

Environment Scrutiny Commission

Scrutiny Review Report: Sustainable Freight

May 2024

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Response to the EV Plan Consultation from the Environment Scrutiny Commission

1 FOREWORD

In the current culture wars, the concept of government or local authorities influencing which mode of transport is used for travel and the delivery of goods has been dressed up as a new phenomenon. However, this is not the first time that transport; and in particular, modal shift has been highly politicised. Whilst rail travel and freight declined in the post war era, from 1979, there was a politically motivated concerted effort to encourage modal shift away from rail and towards individual motorised road transport.

Cycling had also declined in the post war era, but in 1981 the GLC was elected on a programme which included significant investment in cycling infrastructure. However, that was largely quashed when, five years later, the GLC was abolished. There would be little further progress for another 2 decades, during which more and more public space would be ceded to unprecedented numbers of ever larger private vehicles, and cycling would become a marginalised and dangerous pursuit for the brave.

Modal shift to individual motorised transport was marketed as a great freedom, although it in fact played its part in the growth of household debt, boosting the profits of private banks and the control that they would have over people's lives. Meanwhile, from the 1980s this shift was prioritised, including in the transportation of goods, as a tool to undermine trade unions that had more sway on the railways than in the road haulage sector.

Even as specific political motivations have faded, we still face the legacy of decades of underinvestment in rail whilst successive governments have continued to prioritise motorised road transport and the ongoing sacrifice of public space to accommodate it. Some, in an exasperating post-truth irony, have in turns ignored the ballooning negative externalities of excessive traffic and "autobesity"¹, then accepted them as inevitable, and now blamed them on those who choose not to drive at all!

Meanwhile, Southwark has recognised that another world is possible. As congestion in cities has grown and environmental considerations become more prominent, some change is underway. A herculean effort is now needed to undo some of the damage of the past 50 years.

Councillor Margy Newens, Chair of the Environment Scrutiny Commission

¹ <https://www.forbes.com/sites/carltonreid/2024/01/22/autobesity-bloated-cars-widen-by-two-centimeters-per-year/?sh=59c389422dd8>

2 RECOMMENDATIONS

Recommendation one

The Council should join with other local authorities, the GLA, academic institutions and others as appropriate to push for more research and, where appropriate, participate in scientific trials, on non-tailpipe vehicular emissions, whether ICE vehicles or EVs, particularly with regard to the links with vehicle size and weight.

Recommendation two

The Commission recommends that the final Freight Plan adopts the same starting principle as the EV Plan, namely that: ‘The most impactful [car] journey is the one that isn’t taken’.

Where a vehicle is deemed necessary, the Council should actively minimise the production of particulate matter by:

- ***favouring the use of the smallest possible EV for the job***
- ***ensuring that drivers are trained to minimise generation of particulates***
- ***using higher quality tyres, and***
- ***maintaining a good quality road surface.***

Recommendation three

The Commission recommends:

- ***that the Council takes full account of any learning opportunities arising from the CRP report expected in relation to the Bankside trial.***
- ***That the Council collaborates with the PLA, TfL, the CRP and neighbouring boroughs to understand the infrastructure required to substantially shift freight from a road based distribution system to one which relies more heavily on rail and river interfacing directly with last-mile logistics.***
- ***That the Council carry out an immediate review of plans to deliver logistics hubs that rely exclusively on the road network. This will include those described above in the Old Kent Road area and any others in the pipeline, to ensure that limited resources are not spent on over delivering road-based freight infrastructure at the expense of prioritising more sustainable options.***

- ***Any plans to deliver road based logistics hubs should be predicated on an evidence based analysis of projected need in a future where, working with partners such as the PLA, TfL, CRP and neighbouring boroughs, Southwark maximises its potential to deliver river and rail freight options.***

The Commission recommends that the findings of this work should underpin the proposed Freight Plan (2024), which should focus on reducing the overall number of vehicular freight journeys by road, prioritising instead the interface between rail, river and the use of cargo bikes to facilitate last mile delivery solutions, whilst lower down the hierarchy and on the basis of need, supporting road logistics hubs that incorporate EVs.

Recommendation four

The Council should assist in the promotion of Cargo Bikes to small business, the community and voluntary sector, and families, such as through the annual Car Free day and at venues such as Maltby Street Market and newly pedestrianised public spaces. The Council should set itself the task of organising promotions and trials of cargo bikes – perhaps together with other less conventional cycles – at least 3 times a year at different locations in the borough, for example at park fares, markets and through pop up events.

Recommendation five

The Council should enable and promote parcel lockers and other click and collect solutions in the Freight Plan.

The Council should work with other stakeholders such as TfL, the GLA and London Councils to actively engage with online retailers and push at a borough-wide and London-wide level for click and collect options to be offered and promoted to consumers as the norm.

The Council should engage with the borough's largest retailers (including those with physical premises used for online sales) to ensure that where parking space is available there is adequate priority given to offering safe access by bike as well as convenient and secure cycle parking in order to facilitate collection/transportation of purchased goods by bike.

Recommendation six

Develop a procurement policy that will deliver zero carbon emissions by 2030, as envisaged in the Climate Emergency Strategy and Action Plan, drawing on best practice, including the work of Ashden and TfL.

Recommendation seven

Undertake research to establish the principal source and destination of freight moving around the borough in order to develop an action plan to reduce the impact of freight on poor air quality.

