

ASSESSMENT GUIDE

FOR

ASSESSORS & FACILITATORS

Enterprise Selection, Planning and Establishment

Level 5

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Title:		Plan a Farm and Select a Site Optimise and Integrate Various Farming Systems and Trends within Related Enterprises					
Applied Title:		Plan a Citrus Farm and Select a Site Optimise and Integrate Various Farming Systems and Trends within Citrus Production Enterprise					
Field:		Agriculture and Nature Conservation					
Sub-Field:		Primary Agriculture					
SETA (SGB):		AgriSETA					
Skills Area:		Enterprise Selection and Planning					
Context:		Citrus Production					
US No:	116324 116337	Level:	5	Credits:	9 11	Notional Hours:	90 110
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Based on the Production Guidelines of:



Supported by:



Unit standard alignment and assessment tool development:

Cabeton Training and Development

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Directions

Please Note: There is a separate assessment guide for the learner. The learner must use this guide to prepare himself / herself for the assessment.

This assessment guide contains all necessary activities and instructions that will enable the assessor and learner to gather evidence of the learner's competence as required by the unit standard. This guide was designed to be used by a trained and accredited assessor who is registered to assess this specific unit standard as per the requirements of the AgriSETA ETQA.

Prior to the delivery of the program the facilitator and assessor must familiarise themselves with content of this guide, as well as the content of the assessment guide for learners.

The assessor, facilitator and learner must plan the assessment process together, in order to offer the learner the maximum support, and the opportunity to reflect competence.

The policies and procedures that are applicable during the execution of this assessment are available on the website of the Citrus Academy, contained in a document named Policies and Procedures for Assessment, and must be strictly adhered to. The assessor must familiarise himself with this document before proceeding.

This guide provides step-by-step instructions for the assessment process of:

US No:	116324 & 116337	Level:	5	Credits:	9+11 (20)
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The step-by-step instructions agree and are conducted in concert with the steps described in the learner assessment guide. The steps are as follows:

Step	Description	Timeframe
1	Learner Assessment Contract	Before delivery of program
2	Learner Declaration of Authenticity	Before delivery of program
3	Diagnostic Assessment of Learning Assumed to be in Place	Before delivery of program
4	Assessment Plan for Gathering of Evidence	Before delivery of program
5	Learner Formative Assessment Activities	During delivery of program, assessment after delivery of program
6	Learner Summative Assessment	After delivery of program
7	Integrated Summative Assessment Tool	After delivery of program
8	Re-assessment Procedures	After completion of assessment
9	Documentation	After completion of assessment
10	Administration and Completion of Portfolio of Evidence	After completion of assessment

Step 1

Pre-Assessment Briefing and Checklist

A pre-assessment briefing for learners is held before the delivery of the program. Use the checklist below to ensure that all these points are addressed and discussed with the learners.

Pre-Assessment Briefing Checklist		
	√	X
Organise resources – people, equipment, venue, etc.		
Explain the purpose of the assessment		
Discuss the standards or criteria to be used		
Discuss assessment roles and accountabilities		
Decide on assessment venues		
Negotiate evidence required, and where or how this evidence may be gathered		
Explain the methods of assessment that will be used during the gathering and summing up of evidence		
Negotiate the date of submission for the activity workbook and the date for the summative assessment		
Discuss resources required for the assessment e.g. equipment, materials, etc.		
Explain the procedure if the learner is found to be not yet competent		
Explain the appeal and review procedures		
Identify any potential learning barriers and negotiate strategies to overcome these		
Complete and sign the assessment plan with the learner		

The learner and assessors must sign the **Learner Contract** in the learner assessment guide.

Step 2

Learner Declaration of Authenticity

The learner is requested to complete and sign the Declaration of Authenticity in the learner assessment guide. This should be checked and co-signed by the assessor.

The format is as reflected in the learner assessment guide.



Step 3

Diagnostic Assessment of Learning Assumed to be in Place

In the learner assessment guide, the learner is asked to indicate whether they have completed the learning assumed to be in place as prescribed by the unit standard.

The assessor must guide the learners through this step, explaining in detail the content of the mentioned learning areas, because names of learning programs do not always agree with the names of the unit standards, and learners might indicate the incorrect information.

If learners indicate that they have not yet completed the mentioned unit standards, the assessor should prescribe an action plan to allow the learner to obtain the skills required by recommending additional training, competence portfolios, or the relevant RPL assessment for the given unit standards.

The format is as reflected in the assessment guide for learners. Please read it and familiarise yourself with its content.



Step 4

Assessment Plan for Gathering of Evidence

A pro-forma assessment plan for this unit standard has been drafted in the learner assessment guide. Explain the plan to the learner and complete the dates and signatures as indicated.

The format for the assessment plan is as reflected in the assessment guide for learners. Please read it and familiarise yourself with its content. Make a note of the dates agreed upon in the table provided below.

Learner and Assessor Assessment Plan		
Unit Standard	Evaluate, adjust and implement factors influencing agricultural enterprises. Implement integrated farm layout and site selection	
Registration Number	116324 and 116337	
Step	Description	Completion / Submission Date
Step 5	Learner Formative Assessment Activities	
Step 6	Summative Assessment	
Step 7	Integrated Summative Assessment	
Step 8	Re-Assessment Procedures	
Step 9	Documentation	
Step 10	Administration and Completion of Portfolio of Evidence	

Step 5

Learner Formative Assessment Activities

The learner assessment guide contains comprehensive activities and worksheets that the learner must complete during the delivery of the learning program. It is imperative that these activities be completed as part of the learning process in order to give the learner the opportunity to develop the skills, knowledge and attitudes that are required for competence.

Learners must complete all the activities in the workbook.

