

Creating Health & Climate Impact

Restoring Madagascar's broken drinking water infrastructure.

Clean Cooking & Sustainable Fuels



Initiatives by:



# Welcome



# Welcome



1. Explaining the Clean Water Clean Cooking PoA.
2. A programme under the Gold Standard for the Global Goals.
3. About SaniTap.
4. Why we need your input – Design Consultation.
5. We will tell you about the Programme of Activities (PoA).



**Gold Standard**<sup>®</sup>

Information Packs have been sent or are available to provide information to support this presentation.

# Agenda

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1. Opening and welcome: Introduction to SaniTap
2. Purpose and Intent of the PoA (Programme of Activities)
  - a) Explanation of VPA (Voluntary Project Activity) 1 (Clean Water)
  - b) Explanation of VPA 2 (Clean Cooking)
3. Sustainable Development Impacts of the Projects and Positive Impacts on Stakeholders
4. Gender Responsive Projects
5. Safeguarding Principles and Adverse Risks
6. Free Prior and Informed Consent: Transfer of carbon emission reduction ownership
7. Feedback and Grievance process
8. Questions and Answers
9. Information on Next Steps and Contact Details
10. Evaluation - Collecting Feedback

# Purpose and Intent of the PoA



# Purpose and Intent of Clean Water Clean Cooking PoA

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- Provide households with lifesaving clean cooking and safe water technologies and improve living conditions.
- Reduce greenhouse gas (GHG) emissions related to the use of biomass for cooking and water boiling.

This Programme of Activities (PoA) will be certified by the Gold Standard for Global Goals.

- Projects under this PoA are registered as Voluntary Project Activities (VPA) using Gold Standard methodologies.
- These projects will generate carbon credits by preventing GHG emissions including CO<sub>2</sub>.
- Savings of non-renewable biomass will reduce deforestation and contribute to improved health conditions of vulnerable female and male end users whilst creating health, convenience and economic benefits.
- This programme actively contributes to several UN Sustainable Development Goals (SDGs).
- The PoA and its related VPAs adhere to all Gold Standard for Global Goals Safeguarding Principles and Requirements. All VPAs will seek to achieve Gender Responsive certification.

# PoA Details



## Boundary

- Madagascar
- Guinea
- Mozambique
- South Africa
- Ethiopia
- Zimbabwe

## Coordinating/Managing Entity

SaniTap Ltd is the Coordinating/Managing Entity (CME).

## Madagascar Project Developer

SaniTap Ltd is the Project Developer in Madagascar

## Duration of the PoA

The PoA is expected to run from 2024 to 2044.

## Product Requirements applied

Green House Gas (GHG) Emissions Reductions.

## No ODA Funding

No ODA funding will be used within the PoA or its VPAs

# PoA VPA Details



## Technologies:

- Technologies to provide and enable Safe Drinking Water.
- Technologies to provide Improved and Clean Cooking.
- Technologies that enable fuel switching.

## Project Activity Examples:

- Restoration of failed water points to provide safe drinking water.
- Provision of household water filters.
- Production of biomass pellets for use in improved cookstoves.
- Provision of improved cookstoves.

VPA Scale: Small Scale and Micro Scale

## Methodologies:

The PoA is expected to include, but not be restricted to, the use of the following methodologies:

- MECD - 'Metered and Measured Energy Cooking Devices' Version1.0.
- ERSDW - 'Emission Reductions from Safe Drinking Water Supply' Version 1.0.
- TPDDTEC – 'Reduced Emissions from Cooking and Heating - Technologies and Practices to Displace Decentralized Thermal Energy Consumption'. Version 4.0.
- SMEC – 'Simplified Methodology for Efficient Cookstove' Version3.0



# Who is SaniTap



## Mission

To **implement scalable business models** that deliver reliable and affordable **WASH services** and **Clean Cooking** to unserved populations, through technology innovation, novel financing mechanisms and last-mile delivery partnerships.

## Vision

All people have access to **climate secure clean water** and **clean cooking**.

SaniTap is the Coordinating/Managing Entity for this PoA.

