

# Gender Integrated Participatory Varietal Selection training (PVS) in Ethiopia

Monday, 12th to Wednesday, 14th January 2015.

Lalibela Auditorium, International Livestock Research Institute (ILRI)  
Campus, Addis Ababa, Ethiopia



2015



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**Gender Integrated Participatory Varietal Selection training (PVS) in Ethiopia**  
Workshop Report

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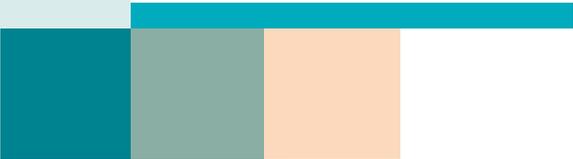
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# Introduction

To ensure integration of gender into research themes within RTB the project ‘Integrating gender in RTB thematic research to enhance development outcomes’ was approved and funded by RTB for implementation in 2013-2014. This workshop on integrating gender into Participatory Varietal Selection (PVS) for potato in Ethiopia was funded through the integrating gender project. Although there is increasing recognition of the importance of integrating men’s and women’s needs in varietal development, scientists and partners often point to the lack of tools and knowledge on how to do this. As part of CGIAR Research Program for Roots Tubers and Bananas, CIP (International Potato Center) is increasingly implementing and experimenting with approaches, tools and materials to address gender analysis and improve gender responsiveness and effectiveness in seed system interventions, of which Participatory Varietal Selection (in this case using Mother and Baby Trials) is one of them. The purpose of the workshop was to introduce a gender-mainstreamed Mother and Baby Trial Methodology to National Partners as well, in preparation for roll-out of Mother and Baby Trials in Ethiopia in 2015.

## Objectives and outputs

The workshop intended to build the capacity of CIP National Partners in Ethiopia to implement Mother and Baby Trials as well as to strengthen skills to integrate gender into PVS trials research processes and methods. Another area of focus also included analysis of data and information collected through Mother and Baby Trials.

At the end of the workshop, CIP's national research partners and extension officers were equipped with skills and tools to integrate gender into PVS in potato varietal selection in Ethiopia. Partners also developed regional work plans for implementing gender-responsive Mother and Baby Trials in Ethiopia with partial funding from RTB as well as in other on-going M&B trial activities in Ethiopia. .

## Workshop opening

The workshop was split into three days with the first day focusing on introducing concepts and methods: Gender concepts, PVS and the Mother and Baby trial design. Day two focused on practices and tips for facilitating gender-responsive Mother and Baby Trials using presentations, sharing of experiences by participants, group activity, and role playing as learning tools. The third day mostly focused on data base management.

The workshop was opened by Asrat Amele who welcomed the participants and outlined the objectives of the three-day workshop.



# Day 1

## Introducing concepts and methods

### Introduction to PVS

Asrat Amele introduced the objectives of the breeding program in Ethiopia, and gave a background and introduced the concept of Participatory Varietal Selection to participants. In these presentations he highlighted the importance of considering farmer (both men and women) preferences and incorporating these in breeding projects. He gave an example of the Southern Region in Ethiopia where the farmers had not adopted a new sweetpotato variety because they did not understand the quality of the varieties and the varieties did not meet their needs. He also emphasized the need to understand the objectives of breeding programs as this can also influence the type of varieties that are selected. In the second part of the presentation he introduced what PVS is and what its objectives are, as well as steps in PVS.



### Questions and Comments

These two presentations elicited a number of questions and comments from the participants:

#### **What are the legalization requirements of farmers' varieties for registration?**

Several steps have to be followed:

- Carry out performance trials in specific sites

- Request permission from the necessary authorities and stakeholders to multiply
- Describe the variety or characterize it
- Carry out trials
- Then present it to the public

#### What are the prerequisites for PVS?

- Variety development is supply and demand driven and the two pathways are complementary. Each of the two pathways works under different contexts and depends on the objective of the program. The main prerequisites of PVS are:
- Formation of a representative consortium integrating farmers, researchers, development actors, among other interested parties.
- Involvement of village and local authorities.
- Involvement or feedback to formal variety release agency.
- Medium-term commitment of all consortium members to participate:  $\geq 3$  years.
- Genuine interest of all consortium members to collaborate and interact horizontally.
- Regular field visits, regular meetings to share progress and results, and communication overall.
- Clear leadership and identification of the coordinator.

#### Standardization of PVS Technology and possibility of integrating farmers into future breeding programs

The PVS Technology can be standardized for use by many farmers. Farmers can be involved in future breeding programs in Ethiopia. The most important aspects are to recognize the demand for such integration and to identify the farmers' needs. Farmers can be involved in PVS programs in the following ways:

- Breeders can consult both men and women farmers in order to set more realistic goals and choose more appropriate parents.
- Farmers can evaluate material grown on the research station.
- Farmers can select testing sites and management practices.
- Farmers can collaborate by growing and selecting breeding materials in their own fields.

