Course of Study Information Page

Course Title: ICT (Information and Communication Technology) Entrepreneur #0452

Rationale: The business world is becoming increasingly dependent on a vast technological foundation that is rapidly evolving from a technology platform that requires flexibility and adaptability. This course will provide students with a foundation in the economic, financial, and technological aspects of business to become competent consumers, employees, and entrepreneurs.

Course Description: Designed to give students a broad base of knowledge that includes the legal, managerial, financial, ethical, and industry-standard supported technology to make appropriate business decisions.

How Does This Course Align With or Meet State and District Content Standards?

Length of Course:	One Year(36-40 weeks)
Grade Level:	9 -12
Credit:	10 credits Elective
	Vocational
Prerequisites:	ICT Foundations – grade "C" or better or teacher approval.
Department(s):	Business Technology
District Sites:	EDHS, ORHS, PHS, UMHS
Board of Trustees Adoption Date:	January 15, 2008
Textbook(s)/Instructional Materials:	
Date Adopted by the Board of Trustees:	

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UNIT # 1: Managing a Business

GOAL: Students will create a business database from the beginning, organize the data into tables, create forms for simple record viewing and run queries and reports to determine real time information.

OBJECTIVES	SUGGESTED ACTIVITIES
The student will:	
Create a database with multiple tables to include business information	Activities includes:Create new database and organize data
Create and modify tables in design view	 Create tables containing data for Employees, Products & Suppliers
Create a report and use the report window to modify a report design Create a report with grouping & subtotals	 Special Reports to determine inventory, & highlight employees and suppliers
How to run specialized queries using multiple criteria	 Queries to determine real time product status and other variables for the business
Create forms with an Object Linking and Embedding (OLE), sub form and Hyperlink Use the Form Window to modify the design Create a custom form with a title, combo box and calculated field	 Product forms with image of each product Product forms with a Hyperlink to supplier web site Add titles to each form and include a calculated field to determine the product cost

ISTE Standards:

- 3. Research and Information Fluency: Students apply digital tools to gather, evaluate, and use information. Students:
 - a. Plan strategies to guide inquiry.
 - b. Locate, organize, analyze, evaluate, synthesize, and ethically use information from a variety of sources and media.
 - d. Process data and report results.
- 4. Critical Thinking, Problem-Solving & Decision-Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
 - a) Identify and define authentic problems and significant questions for investigation.
 - b) Plan and manage activities to develop a solution or complete a project.
 - c) Collect and analyze data to identify solutions and/or make informed decisions.
 - d) Use multiple processes and diverse perspectives to explore alternative solutions.
- 6. Technology Operations and Concepts: Students demonstrate a sound understanding of technology concepts, systems and operations. Students:
 - a. Understand and use technology systems.
 - b. Select and use applications effectively and productively.
 - c. Troubleshoot systems and applications.
 - d. Transfer current knowledge to learning of new technologies.

Content Area Standards

- 1.0 Academics: Students understand the academic content required for entry into postsecondary education and employment in the Information Technology sector.
 - 1.2 Science: (Science Standard)
 - 1.a Select and use appropriate tools and technology, such as spreadsheet and charts, to perform tests, collect data, analyze relationships, and display data.
 - 1.d Formulate explanations by using logic and evidence.
 - 2.1 Reading:
 - 2.6 Demonstrate use of sophisticated learning tools by following technical directions (e.g., those found with graphic calculators and specialized software programs and in access guides to World Wide Web sites on the Internet).
 - 2.7 Critique the logic of functional documents by examining the sequence of information and procedures in anticipation of possible reader misunderstandings.
 - 2.3 Written and Oral English Language Conventions:
 - 1.4 Produce legible work that shows accurate spelling and correct use of the conventions of punctuation and capitalization.
- 4.0 Technology: Students know how to use contemporary and emerging technological resources in diverse and changing personal, community, and workplace environments.
 - 4.2 Understand the use of technological resources to gain access to, manipulate, and produce information, products, and services.

- 5.0 Problem Solving and Critical Thinking: Students understand how to create alternative solutions by using critical and creative thinking skills, such as logical reasoning, analytical thinking, problem-solving techniques:
 - 5.1 Apply appropriate problem-solving strategies and critical thinking skills to work-related issues and tasks.
 - 5.2 Understand the systematic problem-solving models that incorporate input, process, outcome, and feedback components.
 - 5.3 Use critical thinking skills to make informed decisions and solve problems.
- 6.0 Health and Safety: Students understand health and safety policies, regulations, and practices, including the use of equipment and handling of hazardous materials:
 - 6.3 Understand the environmental and ergonomic risks associated with the use of business equipment and the financial impact of an unsafe work environment.
- 7.0 Responsibility and Flexibility: Students know the behaviors associated with the demonstration of responsibility and flexibility in personal, workplace, and community settings:
 - 7.1 Understand the qualities and behaviors that constitute a positive and professional work demeanor.
 - 7.2 Understand the importance of accountability and responsibility in fulfilling personal, community, and workplace roles.
 - 7.3 Understand the need to adapt to varied roles and responsibilities.
 - 7.4 Understand that individual actions can affect the larger community.
- 9.0 Leadership and Teamwork: Students understand effective leadership styles, key concepts of group dynamics, team and individual decision making, the benefits of workforce diversity, and conflict resolution:
 - 9.1 Understand the characteristics and benefits of teamwork, leadership, and citizenship in the school, community, and workplace settings.
 - 9.3 Understand how to organize and structure work individually and in teams of effective performance and the attainment of goals.
 - 9.5 Understand how to interact with others in ways that demonstrate respect for individual and cultural differences and the attitudes and feelings of others.
- 11.0 Demonstration and Application: Students demonstrate and apply the concepts contained in the foundation and pathway standards.

