

LIVING UNDER BASIC SANITATION IN URBAN AREAS: A DIGITALIZATION APPROACH TO CREATE A BETTER COMMUNITY

Halting slums' continuum through low-cost digitalized footprints to improve sanitation access

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Targeted UN SDGs



A MASS PICTURE OF CLEAN WATER & SANITATION IN ASIA – PACIFIC REGION

Dr. Tedros Adhanom Ghebreyesus
General-Director of World Health Organization



“Poor water infrastructure puts world at greater risk from coronavirus”

“...water, sanitation, and hygiene measures in healthcare settings are important for... protecting patients, staff, and caregivers from infection risks”

“We must also ramp up investment in hygiene, water and sanitation, and infection prevent and control”

Source: The Guardian (2020), World Health Organization (2020)

65%

ASEAN leaders consider **resource access & efficiency** as a part of current importance

#4

Water, waste & sanitation scores as one of the most important priorities in ASEAN

→ **Sanitation system is deliberated as a key factor in enhancing the sustainable development of ASEAN member states**

Source: The ASEAN Secretariat (2018)

However

“Gaps in access to clean water and basic sanitation remain despite an increase in overall prosperity in almost all countries”

“...there are still marginalized groups relying on unprotected dug wells or surface water as their main water source, and practicing unsafe sanitation”

Source: UNESCAP (2018)

In 2015, **630 million people** practiced **open defecation** across Asia – Pacific region

1.1 billion people lacking access to **basic sanitation facilities** across Asia – Pacific region

Source: UNESCAP (2018)

ASEAN STATE MEMBERS' EFFORT TO ACCELERATE THE SANITATION SYSTEMS HAS NOT BEEN STRONG ENOUGH..

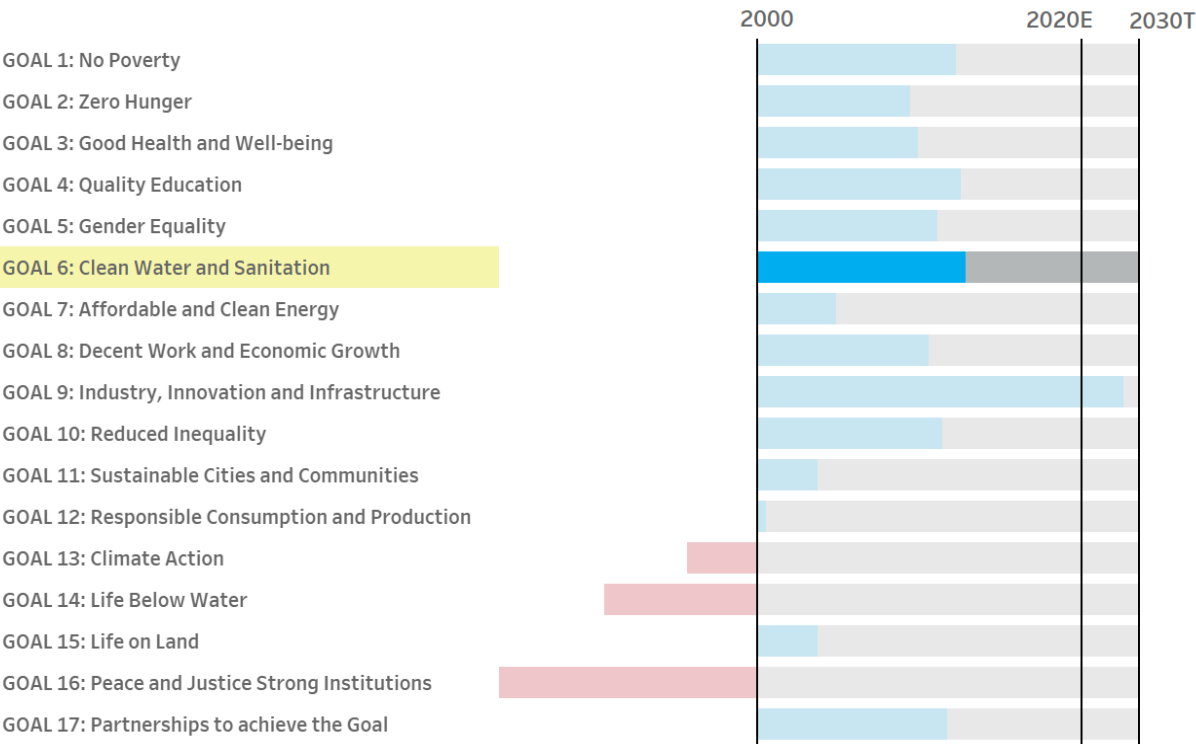
PERCENTAGE OF ASEAN POPULATION
LIVING WITHOUT BASIC SANITATION (2000-2017)

