### Recognising the needs of the poor in small town WASH

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#### Introduction

UN Sustainable Development Goal 6 has specific targets and indicators for global access to water, sanitation and hygiene (WASH). Water and sanitation access are typically included in multidimensional poverty indicators and are inherently linked with human development. When water access is poor, women and girls often bear the brunt of the burden since they are usually responsible for managing household water.

#### Methods and Materials

The multidisciplinary methodology employed in this research uses mixed methods to characterise experiences of the urban poor, with a focus in WASH. These include:

 Development of wealth and WASH indices using household socio-economic indicators based on HDSS (Health and Demographic Surveillance System, Mekelle University) survey data from 9,710 (rural and urban) households (2016),



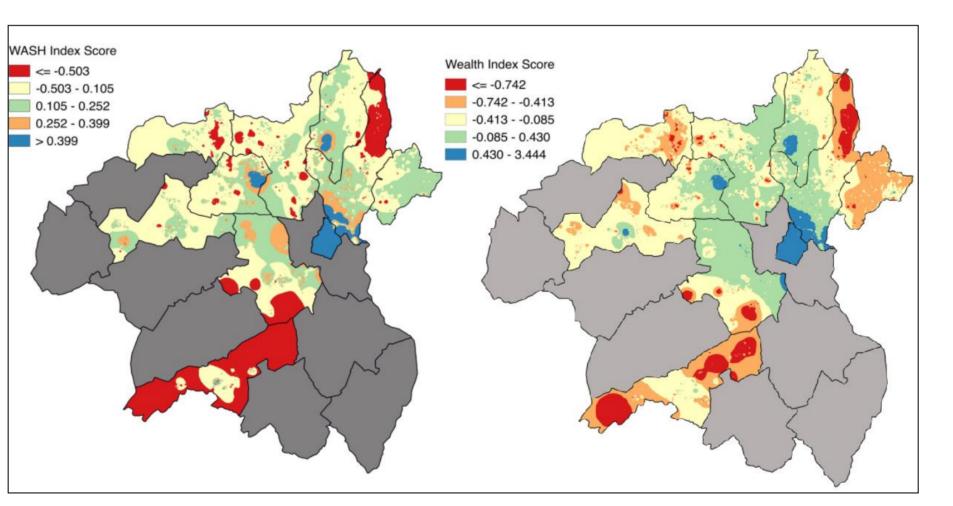
Many approaches to the measurement of poverty centre on definitions that are appropriate for rural users – such as in WASH – distance to basic water and sanitation facilities. However, urban and rural experiences of poverty differ and these methods of measurement may not adequately reflect urban poverty, where services are present but unaffordable and unsuited to high density areas. Therefore, characterising the urban poor needs to be context specific and take into account the fact that traditional indicators may not sufficiently allow for capturing the challenges that the poor face in urban areas.

Water insecurity in Wukro town, northern Ethiopia, is characterised by urbanisation, climate variability and poverty, as is the case in many small towns across sub-Saharan Africa. Wukro is a town of 42,000 people and is in a state of transitioning from a rather small, insignificant urban centre into an important conference town due to it's strategic location, 50km from the Tigray regional capital, Mekelle. Insufficient water supply is being addressed with a new system installed by UNICEF as part of the ONEWASH Plus Programme in close collaboration with Wukro water utility. Therefore, Wukro presents an interesting case for studying the change as this new water supply system comes into operation in 2018.

- Econometric, regression and descriptive analysis of urban household survey data (n=4,027, 2016 and n=2,300, 2017) for a quantitative characterisation of the urban poor,
- Life history interviews conducted in 2018 that contribute a qualitative understanding of multidimensional poverty to the quantitative analysis.

#### Results

1) There are spatial relationships between household wealth and WASH access as can be seen in Fig. 2.



Picture 3: View of Wukro

#### Conclusions

The spatial variation of urban wealth inequality is not adequately captured in traditional measures of poverty used to compare between rural and urban areas. A multidimensional poverty assessment using traditional metrics indicated that the wealthier were more concentrated in urban areas. However, we question whether these metrics are appropriate for urban spaces in the current form.

## WASH indicators are not representative of the situation on the ground in Wukro. Even though 94% of urban households have their own taps, the

