

FortisBC Clean Growth Pathway to 2050

Rethinking BC's energy future

Tyler Bryant

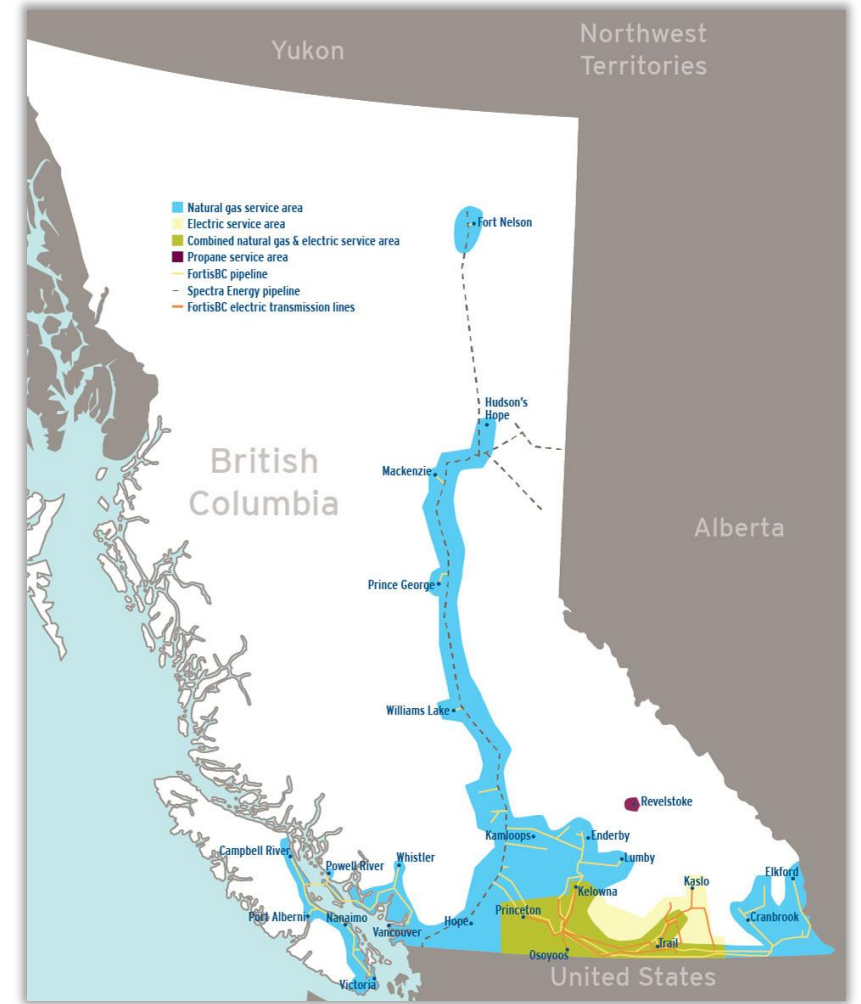
Low-Carbon Policy Strategy Manager



FortisBC

We're the largest energy provider in the province and we're putting more than 100 years of knowledge into creating a cleaner, healthier tomorrow for BC.

- We serve **1.2 million** customers providing:
 - electricity
 - natural gas
 - renewable gas
 - propane
 - alternative energy solutions
- Directly employing **2,400** British Columbians
- 5 year **\$4.3 billion** capital plan



4 pillars of our Clean Growth Pathway to 2050



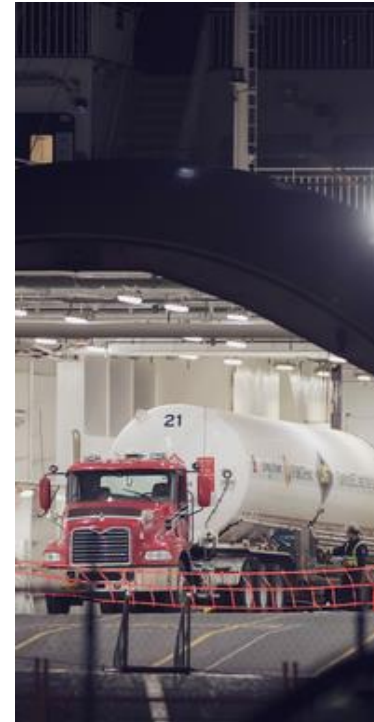
Energy efficiency



Renewable gas



Zero and low carbon transportation



Global LNG

How we'll measure our progress to 2050

We set an ambitious emissions reduction target.

