

INTERNATIONAL STUDY OF INSTITUTIONAL MODELS TO SUPPORT THE DEVELOPMENT OF GHANA'S PROPOSED NATIONAL SANITATION AUTHORITY

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Abbreviations

MMDA	Metropolitan Municipal District Assembly
NSA	National Sanitation Authority
MSWR	Ministry of Sanitation and Water Resources
WSUP	Water and Sanitation for the Urban Poor

The Urban Sanitation Research Initiative – Ghana is a research programme designed to feed into the national evidence base around pro-poor urban sanitation in Ghana, helping to drive policy change and wider sector change.

This 2016–2020 programme is managed by Water & Sanitation for the Urban Poor (WSUP) in strategic partnership with the Ministry of Local Government and Rural Development, Environmental Health and Sanitation Directorate, (MLGRD-EHSD), the Institute of Local Government Studies (ILGS), and the Kwame Nkrumah University of Science and Technology (KNUST).

This research programme forms part of the multi-country Urban Sanitation Research Initiative managed by WSUP and core-funded by UK aid from the UK government.

1. Introduction

The overall aim of the project is to respond to Government of Ghana's interest to establish a National Sanitation Authority to prioritise sanitation service delivery and achieve Ghana's commitment to SDG Goal 6. The Ministry of Sanitation & Water Resources (MSWR) has requested the Urban Sanitation Research Initiative in Ghana to undertake a policy research project to assist in decision-making around the setup of the proposed National Sanitation Authority (NSA). The specific objective of the assignment is to provide technical support to the MSWR and other key stakeholders to help decide upon the role/function and structure of the proposed NSA, and its relationship with other institutions.

The objective of the assignment is to provide technical support to the MSWR and other key stakeholders to help decide upon the role/function and structure of the proposed NSA, and its relationship with other institutions. The decision-making process about the roles and responsibilities of the NSA and the institutional structure is informed by an international review and assessment of the institutional arrangements for the sanitation sector in the following fifteen countries. The aim is to assess how effective these institutional models are and consider their viability and appropriateness within the context for the expectations from existing Ghanaian authorities, utilities, NGOs and civil society.

The international review was comprised of desk-based research of the institutional arrangements for sanitation in the following fifteen countries:

Africa: Burkina Faso, Kenya, Mozambique, Nigeria, Rwanda, Senegal, South Africa, Tanzania, Uganda, Zambia.

South America and Asia: Brazil, India, Indonesia, Nepal, Vietnam.

This report presents the findings from these assessments on the assumption that one, or a combination of these examples, is likely to provide the basis for the model to be adopted in Ghana.

2. Methodology

A literature review was undertaken, predominantly using sources available on the internet. Sector experts were also contacted to provide additional input and/or validation of research¹. The information was collected and categorised as per the following framework of functional attributes across the sanitation chain (see Table 1), which covers the spectrum of activities related to the provision of urban sanitation services.

Enabling: i) Policy setting ii) Regulations iii) Infrastructure financing iv) Capacity development

Developing: i) Planning at the local level ii) Infrastructure provision

Sustaining: i) Asset management, ii) Service delivery, iii) Monitoring and evaluation iv) Enforcement

Table 1 Framework of functional attributes across the sanitation chain used for the analysis

Functional attributes	Behavioural aspects		Toilets			Conveyance		Treatment
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Faecal sludge / wastewater treatment
Enabling								
Policy								
Regulations								
Financing								
Capacity development								
Developing								
Planning								
Infrastructure provision								
Sustaining								
Enforcement								
Asset management								
Service delivery								
Monitoring and evaluation								

The institutions/agencies/organisations related to sanitation service delivery were categorised according to:

- *Ministries:* Line ministries assigned specific executive roles within the sanitation sector
- *Local authorities:* district and municipal authorities mainly responsible for ensuring services
- *Parastatal agencies:* acting as service providers, asset holding companies, regulators, etc.
- *Private sector:* both formal and informal, providing varying degree of services from toilet construction to operating and maintaining treatment facilities.

¹ See Annex 1 for the list of experts contacted.

The roles of donors and NGOs were not considered in the landscape since:

- i) Donors generally finance and support national governments in line with national policies/strategies. Therefore, their role is aligned with the ministries that they support.
- ii) NGOs carry out important activities at the local level to support improvements in sanitation, often filling in gaps in public services. However, NGOs are generally not officially part of the institutional framework which is characterised by governmental agencies and parastatals.

Limitations of the study:

1. The study presents the institutional frameworks as described in literature and views of the sector experts. However, it should be noted that ground realities are different, and the roles as described may or may not be undertaken by the organisations in practice.
2. The study focusses on the roles and responsibilities of various organisations with the sector in 15 countries. It has not captured sector performance and thus does not claim one institutional arrangement is any better than the other. The study only presents the various options that the NSA could get inspirations from.

3. Synthesis and selection of countries for further analysis

Tables 2,3 and 4 present the variations in the roles amongst the various actors in the sanitation sectors in the fifteen countries according to the categories of functional attributes defined above. The tables highlight that no single institution is responsible for all the five functions as the mandates are quite diverse and that the functions are devolved to various institutions within the sector. It is therefore highly unlikely that the NSA would be able to cater to all the defined roles.

Table 2 Summary institutional analysis based on the functional attributes related to “enabling” sanitation services

Enabling	
Policy setting:	This function is exclusively with the line ministries and no other agency are involved in policy setting in any of the countries. At the local level, local authorities are involved in the formulation of by-laws pertaining to sanitation.
Regulations (economic and environmental)	This is often the responsibility of line ministries, but exceptions are Brazil, Kenya, Mozambique, Nepal, Rwanda, Tanzania and Zambia where independent institutions regulate the sector. Economic regulators are only present in Brazil, Kenya, Mozambique, Tanzania and Zambia.
Financing	In most countries financing of infrastructure is carried out by the ministries responsible for (water and) sanitation. The only exceptions being Kenya and Zambia where financing for household sanitation is carried out by Trust Funds. In Burkina Faso, the parastatal agency ONEA also subsidises household sanitation as a pro-poor intervention. India show a promising example of sanitation financing based on comprehensive city sanitation plans.
Capacity development	Capacity building is generally led by line agencies in most countries, with exceptions of Burkina Faso and Zambia, where the parastatals (ONEA and NWASO) are involved in capacity building activities of local service providers.

Table 3 Summary institutional analysis based on the functional attributes related to “developing” sanitation services

Developing	
Planning (at a local level)	This function is conducted by local authorities (district and municipal). The exceptions in this case are Burkina Faso, Kenya, Senegal and Zambia where local level planning for sanitation service are undertaken by the parastatal agencies such as ONEA, ONAS, Water and Sanitation Boards and the Commercial Utilities respectively.
Infrastructure provision	The provision of bulk infrastructure (sewerage networks, treatment facilities (faecal sludge and wastewater) etc) are provide by either national or provincial governments. In case of Burkina Faso, Kenya, Senegal, South Africa, Tanzania and Zambia, these are carried out by their respective parastatals. Smaller investments in sludge emptying services are either conducted by local authorities or the private sector and in a very small scale by CBOs in Indonesia.

Table 4 Summary institutional analysis based on the functional attributes related to “sustaining” sanitation services

Sustaining	
Enforcement	The enforcement of by-laws is primarily the function of local authorities, but in most cases they are only relate to containment at a plot level. The enforcement of regulations for emptying, transport and treatment falls under National/regional pollution boards or environmental regulators, which are mostly parastatal agencies. Case in point are authorities in being Burkina Faso, Kenya, Rwanda, Senegal, South Africa, Tanzania, Uganda and Zambia. In case of Brazil, India, Indonesia, Nepal and Vietnam, these functions are also relegated by the environmental health departments of local authorities.
Asset management of large infrastructure	This function is normally devolved to the service providers; either local authorities/boards in ownership of the infrastructure or to parastatals/private sector under the service agreement.
Service delivery	Responsibility for emptying and transport is either undertaken by the private sector (formal and informal) or local authorities. The larger operations of sewer networks and treatment facilities are in most cases taken up by the service provider (parastatal or private companies). India, Nepal and Nigeria are the only cases where this function is undertaken by state authorities/provincial governments. Indonesia provides an interesting case were CBOs are becoming increasingly popular in providing emptying and treatments services for decentralised wastewater treatment systems.
Monitoring and evaluation	Primarily the function rests with ministries using the local authorities for data collection. Exceptions in this case where there are independent regulators are Mozambique, Senegal and Zambia where sector performance is monitored based upon evaluations of service providers.

Figure 1 shows the extent of involvement of the Ministries, Local authorities, Parastatal agencies, and private sector actors with regards to the functional attributes within the sanitation sector of the respective countries.

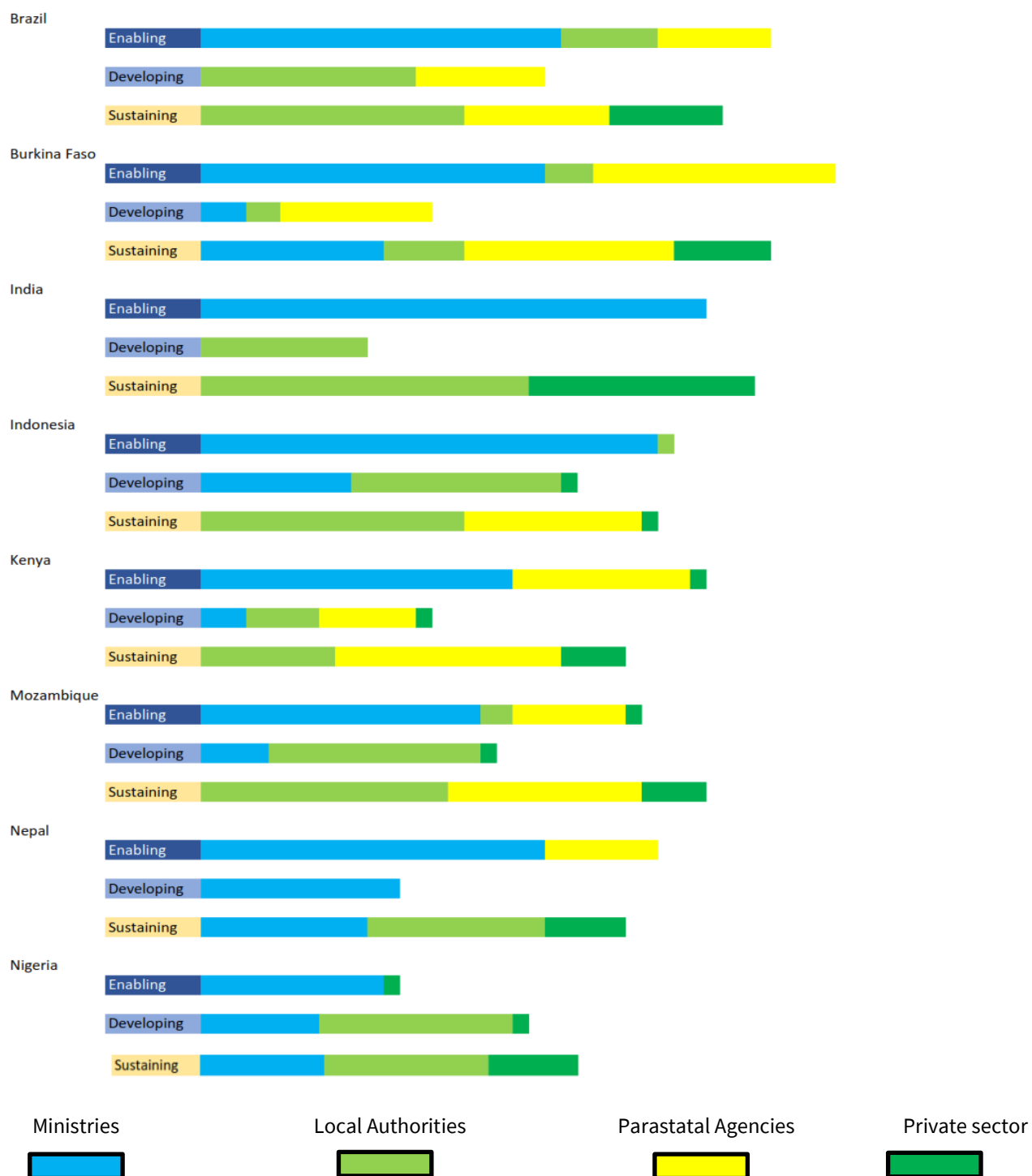


Figure 1 Involvement of the Ministries, local authorities, parastatal agencies, and private sector actors in the sanitation sector in Brazil, Burkina Faso, India, Indonesia, Kenya, Mozambique, Nepal and Nigeria

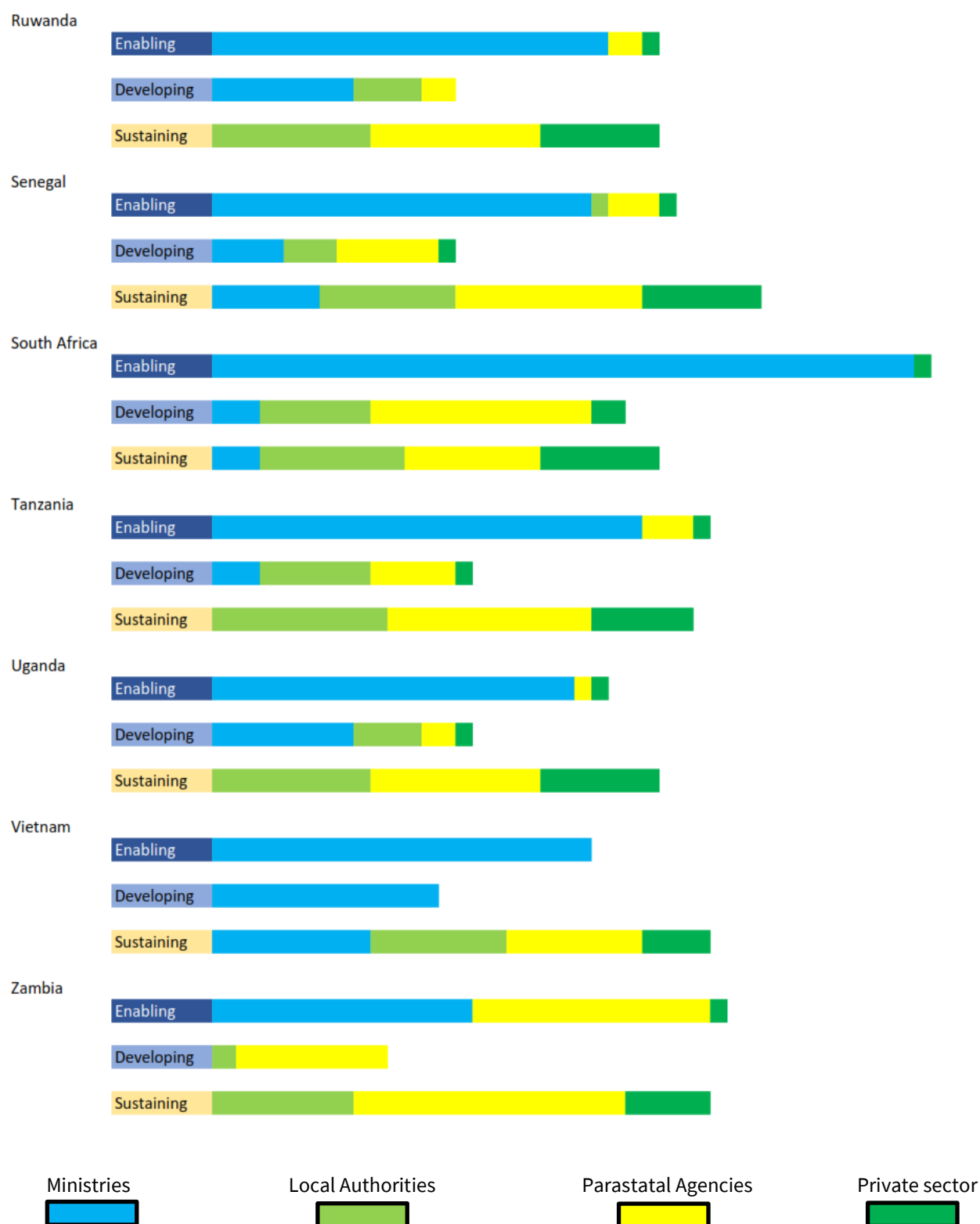


Figure 2 Involvement of the Ministries, local authorities, parastatal agencies, and private sector actors in the sanitation sector in Rwanda, Senegal, South Africa, Tanzania, Uganda, Vietnam and Zambia

Based on the expected functions of the NSA and the 15 cases studied, a comparative analysis is presented below to determine which countries are considered most relevant and relevant for further investigation. The 15 institutional models were assessed to determine which of the required functional attributes are fulfilled by parastatal agencies in each of the countries and scored accordingly (see Table 6). In addition, each of the countries are scored '0' or '1' based on their similarity to the socio-economic context of Ghana. The final scores for each country are presented in the range of Low/Medium/high relevance to the NSA. The five countries that scored high relevance amongst the 15, are Burkina Faso, Kenya, Senegal, Uganda and Zambia.

