

Chapter 9 – Look and feel of roadworks

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9.1 Public perception

While roadworks are an inevitable part of everyday life, well-designed and maintained temporary traffic management and work sites will help retain healthy and pleasant street environments where Londoners feel safe and relaxed. The site boundary is invariably the perimeter of the traffic management and plays a critical role in communicating the professionalism and integrity of the company and its contractors.

Creating clear and consistent information for people living and working near roadworks sites will keep road users better informed, with traffic signs integral to this – see Chapter 6. Good information helps to reduce public confusion and complaints.

Well-planned works outside peak usage hours or returning the road to its users at peak hours all help keep London moving.



Well-maintained traffic cones keep a site safe and routes clearly defined



Straight and tidy barriers maximise safety and give a good impression on site

9.2 Maintenance

National guidance for site maintenance is provided in Chapter 8. Site maintenance regimes should be planned in advance of works and proportionate to the risk of disruption expected. Any maintenance regime should be monitored and reviewed on a regular basis to ensure roadworks do not deteriorate to unsafe levels for extended periods of time.

Maintenance frequency will be determined on a site-by-site basis following a risk assessment. As much of the TLRN has high traffic volumes, including pedestrians and cyclists, two-hourly inspections would be appropriate in most locations.

It is recommended that diversion routes are inspected frequently, particularly when signs are located on footways and other areas where signs are prone to being disturbed. Where a Roadworks Inspector identifies that a site has become non-compliant with the Safety Code, the site is classified as follows:

- **High risk:** The site needs rectification without delay and within two hours of notification of the failing
- **Low risk:** The site requires making good within four hours of notification of the failing

One of the most critical parts of improving the appearance of roadworks is to ensure the guarding and barrier systems are correctly installed and straight and the cones are tidy, correctly aligned and clean.

Barriers and other traffic management equipment should not be utilised to support tools, plant or building materials.

It is incumbent upon works promoters to keep works sites compact and as minimally disruptive as possible although this should not compromise compliance with the Safety Code. As works progress, surplus traffic management should be removed and the site reduced if reasonably practicable without detriment to safety zones.

9.3 Tidiness: safety, security, aesthetics

Sites should be kept orderly, with materials safely stored in an organised manner and contractors should make provision to promptly remove waste and litter from sites. Construction debris is a potential trip hazard to the workforce, or could be used as a missile or weapon during public disorder, and it has a detrimental impact on the appearance of the local street scene.

Where there are high numbers of road users and the storage of materials, tools, plant or welfare facilities is occupying too much road space, consideration should be given to creating storage facilities within less busy nearby side streets, with the agreement of the relevant highway authority.

The corporate image and professionalism of a works promoter, contractor and TfL as the highway authority can be severely called into question when sites are untidy.

Street litter collecting within a site and along its boundaries, particularly within walkways and cycle lanes, should be removed. Not only is it unsightly but litter can present a hazard to more vulnerable road users. This is particularly pertinent in the case of longer-duration works, where traffic barrier and hoarding has a solid edge at floor level, as it can trap wind-blown litter alongside it.

Cluttered, untidy sites have the potential to be vulnerable to the hiding and disguising of suspect packages. A tidy site, with well maintained barriers, can help reduce this risk.

Developers and TfL aspire to make local areas more attractive to walking and cycling to help meet the Mayor's transport strategy and promote active travel. A temporary streetscape environment should minimally impact the area and not lower the visual amenity and attractiveness of an area. Traffic management equipment should be kept clean of grime, dirt and dust often emitted through undertaking roadwork operations.



Untidy sites are potentially unsafe and several reduce the attractiveness of an area



Barriers can create litter traps that can make sites appear unsightly

9.4 Workforce

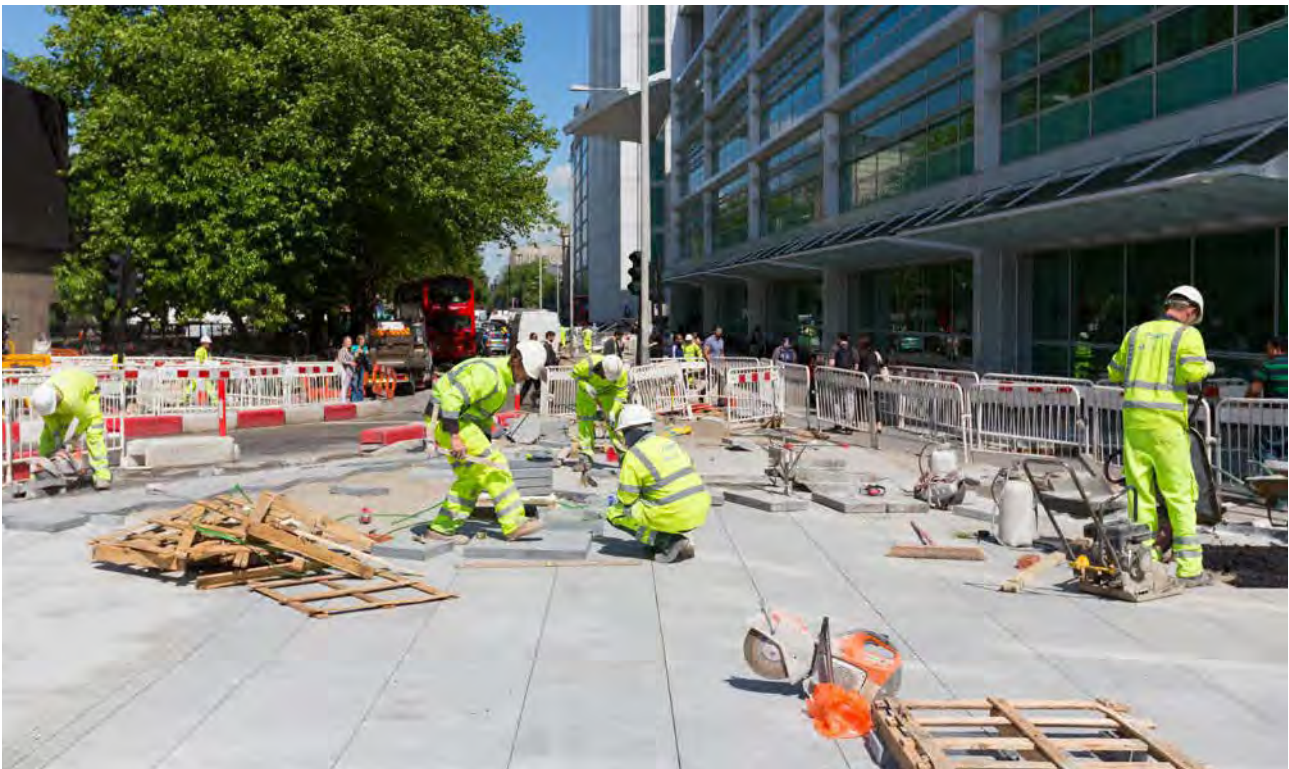
Contractors and visitors to sites should be qualified for the roles they are undertaking and suitably dressed in Personal Protective Equipment as required by the demands of their role. However, the cleanliness and appearance of the Personal Protective Equipment not only affects the safety performance of the product but it can demonstrate publicly the company policy towards maintaining high safety standards throughout all its operations.

