

# REPUBLIC OF KENYA

# NATIONAL OCCUPATIONAL STANDARDS

# **FOR**

# **AGRIPRENEUR**

# LEVEL 5



TVET CDACC P.O. BOX 15745-00100 NAIROBI First published 2018 © 2018, TVET CDACC

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#### **FOREWORD**

The provision of quality education and training is fundamental to the Government's overall strategy for social economic development. Quality education and training will contribute to achievement of Kenya's development blueprint, Vision 2030 and sustainable development goals.

Reforms in the education sector are necessary for the achievement of Kenya Vision 2030 and meeting the provisions of the Constitution of Kenya 2010. The education sector had to be aligned to the Constitution of Kenya 2010 and this resulted in the formulation of the Policy Framework for Reforming Education and Training (Sessional Paper No. 14 of 2012). A key feature of this policy is the radical change in the design and delivery of the TVET training. This policy document requires that training in TVET shall be competency based, curriculum development shall be industry led, certification shall be based on demonstration of competence and mode of delivery shall allow for multiple entry and exit in TVET programmes.

These reforms demand that Industry takes a leading role in curriculum development to ensure the curriculum addresses its competence needs. It is against this background that these Occupational Standards were developed for the purpose of developing a competency-based curriculum for Agripreneurship level 5. These Occupational Standards will also be the basis for assessment of an individual for competence certification.

It is my conviction that these Occupational Standards will play a great role towards development of competent human resource for the Agriculture sector's growth and sustainable development.

PRINCIPAL SECRETARY
VOCATIONAL AND TECHNICAL TRAINING
MINISTRY OF EDUCATION

#### **PREFACE**

Kenya Vision 2030 aims to transform the country into a newly industrializing, "middle-income country providing a high quality life to all its citizens by the year 2030". Kenya intends to create a globally competitive and adaptive human resource base to meet the requirements of a rapidly industrializing economy through life-long education and training. TVET has a responsibility of facilitating the process of inculcating knowledge, skills and attitudes necessary for catapulting the nation to a globally competitive country, hence the paradigm shift to embrace Competency Based Education and Training (CBET).

The Technical and Vocational Education and Training Act No. 29 of 2013 and Sessional paper No 14 of 2012 on Reforming Education and Training in Kenya, emphasized the need to reform curriculum development, assessment and certification in TVET. This called for shift to CBET in order to address the mismatch between skills acquired through training and skills needed by industry as well as increase the global competitiveness of Kenyan labour force.

The TVET Curriculum Development, Assessment and Certification Council (TVET CDACC), in conjunction with Agripreneurship Sector Skills Advisory Committee (SSAC), German International Cooperation and Ministry of Agriculture, Livestock and Fisheries have developed these Occupational Standards for Agripreneur level 5. These standards will be the basis for development of competency-based curriculum for Agripreneurship levels 5.

The occupational standards are designed and organized with clear performance criteria for each element of a unit of competency. These standards also outline the required knowledge and skills as well as evidence guide.

I am grateful to Council Secretariat, Council Technical Committee, Agripreneurship SSAC, expert workers and all those who participated in the development of these occupational standards.

CHAIRPERSON TVET CDACC

#### ACKNOWLEDGMENT

These Occupational Standards were developed through combined effort of various stakeholders from private and public organizations. I am thankful to the management of these organizations for allowing their staff to participate in this course. I wish to acknowledge the invaluable contribution of industry players who provided inputs towards the development of these Standards.

I thank TVET Curriculum Development, Assessment and Certification Council (TVET CDACC) for providing guidance on the development of these Standards. My gratitude goes to Agripreneurship Sector Skills Advisory Committee (SSAC) members for their contribution to the development of these Standards. I thank all the individuals and organizations who participated in the validation of these Occupational Standards.

My gratitude also goes to NEPAD Planning and Coordinating Agency (NPCA) of the Africa Union Commission and German Ministry of Economic Cooperation and Development (BMZ) through its implementing agency German International Cooperation (GIZ) GmbH which enabled the development of these Standards through the CAADP ATVET project.

I also appreciate the office of the National Coordinator of GIZ CAADP ATVET Project which was instrumental in the cooperation between the project team, Ministry of Agriculture, Livestock and Fisheries (MoALF) and Ministry of Education.

I acknowledge all other institution which contributed to the success of development of these standards.

CHAIRPERSON
AGRIPRENEURSHIP SECTOR SKILLS ADVISORY COMMITTEE

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#### ABBREVIATION AND ACRONYMS

AGR Agriculture

AP Agripreneurship

ATVET Agricultural Technical and Vocational Education and Training

BC Basic Competency

CAADP Comprehensive Africa Agricultural Development Programme

CBET Competency Based Education and Training

CDACC Curriculum Development Assessment and Certification Council

CR Core Competency

DACUM Develop a Curriculum

GDP Gross Domestic Product

GIZ German International Cooperation

GPS Global Positioning System

ICT Information Communication Technology

KCPE Kenya Certificate of Primary Education

KCSE Kenya Certificate of Secondary Education

KNQA Kenya National Qualifications Authority

KNQA Kenya National Qualifications Authority

MoALF Ministry of Agriculture Livestock and Fisheries

MoEST Ministry of Education Science and Technology

NOS National Occupation Standard

OS Occupational Standard

OSH Occupation Safety and Health

OSHA Occupation Safety and Health Act

OSHS Occupational Safety and Health Standards

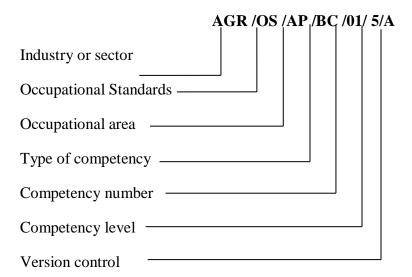
PPE Personal Protective Equipment

SSAC Sector Skills Advisory Committee

TVET Technical and Vocational Education and Training

TVETA Technical and Vocational Education and Training Authority

### **KEY TO UNIT CODE**



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### **COURSE OVERVIEW**

This course is designed to equip an individual with competencies for Agripreneurship. It involves developing agri-enterprise business plan, starting agri-enterprise, marketing agri-enterprise products/ services, managing agri-enterprise, applying ICT in agri-enterprise.

The units of competency comprising this qualification include the following basic and core competencies:

### **Basic Units of Competency**

Unit Code	Unit Title				
AGR/CU/AP/BC/01/5/A	Demonstrate Communication Skills				
AGR/CU/AP/BC/02/5/A	Demonstrate Numeracy Skills				
AGR/CU/AP/BC/03/5/A	Demonstrate Digital Literacy				
AGR/CU/AP/BC/03/5/A	Demonstrate Entrepreneurship Skills				
AGR/CU/AP/BC/04/5/A	Demonstrate Employability Skills				
AGR/CU/AP/BC/05/5/A	Demonstrate Environmental Literacy				
AGR/CU/AP/BC/06/5/A	Demonstrate Occupational Safety and Health Practices				

### **Core Units of Competency**

Unit Code	Unit Title
AGR/CU/AP/CR/01/5/A	Agri-Enterprise Business Plan Development
AGR/CU/AP/CR/02/5/A	Agri-Enterprise Starting
AGR/CU/AP/CR/03/5/A	Agri-Enterprise Products/ Services Marketing
AGR/CU/AP/CR/04/5/A	Agri-Enterprise Management
AGR/CU/AP/CR/05/5/A	Application Of ICT in Agri-Enterprise

# **BASIC UNITS OF COMPETENCY**

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### DEMONSTRATE COMMUNICATION SKILLS

**UNIT CODE:** AGR/CU/AP/BC/01/5/A

### **UNIT DESCRIPTION**

This unit covers the competencies required to demonstrate communication skills. It involves meeting communication needs of clients and colleagues, contributing to the development of communication strategies, conducting workplace interviews, facilitating group discussions and representing the organisation.

#### **ELEMENTS AND PERFORMANCE CRITERIA**

ELEMENT	PERFORMANCE CRITERIA
These describe the key outcomes which make up workplace function	These are assessable statements which specify the required level of performance for each of the elements.  Bold and italicized terms are elaborated in the Range
Meet     communication     needs of clients     and colleagues	<ul> <li>1.1 Specific communication needs of clients and colleagues are identified and met based on workplace requirements</li> <li>1.2 Different communication approaches are identified and applied according to clients' needs</li> <li>1.3 Conflict is identified and addressed as per the standards of the organization</li> </ul>
2. Contribute to the development of communication strategies	<ul> <li>2.1 Strategies for internal and external dissemination of information are developed, promoted, implemented and reviewed as per organizations' strategic plan</li> <li>2.2 Channels of communication are established and reviewed based on the workplace needs</li> <li>2.3 Communication training needs are identified and provided according to SOPs</li> <li>2.4 Work related network and relationship are maintained based on workplace requirements</li> <li>2.5 Negotiation and conflict resolution strategies are maintained as per the workplace procedures</li> </ul>
3. Conduct workplace interviews	<ul> <li>3.1 Communication strategies are identified and employed in interview situations based on workplace requirements</li> <li>3.2 Records of interviews are made and maintained in accordance with organizational procedures</li> <li>3.3 Effective questioning, listening and nonverbal communication techniques are used based on needs</li> </ul>

4. Facilitate group discussions	<ul> <li>4.1 Mechanisms to enhance <i>effective group interaction</i> are identified and implemented according to workplace requirements</li> <li>4.2 Strategies to encourage group participation are identified and used as per organizations' procedures</li> <li>4.3 Meetings objectives and agenda are set and followed based on workplace requirements</li> <li>4.4 Relevant information is provided and feedback obtained according to set protocols</li> <li>4.5 Evaluation of group communication strategies is undertaken in accordance with workplace guidelines</li> </ul>
	accordance with workplace guidelines 4.6 Specific communication needs of individuals are identified and addressed as per individual needs
5. Represent the organization	<ul> <li>5.1 Relevant presentation are researched and presented based on internal or external communication forums requirements Presentation is delivered in a clear and sequential manner as per the predetermined time 5.2 Presentation is made as per appropriate media 5.3 Difference views are respected based on workplace procedures 5.4 Written communication is done as per organizational standards</li> </ul>
	5.5 Inquiries are responded according to organizational standard

# **RANGE**

This section provides work environment and conditions to which the performance criteria apply. It allows for different work environment and situations that will affect performance.

