

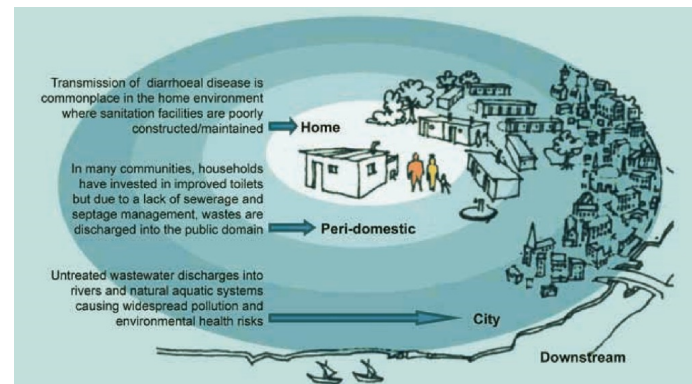
Introduction to City Wide Sanitation Planning

DATE: 22.11.2015

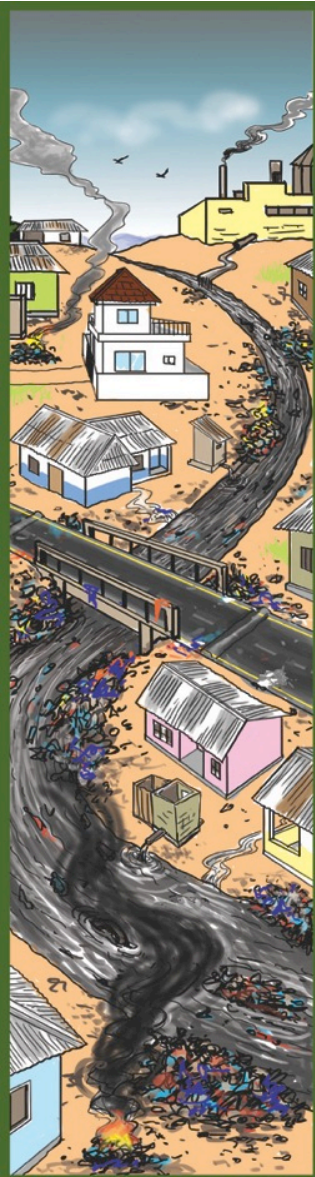


WHY IS SANITATION IMPORTANT?

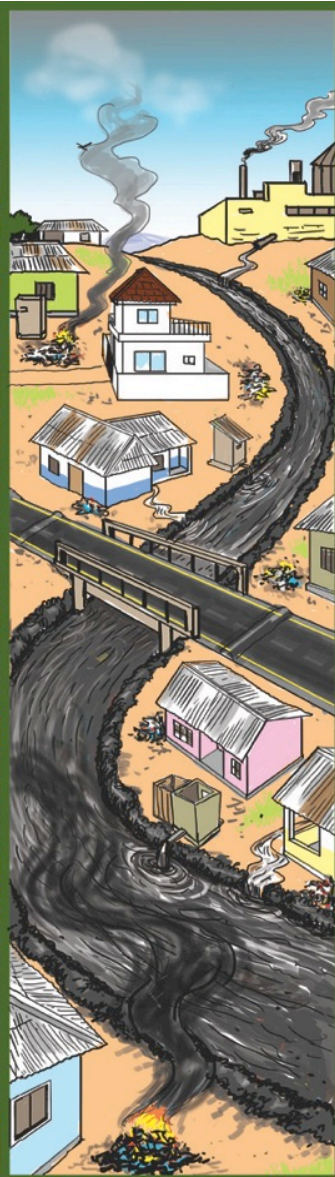
- To reduce disease transmission „in and around the home“
- Sanitation systems with integrated treatment promote:
 - Environmental health
 - Resource recycling (*reuse of water → nutrient & energy recovery*)
- Improved services and infrastructure enhance attractiveness of city for investment
 - *Economic return on 1 US\$ invested
→ in 5 US\$ benefit (WHO 2012)*