Source: JPM (2019)



ASEAN SDGs SCORECARD (2020)

Source: UNESCAP (2020)



Significant effort has been made in ASEAN members to eradicate under-basic sanitation experiences

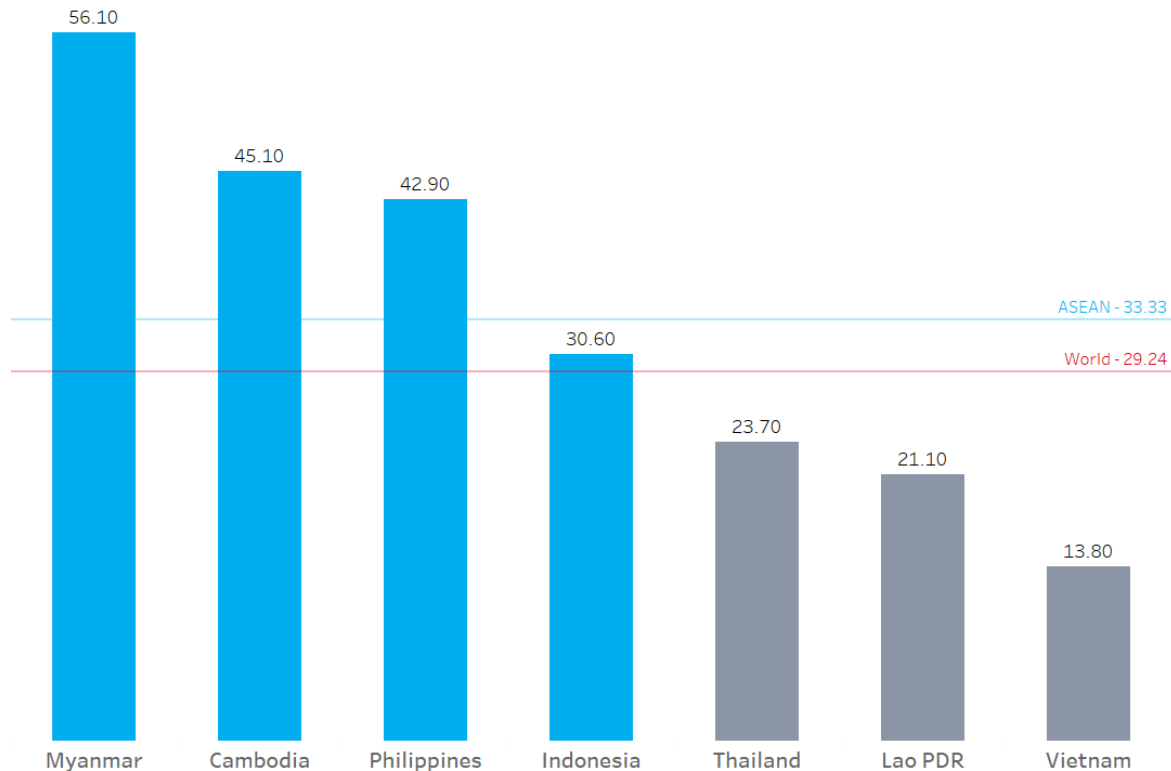
However, the SGD Goal 6 is still underperforming comparing to ASEAN's goals

... AND SLUMS' ACCESS TO BASIC SANITATION SYSTEM REMAINS QUESTIONED IN THE REGION

The larger the slum dwellers population is, the more unlikely they have access to basic sanitation services