An additional country, India, although scored as medium relevance, is further included in the selection as a promising example for financing sanitation interventions based on a comprehensive city sanitation planning approach and for its City Benchmarking approach to rank and monitor progress in sanitation improvements. Tanzania also scores equal to India in the comparison, but since no remarkable features in the sanitation sector were found (in comparison to India), it was not considered for the selection.

In addition to the above ranking of countries, a brief summary of the salient features from the research is presented in Table 5, below from each of the six countries have shown in the recent years:

Table 5 Salient features of the sanitation sector in the selected countries

Country	Salient features
Burkina Faso	• Good demonstration of sanitation infrastructure interventions in urban and per-urban areas • Well established capacity building programme for local authorities to improve service delivery • Well established governance structures (mostly for water supply)
India	• Financing based on comprehensive citywide sanitation plans • Innovative Corporate Social Responsibility Fund for financing sanitation improvements • Sanitation Bench Marking systems to raise political awareness on sanitation and, influence motivation of LAs and funding for sanitation improvements
Kenya	• Well established results-based financing mechanism for household sanitation • Comprehensive approach to financing: financing + supervision + capacity building of local implementers • Investments provided for urban, peri-urban and rural settings • Good pro-poor strategies • High level of accountability and transparency
Senegal	• Good PPP involvement strategies at various levels of the sanitation chain aimed at improving service delivery • Good asset management approaches • Capacity building of private sector for service delivery • Strong focus on on-site sanitation interventions
Uganda	• Good operational model for water and sanitation infrastructure planning and implementation at the regional level • Investment planning combines water and sanitation interventions right at the inception phase • Strong focus on small towns and rural growth centres
Zambia	• Well established sector regulator, with sound financial sustainability, independent from line ministries • Good pro-poor initiatives • Independent authority enforcing sector standards and guidelines

Table 6: Selection of countries for further analysis

Countries	Functional attributes as required by the NSA					Total count	Similar socio-economic conditions to Ghana		Score/Range			Relevance to the NSA	Final selections
	Financing	Regulations	Capacity development	Planning	Infrastructure provision		No (0)	Yes (1)	Low (0-2)	Medium (3-4)	High (5-6)		
Brazil		✓		✓	✓	3	0			3		Med	
Burkina Faso	✓		✓	✓	✓	4		1			5	High	Burkina Faso
India	✓		✓	✓	✓	4	0			4		Med	India
Indonesia						0	0		0			Low	
Kenya	✓	✓		✓	✓	4		1			5	High	Kenya
Mozambique		✓				1		1	2			Low	
Nepal		✓				1	0		1			Low	
Rwanda		✓				1		1	2			Low	
Senegal	✓		✓	✓	✓	4		1			5	High	Senegal
South Africa				✓	✓	2	0		2			Med	
Tanzania		✓		✓	✓	3		1		4		Med	
Uganda	✓		✓	✓	✓	4		1			5	High	Uganda
Vietnam						0	0		0			Low	
Zambia	✓	✓		✓	✓	4		1			5	High	Zambia

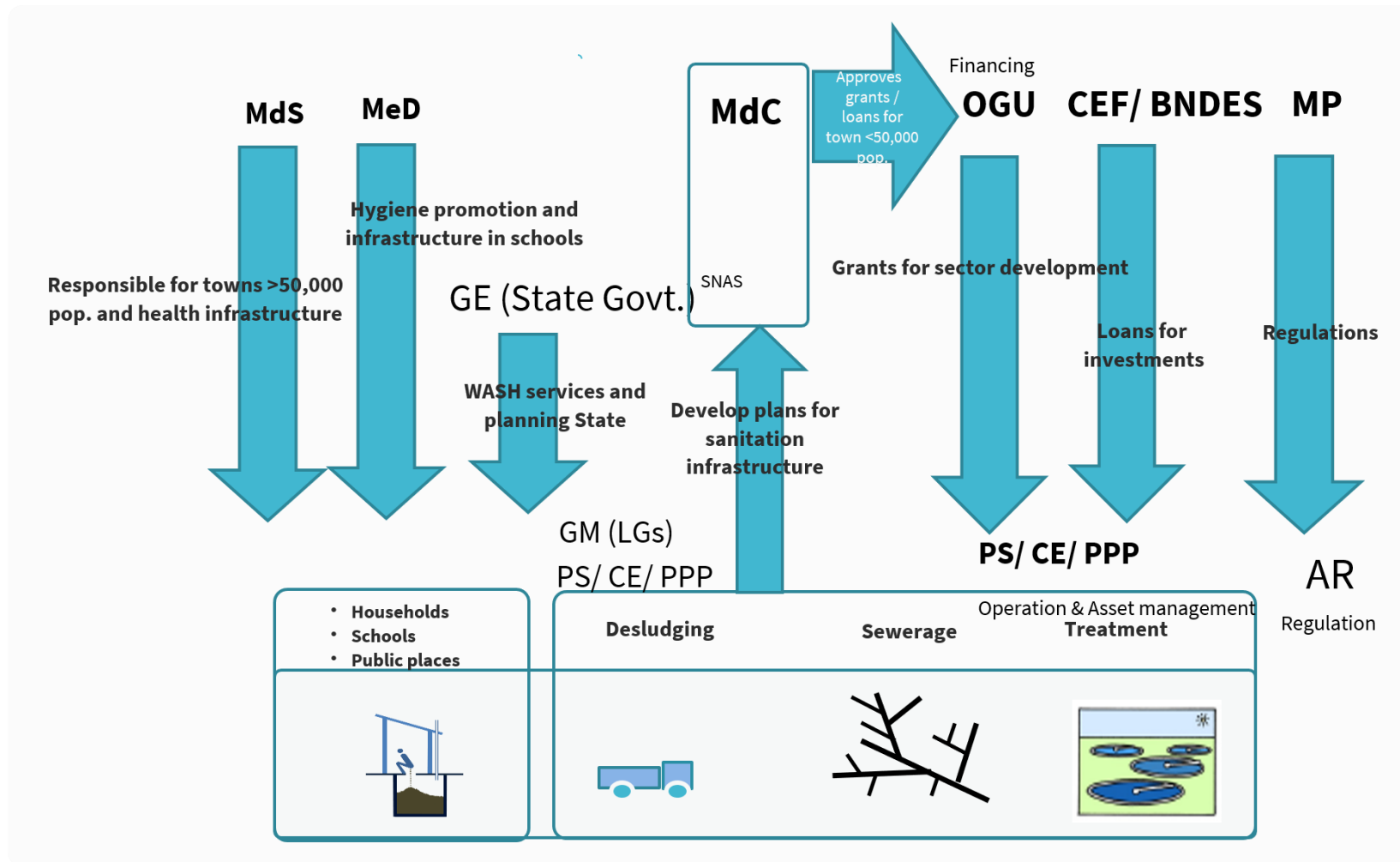
Annex 1: List of sector experts consulted

Expert	Organisation	Country
Adrien Mazeau	i-San Consulting	Burkina Faso and Senegal
Joana Forte	Water Aid	Mozambique
Victor Valente	KFW	Brazil
Kitchinme Bawa	AMCOW	Nigeria
Mingma Sherpa	ADB, Nepal	Nepal
Pan Nam Hung	Ministry of Environment	Vietnam
Bithush Luthra	CSE	India
Ison Symbeye	GFA Consulting	Zambia
Martin Mukasa	WSDF	Uganda

Annex 2: 15 country assessments of intuitional frameworks for sanitation

Brazil

Organigram of the institutional setup



Brief description of institutions/agencies/authorities: Brazil

Abbreviation of institutions/agencies /authorities	Full title of institutions/agencies / authorities	Main mandates/roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
GF	Federal Government/ Governo Federal	The Federal Government sets up national policies and is responsible for most of the investments in basic sanitation, through resources from the General Budget (OGU), the Working Time Guarantee Fund (FGTS) and the Workers' Assistance Fund (FAT). Further down, various ministries sanitation fund in a coordinated way with a division of responsibilities	Government	National
MdC/SNSA	Ministry of Cities/ Ministério das Cidades	Ministry of Cities supports municipalities with more than 50 thousand inhabitants, metropolitan regions and integrated regions of development. It plans and manages resources (funds from GF) through the Secretariat National Environmental Sanitation (SNSA) <i>Secretaria Nacional de Saneamento Ambiental</i>	Government	National
MdS	Ministry of Health/ Ministério da Saúde	Ministry of Health defines water quality standards for human consumption and, through the National Health Foundation is responsible for assisting municipalities, rural settlements, indigenous communities and other traditional populations. The Ministry of Health sector is responsible to coordinate health facilities. They directly support towns under 50.000 inhabitants via the agency FUNASA	Government	National
MeD	Ministry of Education	Responsible for sanitation and hygiene in schools		
CEF	Federal Savings Bank/ Caixa Econômica Federal	Caixa Econômica Federal and the National Development Bank for Economic and Social Development (BNDES) are the financial resources (via loans) and those responsible for implementing the programs, resources and monitoring the contracted actions	Government	National
BNDES	National Development Bank for Economic and Social Development/ Banco Nacional de Desenvolvimento Econômico e Social	Development banks that provide loans for infrastructure development	Government	National

GE	State Governments/ Governos Estaduais	Operates and maintains sanitation systems, in addition to establishing the rules of tariffs and subsidies in the systems operated by the state They normally provide services via CE, PS and/ or PPP	Government	State
GM	Municipal Governments/ Governos Municipais	It is the municipality's responsibility to provide, directly or through concession to private companies, basic sanitation services, collection, treatment and final disposal. They are also responsible for the elaboration of the Basic Sanitation Municipal Plans. These plans are a key tool for the municipalities to obtain loans for sanitation with the federal government and financial institution. The municipality that does not prepare the plan is prevented from having federal resources available for water and sanitation projects.	Government	Municipal
PS	Service provider/ Prestadores de serviços	These service providers are contracted by the municipalities to provide water and sanitation services, either construction or O&M	Private	-
CE	State Companies/ Companhias Estaduais	Many municipalities delegate water and sanitation services to state-owned companies, other services directly through municipalities, and departments of municipal secretariats. These state-owned enterprises provide services under concession contracts. This model covers 75% of municipalities. The concession contracts between the state and local the municipalities are very vague and there are no standards on the structure the company's obligations, these services are either construction or O&M	Parastatal	State
PPP	Public Partnerships/ Parcerias Público Privada	Public Private Partnerships also provide water and sanitation services in Brazil in construction or O&M	Parastatal	-
MP	Public Ministry/ Ministério Público	The Public Ministry participates in the articulation within consumers and environmental defence. Also acts as a regulator	Government	National
AR	Regulatory Agencies/ Agências Reguladoras	As far as regulation is concerned, according to the Brazilian Association of Regulation (ABAR, 2015), in 2014 there were 50 regulatory agencies for water and sewage: 23 of state scope, 24 municipal and 3 consortia of municipalities	Government	-
MdE	Ministry of Education/ Ministério da	Sanitation and health activities within schools are the responsibility of the Ministry of Education. It also provides and maintains school sanitation infrastructure	Government	National

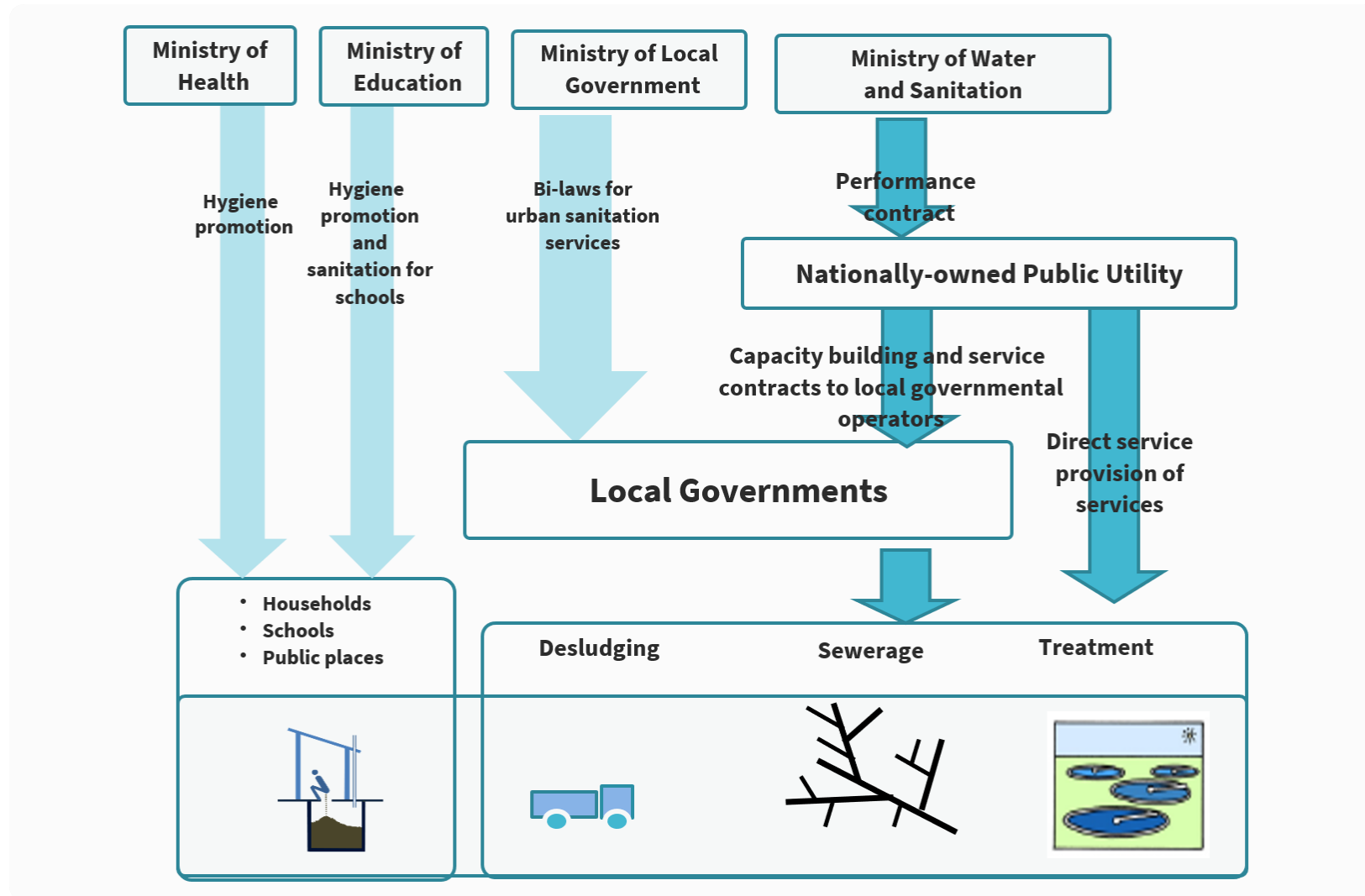
Institutional mapping of the Brazilian sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal collection/ sludge transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	GF/MdS	GF/MdC	GF/MeD	GF/MdS	GF/MdC	GF/MdC	GF/MdC	GF/MdC
						GE/ GM	GE/ GM	GE/ GM
Regulations	MdS	AR	AR	AR	AR	AR	AR	AR
						GE/ GM	GE/ GM	GE/ GM
Financing	GF	GF	GF	GF	GF	GF	GF	GF
Capacity development	MdS	McD	MeD	MdS	McD	McD	McD	McD
Developing								
Planning	GM	GM	GM	GM	GM	GM	GM	GM
						CE/ PPP	CE/ PPP	CE/ PPP
Infrastructure provision	GE/GM	HH	GE/GM	GE/GM	GE/GM	GE/GM	GE/GM	GE/GM
		GE/GM (under specific programs)				CE/ PPP	CE/ PPP	CE/ PPP
Sustaining								
Enforcement	GE/ GM	GE/ GM	GE/ GM	GE/ GM	GE/ GM	GE/ GM	GE/ GM	GE/ GM
Asset management	GE/ GM	HH	Schools	Health Centers	GE/ GM	GE/ GM	GE/ GM	GE/ GM
						CE/ PPP	CE/ PPP	CE/ PPP
						Pvt (F)	Pvt(F)	Pvt(F)
Service delivery	GE/ GM	Pvt(I)	Pvt(F)	Pvt(F)	Pvt(F)	CE/ PPP	CE/ PPP	CE/ PPP
		Pvt(F)						
Monitoring and evaluation	GE/ GM	GE/ GM	GE/ GM	GE/ GM	GE/ GM	GE/ GM	GE/ GM	GE/ GM

