

Report Title:	Electric Vehicle Chargepoint Implementation Plan
Contains Confidential or Exempt Information	No - Part I
Cabinet Member:	Councillor Haseler, Cabinet Member for Planning, Parking, Highways & Transport
Meeting and Date:	Cabinet – 23 February 2023
Responsible Officer(s):	Andrew Durrant, Executive Director of Place Services, and Chris Joyce, Head of Infrastructure, Sustainability and Economic Growth
Wards affected:	All

## **REPORT SUMMARY**

A ten-year Electric Vehicle Chargepoint Infrastructure Plan was drafted setting out the actions the council will need to take to enable the transition to electric vehicles. To make sure that the plan accurately reflects the experience, needs and circumstances of those that will use it, the draft plan underwent a public consultation between 1 December 2022 and 9 January 2023.

There were 194 responses to the consultation and high overall support for its approach to on-street charging, car park charging and rapid charging. 77% of respondents agreed or strongly agreed that, if implemented, the plan would give them the confidence that an electric vehicle would meet their daily needs.

Feedback from the consultation has been used to revise the plan and produce a final version. This version is recommended for adoption and implementation.

Enabling the delivery of electric vehicle charging infrastructure to meet growing demand through a new EV implementation plan is a goal in the borough's Corporate Plan. Moreover, the plan will fully support our overarching commitment to create a sustainable borough of opportunity and innovation and our priorities for quality infrastructure and to take action on climate change.

### **1. DETAILS OF RECOMMENDATION(S)**

**RECOMMENDATION:** That Cabinet notes the report and:

- i) Approves the Electric Vehicle Chargepoint Implementation Plan**

## 2. REASON(S) FOR RECOMMENDATION(S) AND OPTIONS CONSIDERED

### Options

**Table 1: Options arising from this report**

Option	Comments
<p>Approves the Electric Vehicle Chargepoint Implementation Plan</p> <p><b>This is the recommended option</b></p>	<p>Work will commence to identify preferred commercial partners to deliver the programmes of on-street and car park chargepoint rollout, allowing delivery to commence next financial year.</p> <p>Officers will additionally commence work on all other actions in the plan, and the policies contained within the plan will be adopted by the council.</p>
<p>Discontinue development of an Electric Vehicle Chargepoint Implementation Plan (i.e. do nothing)</p> <p>This is not recommended</p>	<p>Without a plan, chargepoints will not be installed at the pace or in the locations that many of our residents, businesses and visitors will need, if they are to make their next vehicle electric.</p>
<p>Further review the plan with a view to making substantial changes.</p> <p>This is not recommended</p>	<p>The draft plan received significant public support at consultation, and has benefitted from useful revisions arising from that process.</p> <p>Substantially reviewing the report further will delay the start of rollout of further chargepoints.</p>

### Context

- 2.1 The sale of new petrol and diesel cars and vans in the UK will end in 2030, as set out in the national Decarbonising Transport strategy. Last year, in Taking Charge: The Electric Vehicle Infrastructure Strategy, the government tasked local authorities with developing local strategies for ensuring the necessary infrastructure will be in place to support this transition, with a particular responsibility for developing the needed network of chargepoints on local authority streets.
- 2.2 It is projected that half of all cars and vans in the borough will be electric by 2035 (based upon University of Oxford's SCATE tool), rising to virtually all such vehicles by 2040, as a result of both growing consumer demand and the incoming national bans on the sale of petrol and diesel vehicles, just seven years away. Increasingly, the borough's residents, businesses and visitors will need and expect the infrastructure to be in place to support electric vehicles.
- 2.3 Faced with the climate emergency, transitioning to electric vehicles is essential to efforts to decarbonise transport, which is the largest source of the borough's carbon emissions accounting for one third of the borough's total. Our Environment and Climate Strategy identifies that the pathway to net zero will need to involve a substantial drop of 75% emissions reduction by 2030 and an 88% reduction by 2035. Infrastructure, particularly chargepoints, has a vital role

to play in enabling people to make their next vehicle electric by providing the charging opportunities that people need.