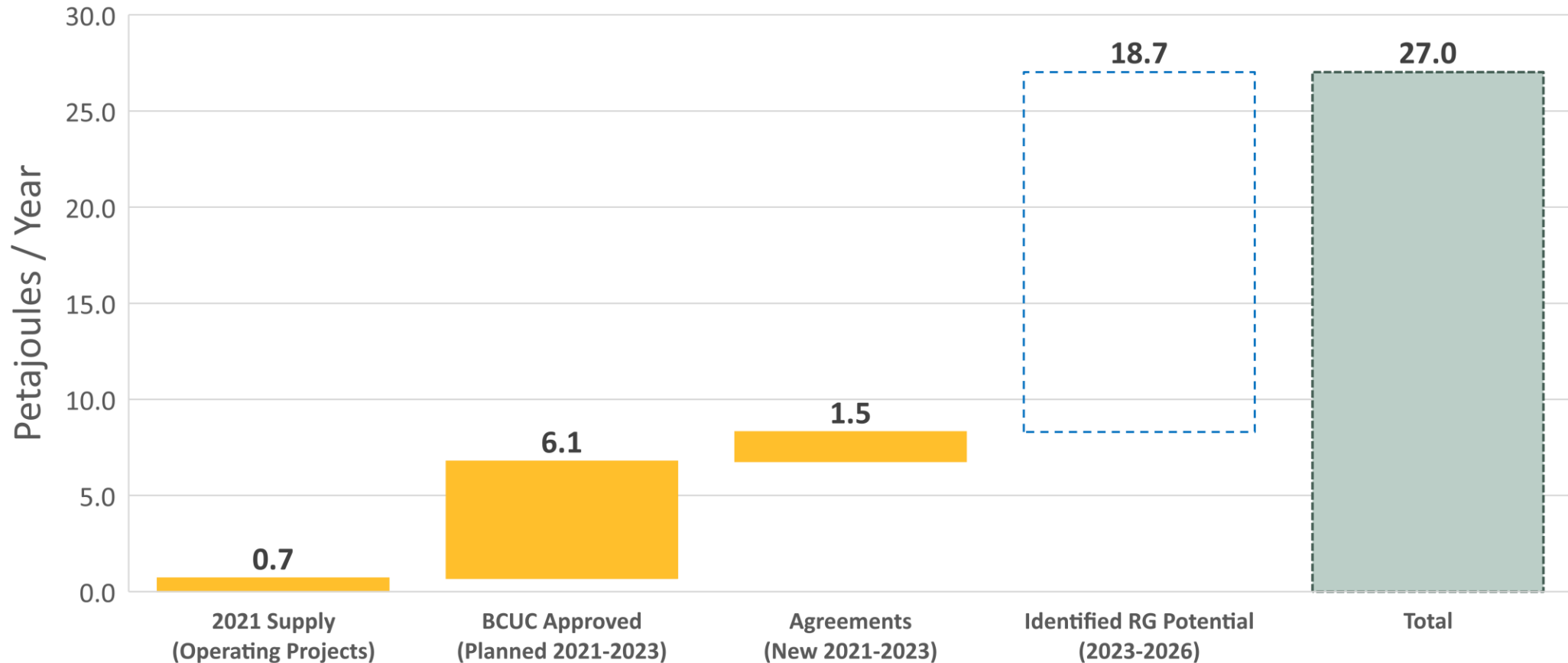
Our **30BY30** target will:

- reduce our customers GHG emissions by **30%** by **2030**
- be a milestone that we measure our progress by