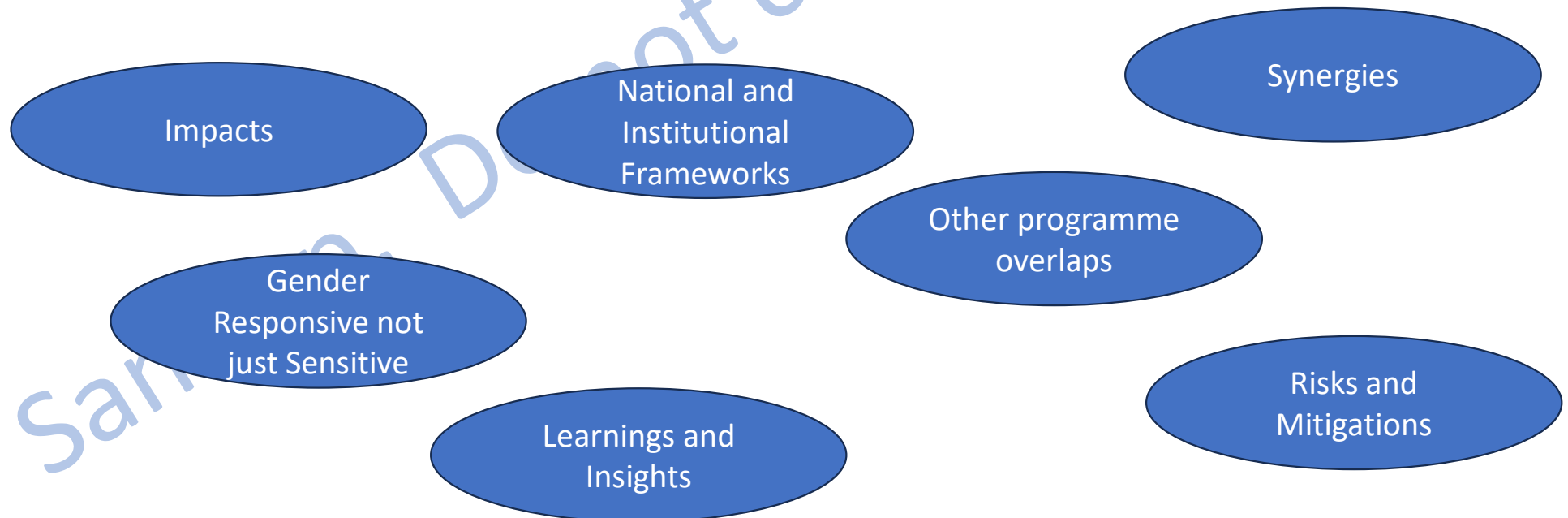


# Design Consultation: your input valued



## Your Input

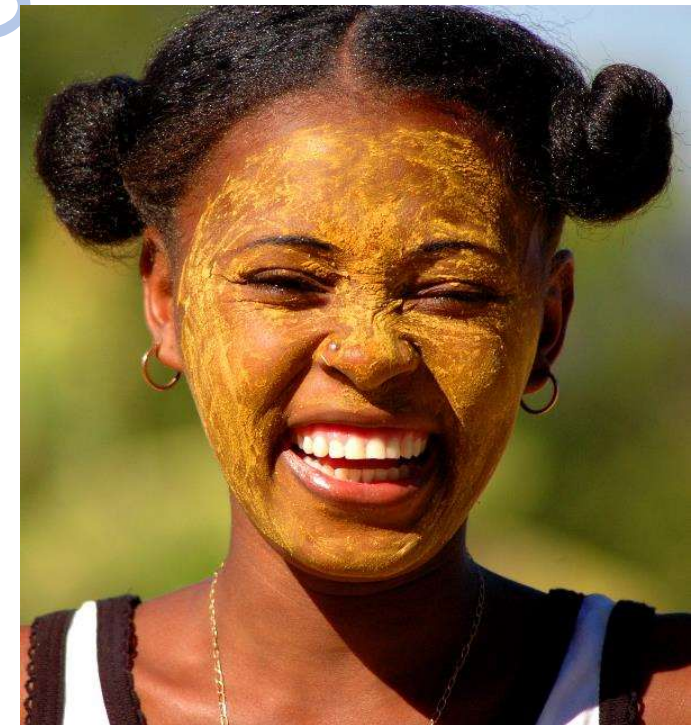
Highly valued so we can develop the best possible Projects within the Programme



# Objectives of Design Consultation



1. Meaningfully identify, engage and consult stakeholders to improve programme design and outcomes.
2. Inform stakeholders and discuss likely programme impacts (positive / negative) during the design, planning and implementation stages, and their relevance.
3. Establish an ongoing engagement process to provide input, feedback and to raise concerns throughout the project.



Without reducing the importance of men, we particularly welcome feedback from women and others whose voice is not normally heard well enough.

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Example of VPA within the PoA:

Clean Water Project



:Madagascar

# VPA: Clean Water



- Across rural Madagascar, over ten thousand non-functioning water points exist, having fallen into disrepair.
- This project restores broken wells, or construct new, and maintain them for 15+ years, providing clean drinking water to tens of thousands of people.
- There are expected to be multiple small scale and/or micro scale VPAs in Madagascar alone.
- Using the Gold Standard for Global Goals' *Methodology for Emissions Reductions from Safe Water*, VER carbon credits will be generated.
- Sale of the VERs creates an income stream that funds the rehabilitation of non-functioning water points; and ensures their ongoing maintenance;
- The project contributes to 8 UN SDGs, of which 3-4 will be monitored.



# The Problem



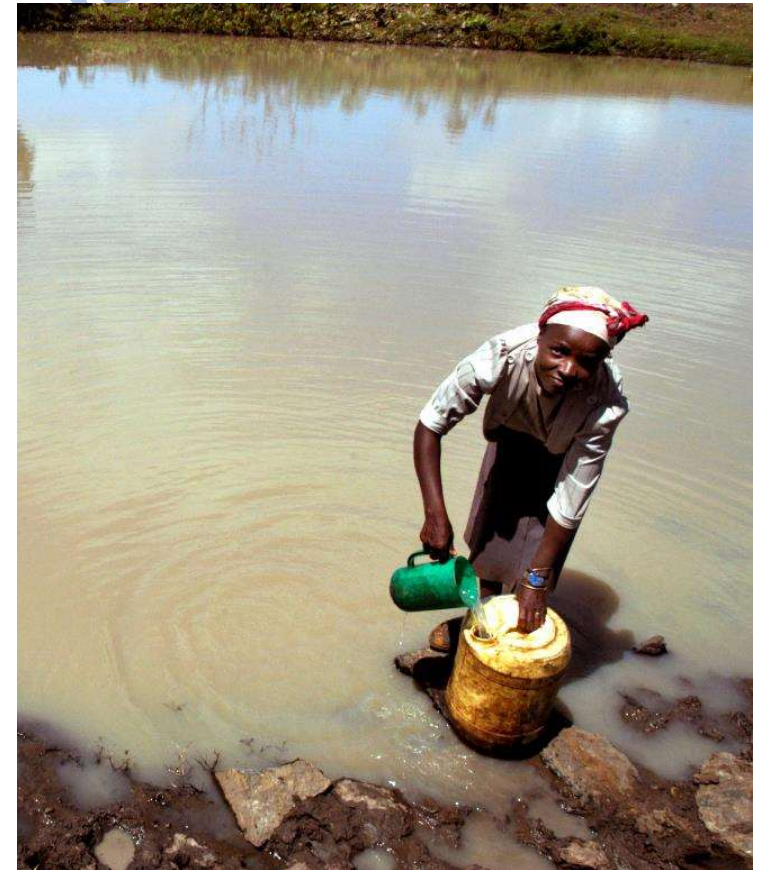
**Thousands of water points have broken down** due to lack of spare parts; inability to pay for repairs; poor community management; or lack of technical competence.

## **IMPACT:**

**Waterborne diseases are rampant** in such villages, and young children are especially at risk.

Without clean water, **households are forced to boil dirty water.**

**CO<sub>2</sub> emissions are produced** because firewood and charcoal are used as fuel resulting in **deforestation** and **loss of precious ecosystems.**



# Need for Safe Water

## Large need for safe water:

- Over 10k **existing** water points (>60% broken).
- <34% **rural people have safe water access.**
- Population growth > construction rate.

## Scale:

1. Phase 1: Well repair for **known 4,310 communities in Madagascar**
2. **Each small scale VPA = ~ 800 wells**
3. Phase 2: Additional repair for existing wells: up to **4,000 extra** communities in Madagascar
4. Est 25% of handpumps for 200m users are broken across sub-Saharan Africa.