- 2.4 The introduction of chargepoints as a prominent new feature of our roads and car parks also serves to accelerate the transition by demonstrating that driving electric is set to become a normal part of everyday life, and offering reassurance to non-users that they will be able to find chargepoints when they need them if they switch to electric.
- 2.5 It is projected that the majority of electric vehicle charging will take place overnight on private residential driveways and in depots, which will often be the cheapest and most convenient place to charge. Residents and businesses will have chargepoints installed on their properties for their own use, linked to the purchase of their electric vehicle.
- 2.6 This will be supported by a growing nationwide privately-run network of premium 'rapid' and 'ultra-rapid' chargepoints that recharge a vehicle in 15 to 30 minutes, particularly suited to service station locations along main roads. On longer journeys, drivers will be able to recharge their vehicles on route, usually as part of the rest stops they would make along the journey anyway.
- 2.7 The role for local authorities to fill is the provision of chargepoints on streets and in council car parks. Residents without off-street parking will need to be able to charge near their home. The times that cars spend parked in car parks will often be a convenient time to top a battery up too, and having our car parks offer charging facilities will ensure our towns continue to meet public expectations and attract shoppers and day-trippers.
- 2.8 Local authority involvement is needed in on-street and car park provision firstly because these are public spaces that we manage, and secondly because typically these types of sites are not commercially viable for chargepoint operators in the near-term. These sites are expected to become commercially viable as the number of electric vehicles on the road increases with time, but local authorities are being encouraged by government to accelerate the transition to electric vehicles by beginning to provide these facilities now. The government are supporting this through their On Street Residential Chargepoint Scheme (ORCS) and Local Electric Vehicle Infrastructure (LEVI) funding pots. Some chargepoint suppliers are willing to take these sites on commercially too, in return for a long concession period for the site.

#### **Development of the plan**

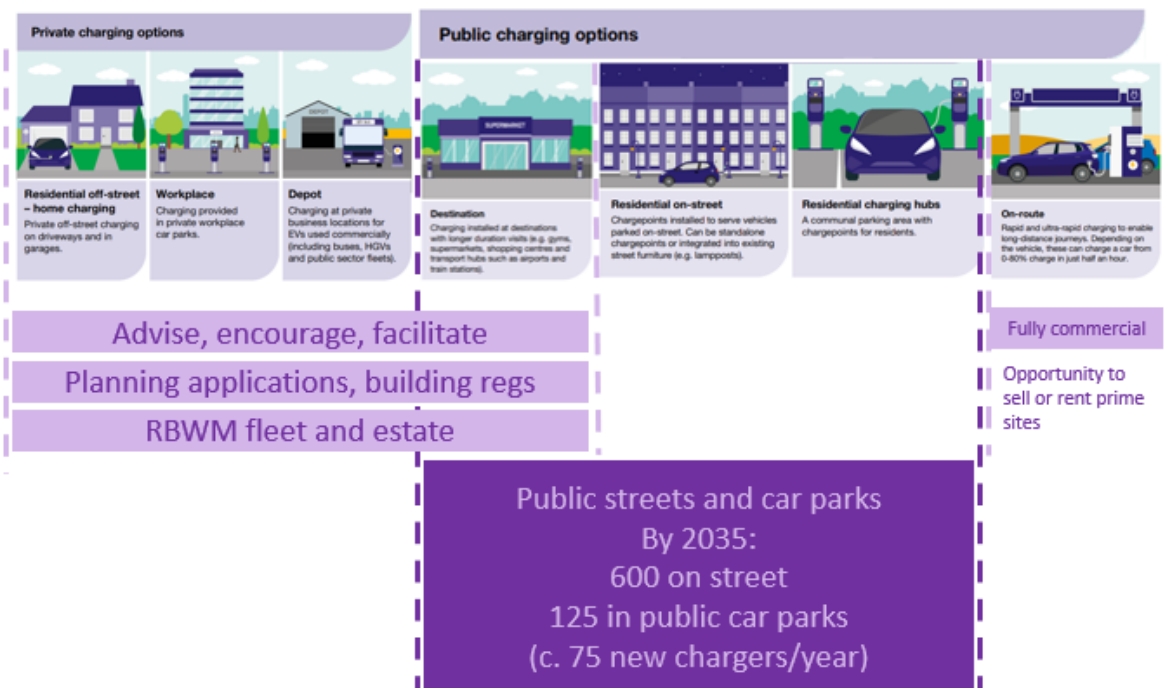
- 2.9 A draft Electric Vehicle Chargepoint Implementation Plan was developed following a review of existing chargepoint trials within the authority, as well as learning and best practice from other local authorities. An early supplier engagement exercise with 12 chargepoint suppliers representing the breadth of business models and technology solutions available enabled us to develop a plan against which the market can deliver. The council additionally benefited from expert support offered by the Energy Saving Trust through their government-funded Local Authority Support Programme.
- 2.10 In October 2022, Cabinet approved that the draft plan undergo a public consultation exercise. The objective was to ensure that the infrastructure that is rolled out will give people the ability and confidence to switch, and to be sure

