



Regional training workshop report

“*In situ* conservation of crop wild relatives and diversity assessment techniques”

10-13 Novembre 2014, Le Meridien Hotel, Pointe aux Piments, Mauritius



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Introduction

The first regional training workshop on *in situ* conservation of crop wild relatives (CWR) and diversity assessment techniques was organized by the University of Mauritius (UoM), University of Birmingham (UoB) and Bioversity International, as part of the project '***In situ* Conservation and Use of Crop Wild Relatives in three ACP countries of SADC Region'** (SADC-Crop Wild Relatives for short), funded by the European Union (EU) through the Secretariat of the African, Caribbean and Pacific Group of States (ACP) Co-operation Programme in Science and Technology (S&T II). The training workshop was held at the Le Meridien Hotel in Pointe aux Piments, Mauritius, from 10–13 November 2014 and was attended by 27 participants from the three partner countries (Mauritius, South Africa and Zambia) and 11 other SADC countries.

The overall objective of the SADC Crop Wild Relatives project is to enhance the link between conservation and use of CWR in three representative ACP countries within the SADC region, Mauritius, South Africa and Zambia, as a means of underpinning regional food security and mitigating the predicted adverse impacts of climate change. One of the specific objectives of the project is to strengthen national capacities in the three partner countries to conserve and use CWR, and to help achieve this, two regional training workshops were planned. The first training workshop focused on *in situ* CWR conservation and diversity assessment techniques, and the second one will focus on CWR use aspects, in particular predictive characterization and pre-breeding. Although the project itself is working only within Mauritius, South Africa and Zambia, other ACP countries from the SADC region are also invited to attend so that an increased capacity for *in situ* conservation and use of CWR is developed in the region.

Objectives and programme of the training workshop

The workshop had three main objectives:

1. To strengthen capacities in the SADC region in planning and managing *in situ* conservation of CWR, namely in:
 - Creating CWR checklists and inventories
 - Prioritization of CWR for conservation
 - Conservation status assessment of priority CWR
 - Implementation of conservation priorities
 - Relevant policy for the conservation of CWR
2. To promote the use of the FAO [*Resource Book for the Preparation of National Plans for Conservation of Crop Wild Relatives and Landraces*](#)
3. To initiate the process of producing National Strategic Action Plans (NSAPs) for the *in situ* conservation of CWR.

The workshop was held over four days and included one field day. The theoretical work on *in situ* conservation of CWR, their diversity assessment and the development of national strategies included lectures, group work and practical exercises. The field day aimed at providing participants with an insight in the conservation and restoration activities being carried out in Mauritius for the *in situ* conservation of CWR.

The training curriculum, agenda and programme were developed by UoB in collaboration with Bioversity International. The workshop programme is provided in Annex 1.

Participants and resource persons

The workshop included 26 participants from SADC countries and six resource persons from UoB and Bioversity. Guest lectures were provided by Vincent Florens, Associate Professor of Ecology, Faculty of Science, UoM and Vikash Tatayah, Conservation Director of the Mauritian Wildlife Foundation. The project manager in Mauritius, Prof Yasmina Jaufeerally-Fakim, Dean of the Faculty of Agriculture, UoM also provided a lecture.

The participants from the SADC region came from 14 SADC countries as listed in Table 1. The participants from Madagascar and Comoros were sponsored by the regional cooperation project GERMINATION (Genetic Resources Management in Action towards an Indian Ocean Network). The SADC Plant Genetic Resources Centre (SPGRC) in Zambia sponsored the participation of Thandie Lupupa, its Senior Programme Officer for *In Situ* Conservation.

Table 1: SADC countries and number of participants per country (project partner countries in bold)

Country	Number of participants
Angola	1
Botswana	1
Comoros	1
Lesotho	1
Madagascar	1
Malawi	1
Mauritius	8
Mozambique	1
Namibia	1
Seychelles	1
South Africa	3
Tanzania	1
Zambia	4
Zimbabwe	1

The list of participants, resource persons and guest lecturers is provided in Annex 2.

Workshop implementation

Day 1 – Opening ceremony

The official opening ceremony was attended by Pro Vice Chancellor of UoM, Associate Professor Thanika D Juwaheer, and Dr Didier Slachmuylders representing the Indian Ocean Commission (IOC). A representative from the European Union office in Mauritius, Ms Lalita Nosib, and the Chief Executive Officer of the Food and Agricultural Research and Extension Institute (FAREI), Jairaj Ramkissoon also attended the opening ceremony.

