

# Six recommendations to increase ZEV ambition

Accelerating the uptake of zero emission  
vehicles | May 2022



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## Setting the scene

The transport sector is the fastest-growing contributor to climate change, accounting for a quarter (23%) of global emissions. In 2021, COP26 energised the global effort towards transport decarbonisation, with preliminary analysis revealing that transport announcements and commitments together culminated in the commitment of nearly 25% of global road transportation - including all modes – to the transition to 100% zero emission vehicles. This represents a great achievement on the global level, but more ambitious actions are still required from governments and jurisdictions at all levels to achieve net zero.

The global electric vehicle (EV) market share has taken a tremendous leap forward in the past decade, and we expect the trend to accelerate exponentially. The context is likely to play in favour of EV uptake in the next decade, with most recent global market analyses such as the [Global EV Outlook](#) and [BNEF EV Outlook](#) confirming the growing market uptake. However, this depends on the geographic and industry context. Meeting increased grid demands, a lack of financial mechanisms to support governments, high up-front costs and a restricted availability of EVs are all barriers. In addition to this, other underlying factors, including the current global energy crisis, need to be taken under consideration to decarbonise road transport.

According to the EV Market Outlook 2021, there are two possible future scenarios. The [Stated Policies Scenario](#) suggests that by 2030, the global electric vehicle stock (excluding two / three-wheelers) will reach nearly 145 million vehicles and will account for 7% of the global vehicle fleet. The second — and more ambitious — scenario known as [EV30@30](#) predicts that 30% of all vehicles except two-wheelers will be electric by 2030. In absolute terms that would mean that global sales would reach 43 million and therefore almost double the prediction of the Stated Policies Scenario.

Overall global electric car stock reached 16 million in 2021, with battery electric vehicles (BEVs) accounting for two-thirds of the world's electric car fleet (BloombergNEF, 2022). However, alignment with the Net Zero trajectory will require that essentially all new light-duty vehicles be zero emission (i.e. electric and fuel cell) in the 2030s. This requires a greater level of commitment and shared solutions from governments, consumers and businesses.

