

Agenda

**Meeting: Safety, Sustainability and
Human Resources Panel**

Date: Thursday 2 December 2021

Time: 10:00am

**Place: Conference Rooms 1 and 2,
Ground Floor, Palestra, 197
Blackfriars Road, London, SE1
8NJ**

Members

Kay Carberry CBE (Chair)

Dr Nina Skorupska CBE (Vice-Chair)

Cllr Julian Bell

Bronwen Handyside

Dr Mee Ling Ng OBE

Mark Phillips

Copies of the papers and any attachments are available on [tfl.gov.uk How We Are Governed](https://tfl.gov.uk/How-We-Are-Governed).

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Further Information

If you have questions, would like further information about the meeting or require special facilities please contact:

James Varley, Secretariat Officer, 020 7983 4613; email: JamesVarley@TfL.gov.uk;

Email: JamesVarley@TfL.gov.uk.

For media enquiries please contact the TfL Press Office; telephone: 0343 222 4141; email: PressOffice@tfl.gov.uk

Howard Carter, General Counsel
Wednesday 24 November 2021

Agenda
Safety, Sustainability and Human Resources Panel
Thursday 2 December 2021

1 Apologies for Absence and Chair's Announcements

2 Declarations of Interests

General Counsel

Members are reminded that any interests in a matter under discussion must be declared at the start of the meeting, or at the commencement of the item of business.

Members must not take part in any discussion or decision on such a matter and, depending on the nature of the interest, may be asked to leave the room during the discussion.

3 Minutes of the Meeting of the Panel held on 14 September 2021
(Pages 1 - 12)

General Counsel

The Panel is asked to approve the minutes of the meeting of the Panel held on 14 September 2021 and authorise the Chair to sign them.

4 Matters Arising and Actions List (Pages 13 - 16)

General Counsel

The Panel is asked to note the updated actions list.

5 Presentation from CIRAS (Pages 17 - 38)

Chief Safety, Health and Environment Officer

The Panel is asked to note the paper.

6 Safety, Health and Environment Report (Pages 39 - 104)

Chief Safety, Health and Environment Officer

The Panel is asked to note the report.

- 7 Safety, Health and Environment Assurance Report** (Pages 105 - 114)
Interim Director of Risk and Assurance
The Panel is asked to note the paper.
- 8 Vision Zero Action Plan Progress Report** (Pages 115 - 182)
Chief Safety, Health and Environment Officer
The Panel is asked to note the paper.
- 9 Air Quality Update** (Pages 183 - 194)
Director, City Planning
The Panel is asked to note the paper.
- 10 Responsible Procurement Update** (Pages 195 - 200)
Chief Finance Officer
The Panel is asked to note the paper.
- 11 Human Resources Quarterly Report** (Pages 201 - 212)
Chief People Officer
The Panel is asked to note the report.
- 12 Members' Suggestions For Future Discussion Items** (Pages 213 - 216)
General Counsel
The Panel is asked to note the forward programme and invited to raise any suggestions for future discussion items.
- 13 Any Other business the Chair Considers Urgent**
The Chair will state the reason for urgency of any item taken.

14 Date of Next Meeting

Thursday 24 February 2022 at 10.00am

Transport for London

Minutes of the Safety, Sustainability and Human Resources Panel

**Conference Rooms 1 and 2, Ground Floor, Palestra,
197 Blackfriars Road, London, SE1 8NJ
10.00am, Tuesday 14 September 2021**

Members

Kay Carberry CBE (Chair)
Cllr Julian Bell
Dr Mee Ling Ng OBE
Mark Phillips

Executive Committee

| | |
|---------------|---|
| Howard Carter | General Counsel |
| Andy Lord | Managing Director, London Underground and TfL Engineering |
| Lilli Matson | Chief Safety, Health and Environment Officer |
| Gareth Powell | Managing Director, Surface Transport |
| Tricia Wright | Chief People Officer |

Staff

| | |
|-------------------|---|
| Tom Cunnington | Head of Buses Business Development |
| Adam Edwards | Lead Sponsor Stations and Structures |
| Jackie Gavigan | Secretariat Manager |
| Jonathon Hawkes | Strategic Planning Manager |
| Ben Hennessy | Change Delivery Lead |
| Lorraine Humphrey | Interim Director of Risk and Assurance |
| Shamus Kenny | Head of Secretariat |
| Sam Longman | Head of Corporate Environment |
| Jane Lupson | Senior Bus Safety Development Manager |
| Donna McGuigan | Diversity and Inclusion Lead |
| Dr Sam Phillips | Head of Health and Wellbeing |
| Stuart Reid | Head of Insights and Direction |
| Mike Shirbon | Head of Integrated Assurance |
| Donald Wayne | Senior Safety, Health and Environment Assurance Manager |
| Marcia Williams | Director of Diversity, Inclusion and Talent |

Also in attendance

| | |
|-----------|--|
| Peter Daw | Assistant Director for Environment and Energy, GLA |
|-----------|--|

37/09/21 Apologies for Absence and Chair's Announcements

The Chair welcomed everyone to the meeting. Howard Carter reported that apologies for absence had been received from Bronwen Handyside and Dr Nina Skorupska CBE. Cllr Julian Bell indicated that he would need to leave for part of the meeting. Shirley

Rodrigues, Deputy Mayor for Environment and Energy, was unable to attend the meeting and Peter Daw was attending in her place.

It was the first meeting of the Panel held in person since 12 February 2020 due to the coronavirus pandemic restrictions. Due to continued space restrictions, some staff were attending the meeting through Teams. The meeting was broadcast live on YouTube, except for the discussion of the information on Part 2 of the agenda, which was exempt from publication.

The Chair reminded those present that safety was paramount to TfL and encouraged Members to raise any safety issues during discussions on a relevant item or with TfL staff after the meeting. Members confirmed there were no other safety matters they wished to raise, other than those to be discussed on the agenda.

38/09/21 Declarations of Interests

Howard Carter introduced the item. Members' declarations of interests, as published on tfl.gov.uk, were up to date and there were no additional interests that related specifically to items on the agenda.

For the purposes of transparency, Mark Phillips noted Item 6 on the agenda (Measuring and Improving Employee Health) in reference to work TfL was doing on employee health monitoring and management in connection with the Rail Safety and Standards Board, on which he was Chief Executive Officer.

39/09/21 Minutes of the Meeting of the Panel held on 30 June 2021

The minutes of the meeting of the Panel held on 30 June 2021 were approved as a correct record and signed by the Chair. The Chair had also signed the minutes of the previous meetings held since June 2020.

40/09/21 Matters Arising and Actions List

Howard Carter introduced the paper, which set out progress against actions agreed at previous meetings of the Panel.

On action 28/06/21(2) arising from the Human Resources Quarterly Report at the meeting on 30 June 2021, Andy Lord confirmed that ABM, London Underground's cleaning contractor, operated a specific recognition scheme for its employees, which had recognised 300 staff members during the coronavirus pandemic, including 50 staff specifically recognised for their work on TfL operations.

The Panel noted the actions list.

41/09/21 Quarterly Safety, Health and Environment Report

Lilli Matson, Gareth Powell and Andy Lord introduced the report, which provided an overview of safety, health and environmental performance for London Underground, TfL Rail, Surface Transport (including London Overground) and Crossrail for Quarter 1 2021/21 (1 April to 26 June 2021) and notable incidents outside the reporting period.

The road, bus and public transport workforce safety scorecard measures had been met. The public transport customer safety scorecard measure was not met, with slips, trips and falls as the main cause of customer injuries, and incidents on stairs and escalators remained high. TfL continued to focus efforts on reducing slips, trips and falls on the network, with innovative thinking and practice to make it safer, such as additional cleaning and UV lighting on handrails to encourage use. Customer intoxication had caused a spike in incidents on London Underground as lockdown eased, particularly at the weekends at the largest stations. Significant work was done to raise awareness through passenger announcements and messaging and more details would be brought back to a future meeting of the Panel, including any available information on whether wearing face coverings was a factor in slips, trips and falls incidents.

[Action: Lilli Matson]

Incidents of violence and aggression towards staff had increased but the strategy to address this was having an effect. Highly trained transport safety officers had been deployed to intervene and protect frontline staff on the network. There were a number of prosecutions and body-worn cameras were rolled out to assist in the identification of offenders. Known hotspots on buses were being addressed with high levels of patrols.

Lower than normal passenger numbers and on street activity continued as tighter Government restrictions remained in place due to the coronavirus pandemic. Across the public transport network, there were no accidental customer or workforce deaths, however serious injuries had increased to a total greater than any quarter throughout 2020/21. Fifteen people were killed and early estimates indicated 849 people were seriously injured on London's streets in Quarter 1. More people cycling were killed or seriously injured compared to other transport modes, followed by powered two-wheeler drivers and then people walking. However, the risk of being killed or seriously injured per journey was falling for people cycling, which reflected a significant increase in the number of people cycling, and a change in where, when and why people were cycling.

Outside of Quarter 1, two notable road safety incidents occurred; the death of a person cycling at Holborn gyratory involving an HGV and a collision between two buses at Victoria bus station which resulted in two serious injuries and a fatal injury. A full investigation was underway in which TfL was fully involved.

The Safer Junctions programme looked at road risk by area and length and prioritised interventions and available funding on that basis, to improve safety at the highest priority locations. The Direct Vision Standard introduced systemic change to reduce the risk of HGVs themselves but did not eliminate the risks entirely. The Safe Systems approach included driver behaviour and enforcement and the Vision Zero Action Plan addressed all aspects to drive out risk. Any conclusions and lessons learnt from the Holborn cycling incident that modified the safety approach would be fed into the Action Plan.

TfL's rental e-scooter trial was well-monitored and included data on the low levels of accidents, all of which were followed up. Users were required to undergo safety training, hold a provisional driving licence and adhere to speed limits. Information gathered from

the trial would inform understanding of how e-scooters could be accommodated on London's roads safely. Safety performance data on incidents from the use of illegal scooters provided by the Metropolitan Police was difficult to extract as it fell under the 'Other vehicle' category. An update on how the e-scooter trial was progressing would be brought back to the Panel and more information would be included in future reports.

[Action: Lilli Matson/Gareth Powell]

TfL operated multi-transport modal risk models covering the approach to securing safety performance now and how to target future investment and activity to reduce new risks and look at emerging new trends. The Panel asked for a better understanding of how the corporate safety risk model was developing, how demand was changing risk exposure, scenario risk planning and behaviour changes. A more strategic overview would be brought back to the Panel.

[Action: Lilli Matson]

As ridership continued to return, TfL was focussing on ensuring a safe return to the network, including refreshing the Vision Zero Action Plan and reinforcing the message around using the roads safely.

The final report had been received from the Rail Accident Investigation Branch into the death of a person at Waterloo station in May 2020 who was fatality injured on the interface between the train and the platform and TfL was fully acting on all the recommendations in the report.

At the time of the meeting, 95 people who worked on the transport network had tragically lost their lives to Covid-19 since the start of the pandemic. Covid-19 remained the top cause of short-term absences in Quarter 1 but fell from the first to third most common cause of long-term absence when compared to the previous quarter. Absences related to mental health and musculoskeletal issues were the most significant causes of long-term absences and remained the focus of TfL's preventative measures.

Wearing of face coverings, except for those who are exempt, was a condition of carriage on the network and enforcement and messaging to customers continued to encourage high compliance. The vaccine clinics and operation of testing facilities continued to be rolled out to staff and contractors to help intercept the virus and ensure they could work safely.

Following recent episodes of heavy rain and severe flooding, TfL was looking at the resilience of its assets and any lessons learnt to feed into its management plan for climate change. Huge efforts were being made into readiness for the expansion of the Ultra Low Emission Zone scheme on 25 October 2021 which would improve air quality in London.

TfL's electricity consumption in Quarter 1 reflected the near normal operation of services and included the reopening of the Waterloo & City line for the first time since March 2020. Consumption was 31 per cent higher compared to the same quarter last year due to reduced service levels as a result of the pandemic. Carbon emissions were only 21 per cent higher, partly offset by grid decarbonisation.

The Panel noted the report.

42/09/21 Measuring and Improving Employee Health

Lilli Matson, Dr Sam Phillips and Jane Lupson introduced the paper, which provided an update on the progress of a health and wellbeing programme for London bus drivers, as well as steps that TfL was undertaking to improve and support the health of its own employees.

The pandemic highlighted the impact preventable underlying conditions such as diabetes, hypertension and obesity could have by increasing the risk of poor outcomes amongst those suffering with Covid-19. Social inequalities also affected outcomes and impacted on general health and wellbeing. Improved health and wellbeing benefitted not only individual employees but also the organisation, resulting in improved attendance, engagement and productivity.

There were several elements to ensuring that any health and wellbeing initiatives brought benefits to employees, such as ensuring initiatives were data driven and evidence based. Any interventions would be rigorously evaluated to determine their benefit and benchmarked both internally and externally.

TfL was undertaking various initiatives to improve and support employee health, including proactive health promotion through trained Health and Wellbeing champions and reactive support through the Employee Assistance and Occupational Health programmes. For harder to reach operational employees, the Employer Health Innovation Fund grant would enable TfL to understand and help overcome the barriers to accessing existing health and wellbeing tools over the next 18 months. Mobile buses would be placed at different sites offering health assessments and GP referrals if needed. A physical and mental health programme for staff at Acton Depot would be developed based on survey study results and evaluated after 12 months. The Health and Wellbeing Steering Group was prioritising leadership commitment, improved communications, and support and training for line managers to determine the milestones, deliverables and measures.

Progress made on the development of a health and wellbeing programme for London bus drivers included the introduction of self-assessment health kiosks at each of the operators to gather data across the whole of the network. The Employer Health Innovation Fund grant would enable TfL to research and pilot the best way to deliver bus driver health and wellbeing assessments in the longer term. Nine bids from bus operators for the Fatigue and Wellbeing Innovation Challenge would be taken forward. Funding awards would be announced shortly with trials due to start in autumn 2021.

TfL valued employee health and wellbeing and had much already in place to support employees. However, there was more that could be done and improved reporting on health data was key. TfL worked closely with its contractors to consider how it could influence the health and wellbeing of their staff, either through contractual obligations and/or as an exemplar of employee best practice. The work TfL was undertaking with the bus operators to improve health among bus drivers was an example of its commitment to support contractors.

Progress would be reported back to the Panel in six months time, including more detail on milestones and measurements used to assess staff awareness and the impact of the initiatives.

[Action: Lilli Matson]

The Panel noted the paper.

43/09/21 Bus Driver Welfare

Gareth Powell and Adam Edwards introduced the paper, which provided an update on workstreams in progress to improve bus driver welfare, including the provision of toilets and bus driver welfare facilities such as mess rooms.

Providing good bus driver facilities aligned with the Mayor's Transport Strategy by ensuring that the bus network was operationally efficient and reliable and therefore met customer expectations. TfL was committed to ensuring that drivers had access to toilets and welfare facilities to carry out their crucial role. The pandemic had impacted the availability and capacity of existing driver welfare facilities and TfL had rapidly responded to address this by providing temporary toilets and expediting plans to provide more mess room capacity to allow social distancing.

TfL continued to engage with bus drivers, operators and Unite to ensure that, as bus routes changed, they were assigned the correct priority within the programme and new toilet facilities were delivered on the highest priority routes. Opportunities for developers to provide facilities for bus drivers would continue to be identified as part of Section 106 planning contributions and other negotiated agreements. TfL continued to identify driver relief facilities in need of renewal and progress projects to ensure facilities met the needs of drivers.

The Panel noted the paper.

44/09/21 Bus Safety Programme and Driver Health and Wellbeing

Gareth Powell and Jane Lupson introduced the paper, which provided an update on the progress of the Bus Safety Programme as well as the emerging work on Driver Health and Wellbeing, in response to the longer-term recommendations made by University College London's Institute of Healthy Equity report into driver deaths as a result of Covid-19.

The number of people killed or seriously injured in or by a bus fell by 38 per cent to 132 people between 2019 and 2020, which was the lowest number on record. While this reduction had exceeded the 2022 target, there was still more to do to ensure reductions continued in those killed and seriously injured in the move out of the pandemic.

The retrofit roll-out of Intelligent Speed Assistance technology began in July 2021 and the programme was expected to deliver 1,200 buses in the first tranche. Future tranches would be subject to the next Government funding settlement.

The safety training programme for London bus drivers commenced in May 2019 but delivery had been severely impacted by the pandemic, with suspensions of all classroom-based training during lockdowns and time taken to ensure Covid-19 safe training environments. TfL was working with operators to establish a revised end date for the training with an intended target of all drivers receiving training by March 2022.

The next round of bus driver training would focus on diversity and inclusion and an update would be brought back to the Panel, including further information on improving bus safety for more vulnerable customers. **[Action: Garth Powell]**

More frequent voluntary health assessments for drivers were being introduced in the form of self-assessment kiosks to help detect health conditions, such as hypertension, diabetes and heart disease at an earlier stage. The kiosks would signpost drivers to additional support available from their operator, Employee Assistance Programmes and other external resources. This enabled bus operators to assist drivers in getting the help they needed and built on the open culture work of the fatigue management programme.

The Panel noted the paper.

45/09/21 Vision Zero Action Plan Update

Lilli Matson and Stuart Reid introduced the paper, which set out the intention to publish an update to the 2018 Vision Zero Action Plan, as well as an overview of the purpose and content of the document.

The Mayor's commitment to Vision Zero and the elimination of deaths and serious injuries from the road network included interim targets to reduce deaths and serious injuries by 65 per cent by 2022, 70 per cent by 2030 and for all deaths and serious injuries from road collisions to be eliminated from London's streets by 2041. The 2018 Vision Zero Action Plan outlined the Safe Systems framework TfL had adopted to work towards those goals and a progress report was planned; to take stock of the considerable amount of progress delivered; to refocus attention on Vision Zero as London emerged from the pandemic; and to share new insights that had emerged. Actions set out in the 2018 Action Plan would be incorporated into the refresh document and delivery status would be reported back.

The progress report would consider: the vision for London and application of the Safe Systems framework; progress in the last three years and emerging road safety trends; what London had delivered and new actions yet to be delivered under the five Safe System pillars of safe speeds, safe streets, safe vehicles, safe behaviours, and post-collision response and victim support.

The final draft of the Vision Zero Action Plan would be shared with the Panel prior to publication.

The Panel noted the paper.

46/09/21 TfL Sustainability Report and Corporate Environment Plan

Lilli Matson and Sam Longman introduced the paper, which contained an overview of the purpose and content of the Sustainability Report alongside, and supported by, a Corporate Environment Plan for the first time in 2021, and outlined TfL's approach to sustainability and environment to customers, staff and suppliers.

The Sustainability Report was a wide-ranging report that aimed to capture the social, economic and environmental benefit TfL delivered and to track progress. It provided an account of work to date and included key metrics to measure performance. Progress and performance against metrics and plans for improvement would be reported annually to the Panel.

The Corporate Environment Plan set out TfL's future approach to improving its organisational performance. It was a forward-looking plan with a focus on the environment strand of sustainability, providing more detail on its ambition, targets and plans. Its central aim was transition to zero-carbon London with five key themes of air quality, sustainable resources, best environmental practices, green infrastructure and climate emergency. Progress on the delivery of the Plan's objectives would be reported quarterly to the Panel and annually through the TfL Safety, Health and Environment report and future Sustainability Reports.

The focus was on the different activities, wide range of services, large workforce and vast supply chain that TfL as a large organisation undertook. The documents were intended to help improve environmental and sustainability performance, engage staff and stakeholders, attract and retain talent, support efforts to secure investment and build and strengthen partnerships.

The final drafts of the Sustainability Report and the Corporate Environment Plan would be shared with the Panel prior to publication.

The Panel noted the paper.

47/09/21 Human Resources Quarterly Report

Tricia Wright introduced the paper, which provided an update on key Human Resources (HR) led activities and performance for the period July - September 2021.

Updates included people performance against TfL scorecard measures and further details on TfL's ongoing response to the coronavirus pandemic, including the move toward office re-occupation and transition to a hybrid way of working. It also included updates on activity delivered across the HR function aligning to three of TfL's top People Priorities: a more inclusive and diverse organisation; an engaged, motivated and healthy workforce; and the right people, skills and capacity to deliver the Business Plan.

The first key indicator of progress against the people scorecard measures would be the results of the annual Viewpoint staff survey which would be launched at the end of September 2021, following which an informal briefing would be provided for Members.

[Action: Tricia Wright/Secretariat]

The recently finalised refreshed equality objectives would be communicated across the organisation and delivery teams would be accountable for the individual initiatives to develop delivery plans. The objectives would form a foundation to the ongoing development of TfL's future focused diversity and inclusion strategy, Action on Inclusion, scheduled to be published in January 2022.

Marcia Williams had been appointed as the new Director of Diversity, Inclusion and Talent and was welcomed by the Panel. The new Director would be responsible for the diversity and inclusion strategy, principles and practices being delivered across the respective businesses, acknowledging the differing needs and business plans in each area. She was also responsible for implementing a TfL-wide talent strategy, organisational development and talent acquisition and creating a diverse workforce with a culture of high performance to meet current and future needs.

The latest group of 46 graduates and 64 apprentices were undertaking their induction this week, with a further 58 apprentices joining in January 2022. Fifteen students from 'Steps in to Work' celebrated completing their year end employability programme at an event in July 2021 and the students would be supported into employment over the coming year. A number had secured apprenticeships and some had entered further education.

TfL was experiencing an increase in staff turnover with a number of leavers attracted to other organisations for significantly more salary, particularly at senior levels, and it was struggling to recruit into a number of areas. The organisation was looking at ways to stall and mitigate this, particularly for diverse talent, and the issue was also being considered by the Remuneration Committee.

The Panel noted the report.

48/09/21 Diversity and Inclusion Update

Marcia Williams introduced the paper, which provided an overview of the work delivered and planned to help ensure TfL's workforce was more reflective of London and would create and embed a fairer and more inclusive culture where colleagues at all levels felt engaged and supported to be their authentic selves.

TfL was committed to delivering on equality and fairness in its recovery from the pandemic. London's diversity was one of its greatest assets and TfL was working to make its workforce better represent the city it served, especially at senior levels. The environment it was operating in was uncertain and this was having an impact on the ability to attract and retain leaders.

In response to recent societal events relating to inequality and injustice, TfL had acted by offering many Director led 'listening sessions' across the organisation which were well received. TfL recognised that there was more work to be done to ensure the consistent provision of the supportive and inclusive environment to which it was committed.

TfL was taking action to address diversity within the organisation, from building diverse pipelines for future leaders to supporting those ready for a leadership role. This year it was launching its Action on Inclusion strategy to ensure a continued relentless pursuit of inclusive leadership, cultures, behaviours and ways of working across the organisation. Colleagues were working to define TfL's Vision and Values and set out future direction. It was measuring success on how included colleagues felt with a new TfL Scorecard, addressing issues around race equality and challenging itself to do better by translating the Anti-Racism Leadership Charter into concrete actions to support colleagues.

Next steps also included: identifying pan-TfL diversity and inclusion priorities with the aim of collating common themes and issues at a TfL level and producing an Action Plan to address the findings; developing and delivering a Disability Roadmap; reviewing SafeLine and enhancing support mechanisms for colleagues to report issues of bullying and harassment and or/discrimination; and designing and implementing a new 12-week pre-employment intervention that incorporated traineeships and a deliverable model for those over 25 with barriers into the workplace.

The Panel noted the paper.

49/09/21 Safety, Health and Environment Assurance Report

Lilli Matson and Stuart Reid introduced the paper, which set out the proposed approach to continuing to strengthen and improve TfL's safety, health and environment (SHE) assurance activities; by providing information on assurance activity and findings; and identifying areas where further development was proposed or underway.

The Office of Rail and Road had highlighted the importance of continuing to have appropriate arrangements in place to monitor and review the effectiveness of risk controls. Recent discussion with the Audit and Assurance Committee identified a need for more visibility and scrutiny of SHE risk management and the assurance processes in place to ensure and evidence compliance with TfL's standards and processes.

Starting from September 2021, it was proposed to improve reporting SHE assurance information to the Panel. As the digital assurance capabilities currently in development were rolled out, there would be progressively more data and insight to report to the TfL Committees and Panels providing risk oversight.

An integrated approach had been adopted to deliver this improvement, based on two complementary strands of work. The first of these concerns ensured sufficient visibility, including reporting to senior executives on SHE assurance and key SHE risks in a unified and consistent way. The second strand included improvement of assurance processes to ensure the required tools and processes were in place. This work was being developed collaboratively across TfL directorates.

The Panel noted the report, considered any further development areas and agreed to regular reporting to the Panel.

50/09/21 Enterprise Risk Update – Inability to Support New Ways of Working (ER10)

Tricia Wright and Ben Hennessey introduced the paper, which provided an overview of Enterprise Risk 10 ('Inability to support new ways of working') which focused on technology, people and estates for office-based employees.

The risk status had been amended to adequately controlled. TfL's approach to programme management, planning and governance was a key factor in the reassessment of the risk status being updated. The programme was coordinating the delivery of clearly identified enablers towards hybrid working under different workstream, led by subject matter experts. The workstream delivery plans incorporated mitigations for the risks.

A gradual transition to hybrid working began from 17 August 2021, in line with the Government guidance. In the first three months, a partial return to the office would be optional. From mid-November 2021, TfL employees would return to the office for at least 20 per cent of their working time. The transition phase would run to March 2022 and a detailed business case proposal for future hybrid working would be submitted ahead of this date, for implementation from approximately April 2022 onwards. A longer duration

of the transition phase would allow the programme to continue to implement enablers, as well as test, trial, adapt and evolve the approach driven by evidence and insights.

The Panel noted the paper and the supplementary information on Part 2 of the agenda.

51/09/21 Members' Suggestions for Future Discussion Items

Howard Carter introduced the item. No additional suggestions were raised for future discussion items on the forward plan or for informal briefings.

The Panel noted the forward plan.

52/09/21 Any Other Business the Chair Considers Urgent

There was no urgent business.

53/09/21 Date of Next Meeting

The next scheduled meeting of the Panel would be held on Thursday 2 December 2021 at 10.00am.

54/09/21 Exclusion of the Press and Public

The Panel agreed to exclude the press and public from the meeting, in accordance with paragraph 3 of Schedule 12A to the Local Government Act 1972 (as amended), when it considered the exempt information in relation to the item on Enterprise Risk Update – Inability to Support New Ways of Working (ER10).

The meeting closed at 12.28pm.

Chair: _____

Date: _____

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Date: 2 December 2021

Item: Actions List

This paper will be considered in public

1 Summary

1.1 This paper informs the Panel of progress against actions agreed at previous meetings.

2 Recommendation

2.1 **The Panel is asked to note the Actions List.**

List of appendices:

Appendix 1: Actions List

List of Background Papers:

Minutes of previous meetings of the Panel

Contact Officer: Howard Carter, General Counsel
Email: HowardCarter@tfl.gov.uk

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Safety, Sustainability and Human Resources Panel Actions List (reported to the meeting on 2 December 2021)

Actions from the meeting held on 14 September 2021

| Minute No. | Description | Action By | Target Date | Status/note |
|--------------|---|------------------------------|------------------|--|
| 41/09/21 (1) | Quarterly Safety, Health and Environment Report Provide an update on work on reducing slips, trips and falls (including any available information on whether mask wearing face coverings was a factor) on the LU network. | Lilli Matson | 2 December 2021 | Verbal update will be provided at this meeting |
| 41/09/21 (2) | Quarterly Safety, Health and Environment Report Provide an update on the e-scooter trial and include more information in future reports. | Gareth Powell / Lilli Matson | - | An update on the trial will be provided at a future meeting and additional information is included in the Quarterly Report. |
| 41/09/21 (3) | Quarterly Safety, Health and Environment Report Provide a strategic overview of the Corporate Safety Risk model. | Lilli Matson | 24 February 2022 | This will be provided in the Enterprise Risk Update - Major Safety, Health or Environmental Incident or Crisis (ER1) paper in February 2022. |
| 42/09/21 | Measuring and Improving Employee Health Provide a progress update to the Panel. | Lilli Matson | March 2022 | On agenda forward plan for 2022/23. |
| 44/09/21 | Bus Safety Programme and Driver Health and Wellbeing The next update to the Panel would include improving safety for vulnerable passengers | Gareth Powell | 24 February 2022 | This will be taken forward in the next report. |

| Minute No. | Description | Action By | Target Date | Status/note |
|-------------------|---|------------------|--------------------|--|
| 47/09/21 | Human Resources Quarterly Report Provide a briefing on the Viewpoint Staff Survey | Tricia Wright | January 2022 | Briefing to be arranged for January 2022 |

Outstanding actions from previous meetings

| | | | | |
|-----------------|---|--------------|-------------|---|
| 10/02/21 | Sustainability in TfL Buildings The Panel would be updated on the Sustainable Development Framework (SDF) after its launch. | Graeme Craig | Autumn 2021 | Updated to be provided after the launch of the SDF in the autumn. |
|-----------------|---|--------------|-------------|---|

Date: 2 December 2021

Item: Presentation from CIRAS

This paper will be considered in public

1 Summary

- 1.1 Each year the Confidential Incident Reporting Service (CIRAS) presents an annual comparator with other sectors, examining trends and themes which point to lessons that can be learnt by TfL.

2 Recommendation

- 2.1 The Panel is asked to note the paper and presentation.

3 Background

- 3.1 CIRAS is an independent confidential reporting system for member organisations across the UK for staff to report safety, health and environmental concerns. It offers a service that allows employees to raise such concerns in confidence which are captured, investigated and concluded. This external service complements our internal reporting systems and procedures.
- 3.2 TfL ensures that all employees are aware of CIRAS and we take all reporting seriously. We always investigate, provide a prompt response and take action as necessary.
- 3.3 For noting, TfL also uses SafeLine and Crimestoppers which allow our staff to raise safety and security concerns in confidence.

List of appendices to this report:

Appendix 1 – CIRAS presentation – The impact of confidential reporting

List of Background Papers:

None

Contact Officer: Lilli Matson, Chief Safety, Health and Environment Officer
Email: LilliMatson@tfl.gov.uk

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Impact of confidential reporting across TfL

Key points

Reporting rate

Confidential reporting rate fell during pandemic.
With (non covid) concerns at 30% (2020/21) and 60% (2021/22 so far) of 2019/20 levels, are there hidden concerns?

Reporting topics

Fatigue is no longer a top confidential concern – concerns about rules & procedures and health & wellbeing now most common

Safety Culture

Against a backdrop of a majority agreeing that safety reporting is encouraged, $\frac{3}{4}$ confidential reporters did not feel their concern would be dealt with effectively through internal channels.

TfL-CIRAS partnership

Champions network and new induction materials in place to promote availability of CIRAS to staff.
Dashboard for TfL management, and full access to member events and shared learning materials on CIRAS website.

CIRAS – working with TfL

Confidential reporting

Surfacing concerns that are otherwise not heard:

- Fear
- Internal channels not working

Closing the loop – reporters can see the impact of their courage to report

Facilitating improvements:

- Action to address concerns
- Better communication where the report arose from a mis-perception

➤ Positive reporting culture is part of a mature safety culture

Shared learning community

1900+ CIRAS members

Reports and responses shared so others can learn

Events bring members together around a topic

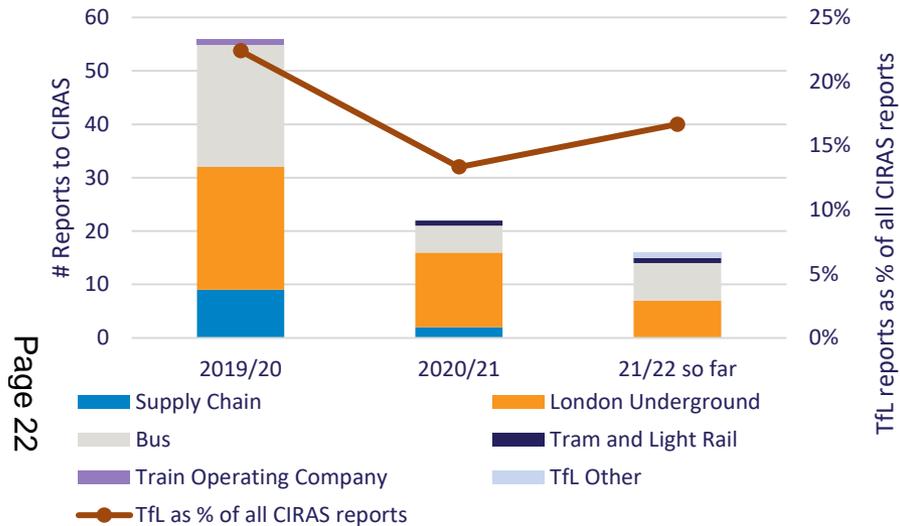
Good practice sharing online and in newsletters

Independent intelligence

Reporting data to triangulate with internal sources and benchmark against the transport sector

CIRAS reports - headlines

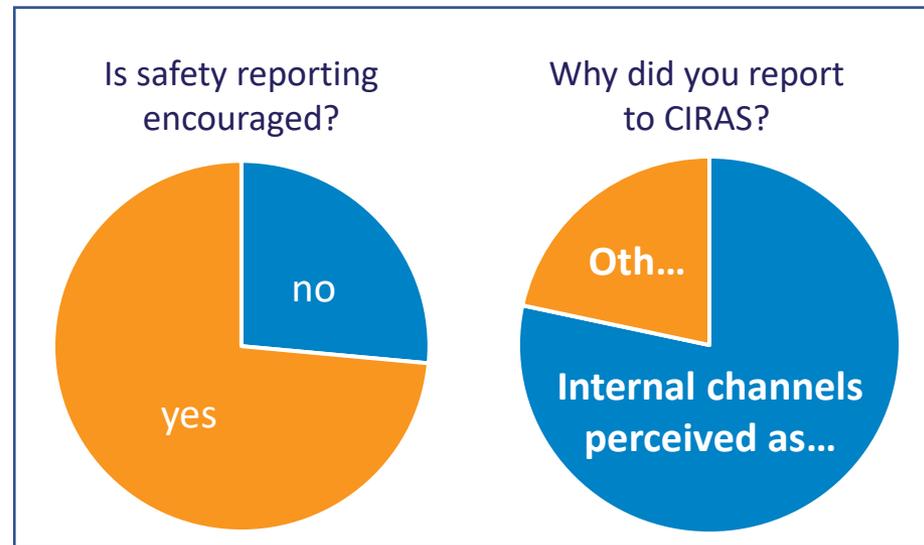
Number of CIRAS reports for TfL



Covid impact in 20/21:
 Overall reports to CIRAS dropped by **1/3**
 TfL reports dropped by almost **2/3**

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Safety culture contrasts



Top topics April 2020 – October 2021



Rules & procedures



Health and wellbeing



Confidential Reporting for Safety

Report hotline 0800 4 101 101

Text 07507 285 887

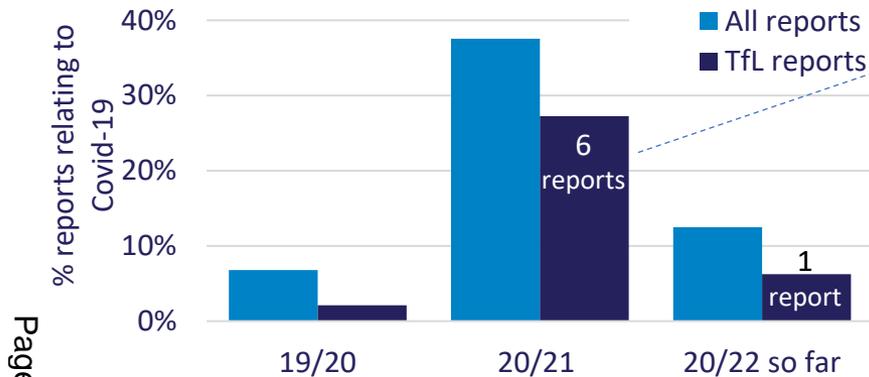
Freepost CIRAS www.ciras.org.uk

What have we learned from confidential reports through the pandemic period?



CIRAS reports – pandemic impact ?

Significant proportion of concerns related to Covid-19

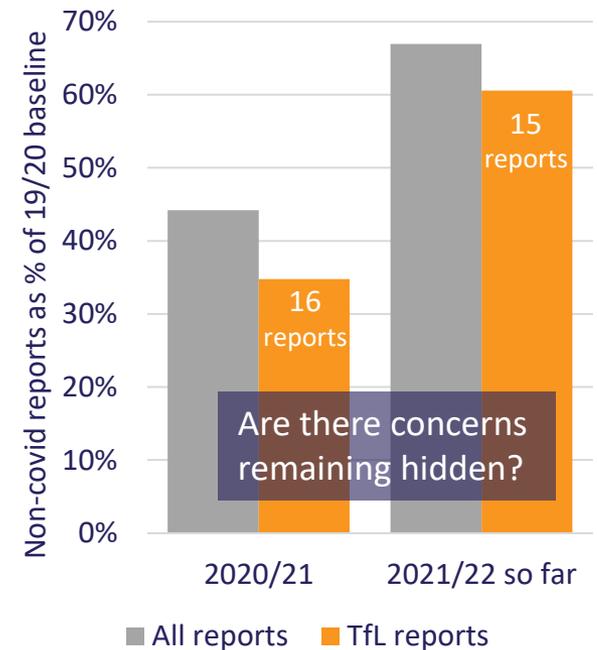
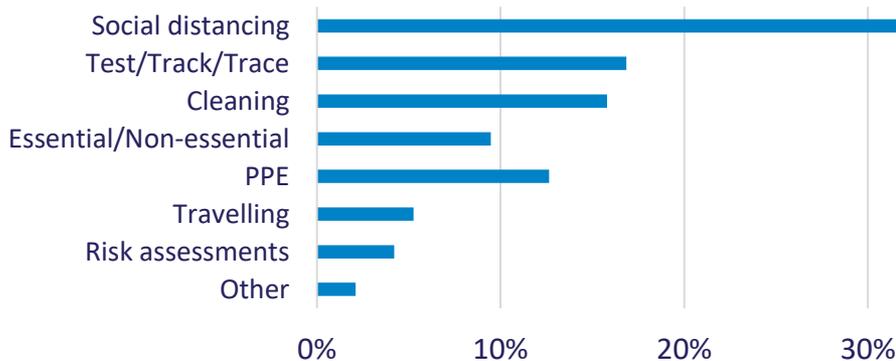


Lower proportion of Covid reports for Tfl and...

...‘Normal’ safety concerns fell further for Tfl than for all CIRAS members.

Page 24

Topics of Covid-19 related reports (all CIRAS, 2020/21)



Are there concerns remaining hidden?



Confidential Reporting for Safety

Report hotline 0800 4 101 101

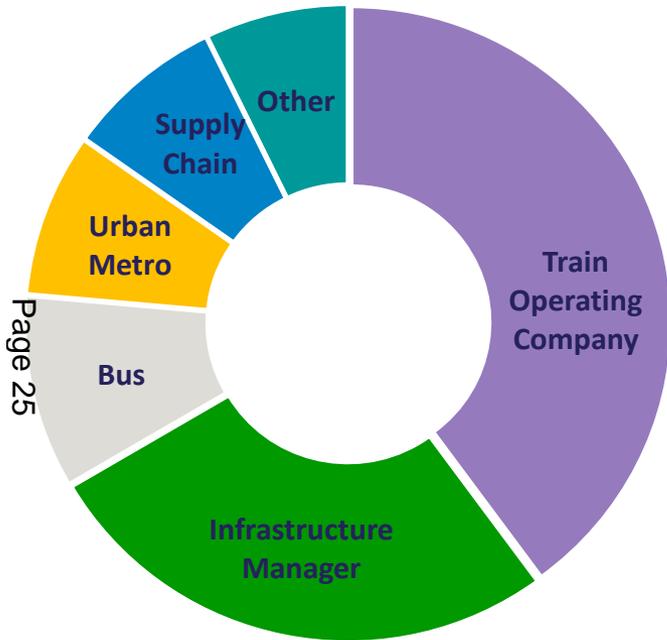
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All reports Tfl reports

Freepost CIRAS www.ciras.org.uk

CIRAS report numbers: April 2020 – October 2021

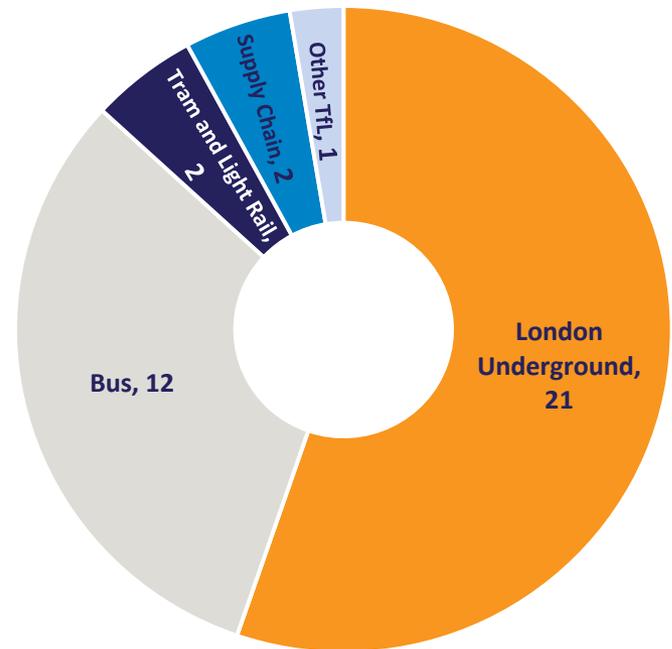
Reports for all CIRAS members



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14% reports went to TfL organisations

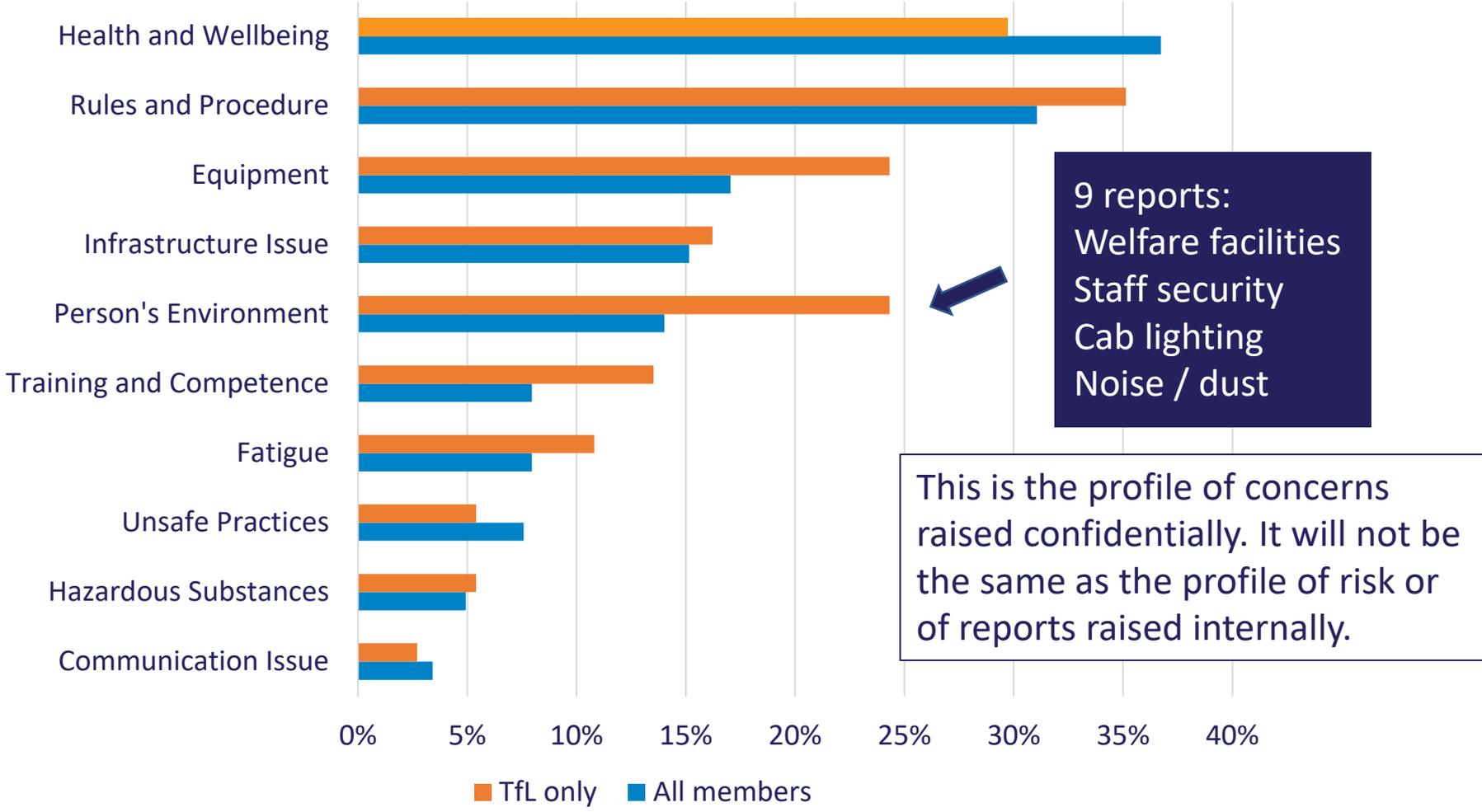
TfL reports



Majority of reports relate to London Underground and bus operators.
Supply chain reporting still limited – hidden concerns?

Reporting themes – profile comparison (April 2020-now)

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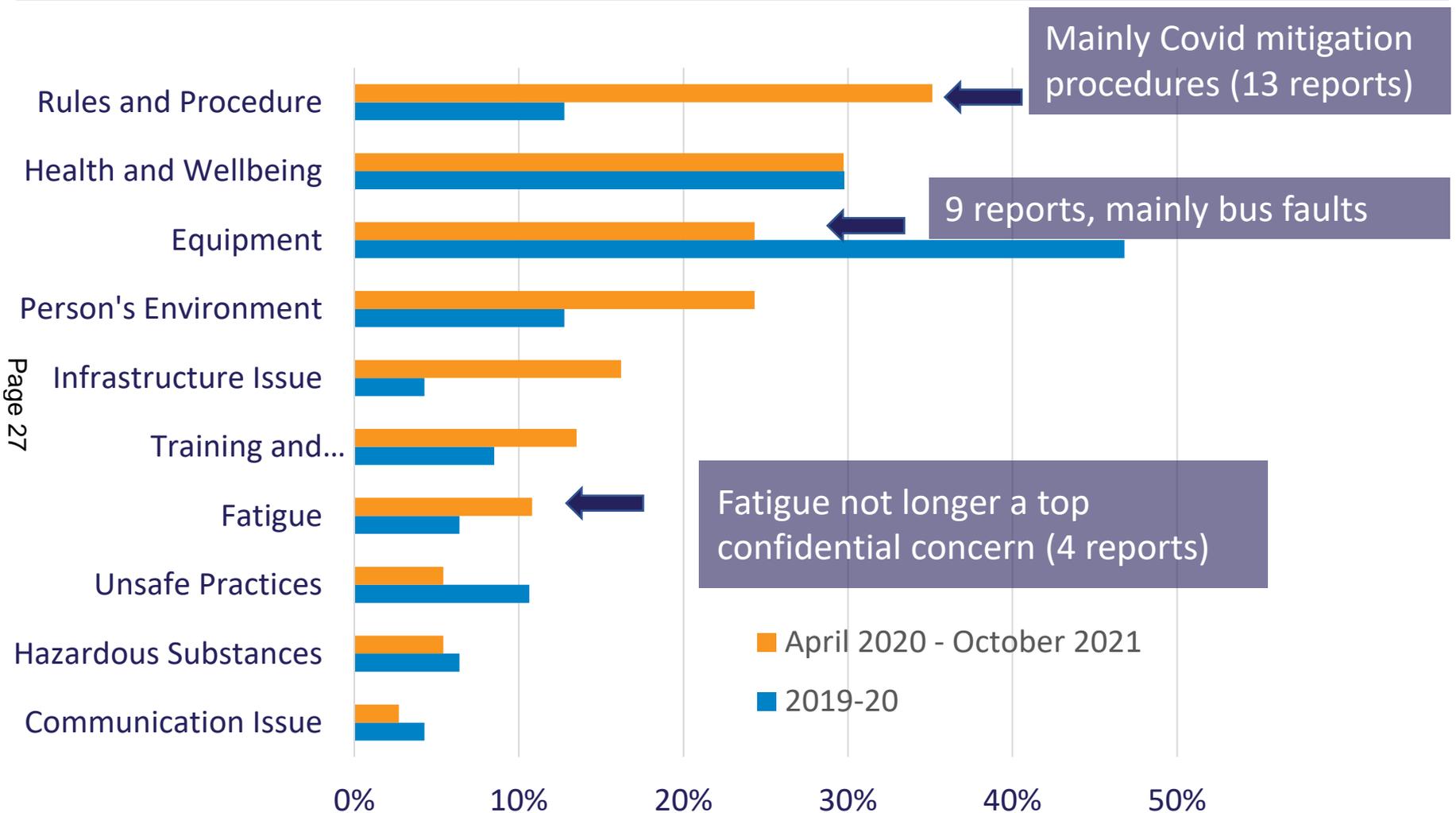
Confidential Reporting for Safety

Report hotline 0800 4 101 101

Text 07507 285 887

Freepost CIRAS www.ciras.org.uk

TfL reporting themes – changes over time



The stories behind the numbers - examples

Issues affecting passenger or staff safety

Concern

Intermittent fault on light above passenger doors on bus – flickering causing distraction and potential for road accident – previously investigated but not fixed.

Response

More thorough investigation found and fixed the root cause of the issue in an insecure microswitch, leading to a programme of checks across the bus fleet. Risk of a road accident caused by distraction reduced.

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Concern

The introduction of the Acoustic Vehicle Alerting System for electric buses raised concerns that the sounds were a distraction to drivers, potentially causing a road accident.

Response

Fleet check and repositioning of speakers for some buses, together with continued engagement with staff regarding the changeover to quieter electric buses.

The stories behind the numbers - examples

Covid related issues

Concern

Fire doors were being wedged open at a depot to reduce the spread of Covid-19 from touching the door handles, creating a fire risk.

Response

Practice of wedging fire doors open was stopped to reduce fire risk, and cleaning regime of touchpoints increased to reduce the Covid risk a different way.

Page 29

Concerns

We processed a number of reports with concerns about:

- Cleaning
- Access to hygiene facilities
- Test and trace arrangements
- Social distancing

Responses

The responses :

- Clarified the arrangements in place as reassurance to the reporter
- Noted the need to ensure arrangements were better communicated
- Re-briefed supervisors to ensure procedures were fully implemented locally

What have we learned about safety culture from confidential reports?



Confidential
Reporting
for Safety

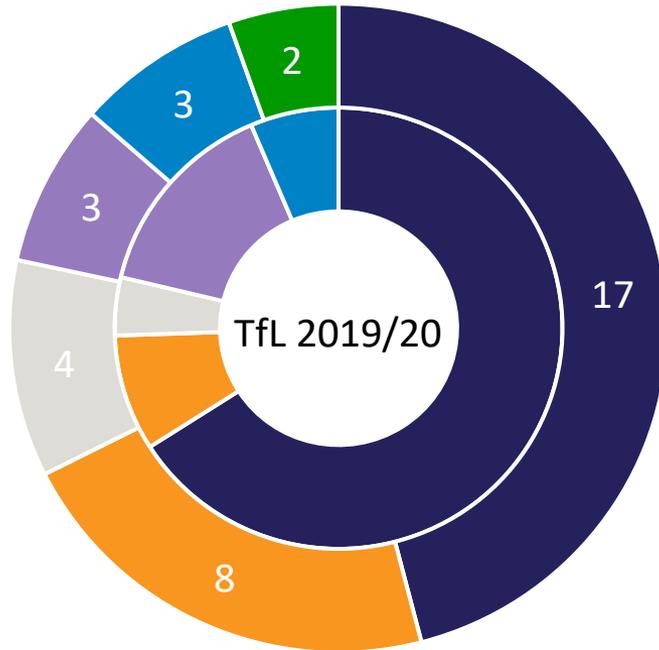
Report hotline 0800 4 101 101

Text 07507 285 887

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Why do staff say they bring concerns to CIRAS?

