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ABSTRACT

Designed for Ohio educators responsible for planning programs to prepare high school students for careers in business and management, this document presents an overview of Ohio's Integrated Technical and Academic Competencies (ITAC) system of career-focused education and specific information about the business and management ITAC career cluster. The first half of the document, which introduces the ITAC system's underlying principles and elements, contains the following items: (1) descriptions of the three types of integrated competencies (core, career cluster, and specialization) forming the ITAC model; (2) guidelines for using ITAC; (3) an explanation of the components of the 51 core ITAC; and (4) a table detailing the academic connections in the core ITAC. The second half of the document, which focuses on business and management career cluster ITAC, is divided into six sections, each of which focuses on one of the following strands deemed essential for all careers: solving problems and thinking skillfully; communicating effectively; applying technology; working responsibly; planning and managing a career; and managing resources. Each section contains the following items: expectation; competencies; sample scenario; sample guiding questions; connections to core ITAC competencies; connection to academic models; and connections to Ohio's proficiency tests and ACT Work Keys. (MN)

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ITAC

Integrated Technical & Academic Competencies





The Business & Management Career Cluster encompasses the entry-level, technical and professional careers within the world of business, management, and marketing. Students may major in at least one of the following areas: banking and finance, accounting, administration and management, marketing, administrative support, computer information systems, information technology, travel and tourism, retail management, culinary and food service management, and distribution and warehousing.

Sample career options within this cluster include—

- computer analyst
- accountant
- sales representative
- loan officer
- network administrator
- marketing director
- hotel food service manager
- web page designer
- administrative assistant
- purchasing agent
- travel agent
- small business owner
- chef

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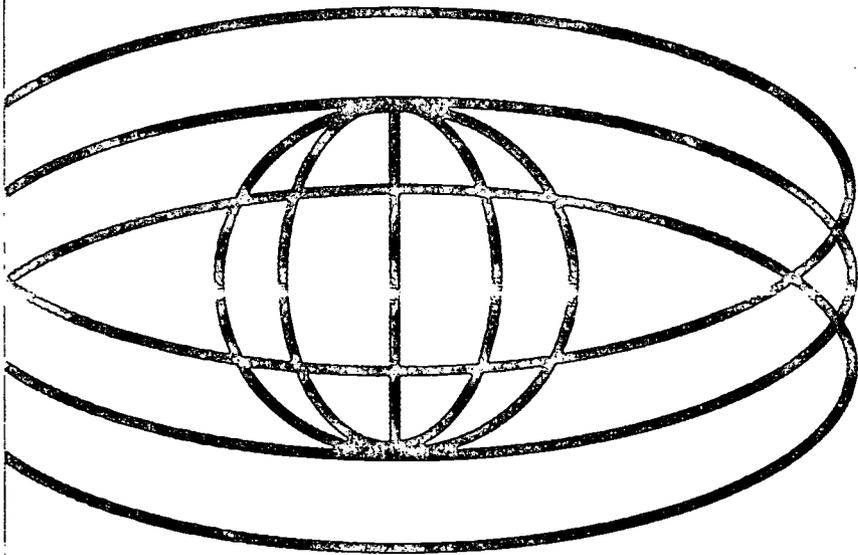
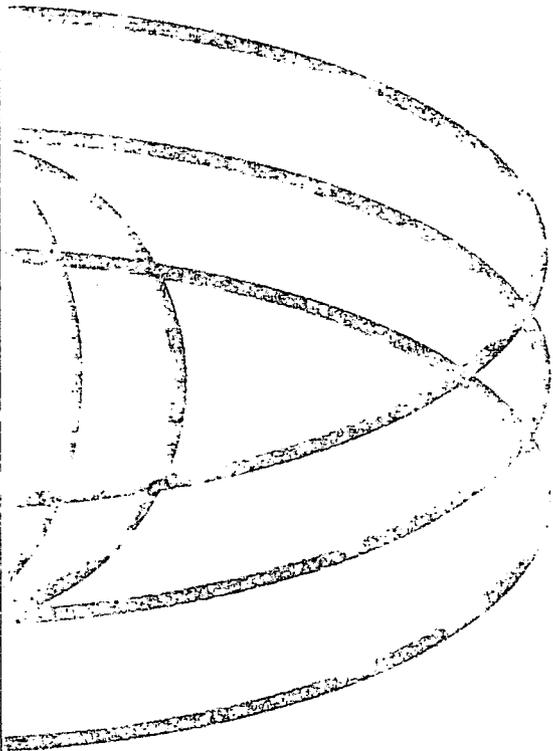


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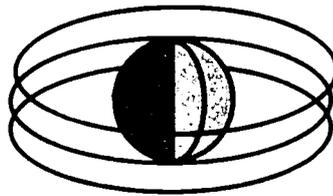
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Career-Focused Education

Career-Focused Education combines high-level academics and technical skills with a real-life context for learning that maximizes students' present and future academic and career success. Career-focused education strengthens—

- proficiency test success
- integrated instruction
- partnerships between education and business & industry
- acquisition of transferable career skills



ITAC

Integrated Technical &
Academic Competencies
for Career-Focused Education

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Division of Career-Technical and Adult Education
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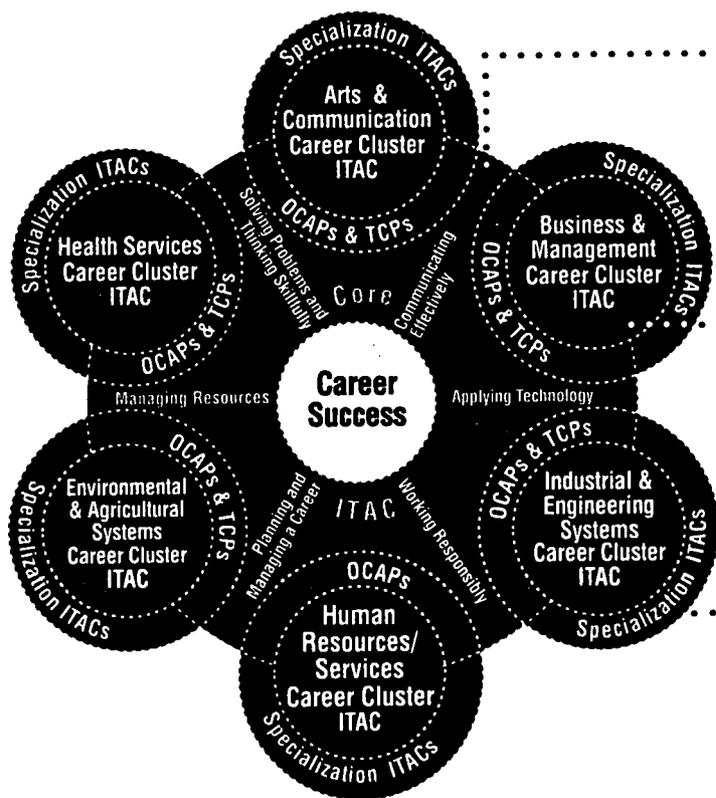
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Components of the ITAC System

Integrated Technical and Academic Competencies (ITAC) documents consist of competencies that integrate academic, technical, and employability knowledge, skills, and attitudes. ITACs are presented in resource documents that include the expectations, competencies, scenarios, and academic connections. ITACs are developed through—

- review and synthesis of national academic, employability, and occupational standards;
- review by teachers—both vocational and academic;
- validation by business and industry representatives; and
- direct links to Ohio’s competency-based education (CBE) models, proficiency test learning outcomes, and ACT Work Keys® System.

ITAC Model



Three types of ITACs form this model:

- **Core ITAC** – Consists of 51 competencies organized into six strands essential for all careers and sample work-related scenarios. Core ITAC represents what individuals need to know and be able to do to be successful in further education, in a career, and in life.
- **Career Cluster ITAC** – Consists of the foundational competencies common to related occupations or industries and sample work-related scenarios. The six Career Cluster ITACs provide a broad foundation for entry-level, technical, and professional careers.
- **Specialization ITAC** – Consists of competencies and sample scenarios critical to success in a specific industry or occupation within a career cluster. Currently, 55 Occupational Competency Analysis Profiles (OCAPs) represent the Specialization Competencies. As OCAPs are revised, they will become Specialization ITACs.

The ITAC system builds on and expands the Occupational Competency Analysis Profile (OCAP) system, which was designed primarily for occupation-specific vocational programs. The ITAC system provides a broader range of competencies, integrates academic knowledge and skills with technical content, and provides sample scenarios to illustrate work-related context. This system is a resource for *both* academic and technical teachers as they plan programs and instruction.

How to Use ITACs

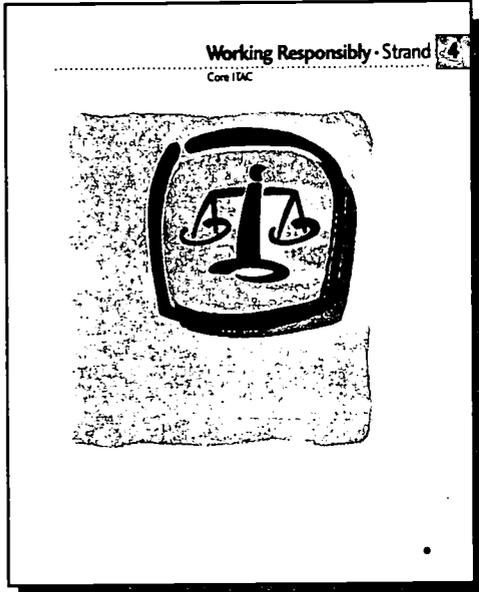
Integrated Technical and Academic Competencies (ITAC) documents are resources for planning programs. The competencies of the ITAC system integrate technical and academic content and are organized into three types, moving from broad to specific—core, career cluster, and specialization. The types are interrelated building blocks for program design. *Core* provides the broad competencies. *Career Cluster* incorporates use of *Core* competencies. *Specialization* incorporates application of both the related *Career Cluster* and *Core* competencies. These ITAC types can be integrated into the overall educational system as follows:

- The Core ITAC could be used to design learning experiences for all students.
- The Career Cluster ITACs—in combination with Core ITAC—could be used to guide courses or experiences in which students explore and develop essential competencies within one of the following career clusters:
 - ✓ Arts & Communication
 - ✓ Business & Management
 - ✓ Environmental & Agricultural Systems
 - ✓ Health Services
 - ✓ Human Resources/Services
 - ✓ Industrial & Engineering Systems
- Specialization ITACs—in combination with Core ITAC and Cluster ITACs—could be used for those programs, courses, and experiences with specific technical skill development.

As a curricular and instructional planning tool, ITACs identify the knowledge, skills, and attitudes needed to help students prepare for academic and career success. ITAC documents foster the development of interdisciplinary projects and learning experiences by illustrating the relationships between broad-based career skills and academic content. Educators can use the components of the ITACs in a number of ways for classroom instruction:

- Competencies can be reviewed and relevant competencies selected for instruction.
- Connections that need to be made between competencies and academic skills can be identified.
- Scenarios can be used as a basis for learning experiences.

Components of Core ITAC



Each strand in Core ITAC has an introduction page which identifies the strand (in words and by icon).



Solving Problems and Thinking Skillfully



Communicating Effectively



Applying Technology



Working Responsibly



Planning and Managing a Career



Managing Resources

Expectation – a statement of desired workplace behaviors and their importance in the world of work.

Competencies – observable and measurable knowledge, skills, and attitudes essential to achievement of the expectation.



Strand 4 – Working Responsibly – Core ITAC

Expectation

Work organizations value employees who possess the ability to work with diverse groups of people and who are able to lead others toward the achievement of common goals. Individuals must demonstrate a positive work ethic—exhibiting honesty, initiative, and dependability. In addition, they should understand the importance of ethical conduct and the role of ethics in professional organizations and work environments.

Competencies

- | | |
|--|---|
| 4.1 Demonstrate leadership | 4.5 Comply with the confidentiality requirements of workplace policies and procedures |
| 4.2 Contribute to teamwork | 4.6 Apply appropriate strategies for dealing with the differences associated with diversity (e.g., racial, ethnic, gender, educational, personality, social, and age) |
| 4.3 Choose ethical courses of action in all work assignments and personal interactions | |
| 4.4 Demonstrate the work ethic | |

You are the director of human resources for a chain of retail stores. Lately there have been several incidents in which employees have treated customers rudely or unfairly because of the customers' racial or ethnic background. You have been asked to provide training for employees that will encourage an appreciation of diversity, positive relations with customers, and an understanding of the legal and economic implications of inappropriate behavior. Present the training plan to your company's management team for their approval.

- What are the benefits of multicultural diversity? What can business organizations do to support an appreciation of diversity?
- What are the contributions of various ethnic groups to businesses, communities, and society?
- What are the legal, social, and economic consequences of prejudicial or discriminatory actions for individuals, businesses, and communities?
- What laws prohibit discriminatory actions? In what context were these laws enacted?

Sample Scenario – a real-life workplace situation requiring learners to apply the knowledge and skills reflected in the strand competencies.

Sample Guiding Questions – targeted questions to use in focusing learners' attention on knowledge and skills covered in the scenario.

Core ITAC – Working Responsibility – Strand 4

- 4.1 Demonstrate leadership**
- Key indicators:
- 4.1.1 Identify a variety of leadership strategies
 - 4.1.2 Demonstrate leadership qualities
 - 4.1.3 Distinguish between the uses of leadership and management
 - 4.1.4 Analyze the factors influencing choice of leadership strategy in a given situation
 - 4.1.5 Match leadership strategies to the given group situation
 - 4.1.6 Collaborate with others to accomplish goals
- 4.2 Contribute to teamwork**
- Key indicators:
- 4.2.1 Demonstrate sensitivity to cultural, gender, and generational differences (in communication, interpersonal skills, and learning preferences)
 - 4.2.2 Demonstrate concern for each team member and for team goals (e.g., provide encouragement, maintain a can-do attitude and common focus)
 - 4.2.3 Complete aspects of assigned tasks according to team-established procedures and within specific timelines
 - 4.2.4 Employ group process techniques to solve problems, make decisions, build consensus, resolve or manage conflicts, construct compromises, support self-expression, and bring forth new ideas and opinions
 - 4.2.5 Evaluate the team's efforts
- 4.3 Choose ethical courses of action in all work assignments and personal interactions**
- Key indicators:
- 4.3.1 Establish a personal code of ethics
 - 4.3.2 Ensure that personal code of ethics is consistent with the professional code of ethics of the chosen profession
 - 4.3.3 Identify strategies that strengthen desirable character traits (including honesty, integrity, compassion, empathy, justice)
 - 4.3.4 Identify consequences of unethical conduct
 - 4.3.5 Recognize conflict between personal/professional ethics and the ethics of others
 - 4.3.6 Demonstrate awareness of legal responsibilities (e.g., copyright laws, harassment, equity)
 - 4.3.7 Identify strategies for responding to the unethical actions of individuals and organizations

Pages following the overview list each competency with its key indicators. Key indicators describe significant elements of competency performance.

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Integrated Technical & Academic Competencies – ITAC

Core ITAC Competencies	Academic Models					
	Percent of Model Relating to Core ITAC					
						
Strand 3 – Applying Technology						
3.1 Demonstrate technological literacy	1%	1%	1%	0%	0%	0%
3.2 Access/retrieve information using electronic communication systems	+1%	0%	0%	2%	1%	2%
3.3 Demonstrate computer literacy	0%	2%	0%	4%	3%	4%
3.4 Use database software to work-related situations	0%	0%	0%	+1%	0%	1%
3.5 Use spreadsheet software to work-related situations	0%	+1%	0%	0%	0%	2%
3.6 Use word-processing software to work-related situations	+1%	0%	0%	2%	1%	2%
Strand 4 – Working Responsibly						
4.1 Demonstrate leadership	0%	0%	2%	1%	0%	4%
4.2 Contribute to teamwork	20%	0%	3%	2%	0%	2%
4.3 Choose ethical courses of action in all work assignments and personal interactions	0%	0%	+1%	1%	0%	4%
4.4 Demonstrate the work ethic	+1%	0%	1%	1%	3%	4%
4.5 Comply with the confidentiality requirements of workplace policies and procedures	0%	0%	0%	+1%	0%	1%
4.6 Apply appropriate strategies for dealing with the differences associated with diversity (age, racial, ethnic, gender, national, personality, social, and age)	20%	0%	0%	20%	0%	4%
Strand 5 – Planning and Managing a Career						
5.1 Identify four personal interests, abilities, and skills related to choosing a career	0%	0%	1%	1%	2%	1%
5.2 Investigate career options	0%	0%	0%	+1%	1%	1%
5.3 Chart career using career-planning skills	2%	0%	0%	+1%	2%	1%
5.4 Demonstrate skills needed to enter or reenter the workforce	4%	0%	+1%	1%	0%	+1%
5.5 Demonstrate job-seeking skills	0%	0%	0%	0%	+1%	0%
5.6 Upgrade career skills	0%	0%	0%	0%	0%	0%
5.7 Explore opportunities to create business	2%	0%	1%	0%	1%	0%

Connections to Academic Models . . .