## Introducing concepts of gender and gender mainstreaming in relation to PVS

Two approaches were used to introduce gender concepts. The first one was a presentation introducing gender concepts, the second was an activity called 'Power Walk,' which involved participants role-playing as different characters (see attached document for instructions on how to facilitate this activity). The last presentation focused on introducing gender mainstreaming into PVS.

The introduction to gender concepts presentation introduced definitions of gender, how it is different from sex, as well as definitions of key gender terms such as gender division of labor, access to and control of resources and benefits, gender equality, women's empowerment, practical gender needs, strategic gender interests, and gender-blind approaches. This presentation did not elicit any questions or comments from the participants.



1 DAY 1 SESSION 2  
INTRODUCTION TO GENDER.PPT

For the Power Walk activity, participants were arranged in one line shoulder-to-shoulder facing the same direction. Participants randomly picked characters from a bowl (and did not share their character identity with anybody). Participants were asked to listen to the statements and if their character would answer yes to the statement read, they were to move forward and if it was a no they moved backwards. At the end of the session, workshop participants were asked to share their identity and explain why they were standing where they were standing, and how they felt moving forward and leaving others behind/ or moving backwards and being left behind; what different power relations were demonstrated by the results and patterns in the exercise; and what they had learned from the activity and what that meant for their work plan.



DAY 1 SESSION 2 ACTIVITY 1  
POWERWALK ETHIOPIA.PPT

## Sample of responses

**Female Journalist aged 26:** “I am a female journalist who has an education. I have no limitations (I have education, a good job/career, money, power, and I am single) so with every statement that applied to me, I moved forward and that felt really good. I make my own decisions and can access all resources that I need even at my place of work.”

**Widowed single mother with three children, ages 12, 6 and 8:** “I have no husband to support me and I am not working. As you can see I kept moving backwards because it’s like life is against me at all times. I cannot even afford food for my children to have at least two meals a day in all seasons and no one listens to me in the community, and neither can my children be treated equally with others because our situation is pathetic.”

**Female Agriculture Minister:** “I am a female Minister of Agriculture. You bet I went the furthest forward of everybody else. Life is good for me. My children can get what they want. I make my own decisions even for my country. I am in control of my life and I am enjoying who I am.”

### The main learning points for this activity were:

- Individuals’ access to rights is shaped by their social position and their power relative to others in their society.
- A person’s social position (or relative power) is affected by their age and gender (as well as by other social characteristics such as ethnicity, class, sexual orientation, and disability).
- Development interventions can increase or decrease power imbalances and inequalities.

The second presentation covered the topic of gender mainstreaming into PVS. It mainly focused on reasons and objectives to mainstream gender into PVS.

Gender mainstreaming in PVS is important, mainly to meet two broad objectives: 1) to achieve equality where men and women should enjoy equal opportunities. If women, for example, do not have equal access to information regarding new crop varieties or ways of farming, they cannot compete equally; 2) to achieve efficiency, since if women have no opportunities to participate in selection of varieties, their preferred traits may be ignored and this may have a negative effect on agricultural productivity and household food security. Furthermore, participatory research that involves all categories

of farmers is regarded as one of the pre-requisites to adoption.



**After the presentations, some participants had the following questions:**

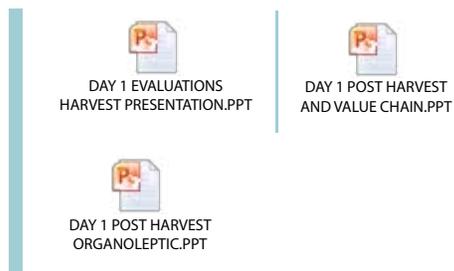
**What happens when a woman and man from a Male Headed Household have conflicts in selection of varieties?**

One of goals of PVS is to provide farmers with a basket of choices. To be able to draw conclusions regarding the trend and what type of varieties should be adopted by MHH, then it is necessary to involve more women and men from other MHH to establish a trend before making conclusions on the basis of just one household. Care must be taken to explain that it is not possible to provide each and every man and woman with their own choices, but there have to be some varieties that are preferred more commonly in the community.

## Introducing Mother and Baby Trial Design

During this session there were several presentations focusing on: 1) introducing the concepts of Mother and Baby, including summarizing the differences between mother and baby trials; 2) an additional four presentations focusing on the different phases of M&B trials, including presentations on evaluation at the vegetative/flowering stage, evaluation at harvest, post-harvest evaluation and value chain, and finally post-harvest organoleptic evaluation. Participants were given an opportunity to ask question for clarification, and after the presentations and clarification questions they were split into two groups for an exercise on planning PVS to ensure that gender is integrated at every stage of PVS.





The discussions at each stage/phase of PVS also focused on a description of what is expected at each stage of the Mother and Baby trials; some of the tools and methods that can be used; which partners are involved; and what measurements are taken at each stage.

### Questions and comments

#### Can one determine the plot size for Mother and Baby trials?

Yes one can determine the plot size, but the bigger the size the better unless one is limited by the amount of seed at hand.

#### How does one handle analysis of baby trials in different locations?

There are different options to analyze data from baby trials. We can use both quantitative and qualitative methods. If the data recorded from baby trials are quantitative, then we can consider each baby as an incomplete block and perform analysis as per incomplete block statistical design. If the data recorded are qualitative, then we can still use non-parametric statistics. So a number of options are available, and a CIP PVS protocol addresses data analysis of baby trials.

