



# Remarks on BP's Energy Outlook 2020

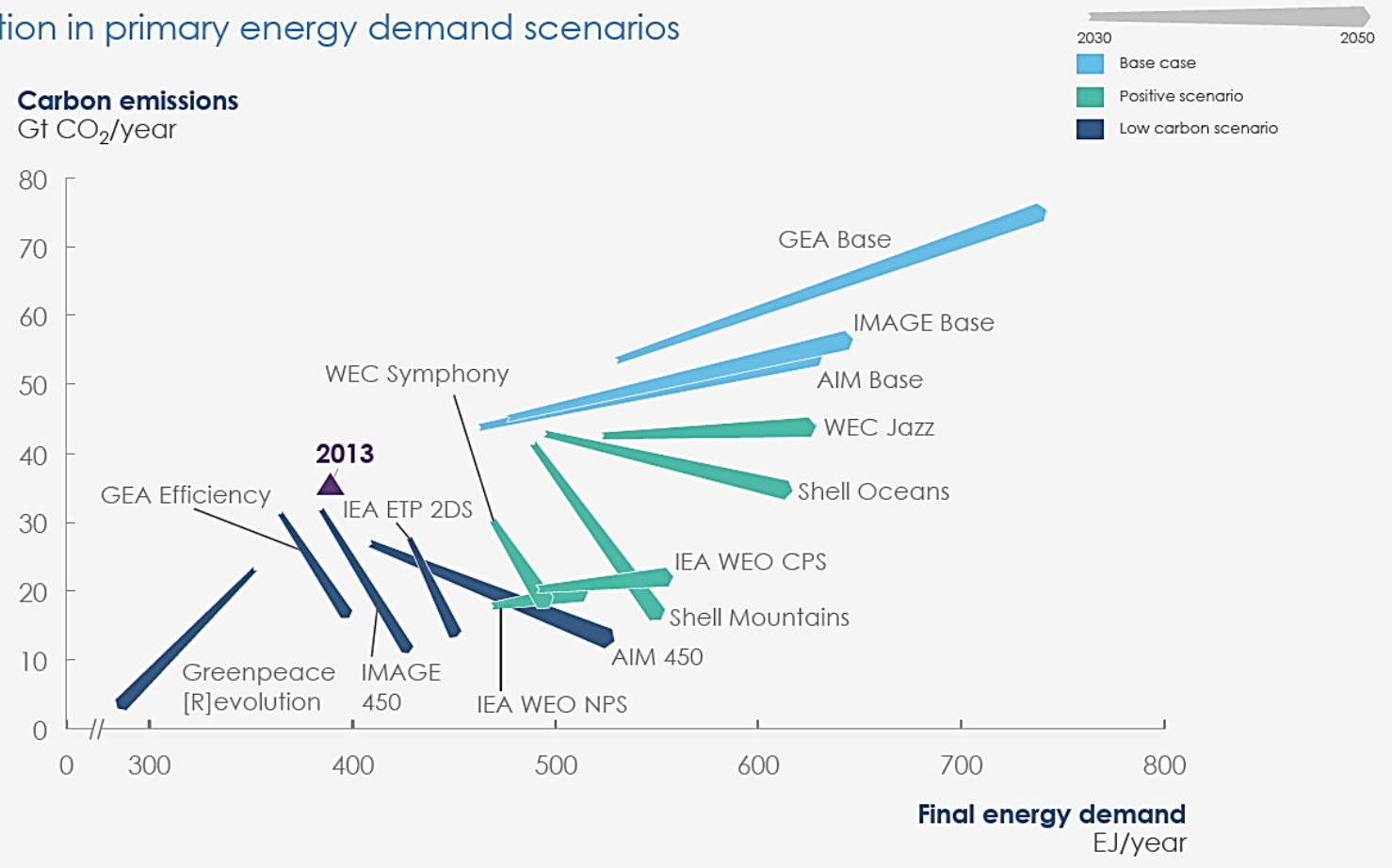
Gert Jan Kramer  
CIEP event, 28 October 2020



