



Department of
Energy and Economic
Diversification

Understanding the Key Players in Western Australia's Energy Sector

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Acknowledgement of Country

The Department of Energy and Economic Diversification acknowledges the traditional custodians throughout Western Australia and their continuing connection to the land, waters and community. We pay our respects to all members of the Aboriginal communities and their cultures, and to Elders both past and present.



WA's Energy Landscape

Unique and isolated energy systems

North West Interconnected System (NWIS)

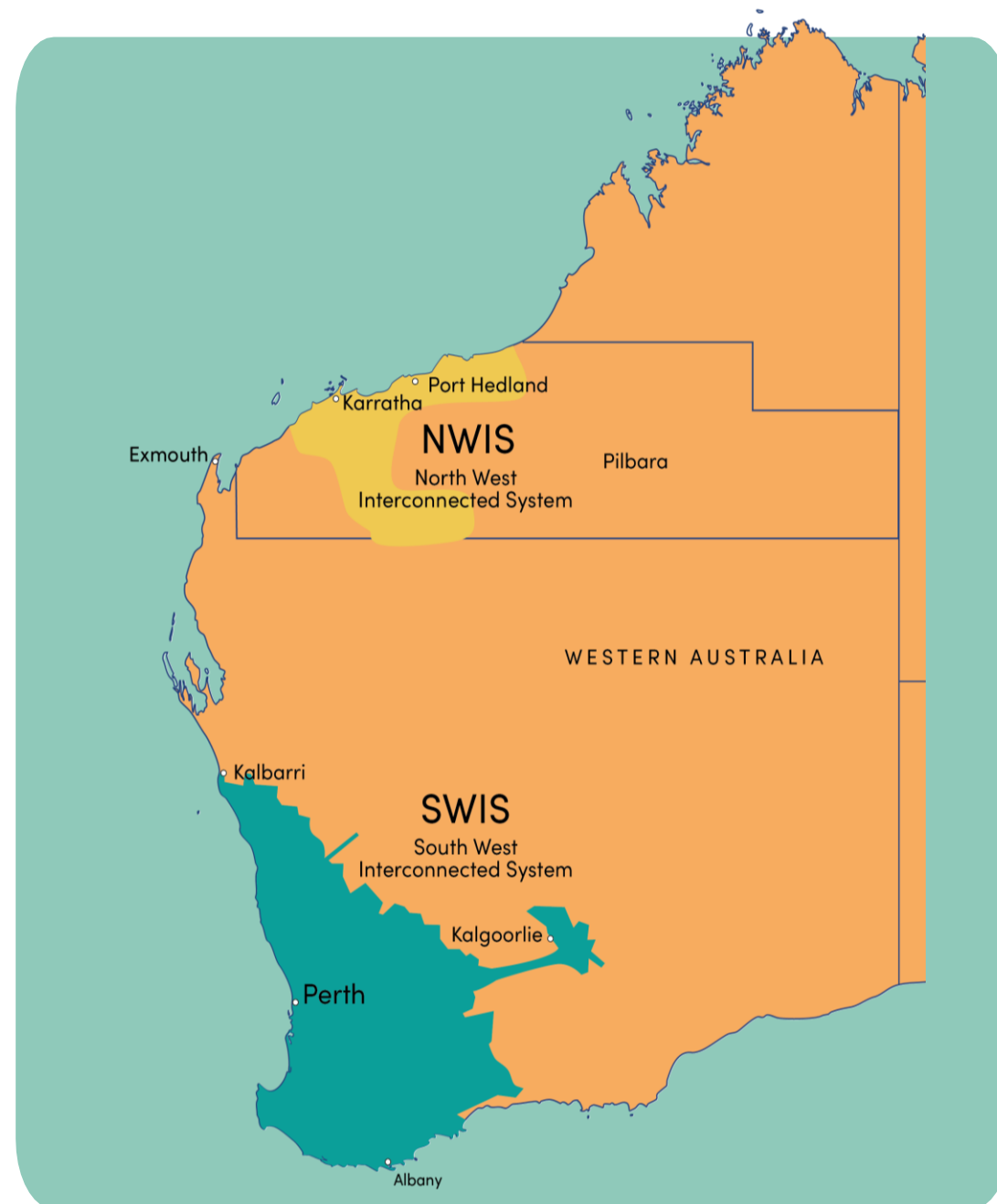
- 1,925km total network circuit length
- 2.9 TWh electricity generated (2021-22)
- Around 2% renewable energy in 2024

