

Renault Kangoo

E-TECH EV45 ELECTRIC FWD AUTOMATIC

2023



90%



10.0 
/10

**Clean Air
Index**

8.5 
/10

**Energy Efficiency
Index**

8.7 
/10

**Greenhouse Gas
Index**

10.0
/10



Clean Air Tests



Laboratory Test

		NMHC	NO _x	NH ₃	CO	PN
10.0/10	Cold Test	●	●	●	●	●
10.0/10	Warm Test	●	●	●	●	●
10.0/10	Highway	●	●	●	●	●
10.0/10	Cold Ambient Test	●	●	●	●	●



Road Test

10.0/10	On-Road Drive	●	●	●	●	●
5.0/5	On-Road Short Trip	●	●	●	●	●
8.0/8	On-Road Heavy Load	●	●	●	●	●
5.0/5	On-Road Light Load	●	●	●	●	●
2.0/2	Congestion	●	●	●	●	●



n.a.



good



adequate



marginal



weak



poor

Comments

The tested Kangoo E-Tech is a pure electric vehicle and no pollutants are emitted at the tailpipe. Accordingly, the car scores the maximum index of 10 in this part of the assessment.

Energy Efficiency Tests



Laboratory Test

Energy

9.9/10	Cold Test		→	21.0 kWh/100 km
9.9/10	Warm Test		→	20.8 kWh/100 km
7.7/10	Highway		→	35.8 kWh/100 km
6.8/10	Cold Ambient Test		→	42.3 kWh/100 km

Consumption

Driving Range

Average	25.9 kWh/100 km	217 km
Worst-case	42.3 kWh/100 km	125 km



n.a.



good



adequate



marginal



weak



poor

Comments

Kangoo's consumption is rather high, but to some extent this can be explained by the body type, which is designed to transport goods and offers a high utility value. The vehicle is challenged by the Highway Test where 35.8 kWh/100 km are needed. With 42.3 kWh/100 km, the -7°C Cold Ambient Test requires twice the energy used in the standard test and the range is reduced to 125 km, if such high consumption would be maintained while driving. The measured charging (11 kW) and discharging efficiency is rather poor – 84% of the electricity withdrawn from the grid is available at the battery output.

8.7



/10

Greenhouse Gases Tests



Greenhouse gases

CO₂

N₂O

CH₄

10.0/10 Cold Test



10.0/10 Warm Test



8.1/10 Highway



7.0/10 Cold Ambient Test



n.a.



good



adequate



marginal



weak



poor

Comments

The Greenhouse Gas Index is based on a Well-to-Wheel+ approach, meaning that the greenhouse gas emissions related to the supply of energy are added to the tailpipe emissions. Since the Kangoo E-Tech is a battery electric vehicle, its greenhouse gas emissions originate only from the upstream processes of electricity supply – 60 to 120 g CO₂-eq./km, depending on the test consumption. Thanks to the relatively low CO₂ emissions of European electricity production, the Kangoo scores a 8.7/10 in this part of the assessment, despite its high energy demand.

Our Verdict

The Renault Kangoo E-Tech is a pure electric vehicle with high utility value. It offers enhanced transport capabilities for goods and targets small and medium business. With its relatively small battery (45 kWh) the car is meant to be used mainly on shorter distances. The body type and the high empty mass of 1,840 kg help explain the high consumption values. However, the results could have been better with a higher grid-to-battery-output efficiency. The measured 84% is noticeably poorer than the usual 88% of today's electric cars charged with 11 kW. The standard WLTC+ test closely matches the declared consumption value of 20 kWh/100 km. The On-Road Drive was conducted in rainy and light windy weather at 11°C and the recorded consumption was 23.3 kWh/100 km, which corresponds to a driving range of 226 km. With an average score of 90%, the Kangoo E-Tech just manages to receive all 5 Green stars.

Disclaimer [↗](#)

Specification

Tested Car

VF1RFK0027049xxxx

Publication Date 11 2023	Vehicle Class Small MPV	Tyres 205/60 R16	Emissions Class Euro 6 AX
Mass 1,862 kg	Engine Size n.a.	System Power/Torque 90 kW/245 Nm	Declared CO₂ n.a.
Declared Battery Capacity 45.0 kWh	Declared Driving Range Overall 272 km City 382 km	Declared Consumption 20 kWh/100 km	
Heating Concept PTC			



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