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MUFPP MONITORING FRAMEWORK PILOT CITIES PROJECT

ANTANANARIVO CASE STUDY REPORT - SEPTEMBER 2019



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The purpose of this document is to share the experience and learning from the Pilot Cities Project of the Milan Pact Indicators Framework that was led in three cities: Antananarivo, Nairobi and Quito during Mars and October in 2019. Through this document we would like to share how the city has started to use the MUFPP monitoring framework and encourage other cities to do so.

The Urban Commune of Antananarivo, supported by the FAO and the RUAF Foundation, carried out the Antananarivo Indicators pilot testing.

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1. Background

1.1. Short summary of the key food issues in Antananarivo

Madagascar is among the four countries with the highest chronic malnutrition rate in the world: 42% of children under five are stunted¹. The most affected areas are the Central Highlands including the Analamanga Region with 48%². Preliminary results of the SMART³ survey conducted by the NGO Action Against Hunger and its partners in June 2019, targeting the 6 Arrondissements of the Urban Commune of Antananarivo, confirm the results of this nutritional status on infants under 5 years of age, six months, teenagers aged 10 to 19 and women aged 15 to 49. For acute malnutrition, the capital has a Global Acute Malnutrition (GAM) rate of 5%, including 1% severe acute malnutrition (SAM).

Underlying poverty exacerbated by the lack of access to drinking water (only 74% of households in the Analamanga Region have access to drinking water), access to health services are among the major challenges that affect the food and nutritional situation of the population.

In fact, food insecurity has increased in the capital from 13% to 18.7% between 2010 and 2012⁴, due to the economic slowdown linked to the 2009 political crisis. However, this situation cannot only be attributed to the consequences of poverty. Existing nutritional habits deserve to be considered and the urban food chain needs to be observed.

In urban areas, few technical and financial partners intervene in the field of under nutrition. In this urban context, the synergy of actors is still insufficient. Factors affecting nutrition are many and diverse. They show that actions to fight against malnutrition can only be effective if they become cross sectorial and multi-stakeholder oriented, based on a shared understanding of the causes of malnutrition.

1.2. Key activities already underway in Antananarivo related to food

Such a context led the Municipality to set up the program «Urban Agriculture in Antananarivo» in 2009, led by the Department of Green Spaces, Environment and Urban Agriculture. Two objectives marked the beginning of the program:

- (i) the promotion of micro-vegetable gardens in precarious areas of the city for food and nutritional security of vulnerable population, and

- (ii) the creation of income-generating activities, through the establishment of fresh vegetables outlets produced locally.

The project officially started in 2011 with a pilot project involving 3 urban neighbourhoods, 30 vulnerable households and 3 public primary schools benefiting from school micro-gardens. It met immediate success, and by the end of 2011, the number of beneficiaries was over 100 families.

1 UNICEF - MICS Survey, 2018

2 Office Régional de la Nutrition, 2018

3 The SMART (Standardised Monitoring and Assessment of Relief and Transitions) Methodology is a standardised, simplified, cross-sectional field survey method designed to aid the collection of quality, up-to-date and timely nutrition data necessary for decision-making. For more information on SMART: <http://smartmethodology.org/>

4 <https://www.populationdata.net/pays/madagascar/>

A partnership with the National Office of Nutrition (ONN) introduced improved crops to train beneficiaries to produce more efficiently with the least amount of space.

In 2014, the program was scaled up through the creation of the first multi-actor working-group on urban agriculture to enable the City to spread urban agriculture practices within the City's boundaries. In addition, the development of an experimentation site on micro-garden agriculture at the municipal nursery to allocate group-trainings was built up. Six years later, the program was covering 24 neighbourhoods, 21 training institutions (schools and social centres) and more than 18,000 beneficiaries were involved. Though the working-group was not becoming a formal structure, it allowed more than 20 different stakeholders (institutional actors, international organizations, civil society organizations and private actors) to exchange on urban agriculture and food security initiatives in the urban context.

Micro-gardens started introducing diverse vegetable varieties with a high nutritional value (leafy greens). With reduced soil availability in town, micro-gardens proposed transforming organic waste into compost and soil for beneficiary households. Today, they provide families with access to a variety of vegetables rich in micronutrients. As an example: 1 m² of a household garden produces up to 4 kg of leaf vegetables per 6-week crop cycle, which

represents 12 diversified meals per month per person. In addition, 90% of the beneficiaries today are basically women, most of them being single parents. Community gardens create living spaces as well, improving the environment of poor neighbourhoods by creating meeting spots for social exchange and learning.

Five years later, the Municipality wanted to go further in its commitment and decided to adhere to the Milan Urban Food Policy Pact (MUFPP). On the occasion, an international symposium on the theme: «*FEEDING CITIES*»: *Urban agriculture, a solution to increase African cities' resilience*» was organized in March 2017 to exchange with other African cities about good practices on urban food resilience. The decision to hold this conference in Antananarivo strengthened the commitment of municipal authorities. In November of the same year, Antananarivo received an international recognition on the Annual MUFPP Mayor's gathering in Valencia, the Milan Pact Award 2017 to the City's actions in such a challenging environment. This allowed obtaining a grant to help continue to spread the MUFPP commitment to other cities in the Malagasy territory. This project helped Antananarivo to outline a new strategy based on a territorial approach: create a network of local actors (Mayors and other stakeholders) to collaborate on the improvement of Food Policies in the Antananarivo City Region.