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Burkina Faso

Organigram of the institutional setup



Brief description of institutions/agencies/authorities: Burkina Faso

Abbreviation of institutions/agencies/authorities	Full title of institutions/agencies/authorities	Main mandates/roles/responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/regional/local)
MEA	Ministry of Water and Sanitation / Ministère de l'Eau et de l'Assainissement.	MEA is the government entity responsible for steering and controlling all the activities related to water supply and provision of sanitation to the population, and management of water resources in the country. Sanitation is managed by the Directorate for Sanitation. (DGA)	Government	National
MS	Ministry of Health / Ministère de la Santé	MS implement hygiene promotion policy and insure the respect of sanitation rule in health center through participation of Directorate for Health and local Authority	Government	National
MENA	Ministry of National Education and Literacy / Ministère de l'Education Nationale et de l'Alphabétisation	MENA ensures the implementation and monitoring of the policy education, technical and vocational education and training (TVET) and non-formal education. MENA is also in charge of hygiene promotion and sanitation facilities for schools.	Government	National
MATD	Ministry of Territorial Administration and Decentralisation / Ministère de l'Administration Territoriale et de la Décentralisation	MATD ensures implementation of the policy on decentralization, local development, support and control of local communities.	Government	National
ONEA	Office National de l'Eau et de l'Assainissement.	Under supervision of the MEA, the Office National de l'Assainissement (ONEA) is a Burkina Faso public company in charge of the creation, promotion, improvement and management of collective or individual sanitation facilities for the disposal of wastewater and excreta in urban and peri-urban areas. They are also involved in capacity build activities of local masons and small-scale service providers.	Parastatal	National and local
LCs	Local authorities/ Collectivités locales	Municipalities have regulation and enforcement mandates at local levels. Transfer of sanitation assets are ongoing from the State to Municipalities. Planning of sanitation services is one a mandate of municipalities where ONEA does not have mandate.	Governmental	Local
Pvt	Private sector / Secteur Privé	Provide pit emptying services primarily in urban areas and toilet constructions. Different degree of formality is found. Some providers evolve within partnership with municipalities and ONEA	Private	Local

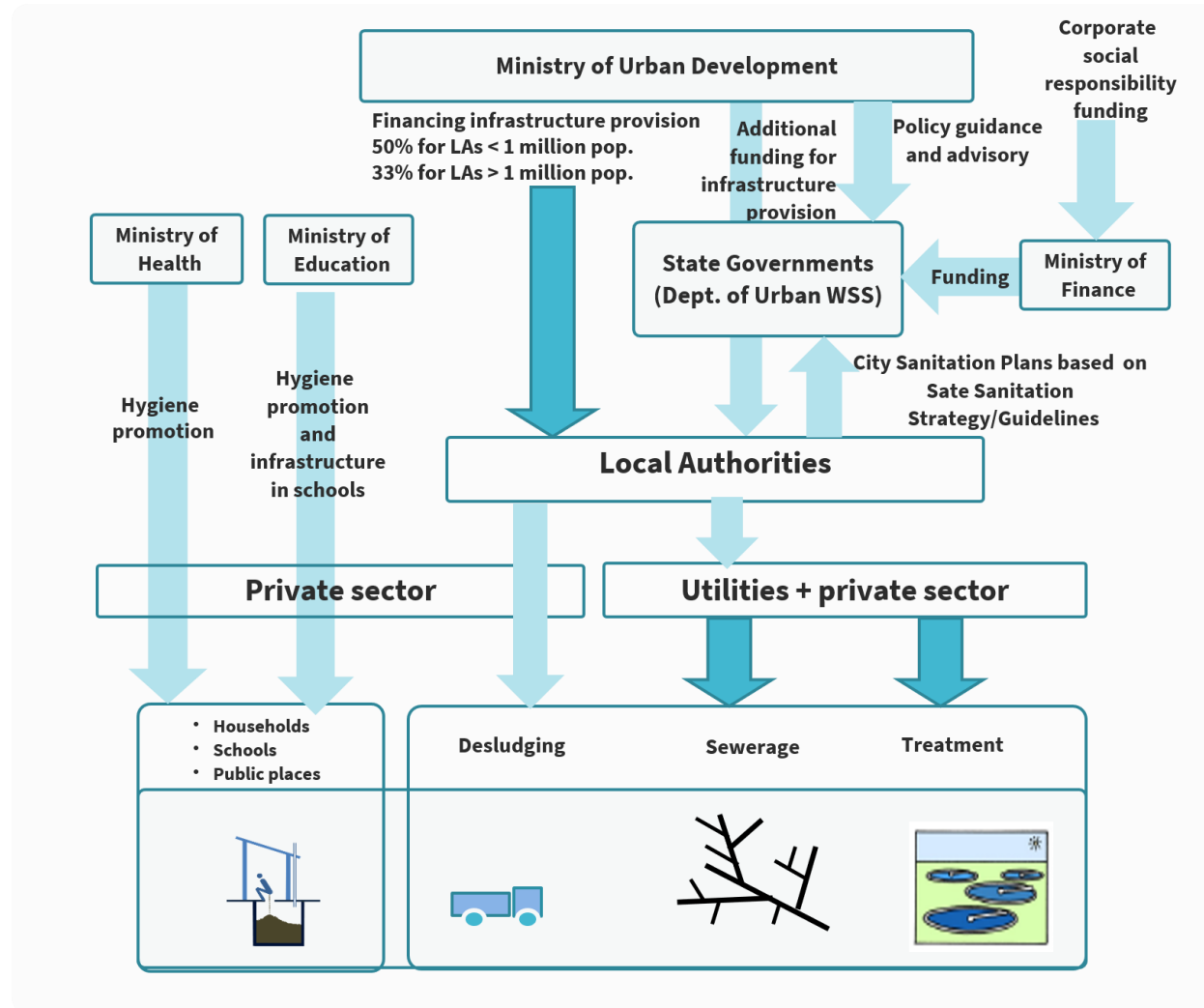
Institutional mapping of the Burkina Faso sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Treatment of faecal sludge/wastewater
Enabling								
Policy	MS	MEA	MENA	MS	MEA	MEA	MEA	MEA
Regulations	MS	MEA	MENA	MS	MEA	MEA	MEA	MEA
Financing	MS	LCs	MENA	MS	LCs	LCs		
		ONEA	ONEA		ONEA	ONEA	ONEA	ONEA
Capacity development	MS	ONEA	MENA	MS	ONEA	ONEA	ONEA	ONEA
					NGO / CBO	NGO / CBO	ONEA	ONEA
					ONEA	ONEA		
Developing								
Planning	MS	ONEA	MENA	MS	ONEA	ONEA	ONEA	ONEA
		LCs	ONEA		LCs			
Infrastructure provision	MS	HH	Schools	Health facilities	ONEA	ONEA	ONEA	ONEA
					LCs			
Sustaining								
Enforcement	MS	ONEA	MENA	MS	ONEA	ONEA	ONEA	ONEA
		LCs			LCs	LCs		
Asset management	MS	HH	Schools	Health facilities	ONEA	ONEA	ONEA	ONEA
					LCs	Prt Sector Fä		
						Prt Sector I		
						LCs		
Service delivery	MS	Prt Sector F	Prt Sector F	Prt Sector F	ONEA	ONEA	ONEA	ONEA
		Prt Sector I			Prt Sector F	Prt Sector F		
					Prt Sector I	Prt Sector I		
Monitoring and evaluation	MS	MEA	MEA	MEA	MEA	MEA	MEA	MEA

NB: The table includes institutional changes mentioned in the latest national sanitation programming document from 2016. These changes may not be yet fully implemented

India

Institutional setup



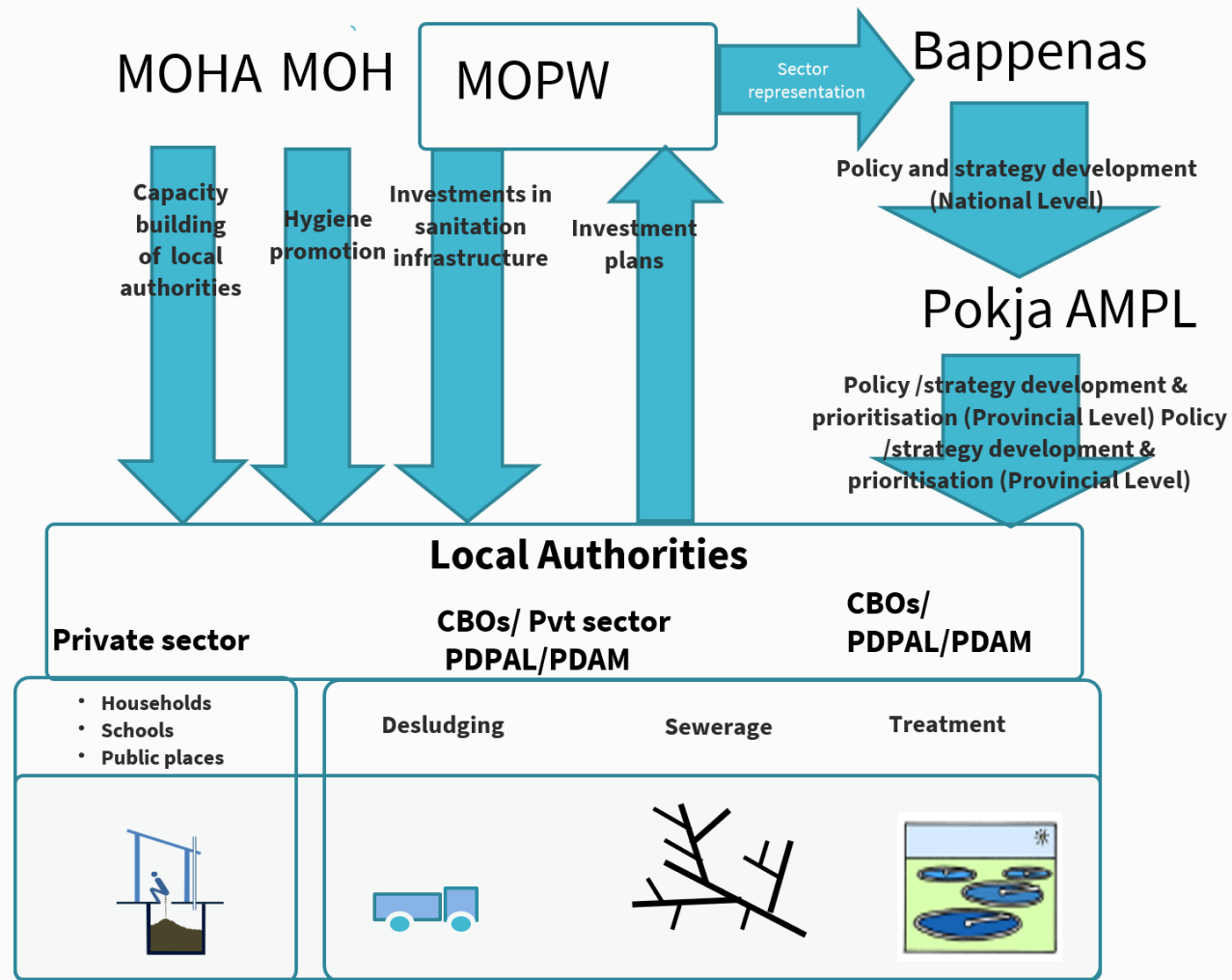
2. Brief description of institutions/agencies/authorities: India

Abbreviation of institutions/agencies /authorities	Full title of institutions/agencies/authorities	Main mandates/roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
MoHUPA	Ministry of Housing and Urban Poverty Alleviation	Sector lead and responsible for policy setting guidelines at a national level, monitoring and benchmarking cities, partially financing LAs under specific a programme of the Govt – The Swach Bharat Mission or Clean India Mission. Running capacity development programmes for state and LAs (also called Urban Local Bodies-ULBs)	Government	National
State Govt.	Sate (provincial) Governments	29 state/provincial governments, responsible for setting sate sanitation strategies, policies guidelines for LAs, monitoring of LAs, partial financing investments in infrastructure, awareness creation (15% of the budget) and capacity building activities (5% of the budget)	Government	Provincial
Las	Local Authorities/ Urban Local Bodies	Main implementing agency, with complete responsibility for planning, infrastructure provision, service delivery, asset management, enforcements and monitoring	Government	Local
Utilities	Publicly owned (State govt.)	Responsible for service delivery and asset management	Government	Local
Private sector	Privately owned infrastructure companies	Responsible for service delivery and asset management	Private	Local
CSR Fund	Corporate Social Responsibility Fund (Swachh Bharat Kosh)	CSR funds is a basket fund from financial contributions from the corporate sector, philanthropists and individuals. The CSR donations also attracts tax rebates on corporate and income taxes. As of 2016 the total collection of the fund was USD 63 million.	Government	National
MoF	Ministry of Finance	Finance ministry that administers the CSR fund and disburses it to state governments		

Institutional mapping of the Indian sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal collection/ transport	sludge Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.
Regulations	State Govt.	State Govt.	State Govt.	State Govt.	State Govt.	State Govt.	State Govt.	State Govt.
Financing	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.
Capacity development	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.	MoHUPA/State Govt.
Developing								
Planning	LGs	LGs	LGs	LGs	LGs	LGs	LGs	LGs
Infrastructure provision	LGs	HH	Schools	Health Centres	LGs	LGs	LGs	LGs
Enforcement	LGs	LGs	LGs	LGs	LGs	LGs	LGs	LGs
Asset management	LGs	HH	Schools	Health Centres	Private Sector F	Private Sector F	Private Sector F	Private Sector F F
	Private sector					LGs	LGs	LGs
Service delivery	Private sector	Private Sector I	Private Sector F	Private Sector F	Private Sector F	Private Sector F	Private Sector F	Private Sector F F
	CBOs					LGs	LGs	LGs
Monitoring and evaluation	LGs	LGs	LGs	LGs	LGs	LGs	LGs	LGs

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			



Brief description of institutions/agencies/authorities: Indonesia

Abbreviation of institutions/agencies /authorities	Full title of institutions/agencies /authorities	Main mandates/roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
MoPW	Ministry of Public Works	The lead agency for providing water and sanitation infrastructure to urban and rural areas	Govt.	National
MoH	Ministry of Health	Responsible for behaviour change and setting standards for drinking water quality.	Govt.	National
MoHA	Ministry of Home Affairs	Responsible for capacity building for local governments	Govt.	National
Bappenas	Directorate of Settlements and Housings in the Development Planning Agency	Bappenas is comprised of representatives from 7 line ministries, namely: Ministries of Home Affairs, Health, Public Works, Finance, Environment, Education and National Bureau of Statistics. Bappenas is responsible for prioritising sector priorities, policy setting and strategies development and coordinates activities in the sector at a national level	Govt.	National
Pokja AMPL-Sub-national/provincial	Sub-national technical Working group on Water and Sanitation	At the provincial level, the Pokjas consist of comprise the respective local government agencies responsible for water supply and sanitation. They oversee implementation of policies and strategies and coordinates activities in the sector at a sub-national or provincial level. The Pokjas have been established in all provinces, and are represented in more than 400 district and city governments.	Govt.	Provincial
Local Govt.	Local Government	In charge of planning, enforcement and overall responsibility of service delivery at a local level.	Govt.	Local
PDPAL/PDAM	Utilities	Local government owned utilities providing either water supply or sewerage services or both	Parastatal	Local
Pvt.sector	Private sector	The service delivery is devolved to the private sector. The services rendered by the formal and informal private sector is provision of emptying services, construction of toilets and sanitary facilities.	Private	Local
CBO	Community Based Organisation	Primarily in charge of operation and maintenance of ward level DEWATS that are increasingly being installed.	Community based	Local

