine basics of risk management.

   a) Define risk management.
   b) Identify and assess risk in terms of impact and likelihood including proactive and reactive assessments. Example: Military and Ford (Bridgestone tire issue)

MSBCS-BCSIII-7: The students will examine basics of entrepreneurship.

   a) Define entrepreneurship (National Standards for NBEA, pg. 70) and steps needed to start and maintain a business opportunity.
   b) Distinguish the role of the entrepreneur in business.
   c) Identify necessary traits of a successful entrepreneur.
   d) Describe the difference between an employer and employee.
   e) Differentiate between a manager and an entrepreneur.

MSBCS-BCSIII-8: The students will examine basics of networking.

   a) Define key terms (servers, routers, hubs, LANs, WANs, queues, IP addresses)
   b) Identify the types of networks and their features.
   c) Create an example of a network using presentation software, Inspiration, and/or word processing applications.
   d) Compare and contrast types of networks, including LANs versus WANs using a word processing application and/or spreadsheet application to demonstrate their understanding.
   e) Describe, compare and contrast Internet protocols (e.g., http, https, and ftp) using a word processing application and/or spreadsheet application.

MSBCS-BCSIII-9: The students will examine basics of business law.

   a) Identify sources of business law.
   b) Understand the different classifications of business law.
   c) Distinguish between civil and criminal law.
d) Identify different areas of civil law that impact business (ie., tort, contract, property law).

e) Differentiate among types of business crimes. (ie., arson, forgery, embezzlement, computer crimes).

f) Understand the applicability of business law from the standpoint of citizens, workers (includes business owners) and consumers in their communities and in society at large (ref. National Standards of NBEA, pg. 10).

g) Introduce to OSHA state and federal regulatory guidance.

h) Create a safety manual

i) Equal pay act

j) Describe their individual code of ethics using word processing application.

**MSBCS-BCSIII-10:** The students will examine basics of marketing.

a) List and describe the four elements of the marketing mix (product, place, price and promotion).

b) Explain the importance of target market relative to cultural diversity.

c) Address the elements of the marketing mix utilizing desktop publishing, word processing and/or web page application.

**ACADEMIC STANDARDS:**

**ELA8W3** – The student uses research and technology to support writing.

**ELA8W4** – The student consistently uses the writing process to develop, revise, and evaluate writing.

**M8A1** – Students will use algebra to represent, analyze, and solve problems.

**M8A3** – Students will understand relations and linear functions.

**M8D2** – Students will determine the number of outcomes related to a given event.

**M8D3** – Students will use the basic laws of probability.

**M8D4** – Students will organize, interpret, and make inferences from statistical data.

**M8P1** – Students will solve problems (using appropriate technology).

**M8P2** – Students will reason and evaluate mathematical arguments.

**M8P3** – Students will communicate mathematically.
M8P4 – Students will make connections among mathematical ideas and to other disciplines.

S8CS6 – Students will communicate scientific ideas and activities clearly.

S8CS1 – Students will explore the importance of curiosity, honesty, openness, and skepticism in science and will exhibit these traits in their own efforts to understand how the world works.

M8RC1 – Students will enhance reading in all curriculum areas.

S8CS6 – Students will communicate scientific ideas and activities clearly.

**NBEA NATIONAL STANDARDS:**

Standard 1 – Apply generally accepted accounting principles to determine the value of assets, liabilities, and owner's equity.

Standard 2 – Analyze the relationship between ethics and the law and describe sources of the law, the structure of the court system, different classifications of procedural law, and different classifications of substantive law.

Standard 3 – Analyze the relationships between contract law, law of sales, and consumer law.

Standard 4 – Analyze the role and importance of agency law and employment law as they relate to the conduct of business in the national and international marketplaces.

Standard 5 – Describe the major types of business organizations operating within the socioeconomic arena of the national and international marketplace.

Standard 6 – Explain the legal rules that apply to the environment and energy regulation.

Standard 7 – Assess opportunity costs and trade-offs involved in making choices about how to use scarce economic resources.

