



# The Energy transition - moving into unknown terrain

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Where are we heading?





# In which direction is the energy world moving?

Recent signposts show diverging paths, in terms of:

- Economic growth
- Energy efficiency
- Technology development
- Market regulations
- Geopolitics

- Energy demand up over 2% in 2018
- Gas is the fastest growing fossil fuel
- Renewable costs dropping



- CO<sub>2</sub> emissions up 2% in 2018
- Coal demand up
- US-China trade tensions
- Multiple conflicts in the Middle East

- More efficient carbon pricing
- Booming EV sales
- Record solar and wind capacity additions

## The Energy World in 2050



2.0-2.2 x

Size of the global economy,  
compared to 2018



29-49 %

Share of solar and wind in  
global electricity generation,  
up from 7% in 2018



3,200-4,800 bcm

Global gas demand,  
compared to 3,900 bcm in 2018



10-36 Gt

Global energy-related  
CO<sub>2</sub> emissions, compared to  
33.1 Gt in 2018



0.6-1.3 bn

Electric vehicles on the road,  
equivalent to 30% - 90% of  
the total LDV fleet



52-118 mbd

Global oil demand,  
compared to 99 mbd in 2018

# What makes the Energy Transition so uncertain



What part will renewables play in the future energy mix



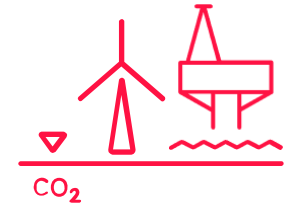
What will be the customers needs and demand



How fast can we transform



How will the future energy system look like



How can low carbon fossil fuels and renewables play together

# Offshore wind – a part of the solution



High growth rates



Scalable



Truly a global solution



Floating wind – high potential



# We need to solve the whole equation

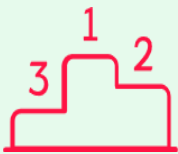
## Business drivers



Growth Potential and Demand



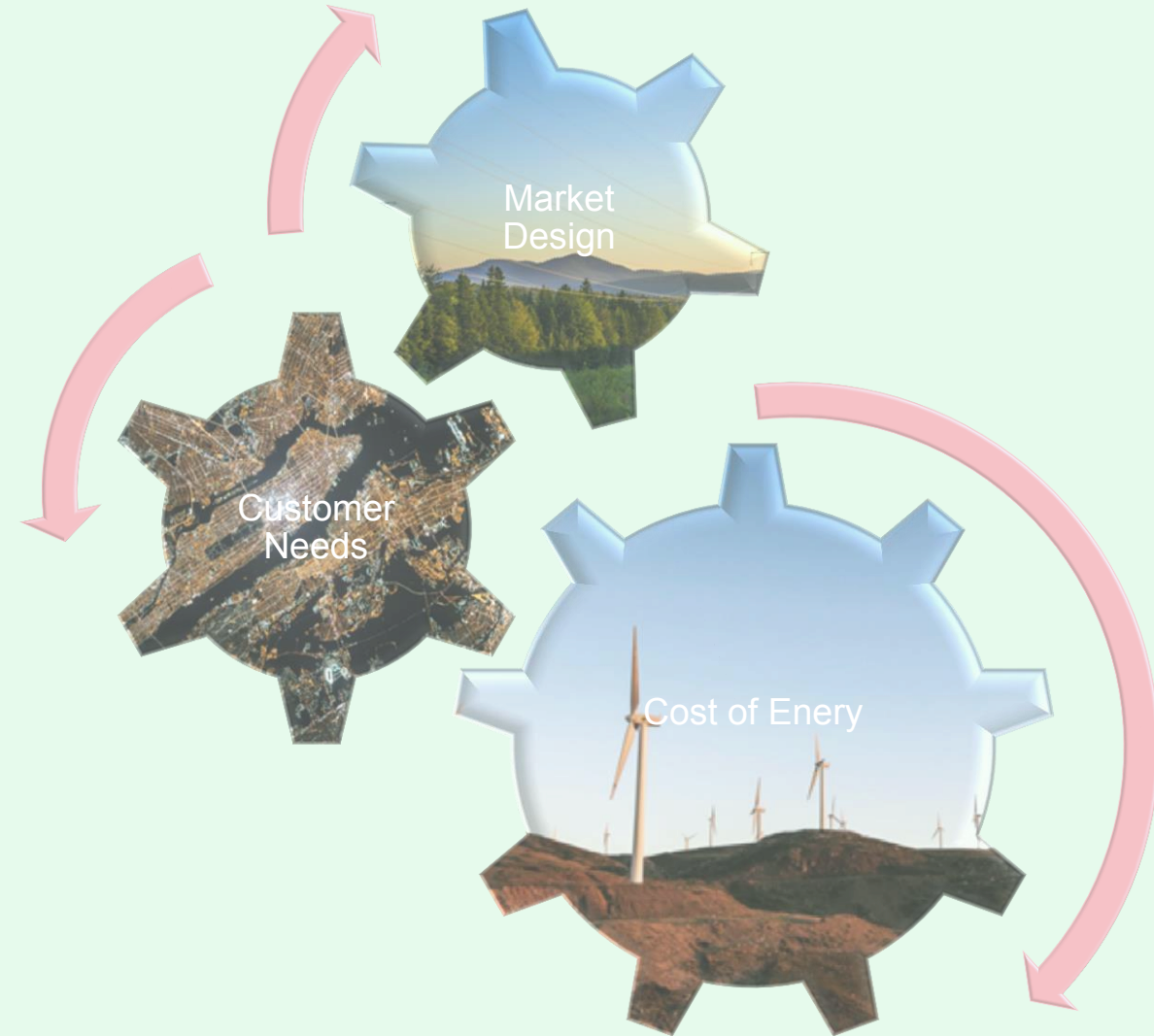
Framework & Conditions



Alternatives & Risk



Returns and Perspectives





# Time to move?

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