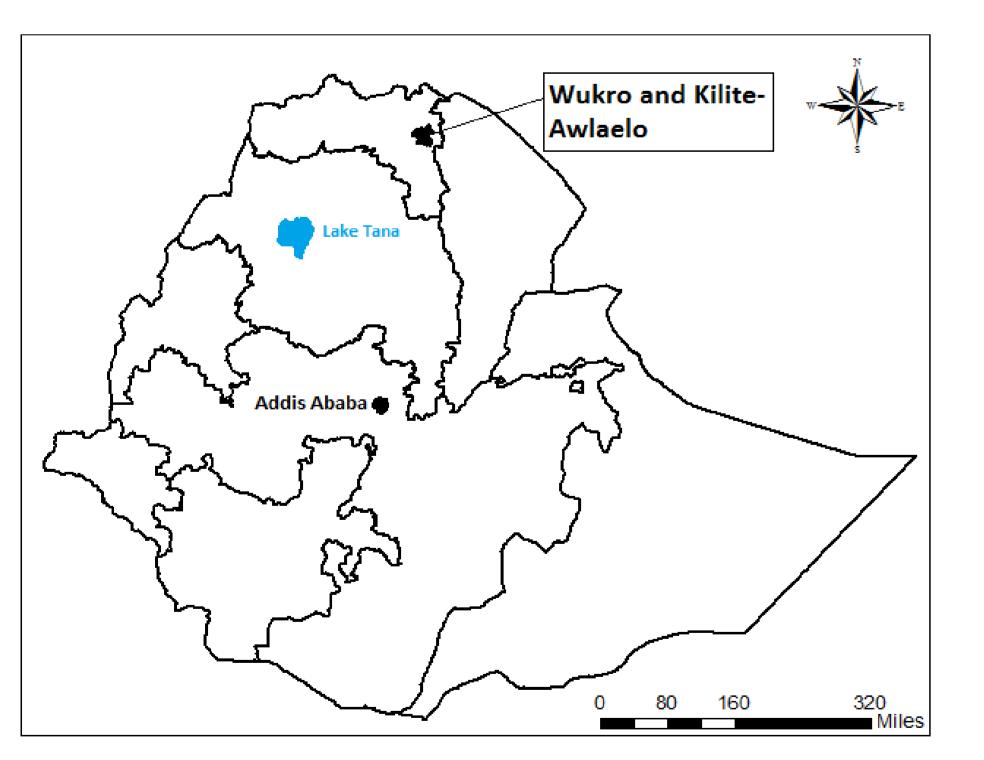
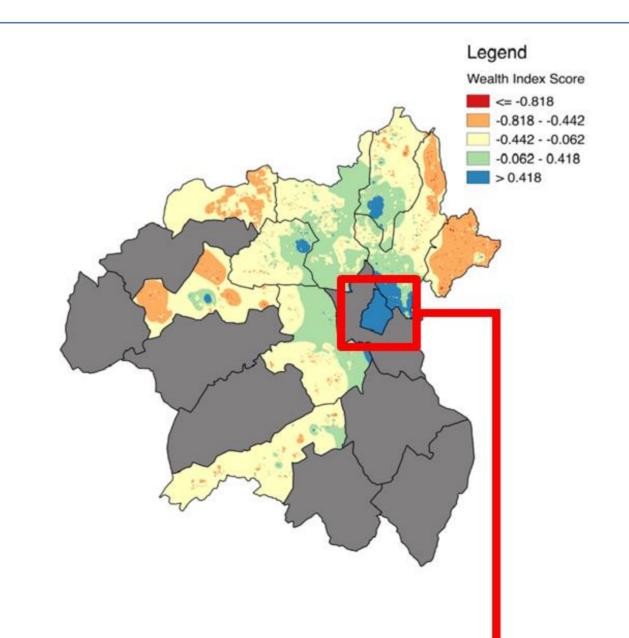


Fig. 1. Location of study site in Ethiopia

**Fig. 2.** HH wealth and WASH access in Wukro and Kilite-Awlaelo *Higher numbers = higher levels of wealth/WASH access* 

2) Comparing urban and rural poverty with traditional wealth indicators is not sufficient for understanding urban poverty.
Fig. 3 shows how urban wealth inequalities are revealed by isolating urban areas for analysis.



availability of water has been severely restricted, with a shifting water supply system delivering water to the town for only a few hours per week. 54% of urban households (n=1462) reported water supply services as the most important concern for which they would request support from the government.

#### The lack of water is exacerbating poverty in

**Wukro.** It results in increased time and money spent collecting water despite primary water access points being close. Small businesses, usually run by women, and poor, often femaleheaded households, struggle more than larger businesses and wealthier households to access water.

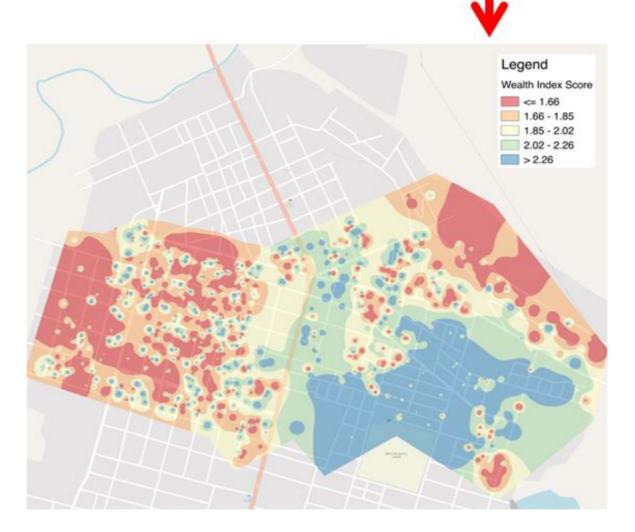
However, this is changing with the development of a new urban water supply system. Residents already report improvements in their access to water in Wukro, just two weeks after the new water supply system has come online.





**Picture 1.** Household water connection, Wukro

**Picture 2.** Research team in yard, Wukro



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Fig. 3. Urban wealth inequalities in Wukro Improving water security for the poor Overall, our research finds that more nuanced approaches to water access need to be integrated into WASH indicators – like multidimensional poverty indicators – in order to understand the true extent of inequality of water access in small towns. The findings of this research are particularly relevant for decision makers seeking to ensure that the benefits from investments in WASH services are fairly distributed and reach the poorest households.