Standard 8 – Analyze choices available to consumers for protection against risk and financial loss.

Standard 9 – Recognize that entrepreneurs possess unique characteristics and evaluate the degree to which one possesses those characteristics.

Standard 10 – Use the financial competencies needed by an entrepreneur.

Standard 11 – Develop a business plan.
Standard 12 – Describe current and emerging computer architecture; configure, install, and upgrade hardware; diagnose and repair hardware problems.

Standard 13 – Identify, evaluate, select, install, use, upgrade, customize, and diagnose and solve problems with various types of operating systems, environments, and utilities.

Standard 14 – Describe the information technology components of major business functions and explain their interrelationships.

Standard 15 – Use input technologies appropriately to enter and manipulate text and data.

Standard 16 – Develop the skills to design, deploy, and administer networks and communications systems.

Standard 17 – Use, evaluate, and deploy communications and networking applications.

Standard 18 – Design and implement risk management policies and procedures for information technology.

Standard 19 – Describe positions and career paths in information technology.

Standard 20 – Analyze the management functions and their implementation and integration within the business environment.

Standard 21 – Analyze management theories and their application within the business environment.

Standard 22 – Analyze the organization of a business.

Standard 23 – Develop personal management skills to function effectively and efficiently in a business environment.

Standard 24 – Examine the role of ethics and social responsibility in decision making.

Standard 25 – Describe human resource functions and their importance to an organization's successful operation.

Standard 26 – Utilize information and technology tools to conduct business effectively and efficiently.

Standard 27 – Recognize the customer-oriented nature of marketing and analyze the impact of marketing activities on the individual, business, and society.

Standard 28 – Analyze the characteristics, motivations, and behaviors of consumers.
Standard 29 – Analyze the influence of external factors on marketing.

Standard 30 – Analyze the elements of the marketing mix, their interrelationships, and how they are used in the marketing process.

Standard 31 – Analyze the role of marketing research in decision making.

Standard 32 – Describe the elements, design, and purposes of a marketing plan.

**BUSINESS FOUNDATIONS UNIT:**

**SAMPLE TASKS:**

- Students will investigate famous entrepreneurs such as Michael Dell, Bill Gates, Doris Christopher, Rich Johnson, Mary Kay and Russell Simmons using the Internet and identify traits that they have in common.
- Students will list and describe skills needed to be a successful entrepreneur.
- Students will evaluate their small business financial needs such as renting office space, marketing plan, personnel, and technology needs by listening to a guest speaker and then estimate how much money they will need by outlining a budget for their business using a spreadsheet and explain how they will finance their business (business loans) using word processing software.
- Students will recognize important accounting procedures such as keeping track of revenue and expenses by creating a balance sheet and income statement using a spreadsheet.
- Students will plan and create a marketing brochure using desktop publishing software and/or a website using web enabled software.
- Students will comprehend risk management using word processing software.
- Using plan layout software such as a word processing program or presentation program, students will create an office including office space for personnel, technology (computers, hubs, copiers, printers, telephones), and meeting rooms.
- Students will describe different laws that help to govern businesses such as OSHA and Equal Employment Opportunities.
- Students will create a PowerPoint incorporating all knowledge learned from the different sample tasks.
- Build a business.
EXPLORATION OF 21ST CENTURY CAREERS – PATHWAYS:

Students will explore multiple career paths and their interrelatedness. They will become acquainted with the array of careers in society.

**MSBCS-BCSII-11**: The student will examine educational requirements, job responsibilities, employment trends, and opportunities within different career pathways.

a) Investigate the 21st Century career opportunities.
b) Evaluate several occupational interests, based on various criteria (educational requirements, starting salaries, trends, opportunities, and career ladders).
c) Describe and demonstrate effective communication skills (reading, writing, speaking, and listening) in a business environment.
d) Explain why people need to work (e.g., social contacts, make purchases for necessities, expand knowledge, develop skills to meet basic needs and for personal satisfaction and enjoyment.
e) Construct and/or update an Individual Career Plan that tailors to the student’s individual interests/goals.
f) Use the student’s Individual Career Plan to explore self-knowledge and academic aptitude and understand that career paths should be related to your individual traits.