– the percentage of objectives from Ohio's Competency-Based Education Models, grades PreK – 12, that relate to and/or reinforce the competencies in the given strand. Each academic area is represented by an icon.



The Arts



Mathematics



Social Studies



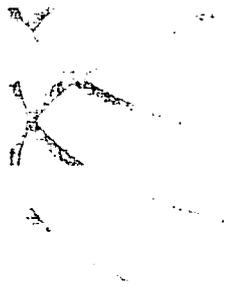
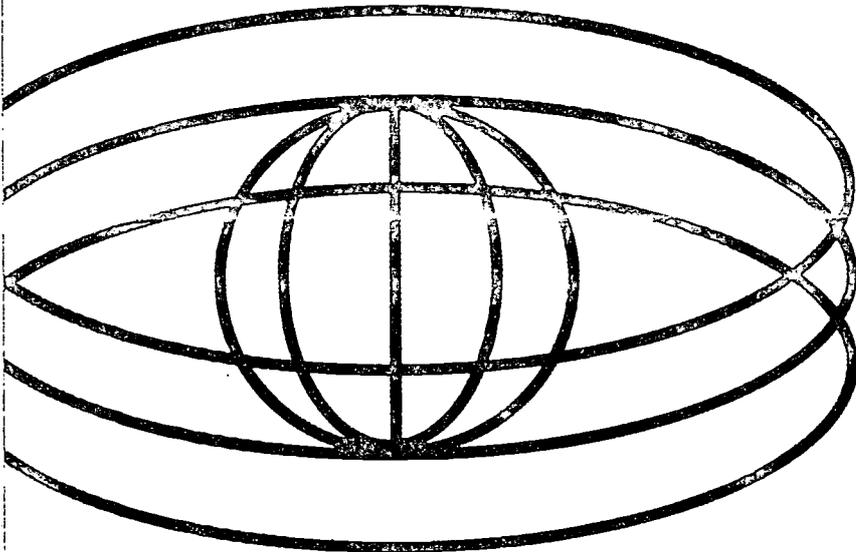
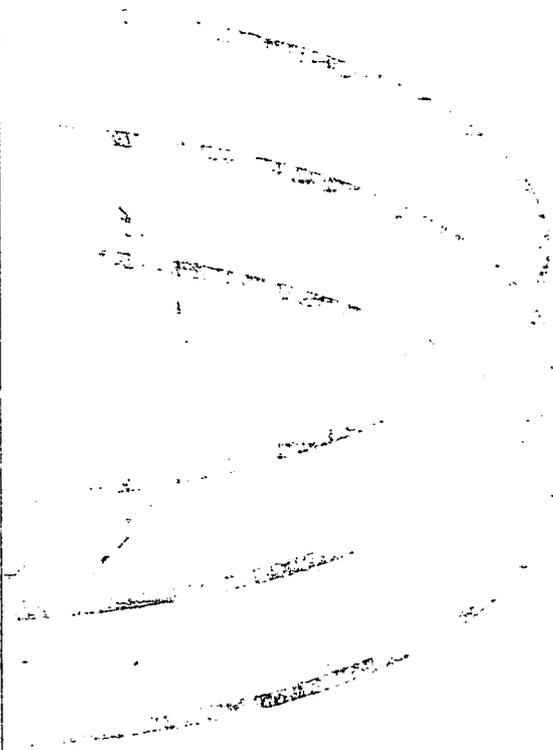
Language Arts



Foreign Language

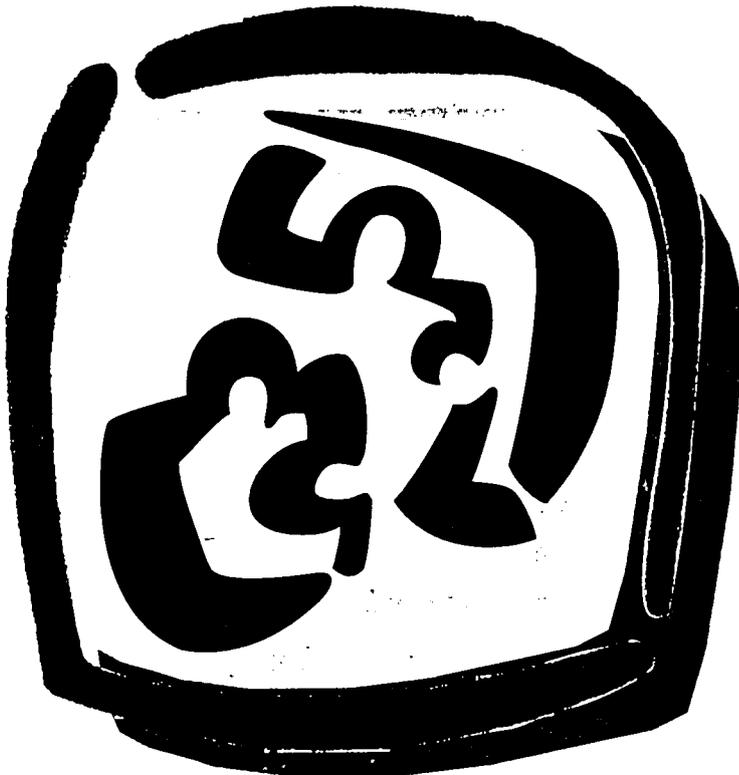


Science



Solving Problems and Thinking Skillfully - Strand 1

Core ITAC





Expectation

All individuals, regardless of career choice, must be able to think for themselves; initiate action on their own; and direct, modify, and assess their own work. Employers seek lifelong learners who can locate and use information. The following competencies specify the knowledge, skills, and attitudes needed to develop the capacity to assess problems and situations, anticipate what might happen next, and continuously search for creative solutions.

Competencies

- | | | | |
|-----|--|------|---|
| 1.1 | Solve problems and make decisions in work-related situations | 1.8 | Utilize scheduling techniques to ensure that jobs are completed by the stated due date |
| 1.2 | Read for information and understanding | 1.9 | Demonstrate knowledge of the economy and how it functions as a whole |
| 1.3 | Use observation skills to analyze work-related situations | 1.10 | Demonstrate knowledge of the economy as a framework within which decisions are made by individuals and groups |
| 1.4 | Apply mathematical processes | | |
| 1.5 | Apply measurement and spatial skills | | |
| 1.6 | Apply statistical analysis skills | | |
| 1.7 | Analyze critical data to guide work activities | | |

Scenario

You are among a team of architects hired to plan the revitalization of a deteriorating historic area in your community. In spite of a rich ethnic history and residents who are committed to seeing the area thrive, the neighborhood is plagued by inadequate housing, abandoned buildings, lack of transportation, crime, and declining businesses. The City Planning Commission is prepared to provide resources to encourage economic development, recreation areas, and better housing. Create a design for the neighborhood and present your plans to the commission for their approval.

Guiding Questions

- What alternative uses should be considered for the land to best meet the needs of the community and its citizens?
- What historic and current economic, social, and environmental factors should be considered in the creation of the plan?
- What data regarding the needs and concerns of citizens and businesses in the community would inform the design of the neighborhood? How should this data be collected, analyzed, and presented?



1.1

Solve problems and make decisions in work-related situations

1.1.1

Identify factors that influence problem solving and decision making

1.1.2

Analyze the source of the problem or the situation requiring a decision

1.1.3

Generate possible alternatives

1.1.4

Analyze possible alternatives

1.1.5

Match problem-solving and decision-making processes to the situation

1.1.6

Use creative thinking processes to support solving problems and making decisions

1.1.7

Justify solution or decision with evidence to support or refute alternatives

1.1.8

Formulate action plans

1.1.9

Implement action plans

1.1.10

Evaluate action taken

1.1.11

Monitor action plans

1.1.12

Adjust action plans as needed

Key Indicators:

1.2

Read for information and understanding

1.2.1

Locate needed information in written materials using formatting cues, skimming, and scanning

1.2.2

Interpret written information, including manuals, graphs, and schedules

1.2.3

Unlock the meaning of unknown or technical vocabulary using standard strategies (e.g., context clues, prefixes, suffixes)

1.2.4

Locate key points, main ideas, relevant details, facts, and specifications in written materials

1.2.5

Judge the accuracy, appropriateness, style, and plausibility of information, proposals, or theories in materials read

Key Indicators:

1.3

Use observation skills to analyze work-related situations

1.3.1

Collect data through sensory perceptions—seeing, hearing, tasting, touching, and smelling

1.3.2

Identify predictable patterns and relationships in given situations

1.3.3

Monitor situations for deviations

1.3.4

Identify patterns and relationships that create doubt, uncertainty, difficulty, or disappointment

1.3.5

Devise appropriate responses to given situations

1.3.6

Apply past observations to present work-related situations

Key Indicators:



1.4

Apply mathematical processes

1.4.1

Solve mathematical problems involving whole numbers and integers

1.4.2

Solve mathematical problems involving fractions, mixed numbers, decimals, percentages, ratios, and proportions

1.4.3

Key Indicators: Apply systematic counting techniques and algorithmic thinking to represent, analyze, and solve problems

1.4.4

Use estimates to determine reasonableness of proposed problem solutions

1.4.5

Use appropriate technology in the solution of math-related problems

1.4.6

Describe problem situations using numerical, symbolic, and graphical representations

1.4.7

Apply combinations of algebraic techniques

1.4.8

Represent problem situations with geometric models (including applying the properties of figures)

1.4.9

Express mathematical ideas orally and in writing

1.5

Apply measurement and spatial skills

1.5.1

Key Indicators: Demonstrate knowledge of units of measurement

1.5.2

Select measurement techniques appropriate for given situation

1.5.3

Match measurement tools to measurement requirements

1.5.4

Determine degree of accuracy required for given situation

1.5.5

Analyze implications of the degree of accuracy of various measurements

1.6

Apply statistical analysis skills

1.6.1

Key Indicators: Estimate probability using standard techniques and formulas

1.6.2

Analyze software options available for statistical analysis

1.6.3

Select software option most appropriate for given situation

1.6.4

Analyze statistical data using selected software

1.6.5

Make inferences or predictions based on data analysis

1.6.6

Represent statistical data using tables, charts, and graphs



1.7

Analyze critical data to guide work activities

1.7.1

Identify critical data needed

1.7.2

Determine the level of detail necessary for various situations according to prescribed procedures (including task analysis; procedural analysis; financial activities; personnel matters; customer contacts; noncompliance and violations; and/or deviations from normal operation of processes, equipment and instrumentation)

1.7.3

Ensure that documentation is complete and error-free and provides valid and reliable evidence

1.7.4

Ensure that documentation is in compliance with established procedures

1.7.5

Analyze documentation to determine appropriate actions for specific situations

Key Indicators:

1.8

Utilize scheduling techniques to ensure that jobs are completed by the stated due date

1.8.1

Develop schedules for equipment maintenance

1.8.2

Develop schedules for materials production, handling, and distribution

1.8.3

Develop meeting schedules

1.8.4

Distribute schedules to all concerned personnel

1.8.5

Implement schedules as planned

1.8.6

Make changes in schedules as appropriate

Key Indicators:

1.9

Demonstrate knowledge of the economy and how it functions as a whole

1.9.1

Analyze how individuals and societies make choices to satisfy wants with limited resources

1.9.2

Analyze how factors of production (including land, labor, capital, and entrepreneurship) are used to produce goods and services

1.9.3

Analyze how individuals and households exchange their resources for income in order to buy goods and services

1.9.4

Analyze how individuals and business firms use resources to produce goods and services to generate revenue

1.9.5

Identify the characteristics of command, market, and traditional economies

1.9.6

Analyze how all levels of government assess taxes in order to provide services

Key Indicators:



1.10

1.10

Demonstrate knowledge of the economy as a framework within which decisions are made by individuals and groups

1.10.1

Determine opportunity costs and trade-offs

1.10.2

Identify key individuals and groups that make economic decisions at the local, state, national, and international levels

1.10.3

Identify the important roles that local, state, national, and international governments play in a global economy

1.10.4

Characterize how government decisions affect individuals

1.10.5

Identify how geographic factors affect the political and economic systems of other countries

1.10.6

Analyze how national and international markets allocate goods and services

1.10.7

Analyze how resources, goods, and services are exchanged in national and international markets

1.10.8

Demonstrate knowledge of competition and how it affects national and international markets

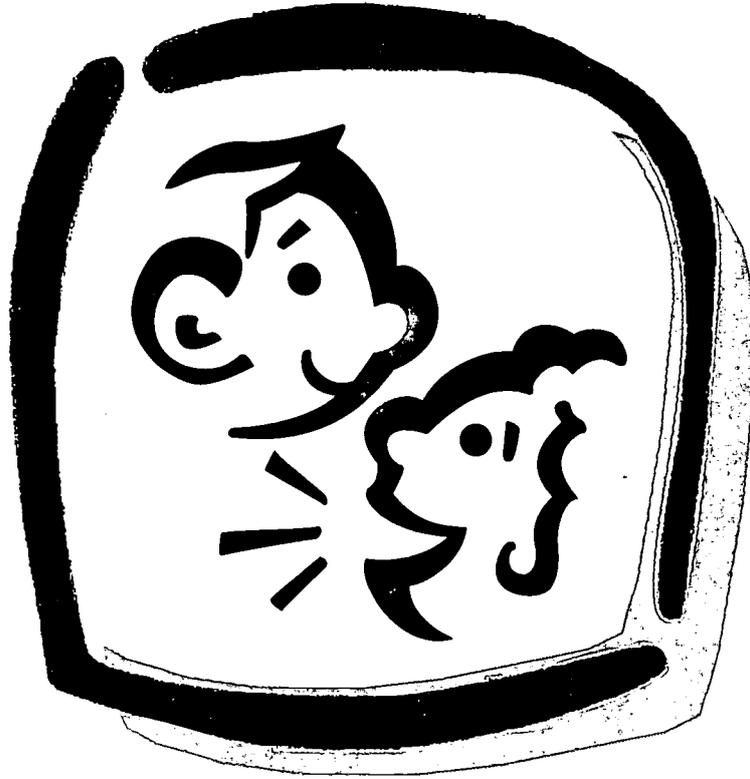
1.10.9

Demonstrate knowledge of supply and demand and how it affects national and international markets

Key Indicators:

Communicating Effectively - Strand 2

Core ITAC





Expectation

Effective communication is essential to workplaces, communities, and families. Employees with positive communication skills contribute to organizational productivity, enhance interpersonal relationships with coworkers and clients, and create opportunities for promotion and advancement.

Competencies

- | | | | |
|-----|---|------|---|
| 2.1 | Apply basic communication skills | 2.7 | Apply graphic communication skills |
| 2.2 | Apply oral communication skills | 2.8 | Apply artistic communication skills |
| 2.3 | Apply written communication skills | 2.9 | Convey information through multimedia presentations |
| 2.4 | Apply technical writing skills | 2.10 | Create graphs and charts |
| 2.5 | Apply listening skills | 2.11 | Build interpersonal relationships |
| 2.6 | Apply demonstration/presentation skills | | |

Scenario

The Chamber of Commerce in your city would like to develop materials to attract new businesses to the community. Your public relations firm has been hired to create promotional materials that highlight your community's resources, rich ethnic history, and workforce. Create these materials and present them to a variety of community members, including business and industry representatives, private citizens, and civic leaders.

Guiding Questions

- What communication tools should be used to convey this information to the target audiences?
- How will you use creative or artistic expression to communicate the information to the target audience?
- What historic and current events have contributed to the city's resources, ethnic diversity, and workforce?
- How will you work with community groups and representatives to build support for your promotional materials?



