



Melbourne Renewable Energy Project

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1. Who, what, how, why

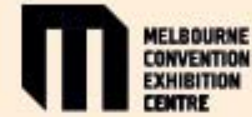


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Melbourne Renewable Energy Project

Principle Partners



Energy Partners





A New Wind Farm: Crowlands

80_{MW}
capacity

=



39
wind turbines



140+
Jobs during
construction

+



8 Jobs
Ongoing operation and
management of the plant

+



Opportunities
for local
businesses



Power Purchase Agreement (PPA)



**Melbourne
Renewable
Energy
Project**

88 GWh
of energy

over a third of Crowlands
Wind Farm total capacity



17,600

average households power use every year

OR



22,512 cars

off the road every year

OR



96,800 tonnes

of greenhouse gas pollution every year

This project will help Melbourne achieve



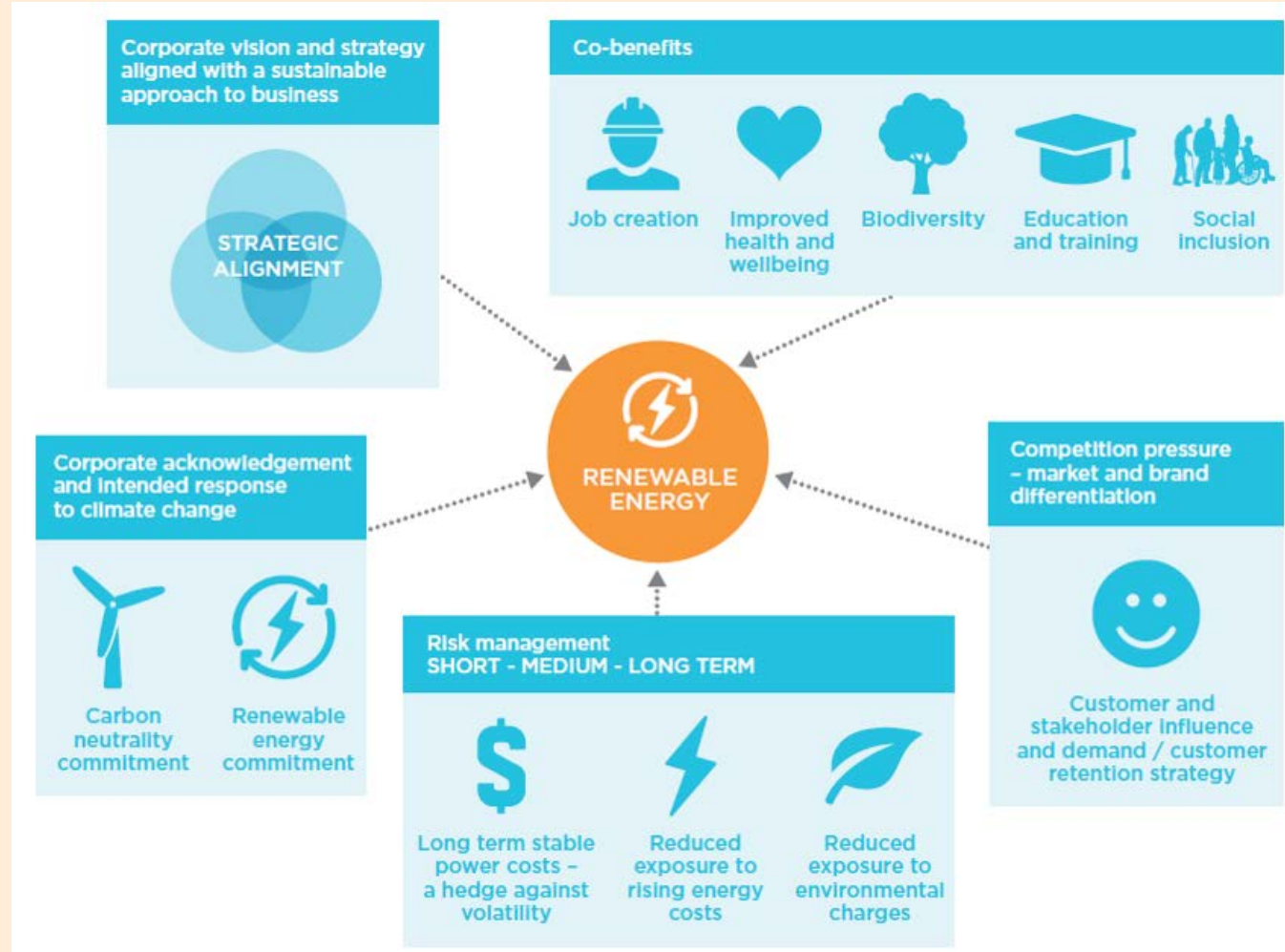
Electricity
from
renewables



0
Net emissions



Leading Drivers for PPAs





Leading Drivers for PPAs

COPP: Sustainability underpins the council plan

Councils: Zero net emissions targets

COPP: 100% RE by 20/21

Corporate vision and strategy aligned with a sustainable approach to business



Co-benefits



Job creation



Improved health and wellbeing



Biodiversity



Education and training



Social inclusion



Corporate acknowledgement and intended response to climate change



Carbon neutrality commitment



Renewable energy commitment

Competition pressure – market and brand differentiation



Customer and stakeholder influence and demand / customer retention strategy

Risk management
SHORT - MEDIUM - LONG TERM



Long term stable power costs – a hedge against volatility



Reduced exposure to rising energy costs



Reduced exposure to environmental charges

Community members don't like council buying offsets



Contracting Renewable Energy: Benefits




Action on climate change




More stable electricity budget and lower costs. Can mitigate risks via contracts.



Leadership & meet strategic goals



Behind the meter options lack scale and other retail electricity strategies do not provide a long term shield against electricity price increases and volatility. Ownership models not for everyone.







Contracting Renewable Energy: Benefits



**Tangible project,
i.e 100% GreenPower from
Crowlands Wind Farm**



**Speed-up transition to
renewable energy dominated grid**



Strengthen urban-regional relationships



Create local jobs in regional areas



2. The appeal of linking electricity contracts to carbon neutrality



MREP: 3 years of hardwork for 10 years of benefit



**Scale: One project reduces
COPP's gross emissions by 87%!**



**Cost: Savings from Black Power PPA
subsidies GreenPower**



**Cost: Cheaper GreenPower –
Long term LGC contract cheaper than
spot market and 5-year forward contract**



**Limited scope to meet council goals
without offsite renewables**





MREP: 3 years of hardwork for 10 years of benefit



Saves Staff Time & Releases (some) Pressure.



**Continue to work on project delivery
and behaviour change programs**



Focus on Fuel Switching, i.e. Electrification.



**Shift from to thinking about
Scope 3 emissions, supply chain & community
emissions**



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-
3. **The decision making steps Councils had to undertake to join the City of Melbourne led initiative of 14 members**