TfL since April 2020



- Internal response unsatisfactory
- Perception of internal channels
- Internal response took too long
- Fear
- 3rd Party
- Anonymous

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3/4 reporters come to CIRAS because they perceive internal channels as ineffective

| Concern raised internally first? | |
|----------------------------------|--------------------|
| Since April 2020 | 60% (21 reporters) |
| 2019/20 | 70% (33 reporters) |



Confidential Reporting for Safety

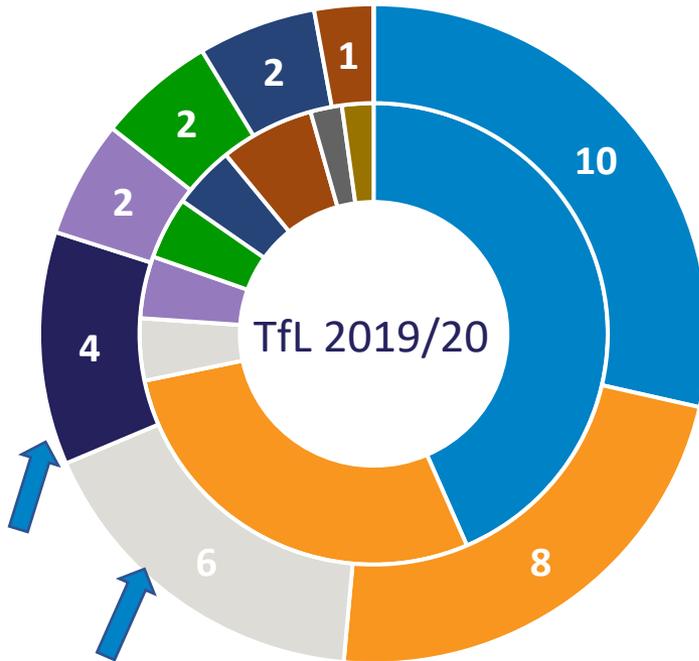
Report hotline 0800 4 101 101

Text 07507 285 887

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Perceived* root causes – trends in TfL reports

TfL since April 2020



- Infrastructure, vehicles, equipment and clothing
- Ineffective risk management
- Cost-saving
- Change management
- Intentional rule breaking
- Rostering
- Processes and Procedures
- Competence management
- Physical, mental or emotional health
- Information sharing and communication

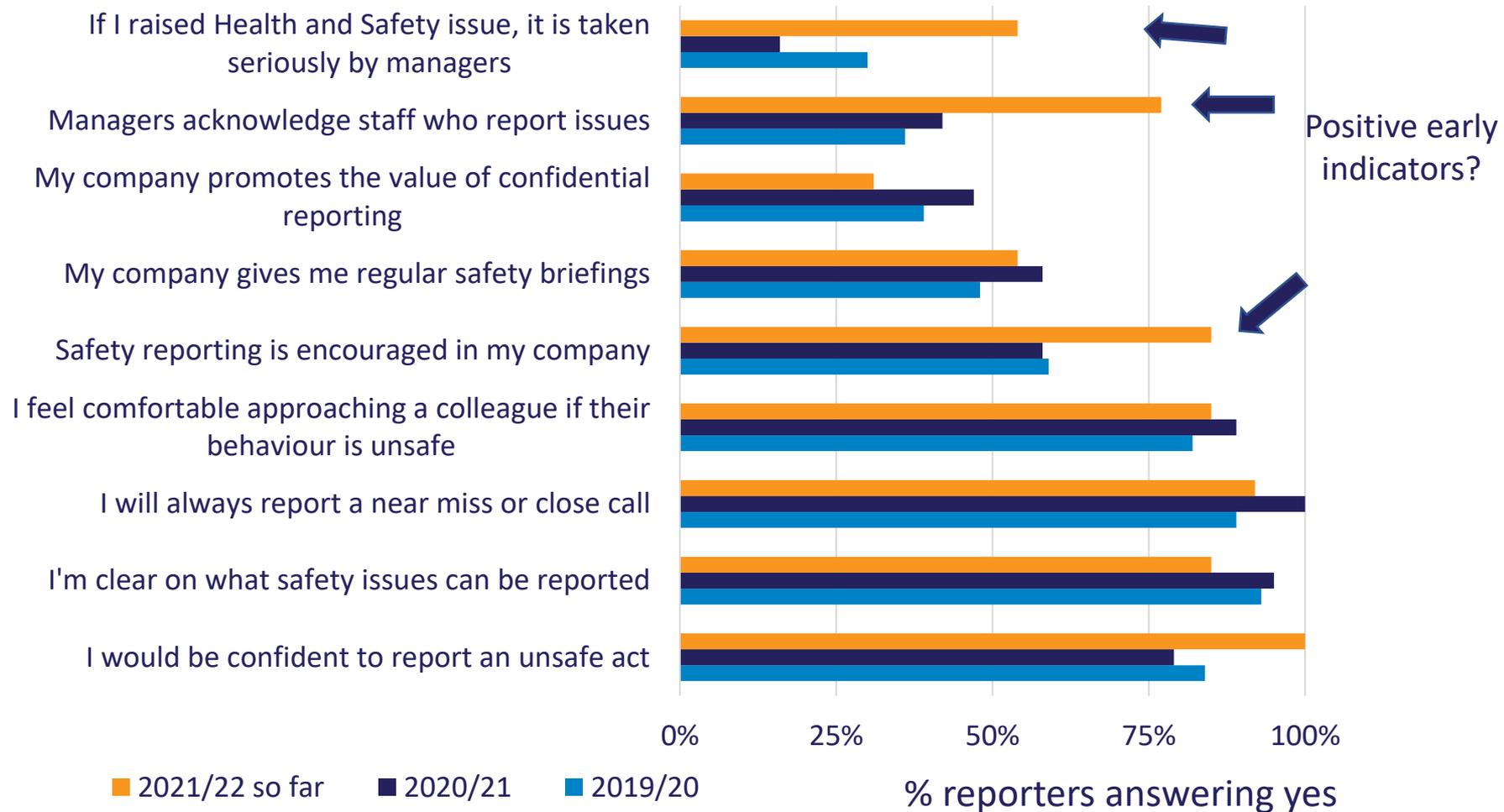
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Increased mention of
cost saving and
change management

*Reporter's view of root cause – TfL's investigation may conclude differently

CIRAS reporters – changing views of TfL safety culture

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Feedback from reporters

Thanks for taking the time to put my thoughts into a coherent report

It has now been rectified.
Thank you so much

You listened

I'm grateful for being reassured that my contact was confidential. This would encourage me to use the system again if needed

Action was taken

I got a result through CIRAS but didn't really get a result when raising internally.

CIRAS: partnering with TfL to encourage reporting on health, wellbeing and safety



Confidential
Reporting
for Safety

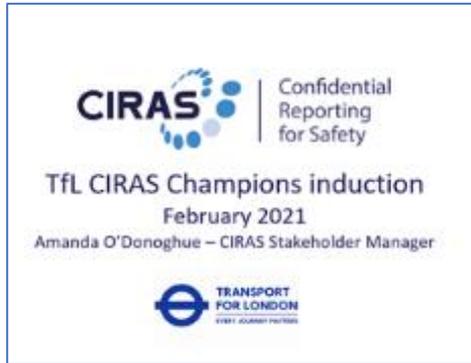
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Meeting the challenge – growing staff awareness

CIRAS champions network – raising awareness in all parts of TfL



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Integration into staff inductions

- Welcome to TfL e-zone materials include CIRAS introduction
- CIRAS features in TOL driver inductions

Promotion through frontline focused media



NEW CIRAS briefings to London River Services Pier Controllers

Learning from reports and the CIRAS community

New Dashboard for TfL Management



Upgraded CIRAS website: member access to reports, shared learning and resources

Page 37



Events: sharing good practice on reporting culture, and topics arising in reports.

Building a speak up culture
21 July 2021
Creating a culture that encourages people to speak up about health and safety concerns.
[View event](#)

Tackling workplace abuse
28 April 2021
Ideas and initiatives for how to protect and support workers and tackle workplace abuse.
[View event](#)

Future TfL & CIRAS collaboration

- SHE culture workstream



Confidential Reporting for Safety

Report hotline 0800 4 101 101

Text 07507 285 887

Freepost CIRAS www.ciras.org.uk

Contact us

Reporting

Report hotline 0800 4 101 101

Text 07507 285 887

Freepost CIRAS

General enquiries

0203 142 5369

enquiries@ciras.org.uk

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www.ciras.org.uk

Date: 2 December 2021

Item: Safety, Health and Environment Report (Quarter 2 – 2021/22)

This paper will be considered in public

1 Summary

- 1.1. This paper summarises key information reported in the second Quarterly (Q2) SHE report for the 2021/22 financial year.
- 1.2. The Q2 period covers the dates 27 June 2021 to 18 September 2021 and most data presented covers this range, except for some road safety and work-related violence data. It is clearly highlighted when this is the case.
- 1.3. A number of notable SHE incidents which occur outside the reporting period are also noted. This paper summarises the key information and trends that are contained in the Quarterly (Q2) report.

2 Recommendation

- 2.1. The Panel is asked to note this summary in considering and discussing the Q2 report.

3 Key information presented in the Q2 report

Scorecard

| Quarter 2 2021/22 Scorecard | | | |
|--|--|-----------|-----------|
| Measure | Unit | Q2 Target | Q2 Actual |
| People killed or seriously injured in road traffic collisions per million journey stages | Killed or seriously injured per million journey stages | 0.45 | 0.31 |
| People killed or seriously injured in road traffic collisions in or by a London Bus (per million surface journey stages) | Killed or seriously injured per million journey stages | 0.020 | 0.015 |
| Customer all injuries per million passenger journeys | All injuries per million journeys | 2.52 | 2.91 |

| | | | |
|------------------------|------------------------------|-----|-----|
| Workforce all injuries | Number of workforce injuries | 427 | 296 |
|------------------------|------------------------------|-----|-----|

- 3.1. The report shows that our road, bus and public transport workforce safety scorecard measures for Q2 2021/22 have been met.
- 3.2. Our public transport customer safety scorecard measure was not met. Slips, trips and falls remain the main cause of customer injury. Slip, trip and fall incidents on stairs and escalators remain high, and there was a slight increase in intoxication related incidents.

4 Safety

Public Transport

- 4.1. During the Quarter, we continued to see more customers returning to our public transport network.
- 4.2. Across our public transport network, very sadly three customers were killed. One customer fell from the top of a bus stairwell as it pulled away, one customer fell onto the track at Golders Green London Underground station and one person was killed while walking into Victoria bus station.
- 4.3. Serious injuries have increased this quarter to a total greater than any quarter since the beginning of 2020/21 when the pandemic began. However, we have also seen a continued increase in passenger journeys this Quarter as we recover from the pandemic.
- 4.4. The number of customers injured per million passenger journeys was 2.91, which is above our target at 2.52 per million journeys. At the end of Q2 2021/22, the average number of customer injuries per period remains 21 per cent below the average number of customer injuries per period in the Quarter preceding the pandemic, Q4 2019/20.
- 4.5. Following Quarter 2, one notable incident occurred on 12 October 2021 at Enfield Town station when a London Overground train hit the buffer stops at slow speed, causing damage to the infrastructure and the first carriage of the train to partially derail. The driver and one passenger were treated for minor injuries, neither of which required hospital treatment. This incident is under investigation by the Rail Accident Investigation Branch (RAIB). TfL and Arriva Rail London are cooperating with RAIB.

Streets

- 4.6. In Quarter 2 2021/22, there were 20 people killed and early estimates indicate 784 people were seriously injured on London's streets. More people using powered two wheelers were seriously injured, compared to other transport modes, followed by people cycling and then people walking. In the year to date we have seen a significant reduction in the number of fatalities on London's streets compared to previous years (57 as of 9 November, compared to 86 at the equivalent point in 2020 and 113 in 2019). Beneath these aggregate numbers there are some important underlying factors (all numbers relate to the equivalent point in the calendar years):

- a) Motorcyclist fatalities have fallen from 28 in 2019 to 7 in 2021, potentially reflecting a reduction in long-distance commuting involving larger motorbikes driven on the more strategic roads.
 - b) Pedestrian fatalities have fallen from 62 in 2019 to 25 in 2021, potentially as a result of reduced footfall from inbound commuters and tourists.
 - c) Cyclist fatalities have doubled from 5 in 2019 to 10 in 2021, reflecting significant increases in cycle use.
- 4.7. Before the pandemic, people walking were consistently the most significantly injured group, followed by powered two-wheeler drivers and then people cycling. However, the risk of being killed or seriously injured per journey is falling for people cycling. This reflects a significant increase in the number of people cycling, and a change in where, when and why people are cycling in and across London.

Workforce

- 4.8. There were seven accidents reported under the Reporting of Injuries, Diseases and Dangerous Occurrences Regulations (RIDDOR) in our capital delivery projects. Work is being undertaken to prevent reoccurrence, including a review of variables influencing workplace performance – such as culture, chain of command and comms – as well as running site stand downs that focus on safety behaviours and the importance of comprehensive risk assessment.
- 4.9. Our Capital Delivery teams have worked hard to continue delivery of our projects, most notably the opening of the Northern Line Extension to Battersea and Nine Elms from Kennington on 20 September 2021.
- 4.10. The level of bus-related violence with injury offences was higher in Quarter 2 of 2021/22 compared with the same period in 2020/21 (77 offences compared with 60). 32 per cent of physical assaults, including spitting, against bus drivers (and reported to the police) are linked to road rage. This Quarter, we have distributed a targeted, customer facing ‘Abuse Stops Now’ poster as part of our Hands Up campaign to identify work-related violence hotspots, as well as posters raising awareness of successful prosecutions.

Health

- 4.11. It is with regret that we report that up to 22 November 2021, 103 people who worked on the TfL transport network have tragically lost their lives to COVID-19 since the start of the pandemic.
- 4.12. COVID-19 remained the top cause of short-term absence in the Quarter and remained the third most common cause of long-term absence. Absences related to mental health and musculoskeletal issues were the most significant causes of long-term absences and remain the focus of our preventative measures.

Environment

- 4.13. Our electricity consumption in Quarter 2 reflected the near normal operation of our services. Compared to the same Quarter last year, consumption was 17 per

cent higher due to reduced service levels last year as a result of the pandemic. When comparing with Quarter 2 in 2019/20, a more “normal” year for comparison, our electricity consumption is not quite back down to pre-pandemic levels. In Quarter 2 2021/22 our total electricity consumption was 362.32 gigawatt hours compared to 355.24 gigawatt hours in Quarter 2 2019/20.

- 4.14. Carbon dioxide emissions from operations, excluding buses, track closely to electricity consumption. Despite a 17 per cent increase in electricity consumption compared to Quarter 2 last year, carbon emissions were only 7 per cent higher, partly offset by grid decarbonisation. In comparison with the more “normal” year of 2019/20 when TfL CO₂ emissions were at 93,823 tonnes in the quarter, we are making progress as our CO₂ emissions totalled 79,457 tonnes in Q2 2021/22.
- 4.15. In July, London experienced severe rainfall which resulted in significant damage to our assets and severe disruption of our services. In response a series of Mayoral London-wide summit meetings were held and a Task and Finish group has been established to identify priority actions to increase London’s climate change resilience. The first meeting of the Task and Finish Group took place on 5 October 2021. As well as TfL representatives, the group includes the Mayor, Deputy Mayors for Transport and the Environment and Energy, London Fire Brigade, the Environment Agency, Thames Water, London Councils, and various London boroughs.
- 4.16. In Quarter 2, the Corporate Environment Plan and the TfL Sustainability report were published.

List of appendices to this report

Appendix 1: SSHP Safety, Health and Environment Report

List of Background papers

None

Contact Officer: Lilli Matson
Email: LilliMatson@tfl.gov.uk

Safety, Health and Environment Quarterly report

Quarter 2 2021/22

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Introduction and Executive Summary

This report summarises our performance in the last Quarter and identifies strategic trends covering the period from 27 June 2021 to 18 September 2021, unless specified.

It sets out ways in which we have continued to keep our customers and workforce safe during the coronavirus pandemic. This Quarter, our priority was to reassure them that we continue to operate safe services as London emerges from the pandemic. In parallel, we have continued to make progress towards our longer-term safety, health and environmental objectives.

During Quarter 2, we saw steadily increasing customer numbers, which sharply rose with the beginning of the autumn school term. However, our customer numbers have not yet reached pre-pandemic levels, which means that many of our key safety, staff and environmental performance indicators remain at different levels than they might normally be.

We have continued to implement measures to improve our short- and long-term safety, health and environmental performance. We have continued to perform well on most of our safety metrics. However, in Quarter 2 we did not meet our customer injury rate target, with a continuing incidence of slips, trips and falls driving the overall outcome.

Although we are moving forward, coronavirus remained the top cause of short-term absence in Quarter 2. Looking ahead, we have been supporting our head office workforce to return to the office with a presentation on 'Coping with Change', in an effort to address and assuage any anxiety they may be feeling about the transition to hybrid working.

The time to tackle the climate emergency is now. This Quarter, we published the Corporate Environment Plan (CEP) and the TfL Sustainability Report. The CEP details the environmental pillar of our sustainability approach and sets out how we plan to improve our environmental performance. The TfL Sustainability Report aims to capture the social, economic and environmental benefit that we deliver as an organisation.

About this report

This report explores and highlights the performance, trends and measures we are implementing to improve safety, health and the environment performance.

Throughout this report, our 'customers' refers to direct users of our services, and our 'workforce' includes our directly employed staff as well as people working in our supply chain. For both groups, we use data collected directly from our operational businesses. Some assault data comes from both our own internal reporting systems and the police.

When referring to people killed or seriously injured, the following causes of injury are excluded: an injury which results from an incident arising from a pre-existing medical condition; intentional self-harm resulting in a physical injury or death; criminal activities perpetrated by customers or members of the public on other customers or members of the public.

Unless otherwise stated, 'streets' refers to all of London's roads, including those managed by London's boroughs. Where we report safety data for streets, we use data collected by the Metropolitan Police Service and the City of London Police, in line with Government requirements. All road safety data is provisional and subject to review and assurance, with the final data published annually in line with Department for Transport requirements.

Reporting period

Most data covers the Quarter from 27 June 2021 – 18 September 2021, except for some work-related violence and aggression data which is reported 6 months in arrears. Some data is provisional and is subject to change.

Mayor's Transport Strategy and Scorecard

Our role is to enable London to move safely and sustainably, in line with the goals of the Mayor's Transport Strategy (MTS). This includes increasing the attractiveness of public transport and making cycling and walking easier and more convenient. We work with many partners, including London's boroughs, businesses, the police, local communities and consumer organisations to achieve the MTS objectives.

Scorecard

Our Quarter 2 scorecard targets are listed in the table below.

| Quarter 2 2021/22 Scorecard | | | |
|--|--|-----------|-----------|
| Measure | Unit | Q2 Target | Q2 Actual |
| People killed or seriously injured in road traffic collisions per million journey stages | Killed or seriously injured per million journey stages | 0.45 | 0.31 |
| People killed or seriously injured in road traffic collisions in or by a London Bus (per million surface journey stages) | Killed or seriously injured per million journey stages | 0.020 | 0.015 |
| Customer all injuries per million passenger journeys | All injuries per million journeys | 2.52 | 2.91 |
| Workforce all injuries | Number of workforce injuries | 427 | 296 |

The table sets out the relevant scorecard metrics, and accompanying targets and actual performance. Below are brief explanations of the performance of each measure. More detailed explanations, with accompanying graphs are set out in the relevant sections of this report.

Road safety measure

Working towards our Vision Zero ambition to eliminate death and serious injury on the roads, our aim in 2021/22 is to reduce the number to fewer than 0.45 people killed or seriously injured on the roads per million journeys. Our Quarter 2 result was 0.31 people killed or seriously injured on the roads per million journeys.

Bus safety measure

Our ambition is that no one is killed or seriously injured on, or by a bus. In Quarter 2, our aim was to have no greater than 0.020 deaths or serious injuries per million surface journey stages. In Quarter 2 there were 0.015 deaths or serious injuries per million surface journey stages. This is a positive result as we progress on our journey towards zero.

Public transport customer safety measure

Working towards our ambition to eliminate deaths and injuries on our public transport network, our aim in 2021/22 is to have fewer than 2.52 injuries to our customers per million journeys. In Quarter 2, the result was 2.91, unfortunately missing this target. Whilst customers continued to return to our network during Quarter 2, demonstrating confidence in public transport, pandemic-related behaviours remain such as concerns around holding on to handrails whilst travelling through our stations or on our services. Slips, trips and falls continue to be our most common cause of customer injury, both on stairs and escalators, and as a result of vehicles braking or manouvering.

Workforce safety measure

Our objective for our workforce is 'Everyone home safe and healthy every day'. There were 296 injuries to our workforce in Quarter 2, meeting our aim of fewer than 427 workforce injuries. This is a positive result, but a reminder we must strive for continuous improvement towards Zero Harm when it comes to the safety of our workforce.

Safety

This section summarises our safety performance across road safety, public transport, capital delivery activities and work-related violence. It provides an overview of key trends for the year and the areas we are targeting for improvement.

Road safety performance

Quarter 2 in 2021/22 involved very different circumstances to Quarter 2 2020/21. This year we have seen near normal levels of activity which meant more people were out on the network, whereas Quarter 2 last year was dominated by the initial easing of the first lockdown.

In 2020 we experienced significantly suppressed levels of traffic at key periods, but we have reached a point in 2021 where traffic is near normal, stabilising and becoming more predictable. It is helpful to keep this in mind when comparing Quarter 2 2021/22 results with 2020/21, and to look at Quarter 2 2019/20 as a more “normal” year for comparison.

Quarterly performance

| Number of people killed | Q2 2019/20 | Q2 2020/21 | Q2 2021/22* |
|-------------------------|------------|------------|-------------|
| Pedestrian | 17 | 12 | 8 |
| Pedal cycle | 2 | 1 | 2 |
| Powered two wheeler | 10 | 11 | 2 |
| Car | 4 | 1 | 5 |
| Bus or coach | 0 | 1 | 1 |
| Taxi | 0 | 0 | 0 |
| Private hire | 0 | 0 | 0 |
| Goods vehicle | 0 | 0 | 0 |
| Other vehicle | 1 | 0 | 2 |
| Total | 34 | 26 | 20 |

**Quarter 2 2021/22 figures are provisional and subject to change.*

The number of people killed in Quarter 2 2021/22 (20) decreased compared to the same period in 2020/21 (26), with the number of people seriously injured remaining similar. The majority of this reduction comes from nine fewer powered two wheeler rider deaths and a continued reduction in pedestrian deaths, conversely there were sadly more deaths in cars and 'other' vehicles.

| Number of people seriously injured | Q2 2019/20 | Q2 2020/21 | Q2 2021/22* |
|------------------------------------|------------|------------|-------------|
| Pedestrian | 263 | 162 | 182 |
| Pedal cycle | 216 | 306 | 209 |
| Powered two wheeler | 273 | 199 | 217 |
| Car | 140 | 97 | 117 |
| Bus or coach | 25 | 6 | 21 |
| Taxi | 3 | 1 | 2 |
| Private hire | 3 | 0 | 1 |
| Goods vehicle | 8 | 2 | 2 |
| Other vehicle | 9 | 22 | 33 |
| Total | 940 | 795 | 784 |

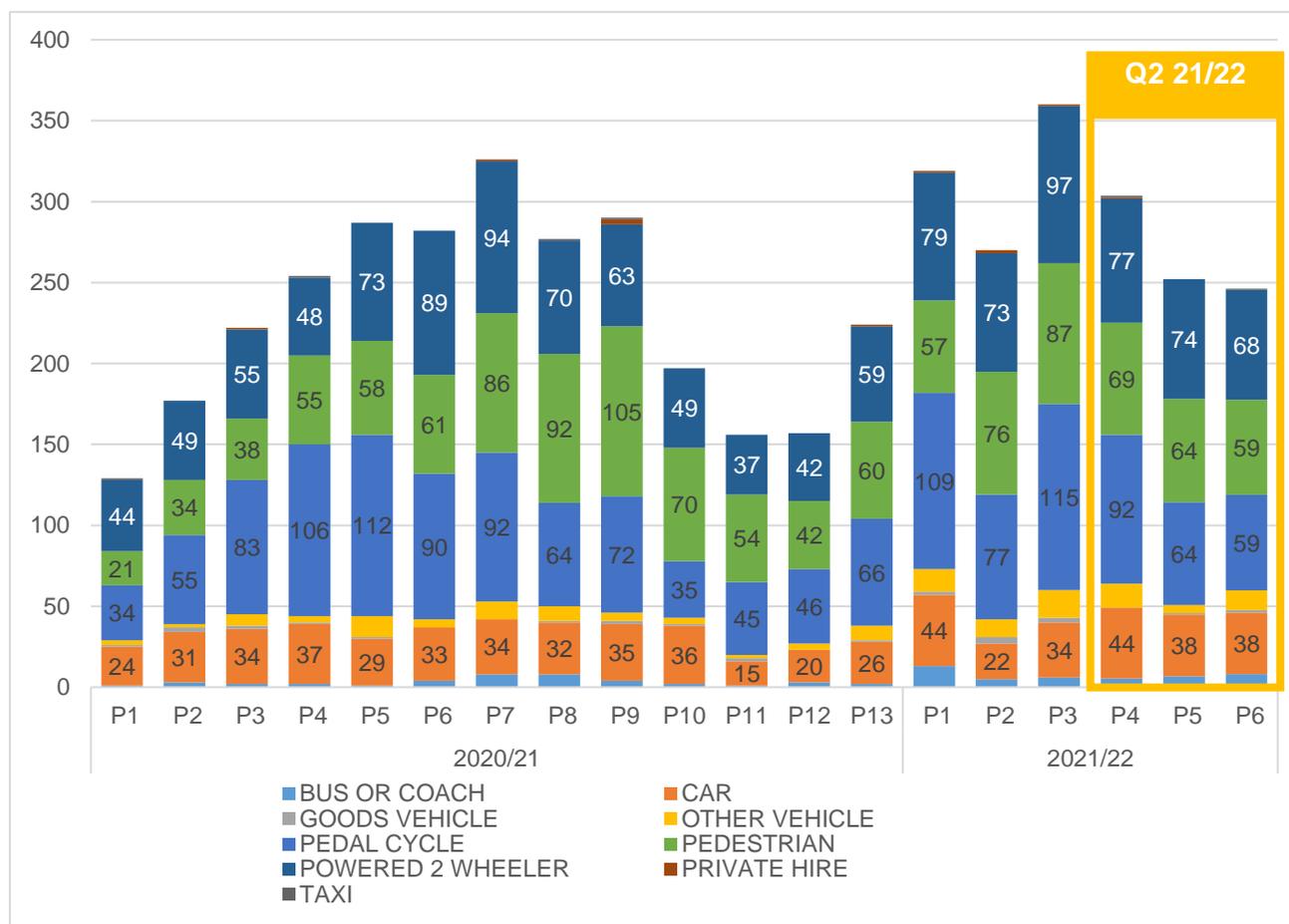
**Quarter 2 2021/22 figures are provisional and subject to change.*

The normal resumption of motorised journeys has changed the composition of serious injuries compared to Quarter 2 of last year. The number of people seriously injured increased across all modes except taxis, pedal cycles, and goods vehicles. This was largely driven by serious injuries occurring to people using powered two wheelers (+nine per cent), cars (+20 per cent), and bus or coach (an increase of 15 serious injuries). The increasing illegal use of private e-scooters on public highways (within 'Other vehicles') led to a 50 per cent increase in serious injuries. Taken as a whole, this was offset by a significant reduction in serious injuries to people cycling (from 306 injuries to 209 in Quarter 2 2021/22) meaning that overall there was a marginal improvement in Quarter 2 of this year compared to 2020/21.

There were some notable incidents which occurred in the period covered by this report. On 14 July 2021 when a bus pulled away from the bus stop, a man fell down the stairs. He very sadly died in hospital a few weeks later. On 4 August 2021 at the junction of Southampton Row and Theobalds Road in Holborn, a woman cycling was tragically killed in a collision with a heavy goods vehicle. On 10 August 2021 at Victoria bus station, there was a bus collision which resulted in the tragic death of a woman walking. We are currently working with the relevant authorities to investigate each incident and have supported the London Borough of Camden to introduce temporary safety improvements at Southampton Row/Theobalds Road in advance of a more comprehensive area-wide scheme, as described in more detail below.

It is useful to compare this to Quarter 2 2019/20 data, as that was more reflective of a “normal” year than 2020/21. Fewer people have been killed in Quarter 2 2021/22 than Quarter 2 2019/20 (a 41 per cent reduction), and fewer have been seriously injured (a 17 per cent reduction), with the most notable decreases in people killed or seriously injured cycling or riding a powered two wheeler. E-scooter usage has risen over the last year, which has led to more user injuries.

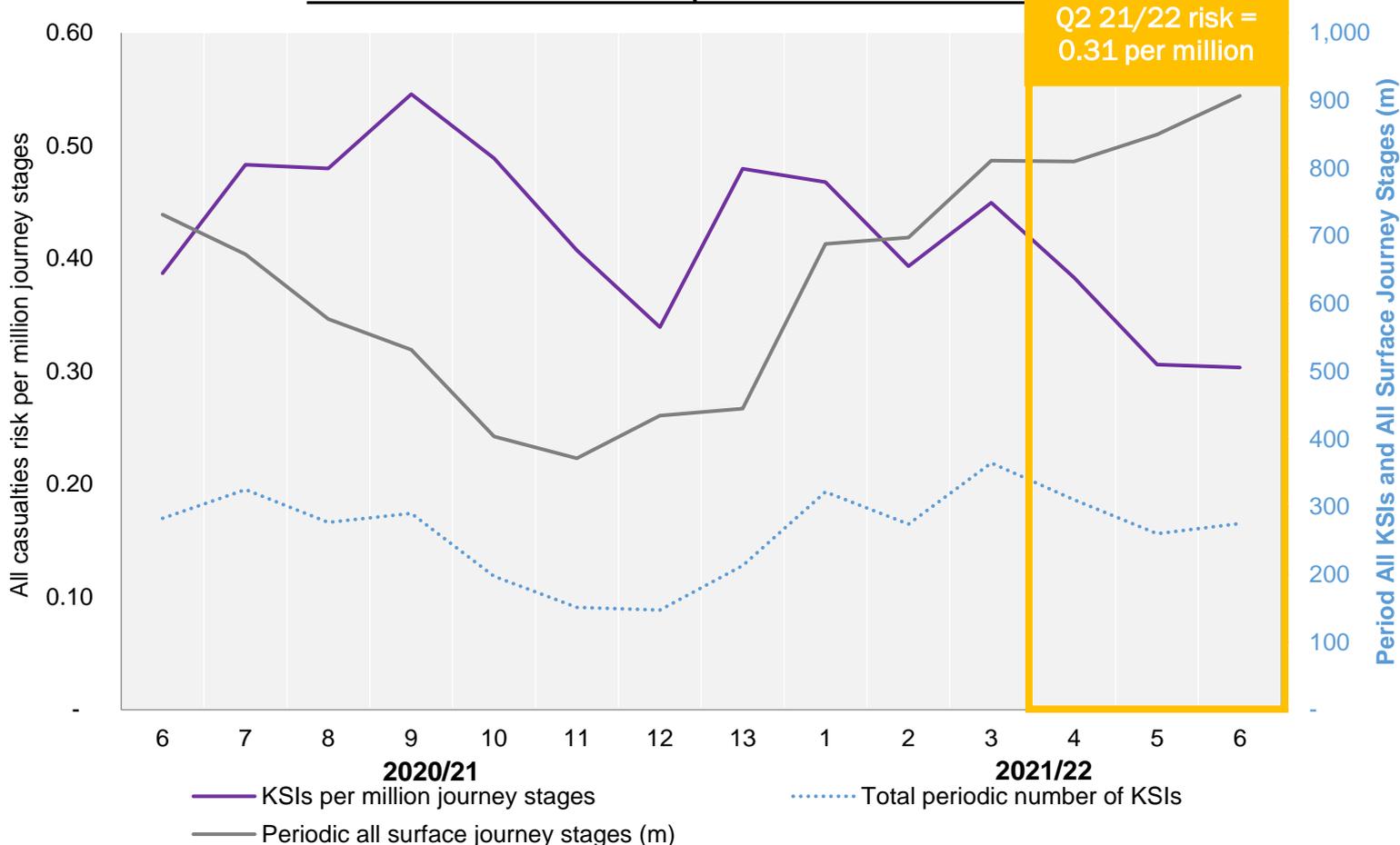
People killed or seriously injured on London’s roads in 2020/21 and 2021/22 (by mode travelled)



In Quarter 2 2021/22, 211 people were killed or seriously injured while cycling. This was a 31 per cent reduction when compared with Quarter 2 2020/21 and a 30 per cent reduction when compared to the previous Quarter. Before the pandemic, people walking were consistently the largest group of seriously injured people, followed by powered two wheeler drivers and then people cycling.

Scorecard measure: People killed or seriously injured in road traffic collisions 2021/22 (per million journeys)

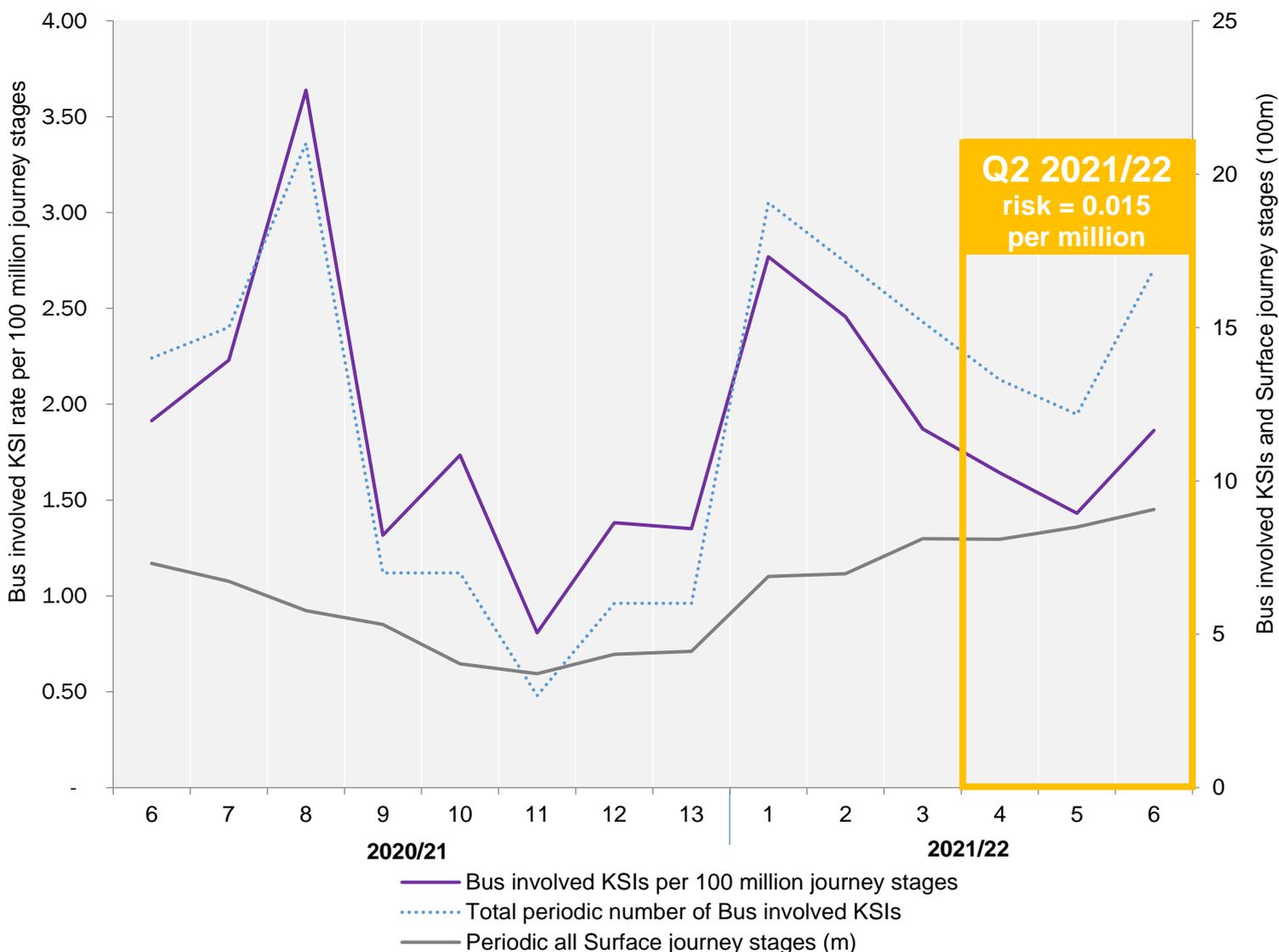
All KSI Rate and Absolutes (P6 2020/21 to P6 2021/22)



Working towards our Vision Zero ambition to eliminate death and serious injury on the roads, our aim in 2021/22 is to reduce the rate to fewer than 0.45 people killed or seriously injured on the roads per million journeys. Our Quarter 2 result of 0.31 exceeds this target.

Scorecard measure: Rates of fatal or serious injury experienced by people in collision with buses

Bus involved KSI rate and absolutes (Period 6 2020/21 to Period 6 2021/22)



The risk of a bus being involved in a collision that kills or seriously injures either a bus passenger or someone else on the roads remains extremely low.

Our bus safety target is more stretching than the general road safety target, to reflect our ability to more directly influence bus services. Our Quarter 2 result of 0.015 deaths or serious injuries per million journeys exceeded our scorecard target (0.020).

Road safety updates

Police Activity to support Vision Zero

During this Quarter, from 26 July to 8 August 2021, the TfL-funded Roads and Transport Policing Command and local Metropolitan Police Service (MPS) Safer Neighbourhood Teams (SNT) intensified action to tackle speeding as London's contribution to the National Police Chiefs' Council 2021 campaign. The #StandUpForSlowingDown slogan was publicised on Twitter and other media outlets. A total of 2,732 Traffic Offence Reports and 14,512 Notices of Intention to Prosecute were issued during this period. 47 drivers were caught speeding at more than 100mph. Other action includes 103 drivers caught driving whilst using a mobile phone, 185 seatbelt offences and 86 drink- or drug-driving offences.

Exchanging Places, a programme to educate cyclists about the dangers associated with blind spots on HGVs using virtual reality headsets, was relaunched in Regent's Park on 21 August 2021, following a pause because of pandemic restrictions. The programme now makes full use of virtual reality headsets.

Operation Close Pass aims to address poor driving behaviour near cyclists. Operations took place in the London Boroughs (LB) of Barking, Barnet, Bromley, Camden, Enfield, Haringey, Redbridge, Richmond, Twickenham and Waltham Forest and led to 26 drivers receiving education about the need to give people cycling more space when passing. A further 33 traffic offences were reported, including three uninsured vehicles which were seized as a result.

Vision Zero and the Motorcycle Delivery Economy

We have continued to engage with companies in the gig economy on the need to improve safety standards and lower the risk of motorcycle riders being involved in fatal and serious injury collisions on London's streets. This work with the delivery, courier and servicing industry, particularly those within the gig economy companies, is designed to aid collaboration and harness their innovation and insight to improve safety standards for their riders.

Lowering Speed Limits Programme

Lowering the speed of vehicles in London is key to reducing both the likelihood of a collision occurring and the severity of the outcome. The Lowering Speed Limits programme plays a vital contribution to the Mayor's Vision Zero ambition to eradicate fatal and serious injury collisions from London's roads by 2041.

The second phase of the programme is underway, reducing the speed by 10mph on more than 140km of our roads. To date we have introduced a 20mph speed limit on 80km of TfL roads.

The following roads will see a reduction in speed limits to 20mph by December 2021:

- A13 Commercial Road between A11 Whitechapel Road and Butcher Row in the London Borough (LB) of Tower Hamlets;
- A10 between The Avenue and LB Hackney borough boundary and A503 Monument Way in Haringey;
- A107 corridor between the A10 and Cassland Road in LB Hackney;
- A23 London Road between Lambeth borough boundary and Thornton Heath Ponds in LB Croydon;
- A3212 Chelsea Embankment between Lots Road and Westminster Borough Boundary and A3220 Battersea Bridge.

We are also reducing the speed limit to 30mph on the A10 Great Cambridge Road between White Hart Lane and Great Cambridge Roundabout in LB Haringey and LB Enfield.

Subject to funding, by April 2022, we plan to reduce the speed limit on a further 15.5km of the TfL Road Network (TLRN), including across the remaining TLRN in Westminster, A205 Upper Richmond Road in LB Wandsworth, A4180 Ruislip Road in LB Ealing, and Gants Hill, Putney and West Wickham town centres.

This Quarter, on 6 September 2021, we briefed the emergency services (London Ambulance Service, London Fire Brigade and MPS) on the upcoming phase two Lowering Speed Limits programme. On 7 September 2021, we also hosted a 'Safe Streets for Everyone' webinar where we provided details of the programme to over 35 strategic stakeholders, community groups and boroughs. These were important opportunities to develop advocacy for our ambitious and accelerated programme and to enable smoother delivery of the programme as it progresses. We have launched a new Have Your Say webpage for local stakeholders to engage with the whole programme over the three year delivery period, helping us to develop the programme further. Our programme will be supported by two waves of marketing, including advertising and radio promotion, to coincide with the December 2021 and March 2022 launch dates.

New Technology for Safer and Smarter Roads

We'll shortly be starting to use innovative new technology from two UK start-ups to reduce road danger and disruption caused by roadworks and unplanned incidents on our road network.

To identify the successful innovators, we ran a two-stage Innovation Partnerships Procedure, making it the first time this procurement process had been adopted within our organisation. Working with RoadLab mentors, nine innovators were chosen and their proposed technology trialled and developed with the support of London's major utility companies and London Councils.

Following this highly competitive trial period, contracts were awarded to two successful companies, Immense and samdesk. Immense uses simulation technology that models roadworks to understand their impact on the road network before they take place. This information can be used to let people in London know about predicted impacts to their journey. Software from samdesk, available for use now, uses artificial intelligence and real-time anonymised social media data to detect emerging disruptions, giving our workforce a faster and more comprehensive insight into incidents unfolding across our transport network. RoadLab is funded by our Lane Rental scheme, which charges companies for carrying out roadworks at times and locations that cause the most disruption. This money is subsequently invested in tackling congestion and minimising the impact of roadworks and has saved £100m in lost travel time so far.

Holborn Gyrotory: Safety Improvements (Southampton Row/Theobalds Road Junction)

We are continuing to work with the London Borough (LB) of Camden in relation to interim steps that can be taken to improve safety at the junction of Southampton Row and Theobalds Road, as well as delivering a longer-term solution. In August 2021, a three-stage delivery approach to tackling safety for people cycling through this junction was proposed by LB Camden.

In the short-term, interim junction safety measures were delivered in early October 2021. These included:

- Changing the southbound Southampton Row approach to the junction from three lanes to two, to reduce the risk to cyclists of vehicles turning left from the current centre ahead-only lane;
- The central ahead-only traffic lane was replaced with a temporary island to separate vehicles turning left and vehicles going straight on;
- Amending the nearside left-turn lane so that people cycling and buses can travel straight ahead through the junction, while general traffic is only allowed to turn left;
- Adding cycle boxes (advanced stop lines) for people cycling at the traffic lights on Southampton Row to provide a safe space to wait in, at the front of queuing traffic.

In the medium-term, more permanent changes will be introduced, including potential kerb line and traffic signal infrastructure changes to help improve safety. Options are currently being worked on and a preferred option will be selected shortly. It is proposed that delivery of this phase will begin early in January 2022, subject to the necessary Government funding being available to TfL.

Our long-term aspiration is to resume large scale junction and area wide improvements, including an area-wide scheme in this part of Camden, led by LB Camden as part of its Liveable Neighbourhood Programme proposals (subject to our future funding agreements with the Government).

Electric Scooters

The London e-scooter trial began with 600 vehicles available over five boroughs. From 7 June to 26 September 2021, the trial grew to nine boroughs and 2,835 vehicles. Over this time period there was approximately 255,000 hire trips taken averaging a distance of 2.8km per trip. Operators have reported that there have been no fatalities and six serious injuries based on the STATS19 injury classification definitions used for road risk injuries.

Use of e-scooters outside the trial (privately owned e-scooters) is illegal on the public highway. We do not know the number of privately owned e-scooters being used on London's roads, but based on police data we have begun to build a picture of some emerging themes that may provide implications about the safety of the use of e-scooters on our network.

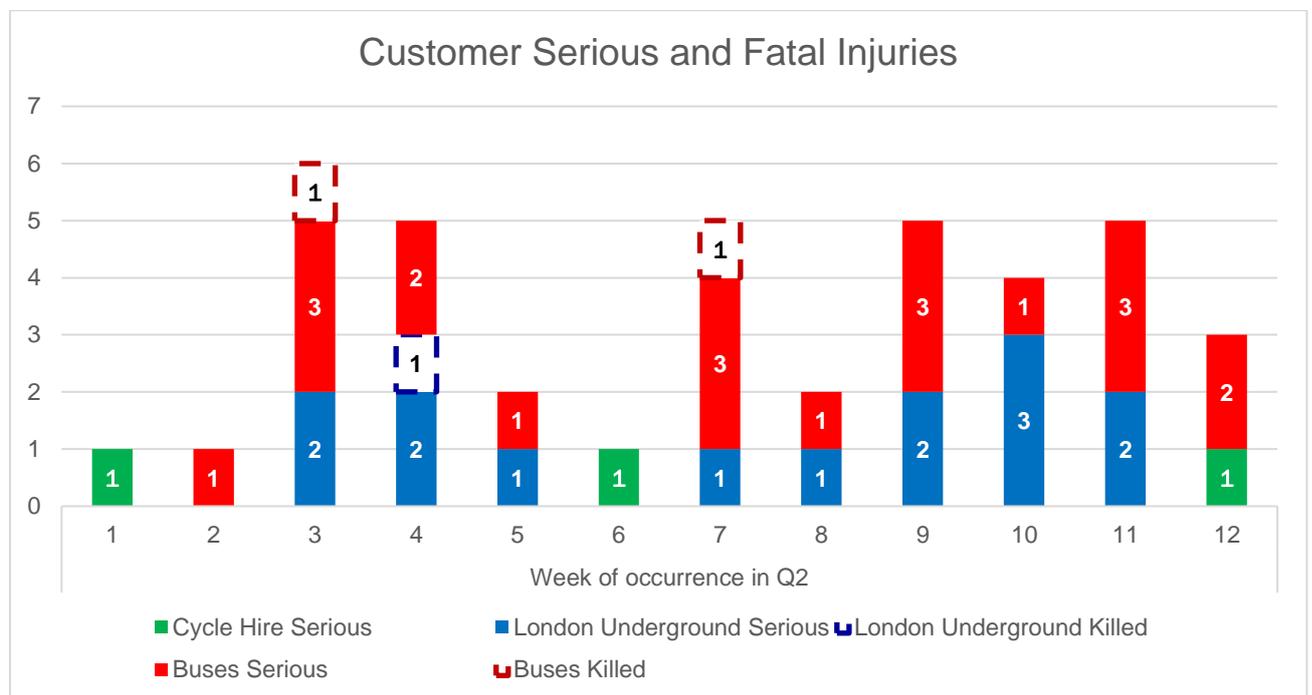
Collision data to the end of 2020 is finalised, figures from January to May 2021 are validated provisional data, and data from June 2021 onwards is raw police data.

So far, we have found that for the casualties attributed to privately owned e-scooters in London 0.8 per cent were fatal, 25.4 per cent were serious injuries and 73.8 per cent were slight injuries. For casualties attributed to cycling in London, 0.2 per cent were fatal, 16.7 per cent were serious injuries and 83.1 per cent were slight injuries. This implies that where collisions take place, riders of privately owned e-scooters in London are more likely to be killed or seriously injured than people cycling. We also estimate that in the period from 1 January 2021 to 18 August 2021, e-scooters made up 3.36 per cent of people killed or seriously injured in London, compared with 1.76 per cent of serious injuries for the period from 1 January 2020 to 31 December 2020.

Public transport safety performance

Quarterly performance

Customers killed or seriously injured per week in Quarter 2 (by mode)



Very sadly, three customers were killed on our public transport network during Quarter 2. These people were:

- A customer who fell from the top of the stairwell as a bus pulled away from the bus stop;
- A customer falling onto the track at Golders Green London Underground (LU) station which is being investigated by the coroner;
- A person walking into Victoria Bus Station who was hit in a collision involving a bus shunting a second bus forward.

There have been 37 customers seriously injured this quarter on public transport, bringing the number of people killed and seriously injured to 40. This is three more than Quarter 1, and the highest number of customers killed or seriously injured of any Quarter since the beginning of 2020/21, when the pandemic began. However, we have

also seen a continued increase in passenger journeys this Quarter as we recover from the pandemic.

All serious injuries and two of the three fatalities on public transport in Quarter 2 relate to a slip, trip or fall. These are, by nature, a large and diverse category of injury and they continue to be our biggest challenge in improving customer safety.

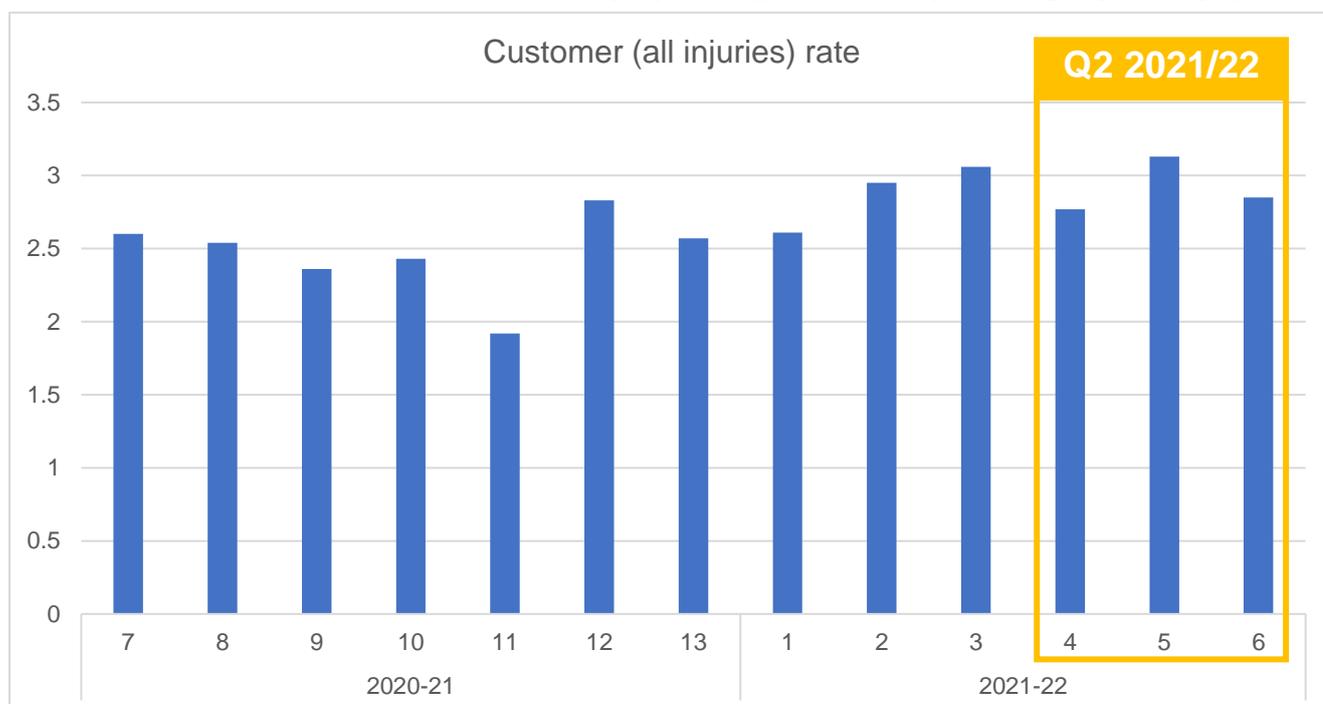
The causes of the serious injuries on LU included five falls on stairs, four falls on escalators, three trips or falls at the platform/train interface, one fall onto the track and one fall from a wall. Amongst falls on stairs, escalators and onto the track, intoxication was named as a contributory factor in five serious injuries, and carrying luggage and running contributed to one serious injury each.

The causes of serious injuries on Buses this Quarter mainly result from three key situations. These are bus drivers braking harshly to avoid collisions or from higher speeds (seven falls); trips or falls as customers are boarding or alighting (four falls whilst alighting); or falls when the bus pulls away and customers are not yet seated (three falls). Bus manoeuvres such as turning or pulling into bus stops also contributed to two falls, and there were two falls down stairwells on buses, one of which included intoxication as a contributory factor.

Customers killed or seriously injured per period this year (total)



Scorecard measure: Customer injury rate (per million passenger journeys)



Unfortunately, our customer injury rate has remained relatively high this Quarter, compared to pre-pandemic levels.

This has resulted in us missing our scorecard target, with 2.91 injuries per million passenger journeys, compared to a target of 2.52 injuries per million passenger journeys.

