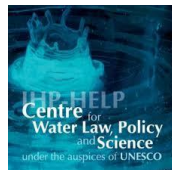




# The Role of Regulatory Frameworks in Ensuring The Sustainability of Community-Based Water And Sanitation

# INNOVATION IN INFRASTRUCTURE THROUGH APPLIED RESEARCH

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Universitas Ibn Khaldun Bogor
- UNESCO Centre for Water Law, Policy and Science,  
University of Dundee, UK
- National Planning Agency  
(Bappenas)
- Jejaring AMPL



Australian Government

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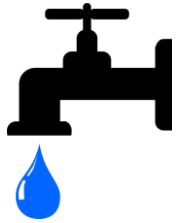
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# Problématique

# 2019 Target: 100-0-100



= 100

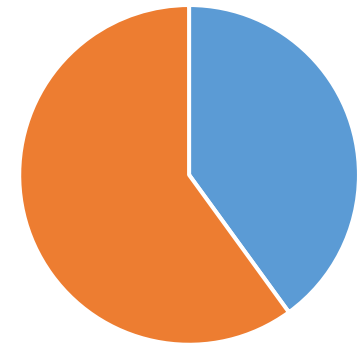


= 0



= 100

Water Supply



■ Institution ■ Community

**Community Based Water Supply** are expected to contribute **60%** (FGD Result). The expected contribution from community sanitation could be higher.

# However...., there are some problems

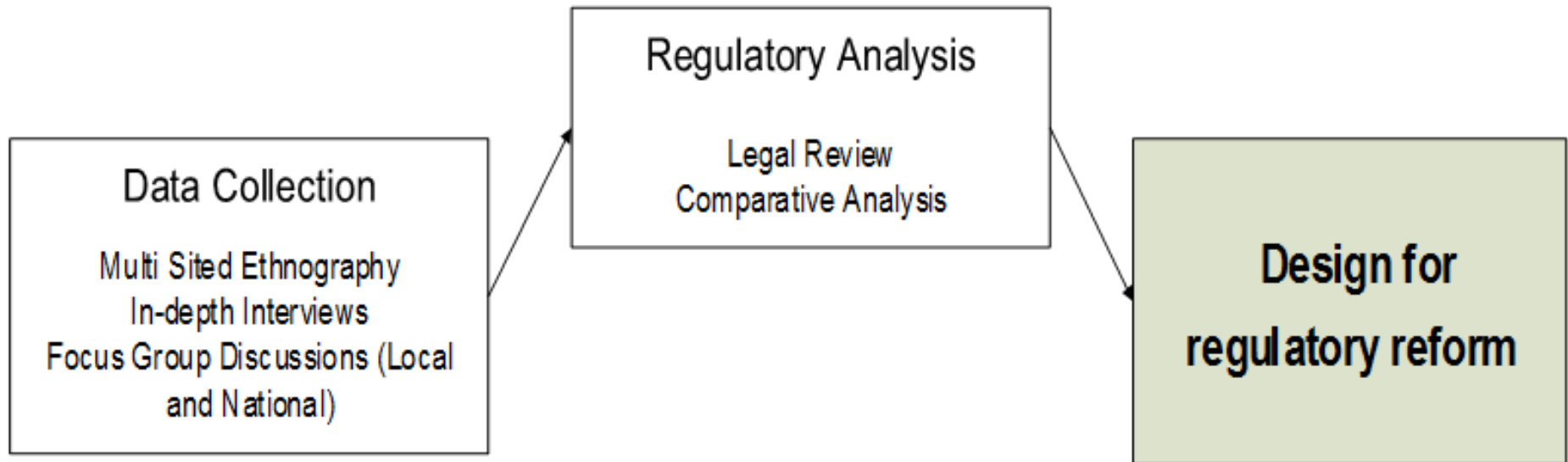
1. The delineation between “community” and “institution” in government policy papers are not clear
2. There is no clear definition on what is meant by “community”
3. Policy makers are not clear whether community based system is a “temporary” or long-term solution
4. National regulatory framework is “discriminatory” towards community based watsan
5. Community watsan’s assets are not legally secured
6. There are overlaps and potential conflict between community watsan service and PDAMs
7. Most community watsan’s initiative have no legally secured access to water source

Aside from the above, regions have started to enact and enforce regional by-laws Drinking Water and Environmental Health (Peraturan Daerah AMPL) – often with substandard legal drafting quality.