Pathway Standards:

- A10.0 Students understand and implement database management systems:
- A10.1 Know the variety of data types that are stored in database management systems.
- B4.0 Students apply technical and interpersonal skills and knowledge to support the user:
 - B4.2 Know the available resources for identifying and resolving problems.

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UNIT # 2: Advertising Documents

GOAL: Students will create various Business documents to answer the customer's questions as well as provide information of interest about the company to persuade them to use their business.

then business.	
OBJECTIVES	SUGGESTED ACTIVITIES
The student will learn:	
The importance of professional documents when advertising a business and how to create them using the following techniques:: create/format Word Art, insert/format a floating graphic, justify a paragraph, insert a Drop Cap, insert a column break, shade a text box and balance columns.	Students will create: Business card for owner Postcard advertisement to mail to customers A 3-column professional newsletter with a diagram and special format.

ISTE Standards:

- 1. Creativity and Innovation: Students demonstrate creative thinking, construct knowledge, and develop innovative products and processes using technology. Students:
 - a. Apply existing knowledge to generate new ideas, products, or processes.
 - b. Create original works as a means of personal or group expression.
 - c. Use models and simulations to explore complex systems and issues.
 - d. Identify trends and forecast possibilities.
- 4. Critical Thinking, Problem-Solving & Decision-Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
 - a. Identify and define authentic problems and significant questions for investigation.
 - b. Plan and manage activities to develop a solution or complete a project.
 - c. Collect and analyze data to identify solutions and/or make informed decisions.
 - d. Use multiple processes and diverse perspectives to explore alternative solutions.

Content Area Standards

2.0 Communications: Students understand the principles of effective oral, written, and multimedia communication in a variety of formats and contexts.

- 2.1 Reading (Reading Standard)
 - 2.1 Analyze the structure and format of functional workplace documents, including the graphics and headers, and explain how authors use the features to achieve their purposes.
 - 2.2 Prepare a bibliography of reference materials for a report using a variety of consumer, workplace, and public documents.
 - 2.4 Synthesize the content from several sources or works by a single author dealing with a single issue; paraphrase the ideas and connect them to other sources and related topics to demonstrate comprehension.
- 2.2 Writing (Writing Standard)
 - 1.7 Use appropriate conventions for documentation in the text, notes, and bibliographies by adhering to those in style manuals.
 - 1.8 Design and publish documents by using advanced publishing software and graphic programs.
 - 2.3.d Include visual aids by employing appropriate technology to organize and record information on charts, maps and graphs.
 - 2.5 Write business letters, job applications and résumés:
 - a. Provide clear and purposeful information and address the intended audience appropriately.
 - b. Use appropriate vocabulary, tone and style to take into account the nature of the relationship with, and the knowledge and interests of, the recipients.
 - c. Highlight central ideas or images.
 - d. Follow a conventional style with page formats, fonts, and spacing that contribute to the documents' readability and impact.
- 2.3 Written and Oral English Language Conventions:
 - 1.4 Produce legible work that shows accurate spelling and correct use of the conventions of punctuations and capitalization.
 - 1.5 Reflect appropriate manuscript requirements, including title page presentation, pagination, spacing and margins, and integrations of source and support material with appropriate citations.

3.0 Career Planning and Management: Students understand how to make effective decisions, use career information, and manage personal career plans:

- 3.6 Know important strategies for self-promotion in the hiring process, such as job applications, résumé writing, interviewing skills, and preparation of a portfolio.
- 4.0 Technology: Students know how to use contemporary and emerging technological resources in diverse and changing personal, community, and workplace environments.
 - 4.2 Understand the use of technological resources to gain access to, manipulate, and produce information, products, and services.
- 5.0 Problem Solving and Critical Thinking: Students understand how to create alternative solutions by using critical and creative thinking skills, such as logical reasoning, analytical thinking, problem-solving techniques:
 - 5.1 Apply appropriate problem-solving strategies and critical thinking skills to work-related issues and tasks.
 - 5.2 Understand the systematic problem-solving models that incorporate input, process, outcome, and feedback components.
 - 5.3 Use critical thinking skills to make informed decisions and solve problems.

- 6.0 Health and Safety: Students understand health and safety policies, regulations, and practices, including the use of equipment and handling of hazardous materials:
 - 6.3 Understand the environmental and ergonomic risks associated with the use of business equipment and the financial impact of an unsafe work environment.
- 7.0 Responsibility and Flexibility: Students know the behaviors associated with the demonstration of responsibility and flexibility in personal, workplace, and community settings:
 - 7.1 Understand the qualities and behaviors that constitute a positive and professional work demeanor.
 - 7.2 Understand the importance of accountability and responsibility in fulfilling personal, community, and workplace roles.
 - 7.3 Understand the need to adapt to varied roles and responsibilities.
 - 7.4 Understand that individual actions can affect the larger community.
- 9.0 Leadership and Teamwork: Students understand effective leadership styles, key concepts of group dynamics, team and individual decision making, the benefits of workforce diversity, and conflict resolution:
 - 9.1 Understand the characteristics and benefits of teamwork, leadership, and citizenship in the school, community, and workplace settings.
 - 9.3 Understand how to organize and structure work individually and in teams of effective performance and the attainment of goals.
 - 9.5 Understand how to interact with others in ways that demonstrate respect for individual and cultural differences and the attitudes and feelings of others.
- 11.0 Demonstration and Application: Students demonstrate and apply the concepts contained in the foundation and pathway standards.

