Introduction of
Scheduled Desludging Services
in Indonesia

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OVERVIEW

Current situation/problems

- On-call basis
- No Health and Safety procedures
- No collection SOP
- No license needed
- No transport monitoring
- Direct payment to driver
- (often) illegal disposal

Built for most big cities (but often far from city)
- Rarely mechanized
- Underutilized or unused, because limited collection
- Inadequate O & M funding
regularly and according to an agreed schedule, a licensed desludging unit comes to a registered customer, to conduct mandatory desludging and deliver it to a Treatment Plant.

All of this is done for a Cost Recovery Tariff, covering all direct operational cost of collection, treatment & direct management.

Except Investment cost of the Treatment Plant, which is covered by Central Government
THE 7 ASPECTS of Scheduled Desludging (LLTT)

- desludging period
- service area
- desludging scheme
- transportation scheme
- desludging units
- transfer stations
- treatment plants
- laboratory
- MIS & GIS
- vehicle monitoring

- registered & eligible septic tank users
- classified based on building use & size
- designated operator
- regulator & supervisor
- private desludger
- customer relation
- billing
- emptying
- transportation
- mon-ev

- tariffs cover operating cost
- capital by government
- can involve private investment
- use of proper septic tanks
- mandatory periodic emptying,
- tariff & mechanisms.
PREPARING Regular Desludging (LLTT)
(14 steps)

1. Assess POTENTIAL
2. Agree on PRINCIPLES
4. Obtain BLESSING (of mayor)
3. Prepare BASIC CONCEPTS

5. Understand / Map CUSTOMERS
6. Prepare OPERATIONAL PLANS

7. Prepare OPERATOR
8. Finalize REGULATIONS
9. Establish FINANCIAL SYSTEM
10. Involve OPERATION PARTNERS
11. Arrange SEPTAGE FLEET
12. Agreement by MANAGEMENT

13. promoting SERVICE
14. LAUNCHING
ACTIVITIES

since mid 2012
with the Govt of Indonesia, WB/WSP
& local stakeholders

- Android & Web-based septic tank sensus tool
- Financial models & tools
- MIS & customer database
- SOPs on admin & technical
- Regulation on sludge management
- Contract for private desludgers
- Exposure workshops and trainings
- Promotional materials
- Manuals and training programs
FIELD ACTIVITIES

formal LLTT launching in 2 cities

October 2015

SOLO
(CENTRAL JAVA)

Followed by:

DKI JAKARTA
KOTA BEKASI
KAB GRESIK

August 2015

MAKASSAR
(SOUTH SULAWESI)
All 11 cities joined FSM4

11 SUPPORTED CITIES for LLTT by IUWASH and IUWASH PLUS

..... there will be more
... endorsed by the Government as the guiding document across Indonesia

4 supplements
(financial, marketing, health & safety, information system)
Early & strong commitment by city leadership (mayor) is crucial to LLTT initiation. Regulations on mandatory desludging & cost recovery tariff take time & must be promoted early. > 80% households prefer regular desludging above “on-call”
Increasing collection efficiency is crucial for cost reduction. Scheduling a truck (4 m3) to empty 2 tanks (@ 2m3) before going to STP + construct STP nearby so the truck can make 2 trips per day.

Most efficient billing is for a water utility to combine it with the monthly water bill. If not possible, it is recommended to appoint a local community group as “billing agent.”

Existing septage treatment plant almost always be the bottleneck. Consider implementing an incremental approach to increase capacity of the septage plant.
INCREMENTAL APPROACH
to increase capacity of septage treatment plant

10 m³
- A, F, M ponds & SDB

30 m³
- A, F, M ponds & SDB
- Aerated lagoons

100 m³
- SDB + limited mechanical dewatering
- Aerated lagoons

300 m³
- Mechanical dewatering

low capacity, low cost, low efficiency, low skills
Aerated lagoons
presses

higher capacity, higher cost, higher efficiency, higher skills
Guide, Syllabus and Training
to start in April 2017
“We will build a great desludging system and .. we will build it cheaply..”

“….Thank you.”