Learners must be encouraged to take control of their learning by indicating areas in the workbook where they experience difficulty.

The learner hands in the learner assessment guide to the assessor or the facilitator, only if the facilitator is a subject matter expert, for the assessment of the formative assessment activities. The assessment of these activities must be done according to the prescribed benchmarks and according to the following marking matrix.

The learner should not move on to the next step before this step has been completed and learners show sufficient capacity and readiness for summative assessment. If problems areas are identified, the learner should be guided with a developmental action plan, which is documented separately and signed by the learner, the facilitator and the assessor.

Model answers are provided below in bold script.

Activity 1 – Case Study
Answer the questions below based on your workplace.
What are the questions that should be answered when one considers a new citrus planting or the establishment of a new citrus farm?
• Is there enough water available to farm commercially with citrus? • What types and varieties are best suited to the prevailing climatic conditions? • What types and varieties are best suited to the soil and water quality? • Which varieties of citrus does the market require? • Given the conditions, what yield can be expected and what is the estimated production cost? Will the farm be profitable? • What infrastructure is required on the farm? • What infrastructure is required in the area around the farm? • What will the environmental impact be of on-farm infrastructure and what factors must be taken into account when deciding on farm layout? • Are there any environmental or conservation issues that are prohibitive or that will require special attention? • How do we construct the infrastructure that we need?
Do research in your workplace and find answers to the questions above, based on a hypothetical new planting.
No model answer provided due to workplace variation. Observe all requirements, assess reasonability and completeness.
Develop a case study, based on the information above, according to the five land-use planning actions.

No model answer provided, dependent on previous answer. Observe all requirements, assess reasonability and completeness.

Answer should be structured in the following five steps:

- **Establish goals and baselines**
- **Determine land suitability**
- **Establish priorities and alternatives**
- **Develop a land-use plan**
- **Inventory and organise resources**

Swap your case study with another learner's. Comment on how the land use in their case study can be optimised. Attach a copy of this case study to your workbook.

No model answer provided, dependent on previous answer. Observe all requirements, assess reasonability and completeness.

Activity 2 – Interview an Expert

Contact an expert in the field of enterprise development and find out if there what new technology is available that can assist in land use planning, based on the case study above. Summarise the information you gather below.

No model answer provided, dependent on circumstances. May include new land survey equipment, analysis techniques, GPS, thermal imaging / surveying, etc. Observe all requirements, assess reasonability and completeness.

Details of Interviewee	
Name and surname:	
Date of interview:	
Signature of interviewee:	

Activity 3 – Workplace Research and Report

Conduct research for the site where your workplace is located and report your findings below.

No model answer provided due to workplace variation. Observe all requirements, assess reasonability and completeness.

Identify the biome in which your workplace is located and identify five species of natural-occurring fauna and five species of naturally-occurring flora.

Biome:

Fauna Species	Flora Species

Identify the major characteristics of the water sources available in your workplace. Discuss the impact that these characteristics may have on the quality of the water. Comment on how negative impacts can be mitigated through management practices.

Conduct research on the natural soil types that occur in the area. Discuss which production practices are being employed to optimise soil quality and usage. Comment on the negative impacts that these practices may have had on soil quality.

Conduct research into historical regional weather patterns. Attach the data you gather to your workbook. Assess and comment on whether climate change has had a marked impact on the local weather patterns.

Discuss how production practices will have to be adjusted to compensate for climate change.

Activity 4 – Research and Report

Go to the website of the Water Research Commission (www.wrc.co.za) and find information on the use of rainwater harvesting in agriculture. Summarise the information you gather below and discuss whether rainwater harvesting can be applied on your farm.

No complete model answer provided, depends on research reports used. Observe all requirements, assess reasonability and completeness.

Activity 5 – Workplace Research

Get hold of a map of the farm where you work. Complete the tasks below and attach the map to your workbook.

- Mark on the map structures that have been built for soil conservation, rainwater harvesting and water runoff management.
- Make notes below on the placement and number of such structures.
- Discuss and mark other sites where it would be appropriate to place structures for soil conservation and water runoff management.
- Using the information you gathered during activity 4, make recommendations for the placement of rainwater harvesting structures and additional infrastructure (such as pipelines) that may be required to make use of rainwater harvesting as an alternative water source for citrus production. Mark these items on the map and discuss your recommendations in detail below.

No model answer provided due to workplace variation. Observe all requirements, assess reasonability and completeness.

Activity 6 – Workplace Research

Complete the tasks below.

What factors must be taken into account when deciding where accommodation structures should be established on a farm? Shortly discuss the influence of each factor.

Factor	Impact
Size and number of structures required	There must be enough space available in the area and the topography must allow for the construction of the required number of structures.
Waterways	Accommodation structures should never be built on a flood plain or below the 30-year flood line.
Access and roads	Accommodation structures must be easily accessible from permanent infrastructure such as roads. Farm roads to accommodation structures must not run past or through orchards.
Water and electricity availability	Structures must be placed where the cost of reticulation will not be prohibitive, i.e. near enough the existing network.
Security	Locations where dwelling are constructed must be secure.
Pollution	Structures must be placed so that the impact on the environment will be minimised and so that waste (sewerage and household refuse) can be disposed of without contaminating soil or water sources.

