Annex 5

Narrative Interim Report

The report must describe in detail how the project has progressed and the results achieved so far, and must describe how the project funds have been used for the planned activities. The total length should not exceed 15 pages.

BMZ Project number:	***6815***
Project country:	***South Africa***
Project title:	***Community-Based Adaptation to Climate Change (CBCCA) to build resilience***
Organisation:	***Mahlathini Development Foundation (MDF)***
Project duration:	***01.10.2022 bis 31.08.2025***
Period:	***January-April 2023***

1. General Information

The CbCCA project is based on working with Climate resilient Agriculture (CRA) learning groups of smallholder participants. These groups are set up a at village level across three provinces: KZN, EC and Limpopo. They work on an annual cyclical planning and review process for implementation of CRA practices (Field cropping, homestead food production and livestock management) – which are supported through training, mentoring and implementation support. The intention is to support both existing learning groups in the three provinces to deepen their implementation and to initiate new learning groups.

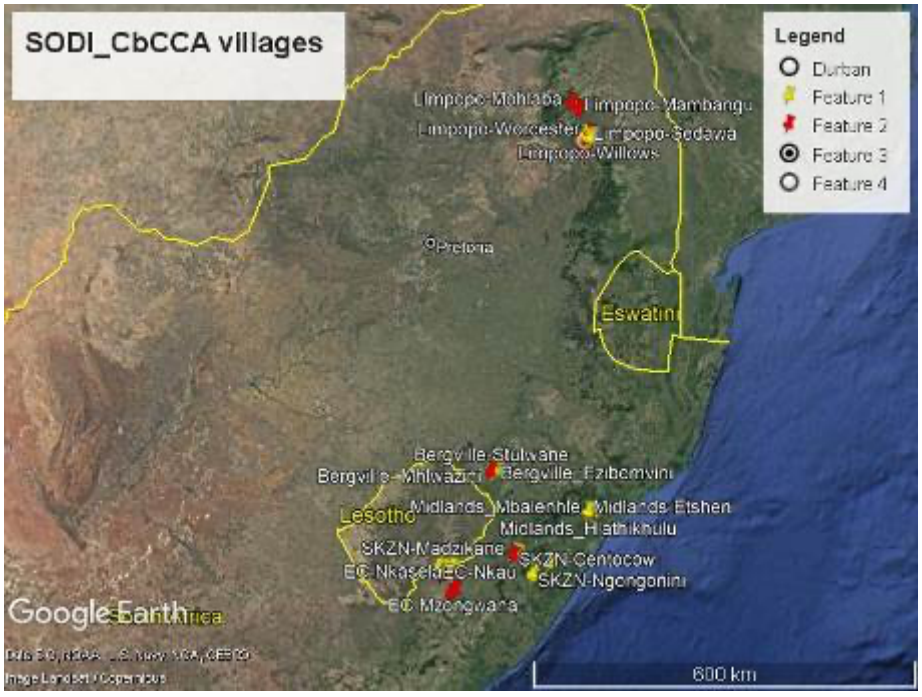


Figure 1: Map of SODI-CbCCA villages across EC, KZN and Limpopo

CRA learning group members also undertake a range of other associated activities according to their need, meaning that not all groups undertake the same activities:

- Setting up and running village savings and loan associations (VSLAs), with membership from the CRA learning groups and beyond, for savings and small loans for consumption smoothing and productive activities.
- Enterprise development and local marketing committees and groups, mostly to run the joint monthly produce markets in nearby towns, but also includes egg and broiler production and sales, livestock auctions and more formal market contracts.
- Water access and management through water committees linked to local governance structures, for planning and implementing integrated water management activities and
- Livestock committees, for development of conservation agreements for rangeland management and local livestock auctions.

The diagram below indicates the interactions with these local or micro level groups at the meso- level through clusters and platforms with multiple stakeholders and at the meso- and macro level through more formalized organizational forums and networks.

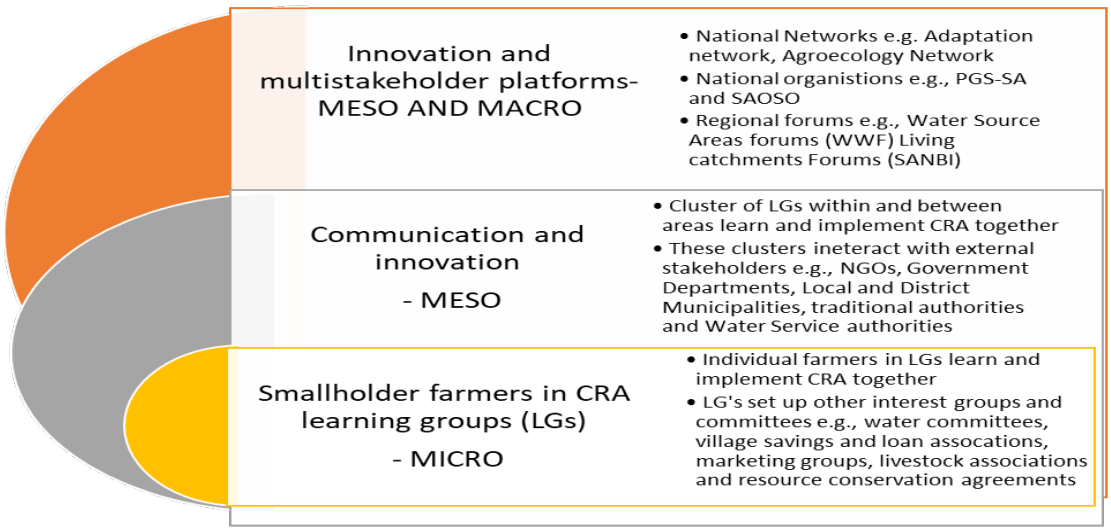


Figure 2: The micro-, meso- and macro-level interactions for the CbCCA programme and the Communities of Practice (COPs).

Quarterly project reports outline the trainings undertaken, field-based activities undertaken with the CRA learning groups and their progress related to economic empowerment (VSLAs, marketing etc.). information on activities related to the innovation and multistakeholder platforms is also to be included in summary form.

Integrated water and natural resources management activities are more discreet in nature and will be reported on as progress is made. This also applies to the development of evidence-based indicators and the monitoring and evaluation handbook development.

1.1. Project Description / Project Objectives

The COVID-19 pandemic, global economic downturns and internal political and economic instability have exacerbated the already significant negative impact of climate change on smallholder farmer communities in South Africa. Unemployment is very high (60-80%), with very low incomes primarily through social grants (around R2000/month per household of 4-5 members). Smallholders need to find ways to provide for a sustainable livelihood for themselves through farming and resource use in their villages. The climate resilient agriculture practices have been piloted and have been shown to significantly improve both livelihoods and social agency and now needs to be deepened and expanded.

The project objectives and outputs are summarized in the small table below.

Overall objective (impact)	**Communities have improved their livelihoods and their capacity to adapt to climate change and have strengthened their resilience climate change risks and shocks**	
Project outputs/objectives	O1	*Capacity is developed for creation of and strengthening institutional frameworks and mechanisms for including proven multi-benefit approaches that promote collective action and coherent Community based Climate Change Adaptation (CbCCA) implementation.*
	O2	*The farmer level decision support system for implementation of CRA is upscaled in eastern SA.*
	O3	*Appropriate frameworks for monitoring and evaluation of environmental benefits and agro-ecosystem resilience are developed at multiple scales*
	O4	*Improvement of water and natural resources management and governance through community ownership*

1.2. Source of Information

Each activity set within the project has a focused monitoring and evaluation process, to encompass the range of environmental, agricultural, economic and social indicators used for reporting. Monitoring forms include for example the CCA baselines, crop and garden monitoring, poultry production monitoring and fodder supplementation monitoring. Databases are collated for the monthly VSLA (village savings and loan associations) records and monthly market stall sales and incomes. Seasonal reviews for each learning group consists of focus group discussions and individual interviews. Resilience snapshots and participatory impact assessments provide more summative evaluative content.

In addition, the provincial field team leaders (Betty Maimela and Mazwi Dlamini) provide monthly reports on training and implementation undertaken with the CRA learning groups. Photographs are included in these summaries and attendance registers are available. All interns are expected to provide monthly field work reports (for SODI – Sphumelelo Mbhele) and reports for events, workshops and meetings are submitted.

Erna Kruger uses these reports and databases to compile the SODI quarterly reports for the organization. Financial reports re compiled jointly by Erna Kruger and Sarika Ramsewak.

2. Project Status

Overall Objective (Impact): Communities are empowered to adapt to climate change and their resilience is strengthened.

Project Objective (Outcome):	**Indicator**		
	Base value (quantitative & qualitative) *Equivalent to proposal*	Target value (Quantitative & qualitative) *Equivalent to proposal*	Achievements (quantitative & qualitative)
Smallholder families in 3 provinces in South Africa apply climate-adapted agricultural practices and diversify their income opportunities in order to stabilize food security in the long term.	As part of an MDF pilot project, 345 smallholder farmers have gained initial experience with local agricultural practices for climate change adaptation. There is currently no coherent regional or local system for climate-adapted agriculture by smallholder	2,625 beneficiaries of smallholder farming families and 75 stakeholders in 3 provinces are organized in Communities of Practice (CoP) and implement at least 3 practices for climate-adapted agriculture according to developed standards.	650 participants, of whom 130 are in new learning groups (3 250 beneficiaries)

	farmers. So far, 9 community-based village savings and loan associations have been established by MDF	18 villages are organized by the project in their own village savings groups	19 VSLAs of which 5 are new

