

Table 2.1. Installed generating capacity by fuel type: Africa, Comparative Reference case

gigawatts

fuel	2019	2025	2030	2035	2040	2045	2050	Average annual percent change, 2019-2050
Liquids-fired	17.0	10.0	6.4	3.9	2.2	1.5	1.5	-7.6
Natural-gas-fired	91.3	89.6	103.6	134.6	152.9	169.8	180.9	2.2
Coal-fired	47.5	51.4	51.4	51.4	51.4	51.4	57.2	0.6
Nuclear	1.9	1.9	3.2	2.7	4.1	4.1	5.4	3.5
Renewables								
Biomass	1.0	1.5	2.7	2.8	3.1	3.1	3.3	3.9
Geothermal	0.7	2.6	5.2	6.8	8.8	9.4	9.4	8.9
Hydro	26.5	32.1	39.6	44.8	51.8	64.8	78.0	3.6
Solar	7.4	21.8	35.2	42.9	50.2	67.1	103.4	8.9
Waste	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.0
Wind	5.6	20.1	30.7	31.9	33.0	34.2	35.3	6.1
Other renewables	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total renewables	41.3	78.4	113.6	129.3	147.1	178.8	229.6	5.7
Total	199.0	231.1	278.2	321.8	357.7	405.6	474.7	2.8

Totals may not equal sum of components as a result of independent rounding.

Sources: U.S. Energy Information Administration (EIA), World Energy Projection System (2020)

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Table 2.2. Net electricity generation by fuel type: Africa, Comparative Reference case

billion kilowatthours

fuel	2019	2025	2030	2035	2040	2045	2050	Average annual percent change, 2019-2050
Liquids-fired	76.9	45.0	28.6	17.6	10.1	6.7	6.7	-7.6
Natural-gas-fired	307.5	331.8	389.3	487.8	585.9	648.0	688.6	2.6
Coal-fired	253.3	270.7	243.8	275.1	296.4	325.6	372.6	1.3
Nuclear	12.9	12.9	22.4	18.9	28.4	28.4	37.8	3.5
Renewables								
Biomass	0.0	1.2	2.4	3.1	3.5	3.6	5.5	infinity
Geothermal	4.8	19.5	38.7	50.3	65.5	69.9	69.9	9.0
Hydro	112.5	133.7	160.1	182.9	214.7	276.5	333.9	3.6
Solar	14.6	47.5	78.6	96.6	113.9	154.0	240.1	9.5
Waste	0.0	0.0	0.0	0.0	0.0	0.0	0.3	infinity
Wind	17.5	57.5	87.7	91.6	95.0	98.6	102.6	5.9
Other renewables	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total renewables	149.4	259.4	367.5	424.6	492.5	602.6	752.3	5.4
Total	800.0	919.7	1051.7	1224.0	1413.3	1611.3	1858.0	2.8

Totals may not equal sum of components as a result of independent rounding.

Sources: U.S. Energy Information Administration (EIA), World Energy Projection System (2020)

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