Variable	Range
Communication     strategies may include     but not limited to:	<ul> <li>Language switch</li> <li>Comprehension check</li> <li>Repetition</li> <li>Asking confirmation</li> <li>Paraphrase</li> <li>Clarification request</li> <li>Translation</li> <li>Restructuring</li> <li>Approximation</li> <li>Generalization</li> </ul>

2. Effective group interaction may include but not limited to:	<ul> <li>Identifying and evaluating what is occurring within an interaction in a non-judgmental way</li> <li>Using active listening</li> <li>Making decision about appropriate words, behavior</li> <li>Putting together response which is culturally appropriate</li> <li>Expressing an individual perspective</li> <li>Expressing own philosophy, ideology and background and exploring impact with relevance to communication</li> </ul>
	Openness and flexibility in communication
3. Interview situations	Establishing rapport  Figure 6 to 1 for the first
may include but not limited to:	Eliciting facts and information
innited to:	Facilitating resolution of issues
	Developing action plans
	<ul> <li>Diffusing potentially difficult situations</li> </ul>

# REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

### **Required Skills**

The individual needs to demonstrate the following skills:

- Active listening
- Giving/receiving feedback
- Interpretation of information
- Role boundaries setting
- Negotiation
- Communication

# Required Knowledge

The individual needs to demonstrate knowledge of:

- Communication process
- Dynamics of groups and different styles of group leadership
- Communication skills relevant to client groups
- Flexibility in communication

# EVIDENCE GUIDE

This provides advice on assessment and must be read in conjunction with the performance criteria, required skills and knowledge and range.

1. Critical aspects	Assessment requires evidence that the candidate:				
of Competency	1.1 Met communication needs of clients and colleagues				
	1.2 Contributed to the development of communication strategies				
	1.3 Conducted interviews				
	1.4 Facilitated group discussions				
	1.5 Represented the organization				
2. Resource	The following resources should be provided:				
Implications	2.1 Access to relevant workplace or appropriately simulated				
	environment where assessment can take place				
	2.2 Materials relevant to the proposed activity or tasks				
3. Methods of	Competency in this unit may be assessed through:				
Assessment	3.1 Observation				
	3.2 Oral questioning				
	3.3 Written test				
	3.4 Portfolio of Evidence				
	3.5 Interview				
4. Context of	3.6 Third party report				
	Competency may be assessed				
Assessment	4.1 On the job				
	4.2 Off the job				
	4.3 During industrial attachment				
5. Guidance	Holistic assessment with other units relevant to the industry sector,				
information for assessment	workplace and job role is recommended.				

#### DEMONSTRATE NUMERACY SKILLS

UNIT CODE: AGR/CU/AP/BC/02/5/A

#### **UNIT DESCRIPTION**

This unit covers the competencies required to demonstrate numeracy skills. it involves calculating with whole numbers and familiar fractions, decimals, and percentages for work estimating, measuring, and calculating with routine metric measurements for work, using routine maps and plans for work, interpreting, drawing and constructing 2D and 3D shapes for work, interpreting routine tables, graphs and charts for work, collecting data and constructing routine tables and graphs for work and using basic functions of calculator.

### ELEMENTS AND PERFORMANCE CRITERIA

ELEMENT	PERFORMANCE CRITERIA		
These describe the key outcomes which make up	These are assessable statements which specify the required level of performance for each of the elements.		
workplace function.	Bold and italicized terms are elaborated in the Range.		
1. Calculate with whole numbers and familiar fractions, decimals and	1.1 Mathematical information that may be partly embedded in routine workplace tasks and texts is selected and interpreted as per SOPs		
percentages for work	1.2 Whole numbers and routine or familiar fractions, decimals and percentages including familiar rates are interpreted and comprehended as per SOPs		
	1.3 Calculations which may involve a number of steps are performed as per SOPs		
	1.4 Calculations done with whole numbers and routine or familiar fractions, decimals and percentages as per SOPs		
	1.5 Conversion between equivalent forms of fractions, decimals and percentages is done as per SOPs		
	1.6 Order of operations is applied to solve multi-step calculations as per SOPs		
	1.7 Problem solving strategies are appropriately applied as per SOPs		
	1.8 Estimations are made to check reasonableness of problem solving process, outcome and its appropriateness to the context and task as per SOPs		

	1.9	Formal and informal mathematical language and symbolism are used to communicate the result of the task as per SOPs.
2. Estimate, measure, and calculate with routine metric measurements for	2.1	Measurement information in workplace tasks and texts are selected and interpreted in accordance with workplace requirements
work	2.2	Appropriate routine measuring equipment are identified and selected in accordance with workplace requirements
	2.3	Measurements are estimated and made using correct units as per measurement manuals.
	2.4	Estimations and calculations done as per routine measurements
	2.5	Conversions performed routinely as per metric units
	2.6	Problem solving processes are used to undertake the tasks as per workplace procedures.
	2.7	Estimations are made to check reasonableness of problem solving process, outcome and its appropriateness to the context and task as per workplace procedures
	2.8	Information is recorded using mathematical language and symbols appropriate to discuss the task as per workplace procedures.
3. Use routine maps and plans for work	3.1	Features are identified in routine maps and plans as per SOPs
	3.2	Symbols and keys in routine maps and plans are clearly explained as per SOPs
	3.3	Orientation of map to North is identified and interpreted as per SOPs
	3.4	Understanding of direction and location is clearly demonstrated as per SOPs
	3.5	Simple scale is applied to estimate length of objects, or distance to location or object as per SOPs
	3.6	Directions are given and received using both formal and informal language as per SOPs
4.Interpret, draw and	4.1	Two dimensional shapes and routine three dimensional
construct 2D and 3D		shapes identified in everyday objects and in different
shapes for work		orientations in accordance with job specifications
F	4.2	The use and application of shapes elaborately explained as per SOPs
	4.3	Formal and informal mathematical language and symbols
		used to describe and compare the features of two
		dimensional shapes and routine three dimensional shapes
		as per workplace procedures.

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	4.4 4.5	Common angles identified in accordance with SOPs Common angles in everyday objects are appropriately
		estimated as per SOPs
	4.6	Formal and informal mathematical language are used to
		describe and compare common angles as per workplace
	4.7	procedures.
	4.7	Common geometric instruments used to draw two
	4.0	dimensional shapes as per SOPs
	4.8	Routine three dimensional objects constructed from given
		nets as per SOPs.
5.Interpret routine tables,	5.1	Routine tables, graphs and charts identified in
graphs and charts for work		predominately familiar texts and contexts as per tables and graph manuals
	5.2	Common types of graphs and their different uses
	5.4	identified as per SOPs
	5.3	Features of tables, graphs and charts identified as per
	3.3	workplace procedures
	5.4	Information in routine tables, graphs and charts located
	3.4	
	5.5	and interpreted as per workplace procedures
	3.3	Calculations are perform to interpret information as per SOPs
	5.6	How statistics can inform and persuade interpretations is
		explained as per SOPs
	5.7	Misleading statistical information is identified as per
		workplace procedures.
	5.8	Information relevant to the workplace is discussed as per
		workplace procedures.
6.Collect data and	6.1	Features of common tables and graphs identified as per
construct routine tables	- 0	SOPs
and graphs for work	6.2	Uses of <i>different tables and graphs</i> identified as per job specifications
	6.3	Data and variables to be collected are determined as per
		workplace procedures.
	6.4	The audience is determined as per the workplace
	- • •	procedures
	6.5	Method of data collection is select as per job requirement
	6.6	Data is collected as per SOPs
	6.7	Information is collated in a table as per SOPs
	6.8	Suitable scale and axes determined as per job
		specifications
	6.9	Graph to present information is drafted and drawn as per SOPs

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	6.10	Data checked to ensure that it meets the expected results
		and context as per workplace procedures
	6.11	Information is reported or discussed using formal and
		informal mathematical language as per workplace
		procedures
7.Use basic functions of	7.1	Keys are identified and used for basic functions on a
calculator		calculator as per SOPs
	7.2	Calculation is done using whole numbers, money and
		routine decimals and percentages as per SOPs
	7.3	Calculation done with routine fractions and percentages as per SOPs
	7.4	Order of operations is applied to solve multi-step calculations as per SOPs
	7.5	Results are interpreted, displayed and recorded as per workplace procedures
	7.6	Estimations are made to check reasonableness of problem solving process, outcome and its appropriateness to the context and task as per workplace procedures
	7.7	Formal and informal mathematical language and appropriate symbolism and conventions used to communicate the result of the task as per workplace procedures.

### **RANGE**

This section provides work environments and conditions to which the performance criteria apply. It allows for different work environments and situations that will affect performance.

Variable	Range
Use basic functions     of calculator may     include but not     limited to:	<ul> <li>Addition</li> <li>Multiplication</li> <li>Calculate ratios</li> <li>Conversion of ratios into percentages</li> </ul>
2. Different tables and graphs may include but not limited to:	<ul><li>Bar Graphs</li><li>Flow Charts</li><li>Pie Charts</li><li>Pictograph</li></ul>

Line Graphs
Time Series Graphs
Stem and Leaf Plot
Histogram
Dot Plot
Scatter plot

### REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

### **Required Skills**

The individual needs to demonstrate the following skills:

- Measuring
- Logical thinking
- Computing
- Drawing of graphs
- Applying mathematical formulas
- Analytical

### Required knowledge

The individual needs to demonstrate knowledge of:

- Types of common shapes
- Differentiation between two dimensional shapes / objects
- Formulae for calculating area and volume
- Types and purpose of measuring instruments
- Units of measurement and abbreviations
- Fundamental operations (addition, subtraction, division, multiplication)
- Rounding techniques
- Types of fractions
- Different types of tables and graphs
- Meaning of graphs, such as increasing, decreasing, and constant value
- Preparation of basic data, tables & graphs

#### **EVIDENCE GUIDE**

This provides advice on assessment and must be read in conjunction with the performance criteria, required skills and knowledge and range.

Critical aspects o	f Assessment requires evidence that the candidate:
Competency	<ul> <li>1.1 Calculated correctly with whole numbers and routine or familiar fractions, decimals and percentages</li> <li>1.2 Estimated, measured and calculated with routine metric measurements</li> <li>1.3 Applied simple scale to estimate length of objects or distance to location or object</li> <li>1.4 Used formal and informal mathematical language to describe and compare common angles</li> <li>1.5 Used common geometric instruments to draw two dimensional shapes</li> <li>1.6 Collected data and constructed routine tables and graphs</li> <li>1.7 Used basic functions of calculator correctly</li> </ul>
2. Resource	The following resources should be provided:
Implications	<ul> <li>2.1 Access to relevant workplace or appropriately simulated environment where assessment can take place</li> <li>2.2 Materials relevant to the proposed activity or tasks</li> </ul>
3. Methods of	Competency may be assessed through:
Assessment	<ul> <li>3.1 Observation</li> <li>3.2 Oral questioning</li> <li>3.3 Written test</li> <li>3.4 Portfolio of Evidence</li> <li>3.5 Interview</li> <li>3.6 Third party report</li> </ul>
4. Context of	Competency may be assessed in:
Assessment	<ul><li>4.1 On the job</li><li>4.2 Off the job</li><li>4.3 Industrial attachment</li></ul>
5. Guidance information for assessment	Holistic assessment with other units relevant to the industry sector, workplace and job role is recommended.

