



**Hydrogen 101**

**Hydrogen  
in the  
Energy  
System**

**Hydrogen Council**





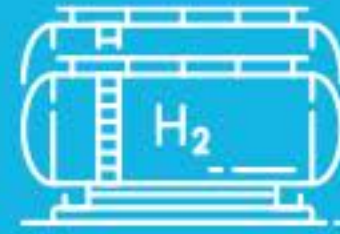
## How does hydrogen energy fit into the existing energy systems?

The strength of hydrogen as an energy carrier lies in its portability and high energy density. These features make hydrogen a feasible solution for transportation or off-grid energy in hard-to-access areas such as construction sites. This means that hydrogen is an ideal solution for decarbonizing sectors that produce lots of carbon emissions. Ultimately, hydrogen enables more flexibility in our energy systems, enabling low-carbon or carbon-free alternatives to reduce emissions and strive towards our global net zero goals.





Industrial processes



Energy storage



Electric power generation



Fuel cells - portable electrical systems



Space heating



Fuel cells - vehicles