

# The NEM Review – a strategic treatment plan

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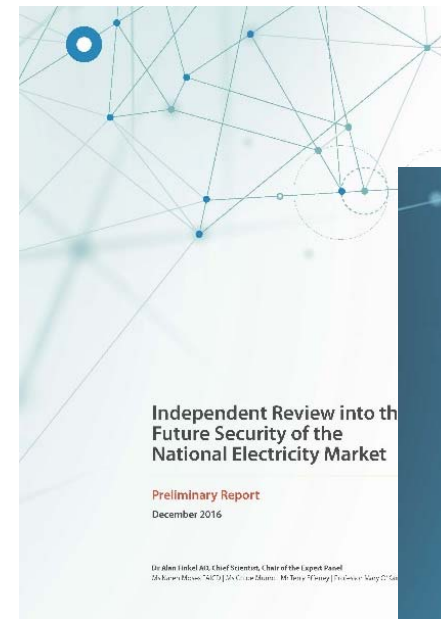


## One year ago

| October 2016 |     |     |     |     |     |     |
|--------------|-----|-----|-----|-----|-----|-----|
| Mon          | Tue | Wed | Thu | Fri | Sat | Sun |
| 26           | 27  | 28  | 29  | 30  | 1   | 2   |
| 3            | 4   | 5   | 6   | 7   | 8   | 9   |
| 10           | 11  | 12  | 13  | 14  | 15  | 16  |
| 17           | 18  | 19  | 20  | 21  | 22  | 23  |
| 24           | 25  | 26  | 27  | 28  | 29  | 30  |
| 31           | 1   | 2   | 3   | 4   | 5   | 6   |

# One year later

| October 2017 |     |     |     |     |     |     |
|--------------|-----|-----|-----|-----|-----|-----|
| Mon          | Tue | Wed | Thu | Fri | Sat | Sun |
| 25           | 26  | 27  | 28  | 29  | 30  | 1   |
| 2            | 3   | 4   | 5   | 6   | 7   | 8   |
| 9            | 10  | 11  | 12  | 13  | 14  | 15  |
| 16           | 17  | 18  | 19  | 20  | 21  | 22  |
| 23           | 24  | 25  | 26  | 27  | 28  | 29  |
| 30           | 31  | 1   | 2   | 3   | 4   | 5   |



49/50 recommendations  
accepted

# The problem



## Step 1: Stop the bleeding



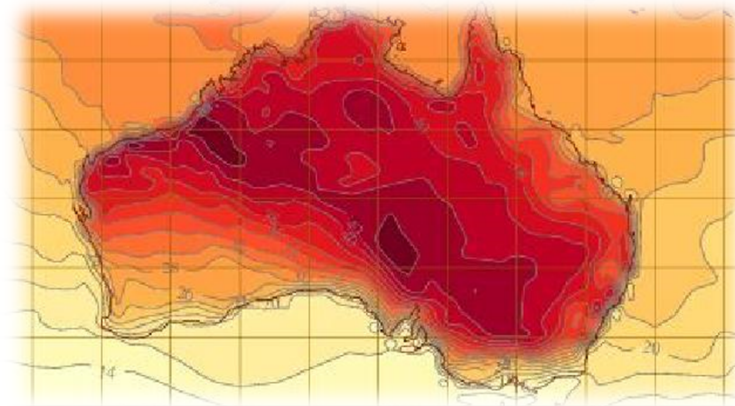
### Preparing for summer

#### Independent response

- AEMO preparations increased
- State governments established task forces

#### Review response: recommendation 1.1

- Independent evaluation of forecast *methodology*
- Independent evaluation of upcoming *actual* forecasts



## Step 2: Diagnose the problem

### Consulted widely...

More than

**120** meetings

with stakeholders

More than **390**  
submissions

Consultation  
sessions attended

by **450** people

A review of best  
practice from

**International  
Energy Agency**

Met with **operators**  
and **regulators** across  
Europe and the US



## Step 2: Diagnose the problem

Conclusion...