Off-grid and Non-Interconnected Systems

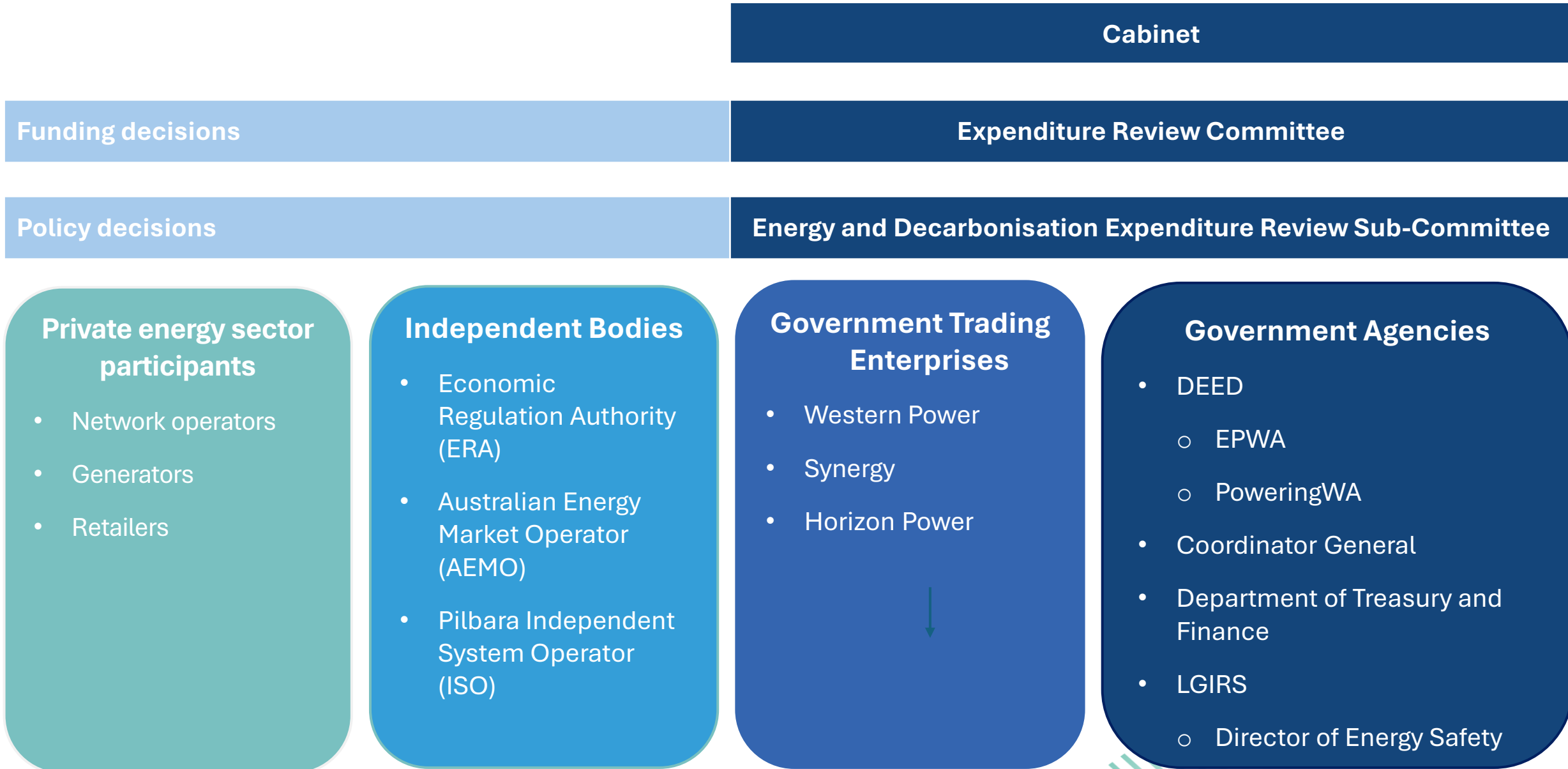
- Horizon Power manages services for 170 regional Aboriginal communities and town microgrids
- 16.4 TWh electricity generated (2021-22)
- Around 3% renewable energy in 2023