All site personnel should also carry a form of identification.

Historically, one of the biggest frustrations of road users has been the appearance of inactivity within roadworks. Works promoters are encouraged to ensure works are planned to keep periods of inactivity to the absolute minimum where possible. Where inactivity is unavoidable, explain why with signing – for example, concrete drying.



Site personnel should be suitably dressed



Clean and consistent Personal Protective Equipment for all site staff helps to demonstrate high safety standards

9.5 Targeting information

The perception and experience of roadworks can be significantly improved with a well-considered communications strategy, which can significantly reduce disruption on the road network, and road user confusion and frustration.

Designers must also be mindful to avoid information overload or message clutter, which can inadvertently contribute to confusion. The key types are:

Advance remote communication:

Consultations or letter drops for major or disruptive works are the first tool to engage with the public and communicate why, what and when work is taking place. When the local community feels engaged with the planning and advance notice of the works, complaints are reduced and it affords them the opportunity to consider alternative means of reaching their destination.

Advance roadside communication:

Designers assessing the impact of works should propose the necessary mitigation measures with their traffic management submissions. TfL can then assess the proposals and make further recommendations. Messaging strategies will be heavily influenced by other works in the area. Reflective and variable message traffic signs are not the only tool in roadside communication. Hoardings and some barrier systems can often be utilised to display pedestrian-facing local information in

advance of works or before a new phase of works is about to commence. These are especially effective at passenger transport interchanges such as train stations and bus stops.

In accordance with the Safety Code, it is a statutory requirement to ensure all approaches to a works site must sufficiently inform a road user what is happening and what is expected of them. Therefore, it is important to consider all pedestrian and cycle approaches such as footpaths from housing estates and the cycle tracks from parks, and not only the main carriageway.

When providing targeted information on larger schemes, consider completion dates and benefits of the works as well as the nature of the works and who will be most affected by and/or interested in the works, including:

- People living and working near works sites
- People travelling through the area
- Community groups and centres – including schools and colleges, places of worship, leisure centres, and hospitals and other health service providers
- Political representatives
- London boroughs



 LONDON
HIGHWAYS
ALLIANCE

Highway Maintenance Works

Contractor	RINGWAY JACOBS
Permit No	YG 438388167
Work type	GYRATORY WORKS
Location	CANONBURY ROAD
From	ST. PAULS ROADS
To	UPPER STREET
Start date	28/06/18
End date	20/10/18

Permitted working hours
0800 – 17.00

Footway restriction
PART FOOTWAY CLOSURE

Road restriction
LANE CLOSURE

24HR TM.

Sorry for any inconvenience
Emergency telephone
0854 266 8880

 Report a roadworks problem
tfl.gov.uk/roadworks

9.6 Branding

With major works, sites may be branded to help members of the public identify who is carrying out the works alongside explaining the nature of the works and when they will be delivered. The branding should not interfere with the performance of the traffic management installation, mask or obscure any traffic signs or be detrimental to personal security, eg by inadvertently creating ambush points or blocking lights and visibility.

Branding should not feature on any traffic sign or equipment.



Branding site hoarding is aesthetically pleasing to passing road users



Chapter 10 – Assessment, approval and monitoring

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10.1 Purpose of this section

Both roadworks and building construction activities can cause traffic disruption in London, but timely and effective planning can keep that disruption to a minimum. The purpose of this chapter is to provide organisations, especially those that are not familiar with working on the TLRN or SRN, with the information required to execute works. This includes outlining the relevant processes and procedures required to assess work proposals and obtain the necessary approvals.

This chapter will help those proposing to undertake works to understand:

- The relevant TfL processes required to undertake works that impact the TLRN
- Some of the challenges that could arise
- The value to all parties of early engagement
- How TfL monitors works for compliance

10.2 Background

Roadworks are primarily governed under two Acts of Parliament – the New Roads and Street Works Act 1991, and the Traffic Management Act 2004 (TMA).⁴⁴ TfL, as a street authority, and those that operate on our network, are bound by this legislation.

The TMA tackles congestion and disruption on the road network. It places a duty on local traffic authorities to ensure that traffic moves freely on their road network and those networks of surrounding authorities. The TMA gives authorities additional tools to better manage parking policies, moving traffic enforcement and the management of street works.