Renewable gas short-term supply outlook

Renewable Gas 5 Year Supply Outlook
As of Q3 2021

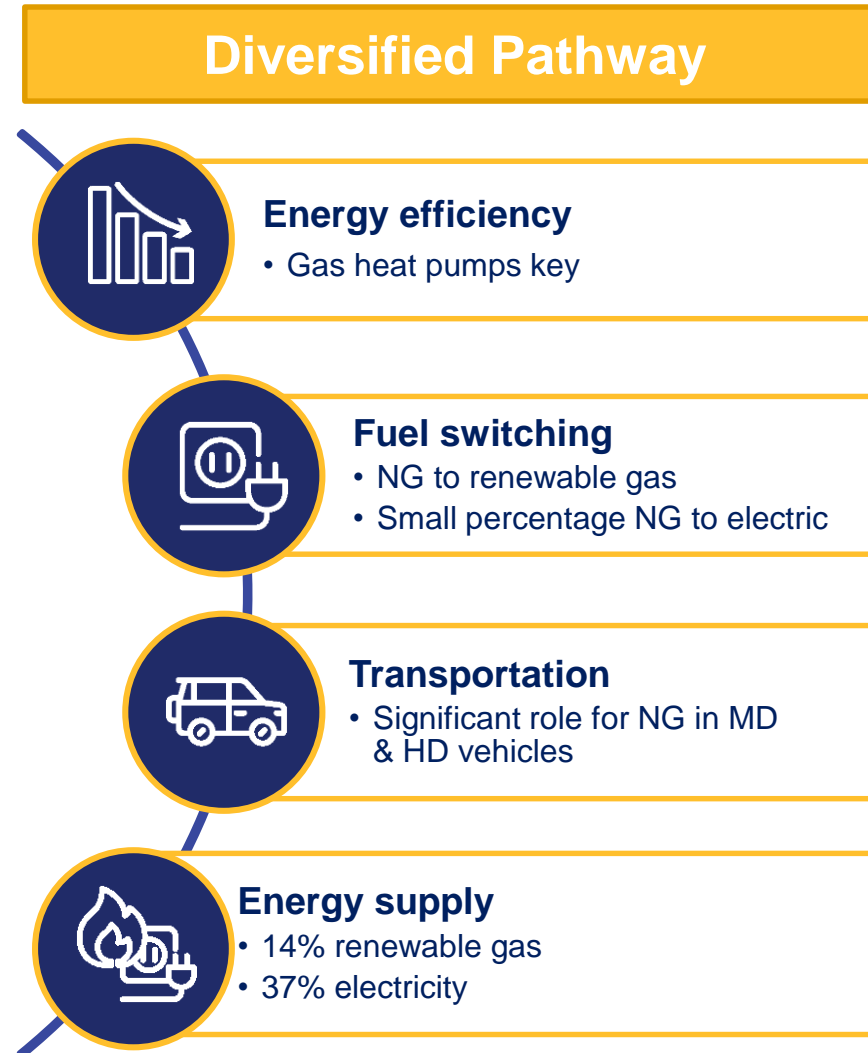
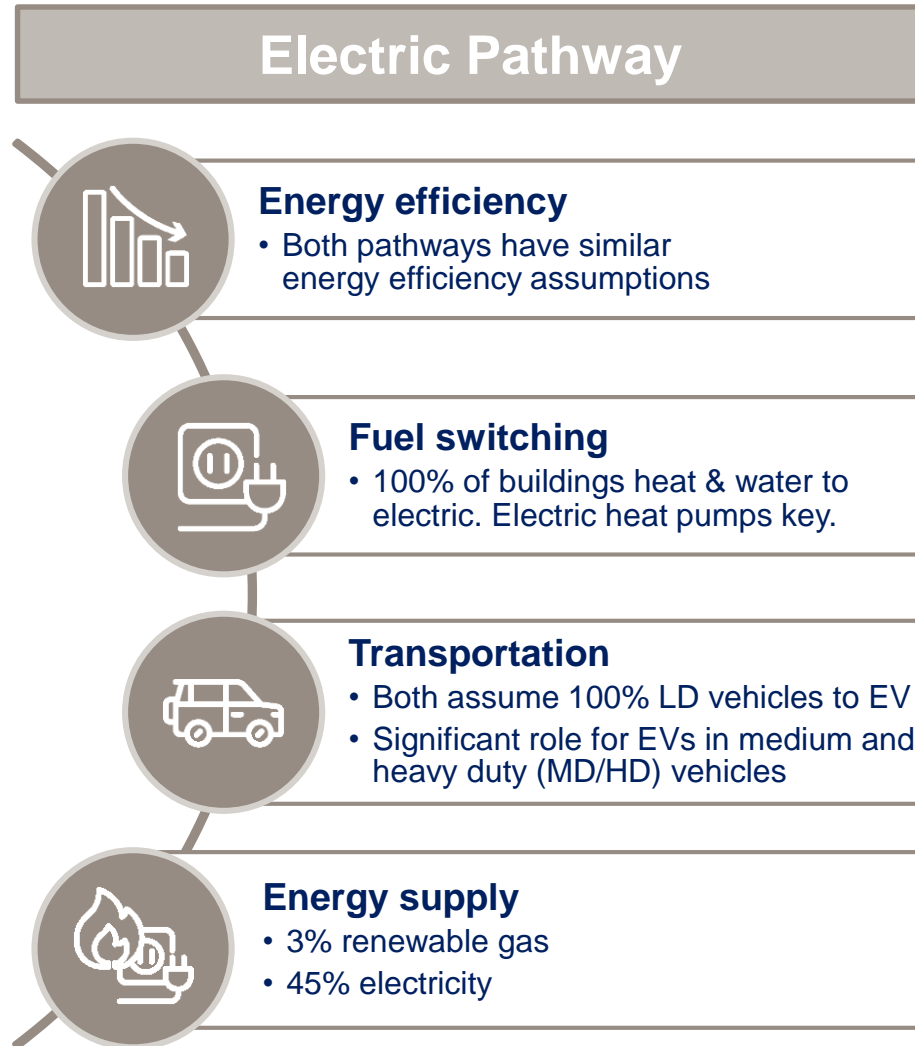