Project Goals (Output)	**Indicators**		
	Base value (quantitative & qualitative) *Equivalent to proposal*	Target value (Quantitative & qualitative) *Equivalent to proposal*	Achievements (quantitative & qualitative)
1. Communities of Practice (CoP) are established at different levels and practices for climate-resilient agriculture are applied sustainably.	1.1 Learning groups (18) at local village level have gained initial experience with approaches to sustainable and climate-resilient agriculture. 1.2 Currently, smallholders are supported by 2 government organisations (ROs) and 2 non-governmental organisations (NGOs)	1.1 CoP at local and regional level are implemented and operational: - 27 CoP / Learning groups for climate-resilient agriculture are established at village level for community-based climate change adaptation (CbCCA) - 3 regional CoP with representatives from the local CoP are established in clusters as innovation platforms for exchange, planning and development - 3 regional multi-stakeholder platforms (ROs and NGOs) for strategy development, policy interactions, coherent planning and awareness raising are established 1.2 In the project regions, 6 ROs and 6 NGOs support smallholder farmers through learning and financing opportunities. From planning to implementation, they are involved in community-based adaptation to climate change activities.	-17 + 5 (new). Mahhehle(SKZN) and Sophaya and Madeira (Limpopo), eMadakaneni and eMahlathini (Bergville) 3 - uThukela catchment partnership - Adaptation network -PGS SA – Participatory guarantee system South Africa 3 -INR_Bergville: restoration work team of 9 youth -AWARD_Limpopo: Youth tala table network and transforming Giyani Programme (WRC) -UKZN-Centre for Water Resources Research (CWRR)-Community level resource management mapping and planning
2. A decision support tool that takes into account climate-resilient agricultural practices will be further developed and applied by smallholder farmers.	2.1 There are no specific criteria for the local assessment of climate-resilient production systems. 2.2 So far, there are no standardized and target group-oriented	2.1 Indicators for monitoring and evaluating the impact of specific agricultural practices for adaptation to climate change have been identified together with smallholder farmers. 2.2. A handbook has been developed and made available as a standard	

	approaches for climate-resilient agriculture for the project regions. 2.3 120 smallholder farmers have developed an understanding of how to use a decision support tool for climate-resilient farming practices	framework for use as "open source" for users at various levels (in digital and printed form). 2.3 A total of 300 smallholder farmers independently use the decision support tool for climate-resilient agricultural practices to implement community-based adaptation to climate change	130 smallholder farmers 9across 5 new learning groups
3. Community-based water management will be institutionalised and sustainably improved.	3.1 At municipal level, there are insufficiently functioning structures for sustainable water management. 3.2 Communities have only limited access to water	3.1. Six communities have been institutionalized and have a sustainable structure (e.g. Committee on Water Management) 3.2 Three community-based approaches to sustainable water management have been developed.	3 Work in Ezibomvini and Stulwane (Bgvl), and Ned (Matatiele) in progress 2 Vimbukhalo and Stulwane water committees in Bgvl active and developing

The table below provides a further summary of the project statues, outlining the CRA learning groups involved and broad activities within each group.

CbCCA -SA	2116ZA311		January-March 2023												
Province	Area	CRA LGs	No of paticipants	CCA w/s	CA	Towers	Tunnels	Gardens (seedlings)	Poultry	Layers	livestock integration	VSLAs	Market groups	Water committees	Livestock Associations
KZN	SKZN	Ngongonini	23		9	5	16		22	6					
		Centocow	23		2	10	10		10	1		1	1		
		Mariathal	18			6	15		15						
		Mahhehle	26		12	12	17		11	10		1	1		
	Midlands	Gobizembe	18		14	22	20	14	24	15			1		1
		Mayizekanye	22		20	27	14	16	12	8			1		
		Ozwathini	35		23	25	25	17	15	7	2	2	1		1
		Stulwane	28		29	5	11	8	5	6	3	2	1	1	1
		Ezibomvini	24		23	3	16	10	8	5	2	2	1	1	1
		Vimbukhalo	32		35		5		8	5	1	1		1	1
		Eqeleni	18		15	3	6	7	3	8	2	1	1		
		Emadakaneni	12		15		8				1	1			
		eMahlathini	7		7		4					1			
Limpopo	Mametja-Sekororo	Sedawa	34			7	14					1	1	1	
		Worcester	37			2	12					1			
		Willows	29				22					1			1
		Santeng	36			17	11					1			
		Turkey	51			2	15					1	1	1	1

		Sofaya	31				7	12	8						
		Madeira	36				8		7			1			
Eastern Cape	**Matatiele**	Ned	38	20			15	19	25				1	1	
		Nchodu	29	30			12	14	20						
		Mzongwana	22	18		20	10	9	7	7					
		Rashule	21	21		18	7	7	1	3		1			
		Nkau	22	22		14	11	13	5	4					
TOTALS			**650**		**204**	**184**	**293**	**124**	**201**	**81**	**11**	**19**	**11**	**6**	**7**
NEW			**130**		**22**	**12**	**30**	**107**	**15**	**11**		**5**	**5**		

NOTE: Funding support through WWF has been secured for the Bergville villages for Conservation Agriculture and water access implementation as well as from the Mazie Trust for conservation Agriculture in the Bergville and Midlands regions.

2.1. Explanations in the event of deviations from planning

No deviations at present.

2.2. Status of implementation

The table below is taken from the project agreement. A column has been included on the right in Table 1 below, outlining the quantities and activities involved for greater clarity.

Table 1: SODI high level work plan and budgeting per activity

SODI Work plan and Budgeting												
Measures & Activities	***2022***	***2023***				***2024***				***2025***		***Activitties and quantities***
1. Implementation of Communities of Practice (CoP)												
Introductory workshops for learning groups (LG) at village level in 3 provinces	*x*			*x*	*x*		*x*					*9X 1day intro meetings*
LG operation; Roles, responsibilities, visions and planning: Workshops for 9 LGs in 3 provinces.		*x*	*x*			*x*		*x*				*9x1 day visioning and action plans*
Training on capacity development for climate-resilient production systems			*x*	*x*		*x*	*x*	*x*	*x*			*3x1day training in CRA for 9 groups (R17 500/month)*
Cyclical implementation of the LG at village level: implementation and mentoring for climate-adapted agriculture for 27 learning groups at village level; development of local marketing initiatives (3) and local food security initiatives (creation of value chains, seed banks, etc.); Community-based management measures for natural resources		*x*	*x*	*x*	*x*	*x*	*x*	*x*	*x*	*x*		*27 Learning groups in total - 9 per province (3 new). (67 days@R200/day, thus 10days/ LF/month x 6-7LFs (R13 551/month)*
Entrepreneurial support for food security: village savings and loan associations as well as local marketing support and development		*x*	*x*	*x*	*x*	*x*	*x*	*x*	*x*	*x*	*x*	*Printing of savings books (Zulu, Pedi), 24 days@R200/day, thus 4days/LF/monthx6 LFs and/or paying for marketing costs (R7 968/month)*
Cyclical implementation of innovation platforms and multi-stakeholder networks; Implementation and capacity building for innovation (3) and multi-stakeholder platforms (3); Meetings and exchange visits				*x*				*x*			*x*	*x*	*1-2 events/year: farmers day, x visit, Multi stakeholder meeting, (R8 400/event)*
2. Development of an M&E toolbox and a manual												

Development of M&E tools and indicators			*x*		*x*		*x*		*x*				*Materials for M&E, Software for e surveys (R19 460/year)*
Development of the Handbook on Community-Based Adaptation to Climate Change										*x*	*x*	*x*	
Regular M&E of MDF together with smallholders		*x*		*x*		*x*		*x*		*x*	*x*	*x*	
Seasonal evaluation by learning groups at village level				*x*		*x*		*x*		*x*	*x*	*x*	*36 Resilience snapshots per year (min)*
Participatory assessments improved climate resilience for a selection of village-level learning groups				*x*		*x*		*x*		*x*	*x*	*x*	*3 PIA's per year (Min)*
3. Sustainable water management													
Establishment and implementation of institutional structures such as water management committees		*x*	*x*	*x*	*x*	*x*	*x*	*x*	*x*	*x*	*x*		
Development of three concepts for sustainable access to water				*x*				*x*		*x*	*x*	*x*	

Investment		***2022***	***2023***	***2024***
Amount per person				
Tunnels	***R5 463,00***	***5***	***35***	***30***
Poultry	***R2 021,00***	***10***	***45***	***45***
Seed (CA, veg) and poultry feed	***R1 815,00***	***10***	***45***	***45***

To further outline the activites, annual tragets and actuals have been outlined in Table 2. This table will be updated quartely.

Table 2: Targets and actuals for project activities

	Target	Actual	Target	Actual	Target	Actual	Target	Actual
	2022	2022	2023	2023	2024	2024	2025	2025
No CCA Intro w/s	2	2	5	Eqeleni, eMadakaneni (Bgvl), Sofaya, Madeira (Limpopo), Mzongwana (EC)	2			
No CCA Planning w/s	2	2	5	Eqeleni, eMadakaneni (Bgvl), Sofaya, Madeira (Limpopo), Mzongwana (EC	2			
Training days (demos)	6	10	12	17 (EC), 4 (Bgvl), 4 (SKZN), & (Limpopo): Tower gardens, mixed cropping, pest and disease control, trench beds, tunnel construction, VLSLA's value adding	12			
No of LGs	18	23	23	25	27		27	
No of participants - monitoring			108	60(CA) + 107 (gardens)	108		108	
Platforms (3 Ips, 3 Multi stakeholders)	2	2	6	1 lp, 3(SANBI, AN, WWF)	6		6	
Cross visits				-1: Community level (10 Midlands farmers to Bgvl for CA open day – March 23) -1: Organisational (12 Wagenegin/UFS students to Bgvl for Land dynamics course)				
No CCA prioritization planning sessions	2		8	3(Bgvl-Eqeleni, eMadakaneni, eMahlathini), 2 (Limpopo-Sofaya, Madeira),	8		18	
No CCA review sessions	2	12	8	-	8		18	
No CCA re-planning sessions	2	12	8	5(EC-Ned, Nchodu, Nkau, Rashule, Mzongwana), 2 (Midlands-Mayizekanye, Gobizembe)	8		18	
VSLAs (360 participants, 18 VSLAS)			18	19	18		18	
Water access scenarios (min 2)			1	3 (Vimbukhalo, Stulwnae, Ezibomvini)	1		1	
Livestock agreements (Min 3)			1	-	1		1	
Local facilitator days (6-9), total 114 days each			38	Noah Mhlongo:35 Isaac Malatji:17	38		38	

				Phumla Nyembezi:15				
Tunnels	5		35	40 – 30 in progress	30			
Poultry	10		45	15 broilers, 11 layers	45			
Seed (CA, veg), poultry feed	10		45	Seed – 107 Poultry feed - 26	45			

This information is further outlined according to the measures and activities, with dates and descriptions of activities provided in Table 3. Again, this table is to be updated quarterly.