Patient's vital signs are poor

- Very high prices
- Very high emissions
- Reliability and security concerns

Comprehensive treatment plan required

- Physical
- Psychological





## Step 3: Prescribe treatment – the red pill



### Orderly Transition (Recommendation 3.2, the last of 50)

#### 1) Agreement to a **trajectory**

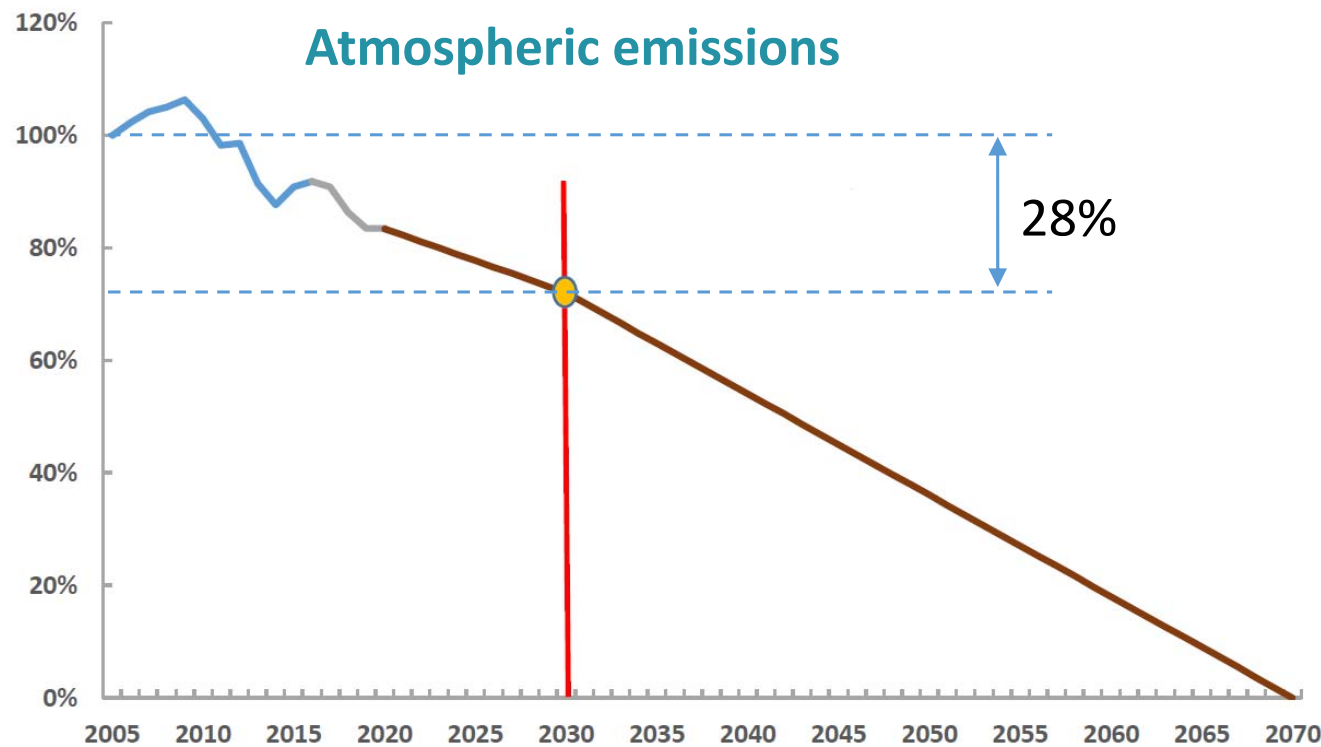
- Not a fixed target
- No mention of renewables

#### 2) A **mechanism** to get there

- Clean Energy Target

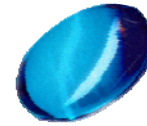
#### 3) Three year **notice of closure**

- provides market-pull signal to encourage new generation





## Step 3: Prescribe treatment – the blue pill



### Generator Reliability Obligation (Recommendation 3.3)



Need to know new generators can deliver when needed

Investor's choice:

- Pumped hydro, generators, batteries...
- Owned or contracted...
- Must be new

Forward looking

Regionally determined

# Step 3: Prescribe treatment – combination therapy



## Step 3: Prescribe treatment – the multicolour pill



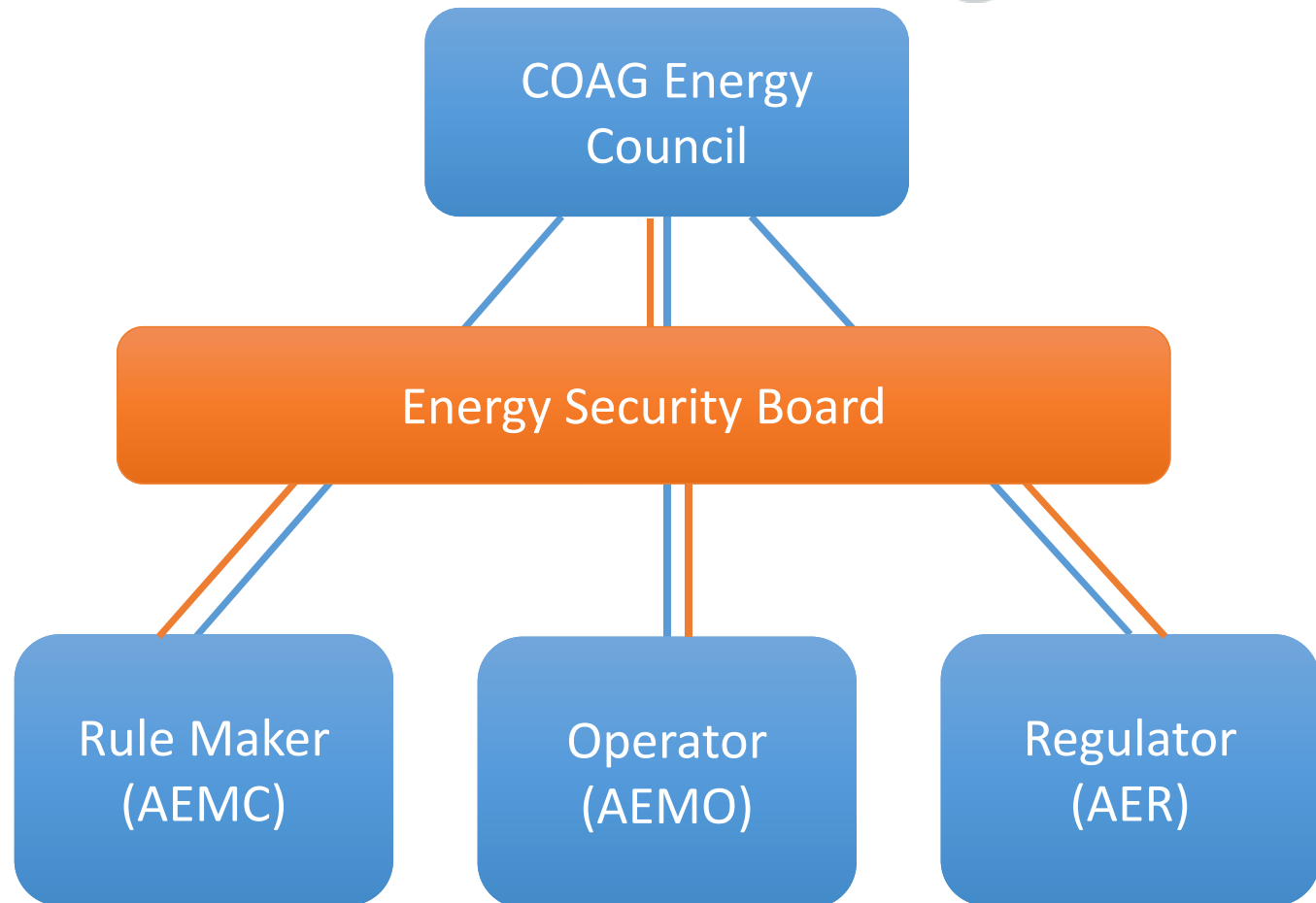
### Comprehensive electricity policy

| Clinical presentation                     | Recommended treatment   |
|---|---|
| Inability to meet extreme demand          | Strategic reserve, day ahead market (Recommendation 3.4)                    |
| Power supply disruption – blackouts       | Enhanced security obligations such as minimum levels of inertia (Chapter 2) |
| Non-optimal transmission line development | Improved system planning, renewable energy zones (Chapter 5)                |
| Lack of gas availability                  | Fair and informed gas production (Chapter 4)                                |
| Insufficient investment                   | Future capacity market option (noted in Chapter 3)                          |

