Production Crop

ACADEMIC SKILLS

AA SPEAKING AND LISTENING
AA1 Utilize effective verbal and non-verbal communication skills
AA2 Participate in conversation, discussion and group presentations
AA3 Communicate and follow directions/procedures
AA4 Utilize speaking and listening skills to communicate effectively with customers and co-workers

AB READING AND WRITING
AB1 Locate and interpret written information
AB2 Read and interpret workplace documents, e.g., reports, manuals, schematics, flowcharts, tables, graphs
AB3 Identify relevant details, facts and specifications
AB4 Record information accurately and completely
AB5 Demonstrate competence in organizing, writing and editing using correct vocabulary, spelling, grammar and punctuation
AB6 Demonstrate the ability to write clearly and concisely using industry-specific terminology

AC CRITICAL THINKING AND PROBLEM SOLVING
AC1 Utilize critical-thinking skills to determine best options/outcomes, e.g., analyze reliable/unreliable sources of information, use previous experiences, implement crisis management, develop contingency planning
AC2 Utilize innovation and problem-solving skills to arrive at the best solution for the current situation
AC3 Implement effective decision-making skills

AD MATHEMATICS
AD1 Perform basic and higher-level math operations, e.g., addition, subtraction, multiplication, division, decimals, fractions, units of conversion, averaging, percentage, proportion, ratios, numbering systems
AD2 Solve problems using measurement skills, e.g., distance, weight, area, volume
AD3 Make reasonable estimates
AD4 Use tables, graphs, diagrams and charts to obtain or convey information
AD5 Use reasoning and problem-solving skills in mathematics

AE FINANCIAL LITERACY
AE1 Locate, evaluate and apply personal financial information
AE2 Identify the components of a budget and how one is created
AE3 Set personal financial goals and develop a plan for achieving them
AE4 Describe types of financial service providers and considerations in selecting a provider
AE5 Demonstrate ability to meet financial obligations

AF INTERNET USE AND SECURITY
AF1 Recognize the potential risks associated with internet and social media use
AF2 Identify and apply internet security practices, e.g., password security, login, logout, log off, lock computer
AF3 Practice safe, legal and responsible use of technology in the workplace

AG INFORMATION TECHNOLOGY
AG1 Use technology appropriately to enhance professional presentations
AG2 Demonstrate effective, appropriate and ethical use of social media
AG3 Identify ways social media can be used as marketing, advertising and data gathering tools

AH TELECOMMUNICATIONS
AH1 Select and utilize the appropriate environment, devices, services and applications to complete workplace tasks
AH2 Demonstrate appropriate etiquette when using telecommunications, e.g., cell phone, e-mail, messaging services, online meetings, conference calls
EMPLOYABILITY SKILLS

EA POSITIVE WORK ETHIC

EA1 Explain the importance of pride and confidence about work and learning new tasks
EA2 Demonstrate consistent and punctual attendance
EA3 Demonstrate initiative in assuming tasks
EA4 Exhibit dependability in the workplace
EA5 Take and provide direction in the workplace
EA6 Accept responsibility for personal decisions and actions

EB INTEGRITY

EB1 Abide by workplace policies and procedures, e.g., safety, internet and cell phone use, code of conduct
EB2 Demonstrate honesty and reliability
EB3 Demonstrate ethical characteristics and behaviors
EB4 Maintain confidentiality and integrity of company information
EB5 Support the mission and vision of the company

EC SELF-REPRESENTATION

EC1 Demonstrate appropriate dress and hygiene in the workplace
EC2 Use language and manners suitable for the workplace
EC3 Demonstrate polite and respectful behavior toward others

ED TIME, TASK AND RESOURCE MANAGEMENT

ED1 Plan and follow a work schedule
ED2 Complete work tasks successfully with minimal supervision
ED3 Work successfully within budgetary constraints
ED4 Demonstrate ability to stay on task to produce high-quality deliverables on time
EE DIVERSITY AWARENESS
EE1 Define and differentiate diversity, equity, inclusion, discrimination and harassment
EE2 Work effectively with all customers and co-workers
EE3 Explain the benefits of diversity within the workplace
EE4 Explain the importance of respect for the feelings, values and beliefs of others
EE5 Identify strategies to bridge cultural/generational differences and use differing perspectives to increase the overall quality of work
EE6 Illustrate techniques for eliminating bias and stereotyping in the workplace
EE7 Identify ways tasks can be structured to accommodate the diverse needs of workers
EE8 Recognize the challenges and advantages of a global workforce