CRA learning group summary

Province	Area	Villages	No of participants
KZN	Bergville	Ezibomvini, Stulwane, Vimbukahlo, Eqeleni, Emadakaneni, eMahlathini	121
	Midlands	Ozwathini, Gobizembe, Mayizekanye	75
	SKZN	Mahhehle,Mariathal, Centocow, Ngongonini	90
Limpopo	Sekororo-Lestitele	Sedawa, Turkey, Santeng, Worcester, Sophaya, Madeira, Willows	254
EC	Matatiele	Ned, Nchodu, Nkau, Rashule, Mzongwana	132
	5	**25**	**650**

Table 3: Description of measures and activites with dates and areas outlined: Oct-March 2023

Activity No	description	Date	Activity
1.2.1.	Establishing learning groups at village level	2022/11/25, 12/09 2022/11/15, 11/29, **2023/03/03** **2023/02/07, 02/14** **2023/02/09,02/16** **2023/01/18** **2023/03/27**	Limpopo: Sophaya **SKZN: Mahhehle -CCA workshop x 2 days, VSLA introduction workshop** **Bergville: Eqeleni** **EC: Ned, Nkau** **Limpopo: Madeira**
1.2.2.	Training and mentoring for climate resilient agriculture	2022/12/02 2022/10/26 2022/10/08-14 2022/11/23,24,29 **2022/02/10** **2022/02/27, 03/28** **2022/03/08, 03/17, 03/28** **2022/03/15** **2023/03/07,08** **2023/03/29,30** **2023/03/24,27,30**	Midlands: Ozwathini contouring workshop SKZN: Mahhehle – tower gardens EC-Matatiele: Drip irrigation workshops in 5 villages SKZN: CA demonstration workshops in 3 villages **SKZN: Plainhill Drip irrigation training** **Limpopo: Sofaya trench beds** **SKZN: Mahhehle tower gardens, poultry production, trench beds** **SKZN: Mariathal gardens and experimentation** **Bgvl: Madakaneni, Mahlathini – gardening training** **EC: Ned, Nchodu poultry production** **EC: Nec, Nchodu, Mzongwana- Pest and disease control**
1.2.3.	Cyclical implementation through mentoring for capacity development for LG at local level	2022/08/16,17,18,19,30 2022/10/16 2022/11/21-24 **2023/01/24-30**	CCA review and planning workshops -Bergville: CA review and planning (5) -Midlands: CA review and planning (3) -Limpopo: CCA review and planning (4) CCA prioritization of practices **-Matatiele: 5 villages (Ned, Nchodu, Rahsule, Nkau, Mzongwana**
1.2.4.	Income diversification and economic empowerment of local farmers (LG at local level)	2022/10/02,11/03, 12/04, **2023/02/02, 03/02** 2022/10/08, 11/07, 12/02 2022/11/05,06,07 **2022/12/13** **2023/01/27,02/07** **2023/01/26**	Market days: monthly farmers markets -Midlands: Bamshela (Ozwathini) -SKZN: Creighton (Centocow) - Bergville: Bergville town Market exploration workshops -Midlands: Mayizekanye, Gobizembe **-PGS follow-up w/s Limpopo** **-EC_Ned-Nchodu market day in Matatiele** **-SKZN: Mariathal** VSLAs VSLA introduction

		2023/02/14 **Jan-March 2023** **2023/03/15,16**	**-SKZN: Mahhehle** VSLA meetings and share outs **-Bergvile: 9** **-SKZN: Ngongonini (2), Centocow (2)** **-Midlands: Ozwathini (2)** **Limpopo: (7)** **Youth tala table value adding training**
1.2.5.	Implementation and capacity development for innovation (3) and multi-stakeholder platforms (3)	2022/11/18 2022/11/10 2022/12/01 **2023/02/23** **2023/02/28** **2023/03/08,09** **2023/03/89,29**	-SKZN: Centocow P&D control cross visit and learning workshop -uThukela water source forum: Visioning and action planning – Bergville -Adaptation Network AGM **-Regenerative Agric farmers' day in Bergville incl Asset research, uThukela Water Source Forum, uThukela Development Agency** **-Adaptation Network: CCA financing dialogue** **-SANBI_gender mainstreaming dialogue** **-WRC-ESS: Bglv Ezibomvini, Stulwane – resource management mapping and planning**
1.2.6.	Indicator development for evidence-based indicators, M&E and handbook development	**2023/01/30- 02/03** **2023/02/02** **2023/01/18** **2023/02/06-10** **2023/01/18** **2023/02/20**	**Limpopo: Focus Group discussions for VSLA and microfinance for the rural poor x 3 (Turkey, Worcester, Santeng)** Garden monitoring: **-SKZN: Plainhill, Spring Valley, Mariathal, Centocow** **-EC: 5 villages** **Bgvl:5 villages** CA monitoring **-EC:5 villages** **-KZN: Bergville -30, Midlands 15, SKZN 15**
1.2.7.	Implementation of sustainable water management	**2023/01/03-02/03** **2023/03/07**	**KZN: Bergville: Stulwane – Conflict man and upgrading sprint protection** **KZN BGVl: Vimbukhalo system repair, committee meetings**
1.2.10.	Organisational & capacity development	2022/11/17 2022/12/05 **2023/02/13** **2023/02/09, 02/16** **2023/03/06** **2023/03/13**	-MDF AGM and organisational capacity development workshop -Mentoring and planning with new finance officer to implement SODI financial reporting system **-Internal short learning event for rainfall and runoff results, as well as soil fertility and Organic carbon** **-Mentoring in CCA workshop implementation. Temakholo from Midlands assisted Bergville team** **-Team session on gender mainstreaming** **- UKZN- Ecological mapping and use of resource planning – Bgvl team**

Below short narrative summaries are provided for some of the activities undertaken.

1.2.1 CCA introduction and prioritization sessions

Mahhehle – SKZN, Sophaya- Limpopo, Eqeleni (Bgvl), Mzongwana,….-EC

Below brief summaries are provided of elements of these workshops.

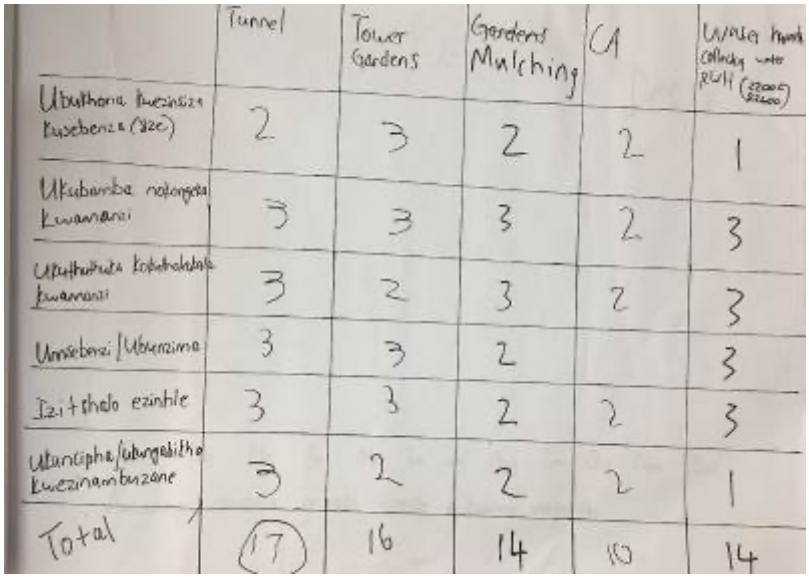
Figure 3: Wandile Mkhize's 919) tower garden in Mahhehle.

Mahhehle-SKZN

Participants here assessed some of their existing practices such as tower gardens against their adaptation capacity. Participants are already harvesting greens from their tower gardens planted towards the end of 2022.

Greens have been consumed and excess is given to relatives and friends, very little is sold and that is mainly as farmgate sales. Farmers mentioned that there is reduced pressure in sourcing water from rivers and springs as they can now use grey water with wood ash to water their tower gardens. This reduces hours spent in collecting water and allows for more time to tend to other activities such as weeding of CA and conventional tillage plots. For the elderly, tower gardens are much easier to work on. Wandile Mkhize (19); a young physically challenged participant is able to work in this garden. He has already been eating cabbages, spinach, beetroots and green peppers already with the rest of his family.

The group was then asked to think about reasons or factors they consider when deciding to grow food. Infrastructure and tools, water and improved water retention, labour requirements, good quality crops were among the list of things farmers look at. These factors were used to rank practices; tunnels, tower gardens, mulching, CA and rainwater harvesting practices. These practices were identified as the easier practices, within homestead boundaries where participants have full control and which were deemed to provide goodresults for the purposes of adapting to changing climate. Practices were ranked as follows.



	Tunnel	Tower Gardens	Gardens Mulching	CA	Water harvesting
Ukuthoma kwezinsiza kusebenza (Use)	2	3	2	2	1
Ukusebenisa nalongoba kwamanzi	3	3	3	2	3
Ukuthuthuka kobuhlalo kwamanzi	3	2	3	2	3
Umsebenzi/Ubuzima	3	3	2		3
Izithelo ezinhle	3	3	2	2	3
Ukunciphisa/ukungabitha kwezinambuzane	3	2	2	2	1
Total	17	16	14	10	14

Figure 4: Matrix ranking of prioritzed CRA practices in Mahhehle, SKZN

Tunnels came on top of the list and this was mainly due to their deep trenches filled organic matter, water holding capacity, efficient water use and protection from birds and chickens through enclosure with the shade netting. Netting does to only protect crops but regulates temperatures in the tunnel for good quality crops. Furthermore, they allow participants to grow food all year round through drips for irrigation and localized fertility. Tower gardens came second followed by mulching and rainwater harvesting. Off the 21 participants in the workshop, 8 participants have jojo tanks from which they store rainwater in the rainy season. Those who do not have jojos cannot afford them from the local outlets in Ixopo and Umzimkhulu with a 2200L costing around R2400 excluding transport from town to Mahhehle. CA was last on the list and this was mostly because participants felt that field cropping relied mainly on rain that they cannot control. In as much as they still do field crops but the intensity and investment has largely been due to increased rainfall variability, increase in insect pests and diseases as well as stray livestock, especially for those without proper fencing. Field crops are now mostly grown in homestead fenced off plots as opposed to big fields as was the norm years ago.

VLSA in Mahhehle

The group voiced out their interest in starting their own VLSA with MDF where this local savings and loan association will be used to finance their agricultural activities, such buying seed, seedlings, poultry stock and feed. Participants are able to save a minimum of a R100 every month and at most R500, Thursday the 9th of February the group will meet at Nomali Tenza's homestead for their VLSA activation and first savings meetings as they will bring their monies then as well. Field staff will be bringing savings box and books for the group.

Garden visits

Paulous Nxasana

Mr Paulous Nxasana is an example of a farmer that implements practices to increase his productivity. Paulous is a pensioner and household head tasked to look after his family. He has a newly constructed tower garden planted with spinach, parsley, cabbages, beetroot, Chinese cabbage, a field of maize, beans and summer cover crops (Sun hemp, sunflower and millet) planted using the conservation agriculture method, a plot of amadumbe, a small garden of spinach, green peppers, and chillies. He collects water from a natural spring a quarter of a kilometre away from his household.