The master of ceremonies was Professor Yasmina Jaufeerally-Fakim from UoM. As the host of the training workshop, she welcomed the participants and introduced the guest speakers. Dr Ehsan Dullo from Bioversity, project coordinator of the SADC Crop Wild Relatives project, also welcomed the guest speakers and participants to the regional workshop and thanked the organizers for their hard work. Dr Dullo also thanked the GERMINATION project in sponsoring two participants from Madagascar and the Comoros Islands in attending the regional training workshop. He said that it is good to see the collaboration between projects dealing with the conservation of plant biodiversity in the region. He then gave an overview of what CWR are and their importance for food security. He discussed the economic value, worth about US\$ 115 billion worldwide, that CWR bring to society in contributing valuable traits to crop improvement. As an example he mentioned the sweetness in tomato, which is due to a gene from a wild tomato. He pointed out that the conservation of CWR is a challenge. They would often fall between the cracks in conservation activities, as many of them grow in areas under the responsibility of the environmental ministries, while they are mostly of interest to the agricultural sector. The SADC CWR project, he said, was developed to support SADC countries and in particular the three project partner countries in their endeavour to conserve CWR at national level. He then introduced the objectives and work packages of the SADC CWR project.

Associate Professor (Mrs.) Juwaheer, Pro Vice Chancellor of UoM, extended her welcome to everybody present. She agreed that the objective of the SADC Crop Wild Relatives project, to enhance the link between CWR conservation and use is very important, as with the rapid economic development, most countries would be facing important challenges to conserve their biodiversity. She said that through this workshop countries would be supported in their conservation activities and expressed her wishes that this workshop may lead to recommendations for the better conservation of CWR. She invited the participants to roll up their sleeves and actively engage in the conservation of this important group of plants. She thanked the EU as donor of this project and declared the workshop open.

Dr Slachmuylders, Project Coordinator, Biodiversity Management in eastern and southern Africa – Indian Ocean, Indian Ocean Commission (IOC) talked about the specific Biodiversity project of the European Development Fund (EDF)/IOC. He said that the SADC Crop Wild Relatives project fits very well with the objectives of the EDF/IOC Biodiversity project in safeguarding the biodiversity of the SADC region. He gave a brief overview of the project and specifically mentioned the need to conserve landraces and neglected and underutilized species. He announced that the call for proposals for EDF/IOC project would be launched on 24th November 2014 and eligible countries would include the five member states of the IOC (Comoros, Madagascar, Mauritius and Seychelles) as well as Kenya and Tanzania. He called upon participants to take advantage of this call to further develop conservation strategies for biodiversity in the region.

Ms Thandie Lupupa, on behalf of Dr Paul Munyenembe, Director of the SADC Plant Genetic Resources Centre (SPGRC), extended a welcome to the guest speakers, participants and organizing institutions. She underlined the importance of the member countries of the SADC region to work together collaboratively in order to achieve regional goals of conservation and use of plant genetic resources. She said that the SADC Crop Wild Relatives project will help to look out of the box, since previous efforts have so far been on crops. This would be the first time that a regional project is addressing the *in situ* conservation of CWR. She confirmed that it is a challenge to address CWR conservation and use, as they fall under responsibility of two different sectors that often do not work together. She said that the training on development of strategies would not only benefit the three project partner countries but all SADC

countries. Besides national strategies it would be important to develop a regional priority list of CWR and a regional strategy, so that cross border activities could be addressed.

To conclude the opening ceremony, Dr Nigel Maxted from UoB delivered a keynote address on the planning and managing of CWR conservation. He first elaborated why CWR conservation and use should be addressed at global, regional, national and local geographic scales. He then illustrated existing initiatives to conserve and use CWR, such as the establishment of the first genetic reserve for CWR conservation in the UK, the European Cooperative Programme for Plant Genetic Resources (ECPGR) *In Situ* and On-farm Conservation Network, other EU funded projects addressing CWR such as [PGR Forum](#), [AEGRO](#) and [PGR Secure](#), and the project implemented by the [Global Crop Diversity Trust on CWR collecting, ex situ conservation and pre-breeding](#). As future prospects for conservation and utilization of CWR, he highlighted the development of *in situ* networks of CWR populations, *ex situ* targeted sampling, predictive characterization to identify traits for crop improvement, user-based informatics that allow better management of the complex data related to CWR conservation and use, and the further development of a policy framework.