The need for made-in-BC, low-carbon pathways

- FortisBC has a proven history in BC's energy industry.
- While BC already has:
 - significant existing energy infrastructure
 - a clean electricity system
 - large renewable, natural gas and biomass resources
 - a relatively large winter heating load

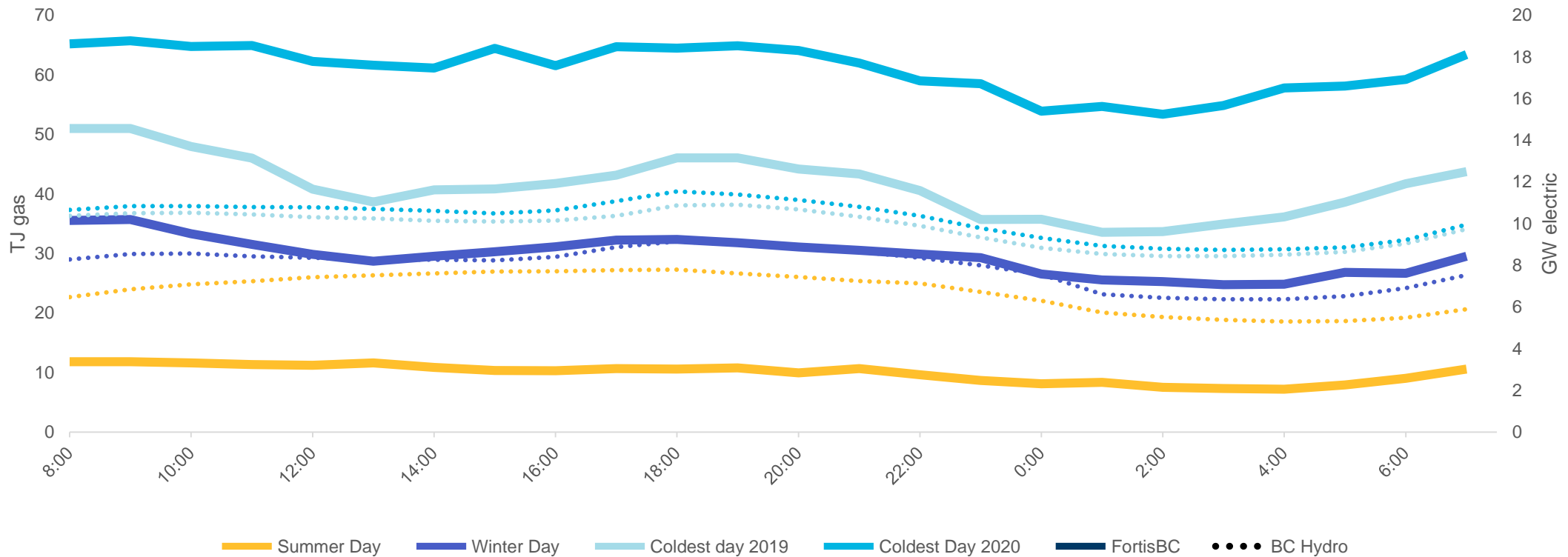


Electric & Diversified Pathways



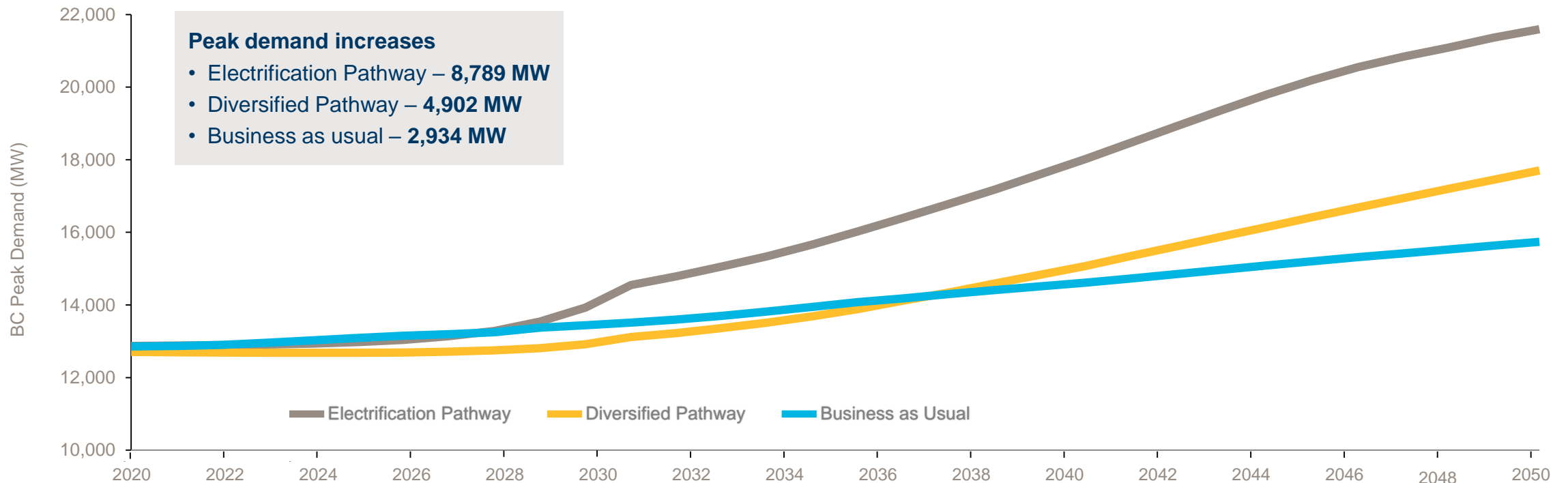
Key challenge: Peak heat demand

On a very cold day, the energy demand on the natural gas system is **60%** higher than the electric system.



Key challenge: Expanding clean peak capacity

Due to the addition of electric vehicles and electric heating, peak demand is expected to increase by approximately **38%** (Diversified Pathway) and **68%** (Electrification Pathway).



*Peak demand impacts are based on conservative assumptions in both pathways (e.g. majority of MHD vehicle charging occurs in non-peak times)