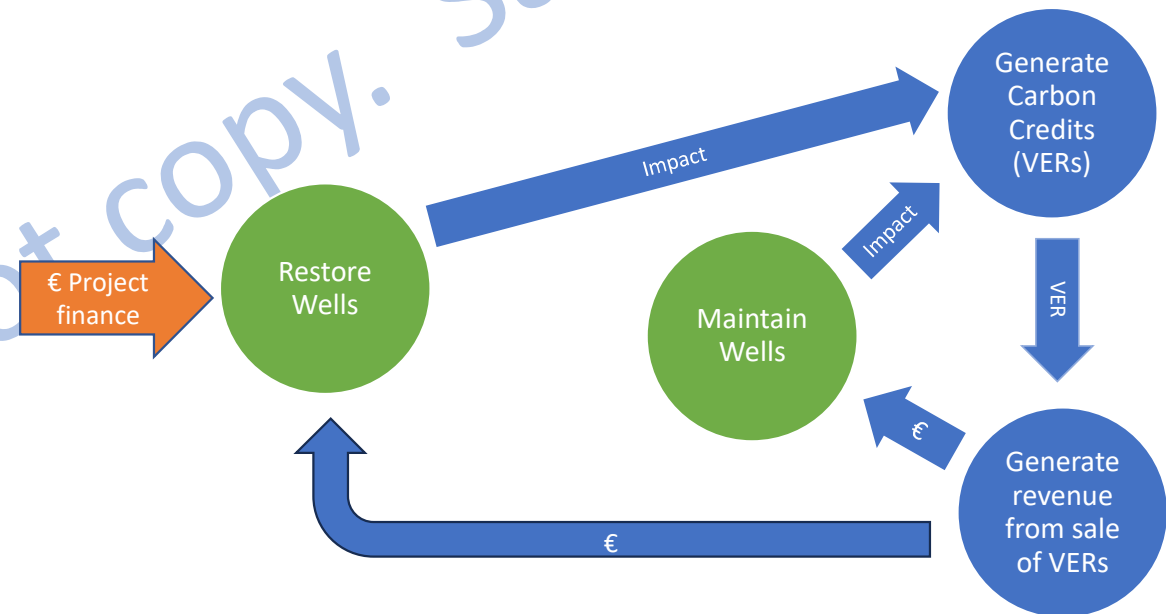
# Sustainable Development Impacts of the Project Solution



We **repair broken rural water points** (or construct new) and **maintain them for 15+ year**. Instead of charging poor communities the full cost, **revenues are earned** through the **sale of verified carbon credits**.

The credits are generated by eliminating the need to boil unsafe water with firewood.

This creates a **virtuous impact cycle**: more wells generate more carbon revenues, which are ploughed back to maintain more water points....





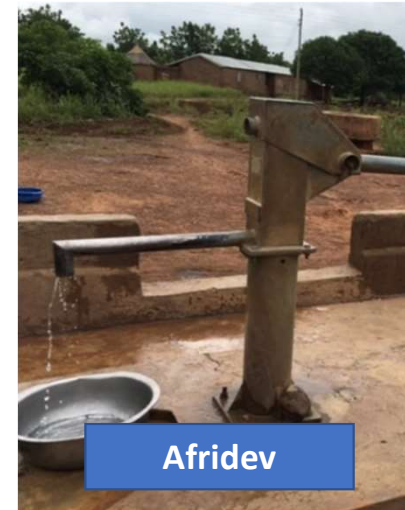
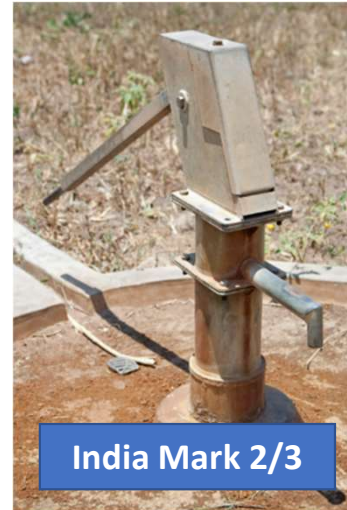
# Explanation of Project Project Technologies



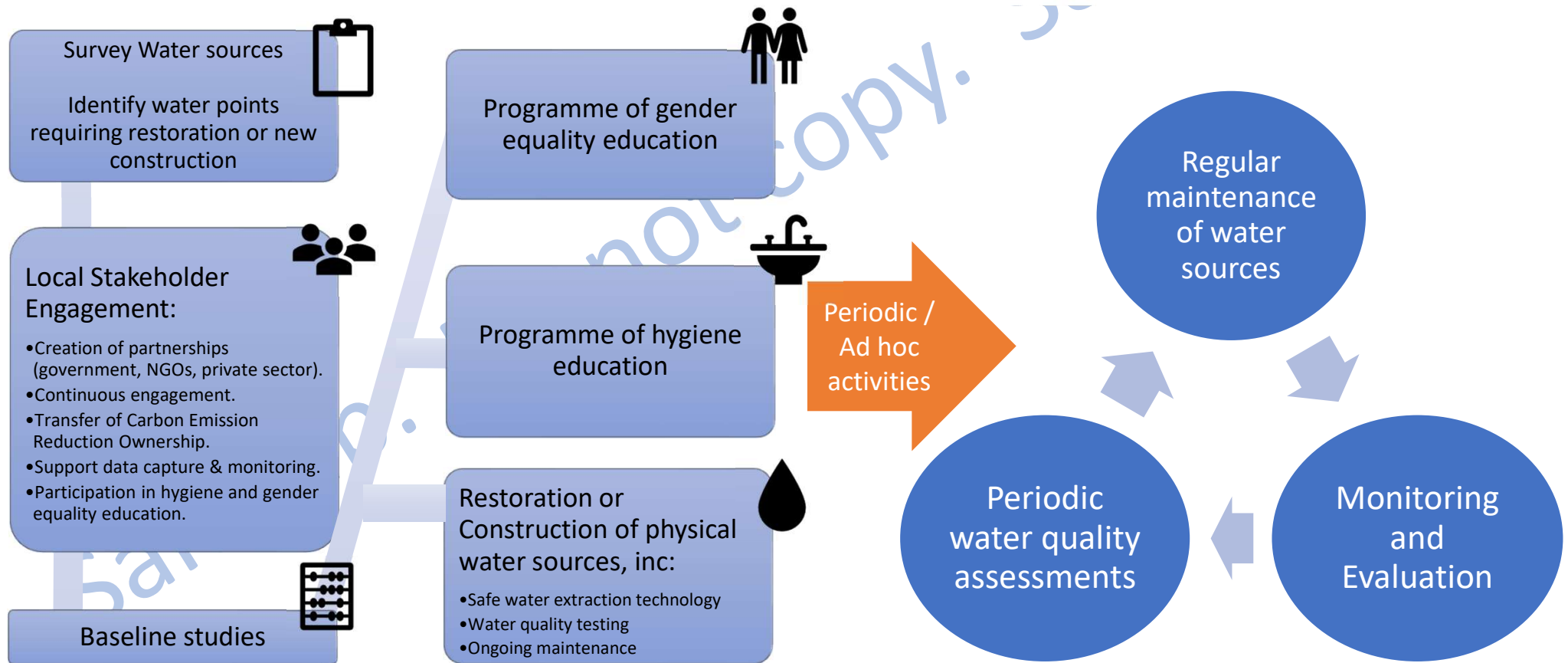
Examples of project technologies:

1. Restoration of non-functional (or new construction) of **hand pumps, boreholes, wells, (solar) pumped or gravity fed systems**, and other **community or household systems**.
2. **Piped water systems** are included in the possible range of safe drinking water technologies.