It is useful to compare this Quarter to Quarter 2 2019/20 data, as that was more reflective of a “normal” year than 2020/21. Whilst fewer customers have been injured in Quarter 2 2021/22 than Quarter 2 2019/20 (a 32 per cent reduction), the rate of customer injuries per million passenger journeys has increased by 12 per cent, in line with increased customer numbers.

Slips, trips and falls make up a large proportion of our public transport customer injuries, and we have seen increases in the rate of slips, trips and falls on Buses and LU since the pandemic began.

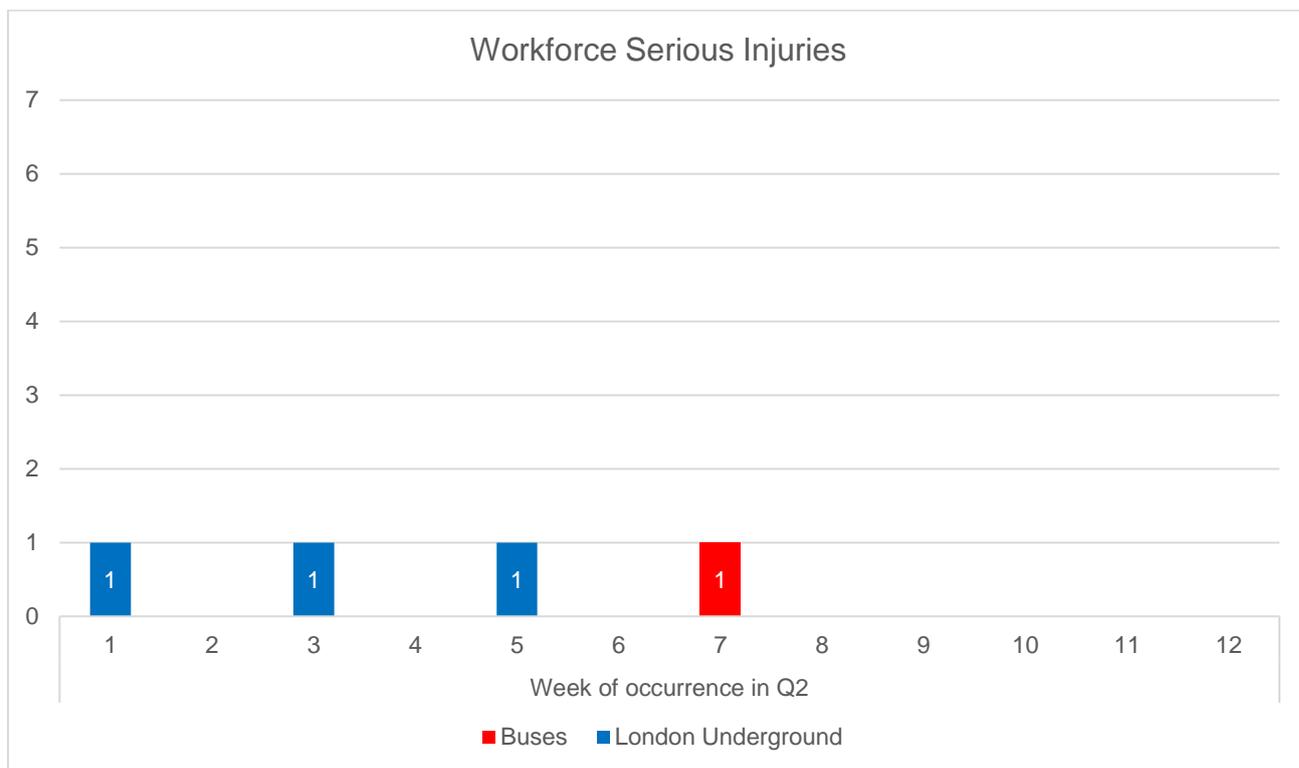
A simple yet effective way to control the number of slips, trips and falls is to influence our customers to hold on to handrails whilst travelling through our stations and on our transport modes. On buses, drivers use the pre-recorded announcement asking customers to hold on to handrails, and we have significantly publicised our deep

cleaning of buses (trains and stations), as well as encouraging customers to use hand sanitiser during their journey. Furthermore, the Customer Insight, Strategy & Experience team have established that despite Imperial College London finding no trace of coronavirus on surfaces on our network, customers are still hesitant to hold onto and keep hold of handrails because of the perceived risk of catching coronavirus from surfaces. Recent benchmarking work about slips, trips and falls on Buses suggests this is a challenge shared by other global transport operators too.

To combat this increased rate of incidents, we have:

- Ensured regularly touched surfaces are cleaned using effective anti-viral products, and have installed 200 ultraviolet (UV) light sanitising units to escalators in LU stations;
- Participated in a regular testing programme with Imperial College London to assure that surfaces and air samples are free of coronavirus;
- Continued to publicise the cleaning regime and test results so that passengers can be confident that our vehicles and stations are clean;
- Recorded new passenger announcements reinforcing the need to hold the handrail;
- Extended a trial of posters in the stairs area on double-deck Buses encouraging passengers to hold the handrail while ascending/descending.

Workforce injuries

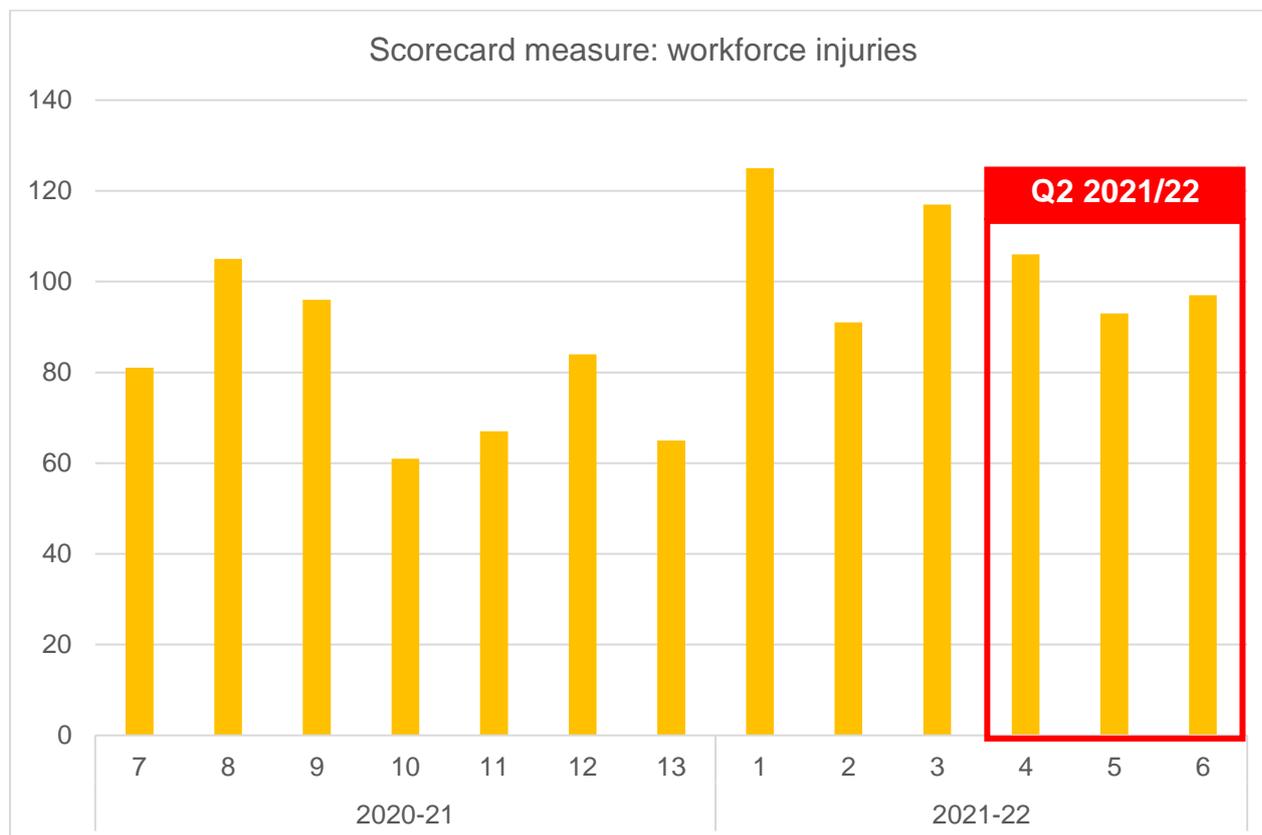


No one was killed whilst working on our public transport network in Quarter 2. Unfortunately, four members of our workforce were seriously injured, three in LU and one on Buses. This is three fewer serious injuries sustained by our public transport workforce in Quarter 2 of 2020/21.

Of these serious injuries, three involved trips. A LU Customer Service Supervisor tripped down stairs, a bus driver tripped as they alighted the bus to reposition the bus mirror, and a member of LU maintenance staff tripped over bollard fixings on the track.

The fourth serious injury to our workforce involved a LU Customer Service Assistant (CSA) being injured when a customer carrying a box accidentally collided with the CSA's hand, resulting in a fracture. All serious injuries are fully investigated to ensure lessons are learned and action taken to prevent a similar accident happening to anyone else.

Scorecard measure: Workforce injuries



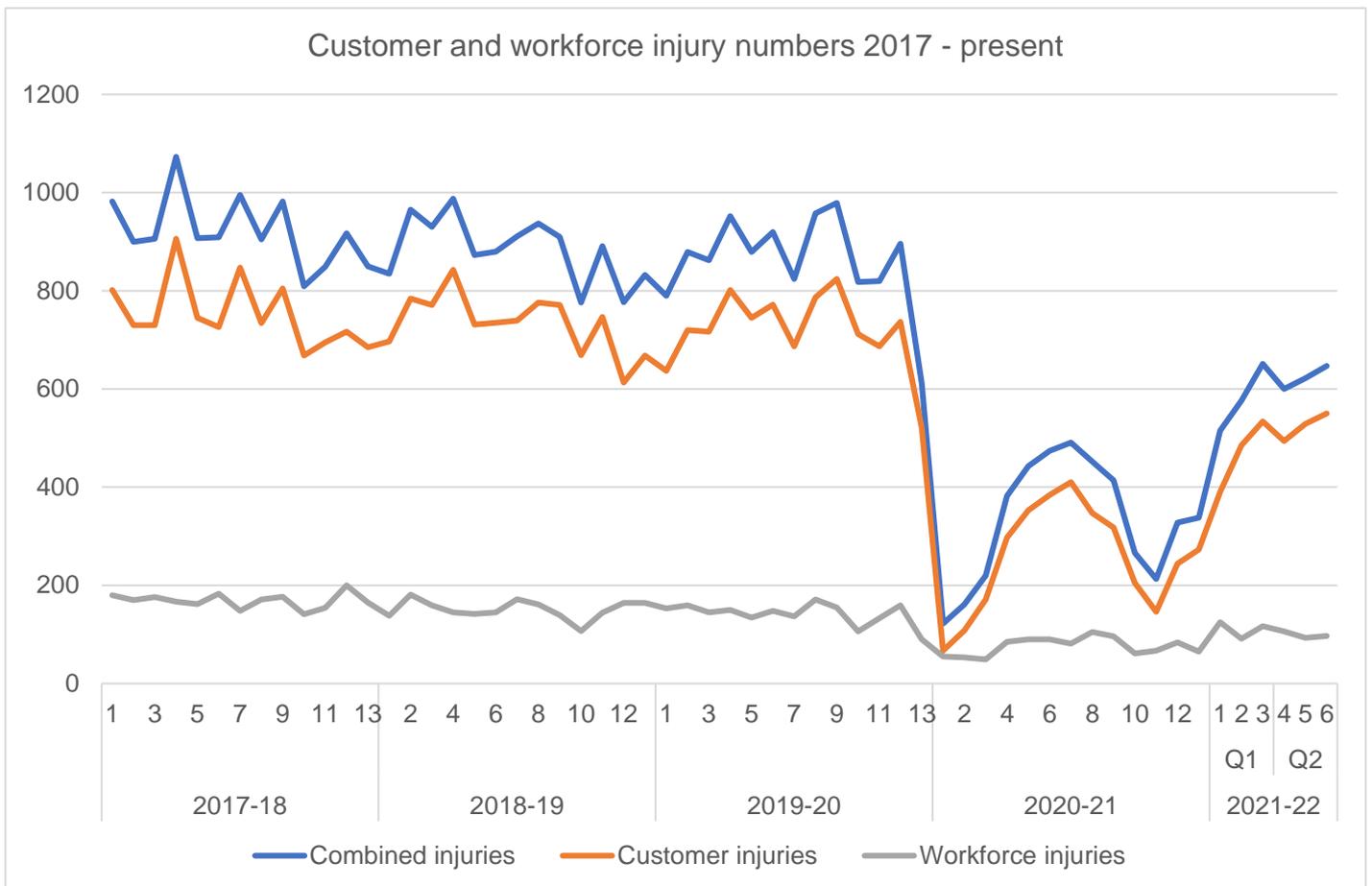
In Quarter 2 there have been 296 injuries sustained by members of our workforce. Whilst our ambition is for everyone who works for us to go home safe and healthy every day, this total represents a positive performance, with significantly fewer injuries than our scorecard target of 427 injuries.

This may reflect a continued suppression of workforce injuries since the pandemic began, however it is also 37 fewer injuries across our public transport workforce in Quarter 2 than the preceding Quarter.

Across Surface Transport, our top causes of workforce injury were collisions; slips, trips and falls; assaults, cuts and abrasions. Meanwhile on London Underground, our top causes of workforce injury were assaults; slips, trips and falls; and injuries relating to maintenance activity.

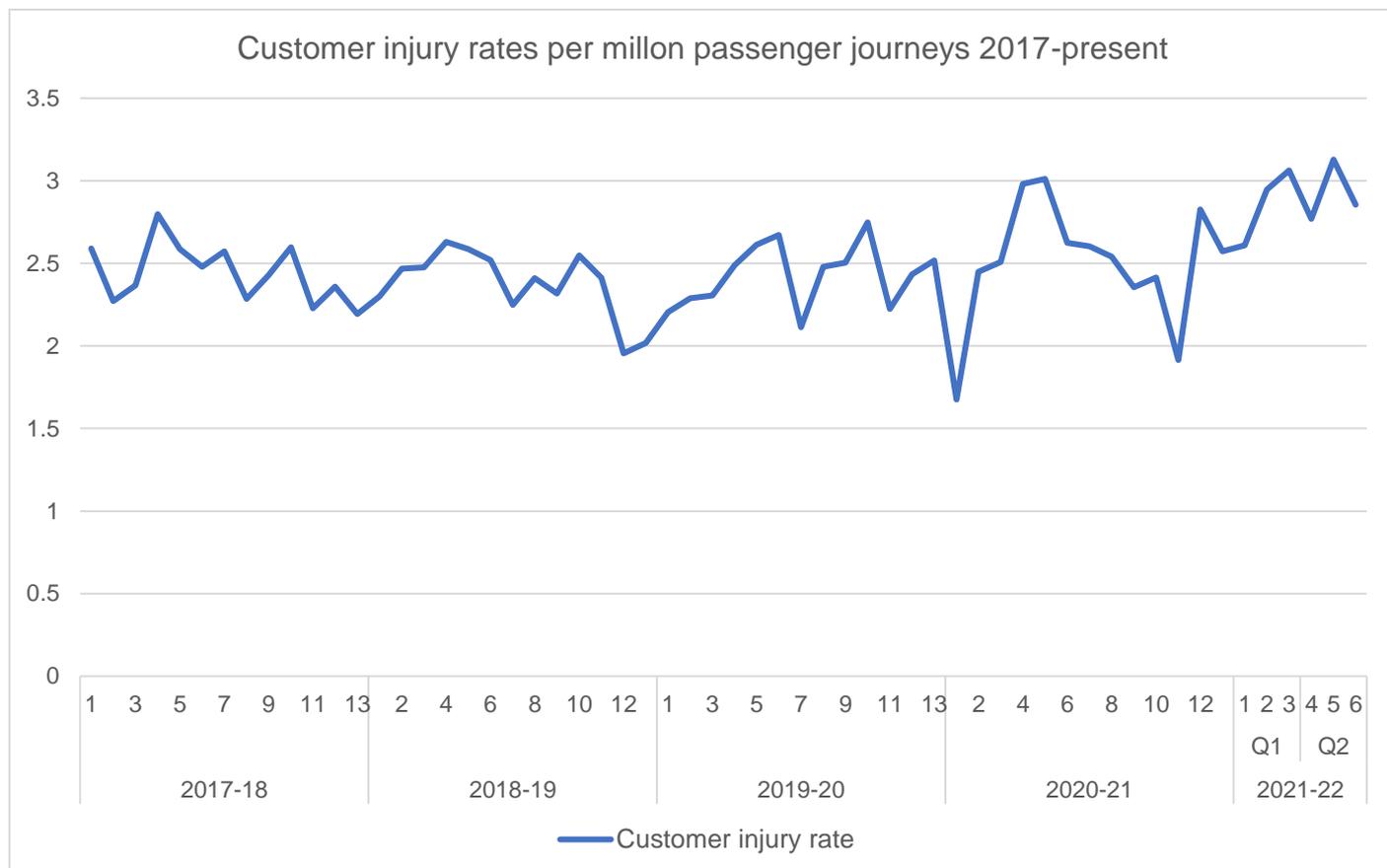
Long term trend

Customer and workforce injury numbers per period since 2017-18 (total)



This Quarter had the highest number of injuries since the beginning of 2020/21 and the start of the pandemic. Customer injuries are increasing mostly because more people are returning to our network for travel, but also because our rate of customer injury remains heightened compared to pre-pandemic levels. Workforce injuries are more stable and remain below pre-pandemic levels.

Customer injury rates per period since 2017/18 (total)



Unfortunately, our customer injury rate (injuries per million passenger journeys) is 20 per cent higher in Quarter 2 than the pre-pandemic average, between 2017/18 and 2019/20. Work is ongoing to better understand what is behind this increased rate, but it is highly likely that it is due to customer reluctance to hold onto handrails because of the fear of getting COVID-19 from those surfaces.

Public transport safety updates

Safe Track Access

The Safe Track Access (STA) Programme was set up in summer 2019 to deliver a number of initiatives to give our teams improved tools, training and approaches to safely access the track environment during Engineering Hours, to minimise the risk of

injuries to themselves and others working in this environment. This will be achieved through cultural and behaviour change and by building new infrastructure & technology to mitigate the two main risks when accessing the track:

- coming into contact with live traction current;
- being on the track before the passage of the last train.

The Programme is divided into three workstreams:

1. Infrastructure

- Track Signage: installation of signage on track at traction current gaps, adjacent to live roads in depots and sidings and at complex junctions (forecast completion date (FCD) of February 2023).
- PCRIDs: development and installation of new Permanent Current Rail Indicator Devices (PCRIDS) at platforms and traction current gaps across the London Underground network (including the replacement of existing PCRIDs on Jubilee, Northern and Piccadilly lines) (FCD of February 2025).
- Protecting Workers on Track (PWT) Safe Access System: development of mobile application used by the PWT that provides additional safety information when accessing track (FCD of July 2024).
- PWT Competency Management System (CMS) (FCD of April 2024): review the current processes for assessing PWT competence to enable the development of a new CMS standard. Design and development of a new database to manage CMS data.

2. Culture and Behaviour

A continuous improvement programme, looking at “Why people do what they do” when they are on the track, to reduce the number of incidents.

3. Governance and Reporting

Tracking of all work relating to Safe Track Access in one place including data metrics and reporting.

Bus Safety Standard

The number of buses fitted with all features required by the Bus Safety Standard continues to climb with over 500 now in the fleet. These vehicles feature intelligent speed assistance and better design features to help avoid or reduce casualties on the bus network. The latest buses to enter the fleet also feature second-generation technology such as better field-of-view camera monitoring systems in place of wing mirrors, and toggling to help distinguish the brake pedal. They also include other

safeguards like brake systems that prevent buses rolling away without a driver in the cab.

The standard will be tightened further in 2024 to harness the latest technology that can help eliminate deaths on or by a bus by 2030 and all fatalities and serious injuries on the Capital's roads by 2041. Of the buses that meet the first- and some second-generation requirements, 384 are equipped with the Acoustic Vehicle Alerting System (AVAS) to make vulnerable road users more aware of the presence of much quieter electric buses. AVAS has been designed to become louder in areas where there is more noise, like busy shopping areas, or quieter when vehicles pass through more open suburban neighbourhoods.

Suicide Prevention Programme

Year-on-year data comparison tells us that since 2018, our Suicide Prevention Programme has helped reduce the number of suicides by 44 per cent across the network.

We have trained 90 per cent of LU station staff in suicide prevention so far. Over the last few years, we have made more than 1,600 life-saving interventions at our stations. It is a reminder that, while vulnerable people still view our network both as a means of ending their life, they also see it as a place where they can find a friendly face and support when they have lost hope.

Capital delivery safety performance

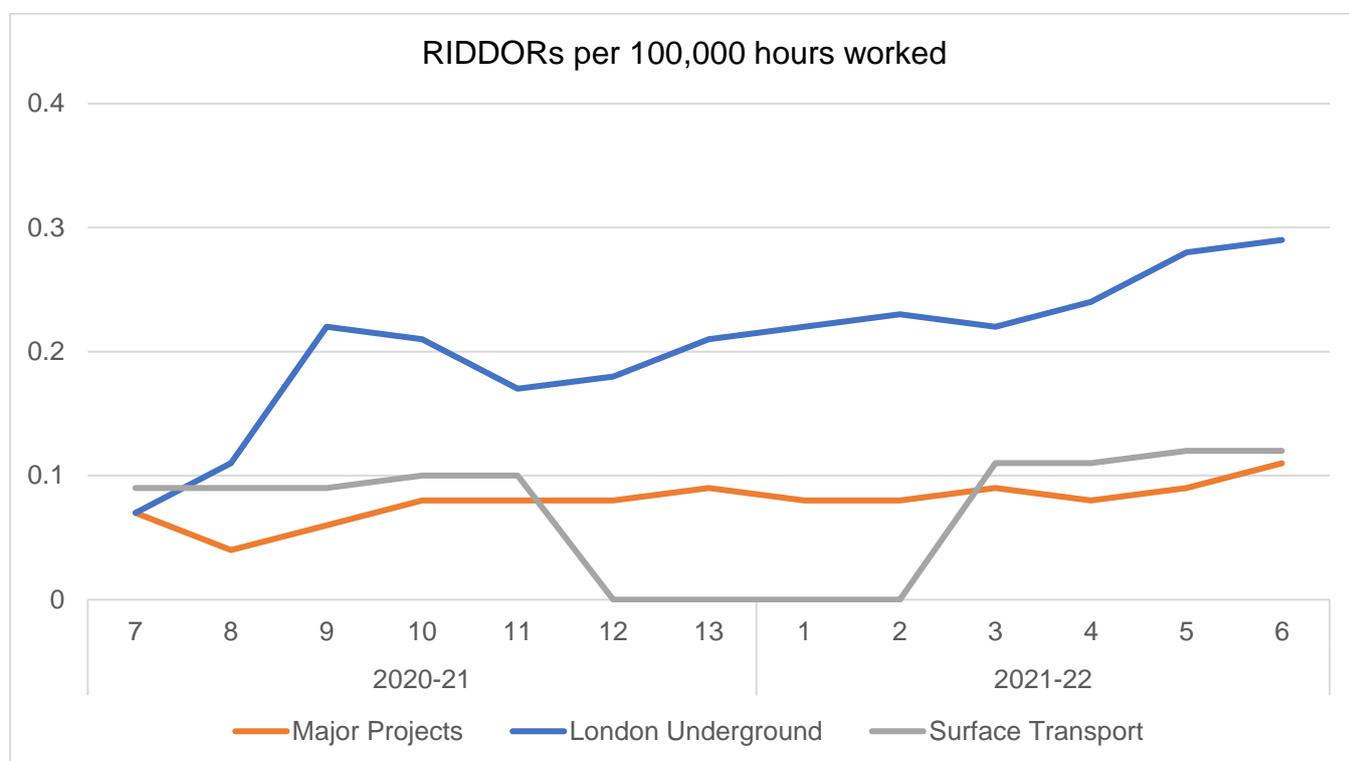
Within TfL, Capital Delivery works cover a broad range of activities across the Major Projects, Directorate (MPD), London Underground Capital Delivery and Surface Transport Project & Programme Delivery. Some are essential asset renewals and maintenance to keep our front line service operating efficiently. Other activities represent new and significant investments to improve the existing infrastructure. Within the Capital Delivery area, the teams comprise employees from both TfL and supplier organisations. Likewise, worksites may be managed by TfL or by suppliers acting as our Principal Contractor. We do not distinguish between TfL or supplier hours worked within this section of the report.

During Quarter 2, the capital projects area workforce completed 2.5 million hours of work, which gives an idea of the scale of works. Whilst this is slightly below the previous Quarter, hours worked are now beginning to stabilise as our sites return to a greater level of normality (COVID-19 risk reduction measures continue to be deployed across our sites) after the further relaxation by Government of coronavirus controls.

Quarterly performance

To enable accurate analysis of data, some of our key measurables are quoted as a frequency rate per 100,000 hours worked. Frequency rates are calculated using a moving annual average based on performance over the previous 13 periods.

RIDDOR accident frequency rate

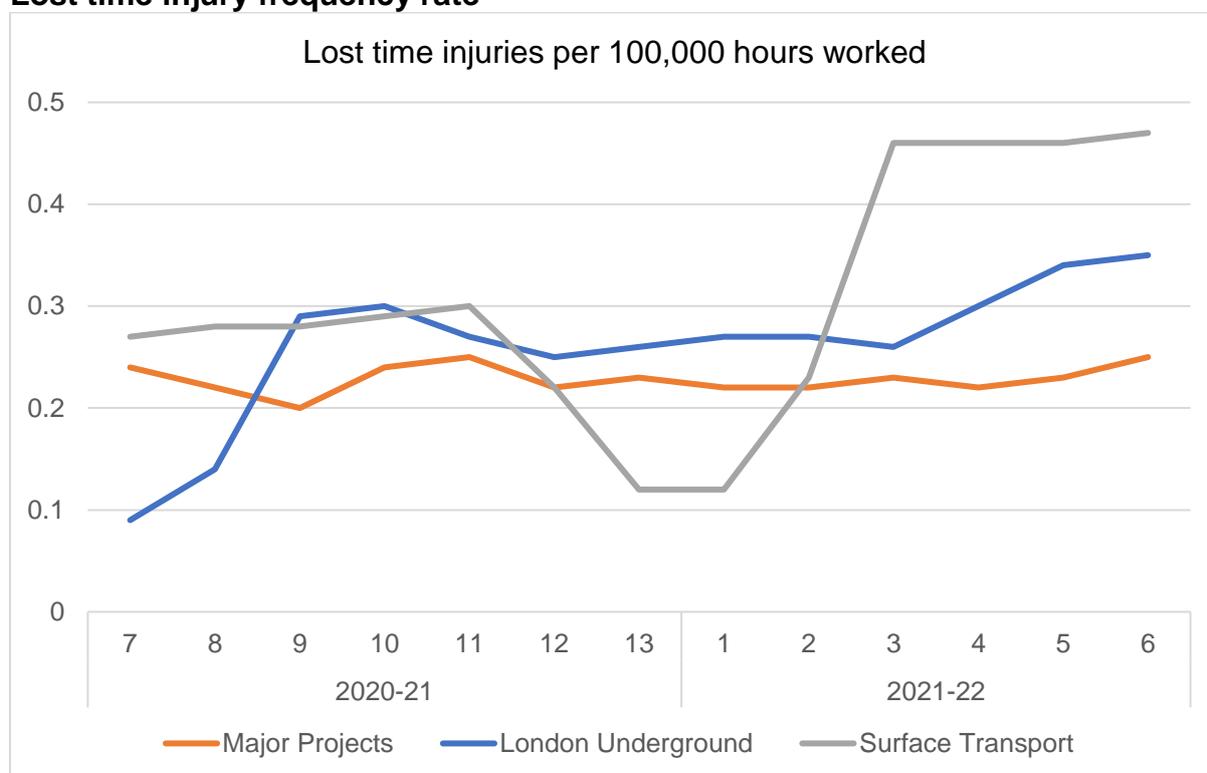


In Quarter 2, there were seven accidents reported under the Reporting of Injuries, Diseases and Dangerous Occurrences Regulations (RIDDOR) in our Capital Delivery teams. Three of these were in London Underground (LU), three in Major Projects, and one in Surface Transport. The increase in RIDDOR reportable accidents on the previous Quarter resulted in the accident frequency rising within LU and Major Projects against their respective thresholds of 0.15 and 0.10. Within Surface Transport, the accident frequency rate remained below the threshold of 0.15.

Work is being undertaken to address the root causes and concerns arising from incidents during the Quarter, in order to prevent recurrence. Following an ankle injury to a track operative at Embankment LU station, the LU team is working closely with the contractor to undertake a review of the variables influencing workforce

performance, including culture, chain of command and communications. After two RIDDOR reportable accidents at Barking Riverside, the TfL Major Projects team worked with the contractor to run a full site stand down focussed on safety behaviours, two-way communication and the importance of conducting detailed workplace risk assessments. As always, learning from recent incidents are shared across capital teams to both prevent harm and drive performance improvements.

Lost time injury frequency rate



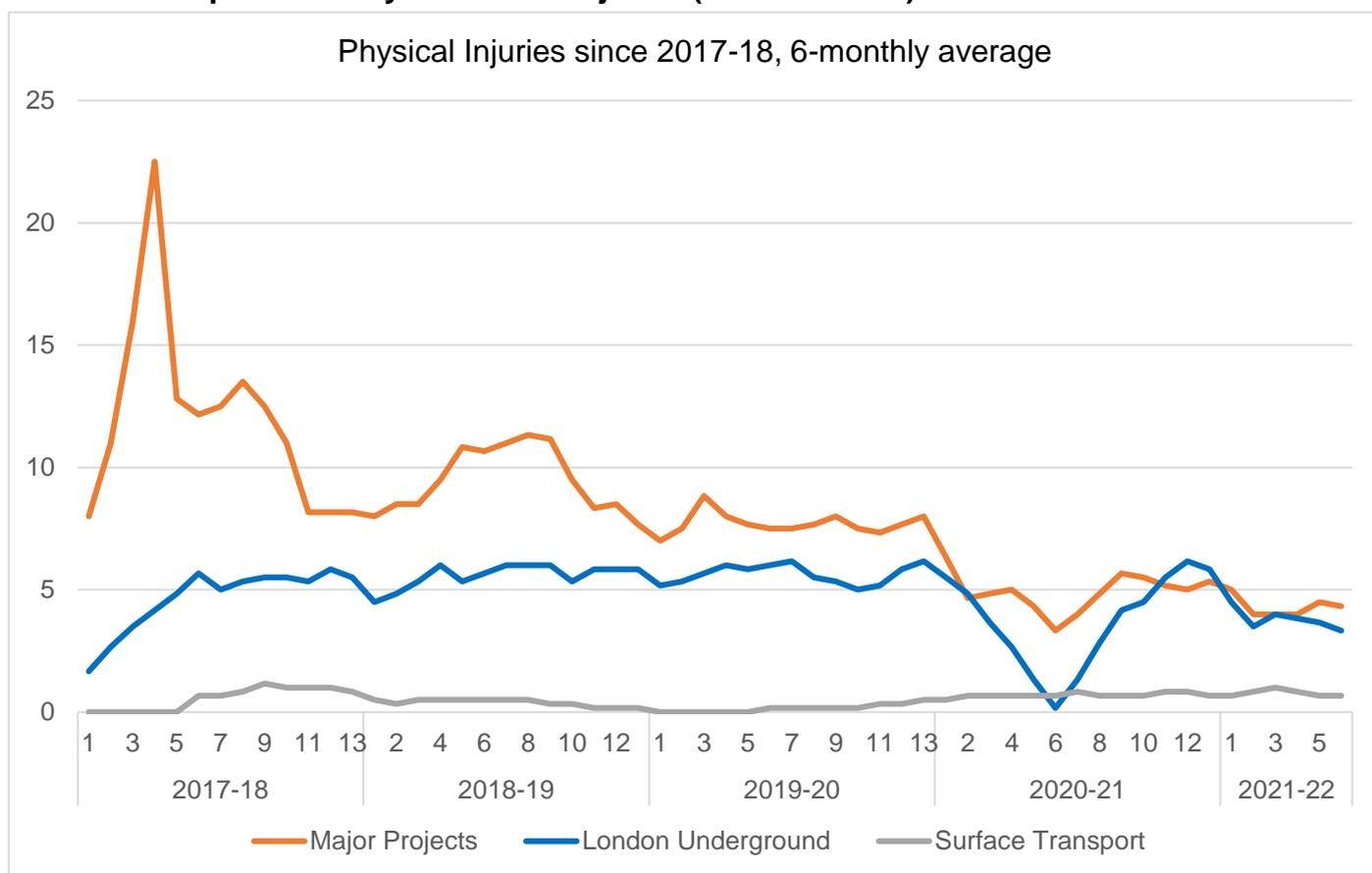
Lost time injuries (LTIs) are injuries which cause an employee to be absent for one or more shifts. There were nine LTIs in our Capital Delivery teams during Quarter 2, a slight increase on the previous Quarter. As a result, there has been a rise in the lost time injury frequency rate in LU and Major Projects against a threshold of 0.20. No lost time injuries were recorded in Surface Transport during the Quarter. However, the Surface Transport rate remains high due to lost time injuries which occurred in the previous Quarter.

The majority of lost time injuries that occurred were classified as minor injuries, resulting in cuts to fingers and muscle strains. Where injuries were classified as RIDDOR reportable accidents, they have been reported to the Health & Safety Executive or the Office of Rail and Road (ORR), as appropriate. All injuries have been

investigated to understand root causes and deploy any possible mitigations in place to prevent recurrence.

Long term trend

Total capital delivery workforce injuries (since 2017/18)



There were 26 injuries across our Capital Delivery teams during Quarter 2. While this is a small increase on the previous Quarter, injuries across our Capital Delivery activities remain well below pre-pandemic levels and continue the overall trend of long-term decline since 2017/18. This remains the case when hours worked are taken into context, which have seen a lesser decline over the same period.

The steady decline in injuries is positive news and reflects the hard work that has gone in to improving safety, health and environment (SHE) performance across our Capital Delivery programmes. However, data indicates that the number of injuries is beginning

to stabilise. As such, it is more important than ever that we continue to investigate all incidents to understand their root causes and identify any improvements.

To facilitate this, we are launching a data improvement programme across our Capital Delivery areas which aims to support better decision making and enable interventions. During the next Quarter, our Major Projects team will also be running an initiative focussed on the use of detailed analysis to inform future improvements and how our use of data aligns with our role as a construction client.

Capital Delivery SHE Improvement Initiatives

We place high value on embedding SHE knowledge within our delivery teams so that business as usual activities can be completed without harm to safety, health or environment. A key element in embedding this knowledge is educating people when to seek further professional support.

Within the capital projects part of the business it is particularly important for project teams to seek such advice and support at the early stages of a project, when decisions are made that can have long-term implications. The SHE department engaged a professional drama company to film a “typical” project team in our office environment. The short film clips tell a story which is designed to encourage the positive safety, health and environmental behaviours. The training package has been launched on ezone, TfL’s internal training platform, as a series of electronic learning modules, with the added flexibility that it can be absorbed individually, or facilitated with a group.

Following the launch of our SHE Capital Delivery & Maintenance Strategy in Quarter 1, we have developed a set of detailed programmes that aim to drive improvement activity across the organisation. We are now working with each of our Capital Delivery teams to ensure these are fully embedded so that all of our local initiatives are geared towards the aims and objectives of the strategy. Alongside this, we are launching a set of pan-organisational improvement activities that aim for a greater level of consistency within our processes and requirements. Current priorities include a data improvement programme and a detailed review of requirements within our procurement and supplier management activities. We will be measuring the success of our programmes and reporting on their progress to the Capital Delivery Improvement Group (CDIG).

Northern Line Extension

Following six years of construction, we successfully opened the Northern Line Extension (NLE) to the public on 20 September 2021. During the six-year construction

period, we maintained an impressive safety record which links to our overall Zero Harm objective. The NLE has delivered two new step-free Tube stations and a twin-tunnel running track. Major construction on the 3km twin-tunnel railway between Kennington and Battersea Power Station via Nine Elms began in 2015 and, despite the challenges of the pandemic, stayed on track for its opening.

The NLE required the excavation of 850,000 tonnes of waste material, 92 per cent of which was transported by barge along the River Thames to East Tilbury, Essex. Transporting the material in this way removed around 47,000 lorry journeys and saved more than 2,600 tonnes of carbon emissions.

Four Lines Modernisation programme

The Four Lines Modernisation (4LM) programme within the Major Projects Directorate (MPD), consists of multiple projects. This is a highly complex and technically very challenging project, and every night there are multiple teams working across our 4LM sites, on the re-signalling of the Circle, District, Hammersmith & City, and Metropolitan lines. During Quarter 2, the Four Lines Modernisation programme achieved the significant milestone of 3.5 million hours worked without a RIDDOR reportable accident, which has rightly been acknowledged as a tremendous team effort by all those on the 4LM programme.

Wimbledon Park step-free access

The Wimbledon Park step-free project was also completed in Quarter 2 by the Capital Delivery Enhancements portfolio, making it our 86th step-free Tube station. This was a complex project due to the restricted location, limited access for heavy equipment and the proximity of local residences to the work site, including the challenges of working in an operational station that saw thousands of customers travel through it to see the tennis at Wimbledon.

Acton Works Depot

Another major milestone was achieved in August 2021 with the arrival of the first train into the new train modification and maintenance facility at Acton Works Depot. It is a purpose built facility, enabling and supporting the Central Line Improvement Programme. This programme ensures the safety of our rolling stock assets.

The Capital Delivery Renewals portfolio successfully surveyed a c.100 year old tunnel ventilation shaft at Down Street disused station, and established this can be used to support the installation of new modern replacement fans to provide smoke extraction to the Piccadilly line. This work helps ensure the safety of our staff and customers.

Returning to a New Normal

MPD ran a SHE Quarter 2 improvement campaign focusing on returning back to a 'new normal', where TfL staff may be experiencing different emotions as we move to a new way of working in potentially challenging circumstances. It allowed people to take time to reflect on how they are feeling and share this with others.

The ultimate aim of the initiative was to provide staff with all the information and support required in relation to returning back and maintaining and enhancing their wellbeing.

Activities included:

- ✓ The development and launch of a SharePoint communication site to provide easy access to core information;
- ✓ Online learning sessions to give staff the tools and support they need in planning their return to our offices and sites (New Ways of Working briefing, Health and Wellbeing in a new normal, back to a new normal, sharing experiences);
- ✓ Produced a frequently asked questions document and bespoke guidance;
- ✓ Signposted health and wellbeing information;
- ✓ Recorded virtual office tours to build confidence for people to return to the office;
- ✓ A programme of regular communications around focused topics.

Future plans

Next Quarter, a pan-organisational review of lessons learned from the pandemic will be launched. In Capital Delivery, the coronavirus pandemic has had a significant impact on our approach to construction work, with our Capital Delivery Improvement Group and Covid Management Group instrumental to formulating our response to the coronavirus pandemic and adapting to the challenges faced. To support the review, the Capital Delivery teams will work together to share the learnings and innovations from across our projects, ensuring they are captured so that they can be incorporated into 'business as usual'.

The Major Projects Directorate (MPD) will continue to deliver its current safety, health and improvement plan and in Quarter 3 will focus on three themes (called the A-B-C of SHE). These will look at **Analysis** of data; **Beacon** – our process of excellence for both pre-construction and construction phases; and **Case Studies** – how we can use a case study to bring “lessons learned” to life. The themes will be delivered in line with the SHE Capital Delivery & Maintenance Strategy.

Work-related violence and aggression

Work-related violence and aggression (WVA) towards our people and those of our operators and contractors is unacceptable. Concerted action is underway to tackle it.

Triggers of WVA incidents

Fare evasion remained the biggest trigger for WVA during Quarter 2, resulting in 27 per cent of all WVA incidents on London Underground (LU) and 35 per cent on the Surface transport network. This is broadly similar to Quarter 1.

However, there was a noticeable increase of five per cent in WVA incidents on LU triggered by other disputes mainly around service disruption and station facilities.

WVA on the LU network on Fridays and Saturdays almost doubled during Quarter 2. There was also a significant rise – of 40 per cent – in incidents on a Monday. These increases were not replicated on the Surface networks. WVA still peaks during the late afternoons on both networks, but there has been an increase of three per cent in the volume and percentage share of incidents occurring between 10.00 and 14.00.

Reports of Hate Crime increased by 15 per cent on the Surface networks, between Quarter 1 and Quarter 2 (a total of 12 more reports). Hate Crime now accounts for 8.7 per cent of WVA on the Surface network. It has also increased on the LU network by 17 per cent, a 0.5 per cent increase from Quarter 1.

Overview of risk and harm

As part of the WVA strategy, we have improved the way we analyse incident data from across TfL, our operators and police partners to better understand the scale and nature of WVA incidents.

This change in the way we analyse data from different data sets was introduced in January 2020. As a result, we are unable to compare levels and trends before this date.

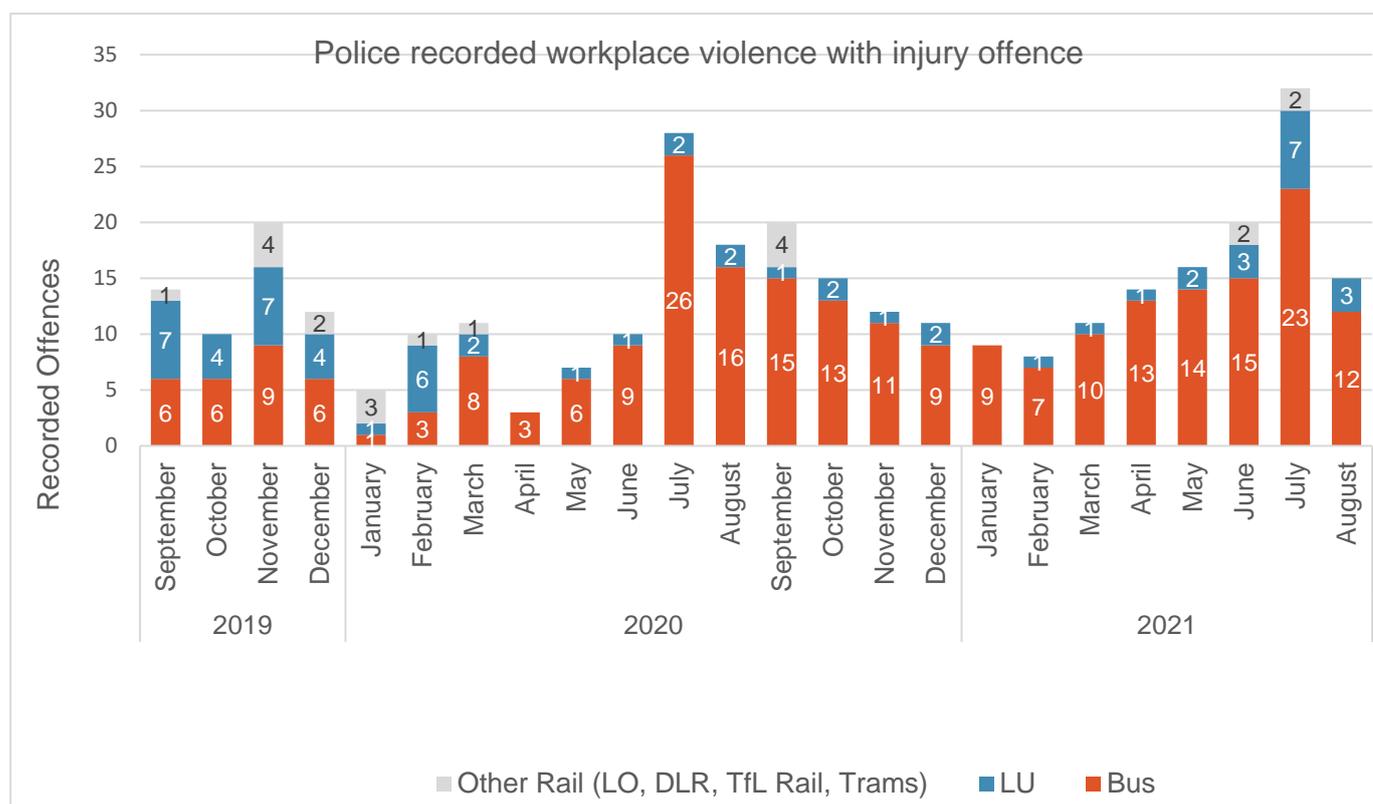
The following analysis compares data from different timeframes in 2020/21 and 2021/22. Due to the effect that reduced customer numbers had on work-related violence and aggression incidents, drawing comparisons and conclusions between the sets of data is difficult.

Volume of incidents in Quarter 2

In Quarter 2 2021/22, there were 972 incidents of WVA on the LU network. This is an 11 per cent increase compared to the previous Quarter (99 additional incidents), in line with this Quarter's increase in customer numbers on the network.

In Quarter 2 2021/22, there were 1,043 incidents of WVA on the Surface networks (including Buses, on-street, London Overground (LO), Docklands Light Railway (DLR), TfL Rail and Trams). This represents an 11.5 per cent decrease from Quarter 1 (136 less incidents).

Police recorded workplace violence with injury offence



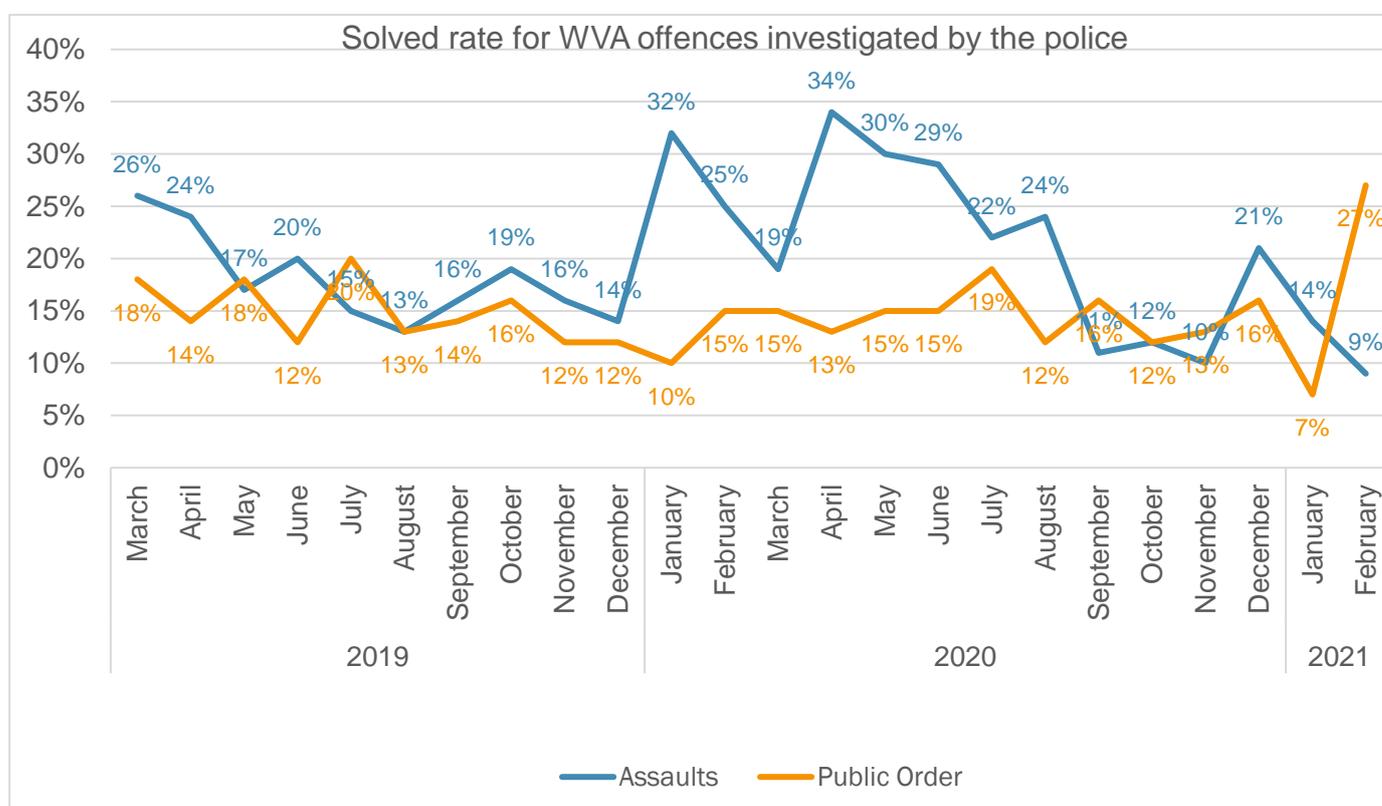
We know from feedback from our workforce and our trade unions that WVA is underreported, particularly verbal abuse. Changes in the reporting of incidents, compounded by the impact of coronavirus on overall crime levels, makes it difficult to draw clear conclusions about trends in offending. Our assumption is that violent offences that result in injury (actual bodily harm or grievous bodily harm) are more likely to be reported given that the staff member may require support, treatment or time off. Police data for violence with injury offences is a more reliable data source for monitoring trends. We have started a project to improve reporting of workplace related violence incidents to help our colleagues stay safe.

The level of bus violence with injury offences was 28 per cent higher comparing April to August 2021 (77 offences) with the same five months in 2020 (60 offences). The principal reason for this increase is that April to August 2020 was during the height of the first lockdown. In the same time period in 2021 crime levels are increasing in line with more passengers returning to the network.

Thirty two per cent of bus related physical assaults (including spitting) reported to the police are linked to road rage. Road rage volumes were lower in 2020/21 because of lockdown and fewer road users (20 offences in 2020 Year-To-Date; 37 offences 2021).

LU and other rail modes (LO, DLR, TfL Rail and Trams) combined had 20 violence with injury police reports between April to August 2021, compared with just six for the same five months in 2020. The lower offence numbers on the rail network in 2020 reflect the lower levels of passenger journeys.

Solved rate for WVA offences investigated by the police



We are working closely with the police to improve the solved rate of offences. This includes prioritising the investigation of WVA incidents, rolling out body-worn video cameras and continuing to support police investigations by providing Oyster card and CCTV information, victim statements and court support.

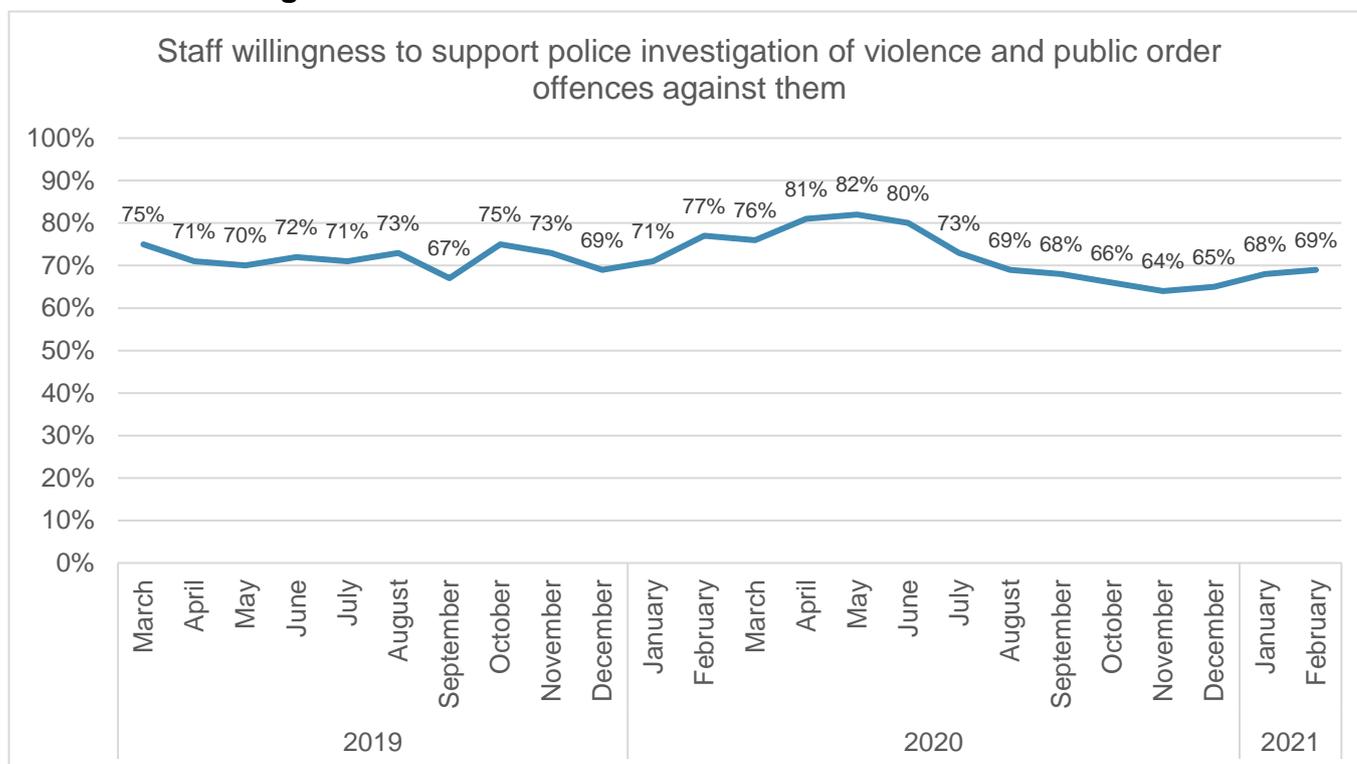
The solved rate is the percentage of offences being investigated by the police that have resulted in action against the suspect e.g. charged with the offence, summonsed to attend court or a restorative justice outcome. Figures are reported six months in

arrears to allow time for the police investigation to conclude and for cases to progress through the criminal justice process. This section therefore compares figures for the twelve-month periods, March 2020 to February 2021 (current), with March 2019 to February 2020 (previous).