Figure 5: Mr Nxasana in his CA plot with beans, maize and cover crops.

Mrs Jabulile Chiya has a tower garden with a stone infiltration system for greywater management that she cleans with clean water every week. The tower garden is planted with parsley, cabbage, spinach, Chinese cabbage, beetroot, and rosemary. The tower garden helps feed the household four times a month. She also has a field where she has implemented CA and a piggery.

Figure 6: Mrs Chiya harvesting spianch for supper.

Mzongwana/Lufefeni-EC: CCA learning workshop (26th January 2023)

Mahlathini has supported Mzongwana between 2021-2022, introducing CA and tower gardens in assocaiton with SaveAct.

In this workshop the CCA aspects were covered, and further implementation prioritized. Farmers commented that climate change has affected many farmers leaving them frustrated by low yield, bad soil and increased pest and disease problems in their gardens and fields. Water shortage is also an issue, they depend on unprotected springs for both consumption and irrigation water. Farmers also commented on the fast-deteriorating state of the road due to heavy downpours, that strong winds have increased and that it is generally much hotter than before. During winter it is very cold and windy, springs dry out and livestock has no grass for grazing. They have to get feed for livestock, which is very expensive.below is a table outlining the outcomes of their climate change impacts brainstorming exercise

Table 4: climate change impacts brainstomring exercise in Mzongwana

Impacts	Description and linkages	Outcomes	Potential adaptive measure
Water shortage	They don't have clean drinking water and water for livestock.	Sickness in humans and their livestock	Getting clean water for consumption and cleaning springs
Too much rain in short period	Lots of soil erosion and bad roads	Soils become hard and dongas are forming	To reduce roil erosion they don't know what to do, but they mulch and plant sweet-potatoes to decrease soil erosion.

Extreme heat	Soil temperature increase and water evaporates quickly on the ground	Poor and less yields, hunger, poverty and death	They don't know what to do, but they are happy to plant their crops inside the tunnel
Crop production	Yield decreases each year and crop diseases increase	No yield or less yield	They are fertilizing the soil by making trench beds and mulching
Social repercussions	Human health declines, Diseases, Loss of jobs, Hunger, poverty, crime, death,	Murder, crime, no money to support families, conflicts between neighbors	Visit clinics when they are sick.
Pests problem increasing	There are lots of pests on their crops, like moles, whiteflies, aphis and army worms	There are losing their produce	They don't know what to do with pests, instead they take it out of the garden.

Table 5: Past and present practices used by farmers in their gardens and fields

Past	Present	Future
They planted maize after ploughing with a tractor	They are planting maize using conservation agriculture and yield is good	They will continue planting cover crops and maize using CA method
They only planted crops like rape, turnip , cabbage and potatoes	They plant different kinds of vegetable crops including herbs even in winter inside their tunnels	They want to continue planting different vegetable crops even during winter after increasing or adding tunnels in their gardens
	They have both big fields and vegetable gardens in their households, but there's too much rain ruining crops	There is too much rain and it is also too hot, but very cold during winter, which makes farming difficult
They used to have lots of livestock	They have livestock, which is affected by too much heat, they are dying and during winter they run out of feed and livestock theft went up	They won't have livestock if theft continues

Figure 7:Above Left to Right: Examples of CRA practices in mzongwana: tower gardens, poultry and a recnetly ccmpleted tunnel

Figure 8: A CA field planted to maize and beans in Lufefeni

In prioritizing practices and actions for the coming year farmers were keen to learn about seed saving and storage, they also had interest in value adding of crops like herbs, pests and disease control practical learning workshop, mixed cropping, soil and water conservation

and poultry workshops that deals with broilers, layers and indigenous chickens. Below is the prioritization matrix for practices (1-Hard to do, 2-Medium, 3-Easy to do)

Table 6: Matrix of the different practices in Mzongwana

CRA Practices	Cost	labor	Material accessibility	Hard labor	Total
Drip irrigation	2	3	2	3	10
Diversion ditches	3	2	3	2	10
Greywater	3	3	3	3	12
Rainwater harvesting	3	3	3	3	12
Ridges and furrows	3	1	3	1	8
Stone bunds	3	3	3	1	10
Keyhole	1	2	1	1	5
Banana basins	3	3	3	3	12
Crop rotation	3	3	3	3	12
Mixed cropping	3	3	3	3	12
Mulching	3	3	3	3	12
Conservation Agriculture	3	2	3	2	10
Targeted fertilizer and lime	2	2	2	2	8
Liquid manure	3	3	3	3	12
Trench beds	3	1	2	1	7
Legumes	3	3	2	3	11
Compost	3	3	3	3	12
Eco-circle	3	3	3	3	12

1.2.1 CCA Review and planning sessions

Seasonal CCA review and planning sessions have been undertaken in: Matatiele (5 villages), in Limpopo (5 villages), in the Midlands (2 villages), Bergville (2 villalges) and SKZN (1 village)

Matatiele-Nchodu (25th Jan 2023) – Rashule (26th Jan 2203)

Nchodu is one of the villages that started working with Mahlathini towards the end of 2022. MDF was invited here by one of ERS enviro champs Active farmers have grown potatoes, rape, cabbage, maize and sugar beans and have sold both locally and to hawkers in Matatiele. The group now has 10 new members.

Figure 9: Betty Maimela facilitating the reivew nad planning session in Nchodu.

To date farmers have implmeneted hte following practices; trench beds, tunnels, drip irrigation,tower gardens, mixed cropping,

The group has undertaken one monthly market in Matatiele and is keend to continue with this process. There is also a large interest in livestock; pigs, sheep and cattle – both around management and sale.

The CRA learning group in Rhashule village has been operational since 2021, working with Mazwi Dlamini, primarily on poultry and CA. They have also implemented trench beds, tunnels, natural pest

and disease control, tower gardens, drip irrigation, liquid manure and rainwater harvesting. The learning group is also working with SaveAct, who is helping them with starting their own business from Village savings and from the income they are making through selling of their garden produce.

They are interested in including more tunnels in their gardens.

Challenges include severe water shortages in the upper section of Rashule, Finding good seed potatoes, pest problems and marketing.

The table below outlines practices and learning sessions the 5 Matatiele villages have prioritized.

Table 7: Prioritized activites for Matatiele CRA learning groups:2023

Mzongwana	Ned	Nchodu	Rhashule	Nkau
Pests and disease control	Pests and disease control	Pests and disease control		Pests and disease control brews
Soil and water conservation		Soil and water conservation	Soil and water conservation	Soil and water conservation
Seed saving and storage	Seed saving and storage	Seed saving and storage	Seed saving and storage	Seed saving and storage
Poultry workshop on broilers, layers, indigenous chickens and their health management	Poultry workshop on broiler, layers, indigenous chickens and their health management	Poultry workshop on broilers, layers, indigenous chickens and their health management	Poultry workshop on broilers, layers, indigenous chickens and their health management	
Crop calendar	Crop calendar	Crop calendar		Crop calendar
		Value adding	Value adding of produce	
	Mixed cropping			Mixed cropping
	Conservation Agriculture	Conservation Agriculture		
Liquid manures	Liquid manures		Fruit production- apples, lemons, grapes and peaches	Underground rainwater harvest tanks
			Marketing to sell both produce and livestock	
		Tower garden	Starting businesses of making liquid soaps and candles	
			More tunnels	
Water access		Water access	Water access	
Livestock management	Livestock management	Livestock management	Livestock management	Livestock management

1.2.2 CCA training: learning and demonstrations

Trainings have been undertaken in most villages including the following topics: Natural pest and disease control, drip irrigation, constructing and packing trench beds, mixed cropping, construction of tunnels, poultry management, soil fertility management and soil and water conservation

For each training session a learning outline is developed, handouts have been produced in isiZulu, isiXhosa, and Sepedi for distribution and reports are produced with photos and attendance registers.

Below is a selection of photographs from training undertaken between January and March 2023


Figure 10: Above Left: trianing in natural pet nad diease control in Nchodu (March'23). Gorup is making an neriched foliarspray brew which includes bonemeal, lime, manure, weeds, milk, and sugar. Above right: The intern Smphumelelo Mbhele is undertaking a trianing in installation nad managmenet of drip irrigation in the utnnels in Plainhill, SKZN (Feb'23)

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Figure 11: Above Left: Mahhahle particpants iwth tower garden materials to implment at hteir homesteads after the trianing session (Feb'23). Above Right: Intern Ngobile Mbokazi takes participants in eMahlathini in Bergville through the soil texture analysis exrcise as part of a soil fertility management training.


Figure 12Above Left and Right: Small groups of participants in eMadakaenin in Bergville d an assessment of water flow, runoff, wind direction and sun in thier yards, to plan for runoff managment and planting as part of their soiland water conservation trianing (March'23)

Tala table youth network value adding training (15-16 March 2023)

A youth group consisting of 2 youths per vialgle in 6 viallges are receving ongoing trianing nad mentoring in entrepreneurship and small bsuniess development linked to the CRA learning groups in their villages in the mametaj-sekororo region of Limpopo. This is a 2 year process undertaken jointly by AWARD and MDF, and funded by DKA (German chruch funder).

Th session in March oncsisted of reviewing the market tables already set up and undertakne by the group and a one day trianing nad dmeosntraiton sesison in value adding. Here the group was divded into two and each spent time preapring cetraing value added products consisting of sweet chilli sauce, pesto, vegetalbe atjar, wild melon jam, lemon maramlade and sweet potato bites. Thereafter the youth were provided with small seed budgets to produce nad sell a vlaue added product at hteir tala talbes (green tables) in their villages.

Figure 13: The youth busy reviewing thier marketing activities to date

Figure 14: Above: Youth group busy bottling thier lemon marmalade and Right: Making atjar and chilli sauce.

1.2.4 Economic empowerment and income diversification

Fruit tree focus in Mametja-Sekororo – Limpopo (Feb-March 2023)

Fruit production is an important component of a diversified cropping and marketing strategy in Limpopo and adds nutrition and environmental benefits for the participants.

An initiative to supply the members of the CRA learning groups with new, grafted varieties of mango, to allow them so sell into the retail market and packhouses in the Hoedspruit area was started in 2021. Every season farmers collect monies to buy trees, sourced mainly from the Bavaria Estate Nursery outside Hoedspruit and mentoring and learning sessions are held in the villages in mango production and orchard management.