Storage is the critical limitation of electrification

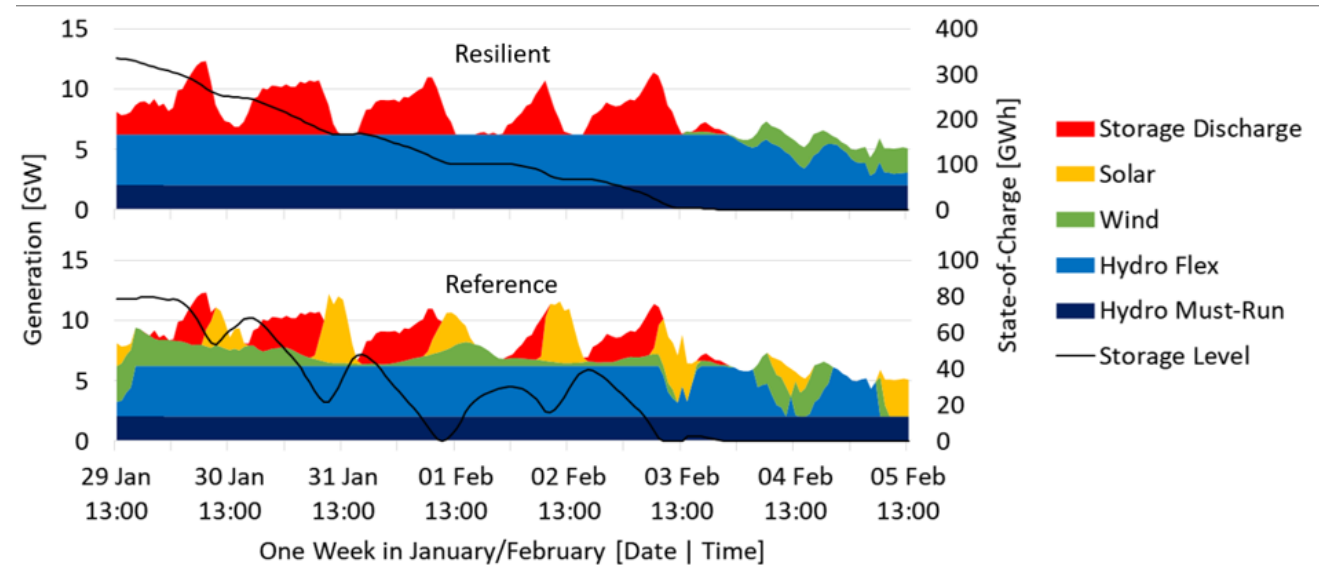