that our plan accurately reflects the experience, needs and circumstances of those who will use it.

- 2.11 The final plan, which this report recommends is adopted, has incorporated feedback received through the public consultation process. The consultation process identified that the plan was widely supported overall.

### Proposed approach

- 2.12 In a typical week, an electric vehicle will need charging once based on average mileage. Combined with projections of the rate of EV take-up in the borough, the plan identifies that by 2033 the borough will need approximately 600 on-street chargepoints, and a further 125 chargepoints in council car parks. The plan proposes that the borough look to deliver approximately 75 chargepoints per year for the next 10 years to meet this demand, which will offer a manageable delivery programme that spreads the investment over time, whilst ensuring that provision remains ahead of demand and stimulates confidence that there is good availability of charging opportunities.



- 2.13 The majority of demand for on-street charging will be in Windsor and Maidenhead, as a result of both the concentration of the borough's population in these towns and also in that away from the towns homes are considerably more likely to have their own driveways where people will choose to charge. The plan recognises that it will be critical to avoid 'not spots' in provision, however, and will provide a greater concentration of chargepoints where there is more demand whilst also ensuring there is suitable geographic coverage.

- 2.14 The plan has looked to understand and incorporate known consumer needs and preferences with regards the positioning and design of chargepoints and the facilities that they offer. This includes ensuring chargepoints are short walks from the homes they serve, availability of contactless payment, live data on chargepoint availability, and simple transparent per unit pricing that is prominently displayed.

- 2.15 It additionally has sought to understand and mitigate the impact of introducing new infrastructure into public spaces, including ensuring accessibility and safety of other users of the space by keeping footways clear of cables and obstructions, utilising existing assets where possible. Additionally, care will be taken to avoid adding to parking pressure on streets by recommending placement near to the ends of streets (but a safe distance from the junction) where parking demand tends to be lower, which will often make it possible to dedicate the bays or the use of charging EVs only (subject to local circumstances).
- 2.16 The plan offers general principles for an approach to chargepoint provision, but all sites will need to be individually designed and consulted on with the local communities they are designed to serve.
- 2.17 Following adoption of the plan, an exercise will be undertaken to identify one or more chargepoint operators that the council will partner with to deliver the plan (in whole or part). The details of any contract would be presented for approval at the appropriate level at the time they are proposed to be taken forward.
- 2.18 The plan also acknowledges other activities for the council to take in supporting the transition to electric vehicles, including making information available and promoting electric vehicles by embedding these into the council's communications and activities, ensuring new developments incorporate adequate chargepoint provision through compliance with new national building regulations (Building Regulations Approved Document S) and developing plans to transition our own fleet and estate to electric.
- 2.19 As a landowner, the plan also proposes that the council investigate opportunities to identify land that may be suitable for rent or sale to companies seeking land near main roads for new rapid and ultra-rapid charging stations, to both generate income or receipts and facilitate the introduction of these facilities around the borough.