**ACADEMIC STANDARDS:**

*ELA8LSV1* – The student participates in student-to-teacher, student-to-student, and group verbal interactions.

*ELA8LSV2* – The student listens to and views various forms of text and media in order to gather and share information,

*ELA8R2* – The student understands and acquires new vocabulary and uses it correctly in reading and writing.

*M8D4* – Students will organize, interpret, and make inferences from statistical data.

*S8CS10* – Students will enhance reading in all curriculum areas

**NBEA NATIONAL STANDARDS:**

Standard 1 – Assess personal skills, abilities, and aptitudes and personal strengths and weaknesses as they relate to career exploration and development.
Standard 2 – Utilize career resources to develop a career information database that includes international career opportunities.

Standard 3 – Relate the importance of workplace expectations to career development.

Standard 4 – Apply knowledge gained from individual assessment to a comprehensive set of goals and an individual career plan.

Standard 5 – Develop strategies to make an effective transition from school to career.

Standard 6 – Relate the importance of lifelong learning to career success.

Standard 7 – Evaluate savings and investment options to meet short- and long-term goals.

Standard 8 – Apply a decision-making model to maximize consumer satisfaction when buying goods and services.

Standard 9 – Evaluate services provided by financial deposit institutions to transfer funds. Analyze factors that affect the choice of credit, the cost of credit, and the legal aspects of using credit.

EXPLORATION OF 21ST CENTURY CAREERS—PATHWAY UNIT:

SAMPLE TASKS:

- Use GCIS to complete the interest profiler. Then, select the top three careers and create a slide show in PowerPoint including: nature of work, working conditions, qualifications and earnings.
- Use the Occupational Outlook website to research occupations of interest.
- Use Paint to draw a picture of their future office and use it as a background in PowerPoint.
- Have students dress up as the occupation they have chosen and take pictures of them and use the pictures in PowerPoint. They can also use Faststone to edit and put frames around the pictures.
- Use Excel to input living expenses, salaries, and cost of living and input formulas to add and get a total for the different categories.

FINANCIAL LITERACY:

Students will examine the basics of economics and personal finance.

MSBCS-BCSIII-12: The student will demonstrate an understanding of economics.

a) Compare and contrast microeconomics and macroeconomics.
b) Explain the concept of Scarcity.
c) Discuss elasticity of supply and demand (cause and effects)
d) Define and list examples of natural, human, and capital goods.

**MSBCS-BCSIII-13:** The student will demonstrate an understanding of personal finance.

a) Saving and investing
b) Earning a living
c) Budgeting
   o Categorizing expenses (variable and fixed)
   o Compare and contrast budgets and zero-based budget.

**ACADEMIC STANDARDS:**

*ELA8RC2 – The student participates in discussions related to curricular learning in all subject areas.*

*M8A1 – Students will use algebra to represent, analyze, and solve problems.*

*M8D4 – Students will organize, interpret, and make inferences from statistical data.*

*M8P1 – Students will solve problems (using appropriate technology).*

*S8CS3 – Students will have the computation and estimation skills necessary for analyzing data and following scientific explanations.*

*S8CS10 – Students will enhance reading in all curriculum areas.*

**NBEA NATIONAL STANDARDS:**

*Standard 1 – Assess opportunity costs and trade-offs involved in making choices about how to use scarce economic resources.*

*Standard 2 – Explain why societies develop economic systems, identify the basic features of different economic systems, and analyze the major features of the U.S. economic system.*

*Standard 3 – Analyze the role of markets and prices in the U.S. economy.*

*Standard 4 – Analyze how the U.S. economy functions as a whole and describe selected macroeconomic measures of economic activity.*

**FINANCIAL LITERACY UNIT:**
SAMPLE TASKS:

- See tasks from business foundations (example: student will evaluate financial needs for a business and outline a budget for the businesses survival using the business they created).
- Using the information (wages/salary) from the career pathways they will create a budget/spending plan using a spreadsheet application.
- Suggested software: Coast to Coast – On your own.