Pathways: E-commerce Pathway

- A3.0 Students understand important promotional strategies for communicating information about products, services, images, and ideas in an e-commerce environment:
- A3.3 Know the essential components of an effective e-commerce Web site.
- A3.4 Know public relations strategies and techniques for online businesses.

Pathways: Entreprenuership Pathway

- B3.0 Students understand how to use technology in a small business to gain a competitive advantage:
- B3.1 Know how technology and electronic media can be used to manage work flow and provide feedback for operational efficiency.

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UNIT # 3: Presentation/Multimedia

GOAL: Student will learn to create dynamic presentations that include tables, objects and organization charts that support the feasibility of opening a business.

OBJECTIVES	SUGGESTED ACTIVITIES
The student will:	
Create a persuasive Presentation to a bank using the following techniques: Insert and edit text based content Insert a table Insert an Object Create an Organization chart Customize bullets Add a graphic to the background Add sound, and inserting an Excel chart.	Students will create a presentation that will include information to effectively demonstrate the attributes and feasibility of a new business. Items included are: A complete description of the business A company mission statement Graphics of food and beverages served A table that includes a partial menu Specific buildings/locations for business in an Excel spreadsheet A table of monthly business expenses & salaries An organization chart of the company's employees
Learn the basics of Fireworks that include:	 A series of Fireworks tutorials that include enhancing images & logos Create a banner with images and text for a web page for the restaurant business.

ISTE Standards:

- 1. Creativity and Innovation: Students demonstrate creative thinking, construct knowledge, and develop innovative products and processes using technology. Students:
 - a. Apply existing knowledge to generate new ideas, products, or processes.
 - b. Create original works as a means of personal or group expression.
 - c. Use models and simulations to explore complex systems and issues.
 - d. Identify trends and forecast possibilities.
- 2. Communication and Collaboration: Students use digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning of others. Students:
 - a. Interact, collaborate and publish with peers, experts, or others employing a variety of digital environments or media.
 - b. Communicate information and ideas effectively to multiple audiences using a variety of media and formats.
 - d. Contribute to project teams to produce original works or solve problems.
- 4. Critical Thinking, Problem-Solving & Decision-Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
 - a. Identify and define authentic problems and significant questions for investigation.
 - b. Plan and manage activities to develop a solution or complete a project.
 - c. Collect and analyze data to identify solutions and/or make informed decisions.
 - d. Use multiple processes and diverse perspectives to explore alternative solutions.

Content Area Standards (Please identify the source)

2.0 Communications: Students understand the principles of effective oral, written, and multimedia communication in a variety of formats and contexts.

2.2 Writing

Writing Strategies for 11th and 12th

- 1.6 Develop presentations by using clear research questions and creative and critical research strategies
- 2.6 Deliver multimedia presentations
 - a. Combine text, images and sound and draw information from many sources.
 - b. Select an appropriate medium for each element of the presentation.
 - c. Use the selected media skillfully, editing appropriately, and monitoring for quality.
- 2.4 Listening and Speaking
 - 1.7 Use props, visual aids, graphs and electronic media to enhance the appeal and accuracy of presentation.
 - 2.6 Deliver descriptive presentations:
 - c. Use effective, factual descriptions of appearance, concrete images, shifting perspectives and vantages points, and sensory details.
 - 2.7 Deliver multimedia presentations:
 - a. Combine text, images and sound by incorporating information from a wide range of media, including films, newspapers, magazines, CD ROMs, online information, television, videos and electronic media generated images.
 - b. Select an appropriate medium for each element of the presentation.
 - c. Use the selected media skillfully, editing appropriately, and monitoring for quality.

4.0 Technology: Students know how to use contemporary and emerging technological resources in diverse and changing personal, community, and workplace environments.

4.2 Understand the use of technological resources to gain access to, manipulate, and produce information, products, and services.

5.0 Problem Solving and Critical Thinking: Students understand how to create alternative solutions by using critical and creative thinking skills, such as logical reasoning, analytical thinking, problem-solving techniques:

- 5.1 Apply appropriate problem-solving strategies and critical thinking skills to work-related issues and tasks.
- 5.2 Understand the systematic problem-solving models that incorporate input, process, outcome, and feedback components.
- 5.3 Use critical thinking skills to make informed decisions and solve problems.

10.0 Technical Knowledge and Skills: Students understand the essential knowledge and skills common to all pathways in the Information Technology sector.

10.6 Understand the interrelationships between hardware components and supportive software.

Pathways: A. E-commerce Pathway

A3.0 Students understand important promotional strategies for communicating information about products, services, images, and ideas in an e-commerce environment:

- A3.3 Know the essential components of an effective e-commerce Web site.
- A3.4 Know public relations strategies and techniques for online businesses.

A3.0 Students understand important promotional strategies for communicating

information about products, services, images, and ideas in an e-commerce environment:

- A3.3 Know the essential components of an effective e-commerce Web site.
- A3.4 Know public relations strategies and techniques for online businesses.

Pathway: B. Entrepreneurship Pathway

B3.0 Students understand how to use technology in a small business to gain a competitive advantage:

B3.3 Understand the software technologies used to make a Web site effective for small business needs.

Department: Business/Technology Course Title: ICT- Entrepreneur

UNIT #4: Marketing Fundamentals

GOAL: Students will learn marketing concepts, the functions of marketing, where marketing takes place, and the need for marketing a business.