### 3. KEY IMPLICATIONS

**Table 2: Key Implications**

<b>Outcome</b>	<b>Unmet</b>	<b>Met</b>	<b>Exceeded</b>	<b>Significantly Exceeded</b>	<b>Date of delivery</b>
Proportion of cars and vans in the borough that are electric (and the figure is still growing)	<50%	50% - 59%	60% - 69%	70%+	31 December 2035

- 3.1 Helping residents and businesses to switch to electric vehicles will reduce the borough's carbon emissions, contributing towards our net zero target.

- 3.2 Electric vehicles contribute to improved air quality in relation to reducing the release of nitrous oxides, which can exacerbate symptoms of lung and heart conditions, increase susceptibility to respiratory infections and allergens, and has a harmful effect on biodiversity. (Electric vehicles do however still emit particulate matter pollution from tyre and brake wear.)

#### **4. FINANCIAL DETAILS / VALUE FOR MONEY**

- 4.1 The recommendation of this paper to approve the plan does not commit the council to any new spending. However, it is made in the context of the plan recommending the introduction of new infrastructure in the future.
- 4.2 With regards on street and public car park chargepoints, it is estimated that the plan will require an investment of c. £5 million in chargepoint infrastructure, over the 10-year plan period, funded in the first instance by chargepoint operators and government ORCS and LEVI grants, rather than by the council. Early supplier engagement has confirmed that the plan could broadly be delivered without new capital investment from the borough, and with existing staff resources.
- 4.3 Optionally, the borough could invest capital from CIL or other sources in on street and car park chargepoints. Chargepoint operators typically offer a share of profits if local authorities invest some of their own capital. Returns for the council would initially be very modest, but by 2033 a combination of increased chargepoint profitability from there being more electric vehicles on the roads and the significant number of chargepoints that will be in the borough by that time create an opportunity for the council to benefit from a significant new income stream.
- 4.4 Whether the council chooses to invest or not, the plan proposes that the operation and maintenance costs of the chargepoint would be met by the chargepoint operator, as is standard UK practice.
- 4.5 The plan proposes awarding concessions in annual batches over the plan period, with a target of introducing around 75 chargepoints per year. This will give flexibility each year for the council to decide whether, and to what extent, it will invest capital in that financial year. The concessions awarded will be subject to an evaluation of options and best value at the time they are made. It is not necessary for the council to commit to a single chargepoint supplier for the full plan period. Any decision to invest would be subject to a business case at the time, as well as the usual capital project and budget approval process for the year.
- 4.6 Separately to the introduction of on street and public car park chargepoints, there is an opportunity to generate income or capital receipts from the rent or sale of council land to businesses looking for locations for new rapid and ultra-rapid charging stations. The plan proposes that the council investigates sites with surplus land that may be suitable to make available for this purpose.

#### **5. LEGAL IMPLICATIONS**

- 5.1 The recommendation of this paper to adopt the plan to public consultation does not have direct legal implications.

5.2 Providing chargepoints on street and in car parks would involve contracts with chargepoint operators. There is considerable flexibility about the type of contract the council enters into, which would be made with input from the council's procurement team. The details of any contract would be presented for approval at the appropriate level at the time they are proposed to be taken forward.

## 6. RISK MANAGEMENT

**Table 3: Impact of risk and mitigation**

Threat or risk	Impact with no mitigations in place or if all mitigations fail	Likelihood of risk occurring with no mitigations in place.	Mitigations currently in place	Mitigations proposed	Impact of risk once all mitigations in place and working	Likelihood of risk occurring with all mitigations in place.
There is a risk that infrastructure installed in the near term may be made obsolete because electric vehicles are an emerging technology which could result in early obsolescence of assets	Moderate 2	Medium	Public EV chargepoint infrastructure is restricted to a few closely controlled trials	Deliver a wider rollout with commercial chargepoint operators, who would take appropriate level of risk and reward	Minor 1	Medium
There is a risk that chargepoint operators do not deliver a level of service that meets resident expectations or that the chargepoint operator goes out of business because this is an inherent risk in working with another party which could result in residents not being able to charge their vehicles easily	Moderate 2	Medium	Public EV chargepoint infrastructure is restricted to a few closely controlled trials	Award concessions in batches and work with multiple chargepoint operators	Minor 1	Low