# Research Question

*How can Regulatory Frameworks Ensure the Sustainability of Community Based Water and Sanitation?*

# Methodology 1





# Methodology 2

## **Focus Group Discussions:**

### National FGDs

- Scoping and Problem-Verification: Hotel Alila, Jakarta, October 11, 2013
- Project Recommendation and Comments: Hotel Akmani, Jakarta, March 26, 2015

### Local FGDs

- Ende, October 11, 2013
- Lamongan, January 26, 2015

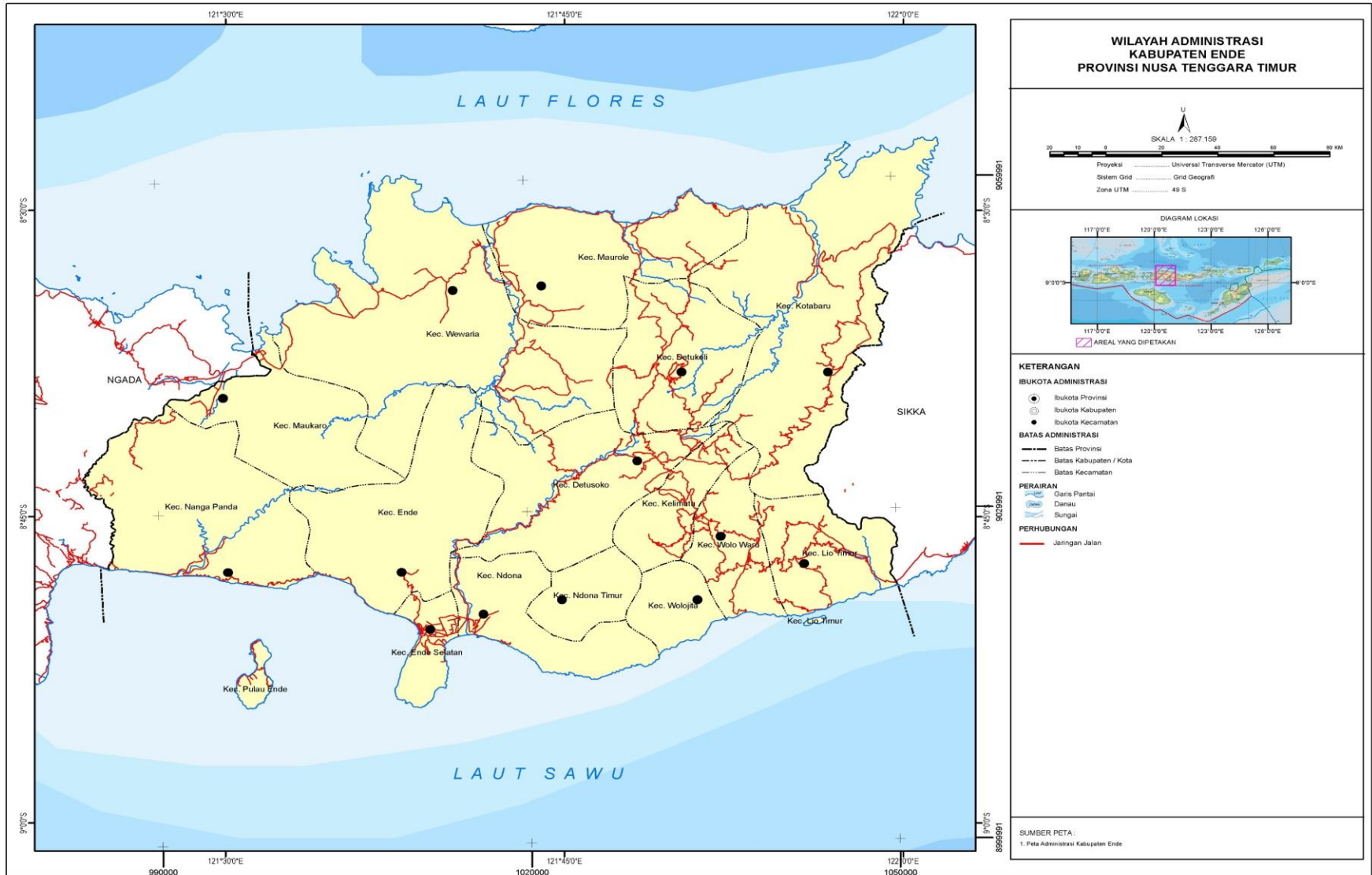
## **Interviews:**

National Level (Bappenas/Pokja/NGOs), Provincial Level (Bappeda Prov),  
Regency Level (Bappeda Kabupaten), Village Level, CBO Level

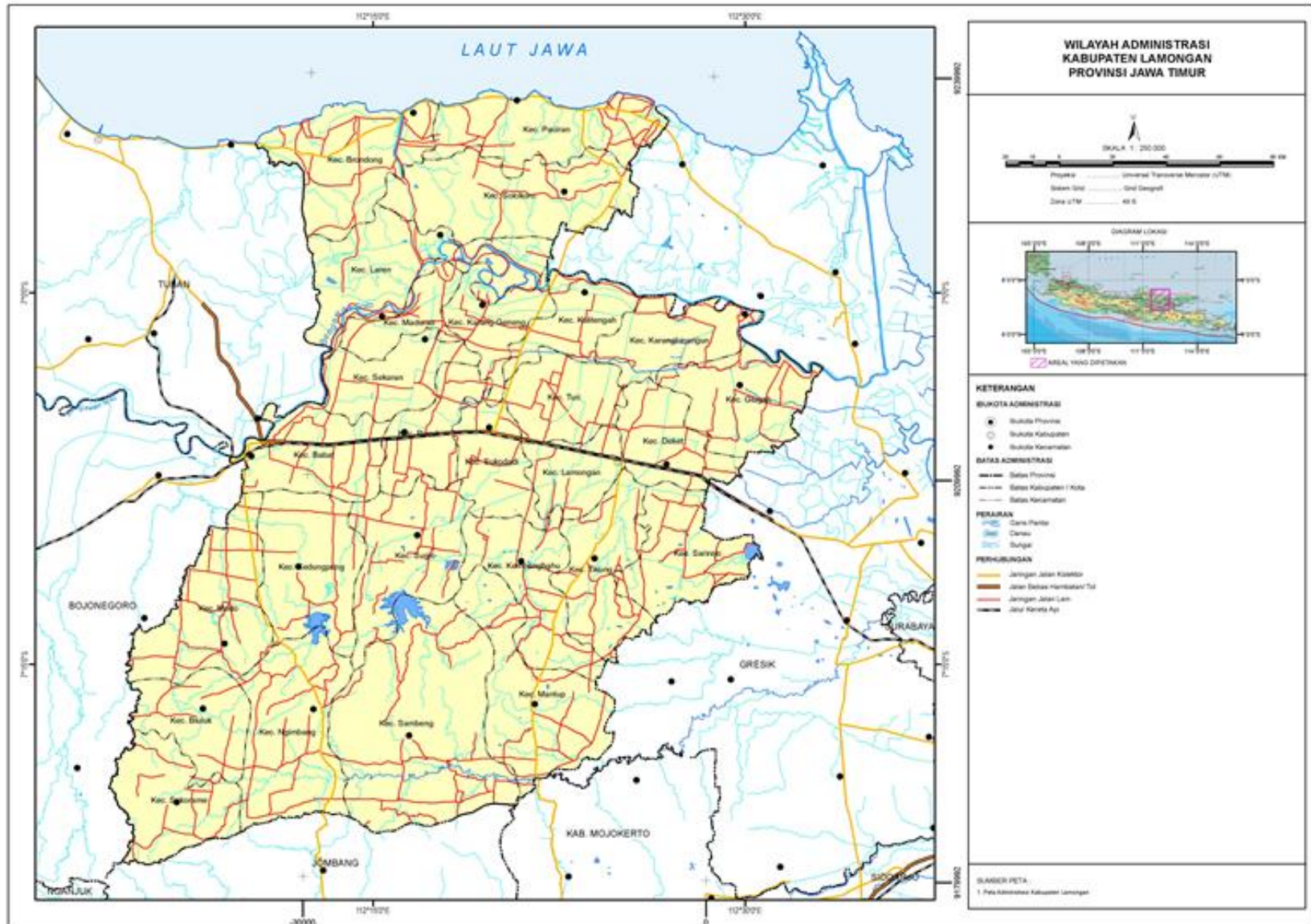
## **Report Writing Workshop:**

Bogor, Hotel Novotel, February 8<sup>th</sup>, 2015 (Chaired by Geoffrey Gooch, PhD)