#### What if farmers give the worst plots on their land for Baby Trials and then performance is high?

This is good, because the farmers will have a positive impact while sharing their experiences with other farmers about the particular varieties in question performing well under the poorest conditions or in the worst part of their field.

#### During the ranking exercise using grains, is it possible that a farmer can put all the grains under one variety?

No, it is not possible. As the researcher and/or extension officer, one explains to the farmers how the ranking criteria work: each farmer is strictly given

six grains only, and has to choose the first three important varieties to him/her: three grains go for the most important variety chosen, two to a less important variety, and one grain to the least important variety.

#### How does one handle multiple realities when farmers decide to come up with more than one variety of clones as their best in a given area?

PVS is about offering a basket of choices to farmers, so it is agreeable to have a number of varieties with different qualities and characteristics in one area; for example, one variety that is high-yielding and another that has characteristics for home consumption, such as good taste and fast cooking qualities.

#### What if farmers select varied clones?

It is very difficult to deliver a clone for every individual farmer, hence it is important to cluster the farmers into groups and see the most preferred clone in each group. Try and target the majority of farmers that have selected a certain clone to be able to meet their needs in the group. Being specific to each farmer may prove costly in provision of varieties to meet individual taste, so one has to be careful not to commit to this option.

### Activity:

#### How can you plan M&B trials to ensure that gender is integrated at every stage of the process?

The participants were divided into two groups and asked to draw from what they knew about PVS and the discussions and presentations throughout to answer the following questions: Thinking out all the stages and processes involved in M&B trials, how can you make sure that M&B trials are gender-mainstreamed? At the end of the session, group representatives presented a summary of group discussions to the rest of the participants:

1. Involve women at every stage in the M&B process, including where farmers define what they are looking for in a variety.
2. Talk to partners who work with women to make sure women can be reached and that they are also recruited to participate. There is also a need to recruit women facilitators to talk to women and convince them.
3. Conduct a Participatory Rural Appraisal in the

community through Focus Group Discussions: discussions should include both men and women from Male Headed Households and Female Headed Households.

4. Farmer selection to include both men and women: 50:50 ratio or at least 30% women and 70% men, but aim to achieve a balance on the basis of economic and social status and age. Plan to have two farmer groups: women only, and men only.
5. Select the sites where to conduct the PVS and plan to implement the evaluation process.
6. Evaluate at every stage of the PVS process and make sure both men and women participate: flowering stage, harvest, and post-harvest evaluations.
7. After evaluations, plan for a stakeholder meeting with everyone involved in the community and disseminate the results: next course of action.







## Day 2

Day 2 started with settling down and a brief recap of the presentations and discussions from Day 1. The recap was followed by the presentations and activities for the day. On Day 2 there were more participatory exercises and fewer presentations than Day 1, so participants got hands-on practical knowledge and information from role-playing.

### Integrating Gender into PVS

This presentation discussed the different steps in integrating gender into PVS: collecting information by conducting baseline studies, involving both men and women in free listing of new potato varieties, and evaluation at every stage in the Researcher-Managed Trials/ Mother Trials and Farmer-Managed Trials/ Baby Trials. The last step involves sex-disaggregated data analysis and reporting of the findings through workshops. It was also mentioned that sometimes projects may not have money to conduct baselines but they could also employ less expensive ways of gathering baseline data and information, such as through the use of Rapid Rural Appraisal tools. Emphasis was placed on ensuring that men and women participate at all stages of PVS, as well as among research collaborator farmers (those hosting baby trials). When it comes to voting for preferred traits, care must be taken that what women select is not influenced by the men; so it is advisable to allow women to go to the field to select the clones first, followed by men, if there is danger that men may try to influence women's voting and selection.



GENDER AND PVS  
HOW TO.PPT

### Discussion and questions and comments

#### **Is it possible to have a variety for men and women?**

It may not be possible, but as a researcher, one presents both men and women farmers with a basket of choices/varieties and among

those choices they are bound to find a variety that suits their needs.

### **Why is it necessary to invite men and women from different socio economic groups to visit researcher-managed and farmer-managed trials and be part of the PVS?**

They get an opportunity to choose a variety of potato that suits their socio-economic group. It also helps to achieve gender balance in selecting varieties that cater for different households under varying socio-economic conditions.

### **What if there are very different preferences between sites in the same area: which variety will be selected for breeding?**

Research has shown that there are not such distinct differences between sites in the same area. Free listing then ranking allows for a list of choices of clones/varieties, and allows farmers in each locality to select the three most important potato varieties at any given time.

### **How do you encourage women to participate in a mixed group?**

It is important to make eye contact with women more and more, talk to them in a friendly and convincing way that would encourage them to contribute to the discussion on issues that they know best about. Sometimes, if necessary, probe them in a way that complements who they are and this helps them to open up. However, the best approach will be to have men and women in separate groups for free listing and then bring the groups together to merge the lists so that both men's and women's preferences are represented. When voting, make sure that the women are not influenced by the men. Let the women vote first to avoid their selecting what the men select. Also, try to understand why some traits are preferred by women more than by men and vice-versa.