The Freight Plan must have a research strand in order to understand, reduce and consolidate freight journeys and map their impact on air quality. This ought to include promotion of the self-service toolkits available through TfL to local business so they can conduct studies to reduce and consolidate freight.

Scrutiny Report

3 INTRODUCTION

The Commission initiated this review at the first meeting of the administrative year 2022/23, on the 18 July 2022, and decided to roll this over for completion during the administrative year 2023/34 due to time pressures arising from the additional responsibilities conferred on the Commission.

At the outset the Commission identified the following goals:

- That the Council develops a coherent and realistic plan to deliver Sustainable Freight options for Southwark that dovetail with existing strategies and plans, including the Air Quality Action Plan, Streets for People Strategy and Climate Emergency Action Plan.
- That the energy, skills and experience of local groups delivering and advocating for Sustainable Freight are well utilised.
- That TfL/ GLA plans to support Sustainable Freight are understood and that these bodies are lobbied effectively to support the Council's plans.

4 EVIDENCE

Evidence was received from the following:

- Peddle My Wheels : 'OurBike community cargo scheme' presentation and information
- Fleet Services report and cabinet paper
- Highways officer report and update
- Planning and development officer report on Logistics hubs and last mile delivery solutions
- Draft Air Quality Plan 2023 – 2027 and presentation
- Dr Ian Mudway, Imperial College London, on the health impact of particulates, in particular those arising from EVs.
- Sam Cooper, Head of Operations, ENSO Ltd – a producer of more sustainable tyres, presentation
- Streets for People plan and presentation by Cabinet Member for Climate Emergency, Clean Air and Streets , Cllr James McAsh, and officers
- Draft EV Plan and presentation
- Cross River Partnership presentations for information (CRP is a public private partnership with 8 partner London boroughs including Southwark, originally formed to deliver cross-river infrastructure projects and now addressing sustainability challenges)
- Port of London Authority, Director of Planning and Development, James Trimmer email
- Transport for London plans for Sustainable Freight – report and presentation

5 CONTEXT

Streets for People

During the course of the review the previous Movement Plan transitioned to the Streets for People strategy.

The Streets for People strategy sets out the council's commitment to improve residents' quality of life and take action on climate change by changing how we travel and use streets in our borough. The Streets for People strategy is themed around 4 areas:

- Streets for Communities
- Streets for Journeys
- Streets for the Economy
- Streets for Nature

and designed to support:

- cleaner air
- safer and quieter streets with less traffic and fewer accidents
- healthy travel options like walking, cycling or wheeling
- greener and more pleasant spaces for our communities to connect and socialise
- a better place for all who live, work, study and visit

The Streets for People strategy has three subsidiary plans that the council consulted upon at the beginning of 2024 and which have been considered under this review. These cover:

- Electric Vehicles (EV) (the Commission's response to this consultation is included as an Appendix to this document)
- Cycling
- Walking

Objective 9 of the Streets for People strategy sets out plans to reduce the impact of freight on our streets and support business to operate sustainably and efficiently. This notes that longer distance freight movements could be replaced by trains and boats.

There are two measures that the strategy commits to:

9.1 Develop and deliver a Sustainable Freight and Last Mile Delivery Hubs Plan by 2024 that prioritises areas of greatest need and potential.

9.2 Support local businesses to switch to cargo bikes and sustainable freight methods to reduce congestion and reliance on larger vehicles and to increase year-on-year proportion of commercial deliveries using low and zero-emission vehicles.

Freight Plan

During the course of the review, officers told the Commission that the council is committed to developing a Freight Plan by the end of 2024, and this is referenced as a commitment in the Streets for People strategy.

Air Quality Plan 2023 -27

During the course of the review the council produced a new Air Quality Action Plan (AQAP) as part of its duty under London Local Air Quality Management. This outlines the action the council will take to improve air quality in Southwark between 2023 and 2027.

The Air Quality Action Plan considers a range of emissions, including NO₂ and Particulate Matter (PM)

Particle pollution includes:

- PM₁₀: inhalable particles of diameter less than or equal to 10 micrometres; and
- PM_{2.5}: fine inhalable particles of diameter less than or equal to 2.5 micrometres.

(By comparison, the diameter of a single hair is about 70 micrometres.)

Southwark is meeting its legal requirements for particulate matter, but current air quality data indicates that Southwark is exceeding World Health Organisation guidelines for PM_{2.5} limits, which is the measure used by the Mayor of London. Southwark is not meeting national objectives for Nitrogen Dioxide (NO₂).

The AQAP is arranged across seven topics, four of which are relevant to the review:

Public health and awareness raising: Increasing awareness can drive behavioural change that lowers emissions and informs the public how to reduce its exposure to air pollution;

Delivery servicing and freight: Goods and service vehicles are usually diesel powered and have high NO₂ emissions. Low emission logistics requires alternatively fuelled conveyances to combat air pollution from this source;

Borough fleet actions: Southwark's fleet includes light and heavy duty diesel-fuelled vehicles such as mini buses and refuse collection vehicles with high primary NO₂ emissions. Southwark can review its own fleet procurement to lead by example;