EF TEAMWORK
EF1 Recognize the characteristics of a team environment and conventional workplace
EF2 Demonstrate effective team skills, e.g., setting goals, listening, following directions, questioning, dividing work, conflict resolution, meeting facilitation, and evaluate their importance in the workplace

EG CREATIVITY AND RESOURCEFULNESS
EG1 Explain the importance of contributing and conveying new ideas in the workplace
EG2 Describe the importance of posing questions when developing ideas
EG3 Explain the value of varying ideas and opinions
EG4 Locate and verify information during the creative process

EH CONFLICT RESOLUTION
EH1 Identify conflict resolution skills to enhance productivity and improve workplace relationships
EH2 Implement conflict resolution strategies and problem-solving skills
EH3 Explain the use of documentation and its role as a component of conflict resolution

EI CUSTOMER/CLIENT SERVICE
EI1 Recognize the importance of and demonstrate how to properly greet/approach customers and clients
EI2 Identify and address needs of customers/clients
EI3 Provide helpful, courteous and knowledgeable service

EI4 Identify appropriate channels of communication with customers/clients, e.g., online, phone call, face-to-face

EI5 Identify techniques to seek and use customer/client feedback to improve company services

EI6 Explain the relationship between customer/client satisfaction and company success

**EJ ORGANIZATIONS, SYSTEMS AND CLIMATES**

EJ1 Define profit and identify factors affecting the profitability of a business

EJ2 Identify "big picture" issues in conducting business, e.g., forecasting, global market, risk management

EJ3 Identify roles in fulfilling the mission of the workplace

EJ4 Identify the rights of workers, e.g., adult and child labor laws, and other equal employment opportunity laws

EJ5 Recognize the chain of command, organizational flow chart system and hierarchy of management within an organization

**EK JOB ACQUISITION AND ADVANCEMENT**

EK1 Recognize the importance of maintaining a job and pursuing a career

EK2 Define jobs associated with a specific career path or profession

EK3 Identify and seek various work experience opportunities, e.g., volunteerism, internships, co-op, part-time/full-time employment

EK4 Prepare a resume, cover letter and job application

EK5 Prepare for and participate in a job interview, e.g., research company, highlight personal strengths, prepare questions, conduct a mock interview, dress appropriately

EK6 Explain the components of a successful job interview

EK7 Identify key factors to evaluate employment offers, e.g., salary, benefits packages

EK8 Explain the proper procedure for leaving a job

**EL LIFELONG LEARNING**

EL1 Acquire current and emerging industry-related information

EL2 Demonstrate commitment to learning as a life-long process and recognize learning opportunities

EL3 Identify various self-improvement opportunities
EL4 Explain the importance of adaptability in career planning and self-management, e.g., diverse portfolio, credentials, professional development

EL5 Employ leadership skills to achieve workplace objectives, e.g., personal vision, adaptability, change, shared vision

EL6 Recognize the importance of job performance evaluation and coaching as it relates to career advancement

EL7 Accept and provide constructive criticism

EL8 Describe the impact of the global economy on jobs and careers

**EM JOB SPECIFIC TECHNOLOGIES**

EM1 Identify the value of new technologies and their impact on driving continuous change and the need for lifelong learning

EM2 Research and identify emerging technologies for specific careers

EM3 Select appropriate technological resources to accomplish work

**EN HEALTH AND SAFETY**

EN1 Identify and assume responsibility for the safety of self and others

EN2 Follow safety guidelines in the workplace, e.g., OSHA, CDC

EN3 Explain the impact of personal health and wellness on job performance
OCCUPATIONAL SKILLS