## Sharing of PVS experiences in Ethiopia and Latin America

The two presentations in this session were aimed at sharing the experiences of PVS (Mother and Baby Trials in particular) in Ethiopia and Latin America. The presentations touched on different aspects including how the trials were organized, who participated in the evaluations, why and how they

selected, what the results of the M&B trial were, how results were analysed; whether women participated (why/ why not); if women participated, what was the nature of their participation? Also discussed was the process of data collection, as well as the involvement of partners in the PVS trials.



### Discussion and questions

#### **Are the selection criteria set for each variety?**

When farmers are invited to participate, the researcher asks them for the criteria/characteristics they look for at each evaluation stage (vegetative, harvest and post-harvest). The criteria are not set per variety; rather, they are the general criteria farmers look for when evaluating varieties or even selecting varieties to plant. Farmers then perform free listing of criteria followed by ranking, then voting for the selected criteria. The next step is to observe the clones of the selected criteria, select them and conduct voting for these clones. Note: Selection criteria may be more or less the same for men and women, but differences may arise when they select the clones.

#### **Does the final decision depend on the overall score of what all farmers select?**

No, it is important to look at the gender-disaggregated selections/choices of men and women to see if differences exist in preferences. Do not rush to have average scores before looking at whether there are any significant differences in what men and women look for.

#### **What is the importance of voting by the researchers if their choices are not going to be included in the clones that farmers select?**

Researchers may wish to compare their preferences to farmer preferences. If these preferences are differences, they may need to investigate further why this is so.

#### **How do we take into consideration the inputs of researchers in the list of criteria?**

We have two different criteria. One that is generated by farmers and another that is researcher-gen-

erated. You may wish to merge the two lists and let the farmers vote for what they prefer the most.

### Additional comments

You may need to follow up with individual interviews or FGD because it is not the figures that are important but the justification behind the selection of a particular clone.

When a researcher prepares for a ranking exercise, he/she should avoid using the actual names of the clones to prevent biased selection of clones by farmers based on what they already know about particular named clones. Instead, the researcher should use codes.

### Experiences from the field from two participants from the Mekelle region of Ethiopia

**Draw backs:** During the free listing exercise in the Mekelle region, the criteria used were created by the researchers and not by the farmers. In addition, the evaluation process was not systematic and there was no use of grains to rank clones but consensus was used among the participating farmers. This may mean that preferences of women and other marginalized groups may not be known.

## Activity:

### Group exercise PVS data analysis

Following the presentation on 'Peruvian experience with PVS using M & B trial design', participants were split into three groups and provided with quantitative results from the Mother and Baby Trials in Peru. They were asked to respond to two questions:

1. From a gender perspective, please list the strengths of presenting data this way.
2. Using the same perspective, please outline the weaknesses and what methods and approaches you can use to address these.



The following were the main observations made across the three groups:

- a. Analysis of Peru data was biased, because very few women participated in the PVS exercise.
- b. The number of clones was very high, hence farmers might have had difficulties in selecting what they wanted.

## Multiple realities: Group Activity

Adapted from Robert Chambers' exercise 'Johari window: Multiple realities', the main objective of this activity was to create awareness of the differences in the knowledge and perceptions of different groups.



The activity involved a role-playing activity, where participants were first split into two groups and then the two groups were further split into two subgroups each, as follows:

- Farmers (A1) versus researchers (A2)
- Male farmers (B1) versus female farmers (B2)

In these groups participants were given two questions related to what they thought they needed or didn't know versus what they thought those who belonged to the group in the same category (but different subgroup) needed/didn't know when it came to new potato varieties. For example, in Group B, the different sub-groups of male farmers and female farmers would discuss the following:

- **Male farmers:** What do male farmers look for or need in new varieties? What are female farmers looking for or needing in new varieties and/or what don't they know?
- **Female farmers:** What do female farmers look for or need in new varieties? What are male farmers looking for or needing in new varieties and/or what don't they know?

### Results from the Group Discussions

After the groups' discussions, the following tables present the findings from the four groups:

**Table 1: Group A1: Farmers**

We farmers need/ We are looking for varieties that are:	They (researchers) need/they are looking for/ do not know
High-yielding, disease-resistant, drought-tolerant varieties with early maturity, frost-resistant, require minimum inputs, take short cooking time, have long storability, high demand in the market (taste, texture and firmness) and acid salinity tolerance.	History of the land, farmers' socio-economic conditions, farmers' awareness of clones and gender division of labor.