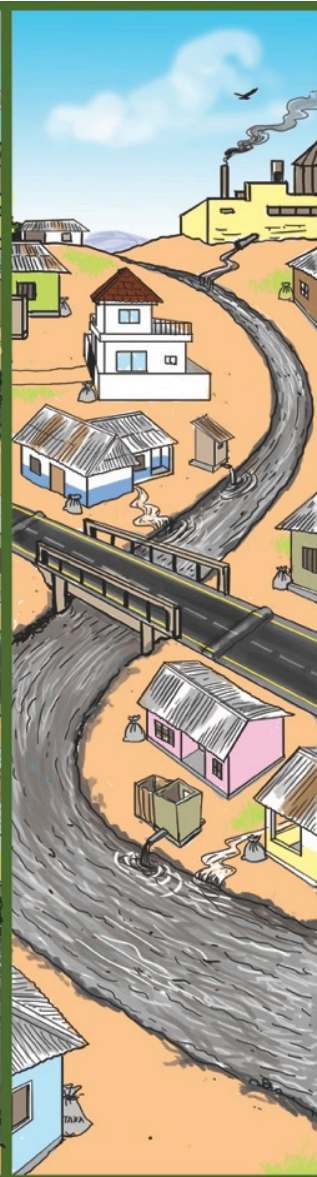
Source: Parkinson, J., Lüthi, C., Walther D. (2014)



UNSANITARY
ENVIRONMENT



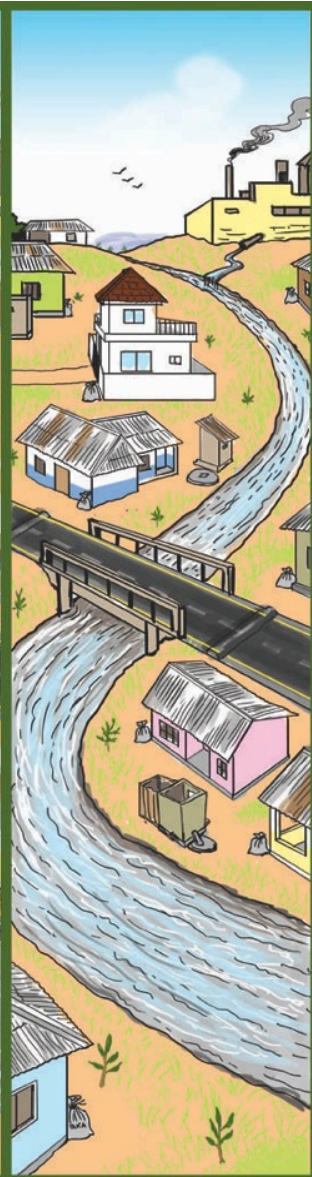
Solid waste removed
from rivers



No more dumping or
burning of solid waste.
Waste contained in bags
for collection



No more discharging of
domestic wastewater into the
river.