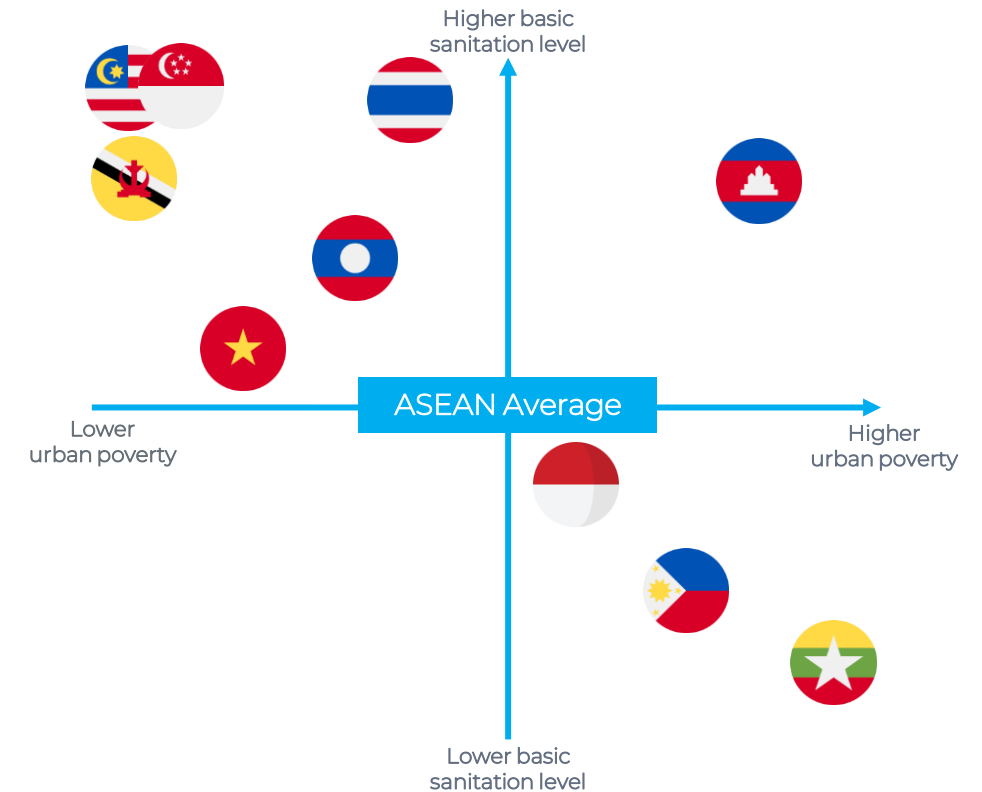
PERCENTAGE OF SLUM DWELLERS IN URBAN POPULATION AMONG ASEAN MEMBERS

Source: The World Bank (2020)



CORRELATION BETWEEN URBAN AREAS' SANITATION LEVEL AND URBAN POVERTY AMONG ASEAN MEMBERS

Source: The World Bank (2020), JPM (2019)



Half of the ASEAN state members still face a high number of slum dwellers than other parts of the world

These high-slum ASEAN countries are also facing poor sanitation services

CONSEQUENCES OF POOR SANITATION

Large-scale impacts due to poor sanitation have been recorded across ASEAN

Financial Losses

↓ **500 million USD**

Issues related to water uses and water quality

↓ **145 million USD**

Issues related to healthcare

Economic Losses

↓ **2%**

ASEAN members' National GDPs

Economic & Financial status of ASEAN members could be enhanced with strengthened sanitation stimulus

Top Health Issues

> **170 million**

People suffer from diarrheal disease and scabies

> **4 million**

Children across ASEAN nations suffer from malnutrition each year

> **1.3 million**

People suffer from helminths

Population's health, especially infants can be protected and enhanced with better sanitation system

ECONOMIC CONSTRAINTS COMES FROM EXTERNAL & INTERNAL

The issue is rooted in both sanitation investment gap and low-income slum dwellers

1.9 million USD

Current investment in water and sanitation



5.2 million USD

Current needs for water and sanitation

→ Water & Sanitation investment gap for ASEAN community puts restraints on the slum dwellers' access



35%

of urban poverty population in developing countries live in Southeast Asia

1/3

of them are among the poorest population in urban cities

→ Slum dwellers with low income are facing high constraints while living in urban cities across ASEAN members

MOBILE MONEY – THE FUTURE IS IN YOUR POCKET

Mobile Money has potentials to create significant economic and sanitation access momentum for ASEAN member states

What is Mobile Money?