South West Interconnected System (SWIS)

- 7,750km transmission and 93,350km distribution lines
- Around 8GW generation capacity
- Over one million customers (connection points)
- 38% renewable energy in 2024



The Role of Government in the WA Energy Sector



WA's Energy Transition

- June 2022 – State Government decision to retire State-owned coal-fired generation by 2030
- Phased approach to retiring coal – three drivers:
 - reliability of ageing coal-fired power stations
 - lowest cost, most reliable energy mix
 - coal is the most emissions intensive form of electricity generation on the SWIS
- WA is also diversifying and growing its economy – meaning demand for electricity will continue to grow in the future.
- In March 2026, the State Government committed to secure more than 1 GW of new wind generation from 2028 through power purchase agreements. T

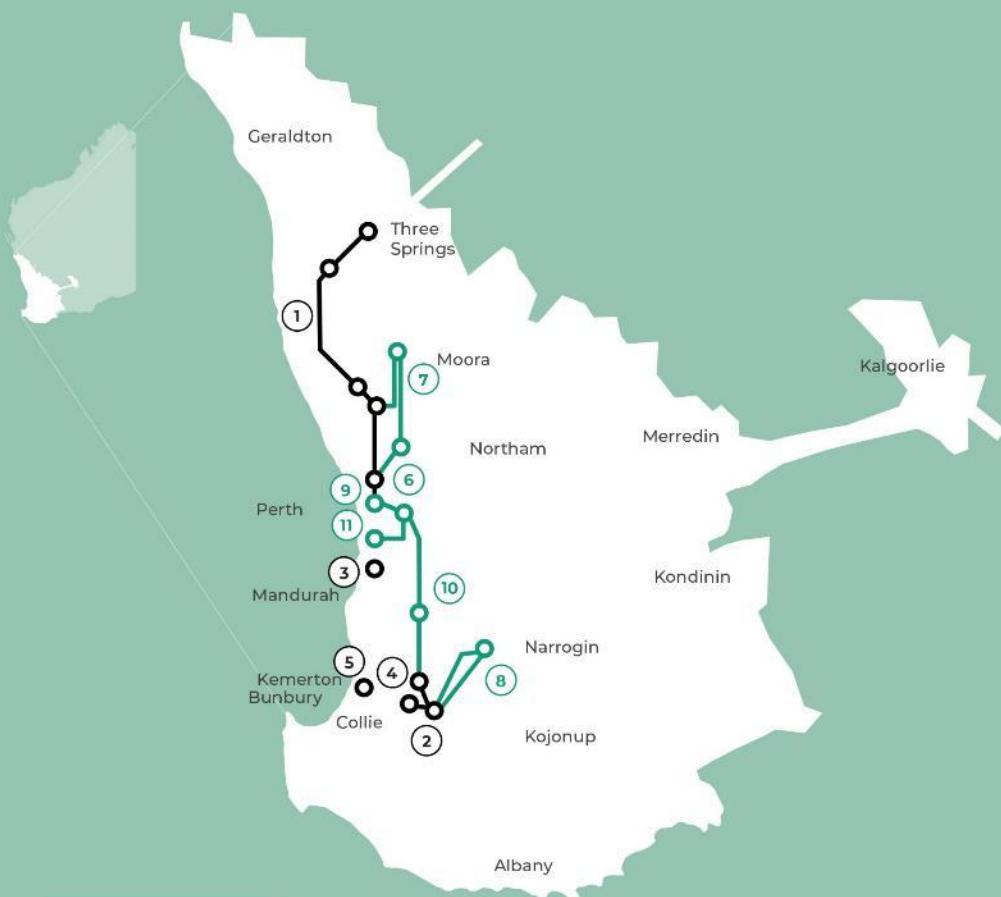


The work program is evolving to support the transition



Clean Energy Link Program

Phases 1 and 2



■ Phase 1
■ Phase 2

Note: locations (eg. Moora, Chittering and Collie) reflect general project geography.

