



ENERGY DECARBONISATION AND CLEAN POWER 2030

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Electricity Networks

Handling a Shock to the System

IET position statement on the whole system challenges facing
Britain's electricity network



Future Power System Architecture

A report commissioned by the Department of Energy & Climate Change

1. Summary Report

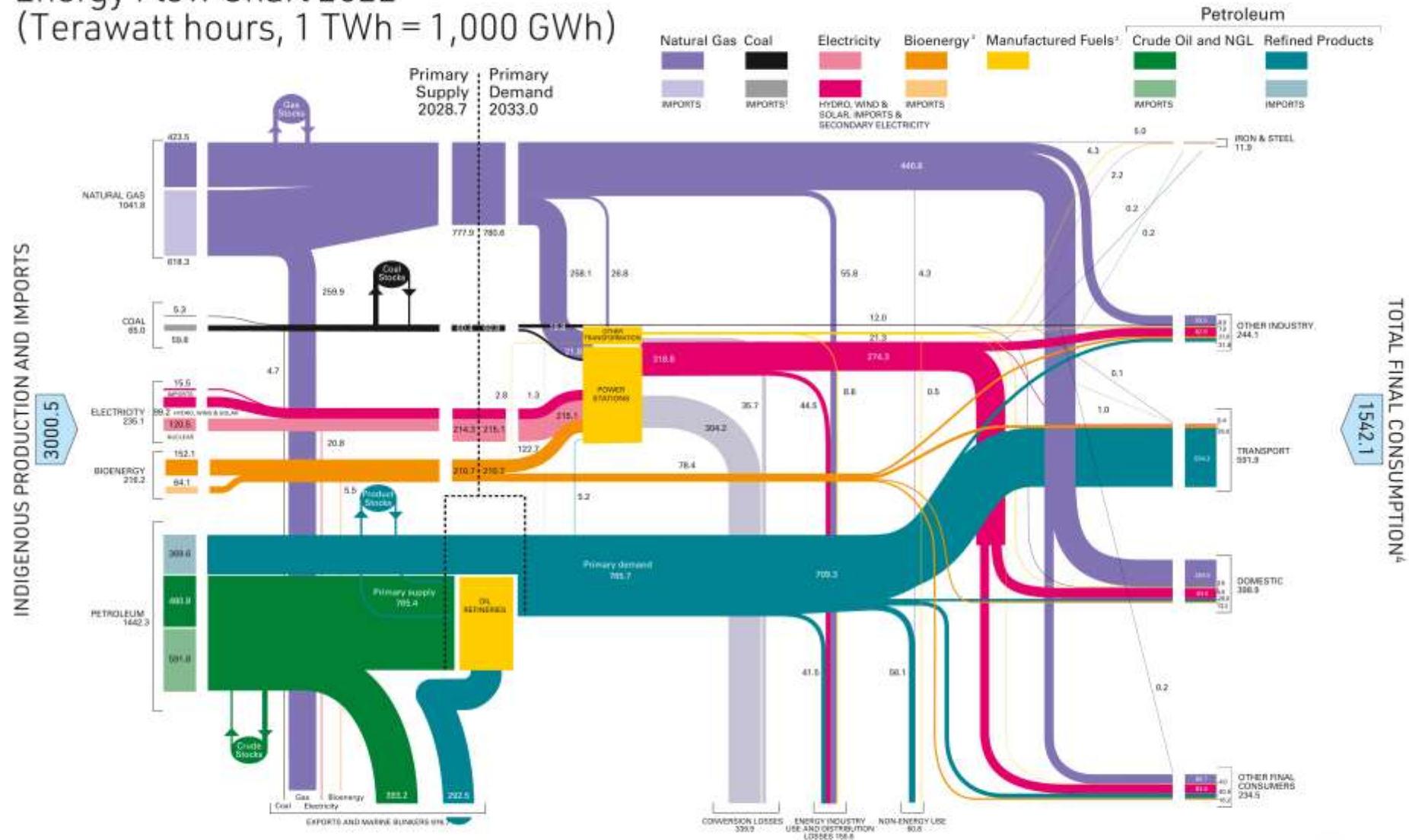


July 2024

Rapid decarbonisation of the GB electricity system



Energy Flow Chart 2022 (Terawatt hours, 1 TWh = 1,000 GWh)



FOOTNOTES:
 1. Coal imports, exports and power stations include manufactured fuels.
 2. Bioenergy is renewable energy made from material of recent biological origin derived from plant or animal matter.
 3. Includes heat sale.
 4. Includes non-energy use.
 This flowchart has been produced using the style of balance and figures in the 2022 Digest of UK Energy Statistics, Table 1.1, (gross calorific value basis)

Clean Power 2030

Advice on achieving clean power
for Great Britain by 2030

Clean Power 2030 Action Plan: A new era of clean electricity

December 2024

The clean power 2030 shopping list

- 30 GW offshore wind and connections to shore
- 12 GW onshore wind
- 30 GW solar PV
- 20 GW battery storage
- 10 GW demand flexibility
- 3 GW international interconnectors
- 88 different 400 kV or DC transmission projects



UK infrastructure

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UK electricity networks plan ‘unprecedented’ £77bn investment in clean power push

Backlog in electricity network connections has been holding back renewable energy projects



Save



The planned investments by National Grid, ScottishPower Energy Networks and SSEN Transmission will cover the period from 2026 to 2031 © Gareth Fuller/PA





