About 300 mango trees 9varieites;Kiet, Tommy and Kent) were sourced and distributed to the local farmers in the following villages:

Villages	Number of trees supplied
Willows	170
Sedawa	40
Madeira	89
Santeng	30
Worcester	24
Turkey	06 for now. More will be sourced in Tzaneen as the Bavaria tree sale is finished.

Figure 15: Mango trees being collected fomr bavaria for distribution in the villages.

Transport was provided to ferry the trees to the villagers from the main supplier. The other types of trees requested (Naartjies, soft peal mandarins, avocados and lichis) are in the process of being sourced and quotations on pricing will be outlined to the farmers from nurseries in and around Hoedspruit with the assistance of the MDF and AWARD.

Local marketing: Monthly market stalls

In the Bergville region of KZN, where 5 villages club together to do a monthly market stall in Bergville town, very little has happened – as during summer, the farmers focus on their field crop production. This is due in part to tradition and habit and in part due to the lack of irrigation options in the area. Market re-initiation is likely to be around May 2023.

In SKZN, the Centocow group has hosted a local market in Creighton every month since December 2022. Unfortunately due to the load shedding difficulties 9which saw the ATMs in this small town out of action for a number of weeks) and SASSA's moving of their grant pay out points, the Creighton site is no longer seen as an ideal option. The teams are in the process of getting permissions form the council in Umzimkhulu to host the market there. It is about 50kms further than Creighton, but a much busier center.

Figure 16: Centocow monthly market at the Sinawe Serivce station in Chreighton (2 March 2023), with contributions from 3 farmers in Centocow and 4 farmers form Ngongonini.

The table below summarizes the produce nd slaes for the day. The day was unfortunately slow due to the ATMs being down. In February, a similar situation prevailed nad the gorup made R928. Thus the decision to move the stall to a different town centre.

Farmer	Produce	Price per unit	Value of produce (R)	Total no sold	Total sales (R)
Zanele Kheswa	Chillies (2 packs)	R5	R10	2	R10
	Spinach (5 bunches)	R10	R50	5	R50
	Avocado tree (2 trees)	R50	R100	0	0
Paulous Nxumalo	Chillies (4 packs)	R5	R20	4	R20
	Spinach (6 bunches)	R10	R60	2	R20
	Cabbages (6 heads)	R10	R60	6	R60
	Brinjal (5)	R5	R25	1	R5
Ntombizodwa Ndaba	Butternut (10)	R10 -R12	R118	2	R22
	Pumpkin (1)	R40	R40	1	R40
Thobeka Zulu	10 kg Potatoes (9 bags)	R55	R495	8	R440
Adrian Williams	Pork Slices	R30, R40, R45. R50		4	R155
	Beetroot Juice (13)	R23	R299	0	0
Flora Phungula	Beadwork	R75, R100, R140, R180, R200		0	0
	Grass mats (6)	R50, R100	R350	0	0
	TOTAL				**R822**

The **Ozwathini marketing initiative** in the Midlands is the most well developed l monthly marketing stalls and farmers have taken over the running and management of these stalls. There was however a gradual decline in participation, punctuality and presentation, which alongside the slow decline in the economy more broadly has seen declining sales for this market.

Figure 17: Pictures of market days in Ozwathini – Jan-March 2023. Note hte new gazaebo at hte bottom centre, bought by the farmers themselves as well as the professional packaging nad presnetation undertaken by this group.

The market was launched at the backdrop of declining sales to bakkie traders and for some time provided a glimmer of hope. In the first six months of operation the overall income ranged from R 5000-R8000 per day, as the market only ran for one day during that period. Subsequent to the July unrest in 2021, the market saw a sharp decline in sales, regardless of farmers increasing their market days from one to three days. In the year 2022, average monthly income ranged from R 2500 to R 4000 over a three-day period. Towards the end of 2022, sales declined even further, with farmers taking home a combined total of R 1 185.00 in December, R 675.00 in January, R700 in February and R910 in March. All of these markets ran over two to three days. The number of farmers who sold at the market also declined to an average of 3 to 4 farmers at each market. Around 10 farmers are still involved.

One positive outcome of this process is that a handful of farmers showed great commitment to the market and worked seamlessly together in ensuring that it ran smoothly. However, with the reduction in external orders from social media marketing (due to time constraints fomr the Mahlathini team side), the income generated was affected, which meant farmers made up to 50% less in income than they did when there was still a high number of external orders.

A discussion was carried out with farmers on the status of the market and what could change to improve how it is run. During the meeting it came to light that farmers do find value in the market as it serves as a platform to sell their fresh produce and get paid in cash as no credit is given at the market. Secondly, the income generated from sales goes towards their monthly savings. They have strengthened their relationships in that they have established a strong bond of trust and working relationship. However, despite the benefits, farmers experience challenges which prevent them from making full use of this platform. Some of the challenges include very low

income generated from the market and damage of produce by adverse weather positions. The Table below gives a summary of highlights, challenges and proposed solutions.

MARKET DAY FEEDBACK FROM FARMERS Ozwathini market review March 2023		
Highlights	*Challenges*	*Possible Solutions/Ideas*
Selling fresh produce and up-front payments	Selling from home makes some members lazy to go to the market	Increase the scale of planting and practice staggered planting
Money earned from the market is used for savings	Sometimes sales are low and income is insufficient	Every month collect a list of available products on the 20th to start advertising early. Start the market earlier (08h00)
Rotting of produce minimized by the monthly market	Produce damaged by too much sunlight and rain in the fields Produce is sometimes not enough due to crop damage and absenteeism	Plant more produce in tunnels Practice staggered planting
Strengthened relationships	Communication is sometimes lacking	Draw up a constitution to govern the operation of the market
Learning about one another's strengths and weaknesses	Only one person other than MDF team is responsible for transporting equipment and making sure produce is safely kept	
Unity in that members sell on behalf of those who are absent	Theft of left over produce	

In Matatiele, Ncodu and Ned villages clubbed together to run a local market day in Matatiele town, with permission from the Local Municipality

Figure 18; The Matatiele market day, (27 Jan 2023)

The Ned learning group has a WhatsApp group with all the members in the group using smartphones to make it easier to communicate. The name of the group is called Thusanang project with 18 of the 45 members of the learning group, including Betty and Mazwi. Farmers had their meeting before the market to discuss prices and availability and then let Mahlathini know where to pick up the collected produce.

This was the first market which had a few teething problems. A total of R584 was made for the day. The biggest concern was that they started quite late. Most of the participants have other avenues for slae including farm gate sales, which work quite well and local hawkers in Matatiele who buy from them. They were however heartened by this initial market stall and are keen to continue and improve.

Village Savings and Loan Associations

For these groups monthly savings and loan meetings are held for all the groups being supported. Each group committee and bookkeeper are responsible for keeping the records of the groups. Facilitation support is provided for most months for each group by the Mahlathini team. This is very intensive in terms of time and effort, but is required to build a transparent and accountable habit when working with monies at a local level.

The table below summarizes the transactions for all VSLA groups in Limpopo and KZN being support. In the EC – Matatiele region the savings groups are managed by SaveAct

Table 8: Summary of VSLA transactions as of March 2023

Area	No.	Village	Group Name	NO. OF PEOPLE	CUM # OF SHARES	VALUE OF TOTAL SHARES	LOAN REPAID TODAY	NEW LOAN TAKEN	NEW BALANCE
Bergville	1	Ezibomvini	Ezibomvini	19	75	R7 500,00	R410,00	R3 900,00	R8 320,00
	2	Ezibomvini	Ukuzama	13	42	R4 200,00	R0,00	R4 200,00	R4 200,00
	3	Emazimbeni	Nyonyana	23	181	R18 100,00	R1 520,00	R5 900,00	R19 650,00
	4	Emabunzini	Isibonelo	19	113	R11 300,00	R0,00	R6 400,00	R11 300,00
	5	Eqeleni	Masibambane	20	0	R0,00	R1 440,00	R5 600,00	R1 480,00
	6	Eqeleni	Masithuthuke	19	0	R0,00	R3 350,00	R10 100,00	R3 615,00
	7	Stulwane	Mbalenhle	20	110	R11 000,00	R410,00	R1 500,00	R13 930,00
	8	Ndunwane	Mphelandaba	15	29	R2 900,00	R0,00	R2 900,00	R2 900,00
	9	Emabunzini	Sakhokuhle	19	719	R71 900,00	R13 830,00	R0,00	R106 360,00
	10	Vimbukhalo	Ukhamba	20	151	R15 100,00	R860,00	R7 500,00	R16 020,00
	11	Stulwane	Vukuzenzele	17	124	R12 400,00	R740,00	R6 400,00	R14 030,00
	12	Stulwane	Umtwana 2	16	83	R8 300,00	R400,00	R4 700,00	R8 700,00
	13	Stulwane	Umtwana 1	16	104	R10 400,00	R100,00	R5 300,00	R10 800,00
	14	Emadakeneni	Azam	14	66	R6 600,00	R1 280,00	R3 100,00	R7 960,00
	15	Stulwane	Ithembalethu	19	104	R10 400,00	R590,00	R5 000,00	R11 080,00
	16	Stulwane	Zebra	14	103	R10 300,00	R490,00	R6 200,00	R12 820,00
	17	Emahlathini	Senzakahle	36	567	R56 700,00	R11 110,00	R0,00	R113 710,00
	18	Stulwane	Sondelani	14	135	R13 500,00	R750,00	R5 100,00	R14 300,00
	19	Stulwane	Mzizi	18	200	R20 000,00	R0,00	R5 300,00	R20 000,00
	20	Emahlathini	Masiphumulele	10	276	R27 600,00	R4 900,00	R0,00	R49 700,00
	21	Stulwane	Thuthukani	19	81	R8 100,00	R500,00	R2 500,00	R9 800,00
	22	Stulwane	Inkanyezi	19	44	R4 400,00	R0,00	R3 600,00	R5 200,00
SKZN	23	Centocow	Sizaneno	13	149	R29 800,00	R6 930,00	R0,00	R64 936,00
	24	Mahhehle	Qedindlala	24	117	R11 700,00	R2 850,00	R11 050,00	R18 050,00
	25	madzikane	senzokuhle	16	700	R70 000,00	R2 550,00	R0,00	R126 815,00
	26	madzikane	sukuma sakhe	8	89	R17 800,00	R0,00	R0,00	R25 505,00
	27	madzikane	masibambane	15	517	R103 400,00	R65 220,00	R0,00	R168 620,00
	28	ngongonini	umnothowethu	30	152	R15 200,00	R380,00	R9 800,00	R18 960,00
Midlands	29	ozwathini	sikhulile	19	561	R56 100,00	R12 860,00	R7 500,00	R91 743,00
	30	ozwathini	siyakhaya	13	519	R51 900,00	R20 163,00	R0,00	R72 063,00
Limpopo	31	Worcester	Rutanang	18	106	R10 600	R3770	R14 650	R14 370
	32	Santeng	Rekakgona	19	222	R22 200	R12 110	R 28 100	R34 310
	33	The Willows	Epopong	19	41	R4 100	R -	R 4 100	R4 100
	34	Turkey	Refentse	19	271	R27 100	R 30 141	R 44 000	R57 241
	35	Turkey	Tswelapele	19	476	R47 600	R 41 064	R 62 700	R88 664
	36	Maderia	Hlalefangng 1	19	642	R64 200	R 88 390	R 130 600	R152 590
	37	Madeira	Thusanang	17	115	R11 500	R -	R 9 000	R11 500
	38	Sedawa	Kopano Ke maatla	19	151	R15 100	R 4 350	R 18 000	R19 450
TOTALS				**686**	**8135**	**R889 000,00**	**R333 457,90**	**R434 700,00**	**R1 434 791,90**

As shown in the totals there are presently 686 participants in VSLA groups with a total savings of R1 ,435 million. This equates to a financial contribution to savings for each participant of around R2 100 annually and is around 10% of the average income per participant. These provide important safety nets, consumption smoothing options and cash flow for micro enterprises and farming activities.