Regulatory requirements	According to sectoral determination 13 of the Basic Conditions of Employment Act which applies to farm workers, worker housing on farms should comply with the following requirements: • The house has a roof that is durable and waterproof • The house has glass windows that can be opened • Electricity is available inside the house if the infrastructure exists on the farm; • Safe water is available inside the house or in close proximity, which is not more than 100m from the house • A flush toilet or pit latrine is available in, or in close proximity to the house; and • The house is not less than 30 square meters in size.
Investigate the placement of accommodation structures on your farm and mark the locations on the map that you used in the previous activity. Discuss the placement of these structures, commenting specifically on whether their placement is optimal, judging by the factors you listed above.	
No model answer provided due to workplace variation. Observe all requirements, assess reasonability and completeness.	
Make recommendations on if and why accommodation structures should be relocated on your farm, taking into account the resources and infrastructure that will be required for the relocation.	
No model answer provided due to workplace variation. Observe all requirements, assess reasonability and completeness.	

Activity 7 – Presentation
Select one of the acts or regulations that apply to the establishment of infrastructure on a farm. Study the legislation and prepare a 10 minute presentation that can be used to inform the directors / owners of your farm of the relevant stipulations. Present this to the class and attach a copy to your workbook. Make keynotes below on the comments made on your presentation, and on the presentations of other learners.
No model answer provided, depends on act / regulation used. Observe all requirements, assess reasonability and completeness. May include: • The National Environmental Management Act (NEMA) 107 of 1998 • The Environment Conservation Act 73 of 1989 • Conservation of Agricultural Resources Act (CARA) 43 of 1983 • The Occupational Health and Safety Act 85 of 1993

Activity 8 – Workplace Activity		
It is the year 2045. Answer the questions below.		
No model answer provided, depends on act / regulation used. Observe all requirements, assess reasonability and completeness.		
Does your farm still exist and is it still producing citrus?		
Looking back where we are now, what were the PEST factors that determined the sustainability and survival of the farming operation? List the factors, rate their importance out of 10 and motivate your rating.		
Factor	Rating (10)	Motivation
If you could go back in time from 2045, what would you have done differently to improve the sustainability of the farming enterprise and ensure its survival?		

In 2045, what is the prevailing biophysical and socio-economic environment in which the farm operates? Is it favourable or not?

Activity 9 – Workplace Interview

Interview the production or stores manager in your workplace and find out answers to the following questions.

No model answer provided due to workplace variation. Observe all requirements, assess reasonability and completeness.

How do we determine critical stock levels and who decides when to reorder items?

Do we have problems with stock losses, whether through theft or stock perishing before being used? If so, why is this and what can be done?

How do we assess new suppliers? Is there a written procedure that I can look at? If not, what criteria are used?

Details of Interviewee

Name and surname:

Date of interview:

Signature of interviewee:

Activity 10 – Workplace Report

Discuss the stock control and supplier / service provider identification procedures that are used on your farm. Discuss the shortcomings of the procedures and make recommendations for improvements.

No model answer provided due to workplace variation. Observe all requirements, assess reasonability and completeness.

Activity 11 – Workplace Research

Complete the tasks below, based on your workplace.

No model answer provided due to workplace variation and dependent on crops chosen. Observe all requirements, assess reasonability and completeness.

Pick a citrus cultivar that is produced on the farm where you work and complete the tables below.

Month	Cell Processes	Fruit and Flower Development	Production Processes					
			Fertilisation	Pest and Disease Control	Irrigation	Pruning	Harvesting	Packing

July								
August								
September								
October								
November								
December								
January								
February								
March								
April								
May								
June								

Production System	Inputs	Outcomes / Output	Start and End Week Number
Fertilisation			
Plant Protection			
Irrigation			
Pruning			
Harvesting			
Postharvest Handling			

Pick **another different crop** that is produced on the farm where you work and complete the tables below. If only citrus is produced on your farm, pick a crop and research the information below.

Month	Cell Processes	Fruit and Flower Development	Production Processes					
			Fertilisation	Pest and Disease Control	Irrigation	Pruning	Harvesting	Packing
July								
August								
September								
October								
November								
December								
January								
February								
March								

April								
May								
June								

Production System	Inputs	Outcomes / Output	Start and End Week Number
Fertilisation			
Plant Protection			
Irrigation			
Pruning			
Harvesting			
Postharvest Handling			

Develop a production calendar for the farm, combining the production requirements of the two crops. Use the weekly calendar below to make notes of the production tasks for that week. Using a different colour ink, add brief notes on the resources, stock, people and other inputs that are required. Use yet another colour ink to make notes on the calendar of when and what data must be recorded in production records.

Jan	Week 1	Week 2	Week 3	Week 4	Week 5
Feb	Week 6	Week 7	Week 8	Week 9	
Mar	Week 10	Week 11	Week 12	Week 13	
Apr	Week 14	Week 15	Week 16	Week 17	Week 18
Ma	Week 19	Week 20	Week 21	Week 22	
Jun	Week 23	Week 24	Week 25	Week 26	
Jul	Week 27	Week 28	Week 29	Week 30	Week 31
Aug	Week 32	Week 33	Week 34	Week 35	
Sep	Week 36	Week 37	Week 38	Week 39	
Oct	Week 40	Week 41	Week 42	Week 43	Week 44
Nov	Week 45	Week 46	Week 47	Week 48	

Dec	Week 49	Week 50	Week 51	Week 52
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Activity 12 – Research Report

Research the market requirements for the citrus type and other crop that you based activity 11 on. List the market requirements below, and discuss whether improvements can be made to the production system discussed above to better meet market expectations.

No model answer provided due to workplace variation and dependent on crop chosen. Observe all requirements, assess reasonability and completeness.

Activity 13 – Workplace Research

Select one of the citrus types produced in your workplace. Get the harvest records from the previous year and attached those to your workbook. Complete the tasks below.

No model answer provided due to workplace variation and dependent on crop chosen. Observe all requirements, assess reasonability and completeness.

Interview the manager at your workplace to determine the crop estimate for next season. Think carefully about the questions that you need to ask to make accurate crop estimate. Write down your questions below in preparation for the interview and summarise the responses you receive.