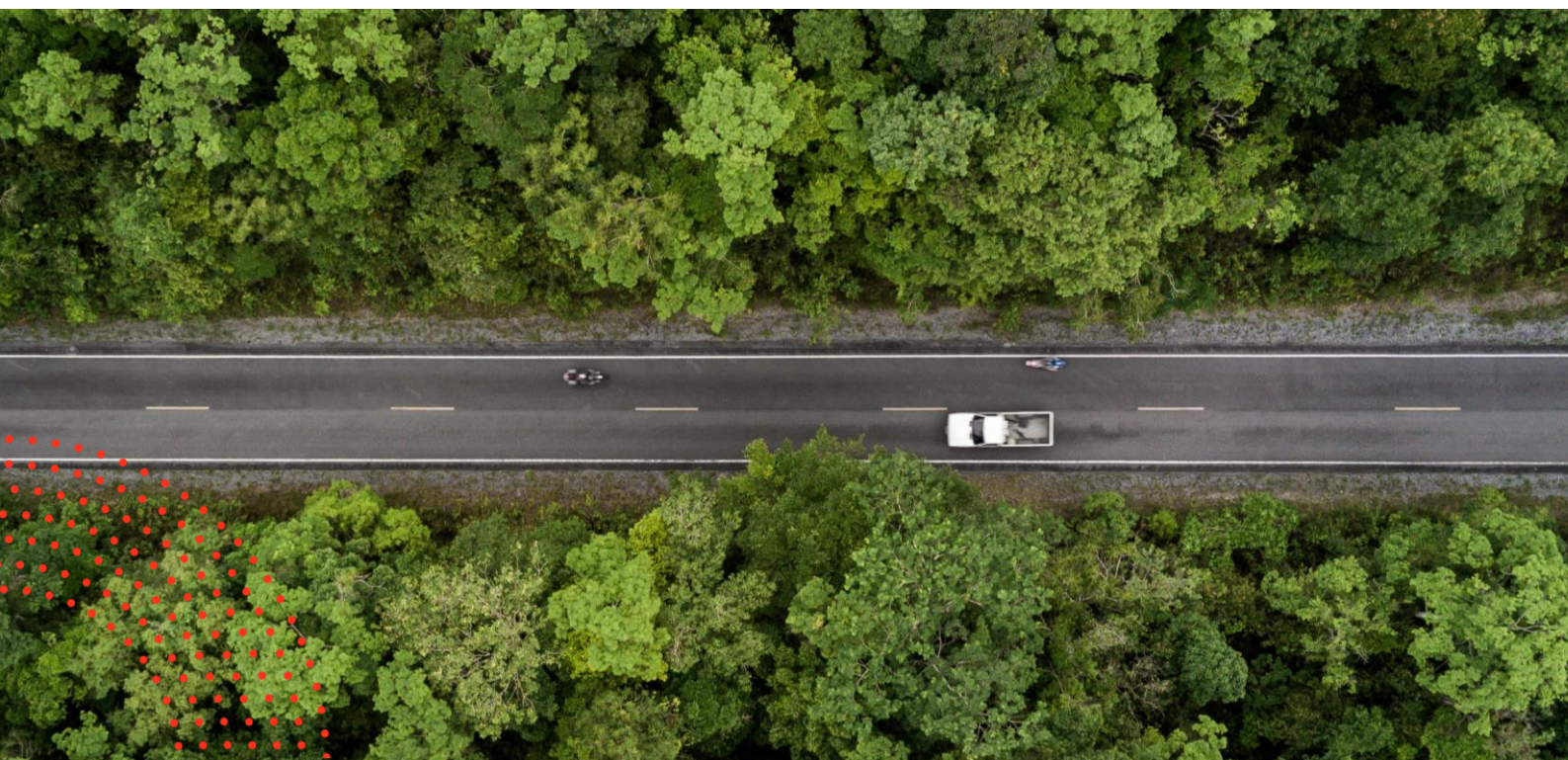


Figure 1: Global passenger plug-in vehicle fleet (in millions)

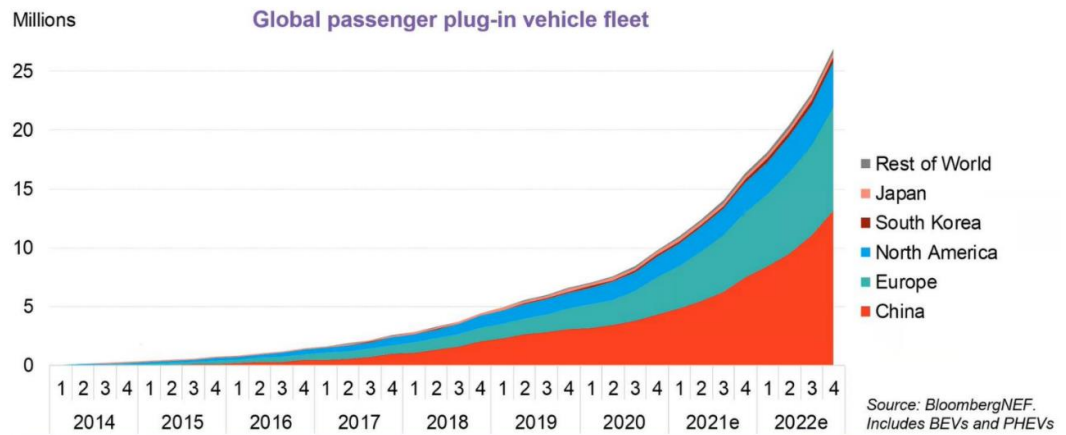
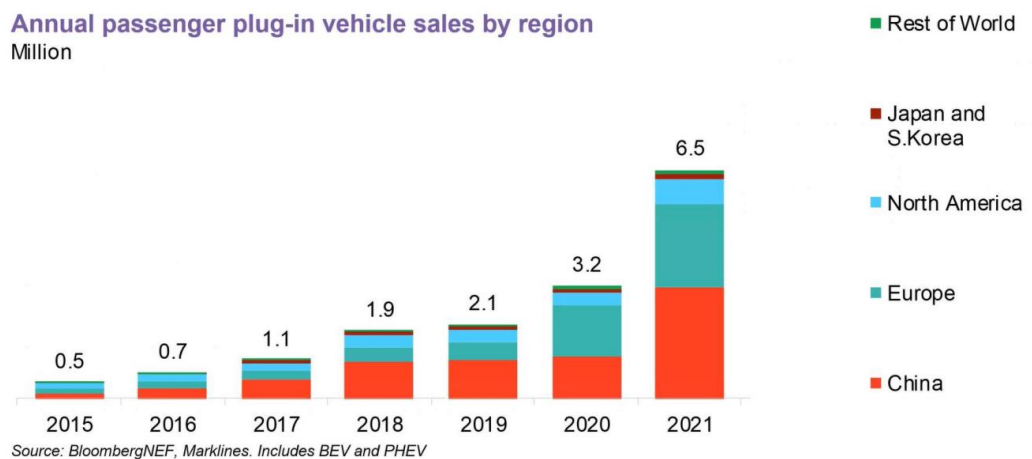


Figure 2: Annual passenger plug-in vehicle sales by region (in millions)



Despite the outcomes of COP26, the current trajectory for transport decarbonisation is low, moving towards a 3.0 degree pathway instead of the 1.5 degree target. Road carbon budget will be depleted within the next 15 years if current emission levels remain the same.

The ZEV Community has developed a catalogue of key policies necessary to accelerate zero emission vehicle uptake. Drawing on extensive published research, this guide identifies the most impactful, high level actions governments can undertake, and will be used as a basis for guiding ZEV Community activities in the future.

## 1. Setting ambitious phase-out targets

Setting ambitious science-based targets to phase out new combustion engine vehicles, aligned with climate mitigation goals, is essential to meet the greenhouse gas emissions (GHG) reduction goal of the Paris Agreement. By setting these targets, governments send a strong demand signal to car manufacturers and the business sector, reducing uncertainty in the market and showing commitment to the transition to zero emission transport. This enables industry to plan and set strategies to achieve their goals and fully transition their fleets to zero emission technologies.

