

The production of renewable energy continued to increase (up 19% to 291 PJ). Renewable energy sources can now supply 30% of domestic electricity use and have exceeded aggregate annual household electricity demand since 2019-20, with combined solar and wind energy supply exceeding aggregate household demand for the first time in 2021-22.



Australia holds abundant energy resources and is a leading exporter of coal, uranium and LNG, however the country's energy sector is undergoing a deep transformation with significantly increasing shares of wind and solar power. By 2030, the government aims to reach the clean electricity target of 82% of renewable energy. In addition to



Renewable sources contributed an estimated 77,716 GWh, making up 29% of Australia's total electricity generation, up 5 percentage points on the share in 2020. The largest source of renewable generation was solar (12% of total ???





Australian Energy Statistics 2020 Energy Update Report: 1.92 MB: Guide to the Australian Energy Statistics 2020: 843.79 KB: Guide to the Australian Energy Statistics 2020: 842.86 KB: Australian Energy Update 2020 data for charts: 323.35 KB: Table A: Australian energy supply and consumption 2017-18 and 2018-19, energy units: 69.49 KB



failing to source a certain percentage of their energy needs from renewable sources. The aim of achieving 23.5 per cent renewable energy (equivalent to 33,000 gigawatt hours) by 2020 was met ahead of time, with Australia's Clean Energy Regulator approving the requisite amount of capacity on 4 September 2019.



The Australian Energy Statistics is the authoritative and official source of energy statistics for Australia and forms the basis of Australia's international reporting obligations. It is updated annually and consists of historical energy ???





The figure shows Australian electricity generation fuel mix in shares from 1997-98 to 2022-23 and calendar year 2023. Fossil fuels contributed 65% of total electricity generation in 2023, including coal (46%), gas (17%) and oil (2%).



The RET sets a target to deliver an extra 33,000 gigawatt-hours (GWh) of electricity from renewable sources every year from 2020 to 2030. The RET creates a market to incentivise the generation and use of renewable ???



Approximately one-seventh of the world's primary energy is now sourced from renewable technologies. Note that this is based on renewable energy's share in the energy mix. Energy consumption represents the sum of electricity, transport, and heating. We look at the electricity mix later in this article.





A brief history of renewable energy in Australia. to buy a set percentage hours under the Large-Scale Renewable Energy Target was largely achieved in 2020 and since then has not been



an increase of almost 5 percentage points compared to 2020. In the past five years, the proportion of Australia's electricity that comes from The growth of renewable energy in Australia in 2021 was again led by small-scale solar. The sector added 3.3 GW of new capacity during the year, representing the fifth year in a



The COVID-19 pandemic had a significant effect on Australia's energy supply and use in 2020???21. Transport energy use fell for a second consecutive year after decades of steady growth, and there was switching away from commercial into residential energy use as a result of lockdowns and increased working from home.





The figure shows Australian electricity generation from renewable sources in gigawatt hours from 1998-99 to 2022-23. The composition of renewable energy in Australia has diversified significantly as wind and ???



Small-scale Renewable Energy Investment.

Australia's small-scale renewable generation capacity has grown rapidly in recent years and is now equivalent to around 20 per cent of the NEM's total capacity. Spending on small-scale generation (mainly rooftop solar electricity and heating) has increased in recent years to around \$3.5 billion in 2019



In 2023, the total estimated generation incentivised by the Small-scale Renewable Energy Scheme (SRES) and Large-scale Renewable Energy Target (LRET) was 27,900 gigawatt hours (GWh) and 48,800 GWh respectively. This represented around 28% of all electricity generation in Australia, 12% higher than 2022.





Australia's energy consumption fell by 2.9 per cent in 2019???20 to 6,014 petajoules. This compares with average growth of 0.7 per cent a year over the previous ten years to 2018???19. The drop in energy consumption in 2019???20 was 182 petajoules: the same amount of energy from filling a 55-litre tank of petrol 97 million times.



In 2022???23 total electricity generation in Australia increased 1 per cent, to around 274 terawatt hours (988 petajoules), as demand increased across much of the country due to warmer and cooler weather at different points of the year. Fossil fuel sources contributed 65 per cent of total electricity generation in 2023, including coal (46%), gas (17%) and oil (2%).