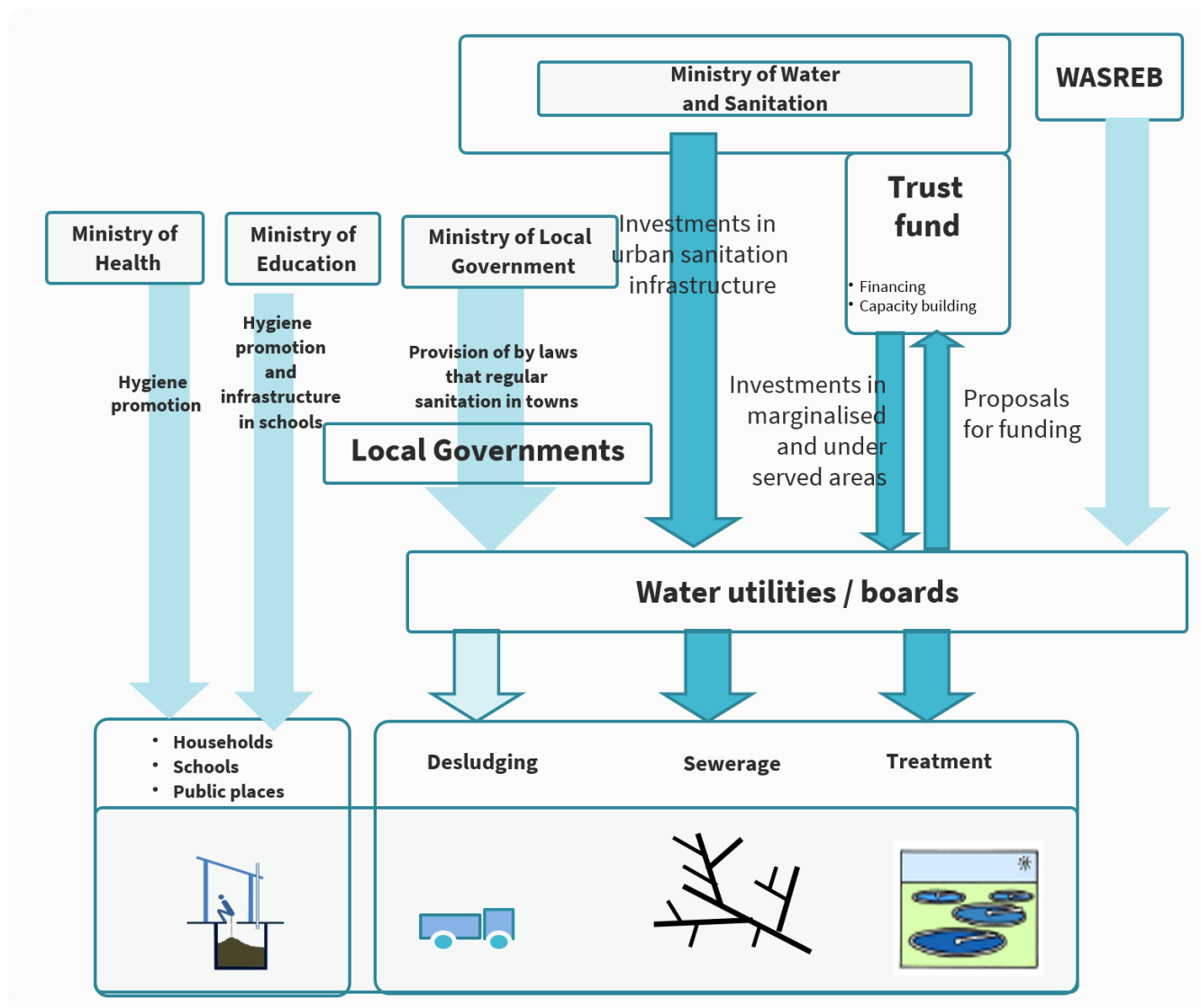
Institutional mapping of the Indonesian sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal collection/ transport	sludge Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoH	Bappenas	Bappenas	Bappenas	Bappenas	Bappenas	Bappenas	Bappenas
Regulations		Bappenas	Bappenas	Bappenas	Bappenas	Bappenas	Bappenas	Bappenas
Financing	MoH	-	MoPW	MoPW	MoPW	MoPW	MoPW	MoPW
Capacity development	MoH	LGs	MoHA	MoHA	MoHA	MoHA	MoHA	MoHA
Developing								
Planning	LGs	Pokja	Pokja	Pokja	Pokja	Pokja	Pokja	Pokja
		LGs	LGs	LGs	LGs	LGs	LGs	LGs
Infrastructure provision	LGs	Households	Pokja	Pokja	Pokja	LGs	MoPW	MoPW
			LGs	LGs	LGs	Private sector		
Sustaining								
Enforcement	LGs	LGs	LGs	LGs	LGs	LGs	LGs	LGs
Asset management	LGs	PDPAL/PDAM	PDPAL/PDAM	PDPAL/PDAM	PDPAL/PDAM	PDPAL/PDAM	PDPAL/PDAM	PDPAL/PDAM
						CBOs		CBOs
Service delivery	LGs	Private sector	Private sector	Private sector	Private sector	PDPAL/PDAM	PDPAL/PDAM	PDPAL/PDAM
						Private sector		
						CBOs	CBOs	CBOs
						LGs/ Pokja		
Monitoring and evaluation	LGs/ Pokja	LGs/ Pokja	LGs/ Pokja	LGs/ Pokja	LGs/ Pokja		LGs/ Pokja	LGs/ Pokja

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Kenya

Organigram of the institutional setup of the Kenyan Urban Sanitation Sector



Brief description of institutions/agencies/authorities: Kenya

Abbreviation of institutions/agencies/authorities	Full title of institutions/agencies/authorities	Main mandates/ roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)	Reference
MoWI	Ministry of Water and Irrigation	Key ministry in charge of the water sector in Kenya. It is mandated with initiating national policies, setting national standards and developing priorities in the water sector. Responsible for monitoring and evaluating the sector development programmes, to review the performance, efficiency and effectiveness of service delivery provided by subordinate agencies. The ministry is also responsible for general sector investments, planning and resource mobilisation.	Government	National	KESH policy 2016-2030 Water Act 2002
MoH	Ministry of Health	MOH is the lead ministry mandated with the development of policies, guidelines, standards and strategies related to sanitation. In charge of promoting household hygiene and sanitation. The Department of Preventive and Promotive Health has the mandate for developing policies, guidelines, standards and strategies related to environmental health that are in line with The Public Health Act. It is also responsible for supporting local governments in the promotion of hygiene and sanitation at a household level.	Government	National	Public Health Act 2012
MoEST	Ministry of Education, Science and Technology	In charge of hygiene promotion and sanitation infrastructure development in schools	Government	National	KESH policy 2016-2030
MoLG	Ministry of Local Government	MoLG supports government's decentralization through Local Government Authorities. Conducts institutional development of local governments through capacity building and revenue management.	Government	National	Local Government Act (Cap. 265)

WSBs	Water Service Boards	Established under the Water Act 2002 section 51(2), WSBs are mandated to ensure efficient and economical provision of water and sewerage services within their areas of jurisdiction. The boards contracts, monitors and enforces agreements with Water Service Providers (WSP) - in line with Water Services and Regulatory Board's (WASREB) regulations - who provide the water and sanitation services on its behalf. Where a WSP cannot be established for economic or social reasons, a WSB provides the services directly.	Governmental	Regional	Water Act 2002 Lake Victoria North Water Services Board website
WSPs	Water Service providers	Responsible for the operation and management of sewerage services. Can include local authority owned companies, NGOs and CBOs.	Governmental or private business	Local	Water Act 2002
LAs	Local Government Authorities	In charge of planning, enforcement and overall responsibility of service delivery at a local level. Setting by-laws and enforcement of regulations within their locality. LAs provide sanitation services either directly or indirectly through government or private companies. WSBs are in charge of the bigger wastewater systems.	Governmental	Local	Local Government Act (Cap. 265)
NEMA	National Environment and Management Council	In charge of environmental protection. Sets limits and standards for environmental pollutions and provides licences.	Semi - Autonomous	National	Environmental Management and Coordination Act 1999 NEMA website
WASREB	Water Services Regulatory Board	Responsible for technical and economic regulation of the water sector in Kenya pursuant to the Water Act 2002.	Parastatal	National	Water Act 2002
WSTF	Water Services Trust Fund	Mandated to provide conditional and unconditional grants to the Counties and to assist in financing the development of and management of water services in the marginalized and underserved areas.	Parastatal	National	Water Act 2002
Private sector	-	The service delivery is devolved to the private sector. The services rendered by the formal and informal private sector is provision of emptying services, construction of toilets, and construction and operation of treatment/disposal facilities.	Private business	Local	

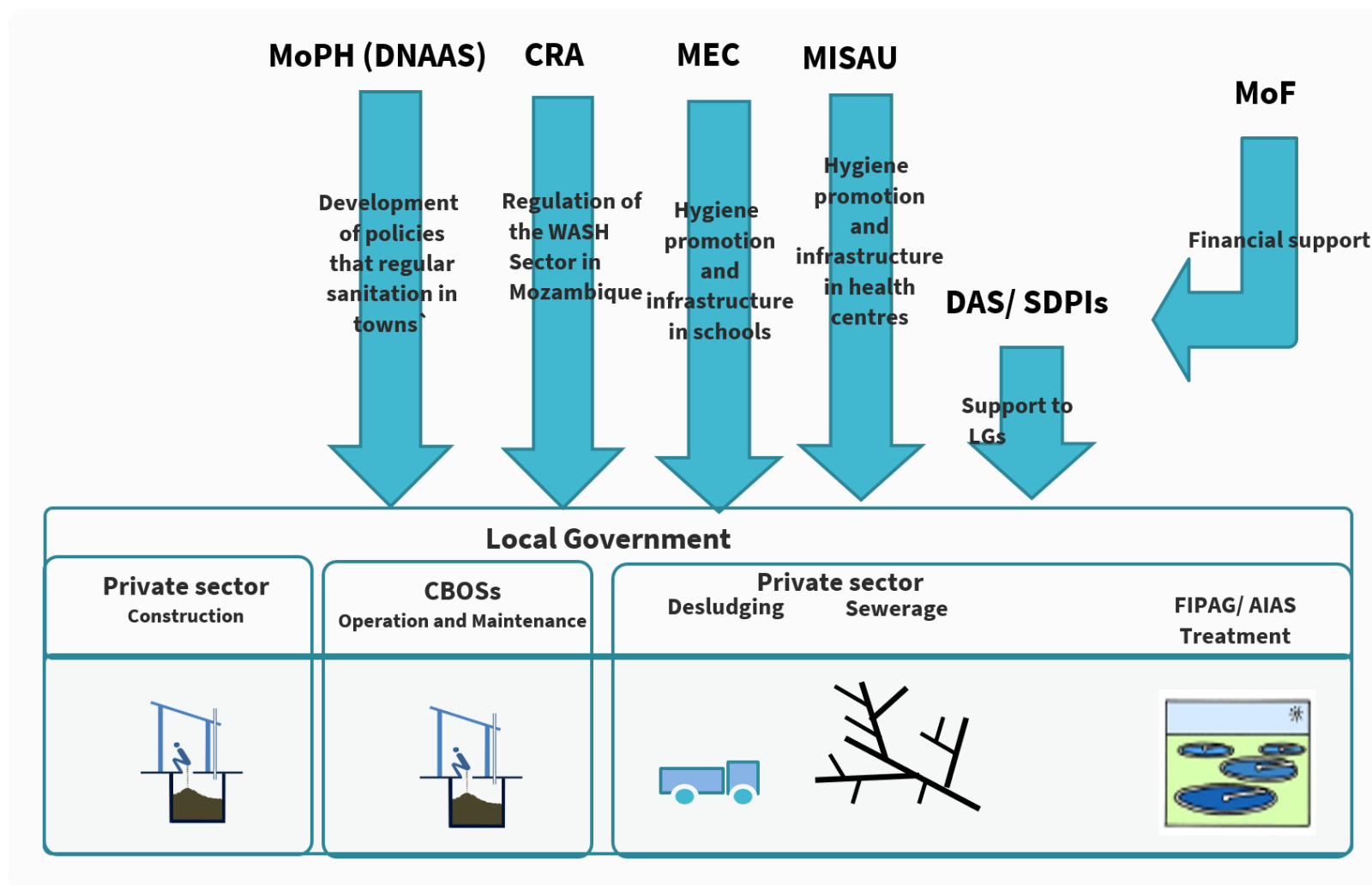
Institutional mapping of the Kenyan sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal collection/ sludge transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoH	MoH/ MoWI	MoH/MoEST	MoH	MoWI/MoH	MoWI	MoWI	MoWI
Regulations	MoH	WASREB	MoEST	MoH	WASREB	WASREB	WASREB/NEMA	NEMA
Financing	MoH	WSTF	MoEST	MoH	WSTF	Private sector (F)	WSTF	WSTF
						WSTF		
Capacity development	MoH	MoH	MoH	MoH	MoH	MoWI	MoWI	MoWI
Developing								
Planning	LAs	LAs	LAS	LAs	LAs	LAs	WSBs	WSBs
Infrastructure provision	MoH	HH	MoEST	MoH	MoWI	Private sector (I)	WSPs/ WSBs	WSPs/ WSBs
		WSTF			WSPs	Private sector (F)		
Sustaining								
Enforcement	LAs	LAs	LAs	LAs	LAs	WSPs/ WSBs	WSPs/ WSBs	WSPs/ WSBs
						LAs		
Asset management	LAs	HH	Schools	Health centres	LAs	Private sector (F)	WSPs/ WSBs	WSPs/ WSBs
Service delivery	LAS	Private sector (I)	Private sector (F)	Private Sector (F)	Private Sector (F)	Private sector (I)	WSPs/ WSBs	WSPs/ WSBs
						Private sector (F)		
Monitoring and evaluation	LAs	WASREB	LAs	LAs	WASREB	WASREB	WASREB	NEMA
								WASREB

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Mozambique

Organigram of the institutional setup of the Mozambican Urban Sanitation Sector



2. Brief description of institutions/agencies/authorities: Mozambique

Abbreviation of institutions/agencies /authorities	Full title of institutions/agencies/ authorities	Main mandates/roles/ responsibilities	Type of organisation (governmental, parastatal, private)	Operational levels (National/ regional/ local)
MoPH	Ministry of Public Works and Housing/ Ministério das Obras Públicas e Habitação	Ministry of Public Works, Housing and Hydric Resources, represented by the National Directorate of Water Supply and Sanitation/ <i>Direcção Nacional Abastecimento de Agua e Saneamento</i> (DNAAS) is the government entity responsible for steering and controlling all the activities related to water supply and provision of sanitation to the population, and management of water resources in the country. That is policy setting, developing national priorities and plans, and monitoring and evaluating sector performance	Government	National
CRA	Water Regulatory Council/ Conselho de Regulação do Abastecimento de Água	The Water Regulatory Council's mission is "to ensure a balance between the quality of the service for water supply and sanitation, the interests of consumers and the financial sustainability of the water supply systems." It does so by approving tariffs, setting service quality targets, monitoring compliance with the targets, reviewing investment programs and hearing complaints by users and municipalities. Additionally, CRA is also involved in regulating the sanitation sector as a major agent by their involvement in major stakeholder discussion platforms	Parastatal	National
DAS	Provincial Water and Sanitation Department/ Departamento de Água e Saneamento	In Mozambique there are National, Provincial, District and Municipal levels. At the provincial level, the entity responsible for water and sanitation is the Directorate of Public Works and Housing. DPOPH hosts the Water and Sanitation Department (DAS) and is the entity charged with the responsibilities of implementing the sector policies, coordinating and supervising the activities of the sector in the province	Government	Provincial
FIPAG	Water Supply Investment and Asset Fund/ Fundo de Investimento e Património do Abastecimento de Água	Asset holder and operator of services of major city water supplies and sanitation systems (including public bathrooms and drainage). FIPAG is the owner of water and sewerage assets in 13 cities also providing supply services. Funding comes from central government, donor projects and fees. In the Maputo Region the company Águas da Região de Maputo (Waters of the Maputo Region) operates the public water and sewer system under contract with FIPAG. ARM is majority-owned by FIPAG (73%) with a minority owned by the private Mozambican holding company Mazi. In the remaining cities, public municipal water departments operate and maintain the systems.	Parastatal	National

AIAS	Water and Sanitation Infrastructure Management Unit/ Administração de Infra-estruturas de Abastecimento de Água e Saneamento	AIAS is the asset manager and operator for urban sanitation and secondary towns water supply	Parastatal	National
LGs	Local Governments/ Governos Locais	Local Governments. Includes provincial, municipal and district authorities. These 10 provinces, 43 municipalities, and 128 districts (all have urban areas) have some level of responsibility, like local planning, budgeting, monitoring and enforcement for water supply and sanitation activities	Government	Depending
SDPIs	District Service for Planning and Infrastructure/ Serviço Distrital de Planeamento e Infra-estrutura	At the district level, the Services of Planning and Infra-structures executes the policies, plans and programs of the central, provincial and district levels.	Government	Regional
MEC	Ministry of Education and Culture/ Ministério da Educação e da Cultura	Sanitation and health activities within schools are the responsibility of the Ministry of Education. It also provides and maintains school sanitation infrastructure.	Government	National
MISAU	Ministry of Health/ Ministério da Saúde	The Ministry of Health sector is responsible for promoting education on hygiene and health.	Government	National
MoF	Ministry of Finance/ Ministério das Finanças	Finance for sector activities come from the Ministry of Finance	Government	National
UGs	User Groups	User Groups that operate and maintain water and sanitation infrastructure in small-towns.	Community	Local
SSIPs	Small- scale Independent Providers	Currently supplying a high percentage of water users, producing latrine slabs, and providing pit emptying services, primarily in urban areas	Private Sector	Local