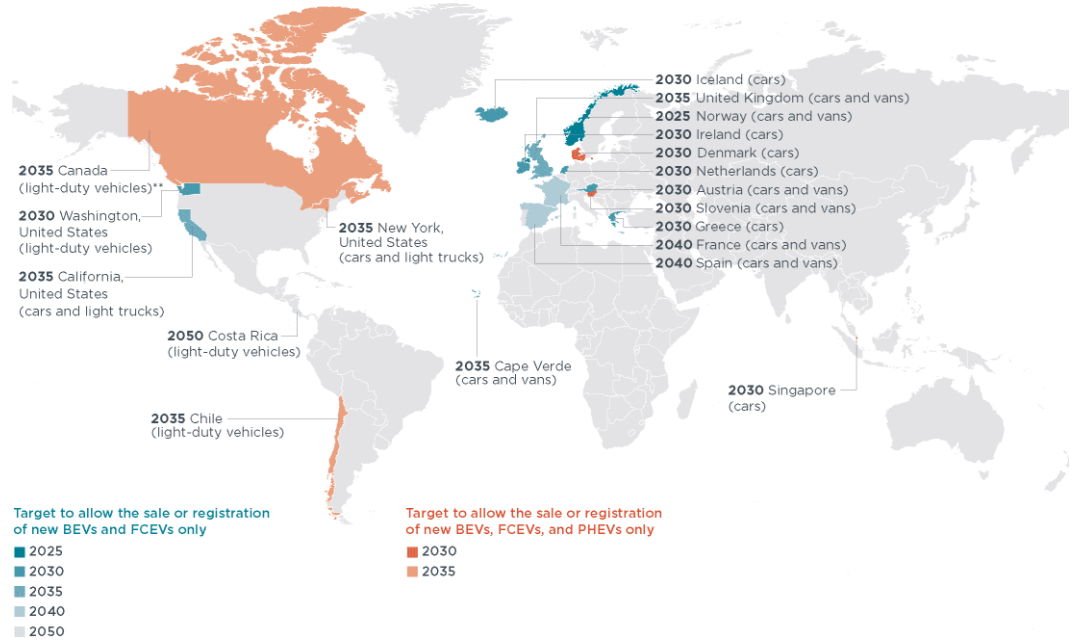
In the build-up to COP26 there was huge push for sustainable transport. Various governments, businesses, and other organisations with an influence on the future of the automotive industry and road transport, announced phase out targets for the sale of light duty combustion engine vehicles. There are also global ZEV Commitments that governments can sign up to on medium and heavy-duty vehicles and to transition their own government fleets.

- [COP26 Transport Declaration on the transition to 100% zero emission cars and vans](#), led by the UK Government. A total of 34 countries; six major vehicle manufacturers; 41 cities, states and regions; 28 fleets and 13 investors all jointly set out their determination for all new car and van sales to be zero emission by 2040 globally and 2035 in leading markets.
- [Memorandum of Understanding on Zero Emission Medium- and Heavy-Duty Vehicles](#), led by CALSTART and the Netherlands government, asks leading countries to commit to working together to enable 100% zero emission new truck and bus sales by 2040. This includes an interim goal of 30% zero emission vehicle sales by 2030, to help reach net zero carbon emissions by 2050.
- [Climate Group's ZEV Pledge for Public fleets](#) led by Climate Group, asks governments at all levels, as well as individual departments, agencies and public sector bodies, to pledge to convert their entire owned or leased fleets, where feasible, to zero emission vehicles by no later than 2030 for cars and buses, 2040 for medium and heavy-duty vehicles.

Figure 3. below shows governments with official targets to 100% phase out sales or registrations of new internal combustion engine light duty vehicles (passenger cars and vans / light trucks) by a certain date, updated through to December 2021.

Figure 3: Governments with official 100% phase-out targets for sale and registration of internal combustion engine light duty vehicles

Governments with official targets to 100% phase out sales or registrations of new internal combustion engine light-duty vehicles (passenger cars and vans/light trucks) by a certain date\* (Status: Through March 2022)



\* Includes countries, states, and provinces that have set targets to only allow the sale or registration of new battery electric vehicles (BEVs), fuel cell electric vehicles (FCEVs), and plug-in hybrid electric vehicles (PHEVs). Countries such as Japan with pledges that include hybrid electric vehicles (HEVs) and mild hybrid electric vehicles (MHEVs) are excluded as these vehicles are non plug-in hybrids.  
 \*\* The Canadian province of British Columbia has set its 2040 target into binding regulation; the Canadian province of Québec has also set a target for 2035.

Source: [ICCT Briefing, updated March 2022](#). Update on government targets for phasing out new sales of internal combustion engine passenger cars

# Subnational snapshot:



## Norway

Norway has set the most ambitious phase out target for zero emission vehicles, only allowing the sale of battery electric vehicles (BEVs) or fuel cell electric vehicles (FCEVs) from 2025.

## British Columbia

British Columbia, Canada, was the first government in the world to have made its ZEV phase out target into binding regulation through the Zero Emission Vehicles (ZEV) Act. In July 2020, the province adopted new regulations setting incremental annual targets and other compliance requirements for automakers to gradually increase the share of new zero emission passenger cars and light commercial vans sold to 10% by 2025, 30% by 2030, and 100% by 2040.

