

## 2 with 8

Safe water for 2 billion people with \$8 billion  
so \$4 / person by scaling HWTS

Henk Holtslag  
E- club of WASH D9999  
[henkholtslag49@gmail.com](mailto:henkholtslag49@gmail.com)



# 2 billion people. Water source with feces (WHO.2022)

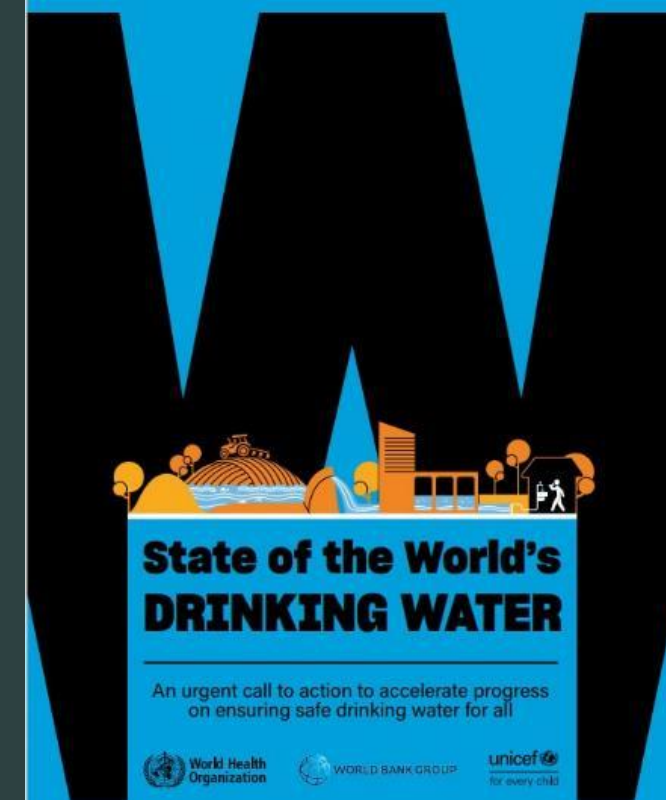
## Urban;

- High maintenance cost, Power cuts,.. How many utilities safe water 24-7? Elephant in the room

## Rural;

- Open wells
- Latrines near wells
- Recontamination in transport, home

**50% safe at point of tap = unsafe point of use!**



# Proposition

The most cost-effective and short term option to reach the goal

“Safe drinking water for all” is HWTS.



# Options for schools, Health clinics etc.

## Membrane filters



**Safe water for 2 bln. people, with new minigrids,  
water kiosk, etc. cost at least \$50bln.**

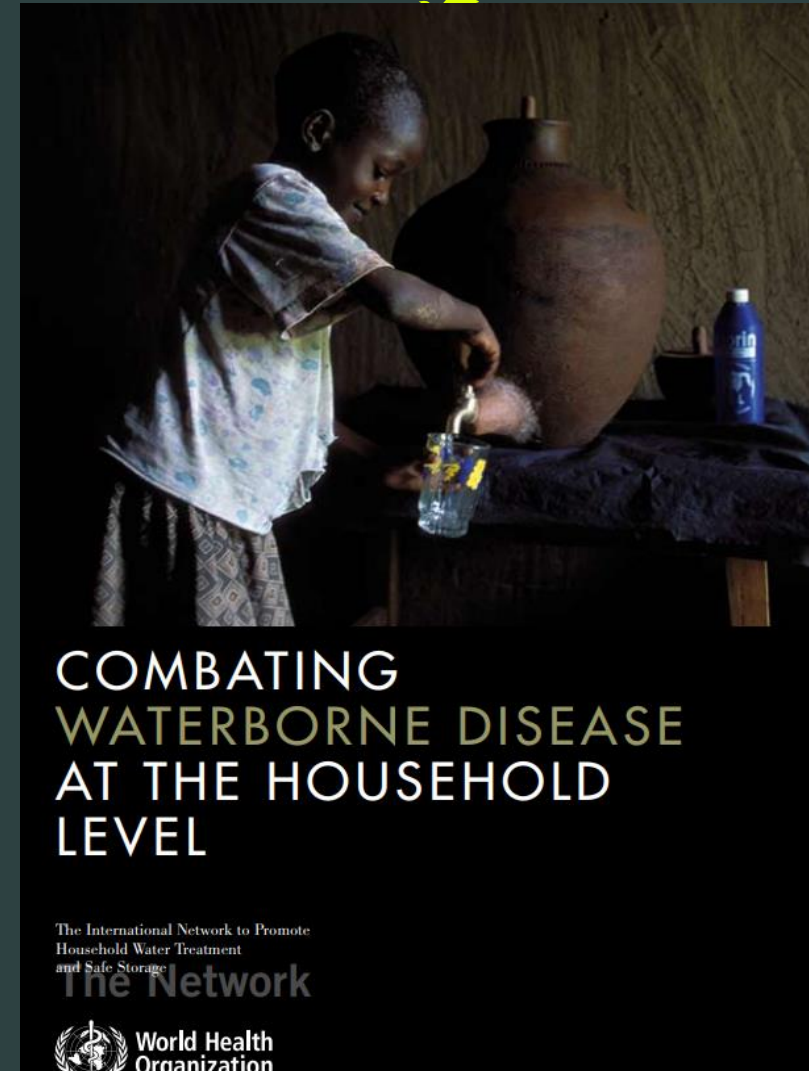
An intermediate solution for quality =

**Household Water Treatment & Safe storage**

Cost \$4/cap.                      So for 2 bln. = **\$8bln.**

HWTS reduces diseases with >50% if used with the  
3 Cs, Correct, Consistent, Continuous use

\$60 benefit for each \$1 invested (WHO. 2007)



**COMBATING  
WATERBORNE DISEASE  
AT THE HOUSEHOLD  
LEVEL**

The International Network to Promote  
Household Water Treatment  
and Safe Storage

**The Network**



**World Health  
Organization**

# Why did HWTS not scale?

Focus on wells + Failures HWTS

**SODIS.** Poor mans solution

**Chlorine.** People don't like the taste. Not used consistently

**Filters.** Kenya; 900.000 membrane filters

- Free gift
- Complicated maintenance,
- No supply chain,...