Day 1 – Introduction of workshop objectives, participants, resource book and group presentation exercise

Workshop objectives and participants

After a brief introduction to the workshop objectives, an overview of the programme and announcement of some logistic issues by Imke Thormann (Bioversity), all 26 participants and 6 resource persons introduced themselves. Each participant was asked to say in which of the following four categories that are relevant for CWR conservation and use his or her work would fit: environmental sector, agricultural sector, policies and other. The fourth category 'other' was for participants mainly active in teaching or social sciences. Some participants explained that their work relates to both the agricultural and environmental sectors. Eleven participants related themselves to the environmental sector, the work of 23 participants regards the agricultural sector, 3 participants are actively working in the policy area and 3 participants classified themselves in the category 'other'.

Resource book

A presentation on the FAO Resource Book for the Preparation of National Plans for Conservation of Crop Wild Relatives and Landraces was given by Joana Magos Brehm (UoB). This resource book is one of the main references the project and many of the lectures during the training workshop would make reference to. Furthermore the resource book will be used during the project to develop a tailor-made toolkit for the SADC region to support the development of NSAPs for CWR conservation.

Group presentation exercise

The introductory session concluded with the explanation of the group presentation exercise by Shelagh Kell (UoB), which will be carried out at the end of the training workshop. The exercise intended to consolidate participants' understanding of the topics in which training would have been provided by applying them in the context of the development of national CWR conservation strategies in their own countries. The group presentations would also enable the workshop trainers to ascertain whether all necessary facets of the topics covered during the workshop had been effectively delivered and to ensure that any outstanding issues requiring clarification could be elaborated during question and answer

sessions. The countries were requested to work in three groups, based on the geographies of their respective home countries: the islands, the coastal countries and the landlocked countries. Each group was requested to work together during the free time available across the four days of the training workshop to prepare a short presentation outlining some of the key factors and issues related to the different steps of the national CWR conservation strategy planning process that they would learn about during the workshop. More details about the group presentations are included in Annex 3.

Day 1 – Lectures and exercises

The day 1 training focused on the identification and prioritization of CWR as well as on diversity analysis of priority crops. The following lectures were provided:

- Creating a national CWR checklist
- Setting priorities for the conservation of CWR: methods and case studies
- Creating a national CWR inventory
- Ecogeographic survey and data analysis
- Ecogeographic data acquisition and verification
- Genetic data in conservation planning
- Gap analysis, species richness and complementarity analysis, climate change data analysis

After the lectures the three partner countries provided brief presentation on progress of their work on the CWR checklist development and prioritization.

During the wrap-up session of day 1, a discussion session was organized such that participants would provide feedback on what new information they had learned and what topics they found challenging. The results of this discussion session are presented in Table 2.

Table 2: Topics that were new to participants and topics they found challenging.

New information	Challenging topics
There are mainly 4 blocks of information when creating a CWR checklist	Genetic data diversity
Resource book/toolkit	Ecogeographic database structure
Compiling checklist	Ecogeographic data analysis
Data verification tool – GEOQUAL (CAPFITOGEN tools)	Criteria for CWR prioritization
Link climate change and conservation of CWR using GIS	Standardization of data for prioritization
Everything!	Use of GIS to locate areas to conserve CWR

Day 2 – Lectures and exercises

The second day of the training workshop focused on implementation of conservation priorities, information system and data management, and the NSAP development and implementation.

The morning session of day 2 included two guest lectures. Vincent Florens from the Department of Biosciences of the UoM gave an overview of biodiversity conservation in Mauritius. Vikash Tatayah, Conservation Director at the Mauritian Wildlife Foundation provided an overview on “*in situ* conservation: restoration experience from Mauritius and Rodrigues islands”.

The following lectures were provided by UoB and Bioversity resource persons:

- *In situ* conservation: genetic reserve design
- *In situ* conservation: genetic reserve management
- *In situ* conservation: monitoring CWR diversity
- Conservation: working with local communities
- Seed collecting
- Information system and data management
- Relevant policies for the conservation of CWR

Thandie Lupupa introduced participants to existing policies on PGRFA relevant to the SADC region, in particular the Convention on Biological Diversity, the International Treaty on Plant Genetic Resources for Agriculture and the Nagoya Protocol.