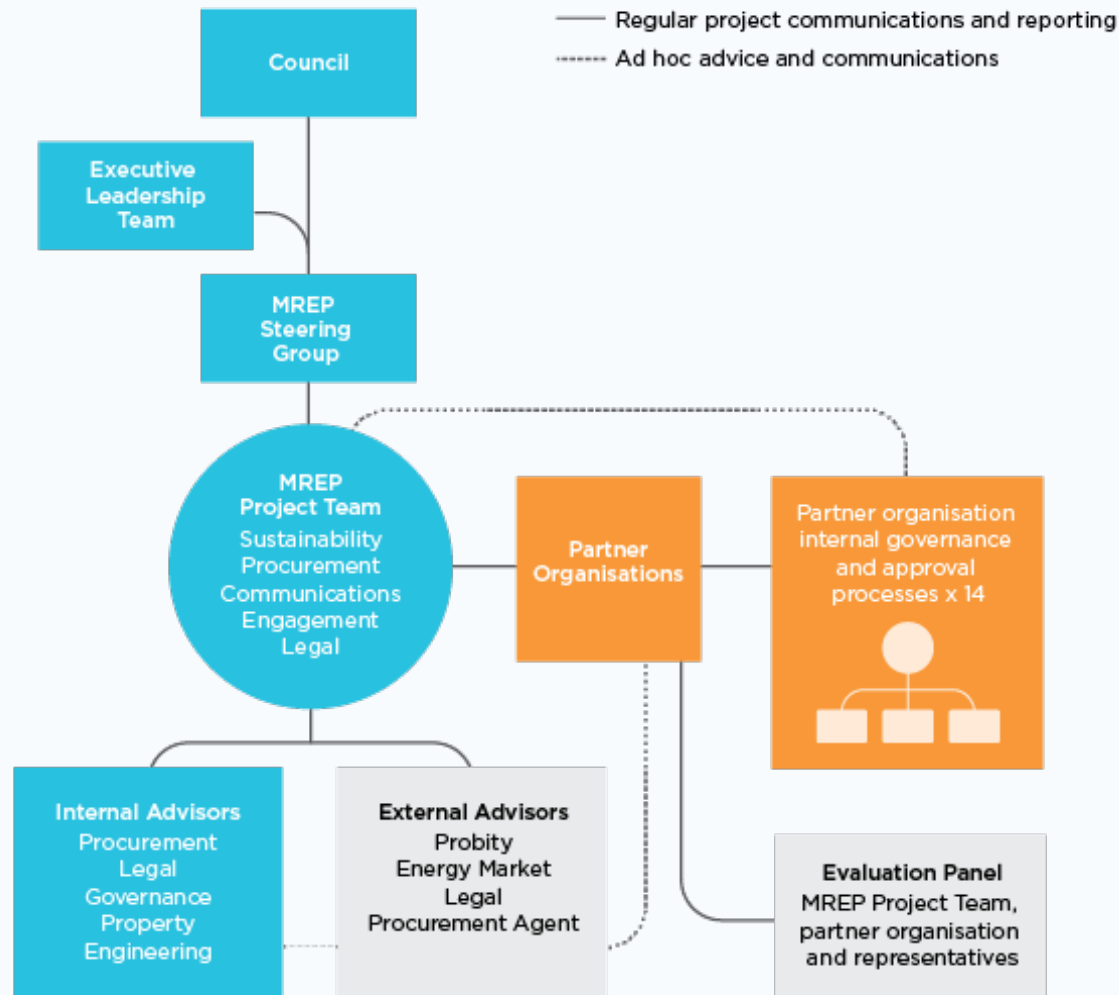


Go it alone, or create a group?





Governance structure





Memorandum of Understanding, then Participant Agreement



An agreement governing the relationship