Colombia’s performance has improved overall thanks to higher scores for Environmental Sustainability and some gains on Energy Security and Energy Equity. The big improvement is due largely to the decision to incorporate 2200MW of renewables into electricity generation as part of the effort to diversify its energy mix. Colombia gets a balance grade BCA and its global ranking is 35.

Trends and Outlook

Colombia is an oil and gas producer and a net exporter of crude oil, mainly to the U.S. market. Its oil exports, however, have declined in recent years because of higher domestic demand for refined products. It has also suffered from sporadic production outages as a result of frequent bombings of oil pipelines. The country is also a producer of natural gas, all of which is used domestically. It imports Liquefied Natural Gas to make up for the gap between gas supply and demand, which rose by an average 3-5% annually in the last decade, and as backup for hydroelectric plants during periods of drought. Colombia has the largest coal reserves in South America and is one of the world’s biggest coal exporters.

Colombia relies largely on renewable energy for power generation with hydropower accounting for 65% of the total alongside solar, wind and biomass. The heavy reliance on hydropower allows Colombia to provide affordable, clean and reliable energy while keeping carbon emissions low, which is why it scores highly on sustainability and equity. However, recent droughts have meant that it has had to import larger quantities of LNG. In 2019, Colombia launched a renewable energy auction, awarding contracts for the addition of 1077MW of wind capacity and 297MW of solar by 2022. This followed the award of contracts for 826MW of renewables in a 2019 reliability auction. These will raise the country’s generation capacity by 2250MW and bring in more than $2 billion in foreign investment.

In January 2020, it approved connection approval to more than 510 renewable energy projects outside the auction framework, which could potentially result in around 7500MW of new installed capacity as part of the effort to expand the share of renewables in its energy mix and meet anticipated demand growth. In recent years, the government introduced an energy efficiency programme targeting a 9% reduction in energy consumption by 2022.

In June 2020, the energy ministry invited tenders for a second regasification terminal on the Pacific coast and plans to award a contract in the second quarter of 2021. The country’s LNG terminal near the Caribbean city of Cartagena began operating in 2016 and helped to secure supply to thermal power plants during an abnormally dry season that lasted from August 2019 to June 2020.

Additionally, political and regulatory changes have opened opportunities for battery storage, distributed generation, self-generation and smart metering.