Details of Interviewee	
Name and surname:	
Date of interview:	
Signature of interviewee:	
What is the crop estimate for next season? Include expected volumes per orchard and expected picking time.	
Calculate the human resource requirements for picking this citrus type next season. Use the Lowveld picking time for the northern regions and the Western Cape picking time for the southern regions. Show your calculations clearly.	
Calculate the tools and equipment requirements for harvesting this citrus type. Indicate when these items must be available and when the mechanical equipment should be serviced to ensure that it is ready for picking time.	

Activity 14 – Presentation

Prepare a presentation that can be used to train the supervisors and picking team leaders on your farm on the topics below. You may combine and order these topics in any way you want. Look for existing resources to help you!

- The correct use, maintenance and cleaning of harvesting tools and equipment
- How to use a daily inspection checklist correctly
- The dos and don'ts of harvesting export citrus
- How to protect the health and safety of workers during harvesting

- How to protect the safety and quality of the fruit while harvesting
- What to do and look out for after the fruit has been harvested

Attach a copy of the presentation to your workbook. If time allows, you can do your presentation for the class. Make notes below on feedback that you receive and on the presentations of other learners.

Presentation should include following points:

- Use daily inspection checklist as per workplace procedures
- Check pickers nails, no jewellery, and personal hygiene (ensure hand washing, etc.)
- Clippers are used to pick export citrus
- Do not snap pick export citrus
- Clippers must be oiled and cleaned after each day (depending on workplace procedures)
- In some cases (for some citrus types) a glove is worn on the hand touching the fruit
- Picking bags is carried so that it hangs on the same side of the body as the hand touching the fruit
- Picking bags must not be torn or have broken straps
- If a picking bag is torn it must be fixed with thread and not wire
- Do not continue to use glove or picking bag that is wet, dirty or torn
- Do not leave long stems on fruit that can injure other fruit
- Do not cut stem skew so that it makes a sharp point
- Do not pick up any fallen fruit – fruit on the ground, stays on the ground
- Do not pick low-hanging fruit
- Do not throw fruit into picking bag or into trailer or bin
- Fruit at ground level must be picked before ladders are used to pick fruit that cannot be reached from the ground
- Ladders must be leaned against the tree or, in case of three-legged ladders, securely placed under the tree
- Ladders must be sturdy and free of loose metal or wood pieces, splinters or burs
- Do not run with a picking bag that has fruit in it or bump it against ladder
- Bins and trailers must be empty, clean and dry before fruit is placed in it
- Do not overfill bins and trailers
- As per workplace procedures, allow fruit to stand in the shade to rest after being picked and before being transported to the packhouse
- Ensure that trailers are serviced and roads are scraped to ensure as smooth a ride as possible

Activity 15 – Workplace Research and Flowchart

Get hold of a copy of the Citrus Postharvest Series and watch module 2, on the citrus value chain. Alternatively, download the learner guide for this module from the website of the Citrus Academy. Now research the value chain for the most important target market for your farm. Draw a flowchart below, showing all the links in the chain. Next to each link, make notes on the following:

- Who are the service provider(s) / supplier(s) responsible for this link?
- What percentage of the eventual cost goes to this link? (Substantiate this calculation on the following page)
- How can the fruit quality be compromised in this link?
- What else can go wrong in this link?
- How much control do I, the grower, have over what happens to my fruit when it reaches this link?
- How can I get more control and manage the process better in this link?

No model answer provided due to workplace variation. Observe all requirements, assess reasonability and completeness.

Calculation of Cost Allocations:

Activity 16 – Case Study

You are asked to investigate the advisability of using a new packhouse that is being built in the area. How will you determine whether it will be beneficial to your farm to make use of the new packhouse? Make a list of the criteria that you will use and other steps that you will take.

(It may help you to watch module 15 of the Citrus Postharvest Series, and any other modules that may give you more insight into the process.)

Observe all requirements, assess reasonability and completeness. Answer may include reference to:

- **Packhouse planning (machinery, facilities, etc.)**
- **Packhouse systems, policies and procedures**
- **Packhouse capacity**
- **Packhouse ability to handle specific citrus types and cultivars**
- **Packhouse human resource management (recruitment and staff training policies, etc.)**
- **Experience and track record of packhouse owners / management**
- **Costing**
- **Logistics (distance, condition of roads, etc.)**



Marking Matrix and Assessor Report for Formative Assessment Activities
Formative Evidence Collection Summary for Unit Standard 116324 – Level 5

	<i>Action Required from Learner to Develop Competence</i>	<i>Competence Assessments</i>	<i>Standard for Activity</i>	<i>Allocation of Marks</i>	<i>Feedback to Learner and Comments on Evidence</i>
<i>Specific Outcome 1: Identify and use appropriate technology to determine sustainable farm layout and infrastructure placement</i> <i>Range:</i> Appropriate technology using a comprehensive approach may include but is not restricted to high and low technological applications	Attend classroom lesson, participate and ask questions	Activities in learner activity book were completed correctly	Activity answers must be at least 85% correct A signature + commentary from the supervisor / coach / mentor or facilitator in learner workbook	As per model answer sheet	
<i>Specific Outcome 2: Identify relevant service providers who can render specific services</i> <i>Range:</i> The service providers may include but are not limited to government and parastatal departments, laboratories, non-governmental organisations, etc.	Attend classroom lesson, participate and ask questions	Activities in learner activity book were completed correctly	Activity answers must be at least 85% correct A signature + commentary from the supervisor / coach / mentor or facilitator in learner workbook	As per model answer sheet	
<i>Specific Outcome 3: Research information relevant to the natural resources of a site</i> <i>Range:</i> The researched information includes but is not restricted to soil, plants, animals, water, energy, topography and applicable legislation	Attend classroom lesson, participate and ask questions	Activities in learner activity book were completed correctly	Activity answers must be at least 85% correct A signature + commentary from the supervisor / coach / mentor or facilitator in learner workbook	As per model answer sheet	
<i>Specific Outcome 4: Implement necessary conservation and</i>	Attend classroom lesson, participate and ask	Activities in learner activity book were	Activity answers must be at least 85%	As per model answer sheet	