Project technologies examples:



# Explanation of Project Implementation Plan



# Sustainable Development Impacts of the Project

## Core impacts



People have safe drinking water



Community institutions (schools and clinics) served



Large quantity CO<sub>2</sub> reduced



Hygiene programs increase health impact



Local employment especially for women



Gender Equality Improved



Reduced deforestation



Sustainability 15+ years



Local capacity building



# Sustainable Development Impacts of the Project SDG Monitoring & Reporting plan



We measure impact created across the programme:

- # of pumps repaired.
- # days operational.
- Speed of response in case of repair.
- # of people reached.
- Tons of CO<sub>2</sub> emissions prevented.
- Various parameters for GS Meth

We deploy innovative technology & use apps like mWater & sensors on selected sample wells.



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Example of VPA within the PoA:

Clean Cooking

:Madagascar



# Problem

In urban areas, most people cook on charcoal. Modern fuels are too expensive.

Charcoal is often produced from unsustainable sources, using inefficient techniques that waste wood – which causes deforestation.



## NEGATIVE IMPACT:

- Disease from smoky stoves **kills many women and children from Indoor Air Pollution**
- **Deforestation** from inefficient charcoal production (1 tons of charcoal needs 10 tons of wood).
- **Greenhouse gas emission** because wood for charcoal comes mostly from non-renewable sources.
- **Increased poverty** due to rising charcoal costs (as wood becomes scarce).

### In Fort Dauphin

Households: 20,000

Daily requirement charcoal/hh: 1Kg

Daily town requirement charcoal: 20 tonnes

Wood required: **200 tonnes/day**

=73,000 tonnes per year

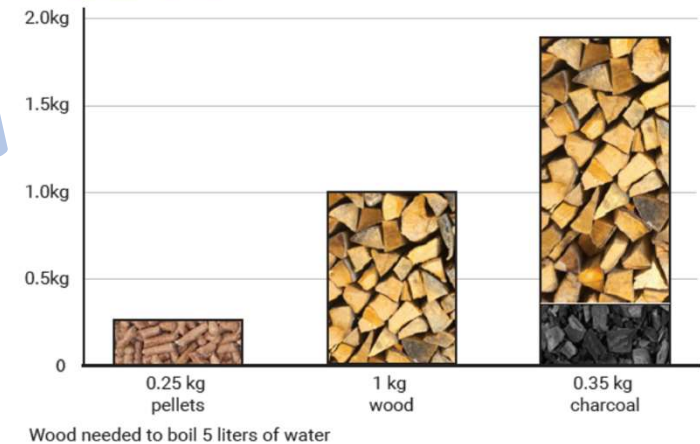
# VPA Clean Cooking : a Fuel – Stove Combo

Introduce cooking on pellets, which use **90% less wood** compared to charcoal.

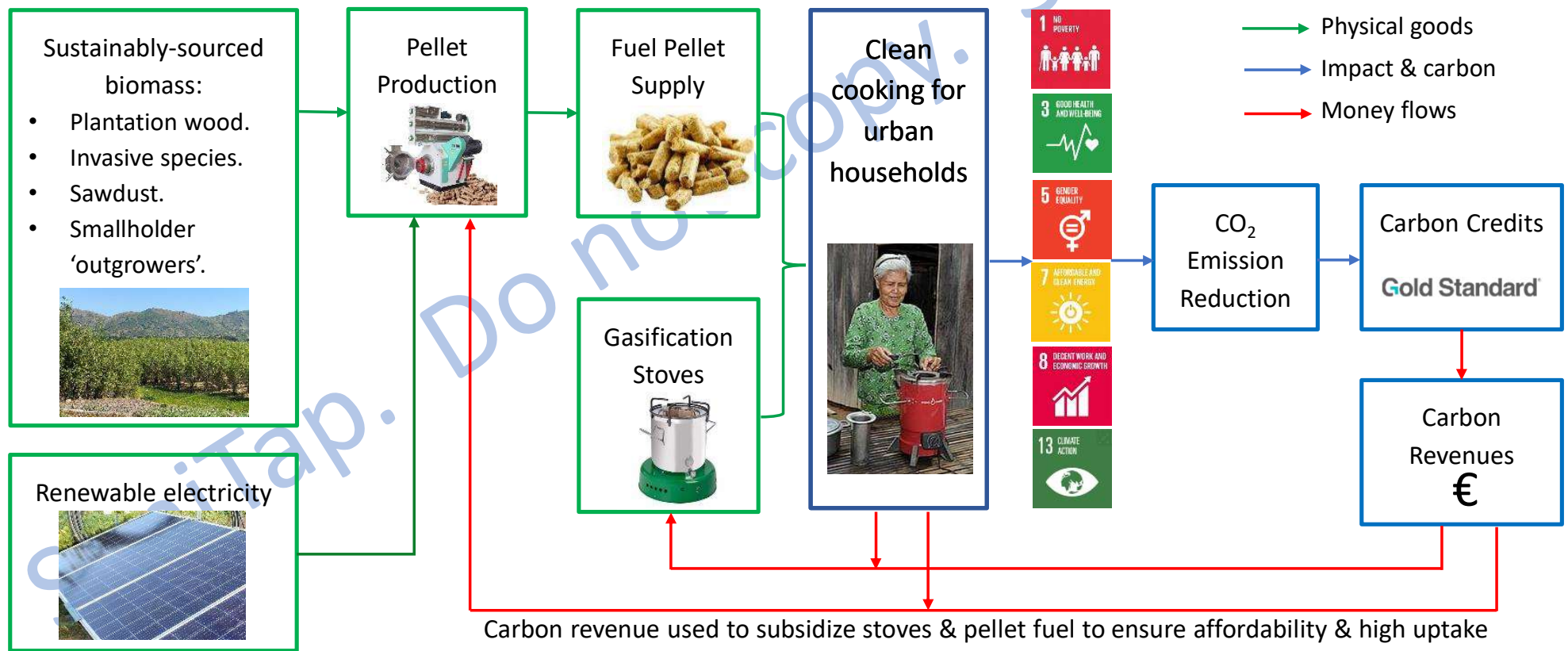
- When made from sustainably-sourced biomass, the forest-savings are huge.

Introduce modern cookstoves that burn pellets, which are convenient, fuel-efficient (Tier 3 or 4).