1.3. Antananarivo's motivations and objectives in starting implementing the MUFPP Monitoring Framework

Following the MUFPP recommended actions; the Municipality started defining a strategic vision by identifying priorities for implementing an Urban Food Policy for Antananarivo. To meet this end, a focal point for the MUFPP was appointed within the Deputy Mayor's Office, in charge of interdepartmental coordination related to food issues. It was then, that a clear opportunity was identified in joining the **MUFPP Monitoring Framework Pilot Project** proposed by RUAF and FAO. The implementation of the Indicators Framework could be led by the MUFPP focal point, as an opportunity to focus on the development of an integrated local policy to help in the deployment of the following strategic areas:

- I. Improve access to data based on the MUFPP indicators to get an overview of the local food system and to facilitate the assessment on the performance of local food initiatives.
- II. Activate and consolidate a multi-stakeholder approach involving actors in the different food related areas: food security, nutrition, health, education, economic development, environmental protection, sanitation, social integration and urban resilience to face climate change.
- III. Establish consistency with the priorities of the National and Regional priorities related to sustainable agriculture development and urban development (vertical and transversal approach).

- IV. Strengthening a territorial approach by using data as a dialogue facilitator between current projects within the urban and regional boundaries. Strengthen the dialogue between regional and local authorities of the suburban communities to facilitate the creation of alliances to enhance territorial integration and rural-urban linkages.
- V. Support civil society initiatives in the territory, in connection with the development of urban and peri-urban agriculture, fighting against chronic malnutrition and social inequity, food value chain integration and diversification (from production to consumption), waste management and food-waste reduction.
- VI. Enhance links with the private sector engaged in the agro-food sector to set priorities and ensure a more efficient, equitable and accessible food supply system.
- VII. Support research on urban food systems by building partnerships with national and international Universities and research centres.

1.4. The MUFPP Monitoring Framework Pilot Project

The MUFPP Monitoring Framework Pilot project was launched in 2018 and presented at the 4th MUFPP Annual Gathering and Mayors' Summit (Tel Aviv 4-5 September 2018) as an opportunity for cities to develop a better understanding of how to work with the MUFPP indicators and establish **their own indicator framework**. The pilot project would run for 6 months and be led by FAO and RUAF with technical support from Wilfred Laurier University, and institutional support from the MUFPP Governing Bodies (MUFPP Steering Committee and Secretariat).

Choosing to join the MUFPP Pilot project would provide the City of Antananarivo with the opportunity to start implementing the MUFPP Indicator Framework with solid technical support by the RUAF Foundation, in collaboration with two other selected pilot cities.

It would provide also the chance to connect with other cities (from outside the pilot project) already implementing the MUFPP Indicator Framework by participating in open exchanges all throughout the process.

The process would start in a training workshop in Rome, organized by FAO HQ, and be closed in a dedicated Session (workshop) at the 5th MUFPP Annual Gathering and Mayors' Summit in October 2019 in Montpellier, France, to share leanings with all MUFPP signatory cities and other major international stakeholders attending the event. The role of the Antananarivo MUFPP local focal point would be to lead the city process as part of the pilot project and to be involved in its co-design with RUAF and the other pilot cities.



1.5. Antananarivo's attempts from the Pilot project

After being selected as a pilot city for implementing the MUFPP Monitoring Framework together with Quito and Nairobi, Antananarivo started getting ready to start the process. The training workshop held in Rome in May 2019 was key to develop the overview of the City's attempts from the monitoring process. These were summarised as follows:

- The 44 MUFPP indicators would be used to revise the City's priorities related to Food. The definition of such priorities would help to outline strategically the vision for the Antananarivo's Food Policy, possibly aligned with SDGs targets for the City.
- The data collection process would help to consolidate the multi-stakeholder approach through the creation of the Antananarivo Food Policy Committee as a formal proactive and engaged working-group; interested in data sharing and monitoring shared indicators.
- By introducing the basis for a Food Policy Monitoring Framework for Antananarivo, the City would help to introduce food issues in the city agenda as a driver to backstop partners and encourage the scaling-up of initiatives.
- The collected information would be diffused to help raise awareness about how food can become an effective driver to address City's main challenges (nutrition, social equity, food procurement, sanitation, etc.)