#### DEMONSTRATE DIGITAL LITERACY

UNIT CODE: AGR/CU/AP/BC/03/5/A

#### **UNIT DESCRIPTION**

This unit covers the compétences required to demonstrate digital literacy. It involves identifying appropriate computer software and hardware, applying security measures to data, hardware, software in automated environment, applying computer software in solving tasks, applying internet and email in communication at workplace, applying desktop publishing in official assignment and preparing presentation packages.

#### **ELEMENTS AND PERFORMANCE CRITERIA**

ELEMENT	PERFORMANCE CRITERIA
These describe the key	These are assessable statements which specify the required level of
outcomes which make	performance for each of the elements.
up workplace function	Bold and italicized terms are elaborated in the Range
Identify     appropriate	1.1 Concepts of ICT are determined in accordance with computer equipment
computer software and	1.2 Classifications of computers are determined in accordance with manufacturers specification
hardware	1.3 Appropriate computer software is identified according to manufacturer's specification
	1.4 <i>Appropriate computer hardware</i> is identified according to manufacturer's specification
	1.5 Functions and commands of operating system are determined
	in accordance with manufacturer's specification
2. Apply security	2.1 Data security and privacy are classified in accordance with
measures to	the prevailing technology
data, hardware,	2.2 Security threats are identified, and control measures are
software in	applied in accordance with laws governing protection of ICT
automated	2.3 Computer threats and crimes are detected in accordance with
environment	Information security management guidelines
	2.4 Protection against computer crimes is undertaken in
	accordance with laws governing protection of ICT
3. Apply	3.1 Word processing concepts are applied in resolving
computer	workplace tasks, report writing and documentation as per job
	requirements

software in	3.2 Word processing utilities are applied in accordance with
solving tasks	workplace procedures
	3.3 Worksheet layout is prepared in accordance with work
	procedures
	3.4 Worksheet is build and data manipulated in the worksheet in
	accordance with workplace procedures
	3.5 Continuous data manipulated on worksheet is undertaken in
	accordance with work requirements
	3.6 Database design and manipulation is undertaken in
	accordance with office procedures
	3.7 Data sorting, indexing, storage, retrieval and security is
	provided in accordance with workplace procedures
4. Apply internet	4.1 Electronic mail addresses are opened and applied in
and email in	workplace communication in accordance with office policy
communication	4.2 Office internet functions are defined and executed in
at workplace	accordance with office procedures
	4.3 <b>Network configuration</b> is determined in accordance with
	office operations procedures
	4.4 Official World Wide Web is installed and managed
7 A 1 1 1.	according to workplace procedures
5. Apply desktop	5.1 Desktop publishing functions and tools are identified in
publishing in	accordance with manufactures specifications
official	5.2 Desktop publishing tools are developed in accordance with
assignments	work requirements  5.3 Dockton publishing tools are applied in accordance with
	5.3 Desktop publishing tools are applied in accordance with workplace requirements
	5.4 Typeset work is enhanced in accordance with workplace
	standards
6. Prepare	6.1 Types of presentation packages are identified in accordance
presentation	with office requirements
packages	6.2 Slides are created and formulated in accordance with
рискидев	workplace procedures
	6.3 Slides are edited and run in accordance with work procedures
	6.4 Slides and handouts are printed according to work
	requirements
	1"

### **RANGE**

This section provides work environments and conditions to which the performance criteria apply. It allows for different work environments and situations that will affect performance.

Variable	Range

Appropriate     computer hardware     may include but not     limited to:	<ul> <li>Computer case</li> <li>Monitor</li> <li>keyboard</li> <li>mouse</li> </ul>
2. Data security and privacy may include but not limited to:	<ul> <li>Confidentiality of data</li> <li>Cloud computing</li> <li>Integrity -but-curious data surfing</li> </ul>
3. Security and control measures may include but not limited to:	<ul> <li>Counter measures against cyber terrorism</li> <li>Risk reduction</li> <li>Cyber threat issues</li> <li>Risk management</li> <li>Pass wording</li> </ul>
4. Security threats may include but not limited to:	<ul><li>Cyber terrorism</li><li>Hacking</li></ul>

# REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

# **Required Skills**

The individual needs to demonstrate the following skills:

- Analytical skills
- Interpretation
- Typing
- Communication
- Basic ICT skills

# Required Knowledge

The individual needs to demonstrate knowledge of:

- Software concept
- Functions of computer software and hardware
- Data security and privacy
- Computer security threats and control measures
- Technology underlying cyber-attacks and networks

- Cyber terrorism
- Computer crimes
- Detection and protection of computer crimes
- Laws governing protection of ICT
- Microsoft suite

### **EVIDENCE GUIDE**

This provides advice on assessment and must be read in conjunction with the performance criteria, required skills and knowledge and range.

1. Critica	ıl A	Assessment requires evidence that the candidate:
Aspec	ts of	1.1 Identified and controlled security threats
Compe	etency	•
		1.2 Detected and protected computer crimes
		1.3 Applied word processing in office tasks
		1.4 Designed, prepared work sheet and applied data to the cells in accordance to workplace procedures
		1.5 Opened electronic mail for office communication as per workplace procedure
		1.6 Installed internet and World Wide Web for office tasks in
		accordance with office procedures
		1.7 Integrated emerging issues in computer ICT applications
		1.8 Applied laws governing protection of ICT
2. Resou	roo	2.1 Tablets
Implic	ations	2.2 Laptops
		2.3 Desktop computers 2.4 Calculators
		2.5 Internet
		2.6 Smart phones
		2.7 Operation Manuals
3. Metho		Competency may be assessed through:
Assess	sment	3.1 Written Test
		3.2 Observation
		3.3 Practical assignment
		3.4 Interview/Oral Questioning
4. Contex	xt of (	Competency may be assessed in:
Assess	sment	4.1 Off the job
		4.2 On the job setting
		4.3 Industrial attachment

5. Guidance	Holistic assessment with other units relevant to the industry sector,
information for	workplace and job role is recommended.
assessment	



#### DEMONSTRATE ENTREPRENEURSHIP SKILLS

UNIT CODE: AGR/CU/AP/BC/04/5/A

### **UNIT DESCRIPTION**

This unit covers the competencies required to demonstrate understanding of entrepreneurship. It involves demonstrating understanding of an entrepreneur, entrepreneurship, and self-employment, identifying entrepreneurship opportunities, creating entrepreneurial awareness, applying entrepreneurial motivation, developing business innovative strategies and developing business plan.

#### ELEMENTS AND PERFORMANCE CRITERIA

ELEMENT	PERFORMANCE CRITERIA
These describe the key outcomes which make up workplace function	These are assessable statements which specify the required level of performance for each of the elements.  Bold and italicized terms are elaborated in the Range
Demonstrate understanding of an Entrepreneur	<ol> <li>1.1 Entrepreneurs and Businesspersons are distinguished as per principles of entrepreneurship</li> <li>1.2 Types of entrepreneurs are identified as per principles of entrepreneurship</li> <li>1.3 Ways of becoming an Entrepreneur are identified as per principles of Entrepreneurship</li> <li>1.4 Characteristics of Entrepreneurs are identified as per principles of Entrepreneurship</li> <li>1.5 Factors affecting Entrepreneurship development are explored as per principles of Entrepreneurship</li> </ol>
2. Demonstrate understanding	2.1 Entrepreneurship and self-employment are
of Entrepreneurship and self-employment	distinguished as per principles of entrepreneurship 2.2 Importance of self-employment is analysed based on business procedures and strategies
	2.3 <b>Requirements for entry into self-employment</b> are identified according to business procedures and strategies
	2.4 Role of an Entrepreneur in business is determined according to business procedures and strategies
	2.5 Contributions of Entrepreneurs to National development are identified as per business procedures and strategies
	2.6 Entrepreneurship culture in Kenya is explored as per business procedures and strategies

	2.7 D
	2.7 Born or made Entrepreneurs are distinguished as per
2 Id-4'f-E-4	entrepreneurial traits
3. Identify Entrepreneurship	3.1 Sources of business ideas are identified as per business
opportunities	procedures and strategies
	3.2 Business ideas and opportunities are generated as per
	business procedures and strategies
	3.3 Business life cycle is analysed as per business
	procedures and strategies
	3.4 Legal aspects of business are identified as per
	procedures and strategies
	3.5 Product demand is assessed as per market strategies
	3.6 Types of <i>business environment</i> are identified and
	evaluated as per business procedures
	3.7 Factors to consider when evaluating business
	environment are explored based on business procedure
	and strategies
	3.8 Technology in business is incorporated as per best
	practice
4. Create entrepreneurial	4.1 <i>Forms of businesses</i> are explored as per business
awareness	procedures and strategies
	4.2 Sources of business finance are identified as per
	business procedures and strategies
	4.3 Factors in selecting source of business finance are
	identified as per business procedures and strategies
	4.4 <i>Governing policies</i> on Small Scale Enterprises (SSEs)
	are determined as per business procedures and
	strategies
	4.5 Problems of starting and operating SSEs are explored
	as per business procedures and strategies
5. Apply entrepreneurial	5.1 <i>Internal and external motivation</i> factors are
motivation	determined in accordance with motivational theories
	5.2 Self-assessment is carried out as per entrepreneurial
	orientation
	5.3 Effective communications are carried out in
	accordance with communication principles
	5.4 Entrepreneurial motivation is applied as per
	motivational theories
6. Develop innovative	6.1 Business innovation strategies are determined in
business strategies	accordance with the organization strategies
	6.2 Creativity in business development is demonstrated in
	accordance with business strategies
	6.3 <i>Innovative business strategies</i> are developed as per
	business principles
	ousiness principles

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	6.4 Linkages with other entrepreneurs are created as per
	best practice
	6.5 ICT is incorporated in business growth and
	development as per best practice
7. Develop Business Plan	7.1 Identified Business is described as per business
	procedures and strategies
	7.2 Marketing plan is developed as per business plan
	format
	7.3 Organizational/Management plan is prepared in
	accordance with business plan format
	7.4 Production/operation plan in accordance with business
	plan format
	7.5 Financial plan is prepared in accordance with the
	business plan format
	7.6 Executive summary is prepared in accordance with
	business plan format
	7.7 Business plan is presented as per best practice

# **RANGE**

This section provides work environment and conditions to which the performance criteria apply. It allows for different work environment and situations that will affect performance.