- Clean-burning save lives by preventing indoor air pollution.



# Solution: a Sustainable Model





# Project technology (pelletising)

The Gold Standard Methodology for *Metered and Measured Energy Cooking Devices* measures fuel used.

- Pellet fuel will be produced from sustainable biomass sources – including some grown by local people.
- Renewable energy will be used to power the production plant.
- Fuel must be readily available and sold at par or cheaper than charcoal.
- Pellets can only be used in special 'gasifying' stoves.



# Project Technology (stoves)

Modern gasifying stoves will be used.

- They replace charcoal with sustainably produced biomass pellets.
- The choice of the stoves impacts ER calculation (thermal efficiency).
- ‘Stove stacking’ is immaterial as MECD will only measure pellets used *not* reducing in charcoal consumption.
- Stoves will be readily available and sold cheaper than traditional stoves.
- Stoves are convenient (as easy to light as a gas stove) with great cooking experience.

Forced air gasifier stoves:  
pollutant emissions reduced by up to 90%.



**FabStove**

Tier 4  
40% thermal efficiency



**mimi moto®**

Tier 4  
47% thermal efficiency




**AFRICAN CLEAN ENERGY**

Tier 3  
30-40% thermal efficiency (TBD)


# Our Core Business = Impact



Access to clean cooking



All 20,000 households in FD could benefit



Large quantity CO<sub>2</sub> reduced annually



Reduced disease from indoor air pollution



Local employment especially for women



Gender Equality Removed



Reduced deforestation



Sustainability 15+ years

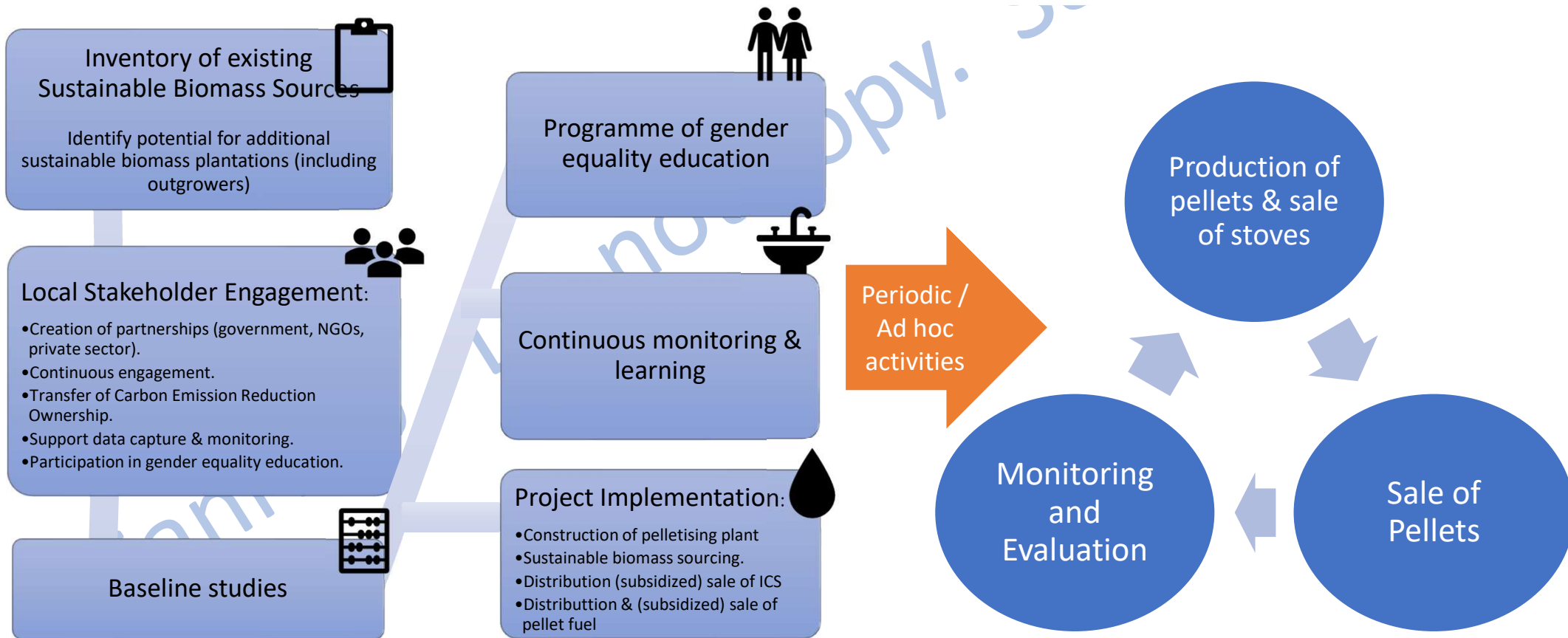


Local capacity building



# Explanation of Project

# Clean Cooking VPA: Implementation Plan



# Sustainable Development Impacts



# Sustainable Development Impacts of the Project

## Core impacts



- SDG13 CO<sub>2</sub> and GHG reductions
- SDG15 Reduced deforestation
- SDG5 Improved Gender Equality – especially for women and girls affected most
- SDG6 Access to safe drinking water
- SDG1 Reduced expenditure on fuel
- SDG3 Reduced indoor air pollution
- SDG7 Increased access to energy
- SDG8 Increased Employment Opportunities

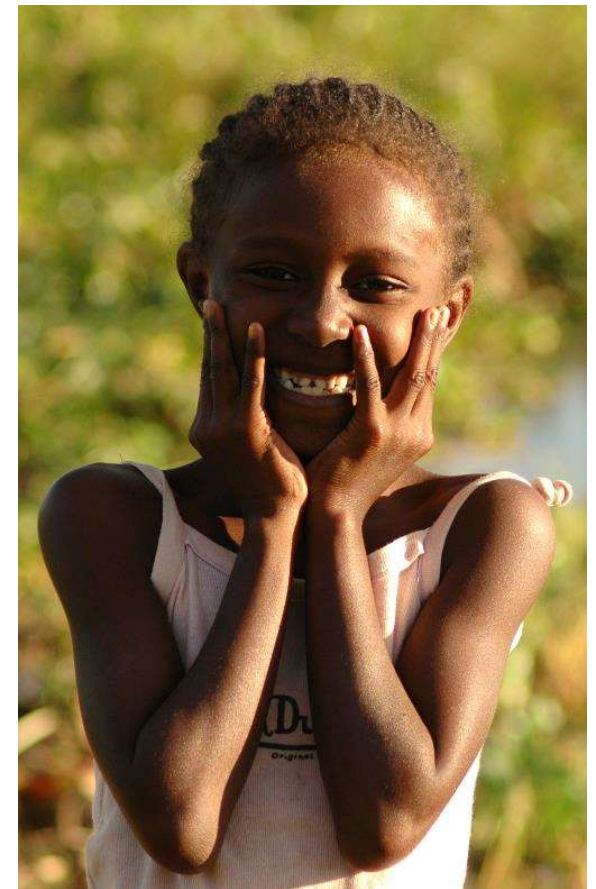
**Each VPA will typically monitor 3-4 SDGs**