Marking Matrix and Assessor Report for Formative Assessment Activities
Formative Evidence Collection Summary for Unit Standard 116324 – Level 5

	<i>Action Required from Learner to Develop Competence</i>	<i>Competence Assessments</i>	<i>Standard for Activity</i>	<i>Allocation of Marks</i>	<i>Feedback to Learner and Comments on Evidence</i>
natural resource management and harvesting practices <i>Range:</i> The land use options may refer to intensive and extensive crop and/or animal systems, as well as aqua-cultural and horticultural production systems	questions	completed correctly	correct A signature + commentary from the supervisor / coach / mentor or facilitator in learner Workbook		
<i>Specific Outcome 5: Apply the principles of sustainability in terms of the layout and infrastructure placement in an agricultural context</i> <i>Range:</i> Sustainability includes but is not restricted to the biophysical, social, economic and political factors involved	Attend classroom lesson, participate and ask questions	Activities in learner activity book were completed correctly	Activity answers must be at least 85% correct A signature + commentary from the supervisor / coach / mentor or facilitator in learner Workbook	As per model answer sheet	
US CCFO: Problem solving	Attends all lessons, activities, practical and completes activities and workbook as per instructions	Attendance register and facilitator report	Learner must at least be present and no negative commentary about the learner should be made in the facilitator report.	N/a	
US CCFO: Teamwork					
US CCFO: Self-organisation and management					
US CCFO: Information evaluation					
US CCFO: Communication					
US CCFO: Use science and technology					
US CCFO: Inter-relatedness of systems					
US CCFO: Self-development					

Marking Matrix and Assessor Report for Formative Assessment Activities
Formative Evidence Collection Summary for Unit Standard 116337 – Level 5

	<i>Action Required from Learner to Develop Competence</i>	<i>Competence Assessments</i>	<i>Standard for Activity</i>	<i>Allocation of Marks</i>	<i>Feedback to Learner and Comments on Evidence</i>
<i>Specific Outcome 1: Optimise and integrate the natural resources required for the relevant farming systems and enterprises</i> <i>Range:</i> Natural resources include but are not limited to soil, water, climate, vegetation, topography and other	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas	As per model answer sheet	
<i>Specific Outcome 2: Plan and optimise infrastructural requirements for the relevant enterprise system</i> <i>Range:</i> Infrastructural requirements include but are not limited to fencing, housing, and water supply, electricity, handling facilities, access and other	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.		As per model answer sheet	
<i>Specific Outcome 3: Optimise and maintain stock required for the relevant enterprises</i>	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas	As per model answer sheet	
<i>Specific Outcome 4: Innovate and plan production systems within relevant enterprises</i>	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas	As per model answer sheet	

Marking Matrix and Assessor Report for Formative Assessment Activities
Formative Evidence Collection Summary for Unit Standard 116337 – Level 5

	<i>Action Required from Learner to Develop Competence</i>	<i>Competence Assessments</i>	<i>Standard for Activity</i>	<i>Allocation of Marks</i>	<i>Feedback to Learner and Comments on Evidence</i>
Specific Outcome 5: Plan and maintain a harvest system within relevant farming systems and enterprises	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas	As per model answer sheet	
Specific Outcome 6: Plan and maintain postharvest systems within relevant farming enterprise	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas	As per model answer sheet	
US CCFO: Problem solving	Attends all lessons, activities, practical and completes activities and workbook as per instructions	Attendance register and facilitator report	Learner must at least be present and no negative commentary about the learner should be made in the facilitator report.	N/a	
US CCFO: Teamwork					
US CCFO: Self-organisation and management					
US CCFO: Information evaluation					
US CCFO: Communication					
US CCFO: Use science and technology					
US CCFO: Inter-relatedness of systems					
US CCFO: Self-development					

Assessment Guide – Assessor and Facilitator**Skills Area:** Enterprise Selection, Planning and Establishment**Level:** 5**Unit Standards:** 116324 & 116337

Assessment Feedback Form – Activity Workbook			
		Comments / Remarks	
Feedback to learner on assessment			
Feedback from learner to assessor			
Learner's Signature			Date:
Assessor's Signature			Date:



Step 6

Learner Research Report

Before the summative task is undertaken, the learner must be reminded of what is expected from him / her in terms of summative and reflexive competence. Read and explain to the learner this section in the learner assessment guide. The learner and assessor must sign off this section to acknowledge that this step was completed. The format is as reflected in the assessment guide for learners. Please read it and familiarise yourself with its content.

The exercise is aimed at allowing learners to think through the aspects of establishing and maintaining a commercial citrus production unit.

- Use the planning and questioning format below to help you collect evidence for foundational and embedded knowledge as prescribed by the outcomes of the unit standards.
- Provide learners with an example or advertisement (real estate) of a farm and use this example to complete the assessment. The example should be related to the local area which learners are familiar with.
- The goal is for learners to assess how suitable the farm is in all aspects, thus considering on-farm resources and location of the farm to for example packhouses, distribution points, market, and accessibility for vehicles.
- Provide the questions as listed to the learners as a guide.
- Ensure that you apply the exact same methodology for each learner in order to ensure that VACS principles are adhered to.
- The benchmark for learner competence is an 85% overall test score.
- Only a suitably qualified and registered assessor who is ALSO a subject matter expert in this specific field can mark this assessment tool for learner assessment.
- If no such a person can be found to assess the learner, then it is advised that a qualified assessor consults with the appropriate subject matter expert prior to the assessment in order to establish key points for competence and / or uses model answers as supplied by a subject matter expert to allocate marks. The subject matter expert should be consulted for any answers that the assessor might have queries on.
- Use a header in the following format for each test paper:

Unit Standard:	116324 and 116337	NQF Level:	5
Learner Name			

- The assessor should use the questions below as a marking matrix and to gather evidence and to check for completeness.

