



## **Incentives to serve the urban poor: South Africa's Case**

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URBAN WATER UTILITIES often fail to provide adequate water supply services to low-income urban communities for various reasons: a poor infrastructure, a difficult topography, utility perceptions that low income communities are financially unreliable and transient, and/or lack of the will. As a result, up to 31% and 57% of the urban population in Africa, and Asia, respectively are not served by piped water supply (WHO/UNICEF, 2000).

In order to improve service provision to the urban poor drastically, there must be institutional and technological innovations. Institutional innovations can occur at three levels: within the community; at the interface between the community and the utility; and in the national government policies and strategies. This is a case study on provision of water services to low-income communities of Durban, South Africa where a combination of technological innovation and incentives from the central government have greatly improved service coverage to the urban poor.

### **Water services to informal settlements in Durban, South Africa**

The Durban Metropolitan Council, the second largest city in South Africa, was estimated to have a population of 2.2 million people as of 1995. Durban Metro Water Service (DMWS) was formed by an Act of Parliament in 1996 to provide water supply, wastewater treatment/disposal, and solid waste management services to the areas under the jurisdiction of Durban Metropolitan Council. The mission statement for Durban Metro Water Services is, "to provide a constant supply of water and services related to the provision of water to the satisfaction of consumers in the Durban Metropolitan Area" (South Africa, Durban Metro Water Services, 1999). DMWS consists of three technical departments of water, wastewater management and solid waste management, as well as three service departments of finance, communications and human resources management. The directors of these departments report to the Executive Director, who in turn reports to the Town Clerk.

At the advent of 1990, Durban Metro experienced a rapid urbanisation, as a result of rural-urban migrations. The main causes of the migrations were political violence, severe drought and unemployment in the rural areas, but were catalysed by the social-political changes in the country. One of the first informal settlements in Durban Metropolitan Area was Cato Crest, a low-income area about 4 kilometres Northwest of the city centre, off the Western Free Way. The first inhabitants of Cato Crest forced their way into empty

land belonging to Central Government in the mid-1970s, fleeing political violence in the surrounding areas of kwaZulu-Natal. The migrants constructed simple temporary structures, known as shacks, or "Umjondolo" in the local Zulu language. With changes taking place in the political arena at the time, and as the number of squatters increased tremendously, officials of the then Durban Municipality Corporation could hardly evict the squatters. By 1991, there were about 370 shacks in Cato Crest with a population of about 1,600 people. Initially, the Council watched helplessly as the settlements grew in geographical and demographic sizes, devoid of any planned basic social services.

The first migrants to Cato Crest fetched water from the neighbouring coloured community or from a public toilet in the centre of the town, travelling distances of up to 1.5 kilometres. With increased pressures from civic organisations, the water utility extended community-managed standpipes. Because of the difficulty experienced in the day-to-day management of the water points, as well as cost recovery, most of the communal standpipes were disconnected due to non-payment. As a solution to this problem, DMWS went into partnership with local agents, locally known as water bailiffs, to manage water kiosks in the informal settlements. The community members were involved in the selection of the water bailiffs, who were required to pay security deposits to the utility. The unit price of the water was agreed upon between the operator and the utility, and was displayed at the kiosk. As the population in the informal settlements increased, people demanded a better service. Subsequently, the ground tank was designed to serve people residing in low-income communities, and to provide them with higher service levels than did the water kiosks. Water bailiffs supplied 200 litres of water daily to households who had paid for the water at one of the utility's office, one month in advance. Further details of service and technological aspects of the ground tank system can be found in a paper, "The Durban Water Tank System" (MacLeod, 1997) that was presented at the 23<sup>rd</sup> WEDC conference.

Owing to the availability of basic water services, the number of shacks in Cato Crest increased from 372 in 1993, to over 3000 by 1998. Informal settlements sprang up in other areas of Durban Metro as well: It is estimated that about 600,000 people lived in informal settlements in Durban Metropolitan Council areas by 1995. The ground tank system spread to other informal settlements in Durban Metro rapidly, such that by April 1999, there was about

4,000 functioning ground tanks within the city boundaries. However, the increase in operational costs, coupled with political pressure, prompted DMWS to revise the tariff in April 1999, in which a provision was made for all households to receive lifeline water requirements of (the first) six kiloliters free of charge. The burden of low-volume users was as consequently transferred to high volume consumers whose water rates were increased proportionally. This tariff provision effectively translated into free water to all ground tank users. It should be noted that absorption of such a high subsidy in the tariff structure of DMWS was feasible mainly because of the high industrial base in Durban Metro, as well as a wealthy middle class.