## Washington State

As part of the legislation "Move Ahead Washington", the State of Washington has mandated that all publicly and privately owned passenger and light duty vehicles of model year 2030 or later that are sold, purchased, or registered within the state be electric vehicles.

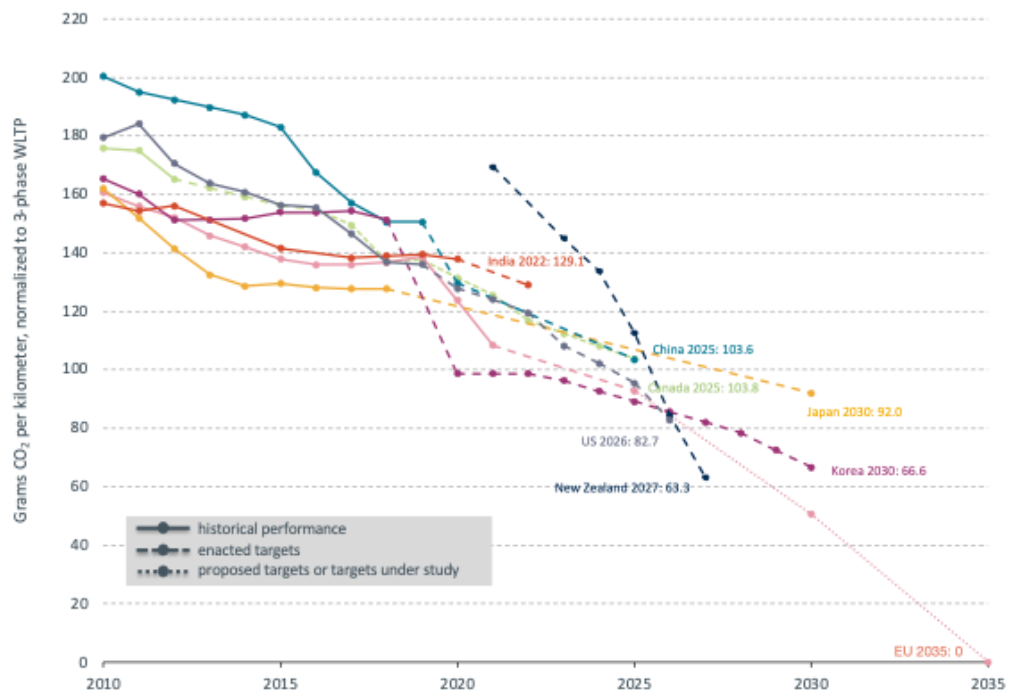


## 2. Implementing vehicle standards and regulations

Introducing and implementing vehicle standards and / or regulations enables governments to meet their ambitious phase out dates. It also provides CO<sub>2</sub> emissions savings against existing regulations, while delivering certainty for the wider automotive ecosystem. While ZEV mandates require that manufacturers produce and sell an increasing share of zero emission vehicles every year, CO<sub>2</sub> standards require decreasing CO<sub>2</sub> emissions or fuel emission for new vehicles per kilometre.

Figure 4 shows binding CO<sub>2</sub> standards for new light-duty vehicles that have been adopted or proposed in eight vehicle markets, alongside the historical emission values from new vehicle registrations from 2010. These standards are each normalised to the three-phase Worldwide Harmonised Light Vehicle Test Procedure (WLTP) to enable comparison; different test procedures are used in different markets.

Figure 4: Binding CO<sub>2</sub> standards for new light-duty vehicles



Source: ICCT, 2020



## 2.1. EU Fit for 55

As part of the European Green Deal, written into the European Climate Law, the European Union has set itself a binding target of achieving climate neutrality by 2050. This requires current greenhouse gas emission levels to drop by at least 55% by 2030. The European Commission proposes to create a new self-standing emissions trading system for road transport to support Member States in meeting their national targets. The Fit for 55 package is a set of proposals to revise and update EU legislation and to put in place new initiatives. It has the aim of ensuring that EU policies are in line with the climate goals agreed by the Council and the European Parliament. With the Fit for 55 package, emissions reductions of 43% should be achieved for this sector by 2030, compared to 2005. The specific emission target for new passenger cars and new light commercial vehicles would be 0 g/km by 2035. These proposals are currently still under discussion.

## 2.2. US Clean Car standards and CAFÉ standards

US Federal Clean Car standards, managed by the US Environmental Protection Agency, require automakers to address and reduce tailpipe emissions from passenger vehicles by establishing yearly reductions in climate change causing pollutants such as CO<sub>2</sub>. These standards typically operate in tandem with Corporate Average Fuel Economy (CAFE) standards, led by the US National Highway Traffic Safety Administration, which regulate how far a passenger vehicle must go on a single gallon of fuel.



### 3. Making ZEVs affordable and convenient

There are various financial and non-financial ways to incentivise the uptake of zero emission vehicles and improve their business case.