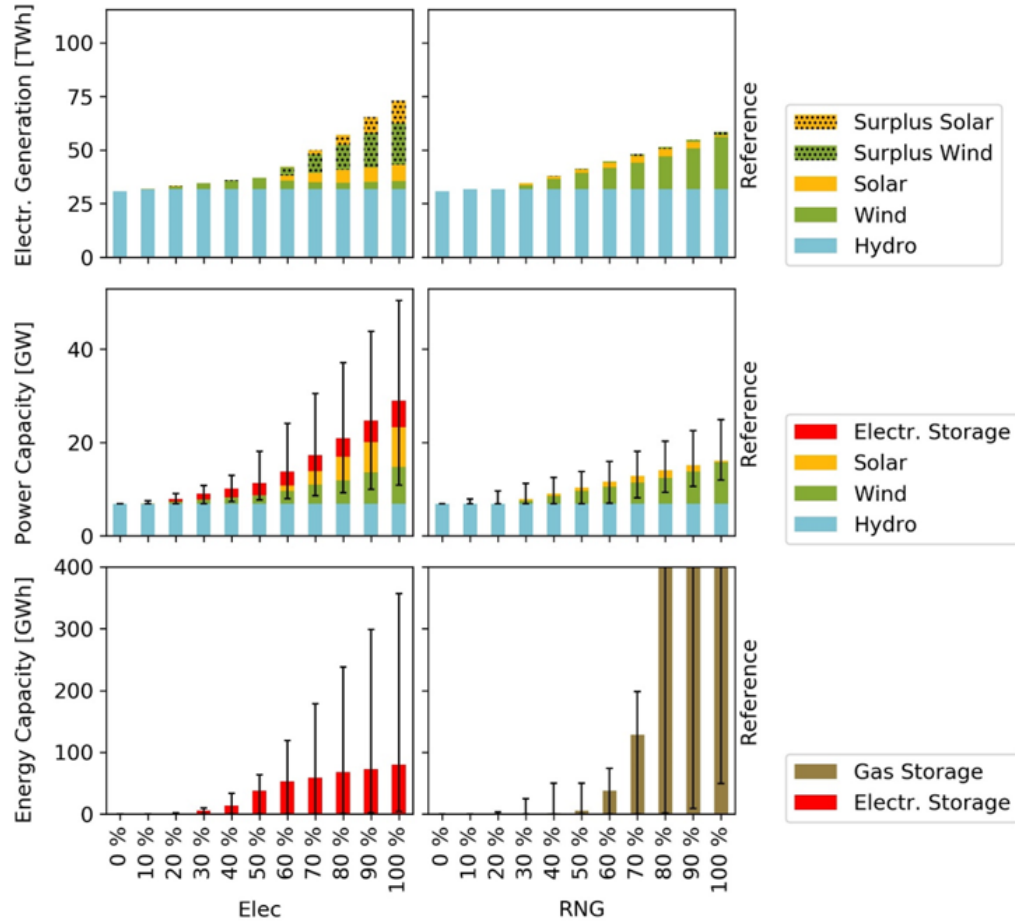
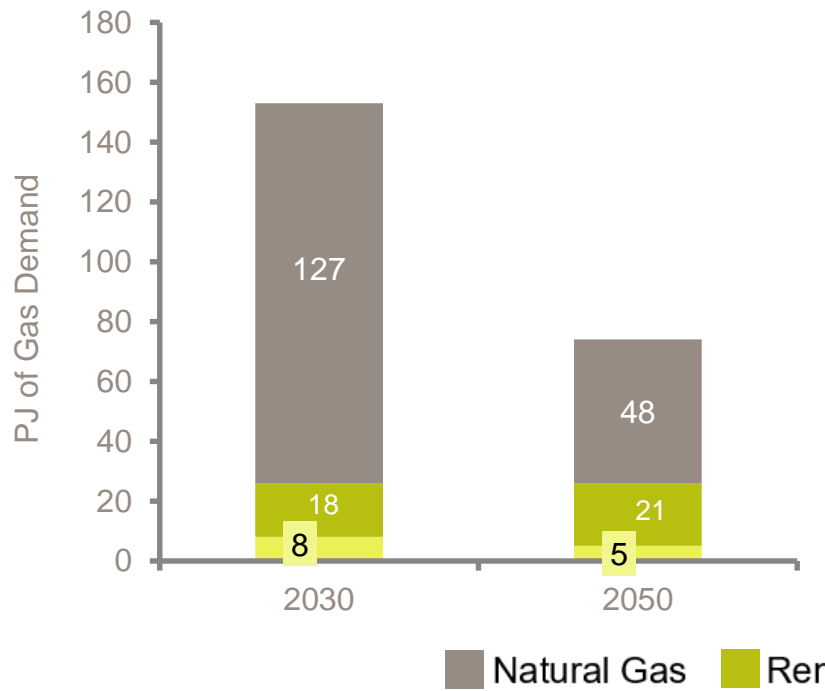