During the wrap-up session of day 2 participants were requested to form three groups to address the following three questions:

- Which topic (or topics) did you find particularly useful?
- Which topic (or topics) did you find less useful, if any?
- Are there any topics from days 1 or 2 that you require further help with? Which ones?

While all topics were considered useful, several were highlighted as particularly useful: policy context, *in situ* conservation, information and data management, and restoration. No topic was considered less useful. Participants identified information and data management, and the toolkit usage as topics that they would require further help with.

Day 3 – Field visits

The field day included visits to several places in the Black River Gorges National Park and a visit to the Ebony Forest restoration project nursery in the southwest of the island. The visit to the National Park was assisted by personnel from the National Parks and Conservation Service, Ministry of Agroindustry and Food Security.

Participants were able to visit conservation sites active in preserving the local flora and fauna of the island. Within the National Park, a number of actively managed areas, called Conservation Management Areas (CMAs), have been established to control invasive species which are outcompeting local indigenous and endemic species. Participants visited the Conservation Management Area at Le Petrin, where populations of the wild relative of coffee, *Coffea macrocarpa*, are found. A second site in the National Park, where a new CMA is being created to protect the main population of a second wild relative coffee species, *C. mauritiana*, was also visited. The delimitation of the populations *in situ* was explained to participants and field data collection was also discussed on site.

A visit to the nursery of the ebony forest restoration project, a privately-run project, provided the opportunity to discuss details and challenges of forest restoration with the project manager Christine Griffiths. This project also shows the engagement of the private sector in the protection of biodiversity in Mauritius.

Day 4 – Lectures and exercises

Lectures and exercises on day 4 focused on an introduction to geographical information systems (GIS) and the use of the open source software GIS program Diva-GIS.

The following lectures were provided:

- Geographic Information Systems and its applications for *in situ* conservation
- Introduction to diversity analysis and its implications
- Species distribution modelling
- Introduction to the CAPFITOGEN¹ tools.

All participants had been requested before the workshop to download DIVA-GIS on their laptops to allow a practical introduction to DIVA-GIS during the workshop. The participants were guided through a series of exercises to learn the basic functions of this software and the implementation of diversity analyses for *in situ* conservation of CWR.

Day 4 – Group presentations, workshop evaluation and closure

Group presentations

Group presentations about key factors and issues related to the steps of the national CWR conservation strategy planning process were provided by Mauritius and South Africa. Both countries provided information related to 12 points as guided by the exercise description (Annex 3):

1. The size and diversity of the national floras
2. Published Floras and/or checklists and whether they are available in electronic format
3. Ecogeographical aspects (e.g., geography, topography, landscape and habitat types), including particularly species rich areas or habitats, and/or those affected by threatening factors
4. Types, number and status of protected areas
5. Crops cultivated in your countries
6. Suggested criteria for prioritizing CWR
7. Potential sources of ecogeographic data for CWR conservation planning (distribution, environmental and genetic data)
8. The types of diversity analysis that you think may be most appropriate to use for CWR conservation planning in your countries
9. Existing *in situ* sites where active plant conservation is undertaken and national *ex situ* conservation facilities
10. Local community involvement in plant conservation activities

¹The CAPFITOGEN Program (<http://www.planttreaty.org/capfitogen>) for the Strengthening of the Capacities of the National Programmes on Plant Genetic Resources in Latin America, funded by the Spanish Government and implemented by the International Treaty on Plant Genetic Resources for Food and Agriculture (ITPGRFA), has developed a series of tools that improve, adapt and facilitate the use of methodologies for ecogeography analysis and GIS.

11. Data management of plant genetic resources
12. National and/or regional conservation policies relevant to CWR conservation

The floor was opened for questions and discussion following each presentation and the participants and resource persons were able to highlight some issues that required clarification. In particular, some of the criteria for prioritization of CWR in both countries were not clear and the resource persons were able to provide guidance on how to clearly define the criteria to avoid any ambiguity. Another issue highlighted was the particular value of the wild flora of Mauritius compared with continental countries. Due to Mauritius having a relatively small flora, a high level of endemism (both taxonomic and most likely genetic), and few native wild relatives of food crops, the resource persons proposed that it would be beneficial to consider the potential value of a wide range of crop uses when creating and prioritizing the national CWR checklist—for example, including ornamentals. The use of the taxa listed in Annex I of the ITPGRFA as a basis for prioritization was discussed and it was pointed out that the list is not based on food security statistics but on political decisions of the countries. Therefore, the use of FAO statistics on nutrition and economic value are probably more useful and informative for prioritization.