There is a risk that projections of demand for electric vehicle charging either prove to cautious or too optimistic because there is uncertainty in the rate at which petrol and diesel vehicles will be replaced by EVs which could result in an over or under provision of EV charging points	Moderate 2	Medium	Public EV chargepoint infrastructure is restricted to a few closely controlled trials	The speed of delivery can be reviewed on an annual basis based upon actual take up and amended accordingly	Minor 1	Low
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## 7. POTENTIAL IMPACTS

- 7.1 Equalities. An Equality Impact Assessment is available as Appendix A.
- 7.2 Climate change/sustainability. This plan will contribute to the lowering of carbon emissions from travel in the borough and is consistent with the Borough's Environment and Climate Strategy.
- 7.3 Data Protection/GDPR. No impact.

## 8. CONSULTATION

- 8.1 The development of the draft plan was informed by:
- Technical support from the Energy Saving Trust's Local Government Support Scheme
  - Early supplier engagement with 12 chargepoint suppliers representing the breadth of business models and technology solutions available
  - Resident expressions of interest for future chargepoint locations
  - Participation in the Energy Saving Trust's national LA-EV Forum and Transport for the South East's Regional Decarbonisation Forum, where local authorities share knowledge and experience
- 8.2 A consultation on that draft plan ran from 1 December 2022 to 9 January 2023, inclusive. The consultation was based on the council's online engagement platform RBWM Together, with documents also available to view in libraries and responses also accepted by mail. The consultation was widely promoted across a spectrum of council communication channels, and through direct contact with key stakeholder groups.



- 8.3 In total, 194 responses were received. 89% of responses were from local residents. Some local business owners, people employed locally, visitors to the area and chargepoint operators also commented.
- 8.4 Overall, there was a high degree of support for the plan.
- 83% agreed or strongly agreed with the Vision
  - 77% agreed or strongly agreed that, if implemented, the plan would give them confidence an electric vehicle would meet their daily needs
  - 81% agreed with the proposed approach to car park chargepoints and 73% agreed with the proposed approach to on-street charging
- 8.5 The consultation invited written comments, for respondents to expand upon their answers to the survey questions. 124 respondents supplied written comments. The most common comments related to:
- A desire for EV charging spaces to be reserved for charging EVs only
  - A desire for the plan to be as ambitious as possible
  - A variety of views on whether charging cables should be allowed to cross over roads and paths
  - A desire for investment in EV chargepoints to be accompanied by continued investment in cycling, walking and public transport
  - A desire for new chargepoints not to block footways that are narrow
- 8.6 As a result of the suggestions and views expressed in the written comments, the plan has been amended to an improved, final version. Key changes include:
- Where grid connection works are required, passive provision will be introduced where cost-effective to expand chargepoint provision at a later date, and works will be coordinated with other street works where possible to reduce the volume of road works
  - Ongoing trials taking place in some other local authorities of allowing cables to cross over roads and paths will be monitored to understand the long-term implications of allowing this
  - We have removed specific ratios for how many chargepoint locations the council will specify the location of compared with those determined by market forces, to free the council to negotiate the best ratio it can through contract negotiations
  - We will investigate options in our negotiations with chargepoint suppliers for businesses in the borough that are interested in privately introducing chargepoints on their own properties to easily partner with the same chargepoint operators that we work with, and other initiatives that support residents and businesses introduce their own chargepoints
  - We will investigate whether 'off-peak' charging tariffs could be offered in council car parks overnight
  - We will specify that we would prefer chargepoints to be compatible with ISO 15118 Vehicle2Grid standard
  - We will identify a trial site for a taxi charging facility

## **9. TIMETABLE FOR IMPLEMENTATION**

- 9.1 Implementation date if not called in: Immediately. The full implementation stages are set out in table 4.