**Table 2: Group A2: Researchers**

We researchers need/ are looking for	They (farmers) need/they are looking for/do not know
Baseline survey data, gender-based varietal selection through PVS and awareness-creation among farmers on new varieties.	 <p data-bbox="820 1039 1266 1144">Inappropriate agronomic practice on use of inputs e.g. Fertilizers, nutritional value of varieties, adequate improved varieties and post-harvest handling techniques.</p>

**Table 3: Group B1: Male farmers**

We male farmers need/ We are looking for varieties that have/are:	They (female farmers) need/they are looking for/do not know
High yields, disease-resistant, early maturity, large tubers, high market demand and long shelf life/storability.	<p data-bbox="820 1291 1266 1428">Know: how to cook, cooking periods of different varieties, easy-to-peel clones, good tasting varieties, long storable varieties and field management techniques: weeding, planting and harvesting.</p> <p data-bbox="820 1428 1266 1512">Do not know: fertilizer application, disease identification, choice of seed size, and variety selection.</p>

**Table 4: Group B2: Female farmers**

We female farmers need/ are looking for	They (male farmers) need/they are looking for/ do not know
Easy cooking (shorter cooking time) to save on fuel and time spent cooking, good taste, long shelf life, and smooth skinned varieties.	High yields, fast maturity, short dormancy, disease and pest resistance, high market demand and smooth skinned varieties.

## Questions, Discussion and Conclusions

### **There is a contradiction between yields and drought-resistance: what does a researcher do to meet the farmers' needs?**

The researcher looks for a variety that is both high-yielding and drought-resistant.

### **What are the differences and similarities between farmers and researchers?**

Researchers presented their problems, while the farmers presented their problems and strengths.

The researchers blamed farmers for not using appropriate fertilizers, whereas the farmers blamed researchers for not giving them the right information and seed varieties.

Farmers talked about different criteria for selecting varieties, other than those the researchers presented. Farmers want varieties that cook faster, while researchers think that farmers do not know the nutritional value of varieties.

### Facilitator Comments

- There are different realities in the field for farmers and researchers.
- There are stereotypes about gender division of labor between men and women: for example, women may be labeled as wanting varieties that are good for cooking yet they still need varieties for sale. Hence, it is good to challenge the stereotypes.
- Differential attitudes by stakeholders towards similar problems, for instance where farmers think that they are underperforming because researchers give the varieties that are not suitable, researchers think that it is because farmers are not practicing good agronomic practices, hence poor yields.

## Facilitation skills: Role Playing

Seven volunteers participated in this activity. One volunteer acted as the group facilitator. Six of the participants were randomly assigned the following characters which they picked from the facilitator's (training session facilitator) hands:

- A woman who is shy to speak and will only speak when asked a question directly.
- A woman who believes that she cannot speak in public so she keeps quiet or refers the question to her husband who is also part of the group.

- A woman who just says "I agree with what others have said" in response to every question.
- A person whether man/woman who dominates conversations especially contradicting or belittling what others say.
- A man whose wife is in the group and likes saying: "My wife and I do it this way. I believe, I want ..."
- A man who is considerate of other peoples' opinions but also likes to share his opinion.

Each participant in the role-playing exercise was asked to keep his/her character secret until the end of the exercise, however the activity facilitator was allowed to know which characters were male and which were female because the female characters held pink folders to identify themselves. Participants who did not participate in the role-playing exercise observed the process and gave comments at the end of the exercise.

### Observations and Comments

- The group facilitator welcomed the participants and gave a brief on the four clones. He later invited the participants to free list for the post-harvest stage for the four clones.
- Men dominated the group, while women did not seem to want to speak – especially the woman whose husband was in the group.
- The facilitator should encourage all participants to talk. If it is not possible, then the group will have to be separated into male and female groups.
- You can also encourage women by telling appropriate light-hearted jokes to encourage women to participate; and you can sound out the women in the group using questions that emphasize their roles in relation to the stage you are free listing for.
- Ask direct questions about the stage you are free listing for.

### Questions

#### **If there is only one woman in the group, is it possible to interview her separately?**

Since we have just been trained, we are not anticipating a situation where we will have only one woman in the group because we now have a target of 30% to 50% women. However, in general it is advisable to separate the women from the men,

get separate free listing criteria, and then combine them into one list.

### How about if a village leader who is also a farmer is present in the group?

It is most likely that when a village leader is present, farmers will not talk. If you think that their presence in the group may bias the results, try to make sure that local leaders do not attend. However, you will still be able to get their opinion as key informants. Alternatively, if they attend you need to explain to people that there will be secret voting and that they should vote for what they prefer, not what they think others prefer. A lot will depend on how you manage the group and also the instructions that you give regarding what needs to be done and the objectives of the exercise.

### Facilitators' comments

- 1) Depending on the community, you may need to have separate groups of men and women for free listing and then merge the lists together so that women's needs are considered.
- 2) If you have a mixed group (not desirable but it may be beyond your control) then use methods and facilitation techniques that will give opportunity for different voices to be heard.

## PVS Trial Exercises

The objective of this session was for workshop participants to practice what they had learned about PVS and gender mainstreaming into PVS. The participants were divided into four groups: vegetative, harvest, post-harvest, and organoleptic groups. Each group was expected to discuss issues pertaining to the different activities, actors and resources at each stage of the four stages of the PVS process. The findings from the four group discussions are summarized below:

### Vegetative group:

- **Farmers to invite for the activity:** 18 men and 12 women.
- **Farmers drawn from:** Female Headed Households and Male Headed Households, model farmers, farmers from different socio-economic categories, and the youth.
- **Farmer mobilization** through awareness-creation meetings, group discussions with village elders and government officials to discuss ap-

propriate time for the farmers.