OBJECTIVES	SUGGESTED ACTIVITIES
The student will learn the:	
Elements of the Marketing Concept	Student will pick any five businesses and identify what each business did to determine the following: Identify needs of customer Develop & market products or services Operate their business profitably
Functions of Marketing	Student will find a clip from a newspaper or article on-line and prepare a brief report that describes how a company performed a marketing function as it developed a new product or service for a business.
Where marketing takes place	Students will research and find five different ways they have seen marketing take place in a one week period. Students will identify a business in each of the following areas: Businesses directly involved in Marketing Businesses with major Marketing activities Businesses with a limited Marketing role
Need for marketing a business	Students will research their local community and list five businesses that are performing marketing functions and tell why they are doing it that way. Does their current marketing plan meet their needs?

ISTE Standards:

- 3. Research and Information Fluency: Students apply digital tools to gather, evaluate, and use information. Students:
 - c. Plan strategies to guide inquiry.
 - d. Locate, organize, analyze, evaluate, synthesize, and ethically use information from a variety of sources and media.
 - e. Process data and report results.
- 4. Critical Thinking, Problem-Solving & Decision-Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
 - e) Identify and define authentic problems and significant questions for investigation.
 - f) Plan and manage activities to develop a solution or complete a project.
 - g) Collect and analyze data to identify solutions and/or make informed decisions.
 - h) Use multiple processes and diverse perspectives to explore alternative solutions.
- 6. Technology Operations and Concepts: Students demonstrate a sound understanding of technology concepts, systems and operations. Students:
 - e. Understand and use technology systems.
 - f. Select and use applications effectively and productively.
 - g. Troubleshoot systems and applications.
 - h. Transfer current knowledge to learning of new technologies.

Content Area Standards

- 1.0 Academics: Students understand the academic content required for entry into postsecondary education and employment in the Information Technology sector.
 - 1.2 Science: (Science Standard)
 - 1.a Select and use appropriate tools and technology, such as spreadsheet and charts, to perform tests, collect data, analyze relationships, and display data.
 - 1.d Formulate explanations by using logic and evidence.
 - 2.1 Reading:
 - 2.6 Demonstrate use of sophisticated learning tools by following technical directions (e.g., those found with graphic calculators and specialized software programs and in access guides to World Wide Web sites on the Internet).
 - 2.7 Critique the logic of functional documents by examining the sequence of information and procedures in anticipation of possible reader misunderstandings.
 - 2.3 Written and Oral English Language Conventions:
 - 1.4 Produce legible work that shows accurate spelling and correct use of the conventions of punctuation and capitalization.
- 4.0 Technology: Students know how to use contemporary and emerging technological resources in diverse and changing personal, community, and workplace environments.
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- 5.0 Problem Solving and Critical Thinking: Students understand how to create alternative solutions by using critical and creative thinking skills, such as logical reasoning, analytical thinking, problem-solving techniques:
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 - 5.3 Use critical thinking skills to make informed decisions and solve problems.
- 6.0 Health and Safety: Students understand health and safety policies, regulations, and practices, including the use of equipment and handling of hazardous materials:
 - 6.3 Understand the environmental and ergonomic risks associated with the use of business equipment and the financial impact of an unsafe work environment.
- 7.0 Responsibility and Flexibility: Students know the behaviors associated with the demonstration of responsibility and flexibility in personal, workplace, and community settings:
 - 7.1 Understand the qualities and behaviors that constitute a positive and professional work demeanor.
 - 7.2 Understand the importance of accountability and responsibility in fulfilling personal, community, and workplace roles.
 - 7.3 Understand the need to adapt to varied roles and responsibilities.
 - 7.4 Understand that individual actions can affect the larger community.
- 9.0 Leadership and Teamwork: Students understand effective leadership styles, key concepts of group dynamics, team and individual decision making, the benefits of workforce diversity, and conflict resolution:
 - 9.1 Understand the characteristics and benefits of teamwork, leadership, and citizenship in the school, community, and workplace settings.
 - 9.3 Understand how to organize and structure work individually and in teams of effective performance and the attainment of goals.
 - 9.5 Understand how to interact with others in ways that demonstrate respect for individual and cultural differences and the attitudes and feelings of others.
- 11.0 Demonstration and Application: Students demonstrate and apply the concepts contained in the foundation and pathway standards.

Pathway Standards:

- A10.0 Students understand and implement database management systems:
 - A10.1 Know the variety of data types that are stored in database management systems.
- B4.0 Students apply technical and interpersonal skills and knowledge to support the user:
 - B4.2 Know the available resources for identifying and resolving problems.

Pathway: B. Entrepreneurship Pathway

- B4.2 Know the components of a promotional plan and how the plan is used to achieve a stated outcome
- B4.4 Understand how market research is used to develop strategies for marketing products or services in a small business

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UNIT # 5: Market Research

GOAL: Student will research and collect demographic information on the Internet to determine the feasibility and/or success of a new business in a given area. Students will collect information from financial institutions to determine the best lending rate for their loan.