A work plan was outlined to organise the process in 4 Phases:

1 PHASE

Indicator selection process and stakeholder engagement (May - June 2019)

2 PHASE

Data collection strategy (July - August 2019) - Building up Antananarivo Food Policy Committee

3 PHASE

Workshop: « Towards a sustainable Food Policy for Antananarivo » - Sharing Data Collection results and defining a roadmap for Policy guidelines (September 2019)

4 PHASE

Reporting and sharing of results in the Annual MUFPP Mayor's Gathering in Montpellier (October 2019)



2. Indicator Selection Process

2.1 Selected indicators

The first phase concerned the Indicator Selection Process and was developed between March and June 2019. All 44 MUFPP indicators were carefully analysed. A first list of 18 indicators was selected, considered to be adapted and consistent with the City's priorities. However, all these indicators could not be applied to the pilot project, for different reasons (lack or non-updated data, lack of resources to collect data, insufficient expertise to analyse data, short-time within the pilot 6 month process). The selection criteria which was implemented responded to 3 main criteria, which were applied to each indicator to enable the definition of the final list of indicators, as follows:

- a) **Evaluation criteria:** Power of the indicator to collect results about what is actually happening in the City as an enabler to think about how such the existing context could be improved.
- b) **Sustainability criteria:** Power of the indicator accountability (long term view) to produce and preserve data availability within the Municipality.
- c) **Resource criteria:** Indicator relevance to provide existing / available data - (Low-cost approach) - Leverage capacity to boost partnerships and ensure fund raising for future actions to provide actions' continuity.

This exercise allowed the City's team to get the big picture of which actions related to Food issues were being led with success (or without success), which of them were being developed directly, or indirectly by the City, and which were being developed by external actors.

A list of 6 indicators came out from this process internally, after a plenary session with the different technical departments, which were concerned by the different themes. The choice of keeping this process internally was decided, given the importance that was addressed to the fact that for the sake of the Pilot project, the monitoring process should be adapted to the existent resources of the Municipality in order to lead the exercise. This would strengthen the teamwork and the appropriation of the MUFPP Framework of indicators internally, an

important condition to be acknowledged during the process, since the MUFPP was still a new issue for technicians. The possibility of soliciting external stakeholders in this primary phase presented a risk, since the resources available to allocate the monitoring process were still very weak. Such insight would be reconsidered at the end of the pilot project. In the future, the list of indicators may be enlarged so as to provide continuity to the implementation of the complete MUFPP Monitoring Framework (44 indicators).

Internal team within the Municipality associated to the project: 14 people (interdepartmental commission)

- Mayors' Office – MUFPP Focal Point and Communication officers (2 members)
- 6 Delegates for each city borough (6 members – 6 Arrondissements)
- Direction of Urban Development (DUD) – (1 member, in charge of M&E)
- Urban Agriculture and Environmental Division (within DUD) (2 members)
- Direction of Health and Hygiene (1 member)
- Direction of Social Issues (Education) (2 members)

Each one of the 6 retained indicators was assessed in a SWOT matrix, which allowed identifying the main advantages for the City.

The list of the 6 final indicators and their advantages for the City are exposed as follows:

MUFPP INDICATOR

ADVANTAGES FOR THE CITY

MUFPP Work stream: Ensuring an enabling environment for effective action (governance)

#1 Presence of an active municipal interdepartmental government body for advisory and decision making of food policies and programmes (e.g. interdepartmental food working group, food policy office, food team)

- Create a Food Policy Committee
- Perpetuate data in the long term (collection, analysis) for the City
- Provide continuity to projects
- Boost partnership for similar projects

MUFPP Work stream: Sustainable Diets and Nutrition

#14 Number of city-led or supported activities to promote sustainable diets

- Increase job opportunities
- Enhance social mobility of vulnerable groups
- Decrease of chronic malnutrition within the city boundaries

MUFPP Work stream: Social and Economic Equity

#20 Percentage of children and youth (under 18 yrs) benefiting from school feeding programmes

- Increase success rate at Schools
- Decrease school abandonment
- Reduce malnutrition rate for school kids
- Increase education rates

MUFPP Work stream: Food Production

#27 Surface area of (potential) agricultural spaces within the municipal boundary

- Improve land management
- Promotion of green spaces/wetland to reduce flood risks

MUFPP Work stream: Food Supply and Distribution

#36 Number of fresh fruit and vegetable outlets per 1000 inhabitants (markets and shops) supported by the municipality

- Cost-effective markets for the city and for retailers/wholesalers
- Increase tax revenue in the City

MUFPP Work stream: Food Waste

#41 Total annual volume of food losses & waste

- Provide access to low-cost school canteens
- Create opportunities for projects on waste management / food-waste reduction

Furthermore, it was decided that key external stakeholders would be associated to each indicator during the pilot phase to collaborate with the data collection and assist the local team as technical advisors during the assessment process. This would help to reinforce the links between the Municipality and its partners and enable the dialogue on how to support partner's initiatives in the future.