between the participants, and to facilitate the tender process and execution of project agreements



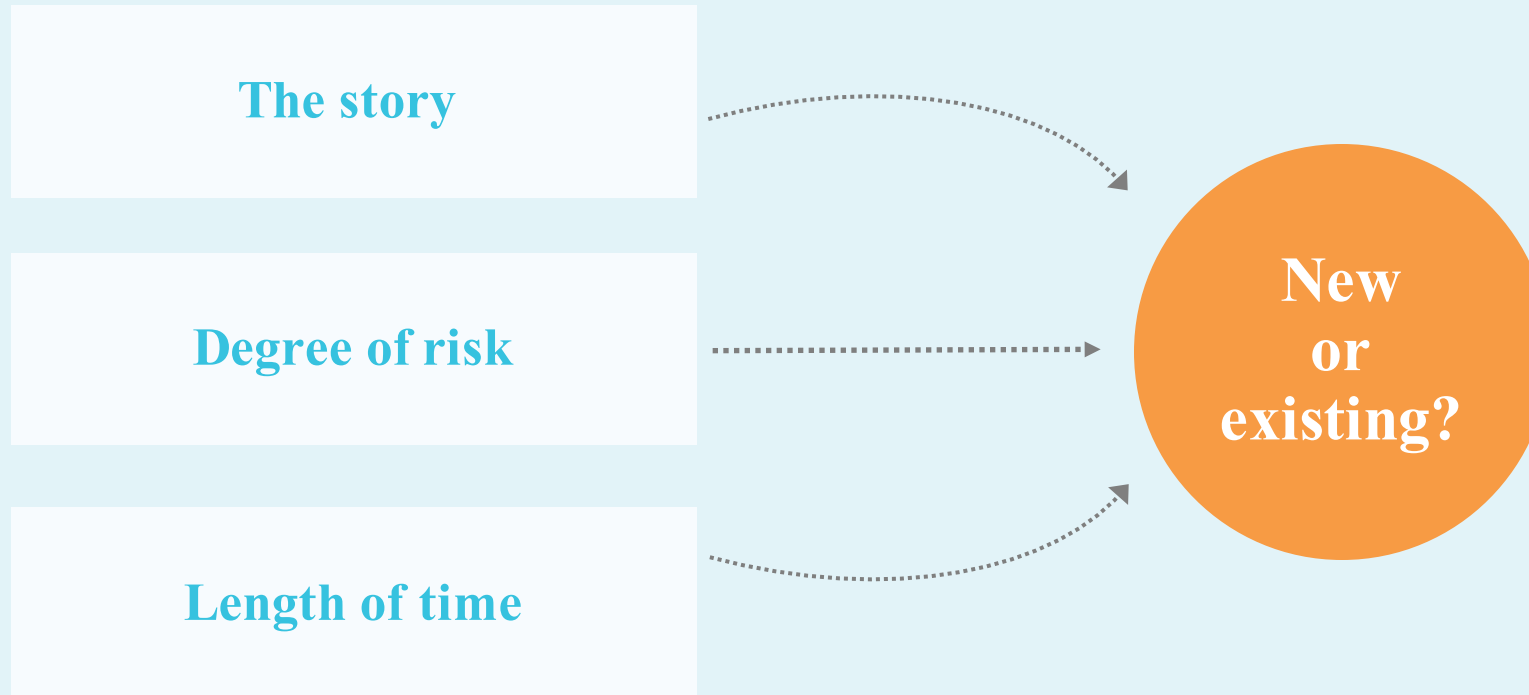
Memorandum of Understanding, then Participant Agreement