A Microfinance handbook for smallholder farmers in South Africa has been produced with support from the Water Research commission. Authored by Nqe Dlamini and Erna Kruger, it is an important contribution to the

field of microfinance service provision for the unbanked rural poor in South Africa. A copy it attached to this report.

Below are a few photographs of VSLA meeting undertaking between January and March 2023

Figure 19: Above Left; Sizaneno VSLA in Centocow during a monthly meeting (Feb 2023). Above right; the Ratanang VSLA in Worcester (Limpopo) doing theirannual share out 9Jan 20230)

1.2.5 Innovation platforms and multi stakeholder engagement

Bergville Regenerative Agriculture farmers day – 23 Feb 2023

This event was implemented in partnership with Asset Research (Stellenbosch University) with funding support from The Maize Trust, AGT Foods, the uThukela development Agency and the WWF.

Stakeholder represented were the Agricultural research Council, Climate Unit, the KZN Department of Agriculture, the Okhahlamba Local Municipality, the local Nkosi, KZN Wildlife, the Wild trust, the Farmer Support Group, the KwaZulu Natal Agricultural Union, Pannar Seeds, UKZN and UFS.

Around 240 smallholder farmers gathers in the Emmaus Hall in Bergville to kick off the event with presentations, before attending three field site visits. A cross visits form 11 farmers from the Midlands CRA learning groups was also included in this day.

Figure 20: Above: The packed communtiy hall for the CA ofarmers' open day event in Emmaus, Bergville and A field site visit to Dlezakhe Hlongwane in Stulwane to interact with the CA trials he has undertaken. Here visitors are viewing his livestock ofdder porduction plots- Lespedeza, short seaosn yellow meaize nad a perennial grass(tall Fescue).

Multistakeholder forums

Mahlathini is involved in a number of regional, provincial and national forums, networks and processes. Activities are summarized in the table below.

Table 9: Summary of multistakeholder engagement: October- March 2023

Organisation	Activity - Description	Dates
uThukela Development Agency	Fresh produce marketing, 1st week of every month	**Oct 2022-March 2023**
Asset Research-Maize Trust, SODI	**Regenerative Agriculture farmers' open day in Bergville**	**23rd Feb 2023**
SAPPI	Meeting with Vimbukhalo community representatives	13th October 2022

	2nd Meeting with SAPPI re spring protection support	**24th Feb 2023**
ESS research - WRC	UKZN research in ecosystem services mapping supported by MDF: water walks, focus group discussions, planning, eco-champs, spring protection work in Stulwane, **thematic and mapping workshops in Ezibomvini and Stulwane**	23rd September 2022 14th October 2022 **13,29,30 March 2023**
WWF Water source forum	uThukela catchment partnership: Stakeholder meetings, online and in person at OLM board room Bergville	29th September 2022 10th November 2022
SANBI- Living Catchment Programme	Social facilitation capacity building workshop – Western Cape; M Malinga Olifants' water indaba: M Malinga, N Mbokazi, H Hlongwane, B Maimela and E Kruger **Video on local initiatives in catchment management**	3rd-5th October 2022 30th Oct-2nd Nov 2022 **24th March 2023**
SANBI	**Climate change adaptation and gender mainstreaming dialogue – presentation and participation**	**8th-9th March 2023**
UKZN and Adaptation Network	Ukulinga Howard Davis memorial symposium: Presentation on CbCCA in Bergville: E Kruger T Mathebula, N Sibiya	12th October 2022
Adaptation Network	Policy input and AGM Ongoing input and involvement in the Capacity development working group: to implement the new Civil Society Organisation Skills Enhancement and Excellence Development (CSO SEED) project, funded by the Flanders government. Some of these activities include youth-led participatory videos on adaptation initiatives and some thematic field visits and exchanges between AN CSO member projects.	13th October 2022 1st December 2022 **7th , 8th Feb 2023** **15th March 2023**
PGS-SA	Quarterly meeting: Discuss mapping of PGS organisations, finalisation of certificate and use of seals and logos. Finalisation of smallholder farm assessment form **PGS-Certification working group**	17th Nov 2022 **13th Feb 2023**
Agroecology network	Online meeting and policy involvement for reviewing of the National department of Agriculture's climate change adaptation master plan (CCAMP). Letter to the minister compiled and endorsed. Led by Mr Stephen Greenberg, arranged by the African Centre for Biodiversity	18th November 2022
Okhahlamba LM	Agriculture and Land summit: MDF presentation and marketing stall: All Bergville staff, farmers representatives and eco champs	30th November 2022
Afromontane research Centre	Maloti-Drakensberg Climate Change Workshop **Wageningen/UFS: Land futures course - Bgvl**	12-14 December 2022 **7-10th March 2023**
IWMI	**Transformative futures for water security dialogue, participation**	**26th-27th Jan 2023**

1.2.6 Indicator development, Monitoring and evaluation.

To date, informal moniotring has taken place. In addtion the monotiring forms have been developed for individaul garden moniotring, poultry moniotring and field cropping moniotring. Field teams are in the process of intervwiing participants. This process is spread over a few months as these interviews are undertaken while doing other work in the commuitieis. Appendix 1 provides outlines of the moniotring forms to be used.

1.2.7 Sustainable water management

There are three funcional viallge level water committees in Bergillve – Vimbukhalo, Ezibomvini and Stulwane. Presently funding nad implmentation support is provided with small budgets provided by the WWF and the Water Research commission (Ecosystem services research in association with UKZN-CWRR).

The table below summarizes work done with the Sulwane and Ezibomvini learning gorups in developing a participatory mapping of the resoruces and resource management plans to be undertakne by the communtieis nad their partners.

Table 10: Local resrouce management plans for Ezibomvini and Sutlwane communities Bergville, KZn. March 2023 (MDF-UKZN_CWRR)

Local resource management areas for improved eco system services- Community defined		
Key Area	**Management required**	**Notes**
Grazing areas (Amadlelo) -Livestock feed and water, firewood, medicinal plants,	**Restoration and management**. -Clear Lantana and use poison after cutting to stop regrowth -Rotational grazing -Control wildfires and make firebreaks. Storage drums for emergencies with fire one can use -Explore financial benefit – grant/incentive mechanisms -Monitor and manage nutrition of veld (erosion control, overgrazing control, removal of poisonous weeds, re-seed of palatable species) -Awareness raising in the community and for livestock owners.	-Eco-champs to do clearing -Dip tank committees and livestock associations -Better community collaboration with dip tank committee as well as TA and councillors -Community workdays
Wetlands (Amacaphuza), -Reeds (incema) -Food and water for cattle, also in winter -Medicinal plants -Fire retardant -Runoff and flood water management -Improved water quality -Fertile soils with earthworms	**Small management changes to manage condition of wetlands.** -Fencing to ensure good condition and make drinking troughs for livestock -Awareness raising on wetlands functions and services -Replanting important species into wetlands; then someone needs to police this and ensure people don't just harvest everything -Protection and restoration of important medicinal species for sale: Stop people with big bags who come in and take for selling -Avoid pigs coming in as they mess things up -Avoid fires and burning -Livestock inclusion managed e.g. –allow them in at certain times only. Or maybe make camps and move them. Or allow them to graze on the edges. Or cut and carry feed.	-TA involvement and 'landowners' in wetland areas to outline rules and responsibilities -Community as a whole to follow these -Local water and land use committees to undertake specific actions related to water access and management -Issues around rights around use of water and important medicinal plants need further interventions -Suggestion: talk to livestock association then bring their comments and suggestions to the water committee to continue the conversation and include all
Erosion control -To ensure availability and quality of water and soil resources	**Restoration** -Awareness raising and outline of responsible actions to enforce -Avoid expanding of minor erosion into dongas. -Prevent siltation and pollution. -Allow re-vegetation, naturally or through re-seeding -Prevent run-off -Check dams, brush packs, stone packs, -Prevent livestock from causing further damage -Control wildfire- make fire breaks Storage drums for emergencies with fire one can use	-TA and livestock committees to undertake some actions -Eco champs to assists -Some actions and contributions from community as a whole (e.g. loan of tractors, small financial contributions -External support -Continued support from UKZN and MDF in mapping, planning, proposal development, community structures and management
Alien trees -Eucalyptus, poplar, and wattle plantations, and patches	Small changes -Promote better management by 'owners' -Cut down and poison lantana and encroaching poplars -Ensure management of wattle patches -Remove trees from water sources and streams in all cases	-TA, Nkosi and 'owners" encouraged to undertake management activities as trees are useful in the community and cannot just be cleared.
Springs and streams -Water provision for drinking, laundry, irrigation, construction and	Protection, restoration, and management – must protect the water sources to ensure supply. - Should protect water so that livestock don't disturb the sources -Protect the springs; with fencing and the ditches above to avoid water from flowing in overland and contaminating these springs.	-TA, local municipality, water committees and localised groups of people using specific water sources to work together on access and management plans and implementation -Community must come together and make rules and regulations re hygiene and water

livestock -Water quality and quantity - Issues are floods, livestock trampling, children use as toilet, litter	-Check water quality. -Remove eutrophication. -Check springs regularly. -Drinking spots for livestock -Community awareness and education – and for children -Maintain the water infrastructure that is there. -Avoid doing laundry in the water sources and keeping them clean, no pampers, no urination, no use as toilet, no dumping of dead animals. -Protect springs with pipes to be able to irrigate the gardens (reticulation to taps) -Also use grey water for irrigation. - water harvesting and use. -Make sure children don't play around the water sources… or pollute them WATER ACCESS -Big issue	-Those that are involved should talk to others and ensure they also learn - involve the TA councillors and Nkosi…. -Asking Mahlathini to help with fencing and funding for water access -Day to day activities of cleaning springs, digging furrows to reduce contamination to be done by locals -Dig refuse pits for disposal of waste – in each locality -Awareness raising and communications -Involve schools -Eco champs to assist with spring protection and management and schools' interventions

Assessment of progress

The project is on track and no major deviations in the project planning and implementation is envisaged.