- **How to facilitate:** coding the clones, separating participants according to gender when voting and ranking, and using grains for ranking.
- **Tips for facilitation:** provision of tea/coffee and snacks to the participating farmers to reduce tiredness and provide refreshment.

### Questions and comments

#### How often will farmers evaluate during the vegetative stage?

Just once.

#### What if there are no Female Heads of Households in the area?

It is advisable to work with both men and women from the Male Headed Households.

#### Why 18 men and 12 women?

The assumption made here is that men have more knowledge of the vegetative stage and women know less, based on field experience in Ethiopia.

**Comment from the facilitator:** Women are involved in weeding of potatoes; hence they must have knowledge of the vegetative stage, so aim to have 50% men and 50% women. We also have to learn to challenge the stereotypes that we have regarding what we think men and women know.

#### Is it OK to have farmers from Female Headed Households and Male Headed Households? Female heads of households make all the decisions, whereas women in MHH are more likely not to be involved in the decision-making process. Then why have women from MHH when they cannot make any decisions?

Women in MHH have negotiating powers, so it is important to include them. The facilitator gave examples of women in Uganda who sabotaged coffee and vanilla bean, and also another in Zimbabwe of a woman who resisted when her husband adopted tobacco; because they did not benefit from crop sales and in some cases they were not consulted when the crop was adopted, in spite of the huge demands on their labor.

### Harvest group: Evaluation at harvesting stage

- **Farmers to participate:** 30 (50% men and 50% women).
- **Participants to be drawn from:** model farmers in the village, community leaders, researchers,

extension officers, traders who sell potatoes, small scale processors, and non-governmental organization stakeholders working with women.

- **Invitations:** through extension officers and Bureau of Agriculture in the form of letters.
- **Facilitation selection criteria:** coding of clones and gender-based free listing of clones, ranking of selected clones, and voting for the clones.
- **Collection of gender-disaggregated data and proper representation of men and women from different socio-economic classes.**

### Comments

- **Work with development agents and extension officers:** explain the selection criteria and/or recruitment criteria so that they may advise you on which farmers to invite.
- Reduce the number of community leaders at this stage because farmers are the ones who should state what they want and the presence of the leaders can result in bias.
- Furthermore, community leaders who are farmers belong to the better/higher socio-economic class, but the main idea here is to try and achieve equity; so reduce the number of such individuals.

### Post-harvest group

- **Number of participants to invite:** 40 (20 men and 20 women).
- **Number of clones to be evaluated:** Four.
- **Groups:** mixed age group, mixed socio-economic status group who are both men and women; development agents.
- **Invitations:** through development agents and in social meetings.
- **How to facilitate:** encourage the participants to actively take part in the activities and discussions, select an appropriate meeting time when most participants will be available, have female facilitators to talk to women, free listing, ranking and voting for the four clones.
- **Facilitation tips:** use of local language and local dressing code.

### Organoleptic evaluation group

- **Number of participants:** 20 (10 men and 10 females).
- **Selection of participants:** based on membership of farmer groups, age, socio-economic sta-



tus and gender.

- **Organoleptic procedure:** free listing of criteria (taste, peeling, and ease of cooking), ranking of criteria, ranking of each criteria on a three-class scale (good, fair and poor); coded clones placed on trays, then allow farmers to evaluate the first clone; next let them use water to rinse their mouths and evaluate the second clone.

### Practical Activity: Organoleptic Evaluation

This activity was conducted with nine participants and one facilitator drawn from the workshop attendees. Two varieties of potatoes were boiled and presented to the participants for organoleptic evaluation. The boiled potatoes were sliced into pieces and participants were asked to look at their appearance and texture then record. Next they tasted variety 1, then cleaned their mouths and tasted variety 2, then recorded.

**Results:** Participants selected clone 1 and not 2.

**Criteria for preference on clone 1:** sweetness, better appearance when cooked and good texture (starchier and not watery) compared to clone 2.

### Comments from facilitator and questions from participants

- **Tips on facilitation in the field:** when working with farmers a facilitator should state the prob-

lem clearly and tell the participants exactly what is expected of them.

- Also clearly explain the criteria to the farmers.
- Depending on the understanding of the farmers, reduce the ranking scales, to be specific to what most of the farmers can understand.
- If you have a number of clones, for example five, then let them rank and select the best two or three depending on the criteria used for organo-

leptic evaluation.

- It is advisable to taste the potatoes when they are warm, but not when hot or cold.
- The criteria for tasting follow the general established criteria of free listing; sometimes you may need to ask probing questions to make sure that you do not miss out any characteristics that are important to them.



## Day 3

### Field Books and Data Set Management: Introduction to Data Management

This presentation outlined the principles for managing research data using data collector. The importance of data collector software in PVS data management (especially its features of operation in giving procedures for standard evaluation trials) was emphasized.