During the current period the solved rate was 17 per cent for violence and public order recorded offences against our workforce – the same as the previous 12-month period.

The solved rate varied by mode during the current period, with a solved rate of 16 per cent for bus-related offences, 20 per cent for LU, and 17 per cent for all other rail modes combined. Across all modes, the solved rates increase in line with severity of incident. The solved rate is higher for violent offences (with or without injury) compared to public order (e.g. verbal abuse) as the police will allocate more resource to identifying and apprehending offenders e.g. media appeals for information for violent incidents. The solved rate in the current 12-month period for violence (with/without injury) offences was 20 per cent compared with 15 per cent for public order offences.

Staff willingness to support police investigation of violence and public order offences against them



A key factor in being able to bring offenders to justice is staff support for and consent to partake in the criminal justice process. As part of our strategy, we are working closely with the police to address staff concerns and improve the support that we collectively provide to them throughout the process.

Figures are reported six months in arrears to allow time for the police investigation to conclude and for cases to progress through the criminal justice process. This section therefore compares figures for the 12-month periods, March 2020 to February 2021 (current), with March 2019 to February 2020 (previous).

During the current period, the percentage of staff willing to support a police investigation was 77 per cent for violence and public order recorded offences against staff which is identical to the previous period.

Progress against 2021/22 annual action plan

The Safety, Sustainability & HR Panel (SSHRP) reports will now include updates against actions within the WVA annual action plan. The plan was approved by the SSHRP on 30 June 2021.

The safety of our customers and colleagues is our top priority and for many years we have been working with the British Transport Police (BTP) to tackle sexual offences and harassment – an issue that disproportionately affects women and girls and, that due to recent tragic events has been highlighted nationally. In October 2021, we launched a new customer-facing campaign in partnership with Rail Delivery Group and the BTP, sending a clear message of zero-tolerance and encouraging victims and bystanders – including our workforce - to report it.

Tackling the key triggers of WVA is essential if we are to eliminate WVA against our people. We are working with our partners and have problem solving activity underway to tackle aggressive begging at Canning Town station, antisocial behaviour by youths at West Croydon bus station, the risk of the impact of serious crime at Finsbury Park and Turnpike Lane stations, and are trialling a new engagement approach at the WVA hotspot of Stratford station.

We are also working with our partners on targeted policing activity. The BTP's Operation Steed has been running on the LU network since January 2021, with the aims of increasing both staff and public confidence, improving feelings of safety, and bringing offenders to justice. Operation Steed was initially due to be a three-month operation, however it has been met with such success and positive feedback it has been extended indefinitely. Deployment locations are decided in collaboration with industry partners locally, and locations include the LU stations West Ham, East Ham, Upton Park, Bow Road, Stepney Green and Canning Town stations and in Quarter 2

we incorporated Dagenham Heathway, Dagenham East and Becontree LU stations. To date the BTP has conducted: 692 deployments, made 45 arrests, 43 Stop and Searches and 160 other interventions, including community resolutions and Penalty Notices for Disorder.

Communication to our staff about WVA is ongoing. This Quarter, this has included working with our marketing team to distribute a targeted, customer facing 'Abuse Stops Now' poster as part of our Hands Up campaign to identify WVA hotspots across the network, and posters raising awareness of successful WVA prosecutions.

Our trial to improve judicial outcomes for public order offences against our staff launched in August 2021 with our first case being successfully heard at Lavender Hill Magistrates Court. The suspect was found guilty of face covering and public order offences and sentenced to pay fines and charges totalling £1,369.

Technology continues to play a key role in delivering our WVA strategy. Following the rollout of the first phase of body-worn video cameras to all frontline teams we have agreed we will look to increase the usage of these cameras by five per cent per Quarter. We have also now prioritised further teams who could also benefit from cameras or lone worker safety devices. Multi-disciplinary teams are in place to deliver these projects alongside a new case management system for our WVA team, to allow the tracking of cases and ensure consistent support is provided to staff.

Following several incidents of violence and aggression against our workforce on some of our construction sites, the Project & Programme Delivery team within Surface Transport has developed a crime hotspot map to highlight where incidents have occurred, enabling information to be shared during the pre-construction phase. Alongside this, a set of workshops has been organised with the supply chain to share best practice in terms of dealing with these incidents.

Building on this, we are launching a new Urban Safety training package to provide our non-customer facing staff working across London with the knowledge to be able to keep themselves safe and secure while at work. Topics range from walking through different types of conflict, to practical decision making and reducing personal risk.

Examples of Successful Prosecutions in Quarter 2

Assault on Transport Support & Enforcement (TSE) Officers at Harlesden LU station

Two TSE Officers were verbally abused and physically assaulted while deployed at Harlesden station in December 2020. They were there to address issues of antisocial behaviour and workplace violence and aggression whilst also engaging and enforcing

the wearing of face coverings. The suspect was found guilty of two counts of common assault by beating. Sentencing took place on 12 October 2021.

The magistrate sitting stated:

“TfL staff and all staff working for the public are entitled to work in a safe environment and at the time of the incident the country was again facing a peak in coronavirus infections and TfL staff were acting to protect the public in a health emergency. The defendant was shouting at TfL staff potentially increasing the risk to them of catching COVID-19 as well as to other members of the public. The public at large are grateful for all the efforts made by TfL to keep the public safe at what was a stressful time for everyone.”

Common assault on 280 bus

A bus driver on the 280 bus was assaulted in February 2021. The suspect was found guilty and a youth rehabilitation order applied along with an 18-month supervision requirement, a six-month curfew with electronic tagging and 100 hours of unpaid work.

Common assault on 432 bus

A bus driver was spat at on the 432 bus in April 2021. The suspect was found guilty and sentenced to 14 days in prison which was suspended for 12 months and ordered to pay compensation of £50.

Charing Cross LU station

Racist verbal abuse took place against a member of our LU team in December 2020. CCTV stills were obtained with a suspect identified at an identification parade. The suspect was found guilty of racially aggravated common assault and public order offences and sentenced to 10 weeks in prison.

Oval LU station

A member of our LU team was verbally abused and spat at in November 2019. The suspect was found guilty of Common Assault and sentenced to prison for three months, suspended for two years while having treatment for alcohol dependency. They were also ordered to comply with a curfew and electronic monitoring for 30 days and to pay compensation of £100.

Oxford Circus LU Station

Five members of our LU team were subjected to verbal and racist abuse in April 2020. The suspect was found guilty of racially aggravated common assault, and public order offences and was committed to prison for four weeks, suspended for 12 months. They were also ordered to undertake an unpaid work requirement along with total fines of £942.

Significant incidents

This section outlines significant incidents that have occurred during Quarter 2 and since the last report. It also provides an update to significant incidents of note.

Significant London Underground incidents

Two reports were published by the Rail Accident Investigation Branch (RAIB) this Quarter which were of interest in LU.

RAIB report: Signal passed at danger and subsequent near miss, Chalfont & Latimer station – Published August 2021

On Sunday 21 June 2020, a near miss occurred between a Chiltern Railways train travelling south and a LU train which was getting ready to depart from LU's Chalfont & Latimer station on the Metropolitan line. A few minutes earlier, a southbound Chiltern Railways train passed a signal displaying a red (stop) aspect (known as a signal passed at danger). This resulted in the train being automatically stopped by a safety system. Without seeking the authority required from the service operator (signaller), the driver reset the tripcock before continuing towards Chalfont & Latimer station, where the train was routed towards the northbound platform, which was occupied by a LU Metropolitan line train.

The Chiltern Railways train stopped about 23 metres before reaching the Metropolitan line train, which was stationary. There were no reported injuries, but there was minor damage to signalling equipment and a set of points. However, this was a significant near miss which could have been more serious.

The RAIB has made three recommendations and identified a learning point in the report published in August 2020. The first recommends that Chiltern Railways improves its driver management processes. The second recommends that Chiltern Railways and LU jointly establish an effective process for the management of safety at the interfaces between their respective operations. The third recommends that

Chiltern Railways, assisted by LU, reviews the risk associated with resetting train protection equipment applicable to Chiltern Railways' trains on LU infrastructure. The learning point concerns the importance of considering sleep disorders during routine medical examinations of safety critical workers. LU is working closely with Chiltern Railways to ensure all recommendations are addressed.

RAIB report: Fatal accident at Waterloo Underground station – Published September 2021

On 26 May 2020, at Waterloo London Underground station in London, a passenger fell into the gap between the northbound Bakerloo line platform and the train from which he had just alighted. A large gap existed between the train and the platform because of the track curvature at the location of the passenger's fall.

The RAIB made three recommendations to LU. The first relates to the need to recognise and assess location-specific risks so they can be properly managed. The second recommends that LU review its quantified risk assessment. The third recommendation relates to the need for effective delivery of actions proposed by internal investigation recommendations.

TfL carried out an internal investigation into this accident and the Formal Investigation Report (FIR) was published in January 2021. Many of the issues identified by the RAIB were addressed in the FIR and in actions taken by LU after the accident in response to an improvement notice issued by the Office of Rail and Road (ORR). The ORR monitors the completion of RAIB recommendations and LU responded to the ORR in Quarter 3 (on 19 November) setting out how LU will address the three RAIB recommendations.

The Coroner has opened an inquest into this matter and LU is an Interested Person. There have been two pre-inquest review hearings to date and a further pre-inquest review hearing will take place on 13 December 2021. A date for the inquest has not yet been fixed.

TfL FIR: Monument Signalling Near Miss FIR (19 March 2021) (ongoing)

A Formal Investigation Report (FIR) has been commissioned, following a high potential incident at Monument to Cannon Street, into the circumstances which led to errors within the Communication Based Train Control (CBTC) system. An interim report has been produced. The final report is due to be published in December 2021.

TfL FIR: Engineering train Movement not following published process – (16 May 2021) (ongoing)

A Formal Investigation has been commissioned into an engineering vehicle passing a signal at danger during a Test Possession Weekend. An interim report has been produced. The final report is due to be published in December 2021.

Significant incidents on the Surface transport network

Ongoing Formal Investigation: Victoria Bus Station Pedestrian Fatality

On 10 August 2021, two route 507 buses collided within Victoria bus station, one hitting the other from behind as it was moving a short distance within the bus stop. This caused the one in front to be shunted forward. In doing so, it collided with and fatally injured a woman walking who was using a designated crossing. Another person who had just boarded the front bus, and one of the bus drivers were also injured.

The bus operator has submitted their investigation findings and we are currently investigating the wider circumstances surrounding the incidents, as well as working collaboratively to assist the police, and the Health and Safety Executive with their ongoing inquiries.

London Overground Collision with Buffer Stop (New)

On 12 October 2021, a London Overground train, operated by Arriva Rail, hit the buffer stops at Enfield Town at slow speed causing damage to the infrastructure and the first carriage of the train to partially derail.

The driver of the train was treated for shock and one passenger for minor injuries, neither of which required hospital treatment. The RAIB and the Office of Rail and Road (ORR) were notified by Arriva Rail, and TfL is working closely with Arriva Rail, the ORR and Network Rail post incident. An investigation has commenced. The driver of the train had a positive drugs test post incident and has been suspended by Arriva Rail. He was arrested by the BTP on 27 October 2021 on suspicion of endangering the safety of the railway and being unfit to work on a transport system through drink or drugs.

Engagement with regulators

This section looks at how we have engaged with our regulators on safety issues over the past Quarter.

Engagement with the Environment Agency

We report our progress on environmental issues to the Environment Agency. Polychlorinated biphenyls (PCBs) are substances that are toxic to humans and animals. There is legislation in England and Wales, as well as an international agreement, which bans their use. Some of the thousands of different types of electrical capacitor used in signalling, power, fleet, tunnel telephone systems on London Underground (LU) predate this legislation and therefore sometimes contain PCBs. LU's programmes for identification, replacement and removal of components that may contain PCBs continued in Quarter 2; this has included removal of components from power rectifiers and testing of track circuit capacitors.

Engagement with London Fire Brigade

We meet the London Fire Brigade (LFB) every month to share progress of our Fire Safety Programme and to discuss any significant fire incidents in the previous months. As well as a joined up response to incidents on our network, the LFB carry out a number of detailed inspection visits to review our approach to fire safety. These collaborative discussions have allowed us to share the detail of our fire risk assessment programme and training with the LFB, as well as sharing detail on how we manage and maintain our fire assets with the LFB inspectors. It has also allowed us to identify areas where we can work more closely together to ensure that we manage the risk of fire on our network.

Engagement with the Office of Rail and Road

We continue to work closely with the ORR to ensure we manage health and safety effectively across our railway networks. We have regular discussions around our ongoing response to the coronavirus pandemic, as well as constructive open and honest discussions about any incidents on our network. We continue to work closely with them to identify opportunities for improving how we manage health and safety. During Quarter 2, we had a number of constructive discussions with the ORR on how

we manage issues ranging from long-term capital investment and asset management to customer and workforce safety. The ORR will be carrying out a number of site visits during Quarter 3.

Independent SHE Assurance Activity

A 'Safety, Health and Environment Assurance Report' has been submitted to the SSHRP this Quarter. This is the first of a regular report on assurance activity carried out by the Integrated Assurance Team for risk ER1 'Major safety, health or environmental incident or crisis'.

SHE is currently reviewing the report to:

- Identify any key trends that may provide additional context to the themes reported in this report;
- Ensure SHE assurance activities for ER1 are informed by the audit outcomes of this independent internal assurance function;
- Determine if any 'poorly controlled' or 'requires improvement' audit outcomes represent a wider strategic SHE concern;
- Determine if any 'well controlled' outcomes represent good practice that can be shared more widely.

Health

COVID-19

Since the start of the coronavirus pandemic, our focus has been to protect the safety and health of our customers and workforce.

Deaths in service

Our sincere condolences remain with the families and loved ones of the 103 members of our workforce who have sadly passed away from COVID-19 as of 22 November 2021. Everyone at TfL pays tribute to the vital role they played in our fight against the pandemic.

TfL's Commissioner, Andy Byford has worked closely with the Mayor of London, Sadiq Khan to design a memorial to commemorate these London transport workers. The new memorial will be created on a pedestrian plaza on Braham Street in Aldgate.

Our Employee Assistance Programme continues to be available to all employees and their dependants, and provides support, guidance and information on a range of topics, including bereavement. The safety of all our staff and customers continues to be our top priority, and we are absolutely committed to doing everything in our power to keep everyone safe on our network.

COVID-19 testing schemes

We continue to offer employees our rapid testing service at facilities in King's Cross and Baker Street LU stations as well our head office buildings: Palestra, Pier Walk and Endeavour Square. This has been a key initiative in our efforts to ensure workforce safety. By 11 October 2021 we had tested more than 6,700 employees, with the number testing positive averaging at less than 0.6 per cent. We have continued the expansion of the Work Collect scheme for the distribution of home test kits from all our testing sites, as well as at more than 25 other locations, including Victoria Station House, fleet and crew depots, stations, service control centres and track maintenance depots. As of 11 October 2021, more than 3,560 kits had been issued.

Throughout June 2021, we assisted the London Borough of Hounslow with its surge testing campaign in response to the concerning spread of the Delta variant in the borough. We distributed more than 1,500 PCR test kits to TfL workplace locations including bus garages and underground stations. We continue to work closely with the Department of Health and Social Care (DHSC) and the boroughs to help support them in any way during this pandemic.

For those who are not fully vaccinated, it remains a legal requirement to self-isolate for ten days from being contacted by NHS Test and Trace or the NHS COVID-19 app as having been in contact with someone who has tested positive. However, to enable those who are unvaccinated to continue to work while self-isolating, we have the TfL Daily Contact Testing (DCT) scheme. This scheme enables our workforce to undertake supervised daily lateral flow tests at one of our test sites, providing they do not have any COVID-19 symptoms. The scheme involves being tested over a seven-day period (two of which are rest days). When not at work, the individual must self-isolate apart from essential shopping, exercise and medical emergencies. This scheme is entirely voluntary.

Together with Westminster City Council, we are continuing to offer Pfizer vaccinations to our staff through a series of pop-up clinics. Since 28 July 2021, six clinics have taken place, at Victoria, Baker Street and Palestra. Those who attend can receive

either a first or a second dose of vaccine (but the requirement for an eight-week gap between doses remains).

Imperial College London sampling

Air and surface sampling of customer areas by Imperial College London continues, with no trace of coronavirus found on the public transport network. Our Occupational Health team continues to liaise with academic institutions to ensure our approach to safety remains at the cutting edge.

Living with Covid-19

We know that the pandemic presents us with a regularly changing situation and we will have to move to an approach where we are 'Living with COVID'. Throughout the pandemic our objective has been to ensure the safety of our workforce and our customers, which will allow us to continue to deliver our vital services for London.

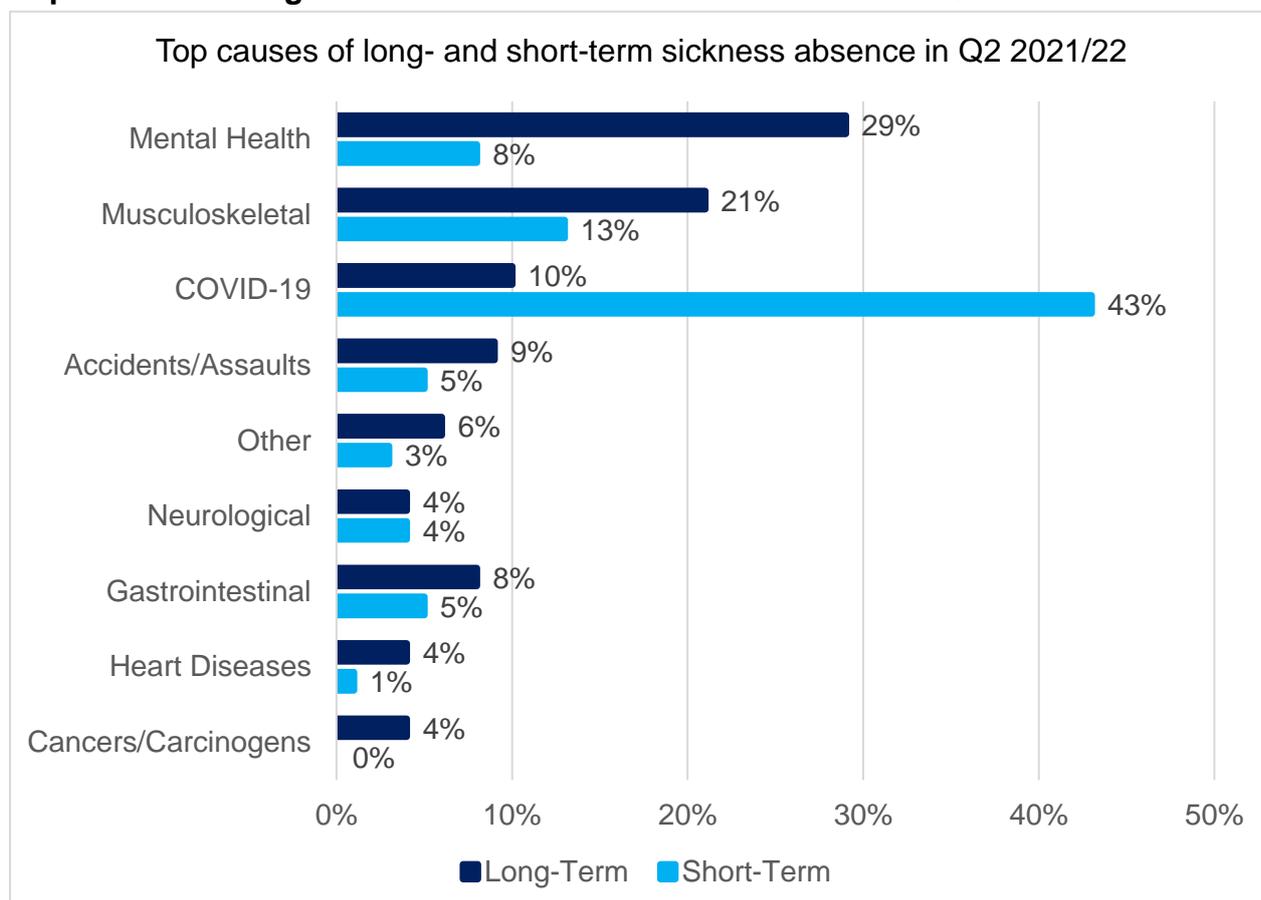
As we look to the future, we will maintain the controls we have put in place to protect the health of our workforce and our customers. While the changing pandemic situation may lead to future changes in our approach (in light of the scientific and medical environment), we will carry out appropriate health and safety risk assessments before we make any significant changes. We will also continue to communicate regularly, openly and honestly with our workforce and customers about how we will continue to manage this risk.

Sickness absence data

When looking at our sickness absence data, the definition of short-term absence is any absence lasting less than 28 days and the definition of long-term absence is of 28 days or more duration.

By looking at the underlying causes of absence in detail, we gain meaningful insight into where we can best target preventative measures. Around 60 per cent of absences at any time are caused by long-term sickness.

Top causes of long- and short-term absence in Quarter 2 2021/22



In Quarter 2 of 2021/22, mental health accounted for 29 per cent of all long-term absences and musculoskeletal related absence was the second highest cause at 21 per cent. These two categories typically account for the majority of long-term sickness absence in the UK. Our Occupational Health team has several initiatives aimed at prevention of ill health but also to support those who become unwell to return to work earlier.

In Quarter 2 of 2021/22, coronavirus remained the top cause of short-term absence at 43 per cent, a significant increase from the previous Quarter (34 per cent). This was largely caused by the NHS COVID-19 app notifying some of our workforce that they had been in contact with someone who had tested positive and therefore needed to self-isolate. This reduced in the last four weeks of this Quarter, but it had put us in the position of coronavirus-related absence being as high as in the second wave for a two-week period. Looking ahead to Quarter 3, following updated Government guidance, the NHS app will only advise to self-isolate if a person has been in contact with someone who has tested positive for COVID-19, they are over 18 years old and unvaccinated, which may lessen the impact of coronavirus on short-term absences.

Health updates

Coping with Change

As we followed the Government's roadmap out of lockdown and thoughts turned to a return and reoccupation of our head office buildings, the Mental Health and Wellbeing Manager gave a presentation on 'Coping with Change: reoccupation and return to the workplace'. The presentation included useful tips and advice to help manage anxiety. The presentation was recorded and shared for those not able to attend the live presentation. A dedicated 'Recovery & Resilience' SharePoint page was set up to share all the wellbeing resources available to TfL staff, including anxiety busting techniques, mental health support and a wellbeing toolkit. Line managers also have access to a wellbeing guidance document and a presentation to help their teams.

World Suicide Prevention Day

To recognise this important day on 10 September 2021, we invited a guest speaker from the Samaritans to talk to colleagues. They shared the facts and figures about suicide and how to spot signs of vulnerability in others and in ourselves. We also promoted our own Suicide Prevention training and mental health support available.

parkrun promotion

parkrun is an inclusive event which helps to encourage greater activity. parkrun resumed in July 2021 and we promoted the events with a poster campaign. A poster was designed that showed all the parkrun events which were located close to each London Underground line. The aim was to encourage greater participation in the event, by featuring members of our workforce on the promotional posters.

Know your Numbers Week

From 6-10 September 2021, we ran 'Know your Numbers' week, which focuses on encouraging people to know their blood pressure numbers in the same way that they may know their height and weight. During this week, our Health and Wellbeing physiologist visited a number of locations within TfL to offer quick blood pressure tests, with more than 100 staff dropping into one of these 'pressure stations' during the week to get a reading of their blood pressure.

Well@TfL

- The Well@TfL pilot began at the end of September. The pilot aims to examine how we can support our colleagues to improve their health and wellbeing. The pilot started with a project involving Acton depot and then expanded to mobile health checks across the business (including night shifts) and mobile occupational health medical assessments.

Acton Well@TfL pilot:

The Well@TfL project launched at Acton at the end of September, giving our workforce the opportunity to have an onsite health check, which measures cholesterol, blood glucose, body composition as well as exploring lifestyle issues such as diet and exercise. Each participant receives bespoke advice and a report on their health by the Health and Wellbeing Physiologist. In addition, they are offered follow-up appointments, to help track their improvements. We will use this information to understand the impact of bespoke health checks and advice. A health and wellbeing questionnaire will be offered to all staff at Acton in November 2021. Aggregated anonymised data from the questionnaire will be used to determine a depot based intervention to improve health. The questionnaire will be repeated a year later in order to establish the impact of the intervention. This will give us the opportunity to learn more about the wellbeing of our workforce and how best to support them.

Mobile Well@TfL Health Checks and Occupational Health Medicals

Next year, the Well@TfL bus will visit sites around the company, offering staff a health check and support on their wellbeing. The health bus will have the equipment necessary to allow onsite Occupational Health medicals, which will commence after the Acton Pilot and alongside the mobile Well@TfL Health checks.

At the same time using a grant from the Employer Health Innovation Fund we are working with the Design Council to look at how we can enable better uptake of the available health initiatives by operational staff.

Bus Driver Fatigue and Health and Wellbeing Challenge

There are ten projects included across eight bus operators.

1. Abellio and Tower Transit joint bid with Compass UK
 - Train bus operators' trainers to deliver three interconnected courses that get people talking, without shame or fear of negative consequences, about mental and physical health and feeling fatigued: (1) Managing fatigue, mental health and wellbeing for line managers, (2) Championing mental wellbeing and alertness for all staff, and (3) Promoting driver wellbeing and alertness for drivers (CPC supported).
 - Timescale: 10-12 months
2. Arriva and Tower Transit joint bid with DriveTech
 - Driver's Mate is a series of 90-second videos helping bus drivers learn about fatigue and their wellbeing, using nudge theory, so that people change their behaviour in the long-term.
 - Timescale: 15-18 months
3. Go Ahead bid with The Sound Doctor
 - The Sound Doctor will provide bus drivers with a groundbreaking programme of audio interventions that will help them fight fatigue and keep them alert during their shift.
 - Timescale: nine months
4. HCT bid with Hestia
 - Everyone's Business team at Hestia will train a cohort of Domestic Abuse Champions at HCT and upskill line managers so they can effectively support their employees.
 - Timescale: four-five months
5. HCT bid with MIND
 - Providing mental health support to managers and frontline staff, concentrating on improving manager awareness of mental health issues and knowing how to support themselves and their teams, and finding suitable volunteers to qualify as Mental Health First Aiders.
 - Timescale: three-four months
6. HCT and UNO joint bid with Tenshi Consulting
 - Senseye technology uses both published and proprietary in-house neuroscience research to associate quantifiable cognitive insights with

patterns of physiology within the eye that can detect and highlight any 'fitness for duty' issues at the point of driver sign-on.

- Timescale: three-four months

7. Metroline bid with DDM

- Gro Health is a digital behaviour change intervention that takes a holistic approach to health encompassing four therapeutic areas of mental wellbeing, sleep, activity and nutrition, using behaviour change activities, personalised resources, coaching, peer-to-peer support and health tracking.
- Timescale: 12 months

8. Metroline bid with The Rest Space

- Rest Space is a physical resting space combined with science-backed educational content to resting and internal communication content to support the change in culture in the workplace.
- Timescale: three-six months

9. Stagecoach bid with The Liminal Space

- Night Club is a transformational health and wellbeing programme that uses a unique interactive walk-in installation designed to communicate evidence-based sleep health information to shift workers.
- Timescale: six-nine months

10. Go Ahead bid with Viewpoint Feedback

- Employee feedback programme using in-the-moment feedback pods to capture information about driver wellbeing and providing managers with details in real time so that they can find solutions to issues that negatively impact drivers' wellbeing.
- Timescale: six-nine months

Bus Driver Health Kiosks

TfL will support bus drivers through the provision of self-service health assessment kiosks or comparable health assessment across all ten bus operating companies. TfL's commissioned UCL's Institute of Health Equity report into bus driver deaths as a result of COVID-19 highlighted the need to be more proactive in understanding existing health conditions of bus drivers, supporting better health, and identifying those most at risk. Accordingly, the health kiosk or assessment will collect information from drivers that could be indicators of conditions such as diabetes, hypertension and heart disease, and will include a lifestyle assessment.

The rollout of these health assessments to bus drivers began during winter 2021/22. TfL will collect aggregated data to define and inform further activities for the Bus Driver Health and Wellbeing Programme.

Employer Health Innovation Fund

The Impact on Urban Health and Design Council have offered TfL a grant of £110,000 to deliver health and wellbeing assessments of bus drivers. The Fund will be used to bring on an external health research consultant to gather insight on the standard benchmark for health assessments across other industries and in local bus operators in comparable countries. Although the research workstream will not be limited to health assessments as a solution, we are open to recommendations of other health and wellbeing initiatives that can be implemented to meet our aims. A broader piece of work will concurrently begin on researching the broader non-clinical services to establish a working definition for 'assessments' and 'wellbeing checks'.

Environment

July flooding events and Mayoral response

Brief summary of TfL impacts

With climate change, severe rainfall events like those London experienced on 12 and 25 July 2021 will become more intense and more frequent.

Two heavy downpours of rain in July led to widespread, severe flash flooding across London. Consequently, they caused significant damage to our assets and severely disrupted our services across the Capital. 30 London Underground stations had to be fully or partially closed. On the Surface road network, several roads and tunnels were affected, London Overground services were disrupted, experiencing severe delays, and Pudding Mill Lane DLR station had to be closed. Whilst the network recovered quickly from these events, assessment of climate related risks will be crucial part of the planning process to avoid similar impacts on the TfL network.

In response to the flooding events, the Mayor convened a series of roundtables (held on 27 July, 3 August, 20 August and 8 October 2021) attended by the Mayor, Deputy Mayors for Transport and Environment and Energy, together with representatives from London Fire Brigade, the Environment Agency, Thames Water, London Councils and

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various London boroughs, as well as TfL. The purpose of the roundtables was to identify any joint learnings and actions from the flooding that could result in improved responses by authorities in future. One outcome has been the creation of a time-limited Task and Finish Group (including TfL representatives) to set out how London can best adapt to future flood events. The first meeting was held on 5 October 2021 and focused on developing the Terms of Reference.

Setting out our Sustainability agenda

In September we published our first ever Sustainability Report and Corporate Environment Plan, setting out our ambitions to address the climate crisis and support London's green and inclusive recovery so the capital can become an even more economically, environmentally and socially sustainable place to live, work and travel.

TfL Sustainability Report

The [TfL Sustainability Report](#) is a wide-ranging report aiming to capture the social, economic and environmental benefit we deliver as an organisation and to track progress. It provides an account of work to date and includes key metrics to measure performance. It is aligned with the reporting approach of a number of other large organisations and with the overarching [United Nations \(UN\) Sustainable Development Goals](#) through an approach that complements our London level strategic policy framework.

Everything we do contributes towards the three pillars of sustainability:

- **Society** – caring about our colleagues, customers and communities through safe, healthy and accessible transport services;
- **Environment** – operating in a sustainable way, to protect and regenerate the natural world;
- **Economy** – being financially sustainable and offering affordable services to help provide good quality of life for all.

The social impact of public transport is far-reaching - not only does it help people get around, but it helps the city grow and connects people to work, education and opportunities as well as friends and family. We want to build on the work already achieved to make our services more inclusive by continuing to bring in step-free access where possible to the Tube and Overground network, working to provide information in the most accessible forms possible and ensuring everyone feels safe when using TfL services.

Corporate Environment Plan

The Corporate Environment Plan (CEP) works alongside the Sustainability Report and is our plan for improving our environmental performance. It is a forward-looking plan providing more detail on our ambition, targets and plans on the environment.

The CEP has been developed around five key themes, which will help us become a zero-carbon London:

- **Climate emergency** – reduce carbon emissions from our activities and ensure we are ready for the impacts of climate change;
- **Air quality** – reduce emissions of harmful air pollutants from our activities;
- **Sustainable resources** – support a low-carbon circular economy;
- **Green infrastructure** – protect, connect and enhance our green infrastructure, including the biodiversity, habitats and ecosystem services on our estate;
- **Best environmental practices** – deliver our activities responsibly and be a good neighbour.

Accelerating our move to a zero emission bus fleet

All new buses entering the London fleet will be zero-emission to help us to decarbonise public transport and further enhance air quality much faster than planned.

This step change was announced by the Mayor of London at the Zero-Emission Bus Summit at City Hall on 17 September 2021, and puts us on the path of eliminating diesel along with its tailpipe gases and particulate matter from our buses by 2034 at the latest, which is three years earlier than planned. This will also contribute to the wider plans the Government has to cut CO₂ emissions in the UK by 68 per cent (compared to 1990 levels), by 2030.

London has more than 550 zero-emission buses in its fleet which is helping us reduce our reliance on conventional diesel, cut harmful emissions and reduce CO₂ in the capital. We are aiming for 10 per cent of our 9,000-strong fleet to be zero-emission by the end of 2022. However, supply chain disruption and shortages of components in the manufacturing sector may put this at risk, as well as the disruption caused by power upgrades at bus garages across London. The fleet includes 20 double-deck zero-emission hydrogen fuel-cell buses operating on route 7 from East Acton to Oxford Circus, launched by the Mayor on 23 June 2021, supported by a bespoke refuelling station at Perivale, Ealing. We have harnessed this technology in London before to help us reduce bus fleet emissions and, like pure electric buses, it ensures our buses emit nothing except water vapour. We will continue adding zero-emission buses as

quickly and affordably as we can so that we can make the entire fleet zero emission by 2034, with options for bringing this forward to 2030 if support for vehicles and infrastructure can be provided by the Government.

Improving London's Air Quality

Ultra-Low Emission Zone Expansion

In 2019, we introduced the world's first 24-hour Ultra-Low Emission Zone (ULEZ) in central London. This has had a transformational impact on air pollution, contributing to a 44 per cent reduction in roadside nitrogen dioxide levels within its boundary.

From 25 October 2021, the existing central London ULEZ was expanded up to, but not including the North Circular Road (A406) and South Circular Road (A205), creating a much larger zone that will help improve air quality for millions of Londoners. Cars, motorcycles, minibuses (up to 5 tonnes), vans (up to 3.5 tonnes) and other specialist vehicles driving within the boundary will need to meet the required ULEZ emissions standards or pay a daily charge.

The expanded ULEZ has the most stringent emission standards, operates for longer hours and covers the largest area of any charging scheme in Europe. Early indications show that 87 per cent of vehicles travelling in the zone already meet the ULEZ standards. This is a dramatic increase in compliance compared to 39 per cent in February 2017, when changes associated with ULEZ began. This means that Londoners are already experiencing the benefits of cleaner air. This is supported by new data, published in October 2021 by the Clean Cities Campaign, that London drivers are ditching diesel cars six times faster than the rest of the UK.

Scrappage Schemes

We have continued to operate the Mayor's scrappage schemes to help drivers scrap their older, more polluting vehicles to meet required emissions standards. To date, the schemes have supported the scrapping of nearly 10,000 vehicles, with more than £43.7m of grant payments issued. On 19 August 2021, a further £5m of funding was secured to enable the ULEZ car and motorcycle scrappage scheme to extend, which brings the total investment up to £61m. The availability of this important mitigation measure for those who are disproportionately affected by the ULEZ expansion will help to remove up to 2,500 additional polluting cars and motorcycles from London's roads.

Electric Vehicle Infrastructure Strategy

On Friday 15 October 2021, the Mayor of London, Sadiq Khan published a draft summary of his 2030 Electric Vehicle (EV) Infrastructure Strategy.

London's ongoing investment in electric vehicles is tackling the twin dangers of air pollution and climate change. This supports the Mayor's wider target of decarbonising the transport network and achieving a zero carbon London by 2030.

The EV charging infrastructure in London now accounts for approximately a third of the UK's total charge points and represents a 55 per cent increase in EV charging points delivered between 2019 and 2021.

Our own modelling that has just been carried out estimates that by 2030 London could need between 40,000 – 60,000 charge points, of which up to 4,000 will be rapid charge points that could fully charge a vehicle in as little as 20 minutes.

This means that there will soon be many more EV charge points across the capital, which will level up infrastructure access across inner and outer London. This will better support access for all users especially those whose travel is essential, those without off-street home charging, and those high mileage users whose regular recharging needs will be better served by the more geographically spread out charging points.

The 2030 EV Infrastructure Strategy is due to be published in full later this year.

Air Quality Education Campaign

The campaign continues to inform drivers about the contribution driving makes to poor air quality and to explain the need for the forthcoming ULEZ expansion. A range of air quality advocates feature in online videos, radio adverts and interviews including Choked Up, a group of young Londoners campaigning for cleaner air, Jonathan Grigg, Professor of Paediatric Respiratory and Environmental Medicine at Queen Mary University, Rosamund Adoo Kissi-Debrah and Sarah Woolnough, Chief Executive Officer at the British Lung Foundation and Asthma UK.

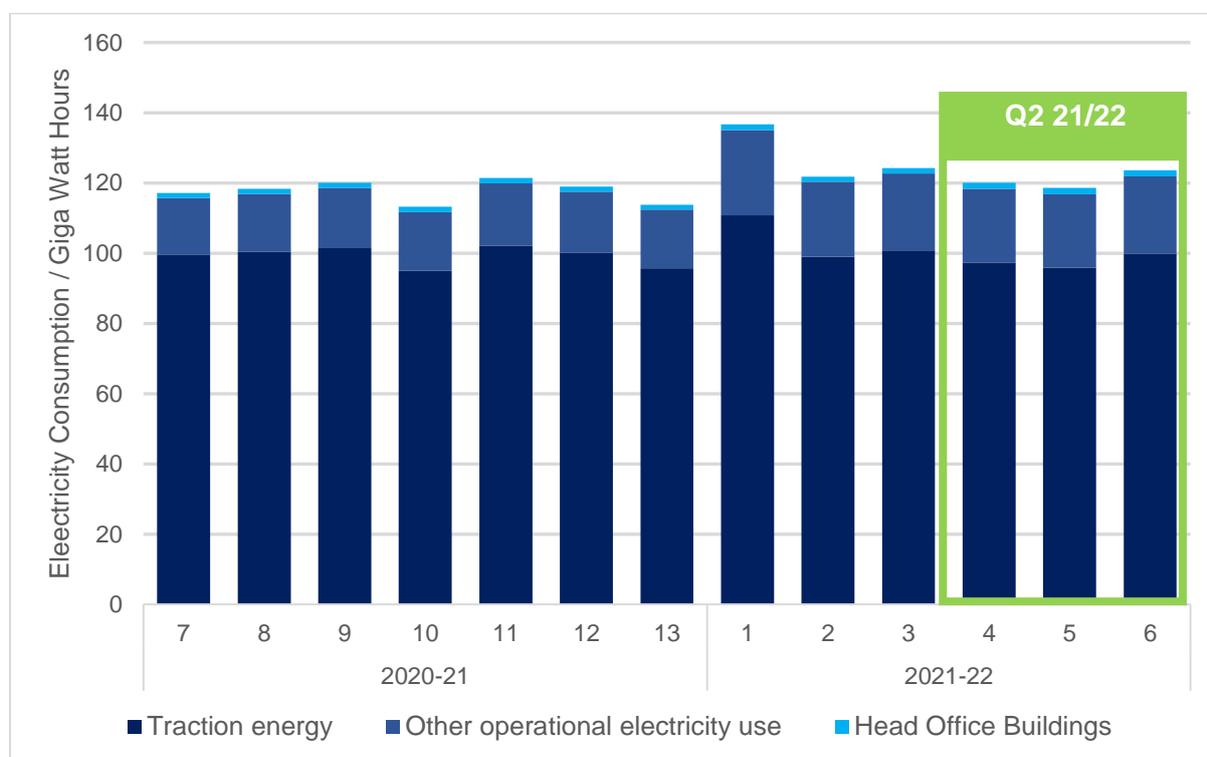
Energy consumption and carbon emissions from our operations

The coming years are crucial in our fight to prevent devastating climate change. The UK must make significant reductions in its carbon emissions if it is to meet its legally

binding goal of reaching net-zero carbon by 2050. In London, the Mayor has set an ambitious goal of London becoming carbon neutral by 2030.

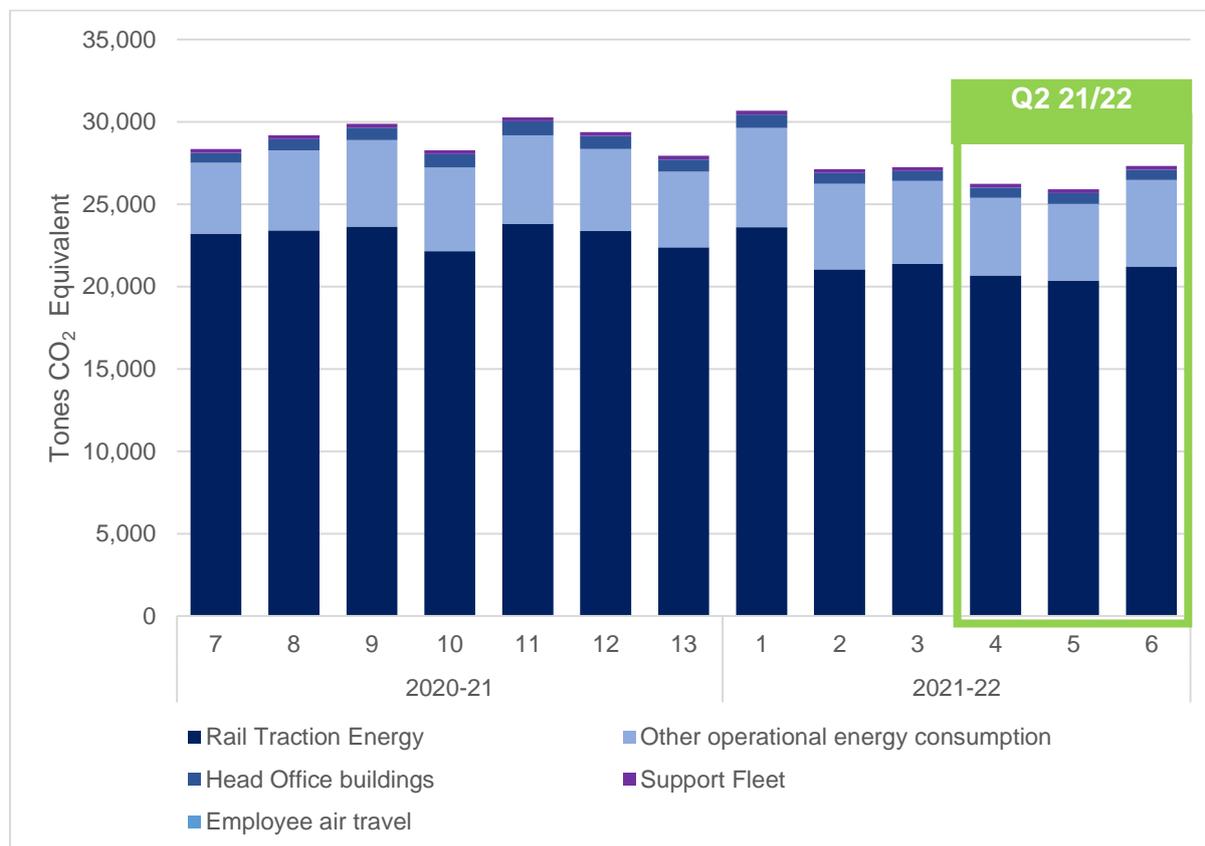
Transport is responsible for more than a quarter of London’s carbon emissions, and this is increasing as other sectors decarbonise. We play a vital role in providing low carbon public transport to Londoners and in promoting walking and cycling. However, we must also lead by example and reduce carbon emissions from everything we do.

Electricity consumption - provisional (giga watt hours) – 2020/21



Electricity consumption in Quarter 2 reflected the normal operation of our services. Total consumption for the first half of this year was 17 per cent higher than the equivalent period last year due to reduced service levels in that period as a result of the pandemic.

CO₂ emissions, excluding buses (tonnes) – 2021/22



Carbon dioxide emissions from operations, excluding buses, track closely to electricity consumption. Electricity consumption increased by 17 per cent for the first half of this year compared to last as rail service levels returned to normal. Carbon emissions were only 7 per cent higher than in the first half of 2021/22, partly offset by grid decarbonisation.

Switching to LED Solutions at Our Bus Shelters

As we maintain more than 12,000 bus shelter assets, switching to light emitting diodes (LED) solutions has the potential to provide significant cost, maintenance and associated carbon savings across the network. LEDs are energy efficient alternatives to conventional fluorescent and halogen lighting, providing on average 50 to 75 per cent more efficient lighting – delivering more lighting output per watt of electricity. Reducing our electricity consumption means we reduce our carbon emissions, which is the key aim of this work and is vital as we work towards a zero carbon London by 2030.

The team measures the light output from the proposed courtesy light (the passenger light that sits above the information panel) and advertising panel edge-lit solutions to see how they fair on street. There are currently two advertising panel trials and one courtesy light installed on shelters in Old Kent Road, with plans to install two more to be able to compare products. This will help inform how the team takes the project forward and rolls out sustainable lighting across our network to provide much-needed environmental benefits while at the same time keeping our customers safe and our advertising panels bright.

This paper will be considered in public

1 Summary

- 1.1 At the September meeting it was agreed that a quarterly paper would be provided to the Panel detailing key second line of defence safety, health and environment (SHE) assurance activities in the last quarter and any trends or significant findings identified. The purpose of this report is to give the Panel an overview of the effectiveness of the risk controls for Enterprise Risk 1 – Major safety, health or environmental incident or crisis (ER1).
- 1.2 The appendices provide a list of audits undertaken in the last quarter as part of the second line of defence. Audits against Enterprise Risks ER4 (Major Security Incident) and ER12 (Asset Condition) have been included as they correlate to ER1. Audit reports issued are given a conclusion of ‘well controlled, adequately controlled, requires improvement or poorly controlled’. Individual findings within audit reports are rated as high, medium or low priority.
- 1.3 Performance data is provided on progress against the audit plan, audit ratings, rating trends by Enterprise Risk and business unit and progress against actions.

2 Recommendation

- 2.1 **The Panel is asked to note the paper.**

3 Annual Integrated Assurance Audit Plan

- 3.1 The annual Integrated Assurance audit plan contains a series of second line of defence audits that address ER1 (Major SHE Incident or Crisis), ER4 (Major Security Incident) and ER12 (Asset condition unable to support TfL outcomes). Audits against all three risks have been included as there is a correlation between the three Enterprise Risks.
- 3.2 The audit plan is developed in consultation with the SHE and Engineering Directorates and Security teams to identify where assurance is required or where there are performance or compliance concerns. Each of the audits is sponsored by the relevant risk or Management System owner, to whom assurance will be provided. The SHE section of the audit plan includes audits of SHE Management System compliance within a defined team or audits that assess a specific procedure within the SHE Management System.

3.3 Audits are only cancelled or deferred at the request or agreement with the audit sponsor or risk owner and are recorded on the audit database. In Quarter 2 of 2021/22 (Q2), five audits of compliance with Network Information Systems Regulations have been cancelled due to a change of assurance strategy, at the request of the Chief Information Security Officer. In consequence two governance audits will be undertaken, rather than the seven compliance audits planned, to focus on awareness of key roles and responsibilities.

4 Work of Note this Quarter

4.1 Two of the audits in Q2 were given poorly controlled conclusions:

- (a) Audit 21 732 'Commercial Development Estates Management HSE Compliance' assessed compliance with key parts of the SHE Management System at the request of the Commercial Development management team. It was identified that roles and responsibilities were not always clearly defined in management procedures or controls implemented consistently, resulting in potential legal non-compliances regarding legionella, asbestos and appliances. Commercial Development are working through the resulting actions which are in date.
- (b) Audit 21 736 'Management of LU station tenants fire risk assessments' was requested by the Fire Engineer to assess the level of compliance with the Fire Regulatory Reform Order (FRRO) risk assessment requirement amongst London Underground (LU) station tenants. Compliance with the FRRO and TfL procedures could not be fully demonstrated due to the availability and quality of station tenants' fire risk assessments and gaps in the monitoring and assurance by LU. A multi-directorate programme of improvement work is in place with Director level oversight.

LU Customer Operations and Asset Performance Integrated Systems Audits

4.2 Integrated Systems Audits assess compliance against a range of key requirements of the TfL Management Systems including SHE, competence, security, finance and operational rules. In 2021 the scope was revised to include Covid-19 checks, fire risk assessments and checks of station tenancies. These audits are not given an overall conclusion as this may mislead given the range of subjects and findings. These audits were developed with subject matter experts from SHE, Security, Finance and Revenue and LU Customer Operations teams and audit Station, Train and Service Control teams. They are also undertaken on LU Asset Performance and Capital Delivery maintenance teams (e.g. track, rolling stock depots and signals teams).

- 4.3 Feedback on Integrated Systems audits is provided quarterly to LU senior management. Due to the consistent question set, it is possible to provide statistical analysis on trends and themes of compliance and non-compliance which are shared with other managers for lessons learnt. The Integrated Systems audits restarted in May 2021 following a brief pause due to Government social distancing rules and six audits were completed since May. The rolling 13 period compliance average is 72 per cent for Customer Services and 66 per cent for Line Operations.

Audit sections ranked by average compliance score (high to low)

- (a) Fire safety compliance, 81 per cent
- (b) Risk assessment, 76 per cent
- (c) Security, 74 per cent
- (d) Safety monitoring, 70 per cent
- (e) Competence, 68 per cent
- (f) Ticketing and revenue, 68 per cent
- (g) Emergency arrangements, 68 per cent
- (h) Payroll assurance, 65 per cent

5 Performance and Trends

- 5.1 The graphs in Appendix 2 show that at the end of Q2, Integrated Assurance are 25 per cent through the annual plan. The annual plan is not evenly split across all quarters; there are a greater number of shorter audits planned in Quarters 3 and 4. The annual plan also took account of available resources as a result of retirements and recruitments. We remain confident the target can be met.
- 5.2 In the last quarter the Risk and Assurance Directorate has increased management oversight of audit actions on a periodic basis through improved reporting. We are starting to see a reduction in the number of overdue actions that peaked during periods of furlough and lockdown.
- 5.3 A recent review looked at the distribution of audit conclusions over the past three years to identify any trends that could indicate a deterioration in TfL performance. The review concluded that there was a reasonably consistent distribution of audit conclusions with no discernible increase in 'poorly controlled' or 'requires improvement' ratings provided, despite the audit plan changing each year.

6 Improving SHE Assurance Tools and Processes

- 6.1 One of the key improvement workstreams for SHE assurance is the digitisation of our SHE assurance process. This will enable local management teams to not only check how well they are implementing and complying with risk controls in the SHE Management System, but also systematically demonstrate compliance, or identify opportunities for improvement. SHE is currently running a trial that includes digitising a selection of assurance checks. Multiple parts of the business are trialling these checks and will provide feedback on their use. Funding approval has been received to continue to the next stage of the digital assurance project.
- 6.2 The SHE Assurance Forum is developing a matrix document that outlines roles and responsibilities for TfL functions that provide assurance related to SHE risks. This is part of an effort by forum members to establish a collaborative, co-ordinated approach to providing SHE assurance.
- 6.3 The SHE Directorate is currently completing a root and branch review of procedures related to SHE assurance and monitoring, in collaboration with key stakeholders and subject matter experts from across the organisation. This is part of the wider programme to improve the SHE Management System. A user-community has been established with representatives from TfL assurance functions and the wider business to help review proposed new content and/or changes to existing procedures, before submission for approval through the relevant change assurance processes.