Evaluation

A workshop evaluation was carried out through two questionnaires—one addressing the logistics and the second addressing the content—that the participants were requested to fill in. All participants were also invited to register on the Bioversity training database.

Closure

During the closing session, Thandie Lupupa (SPGRC) gave a vote of thanks to the organizers and resource persons. Dr Ehsan Dulloo (Bioversity), SADC CWR global project coordinator, highlighted the key topics that participants were exposed to during the week. He hoped that participants would now be able to create their national checklist and inventory of CWR, to carry out ecogeographic surveys and/or studies and gap analysis, to use genetic data and to prioritize their CWR species for *in situ* conservation. He also wished that participants have gained a good understanding of the factors to be taken in to account in the design, establishment and management of genetic reserves for CWR, including policy issues and involvement of local communities. He highlighted that monitoring wild populations of CWR is very important to ensure that the *in situ* conservation interventions are working. Participants were also exposed to GIS tools like DIVA-GIS and urged participants to use these tools. In conclusion Dr Dulloo said that these skills are important to enable countries prepare their NSAPs, which is the main goal of the project. He thanked again the local organizers, hotel personnel and SPGRC representative for facilitating the attendance of participants from other SADC countries.

Annexes to workshop report

Annex 1. Workshop agenda

Monday 10th November 2014		
	OFFICIAL OPENING CEREMONY	
09:15 – 09:20	– Welcome address	Yasmina JAUFEEALLY-FAKIM (UoM)
09:20 – 09:30	– Introduction of SADC CWR project from coordinator	Ehsan DULLOO (Bioversity)
09:30 – 09:35	– Address by Pro Vice-Chancellor (Planning and Resources)	Thanika D JUWAHEER (UoM)
09:35 – 09:45	– Presentation on the EDF/ IOC biodiversity project	Didier SLACHMUYLDERS
09:45 – 9:50	– Welcome remarks from SADC Plant Genetic Resource Centre	Thandie LUPUPA (SPGRC)
09:50 – 10:05	– Speech from the Permanent Secretary of Ministry of Agro-Industry and Food Security	Ashis KumarHOOLAS
10:05	– Keynote address: Planning and managing CWR conservation	Nigel MAXTED (UoB)
11:00 – 11:15	COFFEE	
	INTRODUCTION	Chair: Ehsan Dullo
11:15	– Workshop objectives and programme overview – Participant introductions	Imke THORMANN (Bioversity) + All
11:35	– A toolkit for developing a ‘National Strategic Action Plan’ for the conservation of CWR	Joana MAGOS BREHM (UoB)
	INTRODUCTION TO THE GROUP PRESENTATIONS	
11:45	– Explanation and preparation of the group presentations to be presented on Thursday	Shelagh KELL (UoB)
	IDENTIFICATION AND PRIORITIZATION OF CWR	
11:55	– Creating a national CWR checklist	Nigel MAXTED
12:15	– Setting priorities for the conservation of CWR: methods and case studies	Shelagh KELL
12:55	– Creating a national CWR inventory	Joana MAGOS BREHM
13:15	– Report on CWR checklist creation and prioritization	Project countries

13:30 – 14:30	LUNCH	
	DIVERSITY ANALYSIS OF PRIORITY CWR	Chair: Hannes GAISBERGER (Bioversity)
14:30	– Ecogeography survey and data analysis	Nigel MAXTED
15:15	– Ecogeographic data acquisition and verification	Joana MAGOS BREHM
15:45 – 16:00	COFFEE	
	DIVERSITY ANALYSIS OF PRIORITY CWR (cont.)	Chair: Imke THORMANN
16:00	– Genetic data in conservation planning	Yasmina JAUFERALLY-FAKIM
16:30	– Gap analysis, species richness and complementarity analysis, climate change data analysis	Nigel MAXTED
17:30	– Identification of sources of ecogeographic data (group work)	Joana MAGOS BREHM + All
18:15	– Wrap-up discussion, day 1	Ehsan DULLOO + All
18:30	CLOSE OF WORKSHOP, DAY 1	