OA BASIC PLANT SCIENCE CONCEPTS AND SKILLS

OA 1 Understand scientific plant classification
OA 2 Compare the anatomical parts and distinguishing characteristics of plants
OA 3 Understand the reproductive processes of plants
OA 4 Analyze the process of plant growth and development
OA 5 Be aware of biotechnology and its use in production agriculture
OA 6 Explain the use of applied genetics in plants
OA 7 Utilize appropriate variety of selection techniques
OA 8 Demonstrate ability to read and utilize seed tag information
OA 9 Demonstrate acceptable agronomic practices, e.g., seeding rates, plant spacing, planting dates
OA 10 Identify appropriate seedbed preparation techniques, e.g., no-till, conventional-till, rotations
OA 11 Identify appropriate techniques for harvesting and storage of crops
OA 12 Understand plant growth requirements

OB INDUSTRY RESOURCES

OB 1 Apply use of related electronic technology, e.g., email, computer applications, GPS, precision farming
OB 2 Interpret the input of local, state, national and international economy to production agriculture
OB 3 Maintain awareness of current trends in production agriculture through industry associations, trade journals and Internet resources

OC FARM BUSINESS MANAGEMENT PRACTICES

OC 1 Apply effective record keeping skills including financial records
OC 2 Demonstrate knowledge of budgeting and cash flow
OC 3 Understand requirements and sources of credit
OC 4 Understand procedures related to buying, leasing and renting land and/or equipment
OC 5 Understand issues related to tax records and filing taxes
**OD MARKETING AND SALES STRATEGIES**

OD 1 Maintain an awareness of world trade issues, e.g., GMO’s, drought, trade agreements

OD 2 Maintain an awareness of strategies relating to futures, forward cash contracts and storage

OD 3 Maintain an awareness of risk management practices such as crop insurance

OD 4 Explore marketing resources, e.g., marketing clubs, extension programs, brokers, consultants

OD 5 Demonstrate knowledge of specialty agriculture markets, e.g. tobacco, aquaculture

OD 6 Develop and interpret marketing plans

**OE AGRICULTURAL MATHEMATICS SKILLS**

OE1 Calculate break-even prices

OE 2 Determine material supplies

OE 3 Calculate area and volume measurements, e.g., acreage, storage, stocking

OE 4 Calculate fertilizer analysis

**OF EFFECTIVE LABOR MANAGEMENT TECHNIQUES**

OF 1 Demonstrate an understanding of the issues related to utilizing immigrant labor

**OG MONITOR AND CONTROL HEALTH, DISEASES AND PESTS**

OG 1 Demonstrate effective pest management practices

OG 2 Recognize common plant diseases

OG 3 Apply appropriate prevention techniques and treatments of plant diseases

OG 4 Utilize understanding of plant nutrition in the management and prevention of diseases

OG 5 Utilize understanding of varieties and breeds in the management and prevention of diseases

OG 6 Understand agriculture’s relationship and responsibility to guarantee a safe food supply and a healthy environment

**OH APPROPRIATE PRODUCTION TECHNIQUES**

OH 1 Utilize appropriate production techniques for crops, e.g., corn, soybeans, tobacco, forage

**OI MANAGEMENT SAFETY PRACTICES**

OI 1 Follow anti-theft and security procedures
OI 2 Identify hazardous substances in the workplace
OI 3 Identify immediate and real cost of an accident

OJ GOVERNMENT AND LEGAL ISSUES

OJ 1 Demonstrate an understanding of state and federal agricultural legislation such as a farm bill
OJ 2 Demonstrate an understanding of agricultural law, e.g., border disputes, incorporation, liability issues, injury claims, attractive nuisance, farming in populated areas
OJ 3 Identify related government agencies, their functions and their programs, as they relate to the farm

OK INDUSTRY-RELATED TERMINOLOGY AND IDENTIFICATION SYSTEMS

OK 1 Identify common agronomic plants, grains, feeds and seeds
OK 2 Identify weeds and other crop pests
OK 3 Use appropriate agricultural terminology

OL AGRICULTURAL STRUCTURES AND FACILITIES

OL 1 Identify needs of crop and equipment storage
OL 2 Calculate and analyze cost of storage
OL 3 Demonstrate the ability to safely operate basic agriculture equipment

OM BEST MANAGEMENT PRACTICES AS RELATES TO AGRICULTURAL ENVIRONMENTAL ISSUES

OM 1 Utilize appropriate soil conservation practices
OM 2 Identify and apply appropriate water conservation practices
OM 3 Analyze and enhance soil fertility
OM 4 Assess fertilizer and pesticide applications