2.1

Apply basic communication skills

- 2.1.1 Guide communication activities using established rules for grammar, word usage, spelling, and sentence construction
- 2.1.2 Select communication style appropriate to audience and situation
- 2.1.3 Present messages in a form that assists recipient's understanding (e.g., speak and write clearly and concisely, write legibly)
- 2.1.4 Locate needed information using communications reference tools (e.g., dictionary, thesaurus, style manual, word division guide)
- 2.1.5 Interpret oral, written, and nonverbal messages
- 2.1.6 Follow written and oral instructions
- 2.1.7 Clarify messages received (e.g., through paraphrasing, questioning)
- 2.1.8 Communicate basic messages in a language other than English

Key Indicators:

2.2

Apply oral communication skills

- 2.2.1 Apply basic communication skills in communicating orally
- 2.2.2 Use nonverbal techniques to reinforce the intended verbal message
- 2.2.3 Support oral communication with creative attention-getters, analogies, examples, verbal illustrations, etc.
- 2.2.4 Supplement oral communication with other forms of communication (including graphic, written, artistic)
- 2.2.5 Demonstrate sensitivity to cultural diversity (e.g., accepted variations in distances between speakers, use of eye contact, meaning of gestures; bias-free language)
- 2.2.6 Adjust delivery according to perceived reception

Key Indicators:

2.3

Apply written communication skills

- 2.3.1 Apply basic communication skills in communicating in written form
- 2.3.2 Organize information into the appropriate format in accordance with standard practices (including prewriting, drafting, proofreading, editing/revising, preparing final copy/publishing)
- 2.3.3 Incorporate creative and original elements (e.g., unique writing style, content, layout) in the written product
- 2.3.4 Supplement written communication with other forms of communication (including graphic, oral, artistic)
- 2.3.5 Demonstrate sensitivity to cultural diversity
- 2.3.6 Use technology (e.g., spelling checkers) to enhance accuracy

Key Indicators:



Strand 2 – Communicating Effectively – Core ITAC

2.4

Apply technical writing skills

2.4.1

Key Indicators: Apply basic communication skills

2.4.2

Consider topic in relation to the audience and purpose

2.4.3

Determine when graphics, charts, and sketches are needed to support and clarify text

2.4.4

Present information in a clear and concise manner

2.5

Apply listening skills

2.5.1

Identify major points of the message (including key information, directions, specific details)

2.5.2

Key Indicators: Determine real needs or goals by attending to both verbal and nonverbal messages

2.5.3

Differentiate between facts, opinions, and feelings

2.5.4

Document message using standard note-taking techniques

2.5.5

Overcome communication barriers

2.5.6

Clarify communication by rephrasing statements, asking questions, showing empathy, and interpreting both verbal and nonverbal information

2.6

Apply demonstration/presentation skills

2.6.1

Apply basic communication skills in presenting a demonstration/presentation

2.6.2

Select valid and reliable reference(s)

2.6.3

Organize content based on purpose and audience

2.6.4

Determine desirable format

2.6.5

Incorporate creative and original elements into the demonstration/presentation

2.6.6

Key Indicators: Organize the components necessary to conduct a demonstration/presentation (including resources, equipment, handouts, graphics, advance organizers)

2.6.7

Incorporate media that support the purpose of the demonstration/presentation (including projection equipment, computer software)

2.6.8

Present the results of an investigation

2.6.9

Demonstrate the operation of equipment or facilities and/or given techniques and procedures

2.6.10

Communicate possible problems, processes, and solutions

2.6.11

Demonstrate knowledge of the topic(s) to be communicated

2.6.12

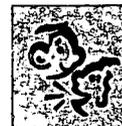
Use self-expression appropriate to the situation (including grooming, adjustment of behavior, expression of feelings and ideas)

2.6.13

Convey information to audience according to accepted business communication practices

2.6.14

Adjust communication according to audience feedback



2.7

Apply graphic communication skills

2.7.1

Apply basic communication skills in communicating through graphics

2.7.2

Ensure that all information is accurate and complete

2.7.3

Specify graphics needed to support presentations

2.7.4

Communicate information using graphics in, print, poster, or transparency form

2.7.5

Communicate information using slides prepared with presentation software

2.7.6

Incorporate creative and original elements into graphics

2.7.7

Employ effective design techniques in development of graphics (including space, lines, shading, shaping, symbols)

2.7.8

Demonstrate sensitivity to cultural diversity

Key Indicators:

2.8

Apply artistic communication skills

2.8.1

Apply basic communication skills in communicating artistically

2.8.2

Participate in a wide variety of experiences that expose self to an appreciation of the arts disciplines—dance, music, theater, and the visual arts

2.8.3

Analyze exemplary works through the relationship between artistic practices, products, and perspectives

2.8.4

Interpret historical and modern artifacts

2.8.5

Demonstrate artistic and creative techniques of production and performance

2.8.6

Create an original artifact or performance that demonstrates an understanding of history and culture

Key Indicators:

2.9

Convey information through multimedia presentations

2.9.1

Organize content based on purpose and audience

2.9.2

Evaluate which set of procedures, tools, or equipment will produce the desired results

2.9.3

Produce a presentation, including designing, creating, importing data and graphics, editing, formatting, and sequencing

2.9.4

Operate multimedia equipment

2.9.5

Apply problem-solving techniques to resolve problems encountered in the process of designing and implementing multimedia presentations

Key Indicators:



Strand 2 – Communicating Effectively – Core ITAC

2.10

Create graphs and charts

2.10.1

Access sources of needed information

2.10.2

Select data for inclusion

2.10.3

Convert data into chosen graphical format

2.10.4

Ensure that the results are correctly represented (including font, scale, size)

2.10.5

Draw conclusions from information presented in graphs and charts

Key Indicators:

2.11

Build interpersonal relationships

2.11.1

Demonstrate knowledge of the components of effective communication

2.11.2

Relate to people of different ages, abilities, genders, cultures, and behavior styles

2.11.3

Demonstrate caring, empathy, and appreciation for others

2.11.4

Communicate personal feelings, needs, and ideas constructively

2.11.5

Demonstrate effective listening skills

2.11.6

Manage conflict and stress

Key Indicators:

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Applying Technology - Strand 3

Core ITAC



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Expectation

Technology influences every work environment. To be effective in today's workplace, individuals must be able to use the tools of technology to improve productivity and efficiency. Employers seek individuals who have developed technological skills and who stay abreast of the continuously changing technological environment.

Competencies

- | | | | |
|-----|--|-----|---|
| 3.1 | Demonstrate technological literacy | 3.5 | Use spreadsheet software in work-related situations |
| 3.2 | Access/transmit information using electronic communication systems | 3.6 | Use word-processing software in work-related situations |
| 3.3 | Demonstrate computer literacy | | |
| 3.4 | Use database software in work-related situations | | |

Scenario

You own a company that sells and maintains a wide variety of office equipment and computer systems. A small, family-owned business has asked you to develop a proposal for equipping its organization with the technology necessary to improve its productivity and customer service. Prepare a proposal with your recommendations, and present it to the owners of the business to persuade them to accept your proposal.

Guiding Question

- How have technological innovations influenced workplace performance?
- What information do you need about this business to determine its technological needs?
- How will you obtain that information?
- What hardware, software, and online services does this business need?
- What communication tools will you need to persuade this business to accept your proposal?

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3.1

Demonstrate technological literacy

- 3.1.1 Demonstrate knowledge of the basic technology systems currently available (e.g., manufacturing technology, organizing and accessing information for technology)
- 3.1.2 Analyze the interplay of technology with social issues, gender issues, ethics, law, and government
- 3.1.3 Identify the uses of technology in industry, education, the political arena, and day-to-day consumer affairs
- 3.1.4 Analyze the benefits and costs of new developments in technology
- 3.1.5 Make decisions about the use of technology that improve performance in the workplace, in school, and in the home

Key Indicators:

3.2

Access/transmit information using electronic communication systems

- 3.2.1 Determine which systems are most appropriate for given situations
- 3.2.2 Transmit messages electronically
- 3.2.3 Access information electronically (e.g., via information services, CD-ROMs, laser disks, videos, and the Internet)
- 3.2.4 Conduct searches electronically
- 3.2.5 Participate in electronic discussion groups

Key Indicators:

3.3

Demonstrate computer literacy

- 3.3.1 Choose the hardware, software, and online services that will produce the desired results
- 3.3.2 Comply with ethical standards in the acquisition, organization, analysis, and communication of information
- 3.3.3 Keep informed of legal parameters regarding computers
- 3.3.4 Provide routine maintenance and repair of computer hardware and software
- 3.3.5 Write basic computer programs for given purposes

Key Indicators:

3.4

Use database software in work-related situations

- 3.4.1 Demonstrate knowledge of the functions and features of database software
- 3.4.2 Identify the type of data needed
- 3.4.3 Determine the best database to aid in the collection, tabulation, synthesis, and evaluation of the particular data identified
- 3.4.4 Locate needed operations information using software documentation or help functions
- 3.4.5 Construct database for the specified purpose
- 3.4.6 Access needed information from the database
- 3.4.7 Select report design for presenting data

Key Indicators:



Strand 3 – Applying Technology – Core ITAC

3.5

Use spreadsheet software in work-related situations

3.5.1

Demonstrate knowledge of the functions and features of spreadsheet software

3.5.2

Identify the type of data needed

3.5.3

Determine the best spreadsheet to aid in the collection, tabulation, synthesis, and evaluation of the identified data

3.5.4

Locate needed operations information using software documentation or help functions

3.5.5

Construct spreadsheet for the specified purpose

3.5.6

Analyze data

3.5.7

Interpret results

Key Indicators:

3.6

Use word-processing software in work-related situations

3.6.1

Demonstrate knowledge of the functions and features of word-processing software

3.6.2

Construct word-processed documents for the specified purpose

3.6.3

Locate needed operations information using software documentation or help functions

3.6.4

Integrate databases, spreadsheets, graphics, and desktop publishing files into word-processed documents

3.6.5

Edit documents using available software features and functions

Key Indicators:

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Working Responsibly - Strand

4

Core ITAC



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Expectation

Work organizations value employees who possess the ability to work with diverse groups of people and who are able to lead others toward the achievement of common goals. Individuals must demonstrate a positive work ethic—exhibiting honesty, initiative, and dependability. In addition, they should understand the importance of ethical conduct and the role of ethics in professional organizations and work environments.

Competencies

- | | | | |
|-----|--|-----|---|
| 4.1 | Demonstrate leadership | 4.5 | Comply with the confidentiality requirements of workplace policies and procedures |
| 4.2 | Contribute to teamwork | | |
| 4.3 | Choose ethical courses of action in all work assignments and personal interactions | 4.6 | Apply appropriate strategies for dealing with the differences associated with diversity (e.g., racial, ethnic, gender, educational, personality, social, and age) |
| 4.4 | Demonstrate the work ethic | | |

Scenario

You are the director of human resources for a chain of retail stores. Lately there have been several incidents in which employees have treated customers rudely or unfairly because of the customers' racial or ethnic background. You have been asked to provide training for employees that will encourage an appreciation of diversity, positive relations with customers, and an understanding of the legal and economic implications of inappropriate behavior. Present the training plan to your company's management team for their approval.

Guiding Questions

- What are the benefits of multicultural diversity? What can business organizations do to support an appreciation of diversity?
- What are the contributions of various ethnic groups to businesses, communities, and society?
- What are the legal, social, and economic consequences of prejudicial or discriminatory actions for individuals, businesses, and communities?
- What laws prohibit discriminatory actions? In what context were these laws enacted?



4.1

Demonstrate leadership

- 4.1.1
- 4.1.2
- 4.1.3
- 4.1.4
- 4.1.5
- 4.1.6

Key Indicators:

- Identify a variety of leadership strategies
- Demonstrate leadership qualities
- Distinguish between the uses of leadership and management
- Analyze the factors influencing choice of leadership strategy in a given situation
- Match leadership strategies to the given group situation
- Collaborate with others to accomplish goals

4.2

Contribute to teamwork

- 4.2.1
- 4.2.2
- 4.2.3
- 4.2.4
- 4.2.5

Key Indicators:

- Demonstrate sensitivity to cultural, gender, and generational differences (in communication, interpersonal skills, and learning preferences)
- Demonstrate concern for each team member and for team goals (e.g., provide encouragement, maintain a can-do attitude and common focus)
- Complete aspects of assigned tasks according to team-established procedures and within specific timelines
- Employ group process techniques to solve problems, make decisions, build consensus, resolve or manage conflicts, construct compromises, support self-expression, and bring forth new ideas and opinions
- Evaluate the team's efforts

4.3

Choose ethical courses of action in all work assignments and personal interactions

- 4.3.1
- 4.3.2
- 4.3.3
- 4.3.4
- 4.3.5
- 4.3.6
- 4.3.7

Key Indicators:

- Establish a personal code of ethics
- Ensure that personal code of ethics is consistent with the professional code of ethics of the chosen profession
- Identify strategies that strengthen desirable character traits (including honesty, integrity, compassion, empathy, justice)
- Identify consequences of unethical conduct
- Recognize conflict between personal/professional ethics and the ethics of others
- Demonstrate awareness of legal responsibilities (e.g., copyright laws, harassment, equity)
- Identify strategies for responding to the unethical actions of individuals and organizations



Strand 4 – Working Responsibly – Core ITAC

4.4

Demonstrate the work ethic

4.4.1

Exhibit desirable personal and professional attitudes and behaviors (including positive view of self and work, awareness of impact on others, responsibility, pride)

4.4.2

Exhibit desirable personal and professional work habits and behaviors (including punctuality, regular attendance, quality performance, meeting or exceeding of job expectations, self-motivation, honesty)

4.4.3

Determine own role within the company's mission

4.4.4

Participate in required and voluntary professional development to benefit employer and self

4.4.5

Improve performance for the benefit of employer and self

4.4.6

Display a sense of personal responsibility for the welfare of the company and colleagues (including health, safety, environmental concerns)

4.4.7

Distinguish between work ethics of various organizations, work groups, and cultures

Key Indicators:

4.5

Comply with the confidentiality requirements of workplace policies and procedures

4.5.1

Identify types of confidential information (including mail and information about personnel, customers, company)

4.5.2

Maintain records on the distribution of information using established format and procedures

4.5.3

Provide information only to authorized personnel, whether transmitted physically or via technology

4.5.4

Inspect returned materials for completeness

4.5.5

Identify the consequences of a breach of confidentiality

Key Indicators:

4.6

Apply appropriate strategies for dealing with the differences associated with diversity (e.g., racial, ethnic, gender, educational, social and age)

4.6.1

Recognize the differences associated with diversity and the implications of those differences

4.6.2

Demonstrate effective interpersonal skills in working with others of different backgrounds

4.6.3

Express feelings, actions, and ideas respectfully

4.6.4

Identify appropriate strategies and solutions for dealing with cultural conflicts and differences

4.6.5

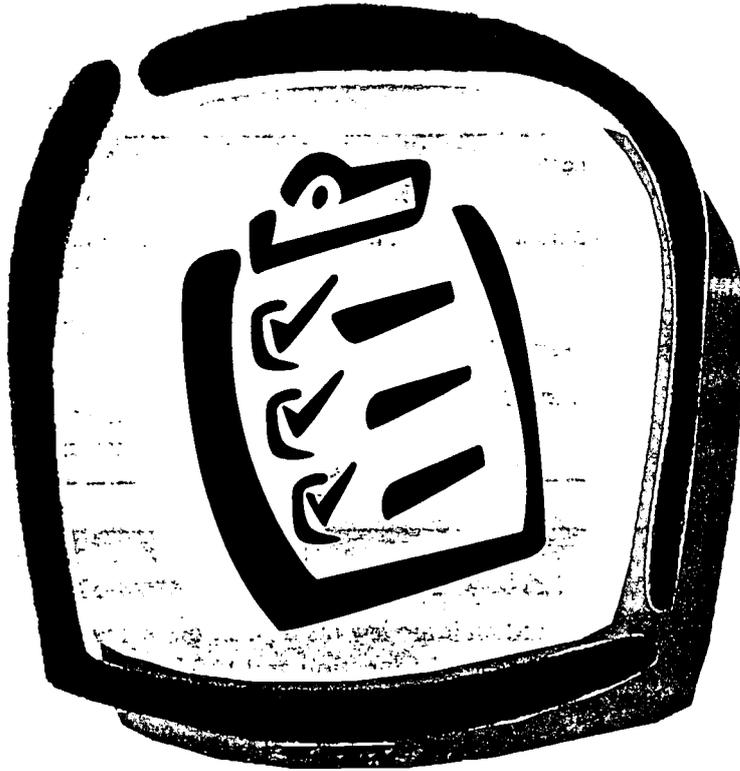
Demonstrate respect for diverse international business practices and etiquette

Key Indicators:

Planning and Managing a Career - Strand

5

Core ITAC





Expectation

Since work is a significant part of life, individuals need to be actively engaged in seeking a career that matches their interests, abilities, aptitudes, and skills. Career planning enhances the possibility that one's career path will lead to success and satisfaction in work. Employers seek individuals who know what they want from work and can effectively present their qualifications and skills through the job search process, including job applications and interviews. Throughout one's career, it is also important to seek continuous professional development opportunities.