**Table 4: Implementation timetable**

Date	Details
1 April 2023	Rollout begins in new financial year, beginning with procurement work
31 March 2026	Phase 1 delivery complete
31 March 2029	Phase 2 delivery complete
31 March 2034	Phase 3 delivery complete

## 10. APPENDICES

10.1 This report is supported by two appendices:

- Appendix A – Equality Impact Assessment
- Appendix B – Electric Vehicle Chargepoint Implementation Plan

## 11. BACKGROUND DOCUMENTS

11.1 This report is supported by five background documents:

- [Royal Borough of Windsor & Maidenhead Corporate Plan 2021-26](#)
- [Environment & Climate Strategy \(Royal Borough of Windsor & Maidenhead\)](#)
- [Decarbonising Transport \(Department for Transport\)](#)
- [Taking Charge: The Electric Vehicle Infrastructure Strategy \(HM Government\)](#)
- [The Building Regulations 2010 – Approved Document S– Infrastructure for the charging of electric vehicles](#)

## 12. CONSULTATION

Name of consultee	Post held	Date sent	Date returned
<i>Mandatory:</i>		<i>Statutory Officer (or deputy)</i>	
Adele Taylor	Executive Director of Resources/S151 Officer	13/01/23	27/01/23
Emma Duncan	Director of Law, Strategy & Public Health/ Monitoring Officer	13/01/23	17/01/23
<i>Deputies:</i>			
Andrew Vallance	Head of Finance (Deputy S151 Officer)		
Elaine Browne	Head of Law (Deputy Monitoring Officer)		
<i>Mandatory:</i>		<i>Procurement Manager (or deputy) - if report requests approval to go to tender or award a contract</i>	
Lyn Hitchinson	Procurement Manager		

<i>Mandatory:</i>	<i>Data Protection Officer (or deputy) - if decision will result in processing of personal data; to advise on DPIA</i>		
Samantha Wootton	Data Protection Officer		
<i>Mandatory:</i>	<i>Equalities Officer – to advise on EQiA, or agree an EQiA is not required</i>		
Ellen McManus-Fry	Equalities & Engagement Officer	<b>13/01/23</b>	<b>26/01/23</b>
<i>Other consultees:</i>			
<i>Directors (where relevant)</i>			
Tony Reeves	Interim Chief Executive		
Andrew Durrant	Executive Director of Place	<b>13/01/23</b>	<b>17/01/23</b>
Kevin McDaniel	Executive Director of People Services		
Stuart Lines	Director of Public Health		
<i>Heads of Service (where relevant)</i>			
Chris Joyce	Head of Infrastructure Sustainability and Economic Growth	<b>13/01/23</b>	
Alysse Strachan	Head of Neighbourhood Services	<b>13/01/23</b>	<b>27/01/23</b>
<i>External (where relevant)</i>			
N/A			

Confirmation relevant Cabinet Member(s) consulted	Cabinet Member for Planning, Parking, Highways & Transport	Yes
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## REPORT HISTORY

<b>Decision type:</b>	<b>Urgency item?</b>	<b>To follow item?</b>
Key decision  First entered into the Cabinet Forward Plan: 16 November 2022	No	No

Report Author: Dug Tremellen, Transport Policy Manager, 01628 796220
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# Equality Impact Assessment

For support in completing this EQIA, please consult the EQIA Guidance Document or contact [equality@rbwm.gov.uk](mailto:equality@rbwm.gov.uk)

## 1. Background Information

Title of policy/strategy/plan:	<u>Electric Vehicle Chargepoint Implementation Plan</u>
Service area:	<u>Infrastructure, Sustainability and Economic Growth</u>
Directorate:	<u>Place</u>

### **Provide a brief explanation of the proposal:**

- What are its intended outcomes?
- Who will deliver it?
- Is it a new proposal or a change to an existing one?

