

When perception meets ownership

How non-EV owners perceive EVs
is radically different to the
experience of owners

Overview

There has been a marked slowdown in the adoption of electric vehicles (EVs) in Ireland in 2024. The most recent figures show just over 17,000 new EVs have been sold between January and November, down 24% on the same period last year.

In 2023, EVs accounted for 18.6% of all car sales in the country, but that figure is now 14.2%, well below the 30% market share for petrol cars and 23% for diesel models, although ahead of plug-in hybrids on 10%.

There are a number of reasons cited for the sales slowdown in Ireland. Sales may have been inflated in 2023 amid pent-up demand and supply issues caused by the Covid pandemic. The first wave of EV buyers also included early adopters and enthusiasts, so a lag should be expected as everyone else takes more time to make the switch.

Other issues include a reduction in government grants and a decision by manufacturers to reduce prices, which has prompted would-be buyers to adopt a wait and see approach amid concerns about resale values.

As EV technology improves, newly released EVs have improved ranges. This is positive but raises doubts among consumers about whether to buy now or wait for further improvements.

The slowdown in sales of EVs is worrying both at manufacturer and government level. Most countries in the EU, including Ireland, are seeking to phase out sales of petrol and diesel cars in the coming years and the transition to EVs is crucial to achieving emission reduction targets.

As a result, manufacturers are calling on policymakers to maintain and increase supports for EVs while also seeking a faster rollout of much-needed public charging infrastructure.

Manufacturers want to highlight the benefits of EV ownership, reminding would-be buyers of the lower running and maintenance costs while emphasising other benefits including increased affordability, longer ranges, extra comfort, greater specification, superior everyday driving characteristics and increased choice and functionality.

Promoting EVs, however, also involves addressing some of the misconceptions non-owners hold about electric car ownership.

From battery life to charging times, range anxiety and limited charging infrastructure, many petrol or diesel car owners have genuinely held concerns about EVs that are preventing them from making a move to zero-emissions motoring.

Despite greater choice and improving infrastructure, opinions on EVs are more divided than they were just a few years' ago.

But what if such concerns could be addressed or eased through facts and, more importantly, through experience?

This was a question posed by Volkswagen Group Ireland as part of new research. And to test it, the parent company of some of Ireland's most popular brands commissioned a survey of EV and non-EV owners on a range of issues relating to EVs.

The findings reveal how the perceptions that non-EV owners hold about EVs are very different to the lived experience of those who already own them.

They also suggest that informed dialogue about EVs and the future of mobility could be key to convincing more drivers to make the switch to zero-emissions motoring.

Survey background

Volkswagen Group Ireland commissioned a survey of 2,384 owners of the Group's vehicles in Ireland including Volkswagen, Skoda and Cupra models.

The total involves 708 owners of fully electric cars (EVs) and 1,605 owners of conventional petrol or diesel models. It also included 46 owners of plug-in hybrids and 25 owners of hybrid cars.

The latter two categories were grouped with non-EV owners. The online survey was carried out for Volkswagen Group Ireland by Core Research from July 31st to August 20th of this year.

Key findings:

- The vast majority of EV drivers (85%) plan to stick with electric when they buy again.
- Half of non-EV drivers believe they will own a fully electric vehicle in the next 10 years.
- Almost half of non-EV drivers are not yet sure about EVs but could be convinced to switch.
- There is little difference in the annual distance covered by both EV owners and non-EV owners with the latter only slightly more likely to drive more over the course of a year.
- Non-EV drivers believe they would need to charge an electric car far more often than EV owners actually do.
- Nine out of 10 (89%) EV drivers have a charger unit fitted in their driveway.
- Three in four non-EV drivers have space for a charging unit at their home.
- EV owners are generally very satisfied with most aspects of EV ownership. However, they have concerns about public charging facilities and longer journey planning.
- Non-EV owners overestimate how often EVs need to be serviced.

Owning is believing:

Once motorists make the switch to an EV, they tend to remain steadfast in their choice. The survey found that 60% of EV owners said they “love their EV” and would not be returning to petrol or diesel cars.

A further 25% said that, while it took some adjustment switching to an EV, they were happy they had done so and would probably stick with an EV for their next vehicle. Just 2% of EV owners said they wanted to return to owning a petrol or diesel car.