List of appendices:

Appendix 1 – Integrated Assurance Audits Completed in Q2 against ER1 and ER12

Appendix 2 – Integrated Assurance Audit Data

List of Background Papers:

None

Contact: Mike Shirbon, Head of Integrated Assurance, Risk and Assurance
Email: Mike.shirbon@tube.tfl.gov.uk

Appendix 1 – Integrated Assurance Audits Completed in Q2 against ER1 and ER12

| Enterprise Risk | Directorate | Ref. | Audit Title | Objective | Conclusion | Priority Rating | | | Summary of Findings |
|---|--------------------|-------|--|---|------------|-----------------|----|---|--|
| | | | | | | H | M | L | |
| ER01 Major health, safety or environmental incident or crisis | Finance | 21732 | Commercial Development Estates Management HSE Compliance | To assess compliance with key parts of Safety, Health and Environment (SHE) management - Roles and Responsibilities, Construction Design and Management Regulations, Training and Competence, Incident Reporting and SHE Improvement Plan. | PC | 2 | 16 | 0 | Roles and responsibilities were not always clearly defined in management procedures and/or all controls implemented consistently, resulting in potential legal non-compliances. |
| ER01 Major health, safety or environmental incident or crisis | London Underground | 21731 | LU Operational Communications | To assess whether the revised arrangements for monitoring the standard of London Underground (LU) Operational Communications are being complied with and are delivering an improvement in operational communications standards in practice. | RI | 2 | 4 | 0 | The standard requirements were not fully complied with by the Communication Review Groups and SHE teams providing assurance. Management systems are in place, but in certain areas they have yet to be implemented due to coronavirus related issues. |
| ER01 Major health, safety or environmental incident or crisis | London Underground | 21733 | L&E Engineering Temporary Works Coordinator | To examine compliance with internal standards on temporary works co-ordinator role which has recently changed to be the responsibility of Lift and Escalator Engineering. | RI | 1 | 6 | 0 | The internal standards on Temporary Works Coordinator and Temporary Works Supervisor roles, were not fully complied with by L&E Engineering. This could lead to the Temporary Works being set up incorrectly, with possible risk of failure and adverse impact on health and safety. |

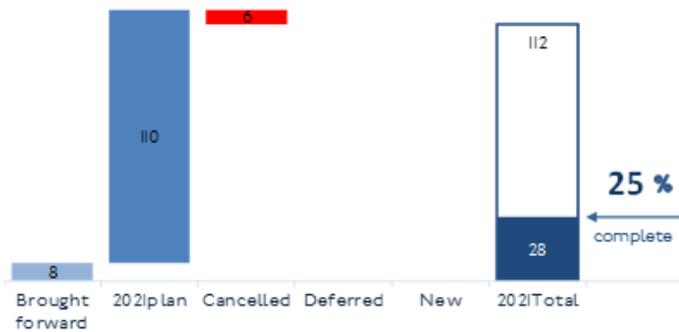
| Enterprise Risk | Directorate | Ref. | Audit Title | Objective | Conclusion | Priority Rating | | | Summary of Findings |
|---|--|--------|---|--|------------|-----------------|----|---|--|
| | | | | | | H | M | L | |
| Ro1 Major health, safety or environmental incident or crisis | London Underground | 21 737 | LU Apprentice Unit | To assess management of the LU Apprentice Unit with regards to competence, safety and safeguarding. | AC | 0 | 3 | 1 | Arrangements were found to be largely well defined, managers and apprentices well trained and records well maintained. |
| ERo1 Major health, safety or environmental incident or crisis | London Underground | 21 736 | Management of LU station tenants fire risk assessments (FRA) | To assess the level of compliance with the Fire Regulatory Reform Order (FRRO) risk assessment requirement amongst LU station tenants. | PC | 2 | 10 | 0 | Compliance with the FRA requirements of the FRRO 2005 and TfL procedures and guidance could not be fully demonstrated. The availability and quality of station tenants' FRAs, and the inadequate monitoring and assurance arrangements meant LU is not sufficiently aware of the risk from station tenants in order to manage the overall fire risk. |
| ERo1 Major health, safety or environmental incident or crisis | London Underground | 21 749 | LU Track Competence Management | To seek assurance that the Asset Operations track teams are demonstrably competent through the application of a robust Competence Management System. | RI | 0 | 4 | 5 | Elements of R2631 Safety Critical Licensing for Track Maintenance had not been fully implemented. Some of the issues raised during the audit have been previously identified and are planned to be resolved in the revised version. |
| ERo1 Major health, safety or environmental incident or crisis | Surface Transport | 21 740 | London Overground L&E Inspections and Assurance | To assess compliance against legislation and internal standards. | AC | 0 | 1 | 1 | Adequately Controlled – Statutory inspections of lifts and escalators were planned and completed with defects corrected. |
| ERo1 Major health, safety or environmental incident or crisis | London Underground Network Operations | | Integrated systems audits of: Arnos Grove Area (21 701) District Line Service Control (21 717) Morden Area (21 715) Mile End Area | To provide assurance that key requirements contained in the Management System are being met. | Not Rated | | | | See report text for trends reported to LU Network Operations. |

| Enterprise Risk | Directorate | Ref. | Audit Title | Objective | Conclusion | Priority Rating | | | Summary of Findings |
|-----------------|-------------|----------|---|-----------|------------|-----------------|---|---|---------------------|
| | | | | | | H | M | L | |
| | | (21 703) | LU Bakerloo and Victoria Track (21 725) Liverpool Street Area (21 706) | | | | | | |

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Appendix 2 : Integrated Assurance Audit Q2 Summary

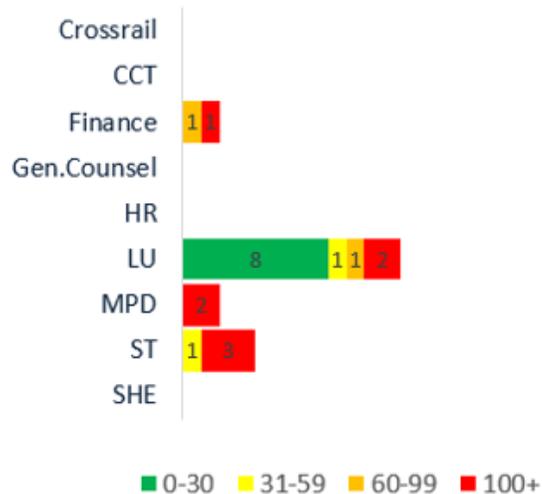
Audit Progress against plan 2021/22 in Q2



Audit Rating By Directorate – last 4 Quarters

| | PC | RI | AC | WC | M/C |
|--------------|-------------|--------------|--------------|-------------|--------------|
| CCT | | | 9 | | 3 |
| Finance | 1 | | 2 | | 2 |
| LU | 3 | 8 | 7 | 5 | 18 |
| MPD | | | | 1 | |
| Pan TfL | | | 1 | | 1 |
| Surface | 2 | 4 | 7 | 1 | |
| Total | 8.0% | 16.0% | 34.7% | 9.3% | 32.0% |

Action Management - Overdue Action by Directorate by Overdue Days



Audit Conclusion By Enterprise Risk – Last 4 Quarters



| | |
|-----|-----------------------|
| PC | Poorly Controlled |
| RI | Requires Improvement |
| AC | Adequately Controlled |
| WC | Well Controlled |
| M/C | Memo/Consultancy |

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Date: 2 December 2021

Item: Vision Zero Action Plan Progress Report

This paper will be considered in public

1 Summary

- 1.1 This paper updates the Panel on the publication of the Vision Zero Action Plan progress report which took place on 15 November 2021.

2 Recommendation

- 2.1 **The Panel is asked to note the publication of the Vision Zero Action Plan progress report.**

3 Background

- 3.1 London has a long history of targeted improvements to road safety and in 2018 took a bold step forward with the Mayor's commitment to Vision Zero and the elimination of deaths and serious injuries from the road network by 2041. This ambition also applies to all our safety activity in the organisation, including customer and workforce safety.
- 3.2 Our interim targets for roads are to reduce deaths and serious injuries by 65 per cent by 2022, 70 per cent by 2030 and for all deaths and serious injuries from road collisions to be eliminated from London's streets by 2041. Our approach to working towards the Vision Zero objective is set out in the 2018 Action Plan, which outlines the Safe Systems framework we have adopted to work towards those goals.
- 3.3 London has made huge strides since committing to Vision Zero, with road deaths and serious injuries falling faster than the national average. However, 96 people were killed and 2,974 people suffered serious injuries on London's roads in 2020, and continued action is needed to achieve the Mayor's Vision Zero goal.
- 3.4 Emerging road danger reduction trends are increasing the challenge, with the volume of motorised traffic remaining high and not falling, journey planning apps increasing such traffic on residential roads, and the number of journeys driving for work rising, with more registrations of small engine scooters as a result.
- 3.5 Delivering Vision Zero is only possible through the critical partnership between TfL, the police and London's boroughs. The Chair of London Councils' Transport and Environment Committee and the Metropolitan Police Service have jointly written the foreword to the document with the Commissioner of TfL.
- 3.6 As part of our long term Vision Zero strategy we are working to galvanise a broad coalition of collective effort across national and London-wide stakeholders,

Members of Parliament, borough leaders, officers and grassroots community groups to address the underlying culture and attitudes to road danger reduction.

4 **New actions in the plan**

- 4.1 The progress report outlines the required new activity to respond to new trends and help reach our Vision Zero target, this is subject to securing the necessary funding to ensure delivery. This includes:
- (a) **Accelerating the roll-out of the 20mph speed limit programme** on TfL roads so that by 2024, 220km of TfL roads would have a 20mph speed limit, up from 80km today and 35km in 2016. The action plan also calls for a joint pilot with Government of a 20mph default speed limit on all residential roads in London.
 - (b) Delivering a significant **increase in speed enforcement** undertaken by the Metropolitan Police Service (MPS) to tackle the risk and harm caused by speeding. This will be done by increasing MPS capacity to enforce up to one million offences by 2024/25, introducing new technology to improve effectiveness of enforcement, rolling out new powers to Police Community Support Officers (PCSOs) so that they can stop speeding vehicles and take enforcement action against drivers and a new roadside mobile camera enforcement team to respond to local community concerns about speeding on residential roads.
 - (c) **Improving safety for people motorcycling.** Working with delivery companies and motorcyclists to understand how to better safeguard people riding motorcycles for work, and developing and piloting a motorcycle safety review tool, tested with stakeholders, to improve safety on corridors with the highest harm.
 - (d) Publishing **analysis showing how deprived communities and some ethnic groups** suffer disproportionate road injuries, and sharing this information with boroughs.
 - (e) **Responding to new trends in road danger;** including increased use of smartphones, driving apps and in-car entertainment systems and more home delivery traffic.
 - (f) A **new communications campaign** to challenge a deep-rooted culture which believes that collisions that lead to deaths and serious injuries on London's roads are inevitable.

List of appendices to this report:

Appendix 1 – Vision Zero Action Plan Progress Report

List of Background Papers:

None.

Contact Officer: Lilli Matson, Chief Safety, Health and Environment Officer
Email: LilliMatson@tfl.gov.uk

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Vision Zero action plan progress report

Our strategy for making London's roads safer for all

Contents

3 Mayor's foreword

4 Joint foreword

5 Setting the scene

6 Introduction

8 Progress so far

11 Understanding the sources of harm

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18 Delivery in partnership

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27 Safe streets

33 Safe vehicles

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50 Working together

53 Our progress

Mayor's foreword

We have made great progress in making our roads safer, but there is more to do achieve our Vision Zero ambition

Every death or serious injury on our streets is devastating, bringing heartache and tragedy to all those involved. I am more determined than ever to achieve Vision Zero and eradicate all loss of life and serious injuries from London's streets by 2041.

Vision Zero challenges us to think differently about the safety of our streets and how we design our road system. While unintended, road collisions result from choices made by individuals, organisations and society and all too often cause death and serious injury. Our response must be to create a safe road system, with every component working together – safe speeds, safe streets, safe vehicles and safe behaviours – so that we can reduce road danger and protect Londoners from harm.

We have made good progress since we launched London's Vision Zero action plan in 2018. London's world-first Direct Vision Standard, which we introduced to reduce lethal blind spots on lorries, is now being enforced on all roads in London, and TfL's ground-breaking bus safety standard is mandating the latest safety technologies and designs on all new buses. Working in partnership with the boroughs, we have delivered 260km of safer, high-quality cycle routes, improved 43 dangerous junctions, delivered more than 100 Low Traffic Neighbourhoods and introduced 322 School Streets, where roads are closed at certain times to traffic to encourage more children to walk, cycle or scoot to school.

While London has made great strides in reducing road danger and outperformed many other UK cities, our journey to zero is far from complete. Tragically, in 2020, 96 people were killed with 2,974 more seriously injured on London's streets. Those at greatest risk of injury are people walking, cycling or using a motorcycle. We also know that where people live, their age, ethnicity and whether they have a disability will also affect their likelihood of injury. We continue to research how road risk varies for certain groups of Londoners, and we will be publishing our findings in 2022 so that we can work with the boroughs, police and other stakeholders to narrow road traffic injury inequalities.

As lowering speeds remains one of the most important things we can do to reduce road danger, we will be accelerating our 20mph speed limit programme on TfL roads so that by 2024, 220km of TfL roads will have a 20mph speed limit. This will be supported by the Metropolitan Police Service Roads and Transport Policing Command, which will be delivering a significant increase in speed enforcement activity over the next two years. We will also be proposing a joint pilot to Government of a 20mph default speed limit on all residential roads in London.

We must not forget the victims of road traffic collisions, those killed or injured on London's streets and the families who are suffering. In the coming months, we will

'We will continue to do all we can to prevent further injuries on our streets, but we can only achieve our ultimate goal of no deaths or serious injuries through collective action'

outline how we will improve the quality and breadth of support available to victims of road traffic collisions in London.

We will continue to do all we can to prevent further injuries on our streets, but we can only achieve our ultimate goal of no



Sadiq Khan
Mayor of London

deaths or serious injuries through collective action. I will continue to work with TfL, the 32 London boroughs, the City of London, and the police and enforcement authorities to put road danger at the heart of all transport related activity so that London can achieve Vision Zero.

Joint foreword

We will continue to work together as we strive to ensure London's roads are safe for everybody

Every death on our roads is tragic and unacceptable. Road risk blights lives, intimidates communities and infringes individual freedom. We know that road danger, and the fear of road danger, is a huge barrier to people walking and cycling – a safer London is a healthier, more active, greener and cleaner London.

The coronavirus pandemic led to a significant fall in travel on our roads, and as a result, 2020 saw a huge reduction in road deaths and serious injuries. However, in a typical year around 4,000 people will be killed or seriously injured on London's streets. We cannot accept these typical years and ignore the toll of death and serious injury on our roads.

As London recovers from the pandemic, we believe this is the right time for TfL, the Metropolitan Police Service (MPS) and London's boroughs to renew their commitment to place Vision Zero at the heart of what we do.

The MPS Roads and Transport Policing Command, jointly funded by TfL and the MPS, is one of the UK's largest policing commands and is dedicated to ensuring all journeys on the roads and surface transport are safe, secure and reliable. The command has the lead policing responsibility for road danger reduction in London and focuses its efforts on tackling the vehicles, drivers

and road user behaviours that cause the greatest risk on the roads.

Around 70 per cent of deaths and serious injuries in London take place on borough roads, so the strategic partnership between TfL, the police and London's boroughs is the foundation of our approach to achieving Vision Zero.

Boroughs, as the legal Highway Authorities for their streets and with key duties around land use, public health, education and more, have a wide range of powers and are well placed to take action. Combined with their unique relationship with local residents, communities and businesses, boroughs have not just the opportunity but also the insights to respond to the Mayor's Transport Strategy Vision Zero goal in ways that are optimal for the areas they serve.

We applaud the hard work by boroughs over many years to reduce road risk in their areas and to lead the way with key interventions such as area wide 20mph limits and School Streets. The scope of this ambition and the embracing of Vision Zero is very clear in many borough Local Implementation Plans. While each borough is unique, there is a core set of actions pioneered by the most ambitious that all boroughs can take to reduce the impact of road risk and the toll of road deaths and injury to their residents:

- Lowering speed limits to 20mph
- Reducing traffic on local streets for safer, greener roads to protect children and people walking and cycling
- Designing streets with safety in mind, to help everyone get around safely and make active travel attractive
- Promoting and encouraging ways to travel that pose less risk to other people on the roads
- Leading by example in committing to eliminating casualties on our streets, through supply chains and fleets

We are proud of what we have delivered together so far. We must jointly continue to enhance our approach and intensify our efforts to reduce road danger. We are committed to making London's roads safer, supporting London's green recovery and ensuring that TfL, the MPS and all of London's boroughs play a full part in achieving Vision Zero.



Andy Byford
London's Transport Commissioner



Cressida Dick
Commissioner of the
Metropolitan Police Service

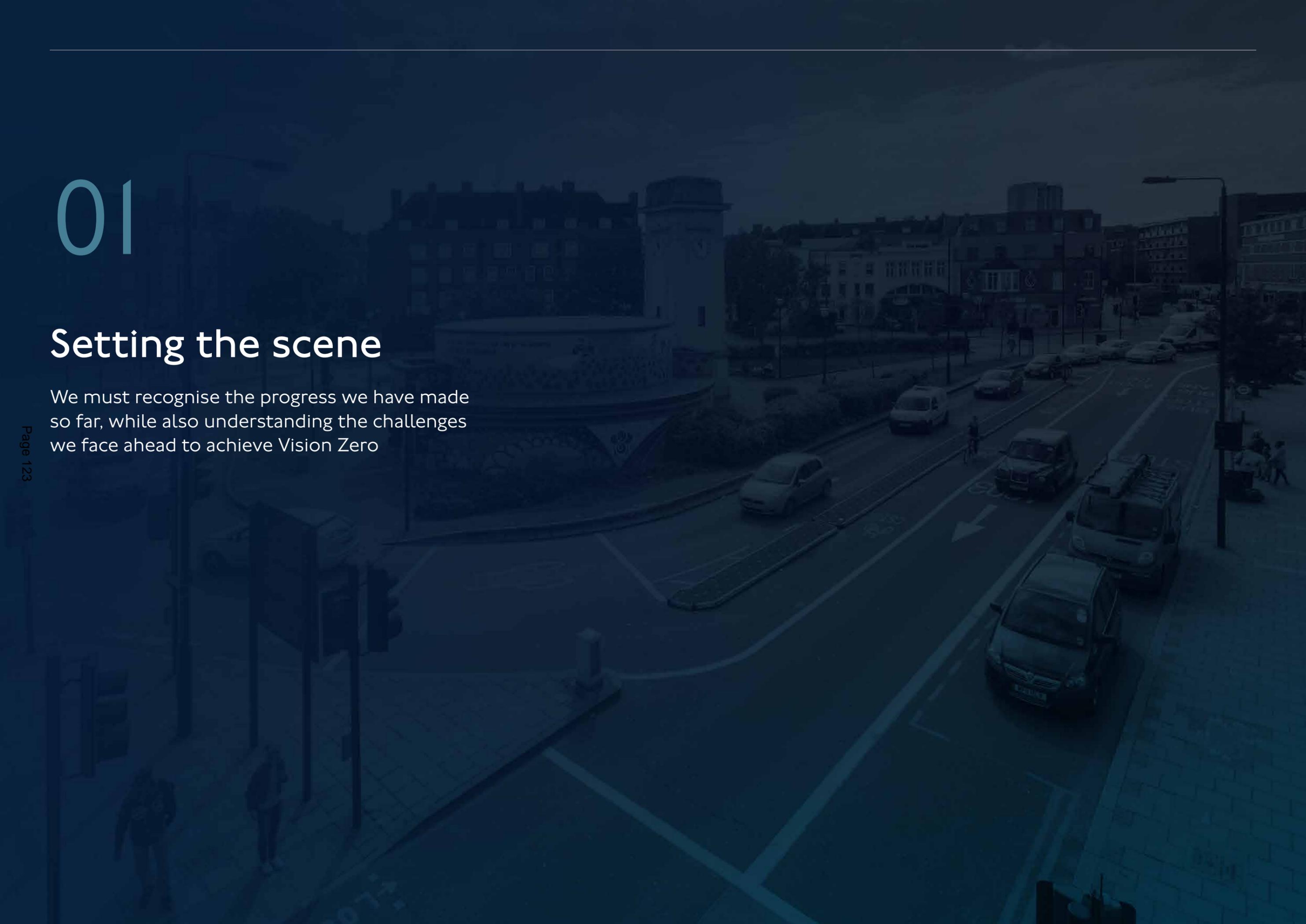


Mayor Philip Glanville
Chair of London Councils Transport
and Environment Committee and
Mayor of the London Borough of Hackney

01

Setting the scene

We must recognise the progress we have made so far, while also understanding the challenges we face ahead to achieve Vision Zero



Introduction

The safety of London’s streets has long been a focus for the London boroughs, the police, TfL and our predecessors

The publication of the Mayor’s Transport Strategy and Vision Zero action plan in 2018 marked a bold commitment to go even further and to aim to eliminate deaths and serious injuries from the transport network. This introduced the Safe Systems framework and set out an ambitious programme of activity reduce road danger.

Three years on, we are halfway through the timespan covered by the action plan. This document supplements the 2018 plan and reaffirms our commitment to Vision Zero, celebrates what has been achieved across London, while also sharing the latest insight and understanding.

Using an evidence-based approach to reduce death and injury generated good progress in a number of areas. For example, the number of people killed on, or by, a London bus has reduced by 77 per cent compared with the 2005-09 baseline.

No death on London’s roads is acceptable or inevitable. Road collisions, while they are unintended, are the result of choices made by individuals, organisations and society. Fear of road danger creates a barrier to active travel and curtails the freedom and choices of millions of Londoners. All too often, collisions result in deaths and serious injuries, which have devastating

effects on families, causing immense grief and changing lives forever. Those who survive collisions may suffer severe and life-changing injuries, as well as lasting emotional trauma.

The Mayor’s Vision Zero objective is to reduce road deaths and serious injuries by 65 per cent by 2022, 70 per cent by 2030 and for all deaths and serious injuries from road collisions to be eliminated from London’s streets by 2041. This is the foundation of the city we want to build that is inclusive to all, responds to the climate crisis and is a great place to live. While this is an ambitious goal, we have seen examples that prove it is possible when looking at Oslo and Helsinki’s achievement of zero road deaths in 2019.

Tackling road danger is integral to a Healthy Streets approach. Healthy Streets put human health and experience at the heart of city planning and help people use cars less and walk, cycle and use public transport more. By making our streets human-centred, pleasant, safe and attractive we will create streets where people want to make healthy lifestyle choices, reduce carbon emissions and help clean up London’s air. Each piece of the puzzle helps to enable the other.

The associated benefits of our Vision Zero ambition

Mode shift away from private vehicles

Reduced dominance of motor traffic



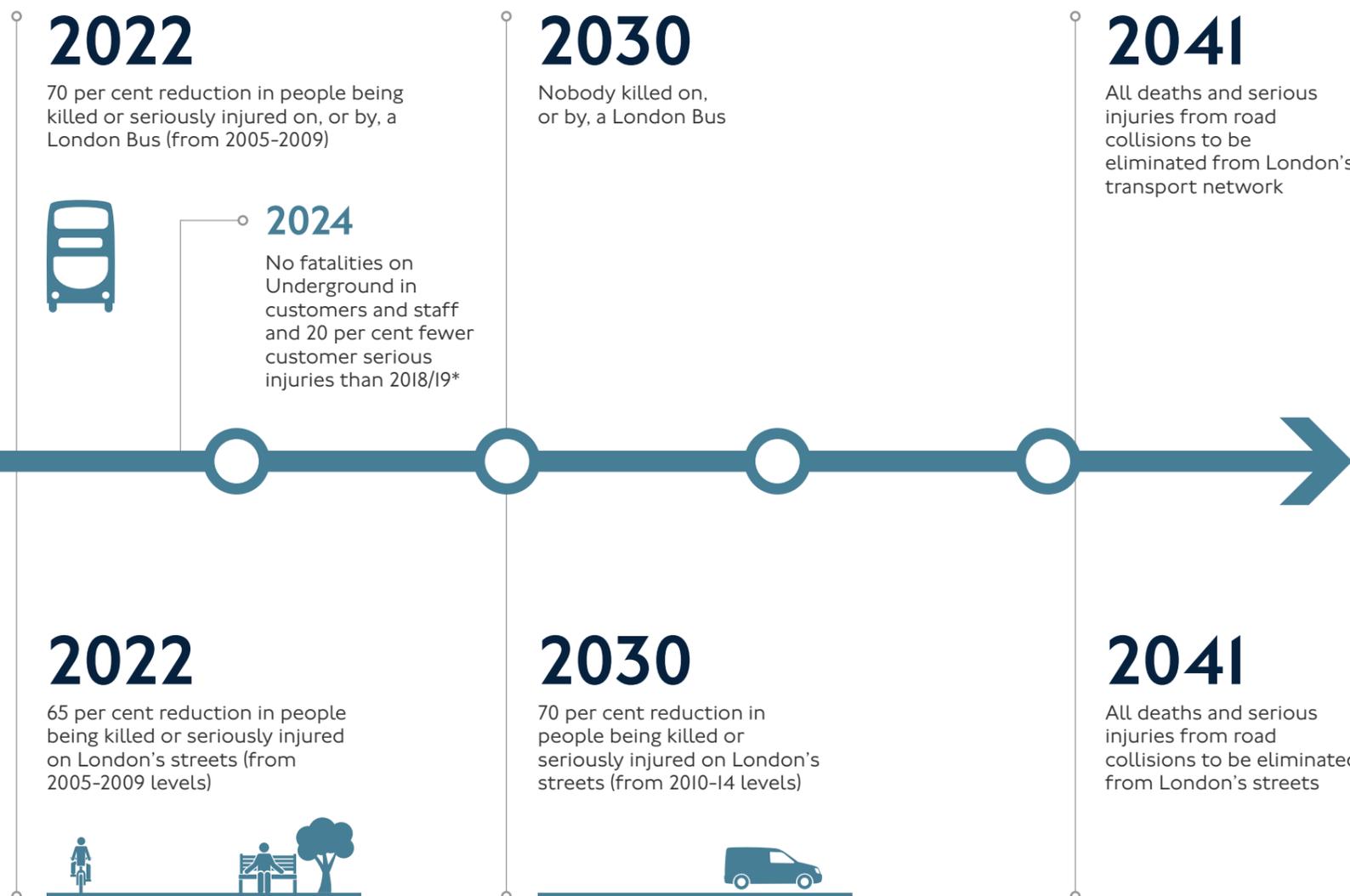
Improved air quality

Vision Zero

Zero carbon

Active travel

Mayoral targets in achieving Vision Zero



We began our Vision Zero journey by focusing on reducing road risk, but our commitment is that nobody should be harmed while travelling on any mode of transport, or while working to deliver transport services in London. That is why we have adopted zero harm for the public and our staff as our ambition for London's roads, public transport, and all of our capital delivery and maintenance works.

All the activity set out in this plan is dependent on continued funding to achieve our long-term vision and enable us to continue to innovate to improve road safety in London and beyond. Following the impact of the pandemic on our income and finances, we are working with Government to seek a stable long-term funding agreement that will support continued investment in reducing road danger.

Zero harm



is our ambition that no customer, staff or supplier should be harmed while travelling or working on our services

Progress so far

The number of people being killed or seriously injured while travelling has fallen, but there is more for us to do

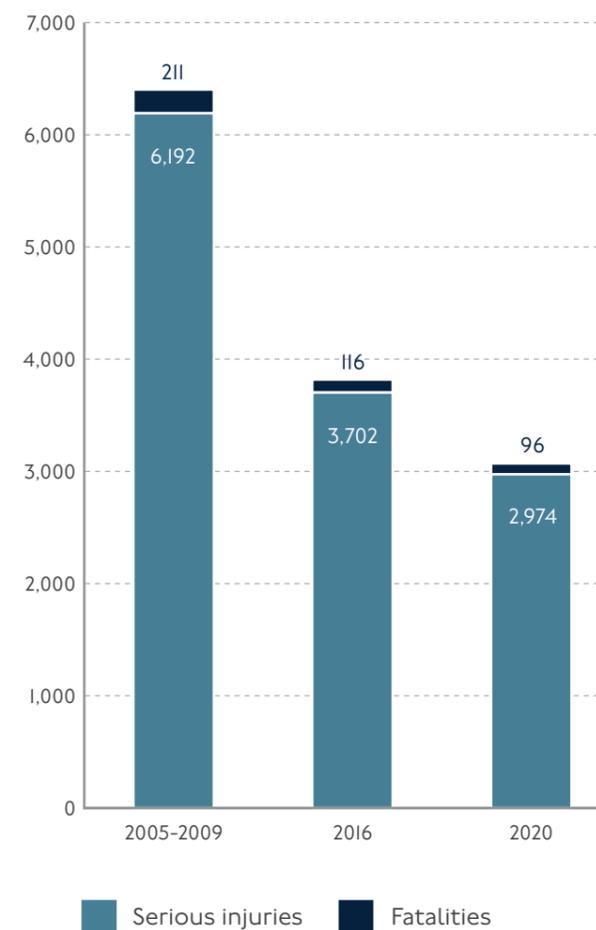
By 2019, London reduced the number of people being killed or seriously injured by 39 per cent against the 2005-09 baseline. In 2020, under pandemic road conditions, this reduction reached 52 per cent.

The reduction in harm is a direct response to the evidence-based approach taken by the London boroughs, police and us to directly tackle the sources of harm to road users. This includes lowering speeds, improving street engineering, targeting enforcement and progressively using technology to make vehicles safer, as well as all the other evidence-based activity outlined in this plan.

The particularly steep reduction in casualties between 2019 and 2020 was largely due to the radical changes in travel patterns caused by the exceptional circumstances of the pandemic.

London has made good progress, especially in reducing harm to children and people travelling by bus. Action on road safety has made London's streets progressively safer for our children. The number of under-16s killed or seriously injured on London's roads dropped by 65 per cent in 2019 against the 2005-09 baseline.

Fatal and serious injuries in London (number of people)*

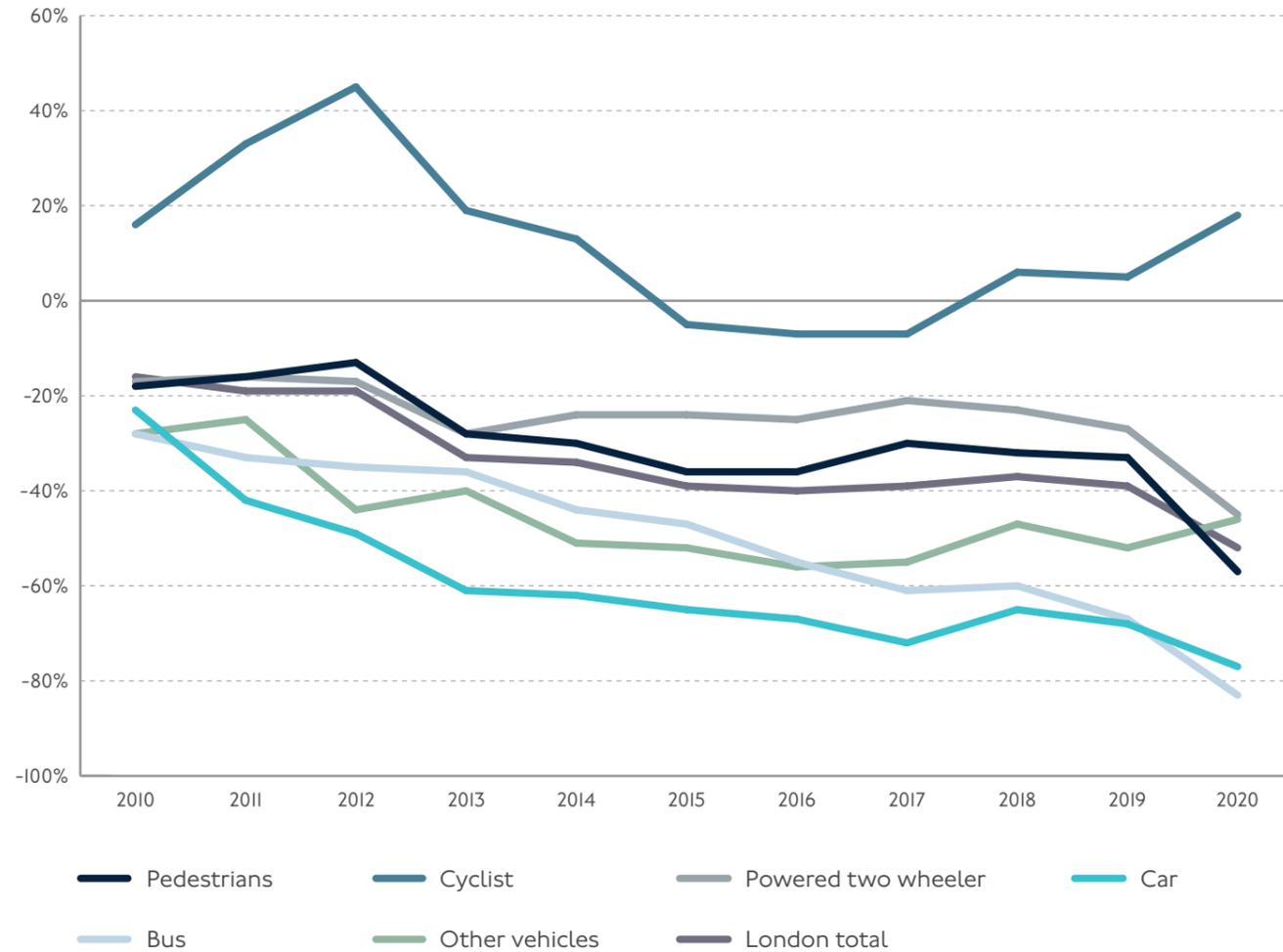


* Data for 2005-09 and 2016 has been backcast for comparison. In 2016, the MPS changed the way it records collision information, which almost doubled the number of serious casualties reported.



We introduced new road layouts in response to the pandemic

Number of people killed or seriously injured against the 2005-09 baseline (absolute number)

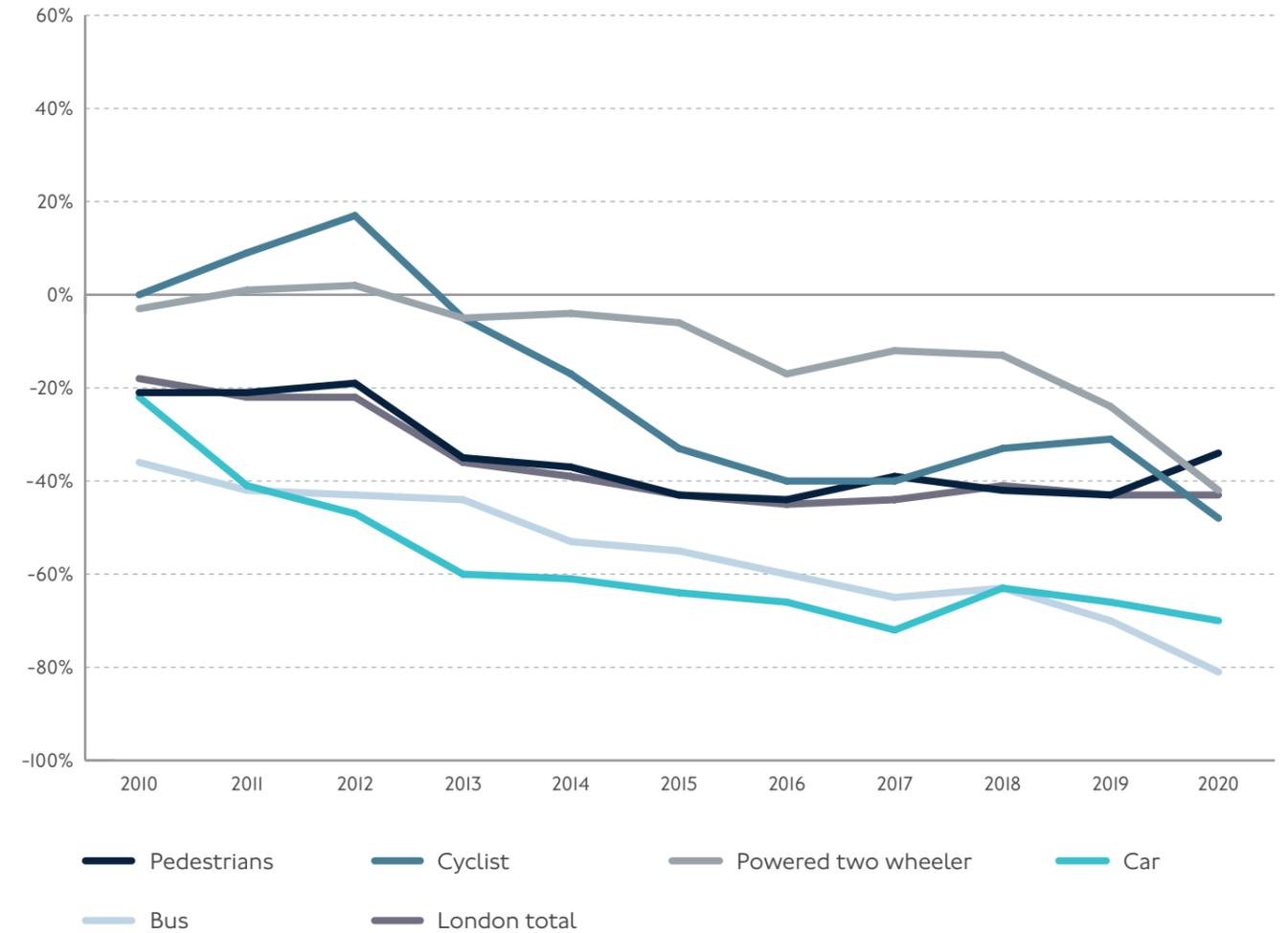


Buses are the safest way to travel on the roads and carry more people than any other public transport mode. Our world-leading Bus Safety Programme is achieving the greatest reduction in people killed or seriously injured per journey of any mode on the roads, with 77 per cent fewer people killed or seriously injured on, or by, a bus than in 2005-09 by the end of 2020. This shows the power of using evidence-

based approaches to pinpoint how we can tackle danger on our roads. However, more progress is needed to make our roads safer, especially for people walking, cycling or riding motorcycles.

London has become safer for people walking and cycling in the past 10 to 15 years. The risk of being killed or seriously injured per journey has fallen for people

Number of people killed or seriously injured against the 2005-09 baseline (rate per million journeys)



walking and cycling. However, we have further to go. Together, people walking, cycling and riding motorcycles account for around 80 per cent of people killed or seriously injured on London's roads.

By 2019, the number of people killed or seriously injured while walking had fallen by a third since the baseline. During the pandemic in 2020, 36 per cent fewer people

were killed or seriously injured while walking than in 2019, with the greatest reducing in central London. This was largely driven by the change in travel patterns during the pandemic, with significant falls in people visiting and walking in the city centre. As we recover, our Streetspace for London schemes are vital to help safeguard everyone using our roads.



We have introduced a range of measures to make cycling safer

Tragically, six people were killed and 862 were seriously injured while cycling in 2020, a 12 per cent increase from 2019. This is largely due to the fact that many more people chose to cycle, and over longer distances, with the Department for Transport (DfT) estimating that cycling kilometres in London increased by 46 per cent during the year.

Although absolute numbers of cyclist casualties have increased, the number of people killed or seriously injured per cycling journey, which is measured as the risk, has fallen by almost a third since the 2005-09 baseline and by 24 per cent between 2019 and 2020. This means that as levels of cycling reached record highs, the risk to people cycling reached a record low. Where those cycle trips replaced journeys that would otherwise have been made by car, risk to other road users was also reduced.

People riding motorcycles, including mopeds and scooters, make up only three per cent of vehicle kilometres, but account for 32 per cent of people killed in London in 2020. There were 31 people killed while riding a motorcycle in 2020, which is the same as in 2019. However, serious injuries fell by a quarter. Someone travelling by motorcycle is 80 times more likely to be killed or seriously injured than someone travelling in a car.

The food delivery industry has more than doubled since the beginning of 2020, which has led to a rise in new registrations of small engine scooters. The increase in people riding for work highlights the need to tackle longstanding poor safety outcomes for people riding motorcycles, but also offers the opportunity to partner with responsible companies to promote safer driving for work.

People from deprived backgrounds are twice as likely to be injured in a road traffic collision as those from the least deprived areas, and Black people are 2.3 times more likely to be killed or seriously injured on London's roads than White people. The risk of children aged from four to 15 and living in deprived areas of being killed or seriously injured for is nearly three times higher than for their peers in the least deprived areas.

While data on disability is not reliably collected in police collision statistics, the National Travel Survey from 2018 reported that disabled pedestrians are four times more likely to be injured by a motor vehicle than non-disabled people. These statistics show the importance of closer scrutiny of the collision data, and the need to use it to guide safety interventions to reduce inequality of road harm.

Understanding the sources of harm

Conflict with faster moving or larger vehicles puts people using London's streets at greatest risk

The reality of large, heavy vehicles mixing with pedestrians and cyclists on London's streets, means that these vehicles pose a particular threat.

We are working to reduce this risk by introducing the Direct Vision Standard, which requires safety features on the vehicles, as well as further work to provide protected street space for people walking and cycling. Enforcement is important here too. London's Freight Enforcement Partnership – a partnership between the MPS, City of London Police, the Driver and Vehicle Standards Agency and us – continues to target and remove the most dangerous freight vehicles from our roads.

People riding motorcycles are disproportionately likely to be involved in a collision that kills or seriously injures someone walking or cycling per journey.

In 2020, cars were involved in 69 per cent of collisions where someone was killed or seriously injured, most of whom were walking, cycling or riding a motorbike, according to a report by Findings journal in 2021. Where measures such as Low Traffic Neighbourhoods have been introduced, road traffic injuries have halved relative

to the rest of London. This shows the importance of measures to reduce the volume of motorised traffic and the dominance of vehicles in areas where people live, work and play.

Human errors and risky behaviours

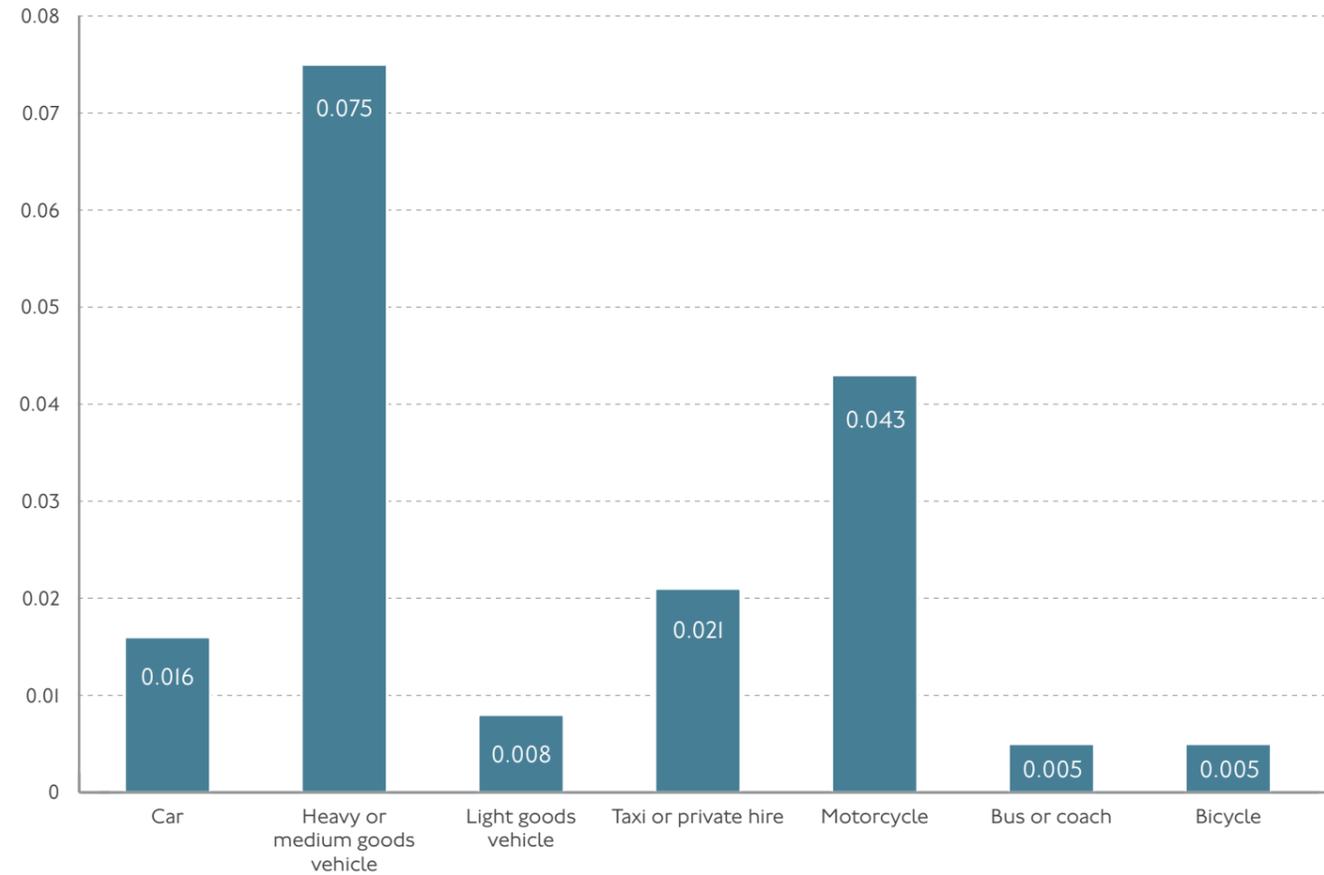
More than 90 per cent of all factors contributing to collisions in London are caused by five behaviours: speed, risky manoeuvres, distraction, drink/drug driving, and vehicle and driver non-compliance. Speed is the single biggest factor in collisions that result in death or serious injury. The police reported speed as a contributory factor in almost half of fatal collisions in 2020.

We need to challenge the acceptability of risk-taking while behind the wheel, with 87 per cent of Londoners believing that collisions on the road are inevitable, not the result of choices people make. This highlights the scale of the challenge we face as a city as we work towards our Vision Zero goal. Key to success will be to widen the understanding of the need for a safer culture of road user behaviour.



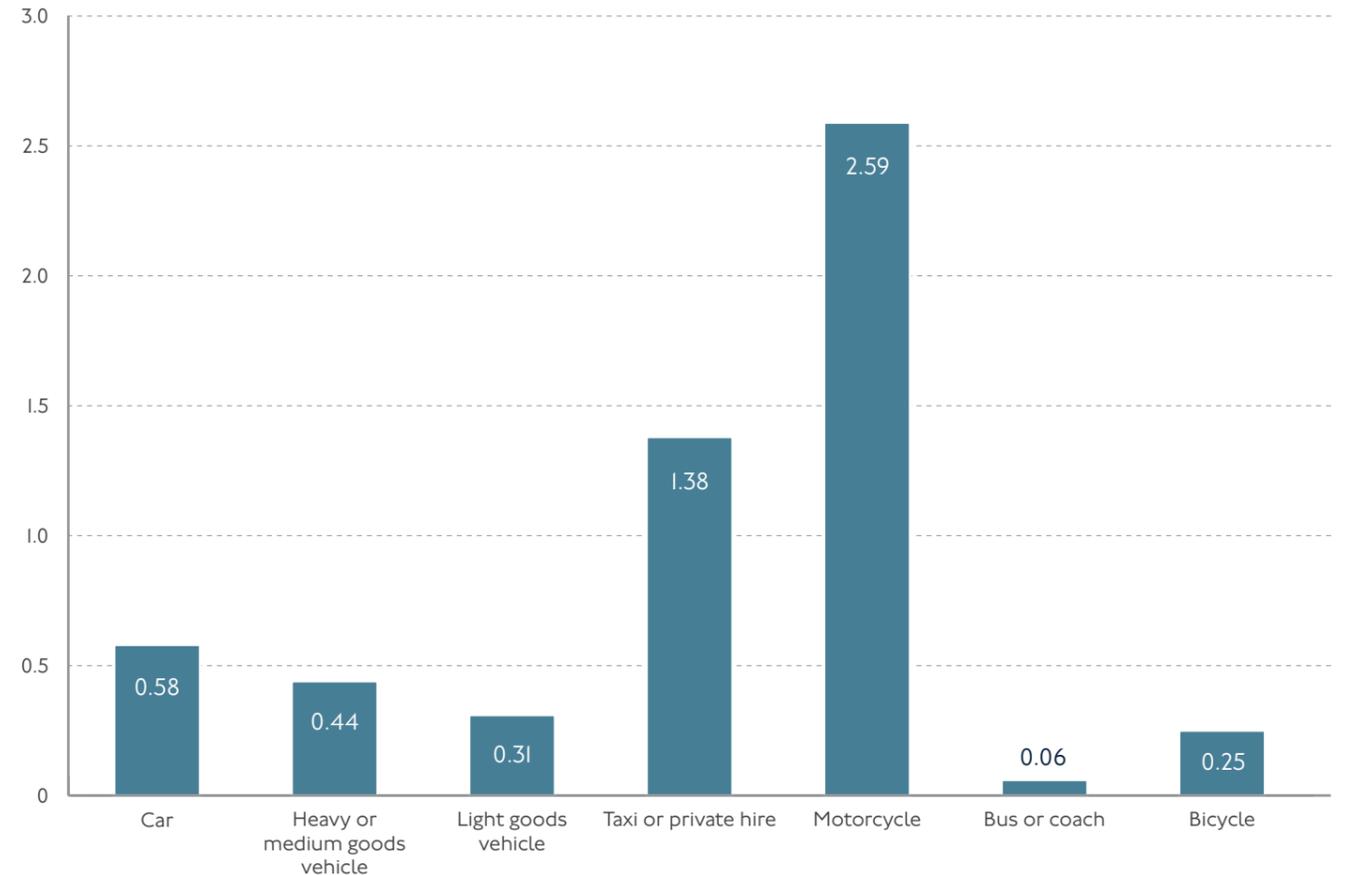
Larger vehicles pose a particular threat to other road users

Type of vehicle involved in collisions that kill another road user
(Estimated number of deaths per million journeys, 2018-2020)



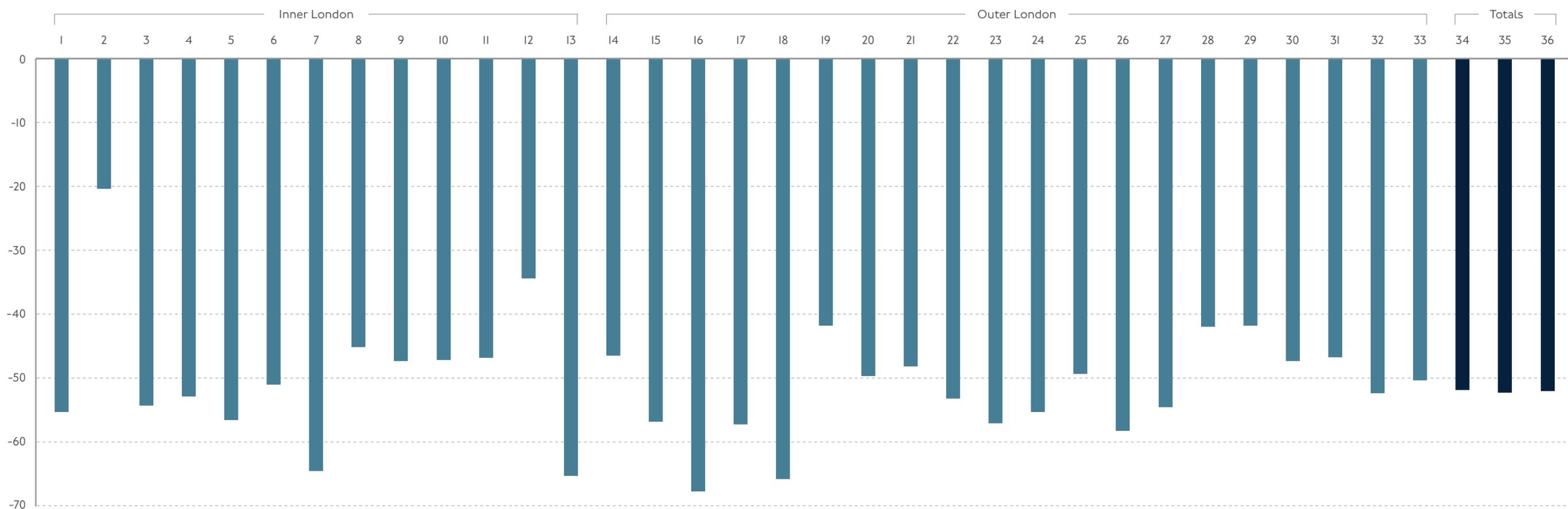
Heavy goods vehicles were involved in 14 per cent of collisions that resulted in a person being killed in 2020, despite making up just three per cent of traffic. The reality of large, heavy vehicles mixing with pedestrians and cyclists on London's streets, means that these vehicles pose a particular threat.