READING STANDARD COMMENT:

After the elementary years, students are seriously engaged in reading for learning. This process sweeps across all disciplinary domains, extending even to the area of personal learning. Students encounter a variety of informational as well as fictional texts, and they experience text in all genres and modes of discourse. In the study of various disciplines of learning (language arts, mathematics, science, social studies), students must learn through reading the communities of discourse of each of those disciplines. Each subject has its own specific vocabulary, and for students to excel in all subjects, they must learn the specific vocabulary of those subject areas in context.

Beginning with the middle grade years, students begin to self-select reading materials based on personal interests established through classroom learning. Students become curious about science, mathematics, history, and literature as they form contexts for those subjects related to their personal and classroom experiences. As students explore academic areas through reading, they develop favorite subjects and become confident in their verbal discourse about those subjects.

Reading across curriculum content develops both academic and personal interests in students. As students read, they develop both content and contextual vocabulary. They also build good habits for reading, researching, and learning. The Reading Across the Curriculum standard focuses on the academic and personal skills students acquire as they read in all areas of learning.

CTAEMRC-1: Students will enhance reading in all curriculum areas by:

a. Reading in all curriculum areas.
   - Read a minimum of 25 grade-level appropriate books per year from a variety of subject disciplines and participate in discussions related to curricular learning in all areas.
   - Read both informational and fictional texts in a variety of genres and modes of discourse.
   - Read technical texts related to various subject areas.

b. Discussing books.
   - Discuss messages and themes from books in all subject areas.
   - Respond to a variety of texts in multiple modes of discourse.
- Relate messages and themes from one subject area to messages and themes in another area.
- Evaluate the merit of texts in every subject discipline.
- Examine author’s purpose in writing.
- Recognize the features of disciplinary texts.

c. Building vocabulary knowledge.
- Demonstrate an understanding of contextual vocabulary in various subjects.
- Use content vocabulary in writing and speaking.
- Explore understanding of new words found in subject area texts.

d. Establishing context.
- Explore life experiences related to subject area content.
- Discuss in both writing and speaking how certain words are subject area related.
- Determine strategies for finding content and contextual meaning for unknown words.

**WRITING:**

The student writes clear, coherent text. The writing shows consideration of the audience and purpose. The student progresses through the stages of the writing process (e.g., prewriting, drafting, revising, and editing successive versions).

**CTAEW-1: The student demonstrates competence in a variety of genres.**

The student produces technical writing (business correspondence: memoranda, emails, letters of inquiry, letters of complaint, instructions and procedures, lab reports, slide presentations) that:

a) Creates or follows an organizing structure appropriate to purpose, audience, and context.
b) Excludes extraneous and inappropriate information.
c) Follows an organizational pattern appropriate to the type of composition.
d) Applies rules of Standard English.

**CTAEW-2: The student uses research and technology to support writing.**

The student:

a) Identifies topics, asks and evaluates questions, and develops ideas leading to inquiry, investigation, and research.
b) Uses organizational features of electronic text (e.g., bulletin boards, databases, keyword searches, e-mail addresses) to locate relevant information.
c) Includes researched information in different types of products (e.g., compositions, multimedia presentations, graphic organizers, projects, etc.).
d) Uses appropriate structures to ensure coherence (e.g., transition elements).
e) Supports statements and claims with anecdotes, descriptions, facts and statistics, and specific examples.
f) Gives credit for both quoted and paraphrased information in a bibliography by using a consistent and sanctioned format and methodology for citations.

CTAEW-3: The student consistently uses the writing process to develop, revise, and evaluate writing.

The student:

a) Plans and drafts independently and resourcefully.
b) Uses strategies of note taking, outlining, and summarizing to impose structure on composition drafts.
c) Edits writing to improve word choice after checking the precision of the vocabulary.