<i>Research and Reporting Points</i>	<i>The Research Is Complete and Relevant to the Point</i>	<i>Knowledge Is Applied to Commercial Citrus Farming in South Africa</i>	<i>Sound Conclusions are Drawn and / or Relevant Recommendations are Made</i>
The learner gave credit to research sources			5 points
The learner applied a sound reporting format			5 points
1. How do we identify, apply and use technology to facilitate a land use plan?	5 points	5 points	5 points
2. How do we optimise soil and water characteristics to maintain the production system?	5 points	5 points	5 points
3. How do we evaluate and integrate weather trends and data into the farming system?	5 points	5 points	5 points
4. How do we optimise and maintain processes according to vegetation potential?	5 points	5 points	5 points
5. How do we assess the flow patterns of water?	5 points	5 points	5 points
6. How do we accurately define and demarcate natural waterways and wetlands?	5 points	5 points	5 points
7. How do we accurately identify indigenous vegetation and the appropriate cultivation species?	5 points	5 points	5 points
8. What are the applicable laws relating to the use of land?	5 points	5 points	5 points
9. What processes are used to conserve soil?	5 points	5 points	5 points
10. What are the principles of rainwater harvesting?	5 points	5 points	5 points
11. How do we ensure that harvested water is used productively?	5 points	5 points	5 points
12. How do we survey and erect swales?	5 points	5 points	5 points
13. How do we plan and optimise infrastructure considering the function of the infrastructure?	5 points	5 points	5 points
14. How do we determine the required infrastructure?	5 points	5 points	5 points
15. What regulation and legislation must be evaluated when planning new infrastructure?	5 points	5 points	5 points
16. How does biophysical, social, economic and political factors relate to the sustainability farming practices?	5 points	5 points	5 points
17. How do we place infrastructure to avoid environmental degradation?	5 points	5 points	5 points
18. How do we identify stock deficiencies and rectify the matter to ensure optimum production?	5 points	5 points	5 points

<i>Research and Reporting Points</i>	<i>The Research Is Complete and Relevant to the Point</i>	<i>Knowledge Is Applied to Commercial Citrus Farming in South Africa</i>	<i>Sound Conclusions are Drawn and / or Relevant Recommendations are Made</i>
19. How do we ensure stock quality?	5 points	5 points	5 points
20. How is the relevant service providers identified?	5 points	5 points	5 points
21. How are and effective data base relating to suppliers established?	5 points	5 points	5 points
22. How do we integrate production cycle system into the enterprise?	5 points	5 points	5 points
23. How is observation reports used to plan productions systems?	5 points	5 points	5 points
24. How do we plan and maintain production records?	5 points	5 points	5 points
25. What influence does market information have on production systems?	5 points	5 points	5 points
26. How is harvest systems and practices planned and maintained?	5 points	5 points	5 points
27. How are good health and hygiene practices planned for and maintained during harvesting?	5 points	5 points	5 points
28. What quality standards regulate the quality of products that must be harvested?	5 points	5 points	5 points
29. How do we plan and maintain postharvest practices?	5 points	5 points	5 points
30. What health and hygiene regulations and legislation governs the harvesting process?	5 points	5 points	5 points

Step 7

Integrated Summative Assessment Tool

One assessment tool is provided in this step, being:

1. Attitudes and Attributes Assessment Tool

This assessment tool has been drafted in its entirety and follows below. It must be copied and completed for every learner in the same manner and according to the same procedure.

Learners must not be given these tools in preparation for summative assessment. This corresponding step in the Learner Assessment Guide is a direct reflection of these tools and is drafted in a format that is appropriate to the learner's level of language competence.

1. Attitudes and Attributes Assessment Tool

- Use this rating scale to judge the learner's CCFO competence according to the unit standard.
- The learner's entire performance and all the stages of learning, as well as all gathered evidence must be considered for this section.
- It is advised that the assessor consult with facilitators, mentors, coaches and supervisors in order to ensure that an objective rating is allocated.
- A rating between 1 and 5 should be given, as follows:

Rating	Description
1	No evidence can be found
2	The evidence found is weak and this is still a major development area for the learner
3	The evidence found meets the average expectation for a learner on this level
4	The evidence found is of a high quality and exceeds the average standard expected
5	The evidence found is outstanding and the learner attitudes and traits are very well developed

- Learner must be given constructive feedback on each rating.
- Ensure that you apply the exact same methodology for each learner in order to ensure that VACS principles are adhered to.
- The benchmark for learner competence in this tool is 3:5 in EVERY CCFO.

At the end of this step, an assessment feedback form is provided which must be completed and signed by the assessor, learner and moderator, where applicable.