Those undertaking roadwork play a key role in this regard and must consider the effects on all road users, the community and businesses when undertaking construction works. Each proposal must be subject to careful planning, assessment, and coordination before consent is given to proceed.

⁴⁴ <https://www.legislation.gov.uk/ukpga/2004/18/contents>

Works assessment process

Works type	Work promoter	Work promoter	Assessment team	Assessment system	Work type examples
Major schemes	Highway Authority Developer	TLRN / SRN	Network Impact Specialist	Londonworks TMAN	<ul style="list-style-type: none"> • Major scheme • Cycle Superhighways • S278 schemes • Structures & tunnels investment programme
Standalone works	Highway Authority Utility	TLRN / SRN TLRN	Coordination & Permitting	Londonworks TMAN Slip number Management system	<ul style="list-style-type: none"> • Drainage • Resurfacing • Traffic signal modernisation • Highways England • Lighting • Scoot • Structural maintenance • Block closures • Crane operations • Utility renewals, upgrades, connections • New Roads and Street Works Act s50

10.3 Proposals to undertake works

Any organisation undertaking particularly disruptive works will be required to submit its traffic management proposals to TfL for assessment. This process ensures that all mitigation measures have been considered to deliver the works in the least disruptive way, the relevant stakeholders are engaged, and the works are adequately communicated to the relevant parties that may be impacted by the works.

The TfL Assessment team will vary depending on the type of work being proposed, as will the assessment system used to process proposals.

The table to the left sets out areas of responsibility for each assessment team.

A major scheme generally involves a permanent change to the road network layout or long-term temporary traffic management arrangements more than six months in duration that will have a significant impact on highway capacity. Any other standalone works that are proposed within the immediate vicinity will also be determined as part of the major scheme assessment.

Standalone works do not realign the permanent nature of the road network, are independent from a scheme, and have a duration of less than six months.

Each traffic management assessment process is slightly different, depending on the type of works being undertaken and the team processing the proposal. TMAN applications are generally determined within one calendar month of receipt, and SNMS applications require 10 days' advance notice. Both assume the application is complete, with all the correct documentation provided.

The table on 164 provides an overview of the information required and the areas a traffic management application should address (where relevant).

Works assessment information

Application type	Information required	Impact of proposal on:
Major scheme	<ul style="list-style-type: none"> Existing and proposed layout drawings Accident data Traffic surveys/data Traffic/transport modeling Scheme impact report where traffic signals are impacted Multi-modal traffic impact assessment or summary Road safety audit Construction Logistics Plan (CLP) Lorry loading, holding and consolidation areas Long Goods Vehicle flow data Supporting information, including stakeholder comments 	<ul style="list-style-type: none"> Road safety Accessibility Pedestrians/cyclists/ buses Motorised traffic/taxis/ interchanges Road network capacity Parking Adjoining roads/wider area impacts Environmental and streetscape Surrounding network and adjacent activities
Standalone works	<ul style="list-style-type: none"> Existing and proposed layout drawings with dimensions Traffic management plan with dimensions Timing/programme of work; Accident/survey data Traffic/transport modelling Traffic impact assessment or summary Highway asset impact Road Safety Audit Construction Logistics Plan (CLP); Lorry loading, holding and consolidation areas Long Goods Vehicle flow data Mitigation strategy covering all affected modes Supporting information including stakeholder comments 	<ul style="list-style-type: none"> Road safety Accessibility Pedestrians/cyclists/ buses Motorised traffic, including motorcyclists and taxis Interchanges Capacity/traffic impact Parking Adjoining roads/wider area impacts Environmental and streetscape Surrounding network and adjacent activities

Further information on the traffic management assessment process can be found by contacting the relevant TfL Assessment team, whose contact details can be found in the Contacts chapter.

The TMAN Assessment component forms part of an overarching system known as Londonworks, which also houses other modules that help to minimise congestion caused by roadworks and construction activity.

There is a Forward Planning portal to enable works promoters to share long-term plans, and a Central Register providing visibility of all works across London that are either proposed or in progress. Both modules are useful as they can help to establish collaborative working opportunities, while the Central Register is a helpful reference to identify potential timeframes when there are no other works being carried out.

TfL's City Planning team is responsible for submitting TMANs on behalf of a developer wishing to work on the TLRN. Contact: **Section278Team@tfl.gov.uk**.

10.4 Road safety audits

In many situations, the guidance contained within the national codes of practice is insufficient to guide designers to cover the complex scenarios likely to be encountered in London. A Road Safety Audit (RSA) may be required for temporary traffic management schemes, even if the arrangements remain in operation for less than six months. This is particularly the case where significant impact on the highway network is anticipated.

TfL's project sponsors will initiate the RSA for TfL-promoted works, and external works promoters should liaise with TfL's traffic management assessors to determine if an RSA is required.

Further information on TfL's RSA procedure (SQA-0170) can be found [here](http://content.tfl.gov.uk/tfl-road-safety-audit-procedure-may-2014-sqa-0170.pdf).⁴⁵ TfL's RSA team can be contacted at: **TfLSafetyAudit@tfl.gov.uk**.

45 <http://content.tfl.gov.uk/tfl-road-safety-audit-procedure-may-2014-sqa-0170.pdf>

10.5 Street and roadworks permits

In addition to the traffic management assessment process, consent to undertake street and roadworks activity on the TLRN from TfL's Coordination and Permitting team is a mandatory requirement.

The London Permit Scheme came into effect in January 2010 to assist in the coordination of street works and roadworks on the TLRN. All planned, non-planned and emergency works will require a permit.

