

Kasungu Self-supply Pilot Project

Although officially access to improved water in Malawi stands at an impressive 90% (JMP), non-functionality of water points is in excess of 40% (DFID). As a result, isolated and rural communities are poorly served and those with access to a communal well are frequently let down by poor functionality, forcing both groups to resort to unsafe sources.

Currently:

- 1.7 million Malawians have no access to improved water (JMP)
- Millions more at any given time cannot access improved water because of poor functionality.

Over the past 15 years Malawi has made significant progress in reducing water poverty and doubling the percentage of its population with access to safe water. Reliable communal water systems are still needed, but in the context of budget tightening and non-functionality they will not, on their own, reach those without any service and the current approach and choice of technology does not deliver acceptable levels of functionality.

Between 2014 and 2016 Pump Aid has been testing the suitability of self-supply in Kasungu. Self-supply places the emphasis on the individual to invest in their own water and sanitation and is an approach that is already operating very successfully in Zimbabwe and elsewhere.

Pump Aid tested this approach by inspiring 25 'WASH Entrepreneurs' to establish financially sustainable businesses, providing water and sanitation products and services who were simultaneously supported by Pump Aid with training and marketing to stimulate demand.

As a result of their activities over 20,000 people secured access to improved water and many more now wish to take advantage of this opportunity.

This approach has demonstrated its suitability to three particular client groups

Individual and groups of households wishing to purchase their own access
Users of community wells seeking to improve functionality and reliability
Small- scale farmers wanting to improve irrigation and resistance to climate shocks

This pilot has shown that people are willing to invest, that WASH entrepreneurs can deliver improved access to water via a business model and, most importantly, this approach can deliver a range of benefits:

- Improving livelihoods: Our 'Wash Entrepreneurs' have at least doubled their incomes generating business and stimulating local economies. They are creating financially sustainable businesses.
- **Responding to demand:** We have shown that **poor rural communities** both want better WASH services and have income to invest. We are treating people as customers rather than beneficiaries.
- Increasing functionality and sustainability: For households, ownership brings increased reliability.
 For water point committees improved maintenance brings increased functionality.
- Achieving access to water targets: Through the activities of our 25 entrepreneurs, over 20,000 people
 have improved access to water.
- **Encouraging Ownership:** Self-supply pumps and wells are owned and maintained by the investor, not the government, nor an NGO. This relieves budget pressure and releases resources for other areas.
- Fostering sharing: Households that share water resources with neighbours, multiply their impact.
- Enhancing convenience and health benefits: Shorter distances to water, frees up time for other purposes; more convenient access increases the use of water for hygienic purposes.
- **Delivering Value for Money**: Self supply projects are significantly more cost effective to implement than standard community well projects especially in remote and hard to reach areas.

PROJECT SUMMARY

1. What we did

We researched, tested and documented findings to provide an evidence base for the potential of self-supply in Malawi and its suitability for scaling up. It involved context analysis, the training of 25 'WASH entrepreneurs' in technical and business skills whilst providing marketing materials and supporting sales promotion. The pilot took a zero subsidy approach with the entrepreneurs, no start up kits and no soft loans. We worked closely with a very supportive District Council staff.

2. What we found

Overall, the training and support of 25 entrepreneurs and their active engagement in business has led to new access to improved water for at least 9,660 people and has secured access to improved water for a further 12,000 in three T/As in Kasungu.

WASH ENTREPRENEURS (after one year's engagement with the project):



- More than doubled their year on year sales after engagement with the programme.
- Stated customer demand from project surveys (existing and new customers) is significant and indicates major growth opportunities.
- Large investment is predominantly seasonal (linked to the harvest season), but maintenance is a year round requirement.
- Access to (affordable) credit is a crucial issue to grow financially sustainable businesses and at present it isn't available.

CUSTOMERS (HOUSEHOLDS)



- The average distance now travelled to an improved water source is 11 metres. Previously 65% would have travelled over 500m.
- 86% report an increase in their water use.
- 10% of purchases were made by groups of households, (providing 2,500 additional people access to improved water).
- 90% of purchases were by individual households. As a result of sharing, this equates to an additional 7160 individuals having much more convenient access to improved water.

CUSTOMERS (COMMUNITY MANAGED WATER POINTS)



- During the pilot Area Mechanics have secured/guaranteed ongoing access to improved water for 11,954 people whose primary water point is a community well and pump (mainly borehole).
- Area Mechanics generate new business through community level marketing, increasing business sustainability.
- There is demand within communities from individuals for their own water points and thus potential markets for AM's to connect with other entrepreneurs to provide digging, installation and repair services) and develop new profitable business streams.
- Given low functionality rates of boreholes historical difficulties with operations and maintenance this is a major opportunity to address systemic problems with CBM water points.
- Area Mechanics improved performance and increased capacity comes from training and crucially a business focus that encourages them to raise their profile within communities, link with other WASH services to provide a broader service base and encourage communities to establish VSLs to finance water point maintenance and repair. It is an approach that is both viable and sustainable.