Type of vehicle involved in collisions that kill or seriously injure another road user
(Estimated number of deaths or serious injuries per million journeys, 2018-2020)



People riding motorcycles are disproportionately likely to be involved in a collision that kills or seriously injures someone walking or cycling per journey. Between 2019 and 2020, 344 people walking or cycling were killed or seriously injured in a collision involving a motorcycle.

Change in the number of people killed or seriously injured in 2020 compared to the 2005-09 baseline (per cent)



- I. Camden
- II. Tower Hamlets
- 21. Ealing
- 31. Richmond
- 2. City of London
- 12. Wandsworth
- 22. Enfield
- 32. Sutton
- 3. Greenwich
- 13. Westminster
- 23. Haringey
- 33. Waltham Forest
- 4. Hackney
- 14. Barking and Dagenham
- 24. Harrow
- 34. Inner total
- 5. Hammersmith and Fulham
- 15. Barnet
- 25. Havering
- 35. Outer total
- 6. Islington
- 16. Bexley
- 26. Hillingdon
- 36. London
- 7. Kensington & Chelsea
- 17. Brent
- 27. Hounslow
- 8. Lambeth
- 18. Bromley
- 28. Kingston
- 9. Lewisham
- 19. Croydon
- 29. Merton
- 10. Southwark
- 20. Newham
- 30. Redbridge

Emerging road safety trends

Progress in road danger reduction is slowing across many cities around the world. While London reduced the number of people being killed or seriously injured by 21 per cent during 2020 compared to 2019, the longer-term trend shows more modest improvement. Other cities internationally are facing the same challenge. To keep our momentum, it is important for us to respond to new risks.

The volume of motorised traffic in London remains high and is not falling. The number of car journeys was stable between 2018 and 2019. Motorcycle journeys increased by eight per cent between 2018 and 2019 and private hire vehicles almost doubled between 2008/09 and 2019/20. Some of this traffic may be using residential roads that are not designed to carry high volumes. More than 300 neighbourhoods in London recorded at least double the number of walking and cycling casualties, which includes deaths, serious and slight injuries, between 2016 and 2018 compared to 2007-09. More than 30 neighbourhoods recorded at least five times the number of walking and cycling casualties.

Driving for work

People driving for work are involved in 57 per cent of deaths and serious injuries on London's roads, where the journey purpose is known. A significant number of people drive for work, with 6.2 billion goods vehicle miles driven on London's roads in 2020. This does not include mileage by taxis, private hire vehicles, motorcycles or bicycles used for work. The pivot to

online shopping, the growth of the food delivery economy, and the rise in private hire vehicles has all contributed to this. The pandemic led to a 20 to 30 per cent increase in home deliveries. A study by the University of Leeds suggests this trend will persist, with Londoners more likely to continue shopping online than respondents from other cities.

Driving and riding for work involves additional pressures. Fatigue, time pressures and driving or riding on unfamiliar roads all carry with them the potential to increase the risk of a collision. At the same time, driving for work does not experience as much scrutiny or regulation as other aspects of health and safety management, with voluntary initiatives such as the Freight Operator Recognition Scheme and Driving for Better Business filling the legislative gap.

Vehicles driven for work tend to be larger, heavier and have fewer safety features. As online shopping has boomed, so has van traffic, with a 29 per cent increase in vans crossing the London boundary cordon between 2001 and 2019. Many vans are not fitted with the safety technologies as standard that are common in the car fleet, such as autonomous emergency braking, lane keep assist and passenger air bags.

The combination of more journeys for work, pressure on drivers, poor regulation, and higher risk vehicles are a concerning trend. We need to continue to partner with the industry and with Government to address this.



The number of home deliveries increased during the pandemic



Our rental trial is designed to help tackle illegal private e-scooters

Fewer people were killed or seriously injured across all modes in 2020, compared to 2019, except for cyclists and the 'other vehicles' category, which includes e-scooters among other rarer vehicle types.

The number of kilometres cycled has increased and the risk of injury per kilometre has decreased since the baseline. The rise in active travel is a positive development, but until we reduce the number of motorised vehicles colliding with cyclists, the increase in people cycling is likely to lead to an overall increase in cyclist casualties in London.

Increased motorcycle traffic, due in part to the food delivery economy doubling in size between 2019 and 2020, risks leading to more deaths and serious injuries of people riding motorcycles. People using

motorcycles are the most at risk of any mode on London's roads.

Illegal e-scooters

The number of small, lightweight vehicles, such as e-scooters, started to grow before the pandemic, despite being illegal and uninsured for private use on public highways. In 2019, there was the first reported fatality of a person riding an e-scooter, and, as of August 2021, three people have been killed while riding an e-scooter in 2021.

Illegal e-scooter use increased significantly during the pandemic, resulting in an estimated 250 people injured in collisions involving an e-scooter in 2020, compared to 40 people in 2019, an increase of more than 600 per cent. This shows the importance of our e-scooter rental trial, to understand

how these vehicles can be integrated safely into London's roads, and the efforts of the police to crack down on illegal scooters, which are often ridden in dangerous ways and at high speeds. Private e-scooters do not have the same safety measures as those used in our trial. More than 2,500 e-scooters were seized between January and August 2021, with riders receiving fines and points on their licence.

Slow developments in car safety

Advancements in vehicle technology has been slower than anticipated. Available technologies such as Intelligent Speed Assistance, alcolocks and pedestrian Advanced Emergency Braking Systems are often available only in premium vehicles. Although progress has been made, the level of technology adoption in the vehicle fleet has not been as great as expected.

Cars have been getting steadily larger in London, meaning more kinetic energy and greater harm to vulnerable road users involved in collisions. Provisional estimates for 2020 show that around one in five cars involved in collisions were large sports utility vehicles.

Smartphones, driving apps and in-car entertainment systems mean drivers are increasingly at risk of distraction, and phone use underpins much of the delivery economy. Between the baseline and 2020, the proportions of collisions where a driver or rider was using a mobile phone more than doubled, and this is likely to even be an underestimate.

Sources of road danger

All the factors outlined so far show the scale and difficulty of the challenge we face in our goal of achieving Vision Zero

While many of these challenges are new or changing, they do not change our strategic approach. At the core of our strategy is a commitment to tackle road risk at source.

We welcome the Government's support for this approach and the intention to update the Highway Code to include a hierarchy of responsibility that makes it clear that those road users who can do the greatest harm have the greatest responsibility to reduce the danger or threat they may pose to other road users.

In particular, our priorities are:

- Reducing the volume of motorised traffic, particularly in residential areas and where walking and cycling activity is concentrated
- Reducing the likelihood and severity of collisions by lowering vehicle speeds
- Focusing action on the most dangerous locations, particularly junctions
- Reducing the danger posed by the vehicles with the greatest risk
- Reducing dangerous behaviours to better protect people when they are most at risk, such as walking, cycling or riding a motorcycle
- Prioritise road safety investment to help reduce the gap in road safety outcomes in areas of high deprivation, inequality and vulnerability

80%

long-term target for all journeys made by walking, cycling and public transport



63%

of journeys are currently made by walking, cycling and public transport



We are prioritising areas where walking and cycling is concentrated

Delivering and progressing the plan

The Vision Zero action plan describes our Safe System approach to road danger reduction. London is on a journey to reduce reliance on motorised vehicles and to enhance the opportunity to travel by sustainable modes.

We have a long-term target to increase the proportion of journeys made by walking, cycling and public transport to 80 per cent of journeys, from the current rate of around 63 per cent. This shift away from private vehicles to other modes will cut the risk we all face. Where vehicle use is essential, the Safe System approach responds to the risk that those vehicles pose to Londoners.

Safe System approach

The internationally recognised Safe System approach follows these principles:

- People make mistakes, so our transport system needs to accommodate human error and unpredictability
- There are physical limits to the kinetic energy that the human body can tolerate. Our transport system needs to be forgiving, so that the forces involved in a collision are not sufficient to cause fatal or serious injury
- All those with a role in designing, building, operating, managing, enforcing and using our streets have a responsibility to reduce danger



Safe speeds

Lowering traffic speeds where vehicles and people are likely to mix reduces the likelihood and severity of collisions. It also makes our streets less dominated by motor vehicles, more attractive for walking and cycling and reduces noise, pollution and carbon emissions.



Safe streets

Reducing danger at locations where the likelihood of injury is higher than in other places is key to making people feel safe on our streets.



Safe vehicles

Reducing the dominance of vehicles not only means reducing the use of motor vehicles, but also reducing the danger they pose and ensuring they are designed as safely as possible.



Safe behaviours

Encouraging all road users to travel safely and fostering a culture of respect, while at the same time retaining a strong focus on enforcement action against criminal and antisocial road user behaviour.



Post-collision response

Understanding the causes of collisions is fundamental to preventing their reoccurrence. There is strong evidence that reducing motorised traffic, in combination with other safe systems can dramatically reduce risk and casualties.

Delivery in partnership

We will continue to work with our partners, suppliers and Government as we pursue our long-term ambitions

Building the London we all want can only be achieved in partnership. This includes the boroughs, who deliver inspiring and innovative improvements for their communities; the police, with whom we have a unique collaboration to improve the safety and security of London's roads; and businesses and organisations, who shape what we do and help to keep us on track.

140km

of our roads will be considered for lower speed limits



63%

of journeys are currently made by walking, cycling or using public transport



We must work together to ensure our roads are safe for all users



Focus on: An achievable ambition

Oslo and Helsinki are proof of what can be achieved in the pursuit of Vision Zero, with nobody being killed on the roads in either city in 2019. In 2020, no one was killed on the roads in Helsinki, and just one person was killed in Oslo.

Both cities dramatically reduced the number of people killed on their roads by reducing the dominance and speed of motorised traffic.

Oslo has worked towards a 'Car-free City Life' since 2015, disincentivising vehicle

use and encouraging walking, cycling and public transport. To do this, they gradually reduced the number of cars that were driving in the city by lowering speeds, reducing parking, implementing cycle lanes, pedestrian infrastructure, and closing roads to motor traffic.

Helsinki has created positive change by consistently lowering speeds since 1970, and prioritising pedestrians and active travel through transport planning. The city has implemented a wide range of elevated crossings, roundabouts, pedestrian islands,

speed bumps and narrowed roadways to ensure vehicle speeds are low and that people walking, cycling and taking public transport are the focus of safety-conscious road layouts.

London is much bigger, more complex and more diverse than either of these cities, but they provide us valuable lessons on effective road danger reduction and offer the example of what can be achieved with sustained effort and investment.

'London is much bigger, more complex and more diverse than either of these cities, but they provide us valuable lessons on effective road danger reduction'

Lilli Matson
Chief Safety, Health and
Environment Officer

02

Safe speeds

The speed at which a vehicle travels is a major factor in the level of danger it poses to other road users and the occupants themselves



20

Lowering speeds is essential to achieve Vision Zero

The speed at which people are driving or riding is the single most important determinant of both the likelihood and severity of a collision. Excess speed was a factor in half of fatal collisions in 2020. The faster a person is driving, the less time they have to react to avoid a collision. If a pedestrian is hit by a vehicle at 20mph, they are five times less likely to be killed than if they are hit at 30mph.

Our achievements

Lowering speeds

Nearly half of London's roads now have a 20mph speed limit. Our commitment to lower speeds means we have now reduced the speed limit on all of our roads within the central London Congestion Charging zone to 20mph. We have worked with the boroughs to deliver 20mph speed limits in nine town centres, including Whitechapel, Archway and Brixton, creating calmer, more inviting streets.

The pandemic has significantly disrupted travel patterns making it difficult to measure the direct impact of lower speeds in London over the past 18 months. We will continue to monitor speed compliance and the impact on the numbers of people killed and seriously injured as London recovers.

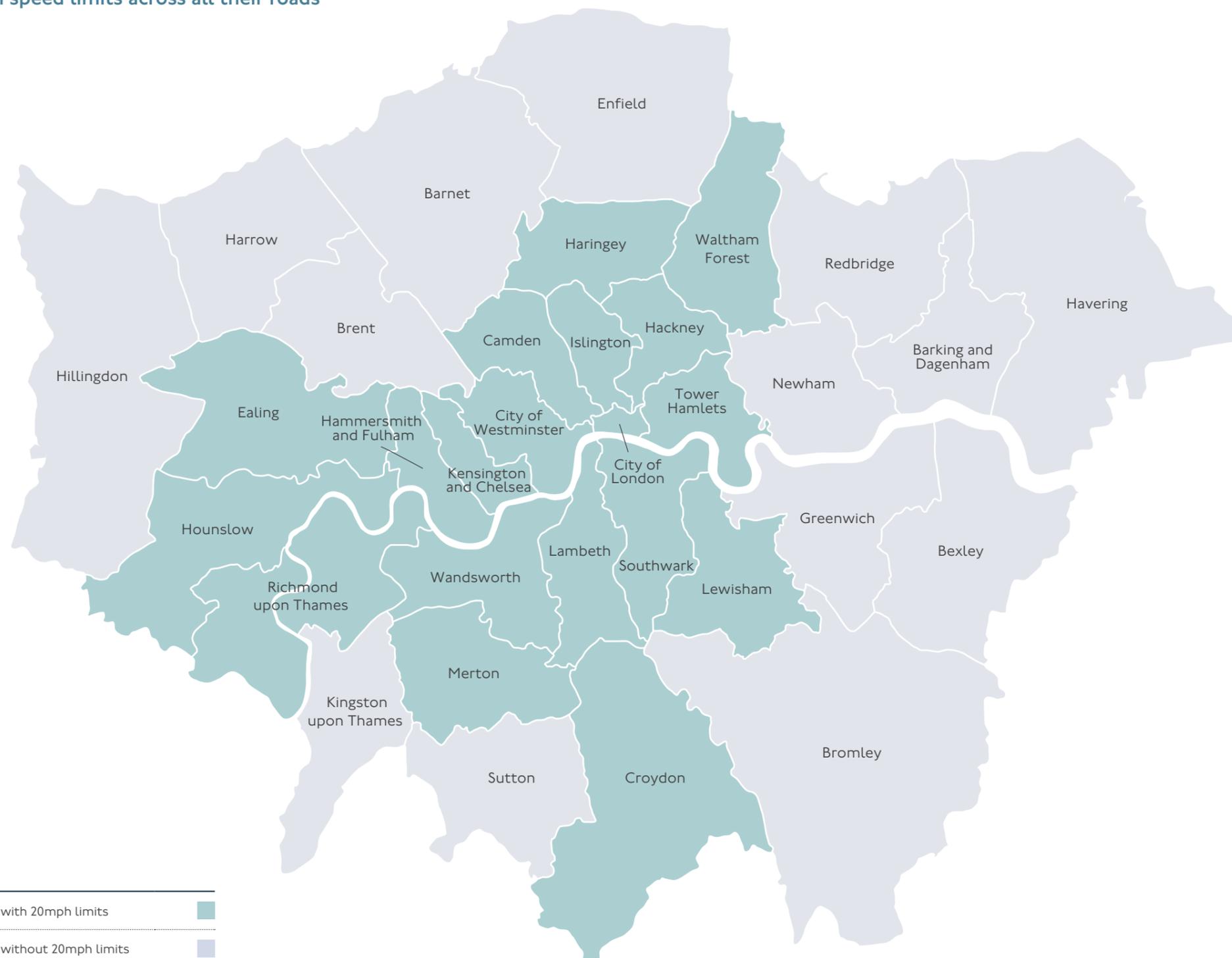
Working with the boroughs and communities

London's boroughs continue to lead the way in reducing speed limits, with Kensington & Chelsea, Westminster and Wandsworth the most recent to bring forward proposals to have 20mph limits on their roads. The City of London and 18 of the 32 boroughs have now committed to implement 20mph across all their roads.



Lower speed limits will help keep all road users safe

Boroughs that have committed to implement 20mph speed limits across all their roads



Key

| | |
|-------------------------------|--|
| Boroughs with 20mph limits | |
| Boroughs without 20mph limits | |

Reducing speeds and imposing a default 20mph limit is the single most impactful thing we can do to reduce the risk of people being killed and seriously injured on our roads. The TfL Lower Speeds Toolkit is available on our website for anyone seeking to make London's streets safer, healthier and more attractive for walking and cycling.

In 2020, we implemented a process for London Boroughs to request police speed enforcement to deal with issues on local residential roads and community concern. This is in addition to deployments based on data analysis of risk, harm and levels of non-compliance.

19
of the 33 London boroughs now have 20mph limits across their roads

80km
of 20mph speed limits on our roads across London



Focus on: Lower speed limits in Westminster

In March 2020, we introduced 20mph speed limits on all our roads in the central London Congestion Charging zone, completing the first lowering speeds action in the Vision Zero action plan. This is a significant step towards reducing the likelihood of and severity of collisions in London, with nine kilometres of lower speed limits delivered on our roads.

We are working to deliver the next action from the plan by implementing

the Londonwide Lowering Speed Limits programme. This stage looks to reduce the speed limit on a further 140km of our roads by 2024.

Excellent progress has been made to develop the designs for more than 25km of roads and corridors prioritised for 2021/22 delivery. We are developing our plans in close partnership with Westminster Council and its Lowering Speed Limits City of Westminster project. This project will

see 20mph introduced on our remaining roads in Westminster and have a permanent 30mph limit on the A40 Westway.

Other 20mph projects include the A23 corridor in Croydon, A13 corridor in Tower Hamlets, A107 corridor in Hackney and the A10 to A503 corridors in Haringey. Working with the boroughs, we plan to deliver these projects by the end of 2021, with Westminster to follow in early 2022, subject to funding.

‘Westminster City Council is committed to making our streets safer, cleaner and healthier for everyone, which is why we introduced a 20mph limit on Westminster’s roads. Slowing down traffic speed reduces the severity of collisions and makes it safer for people to walk and cycle in the city’

Councillor James Spencer
Cabinet Member for City Management, Westminster City Council



The police provide a highly visible deterrent to prevent speeding

We continue to support community responses to speeding with Community Roadwatch and Junior Roadwatch schemes. Community Roadwatch gives residents the opportunity to work side-by-side with their local police teams and use speed detection equipment to identify speeding vehicles in their communities. Warning letters are issued to speeding drivers and the data informs future police action and deployments. Since its launch in 2017, more than 4,000 sessions have been held and more than 100,000 drivers have been caught speeding. Our research shows that a fifth of Londoners are aware of Community Roadwatch, and more than half of those think it's effective, rising to almost three quarters among those who have children in the household.

Marketing support

In 2019, we launched the 'Watch Your Speed' campaign, which aimed to change drivers speeding habits by making them think about the impact their behaviour has on their passengers, whether they be friends or family. This campaign has been running ever since.

Awareness of our Vision Zero advertising rose from 31 per cent for the previous campaign to 44 per cent for Watch Your Speed. Research showed that the emotional impact of our advertising performed above industry average.

Police support

Enforcement has a critical role in challenging the culture of those drivers who think speeding is a victimless crime. Speed enforcement in London is currently done by the police using a combination of on-street officers, fixed-site digital cameras and mobile speed enforcement vans. Fines from speed enforcement go to the Treasury, while any income from speed awareness courses goes to covering the cost of speed enforcement.

In 2020/21, the MPS enforced more than 280,000 speeding and red light offences through on-street and safety camera enforcement activity. This is an increase of over 60 per cent on 2018/19 when our first Vision Zero action plan was published. Around two thirds of all speed enforcement undertaken by the MPS is in areas with 20mph and 30mph limits.

280,000

speeding and red light offences enforced through on-street and safety camera enforcement activity





Focus on: Lowering speeds outside our schools

The London Borough of Croydon's first Junior Roadwatch session in 2019 saw Year 4, 5 and 6 pupils from Winterbourne Boys' Academy in Thornton Heath set up speed cameras near their school.

Junior Roadwatch is a road danger reduction education scheme and it is run as a joint initiative between the MPS, London's boroughs and us.

As part of the scheme, primary school children are given the opportunity to take part in speed awareness sessions with police officers from the RTPC to educate drivers about the dangers of speeding near their school.

If a motorist is caught driving too fast, the police run checks to make sure there are no other issues with the vehicle or driver before council officers explain they either face a fine and three penalty points on their licence or talk to the pupils. The 10 and 11-year-old children asked the drivers if they realise the consequences of speeding and other relevant questions to highlight the danger of speeding.

Working with school children and the police, the council was able to make a real difference by explaining the human impact speeding can have on communities.

The pupils monitored speeds around Melfort Road, with pupils from Winterbourne Junior Girls' School doing the same exercise the next day. Over the two days, 28 drivers were stopped for speeding and all of them chose to speak to the children instead of other enforcement activity. The average speed for both days was around 30mph, but the speed limit on the road is 20mph.

So far six schools across the borough have taken part in the scheme with more schools waiting to participate.

'We are here to ask questions to the drivers, like why they are speeding near our school. If you speed you could kill someone. If a pedestrian is hit by a car at 20 miles per hour they are about five times more likely to survive than if they're hit at 30 miles per hour'

Shania Falaiye
Pupil at Winterbourne Junior Girls' School

Future work

Challenging the culture of speeding

While the MPS does more speed enforcement than any other police force in the country, we need to go further. Speed is the single biggest contributory factor in fatal collisions in the Capital and levels of non-compliance remain too high. Local authorities, local communities and vulnerable road user groups are calling on the police and us to do more.

We are working to increase our capacity to enforce speed limits to provide an effective deterrent to those drivers that think they can speed and get away with it. We are harnessing new approaches and technology to enable our enforcement to be more effective and targeted. We prioritise enforcement in the areas where non-compliance, risk and harm are greatest, and on the drivers that pose the highest risk. Our expanding enforcement capability will enable us to respond more effectively to local community concerns and emerging problems, and support the rollout of lower speed limits as part of an effective speed management approach.

In our Vision Zero action plan, we committed to expanding London's safety camera network as part of efforts to reduce speed and speed-related collisions. It remains our intention to increase the number of locations where speeding can be detected through additional digital cameras whether fixed or redeployable. We are carrying out the essential preparatory work for this before rolling out to new sites, based on a new prioritisation methodology agreed with the London Boroughs. This

includes implementing offence processing technology, recruiting enforcement staff, and exploring new camera technology to ensure we are investing in the best and most cost-effective systems for the future.

The following actions continue on from our Vision Zero action plan, where we set out 17 actions:

Action 18

We will challenge the culture around speeding in London by:

- Significantly enhancing police capacity to enforce up to one million offences per year by 2024/25 by drivers who continue to speed
- Implementing new safety camera technology that will enable the police to take action against high-risk speeders, regardless of which camera has captured the speeding offence, once approved by the Home Office. Approval is expected by the end of 2021/22
- Launch five new mobile safety cameras by the end of 2021, operated by a team of Roads Policing police community support officers, to target enforcement in areas of local concern

Reducing speed limits on more of our roads

There are now 80km of 20mph speed limits on our roads, up from 35km in 2016. By 2024, 220km of TfL road will have a 20mph speed limit on it.

We will look at lowering speeds on a further 140km of our road network in inner and outer London, including on the inner ring road, high-risk roads and roads in town centres. This might mean speeds will be lowered along some roads from 50mph to 40mph, or from 40mph to 30mph

Action 19

Accelerate the roll out of lower speed limits across a further 140km of our road network by 2024, to reduce the likelihood and severity of collisions.

New actions

Further enhancing speed enforcement capability

The joint funding between the MPS and us provides the largest roads policing capability in the country through the MPS Roads and Transport Policing Command (RTPC). The Command's police community support officers (PCSO) play a significant role in reducing road danger. There is more they, and other PCSOs, could do to tackle speeding if they had the powers to stop and deal with speeding drivers at the roadside. The designation of police constable traffic enforcement powers to PCSOs has been proven to work in other areas, such as Lincolnshire, and we are confident would be successful in London too.

Action 20

The MPS will designate police constable traffic enforcement powers to police community support officers so they can stop speeding vehicles and take enforcement action against drivers. Beginning in 2022, powers and training will be rolled out in a phased approach beginning with 400 PCSOs in the RTPC.

Working with Government to change the default speed limit in urban areas

We believe there is a case for the national default speed limit on urban and residential roads to be 20mph and we will seek to work with the DfT and London's boroughs to investigate plans that would see us follow the lead of the Welsh and Scottish Governments in enacting this legislation.

A lower default urban speed limit would spread the benefits of 20mph limits to all communities, making it simpler for drivers to understand and comply with the law. It would also save significant amounts of public money that would otherwise be required to make traffic orders, sign 20mph speed limits and install the necessary speed compliance measures.

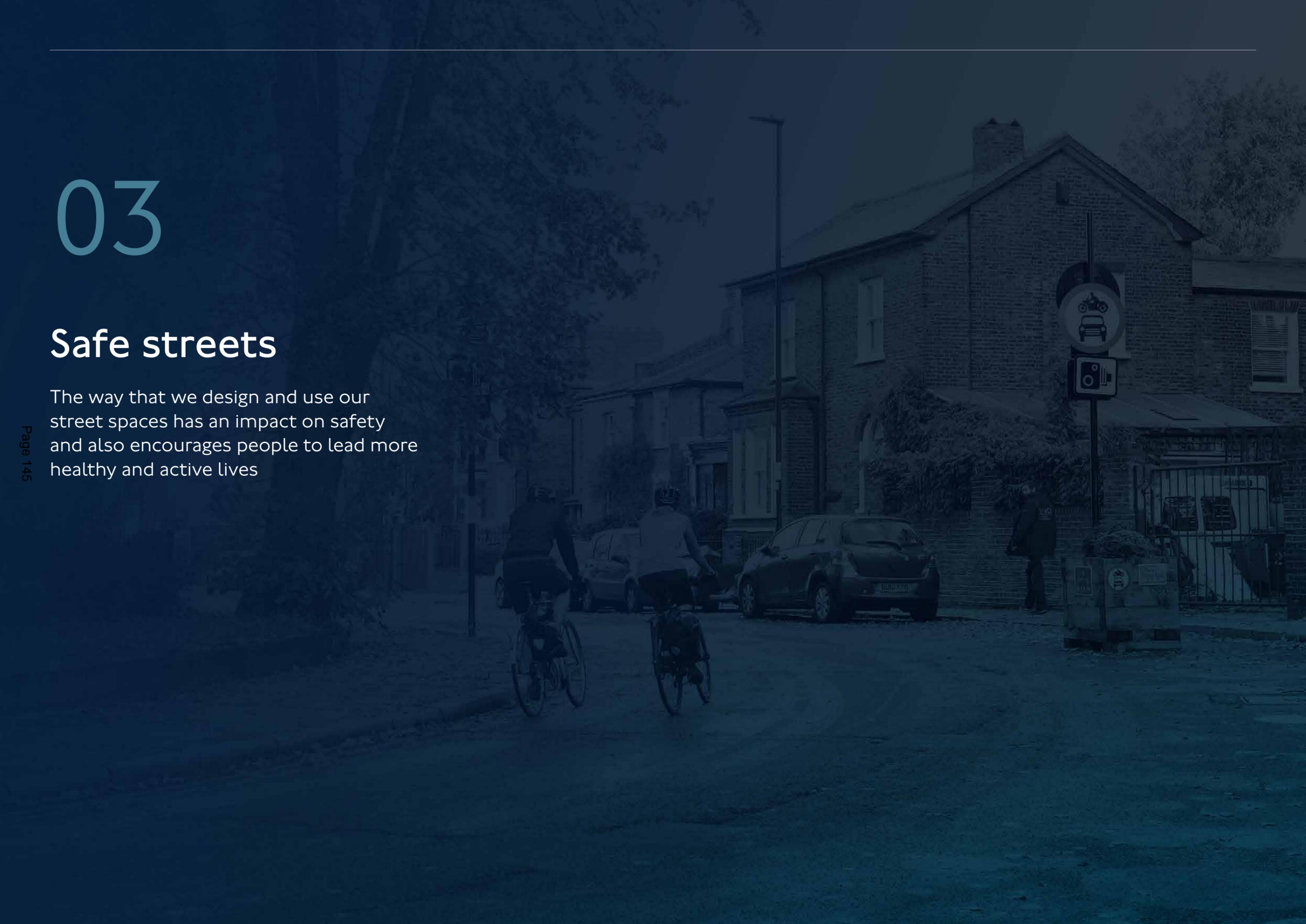
Action 21

Work with Government to propose 20mph as the default speed for urban and all residential roads.

03

Safe streets

The way that we design and use our street spaces has an impact on safety and also encourages people to lead more healthy and active lives





Creating healthy, safe and liveable streets that work for all Londoners

Designing an environment that is forgiving of mistakes and reducing danger where the likelihood of injury is higher is key to achieving Vision Zero. Safer streets are at the heart of our Healthy Streets Approach, which is an evidence-led and proactive approach to planning schemes, using analysis of road risk to target and prioritise locations.

Delivering Vision Zero and Healthy Streets will also help tackle London's deep inequalities. Younger people and people from Black, Asian, and minority ethnic backgrounds are more likely to walk for part of their journeys, and safety concerns about cycling are felt more acutely by women and people from Black, Asian, and minority ethnic backgrounds.

Following the impact of the pandemic on our income and finances, we are working with Government to seek a stable long-term funding agreement that will support continued investment in Healthy Streets.

43

dangerous junctions improved through the Safer Junctions programme



Our achievements

Over the past few years, we have worked closely with the London boroughs to deliver a range of ambitious schemes, creating more attractive and less traffic-dominated streets across the Capital. Delivering Healthy Streets continues to be a core priority for us, including rolling out 20mph speed limits and pedestrian crossings as part of new schemes, and allocating more road space for people walking, cycling and using public transport.

Safer Junctions

The Safer Junctions programme has already improved 43 dangerous junctions in London, where the greatest numbers of people have been killed or injured while walking, cycling or riding motorcycles. These schemes have helped to reduce collisions by 23 per cent overall, and by 30 per cent for vulnerable road users up to December 2020, according to data taken over a period of 18 months. The number of injuries of all severities to people motorcycling fell by an average of 18 per cent across our completed projects.



We are encouraging people to walk more by making streets safer

There are 30 junctions remaining in the programme and we will deliver improvements at three further junctions by 2022. These include Battersea Bridge/Cheyne Walk, York Road Roundabout, and Holloway Road/Drayton Park. The latter will include nine new or improved pedestrian crossings along Holloway Road, in addition to improvements at the junction itself.

Our ambitious plans to transform the northern and southern roundabouts at Lambeth Bridge, to improve safety for pedestrians and cyclists, are well advanced. This project includes improvements to the Safer Junction location at Millbank. If funding is approved – and there are no unforeseen delays – we plan to start construction in late 2023 and finish in 2025.

The three Safer Junction locations on the Bishopsgate corridor have been improved following temporary Streetspace for London measures, as a direct response to the pandemic, with reduced levels of motor traffic in the busiest hours. Traffic restrictions have created a calmer, safer environment for people walking and cycling, as well as improving bus journey times along the corridor. We will monitor the scheme and review these three locations to see if any further work is needed to make them even safer for walking and cycling.

Subject to necessary funding, we propose to engage or consult on 10 further Safer Junctions schemes by 2024, progressing these to delivery, depending on the outcome of this engagement.

The Safer Streets infrastructure programme is not limited to the Safer Junctions list. Working with the boroughs, we continually review locations across the network to assess changing levels of risk for vulnerable road users, with an annual programme of low-cost, high-impact improvements targeted to reduce road danger.

Together with our borough partners, we have removed barriers to walking and cycling at junctions through the delivery of new, safer pedestrian crossings and protected cycle facilities at junctions on cycle routes. Over the last five years, we have introduced around 15 new or improved pedestrian crossings on our roads, with many more being achieved on local roads through borough-delivered Local Implementation Plans.

Under the Healthy Streets Approach, we have been proactively using existing traffic signals to more effectively, and safely, support pedestrian movement. This includes reducing pedestrian wait times at crossings where we know people are moving most, such as near schools, shopping centres and transport hubs, and prioritising pedestrians through new innovative technology such as Green Person Authority where crossings' default setting is green for pedestrians. In 2019/20, these initiatives saved more than 2,300 hours for pedestrians every day. Every year, we review signal timings at more than 1,200 locations across London with the aim of making it easier for people walking, taking the bus and cycling to get around.

Action 22

Keep Londoners safe and continue to drive down the number of deaths and serious injuries:

- Continue to deliver improvements to Safer Junctions, as well as at other high-risk locations on the network
- Deliver a prioritised programme of new pedestrian crossings, including at high risk junctions where there are none currently

Expanding the cycle network

Between 2016 and early 2020, we have worked with the boroughs to treble the amount of protected space for cycling and deliver an extensive network of routes on quieter streets.

Since March 2020, as part of the Streetspace for London programme in our response to the pandemic, we have delivered a further 100km of new or upgraded cycle routes, some of it through temporary infrastructure. About 22 per cent of Londoners now live within 400 metres of London's high-quality cycle network, up from five per cent in 2016.

Expanding the cycle network with high-quality routes plays a critical role in reducing real and perceived road danger. Following the delivery of Cycleway 4 in 2020, our customer research shows that 98 per cent of people using the route felt safe all or most of the time, and 95 per cent of users said they felt safer since the Cycleway was constructed.

Although it cannot be solely attributed to new infrastructure, monitoring carried out in Autumn 2020 showed a seven per cent increase in cycling in inner London and a 22 per cent increase in outer London, compared to spring 2019.

Action 23

Continue to expand London's Cycleway network, so that more people have access to the network of signed, high-quality cycle routes. Work with boroughs to target interventions to encourage more cycling activity by underrepresented groups.

260km

of new or upgraded cycle infrastructure since 2016





Some roads can be closed to vehicles to encourage active travel

Low Traffic Neighbourhoods

Since March 2020, we have worked with the boroughs to roll out more than 100 Low Traffic Neighbourhoods (LTNs), which are networks of local roads, often bounded by main roads, with restrictions to reduce through traffic. In addition to enabling social distancing, safer active travel and reducing road risk, LTNs help address the exposure of residents to air pollution. We used areas of deprivation as one of the criteria in selecting locations.

London's LTNs implemented between March and September 2020 saw road traffic injuries halve, compared with the rest of London, with no change in the number of injuries on boundary roads. There was a particularly steep decline, both in absolute and relative injury risk, for people walking, with an 85 per cent reduction in absolute injuries, according to a report by Findings journal in 2021. This step change in safety performance in LTNs was significantly greater than the London average over the same period.

LTNs are a low-cost and effective way of reducing road risk across large areas and creating better environments for walking and cycling.

100

LTNs in place, which halve road traffic injuries



School Streets

The boroughs and TfL are introducing School Streets, which restrict access to motor traffic at drop-off and pick-up times around schools. These are designed to encourage active travel journeys to and from school, enabling social distancing and reducing road danger.

School Streets improve the perception of safety outside schools and have proven to reduce nitrogen dioxide by up to 23 per cent during morning drop offs, according to an air quality study by the GLA in 2021. Under the Streetspace for London programme, 322 School Streets have been delivered across the London boroughs. We will continue to support their delivery, share best practice and help transition them from temporary to permanent schemes where appropriate.

In response to the Mayor's manifesto commitment to support the innovative use of timed changes to streets, we are developing a toolkit for boroughs to showcase best practise examples of timed street closures. This will include School Streets and other schemes such as Play Streets and Summer Streets.

322

School Streets have been delivered across all the London boroughs





Focus on: Low Traffic Neighbourhoods in Islington

In July 2020, the Borough of Islington installed measures in the St Peter's area to create a people-friendly streets neighbourhood, such as bollards and smart cameras, to prevent traffic from cutting through local streets from one main road to the next.

The measures included relocating an existing bus gate and installing a new camera-controlled traffic filter at Coleman

Fields. We also removed width restrictions on Prebend Street and converted 12 metres of parking bays into a loading bay for local businesses, which will be operational between 08:30 and 18:30 on weekdays and 08:30 and 13:30 on Saturdays. The bay will be available for residents and visitors parking outside these hours.

This LTN was created using an Experimental Traffic Order, which can only stay in force

for up to 18 months. For each people-friendly streets trial, the borough will ask residents for their views on whether the LTN should be made permanent at the end of the trial period. Since the introduction of the people-friendly streets scheme in the St Peter's neighbourhood, traffic has reduced by an average of 56 per cent, with average vehicle speeds falling by nine per cent and the number of vehicles speeding falling by 78 per cent.

'We all have a role to play in tackling the climate emergency, and our people-friendly streets neighbourhoods are a key part of our efforts to create a cleaner, greener and healthier Islington together. By reducing traffic within the neighbourhood, the trial has helped create streets that are better suited to walking, cycling and using buggies and wheelchairs.'

Councillor Rowena Champion
Islington Council's Executive
Member for Environment
and Transport

Future work

Working with the boroughs

Boroughs are responsible for 95 per cent of London's road network, and we are working with them to deliver safer streets through their Local Implementation Plans. We are asking boroughs to consider measures such as those already discussed to:

- Reduce traffic on local streets to create safer, greener roads with cleaner air to support an increase in people, especially children, walking and cycling
- Design streets that help everyone to get around safely and make active travel options attractive
- Promote and encourage ways to travel that pose less risk to other people on the roads, such as walking, cycling and using public transport

We also continue to work with boroughs to expand the high-quality cycle network to reach more Londoners, working towards the Mayor's ambition for the network to reach a third of all Londoners by 2025. This includes delivering 30km of new or upgraded cycle routes in 2021/22, building on the recent expansion of the network through the Streetspace for London programme. In supporting London's recovery from the pandemic, together with London boroughs, we will also consider whether temporary cycling and social distancing schemes introduced in 2020 should be retained, amended or removed.

The development and construction of rapid, and in some cases, innovative infrastructure has led to some concern. As part of our Inclusive Streets Engagement Programme, we discussed key issues and solutions with older and disabled people and cycling groups. We will ensure their needs are fully understood and integrated into our street designs. We are also committed to ensuring that Equality Impact Assessments are conducted for all projects to ensure a robust and well-considered inclusive design approach.

Action 24

Work with the boroughs to implement measures to reduce through-traffic from residential roads, to improve safety, air quality, and reduce noise pollution.

New actions

Prioritising interventions by deprivation and road risk

We are asking the boroughs to prioritise areas with the highest deprivation when delivering their Local Implementation Plans, and we are using a similar approach to prioritising our own investment in Healthy Streets. Our investment in 2021/22 has been informed by metrics including road risk, indices of deprivation and poor air quality, and we will continue to use these factors to identify and prioritise Healthy Streets schemes.

We are also working with boroughs to share data and research findings that will help to strengthen our work on deprivation as part of a collaborative approach to closing the gap on inequality.

Improving safety for people using motorcycles

Motorcycles are heavy vehicles with little to no protection for the rider, capable of very high speeds. This makes them, like pedal cycles, very vulnerable to defects in the road surface and anything that obscures the view of drivers and riders turning at junctions.

Action 25

Ensure design guidance for motorcyclists reflects current best practice and targets the most common causes of motorcycle collisions on the network. Develop and pilot a motorcycle safety review tool, tested with stakeholders, to improve safety on corridors with the highest harm.

30km

of new or upgraded cycle routes will be delivered in 2020/21



28,045

new on-street cycle parking spaces delivered

04

Safe vehicles

All vehicles using London's roads must have safety at the forefront of their design, from improving the driver's vision to using the latest technology





Ensuring the vehicles on our streets are as safe as they can be through design and innovation

Vehicles have become much safer for people travelling in them over the last decade, with a 77 per cent drop in deaths and injury for those driving and travelling in cars since the 2005-09 baseline. However, the same progress has not been made for people outside the vehicle.

Horizon scanning research tells us that if every existing and proven technology and safety feature were to be adopted by all vehicles overnight, by 2041 more than 7,500 serious injuries and more than 150 fatalities could be avoided in London alone. Of all these technologies, Intelligent Speed Assistance will have the greatest impact.

Our achievements

Direct Vision Standard

The Direct Vision Standard for heavy goods vehicles (HGVs), is a world-first, industry leading lorry safety permit scheme, applicable to freight operators in London. It measures the driver's direct field of vision from their cab and rates it from zero to five stars, with those rated zero having to retrofit additional safety features to enhance the drivers view of hazards in an urban setting.

The permit scheme applies to HGVs weighing more than 12 tonnes. The primary method of enforcement is by Automatic Number Plate Recognition, which checks whether vehicles entering London have the correct permits. This is supplemented by operations officers who work closely with policing partners and monitor whether the conditions of the permit are being met.

Working closely with the City of London Police and the MPS, we formed the London Freight Enforcement Partnership in October 2015. This is the first multi-agency unit doing targeted checks on dangerously non-compliant vehicles and drivers in London. By helping to tackle the disproportionate risk posed by HGVs, giving out fixed penalty notices and stopping vehicles with mechanical problems, we have made London's roads safer.

Since enforcement started in March 2021, more than 40,000 zero-rated HGVs have now had safe systems fitted, improving protection for vulnerable road users and saving lives.



Our world-first Direct Vision Standard is making HGVs safer

Standards will tighten further in 2024, with the introduction of three stars as the minimum standard for operating in Greater London. This will deliver safer lorries not only in London, but through supply chains across the country. HGVs that cannot meet the three star standard by design will have to retrofit a Progressive Safe System, which will match the vision of a three star rated HGV, giving the driver better sight of vulnerable road users and other hazards.

The ground-breaking evidence, based on extensive research we commissioned, has informed safety requirements at European level, ensuring that more locations will benefit from safer vehicles. Other major cities are very interested in DVS and discussions are being held about potential implementation within their metropolitan areas, further publicising the scheme for worldwide adoption.

Bus Safety Standard

Our Bus Safety Standard has helped make buses the safest way to travel by road in London. By 2020, 77 per cent fewer people were killed or seriously injured on, or by, a bus than during the 2005-09 baseline. The standard was based on extensive research and closely matched targeted action with the evidence of key risks.

The Bus Safety Standard applies to all new vehicles entering the London bus fleet, which is up to 700 vehicles per year, with more than 525 currently in service that meet the standard. The majority of these buses meet the requirements of the 2019 standard and the first buses achieving our enhanced 2021 standard entered service during summer 2021.

The 2019 Bus Safety Standard introduced new features that are now a standard requirement on all new buses, such as Intelligent Speed Assistance, acoustic vehicle alerting systems for quiet running vehicles, non-slip flooring to reduce passenger slips, trips and falls, pedal indicator lights to reduce incidences of pedal confusion and blind spot mirrors to increase visibility of vulnerable road users.

There are 525 new buses in our fleet that have Intelligent Speed Assistance, and we are now retrofitting this technology to more buses, with 1,150 buses retrofitted so far, which means as of September 2021 around 18 per cent of the whole bus fleet currently benefits from this technology. We are keen to accelerate the roll out and will retrofit a further 3,000 buses over the next two years.

The 2021 Bus Safety Standard makes camera monitoring systems that replace wing mirrors compulsory, provides more occupant-friendly interiors and adds a mechanism to prevent the bus from moving when the driver leaves the cab. Buses with these improvements started appearing on our streets in summer 2021. Advanced Emergency Braking and specially redesigned bus fronts that reduce the impact of any collisions will follow in 2024.

525

buses fitted with Intelligent Speed Assistance systems



Action 26

Drive major improvements in safety across London's bus network and ensure our ambition of no one being killed in or by a London Bus by 2030 through:

- Continuing the roll out of the Bus Safety Standard on new vehicles, with all existing measures mandated by 2024. Retrofitting features such as intelligent speed assistance by the end of 2022, to bring forward the benefits resulting from a reduction in the number of casualties, and continuing to incorporate evidence-based safety measures
- Working with operators to expand and deliver the Fatigue Management Programme for bus drivers, incorporate new communications with bus drivers and other frontline staff and continue to look at new ways to manage and prevent fatigue
- Promoting innovative fatigue, health and wellbeing initiatives for bus drivers through delivery of the Bus Safety Programme and leading the Health & Wellbeing Innovation Challenge jointly with bus operators. Fatigue detection technology will be rolled out to 500 buses by the end of 2022
- Working with operators and the Design Council to develop a bus driver health and wellbeing programme that analyses the effectiveness of interventions
- Building on the success of the Destination Zero training programme, equip drivers with the skills to adapt to the changing streetscape and better support the needs of our vulnerable and diverse customers, and work to achieve Vision Zero
- Promoting a culture of transparency, both internally and across operators, proactively sharing learning opportunities and publishing data wherever possible at, for example, the Safety Managers Meeting or the Bus Operator Forum
- Improving safety monitoring and assurance processes among operators, and enhancing incident reporting and investigation processes to aid identification of root causes and corrective actions
- Implementing a strategic data-led approach to reducing passenger injuries due to slips, trips and falls, involving the evaluation of a variety of technical, behavioural and procedural interventions
- Continue to investigate how improved Connected and Autonomous Vehicle technology can further help our Bus Safety Programme



Focus on: Improving bus safety

Go Ahead London is London's biggest bus company, responsible for around 2,200 of the Capital's buses, including more than 200 electric vehicles. Like fellow operators, it puts safety at the forefront of everything it does and is committed to rolling out the Bus Safety Standard across the fleet.

Go Ahead London played a significant role in our development of the first phase of the Acoustic Vehicle Alerting System (AVAS), which makes quiet-running buses, including electric buses, identifiable to people walking and other road users. AVAS was initially trialled in early 2020 on Go Ahead London's route 100 between St Paul's Cathedral and Shadwell. It was also trialled on route 360, which runs down Exhibition

Road which has no pavement and is popular with tourists. The trials contributed to the development of responsive AVAS, which gives roads their own external noise level, best suited to that location, and AVAS equipped buses automatically adjust their sound to this level as they travel. Route 100 was upgraded to responsive AVAS in May 2021.

Having participated in a previous trial of Intelligent Speed Assistance, which helps drivers keep to the speed limit based on a digital map, more than 200 of Go Ahead London's new vehicles have this technology fitted. The operator has also introduced pedal indicator lights to its fleet and worked with us to make it a requirement

in the Bus Safety Standard. This feature reduces pedal confusion by making each pedal flash up on the driver's dashboard whenever the pressure is applied.

Go Ahead London was the first London operator to fit camera monitoring systems on buses as a more effective alternative to side mirrors. These reduce blind spots, reducing the risk of bus collisions. It also removes the risk of a mirror hitting other road users, as well as providing better visibility in the dark or in bad weather. More than 200 vehicles within the Go Ahead London fleet now have this technology fitted and the feedback from drivers has been positive.

'We are trialling seats with higher backs on top decks to reduce the movement of passengers if a driver needs to make an emergency stop. Hand poles have also been replaced with handles on top decks so that passengers do not run the risk of colliding with them, while new flooring with a more tactile and longer-lasting finish has been introduced to reduce slips and trips'

Richard Harrington
Engineering Director,
Go Ahead London



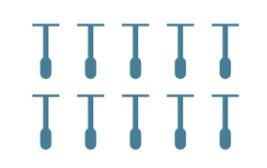
Our e-scooter trial is being rolled out across several boroughs

E-scooter rental trial

We are coordinating an e-scooter rental trial to promote safety, reduce risks and achieve a consistent approach across London by setting high standards for the vehicle design, maintenance and parking. This will provide the data to understand how e-scooters might affect London in future, helping and informing the DfT's regulation of this new vehicle.

Working with London's policing agencies, we will continue to enforce illegal private e-scooter use that is creating risk on London's roads and pavements.

10
boroughs have been running our trial of rental e-scooters



3,480
vehicles used in the rental e-scooter trial



Focus on: Road safety and the construction industry

Tideway recognises that the safety and wellbeing of people who work outside of the construction hoarding are just as important as those working inside. High standards should apply to anybody working on the job, including lorry and van drivers serving the project.

Its commitment is to mitigate the risk to all vulnerable road users working on and using roads around the project's worksites and when travelling on the wider road network. While building in a densely populated area where many other construction projects are taking place, there is a significant risk

when delivering plant, equipment and materials to worksites or collecting waste and excavated material, even when using the river.

Large infrastructure projects can influence the behaviours of the supply chain by encouraging and supporting them to work with together to minimise road risk. Tideway gave a legacy commitment early on in the planning stages to introduce new initiatives reducing risk to vulnerable road users. This commitment fitted with the idea of the Direct Vision Standard and helped when sharing information

to help the industry understand its aims and benefits.

Tideway assisted some of its supply chain to obtain 27 low-entry cab HGVs, with 12 mixers and 15 tippers. Feedback from the tipper drivers confirmed that vision is better and there was no concerning feedback that couldn't be overcome. Tideway worked with its contractors to underline the importance of adhering to the Mayor's Safety Permit Scheme and, to date, they have reported no compliance issues in their supply chain.

'What we'd say to any operators considering DVS requirements is that, while meeting the minimum helps, it is worth considering if you can look at obtaining better-rated vehicles as part of your procurement cycles. This not only improves safety for you, your drivers and the community – but as the minimum rating will be three stars from 2024, you could get ahead of the game and help contribute to the aim of Vision Zero'

Gordon Sutherland
Traffic and Road Logistics
Manager, Tideway

Future work

Fleet and construction vehicle schemes

The Fleet Operator Recognition Scheme (FORS) is a voluntary accreditation scheme for fleet operators that aims to raise the level of quality within fleet operations and demonstrate which operators are achieving exemplary levels of best practice in safety, efficiency, and environmental protection. Our Work Related Road Risk requirements specify that FORS Silver accreditation is required wherever trucks or vans are used in the supply chain, in order to manage road risk. FORS is internationally recognised, with around 5,000 registered operators across the UK and Europe.

The Construction Logistics and Community Safety (CLOCS) scheme promotes best practice to reduce the risk posed by construction vehicle movement, and provides guidance to enable safe movement of people past construction sites. Between 2019 and 2021, more than 400 people were fully trained in developing Construction Logistics Plans, and an advanced training course has been launched to make construction trips safer and more sustainable.

Boroughs have the opportunity to lead by example in committing to eliminating casualties on our streets, through implementing FORS and CLOCS standards in their procurement contracts for example. Making these schemes the contracting standard across London will help reduce the risk to those people sharing the roads with people driving for work. All our construction projects costing more than £1m now specify FORS and CLOCS standards in the procurement contract.

New actions

Encouraging safer vehicles

The adoption of technology in cars to improve collision outcomes for people outside the vehicle has been too slow. The EU General Safety Regulation will make existing technologies, such as Intelligent Speed Assistance and Advanced Emergency Braking, mandatory in all new vehicles from 2022. We recommend that the Government should translate this regulation into UK legislation as a priority, as it has the potential to deliver major leaps forward in vehicle safety.

The European New Car Assessment Programme (EuroNCAP) enables safety comparisons of vehicles and pressures manufacturers through its star rating system to increase standards.

Intelligent Speed Assistance systems are the technology with the greatest potential to reduce harm across all vehicle classes, by helping drivers manage their speed and keep to the legal limit. We introduced this technology to our bus fleet, which led to an 80 per cent reduction in speeding occurrences in the first tranche of vehicles.

Action 27

To encourage safer vehicles, we must:

- Engage with the Government to support full adoption of the EU General Safety Regulation, making safety technologies mandatory in all new vehicles in the UK from 2022
- Investigate the feasibility of procuring only EuroNCAP five-star cars and vans as part of our commitment to safer and greener fleet. Influence our supply chain and partners to use safer vehicle fleets, including by developing simple guidance by 2022 to help navigate what is available to help operators make the best fleet procurement decisions
- We will retrofit mandatory Intelligent Speed Assistance systems to 360 vehicles in our own fleet by the end of 2021/22, mandate it in all new buses and retrofit to a further 3,000 buses

Policy integration

Vision Zero and zero carbon are harmonious policy goals. Wherever we look to improve London's emissions standards, we should also improve vehicle safety standards.