Competencies

- | | | | |
|-----|--|-----|---|
| 5.1 | Identify how personal interests, abilities, and skills relate to choosing a career | 5.4 | Demonstrate skills needed to enter or reenter the workforce |
| 5.2 | Investigate career options | 5.5 | Demonstrate job-keeping skills |
| 5.3 | Chart career using career-planning skills | 5.6 | Upgrade career skills |
| | | 5.7 | Explore opportunities to create a business |

Scenario

You have just been granted an interview for a position in the career area of your choice. Assuming you have completed all education and training necessary for this career, prepare to discuss why you selected the career, your long-range career goals, the skills you will bring to the workplace, and your long-term plan for professional development. Following the interview, obtain feedback about your ability to portray your interest and qualifications.

Guiding Questions

- What should you consider when planning a career?
- What are the implications of selecting a nontraditional career?
- What skills are needed to be successful in this career? How can you obtain those skills?
- Where can you obtain information about various careers and career opportunities?
- What communication skills will you use to convey your interest in and qualifications for this career?



5.1

Identify how personal interests, abilities, and skills relate to choosing a career

- 5.1.1 Determine own interests and aptitudes
- 5.1.2 Relate personal interests to academic and occupational skills
- 5.1.3 Identify impact of abilities and skills on career development
- 5.1.4 Identify how self-knowledge relates to making career choices

Key Indicators:

5.2

Investigate career options

- 5.2.1 Identify career options, including self-employment and nontraditional careers
- 5.2.2 Identify the range of available career information sources
- 5.2.3 Research knowledge, abilities, and skills needed in each occupation using a variety of resources (e.g., handbooks, career materials, labor market information, computerized career-information delivery systems, and role models/mentors)
- 5.2.4 Select careers that best match interests and aptitudes
- 5.2.5 Analyze the impact of factors such as population, climate, employment trends, and geographic location on occupational choice
- 5.2.6 Assess differences in the wages, benefits, annual incomes, cost of living, and job opportunities associated with selected career options
- 5.2.7 Identify potential conflicts between interest/aptitudes and career choices
- 5.2.8 Identify how career choices influence family, personal life, and lifestyle
- 5.2.9 Assess labor market information pertaining to career options
- 5.2.10 Explore future trends and occupations in the world of work

Key Indicators:

5.3

Chart career using career-planning skills

- 5.3.1 Demonstrate use of career information
- 5.3.2 Identify elements of career planning
- 5.3.3 Summarize the educational requirements of various occupations
- 5.3.4 Identify skills that apply to a variety of occupations
- 5.3.5 Identify challenges that may interfere with individual career plan (e.g., gender issues, misinformation, expectations of others, and conditions of labor market)
- 5.3.6 Identify short-term and long-term goals for achieving career plan
- 5.3.7 Develop a career plan
- 5.3.8 Showcase interests, aptitudes, and skills utilizing a portfolio
- 5.3.9 Annually review/revise the individual career plan

Key Indicators:



5.4

Demonstrate skills needed to enter or reenter the workforce

5.4.1

Apply knowledge of personal abilities, interests, and skills to the seeking of employment regionally, nationally, and globally

5.4.2

Develop job-getting tools (including résumés, letters of application, portfolios)

5.4.3

Demonstrate job-getting skills (including locating acceptable jobs, interviewing, completing a job application, and interpreting an employee contract)

5.4.4

Demonstrate skill in a second language if required for the position

5.4.5

Maintain a portfolio demonstrating job competence and containing job-getting tools

Key Indicators:

5.5

Demonstrate job-keeping skills

5.5.1

Demonstrate strong communication skills orally, in writing, or via computer

5.5.2

Apply basic arithmetic and mathematics skills to job tasks

5.5.3

Apply thinking skills to job tasks (including creative thinking, decision making, reasoning, problem solving, interpretation of information)

5.5.4

Apply interpersonal skills in relating to others on the job

5.5.5

Identify an awareness of employer expectations for the job

5.5.6

Carryout job tasks in accordance with employer expectations

5.5.7

Display positive work ethic

Key Indicators:

5.6

Upgrade career skills

5.6.1

Identify personal and workplace changes that require upgrading of own skills

5.6.2

Modify own career goals based on personal and workplace changes

5.6.3

Analyze various education/training options for securing needed upgrading

5.6.4

Identify professional development opportunities

5.6.5

Participate in professional development activities

5.6.6

Recognize need for lifelong upgrading of career skills

Key Indicators:

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5.7

Explore opportunities to create businesses

5.7.1

Identify an unmet need or opportunity for provision of a good or service

5.7.2

Identify potential target markets nationally and/or internationally

5.7.3

Identify factors that contribute to the success or failure of a business

5.7.4

Evaluate the costs and benefits of future opportunities (e.g., renovations, improvements, expansions, addition of new products or services, international trade opportunities)

5.7.5

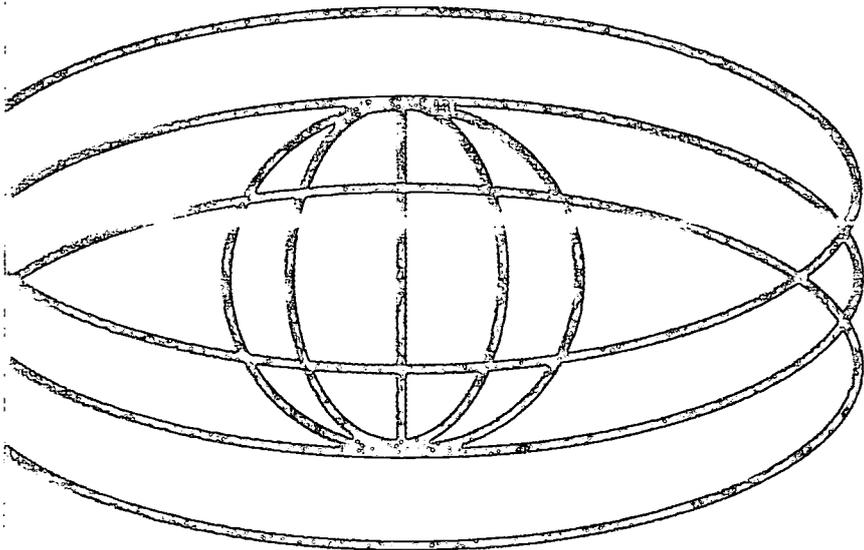
Evaluate entrepreneurship and intrapreneurship opportunities

5.7.6

Identify components of a business plan, considering various factors for identified opportunities and marketing strategies (including population, climate, location, supply and demand, competition)

Key Indicators:

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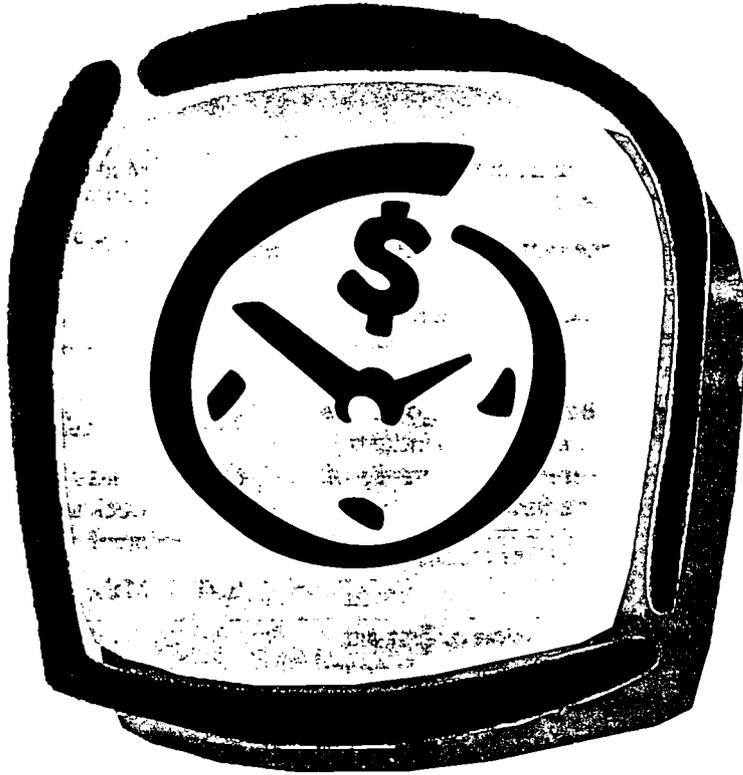


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Managing Resources - Strand

6

Core ITAC





Expectation

In high-performance workplaces, all individuals must effectively manage a variety of resources—personal, financial, and environmental. Individuals' ability to maintain good health, contribute to a safe work environment, and manage time not only enhances personal well-being, but fosters the success of the organization or business as well.

Competencies

- | | | | |
|-----|---|------|--|
| 6.1 | Apply self-management processes in the workplace | 6.7 | Manage work and family responsibilities for the well-being of self and others |
| 6.2 | Use reference materials to obtain information appropriate to a given problem, topic, or situation | 6.8 | Determine resources needed to produce a given product or provide a given service |
| 6.3 | Maintain/promote wellness | 6.9 | Ensure the quality of products and services |
| 6.4 | Determine the impact of government regulations and business/industry procedures on the performance of particular work functions | 6.10 | Utilize an inventory control system to track supplies, materials, and equipment |
| 6.5 | Implement safety procedures and programs | 6.11 | Make informed financial decisions |
| 6.6 | Support the provision of first aid in accordance with company policy and procedures | | |

Scenario

Your city has just experienced an outbreak of E.coli bacteria, which made a large percentage of the population ill. As a member of the city health department staff, your job is to analyze the potential causes of the outbreak and to educate the citizens and businesses in the community so as to prevent future outbreaks. Develop and present several communication tools, such as a 60-second television advertisement and a brochure, that convey your recommendations to prevent further contamination and illness.

Guiding Questions

- What food-handling and production practices contribute to E.coli contamination?
- What are the consequences of unsafe practices for individuals, businesses, and the community as a whole?
- What government regulations and business/industry policies impact the quality and safety of the foods we eat?
- How can individuals and families maintain good health and prevent E.coli contamination?



6.1

Apply self-management processes in the workplace

- 6.1.1
- 6.1.2
- 6.1.3
- 6.1.4
- 6.1.5
- 6.1.6
- 6.1.7

Key Indicators:

- Develop a system for organizing work
- Apply time-management skills
- Apply anger-management skills
- Apply stress-management skills
- Arrange work environment based on the principles of ergonomics
- Maintain a work area conducive to productivity (e.g., neat, orderly)
- Manage resources to support achievement of goals

6.2

Use reference materials to obtain information appropriate to a given problem, topic, or situation

- 6.2.1
- 6.2.2
- 6.2.3
- 6.2.4
- 6.2.5

Key Indicators:

- Obtain needed technological and informational reference materials
- Collect information from selected references
- Evaluate the validity and reliability of the information obtained
- Organize information for use in problem solving, decision making, or communications
- Apply information to workplace situations

6.3

Maintain/promote wellness

- 6.3.1
- 6.3.2
- 6.3.3
- 6.3.4
- 6.3.5

Key Indicators:

- Recognize positive and negative influences on wellness (including social activities, sports, hobbies, environment, health, emotions, economics)
- Participate in the arts disciplines and/or extracurricular activities (including dance, music, theater, visual arts, sports) that promote wellness and balance within an individual
- Follow wellness principles that result in significant, measurable improvements in own overall health condition and the health condition of peer(s)
- Monitor health and health parameters
- Act on environmental issues that influence wellness



Strand 6 – Managing Resources – Core ITAC

6.4

Determine the impact of government regulations and business/industry procedures on the performance of particular job functions

6.4.1

Identify the purpose of government regulations and their impact on the management of resources

6.4.2

Differentiate among federal, state, and local regulations and local business and industry procedures

6.4.3

Identify the various agencies involved in government oversight

6.4.4

Identify which regulations or guidelines take priority in a given situation

6.4.5

Locate information about the required process(es) for implementing regulations

6.4.6

Comply with regulations in the handling of materials, services, resources, and/or work activities (including inspection or self-monitoring)

Key Indicators:

6.5

Implement safety procedures and programs

6.5.1

Identify safety requirements

6.5.2

Demonstrate knowledge of safety rules and guidelines

6.5.3

Interpret safety signs and symbols

6.5.4

Demonstrate desirable safety attitudes and habits

6.5.5

Use safety equipment in accordance with established procedures

6.5.6

Document results of safety procedures and programs

Key Indicators:

6.6

Support the provision of first aid in accordance with company policy and procedures

6.6.1

Identify supplies and equipment needed in emergency situations

6.6.2

Locate supplies and equipment needed in emergency situations

6.6.3

Follow established procedures for the administration of first aid until official help arrives

6.6.4

Analyze the impact of stress throughout an emergency situation

6.6.5

Practice universal precautions during first aid procedures (including those related to blood-borne pathogens, confined spaces, emergency egress, fire safety, hearing conservation)

Key Indicators:

6.7

Manage work and family responsibilities for the well-being of self and others

6.7.1

Explore the meaning of work and the meaning of family

6.7.2

Analyze how work life is affected by families and how families are affected by work life

6.7.3

Implement strategies for balancing work and family roles

Key Indicators:



6.8 **Determine resources needed to produce a given product or provide a service**

- 6.8.1 Identify the different types of resources involved in the production of a product or provision of a service (e.g., financial, human, material, equipment)
- 6.8.2 Create a management plan for the allocation of financial resources to meet financial goals
- 6.8.3 Plan for the appropriate allocation and use of materials and equipment
- 6.8.4 Plan for the allocation and use of human resources
- 6.8.5 Plan for the allocation and use of information and technology needed to make and support decisions
- 6.8.6 Plan for the allocation and use of natural resources
- 6.8.7 Plan for the allocation and use of space so as to make the best use of facilities for goal achievement

Key Indicators:

6.9 **Ensure the quality of products and services**

- 6.9.1 Identify the importance of individual and organizational productivity in the workplace and how it affects the profitability of the business
- 6.9.2 Determine the quality- and quantity-control standards and procedures required to produce a specific product or provide a specific service
- 6.9.3 Inspect the production of the product or provision of the service to assure quality levels
- 6.9.4 Monitor production of products and provision of services
- 6.9.5 Select equipment and raw materials that will support quality in the process of producing a product or providing a service
- 6.9.6 Interpret quantitative and qualitative records to identify problems and provide a basis for making decisions about the production of products and provision of services
- 6.9.7 Provide appropriate documentation regarding the quality of products and services
- 6.9.8 Identify corrective actions needed to improve the quality of products and services
- 6.9.9 Create new methods for improving the quality of products and services

Key Indicators:

6.10 **Utilize an inventory control system to track supplies, materials, and equipment**

- 6.10.1 Determine the factors, including regulations, that influence the type of control system used
- 6.10.2 Develop an inventory system
- 6.10.3 Maintain the inventory system
- 6.10.4 Report the inventory results

Key Indicators:



6.11

Make informed financial decisions

6.11.1

Identify the need for personal financial management records

6.11.2

Create a budget

6.11.3

Evaluate the effectiveness of the budget

6.11.4

Demonstrate knowledge of how credit affects personal/family finances

6.11.5

Identify the steps to follow to avoid credit problems

6.11.6

Make informed consumer choices in response to personal needs and wants

6.11.7

Identify the factors that influence consumer decisions (e.g., advertisements, peer groups, price, location)

6.11.8

Recognize the value of company benefits and the importance of retirement planning

6.11.9

Identify the costs and benefits for individuals of various types of taxation at the local, state, and federal levels

Key Indicators:

Academic Connections in Core ITAC

Academic Connections answer the question, "What knowledge and skills from the Ohio Competency-Based Education (CBE) Models are essential to the achievement of the Core competencies?" The academic content represented in the ITAC includes the subject areas from six models:



The Arts



Mathematics



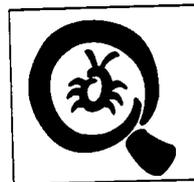
Social Studies



Language Arts



Foreign Language



Science

These connections were identified by relating the content of the competencies in the Core ITAC strands to essential content from the objectives in the Ohio CBE Models. ITAC key indicators for each competency were used to clarify the nature and specificity of the connection. Subject-matter experts in each academic area verified the connections.

The following chart is a summary of the percentages of connections for each model. For specific connections between the core competencies and objectives in each model, visit the following website: <www.cete.org/products>. This summary does not represent all possible opportunities for interdisciplinary curriculum development. Many other connections could be made during the instructional process through authentic projects or workplace situations that involve related content.

Academic Connections in Core ITAC

The chart below illustrates the relationship between the Core ITAC and the objectives in Ohio's Competency-Based Education (CBE) Models. Each column represents the percent of the total number of CBE objectives, PreK–12 grade, that are related to each core competency.