Variable	Range
Types of entrepreneurs may include but not limited to:      Characteristics of Entrepreneurs may include but not limited to:	<ul> <li>Innovators</li> <li>Imitators</li> <li>Craft</li> <li>Opportunistic</li> <li>Speculators</li> <li>Creative</li> <li>Innovative</li> <li>Planner</li> <li>Risk taker</li> <li>Networker</li> <li>Confident</li> <li>Flexible</li> <li>Persistent</li> <li>Patient</li> <li>Independent</li> <li>Future oriented</li> </ul>
3. Requirements for entry into self- employment may include but not limited to	<ul><li>Goal oriented</li><li>Technical skills</li><li>Management skills</li></ul>

	Entrepreneurial skills
	Resources
	Infrastructure
4. Internal and external motivation	Interest
may include but not limited to:	<ul> <li>Passion</li> </ul>
	• Freedom
	<ul> <li>Prestige</li> </ul>
	• Rewards
	Punishment
	Enabling environment
	Government policies
5. Business environment may include	External
but not limited to:	• Internal
	Intermediate
6. Forms of businesses may include	Sole proprietorship
but not limited to:	<ul> <li>Partnership</li> </ul>
	Limited companies
	Cooperatives
7. Governing policies may include but	<ul> <li>Increasing scope for finance</li> </ul>
not limited to:	<ul> <li>Promoting cooperation between</li> </ul>
	entrepreneurs and private sector
	Reducing regulatory burden on entrepreneurs
	Developing IT tools for entrepreneurs
8. Innovative business strategies may	New products
include but not limited to:	<ul> <li>New methods of production</li> </ul>
	New markets
	<ul> <li>New sources of supplies</li> </ul>
	Change in industrialization

# REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

# **Required Skills**

The individual needs to demonstrate the following skills:

- Analytical
- Management
- Problem-solving
- Root-cause analysis

Communication

### Required Knowledge

The individual needs to demonstrate knowledge of:

- Decision making
- Business communication
- Change management
- Competition
- Risk
- Net working
- Time management
- Leadership
- Factors affecting entrepreneurship development
- Principles of Entrepreneurship
- Features and benefits of common operational practices, e. g., continuous improvement (kaizen), waste elimination,
- Conflict resolution
- Health, safety and environment (HSE) principles and requirements
- Customer care strategies
- Basic financial management
- Business strategic planning
- Impact of change on individuals, groups and industries
- Government and regulatory processes
- Local and international market trends
- Product promotion strategies
- Market and feasibility studies
- Government and regulatory processes
- Local and international business environment
- Relevant developments in other industries
- Regional/ County business expansion strategies

#### **EVIDENCE GUIDE**

This provides advice on assessment and must be read in conjunction with the performance criteria, required skills and knowledge and range.

1. Critical Aspects of	Assessment requires evidence that the candidate:
Competency	1.1 Distinguished entrepreneurs and business persons correctly

	1011 (6.1 61
	1.2 Identified ways of becoming an entrepreneur
	appropriately
	1.3 Explored factors affecting entrepreneurship
	development appropriately
	1.4 Analysed importance of self-employment accurately
	1.5 Identified requirements for entry into self-employment correctly
	1.6 Identified sources of business ideas correctly
	1.7 Generated Business ideas and opportunities correctly
	1.8 Analysed business life cycle accurately
	1.9 Identified legal aspects of business correctly
	1.10 Assessed product demand accurately
	1.11 Determined Internal and external motivation factors appropriately
	1.12 Carried out communications effectively
	1.13 Identified sources of business finance correctly
	1.14 Determined Governing policy on small scale
	enterprise appropriately
	1.15 Explored problems of starting and operating SSEs
	effectively
	1.16 Developed Marketing, Organizational/Management,
	Production/Operation and Financial plans correctly
	1.17 Prepared executive summary correctly
	1.18 Determined business innovative strategies
	appropriately
	1.19 Presented business plan effectively
2. Resource	2.1 The following resources should be provided:
Implications	2.2 Access to relevant workplace where assessment can
	take place
	2.3 Appropriately simulated environment where assessment
	can take place
3. Methods of	3.1 Written tests
Assessment	3.2 Oral questions
	3.3 Third party report
	3.4 Interviews
	3.5 Portfolio
4. Context of	Competency may be assessed
Assessment	
	4.1 On-the-job
	4.2 Off-the –job
	4.3 During Industrial attachment

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5. Guidance Holistic assessment with other units relevant to the industry sector, workplace and job role is recommended.



#### DEMONSTRATE EMPLOYABILITY SKILLS

UNIT CODE: AGR/CU/AP/BC/05/5/A

### **Unit Description**

This unit covers competencies required to demonstrate employability skills. It involves conducting self-management, demonstrating interpersonal communication, critical safe work habits, leading small teams, planning and organizing work, maintaining professional growth and development, demonstrating workplace learning, problem solving skills and managing workplace ethics.

#### **ELEMENTS AND PERFORMANCE CRITERIA**

ELEMENT	PERFORMANCE CRITERIA
These describe the key outcomes which make up workplace function.	These are assessable statements which specify the required level of performance for each of the elements.  Bold and italicized terms are elaborated in the Range
Conduct self-management	<ol> <li>1.1 Personal vision, mission and goals are formulated based on potential and in relation to organization objectives</li> <li>1.2 Emotional intelligence is demonstrated as per workplace requirements.</li> <li>1.3 Individual performance is evaluated and monitored according to the agreed targets.</li> <li>1.4 Assertiveness is developed and maintained based on the requirements of the job.</li> <li>1.5 Accountability and responsibility for own actions are demonstrated based on workplace instructions.</li> <li>1.6 Self-esteem and a positive self-image are developed and maintained based on values.</li> <li>1.7 Time management, attendance and punctuality are observed as per the organization policy.</li> <li>1.8 Goals are managed as per the organization's objective</li> <li>1.9 Self-strengths and weaknesses are identified based on personal objectives</li> </ol>
2. Demonstrate interpersonal communication	2.1 Writing skills are demonstrated as per communication policy     2.2 Negotiation and persuasion skills are demonstrated as per communication policy     2.3 Internal and external stakeholders' needs are identified and interpreted as per the communication policy

	2.4 Communication networks are established based on
	workplace policy
	2.5 Information is shared as per communication policy
3. Demonstrate critical safe work habits	<ul><li>3.1 Stress is managed in accordance with workplace policy.</li><li>3.2 Punctuality and time consciousness is demonstrated in line with workplace policy.</li></ul>
	3.3 Personal objectives are integrated with organization goals based on organization's strategic plan.
	3.4 <i>Resources</i> are utilized in accordance with workplace policy.
	3.5 Work priorities are set in accordance to workplace goals and objectives.
	3.6 Leisure time is recognized and utilized in line with personal objectives.
	3.7 <i>Drugs and substances of abuse</i> are identified and avoided based on workplace policy.
	3.8 HIV and AIDS prevention awareness is demonstrated in line with workplace policy.
	3.9 Safety consciousness is demonstrated in the workplace based on organization safety policy.
	3.10 <i>Emerging issues</i> are identified and dealt with in accordance with organization policy.
4. Lead small teams	4.1 Performance targets for the <i>team</i> are set based on organization's objectives
	4.2 Duties are assigned in accordance with the organization policy.
	4.3 <i>Forms of communication</i> in a team are established according to organization's policy.
	4.4 Team performance is evaluated based on set targets as per workplace policy.
	4.5 Conflicts are resolved between team members in line with organization policy.
	4.6 Gender related issues are identified and mainstreamed in accordance workplace policy.
	4.7 Human rights and fundamental freedoms are identified and respected as Constitution of Kenya 2010.
	4.8 Healthy relationships are developed and maintained in line with workplace.
5. Plan and organize work	5.1 Task requirements are identified as per the workplace objectives
	5.2 Task is interpreted in accordance with safety (OHS), environmental requirements and quality requirements

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	5.3 Work activity is organized with other involved personnel as per the SOPs
	5.4 Resources are mobilized, allocated and utilized to meet project goals and deliverables.
	5.5 Work activities are monitored and evaluated in line with
	organization procedures.
	5.6 Job planning is documented in accordance with workplace
	requirements.
	5.7 Time is managed achieve workplace set goals and
	objectives.
6. Maintain professional growth	6.1 Personal training needs are identified and assessed in line with the requirements of the job.
and development	6.2 Training and career opportunities are identified and
	utilized based on job requirements.
	6.3 Resources for training are mobilized and allocated based
	organizations and individual skills needs.
	6.4 Licensees and certifications relevant to job and career are
	obtained and renewed as per policy.
	6.5 Work priorities and personal commitments are balanced
	and managed based on requirements of the job and
	personal objectives.
	6.6 Recognitions are sought as proof of career advancement in
	line with professional requirements.
7. Demonstrate	7.1 Learning opportunities are sought and managed based on
workplace learning	job requirement and organization policy.
	7.2 Improvement in performance is demonstrated based on courses attended.
	7.3 Application of learning is demonstrated in both technical and non-technical aspects based on requirements of the job
	7.4 Time and effort is invested in learning new skills based on job requirements
	7.5 Initiative is taken to create more effective and efficient
	processes and procedures in line with workplace policy.
	7.6 New systems are developed and maintained in accordance
	with the requirements of the job.
	7.7 Awareness of personal role in workplace <i>innovation</i> is
	demonstrated based on requirements of the job.
8. Demonstrate	8.1 Creative, innovative and practical solutions are developed
problem solving	based on the problem
skills	8.2 Independence and initiative in identifying and solving
SKIIIS	problems is demonstrated based on requirements of the
	job.
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	8.3 Team problems are solved as per the workplace guidelines
	8.4 Problem solving strategies are applied as per the workplace guidelines
	8.5 Problems are analyzed and assumptions tested as per the context of data and circumstances
9. Demonstrate workplace ethics	9.1 Policies and guidelines are observed as per the workplace requirements
	9.2 Self-worth and professionalism is exercised in line with personal goals and organizational policies
	9.3 Code of conduct is observed as per the workplace requirements
	9.4 Integrity is demonstrated as per legal requirement

# **RANGE**

This section provides work environment and conditions to which the performance criteria apply. It allows for different work environment and situations that will affect performance.