## *Positive Impacts on Stakeholders*

# Economic, Social and Environmental



- 1. Household wealth increased.** Less time or money spent on fuel allowing income generating activity & education.
- 2. Improved health.** Reduced indoor air pollution as less time is spent boiling water or cooking on inefficient stoves.
- 3. Reduced illness.** Access to safe water and better hygiene practices reduce water-borne disease.
- 4. Reduce time spent gathering fuel** required to boil water – enhancing gender equality as this predominantly impacts women, girls and boys.
- 5. Improved gender equality.** The above impacts benefit predominantly women, girls and boys, in addition to improved education and gender responsive activities.
- 6. Increased employment.** Job creation throughout the safe water & clean cooking value chains.
- 7. Reduced deforestation.** Less fuel needed for boiling water or cooking: demand for wood reduces.



# Gender Responsive VPAs





# A Gender Responsive Project

## SDG 5: Gender Equality



Gold Standard projects are required to be gender-sensitive. Projects wishing to quantify Gender Equality impact (SDG 5) must be gender-responsive.

### GENDER SENSITIVE

- ❖ **Objective:** prevent adverse impacts on women and men.
- ❖ Requires compliance with Safeguarding Principles and consultation requirements.

### GENDER RESPONSIVE

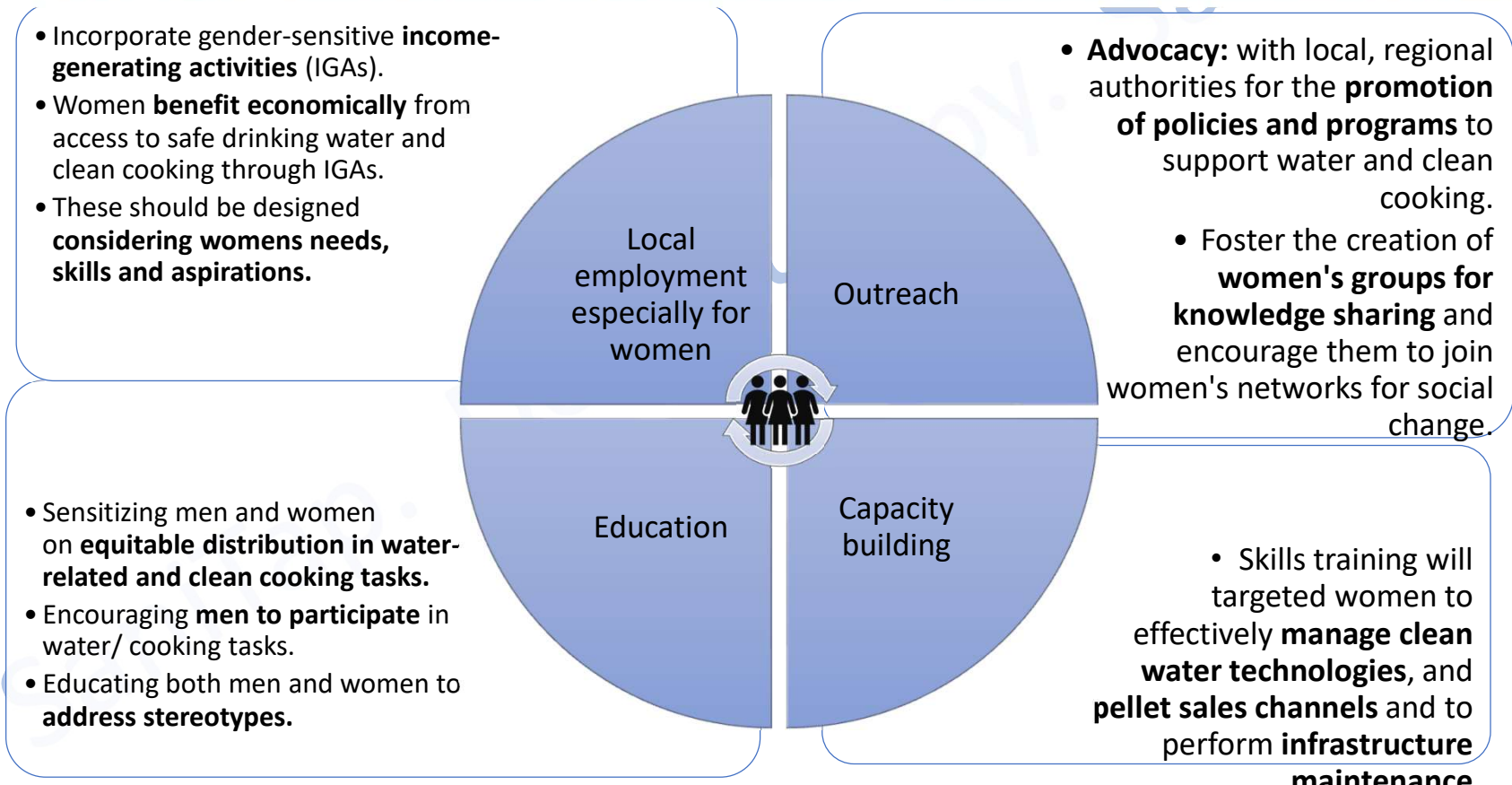
- ❖ **Objective:** pro-active approach to improving gender equality and claim contributions to SDG 5.
  - ❖ Requires to:
    - (i) conduct deeper gender analysis.
    - (ii) select gender-targeted project goals and action.
    - (iii) design project-specific gender indicators and parameters