Core ITAC Competencies	Academic Models					
	Percent of Model Relating to Core ITAC					
	 The Arts	 Math	 Social Studies	 Language Arts	 Foreign Language	 Science
Strand 1 — Solving Problems and Thinking Skillfully						
1.1 Solve problems and make decisions in work-related situations	52%	16%	4%	24%	0%	54%
1.2 Read for information and understanding	5%	1%	19%	33%	5%	32%
1.3 Use observation skills to analyze work-related situations	27%	5%	1%	42%	2%	39%
1.4 Apply mathematical processes	0%	62%	1%	<1%	4%	24%
1.5 Apply measurement and spatial skills	0%	22%	1%	0%	4%	28%
1.6 Apply statistical analysis skills	<1%	9%	<1%	1%	0%	12%
1.7 Analyze critical data to guide work activities	5%	0%	1%	1%	0%	27%
1.8 Utilize scheduling techniques to ensure that jobs are completed by the stated due date	<1%	0%	0%	3%	0%	1%
1.9 Demonstrate knowledge of the economy and how it functions as a whole	6%	0%	6%	1%	2%	0%
1.10 Demonstrate knowledge of the economy as a framework within which decisions are made by individuals and groups	3%	2%	6%	1%	4%	0%
Strand 2 — Communicating Effectively						
2.1 Apply basic communication skills	79%	3%	1%	67%	50%	20%
2.2 Apply oral communication skills	14%	5%	0%	18%	37%	10%
2.3 Apply written communication skills	5%	2%	0%	29%	13%	9%
2.4 Apply technical writing skills	2%	0%	0%	1%	0%	5%
2.5 Apply listening skills	4%	0%	1%	21%	8%	9%
2.6 Apply demonstration/presentation skills	20%	<1%	0%	6%	7%	4%
2.7 Apply graphic communication skills	12%	9%	2%	4%	5%	5%
2.8 Apply artistic communication skills	96%	<1%	1%	27%	8%	3%
2.9 Convey information through multimedia presentation	13%	0%	0%	2%	1%	4%
2.10 Create graphs and charts	3%	10%	2%	4%	5%	6%
2.11 Build interpersonal relationships	4%	0%	4%	5%	11%	7%

Core ITAC	Academic Models					
Competencies	Percent of Model Relating to Core ITAC					
	 The Arts	 Math	 Social Studies	 Language Arts	 Foreign Language	 Science
Strand 3 — Applying Technology						
3.1 Demonstrate technological literacy	5%	1%	1%	0%	0%	8%
3.2 Access/transmit information using electronic communication systems	<1%	0%	0%	2%	11%	2%
3.3 Demonstrate computer literacy	4%	2%	0%	4%	3%	4%
3.4 Use database software in work-related situations	0%	0%	0%	<1%	0%	3%
3.5 Use spreadsheet software in work-related situations	0%	<1%	0%	0%	0%	2%
3.6 Use word-processing software in work-related situations	<1%	0%	0%	2%	2%	2%
Strand 4 — Working Responsibly						
4.1 Demonstrate leadership	0%	0%	2%	1%	0%	4%
4.2 Contribute to teamwork	20%	0%	5%	23%	4%	5%
4.3 Choose ethical courses of action in all work assignments and personal interactions	0%	0%	<1%	1%	0%	4%
4.4 Demonstrate the work ethic	<1%	0%	1%	13%	3%	4%
4.5 Comply with the confidentiality requirements of workplace policies and procedures	0%	0%	0%	<1%	0%	1%
4.6 Apply appropriate strategies for dealing with the differences associated with diversity (e.g., racial, ethnic, gender, educational, personality, social, and age)	20%	0%	8%	20%	8%	4%
Strand 5 — Planning and Managing a Career						
5.1 Identify how personal interests, abilities, and skills relate to choosing a career	8%	0%	1%	11%	2%	1%
5.2 Investigate career options	6%	0%	0%	<1%	3%	1%
5.3 Chart career using career-planning skills	2%	0%	0%	<1%	2%	1%
5.4 Demonstrate skills needed to enter or reenter the workforce	4%	0%	<1%	1%	5%	<1%
5.5 Demonstrate job-keeping skills	0%	0%	0%	8%	<1%	0%
5.6 Upgrade career skills	0%	0%	0%	0%	0%	0%
5.7 Explore opportunities to create businesses	2%	0%	3%	0%	1%	0%

ITAC – Integrated Technical & Academic Competencies

Core ITAC	Academic Models					
Competencies	Percent of Model Relating to Core ITAC					
	 The Arts	 Math	 Social Studies	 Language Arts	 Foreign Language	 Science
Strand 6 — Managing Resources						
6.1 Apply self-management processes in the workplace	5%	0%	3%	8%	8%	3%
6.2 Use reference materials to obtain information appropriate to a given problem, topic, or situation	12%	0%	1%	7%	<1%	4%
6.3 Maintain/promote wellness	<1%	0%	0%	8%	1%	1%
6.4 Determine the impact of government regulations and business/industry procedures on the performance of particular work functions	0%	0%	4%	0%	0%	0%
6.5 Implement safety procedures and programs	12%	0%	0%	<1%	0%	3%
6.6 Support the provision of first aid in accordance with company policy and procedures	0%	0%	0%	0%	0%	0%
6.7 Manage work and family responsibilities for the well-being of self and others	0%	0%	0%	<1%	0%	<1%
6.8 Determine resources needed to produce a given product or provide a given service	11%	0%	6%	2%	0%	1%
6.9 Ensure the quality of products and services	22%	0%	0%	8%	0%	<1%
6.10 Utilize an inventory control system to track supplies, materials, and equipment	0%	0%	0%	<1%	0%	<1%
6.11 Make informed financial decisions	0%	0%	2%	<1%	0%	0%

Core ITAC Acknowledgments

The Vocational Instructional Materials Laboratory extends thanks and appreciation to the many representatives of business, industry, labor, and community organizations who contributed their time and expertise to the identification and verification of competencies.

The following panel participants verified the technical and academic competencies in the Core ITAC:

Laura Berk, The Center for Manufacturing Excellence, Toledo, Ohio
Kay Briggs, Coalition of Neighborhoods, Cincinnati, Ohio
Walter R. Cates, Sr., Main Street Business Association, Columbus, Ohio
Cap Clegg, Columbus Financial Concepts, Dublin, Ohio
Randy Deatherage, Agnew Farm Equipment, Youngstown, Ohio
Timothy A. Ely, Beacon Electric, Cincinnati, Ohio
Diane Findley, RN, Paul E. Detty MD Inc., Lancaster, Ohio
Sheila Kane, The Andersons General Store, Columbus, Ohio
Keith Meske, Educable TV 25, Columbus, Ohio
Sandy O'Connor, Clark County Dept. of Human Services, Springfield, Ohio
Joyce E. Odor, Columbus Public Schools, Columbus, Ohio
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Charlie Pinter, Kroger, Gahanna, Ohio
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Van S. White, Human Resources Consultant, Cincinnati, Ohio
Morris Williams, Coalition of Neighborhoods, Cincinnati, Ohio

The following educator review panel was responsible for reviewing the integrated technical and academic competencies in the Core ITAC:

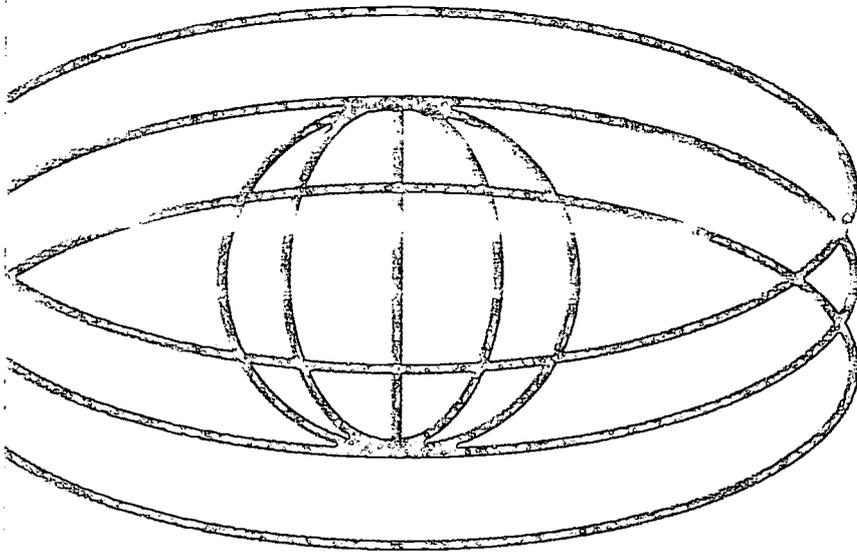
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David Cairns, Warren County JVS, Lebanon, Ohio
Denise P. Clapp, Hilliard Davidson High School, Hilliard, Ohio
Carmen R. Giebelhaus, Ohio Department of Education, Columbus, Ohio
Karen P. Heath, Ohio Department of Education, Columbus, Ohio
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Abbejean Kehler, Ohio Council on Economic Education, Columbus, Ohio
Betty Kulich, Fort Hayes Metro Education Center, Columbus, Ohio
Jerry Mahl, EHOVE Career Center, Milan, Ohio
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Susan Washam Witten, Ohio Department of Education, Columbus, Ohio

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Business & Management Career Cluster ITAC

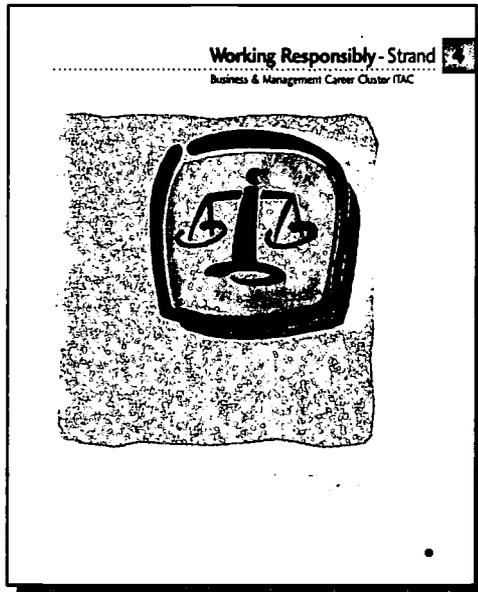


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Components of Career Cluster ITACs

Career Clusters:

- Arts & Communications
- Business & Management
- Industrial & Engineering Systems
- Human Resources/Services
- Environmental & Agricultural Systems
- Health Services



- Each strand in a Career Cluster ITAC has an introduction page which identifies the strand (in words and by icon) and the career cluster. These pages also appear in the Core ITAC.



Solving Problems and Thinking Skillfully



Communicating Effectively



Applying Technology



Working Responsibly



Planning and Managing a Career



Managing Resources

- **Expectation** – a statement of desired workplace behaviors and their importance in the world of work.

Competencies – observable and measurable knowledge, skills, and attitudes essential to achievement of the expectation.

Strand 4 – Working Responsibly – Business & Management Career Cluster ITAC

Expectation

Working responsibly encompasses skills in leadership, teamwork, and legal and ethical conduct. Individuals must daily demonstrate a strong work ethic, including — but not limited to — honesty, initiative, and dependability. Individuals must be able to discern between right and wrong in difficult or subtle situations. Then, they must act with rightness, fairness, and equity. Individuals must be free from petty, mean, or dubious conduct if an organization is to thrive. Without high standards of ethical conduct on both sides, individuals and organizations are subject to low morale and a host of management, legal, economic, and political problems.

Competencies

- | | |
|---|--|
| 4.1 Evaluate the relationship between law and business | 4.3 Analyze ethical business behavior |
| 4.2 Evaluate issues related to leadership and managerial ethics | 4.4 Evaluate issues related to employee ethics |

An employee at the accounting firm in which you work was fired for unethical accounting practices. Your boss has assigned you to develop a written code of ethics for the firm. You must present this written code of ethics at the next staff meeting, which will be attended by your peers as well as your superiors.

- What is a code of ethics? What role does a code of ethics play in promoting a productive workplace?
- How do you know when behavior is ethical?
- What is ethical and unethical behavior related to a business environment?
- What laws and regulations would influence the content of a code of ethics?
- What are the economic, social, and legal consequences of unethical behavior?

- **Sample Scenario** – a real-life workplace situation requiring learners to apply the knowledge and skills reflected in the strand competencies.

Sample Guiding Questions – targeted questions to use in focusing learners' attention on knowledge and skills covered in the scenario.

Connections to Core ITAC Competencies – a list, by number, of key competencies in Core ITAC that relate to and/or reinforce the competencies in the given strand and cluster.

Business & Management Career Cluster ITAC – Working Responsibility – Strand 4

Core ITAC	Competency Connections
Strand 1: Solving Problems and Thinking Skillfully	1.1, 1.2, 1.7
Strand 2: Communicating Effectively	2.1, 2.2, 2.3, 2.4, 2.5, 2.6
Strand 3: Applying Technology	None
Strand 4: Working Responsibly	4.3, 4.4, 4.5, 4.6
Strand 5: Planning and Managing a Career	None
Strand 6: Managing Resources	6.1, 6.4

Academic Connections

Academic Area	Connections
Math	<ul style="list-style-type: none"> • Data Analysis and Probability: Use sampling and recognize its role in statistical claims
Social Studies	<ul style="list-style-type: none"> • American Heritage: Draw connections between ideas, interests, beliefs, and ideologies and their influence on individual and group historical actions • American Heritage: Demonstrate historical continuity and/or change with respect to a particular historical development, such as management theory • Democratic Processes: Analyze and evaluate situations in which individual rights conflict with each other or with other important interests • Democratic Processes: Interpret public law and its impact on individual and organizational behavior • Citizenship Rights and Responsibilities: Associate the exercise of responsibilities with the exercise of rights • Citizenship Rights and Responsibilities: Participate with others in evaluating public policy and work to achieve consensus on how the policy issues should be addressed • Citizenship Rights and Responsibilities: Evaluate positions on the proper scope and limits of individual rights in specific situations • Citizenship Rights and Responsibilities: Acquire, interpret, and evaluate information regarding civic issues
Language Arts	<ul style="list-style-type: none"> • Reading/Multidisciplinary: Connect themes and ideas across the disciplines through literature • Reading/Multidisciplinary: Explore and analyze a variety of cultural elements, attitudes, beliefs, and value structures by reading and experiencing our diverse literary tradition
Foreign Language	<ul style="list-style-type: none"> • Multidisciplinary Connections, Information, and Knowledge: Identify and discuss issues common to the home and target cultures

Connections to Academic Models – a list of objectives from Ohio's Competency-Based Education Models, grades 9–12, that relate to and/or reinforce the competencies in the given strand and cluster. Each academic area is represented by an icon.

Business & Management Career Cluster ITAC – Working Responsibility – Strand 4

Competencies & Key Indicators

4.1	Evaluate the relationship between law and business
4.1.1	Analyze the relationship between ethics and the law
4.1.2	Identify the impact civil and criminal laws may have on specific business elements and practices
4.1.3	Identify the impact laws of various jurisdictions may have on specific business elements or operations
4.1.4	Demonstrate knowledge of contract law
4.2	Evaluate issues related to leadership and managerial ethics
4.2.1	Investigate the nature of leadership and managerial ethics
4.2.2	Research the history of leadership and management theory
4.2.3	Analyze current issues in leadership and management ethics
4.2.4	Identify the impact that various employment and social laws may have on leading and managing business
4.3	Analyze ethical business behavior
4.3.1	Analyze current trends in computer and business ethics
4.3.2	Identify various types of ethical and unethical business practices
4.3.3	Interpret codes of ethics for great businesses
4.3.4	Identify potential consequences of unethical business practices
4.4	Evaluate issues related to employee ethics
4.4.1	Analyze current issues in employee ethics
4.4.2	Identify types of ethical employee behaviors
4.4.3	Identify ethics established by business for entry-level employees
4.4.4	Identify unethical behaviors
4.4.5	Identify potential consequences of unethical behaviors

Pages following the overview list each competency with its key indicators. Key indicators describe significant elements of competency performance.

Connections to Ohio's Proficiency Tests and ACT Work Keys® – a crosswalk between ITACs (core, cluster, specialization) and assessments that reflect student exit outcomes.