Table O of the Australian Energy Statistics has been updated to include estimates for 2021-22 and calendar year 2022 using the latest data available on Australia's total electricity generation. Total electricity generation in Australia was estimated to be 273,265 gigawatt hours (GWh) in calendar year 2022, a 2% increase from 2021. Renewable sources contributed an ???





Australian Energy Update 2020 2 Energy consumption The Australian economy grew by 1.9 per cent in 2018???19 to reach \$1.9 trillion. Population grew by 1.5 per cent to reach 25.4 million people. Australia's energy consumption rose by 0.6 per cent in 2018???19 to reach 6,196 petajoules.



In 2020, renewable energy sources (including wind, hydroelectric, solar, biomass, and geothermal energy) generated a record 834 billion kilowatthours (kWh) of electricity, or about 21% of all the electricity generated in the United States.Only natural gas (1,617 billion kWh) produced more electricity than renewables in the United States in 2020. Renewables ???

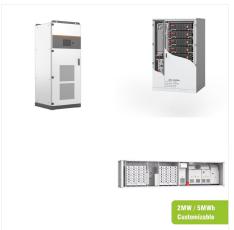


Renewable Energy Statistics 2020 provides data sets on power-generation capacity for 2010-2019, actual power generation for 2010-2018 and renewable energy balances for over 130 countries and areas for 2017-2018. Data was obtained from a variety of sources, including an IRENA questionnaire, official national statistics, industry association





Renewable Energy Statistics 2021 provides data sets on power-generation capacity for 2011-2020, actual power generation for 2011-2019 and renewable energy balances for over 130 countries and areas for 2018-2019. Data was obtained from a variety of sources, including an IRENA questionnaire, official national statistics, industry association



Monthly electricity prices in selected EU countries 2020-2024. EU-ETS allowance prices in the European Union 2022-2024. Outlook for 100 percent renewable energy transition Australia 2050 by source



Australian Energy Statistics for electricity generation shows that 24 per cent of Australia's electricity came from renewable energy last year, up from 21 per cent in 2019. This increase with driven by a boom in solar installation.





The annual target increased each year until 2020 and is now constant at 33,000,000 megawatt hours (MWh) until 2030. The renewable power percentage (RPP) helps calculate the amount of LGCs liable Find out your legal obligations and fees if you make relevant acquisitions under the Renewable Energy Target (RET). arrow_right_alt.



The line chart shows the percentage of total energy supplied by each source. Renewable energy here is the sum of hydropower, wind, solar, geothermal, modern biomass and wave and tidal energy. Australia: Energy intensity: how much energy does it use per unit of GDP? Click to open interactive version.



This page was first published in July 2020 and last revised in January 2024. Cite this article Reuse our work freely. Renewable energy is a collective term used to capture several different energy sources. "Renewables" typically include hydropower, solar, wind, geothermal, biomass, and wave and tidal energy.

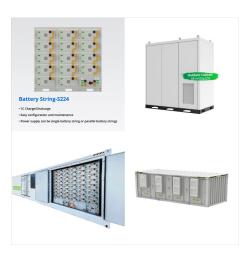




In 2020, Australia operated 91 hard coal and three lignite mines, with over 200 coal deposits. Most hard coal mines were in Queensland (67%) and New South Wales Renewable energy has potential in Australia, and the Climate Change Authority is reviewing the 20-percent Renewable Energy Target (RET). The production of 50 megawatts of wind power



Employment in Renewable Energy Activities,
Australia Reference Period 2017-18 financial year;
Data from the Clean Energy Regulator (2020)
reports that there were cumulatively over 2.2 million
roof-top solar PV systems installed in Australia at
the end of December 2019. Percentage of suitable
dwellings with roof-top solar PV (a), 2017-18



The Australian Energy Statistics is the authoritative and official source of energy statistics for Australia to support decision making and help understand how our energy supply and use is changing. This edition contains the latest data for 2021-22. Australian renewable energy consumption, energy units: 83.04 KB: Table S: Australian