City of Port Phillip signed the MOU because we loved the idea of MREP

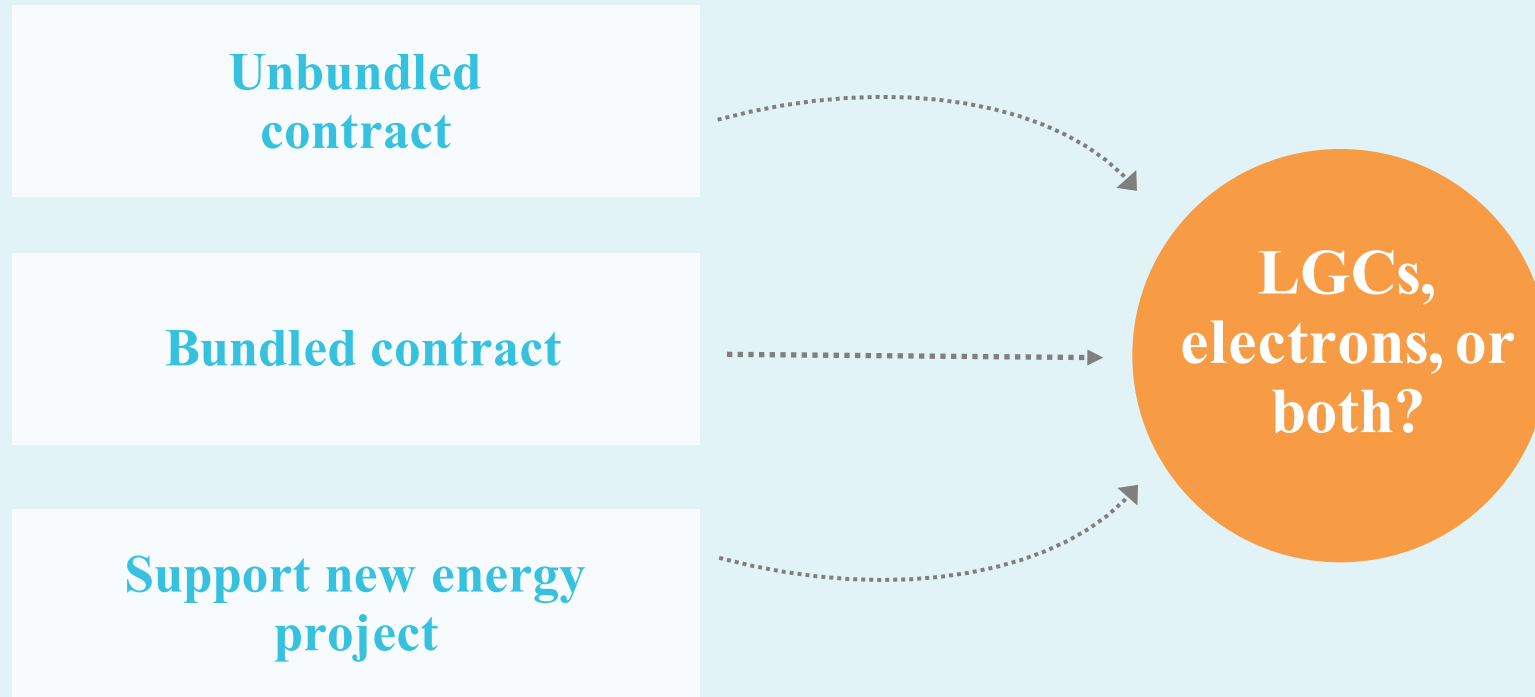


Project type





Form of renewable energy





The key attributes for a PPA



**Be creditworthy
(investment grade
credit rating ideally)**