# The Scenario Space in 2016

EXHIBIT 4

Large variation in primary energy demand scenarios



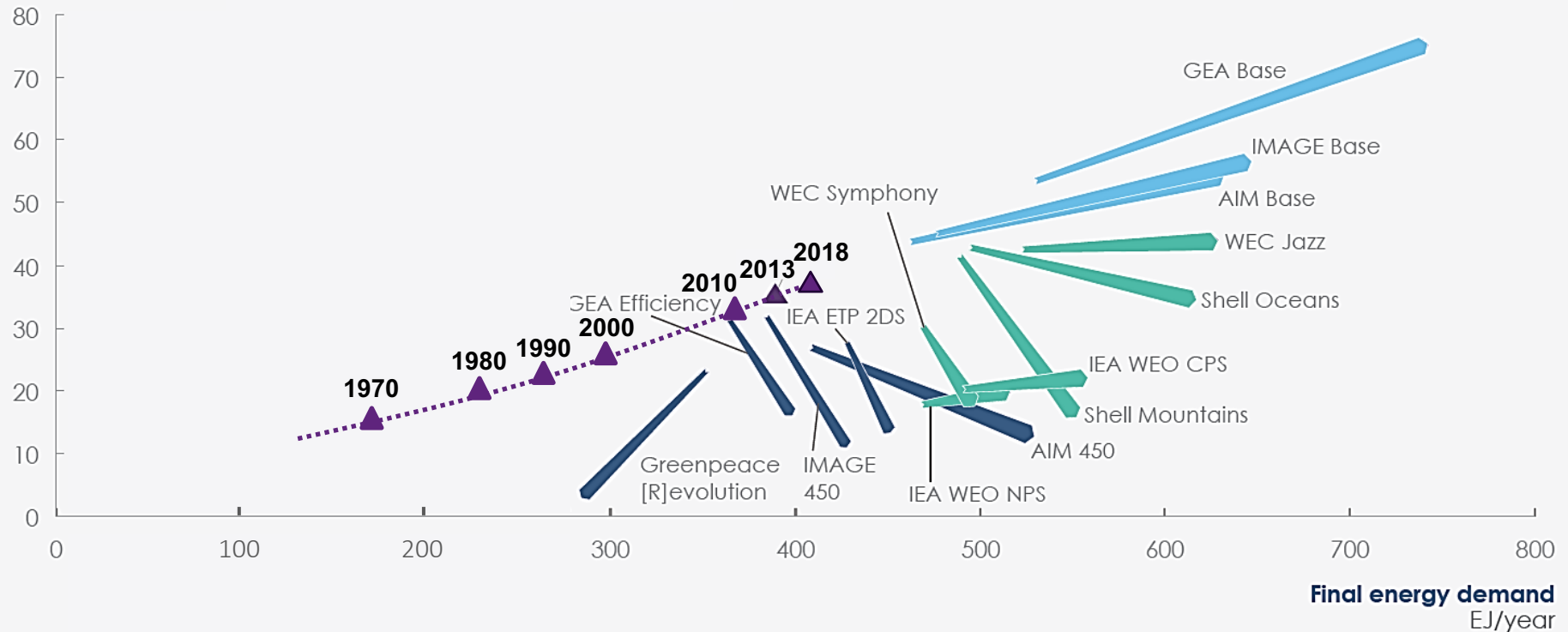


# Scenarios as Departures from the Trendline

EXHIBIT 4

Large variation in primary energy demand scenarios

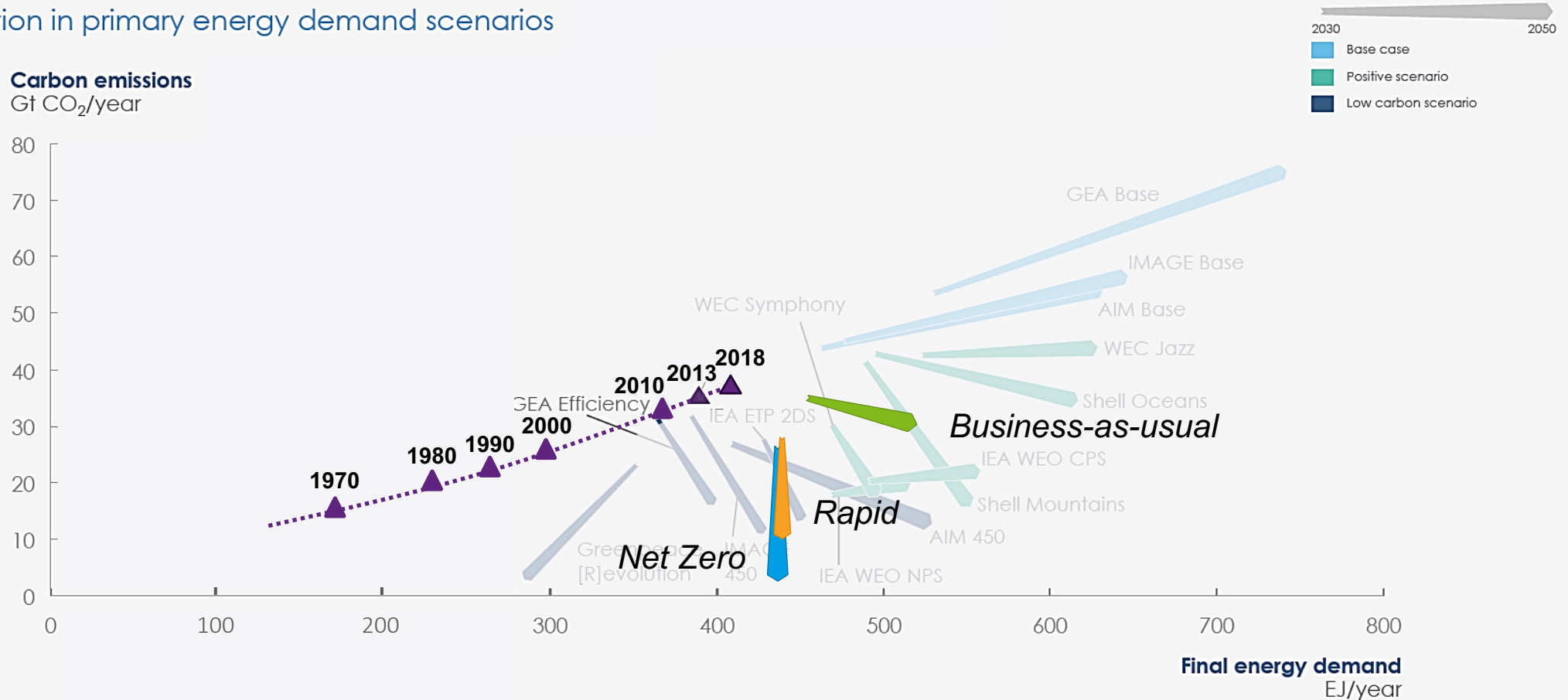
**Carbon emissions**  
Gt CO<sub>2</sub>/year





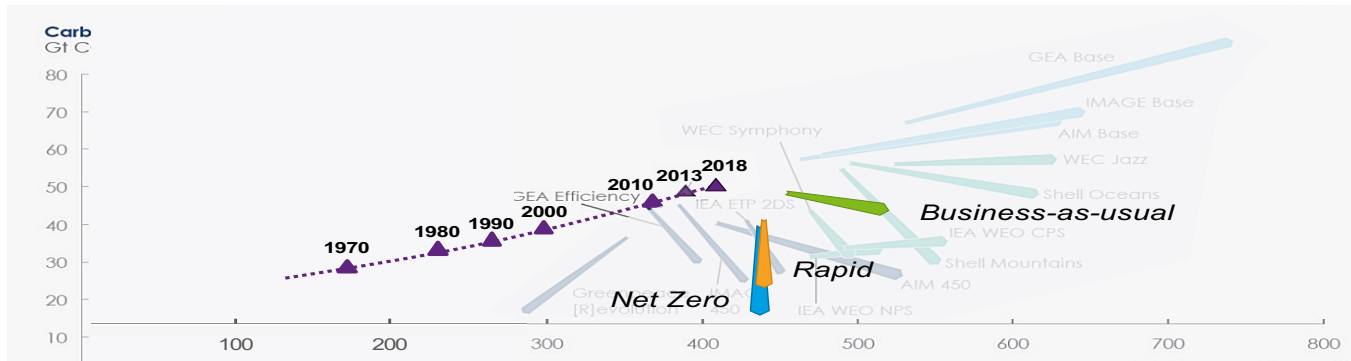
# The BP Scenarios in Context

EXHIBIT 4  
Large variation in primary energy demand scenarios





# General Observations and a Few Questions



- All scenarios, even “business-as-usual”, are very radical departures from the historic trendline.
- Energy demand moderation is quite extreme. Will 3 billion more people than today (and perhaps 5 billion more in the middle class) be able satisfy their ambitions?
- Rapid and Net Zero seem to be ‘strong policy’ and ‘even stronger policy’, but you do not seem to articulate a choice in *how* to reach the target.
  - What about the CCS agenda?
    - CCS only features in BECCS (but isn’t all CO<sub>2</sub> the same)
    - CCUS – is the ‘U’ scalable? And affordable?
- The Outlook and The Netherlands: the strong ‘Klimaatakkoord’ for 2030 seems Rapid-like. Even for a wealthy, well-governed nation, it’s a daunting challenge to deliver on it.

A photograph of a vast green field with a single, large, leafy tree in the center. The sky is bright blue with scattered white clouds. The image is partially overlaid by a semi-transparent white and yellow graphic on the left side.

**Thank you!**

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