Under the scheme, works promoters are required to obtain permission from TfL to work on the TLRN. This allows TfL to determine the best time for the works to be carried out when there is the least disruption to traffic and also identify any collaborative working opportunities.

Permit conditions regarding the way the works are to be carried out are also agreed as part of the approval process.

Below are the minimum advance notice periods for applying for a permit to work.

Further information on TfL's permit scheme can be found here.⁴⁶

Works type	Application period			Response period		
	Provisional advance authorisation	Permit	Variation	Provisional advance authorisation	Permit	Variation
Major	3 months	10 days	2 days or 20 per cent of original duration	1 month	5 days	2 days
Standard		10 days			5 days	
Minor		3 days			2 days	
Immediate		2 hours after			2 days	

⁴⁶ <https://tfl.gov.uk/info-for/urban-planning-and-construction/roadworks-and-street-faults#on-this-page-4>

10.6 Highway licence approval

A separate approval process is required for activities that require licensing under the Highways Act. These activities include:

- Crane operations
- Mobile elevated platforms

- Hoardings
- Scaffolding
- Building materials
- Skips

Application forms for highway licensed activities can be found [here](#).⁴⁷



Licensed activity

⁴⁷ <https://tfl.gov.uk/info-for/urban-planning-and-construction/highway-licences>

10.7 Temporary traffic regulation orders and suspensions

A regulatory order or notice is required when it becomes necessary to prohibit, regulate or restrict traffic on a road on part of the road network as a consequence of the work. This includes scenarios such as temporary road closures, banned turns, changes in kerb line controls and loading/parking suspensions. Under the Road Traffic Regulation Act 1984,⁴⁸ such changes to the way the permanent road network normally operates requires either a Temporary Traffic Regulation Order/ Notice (TTRO/N) or a Temporary Suspension Request (TSR). Advance notice periods for legally making the relevant TTRO/N or TSR are as follows:

Temporary order type	RTRA reference	Description	Advance notice
Regulation Order	Section 14(1)	Planned traffic prohibitions or restrictions	12 Weeks
Regulation Notice	Section 14(2)	Traffic prohibitions or restrictions required without delay	Not required
Temporary suspension request	Section 6	Suspension of bus lanes, parking controls, such as parking, loading, disabled or motorcycle bays	3 weeks

48 <https://www.legislation.gov.uk/ukpga/1984/27/contents>

Any new permanent arrangements introduced on the highway, such as new loading/parking facilities, banned turns and kerb line control changes, will require amendments to existing traffic orders.

For scheme-related work, these will commonly be as follows:

Order type	RTRA reference	Description	Advance notice
Experimental Order	Section 9	Temporary road layout for experimental purposes	8 Weeks
Permanent Order	Section 6	Changes to permanent traffic prohibitions or restrictions	12 weeks

Further information can be found by contacting TfL's traffic order team:
TrafficOrderSection@tfl.gov.uk

10.8 Lane rental

The Transport for London Lane Rental Scheme was introduced on 11 June 2012 and updated on 1 July 2014. The Lane Rental Scheme applies to 56 per cent of the TLRN and is designed to minimise disruption due to roadworks and street works in specified traffic-sensitive locations by applying a daily charge for each day that the street is occupied by the works.

Lane Rental Scheme charges can be either low (£800) or high (£2,500) and are applied for each day of impact. Works promoters must establish if charges apply to their proposals before commencing works. Further details on TfL's Lane Rental Scheme can be found here.⁴⁹

10.9 Stakeholder communications

Engaging stakeholders is fundamental to the success of well-executed roadworks. All relevant stakeholders affected by work proposals must be consulted for awareness and to ensure any adverse effects are mitigated. This should include, where applicable:

- Vulnerable road users (cyclists, powered two-wheelers, those with mobility impairments and pedestrians)
- Other members of the public
- Freight industry
- Local boroughs
- Local businesses
- Residents groups
- Public transport sectors (buses, Tube and overground rail)
- Emergency services
- Taxis
- Established development related working groups

⁴⁹ <https://tfl.gov.uk/info-for/urban-planning-and-construction/lane-rental-scheme>

There are a variety of ways to provide awareness of roadworks to help customers avoid delays by making pre-planned changes to their journeys. Communication conventionally involves notifying residents and businesses by sending letters in the near vicinity of works, as well as the installation of variable message signs.

Depending upon the scale of the activity and the anticipated operational impacts for road users, the following enhanced communication tools should also be considered:

- Transport planning and analysis – to understand the specific locations' users; their make-up, frequency of journeys, origins and destinations, and to predict how individual journeys will be affected and the disruption that will be experienced by time of day and day of week
- Analysis-based travel advice content – captured in a single factsheet which is then used as a single source of truth to inform all communications and engagement including:
 - Dedicated travel advice webpage including interactive mapping of works and associated diversions / other travel advice
 - Targeted emails to registered road users
 - Targeted emails to registered regular bus users
 - Tailored letters across immediate residential area, any wider area(s) anticipated to be impacted by works, and other key stakeholders
 - Other tailored printed information including advice for businesses in the locality, cyclists and pedestrians
 - Industry standard road closure data for satnav and other road network information providers
 - Communication of timings to ensure optimal customer and road user response based on frequency of travel through the specific location

TfL Assessment teams are able to provide contact details for stakeholders that should be contacted, which will be dependent on the type and locality of the works.

10.10 Works monitoring

Legislation empowers TfL, as a street authority for the TLRN, to undertake inspections of roadworks to ascertain if a statutory undertaker has complied with its duties.

These inspections include checking if roadworks in progress are compliant with the technical standards prescribed within the Safety Code. Works are also inspected to assess if they are being undertaken in accordance with the approved permit conditions, if they are incurring Lane Rental charges or are overrunning their estimated end date.