**SDG 5 Mission Statement:** "Achieve gender equality and empower all women and girls."



# A Gender Responsive Project

## Project focus



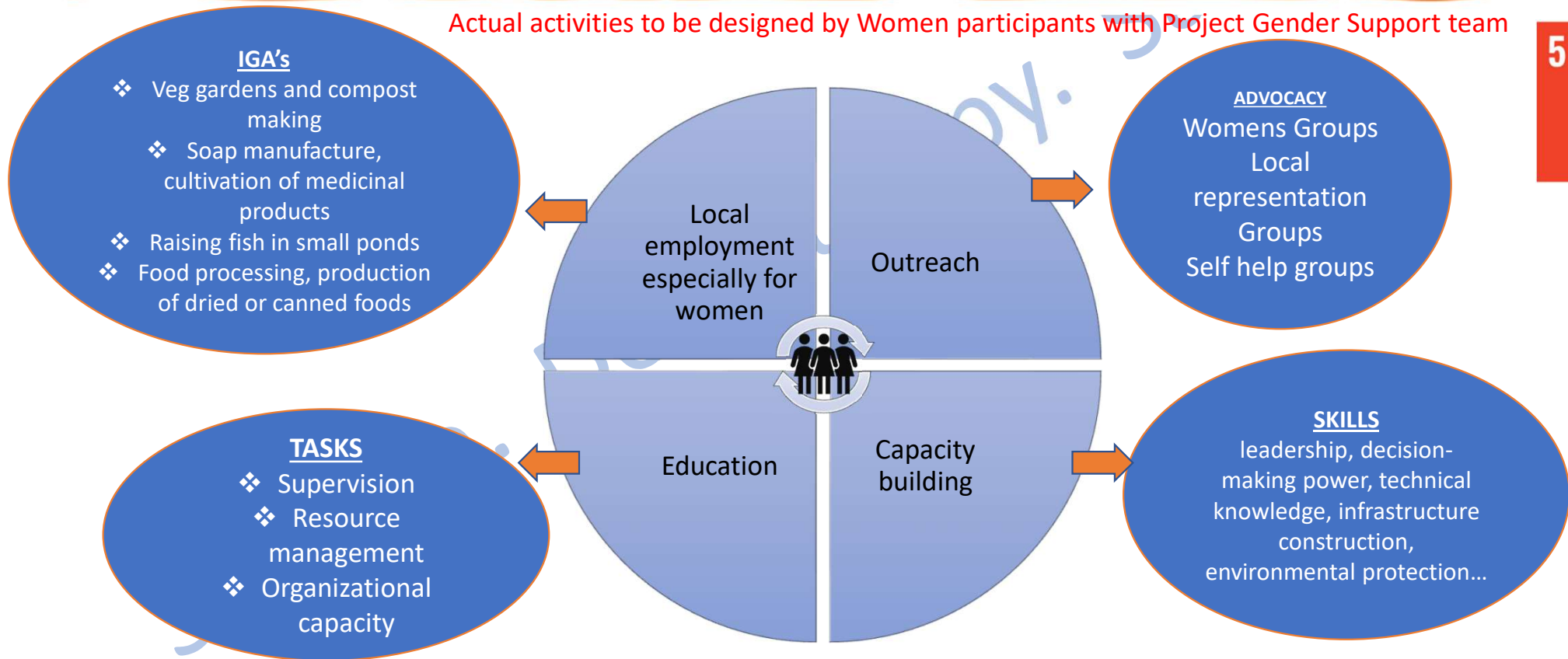
Periodic monitoring and evaluation of impacts to adjust projects

# A Gender Responsive Project

## Project Gender Activities (examples) TBD



Actual activities to be designed by Women participants with Project Gender Support team



Periodic monitoring and evaluation of impacts to adjust projects

# National policies for gender



## VPAs will comply with National Policy and Standards



VPAs supported by national Gender Experts

- La constitution de Madagascar reconnaît
  - dans son article 6 l'égalité homme femme. *Tous les individus sont égaux en droits et jouissent des mêmes libertés fondamentales protégées par la loi sans discrimination fondée sur le sexe, le degré d'instruction, la fortune, l'origine, la race, la croyance ou l'opinion.*
  - Dans son article 7 : *Les droits individuels et les libertés fondamentales sont garantis par la constitution...*
- En 2000, la Politique Nationale de Promotion de la Femme (PNPF) a été mis en place à Madagascar et arrivée à son terme en 2015.
- En 2003, le pays s'est doté d'un Plan d'Action National Genre et Développement (PANAGED) et de Plans d'Action Régionaux (PARGED) pour la période 2004-2008.
- En 2016, la Stratégie Nationale de Lutte contre les Violences Basées sur le Genre 2017- 2021 a été adoptée
- En 2018, l'analyse situationnelle de l'égalité femme-homme, préalable à l'élaboration de la Politique Nationale de l'Égalité Femme-Homme 2020-2030 et de son Plan d'Action quinquennal a été initiée.
- Depuis 2019, le pays dispose de sa Politique Générale de l'Etat -Initiative Emergence Madagascar (PGE- IEM) qui inclut dans ses priorités la promotion de la femme et accorde à la femme la place qui lui revient dans la société et dans l'économie en général.
- En 2020, la Loi n° 2019 – 008 du 16 janvier 2020 relative à la lutte contre les Violences Basées sur le Genre a été promulguée.
- En 2023, la stratégie nationale du genre et changement climatique a été publiée. Le document décrit les impacts du changement climatique sur les femmes et les hommes, ainsi que les mesures prises pour intégrer le genre dans les politiques, les stratégies et les programmes relatifs au climat. Il propose également des solutions pour renforcer la capacité d'adaptation des femmes face aux changements climatiques.

- Les croyances et les normes traditionnels attribuent
  - aux hommes le sexe fort et aux femmes le sexe plus faible (cf: adage malagasy : "les femmes sont des meubles plus fragiles"
  - Les hommes gerent et représentent officiellement la famille : la loi relative au mariage et aux regimes matrimoniaux les place comme chef de famille<sup>3</sup>
  - Les femmes s'occupant principalement des rôles reproductifs (santé des enfants), tandis que les hommes l'autorité pour prendre les décisions finales sur l'affectation des revenus importants (USAID, 2020)
  - les travaux mieux rémunérés sont souvent assumés par les hommes alors que les femmes occupent des emplois considérés comme plus faciles (exemple : gestion des infrastructures publiques par les hommes et les travaux de nettoyage par les femmes)
  - Les femmes et les filles collectent l'eau et dépensent au moins 30mn/jours (USAID, 2020)<sup>4</sup>
- Selon textes législatifs, les femmes et les hommes sont égaux en droit, pourtant dans la réalité, une grande disparité existe. A titre d'exemple,
  - Les femmes sont lésées au droit à la propriété : 15% des femmes et des filles possèdent des titres foncier contre 52% chez les hommes (MPPSPF, 2023)<sup>1</sup>
  - Budget temps : la charge de travail des femmes (13h) est plus importante que celle des hommes (10h), due à la gestion du foyer en milieu rural. (FERT –FIFATA, 2020)<sup>2</sup>
  - Emploi : les femmes et les filles sont nombreuses dans les activités informelles de survie avec un taux de 51,70% (Politique Nationale de l'Emploi et de la Formation Professionnelles, 2015)
  - Accès à l'éducation (AFROBAROMETRE, 2022)



# Safeguarding Principles



# Safeguarding Principles and Adverse Risks



Project adheres to all **Gold Standard for Global Goals Safeguarding Principles and Requirements** and seeks Gender Responsive certification.