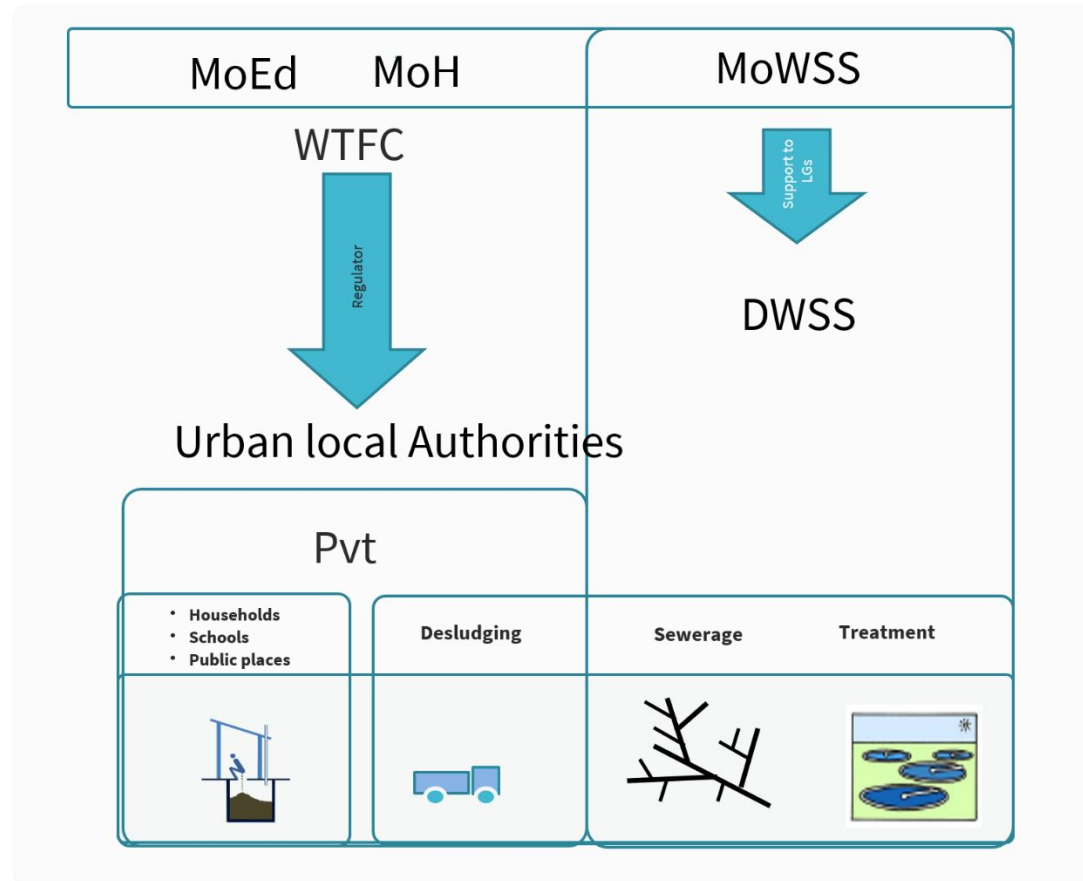
Institutional mapping of the Mozambican sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Containment				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MISAU	MoPH (DNAAS)/ MISAU	MEC	MISAU	MoPH	MoPH	MoPH	MoPH
Regulations	MISAU	CRA	CRA	CRA	CRA	CRA	CRA	CRA
Financing	MISAU	Not know	MEC	MISAU	MoPH	Private sector (F)	MoPH	MoPH
						Private sector (I)		
Capacity development	MISAU/ MEC	LGs	MEC	MISAU	LGs	Not known	MoPH	MoPH
Developing								
Planning	LGs	LGs	LGs	LGs	LGs	LGs	LGs	LGs
Infrastructure provision	MISAU	Households	MEC	MISAU	MoPH (DNAAS)	MoPH (DNAAS)	MoPH (DNAAS)	MoPH (DNAAS)
			LGs	LGs	LGs	Private sector (F)	LGs	LGs
						Private sector (I)		
Enforcement	LGs	LGs	LG	LG	LG	LG	LG	LG
Asset management	LGs	Households	Schools	Health centres	LGs	Private sector (F)	FIPAG/ AIAS	FIPAG/ AIAS
						Private sector (I)		
Service delivery	LGs	Private sector (F)	Private sector (F)	Private sector (F)	Private sector (F)	Private sector (F)	FIPAG/ AIAS	FIPAG/ AIAS
		Private sector (I)				CBOs		
Monitoring and evaluation	LGs	CRA	CRA	CRA	CRA	CRA	CRA	CRA
		LGs	LG	LG	LG	LG	LG	LG

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Nepal

Institutional setup



Brief description of institutions/agencies/authorities: Nepal

Abbreviation of institutions/agencies /authorities	Full title of institutions/agencies/ authorities	Main mandates/roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
MoWSS	Ministry of Water Supply and Sanitation	Lead ministry responsible for formulating policy, planning and monitoring of the WASH sector.	Government	National
DWSS	Department of Water Supply and Sewerage	Under the MoWSS, the department has the responsibility of planning, implementation, operation, repair and maintenance of water supply and sanitation systems throughout the country. It is the lead implementing agency of the WASH sector. DWSS has offices at the national, 5 regions, and Divisional/Sub-divisional offices throughout 75 districts in the country.	Government	National
MoHP	Ministry of Health and Population	Its main role on WASH is to promote health and hygiene	Government	National
MoE	Ministry of Education	Responsible to promote WASH in educational institutions and develop curriculum and educational practices on WASH services	Government	National
WTFC	Water Tariff Fixation Commission	Regulatory body for the urban water and sanitation services delivery.	Autonomous	National
LG	Local government/ Municipalities	Responsible for enforcement and coordination	Government	National
Pvt	Private sector	Responsible for service delivery and asset management	Private	Local

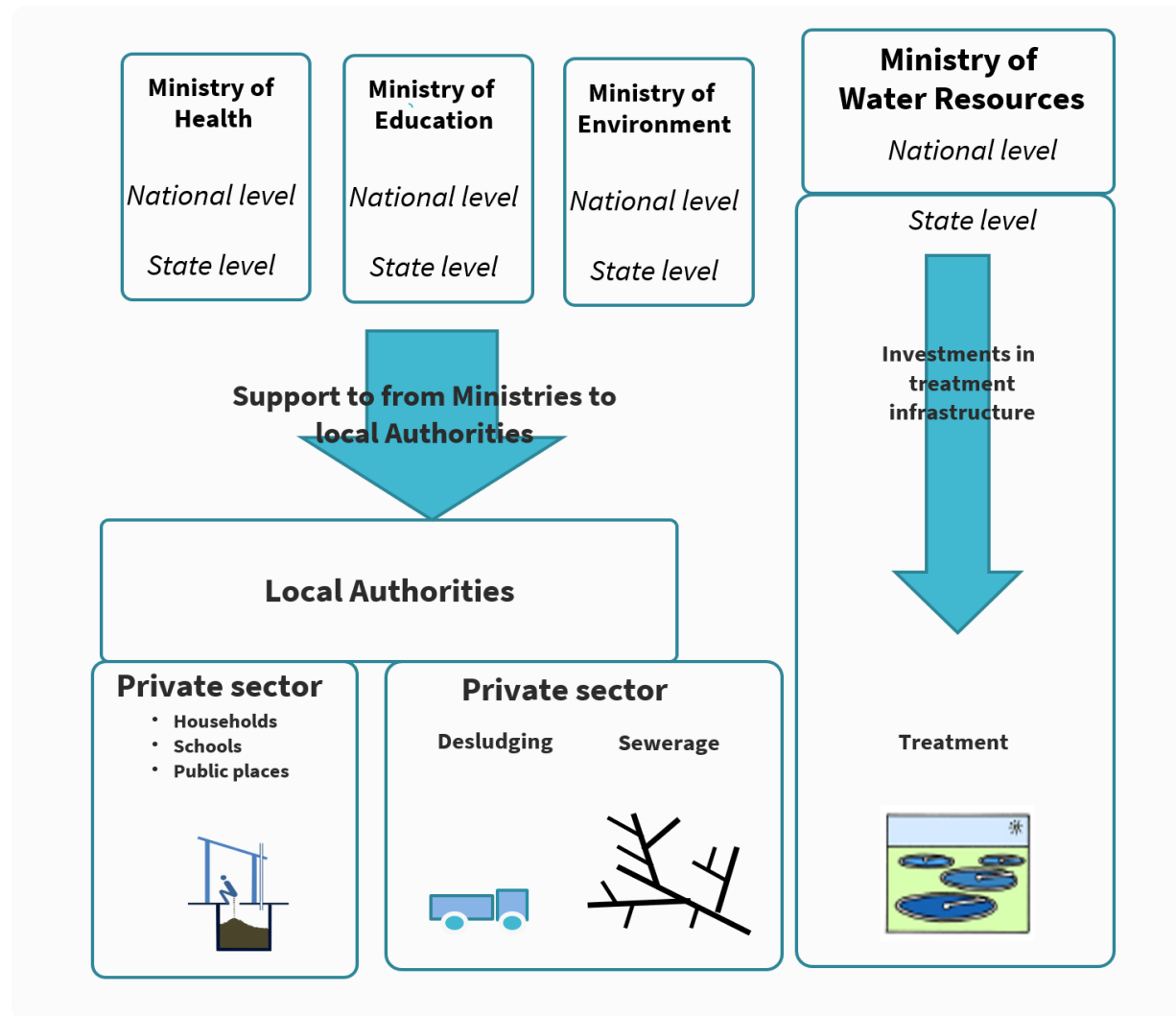
Institutional mapping of the Nepal sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Containment				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoHP	MoWSS	MoE	MoHP	MoWSS	MoWSS	MoWSS	MoWSS
Regulations	MoHP	WTFC	WTFC	WTFC	WTFC	WTFC	WTFC	WTFC
Financing	MoHP	-	MoE	MoHP	MoWSS	MoWSS	MoWSS	MoWSS
Capacity development	MoHP	MoWSS	MoE	MoHP	MoWSS	MoWSS	MoWSS	MoWSS
Developing								
Planning	MoHP	DWSS	MoE	MoHP	DWSS	DWSS	DWSS	DWSS
Infrastructure provision	MoHP	HH	MoE	MoHP	DWSS	DWSS	DWSS	DWSS
Sustaining								
Enforcement	LGs	LGs	LGs	LGs	LGs	LGs	LGs	LGs
Asset management	LGs	HH	Schools	Health centres	LGs	DWSS	DWSS	DWSS
Service delivery	LGs	Pvt (I)	Pvt	Pvt	Pvt	Pvt (I)	DWSS	DWSS
		Pvt (F)				Pvt (F)		
Monitoring and evaluation	MoHP	MoWSS	MoWSS	MoWSS	MoWSS	MoWSS	MoWSS	MoWSS

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Nigeria

Organigram of the institutional setup of the Nigerian Urban Sanitation Sector



Brief description of institutions/agencies/authorities involved in urban sanitation: Nigeria

Abbreviation of institutions/agencies/authorities	Full title of institutions/agencies/authorities	Main mandates/roles/responsibilities	Type of organisation	Operational levels (National/ regional/ local)
MoWR/ MoE	Ministry of Water Resources/ Ministry of Environment	Largely responsible for policy guidance in urban sanitation.	Government	National
sMoWR	State ministry of Water Resources	State Ministries of Water Resources oversee sanitation in urban settlements. Responsible for policy setting at the provincial/state level. Oversees implementation and channels financing to infrastructure provision. Responsible, via the State Water Agencies, for the establishment, operation, quality control, and maintenance of urban, and semi-urban water supply systems and where ever sewer networks exist, responsible of wastewater management.	Government	Provincial/state level
MoH	The Ministry of Health	Lead agency for community sanitation and hygiene. Implementation is via the state departments of the ministry (sMoH)	Government	National
MoEd	Ministry of Education	Responsible for school hygiene programs. Implementation is via the state departments of the ministry (sMoE)	Government	National
LGs	Local government departments for Water and Environmental Sanitation	Established within local governments to oversee the delivery of water and sanitation services, and provide support to communities in the facilities' management, sanitation promotion, and hygiene education. There is a lack of clarity with which departments (state and municipal govt.) are responsible faecal sludge management.	Government	Local
Pvt.	Pvt Sector	The services rendered by the formal and informal private sector is provision of emptying services, construction of toilets and sanitary facilities.	Private enterprise	Local

Note: In Nigeria, the urban sanitation sector is complex with most roles and responsibilities not clearly marked out, which causes either grey areas for mandates. In principal, the state ministries are responsible for policy setting, and providing water supply and sanitation services in urban settlements via the departments, but there is a lack of clarity with which departments (state and municipal govt.) are responsible faecal sludge management. Wastewater, where is sewer network in present, is the responsibility of the state water agency, but most urban settlements in Nigeria rely on on-site sanitation systems. The emptying services are provided by the private sector, but majority of the sludge is either discharged (approved or unapproved) into dumpsites and illegally into water bodies.

Since state governments are responsible for policy setting and service provision, the level of sector development amongst the states vary considerably and with inconsistent state policies and regulations. An overall national institutional and regulatory framework for urban sanitation is missing.

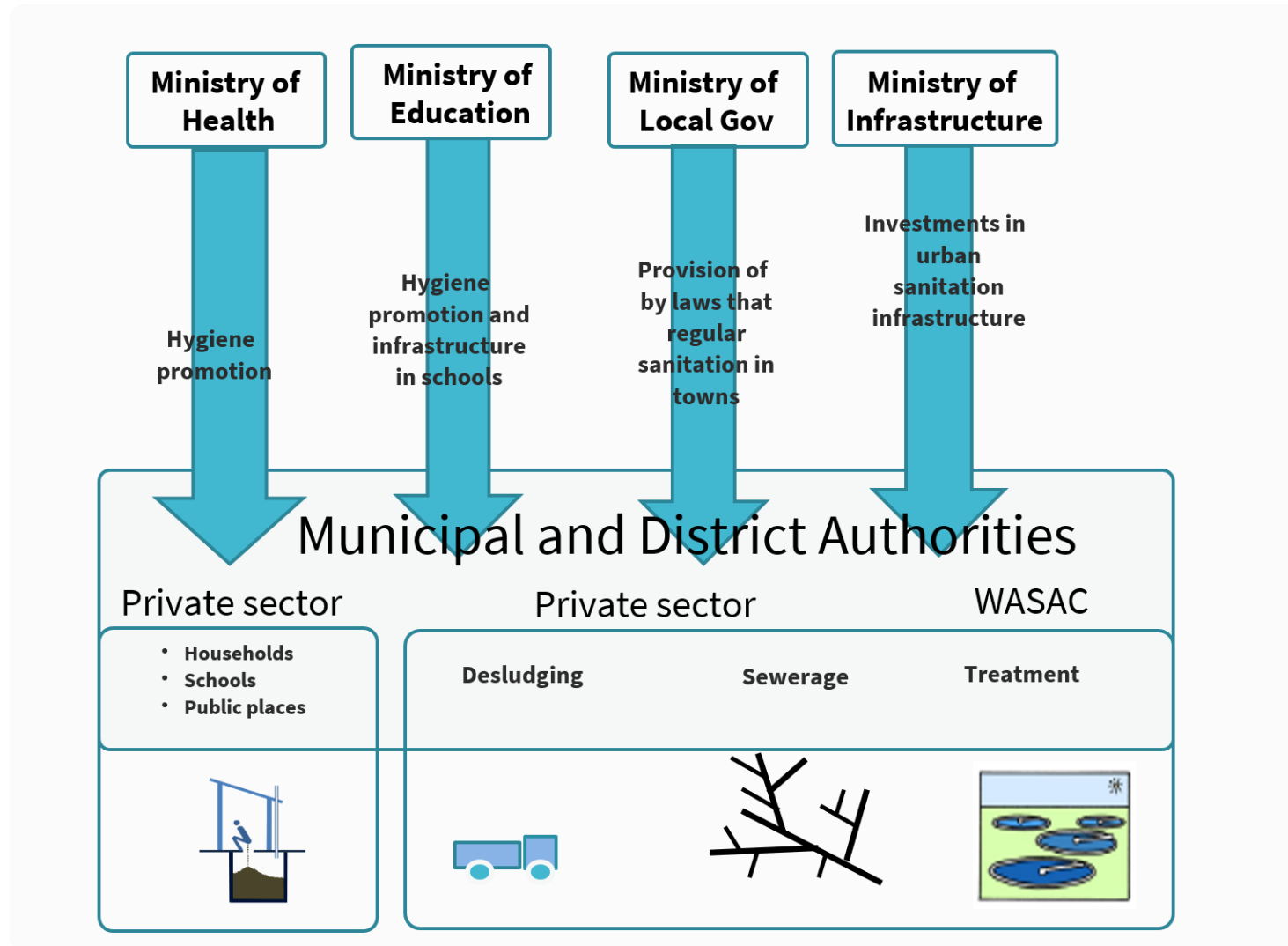
Institutional mapping of the Nigerian sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal collection/ transport	sludge Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoH/ sMoH	MoWR/sMoWR/ MoE/sMoE	MoE/ sMoEd	MoH/ sMoEd	MoWR/sMoWR	MoWR/sMoWR	MoWR/sMoWR	MoWR/sMoWR (wastewater)
Regulations	No information	No information	No information	No information	No information	No information	No information	No information
Financing	MoH	No information	MoE	MoH	MoWR/sMoWR	Pvt (I) Pvt (F)	MoWR/sMoWR	MoWR/sMoWR (wastewater)
Capacity development	No information	No information	No information	No information	No information	No information	No information	No information
Developing								
Planning	sMoH	MoWR/sMoWR	sMoE	sMoH	MoWR/sMoWR	sMoWR	sMoWR	MoWR/sMoWR (wastewater)
	LGs	LGs	LGs	LGs	LGs	LGs	LGs	LGs
Infrastructure provision	LGs	HH	LGs	LGs	LGs	Pvt (F)	sMoWR	MoWR/sMoWR (wastewater)
Sustaining								
Enforcement	LGs	LGs	LGs	LGs	LGs	LGs	LGs	LGs
Asset management	LGs	HH	Schools	Health facilities	LGs	Pvt (I) Pvt (F)	sMoWR	MoWR/sMoWR (wastewater)
						Pvt (I) Pvt (F)		
Service delivery	LGs	Pvt (I)	Pvt(F)	Pvt(F)	Pvt(F)	Pvt (I) Pvt (F)	sMoWR	MoWR/sMoWR (wastewater)
Monitoring and evaluation	sMoH	sMoH	sMoE	sMoH	MoWR/sMoWR	No information	sMoWR	MoWR/sMoWR (wastewater)