OBJECTIVES	SUGGESTED ACTIVITIES
The student will learn:	
To use effective Internet search techniques to acquire data	Students will identify Market Issues to determine specifics about their customers: Who are my Customers? Where are my Customers? What do my customers want? When do my customers buy? Why do my customers buy?
Evaluate the feasibility of opening a business in a particular area	 Research & determine the specific geographical location to open a business & determine why this location will help make it successful Research specific buildings for sale in that location that can be used for your new business Research information on banks and their interest rates for a loan Research the customer demographics of the area picked for this business
Evaluate business competitors	Students will research three similar businesses: o In the area you want to open your business o That are the same as yours o That have good web sites

ISTE Standards:		

- 3. Research and Information Fluency: Students apply digital tools to gather, evaluate, and use information. Students:
 - a. Plan strategies to guide inquiry.
 - b. Locate, organize, analyze, evaluate, synthesize, and ethically use information from a variety of sources and media.
 - c. Evaluate and select information sources and digital tools based on the appropriateness to specific tasks.
 - d. Process data and report results.
- 4. Critical Thinking, Problem-Solving & Decision-Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
 - a. Identify and define authentic problems and significant questions for investigation.
 - b. Plan and manage activities to develop a solution or complete a project.
 - c. Collect and analyze data to identify solutions and/or make informed decisions.
 - d. Use multiple processes and diverse perspectives to explore alternative solutions.
- 5. Digital Citizenship: Students understand human, cultural, and societal issues related to technology and practice legal and ethical behavior. Students:
 - a. Advocate and practice safe, legal, and responsible use of information and technology.
 - b. Exhibit a positive attitude toward using technology that supports collaboration, learning, and productivity.
 - c. Demonstrate personal responsibility for lifelong learning.
 - d. Exhibit leadership for digital citizenship.

Content Area Standards (Please identify the source)

- 2.0 Communications: Students understand the principles of effective oral, written, and multimedia communication in a variety of formats and contexts.
 - 2.1 Reading (Reading Standard)
 - 2.1 Analyze the structure and format of functional workplace documents, including the graphics and headers, and explain how authors use the features to achieve their purposes.
 - 2.2 Prepare a bibliography of reference materials for a report using a variety of consumer, workplace, and public documents.
 - 2.3 Generate relevant questions about readings on issues that can be researched.
 - 2.4 Synthesize the content from several sources or works by a single author dealing with a single issue; paraphrase the ideas and connect them to other sources and related topics to demonstrate comprehension.
 - 2.6 Demonstrate use of sophisticated learning tools by following technical directions (e.g., those found with graphic calculators and specialized software programs and in access guides to World Wide Web sites on the Internet).
 - 2.7 Critique the logic of functional documents by examining the sequence of information and procedures in anticipation of possible reader misunderstandings.
 - 2.3 Written and Oral English Language Conventions:
 - 1.4 Produce legible work that shows accurate spelling and correct use of the conventions of punctuations and capitalization.
 - 1.5 Reflect appropriate manuscript requirements, including title page presentation, pagination, spacing and margins, and integrations of source and support material with appropriate citations.

- 4.0 Technology: Students know how to use contemporary and emerging technological resources in diverse and changing personal, community, and workplace environments.
 - 4.2 Understand the use of technological resources to gain access to, manipulate, and produce information, products, and services.
- 5.0 Problem Solving and Critical Thinking: Students understand how to create alternative solutions by using critical and creative thinking skills, such as logical reasoning, analytical thinking, problem-solving techniques:
 - 5.1 Apply appropriate problem-solving strategies and critical thinking skills to work-related issues and tasks.
 - 5.2 Understand the systematic problem-solving models that incorporate input, process, outcome, and feedback components.
 - 5.3 Use critical thinking skills to make informed decisions and solve problems.
- 8.0 Ethics and Legal Responsibilities: Students understand professional, ethical, and legal behavior consistent with applicable laws, regulations, and organizational norms:
 - 8.3 Understand the role of personal integrity and ethical behavior in the workplace.
- 10.0 Technical Knowledge and Skills: Students understand the essential knowledge and skills common to all pathways in the Information Technology sector.
 - 10.1 Know how to use a variety of business- and industry-standard software and hardware, including major proprietary and open standards.
 - 10.5 Use technology and electronic media to manage the work flow and to provide feedback.
 - 10.6 Understand the interrelationships between hardware components and supportive software.
 - 10.7 Analyze the functions, features, and limitations of different operating systems, environments, applications, and utilities.

Pathway Standards:

- A8.0-Students understand the importance of reading, writing, and comprehending documentation in a technical environment:
 - A8.3 Analyze the effectiveness of online information resources to support collaborative tasks, research, publications, communications, and increased productivity.
- B2.0-Students understand the effective use of communication software to access and transmit information:
 - B2.3 Use multiple online search techniques and resources to acquire information.
 - B2.4 Know the appropriate ways to validate and cite Internet resources.

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UNIT # 5: Financial Planning

GOAL: Students will be able to create, calculate, modify and interpret spreadsheets for business purposes.

OBJECTIVES	SUGGESTED ACTIVITIES
The student will:	
Create and design a workbook	 Students will learn how to create a Workbook that will hold multiple spreadsheets related to their business
Determine the monthly payment for a loan	 Create an Amortization schedule for their business loan
Create a data table to analyze data in a worksheet	 Loan Payment Calculator for their business loan Interest Rate table for their business loan
Determine the present value of a loan using the PV function	ioan
Protect a worksheet	
Add computational fields to a database	 Student will create a worksheet database
Sort a worksheet database on one or multiple fields	 Student will sort and query a worksheet database
Display automatic subtotals	
Use a data form to find records that meet comparison criteria	
Use advanced filtering features to display records that meet certain criteria	
Learn payroll basics and apply to an Excel document	 Students will create a Spreadsheet to include various parts of Payroll information

ISTE Standards:		
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- 4. Critical Thinking, Problem-Solving & Decision-Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
 - a. Identify and define authentic problems and significant questions for investigation.
 - b. Plan and manage activities to develop a solution or complete a project.
 - c. Collect and analyze data to identify solutions and/or make informed decisions.
 - d. Use multiple processes and diverse perspectives to explore alternative solutions.
- 6. Technology Operations and Concepts: Students demonstrate a sound understanding of technology concepts, systems and operations. Students:
 - a. Understand and use technology systems.
 - b. Select and use applications effectively and productively.
 - c. Troubleshoot systems and applications.
 - d. Transfer current knowledge to learning of new technologies.