The Arts



Mathematics



Social Studies



Language Arts



Foreign Language



Science



Management · Business & Management ·

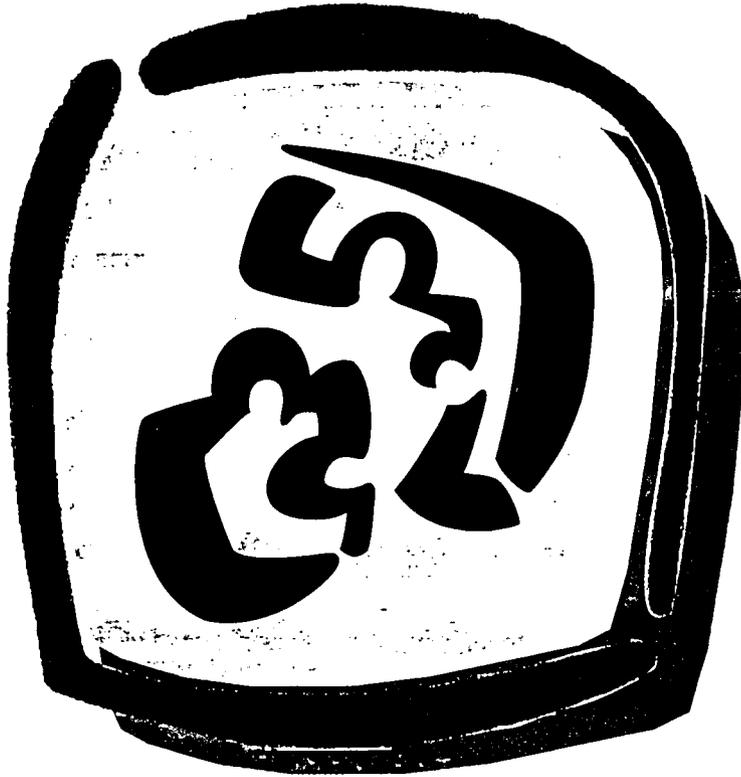
BUSINESS & MANAGEMENT

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Solving Problems and Thinking Skillfully - Strand 1

Business & Management Career Cluster ITAC





Expectation

All individuals, regardless of career choice, must be able to think for themselves; initiate action on their own; and direct, modify, and assess their own work. Employers seek lifelong learners who can locate and use information. The following competencies — focusing on business, economics, and finance — specify the knowledge, skills, and attitudes needed to develop the capacity to assess problems and situations, anticipate what might happen next, and continuously search for creative solutions.

Competencies

1.1	Analyze trends and issues in business and management	1.9	Apply business economic concepts
1.2	Apply analytical skills in business operations	1.10	Examine issues related to managing economic resources
1.3	Apply mathematics skills in business operations	1.11	Analyze economic indicators and trends
1.4	Perform basic accounting functions	1.12	Evaluate marketing concepts
1.5	Analyze financial data	1.13	Identify key elements of business organizations
1.6	Analyze credit issues	1.14	Identify business management practices
1.7	Develop a financial plan	1.15	Examine the role of the selling process
1.8	Perform banking functions		

Sample Scenario

You and your business partners have decided to open a business that sells cleaning products that are environmentally safe. The cleaning products will be free of chemicals that might trigger allergies and other, more serious reactions. Develop a business plan and marketing strategies, including an infomercial that will advertise your business and the new products. Present your work to a panel of local business owners to assess the viability of your plan.

Guiding Questions

- What should be included in the business plan?
- What is the market for environmentally safe products?
- What substances included in cleaning products are considered environmentally safe? Why?
- What financial projections can be made in terms of both sales and profit?
- What marketing strategies will be most appropriate for environmentally safe products?



Core ITAC	Competency Connections
Strand 1: Solving Problems and Thinking Skillfully	1.1, 1.2, 1.3, 1.4, 1.5, 1.6, 1.7, 1.8, 1.9, 1.10
Strand 2: Communicating Effectively	2.1, 2.2, 2.3, 2.5, 2.10
Strand 3: Applying Technology	3.3
Strand 4: Working Responsibly	None
Strand 5: Planning and Managing a Career	None
Strand 6: Managing Resources	6.1, 6.8, 6.11

Academic Connections



The Arts

- **Understanding the Role of the Arts in People's Lives:** Access primary and secondary data related to an historical or current event and make inferences and predictions that are possible from the data about its future implications for the arts
- **Communicating Through the Arts:** Communicate information about a concept or problem encountered using multiple solutions/ technologies and assess the effectiveness/impact of each approach



Math

- **Patterns, Relations, and Functions:** Describe the general characteristics of polynomial functions and use them in problem-solving situations
- **Geometry:** Explore inductive and deductive reasoning through applications to various subject areas
- **Algebra:** Set up and solve linear equations
- **Algebra:** Describe geometric situations and phenomena using variables, equations, and functions
- **Algebra:** Describe and solve algebraic situations with matrices
- **Algebra:** Describe measures of central tendency, mean, median, mode, and variance algebraically and graphically
- **Data Analysis and Probability:** Organize data into tables, charts, and graphs
- **Data Analysis and Probability:** Use curve fitting to predict from data, use experimental or theoretical probability, as appropriate, to represent and solve problems involving uncertainty
- **Data Analysis and Probability:** Read, interpret, and use tables, charts, and graphs to identify patterns, note trends, draw conclusions, and make predictions



Social Studies

- **Decision Making and Resources:** Describe a business cycle and identify changes that occur in economic activities during times of contraction and expansion



Academic Connections



Social Studies (cont.)

- **Decision Making and Resources:** Compare advantages and disadvantages of competition in the marketplace, find examples of ways in which businesses compete, and identify reasons why they may seek to restrict competition
- **Decision Making and Resources:** Identify types of financial institutions and explore their roles as intermediaries between households and businesses
- **Decision Making and Resources:** Identify the functions and characteristics of money and suggest acceptable and unacceptable forms of money
- **Decision Making and Resources:** Suggest the impact of savings and credit usage on the economy
- **Decision Making and Resources:** Compare the efforts of the United States government with governments in other nations to promote competition, to protect national economic interests, and to regulate economic activity
- **Decision Making and Resources:** Compare traditional, market, command, and mixed economies in terms of how the three fundamental economic questions are addressed
- **Decision Making and Resources:** Justify proposed solutions to current issues by considering the costs and benefits of the reallocation of resources
- **Decision Making and Resources:** Discuss how the activities of government impact economic activity



Language Arts

- **Listening/Visual Literacy/Meaning Construction:** Use information gathered from listening and viewing experiences to expand research
- **Reading/Structure:** Develop and use an increasingly sophisticated vocabulary gained through context
- **Reading/Meaning Construction:** Confirm and extend meaning in reading by researching new concepts and facts
- **Reading/Meaning Construction:** Use reading as a possible problem-solving strategy to clarify personal thinking and understanding
- **Reading/Application:** Read selections from a variety of styles and formats, recognizing that style and format influence meaning
- **Writing/Application:** Vary styles and formats for the intended purpose and audience



Foreign Language

- **Cultural Knowledge:** Identify and describe recent trends in social patterns and conventions of the target culture(s)
- **Multidisciplinary Connections, Information, and Knowledge:** Give examples of social, political, and economic interdependence of the home and target cultures



Academic Connections



Science

- **Scientific Inquiry:** Check the appropriateness and accuracy of measures and computations using various strategies (e.g., estimations, unit analysis, determination of significant figures)
- **Scientific Inquiry:** Explain the influence of perspective (e.g., spatial, temporal, and social) on observation and subsequent interpretations
- **Scientific Inquiry:** Create multiple representations of the same data using a variety of symbols, descriptive languages, mathematical concepts, and graphic techniques
- **Scientific Inquiry:** Analyze the changes within a system when inputs, outputs, and interactions are altered
- **Scientific Inquiry:** Recognize and communicate differences between questions that can be investigated in a scientific way and those that rely on other ways of knowing
- **Conditions for Learning Science:** Formulate processes for determining when questions are appropriate for scientific investigation
- **Applications for Learning Science:** Develop an informed point of view that allows for validation or refutation of the scientific statements and claims of advocates before pursuing courses of action (e.g., contributing support, signing petitions, casting votes)
- **Applications for Learning Science:** Differentiate between observations and inferences in the exploration of evidence related to personal, scientific, and community issues



Competencies & Key Indicators

1.1

Analyze trends and issues in business and management

1.1.1

Identify types of business enterprises and trends affecting them

1.1.2

Analyze influences on trends and issues in business and management

1.1.3

Analyze historical, social, and political factors affecting trends and issues in business and management

Key Indicators:

1.2

Apply analytical skills in business operations

1.2.1

Determine what information is needed to solve problems and make decisions

1.2.2

Determine whether information is sufficient, insufficient, or extraneous when solving business problems

1.2.3

Interpret data needed to solve problems and make decisions

1.2.4

Apply information from tables, charts, and graphs (line, circle, bar charts) to problem solving and decision making

1.2.5

Interpret work flow and organizational charts

1.2.6

Apply logic skills to business decisions

Key Indicators:

1.3

Apply mathematics skills in business operations

1.3.1

Solve for unknowns using algebraic equations

1.3.2

Apply number relations (e.g., greater than, less than, equal)

1.3.3

Interpret measurements (e.g., weight, capacity, length, area, volume)

1.3.4

Calculate break-even sales

1.3.5

Calculate discounts and due dates

1.3.6

Calculate percentages

1.3.7

Make estimates based on given data (e.g., time, financial, inventory)

1.3.8

Prove financial data (e.g., checkbooks, cash drawers, accounting forms)

1.3.9

Apply keyboarding and 10-key skills

Key Indicators:



1.4

Perform basic accounting functions

1.4.1

Identify the purposes of basic accounting functions

1.4.2

Key Indicators: Apply generally accepted accounting principles (GAAP) and procedures in business operations

1.4.3

Employ computer accounting applications

1.4.4

Calculate payrolls

1.4.5

Prepare balance sheets and profit/loss statements

1.4.6

Interpret inventory control system data

1.5

Analyze financial data

1.5.1

Key Indicators: Analyze financial reports (profit/loss statements, balance sheets) both electronically and manually

1.5.2

Evaluate cost-profit relationships

1.5.3

Predict financial outcomes relative to business decisions and financial data

1.6

Analyze credit issues

1.6.1

Key Indicators: Analyze differences in the uses of credit cards, debit cards, installment loans, term loans, and commercial loans

1.6.2

Determine factors involved in issuing credit

1.6.3

Identify the components of credit reports

1.7

Develop a financial plan

1.7.1

Key Indicators: Identify components of a financial plan

1.7.2

Compare various sources of capital and types of loans

1.7.3

Compare methods of financing given business and personal endeavors

1.7.4

Set long-term financial goals and objectives (business, personal)

1.8

Perform banking functions

1.8.1

Key Indicators: Maintain a checkbook with proper reconciliation

1.8.2

Complete bank deposits/records

1.8.3

Inspect currency for counterfeit bills, check authenticity, credit card fraud, smart card fraud, check card fraud, electronic currency fraud

1.8.4

Calculate the cost of accepting credit cards



Strand 1 – Solving Problems and Thinking Skillfully – Business & Management Career Cluster ITAC

1.9

Apply business economic concepts

1.9.1

Identify economic resources

1.9.2

Analyze the functions of money

1.9.3

Identify the difference between economics and economic activities

1.9.4

Identify the relationship between business, society, and government

1.9.5

Apply the concept of economic goods and services to given business situations

1.9.6

Apply the concept of utility to given business situations

1.9.7

Apply the concept of supply and demand to given business situations

1.9.8

Apply the concept of competition to given business situations

1.9.9

Apply the concept of price to given business situations

1.9.10

Apply the concept of opportunity cost to given business situations

Key Indicators:

1.10

Examine issues related to managing economic resources

1.10.1

Identify the types of economic systems

1.10.2

Analyze the interdependence between government and business

1.10.3

Identify the factors that influence management decisions

1.10.4

Track work flow using flow charts

Key Indicators:

1.11

Analyze economic indicators and trends

1.11.1

Identify business cycles

1.11.2

Investigate the nature of current and past economic problems

1.11.3

Identify leading indicators

1.11.4

Identify lagging indicators

Key Indicators:

1.12

Evaluate marketing concepts

1.12.1

Identify marketing functions and related activities

1.12.2

Analyze market segmentation and its role in the marketing plan

1.12.3

Identify the purposes and functions of a marketing plan

1.12.4

Analyze the effects of marketing

1.12.5

Identify current trends in marketing and their effects on business operations

1.12.6

Analyze promotional planning strategies

Key Indicators:



Identify key elements of business organizations

1.13

Key Indicators:

- 1.13.1 Identify the parts of a business plan
- 1.13.2 Identify the relationship between the business plan and the business organization
- 1.13.3 Identify current trends in various industries
- 1.13.4 Identify types of business ownership and the characteristics of each
- 1.13.5 Identify advantages and disadvantages of various types of business ownership
- 1.13.6 Identify forms of international business activities
- 1.13.7 Identify barriers to international trade
- 1.13.8 Identify efforts being made to develop a global economy

Identify business management practices

1.14

Key Indicators:

- 1.14.1 Identify functions of management
- 1.14.2 Identify management levels and their role in the organization
- 1.14.3 Identify areas of management (human resources, financial, facility, inventory, information systems, logistics, accounting) and their relationship to business functions

Examine the role of the selling process

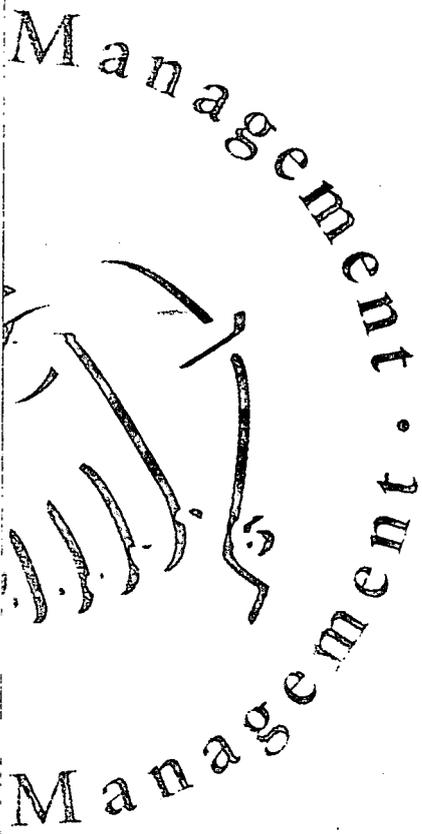
1.15

Key Indicators:

- 1.15.1 Identify the elements necessary to convey a professional appearance and businesslike image
- 1.15.2 Determine strategies for identifying your audience/clients and their needs and motives
- 1.15.3 Determine strategies for analyzing competitors' offerings
- 1.15.4 Identify sales support services and the benefits for customers
- 1.15.5 Interpret business policies so they could be understood by customers/clients
- 1.15.6 Demonstrate knowledge of products/services
- 1.15.7 Determine strategies for presenting feature-benefit sales
- 1.15.8 Identify the importance of each person's role in the selling process



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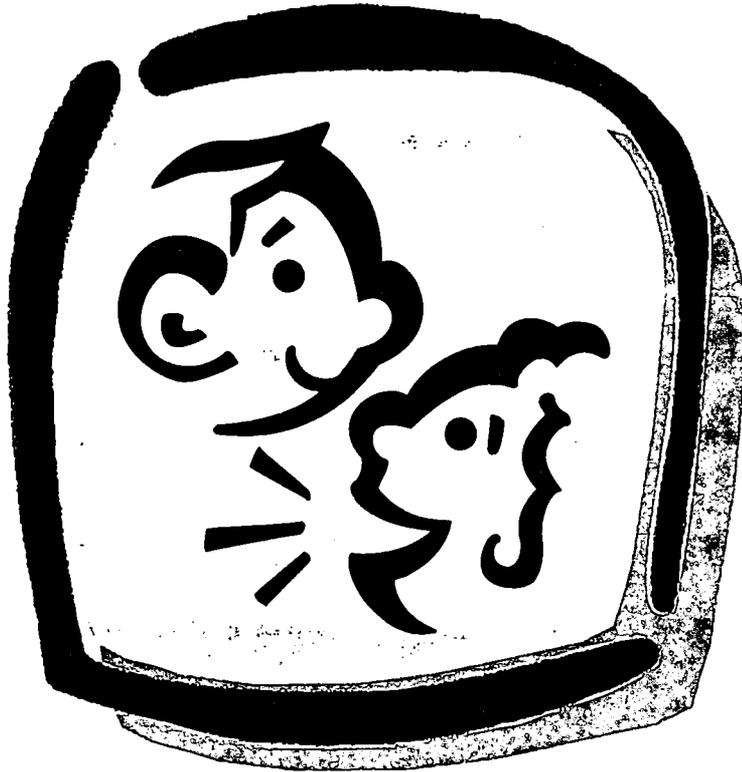


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Communicating Effectively - Strand 2

Business & Management Career Cluster ITAC





Expectation

Effective communication is essential to workplaces, communities, and families. Employees with positive communication and customer relations skills contribute to organizational productivity, enhance interpersonal relationships with coworkers and clients, and create opportunities for promotion and advancement.