Another major point to note is that all these changes in the water sector were possible because of the enabling political climate in South Africa. The changes in the water sector took place not only in low-income urban areas, but also in rural areas as well. With political turnaround brought about by democratic elections in 1994, there was not only the will on the government's side, but also more pressure from various political and civic organisations for better service quality for the economically disadvantaged people of South Africa. Consequently, the popularly elected government faced the challenge of meeting pent-up demand for the basic services that was a dream to the majority population in earlier regimes. The new Government set about changing the policies to create a framework under which particular policies and initiatives could be executed in order to achieve the national goal of potable water delivery for all. The new measures are described in the proceeding section.

### **Incentive to serve the urban poor**

When the new government of national unity came into power in 1994, it formulated the Reconstruction and Development Program (RDP), which aimed at improving the quality of life of the majority of South Africans. Aware that water supply and sanitation is central in this endeavour, the Government set up a new Department of Water Affairs and Forestry (DWAF) in July 1994 to spear head the efforts of the reconstruction and development program. In November 1994, DWAF issued a white paper whose objective was to set out the policy for the new Department with specific regard to water supply and sanitation services. The white paper clearly spelt out that "The goal of the new Department of Water Affairs and Forestry is to end the inequity in access to basic water supply and sanitation services" (South Africa, Water Supply and Sanitation White Paper, 1994, p.3).

The government white paper on water and sanitation set a target of ensuring that all South Africans have access to basic water supply and sanitation within seven years from the date of publication. The white paper defined adequate basic sanitation provision as one well-constructed VIP per household. Basic water supply was defined in terms of the following service levels (South Africa, Water Supply and Sanitation White Paper, 1994, p.14 -15):

- Quantity: 25 litres per person per day;
- Cartage: The maximum distance that a person should have to cart water to their dwelling is 200 metres;
- Availability: The flow rate of water from the outlet should be at least 10 litres per minute, and water should be available on a regular, daily basis;
- Assurance of supply: The supply should provide water security for the community; i.e. in terms of raw water availability, and effective operation and maintenance of the system;
- Quality: Compliance to currently accepted minimum standards with respect to health related chemical and microbial contaminants; and should be acceptable to consumers in terms of its potability; and
- Upgradability: the desire of many communities to upgrade a basic service to provide for household connections should be taken into account during the planning phase.

The 1994 water services white paper also provided for training and capacity building of user communities in order to make water service provision sustainable. The training categories include:

- General community awareness on water and sanitation, including provision of information packs and teaching aids to schools;
- Training of local authorities and local water committees in basic understanding of water and public health, administrative skills and necessary technical skills;
- Training of community support personnel such as artisans, specialised water care technicians; and
- Training of professional and managerial staff.

The 1994 water services white paper summarised the financial policy concerning water service provision as follows:

*The basic policy of Government is that services should be self-financing at a local and regional level. The only exception to this is that, where poor communities are not able to afford basic services, Government may subsidise the cost of construction of basic minimum services but not the operating, maintenance or replacement costs.* (South Africa, Water Supply and Sanitation White Paper, 1994, p.18)

For urban water services, the 1994 white paper stated that the service provider should ensure that all households within the service area are provided with at least basic services within a reasonable time frame. The urban service provider has the responsibility of facilitating the provision of higher service levels through appropriate financing and tariff mechanisms, whilst ensuring the financial viability of the water and sanitation sector. The Government further pledged to fund the capital costs of service extension to

marginal areas of the country with limited potential for sustainable economic development.

The Water Services Act (Act 108 of 1997) provides a legal framework for implementation of the 1994 water services white paper. In that Act, every citizen's right of access to basic water supply and basic sanitation was reiterated, and every water services institution was expected to take reasonable measures to realise these rights. Section 4, subsection (3), part (c) of the Act gives the following conditions about disconnection of services:

*Procedures for the limitation or discontinuation of water services must - ... (c) not result in a person being denied access to basic water services for non-payment, where that person proves, to the satisfaction of the relevant water services authority, that he or she is unable to pay for basic services.* (South Africa, Water Services Act, 1997, p.10).