**Few disadvantages of the project** except

- The possibility of reduced income to producers of charcoal.
- Fabricators of traditional cookstoves might see a reduction in turnover. They can be encouraged to sell & service improved cookstoves and/or produce sustainable biomass.

SaniTap seeks input from stakeholders to identify additional adverse risks and identify mitigation solutions.

See **Details of Safeguarding Principles in Information Pack.**



# Transfer of carbon emission reduction ownership



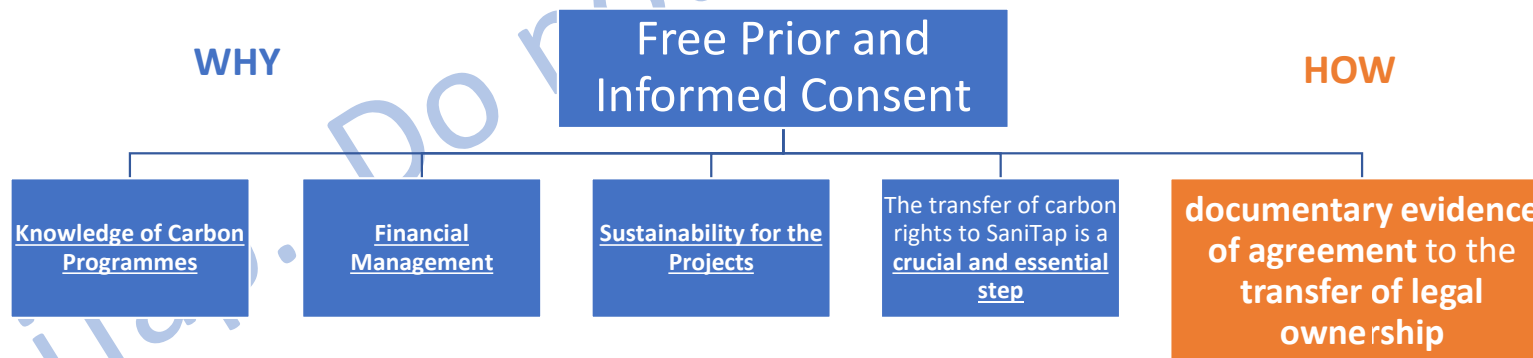
## Free Prior and Informed Consent



# Transfer of carbon emission reduction ownership

**Carbon rights** (ownership of carbon emission reduction and other mitigation outcomes) initially **belong to the households that reduce their CO<sub>2</sub> emissions** by using less firewood and charcoal for boiling water, using clean fuels or improved cookstoves.

- This is because *they* are the ones taking action to reduce emissions.
- However, **to effectively monetize these carbon emission reductions** and generate funds to implement Clean Water and Clean Cooking projects, the **ownership of these carbon rights needs to be transferred to SaniTap**.



End-users need to **enter into an agreement with SaniTap**, transferring '**Full and uncontested legal ownership of any Products**' that are generated under Gold Standard Certification (**VER carbon credits**), in return for the **subsidised / freely provided services or technologies**. Users must also agree to data collection which will be required to monitor the project activities.



# Feedback and Grievance process



# Continuous Input and Grievance



SaniTap established a process for stakeholders to submit feedback or to record concerns/grievances during the entire project lifetime.

1. A **Continuous Input and Grievance Expression Book** and **telephone number** will be available at each VPA location.
2. Email to [stakeholder.consultation@sanitap.org](mailto:stakeholder.consultation@sanitap.org).
3. SaniTap can also be emailed at [CleanWaterCleanCooking@sanitap.org](mailto:CleanWaterCleanCooking@sanitap.org).
4. Mail can be sent to: SaniTap Ltd, Hamptons Farmhouse, Park Rd, Hadlow, TN11 9SR. United Kingdom.
5. Grievance will be treated confidentially and can be submitted using the feedback form or by email at [confidential\\_grievance@sanitap.org](mailto:confidential_grievance@sanitap.org) or by telephone to the Grievance Officer at SaniTap or any Director of the company.





# Questions and Answers

SaniTap. Do not copy.



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# Next Steps

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# Information on next steps



## Next steps

1. The **'first-round'** feedback from the physical **Stakeholder Consultation meeting** including feedback from those unable to attend the meeting will be consolidated. SaniTap will respond to this feedback, circulating its response.
2. Stakeholders can then provide **'second-round'** feedback **over the following 30 days** (ie feedback on SaniTap's response to the first-round feedback).
3. Subsequently, SaniTap will submit a **Stakeholder Consultation Report** to Gold Standard. This will be **published on the Gold Standard Registry**.
4. All stakeholders can provide further feedback **at any point over the full duration of the Project**, through the feedback and grievance processes detailed in previous slide.

# Feedback



# What we will do with the feedback: next steps



- SaniTap will aim to respond to all feedback promptly and individually
- All feedback will be digitised and held on the SaniTap systems for transparency and may be used for audit purposes by Gold Standard as part of the registration process.
- SaniTap will review and evaluate all feedback for potential incorporation in the design of the PoA and subsequent VPAs
- All attendees of the Design Consultation will receive consolidated feedback and SaniTap responses so that further feedback can be given (another 30 days minimum).
- SaniTap will inform all stakeholders of the 2<sup>nd</sup> round feedback and SaniTap response and use of the feedback.
- All feedback - and SaniTap's response to the feedback - will be made publicly available through the Design and Stakeholder Consultation Reports which will be published on the Gold Standard Impact Registry

We look forward to receiving your helpful feedback, concerns, comments or advice.

# Evaluation - Collecting Feedback Today



1. Please complete the Feedback Forms available at the meeting today
2. Or use the Feedback form using the QR Code
3. **Face-to-face feedback** can be given to any members of the **SaniTap team**, including independent **representatives of WaterAid**
4. Feedback can be given to any members of the **independent Malagasy Expert Gender Stakeholders team (SiMIRALENTA)** during or after the Stakeholder Consultation meeting



SaniTap will aim to respond to all feedback promptly



[info@sanitap.org](mailto:info@sanitap.org)



# Suppressed Demand – Clean Water



Suppressed demand support low-carbon development for poor communities, who lack access to enough energy to meet their basic needs. They should not have to increase their emissions before they can benefit from carbon markets.

Without 'suppressed demand' we would have to encourage people to boil water (using non-renewable biomass) – causing emissions and deforestation. ONLY THEN would we be able to start a carbon program...

Suppressed demand enables projects to avoid such unnecessary future deforestation and emissions and get people clean water NOW instead of years later.