Variable	Range
Drug and     substance abuse     may include but     not limited to:	<ul> <li>Commonly abused</li> <li>Alcohol</li> <li>Tobacco</li> <li>Miraa</li> <li>Over-the-counter drugs</li> <li>Cocaine</li> <li>Bhang</li> <li>Glue</li> </ul>
2. Feedback may include but not limited to:	<ul><li>Verbal</li><li>Written</li><li>Informal</li><li>Formal</li></ul>
3. Relationships may include but not limited to:	<ul> <li>Man/Woman</li> <li>Trainer/trainee</li> <li>Employee/employer</li> <li>Client/service provider</li> <li>Husband/wife</li> <li>Boy/girl</li> <li>Parent/child</li> <li>Sibling relationships</li> </ul>

4. Forms of	• Written
communication	Visual
may include but	
not limited to:	• Verbal
not minica to.	• Non verbal
7 m	Formal and informal
5. Team may	Small work group
include but not	• Staff in a section/department
limited to:	Inter-agency group
6. Personal growth	Growth in the job
may include but	Career mobility
not limited to:	<ul> <li>Gains and exposure the job gives</li> </ul>
	<ul> <li>Net workings</li> </ul>
	<ul> <li>Benefits that accrue to the individual as a result of</li> </ul>
	noteworthy performance
7. Personal	Long term
objectives may	Short term
include but not	• Broad
limited to:	• Specific
8. Trainings and	Participation in training programs
career	Technical
opportunities	<ul> <li>Supervisory</li> </ul>
may include but	<ul> <li>Managerial</li> </ul>
not limited to	Continuing Education
	<ul> <li>Serving as Resource Persons in conferences and workshops</li> </ul>
9. Resource may	Human
include but not	<ul> <li>Financial</li> </ul>
limited to:	<ul> <li>Hardware</li> </ul>
	<ul> <li>Software</li> </ul>
10. Innovation may	New ideas
include but not	<ul> <li>Original ideas</li> </ul>
limited to:	Different ideas
	Methods/procedures
	• Processes
	<ul><li>New tools</li></ul>
11. Emerging issues	Terrorism
may include but	Social media
not limited to:	National cohesion
	<ul><li>Open offices</li></ul>
12. Range of media	Mentoring
for learning may	<ul><li>peer support and networking</li></ul>
101 lourning may	• peer support and networking

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include but not	IT and courses
limited to:	

### REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

### **Required Skills**

The individual needs to demonstrate the following skills:

- Communication
- Critical thinking
- Observation
- Organizing
- Negotiation
- Monitoring
- Evaluation
- Record keeping
- Problem solving
- Decision Making
- Resource utilization
- Resource mobilization

### Required Knowledge

The individual needs to demonstrate knowledge of:

- Work values and ethics
- Company policies
- Company operations, procedures and standards
- Occupational Health and safety procedures
- Fundamental rights at work
- Personal hygiene practices
- Workplace communication
- Concept of time
- Time management
- Decision making
- Types of resources
- Work planning
- Resources and allocating resources

- Organizing work
- Monitoring and evaluation
- Record keeping
- Workplace problems and how to deal with them
- Gender mainstreaming
- HIV and AIDS
- Drug and substance abuse
- Leadership
- Safe work habits
- Professional growth and development
- Technology in the workplace
- Emerging issues
- Social media
- Terrorism
- National cohesion

### **EVIDENCE GUIDE**

1. Critical	Assessment requires evidence that the candidate:
aspects of	1.1 Conducted self-management
Competency	1.2 Demonstrated interpersonal communication
	1.3 Demonstrated critical safe work habits
	1.4 Led small teams
	1.5 Planned and organized work
	1.6 Maintained professional growth and development
	1.7 Demonstrated workplace learning
	1.8 Demonstrated problem solving skills
	1.9 Demonstrated workplace ethics
2. Resource	The following resources should be provided:
Implications	2.1 Access to relevant workplace where
	assessment can take place
	2.2 Appropriately simulated environment
	where assessment can take place
3. Methods of	Competency in this unit may be assessed through:
Assessment	2.1.0-1
	3.1 Oral questioning
	3.2 Portfolio of evidence
	3.3 Third Party Reports
	3.4 Written tests

4. Context of	Competency may be assessed
Assessment	4.1 On-the-job
	4.2 Off-the –job
	4.3 During Industrial attachment
5. Guidance	Holistic assessment with other units relevant to the industry sector,
information	workplace and job role is recommended.
for	
assessment	



### **DEMONSTRATE ENVIRONMENTAL LITERACY**

UNIT CODE: AGR/CU/AP/BC/06/5/A

### **UNIT DESCRIPTION**

This unit describes the competencies required to demonstrate understanding of environmental literacy. It involves controlling environmental hazard, controlling control environmental pollution, complying with workplace sustainable resource use, evaluating current practices in relation to resource usage, identifying environmental legislations/conventions for environmental concerns, implementing specific environmental programs and monitoring activities on environmental protection/programs.

ELEMENT	PERFORMANCE CRITERIA
These describe the key outcomes which make up workplace function.	These are assessable statements which specify the required level of performance for each of the elements.  Bold and italicized terms are elaborated in the Range
Control environmental     hazard	<ul> <li>1.1 Storage methods for environmentally hazardous materials are strictly followed according to environmental regulations and OSHS.</li> <li>1.2 Disposal methods of hazardous wastes are followed always according to environmental regulations and OSHS.</li> <li>1.3 PPE is used according to OSHS.</li> </ul>
Control environmental     Pollution control	<ul> <li>2.1 Environmental pollution <i>control measures</i> are compiled following standard protocol.</li> <li>2.2 Procedures for solid waste management are observed according to Environmental Management and Coordination Act 1999</li> <li>2.3 Methods for minimizing <i>noise pollution</i> is complied with based on <i>Noise</i> and Excessive Vibration <i>Pollution and Control Regulations</i>, 2009</li> </ul>
3. Demonstrate sustainable resource use	3.1 Methods for minimizing wastage are complied with. 3.2 Waste management procedures are employed following principles of 3Rs (Reduce, Reuse, Recycle)

	2.234.1.1.6
	3.3 Methods for economizing and reducing resource
	consumption are practiced as per the Environmental
4 5 1 4	Management and Coordination Act 1999
4. Evaluate current	4.1 Information on resource efficiency systems and
practices in relation to	<b>procedures</b> are collected and provided to the work
resource usage	group where appropriate.
	4.2 Current resource usage is measured and recorded by
	members of the work group.
	4.3 Current purchasing strategies are analyzed and
	recorded according to industry procedures.
	4.4 Current work processes to access information and
	data is analyzed following enterprise protocol.
5. Identify Environmental	5.1 Environmental <i>legislations/conventions</i> and local
legislations/conventions	ordinances are identified according to the different
for environmental	environmental aspects/impact
concerns	5.2 Industrial standard/environmental practices are
	described according to the different environmental
	concerns
6. Implement specific	6.1 Programs/Activities are identified according to
environmental	organizations policies and guidelines.
programs	6.2 Individual roles/responsibilities are determined
	and performed based on the activities identified.
	6.3 Problems/constraints encountered are resolved in
	accordance with organizations' policies and
	guidelines
	6.4 Stakeholders are consulted based on company
	guidelines
7. Monitor activities on	7.1 Activities are periodically monitored and evaluated
Environmental	according to the objectives of the environmental
protection/Programs	Program
	7.2 Feedback from stakeholders are gathered and
	considered in proposing enhancements to the
	program based on consultations
	7.3 Data gathered are analyzed based on evaluation
	requirements
	7.4 Recommendations are submitted based on the
	findings
	7.5 Management support systems are set/established to
	sustain and enhance the program
	7.6 Environmental incidents are monitored and reported
	to concerned/proper authorities
RANCE	to concerned proper authornies

This section provides work environments and conditions to which the performance criteria apply. It allows for different work environments and situations that will affect performance.

Variable	Range
PPE may include but not limited to:	<ul> <li>Mask</li> <li>Gloves</li> <li>Goggles</li> <li>Safety hat</li> <li>Overall</li> <li>Hearing protector</li> <li>Safety boots</li> </ul>
2. Environmental pollution control measures may include but not limited to:	<ul> <li>Methods for minimizing or stopping spread and ingestion of airborne particles</li> <li>Methods for minimizing or stopping spread and ingestion of gases and fumes</li> <li>Methods for minimizing or stopping spread and ingestion of liquid wastes</li> </ul>
3. Waste management procedures may include but not limited to:	<ul> <li>Sorting</li> <li>Storing of items</li> <li>Recycling of items</li> <li>Disposal of items</li> </ul>
4. Resources may include but not limited to:	<ul> <li>Electric</li> <li>Water</li> <li>Fuel</li> <li>Telecommunications</li> <li>Supplies</li> <li>Materials</li> </ul>
5. Workplace environmental hazards may include but not limited to:	<ul><li>Biological hazards</li><li>Chemical and dust hazards</li><li>Physical hazards</li></ul>
6. Organizational systems and procedures may include but not limited to:	<ul> <li>Supply chain, procurement and purchasing</li> <li>Quality assurance</li> <li>Making recommendations and seeking approvals</li> </ul>

### REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

### **Required Skills**

The individual needs to demonstrate the following skills:

- Observation
- Measuring
- Writing
- Communication
- Analytical
- Monitoring
- Evaluation

### Required Knowledge

The individual needs to demonstrate knowledge of:

- Storage methods of environmentally hazardous materials
- Disposal methods of hazardous wastes
- Usage of PPE Environmental regulations
- OSHS
- Types of pollution
- Environmental pollution control measures
- Different solid wastes
- Solid waste management
- Different noise pollution
- Methods of minimizing noise pollution
- Solid Waste Act
- Methods of minimizing wastage
- Waste management procedures
- Economizing of resource consumption
- 3Rs principle
- Types of resources
- Techniques in measuring current usage of resources
- Calculating current usage of resources
- Types of workplace environmental hazards
- Environmental regulations
- Environmental regulations applying to the enterprise.
- Measurement and recording of current resource usage

- Analysis current work processes to access information and data Analysis of data and information
- Identification of areas for improvement
- Resource consuming processes
- Determination of quantity and nature of resource consumed
- Analysis of resource flow of different parts of the resource flow process
- Use/conversion of resources
- Causes of low efficiency of use
- Increasing the efficiency of resource use
- Inspection of resource use plans
- Regulations/licensing requirements
- Determine benefit/cost for alternative resource sources
- Benefit/costs for different alternatives
- Components of proposals
- Criteria on ranking proposals
- Regulatory requirements
- Proposals for improving resource efficiency
- Implementation of resource efficiency plans
- Procedures in monitor implementation
- Adjustments of implementation plan
- Inspection of new resource usage

## **EVIDENCE GUIDE**

1. Critical	Assessment requires evidence that the candidate:
Aspects of Competency	<ul> <li>1.1 Controlled environmental hazard</li> <li>1.2 Controlled environmental pollution</li> <li>1.3 Demonstrated sustainable resource use</li> <li>1.4 Evaluated current practices in relation to resource usage</li> <li>1.5 Demonstrated knowledge of environmental legislations and local ordinances according to the different environmental issues /concerns.</li> <li>1.6 Described industrial standard environmental practices according to the different environmental issues/concerns.</li> <li>1.7 Resolved problems/ constraints encountered based on management standard procedures</li> </ul>