3. Summary of conclusions

Kasungu District and Malawi in general provide many of the conditions for self-supply to take root and thrive: high levels of groundwater, a supply of artisans working at community level, a sizeable population without improved access to water and a generally supportive government.

We believe this pilot has demonstrated that self-supply has significant potential in four market areas, all of which are major development challenges in Malawi.

- Households that want a more convenient supply. Individual Supply.
- Groups of households that want a reliable supply. Group supply.
- Water Point Committees for Community Wells engaging the services of trained and skilled area mechanic. Community Maintenance and Functionality.
- Small scale farmers wanting access to water to improve productivity. Irrigation.

Each of these markets offers potential for small scale entrepreneurs, but they all require initial support to develop.

4. Recommendations for the scale up of self-supply in Malawi

This pilot has provided strong evidence that with the right balance of support, markets for water and sanitation products in rural Malawi can be developed. The benefits of a supported self-supply approach are well documented across numerous countries. Conducive conditions exist in Malawi and District government structures are crucial to ensure self-supply flourishes at local level.

- Initial and ongoing investment is required in order for self-supply to take root across Malawi. Donors must make financial commitments to exploit the opportunity self-supply offers.
- The Government of Malawi should urgently seek to establish an enabling environment.
 - By implementing a policy framework that explicitly promotes supported self-supply.
 - By actively promoting the role of the private sector, improving access to credit, training for WASH entrepreneurs and customer quality assurance measures such as minimum standards.
 - By recognising rope and washer pump technology as a form of improved water delivery for communities unsuited to more complex interventions.
 - By establishing a Working Group to act as a national level coordinating and promotion body and promoting self-supply within government, notably by the Ministry of Health.
- Self-Supply initiatives at local level need to:
 - Ensure a strong focus on business development and avoid market distortions where possible
 - Coordinate and liaise closely with District government structures. Ensure relevant District officers are fully engaged.
 - Ensure that support evolves as markets evolve.
- Practically, upscaling in Malawi will require numerous actors. Initially, geographic expansion from
 Kasungu will allow for a more organic growth, providing for increased customer demand through
 word of mouth (as this project found, a crucial marketing method). This is vital in a context
 whereby there are high levels of externally delivered water points and evolved expectations by
 local communities of the role of external agencies.
- A business focused approach is crucial to ensure financially sustainable WASH entrepreneurs and a scale up of self-supply in Malawi which isn't dependent on external funding.







NEXT STEPS

The speed of adoption is an escalating curve, which is likely to mirror the path of other services like mobile telephones and solar lights. As more people adopt them, more people see the benefits and more people want them for themselves and our entrepreneurs have already received expressions of interest from double the number of customers they have previously served. Demand is taking off and this creates an opportunity for Pump Aid, the Malawi Government and other agencies working in Malawi to seize the potential of self-supply and



bring the benefits of clean, safe water to the maximum number of people in the shortest possible time.

"The Water Ladder: Incremental steps from a small start to a great end"

Installing an improved pump and providing all weather protection for both pump and well

Installing a basic rope and washer pump

Lining an existing well

Digging a new well or deepening an existing one

Unprotected water source

What is self-supply?

Self-supply is defined as improvements to household or community water supplies that are fully financed by the owners themselves. Neither governments nor NGOs provide subsidies for capital investment or for operation and maintenance. The products and services for the water source improvements are usually provided on a commercial basis by local private enterprises.

Self-supply emphasises incremental improvements to water and sanitation facilities. They start by digging a well with a basic cover, then when funds are available, the well is lined to protect from collapse, then finally install a pump.

Gradually even poor rural communities can improve their access to improved water.

Across the globe many countries have positive experience of self-supply. In the USA over 10 million people are reliant on self-supply, in Ethiopia the government has recently enshrined self-supply into its Water Growth and Development Policy and in Zimbabwe over 2 million people are supported with access to improved water through self-supply.

What is Pump Aid?

Pump Aid is a small NGO which began operating in Malawi in 2004 and, over the past 12 years, it has installed over 4,000 community based Elephant pumps and brought improved access to water to half a million people. In recent years it has focussed more on the smaller communities of rural Malawi (those with populations of less than 150) and, has been investigating and evaluating how to improve the functionality of water points in remote areas, where access to piped water is limited and the performance of piston pumps and boreholes most weak. Its work has now reached a stage where we believe it can make a significant contribution to Malawi's Sustainable Development Targets.

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