MUFPP INDICATOR	INTERNAL TEAM (URBAN COMMUNE OF ANTANANARIVO)	EXTERNAL STAKEHOLDER AND SUPPORT
MUFPP Work stream: Ensuring an enabling environment for effective action (governance)		
#1 Presence of an active municipal interdepartmental government body for advisory and decision making of food policies and programmes (e.g. interdepartmental food working group, food policy office, food team)	Mayor's Office (FPO and Communications Office) 6 Borough delegates Direction of Urban Development (DUD) Urban Agriculture and Environmental Division (DUD) Direction of Health and Hygiene Direction of Social Issues (Education) (2 members)	RUAF Foundation
MUFPP Work stream: Sustainable Diets and Nutrition		
#14 Number of city-led or supported activities to promote sustainable diets	Direction of Health and Hygiene Direction of Social Issues (Education)	Office Regional de la Nutrition (ORN Analamanga) Action Against Hunger (NGO ACF)
MUFPP Work stream: Social and Economic Equity		
#20 Percentage of children and youth (under 18 yrs) benefiting from school feeding programmes	Urban Agriculture and Environmental Division Direction of Social Issues (Education)	Office Regional de la Nutrition (ORN Analamanga) WFP – CISCO Antananarivo
MUFPP Work stream: Food Production		
#27 Surface area of (potential) agricultural spaces within the municipal boundary	6 Borough delegates Direction of Urban Development (DUD) Urban Agriculture and Environmental Division (DUD)	CIRAD ASA program (European Union)
MUFPP Work stream: Food Supply and Distribution		
#36 Number of fresh fruit and vegetable outlets per 1000 inhabitants (markets and shops) supported by the municipality.	6 Borough delegates Direction of Urban Development (DUD)	ASA program (European Union)
MUFPP Work stream: Food Waste		
#41 Total annual volume of food losses & waste	Urban Agriculture and Environmental Division (DUD) Direction of Health and Hygiene	GRET (NGO) SAMVA (autonomous structure in charge of waste management)

3. Working with the Indicators

3.1. Methodology to gather and analyse data

The data gathering was the second important phase of the project and lasted for two months. It consisted in the collection of existing reports, articles and scientific reviews, which were accessible through the City's M&E database. Extra data was accessible through individual meetings with key external stakeholders and documents provided during meetings. Some

of them contained up to date data and others were out dated. In order to assess the data the **MUFPP Monitoring Framework Methodological Guidelines** for each one of the indicators were implemented. Each indicator allowed the identification of sub-indicators, which added specificity about the local context.

3.2. Challenges in accessing data

In general, main challenges in the data assessment concerned basically data gaps and data sharing blocking points. The Municipality's database was very much out of date, so gaps had to be filled with unofficial external data, which was sometimes also incomplete and based on specific methodologies which were not precise enough. Partners were eager to share information and provide contacts in order to facilitate the work. Some difficulties overcame as regards transparency, especially when addressing indicator #36. The main obstacle presented by the 6 borough delegates was related to formal outlets vs. informal outlets. This indicator is directly associated to one of the main City's revenue collection sources

(market vendor's tickets) and data sharing for this reason was difficult to obtain. Another indicator that was difficult to assess was #41 about waste collection. In Antananarivo, waste management is led by an autonomous structure (other than the City), and revenue collection is shared. Such context contributes to tensions between both structures. For this reason, official data was not easy to obtain in time. The assessment had to be based in the last reviews, which were not accurate enough.

The following chart presents the main challenges, which were faced for each indicator:



MUFPP INDICATOR	MAIN CHALLENGES FACED
#1 Presence of an active municipal interdepartmental government body for advisory and decision making of food policies and programmes (e.g. interdepartmental food working group, food policy office, food team)	<ul style="list-style-type: none"> • Reticence of some stakeholders and internal team members as regards the continuity of the project in the future (government transitions) • Political risks (upcoming election in November 2019) • Lack of time and resources for data collection
#14 Number of city-led or supported activities to promote sustainable diets	<ul style="list-style-type: none"> • Lack of coordination between actors, no official data • Lack of perpetuation of data (Local and National), lack of information-sharing of data • Reticence of partners due to political risks: some associations still do not trust local authorities on their capacity to promote initiatives
#20 Percentage of children and youth (under 18 yrs) benefitting from school feeding programmes	<ul style="list-style-type: none"> • Variable due to dependency on resources and external funding (WFP) • Schools do not report formally to authorities (30 schools under CUA, 60 under Ministry of Education)
#27 Surface area of (potential) agricultural spaces within the municipal boundary	<ul style="list-style-type: none"> • Political risks (local vs. central government) • Dependency on National Urban Development planning
#36 Number of fresh fruit and vegetable outlets per 1000 inhabitants (markets and shops) supported by the municipality.	<ul style="list-style-type: none"> • Lack of transparency • Insufficient infrastructure • Informal and seasonal markets/sellers (nomadic)
#41 Total annual volume of food losses & waste	<ul style="list-style-type: none"> • Very unorganized, small scale actions and strategies • Not the priority for the population • Need of raising awareness of sellers/vendors on communitarian waste management • Existing tensions between local authorities and the autonomous authority which manages the City's waste

3.3. Main findings

Above all, the use of the MUFPP Indicators Framework allowed the Municipality to:

- Choose main priorities for the City related to food
- Create cross-sectorial engagement through the workshop, gathering more than 40 actors who are eager to take part in the consolidation of a Municipal strategy on the basis of the creation of a Food Policy Committee in the near future.
- Create cohesion and strengthen relationships between the City's technical services
- Develop participative analyses and creation of a common vision for the future through the data sharing exercise
- Enhance friendship with other MUFPP Cities implementing the Framework (Nairobi, Quito, Milan)

3.4. Using data

As exposed, the Indicators Framework was useful for the identification of City priorities and 6 MUFPP indicators were retained. However, after the data collection process, it was suggested that more detailed sub-indicators should be identified, which suited better the local context.