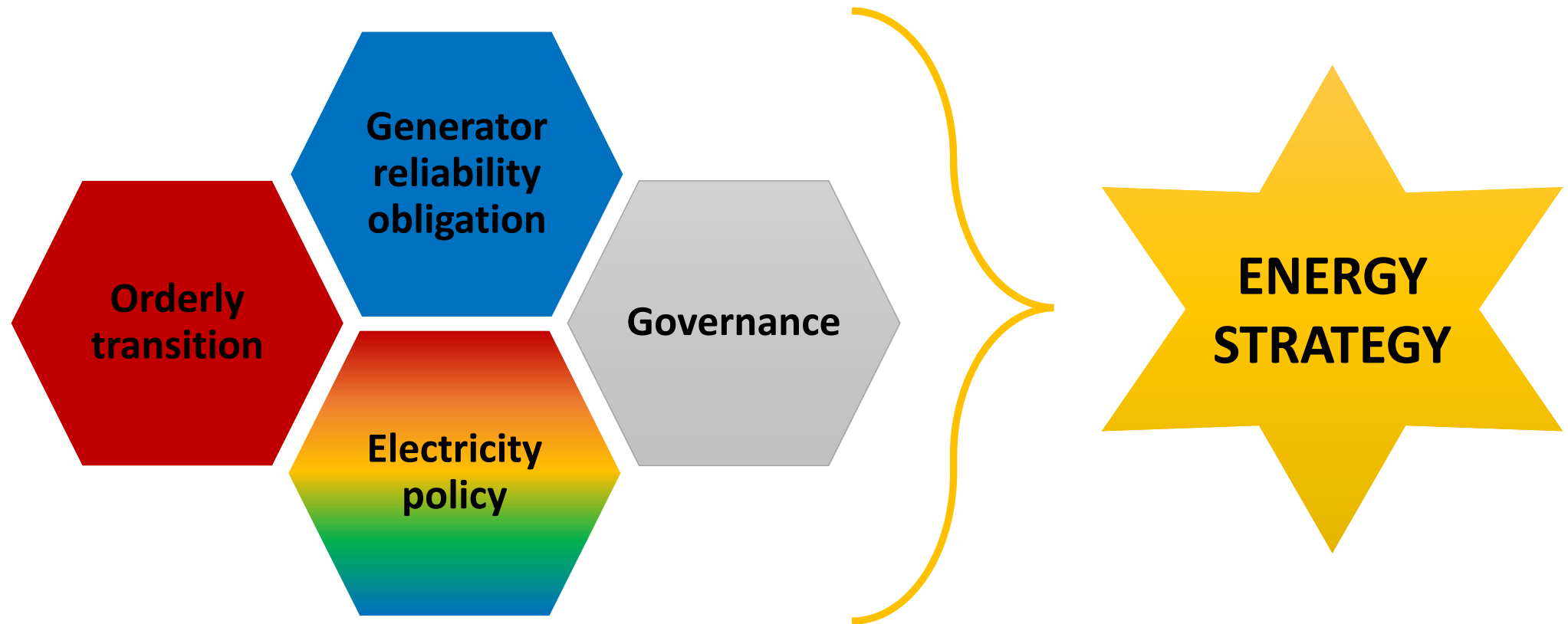
## Step 3: Prescribe treatment – the white pill



