



THE ECONOMICS OF WATER: TRANSFORMING MINDSETS TRANSFORMING APPROACHES

MALAYSIA'S VISION FOR SUSTAINABLE WATER MANAGEMENT



The global water crisis we face today transcends borders...



MALAYSIA'S WATER MANAGEMENT JOURNEY

- The water crisis in 1998, which affected millions of residents in the Klang Valley where our capital is located, highlighted the need for structural reform
- This transition marked a fundamental shift from fragmented state-level governance to a more coordinated federal-state partnership model - establishment of National Water Services Commission (SPAN) & Water Asset Management Company (PAAB)

*Photo Credit: Ihsan Adityawarman
Location: Banting, Selangor, Malaysia*

REFORMS

- Non-Revenue Water: 40% → 33.9%
- Shift toward Regional Centralised Sewage Treatment Facilities – efficient green technologies
- Stronger pollution laws (2023 Amendments) – maximum fines from RM100k to RM10mil
- Reforms resulted in improved access to clean water and sanitation.

*Photo Credit: Indah Water Konsortium
Location: Kuala Lumpur, Malaysia*

TODAY'S CHALLENGES

- Water demand ↑ 76% from 14,458MLD in 2010 to 25,455MLD in 2050
- Rapid urbanisation and climate risks
- New industries with intensive water demands - data centers & semiconductors



*Photo Credit: Pok Rie
Location: Kenyir Lake, Terengganu*

MALAYSIA'S STRATEGY

- Established Water Sector Transformation 2040 (AIR2040) in ensuring water security for all Malaysians and developing water as a dynamic economic sector



*Photo Credit: Pok Rie
Location: Putrajaya, Malaysia*

3 KEY TRANSFORMATIONAL SHIFTS

From 'Plentiful' →
'Precious Resource'

- River Basin Plans - smart water systems, NRW matching grants

From 'Closely Controlled'
→ 'Shared Opportunity'

- Private Sector Participation – Organic Fertiliser
- Solar Initiatives
- Water Reclamation Plants – industrial use

From 'Reactive' →
'Prepared'

- Flood Forecasting and Warning System
- R&D and application of emerging technologies – AI, IoT
- Water Services Academy



MALAYSIA'S REGIONAL & GLOBAL ROLE

- ASEAN river basin collaboration
- Water Knowledge Hub



INVITATION TO COLLABORATE

- Open to partnerships and innovation
- Testing ground for new solutions

Photo Credit: Sam Lim

Location: George Town, Pulau Pinang, Malaysia

A tropical landscape featuring a palm tree in the foreground on the right, leaning over a body of water. The water reflects the surrounding greenery and the sky. In the background, there is a dense forest of tall trees. A semi-transparent dark grey rectangle is overlaid in the center of the image, containing the text.

Together for Water-Secured Future

Photo Credit: Andy Lai
Location: Sarawak, Malaysia