The collected data allowed to:

- Get the big picture of all the different initiatives that had been led as regards food issues within the City. Analyse the outcomes, assess the impacts and evaluate the necessity to provide a favourable context to ensure action continuity.
 - Build a map of actors that were being involved in food issues, their level of engagement and power of influence concerning decision-making processes.
 - Hold a workshop of more than 40 different actors to define the sectorial orientations and concrete actions to improve the City's food cycle (these proposals are exposed as results in the following chapter).
- Create, as a result of the workshop, a Local Food Policy Committee for Antananarivo, which will be formalised in the short term to start working on the elaboration of a Local Food Policy for Antananarivo (expected after the elections, 2020).
 - Help raise awareness about the present food situation and to provide future orientations to guide future actions.
 - Develop a roadmap for communicating and disseminating the collected data using the City Council's existing resources (SMS, social media, street banners, screens, apps, etc.) to raise the population's awareness about the improvement of nutritional habits.



4. Research Results

4.1. Research outputs for each indicator

In order to close the third phase of the project, a one-day workshop was organised on the 11th of September 2019, which gathered more than 40 food actors (between representatives of local, regional and national authorities, NGO's and the private sector). This event was co-organised with RUAF and the NGO Action Against Hunger (ACF Madagascar). ACF

has been working since 2019 on the collection of data focusing on the nutritional vulnerable situation in the Antananarivo Urban Commune.

The following chart synthesises the key research outputs for each indicator and its sub-indicators (see also appendix A) :

KEY RESEARCH OUTPUTS			
Sub-Indicator	Qt / Ql	Units	Outputs (2019)

#1 Presence of an active municipal interdepartmental government body for advisory and decision making of food policies and programmes (e.g. interdepartmental food working group, food policy office, food team)

Field : Food governance

1	Qt	Number of Municipal services dealing with food issues (from production to waste)	13 people: Mayor's office (2 people) 4 Technical directorates (Direction of Social Affairs, Direction of Health and Hygiene, Direction of Urban Planning and Development, Direction of Resource Mobilization) 1 Communication officer 6 Borough Delegates
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#14 Number of city-led or supported activities to promote sustainable diets

Field : Sustainable diets and nutrition

2	Qt	Number of actors working to improve living conditions of vulnerable populations (education, nutrition, social protection, among others)	30 initiatives led by the Civil Society within the City's boundaries 1 Hospital dedicated to mother- child health (Tsaralalana) 4 Basic Health Centre (CSB, supported by the Municipality) 15 CSB (supported by Central government) 1 Regional Monitoring and Evaluation Group (GRSE) 1 Civil Society for Childhood Platform (PFSCÉ) 1 Task-force (financial support for activities in favor of nutrition (PTF) 1 Private Sector Platform (SUN Business Network) - with 12 members
3	Qt	Number of functional communitarian nutrition sites (ORNs)	24 sites in the Municipality
4	Qt	Number of children aged 0 to 2 followed by communitarian nutrition sites (PNNC)	2,477 children aged 0 to 2 years followed in the sites
5	Qt	Number of children aged 2 to 5 followed in communitarian nutrition sites (PNNC)	2,095 children aged 2 to 5 years followed in the sites
6	Qt	Chronicle malnutrition rate of children 0-5 years	48% chronicle malnutrition rate of children between 0 and 5 years (National Survey)
7	Qt	Chronicle malnutrition rate of children 0-5 years	49.3% (Source : SMART Survey - ACF)

#20 Percentage of children and youth (under 18 yrs) benefitting from school feeding programmes

Field : Economic and social equity

8	Qt	Number of establishments benefiting from the Ministry's (MEN) program on school canteens	93 institutions benefiting from the MEN program « school canteens » supported by WFP
9	Qt	Number of establishments with a vegetable garden	44 EPPs and social centres (30 supported by the City and 14 autonomous)
10	Qt	Number of diversified diets per week	3 meals a week enriched with leaf vegetables
11	Qt	Number of student parents sensitized on school nutrition activities	96 supported by Central Government - MEN/WFP

#27 Surface area of (potential) agricultural spaces within the municipal boundary

Field : Food production

12	Qt	m2 of land used for urban and peri-urban agriculture	2,878 ha (35% Urban Agriculture area within City's boundaries) 30,929 ha (UA within 38 peri-urban communes) = (44.3% of the Grand Tana area)
13	Qt	Kg of agro-ecological products sold in outlets within urban areas	4 000 kg
14	Qt	Number of municipalities in the peri urban area that practice UA	33
15	Qt	Number of producers of ecological vegetables	170
16	Qt	Number of hectares dedicated to growing ecological agro vegetables	11,19ha

#36 Number of fresh fruit and vegetable outlets per 1000 inhabitants (markets and shops) supported by the municipality.