The aim of the Electric Vehicle Chargepoint Implementation Plan is to set out how the council will play its role in ensuring chargepoints are provided around the borough to enable a transition away from petrol and diesel cars and vans, and to meet resident needs and expectations relating to their provision.

Chargepoints will ordinarily be delivered by third parties under contract. The plan includes confirming the council's expectations around standards these chargepoints will need to adhere to including ensuring that the chargepoints are widely accessible and don't impede accessibility within the wider street environment.

This is a new plan, and will be delivered by the council's Transport team and through future contracts with chargepoint operators. (The specifics of these contracts will be the subject of future decisions.)

## 2. Relevance Check

### **Is this proposal likely to directly impact people, communities or RBWM employees?**

- If No, please explain why not, including how you've considered equality issues.
- Will this proposal need a EQIA at a later stage? (for example, for a forthcoming action plan)

Yes

If 'No', proceed to 'Sign off'. If unsure, please contact [equality@rbwm.gov.uk](mailto:equality@rbwm.gov.uk)

### 3. Evidence Gathering and Stakeholder Engagement

<b>Who will be affected by this proposal?</b> For example, users of a particular service, residents of a geographical area, staff
<ul style="list-style-type: none"><li>• Drivers of motor vehicles</li><li>• People walking, wheeling and cycling</li></ul>
<b>Among those affected by the proposal, are protected characteristics (age, sex, disability, race, religion, sexual orientation, gender reassignment, pregnancy/maternity, marriage/civil partnership) disproportionately represented?</b> For example, compared to the general population do a higher proportion have disabilities?
No
<b>What engagement/consultation has been undertaken or planned?</b> <ul style="list-style-type: none"><li>• How has/will equality considerations be taken into account?</li><li>• Where known, what were the outcomes of this engagement?</li></ul>
The draft plan was developed with expert input from chargepoint operators, other local authorities who have trialled chargepoints more extensively and the Energy Savings Trust. The draft plan underwent a public consultation, which included specifically inviting comments from the borough's Disability & Inclusion Forum. As a result of engagement, we are committing in the plan to act on key feedback: <ul style="list-style-type: none"><li>• Chargepoints won't be allowed to block footways that are narrow</li><li>• Chargepoints will need to comply to new British Standard PAS 1899 (chargepoint accessibility standard, developed nationally by Motability)</li><li>• Chargepoints won't reduce the availability of disabled parking</li></ul>
<b>What sources of data and evidence have been used in this assessment?</b> Please consult the Equalities Evidence Grid for relevant data. Examples of other possible sources of information are in the Guidance document.
<ul style="list-style-type: none"><li>• Inclusive Mobility - A Guide to Best Practice on Access to Pedestrian and Transport Infrastructure (Department for Transport 2021)</li><li>• PAS 1899:2022 Electric vehicles – Accessible charging – Specification</li></ul>

## 4. Equality Analysis

Please detail, **using supporting evidence**:

- How the protected characteristics below might influence the needs and experiences of individuals, in relation to this proposal.
- How these characteristics might affect the impact of this proposal.

Tick positive/negative impact as appropriate. If there is no impact, or a neutral impact, state 'Not Applicable'

More information on each protected characteristic is provided in the Guidance document.