During this highly practical and computer-based activity session, workshop participants were divided into four groups to learn about data collector software in PVS data management and processing. The main practical sections covered during the exercise were: starting data collector, creating field books, storing data in the field, checking field book and data, as well as Analysis of Variance. The presentation on “Data Collector Healthy Tuber Yield Trials” provided step-by-step instructions on data collector and its operation. The second part of the practical session focused on Meta-Analysis with data collector to combine field data books, run meta-analysis and present the meta-analysis results. Participants learned several practical skills related to the use of data collector and data analysis: how to enter, manage, analyze, and share data, as well as present results from the analysis.

### Review of Methodology, Question and Answer Session

#### **Is it possible when working with farmers to discuss the varieties on the basis of their nutritional value?**

If the objective is to expose farmers to nutritious varieties, they are asked to give their opinion on the different varieties based on their selection criteria. Whatever variety they choose as their best clone is analyzed for the nutritious value. If the nutritious value of the best

option for them is high, then a researcher encourages the farmers to adopt it. If it is not, then the researcher analyzes the second best clone and gives advice according to the findings from the nutritional analysis.

**During evaluation, does the researcher use the yield figures from the farmers or does he/she use the actual crop yield?**

A comparison between the farmers' yields and the actual yields is carried out to draw concrete conclusions on yield levels for each clone.

**When entering data in Excel in preparation for data processing and entry into data collector, how does one proceed?**

The data are entered and saved in Excel spreadsheets, then one proceeds to analyze them in data collector depending on what kind of results and patterns one wants to report.

**What is data collector?**

It is software for collecting, entering and analyzing data created by CIP. Steps include: collection of field data; creation of field book, sharing of data with other researchers at this point, and/or then proceeding to conduct data analysis to be able to report findings to different stakeholders.

## Work plan and budget

This activity was conducted so that participants could come up with work plans and tentative budgets that could be submitted to RTB CGIAR research program for funding to carry out gender-integrated PVS in the different regions of Ethiopia represented during this workshop. The participants were grouped into four geographical regions namely: South, North, Western and Central. Most of the

groups ran out of time before completing their work plans. It is expected that some work will continue beyond the workshop to finalize the work plans as including the gender indicators. The completed work plans and budgets are appended below



## Evaluation of Training and closing remarks

Workshop participants filled out workshop evaluation forms on the basis of overall assessment, usefulness of workshop content and activities, style of delivering the material, skills learned for integrating gender into PVS, how best or not the workshop had met the participants' expectations, aspects that were the most interesting, and areas that would require improvement. Participants made the following remarks about the workshop.

**Remarks:**

- Expectations on how to integrate gender into PVS were met.
- We gained knowledge on participatory selection of varieties and analysis of data.
- Role-playing on facilitation helped us to understand that different people have different ways of expressing their needs and aspirations.
- We gained knowledge on the need to recognize women farmers and aim at achieving 50% women's participation.
- Data collector as a program is a good tool for collecting, managing, processing, and analyzing data from PVS.

# Annex 1:

## Workshop Program

Training Workshop on Gender Integrated Participatory Varietal Selection (PVS) in Roots, Tubers and Banana (RTB) Crops in Ethiopia

Monday, 12th to Wednesday, 14th January 2015.

Lalibela Auditorium, International Livestock Research Institute (ILRI) Campus, Addis Ababa, Ethiopia

Time	Activities and presentations
<b>Day 1</b>	
Session 1:	Activity 1: Introductions: Settling down, Introduction and Expectations of the Workshop
8:00 – 8:20	Registration (Gedif Mulugeta)
8:20- 8:30	Welcome Address (Dr Amele)
8:30-8:40	Participants introduce each other
8:40 – 8:50	Housekeeping (Gedif Mulugeta and Kalkidan Damte)
8:50 – 09:00	Workshop objectives (Elizabeth Mukewa)
<b>Day 1</b>	
Session 2:	Introduction to Gender Concepts
09:30 – 10:00	Power Point: Introduction to gender concepts (Elizabeth)
10:00 – 10:30	Exercise 2: Power Walk (Elizabeth Mukewa)
10:30-11:00	TEA BREAK
<b>Day 1</b>	
Session 3:	Introduction to PVS
11:00 – 11:30	Introduction: Setting breeding program - objectives and options (Dr Amele )
11:30 – 12:00	Introduction to PVS (Dr Amele)
12:00 - 13:00	Why does gender mainstreaming into PVS methodologies matter? (Elizabeth)
13:00-14:00	LUNCH
<b>Day 1</b>	
Session 4:	Introducing the Mother and Baby Trial Design
14:00 – 14:30	Mother-Baby Trial: Phases, Selection Cycles and Main Exercises (Dr Amele)
14:30 – 15:30	Evaluation during vegetative development ( Dr Amele)
15:30-16:00	TEA BREAK
16:00 – 16:30	Evaluation and harvest time (Dr. Amele)
16:30 – 17:30	The M&B methodology - postharvest and value chain actor involvement + Organoleptic (Dr Amele)
	DAY ENDS