Introducing financial incentives, taking the form of direct payment subsidies or tax benefits, supports the uptake of zero emission vehicles by making them more affordable, reducing the upfront price and the cost of ownership. Due to their higher purchasing cost, financial incentives are key to driving ZEV adoption until price parity is reached. The increased sales of zero emission vehicles in European and US markets has been supported by financial incentives, including direct payments to consumers and “cash on the hood” initiatives. Other governments provide “feebates” / bonus-malus taxation systems, as seen in France or Sweden, where EV rebates are funded by higher taxes on more polluting vehicles. Favourable company car tax rates for EVs have been key to incentivising their take up in the UK.

There are also a range of non-financial incentives that can support the uptake of ZEVs. For example, road access measures in urban areas, such as Zero or Low Emission Zones (ZEZs or LEZs); parking and charging incentives; and preferential road access. These zones restrict access for higher emitting vehicles.

By introducing ZEZs or Zero Emission Areas (ZEAs), where internal combustion engine vehicles are banned, cities can greatly reduce greenhouse gas emissions and air pollution levels in the city, as well as congestion. Various cities around the world such as London, Paris, Seoul, Medellin and Amsterdam have all committed to implementing ZEAs in major areas of the city by 2030, and others are also leading by example and pledging to convert their government fleets. (ICCT, 2021).



## 4. Supporting charging infrastructure deployment

Sufficient access to charging infrastructure is essential to meet the increased demand for charging points, and to enable a full transition to ZEVs. Today, around a fifth of all installed charging points are available to the public. As EV adoption continues, it is expected that the ratio of public to private chargers will decrease, resulting in only 9% of a much higher total number of charging points being public by 2030. Governments are implementing strategies and policies to accelerate the roll out of charging infrastructure and to meet the needs of the future. Some of these measures include:

### 4.1. Binding targets

The Alternative Fuels Infrastructure Regulation (AFIR) is a piece of legislation proposed by the European Commission to ensure that there is sufficient public charging infrastructure to match the increased deployment of ZEVs.

Beyond the AFIR, additional policies will be needed to ensure that home and workplace charging also keep pace with electric vehicle adoption. The ICCT has outlined some additional recommendations for cars and vans.

Private home and workplace charging is generally less expensive to install compared to public charging points. The latter often require a wider combination of financial deployments and coordination with different stakeholders. The EU and national governments are supporting home and workplace charging with measures including the Energy Performance Building Directive (EPBD) with binding requirements that align with projected EV uptake.

With regards to light duty vehicles, there are numerous funding schemes from the EU, including the Connecting Europe Facility Transport program. These schemes have helped to develop a public charging infrastructure network across Europe, and will work to ensure that this network is accessible to all in the future. Most member states are also leveraging funding from more flexible EU programs like the Recovery and Resilience Fund and InvestEU to build charging infrastructure and meet the targets outlined in the AFIR.

The ICCT further developed policy recommendations on heavy duty vehicles, asserting that the infrastructure roll-out must not be homogeneous across member states, due to their large differences in traffic volumes. Instead, a differentiated approach should be endorsed. This should be based on the needs of each level of average truck traffic, which groups corridors of the Trans-European Network.

### 4.2. Public charging network

Building a public charging infrastructure network is important to transition to ZEVs. Governments are working together to collect inputs and guidance from industry leaders, manufacturers and other stakeholders to build a convenient, reliable and equitable public charging network.

# Subnational snapshot:



## United Kingdom

The UK has released a strategy which sets out a vision and action plan for the rollout of electric vehicle charging infrastructure in the UK, ahead of the 2030 phase out dates. Backed by £1.6 billion, the plan supports the instalment of 300,000 public EV charging points by 2030, while new legal requirements on operators will see drivers able to pay by contactless, compare charging prices and find nearby charge points via apps.

## United States

The US has announced the new EV Charging Action Plan to outline the steps federal agencies can take to develop and deploy charging points across the country. Another key component of their wider electric vehicle strategy is to publish guidance for states and cities on how to strategically deploy EV charging stations and build out a national network.

## Germany

By 2030, there will be a total of one million charging points available in Germany. The Federal Cabinet agreed a "Masterplan Ladeinfrastruktur" (master plan for charging station infrastructure) in November 2019. Germany's Federal Ministry of Transport and Digital Infrastructure (BMVI) is making a total of €500 million available by the end of 2025 to develop public charging infrastructure in Germany. The aim is to set up at least 50,000 charging points (of which at least 20,000 are fast charging points).



### 4.3. Incentives for businesses and EV owners

Governments can incentivize EV adoption through grants to support businesses and EV owners with the costs of installing EV charging points. Various governments are implementing programs that support businesses and private owners to acquire and install charging points. The [Québec workplace charging](#) is a good example of an initiative that supports businesses with the upfront costs of charger installation. The government provides financial assistance to businesses for the acquisition and installation of charging stations in the workplace for up to 50% of eligible expenses.

The [Electric Vehicle Charging Station Financing Program \(Program\)](#), part of the California Capital Access Program (CalCAP), is a similar initiative that provides loans for the design, development, purchase, and installation of charging infrastructure [at small business locations in California](#). Small businesses are eligible for a rebate of 10-15% of the enrolled loan amount. Eligible borrowers must be small businesses with 1,000 or fewer employees and must maintain legal control of the EVSE for the entire loan period.