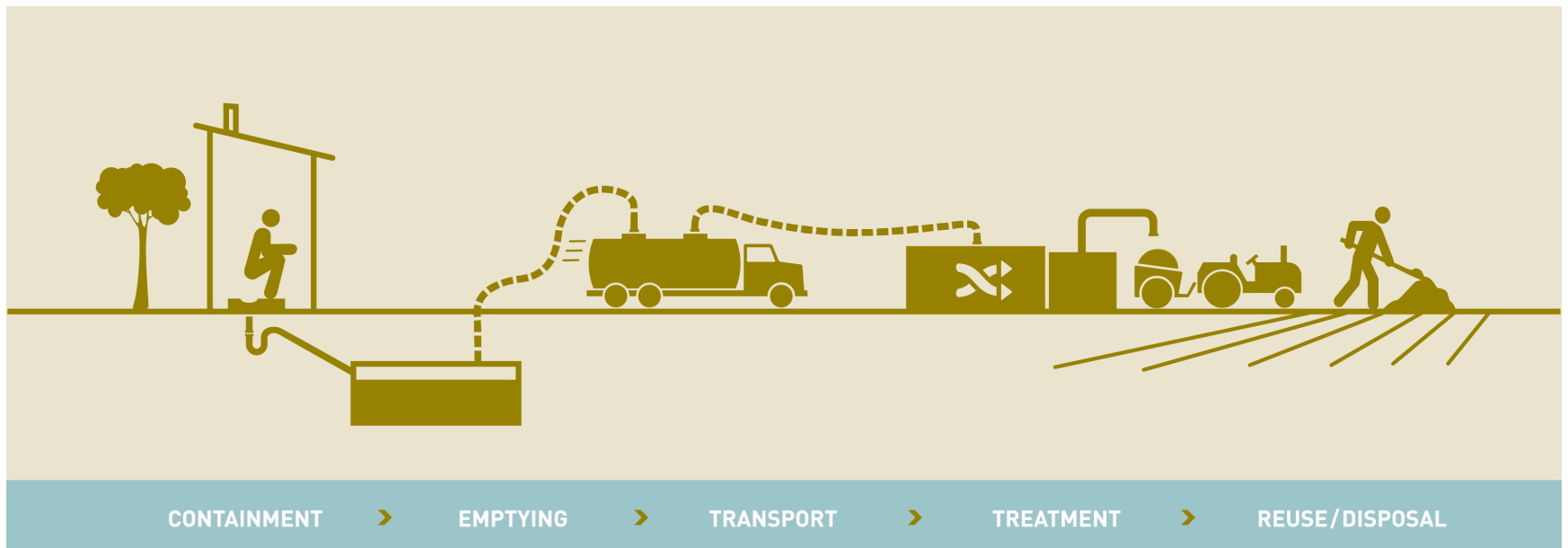


Toilets connected to on- and
off-site sanitation solutions.
Trees and grass can begin
to grow.

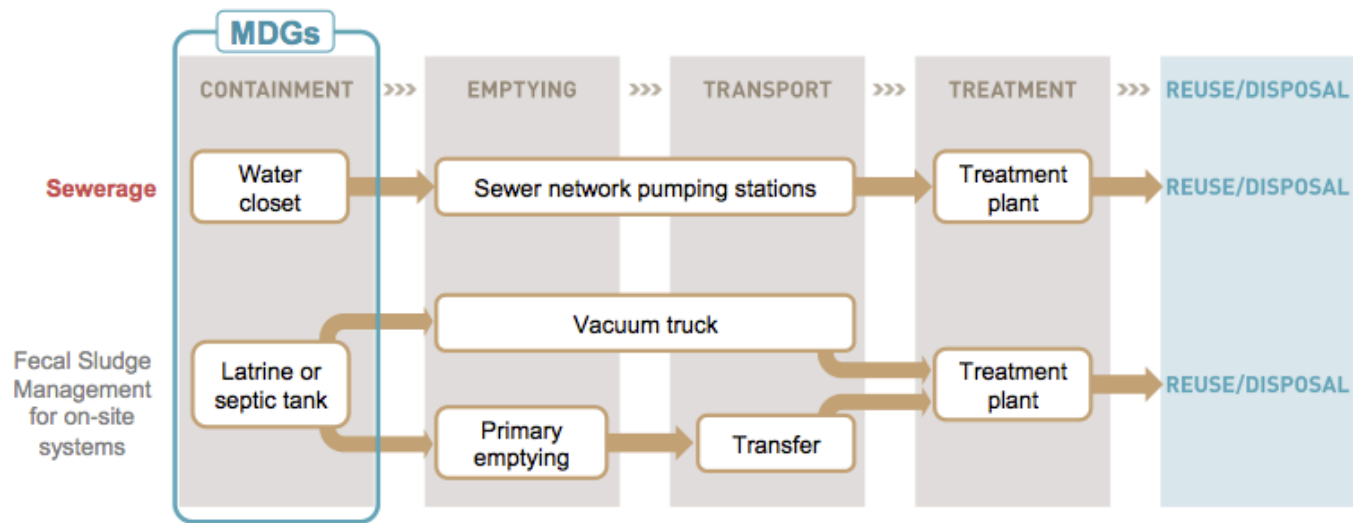


SANITARY ENVIRONMENT:
Industrial wastewater is
treated before being
discharged into the river.
Trees and grass can
flourish.