Figure 8. Electricity generation and storage level during the five-day peak demand event in the Resilient (top) and Reference (bottom) scenario of the electrification pathway. The top of the stacked areas delineates the electricity demand.

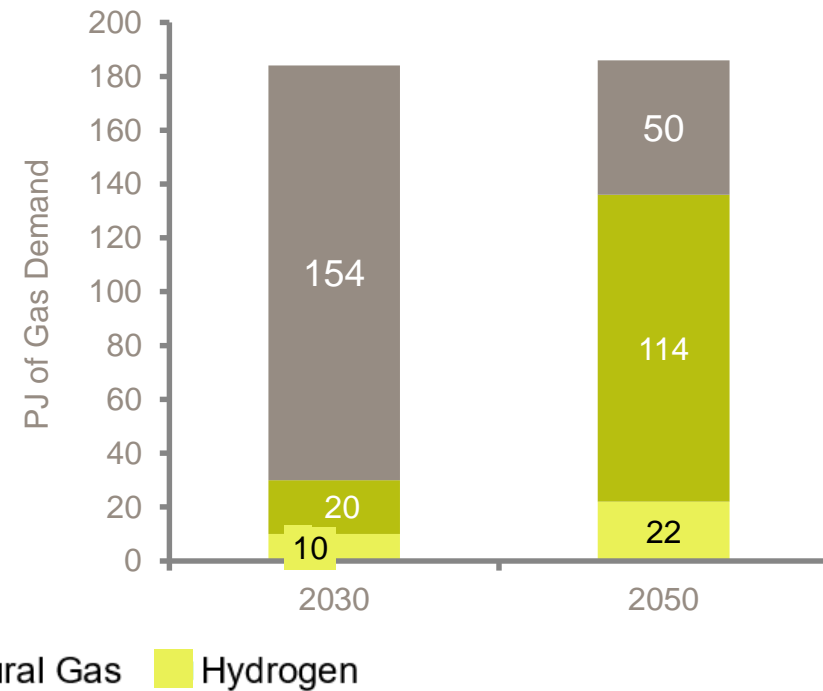
Key challenge: Expanding renewable gas supply

Large potential for renewable gas over the coming decades. Partnerships between governments, industry, Indigenous communities and stakeholders will be key.

Electric Pathway – gas demand



Diversified Pathway – gas demand



Our diversified approach to climate action

- Achieves the Province's **80%** reduction target
- Reduces decarbonization costs by **\$100B**
- Considers peak day demand and related infrastructure
- Provides important resiliency and reliability
- It's not either/or, **it's both/and**