Inspections are also carried out once the works are complete to assess whether the reinstated highway is compliant with the performance standards specified within the DfT's Specification for the Reinstatement of Openings in Highways.⁵⁰

More than 40,000 inspections a year are carried out on roadworks. Video analytic technology is sometimes deployed to monitor activity on longer-duration works, such as schemes, s278 development works and utility mains replacement works. These mobile CCTV cameras auto-detect whether activity is taking place on-site when expected – providing alerts containing still images to

a back-office system for validation. This ensures finite roadspace is being actively occupied when expected.

Partnerships are also in place with other TfL business areas that have an on-street contingent, who supply observations on roadworks they encounter. In total, more than 20,000 reports on roadworks per year are received from in excess of 380 officers who frequently patrol the network. The reports are submitted through mobile software and transmitted to a back-office system where they are validated by specialist roadworks inspectors.

Alongside this, a further 7,700 reports per year are received from members of the public reporting roadworks problems through TfL's website, which are also validated for compliance.

With access to more than 5,000 CCTV cameras, our Network Management Control Centre also monitors the road network 24 hours a day, regularly identifying concerns it has observed with roadworks.

It is essential that construction organisations provide TfL with a 24/7 contact point empowered to rectify any non-compliant defects within two hours of being notified of a high-risk failure, or within four hours for lower-risk issues.

⁵⁰ https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/11042/sroh.pdf

10.11 Works enforcement

Any breaches of safety standards are taken seriously, with the appropriate remedial interventions implemented against the parties concerned, with prosecution considered if this is deemed the most appropriate course of action. The interventions at our disposal include:

- Operation of a Fixed Penalty Notice system - this provides TfL with the option of dealing with specified streetworks offences through the payment of a fine in lieu of prosecution
- Prosecution in the magistrates' courts where the use of Fixed Penalty Notices are not considered appropriate or available, for example safety offences or where they have failed to discharge liability through the Fixed Penalty Notice scheme, and
- Action plans to address specific areas of under performance, which are then closely monitored with the works promoter through enhanced reporting, regular progress review meetings and toolbox talks

Charges are also imposed where works are found to be overrunning, or are being undertaken during Lane Rental operational hours.

10.12 Roadworks patrols

TfL undertakes regular roadworks patrols with the delivery team, road users, campaign groups, and developers to cycle and walk through traffic management on the TLRN both before and during roadworks. This active traffic management experience provides first-hand intelligence to road users encountering temporary road network conditions, and realising the constraints arising.

Issues are discussed along the route with observations collated into a report for dissemination to the group, site managers and other stakeholders. The emphasis is on ensuring high-quality provision for vulnerable road users at works sites.

The patrol methodology has been a catalyst for change, especially in the way TfL approaches roadworks design and conflict mitigation as part of the traffic management assessment process. This includes interventions such as mandatory and advisory cycling facilities around roadworks and the provision of loading areas.

Further information relating to cycle patrols can be requested from:

TMWorkinggroup@tfl.gov.uk.

References

Service	Notice period
Mayor's Transport Strategy ⁵¹	Greater London Authority
Healthy Streets for London ⁵²	Transport for London
Vision Zero action plan ⁵³	Transport for London
Safety at Street Works and Roadworks: A Code of Practice ⁵⁴ (the Safety Code)	Department for Transport
Chapter 8 of the Traffic Signs Manual ⁵⁵ (Chapter 8)	Department for Transport
Traffic Signs Regulations and General Directions ⁵⁶ (TSRGD)	Her Majesty's Stationery Office
Health and Safety at Work Act 1974 ⁵⁷	Her Majesty's Stationery Office
Construction (Design and Management) Regulations 2015 ⁵⁸	Health and Safety Executive
Management of Health and Safety at Work Regulations 1999 ⁵⁹	Her Majesty's Stationery Office
New Roads and Street Works Act ⁶⁰	Department for Transport
Walking action plan ⁶¹	Transport for London
Pedestrian Comfort Guidance ⁶²	Transport for London
Equality Act 2010 ⁶³	Government Equalities Office
Inclusive Mobility ⁶⁴	Department for Transport
Crime and Disorder Act 1998 ⁶⁵	Her Majesty's Stationery Office
BS 8442:2015: Miscellaneous road traffic signs and devices	British Standards

Service	Notice period
BS EN12899-1: 2007 Fixed, vertical road traffic signs	British Standards
Traffic Advisory Leaflet 01/14 ⁶⁶ (Temporary white on red signs at roadworks)	Department for Transport
Traffic Advisory Leaflet 15/99 Cyclists at Roadworks ⁶⁷	Department for Transport
Local Transport Note LTN 01/12 ⁶⁸ (Shared use routes for pedestrians and cyclists)	Department for Transport
Local Transport Note LTN 02/08 ⁶⁹ (Cycle infrastructure design)	Department for Transport
An Introduction to the use of Portable Vehicular Signals ⁷⁰	Department for Transport
CLOCS Standard for construction logistics: managing work related road risk ⁷¹	Construction Logistics and Community Safety
Interim Advice Note 142/11 (Temporary Barrier Decision Tool) ⁷²	Highways England
BS 8442:2015 Miscellaneous road traffic signs and devices. (Requirements and test methods)	British Standards
BS EN1317 (Road Restraint Systems)	British Standards
List of compliant road restraint systems ⁷³	Highways England
TOPAS 2516C ⁷⁴ (Performance Specification for Discontinuous Variable Message Signs)	Highways England
TOPAS 2502B ⁷⁵ (Performance Specification for Portable Traffic Signal Control Equipment for use at Roadworks)	Highways England