SANITATION VALUE CHAIN

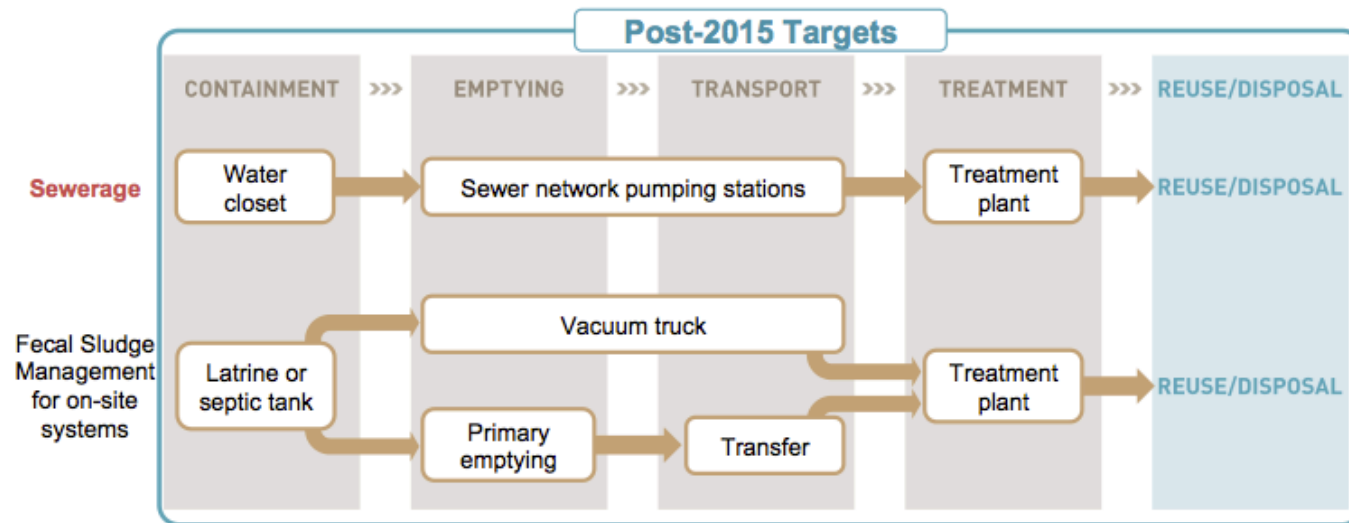


MILLENIUM DEVELOPMENT GOALS



Source: © Bill & Melinda Gates Foundation

SUSTAINABLE DEVELOPMENT GOALS



Source: © Bill & Melinda Gates Foundation

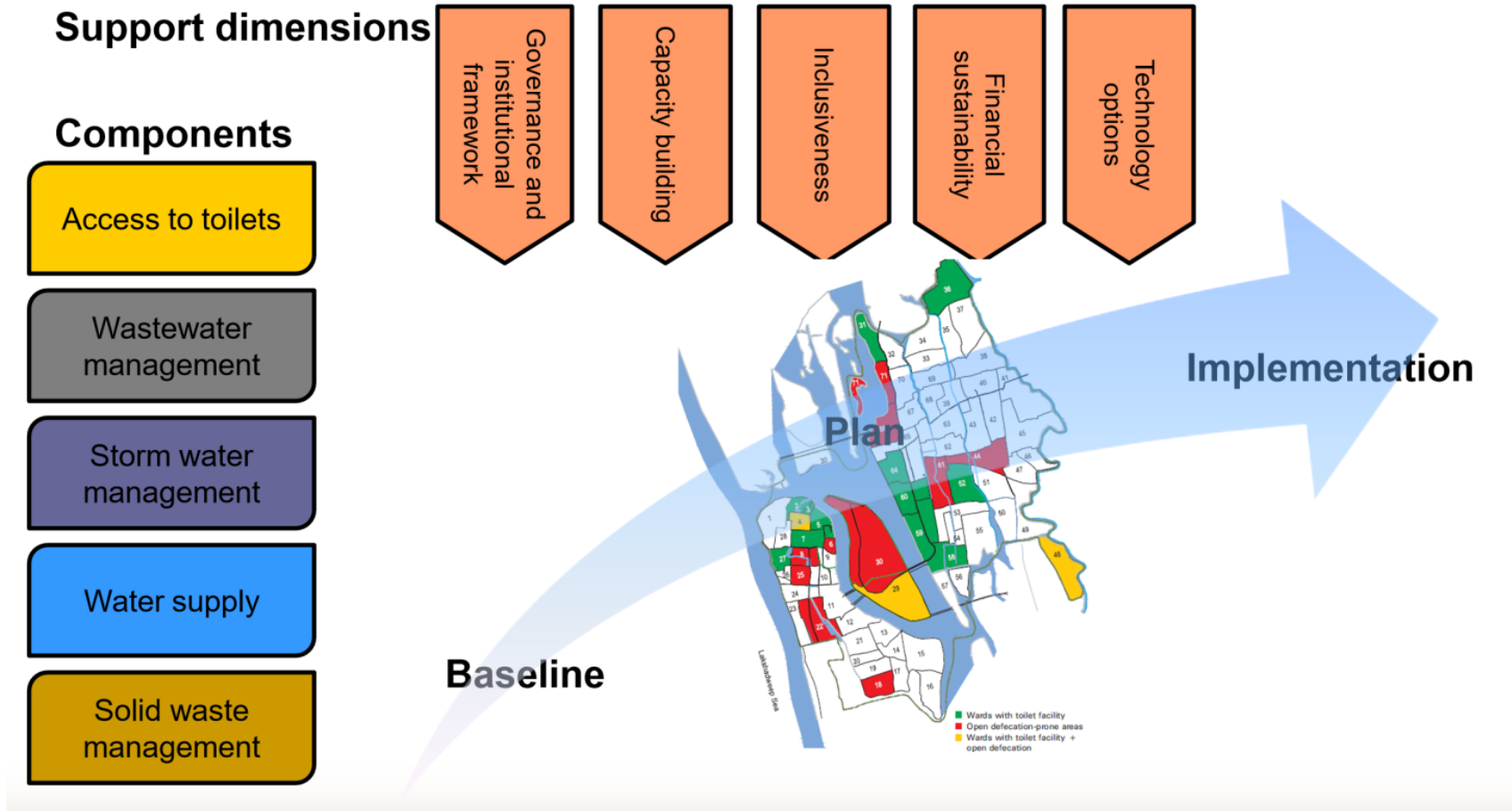
CONVENTIONAL RESPONSES TO URBAN SANITATION PROBLEMS