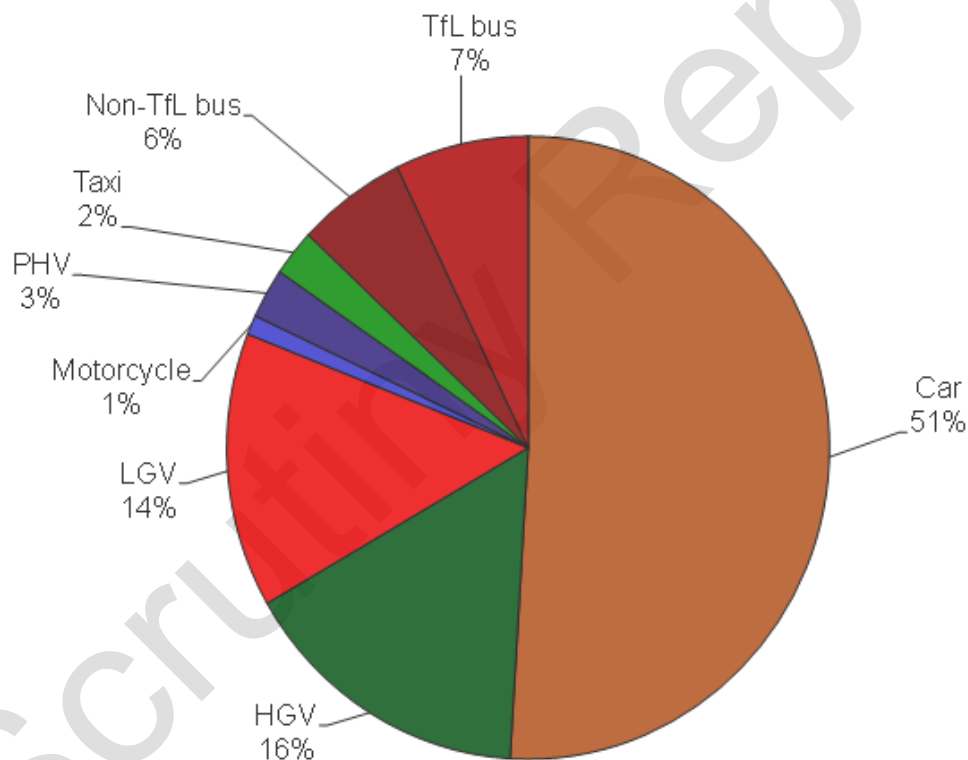
Cleaner transport: Motor vehicles are the largest source of air pollution in London. There is a need to incentivise modal shift to walking, cycling and ultra-low emission vehicles (such as electric bikes (including electric cargo bikes) and EVs).

6.1 The impact of freight on air quality, human health and ecology

Tailpipe Emissions

TfL told the Commission that in London, HGVs and LGVs account for 30% of road transport greenhouse gas (GHG) emissions (2019 figures), second only to cars (accounting for 51%).

TfL provided the below pie chart showing the distribution by vehicle type (2019):



HGVs are particularly harmful as these are frequently large diesel-fuelled vehicles with high primary NO₂ emissions. Dr Ian Mudway, Imperial College, told the Commission that tailpipe emissions from Internal Combustion Engines (ICE) are well understood to be toxic to human health, and diesel is one of the most toxic substances.

It is for this reason that Southwark Council's new Air Quality plan 2023-27 has a theme of addressing delivery servicing and freight, with a focus on transitioning

Southwark Council's fleet, which is 70% diesel², away from fossil fuels and towards less polluting vehicles, including EVs, wherever possible.

Because the science on the harms of tailpipe emissions is well established, there have been a number of regulatory actions at EU, national and regional level, as well as policy interventions at a local authority level, to reduce the impact on health of ICE tailpipe emissions. These include European Emission Standards for cars (Euro 1-6), ULEZ and, more locally, support for modal shift to EV, cycling and walking through plans coming under the Streets for People umbrella.

6.2 Electric Vehicles and Particulate Matter (PM)

EVs eliminate tailpipe emissions, however they are still sources of tyre, road, and brake dust. These include PM10 and PM2.5 PM. In general, EVs are heavier than ICE equivalents both due to the size/weight of the battery and the tendency over time for manufacturers to favour production of larger vehicles. This leads to greater tyre wear (although regenerative braking in EVs will reduce brake dust over time).

Researchers from Imperial College London's [Transition to Zero Pollution](#) initiative warn that six million tonnes of tyre wear particles are released globally each year; in London alone 2.6 million vehicles emit around nine thousand tonnes of tyre wear particles annually.

Tyre wear is the second-largest source of micro-plastics in our oceans and of air particulate pollution³. It is estimated that 25% of all micro-plastics in the sea are from tyres. A government report estimates that 52% of all the small particle pollution from road transport in 2021 came from tyre and brake wear, plus a further 24% from abrasion of roads and their painted markings. Just 15% of the emissions came from the exhausts of cars and a further 10% from the exhausts of vans and HGVs.

The transition from ICE to EV is gathering pace amongst car users and, increasingly, freight is switching to EVs.

Dr Ian Mudway of Imperial College told the commission that research on the harms of these particulates on human health is still emerging, and that public concern is ahead of the science. He said that, despite the gaps and uncertainties, the wisest course is to adopt the precautionary principle and seek to reduce PM production.

Sam Cooper, Head of Operations, ENSO Ltd, also gave evidence to the Commission on tyre dust. ENSO is one of six winning innovators selected by TfL's London Freight Lab, an innovation challenge aiming to reduce the adverse impacts of freight in London. ENSO Ltd. manufactures tyres which are more energy efficient, durable and sustainable than the average tyre, with the goal of extending EV range and reducing tyre pollution. ENSO's product is promoted principally to freight companies.