**Energy is a strategic consideration,
enabling your organisation to make a
long term commitment**



**Ideally consume at least
15 GWh per annum in a State**

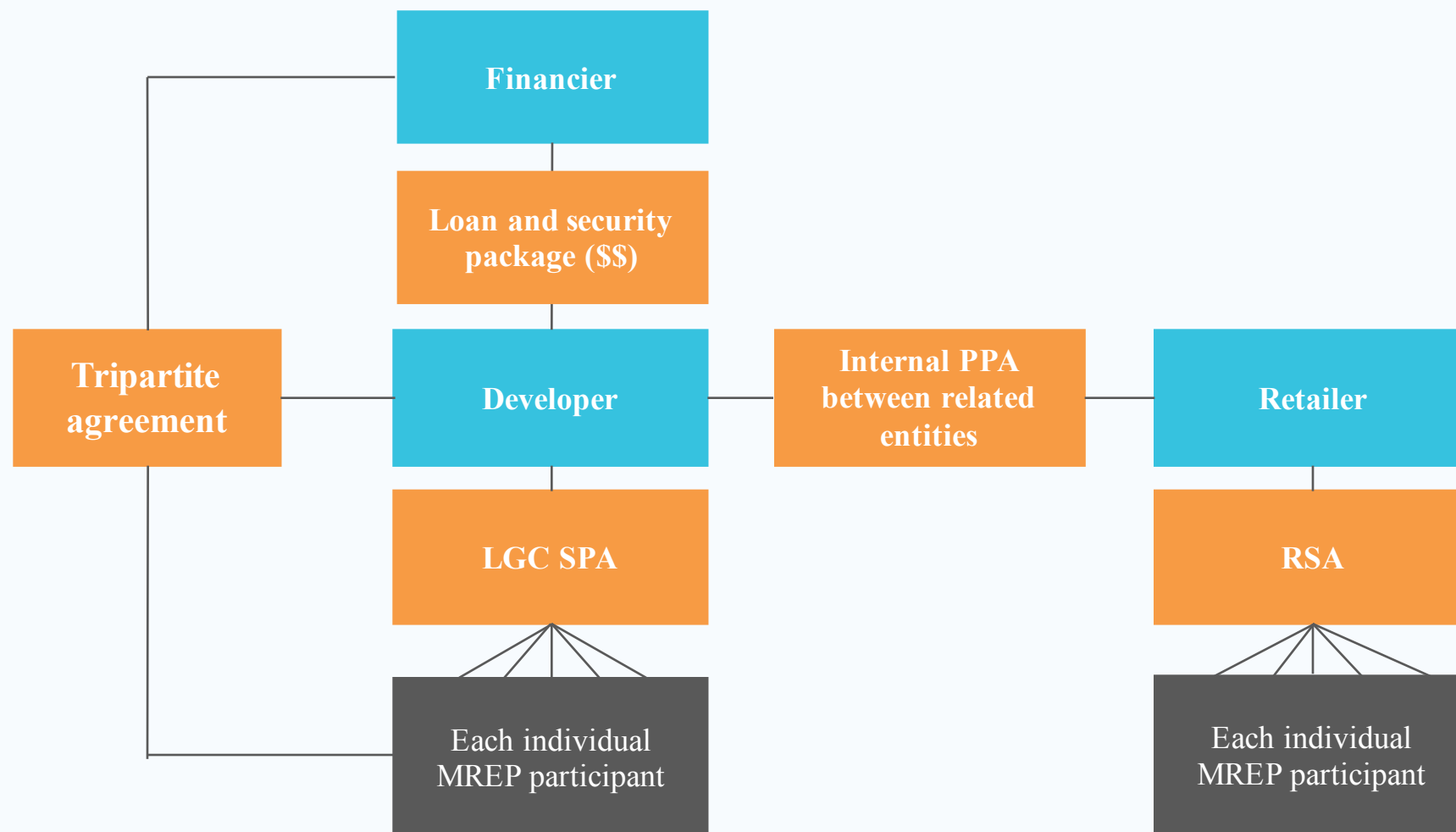


**Have relatively predictable electricity
needs over ~10 year term**



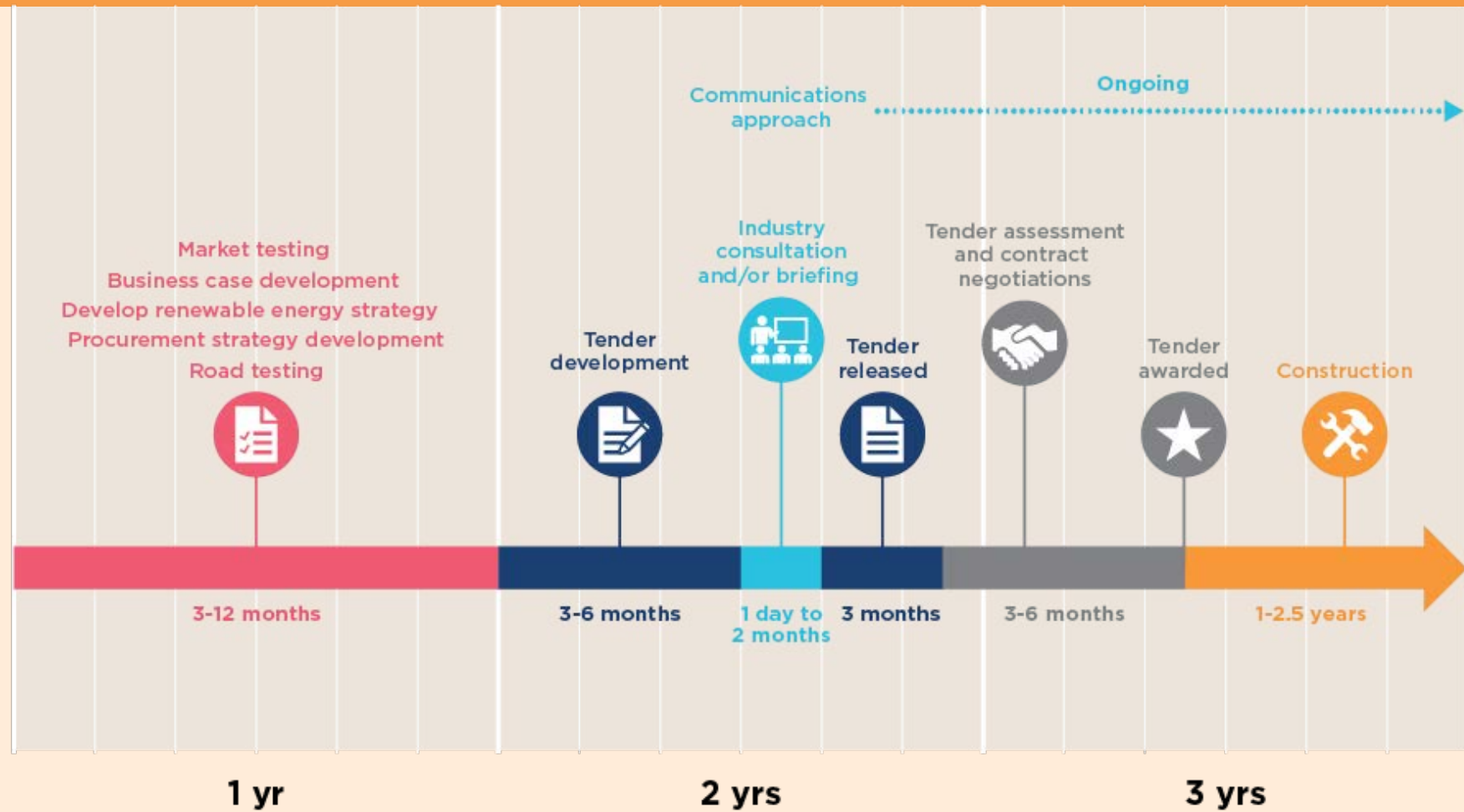