Field : Food supply and distribution

17	Qt	Number of Municipal markets within City boundaries	30 municipal markets
18	Qt	Number of (formal) outlets (stall-vendors)	4299 stalls
19	Qt	Number of informal markets	447
20	Qt	Number of agro ecological markets within City boundaries	5
21	Qt	Number of (small cooperatives) TPECs active in the peri-urban area of Antananarivo (NORD)	45

#41 Total annual volume of food losses & waste

Field : Food waste

22	Qt	Tn volume of organic waste at city level / year	320,000 t / year
23	Qt	Tn volume of organic waste at the City level / day	875 / day
24	Qt	kg of garbage / inhab / day	0.5 kg / person
25	Qt	% of organic waste from compostable from communal markets	65%

4.2. Key Insights

MUFPP INDICATOR	MAIN CHALLENGES FACED
#1 Presence of an active municipal interdepartmental government body for advisory and decision making of food policies and programmes (e.g. interdepartmental food working group, food policy office, food team)	The creation of the Food Policy Committee for Antananarivo (FPCA) is still an on-going process. A draft of bylaw to support the creation of the FPCA is being revised within the Municipality.
#14 Number of city-led or supported activities to promote sustainable diets	Many initiatives are being deployed, however there is disaggregation and lack of coherence between them. The City intends to reinforce coherence and coordination through the creation of the Food Policy Committee.
#20 Percentage of children and youth (under 18 yrs) benefitting from school feeding programmes	External funding is needed to ensure project continuity and up-scaling (90/90 schools)
#27 Surface area of (potential) agricultural spaces within the municipal boundary	Food production surfaces are for the moment being preserved under strong pressure from the urbanisation process. Policies are lacking as regards the integration of Urban Agriculture in the future planning for the City.
#36 Number of fresh fruit and vegetable outlets per 1000 inhabitants (markets and shops) supported by the municipality.	There is insufficient infrastructure. The informal sector is predominating and increases. There is an urgent need to assess how to deal with informal and seasonal sellers. Local policies and data collection tools are needed.
#41 Total annual volume of food losses & waste	Small scale actions and communitarian waste management is needed. Need of raising awareness of sellers/vendors about waste recovery and reduction. Existing tensions between local authorities and the autonomous authority that manages the City's waste. Concentration and joint policies are needed. Data needs to be shared between actors.

5. Key Learnings from the Pilot Phase

5.1. Use of data as a driver for the development of an Action plan

The indicator assessment results were presented in the workshop and used to trigger the work in groups. 6 working groups were created on the basis of the 6 MUFPP selected indicators. The MUFPP recommendations were presented in order to help the groups to work in the definition of specific orientations and concrete actions to improve the local food cycle. The output is presented in the following chart. This information sets up a guideline for future work in the next meetings.

PROPOSED STRATEGIC ORIENTATIONS / ACTIONS TO IMPROVE THE ANTANANARIVO FOOD CYCLE		
MUFPP Recommendations	Orientations	Proposed actions
<p>#1 Presence of an active municipal interdepartmental government body for advisory and decision making of food policies and programmes (e.g. interdepartmental food working group, food policy office, food team)</p> <p>Facilitate collaboration between municipal agencies and services and seek harmonization of policies and programs that impact the food system across multiple sectors and levels of government, options may include the assignment of permanent municipal staff; tasks and procedures and reallocation of resources.</p>	Set-up a system for data sharing, collection and effective monitoring	<ul style="list-style-type: none"> • Data centralization within the Municipality • Local Food Committee periodic meetings to feed database and share members' opinion • Data storage and periodic update
	All stakeholders acknowledge strategies and directions	<ul style="list-style-type: none"> • Preparation of agreed strategic documents • Accountability for strategic orientations to set up projects and enhance partnerships • Definition of a relevant reference framework with strategic orientations • Establishment of a monitoring and evaluation system consistent with the MUFPP Indicator Framework
	Ensure action and results visibility	<ul style="list-style-type: none"> • Communication at the City level • Development of a Municipal Action Plan for Food • Implementation in the short, medium and long term

#14 Number of city-led or supported activities to promote sustainable diets

Develop dietary guidance to inform consumers, urban planners (especially for public procurement of food products), food service providers, retailers, producers and processors, and promote campaigns communication and training to raise public awareness of food issues.	Guarantee food accessibility and food security	<ul style="list-style-type: none"> • Creation of an inventory of catering establishments • Train restoration actors on hygiene standards • Monitoring and evaluation • Awareness and application of existing laws and bylaws
	Strengthening food hygiene activities and food processing conditions	
	Standardization of food products	<ul style="list-style-type: none"> • Consumer information about ingredients, sale conditions, food origin
	Increase awareness on food issues	<ul style="list-style-type: none"> • Nutritional education • Education on food hygiene • Cooking demonstrations • Strengthening anti-food-fraud actions