Service	Notice period
TOPAS 2504A ⁷⁶ (Performance Specification for Vehicle Detection Equipment for Vehicle Actuated Portable Traffic Signals)	Highways England
TOPAS 2537A ⁷⁷ (Performance Specification for Portable Traffic Signal Control Equipment with Pedestrian Facilities for use at Roadworks)	Highways England
TOPAS 2538A ⁷⁸ (Performance Specification for Portable Traffic Signal Control Equipment for a Standalone Pedestrian Facility)	Highways England
National Highway Sector Scheme I2D ⁷⁹	Highways England
Traffic Advisory Leaflet (TAL) 03/11 ⁸⁰ (Signal-controlled Pedestrian Facilities at Portable Traffic Signals)	Highways England
IAN I15/08: ⁸¹ Guidance for works on the hard shoulder and roadside verges on high speed dual carriageways	Highways England
IAN I37-10: ⁸² The use of stepped speed limits at roadworks	Highways England
IAN I50/16: ⁸³ Guidance on alternative temporary traffic management techniques for relax works on dual carriageways	Highways England
IAN I63/12: ⁸⁴ Alternative entry taper at relaxation scheme temporary traffic management on high speed roads	Highways England
IAN I79/14: ⁸⁵ Guidance on the use of vehicle mounted high level VMS to provide advance warning of lane closures for relaxation works on dual carriageways with a hard shoulder	Highways England
IAN I81/14: ⁸⁶ Guidance on the use of impact protection vehicles for temporary traffic management. Read in conjunction with: Highways Term Maintenance Association (HTMA) ⁸⁷ Guidance on temporary traffic management vehicle selection and operation	Highways England
IAN I87/15: ⁸⁸ Use of a convoy vehicle for controlling traffic through guide islands at relaxation works on dual carriageways	Highways England
IAN I88/16: ⁸⁹ Guidance on omission or warning lights (road danger lamps) for relaxation works on dual carriageways	Highways England

Service	Notice period
Traffic Management Act 2004 (TMA) ⁹⁰	Her Majesty's Stationery Office
Highways Act 1980 ⁹¹	Her Majesty's Stationery Office
Road Safety Audit procedure ⁹²	Transport for London
Highway Licence Application Forms ⁹³	Transport for London
Road Traffic Regulation Act 1984 ⁹⁴	Her Majesty's Stationery Office
Lane Rental Scheme ⁹⁵	Transport for London
Specification for the Reinstatement of Openings in Highways ⁹⁶	Department for Transport
Transport for London website ⁹⁷	Transport for London

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- 51 <https://www.london.gov.uk/sites/default/files/mayors-transport-strategy-2018.pdf>
 - 52 <http://content.tfl.gov.uk/healthy-streets-for-london.pdf>
 - 53 <http://content.tfl.gov.uk/vision-zero-action-plan.pdf>
 - 54 https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/321056/safety-at-streetworks.pdf
 - 55 https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/203669/traffic-signs-manual-chapter-08-part-01.pdf
 - 56 http://www.legislation.gov.uk/uksi/2016/362/pdfs/uksi_20160362_en.pdf
 - 57 <https://www.legislation.gov.uk/ukpga/1974/37>
 - 58 <http://www.hse.gov.uk/construction/cdm/2015/index.htm>
 - 59 <http://www.legislation.gov.uk/uksi/1999/3242/contents/made>
 - 60 <http://www.legislation.gov.uk/ukpga/1991/22/contents>
 - 61 <http://content.tfl.gov.uk/mts-walking-action-plan.pdf>
 - 62 <http://content.tfl.gov.uk/pedestrian-comfort-guidance-technical-guide.pdf>
 - 63 <https://www.gov.uk/guidance/equality-act-2010-guidance>
 - 64 <https://www.gov.uk/government/publications/inclusive-mobility>
 - 65 <https://www.legislation.gov.uk/ukpga/1998/37/contents>
 - 66 <https://www.gov.uk/government/publications/temporary-white-on-red-signs-at-road-works>
 - 67 [http://www.ukroads.org/webfiles/tal 15-99 cyclists at roadworks.pdf](http://www.ukroads.org/webfiles/tal%2015-99%20cyclists%20at%20roadworks.pdf)
 - 68 <https://www.gov.uk/government/publications/shared-use>
 - 69 <https://www.gov.uk/government/publications/cycle-infrastructure-design-ltn-208>
 - 70 https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/509198/introduction-use-portable-vehicular-signals.pdf
 - 71 <https://www.clocs.org.uk/page/clocs-standard>
 - 72 <http://www.standardsforhighways.co.uk/ha/standards/ians/pdfs/ian142.pdf>
 - 73 http://www.standardsforhighways.co.uk/ha/standards/tech_info/files/List_of_ENI317_Compliant_RRS_March_2016.pdf
 - 74 [http://www.topasgroup.org.uk/MyFiles/Files/specifications/2516C v3 draft uploaded.pdf](http://www.topasgroup.org.uk/MyFiles/Files/specifications/2516C%20v3%20draft%20uploaded.pdf)
 - 75 [http://www.topasgroup.org.uk/MyFiles/Files/specifications/2502B v4 170415.pdf](http://www.topasgroup.org.uk/MyFiles/Files/specifications/2502B%20v4%20170415.pdf)
 - 76 [http://www.topasgroup.org.uk/MyFiles/Files/Specifications 2016/TOPAS 2504A 11316.pdf](http://www.topasgroup.org.uk/MyFiles/Files/Specifications%2016/TOPAS%202504A%2011316.pdf)
 - 77 <http://www.topasgroup.org.uk/shop/topas-2537a-performance-specification-for-portable-traffic-signal-control-equipment-with-pedestrian-facilities-for-use-at-roadworks/>
 - 78 [http://www.topasgroup.org.uk/MyFiles/Files/Specifications 2016/TOPAS 2538A 11316.pdf](http://www.topasgroup.org.uk/MyFiles/Files/Specifications%2016/TOPAS%202538A%2011316.pdf)
 - 79 [https://www.ukas.com/download/publications/publications_relating_to_certification_bodies/NHSS I2D 9001 2008 - Issue 10 November 2016.pdf](https://www.ukas.com/download/publications/publications_relating_to_certification_bodies/NHSS%20I2D%209001%202008%20-%20Issue%2010%20November%202016.pdf)
 - 80 https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/482503/3-11.pdf
 - 81 <http://www.standardsforhighways.co.uk/ha/standards/ians/pdfs/ian115r2.pdf>
 - 82 <http://www.standardsforhighways.co.uk/ha/standards/ians/pdfs/ian137.pdf>
 - 83 http://www.standardsforhighways.co.uk/ha/standards/ians/pdfs/ian150_16.pdf