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Rwanda

Organigram of the institutional setup of the Rwandan Urban Sanitation Sector



Brief description of institutions/agencies/authorities: Rwanda

Abbreviation of institutions/agencies /authorities	Full title of institutions/agencies/ authorities	Main mandates/roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
MININFRA	Ministry of Infrastructure	Lead ministry in the provision of (water and) sanitation services in Rwanda. Responsible for the development of national policies, guidelines and strategies for the sanitation sector. Improving institutional and human resource capacity of districts. Monitoring and assessing the implementation of national policies and programs related to sanitation. Support and supervise the development of sanitation infrastructure by the districts.	Government	National
MoH	Ministry of Health	Offers preventive, curative and rehabilitation services. Supports MININFRA in promoting hygiene in households through the national Community-Based Environmental Health Promotion Programme (CBEHPP).	Government	National
MINEDUC	Ministry of Education	Responsible for hygiene promotion and sanitation provision in schools.	Government	National
MINALOC	Ministry of Local Government	Responsible for the decentralisation process through the districts. Supervise and monitor local institutions to ensure that they contribute to effective service delivery, targeting community and social economic development. Funds small scale sanitation projects		National
Districts		Mandate of planning, enforcement and provision of sanitation services for their populations. Setting by-laws and enforcement of regulations related to sanitation at the local level.	Governmental	Local

REMA	Rwanda Environmental Management Agency	Mandated for environmental protection in Rwanda. Sets limits and standards for environmental pollutions.	Parastatal	National
WASAC	Water and Sanitation Corporation	In charge of the provision of water and sanitation services in urban areas. In households, responsible for development, evaluation and support of adequate technical sanitation solutions.	Parastatal	National
MVK	Kigali town municipality	Similar responsibility as DISTRICTS but operational in Kigali only.	Semi-Autonomous	Local (Kigali only)
RURA	Rwanda Utilities Regulatory Agency	Responsible for the regulation of telecommunications networks and/or telecommunications services, electricity, water, sanitation (solid waste management, wastewater treatment and cleaning services), transport of persons and goods, and other public utilities, if deemed necessary. RURA regulates sanitation service provision through establishing the required regulatory tools, licensing sanitation service provision, monitoring compliance to the licences issued and analyse reports of sanitation service providers.	Parastatal	National
Private sector	-	The service delivery is devolved to the private sector. The services rendered by the formal and informal private sector is provision of emptying services and sanitary facilities.	Private business	Local

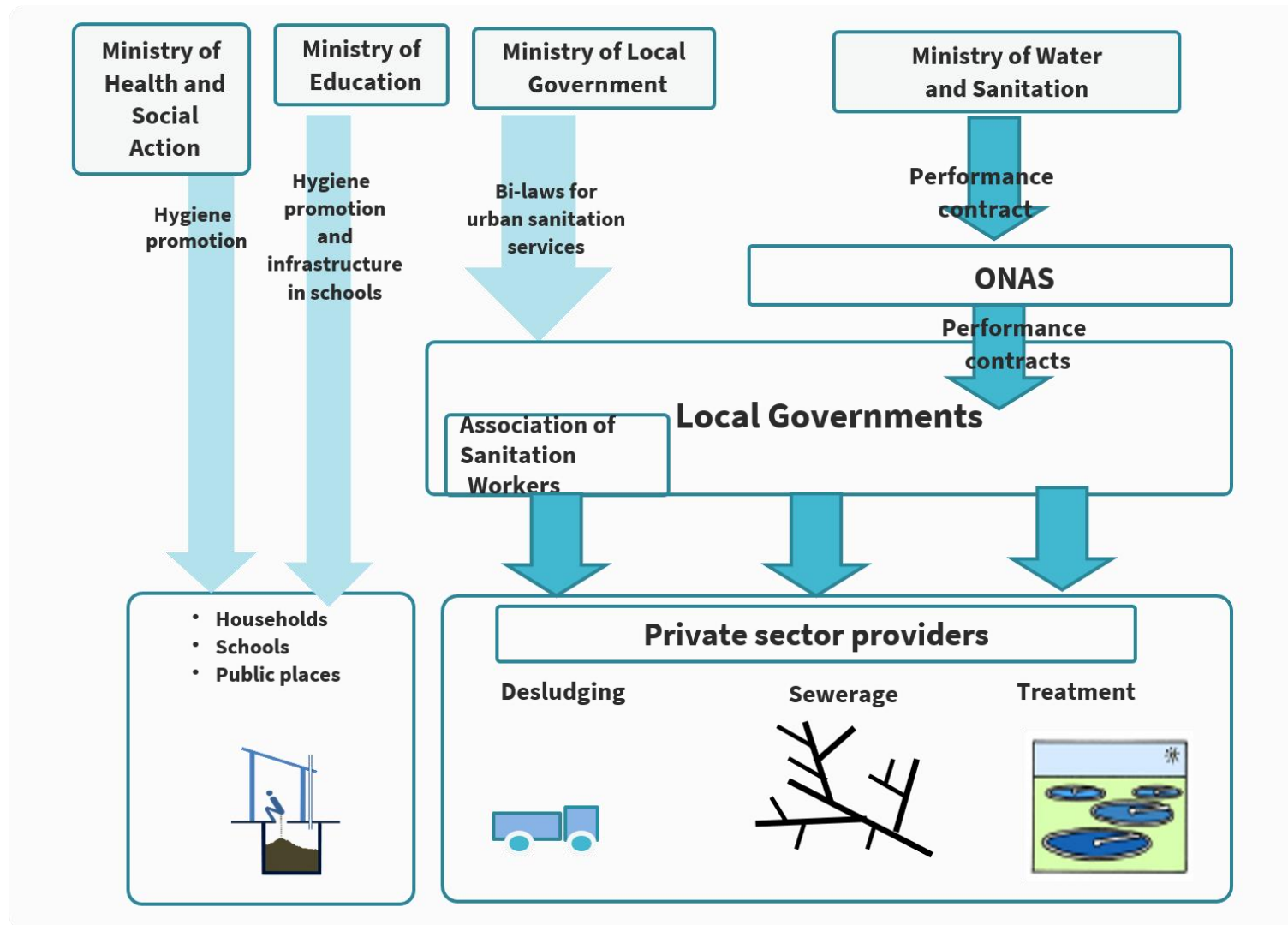
Institutional mapping of the Rwandese sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal collection/ transport	sludge Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoH/MININFRA	MININFRA	MININFRA	MININFRA	MININFRA	MININFRA	MININFRA	MININFRA
Regulations	MoH	MINALOC	MINEDUC	MoH	MINALOC	Not know	Not know	REMA RURA
Financing	MoH	-	MINEDUC MININFRA	MoH	MININFRA	Private sector (F)	MININFRA	MININFRA
Capacity development	MoH	MININFRA	MVK/Districts	MoH	MININFRA	MININFRA	MININFRA	MININFRA
Sustaining								
Planning	MoH	Districts	MINEDUC	MoH	MVK/ Districts	Districts	MININFRA	MININFRA
						MININFRA	WASAC	WASAC
Infrastructure provision	Private sector (F)	HH	MINEDUC	MoH	MININFRA	Private sector (I)	MININFRA	MININFRA
						Private sector (F)		
						Districts/MVK		
Sustaining								
Enforcement	Districts	Districts	Districts	Districts	Districts	REMA	REMA	REMA
						Districts		
Asset management	Districts	HH	Schools	Health centres	Private Sector (I)	Private sector (F)	WASAC	WASAC
Service delivery		Private sector (I)	Private sector (F)	Private Sector (F)	Private Sector (F)	Private sector (F)	WASAC	WASAC
Monitoring and evaluation	Districts	Districts	Districts	Districts	Districts	REMA	REMA	REMA

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Senegal

Organigram of the institutional setup of the Senegalese Urban Sanitation Sector



Brief description of institutions/agencies/authorities: Senegal

Abbreviation of institutions/agencies/authorities	Full title of institutions/agencies/authorities	Main mandates/roles/responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/regional/local)
MHA	Ministry of Hydraulics and Sanitation/ Ministère de l'Hydraulique et de l'Assainissement.	MHA is the government entity responsible for steering and controlling all the activities related to water supply and provision of sanitation to the population, and management of water resources in the country. Sanitation is managed by the Directorate for Sanitation.	Government	National
MSAS	Ministry of Health and Social Action / Ministère de la Santé et de l'Action sociale	MSAS has the mission to implement the policy in matters of Health and Social Action. Under authorities of the MSAS, main mandates of the Service National de l'Hygiène (SNH) are to prepare and operationalize public health policies concerning hygiene, educate population on hygiene and sanitation related aspects, enforce hygiene regulations in urban and rural areas.	Government	National
ME	Ministry of Education / Ministère de l'Éducation	Sanitation and health activities within schools are the responsibility of the Ministry of Education. It also provides and maintains school sanitation infrastructure through the Direction des équipements scolaires (DES).	Government	National
MGLAT	Ministry of Local Governance for Development and Regional Planning / Ministère de la Gouvernance Locale du Développement et de l'Aménagement du Territoire	The (MGLDAT) is in charge of the preparation and implementation of the Senegalese policy on decentralization, local development, support and control of local communities.	Government	National
ONAS	Office National de l'Assainissement du Sénégal/ National Office of Satiation of Sénégal	Under the authority of the MHA, Office National de l'Assainissement du Sénégal (ONAS) is the national sanitation authority in Senegal. ONAS is responsible for the collection, treatment, recovery and disposal of wastewater, faecal sludge and rainwater in urban and peri-urban areas It is a utility providing services to customers connected to both on-site and sewerage systems.	Parastatal	National/Local

AAAS	Association of Senegalese Sanitation Workers (pit emptiers) / Association des Acteurs de l'Assainissement du Sénégal	Role of the association is to increase membership, centralize resources, register and map domestic sanitation, create a consumer database, map desludging services, make capital improvements and manage fecal sludge. ONAS engages the association to monitor FS emptying, planning of treatment plants, and call center operations	Private	National/Local
CL	Local autorités / Collectivités locales	In urban settings, local authorities are responsible for providing sanitation services areas where ONAS is not present.	Governmental	Local
PS	Private sector / Secteur Privé	Provide pit emptying services primarily in urban areas, manage small scale sewerage systems, manage treatment plants in partnerships with municipalities and ONAS	Private	Local

Institutional mapping of the Senegalese sanitation sector according to functional attributes:

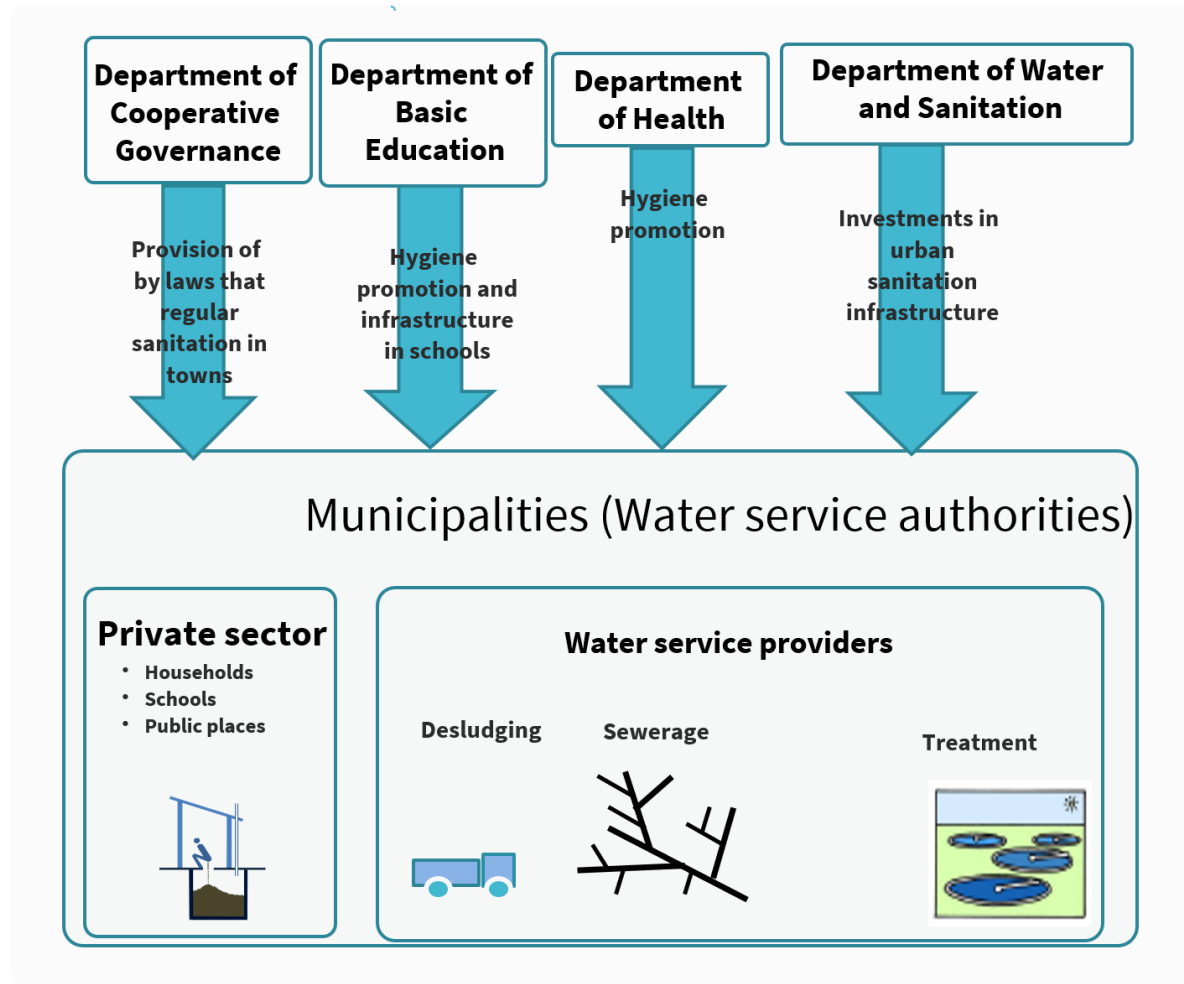
Functional attributes	Behavioural aspects	Containment				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	SNH - MSAS	MHA	MoE	MSAS	MWDSEP	MWDSEP	MWDSEP	MHA
Regulations	SNH - MSAS	MHA	MoE	MSAS	MHA	MHA	MHA	MHA
Financing	SNH – MSAS	HH	MoE	MSAS	LCs	HH	ONAS	ONAS
		ONAS			CBOs?			
Capacity development	SNH - MSAS	MHA	MoE	MSAS				
Developing								
Planning	SNH - MSAS	LCs	MoE	MSAS	LCs	ONAS	ONAS	ONAS
							LCs	
Infrastructure provision	SNH - MSAS	HH	MoE	MSAS	LCs	ONAS	ONAS	ONAS
						Pvt sector F / AAAS		
Sustaining								
Enforcement	SNH - MSAS	MHA, MSAS...	MoE	MSAS	LCs	ONAS	ONAS	ONAS
		LCs				LCs	LCs	
Asset management	SNH - MSAS	HH	Schools	Health facilities	LCs	Pvt sector F AAAS	LCs	LCs
						ONAS	ONAS	
Service delivery	SNH - MSAS	Pvt sector F	Pvt sector F	Pvt sector F	LCs	Prt sector F AAAS	Prt sector F	Prt sector F
						ONAS	ONAS	
Monitoring and evaluation	SNH - MSAS	ONAS	MoE	MSAS	LCs	ONAS	ONAS	ONAS
		LCs			MHA			

NB: In Senegal, there is no independent regulator for the water and sanitation sector. Regulation is done via service contracts managed by ONAS under ministry's authority.