Attitudes and Attributes Assessment Tool

Use the following rating table in this assessment:

Rating	Description
1	No evidence can be found
2	The evidence found is weak and this is still a major development area for the learner
3	The evidence found meets the average expectation for a learner on this level
4	The evidence found is of a high quality and exceeds the average standard expected
5	The evidence found is outstanding and the learner attitudes and traits are very well developed

CCFO Criteria	Rating
Identifying – The learner can identify problems and deficiencies correctly.	
Working in a Team – The learner is able to work well as member of a team.	
Organising – The learner works in an organised and systematic way whilst performing all tasks and tests.	
Communicating – The learner is able to communicate his or her knowledge orally and in writing, in a way that shows what knowledge he or she has gained.	
Demonstrating – The learner is able to show and perform the tasks required correctly.	
Contributing – The learner is able to link the knowledge, skills and attitudes that he or she has acquired in this module of learning to specific duties in their job or in the community where he or she lives.	
Science – Learner is able to utilise and use science and technology effectively	
Collecting – Learner can effectively gather information	



Assessment Feedback Form			
		Comments / Remarks	
Feedback to learner on assessment and / or overall recommendations and action plan for competence			
Feedback from learner to assessor			
Assessment Judgement	You have been found: ☐ Competent ☐ Not yet competent in this unit standard	Actions to follow: ☐ Assessor report to ETQA ☐ Learner results and attendance certification issued	
Learner's Signature		Date:	
Assessor's Signature		Date:	
Moderator's Signature		Date:	

Step 8

Re-Assessment Procedures

- Note that only outcomes on which the learner was found not yet competent must be re-assessed.
- The same procedures in steps 6 and 7 are repeated.
- The tool must be adapted at discretion of the assessor. Best practice is not to present the exact same format and questions if possible.
- Use your expertise and judgement to ensure that the method of re-assessment remains integrated and relevant to the expected outcomes.



Step 9

Documentation

The following documentation is addressed in this step:

1. Learner and assessor information reports;
2. Assessor report and summative evidence collection summary;
3. Learner assessment re-actionnaire;
4. Assessor's assessment review and improvement document;
5. Assessment appeal form

1. Learner and Assessor Information Forms

The learner information form is in the assessment guide for learners. The assessor information form follows. These forms must be completed for each individual learner and placed in the learner's portfolio of evidence.

2. Assessor Report and Summative Evidence Collection Summary

This report follows after the information report. Use it to summarise the findings during assessment. Please complete the copy of this report that is in the learner assessment guide.

3. Learner Assessment Re-Actionnaire

A pro-forma for the learner assessment re-actionnaire is included in the learner assessment guide. Ask the learner to complete this form and sign it.

4. Assessor's Assessment Review and Improvement Document

The assessor is expected to complete the assessor review of the assessment process, using the pro-forma document of which an example follows. Please complete the copy of the document in the learner assessment guide. This document must be discussed with the learner and any learner commentary should be recorded.

5. Assessment Appeal Form

The assessment appeal form is also provided in the learner assessment guide. Assist the learner to complete the document if necessary.

The learner must be requested to sign-off all reports and documents before they are placed in the portfolio of evidence.

Assessor Information Form			
Unit Standard	116324 and 116337		
Program Date(s)			
Surname			
First Name			
Company Name			
Job / Role Title			
Home Language			
Gender	Male	Female	
Race	African	Coloured	Indian/Asian White
Employment	Permanent	Non-permanent	
Disabled	Yes	No	
Date of Birth			
ID Number			
Contact Telephone Numbers			
Email Address			
Postal Address			

Assessor Report and Summative Evidence Collection Summary for Unit Standard 116324 – Level 5					
Description	Evidence Gathered		Benchmark	Competent / Not yet Competent	Feedback and Comments
	Foundational and Embedded Knowledge	Practical Skills, Underpinning Knowledge and Reflexive Competence			
Specific Outcome 1: Identify and use appropriate technology to determine sustainable farm layout and infrastructure placement <i>Range:</i> Appropriate technology using a comprehensive approach may include but is not restricted to high and low technological applications	Summative Research Report	CCFO Rating Scale	85% competence in all areas		
Specific Outcome 2: Identify relevant service providers who can render specific services <i>Range:</i> The service providers may include but are not limited to government and parastatal departments, laboratories, non-governmental organisations, etc.	Summative Research Report	CCFO Rating Scale	85% competence in all areas		
Specific Outcome 3: Research information relevant to the natural resources of a site <i>Range:</i> The researched information includes but is not restricted to soil, plants, animals, water, energy, topography and applicable legislation	Summative Research Report	CCFO Rating Scale	85% competence in all areas		

Assessor Report and Summative Evidence Collection Summary for Unit Standard 116324 – Level 5					
Description	Evidence Gathered		Benchmark	Competent / Not yet Competent	Feedback and Comments
	Foundational and Embedded Knowledge	Practical Skills, Underpinning Knowledge and Reflexive Competence			
Specific Outcome 4: Implement necessary conservation and natural resource management and harvesting practices <i>Range:</i> The land use options may refer to intensive and extensive crop and/or animal systems, as well as aqua-cultural and horticultural production systems	Summative Research Report	CCFO Rating Scale	85% competence in all areas		
Specific Outcome 5: Apply the principles of sustainability in terms of the layout and infrastructure placement in an agricultural context <i>Range:</i> Sustainability includes but is not restricted to the biophysical, social, economic and political factors involved	Summative Research Report	CCFO Rating Scale	85% competence in all areas		
Embedded Knowledge: The learner is able to demonstrate a basic knowledge of: 1. The laws and principles applicable in comprehensive land use 2. The inter-relationship between and the sustainable use of natural resources	Summative Research Report		Overall minimum test score of 85%		

Assessor Report and Summative Evidence Collection Summary for Unit Standard 116324 – Level 5					
Description	Evidence Gathered		Benchmark	Competent / Not yet Competent	Feedback and Comments
	Foundational and Embedded Knowledge	Practical Skills, Underpinning Knowledge and Reflexive Competence			
Unit Standard CCFOs: 1. Problem solving relates to all specific outcomes 2. Teamwork relates to specific outcome 1 3. Self-organisation and management relates to specific outcome 2 4. Information evaluation relates to specific outcomes 1 and 2 5. Communication relates to specific outcomes 1 and 2 6. Use science and technology relates to specific outcomes 1 and 2 7. Inter-relatedness of systems relates to specific outcomes 1 and 2 8. Self-development relates to specific outcomes 1 and 2	N/a	Rating Scale	Minimum rating of 3:5 in each criteria or overall average of 3:5		