- In larger cities, utilities to provide sanitation services
 - Focus on sewerage only
 - Limited number of people reached
- Majority of urban dwellers rely on non-sewered sanitation systems
- Conventional Master Planning approach:
 - Focus on sewerage system extension
 - Rehabilitation of existing systems
- Many issues excluded in planning:
 - Poverty, land ownership etc.



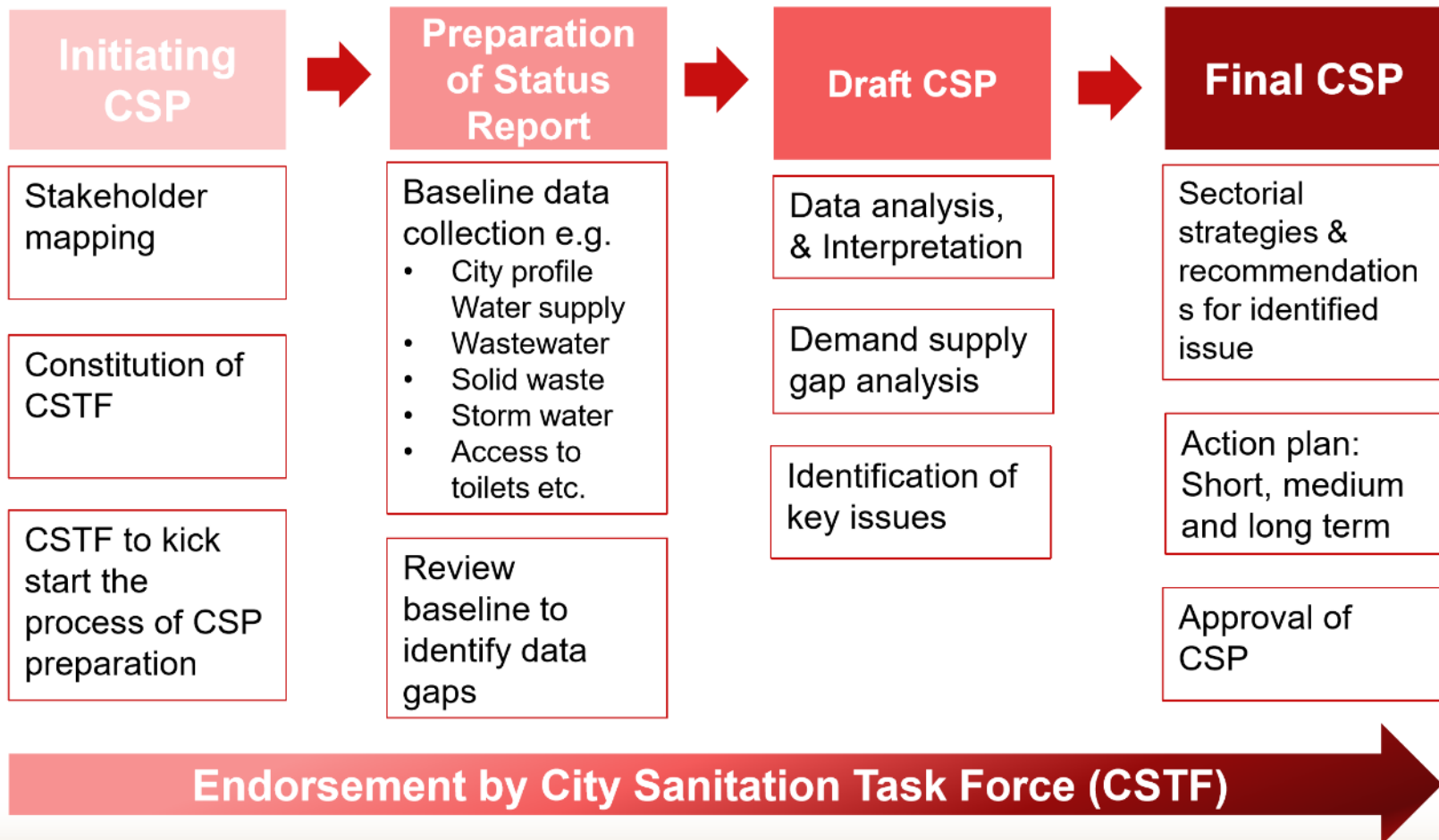
Source: Parkinson, J., Lüthi, C., Walther D. (2014)

