



# WaterNet short course

## Financing of Water Infrastructure projects

SWOT analysis framework for water infrastructure financing in SADC

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# Purpose & structure of presentation

- What is a SWOT?
- Water sector SWOT issues & objectives

# What is a SWOT analysis?

- A generic situation analysis that covers the *internal* and *external* environment of an organization, an area, sector, resource or asset.
- *Purpose*: describe a specific issue in order to improve the situation by:
  - Seizing new opportunities and mitigate/pre-empt possible threats- negative impacts
  - Exploiting the strengths/ comparative advantages to increase efficiency and delivery (e.g. SDGs) and increase access to funding options.
  - Addressing weaknesses of the water sector to turn them into strengths or reduce their negative impacts.
- Need to formulate a clear issue for and objective of the SWOT.
- Comparative analysis: in time (e.g. every 5 years) or for competing infrastructure - measures

# SWOT analysis characteristics

- Subjective: need proper stakeholder representation in SWOT analysis
- Participatory and iterative: to get all perspectives and to adjust where and when necessary
- Multidisciplinary: beyond single disciplines (at least the 4 SD pillars)
- Applied to a wide range of issues at different levels. In the water sector, e.g.:
  - Infrastructure
  - Water sector institutions
  - Water sector enabling environment

# SWOT terms

Opportunity: external factor that is favourable to the objective

Threat; external factor that is unfavourable to the objective

Strength: internal factor that is favourable to the objective

Weakness; internal factor that is unfavourable to the objective

Note that a variable can be a threat or an opportunity depending on the issue- objective

	Positives	Negatives	Management orientation
External environment (beyond direct control)	Opportunities	Threats	Adaptive management Lobbying for favourable external environment
Internal environment (under control)	strengths	Weaknesses	Reforms to address weaknesses Exploitation of strengths

# Examples of SWOT derived water strategies

- Seizing new opportunities & mitigate threats:
  - Maximise safe yields in response to climate change and water scarcity
  - Desalination & water purification technologies
- Increase access to funding sources:
  - Use of local capital markets and good credit rating to attract investments in the water sector.
- Address weaknesses in the water sector:
  - Water sector reforms to improve the performance of the water sector (e.g. regulator, competition).
  - Decentralisation of WRM (e.g. CBNRM or basin level).

# A SWOT of what and for what?

- SWOT of several key issues:
  - Water infrastructure: current & desired.
  - Financing options for water infrastructure: current & future
  - Water sector institutions: collaboration, clarity of responsibilities
  - Enabling environment – management: gaps, strengths
- What are the objectives? E.g. SDG6, minimising sustainable supply costs, increasing institutional efficiency
- SWOT at different spatial levels:
  - Water catchment areas;
  - Countries; and
  - Shared river basins (2+ countries)

# Possible SWOT issues for water infrastructure

- Water infrastructure:
  - Surface water: dams
  - Groundwater: well fields
  - Water transfer schemes & maximizing system safe sustainable yields
  - Sanitation, treated effluent re use & recycling
  - Transboundary water sources
  - Water use efficiency & demand management
- Financing:
  - Domestic – international
  - Public (concessional & conditional) and commercial (profit oriented)



# SWOT (dis-)advantages

- Advantages:
  - Focuses on key factors; use quantitative & qualitative data; regular management review; simple to use & understand; involvement of all stakeholders (with different perspectives)
- Disadvantages:
  - Subjective, risk of manipulation & over-simplification; no weighing of factors – directions; overload of information.

# Example: SWOT for recycling of wastewater

	Positives	Negatives	Management orientation
<b>External environment (beyond direct control)</b>	<b>Opportunities</b> Wastewater close to demand centres Decreasing unit costs and increased efficiency New technologies	<b>Threats</b> Attitude towards recycled wastewater Health risks	Awareness raising campaigns Integrated development & land use planning Water quality monitoring & blending
<b>Internal environment (under control)</b>	<b>Strengths</b> Growing resource availability with improved sanitation	<b>Weaknesses</b> Different responsible institutions Lack of financing Lack of HR capacity	1 institution for water supply and wastewater management Training Recycling targets & plans

# Assignment

- SWOT of country water infrastructure (20 minutes)
- SWOT of financing of country's water infrastructure (40 minutes)
- Management issues:
  - Which new opportunities can be seized & how can threats be mitigated:
  - How can access to funding sources be increased?
  - How can weaknesses in the water sector be overcome?

THANK YOU

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