	1.8 Implemented and monitored environmental practices on a
	periodic basis as per company guidelines
	1.9 Recommended solutions for the improvement of the Program
	1.10 Monitored and reported to proper authorities any
	environmental incidents
2. Resource	The following resources should be provided:
Implications	2477 1 1 21 2 21 2
	2.1 Workplace with storage facilities
	2.2 Tools, materials and equipment relevant to the tasks (ex.
	Cleaning tools, cleaning materials, trash bags, etc.)
	2.3 PPE
	2.4 Manuals and references
	2.5 Legislation, policies, procedures, protocols and local
	ordinances relating to environmental protection
	2.6 Case studies/scenarios relating to environmental Protection
3. Methods of	Competency in this unit may be assessed through:
Assessment	2.1.01
	3.1 Observation
	3.2 Oral questioning
	3.3 Written test
	3.4 Interview/Third Party Reports
	3.5 Portfolio of evidence
4. Context of	Competency may be assessed
Assessment	4.1 On-the-job
	4.2 Off-the –job
	4.2 On-the – Job 4.3 During Industrial attachment
5. Guidance	-
	Holistic assessment with other units relevant to the industry sector,
information	workplace and job role is recommended.
for	
assessment	

## DEMONSTRATE OCCUPATIONAL SAFETY AND HEALTH PRACTICES

UNIT CODE: AGR/CU/AP/BC/07/5/A

# **UNIT DESCRIPTION**

This unit specifies the competencies required to identify workplace hazards and risk, identify and implement appropriate control measures and implement OSH programs, procedures and policies/guidelines

ELEMENT	PERFORMANCE CRITERIA
These describe the key outcomes which make up workplace function.	These are assessable statements which specify the required level of performance for each of the elements.  Bold and italicized terms are elaborated in the Range
Identify workplace     hazards and risk	<ul> <li>1.1 Hazards in the workplace are identified based their indicators</li> <li>1.2 Risks and hazards are evaluated based on legal requirements.</li> <li>1.3 OSH concerns raised by workers are addressed as per legal requirements.</li> </ul>
2. Control OSH hazards	2.1 Hazard prevention <i>and control measures</i> are implemented as per legal requirement. 2.2 Risk assessment is conducted and a risk matrix developed based on likely impact. 2.3 <i>Contingency measures</i> , including <i>emergency procedures</i> during workplace <i>incidents and emergencies</i> are recognized and established in accordance with organization procedures.
3. Implement OSH programs	<ul> <li>3.1 Company OSH program are identified, evaluated and reviewed based on legal requirements.</li> <li>3.2 Company OSH programs are implemented as per legal requirements.</li> <li>3.3 Workers are capacity built on OSH standards and procedures as per legal requirements</li> </ul>

3.4 <i>OSH-related records</i> are maintained as per legal
requirements.

This section provides work environments and conditions to which the performance criteria apply. It allows for different work environments and situations that will affect performance.

Variable	Range
Hazards may include but are not limited to:	<ul> <li>Physical hazards</li> <li>Biological hazards</li> <li>Chemical hazards</li> <li>Ergonomics</li> <li>Psychological factors</li> <li>Physiological factors</li> <li>Safety hazards</li> <li>Unsafe workers' act</li> </ul>
2. Indicators may include but are not limited to:	<ul> <li>Increased of incidents of accidents, injuries</li> <li>Increased occurrence of sickness or health complaints/ symptoms</li> <li>Common complaints of workers related to OSH</li> <li>High absenteeism for work-related reasons</li> </ul>
3. Evaluation and/or work environment measurements may include but are not limited to:	<ul> <li>Health Audit</li> <li>Safety Audit</li> <li>Work Safety and Health Evaluation</li> <li>Work Environment Measurements of Physical and Chemical Hazards</li> </ul>
4. OSH issues and/or concerns may include but are not limited to:	<ul> <li>Workers' experience/observance on presence of work hazards</li> <li>Unsafe/unhealthy administrative arrangements (prolonged work hours, no break time, constant overtime, scheduling of tasks)</li> <li>Reasons for compliance/non-compliance to use of PPEs or other OSH procedures/policies/guidelines</li> </ul>

5. Prevention and control measures may include but are not limited to:	<ul> <li>Eliminate the hazard</li> <li>Isolate the hazard</li> <li>Substitute the hazard with a safer alternative</li> <li>Use administrative controls to reduce the risk</li> <li>Use engineering controls to reduce the risk</li> <li>Use personal protective equipment</li> <li>Safety, Health and Work Environment Evaluation</li> <li>Periodic and/or special medical examinations of workers</li> </ul>
6. Safety gears /PPE (Personal Protective Equipment's) may include but are not limited to:	<ul> <li>Arm/Hand guard, gloves</li> <li>Eye protection (goggles, shield)</li> <li>Hearing protection (ear muffs, ear plugs)</li> <li>Hair Net/cap/bonnet</li> <li>Hard hat</li> <li>Face protection (mask, shield)</li> <li>Apron/Gown/coverall/jump suit</li> <li>Anti-static suits</li> <li>High-visibility reflective vest</li> </ul>
7. Appropriate risk controls	<ul> <li>Eliminate the hazard altogether</li> <li>Isolate the hazard from anyone who could be harmed</li> <li>Substitute the hazard with a safer alternative</li> <li>Use administrative controls to reduce the risk</li> <li>Use engineering controls to reduce the risk</li> <li>Use personal protective equipment</li> </ul>
8. Contingency measures may include but are not limited to:	<ul> <li>Evacuation</li> <li>Isolation</li> <li>Decontamination</li> <li>Emergency personnel</li> </ul>
9. Emergency procedures may include but are not limited to:	<ul> <li>Fire drill</li> <li>Earthquake drill</li> <li>Basic life support/CPR</li> <li>First aid</li> <li>Spillage control</li> <li>Decontamination of chemical and toxic</li> <li>Disaster preparedness/management</li> <li>Set of fire-extinguisher</li> </ul>

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10. Incidents and emergencies may include but are not limited to:	<ul> <li>Chemical spills</li> <li>Equipment/vehicle accidents</li> <li>Explosion</li> <li>Fire</li> <li>Gas leak</li> <li>Injury to personnel</li> <li>Structural collapse</li> <li>Toxic and/or flammable vapors emission.</li> </ul>
11. OSH-related Records may include but are not limited to:	<ul> <li>Medical/Health records</li> <li>Incident/accident reports</li> <li>Sickness notifications/sick leave application</li> <li>OSH-related trainings obtained</li> </ul>

### REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

### **Required Skills**

The individual needs to demonstrate the following skills:

- Communication
- Interpersonal
- Presentation
- Risk assessment
- Evaluation
- Critical thinking
- Problem solving
- Negotiation

# Required Knowledge

The individual needs to demonstrate knowledge of:

- General OSH Principles
- Occupational hazards/risks recognition
- OSH organizations providing services on OSH evaluation and/or work environment measurements (WEM)
- National OSH regulations; company OSH policies and protocols
- Systematic gathering of OSH issues and concerns

- General OSH principles
- National OSH regulations
- Company OSH and recording protocols, procedures and policies/guidelines
- Training and/or counseling methodologies and strategies

# **EVIDENCE GUIDE**

1. Critical Aspects	Assessment requires evidence that the candidate:
1. Critical Aspects of Competency	<ul> <li>Assessment requires evidence that the candidate:</li> <li>1.1 Identified hazards in the workplace based their indicators</li> <li>1.2 Evaluated workplace hazards based on legal requirements.</li> <li>1.3 Addressed OSH concerns raised by workers as per legal requirements.</li> <li>1.4 Implemented hazard prevention and control measures as per legal requirement.</li> <li>1.5 Conducted risk assessment as per legal requirement.</li> <li>1.6 Developed risk matrix based on likely impact.</li> <li>1.7 Recognized and established contingency measures in accordance with organization procedures.</li> <li>1.8 Identified, evaluated and reviewed company OSH program based on legal requirements.</li> <li>1.9 Implemented company OSH programs as per legal requirements.</li> </ul>
	1.10 Capacity built workers on OSH standards and procedures as per legal requirements
2 D	1.11 Maintained OSH-related records as per legal requirements.
2. Resource Implications	<ul> <li>2.1 The following resources should be provided:</li> <li>2.2 Access to relevant workplace where assessment can take place</li> <li>2.3 Appropriately simulated environment where assessment can take place</li> </ul>
3. Methods of Assessment	Competency in this unit may be assessed through:  3.1 Observation 3.2 Oral questioning 3.3 Written test 3.4 Portfolio of Evidence 3.5 Interview

	3.6 Third party report
4. Context of	Competency may be assessed
Assessment	4.1 On-the-job
	4.2 Off-the –job
	4.3 During Industrial attachment
5. Guidance	Holistic assessment with other units relevant to the industry sector,
information for	workplace and job role is recommended.
assessment	



CORE UNITS OF COMPETENCY

### **DEVELOP AGRI-ENTERPRISE BUSINESS PLAN**

UNIT CODE: AGR/OS/AP/CR/01/5/A

### **UNIT DESCRIPTION**

This unit specifies the competencies required to develop an agri- enterprise business plan. It involves preparing to develop agri-enterprise business plan, developing agri-enterprise business plan, evaluating agri-enterprise business plan and completing development of agri-enterprise business plan.

ELEMENT	PERFORMANCE CRITERIA
These describe the key	These are assessable statements which specify the required level
outcomes which make up	of performance for each of the elements.
workplace function.	Bold and italicized terms are elaborated in the range.
Prepare to develop	1.1 <i>Tools</i> for feasibility study are developed and/ or acquired
agri- enterprise	based on the study methodology plan
business plan	1.2 <i>Feasibility study</i> is conducted in accordance with standard
	procedures
	1.3 A <b>SWOT</b> analysis is conducted in accordance with standard
	procedures
	1.4 Templates for <i>business plan</i> are acquired based on standard
	business planning procedure
2. Develop agri-	2.1 Marketing plan is developed in accordance with marketing
enterprise business	principles
plan	2.2 Management plan enterprise is developed in accordance with
	the principles of management
	2.3 Operational plan of the enterprise is developed in accordance
	with standard operating procedures
	2.4 Financial plan is developed in accordance with standard
	financial management principles and organizational financial manual
	2.5 Procurement plan is developed in accordance with
	organizational procurement policies
	2.6 <i>Business strategies</i> are developed based on the business plan
3. Evaluate agri-	3.1 Viability of business is assessed based on the <i>investment plan</i>
enterprise business plan	3.2 Quality of business plan is assessed based on standard
	business planning procedures

	3.3 Review the business plan based on the quality assessment
	report
4. Complete development	4.1 Business plan is documented and filed in accordance with
of agri-enterprise	organizational policies and procedures
business plan	4.2 Business planning <i>project report</i> is prepared in accordance with enterprise policies and procedures/clients' specifications.
	4.3 Business plan is shared with relevant stakeholders according to organizational policies.

This section provides work environments and conditions to which the performance criteria apply. It allows for different work environment and situations that will affect performance.