Tuesday 11th November 2014

	IMPLEMENTATION OF CONSERVATION PRIORITIES	Chair: Shelagh KELL
09:15	– <i>In situ</i> conservation: biodiversity conservation in Mauritius	Vincent FLORENS (UoM)
10:15	– <i>In situ</i> conservation: genetic reserve design	Nigel MAXTED
11:15 – 11:30	COFFEE	
	IMPLEMENTATION OF CONSERVATION PRIORITIES (cont.)	Chair: Shelagh KELL
11:30	– <i>In situ</i> conservation: monitoring CWR diversity	Ehsan DULLOO
12:30	– <i>In situ</i> conservation: restoration experience from Mauritius and Rodrigues islands	Vikash TATAYAH (MWF)
13:00 – 14:00	LUNCH	
14:00	IMPLEMENTATION OF CONSERVATION PRIORITIES (cont.)	Chair: Yasmina JAUFEEARALLY-FAKIM
14:00	– Conservation working with local communities	Ehsan DULLOO
14:45	– Seed collecting	Nigel MAXTED
	INFORMATION SYSTEM AND DATA MANAGEMENT	
15:15	– Information system and data management - introduction	Imke THORMANN
15:45 – 16:00	COFFEE	
	INFORMATION SYSTEM AND DATA MANAGEMENT (cont.)	Chair: Joana MAGOS BREHM
16:00	– Information system and data management - practical	Imke THORMANN
	NATIONAL STRATEGIC ACTION PLANS DEVELOPMENT AND IMPLEMENTATION	
17:00	– Relevant policies for the conservation of CWR	Ehsan DULLOO
17:30	– Existing policies on PGRFA in the SADC region	Thandie LUPUPA
18:00	– Wrap-up discussion, day 2	Shelagh KELL + All
18:15	CLOSE OF WORKSHOP, DAY 2	

19.30

SOCIAL DINNER

Wednesday 12th November 2014

08:30 – 17:30	FIELD DAY	Ehsan DULLOO + All
08:30	Depart from hotel*	
10:00 – 12:30	<ul style="list-style-type: none"> – Field work in the Black River Gorges National Park – Identification of CWR in Protected Areas – Population sampling strategies for data collection (delimitation of populations), data collection from the field using field collection template 	Assisted by personnel from National Parks and Conservation Service
12:30 – 13:30	Lunch	
13:30 – 16:00	Visit to restoration sites in Black River Gorges National Park and conservation activities in National Park	National Parks and Conservation Service, Mauritian Wildlife Foundation
17:30	Back to hotel	

*Pick-up of Mauritian participants in Reduit.

Thursday 13th November 2014		
	GIS ANALYSIS FOR <i>IN SITU</i> CWR CONSERVATION PLANNING	Chair: Nigel MAXTED
08:30	– Geographic information systems – introduction	Hannes GAISBERGER
09:00	– An introduction to DIVA-GIS (practical)	Hannes GAISBERGER + All
10:45 – 11:00	COFFEE	
	GIS ANALYSIS FOR <i>IN SITU</i> CWR CONSERVATION PLANNING (cont.)	Chair: Nigel MAXTED
11:00	– An introduction to DIVA-GIS (practical)	Hannes GAISBERGER + All
13:00: – 14:00	LUNCH	
	GIS ANALYSIS FOR <i>IN SITU</i> CWR CONSERVATION PLANNING (cont.)	Chair: Nigel MAXTED
14:00	– Training DIVA-GIS (practical)	Hannes GAISBERGER + All
15:45	– Using CAPFITOGEN tools for ecogeographic diversity analysis	Imke THORMANN
16:15	– Species distribution modeling and climate change analysis	Hannes GAISBERGER
16:45– 17:00	COFFEE	
	GROUP PRESENTATIONS	Chair: Ehsan DULLOO
17:00	– Group presentations and discussion	Shelagh KELL + All
18:00	– Workshop evaluation	Imke THORMANN + All
18:15	– Final wrap-up discussion	Ehsan DULLOO + All
18:30	CLOSE OF THE TRAINING WORKSHOP	

Bioversity (Bioversity International), MWF (Mauritian Wildlife Foundation), SPGRC (SADC Plant Genetic Resources Centre), UoB (University of Birmingham), UoM (University of Mauritius)

Annex 2. List of participants, resource persons and guest lecturers

Participants

Participants from Mauritius (9)

NAME	Affiliations	Email address
Mr Yacoob Mungroo	Agronomy Division , Ministry of Agro Industry and Food Security	yamungroo@govmu.org
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Participants from Zambia (3)