	Details and supporting evidence	Potential positive impact	Potential negative impact
Age	<p>Impact of a fall resulting from trip hazards associated with vehicle charging. Older people are more likely to fall including as a result of a trip hazard, and more likely to experience extended or ongoing impacts following a fall if it results in a physical injury or a loss of confidence. Source: <a href="https://www.nhs.uk/conditions/falls/">https://www.nhs.uk/conditions/falls/</a></p> <p>Drivers under 49 are more likely than older drivers to switch to electric vehicles over the next decade so may initially benefit more from the improvements, although ultimately all drivers will be required to switch. Source: <a href="https://www.ons.gov.uk/economy/environmentalaccounts/articles/overhalfofyoungerdriverslikelytoswitchtoelectricinnextdecade/2021-10-25">https://www.ons.gov.uk/economy/environmentalaccounts/articles/overhalfofyoungerdriverslikelytoswitchtoelectricinnextdecade/2021-10-25</a></p>		<input checked="" type="checkbox"/>
Disability	<p>Introduction of charging infrastructure not designed with the needs of disabled persons in mind. Across the UK, many early examples of chargepoint installations have proved to be inaccessible to some disabled people through their design and positioning. Additionally, some have reduced the accessibility of street environments through poor positioning, eg. blocking footways. Source: PAS 1899:2022 Electric vehicles – Accessible charging – Specification</p>		<input checked="" type="checkbox"/>
Sex	<p>Introduction of charging infrastructure in isolated locations where women may not feel safe, particularly at night. Across the UK, many early examples of chargepoint installations did not consider personal safety and security, at the chargepoint and on walking routes between the chargepoints and people's homes. Source: discussion at Energy Savings Trust's Local Authority EV Forum</p>		<input checked="" type="checkbox"/>
Race, ethnicity and religion			
Sexual orientation and gender reassignment			

Pregnancy and maternity			
Marriage and civil partnership			
Armed forces community			
Socio-economic considerations e.g. low income, poverty	Cost of vehicle purchase is currently a barrier to adoption of EV and so initially benefits of more public chargepoints may initially not be felt as much by persons on lower incomes. However, in the longer-term purchase prices will come down as the cost of batteries is expected to dramatically fall and as a second-hand EV market becomes better established, and the sale of new internal combustion engine vehicles ends. Further, persons on lower incomes may be less likely to have their own private off-street parking and so may benefit more from public chargepoint provision. Source: <a href="https://www.ons.gov.uk/economy/environmentalaccounts/articles/overhalfofyoungerdriverslikelytoswitchtoelectricinnextdecade/2021-10-25">https://www.ons.gov.uk/economy/environmentalaccounts/articles/overhalfofyoungerdriverslikelytoswitchtoelectricinnextdecade/2021-10-25</a>	Neutral / not applicable	Neutral / not applicable
Children in care/Care leavers			

## 5. Impact Assessment and Monitoring

*If you have not identified any disproportionate impacts and the questions below are not applicable, leave them blank and proceed to Sign Off.*

**What measures have been taken to ensure that groups with protected characteristics are able to benefit from this change, or are not disadvantaged by it?**

For example, adjustments needed to accommodate the needs of a particular group

- The plan commits the borough to not allowing trailing cables across footways or carriageways at this time to substantially reduce risk from trips and falls
- The plan commits the borough to ensuring chargepoints meet PAS 1899 accessibility standards so that they met the needs of a wide range of disabled users
- The plan commits the borough to not further constricting the width of narrow footways to ensure footways remain accessible
- The plan commits to locating chargepoints in highly visible locations and distributing chargepoints around the borough such that chargepoints are available within 5 minutes of 90% of homes without driveways for personal safety and security in particular that of women and girls

**Where a potential negative impact cannot be avoided, what measures have been put in place to mitigate or minimise this?**

<ul style="list-style-type: none"> <li>For planned future actions, provide the name of the responsible individual and the target date for implementation.</li> </ul>
Mitigations are in place as above.
<p><b>How will the equality impacts identified here be monitored and reviewed in the future?</b></p> <p>See guidance document for examples of appropriate stages to review an EQIA.</p>
There will be public consultations on the specific proposals for each item of new infrastructure (e.g. a new chargepoint) and opportunities for each to be scrutinised including through an EqlA process and through consultation/engagement with the public

## 6. Sign Off

<b>Completed by:</b> Dug Tremellen	<b>Date:</b> 26/01/23
<b>Approved by:</b>	<b>Date:</b>

If this version of the EQIA has been reviewed and/or updated:

<b>Reviewed by:</b>	<b>Date:</b>
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