² October 2022 Fleet Services Briefing Note

³ According to [The Tyre Collective](#)

Sam Cooper told the Commission that because EVs are heavier and produce a higher level of torque than their ICE counterparts, tyre wear is from 20 – 50% higher, resulting in an extra 2 to 3 billion spent tyres each year.

The Commission heard that there is a sustainability problem with both the production and the disposal of tyres. The industry is carbon intensive and uses harmful chemicals; furthermore, there is a very wide variation in the speed at which different tyres wear. ENSO told the commission that its tyres use a greater proportion of recycled material and natural rubber than those produced by other manufacturers, and that its aim had been to design a tyre to wear as slowly as possible.

Dr Ian Mudway told the Commission that tyre composition is often not clear because of proprietary confidentiality making toxicology harder to establish. There is a study in Cambridge that is doing an analysis of composition and toxicology.

Air Quality colleagues told the Commission that particulate emissions from brakes and tyres are considerable, and greater in volume than tailpipe emissions. However, they added that tailpipe emissions can be acidic and thus more damaging to the lungs.

Dr Ian Mudway reported that the health impacts of tyre, brake and road dust particulates will differ from that of tailpipe emissions. Although these impacts are not yet established, the precautionary principle would be to assume that they may be equally deleterious to health.

The Commission Chair held a meeting with [The Tyre Collective](#) which is a clean-tech start-up company that has developed a device to capture tyre particulates for the monitoring of tyre wear.

Given Southwark Council's role and responsibility in public health, the Commission felt that the risks of increased particulate pollution (from tyres, brakes and road dust) associated with the proliferation of increasingly heavy private cars as well as delivery vehicles, must be taken extremely seriously.

Officers agreed that more work is required in this area. Southwark Council is working with Lambeth Council to investigate the impact of road dust, and there is room for further collaboration on this issue with the GLA. Whilst this work is somewhat beyond the scope of Southwark Council's draft Air Quality Action Plan, it would be reasonable for the Council to lobby for more research, for example by Imperial College to support further action. The Commission would like to see this prioritised given the shift to larger and heavier vehicles including EVs.

Recommendation one

The Council should join with other local authorities, the GLA, academic institutions and others as appropriate to push for more research and, where appropriate, participate in scientific trials, on non-tailpipe vehicular emissions, whether ICE vehicles or EVs, particularly with regard to the links with vehicle size and weight.

6.3 Reducing Particulate Matter from EVs

The Commission heard from ENSO, TfL and Dr Ian Mudway on approaches to reducing particulate production, and from the lead member, Cllr James McAsh on the overall strategic approach to transport in the borough as outlined in the Streets for People Strategy, and the link to the Council's Climate Emergency Action Plan. Officers also presented the draft EV Plan.

Dr Ian Mudway said the most effective way to reduce particulates is to eliminate or reduce the number of journeys taken, including by EV freight.

The Council's draft EV plan states: 'The most impactful car journey is the one that isn't taken'. The Commission endorses this approach and recommends the same approach is taken in the Freight Plan under development.

ENSO also endorsed the approach of reducing the number of journeys taken, and proposed various actions to lessen the pollution produced. ENSO recommended these three approaches to reduce and mitigate tyre particulate production:

- Improve driver behaviour: This is the most impactful measure, particularly in a city environment with lots of starting and stopping, and amongst delivery drivers with heavier vehicles.
- Improve the quality of the tyres: In trials under TfL's London Freightlab, ENSO's tyres showed a 35% reduction in tyre wear when compared with a typical budget tyre.
- Improve the road surface: The quality of the road surface significantly impacts rates of tyre degradation.

ENSO reported that there is currently little regulatory pressure to improve the environmental credentials of tyres. California appears to be the most advanced in this area and has proposed banning a chemical frequently used in tyres that has been linked to salmon deaths in waterways in the US. Meanwhile, EURO 4, 5 & 6 are focused on tailpipe emissions, while EURO 7 (due 2027) introduces particulate emissions set at a low-bar. ENSO would like to see more research on the harms of particulates and on ways to reduce their generation.

The Commission considered the draft EV Plan and the Chair submitted a response to the EV Plan consultation on behalf of the Commission (attached to this report as Appendix 1). The EV Plan includes a comprehensive list of actions to encourage residents' to transition away from ICE vehicles, and the council's transition from ICE freight, however it is largely silent on commercial EV freight. The Commission would like to see the final EV Plan dovetail with the Freight Plan in development.

Recommendation two

The Commission recommends that the final Freight Plan adopts the same starting principle as the EV Plan, namely that: 'The most impactful [car] journey is the one that isn't taken'.

Where a vehicle is deemed necessary, the Council should actively minimise the production of particulate matter by:

- ***favouring the use of the smallest possible EV for the job***
- ***ensuring that drivers are trained to minimise generation of particulates***
- ***using higher quality tyres, and***
- ***maintaining a good quality road surface.***

6.4 Fleet Services

Southwark Council's fleet contributes 1% of Southwark's carbon emissions. The Air Quality Action Plan has a theme focused on reducing these.

Officers outlined plans to decarbonise the current fleet of 330 vehicles which comprises diesel, petrol and hybrid models. Subsequently a procurement report was agreed by cabinet in October 2023.