Supply Linked Retail PPA - *MREP Contractual Structure*



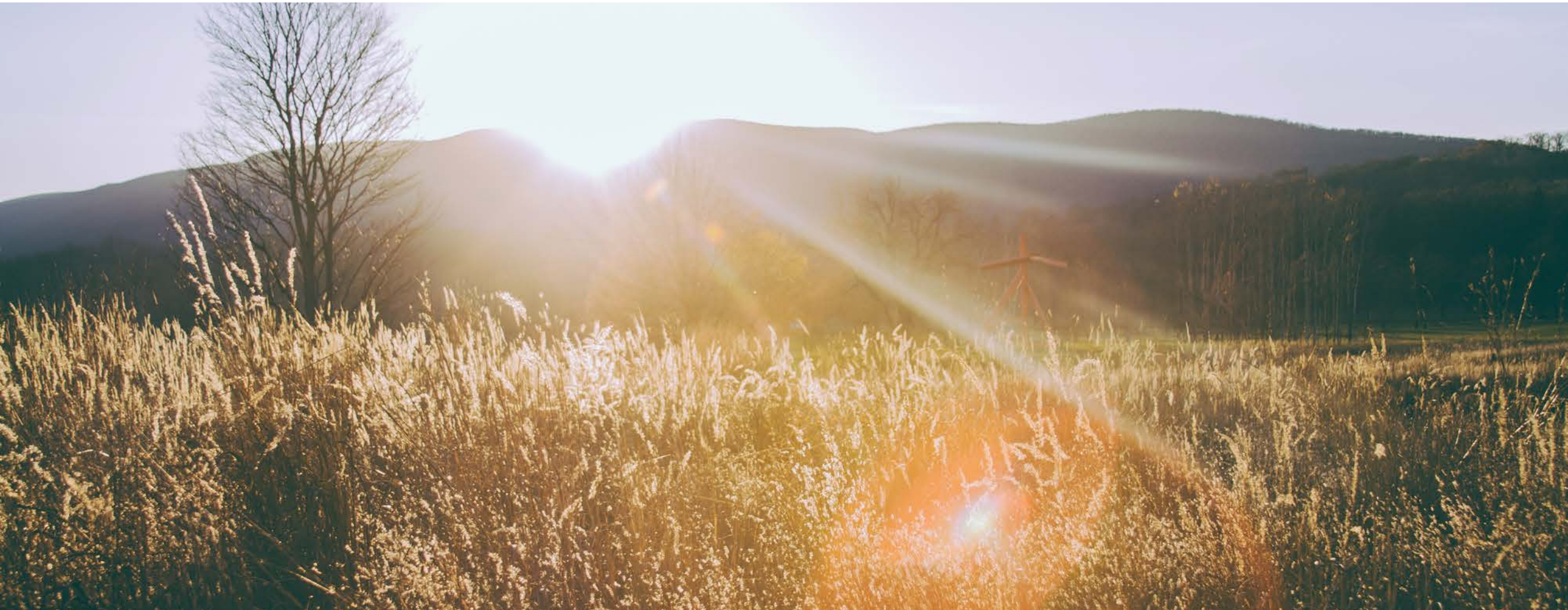


MREP Timeline



4. How did members measure and assess risk and financial impacts and environmental benefits?

Renewable Energy Will Be Consistently Cheaper Than Fossil Fuels By 2020, Report Claims