In March 2022, the UK released guidance to implement a [Workplace Charging Scheme](#). This is a voucher-based scheme providing support to charities and small accommodation businesses towards the upfront costs of purchasing and installing EV charging points.

### 4.4. EV infrastructure building codes

EV infrastructure building codes are an important policy requirement to help expand the EV market. EV Building Codes require that parking in new buildings includes the necessary electrical equipment for easy and low-cost installation of EV charging stations. This policy leads to an increase in available charging stations and brings down costs of the installation of chargers by 75% when compared to retrofitting an existing building. As a result, more people have the option to drive an EV and state and local governments have lower costs to achieve their electrification and climate goals. The [Southwest Efficiency Project adoption toolkit](#) is a useful resource, and provides a [complete list](#) of local EV infrastructure building codes from around the US.

# Subnational snapshot:



## Sacramento, California

As part of their ongoing efforts to increase electric vehicle adoption and improve access to charging, the City of Sacramento in California has introduced the [Green Building Standards Code](#). This requires that any new or altered buildings include “EV Capable” parking spaces which have electrical panel capacity, a dedicated branch circuit, and a raceway to the EV parking spot to support future installation of charging stations.



## 4.5. Reliability standards

Reliability standards are an increasingly important area for policy development as charging infrastructure networks increase and age. Charging points can be difficult to find, difficult to use and may turn out to be in use or broken when a driver reaches them.

The recent EV Infrastructure Strategy in the UK will regulate charging points to ensure they all meet minimum reliability requirements, as well as ease of payment and price transparency.

At present there is no widespread industry standard for payment at EV charging points. It can require multiple apps or smartcards across different charge point operators. For example, in Europe this leads to a system where consumers across borders can face to scenarios. They either have a choice of payment method and can access this by signing up to an app or provider programme. Alternatively, they might not be able to charge their vehicle because they are not registered with the required subscription service. (European Court of Auditors, 2021) A comprehensive, and interoperable network of charge points will ensure EV drivers are able to find and use nearby charging stations regardless of their network provider.

Several initiatives, such as the [EV Roaming Foundation](#) and [Open Charge Alliance](#) are cooperating with many private and public stakeholders in this field to support the Open Charge Point Interface protocol (OCPI) as a free and reliable standard worldwide. This has the ultimate objective of allowing any EV driver to charge at any station.

The Climate Group's EV100 and ZEV Community initiatives launched a '[Public EV Fast Charging Principles](#)' guide to aid the development of charging infrastructure and enable mass electric vehicle (EV) uptake in North America.



## 5. Increasing public awareness on ZEVs

### 5.1. Consumer awareness

Lack of public awareness is one of the key barriers to EV adoption. There remains a lack of understanding and several misconceptions affecting consumer perceptions of electric vehicles. This includes information about the available models, battery range, charging requirements, available financial incentives, and the potential savings from lower fuel and maintenance costs. A [literature review of electric vehicle consumer awareness](#) and outreach activities conducted by the ICCT summarised some of the key literature and exemplary actions taken by leading electric vehicle markets. The research clearly shows that greater knowledge and exposure to electric vehicles leads to higher chances that consumers will consider purchasing an electric vehicle in the future.

Awareness of the climate impact of internal combustion vehicles, and the technical viability of zero emission options as alternatives to ICEVs is rapidly growing. This is fundamental to increase the uptake of electric vehicles from businesses, who are often challenged by different stakeholders while presenting their business cases for EV adoption.

The report also categorised the different consumer outreach and awareness activities, included in the table below with additional examples.

Table 1: Examples of consumer outreach and awareness activities

Category	Example	Location
Information and tools: general information, costs comparison, public charger locations etc	<a href="#">Go Ultra-Low</a>	United Kingdom
	<a href="#">OUC Electric Vehicles and Charging</a>	City of Orlando, Florida, USA
Public events (ride and drives or EV showcases)	<a href="#">Ride and Drive Clean</a>	Bay Area, California, USA
Exposure to EVs from fleets (public and private, tourism)	<a href="#">EV100 companies</a>	Global, Climate Group initiative
Regional planning (EV Action plans, demonstration projects)	<a href="#">Interreg Central</a>	Europe, Transnational joint action plans
	<a href="#">Seattle Transportation Electrification Blueprint</a>	City of Seattle, State of Washington, USA
Consumer awareness campaigns	<a href="#">Veloz</a>	California, USA
	<a href="#">Go Ultra-Low</a>	United Kingdom
	<a href="#">Roulons Vert</a>	Québec, Canada
Youth education and professional development	<a href="#">MSIP Skills Academy</a> ,	Scotland, United Kingdom



## 5.2. Lack of dealer knowledge on EVs

Studies show that car dealerships in the US are not well prepared for the increasing interest from the public on zero emission vehicles. They also lack knowledge about the overall environmental benefits and economic incentives or subsidies. For example, the costs of owning, maintaining and charging an EV (total price of ownership or TCO); the battery range, lifetime and its disposal; and knowledge on charging options and what to do if the battery runs out. This lack of knowledge can discourage potential buyers who are curious and interested in learning more about EVs from making the purchase, hindering EV adoption.