The students will achieve the following content standards:

- 1.0 Academics: Students understand the academic content required for entry into postsecondary education and employment in the Information Technology sector.
 - 1.1 Mathematics: (Mathematics Standard)
 - 1.3 Convert decimals to percents and use these representations in estimations, computations and applications. (Mathematics)
 - 1.6 Calculate the percentage of increases and decreases of a quantity.
 - 1.7 Solve problems that involve discounts, markups, commissions, and profit and compute simple and compound interest.
 - 2.5 Use a variety of methods, such as words, numbers, symbols, charts, graphs, tables, diagrams, and models to explain mathematical reasoning.
 - 2.8 Make precise calculations and check the validity of the results from the context of the problem.
 - 5.0 Students solve multi-step problems, including word problems, involving linear equations and linear inequalities in one variable and provide justification for each step.
 - 1.2 Science: (Science Standard)
 - 1.a Select and use appropriate tools and technology, such as spreadsheet and charts, to perform tests, collect data, analyze relationships, and display data.
 - 1.d Formulate explanations by using logic and evidence.

Specific applications of Principles of Economics standards (grade twelve):

- (12.1) Students understand common economic terms and concepts and economic reasoning.
- (12.2.2) Discuss the effects of changes in supply and/or demand on the relative scarcity, price, and quantity of particular products.
- (12.2.3) Explain the roles of property rights, competition, and profit in a market economy.
- (12.2.5) Understand the process by which competition among buyers and sellers determines a market price.
- (12.2.8) Explain the role of profit as the incentive to entrepreneurs in a market economy. (12.4.3) Discuss wage differences among jobs and professions, using the laws of
 - demand and supply and the concept of productivity.

- 2.0 Communications: Students understand the principles of effective oral, written, and multimedia communications in a variety of formats and contexts.
 - 2.1 Reading: (ELA Standard)
 - 2.6 Demonstrate use of sophisticated learning tools by following technical directions.
 - 2.3.d Include visual aids by employing appropriate technology to organize and record information on charts, maps and graphs.
- 5.0 Problem Solving and Critical Thinking: Students understand how to create alternative solutions by using critical and creative thinking skills, such as logical reasoning, analytical thinking, and problem-solving techniques.
 - 5.1 Apply appropriate problem-solving strategies and critical thinking skills to work-related issues and tasks.
 - 5.2 Understand the systematic problem-solving models that incorporate input, process, outcome, and feedback.
 - 5.3 Use critical thinking skills to make informed decisions and solve problems.
- 10.0 Technical Knowledge and Skills: Students understand the essential knowledge and skills common to all pathways in the Information Technology sector.
 - 10.1 Know how to use a variety of business- and industry-standard software and hardware, including major proprietary and open standards.
- 11.0 Demonstration and Application: Students demonstrate and apply the concepts contained in the foundation and pathway standards.

Pathway Standard

- A8.0 Students understand the importance of reading, writing, and comprehending documentation in a technical environment.
 - A8.1 Know appropriate search procedures for different types of information, sources, and queries.
 - A8.2 Evaluate the accuracy, relevance, and comprehensiveness of retrieved information.
- A8.3 Analyze the effectiveness of online information resources to support collaborative tasks, research, publications, communications, and increased productivity.

B. Entrepreneurship Pathway

- B2.0 Students understand the elements and purpose of a business plan.
- B2.4 Develop a financial plan that outlines sources of capital and projects income and expenses.

Department: Business/Technology Course Title: ICT- Entrepreneur

UNIT # 8: Introduction to E-Commerce (Web Page)

GOAL: Students will understand the concepts of online transactions for a business and identify principles of good web design.

OBJECTIVES	SUGGESTED ACTIVITIES
The student will learn:	
The basics of web page design through the use of notepad and HTML code. Included in the web page will be tags, images.	Create a web page to advertise their new business Add custom banner Add a table Add a bulleted list
The fundamental of what E-Commerce is and why it's important.	Students will research E-commerce and define the meaning in today's business world.
Define E-commerce trends	 Research E-commerce trends in today's business communities Compare online shopping vs retail Examples may include WalMart, Borders and Safeway
Define and understand the types of e-commerce in business	Students will research and identify the different types of e-commerce: E-tailing or "virtual storefronts" The gathering and use of demographic data through Web contacts Electronic Data Interchange the business-to-business exchange of data Business-to-business buying and selling
To create an effective survey for use on their web page.	Students will create a multiple question survey to help identify the characteristics of their target market

ISTE Standards:

- 3. Research and Information Fluency: Students apply digital tools to gather, evaluate, and use information. Students:
 - e. Plan strategies to guide inquiry.
 - f. Locate, organize, analyze, evaluate, synthesize, and ethically use information from a variety of sources and media.
 - f. Process data and report results.
- 4. Critical Thinking, Problem-Solving & Decision-Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
 - i) Identify and define authentic problems and significant questions for investigation.
 - j) Plan and manage activities to develop a solution or complete a project.
 - k) Collect and analyze data to identify solutions and/or make informed decisions.
 - I) Use multiple processes and diverse perspectives to explore alternative solutions.
- 6. Technology Operations and Concepts: Students demonstrate a sound understanding of technology concepts, systems and operations. Students:
 - i. Understand and use technology systems.
 - j. Select and use applications effectively and productively.
 - k. Troubleshoot systems and applications.
 - I. Transfer current knowledge to learning of new technologies.