#20 Percentage of children and youth (under 18 yrs) benefitting from school feeding programmes

Use forms of social protection systems to provide vulnerable populations with access to healthy food. It is a way to increase the level of food security for specific vulnerable groups.	Promoting school feeding based on local purchases through the National FEFFI (Farimbon'Ezaka ho Fanatsarana ny Fanabeazana eny Ifotony, or ex FRAM	<ul style="list-style-type: none"> • Define the right model to adapt it to needs, eg endogenous school feeding to ensure sustainability. For this model, the parental contribution is solicited. • Joint advocacy with the Municipality to allocate a percentage of budget to improve canteens' operation capacity, in the context of local development • Establish a school feeding committee by democratic vote
	Popularization of the Farmer Field School (CEP) approach, in the urban context, development of childcare.	<ul style="list-style-type: none"> • Initiate urban agricultural training • Organize a contest for a better school garden or vegetable garden • Share experiences and good practices between FEFFI
	Reinvigorated school milk or «ronono antsekoly», there may also be other similar local initiatives	<ul style="list-style-type: none"> • Develop 4P « Public Private Partnership Peasant » alliances • Promote access to drinkable water within all EPP

#27 Surface area of (potential) agricultural spaces within the municipal boundary

<p>Protect and enable secure land access and tenure for sustainable food production in urban and peri-urban areas, including land for community gardeners and small producers, for example through land banks; provide access to municipal lands for local agricultural production and promote integration with land use and urban development plans and programs.</p>	<p>Disseminate Urban Agriculture practices (AULNA type) in the urban environment</p>	<ul style="list-style-type: none"> Disseminate the AULNA technique to institutions and attached them to the Municipality (CSB, district, EPP, community gardens, etc ...) to serve as showcases at the household level Set up agro ecological zones at the level of the 6 districts (at least 1 location per district with at least 1.2m² X 3 per site: in the public gardens, at the offices of fokontany, ...) to raise awareness, inform, educate locals on the interest and importance of agro ecology in relation to the environment and health Strengthen managers' capacity to deploy the AULNA technique and the implementation of agro ecological zones
	<p>Strengthen land tenure security in peri-urban areas, taking into account PUDI guidelines (Urbanisation Master Plan)</p>	<ul style="list-style-type: none"> Follow the validation and implementation of PUDI Diffusion of texts on land procedure (brochure, others)
	<p>Valorisation of production basins</p>	<ul style="list-style-type: none"> Involve all actors concerned (Ministries, NGOs, municipalities, Region, association, organization of producers, ...) Identify pilot production areas, implementation



#36 Number of fresh fruit and vegetable outlets per 1000 inhabitants (markets and shops) supported by the municipality.

<p>Provide support to municipal public food markets in policy and programs, including farmers' markets, informal markets, retail and wholesale markets, restaurants / food stalls and other food retailers, recognizing the different approaches working with private and public components of market systems.</p>	<p>Develop markets for agro ecological products</p>	<ul style="list-style-type: none"> • Promote the location of sales outlets of agro-ecological products in each market at the level of the Urban Commune of Antananarivo (wholesale, semi-wholesale, producers, households). • Improvement of the existing infrastructure for the installation of these outlets • Communication, development education (on the existence of outlets, on agro-ecological products, the impact of the consumption of chemicals on health, respect for the environment (enrichment of soil etc ...)) • Capacity building of local officials on the monitoring and management of markets • Organization of "Quality Product Days" (contest for the best producers, the best tradesmen, diffusion of the culinary techniques, tasting, consultation and advices on the consumption of agro ecological products by the doctors, ...) • Identify and formalize the retailers managing agro ecological product outlets • Strengthen the capacity of retailers managing agro ecological product outlets • Set up a sales centre for agro ecological products
	<p>Ensure the quality of agricultural products (agro ecological standards)</p>	<ul style="list-style-type: none"> • Promote the quality approach on agro ecology: implement a quality assurance system (participatory guarantee system) • Labelling of agro ecological products



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#41 Total annual volume of food losses & waste