Other comments

The programme is multi-faceted and complex. To streamline activities, a seasonal approach has been instituted – allowing for a focus on field cropping in summer, poultry production in autumn and spring and vegetable production from autumn through spring.

The initiation of the livestock management activities requires working with a slightly different target group, as the membership of the CRA learning groups is heavily skewed towards women. It would need to include the traditional authorities, dip tank committees and livestock associations in the selected villages. In addition, grazing management requires a community level focus on resource conservation and management which is often difficult to initiate and achieve. There is generally a high level of conflict in the communities related to livestock. Thus the focus will be on a selection of villages where inroads have been made and where a partnership with Conservation South Africa and Meat Naturally is also possible. These are 3 villages in Mametja-Sekororo (Limpopo) and 3 villages in the Bergville region of KZN. In Matatiele, the villages need to be included into the existing Meat Naturally local auctions process in partnership with ERS. Work on these initiatives is to commence this winter (June-July 2023).

A similar complexity plays out for the initiation of the water committees and water access activities as these require full community involvement and positive support form the local governance structures such as the Traditional Authorities, Local Municipalities and Water Service Authorities. Here the mandate for water provision sits with the District Municipalities and the water service authorities and activities cannot be undertaken without their involvement. It is easier to initiate these activities in regions where there is already a multistakeholder focus on the water management issues in the region, which is part of the reason the strategic water source area communities have been prioritized for this programme. Definite and positive progress is being made in the Bergville region of KZN, with the support and back stopping from organizations linked to the fledgling uThukela catchment management partnership. IN Limpopo a process known as the mountain streams initiative, being developed under the auspices of the district development model and the Water Research Commission is showing promise in providing a favourable institutional setting for this work. In Matatiele (EC) and ongoing relationship with the Umzimvubu catchment forum and ERS is proving useful.

Date: 7 April 2023

APPENDIX 1:

GARDEN MONITORING AND INDIVIDUAL EXPERIMENTATION PLAN

NAME AND SURNAME:

VILLAGE

DATE:

FIVE FINGERS				
	🔴	⚪	🔵	**Detailed description of what is there- list practices**
Water management: a) Infiltration/ run off , crusting b) Organic matter in and on the soil c) Greywater use and management *(e.g., filtered, ash, dedicated structures – tower garden/sack garden)* *d)* Water harvesting and storage *(e.g., check dams, gabions, drums, basins, small dams, Jo-Jos)* e) Mulching f) Drip irrigation *g)* Water source and quality *(e.g., spring, borehole, municipal tap, bought….)* h) Other……				
Microclimate control: a) Micro tunnels b) Shade netting c) Windbreaks, trees, shelter belts, fruit trellises,… d) Other…….				
Control of soil movement: e) Contours, diversion ditches, swales, bunds, f) stone lines, g) Bed orientation/layouts h) furrows (function) i) Other……..				

Soil health: *j)* Bed design *(e.g., trench beds, ridges, dedicated beds and paths, terraces, sunken/raised beds, banana basins, eco circles..)* k) Compost, improved manure, green manures, legumes, *l)* Composted manure *(kraal manure and dry grass a layer of each and cover)* m) Use and sources of manure				
Improved crop management: n) Mixed cropping o) Crop rotation p) Seed saving q) Nursery/ propagation r) Continuity- seedling production s) Natural pest and disease control practices t) Other…….. **Field cropping** a) Minimum tillage; b) Soil cover; c) Crop diversification; intercropping, rotation, cover crops…) d) Close spacing **List of crops in garden and field** a) Garden b) Field **Fruit production** a) List of fruit types and number of each b) Management practices e.g. basins, mulching, composting, pruning c) Pest and disease control e.g. (picking off rotten fruits of the ground, other)				
Looking after livestock a) Poultry (indigenous, broilers, layers) and number of each; a. Feeding and management (housing conditions and hygiene) b. Supplier				

b) Livestock (goats, cattle, pigs) and numbers a. Feeding and management (housing and hygiene) b. Supplier c. Fodder supplementation/ production				
Looking after indigenous plants: *a)* Indigenous plants and trees *(medicinal, fruit, pest control etc.)* *b)* Indigenous fruit *(names and numbers)* c) Biodiversity for garden management *(e.g. planting pest repellent plants)*				

POULTRY PRODUCTION MONITORING FORM

Baseline information

Area: _____BP/FO Name: _____

VSLA Name		Date of VSLA Creation	
No. of members		Date of Data Collection	
Learning group membership (yes/no)		CRAhemes e.g. poultry, potatoes, maize, vegetables, sheep, pigs	

1	Name:			Surname:			
	Phone no.:				Age:	Sex	F=01 M=02
	A1	When did you become a member of this VSLA? [Record the year]					
	B1	How many VSLAs are you member of? [If more than one, record below the name of each group and the year the member joined]					
		Name of other VSLA				Year	
	a						
	b						
	c						
	d						
	C1	Does your household receive social grants? [Circle the answer]				Yes=01	No=02
		Please indicate the type of grant:[circle the answer]				Child	Pension
		Please indicate the no of grants [write 1,2..under the grant name]					
		Please indicate your average monthly income (using a tick) R0-R1000 R1000-R2000 R3000-R4000 R4000-R5000 R5000-R6000 Above R6 000					
	D1	What is the main source of income of this HH? [Circle only one option]	Employment (FT/PT/Casual)	01	Own enterprise activity	04	
			Social Grants	02	Remittances from family members	05	
			Other (please specify)	03			

General information

This information is gathered for each poultry participant only once.

1. Please indicate the type of poultry enterprise:
    a. Broilers- meat
    b. Layers – eggs
    c. Multipurpose – (traditional)

2. Please indicate the type of feed you use:
    a. Broiler starter Broiler finisher
    b. Layer mash
    c. Maize crush
    d. Other; specify.....

3. Please indicate where and how you source your feed.
    a. Are you in a bulk buying group y/n? .....

Name of supplier (e.g. Boxer in Matatiele, TWK in Cedarville or Local informal in village, bulk through SaveAct ect...)

.....
.....

4. Size of feed bags, or amount in Kgs (e.g. 2 x 50kg etc) AND PRICE
    .....
5. Transport arrangements (e.g. TAXI @R50/bag etc)
    .....
6. Please describe how much feed you provide (grams per day per bird... or an estimation of that and also mixes of rations and crush...)
    .....
    .....
7. What bio security measures do you have in place? (Hand sanitizers, foot baths etc,)
    .....
    .....

8. What disinfection procedures do you use after each batch of chickens? (please describe and name the product used as well as waiting period)
    .....
    .....
9. Do you keep records? If so, how?
    .....
    .....

10. Where do you source drinking water for the birds? (If rainwater is used, consider chlorine drops)
    .....

11. How do you dispose of the dead birds?
    .....
12. Challenges experienced with the flock or enterprise?
    .....
    .....

13. What have you learnt (New ideas, additional ideas/concepts) through your involvement?
    .....
    .....

14. Has this new information or these processes helped you? Has it encouraged you to do some things? What? Are you doing anything differently?
    .....
    .....
15. How? What has changed or improved?
    .....
    .....
    .....
16. Issues/ constraints/difficulties you would like to have covered which have not been.....
    .....
    .....
    .....

General comments about the poultry enterprise (by facilitator) and also any advice /assistance/ encouragement/ homework you gave them)):

Record keeping for broilers Date: from..... to.....

Area:..... Village:.....

Name and Surname: .....

Date of purchase: .....

Number of birds: .....

Equipment bought for this round (Item and price): .....

Brooding:

-Gas/electricity; Date of purchase..... Amount in Rands:.....

- Date of start of brooding..... Date of end of brooding.....

Vaccination and medication:

- Name of vaccination/medication .....

- Date of application .....

- No of birds treated.....

- Price in Rands.....

Mortality: Birds/day, birds/week or total number for present batch:.....

What do you use for floor shavings and how deep is it (in cm)? (Sawdust / dry manure)
.....

Do you have a lighting program? Yes/No. Please describe .....

Feed bought; type(starter, finisher, post finisher, maize crush), amount and price
.....
.....

Stock left over at the end of batch cycle? (e.g. 20kg starter..vaccines for 100birds...)
.....

Sales

How do you market your broilers?: (e.g. live to neighbours, or pension points ,or slaughtered as chicken pieces etc....).....
.....

What is your price per bird? .....

No of birds sold for this batch, or per week (if per week for how many weeks do you sell for each batch)

.....

No of birds consumed or bartered in this cycle or per week .....

Record keeping for Layers

Period: from..... to.....

Area:..... Village:.....

Name and Surname: .....

Number of laying hens: .....

Equipment bought for this round (Item and price): .....

Vaccination and medication:

- Name of vaccination/medication .....
- Date of application .....
- No of birds treated.....
- Price in Rands.....

Mortality: Birds/day, birds/week or total number for present batch:.....

What do you use for floor shavings and how deep is it (in cm)? (Sawdust / dry manure)
.....

Feed bought; type(layers pellets, layers mash, maize crush, other), amount and price
.....
.....

Stock left over at the end of batch cycle? (e.g. 20kg layers mash.. vaccines for 100birds...)
.....

Sales

How do you market your eggs?: (e.g. to neighbours, or pension points etc....)

.....
.....

What is your price per egg? .....Per tray of 6/12/30 eggs.....

No of eggs sold for this batch, or per week (if per week for how many weeks do you sell for)

.....

No of eggs consumed or bartered in this cycle or per week .....

Record keeping for indigenous chickens

Period: from..... to.....

Area:..... Village:.....

Name and Surname: .....

Number of birds in flock: .....No of hens/rooster(Ratio) .....

What is your price per bird?.....

Did you sell any birds in this period? How many?.....

How many birds were slaughtered for home consumption in this period? .....

How many eggs were consumed in this period? .....