2.0 Communications: Students understand the principles of effective oral, written, and multimedia communication in a variety of formats and contexts.

- 2.1 Reading (Reading Standard)
 - 2.4 Synthesize the content from several sources or works by a single author dealing with a single issue; paraphrase the ideas and connect them to other sources and related topics to demonstrate comprehension.
 - 2.6 Demonstrate use of sophisticated learning tools by following technical directions (e.g., those found with graphic calculators and specialized software programs and in access guides to World Wide Web sites on the Internet).
 - 2.7 Critique the logic of functional documents by examining the sequence of information and procedures in anticipation of possible reader misunderstandings.
- 2.3 Written and Oral English Language Conventions:
 - 1.4 Produce legible work that shows accurate spelling and correct use of the conventions of punctuations and capitalization.
 - 1.5 Reflect appropriate manuscript requirements, including title page presentation, pagination, spacing and margins, and integrations of source and support material with appropriate citations.
- 4.0 Technology: Students know how to use contemporary and emerging technological resources in diverse and changing personal, community, and workplace environments.
 - 4.2 Understand the use of technological resources to gain access to, manipulate, and produce information, products, and services.

- 5.0 Problem Solving and Critical Thinking: Students understand how to create alternative solutions by using critical and creative thinking skills, such as logical reasoning, analytical thinking, problem-solving techniques:
 - 5.1 Apply appropriate problem-solving strategies and critical thinking skills to work-related issues and tasks.
 - 5.2 Understand the systematic problem-solving models that incorporate input, process, outcome, and feedback components.
 - 5.3 Use critical thinking skills to make informed decisions and solve problems.
- 8.0 Ethics and Legal Responsibilities: Students understand professional, ethical, and legal behavior consistent with applicable laws, regulations, and organizational norms:
 - 8.3 Understand the role of personal integrity and ethical behavior in the workplace.
- 10.0 Technical Knowledge and Skills: Students understand the essential knowledge and skills common to all pathways in the Information Technology sector.
 - 10.1 Know how to use a variety of business- and industry-standard software and hardware, including major proprietary and open standards.
 - 10.5 Use technology and electronic media to manage the work flow and to provide feedback.
 - 10.6 Understand the interrelationships between hardware components and supportive software.
 - 10.7 Analyze the functions, features, and limitations of different operating systems, environments, applications, and utilities.

Pathway Standard: : B. Entrepreneurship Pathway

- B3.0 Students understand how to use technology in a small business to gain a competitive advantage:
- B3.3 Understand the software technologies used to make a Web site effective for small business needs.

Department: Business/Technology Course Title: ICT- Entrepreneur

UNIT # 9: Business Management Practices

GOAL: Students will understand the processes, methods, and strategies of managing a business.

OBJECTIVES	SUGGESTED ACTIVITIES
The student will learn:	
What a Business Proposal is and learn how to create one that includes: Learning how to insert watermark, borders and shading, picture bullets, a section break, centering text vertically, summing columns in a table and modifying a chart in a graph.	 Students will write a Sales/Business Proposal that includes the background for the restaurant, a table of foods & beverages & a request for money. A table used to determine bank rates for new & used buildings, loan terms & costs, and other costs associated with the loan
Business vocabulary as it relates to starting and owning a business	 Students will learn common business terms through daily vocabulary assignments
An introduction to a Business Plan and understand why they are used in a business	 Students will write a complete Business Plan, including Cover Letter & Executive Summary, for the company they are starting
To understand Business Ethics	 Prepare a Code of Ethics for their business
Practical Job Interviewing Techniques	 Students will learn some practical Do's and Don'ts of interviewing for a job through a class simulation/partner project

ISTE Standards:

- 1. Creativity and Innovation: Students demonstrate creative thinking, construct knowledge, and develop innovative products and processes using technology. Students:
 - e. Apply existing knowledge to generate new ideas, products, or processes.
 - f. Create original works as a means of personal or group expression.
 - g. Use models and simulations to explore complex systems and issues.
 - h. Identify trends and forecast possibilities.
- 2. Communication and Collaboration: Students use digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning of others. Students:
 - c. Interact, collaborate and publish with peers, experts, or others employing a variety of digital environments or media.
 - d. Communicate information and ideas effectively to multiple audiences using a variety of media and formats.
 - e. Contribute to project teams to produce original works or solve problems.
- 4. Critical Thinking, Problem-Solving & Decision-Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
 - e. Identify and define authentic problems and significant questions for investigation.
 - f. Plan and manage activities to develop a solution or complete a project.
 - g. Collect and analyze data to identify solutions and/or make informed decisions.
 - h. Use multiple processes and diverse perspectives to explore alternative solutions.