<p>Convene food system stakeholders to assess and monitor food loss and waste at all stages of the food supply chain in the region (including production, processing, packaging, preparation, presentation and handling safe food, reuse and recycling) and ensure comprehensive planning and design, transparency, accountability and policy integration.</p>	<p>Regular collection of data on food waste</p>	<ul style="list-style-type: none"> • Perform a census on food waste (catering waste, food waste, waste, etc.) to understand the situation at the City level • Launch a nutrition-related waste study: waste can help to explain nutrition problems
	<p>Education on waste reduction, avoid waste</p>	<ul style="list-style-type: none"> • Start with schools supported by the Municipality, create value groups within schools
	<p>Integrate waste recovery into planning Encourage the private sector (food companies) to value the surplus food so that it does not become waste</p>	<ul style="list-style-type: none"> • Municipal bylaw or Regional Directive to encourage via tax benefits, to reduce waste or by setting up waste recovery actions (target: private companies) • Capacity building through context-specific methods, eg. for recycling, composting • Install waste sorting in public buildings (EPP, Universities, Ministries) by setting up different garbage bins
	<p>Work on waste management in communal markets Linking valuation and the outlet Rise awareness of waste producer groups and consumers on the consequences of not managing waste so that it can make sense</p>	<ul style="list-style-type: none"> • Install in all markets outlets for “zero-waste” products to sensitize consumers • Communication campaigns to spread messages to reduce waste and turn food waste into other products. • Sharing of knowledge and communication with peri-urban communes for the installation of municipal composting training sites (showcases) • Cooking demonstrations with products from waste (eg skin potatoes.) - reuse Recipes - Awareness Waste Day
	<p>Communicate results Vertical synergy: joint efforts of central, regional and local government authorities towards common goals</p>	<ul style="list-style-type: none"> • Communication on waste behaviour changes • Introduce the waste discussion in educational programs in schools • Use the City’s MAMYCOM screens and the FB page to spread messages about reducing food waste • Household awareness about waste reduction - via existing waste workers / RF2 (Sanitation and Hygiene System)

5.2. Strengths & weaknesses of the MUFPP framework of indicators

The main strength of using the MUFPP Indicators Framework was for sure the solid methodological guideline it provided. Suggested guidelines were clear and easy to adapt to the local context. The Indicators Framework helped to organise priorities and rapidly select the accurate information. Another important strength was the possibility to share with other Cities a common ground for the assessment process. Even if all pilot Cities approached the assessment differently, same indicators were shared at the basis, so the exchange was easier to follow. The MUFPP is for the moment the only global food policy guideline

standard, recognised internationally by cities. This also provided consistency to the analyses, which helped to ensure partners about the importance of such an effort, and supported the project's credibility.

As regards weaknesses, the main point was the choice restriction due to lack of time. For practical reasons, data availability was the main priority, as well because of the lack of resources which were appointed to the project. This was not at all a constraint to guarantee the success of the project, as it is only the beginning of a process, which may be improved in the near future.

5.3. Need of Key local stakeholders to work with the indicators on a longer term basis

The objective of joining the Pilot Project for Antananarivo was very much focused on the use of the Monitoring Framework as a driver for the consolidation of a multi-stakeholder food network, oriented to become the Antananarivo Food Policy Committee in the near future. Such attempt was meant to reinforce the links between local and regional partners, to consolidate communication and enhance future dialogue, foster engagement and interest in data sharing, provide the basis for shared monitoring actions. The workshop was the first step to start discussions and show the power of this possibility, however some key points need to be revised in order to guarantee the success of the work in a longer-term basis:

- Reinforce the MUFPP focal point's role in the Municipality, which is for the moment somehow vulnerable to political transitions. Even if the local coordination is now anchored in the Municipality within the duties of a Civil Servant in the Mayor's Office, this still needs to be reinforced and officialised to avoid political risks.

- Continue reinforcing Municipal technical teams' capacity and support the interdepartmental coordination. This will allow a better organisation of data within the City and will encourage technicians to preserve the work done so far.
- Consolidate rapidly the creation of the Antananarivo Food Policy Committee, together with the concerned bylaw. This should integrate the definition of a local Food Policy Board ensuring the representativeness of different sectors and choosing the right sector leaders (associated to the 6 MUFPP working areas). This will contribute to the perpetuity of discussions, data sharing and implementation of a future policy action plan, following the proposed orientations and actions (outcome out of the first workshop).

5.4. Future trends

Some ideas about what can be developed after the Pilot City project:

- Work with other Cities in the region to help create a regional coordination for the MUFPP in general but also for the implementation of the Monitoring Framework in cities. Such coordination will enhance experience sharing, city exchanges and capacity building.
- Create City-to-City partnerships. A partnership between Antananarivo and Nairobi to perpetuate collaboration and exchanges is expected.
- Help to create synergies with local and regional Mayor's Associations in the region / continent (ex. AIMF).
- Foster collective fund raising. Cities are reluctant to engage more with MUFPP if funds are not ensured.

5.5. Challenges and benefits of working with RUAF and other pilot cities in this process

Working with the RUAF support on the MUFPP Indicators Monitoring Framework has provided a unique opportunity for Antananarivo to acknowledge full immersion into the Food Policy process. Data collection has been difficult, but the time investment was worth the effort, as a starting point to allow obtaining knowledge about the context, getting closer to actors and imagining future potential

initiatives. RUAF experience has provided key support in the process, even if the time and resources were short. The exchange with other pilot cities allowed the City to feel accompanied in the process and the exchange was enriching and very useful. We are sure that future exchanges with Nairobi and Quito will continue to help us to go further in the improvement of our own strategy.







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