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Ms Milimo Kaula	Wildlife Ecologist Zambia Wildlife Authority Private Bag 1, Chilanga, Zambia	milimo30@gmail.com

Participants from South Africa (3)

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SPGRC participant (1)

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SADC participants (9)

NAME	Affiliations	Email address
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Participants from Germination Project (2)

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Guest lecturers

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Associate Professor of Ecology
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Vikash Tatayah

Conservation Director
Mauritian Wildlife Foundation
Co-Chair, IUCN/SSC Mascarene Island Specialist Group

Annex 3. Group presentations exercise

Purpose

The purposes of the group presentations are to:

1. Consolidate participants' understanding of the topics in which training has been provided by applying them in the context of the development of national CWR conservation strategies in their own countries
2. Enable the workshop trainers to ascertain whether all necessary facets of the topics covered during the workshop have been effectively delivered and to ensure that any outstanding issues requiring clarification can be elaborated during question and answer sessions

Working groups

Participants are requested to work together in three groups according to the countries they are representing, as follows:

1. The island nations: Comoros, Madagascar, Mauritius and Rodrigues, Seychelles
2. Coastal nations: Angola, Mozambique, Namibia, South Africa, Tanzania
3. Land-locked nations: Botswana, Lesotho, Malawi, Zambia, Zimbabwe

These groups are defined according to factors related to geography that may result in some common issues arising during the national CWR conservation planning process. For example, island nations tend to have particularly high levels of endemism coupled with extreme problems with invasive species, habitat degradation and species extinction, while coastal nations are likely to share the common issue of coastal development leading to loss of unique and important CWR habitats.

Preparation

Each group will work together during the free time available across the four days of the training workshop to prepare a short presentation (max. 15 minutes) outlining some of the key factors and issues related to the different steps of the national CWR conservation strategy planning process that you will learn about during the workshop (Figure 1). The intention is to apply what you learn during the four days to the situation in your home countries as a peer group and to identify common issues or differing aspects that make your country unique. We do not wish to be prescriptive and therefore we do not expect you to work to any particular structure or required content. However, for guidance, you may consider including information on:

1. The size and diversity of the national floras of the countries in your group and any knowledge you might have about the CWR that occur there (whether native or introduced)
2. Published Floras and/or checklists and whether they are available in electronic format
3. Ecogeographical aspects (e.g., geography, topography, landscape and habitat types), including particularly species rich areas or habitats, and/or those affected by threatening factors
4. Types, number and status of protected areas in your countries
5. Crops cultivated in your countries, which ones are of particular economic importance, and which are important to a number of countries in the region
6. Suggested criteria for prioritizing CWR in your countries

7. Potential sources of ecogeographic data for CWR conservation planning (distribution, environmental and genetic data)
8. The types of diversity analysis that you think may be most appropriate to use for CWR conservation planning in your countries
9. Knowledge of existing *in situ* sites where active plant conservation is undertaken and of national *ex situ* conservation facilities
10. Local community involvement in plant conservation activities
11. Data management of plant genetic resources in your countries
12. National and/or regional conservation policies relevant to CWR conservation

We do not expect you to spend a lot of time gathering information in advance of the workshop but you may choose to come prepared with any relevant documents and files on your laptops that contain information that may be useful. We do not expect you to carry country Floras or other heavy books to the workshop for the purposes of this assessment!

Delivery

Each group will give their presentation during the final workshop session on Thursday 13th November. As they will be short presentations, you may wish to nominate one speaker, or you may prefer to share the task, as you see fit. This will be an informal session during which the participants and trainers will ask the speaker(s) questions after each presentation, the intention being to consolidate and strengthen the learning process. Please note that you are not being assessed as individuals or as groups. The group presentations are a means of strengthening participants' learning and of providing the trainers with an opportunity to evaluate the effectiveness of the training provided and identify potential future training needs and areas where ongoing support is likely to be required.

Support

The workshop trainers will be available to provide you with support during the workshop so if you have any questions about the group presentations, please ask any of us and we will provide you with guidance.

Reference

Maxted, N., Avagyan, A. Frese, L., Iriondo, J.M., Kell, S.P., Magos Brehm, J. and Singer, A. (2013) *Preserving diversity: in situ conservation of crop wild relatives in Europe – the Background Document*. Rome, Italy: *In Situ* and On-farm Conservation Network, European Cooperative Programme for Plant Genetic Resources. www.pgrsecure.org/documents/background_document.pdf