Content Area Standards

- 2.0 Communications: Students understand the principles of effective oral, written, and multimedia communication in a variety of formats and contexts.
 - 2.1 Reading (Reading Standard)
 - 2.1 Analyze the structure and format of functional workplace documents, including the graphics and headers, and explain how authors use the features to achieve their purposes.
 - 2.2 Prepare a bibliography of reference materials for a report using a variety of consumer, workplace, and public documents.
 - 2.3 Generate relevant questions about readings on issues that can be researched.
 - 2.4 Synthesize the content from several sources or works by a single author dealing with a single issue; paraphrase the ideas and connect them to other sources and related topics to demonstrate comprehension.
 - 2.6 Demonstrate use of sophisticated learning tools by following technical directions (e.g., those found with graphic calculators and specialized software programs and in access guides to World Wide Web sites on the Internet).
 - 2.7 Critique the logic of functional documents by examining the sequence of information and procedures in anticipation of possible reader misunderstandings.
 - 2.3 Written and Oral English Language Conventions:
 - 1.4 Produce legible work that shows accurate spelling and correct use of the conventions of punctuations and capitalization.
 - 1.5 Reflect appropriate manuscript requirements, including title page presentation, pagination, spacing and margins, and integrations of source and support material with appropriate citations.

- 4.0 Technology: Students know how to use contemporary and emerging technological resources in diverse and changing personal, community, and workplace environments.
 - 4.2 Understand the use of technological resources to gain access to, manipulate, and produce information, products, and services.
- 5.0 Problem Solving and Critical Thinking: Students understand how to create alternative solutions by using critical and creative thinking skills, such as logical reasoning, analytical thinking, problem-solving techniques:
 - 5.1 Apply appropriate problem-solving strategies and critical thinking skills to work-related issues and tasks.
 - 5.2 Understand the systematic problem-solving models that incorporate input, process, outcome, and feedback components.
 - 5.3 Use critical thinking skills to make informed decisions and solve problems.
- 8.0 Ethics and Legal Responsibilities: Students understand professional, ethical, and legal behavior consistent with applicable laws, regulations, and organizational norms:
 - 8.3 Understand the role of personal integrity and ethical behavior in the workplace.
- 10.0 Technical Knowledge and Skills: Students understand the essential knowledge and skills common to all pathways in the Information Technology sector.
 - 10.1 Know how to use a variety of business- and industry-standard software and hardware, including major proprietary and open standards.
 - 10.5 Use technology and electronic media to manage the work flow and to provide feedback.
 - 10.6 Understand the interrelationships between hardware components and supportive software.
 - 10.7 Analyze the functions, features, and limitations of different operating systems, environments, applications, and utilities.

Pathway Standard: B. entrepreneurship Pathway

- B.2.0 students understand the elements and purpose of a business plan:
- B.2.1 Understand the reasons a small business develops a business plan.
- B2.5 Analyze a proposed business situation and its potential market.

Department: Business/Technology Course Title: ICT- Entrepreneur

UNIT 9: Accounting Principles

GOAL: Students will understand accounting rules used to prepare, present, and report financial statements for a wide variety of business types.

OBJECTIVES	SUGGESTED ACTIVITIES
The student will learn:	
Basic Accounting Principles How to prepare simple Financial Statements	 Students will apply the Accounting Equation to their business. Students will prepare: a Balance Sheet to determine the worth of their business
	 an Income Statement to determine the Revenue and Expenses.

ISTE Standards:

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 - i. Create original works as a means of personal or group expression.
 - k. Use models and simulations to explore complex systems and issues.
 - I. Identify trends and forecast possibilities.
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 - e. Interact, collaborate and publish with peers, experts, or others employing a variety of digital environments or media.
 - f. Communicate information and ideas effectively to multiple audiences using a variety of media and formats.
 - f. Contribute to project teams to produce original works or solve problems.
- 4. Critical Thinking, Problem-Solving & Decision-Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
 - i. Identify and define authentic problems and significant questions for investigation.
 - j. Plan and manage activities to develop a solution or complete a project.
 - k. Collect and analyze data to identify solutions and/or make informed decisions.
 - I. Use multiple processes and diverse perspectives to explore alternative solutions.

Content Area Standards

2.0 Communications: Students understand the principles of effective oral, written, and multimedia communication in a variety of formats and contexts.

- 2.1 Reading (Reading Standard)
 - 2.1 Analyze the structure and format of functional workplace documents, including the graphics and headers, and explain how authors use the features to achieve their purposes.
 - 2.2 Prepare a bibliography of reference materials for a report using a variety of consumer, workplace, and public documents.
 - 2.3 Generate relevant questions about readings on issues that can be researched.
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 - 10.5 Use technology and electronic media to manage the work flow and to provide feedback.
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 - 10.7 Analyze the functions, features, and limitations of different operating systems, environments, applications, and utilities.

Department: Business/Technology Course Title: ICT- Entrepreneur

UNIT # 10: Business Law

GOAL: Students will understand the concepts of business law which is a body of law which governs business and commerce and is often considered to be a branch of civil law.

OBJECTIVES	SUGGESTED ACTIVITIES
The student will learn:	
The Basics of Business law and how it applies to their business	 Students will research Business Law on the Internet and set up a table that includes: Laws that apply to their business How they will go about following that Law What are the consequences of breaking the Law?
The four legal issues that most frequently cause problems in small businesses	Students will research the following legal issues and discuss their use in small business arenas: Trademark Deals with cofounders Employee Rights Contract Liability

ISTE Standards:	
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- 1. Creativity and Innovation: Students demonstrate creative thinking, construct knowledge, and develop innovative products and processes using technology. Students:
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 - n. Create original works as a means of personal or group expression.
 - o. Use models and simulations to explore complex systems and issues.
 - p. Identify trends and forecast possibilities.
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 - n. Plan and manage activities to develop a solution or complete a project.
 - o. Collect and analyze data to identify solutions and/or make informed decisions.
 - p. Use multiple processes and diverse perspectives to explore alternative solutions.

Content Area Standards

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 - 2.1 Reading (Reading Standard)
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