Time	Activities and presentations
<b>DAY 2</b>	
Session 1	
8:00 – 8:10	Settling down
8:10 – 8:30	RECAP
08:30 – 09:00	Group exercise: Organoleptic evaluation (Gedif) (Spilt group into two)
<b>Day 2</b>	
Session 2:	
	TIP on integrating gender into PVS:- It's more than just using tools
09:00 - 09:30	PVS and gender -Power Point presentation + Activity (Dr Mudege)
09:30 – 10:30	Activity Community Characterization and presentation (Dr Mudege)
10:30 – 11:00	TEA
<b>Day 2</b>	
Session 3:	
	Sharing of PVS implementation experiences
11:00 - 11:30	Eliciting farmer's preferences for new potato types in Ethiopia (Dr Amele)
11:30 - 12:00	Participants share experiences with PVS
12:00 -12:30	PERU experience (Dr Mudege)
Group Work:	Split group into 3 to discuss discus data analysis of Peru data from a gender perspective
12:30 – 13:00	Group Exercise - Multiple realities (Dr Mudege)
13:00 – 14:00	LUNCH
14:00 – 14:30	Group presentations (Multiple realities) (Dr Mudege)
14:30 – 15:00	Group Activity....
15:30- 15:30	Role play and discussion (characters to be developed ...) (Mudege and Amele)
15:30- 16:00	TEA
16:30 – 17:00	Role play and discussion (characters to be developed ...) (Mudege)
<b>Day 2</b>	
Session 4:	
	Data Management
17:00 – 17:30	Introduction to Field Books and Data Sets Management (Dr Amele) DAY END
<b>DAY 3</b>	
Session 1:	
8:00 – 8:10	Settling down
08: 10 – 08:30	Recap Data management continues
8:30: – 9:30	Working with data collector (installation, how to create field book with data collector) (Dr Amele)
9:30 - 09:45	Options for statistical analysis with PVS Data (Dr Amele)

Time	Activities and presentations
<b>Day 3</b>	
Session 2:	
09:45 – 10:45	Genetic materials from CIP proposed for participatory selection during the next cropping season (Dr Amele)
10:45 – 11:00	TEA BREAK
11:00 – 12:00	Review of the methodology and question and answer session (facilitated by Dr Amele)
<b>Day 3</b>	
Session 3:	
12:00 - 13:00	Work plan (Mukewa and Amele)
13:00	LUNCH
14:00 – 16:00	Work plan (Mukewa and Amele)
16:00 – 16:15	Evaluation of training (Mukewa) Workshop ends Departures

## Annex 2:

### PVS Workshop Participants

No	Name	Organization	Position	Sex of Participant
1	Yifru Worku	Debre Berhan Agricultural Research Center	Researcher	M
2	Lemma Tessema	Holetta Agricultural Research Center	Researcher	M
3	Ebrahim Seid	Holetta Agricultural Center	Researcher	M
4	Abebe Chidi	Holetta Agricultural Center	Researcher	M
5	Getachew Kebede	Kulumsa Agricultural Research Center	Researcher	M
6	Awok e Ali	Kulumsa Agricultural Research Center	Researcher	M
7	Desta Fikre	Atsibi Bureau of Agriculture	Researcher	M
8	Gebrehiwot Hailemariam	CIP –Mekelle Office	Research Assistant	M
9	Daniel Geberekidan	CIP-Mekelle Office	Research Assistant	M
10	Yibrha Geberemedhin	Alamata Agricultural Research Center	Researcher	M
11	Muez Mehari	Alamata Agricultural Research Center	Researcher	M
12	Asheber Kifle	CIP- Hawassa Office	Research Assistant	M
13	Mihiretu Cherinet	CIP-Hawassa Office	Research Assistant	M
14	Niguse Abebe	Mekelle Agricultural Research Center	Researcher	M
15	Tsigereda Zeray	Mekelle Agricultural Research Center	Researcher	F
16	Wubet Awoke	Adet Agricultural Research Center	Technical Assistant	M
17	Balew Ferede	Addet Agricultural Research Center	Technical Assistant	M
18	Yirga Woldesenbet	Gummer Bureau of Agriculture	Researcher	M
19	Alemu Wabato	Mesha Bureau of Agriculture	Researcher	M
20	Tsegay Terefe	South Agricultural Research Institute	Researcher	M
21	Kanko Chuntale	South Agricultural Research Institute	Researcher	M
22	Dr. Netsayi N. Mudege Coordinator (Facilitator)	CIP, Nairobi Kenya	Gender Research	F
23	Elizabeth Mukewa Consultant (Facilitator)	Nairobi	Independent	F
24	Dr. Asrat Amele	CIP-Ethiopia (Facilitator)	Potato Breeder	M
25	Gedif Mulugeta	CIP- Ethiopia	Research Assistant	M





The International Potato Center (known by its Spanish acronym CIP) is a research-for-development organization with a focus on potato, sweetpotato, and Andean roots and tubers. CIP is dedicated to delivering sustainable science-based solutions to the pressing world issues of hunger, poverty, gender equity, climate change and the preservation of our Earth's fragile biodiversity and natural resources. [www.cipotato.org](http://www.cipotato.org)



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