ENTREPRENEURSHIP:

MKT-EN-1: Understands concepts and processes associated with successful entrepreneurial performance.

a) Define entrepreneurship.
b) Identify and analyze characteristics of a successful entrepreneur.
c) Identify the reasons for planning in entrepreneurial businesses.
d) Discuss the entrepreneurial discovery processes.
e) Assess global trends and opportunities.
f) Determine opportunities for business creation.
g) Generate ideas for business.
h) Determine feasibility of ideas.
i) Determine the major reasons for business failure.

ACADEMIC STANDARDS:

ELA8W1 – The student produces writing that establishes an appropriate organizational structure, sets a context and engages the reader, maintains a coherent focus throughout, and signals a satisfying closure.

ELA8W3 – The student uses research and technology to support writing.

SSEF6 – The student will explain how productivity, economic growth and future standards of living are influenced by investment in factories, machinery, new technology and the health, education and training of people.

SSEIN1 – The student will explain why individuals, businesses and governments trade goods and services.
MKT-EN-2: Explain the fundamental concepts of business ownership.

a) Determine the relationship of competition to our private, free enterprise system.
b) Explain the effects of competition on buyers and sellers.
c) Identify the common types of business ownership.
d) Compare and contrast the advantages and disadvantages of each type of ownership.
e) Explain relevant government regulations relating to the operation of a business.
f) Discuss the types of risks that businesses encounter.
g) Explain how businesses deal with the various types of risks.
h) Identify the market segment for the business.
i) Formulate a marketing mix designed to reach a specific market segment.
j) Utilize the marketing functions to determine the competitive advantage of the proposed business.

ACADEMIC STANDARDS:

ELA8W1 – The student produces writing that establishes an appropriate organizational structure, sets a context and engages the reader, maintains a coherent focus throughout, and signals a satisfying closure.

ELA8W3 – The student uses research and technology to support writing.

SSEF5 – The student will describe the roles of government in a market economy.

CTAE FOUNDATION SKILLS:

The Foundation Skills for Career, Technical and Agricultural Education (CTAE) are critical competencies that students pursuing any career pathway should exhibit to be successful. As core standards for all career pathways in all program concentrations, these skills link career, technical and agricultural education to the state’s academic performance standards.

The CTAE Foundation Skills are aligned to the foundation of the U.S. Department of Education’s 16 Career Clusters. Endorsed by the National Career Technical Education Foundation (NCTEF) and the National Association of State Directors of Career Technical Education Consortium (NASDCTEc), the foundation skills were developed from an analysis of all pathways in the sixteen occupational areas. These standards were identified and validated by a national advisory group of employers, secondary and postsecondary educators, labor associations, and other stakeholders. The Knowledge and Skills provide learners a broad foundation for managing lifelong learning and career transitions in a rapidly changing economy.

CTAE-FS-1 Technical Skills: Learners achieve technical content skills necessary to pursue the full range of careers for all pathways in the program concentration.
CTAE-FS-2 Academic Foundations: Learners achieve state academic standards at or above grade level.

CTAE-FS-3 Communications: Learners use various communication skills in expressing and interpreting information.

CTAE-FS-4 Problem Solving and Critical Thinking: Learners define and solve problems, and use problem-solving and improvement methods and tools.

CTAE-FS-5 Information Technology Applications: Learners use multiple information technology devices to access, organize, process, transmit, and communicate information.

CTAE-FS-6 Systems: Learners understand a variety of organizational structures and functions.

CTAE-FS-7 Safety, Health and Environment: Learners employ safety, health and environmental management systems in corporations and comprehend their importance to organizational performance and regulatory compliance.

CTAE-FS-8 Leadership and Teamwork: Learners apply leadership and teamwork skills in collaborating with others to accomplish organizational goals and objectives.

CTAE-FS-9 Ethics and Legal Responsibilities: Learners commit to work ethics, behavior, and legal responsibilities in the workplace.

CTAE-FS-10 Career Development: Learners plan and manage academic-career plans and employment relations.

CTAE-FS-11 Entrepreneurship: Learners demonstrate understanding of concepts, processes, and behaviors associated with successful entrepreneurial performance.