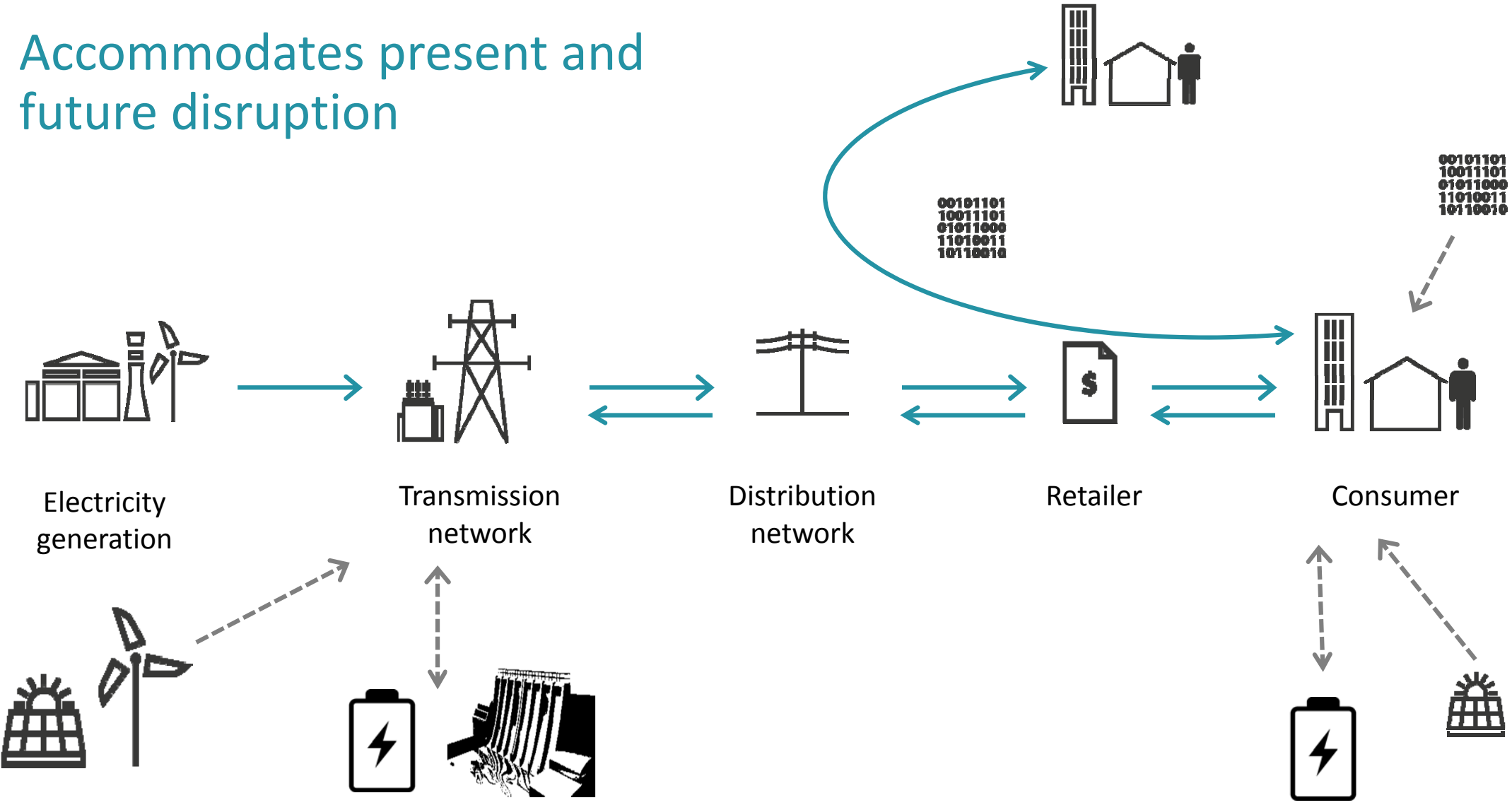
### Governance



# Finkel Review strategic treatment plan



# Accommodates present and future disruption



There's no going back...





Patient discharge notes



Security

Reliability

Low emissions

Lowest cost



ORDERLY  
TRANSITION



SYSTEM  
PLANNING



STRONGER  
GOVERNANCE

## Patient discharge notes

### Prognosis

Full recovery  
expected within  
three years!