Competencies

- | | | | |
|-----|--|-----|------------------------------------|
| 2.1 | Build customer and coworker relations | 2.3 | Build customer service |
| 2.2 | Communicate using telecommunications tools | 2.4 | Deliver business presentations |
| | | 2.5 | Prepare written business documents |

Sample Scenario

You are a manager for a local car dealership. Your primary responsibility is interviewing and hiring new employees. You have decided that there needs to be a procedure manual that can be shared and discussed during interviews, as well as an audiovisual presentation that depicts the company's customer service practices, which will be viewed by all new employees. Develop a plan for carrying out these activities.

Guiding Questions

- What information needs to be included in the guide?
- Which audiovisual presentation strategy will best meet your objectives?
- What are the customer service practices and expectations of new employees?

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Core ITAC	Competency Connections
Strand 1: Solving Problems and Thinking Skillfully	1.1, 1.2
Strand 2: Communicating Effectively	2.1, 2.2, 2.3, 2.4, 2.5, 2.6, 2.7, 2.8, 2.9, 2.11
Strand 3: Applying Technology	3.1, 3.2, 3.3, 3.4, 3.5, 3.6
Strand 4: Working Responsibly	4.1, 4.2, 4.3, 4.4, 4.5, 4.6
Strand 5: Planning and Managing a Career	None
Strand 6: Managing Resources	6.1, 6.8, 6.9

Academic Connections

	The Arts	<ul style="list-style-type: none"> • Communicating Through the Arts: Develop and practice presentation skills
	Language Arts	<ul style="list-style-type: none"> • Oral Communication/Structure: Refine speaking techniques for formal, semiformal, and informal settings • Oral Communication/Structure: Develop a repertoire of organizational strategies for presenting information orally • Oral Communication/Meaning Construction: Use interviewing techniques to gather information • Writing/Structure: Develop extended pieces of writing which contain ordered, related, well-developed paragraphs with sentences of varied lengths and patterns • Writing/Structure: Develop effectively organized pieces of expository writing containing strong voice, clear thesis, and well-developed ideas • Writing/Meaning Construction: Evaluate, analyze, and synthesize information for writing • Writing/Application: Focus writing and tone on such elements as audience, situation, and purpose
	Foreign Language	<ul style="list-style-type: none"> • Cultural Knowledge: Interact in a variety of cultural contexts that reflect both peer group and adult activities of the target culture(s) using appropriate verbal and nonverbal language • Cultural Knowledge: Develop sensitivity to cultural differences
	Science	<ul style="list-style-type: none"> • Scientific Inquiry: Communicate the results of investigations clearly in a variety of situations • Conditions for Learning Science: Create presentations of scientific understandings using diverse modes of expression • Conditions for Learning Science: Develop multimedia presentations of group and individual research projects and investigations appropriate for a variety of audiences and forums



Competencies & Key Indicators

2.1

Build customer and coworker relations

2.1.1

Provide needed information to customers and coworkers in a considerate and respectful manner

2.1.2

Project a professional business image (appearance, voice, grammar, word usage, enunciation, nonverbal communication)

2.1.3

Gather information needed for international business communication

2.1.4

Demonstrate business professionalism through the use of appropriate manners in accordance with established protocols and company policies

Key Indicators:

2.2

Communicate using telecommunications tools

2.2.1

Identify company policies regarding use of telecommunications tools (telephones, answering machine, voice mail, e-mail, teleconferencing systems)

2.2.2

Operate telecommunications equipment in accordance with company policy

2.2.3

Communicate via telephones, voice mail, e-mail, teleconferencing systems

2.2.4

Keep up-to-date concerning new and emerging communication technologies

2.2.5

Take complete and accurate telephone messages

2.2.6

Give complete and accurate telephone messages

2.2.7

Follow established telephone etiquette

Key Indicators:

2.3

Build customer service

2.3.1

Identify organization's products and services (including own strengths as a sales agent)

2.3.2

Recognize the importance of all customers to the business

2.3.3

Determine customers' individual needs

2.3.4

Interact with customers in a professional manner (prompt, friendly, courteous, helpful, knowledgeable, understandable)

2.3.5

Follow through on commitments made to customers (special orders, delivery specifications, new items)

2.3.6

Communicate business policies to customers

2.3.7

Handle merchandise returns in accordance with customer service policy

2.3.8

Handle customer complaints in accordance with customer service policy

2.3.9

Facilitate customer service through the maintenance of key information systems

2.3.10

Maintain customer base

Key Indicators:



2.4

Deliver business presentations

2.4.1

Identify types of presentations for business use

2.4.2

Outline presentations

2.4.3

Enhance presentation delivery using various types of technology

2.4.4

Project a professional business image (appearance, voice, grammar, word usage, enunciation, nonverbal communication)

Key Indicators:

2.5

Prepare written business documents

2.5.1

Prepare written business documents using various formats (letters, thank-you notes, acknowledgments, transcripts, memorandums)

2.5.2

Prepare complex written reports (research, analysis, legal)

Key Indicators:



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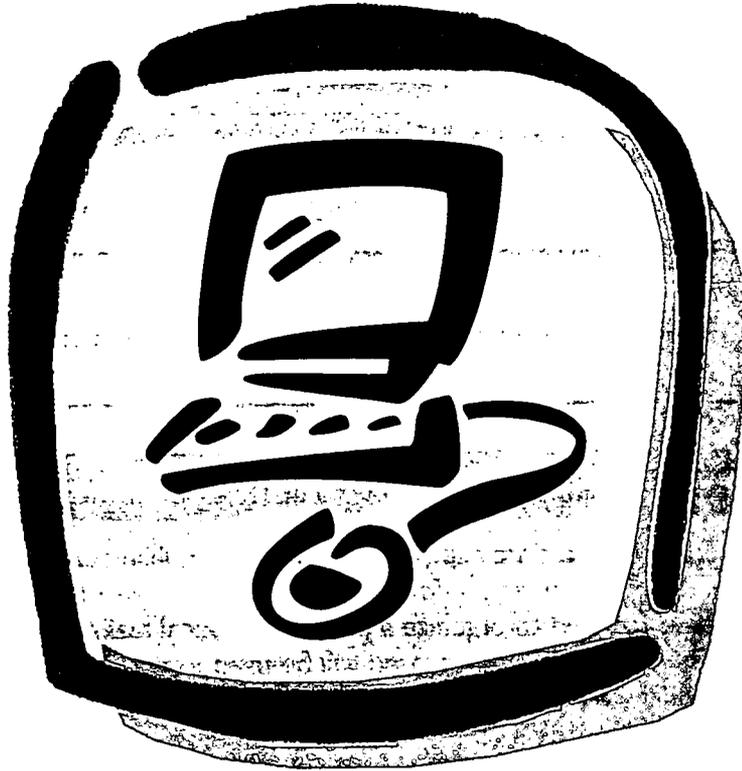


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Applying Technology - Strand 3

Business & Management Career Cluster ITAC



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Expectation

Technology influences every work environment. To be effective in today's workplace, individuals must be able to use the tools of technology and software applications to improve productivity and efficiency. Employers seek individuals who have developed technological skills and who stay abreast of the continuously changing technological environment.

Competencies

- | | | | |
|-----|---|-----|--|
| 3.1 | Analyze the role of technology in business | 3.4 | Create word-processed documents for business applications |
| 3.2 | Create spreadsheets for business applications | 3.5 | Perform desktop publishing functions for business applications |
| 3.3 | Create databases for business applications | 3.6 | Reproduce documents |

Sample Scenario

You and your colleagues are experiencing difficulty in filling empty positions in all departments. The organization lacks information about the available pool of qualified workers. Thus, you have decided to organize a job fair at a local mall to attract interest for various positions. The application information will be used to create a database of available applicants, which can be used as a resource. Develop your job fair plan and share it with a group of business professionals.

Guiding Questions

- What information is needed from prospective employees?
- Which database format would best serve this purpose?
- How should the application form be designed?
- What training would employing managers need in order to access the information needed?
- What has happened in the community that is causing this shortage of qualified workers?
- How will you know whether the database is meeting the needs of the company?



Core ITAC	Competency Connections
Strand 1: Solving Problems and Thinking Skillfully	1.1, 1.4, 1.5
Strand 2: Communicating Effectively	2.1, 2.3, 2.4
Strand 3: Applying Technology	3.1, 3.3, 3.4, 3.5, 3.6
Strand 4: Working Responsibly	None
Strand 5: Planning and Managing a Career	None
Strand 6: Managing Resources	6.1, 6.4, 6.9

Academic Connections



Math

- **Algebra:** Describe problem situations by using and relating numerical, symbolic, and graphical representations
- **Algebra:** Explore recursive functions and procedures using spreadsheets and other computer capabilities and use notations appropriate to these problem situations
- **Algebra:** Analyze and describe the errors and sources of error that can be made when using computers and calculators to solve problems
- **Algebra:** Use computer simulations and random number generators to estimate probabilities
- **Estimation:** Use mental computation when computer and calculator are inappropriate
- **Data Analysis and Probability:** Read, interpret, and use tables, charts, and graphs to identify patterns, note trends, draw conclusions, and make predictions
- **Data Analysis and Probability:** Transform data to aid in data interpretation and prediction



Language Arts

- **Writing/Meaning Construction:** Use word processing, graphics, and publishing as aids for constructing meaning in writing
- **Listening/Visual Literacy/Application:** Use technology and other media as a means for expressing ideas



Science

- **Scientific Inquiry:** Create and use databases to collect, organize, and verify data and observations
- **Conditions for Learning Science:** Access appropriate technology to perform complicated, time-consuming tasks
- **Conditions for Learning Science:** Use technology (e.g., desktop publishing, teleconferencing, networking) to communicate scientific ideas
- **Conditions for Learning Science:** Collect, store, retrieve, and manipulate information with available technologies that may range from hand processes up through computer applications



Academic Connections



Science (cont.)

- **Applications for Science Learning:** Analyze the contributions of advances in technology through history to own everyday life
- **Applications for Science Learning:** Extend the limits of human capabilities using technological advancements
- **Applications for Science Learning:** Create products, making inferences, and drawing conclusions using databases, spreadsheets, and other technologies
- **Applications for Science Learning:** Use appropriate technologies to prepare and present the findings of investigations incorporating tables, graphs, diagrams, and text



Competencies & Key Indicators

3.1

Analyze the role of technology in business

- Key Indicators:
- 3.1.1 Explain the benefits and drawbacks of technological advancements
 - 3.1.2 Research future trends in technology
 - 3.1.3 Determine current technology needs for various types of businesses
 - 3.1.4 Identify the impact of technology on business
 - 3.1.5 Integrate technology into every applicable business process

3.2

Create spreadsheets for business applications

- Key Indicators:
- 3.2.1 Gather information needed to create usable spreadsheet files according to company needs
 - 3.2.2 Follow written and/or oral instructions and specifications for preparing spreadsheets
 - 3.2.3 Integrate spreadsheet files with other application software
 - 3.2.4 Perform special spreadsheet functions (products, summations, percentages)

3.3

Create databases for business applications

- Key Indicators:
- 3.3.1 Gather information needed to create usable database files according to company needs
 - 3.3.2 Follow written and/or oral instructions and specifications for preparing databases
 - 3.3.3 Integrate database files with other application software
 - 3.3.4 Perform special database functions (merge, sort, purge, query, report)

3.4

Create word-processed documents for business applications

- Key Indicators:
- 3.4.1 Follow written and/or oral instructions and specifications for preparing word processing files
 - 3.4.2 Create documents in accordance with established company format and style (letters, résumés, memorandums, newsletters, manuscripts, reports)
 - 3.4.3 Integrate word processing files with other application software
 - 3.4.4 Perform special word-processing functions (borders, shading, columns, tables)



3.5

Perform desktop-publishing functions for business applications

3.5.1

Create a document using desktop-publishing functions

3.5.2

Import data

3.5.3

Scan images

3.5.4

Produce a publication

Key Indicators:

3.6

Reproduce documents

3.6.1

Determine best reprographic method for given jobs

3.6.2

Maintain reprographic equipment

3.6.3

Select paper according to reprographic requirements

3.6.4

Troubleshoot equipment problems

Key Indicators:

Working Responsibly - Strand 4

Business & Management Career Cluster ITAC





Expectation

Working responsibly encompasses skills in leadership, teamwork, and legal and ethical conduct. Individuals must daily demonstrate a strong work ethic, including — but not limited to — honesty, initiative, and dependability. Individuals must be able to discern between right and wrong in difficult or subtle situations. Then, they must act with rightness, fairness, and equity. Individuals must be free from petty, mean, or dubious conduct if an organization is to thrive. Without high standards of ethical conduct on both sides, individuals and organizations are subject to low morale and a host of management, legal, economic, and political problems.

Competencies

- | | | | |
|-----|---|-----|--|
| 4.1 | Evaluate the relationship between law and business | 4.3 | Analyze ethical business behavior |
| 4.2 | Evaluate issues related to leadership and managerial ethics | 4.4 | Evaluate issues related to employee ethics |

Sample Scenario

An employee at the accounting firm in which you work was fired for unethical accounting practices. Your boss has assigned you to develop a written code of ethics for the firm. You must present this written code of ethics at the next staff meeting, which will be attended by your peers as well as your superiors.

Guiding Questions

- What is a code of ethics? What role does a code of ethics play in promoting a productive workplace?
- How do you know when behavior is ethical?
- What is ethical and unethical behavior related to a business environment?
- What laws and regulations would influence the content of a code of ethics?
- What are the economic, social, and legal consequences of unethical behavior?



Core ITAC	Competency Connections
Strand 1: Solving Problems and Thinking Skillfully	1.1, 1.2, 1.7
Strand 2: Communicating Effectively	2.1, 2.2, 2.3, 2.4, 2.5, 2.6
Strand 3: Applying Technology	None
Strand 4: Working Responsibly	4.3, 4.4, 4.5, 4.6
Strand 5: Planning and Managing a Career	None
Strand 6: Managing Resources	6.1, 6.4

Academic Connections	
	<p>Math</p> <ul style="list-style-type: none"> • Data Analysis and Probability: Use sampling and recognize its role in statistical claims
	<p>Social Studies</p> <ul style="list-style-type: none"> • American Heritage: Draw connections between ideas, interests, beliefs, and ideologies and their influence on individual and group historical actions • American Heritage: Demonstrate historical continuity and/or change with respect to a particular historical development, such as management theory • Democratic Processes: Analyze and evaluate situations in which individual rights conflict with each other or with other important interests • Democratic Processes: Interpret public law and its impact on individual and organizational behavior • Citizenship Rights and Responsibilities: Associate the exercise of responsibilities with the exercise of rights • Citizenship Rights and Responsibilities: Participate with others in evaluating public policy and work to achieve consensus on how the policy issues should be addressed • Citizenship Rights and Responsibilities: Evaluate positions on the proper scope and limits of individual rights in specific situations • Citizenship Rights and Responsibilities: Acquire, interpret, and evaluate information regarding civic issues
	<p>Language Arts</p> <ul style="list-style-type: none"> • Reading/Multidisciplinary: Connect themes and ideas across the disciplines through literature • Reading/Multidisciplinary: Explore and analyze a variety of cultural elements, attitudes, beliefs, and value structures by reading and experiencing our diverse literary tradition
	<p>Foreign Language</p> <ul style="list-style-type: none"> • Multidisciplinary Connections, Information, and Knowledge: Identify and discuss issues common to the home and target cultures



Academic Connections



Science

- **Scientific Inquiry:** Seek elaboration and justification of data and ideas, and reflect on alternative interpretations of the information
- **Conditions for Learning Science:** Investigate social issues with a scientific perspective (e.g., human rights, wellness, economics, futurism, environmental ethics)
- **Conditions for Learning Science:** Examine the intellect, perspectives, and ethics of notable scientists



Competencies & Key Indicators

4.1

Evaluate the relationship between law and business

- Key Indicators:
- 4.1.1 Analyze the relationship between ethics and the law
 - 4.1.2 Identify the impact civil and criminal laws may have on specific business elements and practices
 - 4.1.3 Identify the impact laws of various jurisdictions may have on specific business elements or operations
 - 4.1.4 Demonstrate knowledge of contract law

4.2

Evaluate issues related to leadership and managerial ethics

- Key Indicators:
- 4.2.1 Investigate the nature of leadership and managerial ethics
 - 4.2.2 Research the history of leadership and management theory
 - 4.2.3 Analyze current issues in leadership and management ethics
 - 4.2.4 Identify the impact that various employment and social laws may have on leading and managing business