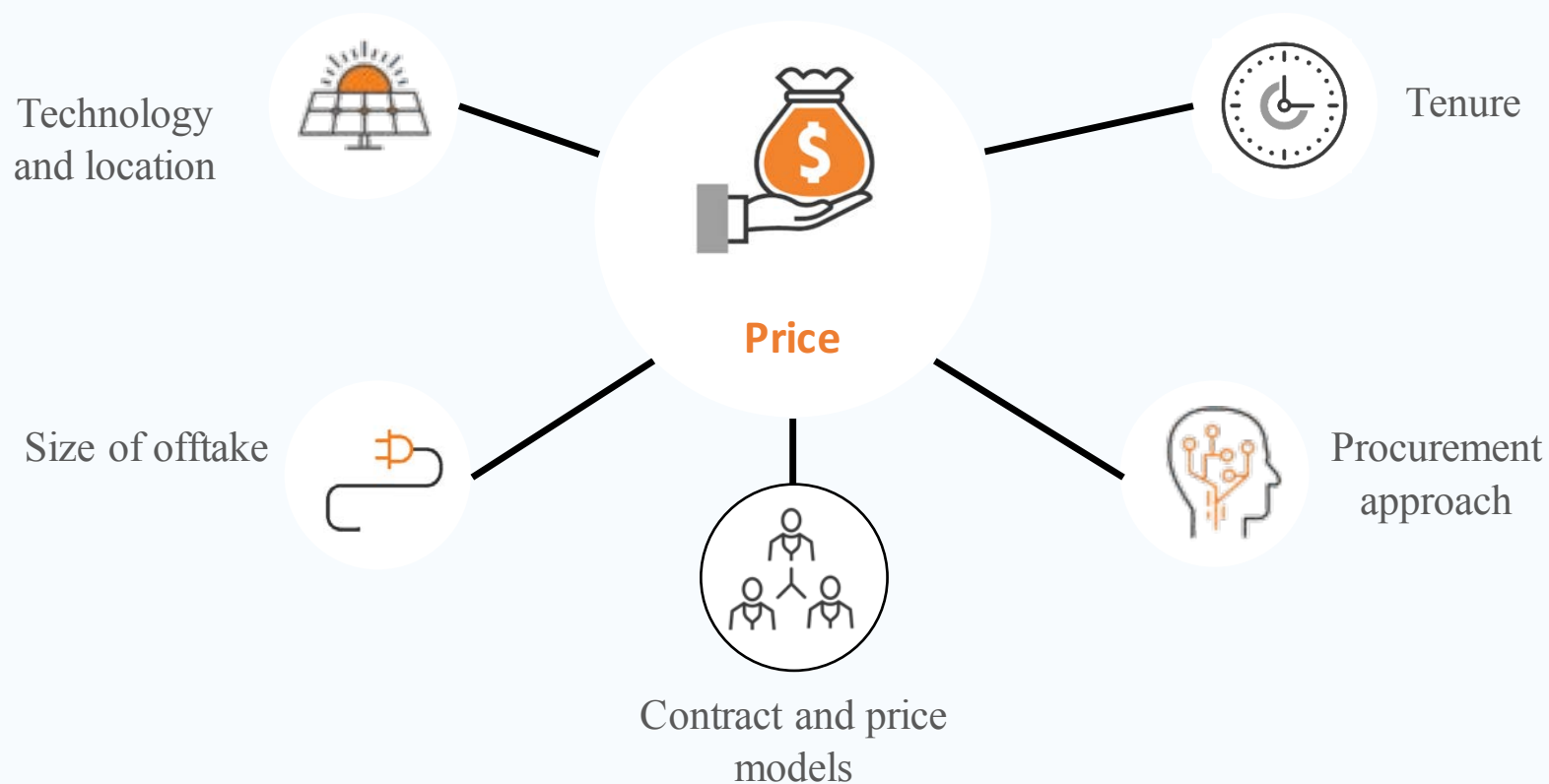


An international trend towards Power Purchasing Agreements





What are the key market drivers impacting corporate PPA prices?