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

South Africa

Organigram of the institutional setup of the South African Urban Sanitation Sector



Brief description of institutions/agencies/authorities: South Africa

Abbreviation of institutions /agencies /authorities	Full title of institutions/ agencies/ authorities	Main mandates/ roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
DWS	Department of Water and Sanitation	Principal ministry in charge of water and sanitation in South Africa. It is mandated with initiating national policies, setting national standards and guidelines, standards and strategies related to sanitation. Responsible for monitoring and evaluating the sector development programmes, to review the performance, efficiency and effectiveness of service delivery provided by subordinate agencies. The ministry is also responsible for general sector investments, planning and resource mobilisation.	Government	National
DoH	Department of Health	DoH is responsible for supporting local governments in the promotion of hygiene and sanitation at a household level. DoH is also responsible for sanitation provision in public healthcare facilities.	Government	National
DBE	Department of Basic Education	In charge of hygiene promotion and sanitation infrastructure development in schools	Government	National
DCoG	Department of Cooperative Governance	DCoG supports government's decentralization through provincial authorities and municipalities. Conducts institutional development of local governments through system development, capacity building and revenue management.	Government	National
MCs	Municipalities	Municipalities (MCs) bear the role of Water Service Authorities (WSAs). In charge of planning, enforcement and overall responsibility of service delivery at a local level. Setting by-laws and enforcement of regulations within their locality. MCs provide sanitation services either directly or indirectly	Governmental	Local

		through government or private companies. WBs are in charge of the bulky sanitation infrastructure.		
WSPs	Water Service providers	Responsible for the provision of sanitation services under contract to the WSAs. Can include government companies, NGOs, CBOs or private company.	Governmental/ parastatal or private company	Local
DEA	Department of Environmental Affairs	DEA is mandated for environmental protection in South Africa. Sets limits and standards for environmental pollutions and provides licences.	Government	National
Private sector	-	The service delivery is devolved to the private sector. The services rendered by the formal and informal private sector is provision of emptying services, construction of toilets, and construction and operation of treatment/disposal facilities.	Private business	Local

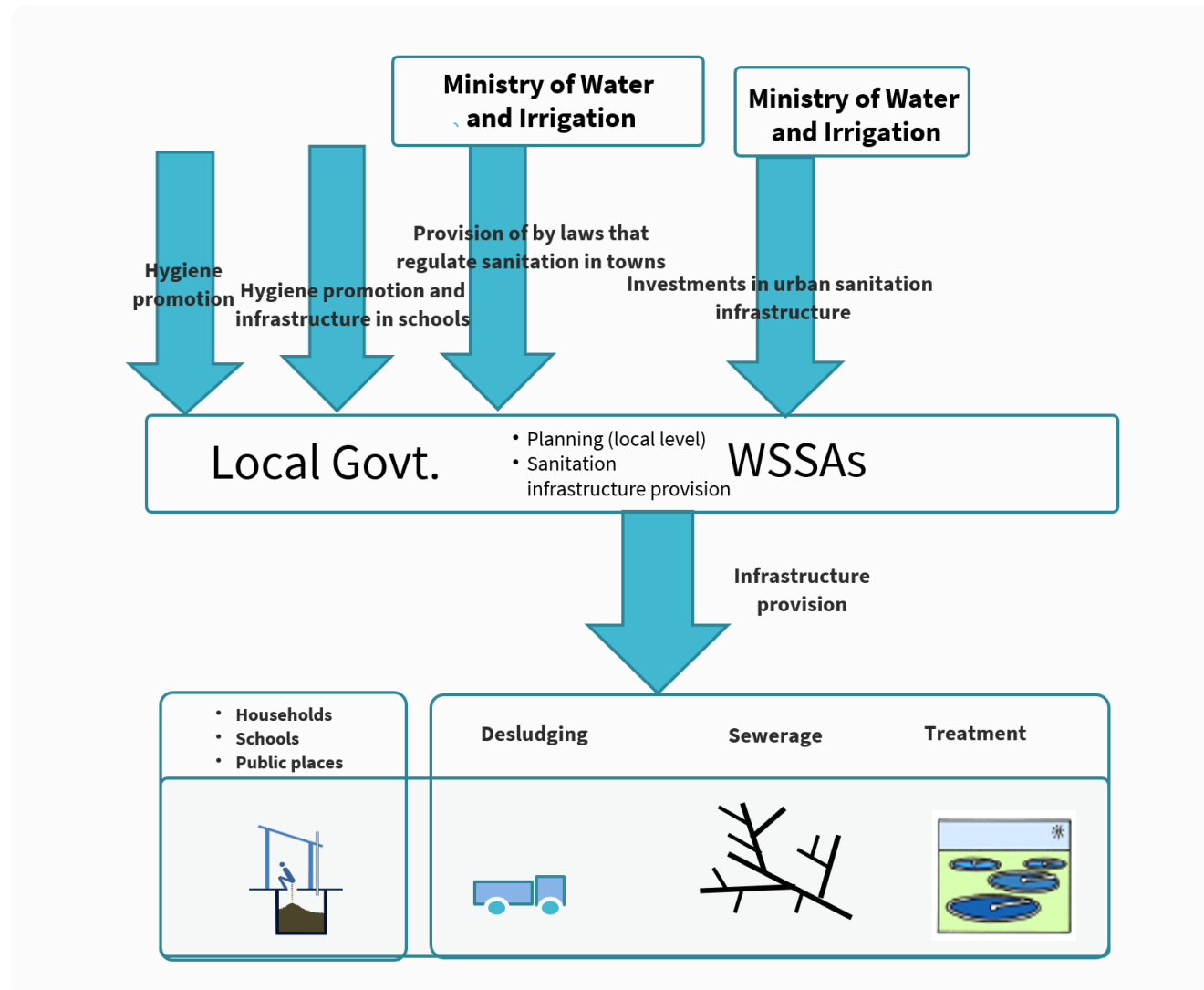
Institutional mapping of the South African sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	DoH	DWS	DWS	DWS	DWS	DWS	DWS	DWS
Regulations	DoH	DCoG	DBE	DoH	DCoG	DWS	DWS	DEA
Financing	DoH	DWS (subsidization and free basic services)	DBE	DoH	DWS	Private sector (F)	DWS	DWS
						DWS		
Capacity development	DoH	DoH	DoH	DoH	DoH	DWS	DWS	DWS
Developing								
Planning	MCs	MCs	MCs	MCs	MCs	MCs	MCs	MCs
							WSP	WSP
Infrastructure provision	DoH	HH	DBE	DoH	DWS	Private sector (I)	WSP	WSP
						Private sector (F)		
						WSP		
Sustaining								
Enforcement	MCs	MCs	MCs	MCs	MCs	WSP	WSP	WSP
						MCs		
Asset management	MCs	HH	Schools	Health centres	MCs	Private sector (F)	WSP	WSP
Service delivery	MCS	Private sector (I)	Private sector (F)	Private Sector (F)	Private Sector (F)	Private sector (I)	WSP	WSP
						Private sector (F)		
						WSP		
Monitoring and evaluation	MCs	MCS	MCs	MCs	MCs	DWS	DWS	DEA
								DWS

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Tanzania

Organigram of the institutional setup of the Tanzanian Urban Sanitation Sector



Brief description of institutions/agencies/authorities: Tanzania

Abbreviation of institutions / agencies / authorities	Full title of institutions/ agencies/ authorities	Main mandates/ roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
MoWI	Ministry of Water and Irrigation	Lead ministry in charge of (water and) sanitation services in Tanzania. It is mandated with initiating national policies, setting national standards and developing priorities in the sector. The ministry is also responsible for monitoring and evaluating the sector development programmes, to review the performance, efficiency and effectiveness of service delivery provided by subordinate agencies. The urban Water Supply and Sanitation Authorities (WSSAs) are regulated by EWURA.	Government	National
MoHCDGEC	Ministry of Health, Community Development, Gender, the Elderly and Children	In charge of promoting household hygiene and sanitation. The Department of Preventive Services and the Department of Policy and Planning within MoHCDGEC, has the mandate for developing policies, guidelines, standards and strategies related to environmental health, that are in line with The Public Health Act. It is also responsible for supporting local governments in the promotion of hygiene and sanitation at a household level.	Government	National
MoEST	Ministry of Education, Science and Technology	Responsible for school sanitation programmes under which the activities such as latrine construction and hygiene education in schools are conducted	Government	National
PO-RALG	President's Office – Regional Administration and Local Government	PO-RALG is the equivalent of Ministry of Local Governments in other countries. Their primary responsibilities are: a) supporting decentralization through capable Regional Administration and Local Government Authorities; b) manage interfaces with MDAs and all key stakeholders; c) promote Urban and Rural Development Policies; d) capacity development; e) deliver equitable quality services to eradicate poverty.	Government	National

WSSAs	Water Supply and Sanitation Authorities	The WSSAs are responsible for developing investments in the water and sanitation sector in Regional Centres, District Headquarters and Townships. The investments in sanitation are primarily carried out for provision of FSM facilities.	Parastatal	Local
LGAs	Local Government Authorities	In charge of planning, enforcement and overall responsibility of service delivery at a local level. Setting by-laws and enforcement of regulations at local level. The (technical aspects) of water supply and sanitation services are a mandated to the WSSAs. Some components of service delivery can be tendered out to private sector as “regulated service provisions”, e.g. registered operators of sludge emptier services (Regulations in progress).	Governmental	Local
NEMC	National Environment and Management Council	In charge of environmental protection. Sets limits and standards for environmental pollutions and provides licences.	Parastatal	National
EWURA	Energy and Water Utilities Regulatory Authority	Responsible for technical and economic regulation of the electricity, petroleum, natural gas and water sectors in Tanzania pursuant to Cap 414 and sector legislation.	Parastatal	National
Private sector	-	The service delivery is devolved to the private sector. The services rendered by the formal and informal private sector is provision of emptying services, (possibly also construction and operation of treatment/disposal facilities)	Private business	Local

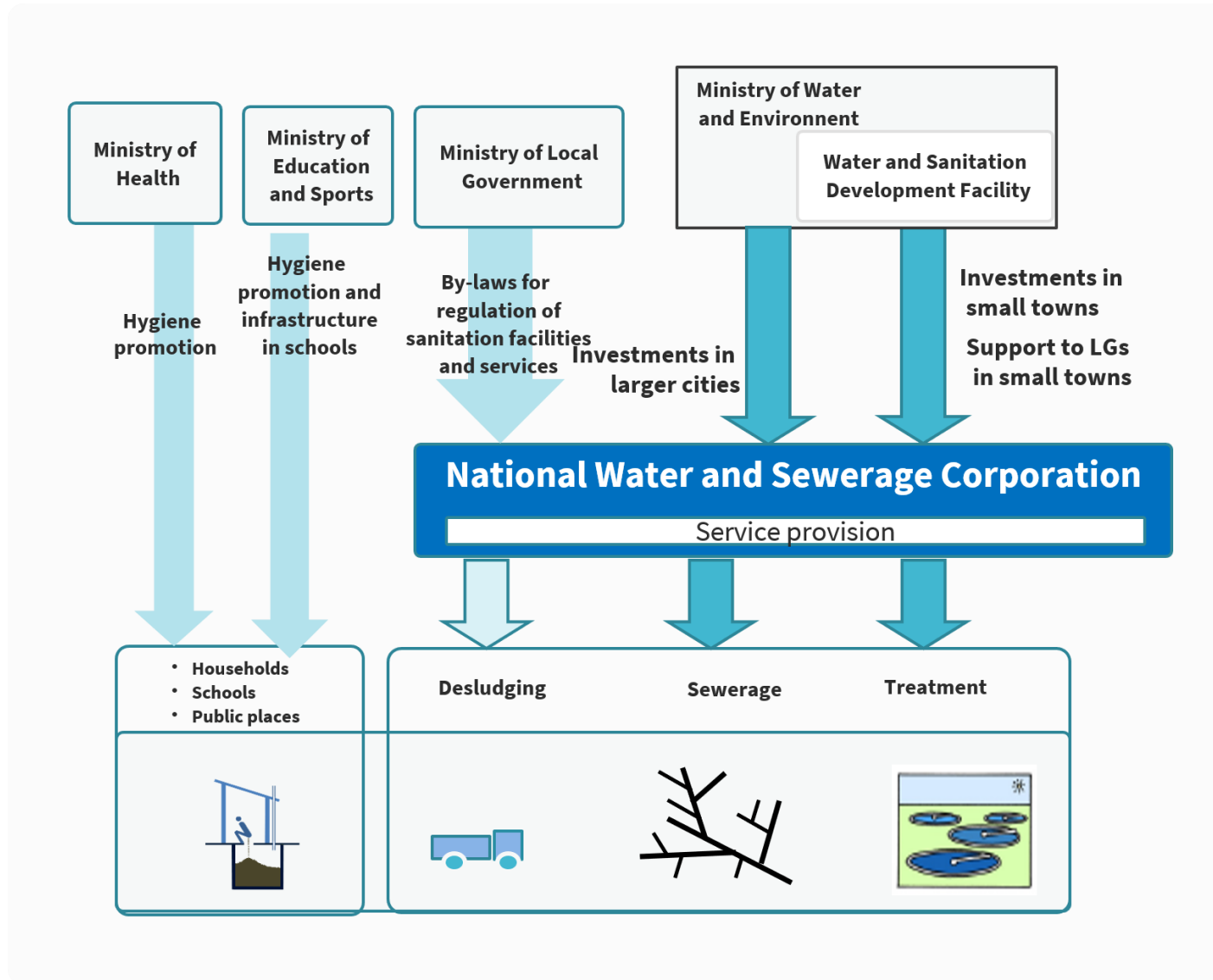
Institutional mapping of the Tanzanian sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoHCDGEC	MoHCDGEC	MoHCDGEC	MoHCDGEC	MoWI	MoWI	MoWI	MoWI
Regulations	MoHCDGEC	PMO-RALG	MoEVT	MoHCDGEC	PMO-RALG	EWURA	EWURA	NEMC
Financing	MoHCDGEC	Not know	MoEVT	MoHCDGEC	MoWI	Private sector (F) MoWI	MoWI	MoWI
Capacity development	MoHCDGEC	MoHCDGEC	MoHCDGEC	MoHCDGEC	MoHCDGEC	MoWI	MoWI	MoWI
Developing								
Planning	LGAs	LGAs	LGA	LGAs	LGAs	LGAs	LGAs	LGAs
							WSSAs/	WSSAs
Infrastructure provision	MoHCDGEC	HH	MoEVT	MoHCDGEC	MoWI	Private sector (I) Private sector (F) WSSA	WSSAs	WSSAs
Sustaining								
Enforcement	LGAs	LGAs	LGAs	LGAs	LGAs	WSSAs LGAs	WSSAs	WSSAs
Asset management	LGAs	HH	Schools	Health centres	LGAs	Private sector (F)	WSSAs	WSSAs
Service delivery	LGA	Private sector (I)	Private sector (F)	Private Sector (F)	Private Sector (F)	Private sector (I) Private sector (F) WSSAs	WSSAs	WSSAs
Monitoring and evaluation	LGAs	LGA	LGAs	LGAs	LGAs	EWURA	EWURA	NEMC EWURA

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Uganda

Organigram of the institutional setup of the Ugandan Urban Sanitation Sector



Brief description of institutions/agencies/authorities: Uganda

Abbreviation of institutions/agencies/authorities	Full title of institutions/agencies/authorities	Main mandates/roles/responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
MoWE	Ministry of Water and Environment	Lead ministry in charge of (water and) sanitation in Uganda. It is mandated with initiating national policies, setting national standards and developing priorities in the sector. The ministry is also responsible for monitoring and evaluating the sector development programmes to review the performance, efficiency and effectiveness of service delivery provided by subordinate agencies	Government	National
MoH	Ministry of Health	In charge of promoting household hygiene and sanitation. The Environmental Health Division (EHD), within the MoH has the mandate for developing policies, guidelines, standards and strategies related to environmental health, that are in line with The Public Health Act. It is also responsible to support local governments in the promotion of hygiene and sanitation at a household level.	Government	National
MoES	Ministry of Education and sports	Responsible for school sanitation programmes under which the activities such as latrine construction and hygiene education in schools are conducted	Government	National
MoLG	Ministry of Local Government	Setting by-laws and enforcement of regulations at local level.		National
WSDFs	Water and Sanitation development facility	The WSDF is a regional organisation that is responsible for developing investments in the water and sanitation sector in small towns and rural growth centres. The WSDF has four regional offices in the North, East, West and Central provinces in Uganda and falls under the MoWE. The investments in sanitation are primarily carried out for public toilets, school toilets and provision of FSM facilities	Government	Regional