4.3

Analyze ethical business behavior

- Key Indicators:
- 4.3.1 Analyze current trends in computer and business ethics
 - 4.3.2 Identify various types of ethical and unethical business practices
 - 4.3.3 Interpret codes of ethics for given businesses
 - 4.3.4 Identify potential consequences of unethical business practices

4.4

Evaluate issues related to employee ethics

- Key Indicators:
- 4.4.1 Analyze current issues in employee ethics
 - 4.4.2 Identify types of ethical employee behaviors
 - 4.4.3 Identify ethics established by business for entry-level employees
 - 4.4.4 Identify unethical behaviors
 - 4.4.5 Identify potential consequences of unethical behaviors



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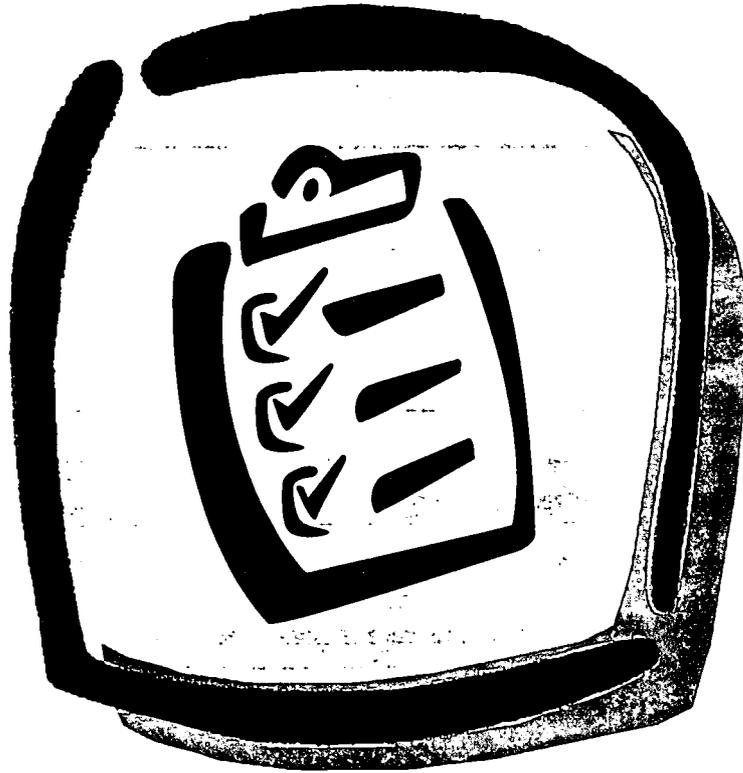
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Planning and Managing a Career - Strand 5

Business & Management Career Cluster ITAC





Expectation

Since work is a significant part of life, individuals need to be actively engaged in seeking a career that matches their interests, abilities, aptitudes, and skills. Career planning enhances the possibility that one's career path will lead to success and satisfaction in work. Employers seek individuals who know what they want from work and can effectively present their qualifications and skills through the job search process, including job applications and interviews. Throughout one's career, it is also important to seek continuous professional development opportunities.

Competencies

5.1	Explore careers within the field of business and management	5.3	Plan for professional development
5.2	Seek employment in the business field	5.4	Manage professional career
		5.5	Analyze personnel policies and procedures

Sample Scenario

You have been working as a salesclerk for a department store and are very much interested in advancing your career in the retailing field. Explore qualifications for various positions, and develop a plan to attain your career goals. Include a career ladder, education and training requirements, and a plan for seeking employment. Present your plan to your mentors in the field and secure their feedback.

Guiding Questions

- What career opportunities are available in the retailing field?
- What knowledge and skills do you need to succeed in this field?
- How can you apply the career planning process to establish and achieve your career goals?
- How can you best communicate your qualifications to potential employers?



Core ITAC	Competency Connections
Strand 1: Solving Problems and Thinking Skillfully	1.1, 1.2
Strand 2: Communicating Effectively	None
Strand 3: Applying Technology	None
Strand 4: Working Responsibly	None
Strand 5: Planning and Managing a Career	5.2, 5.3, 5.4, 5.5, 5.6
Strand 6: Managing Resources	6.1

Academic Connections			
	<table border="1"> <tr> <td data-bbox="228 686 363 863">Language Arts</td> <td data-bbox="363 686 1240 863"> <ul style="list-style-type: none"> • Listening/Visual Literacy/Multidisciplinary: Participate in a community of learners • Writing/Structure: Evaluate and revise writing to focus on such things as audience, tone, and purpose </td> </tr> </table>	Language Arts	<ul style="list-style-type: none"> • Listening/Visual Literacy/Multidisciplinary: Participate in a community of learners • Writing/Structure: Evaluate and revise writing to focus on such things as audience, tone, and purpose
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	<table border="1"> <tr> <td data-bbox="228 875 363 1190">Foreign Language</td> <td data-bbox="363 875 1240 1190"> <ul style="list-style-type: none"> • Participation in Multilingual Communities at Home: Participate in a career exploration or school-to-work project that requires proficiency in the target language and culture • Participation in Multilingual Communities at Home: Explore needs of corporations and businesses to identify job-related skills • Participation in Multilingual Communities at Home: Extend exploration of career opportunities in which proficiency in a foreign language is highly desirable </td> </tr> </table>	Foreign Language	<ul style="list-style-type: none"> • Participation in Multilingual Communities at Home: Participate in a career exploration or school-to-work project that requires proficiency in the target language and culture • Participation in Multilingual Communities at Home: Explore needs of corporations and businesses to identify job-related skills • Participation in Multilingual Communities at Home: Extend exploration of career opportunities in which proficiency in a foreign language is highly desirable
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	<table border="1"> <tr> <td data-bbox="228 1205 363 1333">Science</td> <td data-bbox="363 1205 1240 1333"> <ul style="list-style-type: none"> • Applications for Science Learning: Refine personal career interests through investigations of the diversity of manufacturing, research, service, and invention processes </td> </tr> </table>	Science	<ul style="list-style-type: none"> • Applications for Science Learning: Refine personal career interests through investigations of the diversity of manufacturing, research, service, and invention processes
Science	<ul style="list-style-type: none"> • Applications for Science Learning: Refine personal career interests through investigations of the diversity of manufacturing, research, service, and invention processes 		



Competencies & Key Indicators

5.1

Explore careers within the field of business and management

5.1.1

Analyze trends and issues in business affecting potential careers

5.1.2

Demonstrate knowledge of careers within the business field

5.1.3

Explore specific business and management career interests

5.1.4

Research projected growth and availability of various business and management careers

Key Indicators:

5.2

Seek employment in the business field

5.2.1

Prepare documentation needed for obtaining a position

5.2.2

Update documents needed for business employment

5.2.3

Compile documents in a professional manner

5.2.4

Identify employment opportunities

5.2.5

Dress appropriately for job interview

5.2.6

Present credentials, philosophy, and goals in job interview for a business position

5.2.7

Identify the steps to follow in leaving a business position

Key Indicators:

5.3

Plan for professional development

5.3.1

Identify the role of professional organizations in the professional development process

5.3.2

Keep up-to-date by reading professional publications

5.3.3

Determine the benefits to business of employees' belonging to professional organizations (membership, networking)

5.3.4

Examine the benefits of belonging to civic and community organizations

5.3.5

Determine the areas of continuing education needed in the business community

5.3.6

Examine the benefits of continuing education for the business field

Key Indicators:

5.4

Manage professional career

5.4.1

Set personal goals

5.4.2

Develop skills and characteristics wanted by business employers

5.4.3

Identify possible advancement patterns in business careers

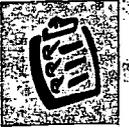
5.4.4

Monitor progress toward personal goals

5.4.5

Plan for career growth, both nationally and internationally

Key Indicators:



5.5

Analyze personnel policies and procedures

5.5.1

Identify company rules and regulations

5.5.2

Identify professional development guidelines within an organization

5.5.3

Identify appropriate training plan for an organization

5.5.4

Evaluate training effectiveness for employees

Key Indicators:



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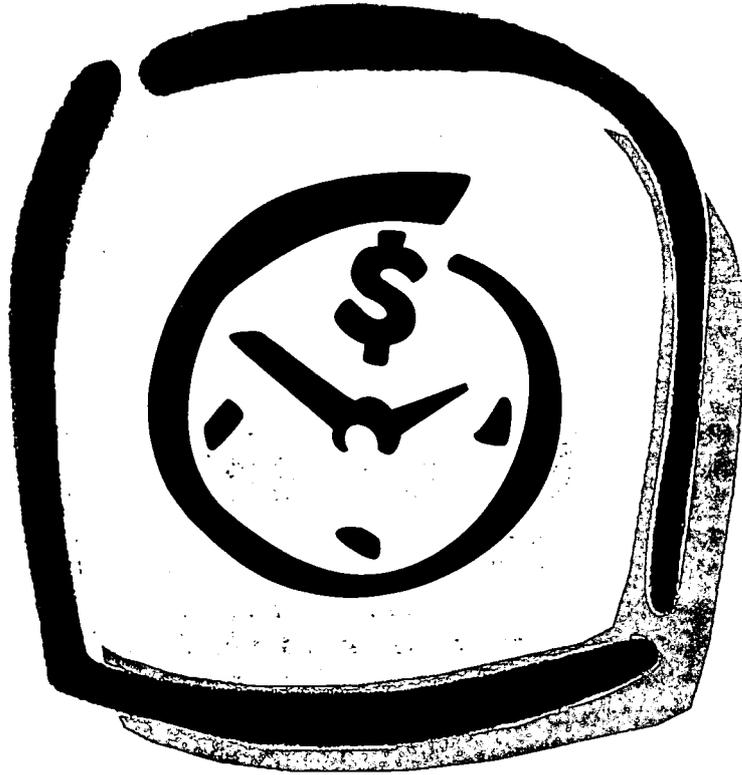
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Managing Resources - Strand 6

Business & Management Career Cluster ITAC





Expectation

In high-performance business workplaces, all individuals must effectively manage a variety of resources—personal, financial, and environmental—through business functions. Individuals' ability to maintain good health, contribute to a safe work environment, and manage time not only enhances personal well-being, but fosters the success of the organization or business as well.

Competencies

6.1	Perform scheduling functions	6.4	Manage inventory
6.2	Conduct meetings and other group functions	6.5	Examine personnel management concepts
6.3	Maintain a records management system	6.6	Perform shipping functions
		6.7	Perform mail functions

Sample Scenario

You are an administrative assistant and have been asked to plan the annual management staff retreat. There will be 10 employees taken off-site for a five-day retreat to review the past year's performance and set goals and directions for the coming year. Your duties are to set the agenda, facilitate the meeting, and make all necessary arrangements, including developing a budget, selecting menus and entertainment options, and developing and sending notifications to all participants. The company will pay all costs. Prepare two proposals (a high-end retreat budget and a low-end retreat budget) for this five-day event, and present your plans to the CEO for approval.

Guiding Questions

- What factors should you consider as you develop a schedule for the retreat?
- What techniques will you use to facilitate the meeting and record the progress of the group?
- What dietary and health factors should you consider as you plan meals and activities?
- What design considerations are important to the development of the meeting notification and other materials?
- What records management system will you use to maintain information about the retreat?



Core ITAC	Competency Connections
Strand 1: Solving Problems and Thinking Skillfully	1.1, 1.4, 1.8
Strand 2: Communicating Effectively	2.1, 2.2, 2.3, 2.5
Strand 3: Applying Technology	3.1, 3.3
Strand 4: Working Responsibly	4.3, 4.4, 4.5
Strand 5: Planning and Managing a Career	None
Strand 6: Managing Resources	6.4, 6.10, 6.11

Academic Connections			
	<table border="1"> <tr> <td data-bbox="219 661 349 829">Math</td> <td data-bbox="349 661 1258 829"> <ul style="list-style-type: none"> • Algebra: Describe and solve algebraic situations with matrices • Algebra: Describe problem situations by using and relating numerical, symbolic, and graphical representations </td> </tr> </table>	Math	<ul style="list-style-type: none"> • Algebra: Describe and solve algebraic situations with matrices • Algebra: Describe problem situations by using and relating numerical, symbolic, and graphical representations
Math	<ul style="list-style-type: none"> • Algebra: Describe and solve algebraic situations with matrices • Algebra: Describe problem situations by using and relating numerical, symbolic, and graphical representations 		
	<table border="1"> <tr> <td data-bbox="219 829 349 1092">Language Arts</td> <td data-bbox="349 829 1258 1092"> <ul style="list-style-type: none"> • Oral Communication/Structure: Organize notes and ideas for formal, semiformal, and informal presentations of information • Oral Communication/Structure: Select topics suitable to the audience • Writing/Multidisciplinary: Write in response to reading, speaking, viewing and listening </td> </tr> </table>	Language Arts	<ul style="list-style-type: none"> • Oral Communication/Structure: Organize notes and ideas for formal, semiformal, and informal presentations of information • Oral Communication/Structure: Select topics suitable to the audience • Writing/Multidisciplinary: Write in response to reading, speaking, viewing and listening
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Competencies & Key Indicators

6.1

Perform scheduling functions

6.1.1

Key Indicators: Maintain appointment calendars

6.1.2

Maintain schedules

6.1.3

Manage scheduling conflicts

6.1.4

Create calendar/schedule of activities (itineraries)

6.1.5

Identify the need for management across projects

6.2

Conduct meetings and other group functions

6.2.1

Plan meetings

6.2.2

Apply parliamentary procedure

6.2.3

Schedule meetings

6.2.4

Prepare agendas

6.2.5

Make necessary meeting room arrangements

6.2.6

Make arrangements for participants' special needs (dietary needs, hearing needs, handicap access, foreign language interpreter)

6.2.7

Facilitate meetings

6.2.8

Participate in group discussions and meetings

6.2.9

Communicate roles and responsibilities of committee members and officers

6.3

Maintain a records management system

6.3.1

Key Indicators: Develop a system for maintaining necessary company records

6.3.2

Maintain secured and protected filing systems

6.3.3

Store materials within appropriate filing systems

6.3.4

Retrieve requested materials from established filing systems

6.3.5

Purge filing systems in accordance with company policy

6.4

Manage inventory

6.4.1

Key Indicators: Select inventory control system(s) (periodic, perpetual, dollar, LIFO, FIFO) appropriate for inventory needs

6.4.2

Manage inventory manually and/or electronically

6.4.3

Maintain inventory control records and systems

6.4.4

Identify reasons for inventory shrinkage

6.4.5

Prepare inventory records and reports



6.5

Examine personnel management concepts

Key Indicators:

- 6.5.1 Identify effective skills and strategies for working with organizations and groups of people
- 6.5.2 Identify the kinds of rewards, incentives, and motivators people seek at work
- 6.5.3 Identify the roles of formal and informal groups within organizations
- 6.5.4 Identify the role of performance evaluations

6.6

Perform shipping functions

Key Indicators:

- 6.6.1 Identify various classes of shipments
- 6.6.2 Sort/distribute shipments
- 6.6.3 Identify requirements for shipments (package, domestic, international)
- 6.6.4 Select shipment method appropriate for shipping needs

6.7

Perform mail functions

Key Indicators:

- 6.7.1 Identify various classes of mail
- 6.7.2 Sort/distribute mail
- 6.7.3 Identify delivery requirements (package, domestic, international)
- 6.7.4 Select delivery method appropriate for mailing needs

Business & Management Career Cluster ITAC Acknowledgments

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The following panel participants verified the technical and academic competencies in the Business and Management Career Cluster ITAC:

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Jean Booze, CPS, Professional Secretaries International, Columbus, Ohio
Betsy Brainard, Sarcom, Lewis Center, Ohio
Jane E. Dennis, Marshall Field's, Columbus, Ohio
Tom Etgen, Columbus, Ohio
B.T. Henry, Sears Northland, Columbus, Ohio
Jerry A. Katz, Huntington National Bank, Columbus, Ohio
Dennis McCabe, Ameritech Cellular, Cincinnati, Ohio
Dave Ruff, Anderson's, Columbus, Ohio
Bill Sikes, The Limited, Columbus, Ohio
Carol Sparks, Federated Department Stores, Inc., Cincinnati, Ohio
Tamara Staley, Kroger Company, Westerville, Ohio
Robert D. Thompson, The Peoples Bank Co., Rockford, Ohio
Deborah Welch, Pingel Design Group, Columbus, Ohio
Matt Yuskewich, Winterset CPA Group, Columbus, Ohio
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The following educator review panel was responsible for reviewing the integrated technical and academic competencies in the Business and Management Career Cluster ITAC:

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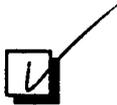


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