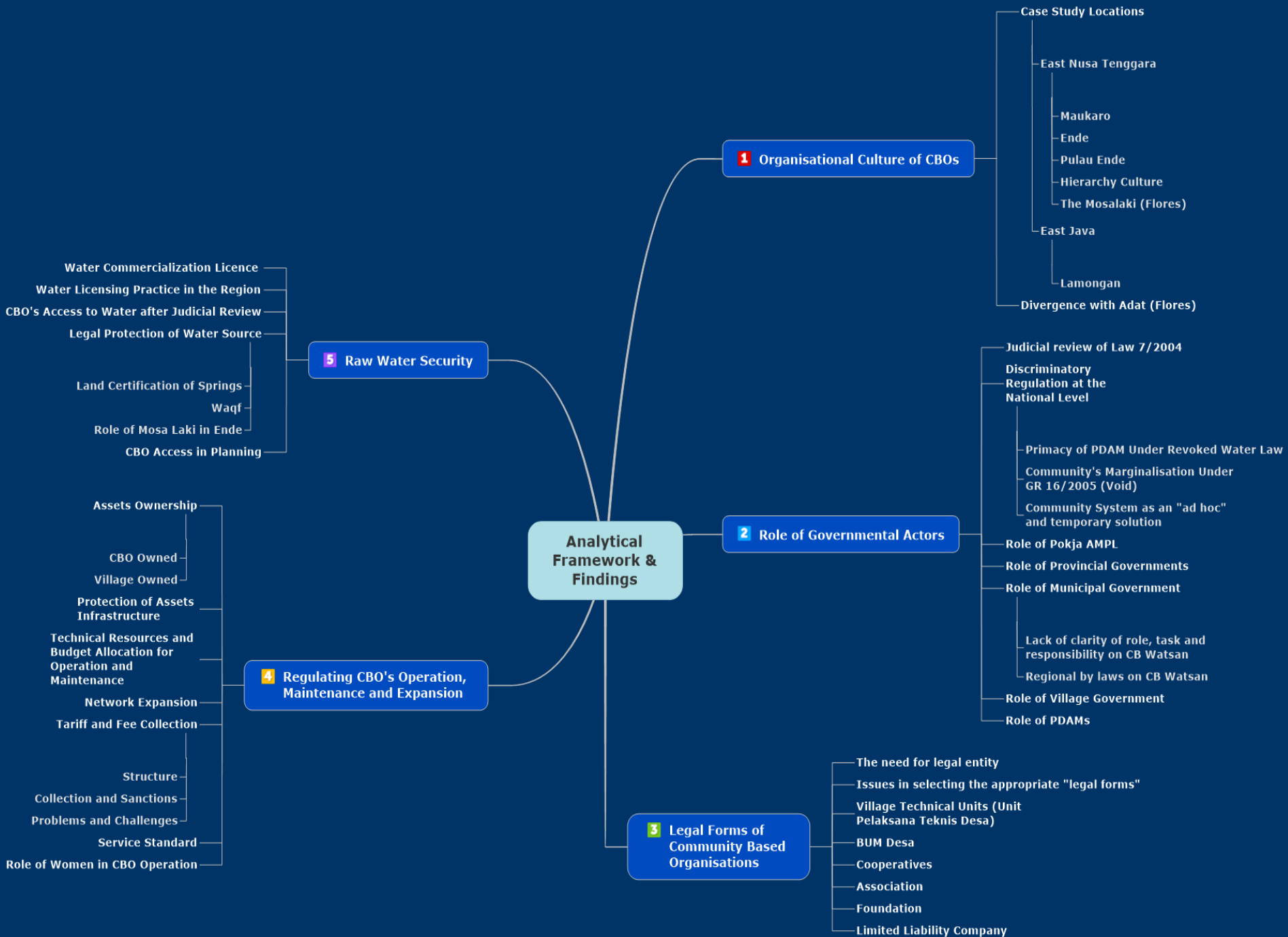
# Methodology 3: Case Study



# Methodology 4: Case Study



# Analytical Framework & Findings



# Recommendations

1. In regions where Adat is prevalent, CB-Watsan initiatives should be integrated with Adat, both in pre and post construction stages
2. Limited professionalization is the way forward
3. CB-Watsan should be recognized as a distinctive actor and model of provision
4. National Legislations must regulate CB-Watsan in alongside the “institutional” system, with equal detail (service levels, quality, redress, etc)
5. Regulatory framework must clarify the roles and responsibilities of local agencies in post construction stage
6. CB Watsan and non-CB Watsan Planning Framework must be integrated
7. Legal forms of CBO should be compatible with the “CB-Watsan” concept
8. Most CB Watsan (immovable property) assets are ownerless. Assets must be owned, either by CBO or by Village
9. Assets Infrastructure should be protected by a combination of Regional By Law, Village Regulation and (where applicable) Adat
10. There should be a specific type of CB-Watsan water abstraction licence
11. CBO should be granted access to all planning instruments

# Field Study





Village road in Maukaro



## AIR BERSIH ADALAH USAHA KITA

### Sistem Perpipaan Gravitasi



Gravity fed system in Maukaro, constructed by the Pro Air Project. Gravity fed system was considered the most appropriate, as electricity is intermittent (lighting starts only from 18.00-06.00)

The system use steel pipes with 50 years timeline. However, only 1 system --- (Koja Aje) out of 4 -- is still functioning. The other systems cease operation after 1-2 years after construction





The Office of BPSAB Koja Aje. Agus Meo, the Chairman, sits on the far left





The public standpipe at BPSAB Koja Aje (Maukaro). The standpipe can serve 4-5 houses with stable pressure. Mosalaki (the Adat Chiefs) – as a compromise – are given their own standpipe.

New connection: connection costs could be prohibitive (due to the cost of piping). Limited pressure may not be able to withstand population growth.