In addition, dealership laws across certain states in the US restrict EV companies from selling directly to customers, which hinders EV adoption and general awareness of the options available.



## 6. Accelerating deployment in fleets and public procurement

Global analysis carried out by the Climate Group with international sustainability consultancy SYSTEMIQ has found that fleet vehicles could be instrumental in bringing about a wider shift to clean road transport, and it's possible for their electrification to happen on an accelerated time frame.

Globally, fleets make up only a quarter of all vehicles on the road, and yet contribute to two-thirds of road transport emissions. This is because these vehicles tend to travel further and are on average heavier than private vehicles. While medium and heavy-duty freight vehicles are a major contributor to this fleet impact, light duty vehicles (under 3.5 tonnes) and buses still account for more than a quarter (26%) of all global road transport emissions (IAE, 2021).

Accelerating the electrification of fleet vehicles – those which are owned or operated by a business, public sector body, or used for shared mobility purposes – can significantly and rapidly reduce road transport emissions. This will help us get closer to the trajectory needed to keep global temperatures within 1.5°C above pre-industrial levels.

### 6.1. Public fleets

There are many significant benefits for electrifying government fleets. These include improved quality of life, lowered operating costs due to fewer maintenance requirements, increased driver safety, and greater government accountability.

In addition to this, converting public fleets also sends a strong demand signal to businesses and other stakeholders in the EV space that zero emission vehicles are the future.

The Climate Group launched the ZEV Pledge for public fleets in November 2021, encouraging governments to commit to transitioning their owned and leased fleets to fully electric by key target dates aligned with the UNFCCC Race To Zero Campaign and the Global Memorandum of Understanding on Zero Emission Medium and Heavy Duty Vehicles. The ZEV Pledge also includes an intention to use public procurement to accelerate deployment.

A number of national, regional, state and city governments in the US, Canada, Mexico and the UK have made a commitment to convert their fleets to zero emission vehicles by 2040. This involves a total of 121,355 vehicles, almost a third of which are medium- or heavy-duty vehicles.

### 6.2. Taxis and ride-hailing

Ride hailing services have grown substantially around the world in the past ten years, and even outnumber taxi trips in some US cities. While remaining a small fraction of overall road travel, the ride-hailing industry is having negative impacts on congestion levels and air pollution in cities. Ride-hailing trips today result in an estimated 69% more climate pollution on average than the trips they displace from personal cars or other modes of transportation. These vehicles often travel without passengers between hired rides (“deadheading”), which result in higher per trip emissions.

# Subnational snapshot:



## Clean Miles Standard (CMS), California

Under the Clean Miles Standard (CMS), developed by the California Air Resources Board (CARB), 2% of all TNC trips must be in EVs by 2023 and that ramps up to 13% by 2025, 50% by 2027 and 90% by 2030. The rule requires ride-hailing services operated by TNCs (such as Uber and Lyft) to submit two-year plans by January 2022 and begin complying by January 2023.



## 6.3. Corporate fleets

More than 16 million electric cars were on the world's roads in 2021 with battery electric models driving the expansion (Bloomberg NEF, 2021). With large amounts of vehicles registered to corporate fleets, companies provide an entry point onto the market for new vehicles and as such businesses are uniquely positioned to lead the electric transport revolution. Today's corporate fleets are tomorrow's second-hand market. Progressive businesses are increasingly recognising the opportunities of fleet electrification - to not just reduce their own fleet emissions but also demonstrate their climate leadership credentials and send a strong demand signal to manufacturers that EVs are the future of road transportation.

Industry players are accelerating the speed of automotive technology innovation as they develop new concepts of electric, connected, autonomous, and shared mobility. The industry has attracted more than \$400 billion in investments over the last decade, with about \$100 billion of that coming since the beginning of 2020. All this money targets companies and start-ups working on electrifying mobility, connecting vehicles, and developing autonomous driving technology (McKinsey,2021).

EV100 is global initiative bringing together forward-looking companies committed to accelerating the transition to EVs with a vision to make electric transport the new normal by 2030. The initiative includes over 120 member companies, committed to convert 5.5 million vehicles by 2030. EV100 member companies currently cover 98 markets worldwide and have already put over 200,000 EVs on the road. 78% of EV100 members believe that supportive policies from state, regional and city governments are vital to creating the right political climate for systematic change.

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#### 6.4. Public procurement

Public procurement is a key tool to drive a faster conversion of public and private sector fleets. Acting both as direct procurers and through the services they procure, governments at all levels can maximise their impact by working together with other major private and public procurers to drive the transition to electric vehicles faster.

With more governments around the world setting ambitious targets to transition to zero emission vehicles, public procurement policies can significantly help meet these goals by accelerating the conversion to sustainable transport systems. With substantial vehicle fleets of their own, local governments and other public sector organisations are very well-positioned to deliver change by purchasing EVs. However, there are constraints due to public budgets, higher upfront costs to be covered, especially when considering heavy-duty or specialised vehicles.

In Europe, the Clean Vehicles Directive sets national targets of zero emission vehicles for public procurement tenders in member states, including purchase, lease, rent and relevant service contracts. This promotes clean mobility solutions, boosting demand for further deployment of zero emission vehicles. The Big Buyers Initiative, promoted by the EU Commission, aims to enhance collaboration between big public buyers to implement strategic public procurement for sustainable solutions.

