

Contact: Laurens Rutten: press@beuc.eu
Date: 02/06/2022
Reference: BEUC-PR-2022-024

Electric cars: cheaper, more sustainable, and long-lasting – new BEUC research finds

Electric cars are unlikely to require battery replacement and are overall the most environmentally sound option, [new BEUC research finds](#). This follows [a 2021 study](#) which found that electric cars are already the most financially interesting option for many consumers [1] – and will soon be for all drivers.

In today's research, BEUC addresses questions that go beyond the price of an electric car: What about the environmental impact of electric cars? Should consumers expect to have to replace their car's battery at some point?

The main findings include:

- **Batteries are expected to last at least as long as the car itself, making out-of-warranty replacement unlikely.** The 'industry standard' warranty for leading electric cars is 160,000 km (or eight years, whichever comes first), which is close to cars' average lifetime mileage of approximately 200,000 km.
- **Electric cars emit less CO2 than petrol cars, even when considering production.** Producing an electric car is more carbon-intensive, but this accounts for most of its life cycle emissions. As of approximately 20,000 km, the life cycle emissions of electric cars fall below those of petrol cars with the emissions gap increasing afterwards.
- **If electric cars were produced more sustainably, they would still be cheaper than conventional ones.** Decarbonising this production would make cars more expensive, but a first owner would – over a period of four years – still save around €2,000 compared to a petrol car or between €3,800 and €6,700 compared to a conventional car running on e-fuels (synthetic fuels). And that is when taking a pessimistic scenario.

Monique Goyens, BEUC Director General, commented:

"As a newbie electric car owner after 40 years of driving, I am aware how many questions drivers have about the move away from petrol cars. Research by consumer organisations demonstrates we can rest assured electric cars are both good for our wallets and better for the environment than petrol cars. Making products more sustainable and durable is of course a never-ending mission. Policymakers should now focus on cleaning up the electric car supply chain."

Examples of BEUC's advice to EU decision-makers

- Reduce the CO2 emissions from the production phase (supply chain) of electric cars, by adopting a methodology that calculates life cycle emissions.
- Allow consumers to have easy and direct access to battery data in real-time and the 'state of health' of their batteries.

Questions addressed in this research

1. Do electric cars emit less CO2 than petrol cars over their lifetime?
2. Would electric cars still be cheaper than conventional cars if we were to produce them more sustainably?
3. Is battery-electric power the only sustainable solution for the future of passenger cars?
4. How can consumers bear the additional costs of decarbonisation?
5. Will consumers need to replace their electric car's battery?
6. Can batteries be recycled?

[1] It is worth noting that despite increasing energy prices, electric vehicles are still the cheapest option.

Documentation

- [Questions & answers document](#)
- Full study by consultancy Element Energy: [Net-zero car in 2030](#)
- Full study by consultancy Element Energy: [Battery replacement review and recycling cost modelling](#)

Do also read

- [Electric cars and climate action: it's also about payment pricing](#)
- BEUC's view [on improving mobility in Europe](#)

Related articles in member magazines

- Belgium (Test Achats/Test Aankoop): *Voitures électriques : "les batteries s'améliorent" / Elektrisch rijden: "batterijen zijn steeds beter"*, December 2021
- Portugal (DECO): *O top com baterias cada vez melhores*, January 2022

About this research

This study was carried out by Element Energy on behalf of BEUC and its members – national consumer groups – of Belgium (Test Achats/Test Aankoop), Cyprus (Κυπριακού Συνδέσμου Καταναλωτών/Kypriakos Syndesmos Katanaloton), France (UFC-Que Choisir), Germany (Verbraucherzentrale Bundesverband), Italy (Altroconsumo), Lithuania (Lietuvos vartotojų organizacijų aljansas – LVOA), Malta (Għaqda Tal-Konsumaturi), Portugal (DECO), Slovenia (Zveza Potrošnikov Slovenije – ZPS) and Spain (OCU). In all modelled questions, a pessimistic scenario was taken to analyse the decarbonisation of electric cars versus an optimistic one for petrol cars.

ENDS

If you would like to be removed from our mailing list, please let us know.

Bureau Européen des Unions de Consommateurs AISBL | Der Europäische Verbraucherverband

Rue d'Arlon 80, B-1040 Brussels • Tel. +32 (0)2 789 24 01 • press@beuc.eu • www.beuc.eu • www.twitter.com/beuc
TVA: BE 0422 071 051 • EC register for interest representatives: identification number 9505781573-45



This press release is part of an activity which has received funding under an operating grant from the European Union's Consumer Programme (2014-2020).