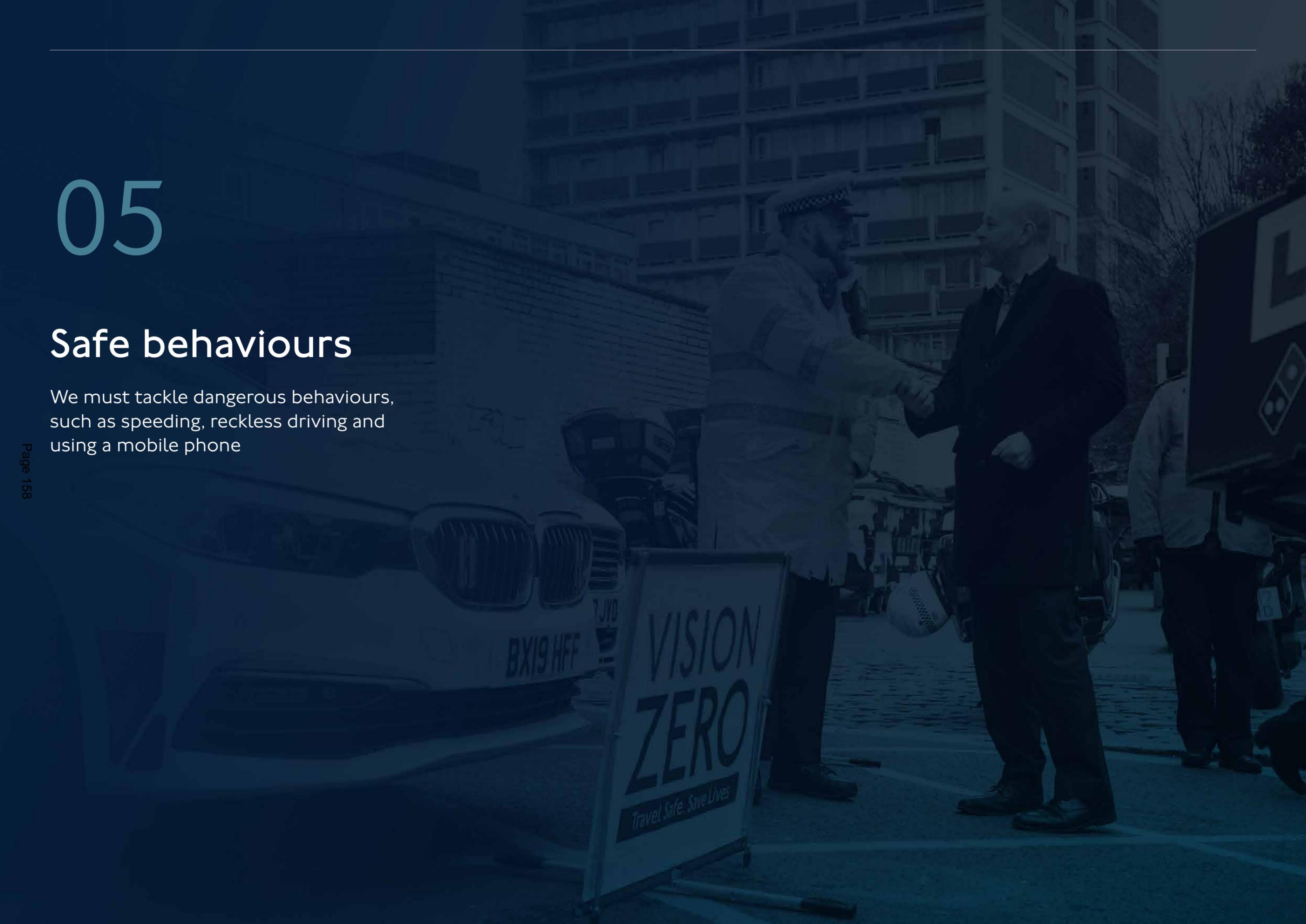
Action 28

Investigate including vehicle safety standards in policies and charging standards to improve London's emissions and reduce congestion.

05

Safe behaviours

We must tackle dangerous behaviours, such as speeding, reckless driving and using a mobile phone





Too often on London's streets we see a culture of risk taking, including speeding, aggressive or inconsiderate driving.

We need to collectively work towards a culture of safer driving, which must be addressed to help us achieve Vision Zero. More than 90 per cent of collisions on London's roads are linked to unsafe behaviours and 87 per cent of Londoners believe that collisions on the road are inevitable.

Our achievements

Our three-tier enforcement approach

Enforcement and policing activity is essential to achieving Vision Zero in London by 2041. Our work, together with the police, the Driver and Vehicle Standards Agency and other enforcement agencies, is fundamental to reducing the kind of illegal, reckless and dangerous road user behaviour that causes risk on our roads and contributes to fatal and serious collisions.

The scale and range of roads policing and enforcement activity in London is unparalleled in the UK. The partnership between the MPS and us ensures that London benefits from the RTPC, with more than 2,000 uniformed officers with

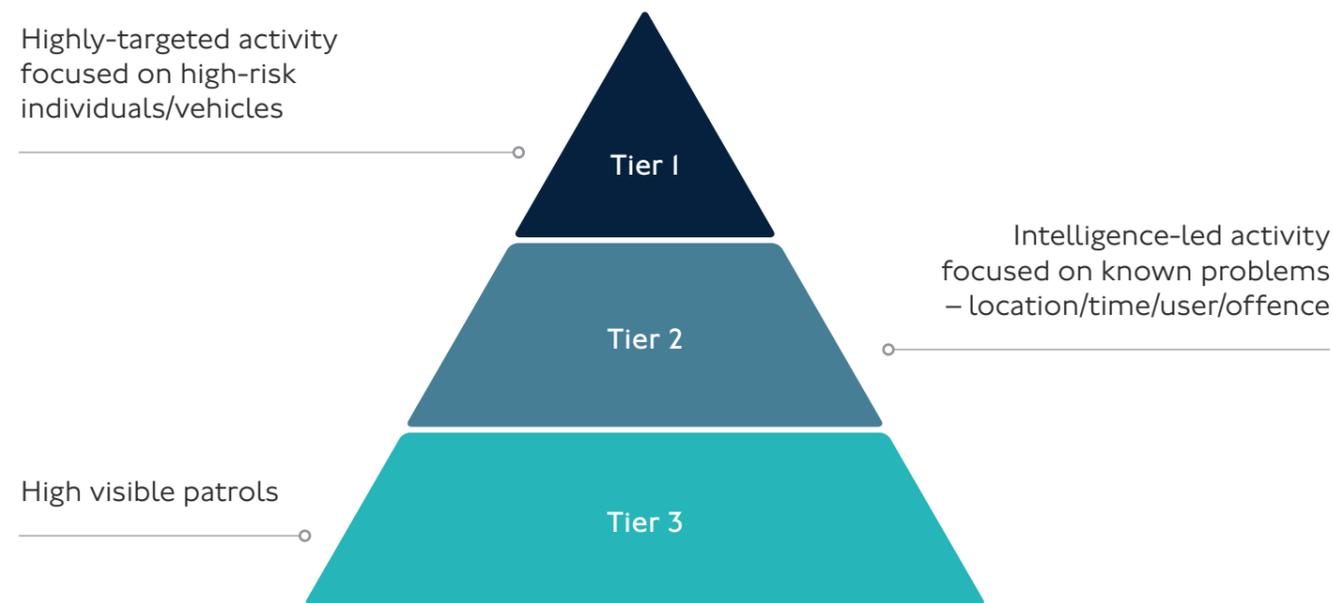
Vision Zero at its heart. The command mobilises officers from across the roads policing teams, and specialist road safety teams, including cycle and motorcycle safety teams, road crime team and the commercial vehicle unit, to tackle road danger. Safer Transport teams, which are the equivalent of local policing teams for the transport network, respond to local concerns and work alongside the community to tackle issues of road danger issues by using various innovative problem-solving approaches.

As part of Vision Zero, we implemented a new policing and enforcement approach to maximise the impact of police enforcement and other road danger reduction activity. The three-tiered approach to roads policing focuses on high-harm and high-risk offenders, such as those with a history of dangerous driving, regular drink/drug driving arrests, and those involved in moped-enabled crime; problems identified through risk-based analysis covering location, time, user and offence; and increasing visibility and enhancing the deterrent effect of policing activity across the Capital.



We work with our partners to ensure enforcement is effective

The three-tier approach to roads policing and enforcement



Since the Vision Zero plan was published in 2018, the police have taken action against more than 880,000 speeding drivers, more than 85,000 uninsured drivers, and more than 35,000 drivers caught driving under the influence of drugs and alcohol. The RTPC runs intensified policing operations to target speeding and antisocial driving in problem areas such as the A10 and A12. The command runs regular large-scale operations where hundreds of officers are deployed across London to deter risky behaviours. A two-week speeding operation in summer 2021, caught almost 3,000 speeding drivers.

We remain committed to our three-tier policing approach and adopting tactics that are proven to work in reducing road danger as well as exploring innovative ways and new technologies to deal with illegal and risky road user behaviour.

While the police have a key role in ensuring all road users follow traffic laws, the key focus will be on the behaviours and vehicles that cause the greatest risk and harm in the Capital.

The Vision Zero priorities for the RTPC include speeding, drink and drug driving, mobile phone offences, not wearing a seatbelt, dangerous and careless driving as well as unlicensed and uninsured drivers and riders.

Engagement, education and problem-solving activities, such as Exchanging Places, and Community and Junior Roadwatch schemes, remain an integral part of our approach. We recognise that every enforcement stop for a road traffic offence is a teachable moment to change behaviour.

Bus driver training

We began our Destination Zero bus driver training in May 2019. This uses virtual reality headsets to teach drivers about hazard perception, hazard prediction and help them understand what it feels like to be a vulnerable road user. We have trained 10,000 bus drivers so far and are due to have trained all 25,000 by April 2022. This is just one of the measures we are taking that help make buses the safest mode of transport on London's roads.

Bicycle and motorcycle training

We fund free cycle skills courses for adults and families who live, work or study in London. These are offered and provided by all 33 London boroughs. Bikeability is a cycle training programme delivered by the boroughs for children, which takes place in schools. There are three levels of training which can be completed through primary and secondary schools. Adult cycle skills has different levels to choose from including Basic, Urban and Advanced. We also offer a free online Cycle Skills course to boost cyclists' confidence with four quick modules.

We fund training courses for powered two-wheeler riders with the aim of helping them to be safe on the road. So far, we have delivered more than 2,300 1-2-1 motorcycle training and Beyond CBT courses.

We are also working with boroughs to continue to promote and encourage ways to travel that pose less risk to other people on the roads.

Additionally, we deliver school behaviour change programmes collaboratively with the boroughs, to help educate young Londoners on how to travel safely. Our STARS programme (Sustainable Travel; Active Responsible, Safe) engages more than half of London's primary schools to educate and encourage sustainable travel in a safe and responsible way. Our STARS Safety and Citizenship scheme, delivered in partnership with London Transport Museum, covers all Year 6 pupils, helping to educate them on safe behaviours and travel to supports their transition into secondary school.

We also fund The Road Safety Club, which is an educational programme and resource delivered to all nursery and pre-school settings, teaching children the basics of road safety to set them up for success as they move into primary school.

10,000

bus drivers trained in hazard perception and prediction



Focus on: Helping riders to stay safe on two wheels

Motorcyclists face the highest risk on London's roads when compared to other modes of travel. We offer a range of free online and face-to-face motorcycle safety training courses across all boroughs to help motorcyclists stay safe on London's busy roads. Since 2017, we have provided additional motorcycle safety training to more than 2,800 riders.

The I-2-I Motorcycle Skills course is aimed at riders looking to develop their urban riding skills with sessions tailored specifically to the rider, focusing on junctions and roads they use regularly. The Beyond CBT: Skills for Delivery Riders course is aimed specifically at delivery riders looking to improve their riding skills while riding for work and includes

instruction on how to filter, overtake, when to ride in bus lanes, using a sat nav while riding, and riding with a load.

'Delivery companies should support this additional training as it will lead to fewer accidents and safer riders. Further training can also lead to lower insurance premiums and a reduction in costly bike repairs for those involved in accidents. Employers have a duty of care to their employees and providing appropriate training is an important part of that duty.

The RTPC provides 24/7 response to emergency incidents on the strategic route network and contributes heavily to Vision Zero by patrolling known motorcyclist casualty hotspots and proactively targeting

the riskiest and most dangerous riders on the road network by carrying out regular patrols to engage with riders and to carry out enforcement when appropriate.

Police Sergeant Dave Bottomley from the MPS Roads and Transport Policing Command explains: 'Recently, we have been engaging with stakeholders in the rapidly expanding delivery, courier and servicing industries to find ways to better protect riders. The Motorcycle Safety Team deliver Bike-Safe London workshops to motorcycle riders within the Greater London area and account for over 50 per cent of Bike-Safe workshops delivered across the UK.'

'There are many advantages to extra training for self-employed couriers. They learn how to progress through traffic safely and confidently, learning skills to reach their destinations more efficiently. This course prepares riders to navigate London's busy roads safely and calmly, while still making quick decisions on the move'

Mark Evison
Phoenix Motorcycle Training



There is a wide range of training available for motorcyclists

Future work

Motorcycle safety campaigns and training

Other vehicles turning across the path of a motorcycle, scooter or moped are the most common cause of collisions that kill people riding on London's roads.

Our new campaign reminds motorcycle riders and drivers to watch out for each other when turning. In our campaign, produced with online influencer Ogmios and his Zen School of Motoring, Ogmios peacefully guides Londoners through car journeys in London, narrating the campaign as he highlights good behaviours between riders and drivers where they have followed the rules of the road and been considerate to other users.

Motorcycles with engines under 125cc require the least training of any motorised vehicle on the road. Compulsory Basic Training (CBT) is a one-day training course with no pass or fail and no requirement to learn about the Highway Code. CBT enables people as young as 17 to ride motorcycles with a top speed of 80mph with L-plates. The training can be renewed every two years, with no requirement to graduate to a full licence. Of all the people killed or seriously injured while riding a motorcycle, 64 per cent were on vehicles that had engines under 125cc. This is why we are working with Government to tighten training requirements.

Motorcyclists are also disproportionately likely – per journey – to be involved in a collision that kills or seriously injures pedestrians or cyclists. This is why we are working to identify opportunities to encourage casual motorcycle riders to swap to pedal cycles or e-bikes.

Action 29

Work to reduce the number of people killed and seriously injured on, or by, motorcycles, particularly bikes under 125cc, including:

- Work with the Department for Transport to identify improvements to the CBT course as set out in the Improving Moped and Motorcycle training consultation of 2016/17. Survey other countries to understand good licensing practice by the end of 2021
- Ensure all our courses and communications are targeted at people at the highest risk of being killed or seriously injured and increase training numbers by 10 per cent by 2022/23. Work with UK Road Offender Education to make the motorcycle diversionary course RIDE better suited to urban environments by spring 2022
- Identify opportunities to encourage mode shift for casual riders from motorcycles to safer, active and sustainable modes

New actions

Shifting the culture of acceptability

To achieve long-term culture and behaviour change needed to deliver Vision Zero, we must inspire a change to the way people feel about road danger in London, influence specific behaviours such as speeding, or watching for other road users when turning, and inform people about positive activity on engineering, enforcement or education that moves London closer towards our Vision Zero target.

We have a comprehensive communications strategy for Vision Zero that addresses the challenges that lie ahead. We need to change a deep-rooted culture that accepts road danger and risk-taking. This will need to be tackled over the long term, in parallel with our more direct interventions.

We will continue to tackle immediate behavioural problems that we see on London's roads so we can reduce the number of people being killed and seriously injured. We also know that to get the public to believe in this issue they need our stakeholders and us to take the lead and inform them of all the changes and the progress we're making, in the same way that concerns about air quality have become more visible and publicly understood in recent years.

It will take a collective willingness and commitment to prioritise this issue for decades to come so that we can achieve our Vision Zero goal. Only with the participation and collective commitment of our stakeholders, the general public and us will we achieve this.

Action 30

Launch a new communications campaign in November 2021 aimed at starting the conversation around changing the road culture.

Working with delivery companies

The food delivery industry has more than doubled since the beginning of 2020 and new registrations of small engine scooters have increased. The increase in people riding for work highlights the need to tackle longstanding poor safety outcomes for people riding motorcycles.

We have met with a significant number of motorcycle fleet operators and delivery platforms during the last year and we are committed to continued collaboration to harness their innovation and insight to improve safety standards for their riders.

Action 31

Work with delivery, courier and servicing companies and survey delivery riders to understand how to better safeguard people riding for work. Host an ongoing delivery, courier and servicing forum focused on rider safety. Encourage delivery companies to subscribe to a common minimum standard to keep riders safe.

Between the 2005-09 baseline and 2020, the proportion of collisions where a driver or rider was using a mobile phone more than doubled, and this is likely to be an underestimate.

Action 32

Commission research to investigate driver distraction to understand what a safe mobile application for work looks like by the end of 2022.

Increasing our civil enforcement capacity

The police must have the capacity and capability to focus on the most serious offences that cause the greatest risk and harm such as speeding, and drink and drug driving. Together with the boroughs, we already complement this activity by doing significant, intelligence-led enforcement of road traffic rules through civil enforcement.

Along with other London highway authorities, we can play a full part in the protection of designated road space through the decriminalisation of additional offences such as moving traffic offences in mandatory cycle lanes and cycle tracks, and encroaching advanced stop lines. This would give us additional powers to enforce in the same way we already do for bus lane and yellow box junction offences, for example.

Action 33

We will introduce 50 new redeployable cameras for civil enforcement of road traffic rules to tackle danger hotspots by April 2022.

Action 34

We will continue to work with Government to make the case for the decriminalisation of offences in designated road space. This includes the planned decriminalisation of moving traffic offences in mandatory cycle lanes and cycle tracks expected by the end of 2021.

We have invested in 50 innovative new cameras for civil enforcement, which will give us much-needed extra capability to tackle danger hot-spots on our roads. The cameras, which will be rolled out by April 2022, use cutting edge technology to enforce banned turns, bus lanes, yellow box junctions and weight restrictions.

The cameras can be moved to where they are most needed, ensuring that we can target junctions with the most dangerous driver behaviour and can remove cameras from locations where enforcement activity has been successful in cutting danger and improving driver behaviour. A trial of the cameras carried out in 2020 saw an improvement in compliance of up to 60 per cent in six months.

06

Post-collision support and investigation

People who are killed or seriously injured in collisions, their loved ones, and people who witness these events, suffer lasting physical, mental and emotional trauma that changes lives





It is vital that we work with our partners to ensure anybody affected by a collision on our roads receives the support they need and deserve

Together with the police and specialist organisations, we are working to support victims of collisions on the roads. It is vital that we learn from these tragic events and continue to improve how we prevent and respond to danger on the roads.

Our achievements

Public road safety dashboard

We launched the new Vision Zero Dashboard at the beginning of 2021, which is a tool that enables organisations and members of the public to more easily access and interpret London's collision data, which is recorded by the police. By sharing data in this way, we can better identify the road danger challenges specific to their communities and work together with London's boroughs and agencies to tackle them.

The Vision Zero Dashboard visualises our published collision statistics, complementing the data we have already made available. Members of the public can now easily filter raw data based on key fields such as injury severity, location, date, time and mode of travel.

Fatal files research

In 2021, we completed an in-depth independent review of MPS investigations of 38 collisions where someone was killed while walking, 33 collisions where someone was killed while riding a motorcycle, and 30 cases where someone involved in a fatal collision was speeding. The purpose of this was to understand the root causes of fatalities in London and help us design and refine interventions. The report took a detailed look at the circumstances surrounding each collision, and the casual factors that led to a tragic loss of life. It confirmed the importance of reducing the speed of traffic, designing safer streets to increase the visibility of people walking, cycling and motorcycling, and fitting safety technology to vehicles, which prevented or mitigated the impact of collisions.

The recommendations, supported by Transport Research Lab analysis, are being integrated into our approach to all our road safety activity, and we will use the detailed findings of the fatal files investigations to further our understanding of collisions in London and their causes.



We have reviewed MPS data on collisions to help inform decisions

Sarah Hope Line

The Sarah Hope Line offers comprehensive help and support to people who have been injured during, or affected by, a serious incident involving any of our services. It is a voice of kindness and compassion to help victims, their families and witnesses on their recovery. Since its launch in January 2016, more than 450 people have benefitted from this assistance.

In line with London Assembly recommendations, further improvements are planned to ensure the service can support as many people as possible. These include an internal review of case management process, refresher training for agents on the new case management process and customer pain points, and improved data capture and reporting.

We are increasing awareness of the Sarah Hope Line and the support services we offer through an ongoing public information campaign and a programme of events with the emergency services and first responders to ensure early intervention with people who need this vital support.

Future work

New technology and collaborative partnerships

We champion London as a testing ground for new technology, to harness innovation for safer, healthier streets and to understand how new technologies will affect our streets. We work with Smart Mobility Living Lab London to develop and validate new mobility and transport technologies that can work with the city's road layout and features.

In 2019, we launched an innovation challenge called RoadLab, which called on the UK's leading innovators to develop technology that could make roadworks in the Capital safer, smarter and more accessible. Nine innovators were chosen to go through to a ten-week programme, where their proposed technology was trialled and developed with the support of London's major utility companies and London Councils. Following a procurement process, we awarded contracts to samdesk and Immense for technology that will make the management of London's road network safer, smarter and more efficient.

We continue to build the space for collaboration between industry and cities. Our partnership with Bosch has identified risky behaviours from camera footage, such as drivers distracted by mobile devices or making risky manoeuvres. Historic telematics incident data from Daimler has broadened our understanding of risk on London's roads and helped us co-create road risk insight products.

Action 35

Bring together original equipment manufacturers, innovators and key stakeholders during 2022 to focus on how innovation through emerging technologies could be applied in vehicles to support our road safety objectives.

New actions

Supporting people from deprived backgrounds

People from more deprived backgrounds are less likely to own a car and more likely to live in areas with high exposure to traffic and road risk, air pollution, noise and community severance caused by traffic. These Londoners are also more likely to walk for longer, and if they do own a motorised vehicle, are more likely to drive or ride for work, putting them at greater risk.

We are working to highlight the link between deprivation and poor road safety outcomes, and using that data to prioritise road safety interventions, including by sharing that information with the boroughs.

Action 36

Publish analysis in 2022 describing how unequal road outcomes manifest among different demographics and communities, to share with boroughs and other stakeholders. Incorporate this in the public road safety dashboard. Identify deprived and vulnerable communities with the poorest road safety records and share that information with boroughs and other stakeholders.



Page 167

We must continue to improve the services offered to victims

Improving support for victims of road danger

Some victims and families affected by road danger are not getting the support they need and deserve. While there are a host of organisations that specialise in providing support services for physical and emotional trauma, the onus is on victims – who are often traumatised, in shock or bereaved – to proactively seek out these services.

More needs to be done to provide the level of support currently afforded to victims of crime but not to those bereaved or injured in collisions. We are working with the Government to understand what more we can collectively do.

The Government is considering options for a long-term national solution. We will work with the DfT to help shape its proposals to meet the needs of road crash victims across London.

Despite the Government’s welcome intervention in this area, we think it is likely that additional support will be required. We want to build on the work of the Sarah Hope Line to ensure those that are bereaved or left with life-changing injuries in road traffic collisions receive the specialist support they need.

In collaboration with the Victim Commissioner for London, the Mayor’s Office for Policing and Crime and the MPS, we are exploring options for enhancing victim support through support agencies that already specialise in road trauma support. Our aim is to increase the number of people supported and improve the offer of support to those left bereaved or left with life-changing injuries. We will work with the MPS to implement a robust and proactive referral mechanism, removing the burden from victims and bereaved families having to search out and make contact with appropriate support agencies. We will ensure that efforts in London are complementary to any national solution proposed by the DfT.

450

people have benefited from the support of the Sarah Hope Line since 2016



2019

when we launched the RoadLab safety innovation challenge



07

Working together

Together with our partners and suppliers, we must consider every opportunity make our roads safer and ensure that safety continues to be at the heart of everything we do



We have a number of partners that we are working closely with as we strive to achieve our Vision Zero target

While we have made good progress towards Vision Zero, eliminating death and injury will require sustained effort over many years. We will need to continue to innovate, adapt and refresh our plans in response to emerging trends and challenges.

A culture that regards road danger as inevitable and risk taking as acceptable is extremely strong and pervasive, and heavily engrained into our day-to-day lives and wider society.

To achieve our Vision Zero objectives, we need to make the changes we are committed to but also galvanise the public, boroughs, community organisations, freight and logistics, businesses, contractors, transport professionals and all public servants. Ultimately, Vision Zero can only be achieved when everyone plays a role and commits to sustained, long-term action and funding for road danger reduction. Only by working in partnership can the police, London's boroughs and TfL deliver our ambitious commitment.

This means we must continue to work together to shape our actions, share and drive best practice, create networks of delivery, mobilise communities, and maintain accountability to each other.

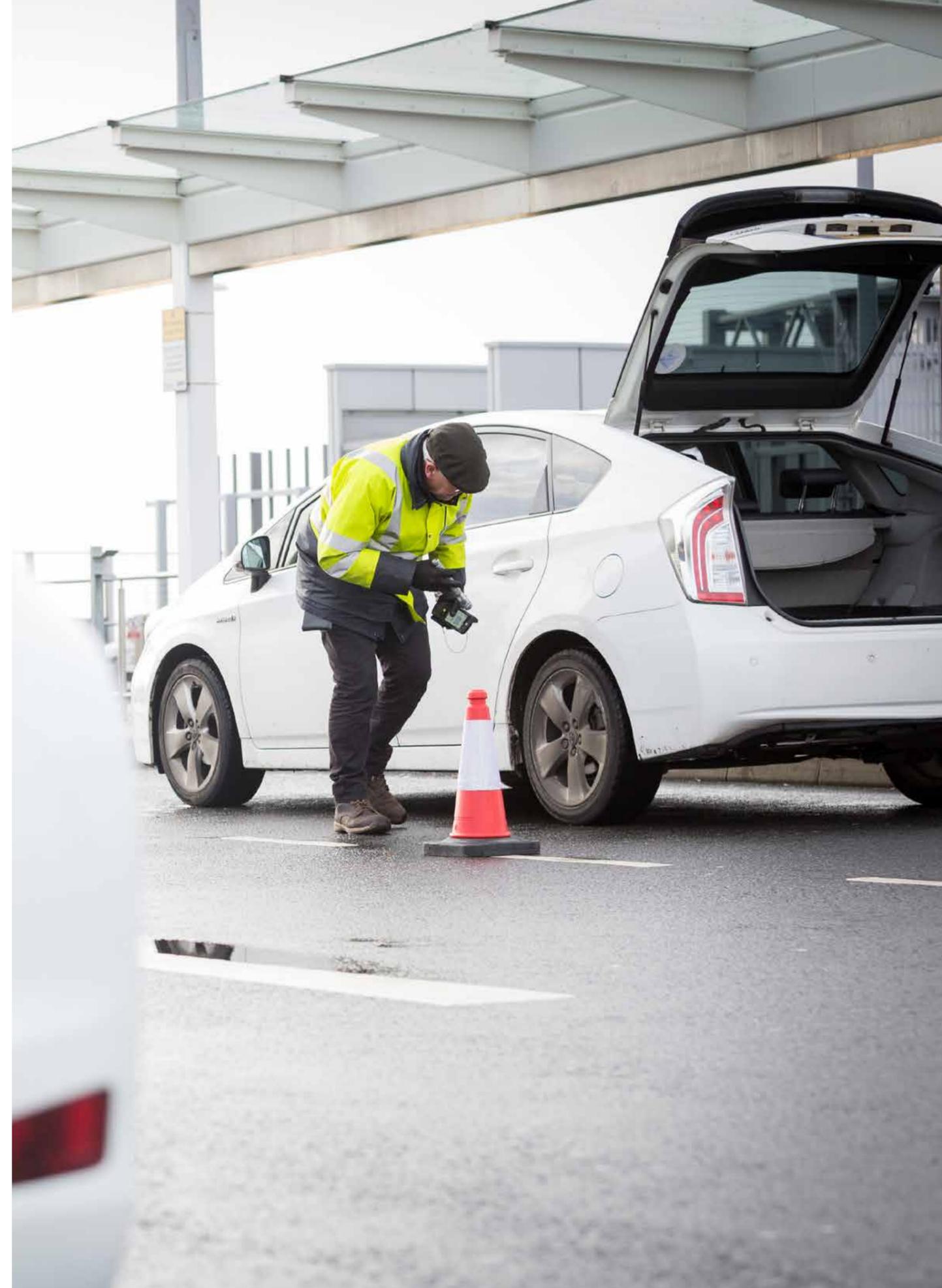
Our achievements

Vision Zero Reference Group

Since 2019, we have brought together a diverse group of organisations across the public and private sector to help us shape our Vision Zero policy development and delivery. The Reference Group has urged us to look more holistically at vehicle standards and held us to higher standards of data provision and transparency, resulting in the launch of our new Vision Zero collision dashboard.

Most importantly, the group plays a crucial role in creating a wider network of advocates and delivery agencies for Vision Zero, embedding a culture of safety in organisations across the Capital. We will continue to strengthen this important part of our culture change activity and shape our work using their insights and feedback.

We will also continue to engage with other strategic stakeholders to shape our Vision Zero actions, including those representing the interests of freight, active travel, taxi and private hire operators, and those representing our customers, particularly those at higher risk.



Our work with our partners is vital to improve vehicle safety

Our governance

We will continue to monitor progress and delivery of our actions, and how well we are doing to achieve our overall aim of eliminating death and serious injury from London's roads, through scheme monitoring, the TfL Scorecard, and updates to the major governance forums, including our Executive Committee and the our Board's Safety, Sustainability and Human Resources Panel.

Create a delivery, courier and servicing forum for rider safety

Throughout 2021, we have been focused on better understanding the challenges experienced by riders and shape a plan of action to tackle these.

We have spoken with many organisations in the sector and know they are committed to reducing death and serious injuries among their riders. We will host an ongoing forum to promote higher standards of safety and training, identify opportunities and discuss emerging issues.

Delivering with the boroughs

Vision Zero is a critical part of our wider strategy that enables a low carbon, liveable and economically thriving city where transport benefits are available to all and where the carbon dioxide, pollution, noise and congestion impacts of transport are kept to a minimum.

We are continuing to work in partnership with London boroughs to ensure they have the data and insight they need to embed road safety in their Local Implementation Plans, and work on building a safer, greener, cleaner London.

We believe this is the perfect time for the MPS, London's boroughs and us to re-commit to taking an active approach to Vision Zero and place it at the centre of our policies, projects and the way we speak to our communities. We have committed to providing localised data, information and expertise to support the development of schemes and interventions that help to reduce road danger across all communities in London.

Steps under the safe systems pillars we can collectively take to help eliminate road deaths and serious injuries from London's streets, are:

- Lower speed limits to 20mph
- Reduce traffic on local streets for safer, greener roads with cleaner air to protect children and people walking and cycling
- Design streets with safety in mind, to help everyone get around the roads safely and make active travel attractive
- Promote and encourage ways to travel which pose less risk to other people on the roads
- Lead by example in committing to eliminating casualties on our streets, through own supply chains and fleets
- We can see an end to death and serious injury on London's roads, but only if we all work together

77

new or improved pedestrian crossings delivered between 2016 and 2020



608

junctions have been upgraded by the boroughs between 2016 and 2020

08

Our progress

We have made notable progress since our original Vision Zero action plan was published and we continue to work through our actions, while adding new targets and initiatives

| Action Number | Action | Complete/Ongoing/New | Progress report (for 2018 actions) |
|--|--|----------------------|---|
| Safe speeds | | | |
| Action 1: TfL will engage on proposals to reduce speed limits on TfL roads by: | | | |
| 1a | Ensuring all our roads within the central London Congestion Charging zone has a 20mph limit | Complete | This action was met in March 2020 when the new 20mph speed limit came into force on our roads inside the Congestion Charging zone |
| 1b | Delivering a programme to reduce speed limits on other locations on our roads to address areas of high road danger | Ongoing | Design work continues on Phase 2 of the programme. our plan to reduce the speed limit by 10mph on 25km of our roads, including A13 Commercial Road, A10 Great Cambridge Road, A23 London Road and on our remaining roads in City of Westminster by the end of 2021/22. |
| Action 2: The boroughs, police and us will improve compliance with speed limits by: | | | |
| 2a | Redesigning streets to encourage lower speeds as part of their Healthy Streets programmes. We will publish a toolkit of best practice design measures in 2018 for reducing speaks to lower limits or 20mph | Complete | The final toolkit was published on our website in June 2019. Consequently, nearly 50 per cent of London's roads now operate with a 20mph speed limit including a new 20mph speed limit on all our roads in central London. |
| 2b | Optimising the use of speed cameras including increased use of mobile speed enforcement technology by the MPS in areas of higher risk and/or community concern | Ongoing | Significant effort has been made to optimise the effectiveness of London's safety camera operation including technology improvements to improve enforcement processing capacity and enforceability of the network. This has contributed to a significant increase in the number of offences speeding offences processed. New mobile safety camera equipment was purchased and will be operational in autumn 2021, enabling us to better respond to emerging issues and local community concerns about speeding. We welcome the improvements recently made to the Home Office Type Approval process which should address the long delays in getting much needed technology improvements approved for enforcement purposes. |
| 2c | Enhancing on-street speed enforcement activity through a three-tier policing and enforcement approach | Ongoing | The MPS RTPC has implemented the three tier policing approach and it is now business as usual for the deployment of RTPC officers for road danger. See actions 2b1; and 9 a, b & c. |
| New actions: | | | |
| 18 | We will challenge the culture around speeding in London by: <ul style="list-style-type: none"> Significantly enhancing police capacity to enforce up to one million offences per year by 2024/25 by drivers who continue to speed Implementing new safety camera technology that will enable the police to take action against high-risk speeders, regardless of which camera has captured the speeding offence, once approved by the Home Office. Approval is expected by the end of 2021/22 Launch five new mobile safety cameras by the end of 2021, operated by a team of Roads Policing police community support officers, to target enforcement in areas of local concern | New | |
| 19 | Accelerate the roll out of lower speed limits across a further 140km of the our road network by 2024, to reduce the likelihood and severity of collisions. Work with Government to propose 20mph as the default speed for all residential roads. | New | |
| 20 | The MPS will designate police constable traffic enforcement powers to Police Community Support Officers so that they can stop speeding vehicles and take enforcement action against drivers, thereby further increasing police speed enforcement capacity. Beginning in 2022, powers and training will be rolled out in a phased approach beginning with 400 Police Community Support Officers in the RTPC. | New | |

| Action Number | Action | Complete/Ongoing/New | Progress report (for 2018 actions) |
|---|---|----------------------|--|
| Safe streets | | | |
| Action 3: Reduce danger at junctions by: | | | |
| 3a | Delivery of the Safer Junctions programme to reduce both collisions and the fear of collision at London's most intimidating junctions. This includes improvement schemes to be completed in at least 20 more locations by May 2020, bringing the total to 41. The majority of junctions in the current programme will be either completed or consulted on by 2023. | Complete | 43 Safer Junction projects have been delivered to date – 60 per cent of the 72 in the original programme. Whilst the majority have been completed, we will continue to improve other junctions on this list between 2021 and 2024, subject to confirmation of future Government funding. |
| 3b | Extending 'Keep clear' markings at appropriate locations on our red route roads, to enable earlier visibility between drivers turning into or out of side streets and people approaching on motorcycles and bicycles. | Ongoing | 'Keep clear' markings within the scope of current projects in design are recommended to be extended through regular scheme design review meetings. A means of recording and delivering against a programme needs to be agreed and this will include measuring the number of projects where roads that aren't ours adjoin red routes. |
| Action 4: | | | |
| 4a | Ensure that road danger reduction is central to design and delivery of all schemes, including through the use of the Healthy Streets Check for Designers, design guidance literature and monitoring. | Complete | Scheme designs have improved with increased training and awareness of safety best practice from sponsors and designers. As of September 2021, 35 scheme reviews were carried out at monthly Safety Outcome Review meetings held since December 2020 |
| 4b | We will investigate ways to make it easier for people to report road defects, such as improving its online tool. | Complete | We have streamlined the reporting process for road defects along with other safety concerns. The Streetcare process was successfully launched and is available online. |
| Action 5: | | | |
| 5 | Introduce a world-leading Bus Safety Standard for the city's entire bus fleet, incorporated into all new London buses and bus operator contracts from the end of 2018. | Ongoing | The Bus Safety Standard Specification has been written into all bus related contracts from end of December 2018. BSS 2021 vehicles will be on street from summer 2021. |
| New actions: | | | |
| 22 and 24 | Keep Londoners safe and continue to drive down the number of deaths and serious injuries: <ul style="list-style-type: none"> Continue to deliver improvements at Safer Junctions, as well as at other high-risk locations on the network Continue to deliver a prioritised programme of new pedestrian crossings, including at junctions where there are none currently Identify high-risk junctions lacking pedestrian crossings and installing signals to improve safety for people walking Work with the boroughs to implement measures to reduce through-traffic from residential roads, to improve safety, air quality, and reduce noise pollution | New | |
| 23 | Continue to expand London's Cycleway network, including upgrades at junctions, so that more Londoners have access to the network of signed, high-quality cycle routes. Work with boroughs and other stakeholders to target interventions to encourage more cycling activity by underrepresented groups. | New | |
| 25 | Improve street safety for people motorcycling. Ensure design guidance for motorcyclists reflects current best practice and targets the most common causes of motorcycle collisions on the network. Develop and pilot a motorcycle safety review tool, tested with stakeholders, to improve safety on corridors with the highest harm. | New | |

| Action Number | Action | Complete/Ongoing/New | Progress report (for 2018 actions) |
|--|---|----------------------|--|
| Safe vehicles | | | |
| Action 6: Raise HGV safety standards by: | | | |
| 6a | Launching the world's first Direct Vision Standard for HGVs. An associated permit scheme will be launched, with permits issued from 2019 and enforcement starting from 2020. The scheme will be further rolled out and the standards tightened by 2024 | Ongoing | <p>The full enforcement project went live on 1 March 2021 after having been postponed due to the pandemic, and extensive enforcement has been done since by dedicated officers in our Crime and on Street Policing Services team.</p> <p>Work leading up to 2024 tightening is ongoing to only permit vehicles with a three star rating to drive in London.</p> <p>In September 2021, around 18,000 permits had been issued and 70,000 vehicles fitted with additional safety measures since the launch.</p> |
| 6b | Working with the European Union and manufacturers to change European standards on direct vision | Ongoing | Work is ongoing to reach a consensus regarding direct-vision vehicle design standards at UNECE-level based on our Direct Vision Standard approach. Agreement has already been reached at the VRU Proxi Working Group pending final voting in October 2021. |
| 6c | Requiring all operators in the GLA family supply chain starting new contracts advertised from November 2018 to be accredited to a minimum of FORS Silver and FORS Gold by April 2024. | Complete | The first phase of mandating FORS Silver in new contracts for fleet operators in the TfL Supply chain was completed in November 2018. |
| 6d | Updating our Construction Logistics Planning Guidance in 2019 to promote best practice in reducing the risk posed by construction vehicle movement, and producing new traffic management guidance for 2019 to enable safe movement of people past construction sites. | Complete | These actions were successfully completed, and there is now a link between FORS and the CLOCS schemes with FORS Silver a minimum requirement for membership of CLOCS. |
| Action 7: Raise vehicle safety and operating standards for taxis, private hire vehicles and other vehicles used for work in London, through a range of targeted interventions that include: | | | |
| 7a | Establishing vehicle safety and performance standards for new taxi and private hire vehicles and reviewing requirements for safety systems. | Ongoing | <p>On 20 June 2019, we held early discussions on new audio for hybrid vehicles. We approved the use of the Dynamo taxi on 28 August 2019. Regulations EU540/2014 and ECE R138 state that: 'Manufacturers shall install AVAS in all new registered hybrid electric and pure electric vehicles by 1 July 2021'.</p> <p>LEVC – All taxis built from 20 April 2021 have AVAS installed.</p> <p>The Dynamo taxi engineering team were provided with a derogation to regulations EU540/2014 and ECE R138, given the relatively small number of taxi models produced by that company. All current taxi vehicles, including approximately 80 Dynamo taxi models in London are part of this derogation.</p> <p>The new vehicle supply from Nissan will be available from October/November 2021 and those vehicles will have AVAS systems installed at point of vehicle manufacture.</p> |
| 7b | Reducing the risk of vehicles used for work by developing a single set of safety standards for the operation of all vehicles used for work, and promoting it to London organisations who employ staff who drive as part of their jobs | Complete | The alignment was completed in November 2018. |

| Action Number | Action | Complete/Ongoing/New | Progress report (for 2018 actions) |
|---------------------|--|----------------------|------------------------------------|
| New actions: | | | |
| 26 | <p>Drive major improvements in safety across London's bus network and ensure no-one is killed in or by a London Bus by 2030 by:</p> <ul style="list-style-type: none"> Continuing the roll out of the Bus Safety Standard on new vehicles and retrofitting features to bring forward casualty reduction benefits Working with operators to expand and deliver the Fatigue Management Programme Building on the Destination Zero training programme, to enable drivers to adapt to the changing streetscape, and work to achieve Vision Zero Carrying out in-depth bus collision data analysis Promoting a culture of transparency internally and across operators, and publishing data wherever possible Improving safety monitoring and assurance processes among operators Using the Sarah Hope Line to provide support to victims and witnesses of serious incidents Reducing passenger injuries due to slips, trips and falls Working with operators to develop a bus driver Health and Wellbeing Programme | New | |
| Action 5: | | | |
| 27 | <p>Encourage the adoption of safer vehicles:</p> <ul style="list-style-type: none"> Engage with the Government to support full adoption of the EU General Safety Regulation (GSR) making safety technologies mandatory in all new vehicles in the UK from 2024 Investigate the feasibility of procuring only EuroNCAP five-star cars and vans as part of our commitment to safer and greener fleet. Influence our supply chain, partners and fleet operators in London to use safer vehicle fleets, including by developing simple guidance by 2022 to help navigate what is available to help operators make the best fleet procurement decisions Retrofit Intelligent Speed Assistance systems to 350 vehicles in our fleet, and to 500 buses by the end of 2021/22 | New | |
| 28 | Investigate including vehicle safety standards in policies and charging standards to improve London's emissions and reduce congestion. | New | |

| Action Number | Action | Complete/Ongoing/New | Progress report (for 2018 actions) |
|--|---|----------------------|---|
| Safe behaviours | | | |
| Action 8: Use marketing and communications to tackle the behaviours that create most risk on our streets, through a series of incisive and targeted marketing and engagement campaigns, starting in 2018 with a focus on reducing inappropriate speed | | | |
| 8 | Use marketing and communications to tackle the behaviours that create most risk on our streets, through a series of incisive and targeted marketing and engagement campaigns, starting in 2018 with a focus on reducing inappropriate speed | Complete | We have created the Watch your Speed campaign, which focuses on raising awareness with drivers of driving at inappropriate speeds. We have also created a behaviours campaign for motorcycle riders and drivers to ensure they watch out for each other when turning. |
| Action 9: The MPS Roads and Transport Policing Command will deter risk-taking on the road through an enhanced, three-tiered approach to policing and enforcement from 2018, through: | | | |
| 9a | Intensifying focus on the most dangerous drivers and riders. | Ongoing | The three-tiered approach has been implemented and now provides the framework for how RTPC officers are deployed. This is supported by a new risk-based analytical approach to help prioritise deployments and inform the tactics used. As part of the three-tiered policing approach, the RTPC has intensified focus on the most dangerous drivers and riders using various tactics. High risk offenders include those with multiple disqualifications, regular drink / drug driving, involvement in moped-enabled crime, continued dangerous driving despite intervention, wanted on warrant or inked to violent crime and transport crime. The RTPC is using offender management plans, investigation and disruption tactics, targeted policing operations and ANPR to manage known high-risk offenders. |
| 9b | Intelligence-led activity targeting specific locations, times and offences. | Ongoing | Data-driven enforcement is a core element of the three-tiered policing approach where RTPC officers are deployed to known problems, locations, times and road-user groups identified through our and MPS risk-based analysis. Activities include problem-solving approaches at priority locations, enhanced and targeted enforcement (such as on the A10 and A12), regular Command-wide enforcement action (including national policing operations) and public engagement and education. While the RTPC has the lead responsibility for roads policing in the MPS, deployments are regularly supported by other MPS teams. |
| 9c | High-visibility patrols to maximise coverage across London and amplify the deterrent effect | Ongoing | RTPC officers using a mix of different tactics to maximise the coverage and visibility of roadside policing and enforcement activity. These deployments are informed by risk-based analysis. |

| Action Number | Action | Complete/Ongoing/New | Progress report (for 2018 actions) |
|--|---|----------------------|--|
| Action I0: TfL will raise standards for professional drivers and riders through training and education, including: | | | |
| I0a | Rolling out a programme of safety workshops for Bus Driving Instructors and a new, innovative training course for all 25,000 bus drivers to develop new skills in reducing road risk, as part of the Bus Safety Programme; and trialling the use of psychometric testing of prospective bus drivers through the Bus Safety Innovation Fund. | Ongoing | Up to September 2021, 200 driving instructors and more than 25,000 bus drivers had been trained and the programme continues to help improve the awareness of bus drivers to all types of road dangers. |
| I0b | Consulting on proposals for all new and existing private hire drivers to take an advanced driving test, reviewing licensing and relicensing requirements, and exploring opportunities for safety information to be issued to drivers and passengers via private hire and taxi apps. | Complete | There was extensive consultation with the industry on introducing an Advanced Driving Test, but this will not be introduced in the short term. Instead, our Taxi and Private Hire directorate is concentrating on a series of measures that have been recommended by the DfT in their Statutory Standards report. In October 2021, Taxi and Private Hire will introduce a new assessment for private hire drivers that will test their knowledge in a series of areas, including safety, regulatory and equality obligations. |
| I0c | Expanding FORS to include a standard for the motorcycle courier sector. | Complete | Version five of the FORS standard went live in January 2019 having been extended to include powered two-wheelers. |
| I0d | Requiring drivers of our vehicles to complete Safe Urban Driving training modules, and rolling out telematics technology to all vehicles in our fleet to monitor drivers' safety performance. | Ongoing | We have telematics fitted to all of the vehicles in our fleet, except for 13 electric vehicles that will be fitted with telematics when a compatible solution is available. In addition, speed limiting devices will be fitted to 350 vehicles. These devices have been tested by us and our supplier and will be added to the vehicles from October 2021. Safe Urban Driving training was not rolled out to our drivers due to Government requirements for people to work from home during the pandemic. A revised plan for rolling this out will be considered for 2022/23. |
| Action II: Provide improved and better targeted skills training and education on how to avoid danger when walking, cycling and motorcycling by: | | | |
| IIa | We will make the case to Government that road safety education plays a role in the in the national curriculum. | Ongoing | Working closely with Government, we are supporting the development of the DfT's Road Safety Action Plan. Together we will identify those areas where our joint effort will have the greatest effect to help improve road safety through greater road user education. |
| IIb | Providing a broad range of motorcycle training interventions to meet the varied needs of London's riders and to reduce risk to people walking and cycling. | Ongoing | Three packages consisting of marketing, training and design guidance are available. This includes around 1,000 motorcycle training sessions delivered via 'Beyond CBT' and 2,500 one-to-one driver trainers courses delivered from 2017. |
| IIc | Finding new ways to communicate the most impactful safety advice including virtual reality technology. | Complete | We have engaged with key stakeholders, particularly the MPS, to run several virtual reality days using headsets to highlight road safety issues and progress resolution. Despite disruption caused by the pandemic, in 2020, 119 people took part in a Cab 'exchanging places' event, and a further 351 took part in a virtual reality experience. In 2019, there were 892 Cab 'exchanging places' events and 1490 virtual reality sessions. |
| IId | Increase the number of adults completing cycle skills training and increase the number of children trained by 50 per cent, by 2024. | Ongoing | In the past five years, 142,000 children have done Bikeability Level 2 training and more than 100,000 adults have received cycle safety training. Since 2020, nearly 3,000 people have completed all four modules of our online Cycle skills courses. |

| Action Number | Action | Complete/Ongoing/New | Progress report (for 2018 actions) |
|---------------------|--|----------------------|------------------------------------|
| New actions: | | | |
| 29 | <p>Work to reduce the number of people killed and seriously injured on or by motorcycles, particularly bikes under 125cc:</p> <ul style="list-style-type: none"> • Work with the DfT to identify improvements to the CBT course as set out in the 'Improving Moped and Motorcycle training' consultation of 2016/17. Survey other countries to understand good licensing practice around the world by the end of 2021 • Ensure all our courses and communications are targeted at people at the highest risk of being killed or seriously injured and increase training numbers by 10 per cent in 2022/23. Work with UK Road Offender Education to make the motorcycle diversionary course RIDE better suited to urban environments by Spring 2022 • Identify opportunities to encourage mode shift for casual riders from motorcycles to safer, active and sustainable modes | New | |
| 31 | Survey delivery riders and work with delivery companies to understand how to better safeguard people riding for work. Encourage delivery companies to subscribe to a common minimum standard to keep riders safe. Investigate driver distraction to understand what a safe mobile application for work looks like by the end of 2022. | New | |
| 30 | Launch a new communications campaign aimed at starting the conversation around changing the road culture by November 2021. | New | |
| 33 | We will introduce 50 new redeployable cameras for civil enforcement of road traffic rules to tackle danger hotspots by April 2022. | New | |
| 34 | Work with Government to make the case for the decriminalisation of offences in designated road space. This includes the planned decriminalisation of moving traffic offences in mandatory cycle lanes and cycle tracks expected by the end of 2021. | New | |

| Action Number | Action | Complete/Ongoing/New | Progress report (for 2018 actions) |
|--|---|----------------------|---|
| Post-collision learning and criminal justice | | | |
| Action 12: Enhance and drive excellence in collision investigation and learning by: | | | |
| I2a | The MPS providing enhanced scene management and evidence gathering training and equipment to MPS Roads and Transport Policing Command first responders. | Complete | MPS provided training courses to 72 RTP officers during 2020/21 and 42 officers at the start of 2021, with more courses being run during the remainder of 2021. |
| I2b | We work with the police and other delivery partners such as bus operators, to embed a new framework for improved, systematic information sharing and post-collision learning. | Complete | Our bus safety team has a well-established collision investigation process known as NIMI. Information is already shared with key stakeholders, and lessons learned gleaned. This links with the TfL Go, Look See process, which has been revised during the pandemic and now includes participation from all relevant stakeholders including local boroughs who take part in a VZ Road Risk Review (RRR). In addition, we launched the Road Danger Dashboard in 2020, which enables members of the public, local boroughs and media to easily analyse collision statistics. |
| Action 13: TfL, the police and other partners will work to improve justice and care for the victims of traffic collisions by: | | | |
| I3a | Publishing through our media channels the criminal justice outcomes of fatal and life-changing or life-threatening collisions that proceed to prosecution. | Ongoing | Together with the MPS, we publicise the criminal justice outcomes of fatal and life-changing or life-threatening collisions that proceed to prosecution through different media and communication channels. With the MPS, we are also looking at options to incorporate criminal justice outcomes in its regular reporting and expect this to be in place by the end of 2021/22. |
| I3b | Promoting the use of driving ban by magistrates for repeat offenders and those accumulating 12 penalty points on their licence. | Ongoing | Working closely with Government, we are supporting the development of the DfT's Road Safety Action Plan (RSAP). Together we will identify which sanctions are most effective at reducing the number of high-risk offenders, including repeat offenders who persistently disregard the law. |
| I3c | Signposting victims of collisions to the most appropriate restorative justice and post-collision support services. | Ongoing | All bereaved and seriously injured victims in London are signposted to specialist victim support services for road collisions, including Brake and Roadpeace, as well as the Sarah Hope Line. With the MPS, we recognise the need to do more in this area to help people access the support they need. This refreshed plan includes an action to enhance the support and remove the burden from victims left bereaved or with life-changing injuries to seek support. |
| I3d | Exploring options for extending the Victims' Commissioner for London's brief to include victims of road crimes, and victims of road collisions where no crime has been charged. | Ongoing | The Victims Commissioner's remit includes victims of road collisions. The Mayor's Integrated Victim and Witness Service for London also provides support to the victims of road crime, such as speeding and drink driving. The Victims Commissioner is supporting our work and that of advocates such as Brake and Roadpeace to continue to improve support for the victims of road collisions on London's roads. |

| Action Number | Action | Complete/Ongoing/New | Progress report (for 2018 actions) |
|--|--|----------------------|--|
| Action 14: TfL, boroughs and the police will monitor and record a range of indicators to measure the impact of London's road danger reduction programme, and publish the results annually on the TfL website: | | | |
| 14 | Together with the boroughs and police, we will monitor and record a range of indicators to measure the impact of London's road danger reduction programme and publish the results annually on our website. | Complete | Our Road Danger Dashboard was successfully launched in 2020 and is publicised with local boroughs through stakeholders in our Local Community Partnership and Investment Delivery and Planning, and when responding to Freedom of Information requests and Mayoral Questions. |
| Action 15: TfL will work with its key partners, including vehicle manufacturers and the Government, to capitalise on opportunities for innovation, including the use of data and new and emerging vehicle technology: | | | |
| 15 | We will work with its key partners, including vehicle manufacturers and the Government, to capitalise on opportunities for innovation, including the use of data and new and emerging vehicle technology. | Ongoing | As a result of an open R&D procurement on connected vehicle data for road risk modelling, we are working in partnership with Daimler. We are evaluating how the model they have developed from their connected vehicle data can provide valuable insight into high-risk locations on the road network. This has been published online. |
| Action 16: TfL will establish a stakeholder advisory panel to oversee implementation of this plan: | | | |
| 16 | We will establish a Vision Zero Reference Group to oversee implementation of the Vision Zero Action Plan. | Complete | The Vision Zero reference group is established and now meet three times a year. |
| Action 17: TfL will work with the UK Government and the European Commission to seek additional powers necessary to effectively tackle road danger in London, now and in the future: | | | |
| 17 | We will work with the UK Government and the European Commission to ensure it has all the tools needed to effectively tackle road danger in London, now and in the future | Ongoing | Working closely with Government, we are supporting the DfT's Road Safety Action Plan (RSAP). Together they will identifying those areas where their joint effort will have the greatest effect, and where changes made at central government level will make it easier for local government to meet the targets of the RSAP. |
| New actions: | | | |
| 35 | Bring together Original Equipment Manufacturers, innovators and key stakeholders during 2022 to focus on how innovation through emerging technologies could be applied in vehicles to support our road safety objectives. | New | |
| 36 | Publish analysis in 2022 describing how unequal road outcomes manifest among different demographics and communities, to share with boroughs and other stakeholders. Incorporate this in the public road safety dashboard. Identify deprived and vulnerable communities with the poorest road safety records and share that information with boroughs and other stakeholders. | New | |

About TfL

Part of the Greater London Authority family led by Mayor of London Sadiq Khan, we are the integrated transport authority responsible for delivering the Mayor's aims for transport.