What costs have you incurred? (e.g. feed, vaccines, housing etc) in this period?

.....

.....

Conservation Agriculture planting monitoring form 2022/23

Personal information

Name:
Age:
No. of years under CA:
No. of people in the homestead:
No. of children in the homestead:
Employment status:
Grants:
Type of grant (s) ☐ *Child Support* ☐ *Old Age* ☐ *care (fill in no of grants in blocks)*
Monthly income estimate:
Other farming activities:
Savings group/bulk buying group: Yes/No
Savings for inputs: Yes/No
Name of the savings group:
Years of involvement in saving group:
Learning group: Yes/No
Joint activity group: Yes/No

Location: Geography

Area:

Village name:

GPS coordinates:

Exact size of plot: trial ……..and control……

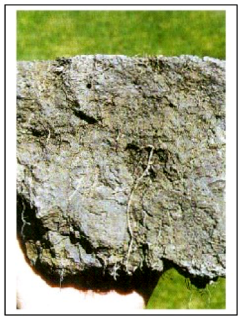
Soils (*Compare with control*)

	CONTROL	TRIAL
Soil colour (light, ave, dark) – for the soil type in the area		
Soil structure (aggregates) – 0,1,2 (from VSA)		
Porosity (Organic matter)- 0,1,2 (from VSA)		
Runoff- 0,1,2 from VSA		
Crust -yes/no		

Soil colour: Look at lightness- darkness of soil depending on soil type – look for organic matter.

GOOD CONDITION VS: 2
Dark coloured topsoil that is not too dissimilar to that under the fence line

MODERATE CONDITION VS: 1
The colour of the topsoil is somewhat paler than under the fence line, but not markedly so



POOR CONDITION VS: 0
Soil colour has become significantly paler compared with under the fence line

Soil structure: Look for size and density of clods- and whether there are nice porous aggregates or not

GOOD CONDITION VS: 2
Good distribution of friable finer aggregates with no significant clodding

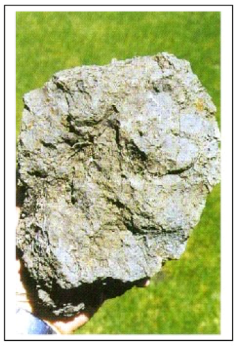
MODERATE CONDITION VS: 1
Soil contains significant proportions of both coarse firm clods and friable, fine aggregates

POOR CONDITION VS: 0
Soil dominated by extremely coarse, very firm clods with very few finer aggregates

Soil porosity: Again look for dense clods, more broken up or very friable, crumbly, with organic matter

GOOD CONDITION VS: 2
Soils have many macropores between and within aggrgates associated with readily apparent good soil structure

MODERATE CONDITION VS: 1
Soil macropores between and within aggregates have declined significantly but are present on close examination of clods showing a moderate amount of consolidation



POOR CONDITION VS: 0
No soil macropores are visually apparent within compact, massive structureless clods. The clod surface is smooth with few cracks or holes, and can have sharp angles

Run-off:

		
A field with good ground cover (residues)nod cover form the growing crops (living) shows no signs of water erosion or run-off after rain VS=2	Mild run-off visible in a field Rill are visible where the water has run and germination has been affected VS = 1	More severe run –off– debris is moved, soil is visibly washed away and very visible rills and small ditches and steps formed in the field VS=0

Description of trial and control: (e.g.) 400 m^2 plot, maize and beans intercrops (M+B), maize sole crops(M) beans sole crop(B), maize and cowpea (M+C) and cover crops (CC)

Plot	CA/Conc	Size (m^2)	No of plots/strips	Layout: (no1,2 3 or other)	Size of plots/strips
Control					
Blocks					
Strips					

Description of 'other': *fill in crop*

1	2	3	4	5	6	7	8	9	10

1. BLOCKS (10x10m) x 10 plots	1 M	2 M+B	3 SCC	4 M	5 M+B
	10 M+CP/Pk	SCC	8 M+B	7 M	6 SCC
2. Strips (2mx50m) x10 strips	1 M				
	2 M+B				
	3 SCC				
	4 M				
	5 M+B				

	6 SCC
	7 M
	8 M+B
	9 SCC
	10 M+CP/Pk
3. Fodder Strips (2mx50m) x 8 strips Short season maize PAN5A190=yellow PAN5A172=white	SSM
	B/WCC relay
	SSM
	Lespedeza
	SSM
	Tall Fescue
	SSM
	B/WCC relay

BEFORE/ AT PLANTING

Method of weeding

Name	Yes/No	Quantity sprayed in ml/16l knapsacks x no of knapsacks	Date of spraying/ weeding
Hand weeding			
Round up			
Dual Gold			
Gramoxone			
Comment on Efficiency of herbicide (which weeds are still present and which ones died?)			

Type of planter

Type of planter	Control	Trial	Date of planting
Hand hoe			
MBLI			

Matraka			
Haraka			
Oxen drawn planter			
2 row planter (tractor drawn)			
Ploughing			

Type of seed

Type of seed	Name	Control plot	Trial plot
Maize	PAN6479		
	PAN53		
	SC701		
	Colorado		
	Kalahari Early Pearl		
	Nelson's Choice		
	traditional		
	PAN5A190		
	PAN 5A172		
	Other:……		
Beans	PAN148		
	Gadra		
	Other…..		
	Dolichos (Lab-lab)		
Pumpkins	Flat White		
	Queensland blue		
	Traditional..		
Cowpeas	Mixed brown		
	Bechuana white		
Cover crops	Sun hemp		
	Sunflower		
	Millet		
	Fodder rye		
	Saia oats		
	Fodder radish		
Fodder crops	Lespedeza		
	Tall fescue		
	Turnip		
	Other……		

Fertilizer

Fertilizer name	Yes/No	Trial (amount) in kg	Control (amount) in kg

		-Micro-dosing -in rows -broadcast	-Micro-dosing -in rows -broadcast
MAP			
LAN			
Lime			
Other (incl manure)…			

Parameters	Plots			
		Control	blocks	Strips
% germination	**M**			
	B,C			
	CC			
Space between rows	**M**			
	B			
	CC			
% Canopy cover	**M**			
	M+B, M+C			
	B,C			
	CC			

Germination and growth

***Legend: M** – Maize, **B** – Beans and **C** – Cowpea, **(1 – 10)** = Plot number (s); Measure for 2 rows*

Pest Control

Issues: ……

Presence of pests on day of assessment: ……

Type of pest**: ……..**

Name	**Yes/No**	**Quantity sprayed in ml/16l knapsacks x no of knapsacks**	**Date of spraying**
Decis Forte			
Other; Name……..			

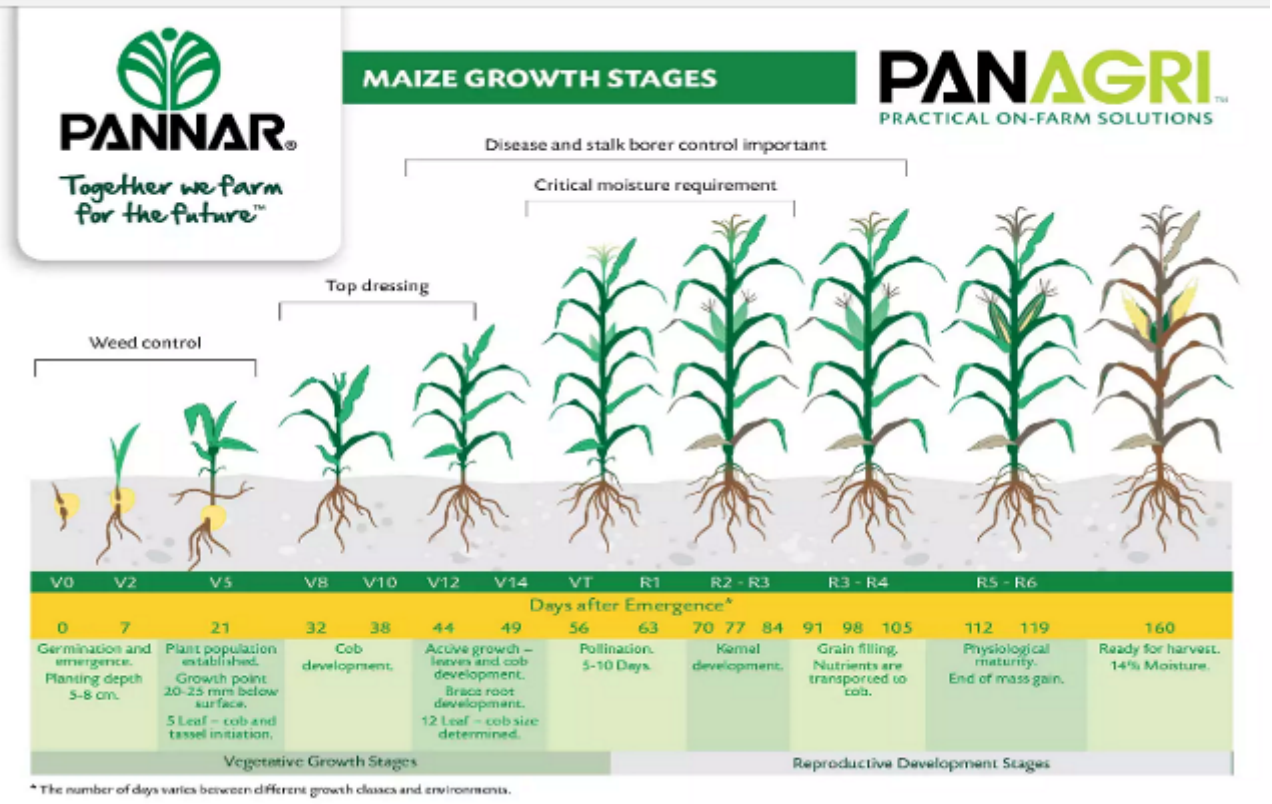
No. of times: ……..

NOTE; If there are unknown disease symptoms please take clear, close up pictures to accompany the form.

Weeding

Dates of weeding	**Weeding practise (handhoe, other tools, herbicide (name)**	**Comment (e.g weeded on time, too many weeds, not much problem, new weed present – name etc**
1st		
2nd		
3rd		

Crop Growth and height



Dates of monitoring	Crop name (e.g maize, beans, cowpeas, sunflower etc	Crop growth stage (use weeks if poss, otherwise days ,or leaf no eg V5)	Growth assessments (0= poor, 1=moderate, 2=good)	Comments (e.g stunted, reddish discolouration, yellowing of lower leaves, yellowing of veins or interveinal yellowing, virus symptoms, witling, other disease symptoms