Despite strong positivity among owners, the majority of non-EV owners said they were not planning to switch to an EV. Many, however, said they could be convinced to do so and admitted that it was inevitable that they would own an EV in the coming years.

More than half of non-EV owners, 55%, said they were not looking to buy an EV, but 30% said they could be convinced to do so, 13% said they would consider it and 2% said their next vehicle would be an EV.

In an encouraging development for manufacturers and policymakers, 50% of non-EV drivers said they expected to be driving a fully electric car within the next ten years with 20% of the total expecting this to be the case in the next four years.

The survey showed that EV owners believe their cars to be a great choice, especially when it comes to traits such as a premium feel, innovation and the seamless integration of software and apps.

Non-EV drivers associate EVs with leading edge design, innovation and a premium feel. While they believe EVs are not attractively priced, many non-EV owners accept that they are cheaper to run and more environmentally friendly.

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Expectations Vs experience

The research found significant differences in general sentiment towards electric cars between EV owners and non-EV owners. Crucially, it also showed that some of the perceptions non-owners hold about EVs are far removed from the actual lived experience of EV owners.

While all car owners are likely to express concerns about certain aspects of their vehicle when asked to choose from a list of potential issues, the survey findings show non-EV owners are much more likely to perceive matters such as charging and the range of EVs to be of concern than the owners of EV cars. In general, EV drivers have fewer concerns overall.

Such findings include:

- 60% of non-EV drivers said they would be concerned or don't feel fully informed about the possibility of running out of charge in an EV, but just 25% of owners shared this concern.
- 43% of non-EV drivers had concerns about how often charging is required in EV cars, compared with 10% of EV owners
- 39% of non-EV owners were concerned that charging their car would affect their day-to-day routine compared with just 10% of EV owners
- 28% of non-EV drivers said they had concerns about the logistics of charging at home compared with 6% of EV owners
- 48% of non-EV owners said they were worried about the time it takes to charge a car, compared with 25% of EV owners

A similar gap in perception and reality is evident when non-EV owners are asked to estimate the frequency of charging EV ownership requires

- 20% of non-EV drivers think they would need to fully charge their car at home every day, but just 3% of actual EV owners say they do this
- 11% of EV owners say they fully charge their car at home every night, but 35% of non-EV drivers think they would need to do this
- Just 2% of EV drivers say they need to fully charge their car at work or in public every day, but 20% of non-EV drivers think they would have to do so
- 44% of non-EV drivers said they would struggle with or have reservations about how often they would need to charge their car compared with just 14% of EV drivers

Going the distance

Many high-mileage motorists avoid buying an EV as they believe it would not suit their purposes. The survey found few differences, however, in the amount of annual kilometres EV and non-EV drivers said they drive each year.

A total of 24% of both EV and non-EV drivers said they drive between 15,000 to 19,999 kms each year while 29% of EV drivers said they drive 20,000 kms or more, very close to the 32% of non-EV drivers who said they drive the same distance annually.

While non-EV drivers were more likely to regularly drive longer journeys, this was only marginally the case. A total of 55% of non-EV drivers said they undertake a long journey of at least 50kms every day compared with 47% of EV drivers. A third of non-EV drivers said they do this every month compared with 26% of EV owners.

When it came to issues that EV owners are already on record as being concerned about, the level of concern was much higher among non-EV owners based on their perceptions.

A total of 71% of non-EV owners, for example, said they would struggle with or have reservations about the distance an EV can drive on a single charge, compared with 44% of EV owners.

Meanwhile, 67% of non-EV owners said the same about an EV's battery's life, compared with 34% of EV-owners.

One of the key benefits of owning certain EV models is that servicing is only required every two years or after 24,000 km, whichever comes first.

The majority of non-EV owners (51%), however, do not know this and believe it to be once a year or every 12,000 kms. Just two in five (38%) non-EV drivers correctly stated that EVs are generally cheaper to service.

Breaking down barriers

While the survey findings show a significant gap between how non-owners perceive EV cars and actual owners experience them, they also highlight the issues that can be of concern to EV owners and which, in turn, could be holding non-EV owners back from making the switch to EVs.

The data provides an insight into the actions needed at policy level to increase EV ownership and the reassurances manufacturers may need to provide, in part to address some of the misinformation about certain aspects of EV ownership.

The research shows the vast majority of EV drivers are generally satisfied with their EV and intend to stick with electric, but the availability of public charging is a concern.