We have a key role in shaping what life is like in London, helping to realise the Mayor's vision for a 'City for All Londoners'. We are committed to creating a fairer, greener, healthier and more prosperous city. The Mayor's Transport Strategy sets a target for 80 per cent of all journeys to be made on foot, by cycle or using public transport by 2041. To make this a reality, we prioritise health and the quality of people's experience in everything we do.

We manage the city's red route strategic roads and, through collaboration with the London boroughs, can help shape the character of all London's streets. These are the places where Londoners travel, work, shop and socialise. Making them places for people to walk, cycle and spend time will reduce car dependency and improve air quality, revitalise town centres, boost businesses and connect communities.

We run most of London's public transport services, including the London Underground, London Buses, the DLR, London Overground, TfL Rail, London Trams, London River Services, London Dial-a-Ride, Victoria Coach Station, Santander Cycles and the Emirates Air Line. The quality and accessibility of these services is fundamental to Londoners' quality of life. By improving and expanding public transport, we can make people's lives easier and increase the appeal of sustainable travel over private car use.

We are moving ahead with many of London's most significant infrastructure projects, using transport to unlock growth. We are working with partners on major projects like Crossrail 2 and the Bakerloo Line Extension that will deliver the new homes and jobs London and the UK need. We are in the final phases of completing the Elizabeth line which, when open, will add 10 per cent to central London's rail capacity.

Supporting the delivery of high-density, mixed-use developments that are planned around active and sustainable travel will ensure that London's growth is good growth. We also use our own land to provide thousands of new affordable homes and our own supply chain creates tens of thousands of jobs and apprenticeships across the country.

We are committed to being an employer that is fully representative of the community we serve, where everyone can realise their potential. Our aim is to be a fully inclusive employer, valuing and celebrating the diversity of our workforce to improve services for all Londoners.

We are constantly working to improve the city for everyone. This means freezing TfL fares so everyone can afford to use public transport, using data and technology to make services intuitive and easy to use, and doing all we can to make streets and transport services accessible to all. We reinvest every penny of our income to continually improve transport networks for the people who use them every day.

None of this would be possible without the support of boroughs, communities and other partners who we work with to improve our services. We all need to pull together to deliver the Mayor's Transport Strategy; by doing so we can create a better city as London grows.

Safety, Sustainability and Human Resources Panel

Date: 2 December 2021

Item: Air Quality Update

This paper will be considered in public

1 Summary

- 1.1 This paper updates the Panel on Transport for London's (TfL) implemented and forthcoming key proposals to improve air quality. It follows a previous update to the Panel in November 2019.
- 1.2 The paper provides a summary of current activities, across the following programmes:
 - (a) Emission control zones
 - (b) Vehicle scrappage schemes
 - (c) Electric vehicle charging infrastructure
 - (d) Converting fleets to zero emission
 - (e) Pathway to net zero carbon transport

2 Recommendation

- 2.1 **The Panel is asked to note the paper.**

3 Emission control zones

Strengthening of the Low Emission Zone

- 3.1 On 1 March 2021, tighter Low Emission Zone (LEZ) standards for heavy vehicles came into effect and apply across most of Greater London.
- 3.2 The tightening of LEZ standards was originally scheduled to take effect in October 2020. However, in response to concerns about the supply chains for newer heavy vehicles and retrofit equipment during the first lockdown, the strengthening of the LEZ was delayed until 1 March 2021 to give the freight industry more time to meet the standards. When TfL reviewed this decision in early September 2020, they found that supply chains had largely resumed and there was no need to further delay the implementation of this scheme.
- 3.3 Heavy vehicles including lorries, buses and coaches need to meet the new standards or pay a daily charge to drive within the zone. The difference between Euro IV, the previous LEZ standard for these vehicles, and Euro VI,

the new standard, is significant; about a 50 per cent reduction in Particulate Matter (PM) emissions and a 65 per cent reduction in NOx emissions.

3.4 The LEZ standards are now:

- (a) Euro VI for buses and coaches over 5 tonnes, lorries and other specialist vehicles over 3.5 tonnes – this is the same as the Ultra Low Emission Zone (ULEZ) standard (these vehicles are no longer subject to ULEZ); and
- (b) Euro 3 for PM for larger vans and minibuses – this remains the same as the previous LEZ standard.

3.5 The six-month report¹ on the impacts of the scheme was published in September 2021, and the key findings include:

- (a) Compliance continued to grow over the first six months of the scheme and by the end of August 2021 stood at 95.5 per cent, compared to only 48 per cent in 2017 when the changes to the LEZ were announced but had not yet started. In effect compliance had doubled since the scheme was announced in 2017.
- (b) Even the most challenging sector (non-TfL bus and coaches) is making great strides, with compliance at 87.1 per cent, up from 51.9 per cent in May 2019. Non-TfL buses and coaches are often built individually or in small quantities making them harder to retrofit and more expensive to replace, difficulties that have been compounded by the significant loss of trade for many of these business during the pandemic.
- (c) As part of the Mayor's commitment to lead the way and to radically transform the TfL bus fleet, all of TfL's buses meet or exceed the Euro VI standard. With the core fleet meeting the standards from the end of 2020, three months in advance of the scheme going live, this has reduced NOx emissions from TfL buses by around 90 per cent since 2016.
- (d) The LEZ also has significant benefits outside of London. Environmental Defense Fund analysis found that vehicles that passed through London's LEZ went on to drive through 95 per cent of the major towns and cities in England and Wales, with a combined population of 18 million people.

Expanding the Ultra Low Emission Zone (ULEZ)

3.6 The expansion of the ULEZ from the central zone to an area bounded by, but not including, the North and South Circular Roads was successfully launched on 25 October 2021.

3.7 This project has taken five years to develop and implement. This includes three consultation exercises, implementation of 800 new cameras and over

¹ https://www.london.gov.uk/sites/default/files/lez_six_month_on_report-final.pdf

1,400 signs, and a new back office system that processes millions of images from the camera networks. It is the largest scheme we have implemented on the surface network in London and will be one of the most impactful.

- 3.8 To prepare drivers and make them aware of the zone prior to expansion, we (TfL and the Greater London Authority (GLA)) have run an extensive communications campaign. More than a million letters were sent to those seen driving non-compliant vehicles in the area and more than 600,000 leaflets were sent to residents living close to the boundary. Four million emails were sent to people on TfL's customer database, and there has been an extensive advertising campaign spanning radio, TV, posters, press, social media and online.
- 3.9 The new zone is eighteen times larger than the original central area and covers a population of 3.8 million people. Early indications show that compliance with the standards had increased significantly by the time the scheme went live in October. Indeed, when the Mayor announced his intention to expand the scheme in February 2017, compliance with the vehicle standards was only 39 per cent. When the scheme went live last month this had increased to 87 per cent. This means we anticipate only 110,000 vehicles will need to pay the charge each day.
- 3.10 The ULEZ expansion, alongside tighter Londonwide LEZ standards, are expected to reduce nitrogen oxides (NOx) emissions from road transport by 30 per cent across London in 2021.
- 3.11 We will be monitoring the impacts of the ULEZ expansion, and will be publishing a one month, six month, and one year report with our findings. The report on the first month of operation will be published in the next few weeks and will be distributed to the TfL Board.

New Zero Emission Zones (ZEZ)

- 3.12 The Mayor's Transport Strategy (MTS) and the London Environment Strategy state that the Mayor, through TfL and the boroughs, will seek to implement local town centre ZEZs from 2020, followed by a Central London ZEZ from 2025.
- 3.1 In September 2019 we published guidance² for the delivery of local ZEZs aimed at boroughs that are interested in delivering town centre ZEZs. We have since held a number of joint GLA/TfL/London Councils workshops for borough officers to update them on the London Recovery Programme and the role that ZEZs could play, and to ask for input to a potential update of the guidance. We have subsequently been revising the existing ZEZ guidance to better reflect the current policy environment, better address areas where boroughs wanted more clarity, and include some lessons learnt from early scheme development. We are looking to publish the updated guidance document in early 2022.

² <http://content.tfl.gov.uk/tfl-guidance-for-local-zero-emission-zones.pdf>

3.2 Borough schemes to note are as follows:

- a) LB Hackney introduced the first ZEZ-type scheme in Shoreditch in September 2018 (in partnership with LB Islington) with their Ultra Low Emission Vehicle Streets scheme.
- b) The City of London launched a trial ZEZ in Beech Street in the Barbican area in March 2020. The trial meant that only zero emission vehicles, pedestrians and cyclists were allowed to drive through. The trial recently concluded in September 2021.

3.3 We are also involved in a European Union funded project called ReVeAL (Regulating Vehicle Access for Improved Liveability) alongside the City of London. The City are using ReVeAL funding to deliver a second ZEZ in the City Cluster zone, a central area focused on St Mary Axe. The scheme aims to be implemented (subject to consultation) by December 2022.

4 Vehicle scrappage schemes

4.1 The Mayor introduced vehicle scrappage schemes for vans and charity minibuses, cars and motorcycles, and heavy vehicles. The schemes are operated by TfL with £61m of funding allocated by the Greater London Authority, to help drivers in London scrap their non-compliant vehicles to meet the ULEZ and LEZ emission standards. To date, scrappage grants have helped to improve London's air quality by taking over 13,300 older, more polluting vehicles off London's roads. Raw materials from scrapped vehicles are recycled and reused by authorised treatment facilities.

4.2 The scrappage schemes prioritised the limited funding available to help the most vulnerable, meaning that they have been restricted to small businesses, low income and disabled Londoners and charities. All funding has now been allocated and the scrappage schemes have closed to new applicants.

4.3 The Mayor continues to call on Government to commit resources to a targeted national diesel scrappage scheme. Government has provided funding for scrappage in Birmingham, Bath and Portsmouth to support their Clean Air Zones but has not provided any funding for scrappage in London.

5 Electric vehicle charging infrastructure

Infrastructure delivery in London

5.1 Much has been achieved over the past few years, and there are now over 7,600 publicly accessible charge points in London, delivered through both the public and private sectors. London's infrastructure now accounts for around a third of the UK's total charge points and represents a 55 per cent increase in EV charging points delivered between 2019 and 2021.

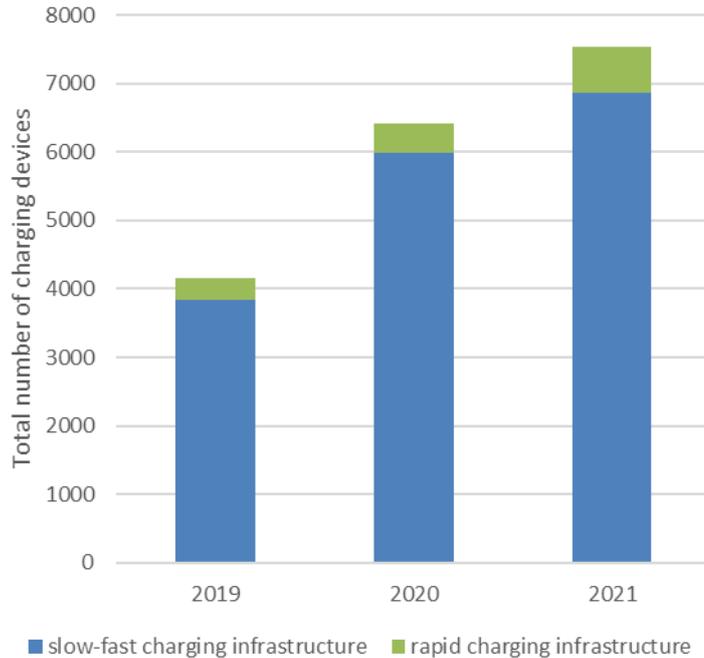


Fig 1. Charging devices by type across London (Source: Zap-Map)

- 5.2 Much of this delivery has been led by the public sector. For example, as part of the Mayor’s first-term commitments, TfL ran a rapid delivery programme which achieved, ahead of schedule, the Mayor’s target of 300 rapid charge points installed by the end of 2020. At this time 310 rapid charge points have been installed by TfL in London. 84 of these are dedicated to taxi use only to support the transition for this key fleet. We have also delivered two flagship rapid hubs, in east and south London. A third site at Baynard House in central London expected to be delivered in 2022.
- 5.3 The private sector has delivered rapid hub sites in west and south London near Heathrow on the M4 and on New Kent Road respectively, with a number of dedicated hubs also delivered to serve key user groups such as taxis and commercial vehicles.
- 5.4 Following a successful bid to the Office for Zero Emission Vehicles (OZEV) in 2016 for Go Ultra Low Cities Scheme (GULCS) funding, London was awarded £13.2m. Since delivery began in 2018, the London boroughs have been allocated £7m of this funding to install on-street, predominantly lamp post column charge points to meet the need of residents without off street parking. The programme has supported delivery of more than 4,800 charge points to date, with a further 500 planned for delivery by the end of March 2022. More recently, London Councils has supported the boroughs to secure c.£6m further funding through the On-street Residential Charge point Scheme (ORCS), to deliver more than 1,500 additional charge points by March 2023..

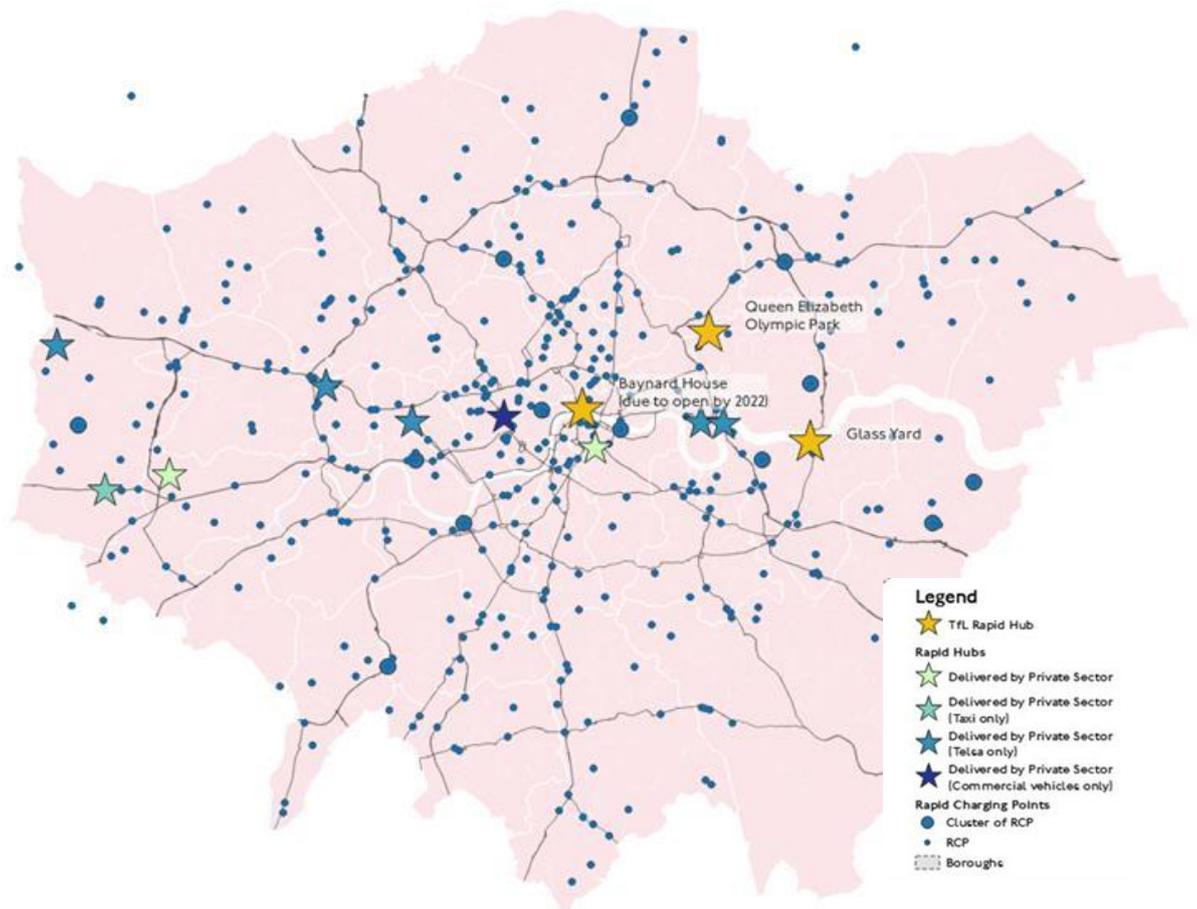


Fig 2. Distribution of London's rapid charge points and hubs in 2021. (Source: Zap-Map, July 2021)

Electric vehicle infrastructure strategy

5.5 In 2019 we published the Electric Vehicle (EV) Infrastructure Delivery Plan, steered by the Mayor's EV Infrastructure Taskforce, which looked at how to overcome the barriers to delivering EV infrastructure in London, as well as how much would be needed, by 2025. Following on from this, we have listened to the issues raised by many around the difficulty in switching to EVs and user experience of EV charging. This, together with recent trends and policy changes, including the phase out of petrol and diesel cars and vans by 2030, has led us to updating the forecasts for London and projecting them to 2030. We have drafted a new EV infrastructure strategy, which sets out how the switch to EVs in London can support the Mayor's ambition of becoming a net zero-carbon city by 2030, and the roles and responsibilities of all stakeholders, including the GLA and ourselves in facilitating this.

5.6 Published on 15 October 2021 as a draft summary document, we are seeking further input and carrying out engagement with stakeholders. The publication of the full strategy is expected by the end of 2021. The strategy sets the following vision:

“Supporting a net zero carbon target for London by 2030, and better air quality for all, the London Electric Vehicle Infrastructure Strategy seeks to accelerate

the transition to zero emission vehicles by setting out the requirements for the provision of infrastructure, focusing on essential trips”

5.7 Related to this focus on essential trips, our strategy is clear about how to prioritise the needs of key user groups, and supporting their transition to EVs. Key users have been identified as those making high mileage trips performing an essential role, including taxis and private hire drivers, as well as other commercial vehicles. Whilst the priority for other groups is mode shift to walking, cycling and public transport in line with MTS objectives, we want to ensure that EV infrastructure in London supports everyone who does need to drive to switch to zero emission transport.

5.8 The draft strategy contains a number of commitments, set out below.

Commitments in the EV infrastructure strategy:

Keystone commitment:

- From 2022, unlock GLA Group land to repurpose it for EV charging – addressing one of the biggest barriers to infrastructure roll out in London. Lead the way for London boroughs to unlock their land, ensuring sufficient levels of charging can be achieved.

Supporting all users:

- Develop a real-time and open API of all charge points in London subject to an initial feasibility study and Government funding - from 2022.
- Support the delivery of shared charging facilities - pioneer the first bus garage shared infrastructure, which, subject to Government funding, will get under way in 2022.

Supporting the EV industry:

- Update London level forecasts every 2 – 3 years and supporting boroughs with granular forecasts - in 2022.
- Provide demand data and evidence base to support private sector investment in rapid charging infrastructure, via Charge Point Operators' (CPO) Forum.
- Seek a partner to set up an EV Ethics and Sustainability Committee to engage with international cities, governments, trade bodies, NGOs etc to identify collective international action on addressing the EV ethics and sustainability supply chain issue.
- Work with energy distributors (DNOs) to identify localised grid constraints, so that DNOs can get government support to fund grid upgrades.

- Support CPOs to streamline the verification of driver licence status, improving efficiencies when applying preferential charging rates to key users.
- Explore green financing opportunities – working with the private sector to find the best financing solutions to support the roll out of EV infrastructure.

Supporting taxis:

- Work with CPOs to find technical solutions to enforce taxi-dedicated bays (already begun).
- Continue delivery (subject to funding) of taxi dedicated bays in locations where taxi drivers frequently work. We will also explore dynamic solutions in the future to maximise utilisation.
- Continue to explore innovative charging options including wireless charging on taxi ranks.

Supporting Private Hire Vehicles (PHV)s:

- Encourage delivery of slow-to-fast charge points focusing in areas with a high proportion of private hire drivers.
- Support the delivery of rapid charging where drivers live and work such as town centres across the city.
- Instigate a regular forum, between CPOs and PHV representatives to help identify and resolve specific issues.

Supporting Light Goods Vehicles (LGV)s:

- Establish a commercial fleet database (subject to funding) for future planning to support fleet users to switch to EVs - by 2023.
- Set up London EV Business Leader's Forum to explore how to support delivery of charging needs – from 2022.

Supporting car clubs:

- Support the electrification of car clubs by encouraging infrastructure in locations where active car clubs operate.
- Work with London boroughs and London Councils to explore dynamic solutions, for making optimal use of infrastructure, such as prioritised overnight rapid charging.

Supporting emergency services and public fleets:

- Work with emergency services and public fleets via the GLA fleet forum to support the transition to EVs. Building on joint EV infrastructure

study, coordinate EV charge point procurement, market engagement and explore joint funding opportunities.

- Assess the feasibility of a dedicated bay for emergency services at one of our rapid charging points (feasibility work starting in 2022).

5.9 The EV Infrastructure Taskforce has been consulted on the emerging draft and we are holding individual meetings with those who are keen to engage further. Since publishing the draft summary strategy, we have also been holding workshops for specific groups such as car clubs, business sector representatives, taxi and private hire, to discuss further the overall strategy and commitments.

6 Converting fleets to zero emission

Buses

6.1 London has brought forward the timeframe for having an entirely zero-emission bus fleet from 2037 to 2034 following an announcement by the Mayor earlier this year that all new London buses will be zero emission.

6.2 This will mean the current 566 zero emission vehicles increasing to circa 800 by the end of March 2022, subject to the ability of the bus manufacturing industry to build and supply them and the necessary grid and garage infrastructure being put in place.

6.3 Following the announcement, the Mayor hosted a Zero-emission Bus Summit, organised by the Campaign for Better Transport and TfL. This allowed representatives from central and local government, bus operators, manufacturers and wider stakeholders to meet to drive forward the uptake of zero-emission buses across the UK.

6.4 Not only will this transition help reduce the harmful pollutants in the air, it will also help us combat the climate change emergency and contribute towards the UK's targets of a 68 per cent cut in CO₂ by 2030, rising to a 78 per cent net reduction by 2035.

6.5 Although most zero-emission buses are pure electric, we continue to support the piloting of potentially complementary technologies like hydrogen. 20 double-deck hydrogen fuel cell vehicles are now operating on route 7 from East Acton to Oxford Circus, as well as some route 245 journeys between Alperton & Golders.

6.6 The faster transition timeframe will enable London to have a total of 10 per cent of its fleet zero emission by the end of 2022 subject to Government support as well as demonstrate to manufacturers that a very significant market is opening up for clean vehicles. This will help increase the commercialisation of this sector, increased jobs and apprenticeships across the UK and help London move away from vehicles powered by fossil fuels. If more significant Government support becomes available, we will look to make the fleet zero-emission even earlier than 2034.

- 6.7 If instead, due to reduced funds, we have to reduce the network, fewer new buses will enter the fleet and the benefits of the Bus Safety Programme will be much slower to realise. It is also likely to lead to slower research and development from bus manufacturers looking to achieve the new designs, if there is no pipeline of orders on which to recoup their substantial investment. The 2024 standard would therefore be put at immediate risk.
- 6.8 It would also likely mean the pause or cancellation of retrofit work on the existing fleet, as well as further development of research into improvements. It could also lead to a scaling back of work to address driver wellbeing. A pause, slow down or stopping of these workstreams will also have direct impacts on our Vision Zero objectives.

Taxis and Private Hire Vehicles (PHVs)

- 6.9 Since 1 January 2018 all newly licensed taxis have been required to be Zero Emission Capable (ZEC). As of 2 November, a total of 4,749 ZEC taxis have been licensed in London. This is over a third of the current operating fleet.
- 6.10 The industry has been supported to transition to newer, greener vehicles with a taxi delicensing scheme and ZEC taxi grants. To ensure that emission reductions from taxis are achieved at the pace needed to meet our air quality targets, we have also introduced a mandate for maximum applicable taxi operating age limits, and removed standing exemptions for historic/niche vehicles, alternative fuels and hardship exemptions.
- 6.11 Currently the maximum age limit for Euro 3, 4 and 5 diesel taxis is 13 years and this will reduce to 12 years (and remain at 12 years) from 1 November 2022. The maximum age limit for Euro 6 diesel taxis and ZEC taxis remains at 15 years, which is also the age limit for taxis that are newly converted to Liquid Petroleum Gas (LPG).
- 6.12 Current emission standards for PHVs require that PHVs under 18 months old must be zero emission capable and meet the Euro 6 emissions standard when licensed for the first time, and those over 18 months old must have a Euro 6 (petrol or diesel) engine. These standards will be tightened in January 2023, at which point all PHVs licensed for the first time will have to be zero emission capable and meet the Euro 6 emissions standard.

TfL support fleet

- 6.13 TfL's support fleet consists of approximately 1,000 vehicles. These are primarily cars and vans, with a small number of specialist heavy vehicles. We are working to meet our targets as set out in Proposal 32 of the MTS:
- (a) All cars in the GLA group support fleet to be zero emission capable by 2025 at the latest;
 - (b) all newly purchased or leased cars and vans (less than 3.5 tonnes) including response vehicles, to be ZEC from 2025;
 - (c) all heavy vehicles in the GLA group fleets to be fossil fuel free from 2030; and

(d) the entire GLA fleets being zero emission by 2050.

6.14 We are developing a strategy to convert our support fleet to ZEC, which includes the leasing of new vehicles as well as implementation of the required infrastructure in the vehicle depots.

7 Monitoring and reporting transport emissions

7.1 We will continue to monitor the speed of transition of London's vehicles to ultra-low emission vehicles (ULEVs) and will update on this to the Panel as part of regular air quality updates.

7.2 The next update to the London Atmospheric Emissions Inventory (LAEI) will be published in early 2022 and will include updated emissions for the new baseline 2019 as well as new projections for 2025 and 2030, taking into account changes to road traffic forecasts and latest data from national government on the uptake of Euro 6/VI vehicles and ULEVs.

7.3 This updated forecast will give a detailed indication of the level of progress toward the NO_x, Particulate Matter and CO₂ emissions trajectories set in the MTS.

Improving air quality and decarbonising transport

7.4 In the Mayor's recent Climate Crossroads speech, he highlighted the links between tackling poor air quality and the need to decarbonise road transport. A good example of this is the central London ULEZ which reduced NO_x by 44 per cent and also carbon emissions by 6 per cent.

7.5 Modelling suggests we are on course to achieve the zero carbon 2050 target set out in the MTS and this is primarily driven by the electrification of vehicles in London. However, it is now clear that we need to move faster, and the Mayor has called for London to become net zero carbon by 2030.

7.6 In collaboration with the GLA, we are working on pathways to meet this challenging target and to reduce cumulative emissions over this time. We will report on progress with this study in the new year.

8 Summary

8.1 There has been a significant improvement in central London's air quality thanks to the action being taken by the Mayor and TfL.

8.2 London is now benefitting from the successful launch of the ULEZ expansion in October 2021, which is predicted to reduce Nitrogen Dioxide levels by 30 per cent, in addition to the strengthening of the LEZ standards in March 2021.

8.3 In addition, the Mayor's vehicle scrappage schemes have taken over 13,300 of the most polluting vehicles off London's roads, helping drivers in London to meet the ULEZ and LEZ emission standards.

- 8.4 Internally, we are working towards a fully zero emission fleet of vehicles at TfL and are pleased to have been able to bring forward our timeframe for a zero emission bus fleet from 2037 to 2034.
- 8.5 We are working to ensure that London has the infrastructure required to support the transition of road transport to zero emissions technologies. Over 7,600 charge points have been delivered in London through both the public and private sectors, meaning London accounts for around one third of the UK's charge points.

List of appendices to this report:

None

List of background papers:

ULEZ 2020 report:

https://www.london.gov.uk/sites/default/files/ulez_evaluation_report_2020-v8_finalfinal.pdf

Low Emission Zone – 6 months on report:

https://www.london.gov.uk/sites/default/files/lez_six_month_on_report-final.pdf

Local Zero Emission Zone guidance:

<http://content.tfl.gov.uk/tfl-guidance-for-local-zero-emission-zones.pdf>

Contact Officer: Alex Williams, Director of City Planning
Email: AlexWilliams@tfl.gov.uk

Date: 2 December 2021

Item: Responsible Procurement Update

This paper will be considered in public

1 Summary

- 1.1 At the meeting of the Panel in July 2021, the Panel requested a further briefing on TfL's Responsible Procurement programme, which will now be repeated annually. This paper provides that further briefing.

2 Recommendation

- 2.1 **The Panel is asked to note the paper.**

3 2021 Activity

Skills and Apprenticeships

- 3.1 TfL's Supplier Skills team (SST) supports TfL's delivery of the skills, training, and employment opportunities theme of the GLA Group Responsible Procurement Policy, by embedding contractual requirements in relevant tenders and managing the delivery of supply chain commitments.
- 3.2 The team currently supports around 50 suppliers to implement their contractual requirements after contract award and reports quarterly supply chain apprenticeship starts to the Department for Transport.
- 3.3 In 2020-21, there were 524 new apprenticeship starts in our supply chain, of which 51.2 per cent are from a Black and minority ethnic background and 27.8 per cent are women.
- 3.4 The collaborative approach to contract management is reflected in the pre-employment programmes and annual apprenticeship fair the team delivers in partnership with key suppliers. The team has recommenced delivery of pre-employment programmes following restrictions imposed by the coronavirus pandemic.

- 3.5 In October 2021, the third Women into Transport and Engineering pre-employment programme commenced with Cleshar Contract Services, who provide track and facilities maintenance services, Siemens, who are upgrading London's road network management system, manufacturing rolling stock and provide technology, goods and services across TfL, Riverlinx CJV, who are building the Silvertown Tunnel, and Glenman Corporation, a supplier to the wider GLA Group. The programme is running in partnership with Women into Construction and gives 17 candidates two weeks of pre-employment training at CONEL college to get them work ready, in preparation for two weeks of work experience with one of the four suppliers. Sixty-four candidates attended the information sessions, looking to gain a place on the programme which guarantees an assessment or interview with any of the suppliers. There are various job opportunities and apprenticeships on offer at the end of the programme. Candidates who successfully complete the programme are guaranteed an interview or face-to-face assessment with one of the employers.
- 3.6 Historically, the programmes have put around 33 per cent of candidates into employment, and further benefits such as increased confidence and work-readiness are evident in those who do not immediately find work.
- 3.7 A series of Mentoring Circles sessions is ongoing with Morson Group, a supplier of track maintenance labour. Run in partnership with the Department for Work and Pensions, the online sessions have given over 100 individuals an insight into working on the London Underground network - with two cohorts totalling 17 individuals having completed their training so far. This work has helped support current resourcing issues in the industry resulting from people leaving the industry during the coronavirus pandemic, as well as supporting workless individuals back into work.
- 3.8 The SST has begun planning activity for National Apprenticeship Week 2022. Following the success of the virtual event in February 2021, which featured 12 supplier sessions and 290 people interested in working for TfL and its supply chain, the event will remain online and allow candidates to understand the breadth of apprenticeships on offer in TfL's supply chain.

Ethical Sourcing and Modern Slavery

- 3.9 As referenced at the meeting of the Panel in July, TfL's Modern Slavery Statement 2020/21 is now published on the TfL website.
- 3.10 TfL undertakes internal and external capacity building to raise awareness of the risk of Modern Slavery in our supply chains. Below is a summary of this activity in the first half of 2021/22:
- a) GLA Central Responsible Procurement Team (CRPT) presentation at the Asset Performance and Capital Delivery Supplier Engagement Forum on 14 October;
 - b) Modern Slavery Training: 35 staff from TfL's Property Management department attended a one hour session led by the Supply Chain Sustainability School on 23 September; and

- c) The CRPT published a blog on Modern Slavery on TfL's intranet Platform to mark Anti-Slavery Day on 18 October 2021, to raise awareness to TfL staff of the risk in our supply chains and our current activity.

Environmental Sustainability

- 3.11 CRPT liaised with Safety, Health and Environment (SHE) colleagues to ensure the environmental commitments within the forthcoming Responsible Procurement Implementation Plan (RPIP) 2021-24 closely align with TfL's Corporate Environment Plan. Key environmental commitments within the RPIP are set out in paragraph 4.2 below.
- 3.12 CRPT ensured relevant Responsible Procurement references were included in TfL's inaugural Sustainability Report, published early October 2021.
- 3.13 CRPT, alongside SHE Corporate Environment Team are working closely with Network Rail and the other transport infrastructure bodies to identify opportunities to align carbon reporting and carbon reduction requirements to our supply chains.
- 3.14 Thirty staff from engineering, project management and purchasing and supply chain disciplines attended An Introduction to Climate Change and Carbon half day workshop on 1 July led by the Supply Chain Sustainability School.

Fair and inclusive employment practices

- 3.15 Fifty-two per cent of TfL key suppliers disclosed their workforce diversity data through the Diversity Data Benchmarking Initiative, in which National Highways, Network Rail and HS2 are also participating.
- 3.16 Following supplier engagement activity led by the CRPT, Siemens, one of TfL's strategic suppliers became accredited to the Mayor's Good Work Standard (this includes accreditation to the Living Wage Foundation).
- 3.17 During Living Wage Week, 15-21 November 2021, the CRPT hosted a Fair and Inclusive Employment Practices Supplier Briefing on 18 November. Approximately 35 GLA Group key suppliers attended to hear how accreditation to the Living Wage Foundation and the Mayor's Good Work Standard can benefit their businesses.

Supplier Diversity

- 3.18 TfL has been progressing priority actions within the GLA Group Small and Diverse Business Action Plan, which is aligned with the commitment of London Recovery Board's Anchor Institution Charter to provide greater access to opportunities to small and diverse businesses affected by the pandemic.
- 3.19 TfL is participating in a GLA Group pilot to use a regulatory mechanism to reserve appropriate contracts for Small and Medium-Sized Enterprises (SMEs), identify pipeline procurements suitable for small and diverse businesses, provide access to tender readiness support, and explore scale-based insurance indemnity approaches.

- 3.20 TfL is implementing an approach to capture indirect spend with SMEs, initially engaging with 20 key suppliers, and are also engaging with tier 1 suppliers around subcontracting behaviours and prompt payment.

Contracts and Tenders

- 3.21 The CRPT supports TfL's Purchasing and Supply Chain function on implementing Responsible Procurement requirements from early market engagement through tender evaluation to contract management. The key contracts receiving support in the first half of 2021/22 are : Surface Technology Contracts Retender, High Voltage Power and TfL Revenue Collection Contract.

4 GLA Group Responsible Procurement Implementation Plan

- 4.1 The Central Responsible Procurement Team is going through the final stages of approval of the revised Responsible Procurement Implementation Plan, which sets out how TfL and the GLA Group functional bodies will deliver the Responsible Procurement Policy, revised in March 2021, over the Mayoral term 2021-24.

- 4.2 Relevant TfL highlights from the plan:

- (a) all GLA Group functional bodies will apply a minimum weighting of 10 per cent of the total evaluation score to relevant responsible procurement and social value matters, for above-threshold contracts. Through this approach, the GLA Group, although not directly in scope, is electing to align to Public Procurement Policy Note 06/20;
- (b) TfL key suppliers are to be assessed for their risk of modern slavery using the Cabinet Office tool. Medium to high risk suppliers will be invited to complete the Modern Slavery Assessment Tool, also hosted by the Cabinet Office, by 31st March 2022 and then implement continuous improvement activities to improve their MSAT score and mitigate the risk of modern slavery in their supply chains;
- (c) the GLA Group is electing to align with Public Procurement Policy Note 06/21, so that bidders for new contracts over £5m in value will be required to produce an organisational Carbon Reduction Plan at Supplier Questionnaire stage. We will also include evaluation criteria in these tenders to encourage bidders to demonstrate their contribution towards London's ambition of being net-zero carbon by 2030;
- (d) from 2025, all new contracts will require freight and servicing vehicles under 3.5 tonnes to GLA Group buildings to be zero-emission;
- (e) work across the GLA Group supply chain to support the delivery of the interim target for Non-Road Mobile Machinery (NRMM) to meet stage IV requirements by 1 January 2025; and

- (f) One hundred per cent of commercial staff to complete carbon literacy training by 2024.

List of Appendices:

None

List of Background Papers:

GLA Group Implementation Plan 2018 – 2020

Contact Officer: Jonathan Patrick, Chief Procurement Officer
Email: JonathanPatrick@tfl.gov.uk

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Safety, Sustainability and Human Resources Panel



Date: 2 December 2021

Item: Human Resources Quarterly Report

This paper will be considered in public

1 Summary

1.1 The Quarterly Report is a standing item on the agenda for this Panel. It provides an update on key Human Resources (HR) led activities and performance for the period September - December 2021.

2 Recommendation

2.1 **The Panel is asked to note the report.**

List of appendices to this report:

Appendix 1 – HR Quarterly Report

List of Background Papers:

None

Contact Officer: Tricia Wright, Chief People Officer
Email: TriciaWright@tfl.gov.uk

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HR Quarterly Report September - December 2021

2 December 2021



HR Quarterly Report

September - December 2021

Introduction

This Human Resources (HR) Quarterly Report provides an update on the activity that has taken place to support our colleagues from July -September 2021, to make Transport for London (TfL) a great place to work, for everyone.

The first section provides an update of our people performance against TfL scorecard measures.

The second section includes detail on our ongoing response to Covid-19, including our move toward office re-occupation and transition to a hybrid way of working.

The final section updates on activity delivered across the HR function aligning to 3 of our top People Priorities:

1. A More Inclusive and Diverse Organisation
2. An Engaged, Motivated and Healthy Workforce
3. The Right People, Skills and Capacity to Deliver the Business Plan



People Scorecard Measures and Performance 2021/22

Pan-TfL scorecard

Our annual People scorecard measures are focused on improving engagement, embedding an inclusive culture, striving for equality across the organisation and monitoring the health and wellbeing of all our people.

Our People targets for 2021/22 are:

- Maintain the 2020/21 total engagement level at 62 per cent
- Achieve a two percent point increase in our people feeling involved, included and safe at work, up to 54 per cent
- Achieve a two percent point increase in the overall wellbeing of our people, up to 59 per cent

Now that the scorecard is in place, we will work to ensure we achieve the targets set out. HR are both driving initiatives centrally and supporting the business with people activity to help us achieve these targets. More detail on these initiatives is set out in the remainder of this report.

Our annual Viewpoint employee survey which will help us identify these scores ran from the 4 October to the 24 October. This year we received 14,983 responses, representing over

55 per cent of our employees. The responses will provide us with a clear idea of what it's like to work here, pinpointing what exactly needs to improve to make TfL a great place to work and for everyone to thrive.

The detailed analysis of the responses is still being worked through and a full update will be provided at the next TfL Board meeting on the 2 February 2022. An informal session for Board members to discuss the results ahead of the next Board is being scheduled for January 2022.



Divisional scorecards update

Professional Services Scorecard Measures

In addition to the Pan-TfL scorecard, divisional scorecards have now been established in London Underground, Surface Transport and Professional Services.

There are four key people milestones central to our people programme of work included on the 2021/22 Professional Services scorecard.

- **Action on Inclusion strategy.** Strategy to be published and prioritised programme of work to deliver strategy developed. To be completed by January 2022

- **Successful completion of the new ways of working transition phase.** Enable hybrid working implementation and inform estates strategy. To be completed by March 2022
- **Talent management enabled by SAP Success Factors (part of wider ERP project)** Talent modules in use across the organisation in time for end of year performance management conversations and to enable critical roles and succession plans to be added to the system. To be completed by February 2022.
- **Implement Vision & Values across our hire to retire processes, policies and procedures.** Develop implementation plan. To be completed by March 2022

These milestones have been identified as key pieces of work that will support the business to meet our emerging priorities through our people and continue to make our organisation a great place to work for everyone.



Supporting colleagues through Covid-19 recovery

Deaths in Service

We continue to do everything we can to support the families and loved ones of the 103 colleagues who have tragically passed away from Coronavirus. Our Employee Assistance Programme is available to all employees and their dependents and provides support, guidance and information on a range of topics, including bereavement. This includes access to support from a qualified counsellor, bereavement counselling services and access to Cruse, a dedicated bereavement support charity. Bereavement support is also extended to families of the deceased via our Sarah Hope Line.



Returning to the Office

Government guidance on social distancing and working-from-home has changed and we are continuing our transition to hybrid working. From the 15 November, all colleagues who have been working from home are expected to spend more time working in our head offices.

A lot has changed in our head office buildings – new meeting room equipment including booking panels, new technology, we do have fewer desks space, but new collaboration spaces have been installed, and we're adopting a new hybrid way of working to enable five Cs; Cohesion, collaboration, culture and bringing back confidence and care.

Our three head offices are now COVID-aware environments so that we can continue to protect one another. Our colleagues are asked to continue practising good hand hygiene, wear a face covering while moving around the buildings and in lifts (exemptions apply), sanitise desk surfaces and equipment before and after use, do regular lateral flow tests and stay home if feeling unwell with a cough, cold or flu.



The transition phase started on 17 August and will run to March 2022 which will allow the programme to test, trial, adapt and evolve our approach driven by evidence and insights. We've conducted a Risk Assessment (and an Equality Impact Assessment) which continue to inform our programme deliverables to support people to adopt the new ways of working.

A More Inclusive and Diverse Organisation

Listening and Reflection Sessions

Last year hundreds of our colleagues attended 'Inspire a Fairer Future' listening sessions which were set up following the death of George Floyd. These sessions gave an opportunity to hear people's concerns first hand, take these on board and become a more inclusive organisation as a result.

However, it is only by keeping the conversation going can we ensure that we learn from past experiences and become more inclusive as an organisation.

In September and October, to align with National Inclusion week, we hosted more of these sessions and opened them up to hear about all experiences and challenges our colleagues have faced on equality within TfL, whether that's because they're Black, Asian or minority ethnic, a carer, LGBT+, disabled, a woman, follow a particular faith, are affected by mental health – or anything else that has left them feeling excluded or under-valued.

Black History Month

In October we celebrated Black History Month and the contribution of black individuals and communities. Our Raising Awareness of Culture and Ethnicity Staff Network Group (RACE SNG) held events throughout the month including focus groups to discuss TfL's anti-racism leadership charter

and how this will be embedded within the organisation.



We also created a Black History Tube Map, renaming our famous stations after black icons from the present day, all the way back to Tudor Britain, raising awareness of the impact of black people upon British culture.

Celebrating Diwali

On the 12 November, we held a virtual Diwali celebration for our colleagues, hosted by our RACE SNG and our Hindu & Jain Society. The event focused and discussed the impact that Coronavirus has had on a celebration which focuses on family and people coming together to celebrate.



Transgender Awareness Week

In November we celebrated Transgender Awareness Week 2021 to raise the visibility of our transgender, non-binary and gender diverse colleagues and address the issues the Trans community faces. All colleagues have the right to be their authentic selves at work and this is at the heart of our Vision and Values.



Earlier this year we worked with the Outbound Staff Network Group and its members to revise our guidance for line manager support for our trans and non-binary colleagues. Some changes have been made which include, adding a voice signature with pronouns and including pronouns on emails too. We are also simplifying the “Change of name and identity form.” Colleagues will no longer need to provide proof of identity for this. Dialogue is also underway with our uniform suppliers to remove gendering of clothes and the order process, additionally we are discussing enabling pronouns to be added with our name badge supplier.

An Engaged, Motivated and Healthy Workforce

Performance Management Changes and myJourney

Our new Colleague Roadmap, part of our Vision and Values, sets out our commitment to be a great place to work for everyone to thrive. That means building an inclusive workplace, where everyone feels safe, valued and able to improve and develop, whatever your role and wherever you are in your career.

Following on from a trial involving 12 teams of early adopters, we have now launched myJourney our new platform for career conversations, development, feedback and our updated performance ratings.

This new platform will allow our colleagues to:

- Record objectives and update progress against them throughout the year.
- Request feedback from colleagues across the organisation on your progress at any time.
- Provide feedback to colleagues, highlighting strengths and potential areas for further development
- Capture regular conversations between you and your direct reports
- Carry out performance and readiness reviews.

This new platform will also enable line managers to have readiness conversations, signposting to the steps needed for colleagues to take the next step in their career.

These readiness conversations will in turn feed into succession plans for critical roles across the organisation. This has already been trialled in our Tech and Data team, using information entered on myJourney.

Well@TfL

The purpose of the Well@TfL project is to develop an evidence based model for assessing – and then addressing – workplace health and wellbeing that can be implemented in all parts of the organisation.

At the end of September, we ran a successful pilot scheme at Acton depot, aimed at giving colleagues the opportunity to have an onsite health check that measured cholesterol, blood glucose and body composition, as well as exploring lifestyle issues such as diet and exercise. Each participant received bespoke advice and a report on their health from the Health and Wellbeing Physiologist. In addition, everyone seen was offered one or more follow-up appointments (as required) to help track their improvements.

As part of the pilot – in which colleagues working night shifts were deliberately included – over 100 employees were each given a 30-minute health check. Nearly one in three was referred to their GP as a result, which immediately confirmed the potential value of rolling-out the project further. The next step will be to mobilise the health checks, by launching the Well@TfL Health

Bus, which will visit sites around the organisation. It is envisaged that, in due course, the Health bus might also be used to conduct Occupational Health medical assessments on site, which in some instances might be a more practical way of conducting this work.

You Matter Awards

The You Matter awards held in Surface returned in September 2021 to celebrate the hard work and contributions of people and teams across all parts of Surface. These awards highlighting our successes and achievements to keep London moving, working and growing and make life in our city better.

These awards are important as all those shortlisted are nominated by their fellow colleagues and the winners are voted on by their fellow colleagues.



There were individual awards in five different categories;

- Keeping our network safe, secure and reliable.
- Diversity & Inclusion
- Green Future
- Restart & Recovery

- Wellbeing

There were also team awards and special awards for lifetime achievement and lifesaving.



The Right People, Skills and Capacity to Deliver the Business Plan

Graduate and Apprentice Recruitment

A further 58 apprentices have been offered positions and are due to start on 17 January 2022 across London Underground, Engineering, Tech and Data, MPD, City Planning, Surface and RfLI.

Virtual events were held for those interested in applying to hear from current apprentices and take part in Q&A sessions with more than 300 people attending in total.



Reaccreditation of our Engineering Graduate Schemes

We have completed our reaccreditation of our Engineering Graduate Schemes with the Institution of Engineering and Technology and the Institution of Mechanical Engineers.

Reaccreditation is required every three years and our scheme was highly commended and described by the assessors as being superb.

The investment in the support infrastructure such as our mentors, enabling our developing engineers to be successful in achieving chartership, was specifically recognised. This is a significant achievement as a result of a collaborative effort by Business Leaders, Mentors, HR and of course the developing engineers themselves.

Our new Mentoring Hub

A mentor is someone who can support their mentee through reflection and encouragement, building their confidence and understanding of the organisation which can help develop their skills and advance their careers. With approximately 28,000 employees, five generations and an average service length of 14 years we certainly have a huge amount of experience and expertise we can share with each other.

On 27 October, we launched our new Mentoring Hub site as part of National Mentoring Day on the 27 October. The Mentoring Hub has lots of refreshed resources and guidance to help our colleagues make the most from the mentoring opportunities available.

We have also piloted a mentoring initiative in the Chief Finance Office linking mentoring opportunities to development needs identified on our new MyJourney platform. This will pair mentors with mentees and if successful this will be rolled out across the organisation in early 2022.

Innovate Schools Challenge

On Wednesday 27 October we welcomed 16 students to take part in our annual Innovate TfL schools challenge, supported by our sponsor Cleshar. This new format saw the students from four target schools attend Pier Walk and address customer challenges by proposing innovations to a panel of our experts.

The sessions aim to help students improve their confidence and employability skills and were supported by Graduates & Apprentices on the day along with, a panel of 5 including Early Careers Manager, a Stuart Ross intern, 3 city planning managers/lead and 1 marketing lead.

Innovations included interventions to increase accessibility on the network, reduction of the transport carbon footprint and ways of keeping our customers safe. We look forward to welcoming more students next year.



Levy Pledge Supporting Economic Recovery

We have approved our first transfer of Apprentice Levy Funds in collaboration with the London Progression Collaboration to support a green, sustainable economic recovery in line with the Mayor's Recovery Missions. Funds will support Vorboss, a fibre

optic installation company who have made great strides in improving access to installation apprenticeships for those who do not have previous experience and have almost achieved gender parity in their recruitment intakes. Our transfer will support the creation of 20 new installation apprenticeships.



Date: 2 December 2021

Item: Members' Suggestions for Future Agenda Discussions

This paper will be considered in public

1 Summary

- 1.1 This paper presents the current forward programme for the Panel and explains how this is put together. Members are invited to suggest additional future discussion items.

2 Recommendation

- 2.1 **The Panel is asked to note the forward programme and invited to raise any suggestions for future discussion items.**

3 Forward Plan Development

- 3.1 The Board and its Committees and Panels have forward plans. The content of the plans arise from a number of sources:
- (a) Standing items for each meeting: Minutes; Matters Arising and Actions List; and any regular quarterly reports. For this Panel these are the Health, Safety and Environment Quarterly Report and the Human Resources Quarterly Report.
 - (b) Regular items which are for review and approval or noting such as the Health, Safety and Environment Annual Report.
 - (c) Items requested by Members: The Deputy Chair of TfL and the Chair of this Panel will regularly review the forward plan and may suggest items. Other items will arise out of actions from previous meetings (including meetings of the Board or other Committees and Panels) and any issues suggested under this agenda item.

4 Current Plan

- 4.1 The current plan is attached as Appendix 1. Like all plans, it is a snapshot in time and items may be added, removed or deferred to a later date.

List of appendices to this report:

Appendix 1: Safety, Sustainability and Human Resources Panel Plan.

List of Background Papers:

None

Contact Officer: Howard Carter, General Counsel

Email: HowardCarter@tfl.gov.uk

Safety, Sustainability and Human Resources Panel Forward Planner 2021/22**Appendix 1**

Membership: Kay Carberry CBE, Dr Nina Skorupska CBE (Vice Chair), Julian Bell, Bronwen Handyside, Dr Mee Ling Ng OBE, and Mark Phillips.

Abbreviations: Managing Director (MD), Customers, Communication and Technology (CCT), London Underground (LU), Surface Transport (ST), CPO (Chief People Officer), CSHEO (Chief Safety, Health and Environment Officer), D (Director), DIT (Diversity, Inclusion & Talent) and SHE (Safety, Health & Environment), DCP (Director, City Planning), CDD (Commercial Development Director), DIA (Director of Internal Audit)

| 24 February 2022 | | |
|---|-------|---------|
| Quarterly Health, Safety and Environment Performance Reports (to include resilience, assurance and compliance issues) | CSHEO | To note |
| Bus Driver Facility Improvements | MD ST | To note |
| Fatigue Management Update | CSHEO | To note |
| Human Resources Quarterly Report | CPO | To note |
| Viewpoint Survey | CPO | To note |
| People Strategy Update | CPO | To note |
| Climate Change Adaptation Update | DCP | To note |
| Action on Inclusion Strategy Update | CPO | To note |
| Strategic Risk Update | D HSE | To note |

SSHHP Forward Planner 2021-22

Regular items

- Quarterly SHE Performance Report – standing item
- HR Quarterly Report – standing item
- Bus Driver Facility Improvements (every 6 months)
- People Plan Update
- Review of CIRAS Report and Themes – annual
- Vision Zero
- Responsible Procurement (every 6 months)
- Strategic Risk

Future Items

- Measuring and Improving Employee Health – Spring 2022
- ORR Update – Winter 2022