Variable		Range
	ools may include but ot limited to	<ul> <li>Questionnaires</li> <li>Observation charts</li> <li>Checklists</li> <li>Set of guided questions</li> <li>Marketing template</li> <li>Management templates</li> <li>Production template</li> </ul>
	easibility study may clude but not limited	<ul> <li>Practicality</li> <li>Possibility of</li> <li>Viability</li> <li>Profitability of business</li> </ul>
	WOT may include at not limited to	Tool to be used by enterprise to analyze factors that will affect the performance of the enterprise.  • Strengths  • Weakness  • Opportunities  • Threats
	usiness plan may clude but not limited	Idea of Describes the nature, objectives and business strategies
	usiness strategy may clude but not limited	<ul> <li>A written document</li> <li>Contains information about how the company will implement the business plan</li> <li>Documentation of execution to completion of an assignment carried out over a given period of time</li> </ul>

6.	Project report may
	include but not limited
	to

### REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

### **Required skills**

The individual needs to demonstrate the following skills:

- Analytical
- Entrepreneurial
- Communication
- Leadership
- Management
- Presentation skills
- Negotiation
- Marketing
- Selling
- Problem solving
- Networking

### Required knowledge

The individual needs to demonstrate knowledge of:

- Enterprise
- Strategy formulation
- Feasibility studies
- SWOT tool
- PESTEL tool
- Principles of market planning
- Business management principles
- Business planning
- Principles of operational planning
- Principles of financial planning
- Human resources development
- Basic accounting principles
- Basic financial management principles
- Financial records and recording tools
- Basic procurement principles

• Organizational policies and standard operating procedures

# **EVIDENCE GUIDE**

1.	Critical Aspects of	Assessment requires evidence that the candidate:
	Competency	1.1 Conducted feasibility studies in accordance with standard
	1 3	procedures
		1.2 Business plan and agri-enterprise strategies are developed
		based on the results of the feasibility studies
		1.3 Agri-enterprise strategy and business plan are documented
		according to organizational policies and procedures
		1.4 The business plan is shared with relevant personnel in
		accordance with the organizational policies and client
		according to clients' specification.
2.	Resource	The following resources must be provided:
	Implications	2.1 Assessment location
		2.2 Candidate reports/file
		2.3 Business plans templates and tools.
3.	Methods of	Competency may be assessed through:
	Assessment	3.1 Interview
		3.2 Written tests
		3.3 Oral questioning
		3.4 Third party report
4.	Context of	Competency may be assessed:
	Assessment	4.1 On the job
		4.2 Off the job
		4.3 During industrial attachment
5.	Guidance information	Holistic assessment with other units relevant to the industry
	for assessment	subsector, workplace and job roles is recommended.

### START AGRI-ENTERPRISE

UNIT CODE: AGR/OS/AP/CR/02/5/A

### **UNIT DESCRIPTION**

This unit specifies the competencies required to start an Agri-enterprise. It involves prepare to start agri-enterprise, implementing agri-enterprise operations, evaluating agri-enterprise and completing starting agri-enterprise.

ELEMENT	PERFORMANCE CRITERIA
These describe the key	These are assessable statements which specify the required level
outcomes which make up	of performance for each of the elements.
workplace function.	Bold and italicized terms are elaborated in the range.
1. Prepare to start agri-	1.1 Business ideas are generated in accordance with business
enterprise	identification processes
	1.2 Feasibility study is conducted in accordance with standard
	procedures using the developed tools
	1.3 A SWOT and value chain analysis are done in accordance
	with standard guidelines
	1.4 Business name search is carried out in accordance to the
	regulatory framework
	1.5 The agri-enterprise is registered in accordance with national
	and county business registration requirements
	1.6 Financial services and business development services
	necessary for the enterprise were identified and accessed in
	accordance to the business plan
	1.7 Enterprise is located at an appropriate site in accordance with
	business plan, enterprise strategy and legal and regulatory
	requirements
	1.8 Business licenses are obtained according to county
	regulations
	1.9 Physical <i>infrastructure</i> required by enterprise is identified,
	procured and set up in accordance with the business plan
2. Implement Agri-	2.1 Human resources required by enterprise are hired in
enterprise start up	accordance with management plan
processes	2.2 Raw materials and inputs to production are sourced in
	accordance with the procurement plan

	2.3 Production processes are carried out in accordance with the
	production plan
	2.4 Products are marketed in accordance with the marketing plan and marketing strategy
	2.5 Financial services required by enterprise are accessed in
	accordance with the financial plan
	2.6 Business services required are obtained in accordance with
	the business plan
	2.7 Financial management is carried out based on the financial
	plan
	2.8 Business records are kept in accordance with organizational
	policies and procedures
	2.9 The enterprise is managed according to the management plan
3.Evaluate agri-enterprise	3.1 Agri-enterprise start up processes are evaluated based on
start up processes	standard business startup procedures
4.Complete starting agri-	4.1 Agri-enterprise start up report is prepared in accordance with
enterprise	standard reporting procedures

This section provides work environments and conditions to which the performance criteria apply. It allows for different work environment and situations that will affect performance.

Variable	Range
SWOT analysis     may include but     not limited to	A tool used by enterprise to analyze factors that will affect the performance of the enterprise. An acronym standing for:  • Strengths  • Weakness  • Opportunities  • Threats
2. Value chain analysis may include but not limited to	<ul> <li>An analysis tool</li> <li>Enterprise product analysis of all its stages from production to consumer</li> </ul>
3. Business name search may include but not limited to	<ul> <li>Done with registrar of companies</li> <li>To ascertain that there is no double registration of the same enterprise name</li> </ul>

4. Business licenses may include but not limited to	Necessary permits that allow legal running of an enterprise
5. Infrastructure may include but not limited to	<ul> <li>Tools and equipment</li> <li>Buildings</li> <li>Electricity</li> <li>Computers</li> <li>Internet connectivity</li> </ul>
6. Business services may include but not limited to	<ul> <li>Business plan consulting</li> <li>Packing and unpacking</li> <li>Logistics management</li> <li>Computer repair</li> <li>Tutoring</li> <li>Loans/ credit</li> </ul>

# REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

# Required skills

The individual needs to demonstrate the following skills:

- Marketing
- Selling
- Communication
- Negotiation
- Planning
- Problem solving
- Networking.
- Analytical
- Entrepreneurial
- Communication

# Required knowledge

The individual needs to demonstrate knowledge of:

- Types of enterprises or businesses
- Legal and regulatory requirements in business registration
- Basic principles of small business management
- Partnership building
- Innovation
- Monitoring and evaluation

- Financial management
- Banking
- Business communication principles
- Human resource management
- Infrastructure
- Business planning
- Business strategy formulation
- Procurement procedures
- Product development
- SWOT tool
- Value chain analysis
- Feasibility study tools

### **EVIDENCE GUIDE**

1. Critical Aspects of	Assessment requires evidence that the candidate:
Competency	1.1 Feasibility study is conducted in accordance with standard
	procedures
	1.2 Agri-enterprise is registered in accordance with the legal and regulatory requirements
	1.3 An in-depth analysis of the enterprise and product/ service
	1.4 Production of products is carried out in accordance with the production plan
	1.5 Products are marketed in accordance with the marketing plan and marketing strategy
	1.6 The enterprise is managed according to the management plan
2. Resource	The following resources must be provided:
Implications	2.1 Assessment location
	2.2 Candidate reports/ file
3. Methods of	Competency may be assessed through:
Assessment	3.1 Written tests
	3.2 Third party report
4. Context of	Competency may be assessed:
Assessment	4.1 On the job
	4.2 Off the job
	4.3 During industrial attachment

5.	Guidance	Holistic assessment with other units relevant to the industry
	information for	subsector, workplace and job roles is recommended.
	assessment	



### MARKET AGRI-ENTERPRISE PRODUCTS/SERVICES

UNIT CODE: AGR/OS/AP/CR/03/5/A

### **UNIT DESCRIPTION**

This unit specifies the competencies required to market Agricultural products; it involves preparing for marketing of agri-enterprise products, executing marketing of agri-enterprise products, establishing customer feedback mechanism and completing marketing of agri-enterprise products.

ELEMENT	PERFORMANCE CRITERIA
These describe the key	These are assessable statements which specify the required level
outcomes which make up	of performance for each of the elements.
workplace function.	Bold and italicized terms are elaborated in the range.
1. Prepare to market agrienterprise products/ services	<ul> <li>1.1 <i>Market research</i> tools are developed based on the nature and type of product/ service.</li> <li>1.2 Carry out a market research following standard procedures</li> <li>1.3 Develop a marketing strategy based on the market research report Consumers are identified based on the type of product/ service</li> <li>1.4 <i>Marketing/ distribution channels</i> are established based on the marketing plan, resources available and location of the consumers</li> </ul>
	<ul> <li>1.5 Marketing trends are established based on customer behaviour and business competitors (other entrepreneurs)</li> <li>1.6 <i>Advertisements</i> are prepared in accordance with the marketing strategy.</li> <li>1.7 <i>Pricing</i> is determined according to pricing methodologies and organizational pricing policies</li> </ul>
2. Market agrienterprise products/services	<ul> <li>2.1 Product/ service is launched in accordance with the national and/ or county policies and regulatory framework.</li> <li>2.2 Brand name (trademark) is developed in accordance with legal requirements</li> <li>2.3 Packaging is undertaken based on packaging specifications, size, type and form</li> <li>2.4 Labeling is carried out based on existing legal guidelines and company preferences</li> <li>2.5 Promotion is done according to the target customer and available resources</li> </ul>

		2.6 Distribution of the products is carried out according to the
		marketing strategy
3.	Respond customer	3.1 <i>Customer feedback</i> is conducted based on the type of
	feedback	customer and the customer feedback methodologies available
		3.2 Continuous improvement of the product/ services is done
		based on customer feedback
		3.3 Customer feedback is responded to in accordance with
		organizational customer care policies
4.	Complete marketing	4.1 Product penetration is established in accordance with the
	of agri-enterprise	marketing principles
	product/ service	4.2 Marketing activities and processes are documented based on
	F	good documentation procedures.
		4.3 Marketing report is prepared and shared with relevant
		personnel in accordance with organizational policies

This section provides work environments and conditions to which the performance criteria apply. It allows for different work environment and situations that will affect performance.