Officers told the Commission that the top priority would be to reduce the total number of vehicles and journeys, which was welcomed by the Commission.

Officers told the Commission that electrified alternatives for smaller vehicles are easier to procure than their larger counterparts; finding more sustainable replacements for the 39 larger vehicles is much more challenging. Furthermore, the switch to EVs is dependent on installation of a charging network with significant infrastructure delivery costs.

There are actions in the cabinet report to improve driver behaviour. This approach aligns with evidence that this is an important step in reducing tyre wear and the production of all particulates.

6.5 Logistics Hubs and last mile delivery solutions

Logistics hubs and last mile delivery solutions work to reduce the number of journeys taken by heavier vehicles (HGV), moving freight to lighter goods vehicles (LGVs) and cargo bikes for the last stretch of the journey. They also often enable collection of goods on foot through solutions such as click and collect lockers.

The pandemic has accelerated the switch to online shopping and resulted in a large increase in deliveries to people's homes. This process is predicted to continue, with further significant increases in home deliveries. PWC 2023 Retail Monitoring report predicts that by 2027 the European last mile delivery market will nearly double compared to 2022 levels.⁴

⁴ <https://www.pwc.nl/en/insights-and-publications/services-and-industries/retail-and-consumer-goods/last-mile-delivery.html>

As a result of the switch to e-commerce in the context of a climate emergency, there is a rapidly growing move amongst policy makers and companies to find efficient, low cost, low carbon solutions to freight delivery in the city. This is driving the investment in logistics hubs and last mile delivery solutions.

This is supported by the Council's Southwark Plan. Freight and transport policies aim to minimise car journeys, promote walking and cycling and encourage efficient low-carbon delivery and servicing arrangements which minimise the number of motor vehicle journeys necessary.

Officers told the Commission that this approach is informed by a significant amount of evidence relating to demand, which suggests that structural changes in London's economy in recent decades have oriented business uses in Southwark increasingly towards central London, with huge growth in industries servicing central London's economy.

The locations seeing the largest investment and speediest growth are logistics hubs serviced by the road network, as these are currently logistically easier to deliver.

Meanwhile the [Cross River Partnership](#) (CRP) is pioneering work to increase the availability of rail and river freight options. CRP's research shows that achieving modal shift of freight from road to rail and river can play an important role in national and local objectives to reduce carbon emissions in accordance with targets to reach net zero, as well as improving air quality and reducing congestion on roads.

The Commission heard evidence that the rail network and the River Thames in London offer huge scope to move goods, with significant carbon savings. It was noted that goods arriving at rail and river hubs could ideally be loaded on site for last-mile delivery by sustainable transport such as cargo bike or EV. Evidence presented suggested that transferring goods from rail and river depots to road-based logistics hubs to be reloaded there for onward shipment was likely to be unnecessary and that the double handling involved would simply increase costs.

One risk the Commission identified is that we may bake in delivery infrastructure that relies on the road network, when rail and river offer far greater carbon savings as well as healthier streets. Officers suggested that, as the capacity requirements for freight delivery solutions are very large, both can be pursued together. The Commission was concerned at a lack of evidence that this approach had been properly thought through.

6.5.1 Road

There has been significant commercial investment in EV hubs for last mile delivery solutions in Southwark, with proposals and planning permission granted by the council for several large sites, often combining logistics hubs with other uses, such as residential property. The hubs include last-mile logistics (referring to the final step of the delivery process): transferring goods from a distribution centre to the end-user, and charging facilities for EVs.

These are mainly located around the Old Kent Road as anticipated in the draft Old Kent Road Area Action Plan, which seeks to retain industrial capacity across the Old Kent Road area, enabling intensification and new forms of development including logistics space in mixed use development.

These are the current schemes in different stages of development:

25 Mandela Way

The proposal is for a logistics hub focused on last-mile delivery (e.g. to office, retail outlet, block of flats or other residential property) within a four storey building that accommodates 12,500sqm of space. The intention is that the building is used to house goods delivered by large vehicles and sort them for transportation to the end consumer via more sustainable modes of transport such as cargo bikes or electric vans.

6-12 Verney Road

Like the 25 Mandela Way scheme, the proposal for 6-12 Verney Road is for a last-mile logistics hub, providing 24,227sqm of space. The building will have four storeys with logistics space at ground and first floor level and flexible logistics and industrial space above.

227-255 Ilderton Road

This mixed used development, currently under construction by Barrett Homes, provides new residential homes stacked above 2,184sqm of distribution and logistics space. The internal yard enables HGVs, smaller electric vehicles and cargo bikes to move through the building with space for loading and unloading.

Tower Bridge Business Park, Mandela Way

The Duchy of Lancaster is refurbishing its distribution hub on Mandela Way to modernise it and reduce carbon emissions. Improvements to Unit A (8,400sqm) include installation of PV panels and an air source heat pump, EV charging bays for six vehicles and improved access for motorised vehicles and bicycles. The works are currently under construction and aim to appeal to logistics and last mile operators.

6.5.2 Rail

There is increasing recognition that the rail network could be better used to move freight. In 2021, London's first Rail Freight Strategy since 2007 was published by TfL with renewed focus on express light rail freight.

The Cross River Partnership (CRP) emphasises hubs based on the rail network over road as a better solution, however there are logistical barriers to delivering this at scale in the short to medium term.