LG	Local government	In charge of planning, enforcement and overall responsibility of service delivery at a local level. The service delivery is tendered out to private sector under a performance contract	Governmental	Local
NEMA	National Environment and Management Agency	In charge of environmental protection. Sets limits and standards for environmental pollutions and provides licences.	Parastatal	National
NWSC	National Water and Sewerage Corporation	The NWSC is a parastatal organisation owned 100% by The Government of Uganda and established under the National Water and Sewage Corporation Act (2000). The organisation has the mandate to provide water supply and sewerage services in large towns and currently operates in 40 towns via a performance contract with the MoWE. NWSC's involvement in the sewerage services and undertaking treatment facilities has been lagging behind.	Parastatal	National
KCCA	Kampala Capital City Authority	Has a similar status as the local government, but is independent from the MoLG. KCCA is responsible for planning, implementing, enforcing and monitoring of sanitation in Kampala.	Semi-Autonomous	Local (Kampala only)
Private sector	-	The service delivery is devolved to the private sector. The services rendered by the formal and informal private sector is provision of emptying services, construction of toilets and sanitary facilities.	Private business	Local

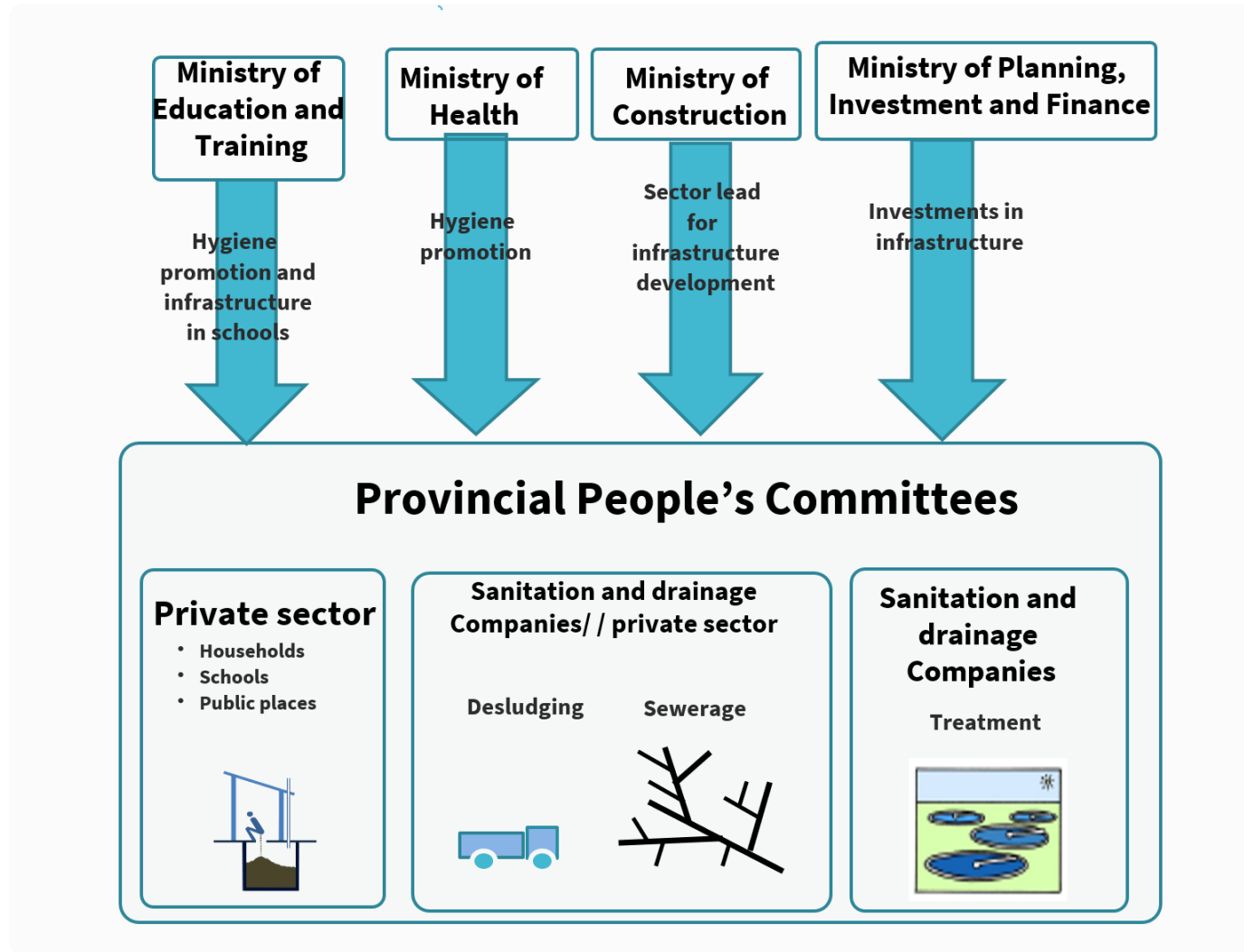
Institutional mapping of the Ugandan sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoH/MoES	MoH	MoH	MoH	MoWE	MoWE	MoWE	MoWE
Regulations	MoH	MoLG	MoES	MOH	Not know	Not know	Not know	NEMA
Financing	MoH		MoES/ MoWE	MoH	WSFD	Private sector (F)	MoWE	MoWE
Capacity development	MoH		-MoWE	MoH		MoWE/WSDF	MoWE	MoWE/WSDF
Developing								
Planning	MoH	LG	MoES	MoH	LG/KCCA	LG	MoWE	MoWE/WSDF
						MoWE/ WSDFs	NWSC	NWSC
Infrastructure provision	Private sector (F)	HH	MoES	MoH	WSDF	Private sector (I)	MoWE	MoWE/WSDF
						Private sector (F)		
						KCCA/LG		
Sustaining								
Enforcement	LG	LG	LG	LG	LG	NEMA	NEMA	NEMA
						LG		
Asset management	LG	HH	Schools	Health centres	Private Sector (I)	Private sector (F)	NWSC	NWSC
Service delivery		Private sector (I)	Private sector (F)	Private Sector (F)	Private Sector (F)	Private sector (F)	NWSC	NWSC
Monitoring and evaluation	LG	LG	LG/	LG	LG	NEMA	NEMA	NEMA

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

Vietnam

Institutional setup of the sanitation sector in Vietnam



Brief description of institutions/agencies/authorities: Vietnam

Abbreviation of institutions/agencies /authorities	Full title of institutions/agencies /authorities	Main mandates/roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
MoC	Ministry of Construction	Lead agency for both urban water supply and sanitation	Government	National
MoPIF	Ministry of Planning, Investment and Finance	Coordinating investment, including managing contribution of external support to the subsector	Government	National
MoH	Ministry of Health	Responsible for Hygiene promotion	Government	National
MoET	Ministry of Education and Training	Responsible for school WASH facilities and hygiene promotion	Government	National
PPCs	Provincial People's Committees	Responsible for planning, development and management of service delivery	Government	Provincial
LAs	Local Authorities	Responsible for enforcement of by-laws and standards	Government	Local
SDC	Sanitation and drainage companies	Water supply, Sanitation and Drainage companies are departments under the PPC and provide service delivery. Most companies are state-owned, while some are public limited companies, but in practice are subject to the authority of the PPCs with regards to tariff control, investment decision, etc. The companies operate under service contracts from the PPCs.	Parastatal	Local
Pvt.	Private sector	On minimum scale and only available in larger cities, the private sector plays a small role in service provision with regards to collection/transport and treatment. The private actors are quite vibrant and developed in the production and supply of sanitary products.	Private	Local

Institutional mapping of the Vietnamese sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Toilets				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoH	MoC	MoC	MoC	MoC	MoC	MoC	MoC
Regulations	MoH	MoC	MoC	MoC	MoC	MoC	MoC	MoC
Financing	MoH		MoET	MoH	MoPIF	MoPIF	MoPIF	MoPIF
Capacity development	-	-	-	-	-	-	-	-
Developing								
Planning	PPCs	PPCs	MoHT	MoH	PPCs	PPCs	PPCs	PPCs
Infrastructure provision	PPCs	PPCs	MoHT	MoH	PPCs	PPCs	PPCs	PPCs
Sustaining								
Enforcement	LAs	LAs	LAs	LAs	LAs	LAs	LAs	LAs
Asset management	PPCs	Households	MoET	MoH	SDC	SDC	SDC	SDC
Service delivery	PPCs	Pvt	Pvt	Pvt	SDC	SDC Pvt	SDC	SDC
Monitoring and evaluation	PPCs	PPCs	PPCs	PPCs	PPCs	PPCs	PPCs	PPCs

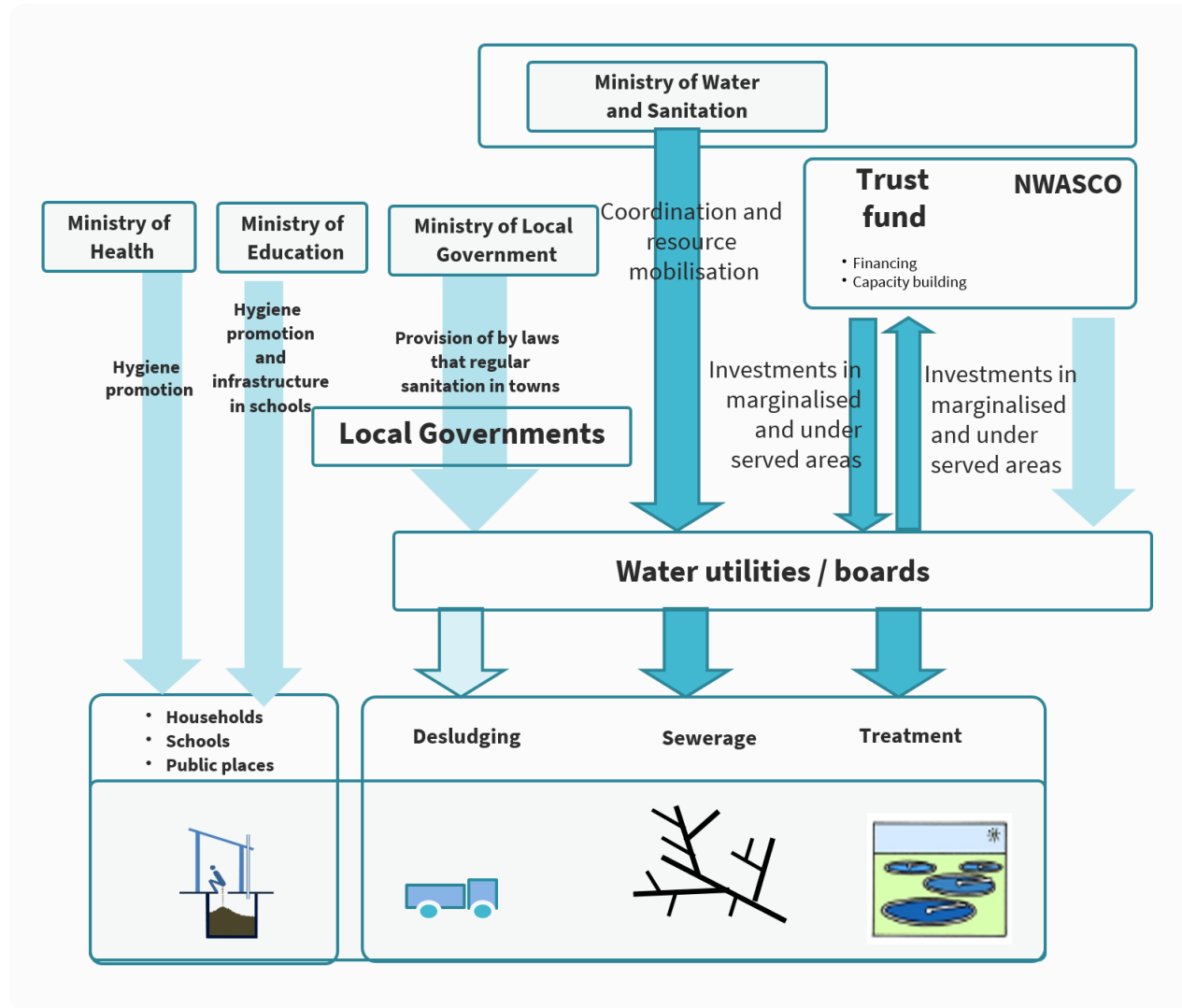
Legend

Government organisation -
Parastatal –
Local Government -

Private sector ('I' - informal) -
Private sector ('F' - formal) -

Zambia

Organigram of the institutional setup of the Zambian Urban Sanitation Sector



Brief description of institutions/agencies/authorities: Zambia

Abbreviation of institutions/agencies /authorities	Full title of institutions/agencies/ authorities	Main mandates/roles/ responsibilities	Type of organisation (governmental, parastatal, private entity)	Operational levels (National/ regional/ local)
MWDSEP	Ministry of Water Development, Sanitation and Environmental Protection	In charge of policy development and guidance, development and of national programmes and strategies, and resource mobilisation foreign and local funds for capital development.	Government	National
MLG	Ministry of Local Government	Responsible for Local Government Policy & Urban and Regional Planning. The Planning Authority has mandate for development of Building Standards, that includes such as onsite facilities linked to building codes. LWSC will have to collaborate with the Planning Authority through the LCC, NWASCO and ZABS in development of on-site sanitation standards. LA are the implementing agents for local government services under MLG.	Government	National
MoH	Ministry of Health	The MoH is responsible for the development of public health and the related Acts, including surveillance programmes for the planning, coordination and monitoring of hygiene promotion at the community level. This includes policy guidance, contribution to the setting of technical standards related to household and school toilets and other sanitation ancillaries and, in close coordination with other Ministries.	Government	National
MoE	Ministry of Education	Responsible for sanitation and hygiene promotion in schools	Government	National
NWASCO	National Water Supply & Sanitation Council	It has the primary role of regulating the WSS sector and funding activities via the Devolution Trust Fund in low-income urban and peri-urban areas. It is also responsible for reporting performance of the urban (and peri-urban) water supply and sanitation sector. The regulator acts independently from the line ministries and have financial autonomy, via collection of user/licencing fees. NWASCO also conducts capacity building activities for the CUs.	Parastatal	National

DTF	Devolution Trust Fund	Financing sanitation infrastructure for urban poor and per-urban areas. The DTF is supervised by NWASCO, but have a high degree of independency.	Parastatal ²	National
ZEMA	Zambia Environmental Management Authority	Regulates environmental protection, effluent standards, etc.	Parastatal	National
LA	Local Authorities	Local Authorities are responsible for provision and monitoring of municipal services, which includes water supply, sanitation and hygiene promotion Local Authorities outsourced the management of WSS services to private enterprises (Commercial Utilities) formed by joint ventures with other Local Authorities	Government	Local
CUs	Commercial Utilities	The mandate of commercial utilities (CUs) is to provide efficient and sustainable supply of water and sanitation services under the general regulation of NWASCO. There were 11 operational CUs in three regions and three private utilities in the copper belt area. The CUs are owned by Las (or a group of Las within a province)	Parastatals	Regional
Pvt sector	Private sector	Provides sanitation services in areas where CUs are not entitled to/or cannot serve.	Private	Local
WWG	Water Watch Group	A voluntary group of community representatives monitoring service provision by the CUs.	Community based	Local

² A Trust Fund is not an organisation per say, but for reasons of simplicity have been considered as parastatal, since it acts on behalf of government agencies and donors, under pre-defined conditions

Institutional mapping of the Zambian sanitation sector according to functional attributes:

Functional attributes	Behavioural aspects	Containment				Conveyance		Treatment/ Disposal
	Hygiene promotion	Household sanitation	Schools/ educational institution	Healthcare facilities	Public facilities	Faecal sludge collection/ transport	Sewerage network	Treatment and disposal of faecal sludge and wastewater
Enabling								
Policy	MoH	MoH	MoE	MoH	MWDSEP	MWDSEP	MWDSEP	MWDSEP
Regulations	MoH	NWASCO	MoE	MoH	NWASCO	NWASCO	NWASCO	ZEMA
Financing	MoH	DTF	MoE	MoE	DTF	DTF	DTF	DTF
Capacity development	MoH	MoH	MoE	MoH	NWASCO	NWASCO	NWASCO	NWASCO
Developing								
Planning	LGs	CUs	CU	CU	CU	CU	CU	CU
Infrastructure provision	LG	HH	Schools	Health facilities	CU	CU	CU	CU
Sustaining								
Enforcement	LG	LG	LG	LG	LGs	LGs	LGs	ZEMA
Asset management	LGs	HH	Schools	Health facilities	LG	Pvt sector	CU	CU
					CU	CU		
Service delivery	LGs	Pvt sector	Pvt sector	Pvt sector	CU	Pvt sector	CU	CU
						CU		
Monitoring and evaluation	LGs	NWASCO	NWASCO	NWASCO	NWASCO	NWASCO	NWASCO	NWASCO

Legend	Government organisation -		Private sector ('I' - informal) -	
	Parastatal -		Private sector ('F' - formal) -	
	Local Government -			

**INTERNATIONAL STUDY OF INSTITUTIONAL MODELS TO
SUPPORT THE DEVELOPMENT OF GHANA'S PROPOSED
NATIONAL SANITATION AUTHORITY**

This report is produced under the Urban Sanitation Research Initiative Ghana, a 2017-2020 programme of rigorous research designed to drive pro-poor sector change in urban sanitation in Ghana.

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