- Money is transferred, made and received through payments via mobile phone
- Available to the unbanked
- An interface for initiating transactions for agents and/or customers that is available on mobile devices

Source: GSMA (2014)

Consumer Behaviors

7/10  customers want to increase cashless payment in the next 12 month

174 million adults
in ASEAN lack bank accounts or credit card

Source: ViSA (2019), BCG (2020)

Digital Trends

A typical person owns **1.3**  mobile phones in ASEAN

9/10 ASEAN nations can provide at least 1 mobile phone per person

Source: The World Bank (2020)

Required Future Investment

6.44 million USD
need to be invested in 2025 in Southeast Asia to meet the demand for Water and Sanitation in urban areas

Source: ADB (2017)

MOBILE MONEY – THE FUTURE IS IN YOUR POCKET

Enhance the financial inclusion for slum dwellers



Encourage the participation of water & sanitation providers



Encourage the participation of other public & private-sector stakeholders

- Available to end-customers without bank account
- Include various forms of mobile payments
- Include various support sources for deposits/withdrawals
- Provide a transparent, and affordable way to secure the dwellers' money from theft within their communities
- Gain access for sanitation services through affordable offerings and new money collection period

- Reduce cash collection costs, staff time, and vendor commission
- Extend their low-cost services to low-income segments
- Improve revenue collection efficiency (recover payments from arrears and reduce non-revenue water arising from billing issues)
- Improve business plan and pricing through collected data on usage

- Provide an effective funding mechanism among stakeholders
- Provide time & resources for effective partnerships between stakeholders
- Develop a consistent, coherent, appropriate overarching M&A framework
- Support all stages of characteristics NGOs/ NPOs/ Government cycle innovate-demonstrate-advocate to replicate
- Support the role of stakeholders as "capacity builder"



THE FOLLOWING KEY ELEMENTS WILL BE ATTAINED BY 2025

ASEAN SOCIO-CULTURAL COMMUNITY BLUEPRINT 2025

ELEMENT B.1

Reduce inequality and promote equitable access to social protection

ELEMENT C.2

Promote coordination to provide access clean and safe sanitation

ELEMENT D.5

Enhance cross-sectoral and cross-pillar coordination to ensure availability sanitation facilities in times of crisis