In March 2023 CRP published research it commissioned to investigate the opportunity to utilise existing station infrastructure in Southwark and Lambeth to support the efficient and sustainable delivery of freight into Central London using rail.

Waterloo and London Bridge Stations have been identified as the best locations. Waterloo in particular has huge potential as it has a very large accessible under-croft space, and good rail connections to the south west.

The initial step will be to initiate a light freight solution which treats “parcels as passengers” and anticipates using the otherwise unused space on existing passenger services to move small volumes of goods between the South West (such as Exeter and Southampton) and London Waterloo. This is easy to develop and low risk as it does not require substantial investment in logistics. However, the low volumes of freight involved mean that carbon savings are also low.

The alternative would be a ‘Dedicated Freight Multiple Unit (FMU)’ which would involve greater investment in a fully repurposed passenger train to carry larger volumes of freight from strategic freight hubs to Waterloo. This concept could replace 8,500 HGVs per year, reducing carbon emissions by 91% or 4,000MT per annum. CRP is coordinating this programme in conjunction with Southwark and Lambeth Councils and other partners. There is huge potential here as the under-croft logistic space available at London Waterloo is 100,000 to 200,000 square feet.⁵

6.5.3 River

The Port of London River Authority told the Commission that river freight offers advantages in both carbon saving and reliability. Transporting goods by river emits roughly half as much carbon per mile as transporting them by road.

Southwark is home to the first destination on the only light freight service currently operating on the river, which is undertaken by DHL and serviced by Thames Clippers. This is a daily service of packages from Heathrow airport to Wandsworth Riverside Quarter (by EV), then by vessel to Bankside Pier, and then to destination by Cargo Bike or EV.

There have been two CRP River Freight pilots, using the Thames to bring goods in and out of the city. Southwark hosted one of these river freight trials at Bankside Pier. This involved shipping office supplies plant/machinery from Dartford to Bankside Pier before last-mile delivery was made by either cargo bike or electric van. The transfer was facilitated using the bookable loading bay installed at Bankside. CRP said these trials demonstrate the potential to bring goods up the Thames and coordinate with last mile delivery services, usually by cargo bike. Officers advised the Commission that a full report is expected on the Bankside trial.

The Port of London Authority (PLA) and TFL both told the Commission that there is considerable potential to use the Thames to deliver freight, saving carbon, with Bankside in particular identified as a key site. There are logistical and capability studies and a desire on the part of TfL and the PLA to pursue this further. In order to do so, certain engineering and health and safety considerations will need to be resolved, including the strengthening of piers and infrastructure to accommodate the

⁵ Page 3 ‘On track for sustainable logistics: Integrating Rail Freight into London’s Deliveries’ Steer on behalf of Cross River Partnership. Ref: 24288601 March 2023 – Summary Report

safe movement of cargo bikes, as well as pedestrian freight for click & collect. The PLA indicated that it is keen to work with the Southwark Council on developing river freight.

Recommendation three

The Commission recommends:

- ***that the Council takes full account of any learning opportunities arising from the CRP report expected in relation to the Bankside trial.***
- ***That the Council collaborates with the PLA, TfL, the CRP and neighbouring boroughs to understand the infrastructure required to substantially shift freight from a road based distribution system to one which relies more heavily on rail and river interfacing directly with last-mile logistics.***
- ***That the Council carry out an immediate review of plans to deliver logistics hubs that rely exclusively on the road network. This will include those described above in the Old Kent Road area and any others in the pipeline, to ensure that limited resources are not spent on over delivering road-based freight infrastructure at the expense of prioritising more sustainable options.***
- ***Any plans to deliver road based logistics hubs should be predicated on an evidence based analysis of projected need in a future where, working with partners such as the PLA, TfL, CRP and neighbouring boroughs, Southwark maximises its potential to deliver river and rail freight options.***

The Commission recommends that the findings of this work should underpin the proposed Freight Plan (2024), which should focus on reducing the overall number of vehicular freight journeys by road, prioritising instead the interface between rail, river and the use of cargo bikes to facilitate last mile delivery solutions, whilst lower down the hierarchy and on the basis of need, supporting road logistics hubs that incorporate EVs.

6.6 Cargo Bikes

Cargo Bikes are an increasingly important way for freight to move around the borough, both as part of last mile delivery schemes and as a principal solution for small business that operate in the borough.

The Commission heard from Peddle My Wheels, who are running the OurBikes community cargo scheme, which is a subsidised scheme sponsored by the council to grow demand. In addition to the two initial schemes in East Dulwich, cargo bikes are now available to hire in Dulwich Village and Walworth.

Evidence shows that local businesses and young families make most use of the scheme. Young families are potentially a large market. Barriers to adoption are parking, cost, location and awareness. Small businesses, including community and voluntary groups, also have potential to grow their use of cargo bikes with more marketing and awareness building.

The council is working with a large range of business and Business Improvement Districts (BIDs) to encourage take up of cargo bikes.

Officers told the Commission that the Council has begun a consultation on the draft Cycling Plan, which includes a number of measures to support cycle freight. Most importantly, it includes using the Accessible Cycle Tool (ACT) in the design of new cycle infrastructure. The goal of the ACT is to ensure new cycle infrastructure is usable by all cycles, including cargo cycles. There are also provisions in the Cycle Plan to improve Cargo Bike parking.