# Filters effective & market-based. Multi million business!!

?50 mln. Inline

19 mln. Stefani

10 mln. Pureit, Nazava, Tulip

4 mln. Pot, Biosand (NGOs)

Easy to sell to the rich.

Why so hard to sell to the poor?

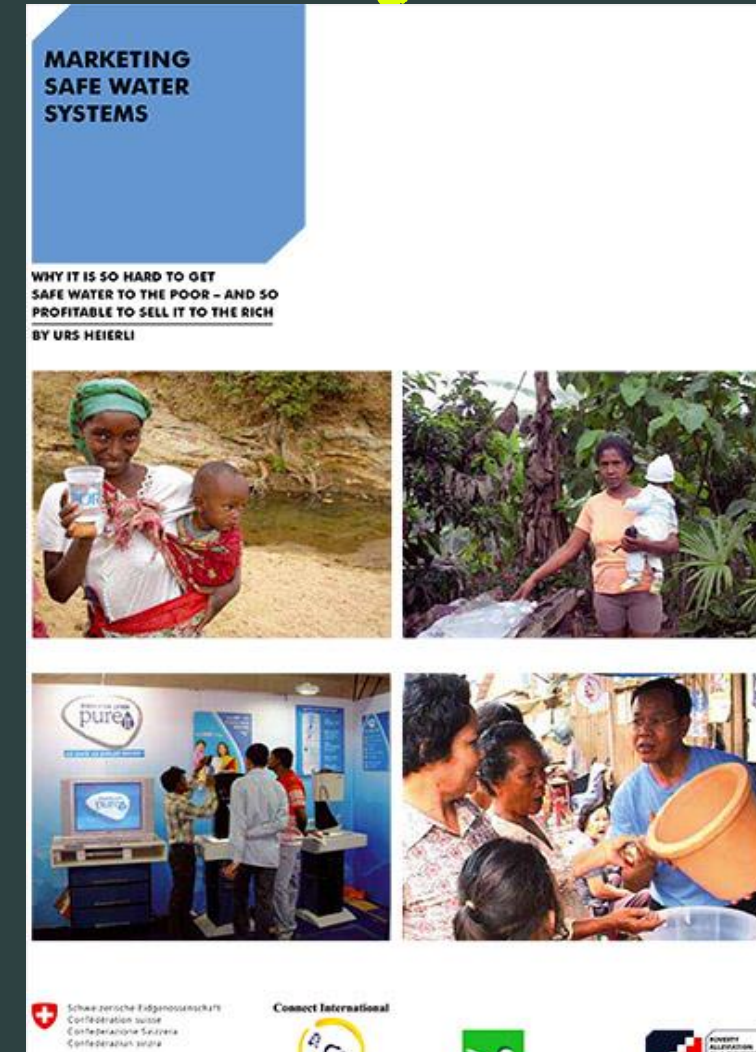


# Why is it so hard to sell to the poor? Lack of A.S.S.

- Awareness
- Supply chain
- Subsidies

And the P of people

For 5 marketing Ps see;  
“Marketing safe water systems” U. Heierli



# Reach 2 bln. with HWTS? Invest in A.S.S.

## 1. Awareness

Clear water can be unsafe, the cost benefit, etc.

large scale, long term on radio, Tv, social media, schools, etc.

Get HWTS in WSPs. Role for Governments, NGO's

## 2. Supply chain + payment options

Build commercial supply chain. Shops sell chlorine + filters

Group credit, Pay as you go,.....

## 3. Subsidy for the poorest

1 bln. really poor. Will not spend a month income on a filter

They need subsidies



# Subsidies distort markets?

**Not if targeted, for example use vouchers**

Example. With \$20 voucher, families pay \$2 and get a \$22 filter

Want a \$32 filter? pay \$12.

Experience with bednets, not perfect but we learned

Vouchers build commercial supply chains,  
essential for spares, for people who can pay



# How to invest grants for HWTs?

- 30%; Awareness campaigns
- 10%; Supply chains, payment systems
- 60%; Subsidise poorest, use vouchers.

## Who pays?

- Those wanting SDG6.1
- Carbon credits



# Example Ethiopia

- **HWTS = Government policy**  
Part of self-supply program
- **100 Utilities sell water filters.**  
Additional service.  
Families pay via water bill
- **Local production**  
Filter models \$22 - \$40  
500.000 sold, > 50% to families  
Initiated by Aqua 4 All



# Suggestions

1. Get HWTS in WSPs. of all countries
2. Stop giving filters!, give vouchers
3. Copy model Ethiopia to other countries
4. Offer market-based products!, LET users choose

*Soluciones a tu alcance*  
para beber agua limpia...  
agua riquísima!!!



**TULIP** BlyN



C\$ 1,950

C\$ 875  
Cada año

**AGUA NICA**



C\$ 2,820

C\$ 980  
Cada año

**FILTRON**



C\$ 2,940

C\$ 2,235  
Cada 2 años

Centro de Tecnologías  
**SMART**

8221.6188 / 8853.7481  
info@centrosmartnica.com  
www.centrosmartnica.com  
Km 31.2 Carretera Panamericana Norte,  
Ciudad de Managua, Nicaragua

Síguenos en:  
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# QUESTIONS