Many states within the US are also implementing policies that include public procurement of EVs. For example, New Jersey has released an EV law which sets a series of goals to electrify 25% of state-owned, non-emergency, light-duty vehicles by 2025 and 100% by 2035, as well as 10% of new bus purchases in 2024, 50% by 2026, 100% by 2032. There is an overall expectation that New Jersey Transit will be close to “zero emission” by 2035.

## Other Climate Group transport resources

### ZEV Community regional profiles

Infographic snapshots of the ZEV policies, targets, and achievements of leading state and regional governments from around the world.

### ZEV Community case studies:

- The electrification of Québec's driving schools. [Read here.](#)
- Climate justice and equity at the core of Seattle's transport electrification. [Read here.](#)
- Companies in Québec increase EV uptake through fleet trials (available in English and Français). [Read here.](#)
- The path to zero emission trucks in California. [Read here.](#)
- Santa Fe launches solar-powered buses [Read here.](#)
- States and regions commit to action through the ZEV Challenge. [Read here.](#)
- Queensland's Electric Super-Highway. [Read here.](#)
- Baden-Württemberg connects stakeholders for e-mobility innovation. [Read here.](#)
- German states pave the way for truck electrification with new e-Highways. [Read here.](#)
- Navarra drives electric vehicle transition with new public-private initiative. [Read here.](#)
- Switched On Scotland: Phasing out the need for new petrol and diesel cars by 2032. [Read here.](#)
- How California and Vermont are driving the uptake of electric cars through public-private partnerships. [Read here.](#)

### ZEV Community "Talking ZEVs" video series

The ZEV Community has been "Talking ZEVs" with California, Scotland, Québec, Chile and New York City – all members of the Under2 Coalition.

### EV100 Progress and Insights Report 2022

EV100 is a global initiative which brings together companies committed to making electric transport the new normal by 2030. A large part of the new global EV fleet are purchased by companies, so it's crucial that businesses lead the shift to EVs through their investment decisions and influence on millions of staff and customers worldwide.

### Fleets First: Unlocking a faster shift to zero emission vehicles

Our global analysis with international sustainability consultancy SYSTEMIQ has found that fleet vehicles could be instrumental in bringing about a wider shift to clean road transport, and it's

possible for their electrification to happen on an accelerated timeframe. It would also deliver transformational benefits for our climate, health and infrastructure.

### [Public EV fast charging principles](#)

Transport is the largest source of emissions in the US and second largest in Canada. Electrifying transport is critical to reduce emissions and reach crucial climate targets as well as improving transport-related air and noise pollution and improving public health.

### [Road to Carbon neutral in Colombia- Decarbonisation Actions Catalogue](#)

Provides subnational governments with the actions, adaptable to their specific context, to reduce emissions in the energy and transport sectors. Also available en [Español](#).

### [Japan and the global transition to zero emission vehicles](#)

The automotive industry is vital for the Japanese economy, constituting around 18.8% of all manufacturing in Japan, with cars and car products the nation's largest exports. That's why it's so important that they are part of the transition to EVs. Climate Group has commissioned research and held an event to discuss Japan Inc's future in the automotive world. This research is now available to download, both in English and Japanese.

### [São Paulo State: Portfolio of actions](#)

The Government of São Paulo aims to prioritise vehicle electrification and adopt energy-efficient modes of transport across its public transport system. These actions are part of the government's smart urban planning targets and will all promote a shift towards sustainable urban living. The action is available to download, both in English and Portuguese.

## Authors and Acknowledgements

### Under2 Coalition

Climate Group is the Secretariat to the Under2 Coalition, a group of ambitious state and regional governments committed to keeping global temperature rises to well below 2°C. The coalition is made up of 270 governments which represent over 1.75 billion people and 50% of the global economy.



[Join the Under2 Coalition](#)

[Find out about our members](#)

### ZEV Community

Government influence is critical to accelerate the uptake of ZEVs. Through the Under2 Coalition's ZEV Community, all levels of government are coming together to share policy insights and learn about ZEV initiatives taking place around the world. By exchanging information and experiences, governments are developing the knowledge needed to implement the policies needed to set ambitious targets, convert their fleets and roll-out supportive infrastructure.



For more information, please contact Anaisa Pinto, Policy Manager, Under2 Coalition – ZEV Community at [apinto@theclimategroup.org](mailto:apinto@theclimategroup.org)

[More on the ZEV Community](#)

### ZEV Alliance

The International Zero Emission Vehicle Alliance (ZEV Alliance) is a collaboration of national and subnational governments working together to accelerate the adoption of ZEVs. The participants set strong targets for ZEV deployment, implement actions to achieve those targets, conduct research to improve policy effectiveness and spur faster ZEV uptake, and encourage and support other jurisdictions in setting and achieving ambitious ZEV targets.



The International Council on Clean Transportation (ICCT) serves as the Secretariat of the ZEV Alliance. For more information, please contact [secretariat@zevalliance.org](mailto:secretariat@zevalliance.org)

[More on the ZEV Alliance](#)