The forest is protected by Adat. Illegal tree cutting will be fined with 1 jar (equals to 40 bottles) of Mokke (traditional liquor), 1 sack of rice and 1 big swine



Panggeng Siswadi, Chairman of HIP PAMS Tirto Agung, Lamongan hand over closet to villagers







Asset base is developing rapidly, but still no security in terms of land tenure







Vicinity to supplies  
(major cities),  
know-how  
(resource person)  
and  
reliable/affordable  
energy supply  
affects Operation  
and Maintenance.  
These resources  
are not available in  
Maukaro.



HIPPAMS Tirto Agung  
used computerized  
accounting software for  
billing



# Some Reflections on the Two Case Studies

| Factors             | Similarities   |
|---------------------|--|
| Dominant Figure     | Successful CBOs relies on one dominant figure. Thus, regeneration is difficult.  |
| Motivation          | Money is not the motivation. Recognition and appreciation appears to be the primary motive.  |
| Technical Person    | The role of technical person is vital, but often underappreciated.   |
| Role of women       | We have yet to meet a women as CBO Chairman. Women are usually positioned as secretary or treasurer  |
| Elite Formation     | When successful, CBO officials becomes the new village elite   |
| Factors             | Differences  |
| Access to Resources | It takes 6 hours from Maukaro to Ende but takes only 2 hours from Lamongan to Surabaya. There is more access to know-how and skilled resources in Lamongan.  |
| Role of Adat        | Adat elites are dominant political force in NTT (aside from local bureaucracy, religious leaders and CBOs). Each of these forces are in some form of tensions. In Eastern Java the Adat is intermingled with bureaucracy |
| Local politics      | The importance to be independent from local politics is stressed in Eastern Java (and intervention from local politics has disrupted services) but less so in Eastern Nusa Tenggara                                      |



# Thank You

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**IN INFRASTRUCTURE**  
**THROUGH**  
**APPLIED RESEARCH**