Alongside the ongoing expansion of the OurBike scheme, officers said they will be exploring the potential for more cost-effective and efficient approaches to delivering cargo cycle for hire across the borough. They will also be looking at the potential for interventions that can support the transition by local business to cargo cycle freight, utilising learning from recent schemes.

Recommendation four

The Council should assist in the promotion of Cargo Bikes to small business, the community and voluntary sector, and families, such as through the annual Car Free day and at venues such as Maltby Street Market and newly pedestrianised public spaces. The Council should set itself the task of organising promotions and trials of cargo bikes – perhaps together with other less conventional cycles – at least 3 times a year at different locations in the borough, for example at park fares, markets and through pop up events.

6.7 Parcel Deliveries

The council has begun consulting on the Walking Plan, setting out how we seek to make our streets usable for all pedestrians and types of journeys, including walking freight. Officers told the Commission that the plan highlights the importance of providing local consolidation, such as parcel lockers and click and collect solutions.

A parcel locker was installed at South Dock in Rotherhithe. South Dock is home to a number of house boats whose residents had struggled to receive parcels, resulting in missed deliveries and repeat trips. The locker allows the delivery of parcels to a secure site in one trip.

TfL told the Commission that retailer lockers are being rolled out across the TfL estate, partnering with Amazon and InPost.

TfL are communicating the environmental benefits of lockers, and other sustainable shopping behaviours, to their customers at key times of year. Officers told the Commission that promoting Parcel Lockers will be part of the emerging Freight Plan.

Recommendation five

The Council should enable and promote parcel lockers and other click and collect solutions in the Freight Plan.

The Council should work with other stakeholders such as TfL, the GLA and London Councils to actively engage with online retailers and push at a borough-wide and London-wide level for click and collect options to be offered and promoted to consumers as the norm.

The Council should engage with the borough's largest retailers (including those with physical premises used for online sales) to ensure that where parking space is available there is adequate priority given to offering safe access by bike as well as convenient and secure cycle parking in order to facilitate collection/transportation of purchased goods by bike.

6.8 Procurement

The Commission would also like to see more emphasis on procurement as a lever to reduce freight emissions noting Ashden's research⁶ that procurement policies and councils' supply chains are an important lever to reduce emissions. Research by Ashden showed that in 2019/2020 English local authorities spent £63bn on procurement of goods and services from third parties, indicating considerable scope and, indeed, necessity to focus on procurement as a route to reduce carbon emissions.

Encouraging greener and more local procurement could have a significant impact. The Government has produced a 2020 Green Paper on Transforming Public Procurement. The Preston Model works with local anchor institutions and encourages greener and more local procurement.

The final Air Quality Action plan details various actions to support this under the delivery servicing and freight topic, including the development of procurement guidance for all departments to consider the impact of their procurement on air quality in Southwark. Addressing procurement as a means to reduce carbon emissions is also envisaged in the Climate Emergency Strategy and Action Plan. There is, however, no outcome specified, and this has yet to be addressed. Meanwhile, organisations such as TfL are on track to deliver zero carbon procurement by 2025. They also have a number of tools to support businesses to reduce transport emissions.

⁶ <https://ashden.org/news/need-to-know-sustainable-procurement/>

Recommendation six

Develop a procurement policy that will deliver zero carbon emissions by 2030, as envisaged in the Climate Emergency Strategy and Action Plan, drawing on best practice, including the work of Ashden and TfL.

6.9 Research and consolidation

The Commission heard that both government and business can benefit from undertaking studies to reduce the number and impact of deliveries.

TfL supports businesses and consumers in streamlining deliveries and servicing. It has self-service toolkits to assist in reducing the frequency of deliveries through consolidation, switching to cargo bikes, and receiving deliveries at quieter times. The Council could benefit from adopting and promoting the use of this toolkit in its procurement strategy.

Officers told the Commission that to aid with the implementation of Streets for People, and the Walking, Cycling and EV Plans, a borough-wide transport policy map is being developed. This will enable the gap, demographic and network analysis needed to identify opportunities for new highways interventions. This will include identifying potential locations for new freight interventions, such as loading facilities, timed access restrictions, consolidation and distribution centres, parcel lockers and cargo bike facilities.

In addition, the Commission recommends that this includes research on cargo delivered by big supermarkets and delivery companies such as Amazon. Officers told the Commission that this is a challenging area for the council to address as it is not under direct control. There are pockets of information on this area, but the council does not currently have access to the full picture.

Recommendation seven

Undertake research to establish the principal source and destination of freight moving around the borough in order to develop an action plan to reduce the impact of freight on poor air quality.

The Freight Plan must have a research strand in order to understand, reduce and consolidate freight journeys and map their impact on air quality. This ought to include promotion of the self-service toolkits available through TfL to local business so they can conduct studies to reduce and consolidate freight.

7 ACKNOWLEDGEMENTS

The Environment Scrutiny Commission members 2023/24:

Elected members

- Councillor Margy Newens (Chair)
- Councillor Graham Neale (Vice-Chair)
- Councillor Youcef Hassaine
- Councillor Cassandra Brown
- Councillor Reginald Popoola
- Councillor David Watson
- Councillor Leo Pollak

Co-optees

- Anna Colligan
- Simon Saville

Julie Timbrell, Project Manager, Scrutiny and co –report author with the Chair, Cllr Margy Newens.

The Commission would like to thank all the contributors to the report, listed above , and in section 4, Evidence, page 7.