CITY SANITATION PLANNING AS A FRAMEWORK TO FORMULATE SOLUTIONS



Source: Walther D. (GIZ, 2015)

THE CITY SANITATION PLAN PROCESS



Source: Walther D. (GIZ, 2015)

CHALLENGES & CONSTRAINTS FACED IN CSP IMPLEMENTATION

- **Infrastructure projects and short term measures initiated and completed**
 - PPP projects, revision of water tariffs
- **Delays in “strategic dimensions”**
 - Institutional / governance reforms
 - Capacity enhancement
 - Long-term financial sustainability
 - Service delivery chains
 - Awareness building for community participation
- **Project vs. Program implementation**
 - e.g. extension of slum sanitation mapping exercise not achieved by municipality

Source: CSP Review Report, Nashik (GIZ, 2014)

THE WAY FORWARD TO IMPLEMENTING CITY SANITATION PLANS

- **Stronger institutional ownership**
 - Administrative parameters to be considered

 - **Strong focus on service delivery and financial sustainability**
 - Early stage mapping and involvement of private sector and civil society
 - CSP to be linked to other infrastructure development plans

 - **Focus on strategic dimensions & softer implementation aspects**
 - Communication and stakeholder participation
- ➡ **Inclusive and universal sanitation service delivery**

Source: CSP Review Report, Nashik (GIZ, 2014)

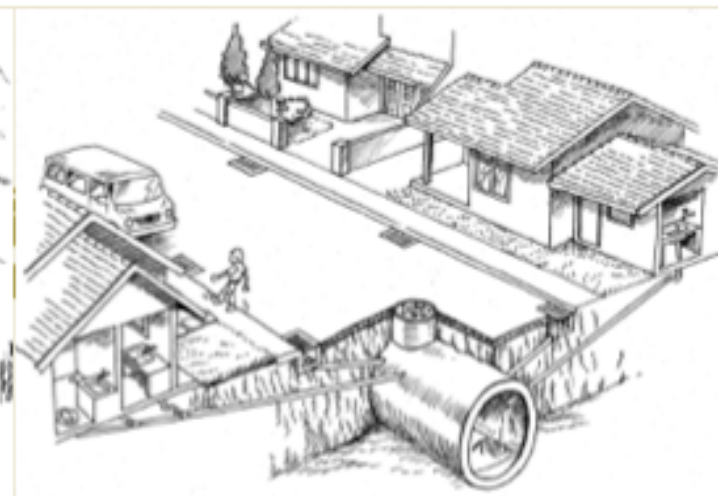
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CONTAINMENT



EMPTYING



TRANSPORT



TREATMENT



REUSE/DISPOSAL

GUIDING QUESTION

- **How could we achieve strong ownership at utility/municipal level?**
- **How could we finance total sanitation and water supply services sustainably?**
- **Further ideas?**