OFFICIAL

Phase One

1 CEL - North (2027)

Transmission capacity: 1,000 MW



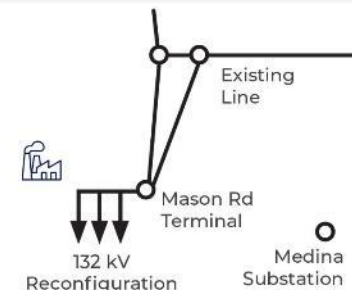
2 CEL - East Stage 1 (2029)

Transmission capacity: 1,600 MW



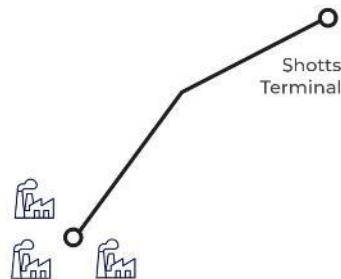
3 CEL - Kwinana Strengthening (Stage 1: 2029 and Stage 2: 2032)

Connect up to: ~900 MW



4 Augmentation - Coolangatta Industrial Estate (Collie Just Transition) (2028-2030)

Connect up to: ~500 MW



5 Augmentation - Kemerton Strategic Industrial Area (2030-2032)

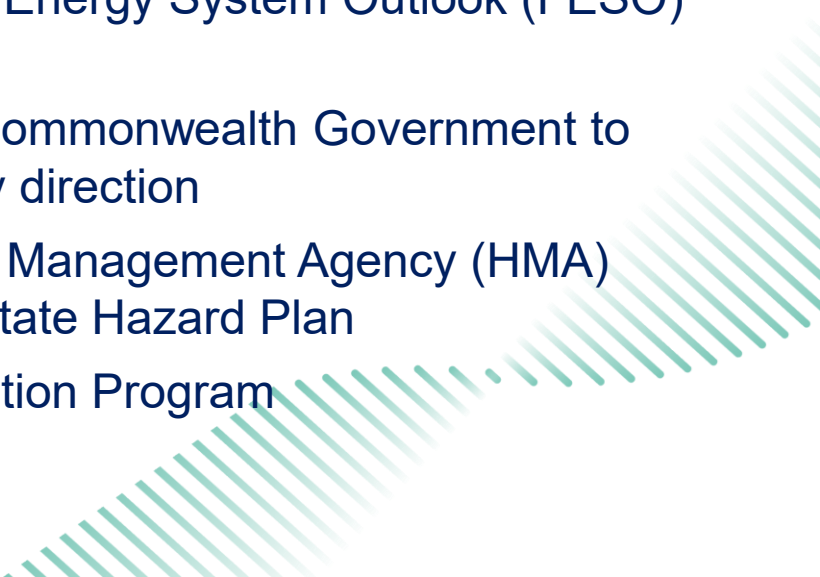
Connect up to: ~100 MW



Working together for a **brighter** energy future.

EPWA's Role

Partial list, as of September 2026

- Wholesale Electricity Market (WEM) Investment Certainty Review
 - Power System Security and Reliability (PSSR) Standards Review
 - Evolution of the Pilbara Network Rules Project
 - Implement the Alternative Electricity Services (AES) registrations framework
 - Administer the Licensing Exemptions regime
 - Implementation and deployment of the WA Residential Battery Scheme
 - Delivery of Social Housing Energy Performance Initiative (SHEPI)
 - Charge Up Electric Vehicle Charger Grants Program
 - Rollout of the Targeted Underground Power Program (TUPP)
 - Oversee Project Jupiter to (facilitate VPPs at scale in SWIS)
 - Deliver Kalgoorlie Vanadium Battery Energy Storage System (VBESS)
 - Oversight of GTE strategic planning and governance
 - Development of Capital Charge Scheme for new and expanded connections to the SWIS
 - Deliver the Future Energy System Outlook (FESO) 2027
 - Engage with the Commonwealth Government to align energy policy direction
 - Discharge Hazard Management Agency (HMA) duties under the State Hazard Plan
 - Albany Gas Transition Program
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Future Energy System Outlook (FESO) 2027

A scenario-based study of the SWIS to 2050

- The FESO will meet the requirements of the WOSP under the ESM Rules
- Modelling to forecast demand and to assess infrastructure and system needs
- Examine three plausible scenarios for SWIS development to 2050:
 - Central
 - Rapid Change
 - Constrained
- Identify potential implications for generation, storage, networks, system security and reliability.
- Provide an evidence base for government, market bodies, industry and investors.
- Align with and build upon the SWIS Transmission Plan, AEMO's ESOO and GSOO, and Western Power's Transmission System Plan