ASEAN ECONOMIC COMMUNITY BLUEPRINT 2025

ELEMENT D.1

Implement a more inclusive and consultative process involving the private sector

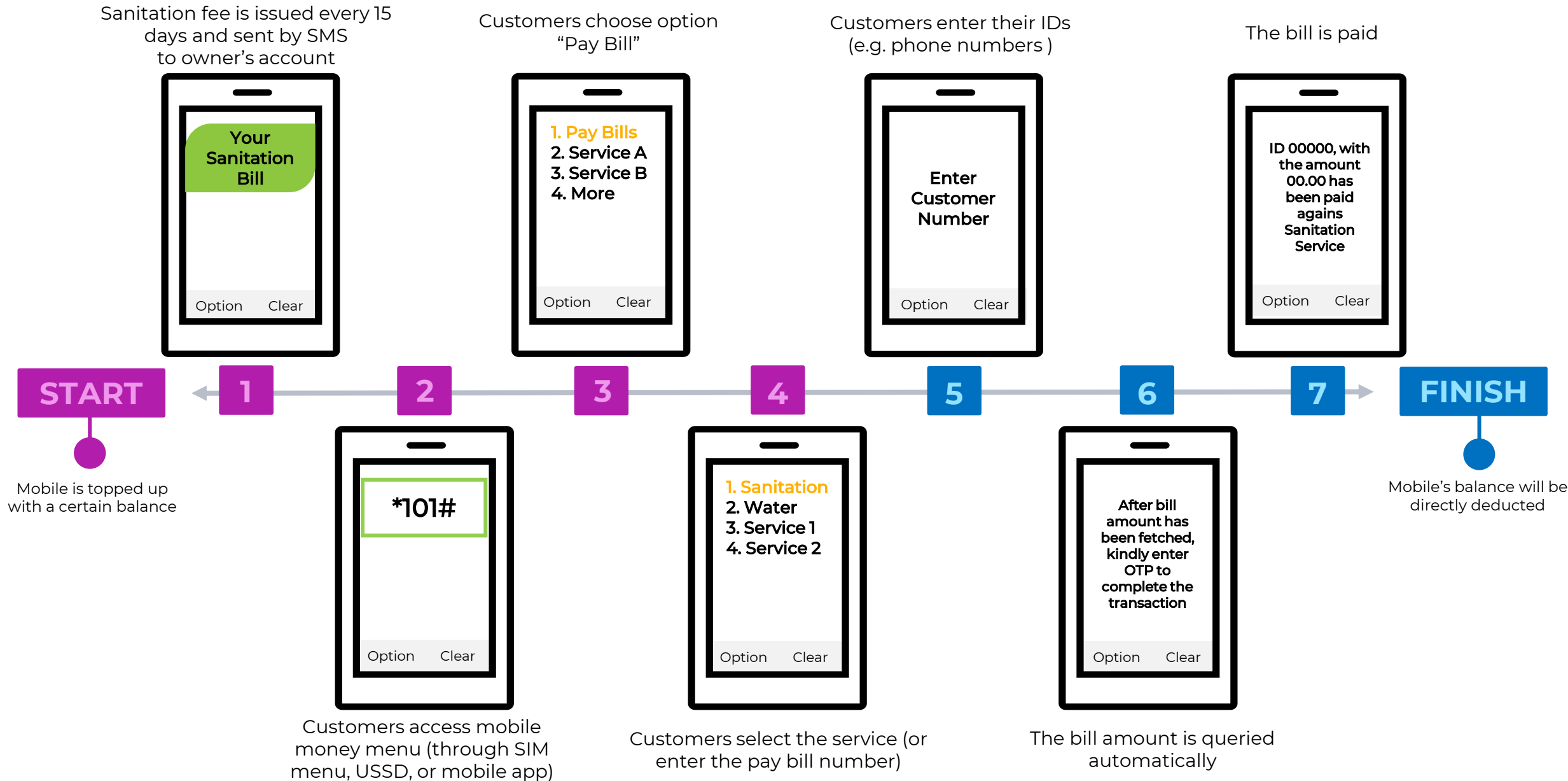
ELEMENT D.3

Promote Private-Public Partnership (PPP) for economic and social development

ELEMENT D.5

Promote the contribution of stakeholders to the regional integration efforts

LET'S EXPLORE THE MOBILE MONEY JOURNEY TO ACCESS BETTER SANITATION SYSTEM



IMPLEMENTATION PLAN

The Plan is based on the ASEAN Economic Community Blueprint 2025, ASEAN Socio-Cultural Community Blueprint 2025 & The 2030 Agenda for Sustainable Development

2021 - 2023

Launch & Grow

Affordable sanitation services with simplified mobile money process launched

- Call for cooperation of the Department of Economics & Social Affairs
- Call for funding from private sectors/ government in providing access to improved sanitation systems
- Partner with NGOs/ NPOs/ government to provide education for the usage of sanitation system with mobile money
- Provide discount and necessities strategies to encourage participation of dwellers
- Launch basic sets of sanitation services with simplified mobile money process for certain slums

2023 - 2025

Sustain

Critical mass of active users and stable service offering

- First round of expansion of services functionality
- Critical mass of active users in slums begin to use the service, creating program momentum
- Collaborate with SAP to construct built-in data & research projects for consumers' engagement & credit score evaluation
- Create consumer loyalty strategies based on the credit score reports to maintain the number of users
- Advise the Government and relevant private-sectors stakeholders of necessary adjustments to regulations to accommodate growth of services

2025 - 2030

Evolve

Expansion of program functionality, services, and partnerships

- New value-added services layered into the program (from other providers such as financial services)
- Implement accessible sanitation to all slum dwellers
- Advise the Government and relevant private-sector stakeholders to evolve regulation to accommodate new services and consumer protection requirements
- Implement all country-designed infrastructure to improve regional sanitation access

PROGRAM EVALUATION KEY CRITERIAS

Sustainability

- Functioning of facilities
- Communication capabilities & Decision-making
- Training provision
- Cost sharing/willingness to pay

Effective Use

- Access
- Sanitation system usage

Replicability

- Services & Functionality expansion
- Service transferability

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