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- 84 <http://www.standardsforhighways.co.uk/ha/standards/ians/pdfs/ianl63.pdf>
 - 85 <http://www.standardsforhighways.co.uk/ha/standards/ians/pdfs/ianl79.pdf>
 - 86 <http://www.standardsforhighways.co.uk/ha/standards/ians/pdfs/ianl81.pdf>
 - 87 https://www.tmca.org.uk/sites/default/files/downloads/htma_guidance_ttm_vehicle_selection_and_operation.pdf
 - 88 <http://www.standardsforhighways.co.uk/ha/standards/ians/pdfs/ianl87.pdf>
 - 89 <http://www.standardsforhighways.co.uk/ha/standards/ians/pdfs/ianl88.pdf>
 - 90 <https://www.legislation.gov.uk/ukpga/2004/18/contents>
 - 91 <https://www.legislation.gov.uk/ukpga/1980/66>
 - 92 <http://content.tfl.gov.uk/tfl-road-safety-audit-procedure-may-2014-sqa-0170.pdf>
 - 93 <https://tfl.gov.uk/info-for/urban-planning-and-construction/highway-licences>
 - 94 <https://www.legislation.gov.uk/ukpga/1984/27/contents>
 - 95 <https://tfl.gov.uk/info-for/urban-planning-and-construction/lane-rental-scheme>
 - 96 https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/11042/sroh.pdf
 - 97 <http://www.tfl.gov.uk/>

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	Central	Camden, City of London, Islington, Kensington & Chelsea, Tower Hamlets, Westminster	
	South	Bexley, Bromley, Croydon, Ealing, Greenwich, Lambeth, Lewisham, Kingston, Merton, Newham, Richmond, Southwark, Sutton, Wandsworth	
Coordination & Permitting	East	Barking & Dagenham, Bexley, Enfield, Greenwich, Hackney, Haringey, Havering, Newham, Redbridge, Tower Hamlets, Waltham Forest	CaPEast@tfl.gov.uk
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	Central	Camden, City of London, Hammersmith & Fulham, Islington, Kensington & Chelsea, Westminster	CaPCentral@tfl.gov.uk
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TfL's City Planning Team	Section278Team@tfl.gov.uk
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Police anti-terrorist hotline	0800 789 321

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SCOPE

APPENDIX A - Health and Safety Management Requirements

TfL RESTRICTED

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TfL Health and Safety Management Requirements

In addition to all other health and safety requirements the ~~BuyerContractorSupplier~~ shall implement the requirements described in this Appendix to protect the workforce, members of the public and persons visiting the site from risks arising from the hazards defined therein.

In addition to all other information required the ~~BuyerContractorSupplier~~ shall provide copies of CA marking information for all CA marked works, goods or materials used in the works for inclusion in the Health and Safety File. This information shall include, as appropriate, the Declaration of Conformity or Declaration of Performance and all safety information.

1. General

- 1.1. The ~~Buyer'sClientBuyer's~~ vision for health and safety is of world class delivery with zero harm. The ~~BuyerClientBuyer's~~ strategy for delivering this is to implement effective health and safety management systems and behaviours to get ***"Everyone home safe and healthy every day"***.
- 1.2. The ~~SupplierContractorSupplier~~ complies with the spirit and intent of the ~~BuyerClientBuyer's~~ Health, Safety and Environment Policy and Health and Safety strategy.
- 1.3. The ~~ContractorSupplier Supplier~~ and ~~theirhis~~ supply chain implements measures to mitigate and manage the key risks to as low as reasonably practicable (ALARP) through:
 - a) robust design risk management;
 - b) effective processes for assessing risk and developing safe systems of work;
 - c) Construction Phase Plans and Emergency Preparedness Plans;
 - d) behavioural safety programme with full participation by all;
 - e) high levels of leadership commitment and supervision and engagement in monitoring and managing the *contract*, rectifying deficiencies and continuously improving;
 - f) personal competency, development and innovation;
 - g) exemplary standards of health and safety performance and management whether in design, construction or procurement to ensure that the ~~BuyerClientBuyer's~~ vision is delivered and compliance achieved with health and safety legislation;
 - h) comprehensive occupational health management scheme;
 - i) regular meetings to discuss health and safety performance;
 - j) ~~SupplierContractorSupplier's~~ workers are work ready through inductions, toolbox talks and briefings;
 - k) "One Team" culture, honesty, openness and engagement; and
 - l) rewarding good performance and challenging poor performance.
- 1.4. The ~~ContractorSupplier~~ responds promptly if the ~~ClientBuyer~~ requests a meeting with a senior representative from the ~~ContractorSupplier~~ (typically a Director) to discuss any reportable event, adverse trends or other evidence of a serious non-conformity with the legislation or health and safety requirements.