Variable	Range
Market research     may include but	<ul><li>Conducting studies</li><li>Surveys</li></ul>
not limited to	Rapid assessment
2. Marketing/	Farmer to trader
distribution	Trader to processor
channels may	Farmer to processor
include but not	Producer to consumer
limited to	Farmer to trader to processor to consumer
3. Customer	Comments from customers
feedback may	
include but not	
limited to	
4. Product	A measure of the amount of consumption or adoption of
penetration may	a product/ service compared to the total market
include but not	
limited to	

# REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

### Required skills

The individual needs to demonstrate the following skills:

- Marketing
- Selling
- Communication
- Negotiation
- Leadership
- Management
- Problem solving
- Networking
- Analytical
- Entrepreneurial
- Entrepreneurial

# Required knowledge

The individual needs to demonstrate knowledge of:

- Basic research methods
- Market feasibility
- Market research
- Marketing/ distribution channels
- Market penetration
- Market mix (8 P's)
- Product development
- Branding
- Labelling
- Promotion
- Business competitors
- Customer care
- Analytical tools
- Organizational policies and standard operating procedures

### **EVIDENCE GUIDE**

1. Critical Aspects of	Assessment requires evidence that the candidate:
Competency	1.1 Carried out a marketing research according to standard
	procedures
	1.2 Distributed products to target customers according to the
	marketing strategy

	1.3 Feedback from customers received, analyzed and responded to
	in accordance with the organizational customer care policies
	1.4 Prepare a marketing report and shared with relevant personnel
	in accordance with organizational policies
2. Resource Implications	The following resources must be provided:
	2.1 Agri-products/ services
	2.2 Assessment location
3. Methods of	Competency may be assessed through:
Assessment	3.1 Written tests
	3.2 Oral questioning
4. Context of Assessment	Competency may be assessed:
	4.1 On the job
	4.2 Off the job
	4.3 During industrial attachment
5. Guidance information	Holistic assessment with other units relevant to the industry sector,
for assessment	workplace and job roles is recommended

### MANAGE AGRI-ENTERPRISE

UNIT CODE: AGR/OS/AP/CR/04/5/A

# **UNIT DESCRIPTION**

This unit specifies the competencies required to manage an agri-enterprise. It involves preparing to manage agri-enterprise, managing the agri-enterprise, evaluating management of agri-enterprise and completing management of agri enterprise.

ELEMENT	PERFORMANCE CRITERIA
These describe the key	These are assessable statements which specify the required level
outcomes which make up	of performance for each of the elements.
workplace function.	Bold and italicized terms are elaborated in the range.
1. Prepare to	1.1 Agri-enterprise management <i>policies and procedures</i> are
manage agri-	developed according to good management practices.
enterprise	1.2 Management tools and strategies are developed in accordance
	to the products and services
	1.3 Agro-enterprise business plan is developed according to the
	business management principles
	1.4 Resources required are identified based on the business plan.
	1.5 Sources of resources are determined in accordance to the size
	and type of the enterprise
	1.6 Sources of <i>risks</i> are identified according to risk assessment
	schedules
2. Manage agri-	2.1 Production processes are managed as per the organizational
enterprise	policies and procedures.
	2.2 <i>Human resources</i> are managed according to the human
	resources management manual.
	2.3 Financial resources are managed according to the good
	financial management practices and organizational guidelines
	2.4 <i>Enterprise</i> risks manage according to risk assessment
	schedules
	2.5 <i>Records</i> maintained according to the enterprise operations
	2.6 Marketing processes are managed according to the nature and
	form of the products and services.
	2.7 Customer relations are managed according to customers
	profile and level of satisfaction

	2.8 <i>Innovation</i> processes are managed according to new and
	emerging technologies and business needs.
3. Evaluate	3.1 Monitoring and Evaluation is undertaken according to the
management of	strategic plan and standard of practices (SOP).
agri-enterprise	3.2 Customers satisfaction survey is conducted according to
	research principles
	3.3 Technical and operational gaps are detected, reported and
	rectified according to the farm policy.
4. Complete	4.1 Management report is prepared based on standard of practice
management of	and farm procedures.
agri enterprise	4.2 Management report is shared with relevant personnel in
	accordance with enterprise policies and practices
	4.3 Sustainable strategies are identified according to the nature of
	the enterprise

This section provides work environments and conditions to which the performance criteria apply. It allows for different work environment and situations that will affect performance.

Variable	Range
Policies may include but not limited to	<ul> <li>Formulated or adopted organizational principles</li> <li>Rules</li> <li>Guidelines</li> </ul>
2. Risks may include but not limited to	<ul> <li>Threat of damage</li> <li>Injury</li> <li>Liability</li> <li>Loss or any other negative occurrence</li> </ul>
3. Records may include but not limited	<ul> <li>Litigation</li> <li>Employee management</li> <li>Customer engagements</li> <li>Purchases</li> <li>Sales</li> <li>Contract</li> </ul>
Innovation may include but not limited to	<ul><li>Value capture</li><li>Value creation</li></ul>

# REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

### Required skills

The individual needs to demonstrate the following skills:

- Analytical
- Entrepreneurial
- Marketing
- Selling
- Communication
- Negotiation.
- Management
- Problem solving
- Networking

## Required knowledge

The individual needs to demonstrate knowledge of:

- Research methods
- Business planning
- Risk management
- Resource mobilization
- Strategy development
- Policy formulation
- Human resource development and management
- Team work and conflict management
- Financial and asset management
- Record keeping
- Marketing
- Customers satisfaction
- Business ethics, values and principles
- Partnership building
- Sustainable mechanisms
- Coordination
- Resource mobilization
- Time management
- Delegation of duties

### **EVIDENCE GUIDE**

1. Critical Aspects of	Assessment requires evidence that the candidate:
Competency	1.1 Developed and documented agri-enterprise management
	policies and procedures
	1.2 Developed agro-enterprise business plan according to the
	business management principles
	1.3 Managed Agri-enterprise processes (production, human,
	financial, customers, record, risks) according to laid down
	policies and procedures
2. Resource Implications	The following resources must be provided:
	2.1 Assessment location
	2.2 Agri-products/ services
3. Methods of	Competency may be assessed through:
Assessment	3.1 Written tests
	3.2 Oral questioning
	3.3 Third party report
4. Context of Assessment	Competency may be assessed:
	4.1 On the job
	4.2 Off the job
	4.3 During industrial attachment
5. Guidance information	Holistic assessment with other units relevant to the industry sector,
for assessment	workplace and job roles is recommended.

## APPLY ICT IN AGRI-ENTERPRISE

UNIT CODE: AGR/OS/AP/CR/05/5/A

### **UNIT DESCRIPTION**

This unit specifies the competencies required to apply ICT in agri-enterprise. It involves preparing to integrate ICT in agri-enterprise, integrating ICT into agri-enterprise processes, evaluating agri-enterprise ICT integration and completing integrating ICT into agri-enterprise.

ELEMENT	PERFORMANCE CRITERIA
These describe the key	These are assessable statements which specify the required level
outcomes which make up	of performance for each of the elements.
workplace function.	Bold and italicized terms are elaborated in the range.
1. Prepare to integrate	1.1 ICT needs for agri-enterprise are identified based on the ICT
ICT in agri-enterprise	needs assessment report.
processes	1.2 ICT tools are developed in accordance with standard operation
	procedures and type of enterprise.
	1.3 ICT infrastructure is acquired and installed in accordance with
	the ICT plan
	1.4 ICT plan for agri-enterprise is developed according to the
	organizational goals, policies and procedures
2. Integrate ICT into	2.1 ICT is integrated into the production process of agri-enterprise
agri-enterprise	in accordance with enterprise policy and procedures
processes	2.2 Agri-enterprise records are managed using ICT in accordance
	with enterprise policies and procedures
	2.3 Agri-enterprise communication is carried out using ICT in
	accordance with enterprise policies and procedures
	2.4 <i>Innovation process</i> is integrated with ICT in accordance with
	enterprise policies and procedures
	2.5 Agri-enterprise <i>marketing process</i> is integrated with ICT in
	accordance with enterprise policies and procedures
	2.6 Human Resources Management (HRM) process was
	integrated with ICT in accordance with enterprise policies and
	procedures
	2.7 Agri-enterprise financial system is integrated with ICT in
	accordance with enterprise policies and procedures
3. Evaluate agri-	3.1 Effectiveness of ICT integration into agri-enterprise is assessed
enterprise ICT	based on the enterprise ICT plan
integration	

	3.2 Efficiency of ICT integration into agri-enterprise is assessed
	based on enterprise ICT plan
	3.3 Agri-enterprise innovativeness is assessed based on enterprise
	ICT plan
	3.4 3.4 Monitoring and Evaluation of ICT process is undertaken in
	accordance with the ICT Plan.
4. Complete integrating	4.1 ICT is used in critical processes of Agri-enterprise financial
ICT into agri-	report is prepared according to organizational policies,
enterprise processes	procedures and ICT plan
	4.2 Agri-enterprise ICT report is prepared and shared with
	relevant stakeholders in accordance with enterprises policies
	and procedures

This section provides work environments and conditions to which the performance criteria apply. It allows for different work environment and situations that will affect performance.

Variable	Range
Enterprise may include but not limited to	<ul><li>Business entity</li><li>Services to customers</li><li>Profit</li></ul>
Marketing     process may     include but not     limited to      Innovation	<ul> <li>Viable and potential marketing opportunities</li> <li>Marketing strategies</li> <li>Supervising the implementation of these marketing strategies.</li> <li>Business idea</li> </ul>
process may include but not limited to	Product development
Agri-enterprise communication may include but not limited to	<ul> <li>Information sharing</li> <li>Sharing information by a company to promote its product or services to potential consumers.</li> </ul>
5. Agri-enterprise records may include but not limited to	<ul> <li>Meeting minutes</li> <li>Memoranda</li> <li>Employment contracts,</li> <li>Accounting documents</li> </ul>

- 6. Human Resources (HR) process may include but not limited to
- Recruitment
- Staffing
- Compensation and benefits
- Training and development
- Career development
- Talent management
- Leadership development
- HR checks and balances

### REQUIRED SKILLS AND KNOWLEDGE

This section describes the skills and knowledge required for this unit of competency.

# Required skills

The individual needs to demonstrate the following skills:

- Marketing
- Selling
- Management
- Planning
- Problem solving
- Networking
- Analytical
- Entrepreneurial
- Communication

### Required knowledge

The individual needs to demonstrate knowledge of:

- Needs assessment tools
- Development of policies and procedures
- Basic principles of applied ICT
- Usage of computers
- Usage of mobile phones
- Usage of mobile phone applications
- Use of internet
- Basic principles of monitoring and evaluation
- Communication
- Entrepreneurship
- Innovation process
- Marketing principles
- Human Resources principles

- Enterprise development
- Basic financial principles
- Basic management
- Policies and procedures

# **EVIDENCE GUIDE**

1 0 11 1 4	
1. Critical Aspects of	Assessment requires evidence that the candidate:
Competency	1.1 Conducted a needs assessment for ICT applications in the agri-
	enterprise according to business plan
	1.2 Integrated ICT applications into the agri-enterprise critical
	processes
	1.3 Evaluated the effectiveness and efficiency of applying ICT to
	the enterprise in accordance with the enterprise business plan
2. Resource Implications	The following resources must be provided:
	2.1 Agri-products/ services
	2.2 Assessment location
3. Methods of	Competency may be assessed through:
Assessment	3.1 Observation
	3.2 Written tests
	3.3 Third party report
4. Context of Assessment	Competency may be assessed:
	4.1 On the job
	4.2 Off the job
	4.3 During industrial attachment
5. Guidance information	Holistic assessment with other units relevant to the industry
for assessment	subsector, workplace and job roles is recommended.