Only a tiny proportion of owners, for example, said they were “not satisfied” or “very unsatisfied” with aspects of ownership such as driving their electric vehicle (2%), their battery warranty (5%), and tyre wear (11%), but 28% listed public charging practicalities under these two option choices while 53% said it was an issue that they struggled with or still have reservations about.

Even though EV owners have concerns about public charging based on their experience of using their cars, the research again showed that higher numbers of non-EV owners identified the same issues based on their perceptions.

A total of 67% of non-EV owners said they had concerns about having to plan and add stops to longer journeys compared with 45% of EV drivers. Meanwhile, 64% of non-EV owners said they would have concerns about queuing and waiting times for public chargers compared with 43% of owners.

The findings confirm what policymakers and administrators already know and are working to address. Even if non-EV owners were to exaggerate the impact of the issue, there is a clear need for better and more high-speed charging infrastructure, particularly at regular intervals on motorway routes used to travel long distances.

Irish motorists and indeed manufacturers have already flagged problems relating to a shortage of useable charging points and the ease of access, reliability and speed of those already in place.

Tried and tested

When asked about areas where brands could do more to inform and support customers, 52% of EV owners and 66% of non-EV owners said they would like more information and reassurance on the battery life and warranties of EVs, making this the key recommendation of both groups.

Most EVs in Ireland already come with an extensive eight year or 160,000 km battery warranty that will cover the cost of any repairs and while battery life is often raised as a potential concern for EV buyers, respected industry research has shown high levels of sustained battery health in modern EVs.

The survey found regular battery tests would help to alleviate any concerns owners and non-owners have about the health of an EV battery and its capacity over time. A total of 53% of EV owners said it would alleviate any concerns they had “a great deal” while 32% said it would do so to “some extent”. The same figures for non-EV owners were 37% and 32%.

Home is where the charge is

Just 14% of the EV owners surveyed said they still struggle with or have reservations about how often they need to charge their car and just 3% said the logistics of charging at home was an issue for them.

The vast majority (89%) said they had a parking space or driveway at home where they could charge their car and that it was fitted with a home charging unit. A further 7% said they had a space to charge their EV but had yet to fit a home charging unit.

Interestingly, 75% of non-EV drivers said they had a parking space or driveway where they could install a home charging unit.

A lack of easy access to domestic charging points is an issue for some motorists, particularly those in urban areas. The survey results show that drivers are willing to consider other options for charging, providing they are convenient.

Given recent increases in the availability of public charging infrastructure options, non-EV drivers were asked where they would consider charging if they did not have a driveway that could accommodate a home charging point. Just under a third (32%) said they would like to do so at their workplace and 24% said a supermarket or shopping centre car park.

A total of 17% said they would like to use a kerbside charging point connected to their home's electricity supply while 26% said they would use ultra-rapid charging points next to motorways or national roads.

When asked the same question, 50% of EV drivers said they would like more ultra-rapid charging points next to motorways and national roads, 43% said they would like to charge at their workplace and 39% said at supermarkets or shopping centres.

The findings show the need for a wide range of charging options and a demand for better publicly available charging points, especially for those who may not the option of charging at home.

Conclusion

The slowdown in sales of EVs is not expected to last and many manufacturers are forecasting a rebound in 2025.

EVs accounted for almost 19% of sales in Ireland in 2023 and it is thought this figure is achievable next year with further growth in the following years.

Concerns about resale values are likely to ease as the market adjusts and more cars are sold at the increasingly affordable prices EVs are now selling for. Meanwhile, new models with extensive range levels are being released with yet more choice on the way to suit a greater number of buyers.

Misinformation about battery life is already being addressed by manufacturers, who are also highlighting the warranties provided to buyers but the survey shows more could be done.

Greater levels of public infrastructure and more charging options at workplace, retail and on-street level could also help to convince more people to make the switch to zero-emissions driving.

The survey findings show many non-owners perceive EVs to be less practical and less rewarding than sticking with a conventional petrol or diesel car, but their perceptions are far removed from the actual lived experience of those who already own EVs.

This suggests that dispelling myths, addressing misinformation and helping people to overcome their reservations is the biggest challenge for manufacturers and those seeking to increase EV uptake.

They should be encouraged, however, by the fact that the vast majority of EV drivers are never going to go back to owning a petrol or diesel model and most non-EV owners accept they will need to switch to EVs in the coming years.