Annex 1

Response to the EV Plan Consultation from the Environment Scrutiny Commission

31st January 2024

The Environment Scrutiny Commission broadly welcomes the Electric Vehicle Plan and the emphasis placed within it on the ongoing need to reduce all car travel.

The Commission notes that whilst EVs typically run on lower carbon fuel and have lower and less polluting tailpipe emissions than their fossil fuel counterparts, they still present significant negative environmental impacts in construction and disposal and through their non-tailpipe emissions. The fact that they are typically heavier than their fossil fuel counterparts raises their potential to produce particulates from tyres and road dust and presents an elevated risk of harm to more vulnerable road users. Whilst, rightly, there has been great emphasis in public discourse on the need to reduce carbon emissions and on the dangers of air pollution caused by tailpipe emissions, this has helped to promote a narrative in which EVs are portrayed as being environmentally innocuous.

The Commission therefore welcomes the council's ongoing efforts to bust this myth through an emphasis on improving our street environment in accordance with the council's Streets for People Strategy, prioritising active travel, micro-mobility and public transport over travel by any type of private car.

Although there is widespread acknowledgement that EVs produce elevated amounts of particulates from tyres, the Commission has been advised by a leading scientist from Imperial College that research on how these impact human health is still at an early stage. The Commission was advised that the precautionary principle is to reduce the risk of harm that particulates may cause as it is likely that they are deleterious to health and the wider environment.

The Commission recommends that the council proactively engage with agencies working to establish the impact of non-tailpipe emissions on health and the wider environment, in particular research led the GLA, Imperial College and King's College London.

The Commission notes that the nationwide lack of EV charging infrastructure is a significant limiting factor in the shift away from fossil fuel powered (ICE) vehicles towards EVs. The decision to switch to an EV will be at least substantially dependent upon guaranteed access to charging facilities and, so far, this is not available. A 2021 survey of vehicles parked in an area of Dulwich Village Ward supported anecdotal evidence that residents of a given street (i.e. of outwardly similar socio-economic status) with off street parking are far more likely to own an EV than those parking on the carriageway, the latter group being more likely to opt for a hybrid or ICE vehicle.

Thus an inevitable result of transition to EVs is the increased demand for off-street parking to facilitate home charging, which is accelerating the loss of planting and permeability in front gardens, whilst residents without this option, if they make the

shift at all, may resort to dangling cables into the highway from windows and trees or, worse still, running cables across the public footway.

At its November meeting, the Commission heard from 2 start-up companies who have designed secure pavement channels that sit flush with the pavement surface, which enable home charging without off-street parking. The gullies/channels are installed to traverse the public footway and can house an EV charging cable, enabling cars parked on the carriageway to be charged from an adjacent property without creating any kind of trip hazard.

The Commission recommends that the Council fully investigates these and similar options for their potential to enhance on-street charging capacity across the borough.

The introduction and enforcement of EV-only bays around charging points will help to maximise the accessibility of installed public charging points and the Commission welcomes this.

Even with such solutions, ensuring equal access to EV charging regardless of housing type and tenure will remain a significant challenge. This reinforces the point that reducing private car use in our borough will be integral to a fairer future across Southwark. Meanwhile, the Commission welcomes plans to trial EV charging infrastructure on its estates.

In general, there is a concern that if the accessibility of charging infrastructure on residential streets and estates fails to keep pace with expansion of charging infrastructure in destination carparks e.g. around shops and leisure centres, either on private or council land, easier/cheaper/more convenient charging at destination will incentivise more car journeys.

As acknowledged in the EV Plan, there is currently a significant deficit in rapid charging capacity across the borough. Increasing the capacity of rapid charging infrastructure will be key to ensuring the shift towards sustainable freight in the borough and the Commission welcomes these objectives.

Whilst working with landowners to scale up provision of EV charging points on private land such as in car parks around offices, shopping facilities and housing developments, it is essential that this does not serve to further reinforce the concept that visits to such spaces must be made by car. The Commission notes, for example, that most supermarkets prioritise car parking whilst offering insufficient secure parking space for cycles and cargo bikes.

The Commission recommends that any collaboration with private landlords on increasing the availability and choice of EV chargepoints should be combined with a focus on increasing secure parking capacity for both standard and non-standard bikes and generally incentivising active travel. (The Commission takes for granted that the council will adopt this approach on its own land.)

The Commission notes the ambition to increase the number of CPOs operating in the borough to provide a range of tariffs to users. The Commission welcomes the

focus on securing sustainable funding and exploring opportunities of income generation from its charging infrastructure that will, in turn, support further expansion of charging capacity and active travel opportunities.

The EV Plan includes actions to encourage residents' transition away from ICE vehicles, and the council's transition to EV freight, however it is largely silent on commercial EV freight. The Commission understands that a Freight Plan is due in spring. This is important as HGVs and LGVs account for 30% of road transport GHG emissions (2019 figures), second only to private cars (51%).

The Commission recommends that more thought is given to the interface between the EV Plan and the emerging Freight Plan strategy for the whole borough, beyond actions for the Council's own fleet.

The Commission recommends a focus on reducing the overall number of vehicular freight journeys by road, through investment in a Freight Plan that prioritises the interface with rail, river and the use of cargo bikes to facilitate last mile delivery solutions whilst, lower down the hierarchy, supporting road logistics hubs that incorporate EVs.