Assessor Report and Summative Evidence Collection Summary for Unit Standard 116337 – Level 5					
Description	Evidence Gathered		Benchmark	Competent / Not yet Competent	Feedback and Comments
	Foundational and Embedded Knowledge	Practical Skills, Underpinning Knowledge and Reflexive Competence			
Specific Outcome 1: Optimise and integrate the natural resources required for the relevant farming systems and enterprises <i>Range:</i> Natural resources include but are not limited to soil, water, climate, vegetation, topography and other	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas		
Specific Outcome 2: Plan and optimise infrastructural requirements for the relevant enterprise system <i>Range:</i> Infrastructural requirements include but are not limited to fencing, housing, and water supply, electricity, handling facilities, access and other	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.			
Specific Outcome 3: Optimise and maintain stock required for the relevant enterprises	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas		
Specific Outcome 4: Innovate and plan production systems within relevant enterprises	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas		

Assessor Report and Summative Evidence Collection Summary for Unit Standard 116337 – Level 5					
Description	Evidence Gathered		Benchmark	Competent / Not yet Competent	Feedback and Comments
	Foundational and Embedded Knowledge	Practical Skills, Underpinning Knowledge and Reflexive Competence			
Specific Outcome 5: Plan and maintain a harvest system within relevant farming systems and enterprises	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas		
Specific Outcome 6: Plan and maintain postharvest systems within relevant farming enterprise	Attend all lectures Complete workbook as per instruction	Research report with recommendations. Observation checklist of attitudes and attributes.	85% competence in all areas		
Embedded Knowledge: The learner is able to demonstrate a basic knowledge of: 1. Role and function of soil and water samples, weather information, vegetation, infrastructure, breed characteristics, production cycles, records, markets, health and hygiene within production systems (agricultural enterprise as a whole) 2. Attributes, characteristics and properties of vegetation, infrastructure, weather, production cycles, markets within production processes 3. Observation of the effects of weather patterns, soil and water characteristics, market trends, breed and crop characteristics and performance, health	Attend all lectures Complete workbook as per instruction	Research report with recommendations.	Overall minimum test score of 85%		

Assessor Report and Summative Evidence Collection Summary for Unit Standard 116337 – Level 5					
Description	Evidence Gathered		Benchmark	Competent / Not yet Competent	Feedback and Comments
	Foundational and Embedded Knowledge	Practical Skills, Underpinning Knowledge and Reflexive Competence			
and hygiene condition, infrastructural conditions, vegetation quality and quantity influencing production systems e.g. impact of drought on enterprises 4. Purpose of vegetation, infrastructure, weather, production cycles, markets within production systems 5. Implications of ineffective practices on production systems 6. Production systems within marketing and global environment 7. Regulations and legislation related to production systems within a global environment e.g. imports/exports 8. Describing various production processes as an integral part of the production system 9. Purpose of this training to develop the planning and integration skills of the learner in various enterprises 10. Procedures, rules and principles are covered related to enterprises, systems and practices					

Assessor Report and Summative Evidence Collection Summary for Unit Standard 116337 – Level 5					
Description	Evidence Gathered		Benchmark	Competent / Not yet Competent	Feedback and Comments
	Foundational and Embedded Knowledge	Practical Skills, Underpinning Knowledge and Reflexive Competence			
Unit Standard CCFOs: 1. Problem solving relates to all specific outcomes. 2. Teamwork relates to all specific outcomes. 3. Self-organisation and management relates to all specific outcomes. 4. Information evaluation relates to all specific outcomes. 5. Communication relates to all specific outcomes. 6. Using science and technology relates to all specific outcomes. 7. Inter-relatedness of systems relates to all specific outcomes. 31. Self-development relates to all specific outcomes.	N/a	Rating Scale	Minimum rating of 3:5 in each criteria or overall average of 3:5		

Assessor's Assessment Review and Improvement Document	
Issues	Comments
Did the assessment go according to plan?	
Did anything unexpected happen?	
Were you pleased with the assessment decision; i.e. was it what you expected?	
How could the process have been carried out more efficiently?	
How could the process of assessing the knowledge be improved?	
How could the Performance Observation checklist be improved?	
Was the evidence you gathered sufficient to make a judgment of competence?	
Was the way you obtained feedback from the learner effective?	
Were you pleased with the way you communicated your decision to the learner? If not, how could this have been improved?	
How would you improve the assessment process?	

Any learner has the right of appeal against any not-yet-competent decision by the assessor. If the learner wishes to appeal, please assist him / her to complete the form below.

Appeal Form			
I hereby appeal against the outcome of my assessment.			
Date:			
Learner's Name:			
Assessors Name:			
Organisation:			
Assessment Details: Criteria, role, standards Used, etc.			
Issue to be Reviewed:			
Learner's Signature		Date:	
Assessor's Signature		Date:	

Step 10

Administration and Completion of Portfolio of Evidence

All the documents or copies thereof, as prescribed previously, must be kept on file as part of the learner portfolio of evidence.

Learner's portfolio of evidence must be readily available for internal and external moderation and verification by the appropriate practitioners, until after the verification process has taken place. The portfolio of evidence may then be kept or returned to the learner according to the service provider's policy.

The prescribed learner results form should be submitted to the ETQA or the National Learner Database as per the SETA procedure.