MREP risks, cost and mitigation

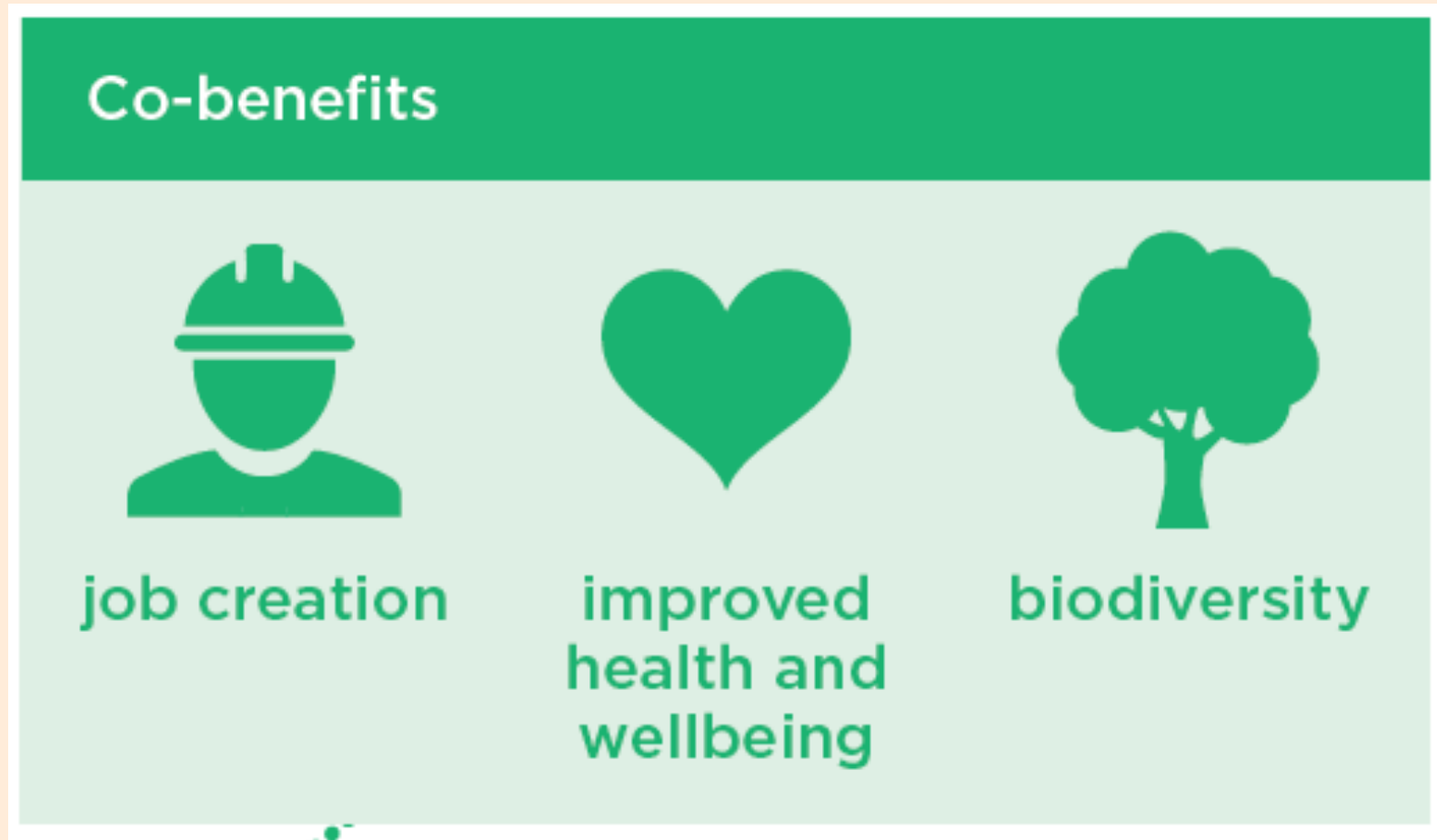
Risk	Cost	Mitigation
Complexity of energy markets & contracting	third party advice	none
Price risk	third party advice	40% price fixed + 60% price reset every 2 years
Regulatory risk	LGC expenditure	Change of Law Provision
construction risk	delays	bridging contracts; exit clauses
Rejection of proposal	opportunity cost	Plan B



BAU vs MREP

	BAU	MREP
Contract term	3 years	10 years
Pricing	3 yrs fixed/known pricing; Guaranteed Saving (30-40%)	40% price fixed + 60% price reset every 2 years
Retailers	4	1 + customer set service standards
Volume	+/-20%	+/- 20% for each org and MREP group
GreenPower	Spot market, expensive	10 years flat rate, less expensive
Procurement/cost of expertise	No upfront cost, ~1.8% trailing commission	Upfront (shared) costs, shared costs every 2 years

Social and environmental benefits



5. What are the key learnings and opportunities for local government?



Our big insights and takeaways



Do your homework & be prepared



**Leverage experiences of
MREP/PPA councils.**



Keep it simple



**Plan for Change. But don't
underestimate how hard change
is!**





Our big insights and takeaways



**Engage Early & Often:
Senior leadership
support is essential.**



**Build your team & find your
champions. A hero will emerge..**



**Be open, transparent & welcome
questions**



**Leverage third-party experts /
build a team of trusted advisors**



6. The real value of MREP is in the replication



What's next?



MREP V2.0
Businesses within City of Melbourne.



**LG PPA (led by Victorian
Greenhouse Alliances)**
34 Councils



**South East Melbourne Renewable
Energy Project**
Councils and Businesses



Procurement Australia LG PPA
Councils



7. Crowlands Wind Farm under construction









Thank you