The Water Services Act further stipulates that in setting water services tariffs, the responsible Minister may differentiate on an equitable basis between different users, different types of water services, and different geographical areas. Furthermore, in prescribing the norms and standards for tariffs, the Minister must consider, among other factors, social equity, as well as the recovery of costs reasonably associated with providing the water services.

In line with the 1994 Water Services White Paper and the 1997 Water Services Act, the Government of South Africa provides grants to urban water utilities to extend services to peri-urban areas and informal settlements in the cities. The funds are meant to fulfil targets set under the Reconstruction and Development Programme. Initially, Durban Metro Water Services used these funds to set up public standpipes/kiosks in informal settlements. However, standpipes and water kiosks were found to have inherent shortcomings, resulting into some members of the communities demanding for better services. On a demand-driven approach, and with full participation of the communities, the management of DMWS came up with an alternative service option, i.e. the ground tank, for providing services to informal settlements at an affordable price, but with considerably higher service benefits to the consumers. Some of the grants received from the Government are used to subsidise the capital cost requirements for the ground tank system. Subsequently, although the total cost of the ground tank, piping accessories and installation labour is about SA R800 (US\$160), consumers paid SA R175 (US\$35) as of September 1997, for all the connection materials.

## Conclusions

The task of providing services to the urban poor is enormous. According to the 1994 South African Government White Paper on water and sanitation services, 56.7% of the black population in South Africa, totalling to about 17.3 million people did not have adequate water supply service levels by 1994. The situation for sanitation services was worse, with an estimated 21 million people without access to adequate sanitation facilities (South Africa, Department of Water Affairs and Forestry, 1996). Under the Recon-

struction and Development Programme (RDP), the popularly elected government set a target of providing at least basic service levels to all the people of South Africa within seven years. Most recent statistics reported in the Global Water Supply and Sanitation Assessment Report show South Africa has scored success in this endeavour: 92% of the urban population and 80% of the rural population are reported to be adequately served in terms of water supply (WHO/UNICEF, 2000). Similarly, adequate sanitation coverage is 99% in the urban centres and 73% in the rural areas.

Given the baseline service coverage in 1994, South Africa has made the highest gains in Africa in water and sanitation coverage. It is also true that when the popularly elected Government of South Africa came to power in 1994, it started one of the most vigorous water and sanitation programmes on the continent. Government white papers with clearly set out policies, guidelines and targets were quickly drafted and debated upon. An adequate legislative framework was put in place to ensure the policies are implemented. Funds under the Reconstruction and Development Programme were availed to water utilities. Clearly, the post-apartheid South African Government is committed to providing incentives to the water utilities, both legislative and material, for extending services to the urban poor. What is not clear, though, is why DMWS had to go all the way to abolish the water charges altogether. It is the contention of the authors that such a strategy:

- Does not send the right signals to the users, and it negates the principle that water is an economic good;
- Is not sustainable, as service quality will invariably fall in the low-income settlements; and
- Is in conflict with the Government White Paper, which has provisions for subsidising the cost of construction of basic minimum services for poor communities, but not for operation and maintenance, or replacement costs.

Implementation excesses notwithstanding, this case study supports a hypothesis that is becoming increasingly popular among scholars and researchers that incentives given to utilities can improve service levels for the urban poor. The incentives should, however, be properly designed such that they do not conflict with financial, economic and environmental sustainability.

## References

- MACLEOD, N A, (1997), The Durban Water Tank, in Pickford, J. et al, *Water and Sanitation for All: Partnerships and Innovations*, Proceedings of the 23<sup>rd</sup> WEDC Conference, Durban, South Africa.
- SOUTH AFRICA, Water Supply and Sanitation White Paper, 1994 [online], Available at <http://www-dwaf.pwv.gov.za/idwaf/Documents/> [Accessed December 26, 2000]

SOUTH AFRICA, Durban Metro Water Services, 1999, *Water Services Development Plan*, unpublished corporate report.

SOUTH AFRICA, *Water Services Act, Act 108 of 1997*, [online], Available at <http://www-dwaf.pwv.gov.za/idwaf/Documents/> [Accessed December 26, 2000]

SOUTH AFRICA, Department of Water Affairs and Forestry, 1996, *National Sanitation Policy*.

WHO/UNICEF Joint Monitoring Programme for Water Supply and Sanitation, 2000, *Global Water Supply and Sanitation Assessment 2000 Report*, WHO/UNICEF.

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