- 1.5. The [ContractorSupplier](#) shall take all necessary precautions to prevent danger, nuisance or inconvenience to the owners, tenants or occupiers of adjacent properties and to the public generally.
- 1.6. The [ContractorSupplier](#) shall inform the [ClientBuyer](#) as soon as becoming aware of any visits from Enforcing Authorities (Health and Safety Executive (HSE), or Local Authority Environmental Health (EH) Department), Port of London Authority (PLA) prosecution or pending or likely prosecution of the [ContractorSupplier](#) for any offence pertaining to the health and safety of his employees or of other persons, or of any conviction on such prosecution, and shall provide the [ClientBuyer](#) with such further information and documents as the [ClientBuyer](#) may require.
- 1.7. The [ContractorSupplier](#) ensures that all employees and Sub[contractorSuppliers](#) and suppliers of any tier are made aware of their responsibility for their own safety and the safety of Others and for ensuring that the activities they undertake are safe and do not place Others at risk.
- 1.8. The [ContractorSupplier](#) ensures that his employees participate in the health and safety initiatives that the [ContractorSupplier](#) and [ClientBuyer](#) use to review and improve health and safety performance collectively with their supply chains. This includes the requirement to attend routine health and safety meetings, briefings and Sub[contractorSupplier](#) forums.
- 1.9. The [ContractorSupplier](#) produces, cascades, communicates and circulates health and safety alerts and communications to all levels of the workforce and shares these with the [ClientBuyer](#). The [ContractorSupplier](#) retains records of these being briefed.

2 [ContractorSupplier](#)'s Health and Safety Management Arrangements

- 2.1. The [ContractorSupplier](#) has a health and safety management system that, as a minimum, meets the requirements contained in ISO 45001.
- 2.2. The [ContractorSupplier](#) shall produce an annual Health and Safety Action Plan at the start of each financial year. The Plan shall:
 - a) list and support a set of Health and Safety Objectives;
 - b) have realistic target dates assigned and be challenging but achievable;
 - c) be presented to, and agreed by, the [ClientBuyer](#) during mobilisation to commence delivery from 1 April in Year 1, and then in subsequent years be presented to, and agreed by, the [ClientBuyer](#) during March to commence delivery on 1 April each year;
 - d) be completed, evidenced and approved by the [ClientBuyer](#) before the end of the financial year; and
 - e) consist of at least one action per financial year relating to collaborative working to deliver a pan-London health and safety benefit or initiative.

3 Health and Safety Advice

- 3.1. The [ContractorSupplier](#) employs at all times suitably competent health and safety resources to oversee and direct a sufficiently sized and competent team of health and safety professionals, to fully implement all the applicable health and safety requirements.

- 3.2. The [ClientBuyer](#) shall be informed if the resources available to fulfil this change, and the measures that shall be taken to ensure health and safety are not compromised.

4 Procurement and Supply Chain Management

- 4.1. Prior to and after the appointment of Sub[contractorSuppliers](#), the [ContractorSupplier](#) is responsible for ensuring that Sub[contractorSuppliers](#) are aware of and understand the health and safety requirements stated within the Contract. The [ContractorSupplier](#) coordinates and manages the interface between his Sub[contractorSuppliers](#) to ensure compliance with the health and safety requirements and monitors and reports health and safety performance periodically to the [ClientBuyer](#).

5 Health and Safety Training

- 5.1. The [ContractorSupplier](#) ensures the delivery of health and safety training for all persons (including Sub[contractorSuppliers](#) and suppliers of any tier) engaged on the *contract*. In particular, training is provided to raise awareness of how health and safety initiatives can be incorporated in to the work activities to maximise performance and assist with mitigating any associated impacts. The [ContractorSupplier](#) provides specific training to maintenance staff to ensure that they are aware of the required mitigation measures detailed in the risk assessments and method statements. The [ContractorSupplier](#) meets all training, assessment and associated costs.
- 5.2. The [ContractorSupplier](#) ensures that all employees, visitors, Sub[contractorSuppliers](#) and suppliers of any tier and others working on Site attend an induction and any other training appropriate to the work taking place before the person starts work on the Site.
- 5.3. The [ContractorSupplier](#) puts in place systems to implement all inductions/training effectively. The persons providing inductions have received adequate training to do so. The [ContractorSupplier](#) ensures that these are carried out in a suitable place with appropriate visual aids.
- 5.4. The [ContractorSupplier](#) has a procedure in place that assists those personnel with learning, reading and language difficulties.
- 5.5. The [ContractorSupplier](#) maintains a written record of attendance for inductions and safety briefings. This record is available to the [ClientBuyer](#) on request.
- 5.6. The [contractorSupplier](#) ensures that all employees carry induction cards / works identification cards at all times.

6 Construction Skills Certification Scheme (CSCS)

- 6.1. The [ContractorSupplier](#) ensures that all employees, Sub[contractorSuppliers](#) and suppliers of any tier and other [ContractorSuppliers](#) entering construction sites are in possession of a valid CSCS card. The [ContractorSupplier](#) ensures that the CSCS card held by any individual is appropriate to their specific job task(s).
- 6.2. An exception to this requirement is granted where the individual holds a valid card from a CSCS affiliated or amalgamated scheme or other accepted scheme which has been assessed as meeting similar standards. Special dispensation shall be given by the [ContractorSupplier](#) to provide access to visitors when on an accompanied site visit.

7 Management of Site Hazards

- 7.1. The [ContractorSupplier](#) takes appropriate action with regards to the site hazards in association with the works contained in any Pre Construction Information. The [ContractorSupplier](#) also considers the hazards identified in the development of their detailed design using the Design Risk Management process of the Construction (Design and Management) Regulations 2015 (CDM Regulations). The [ContractorSupplier](#) ensures that they properly communicate the hazards on drawings or through risk registers, and controls the residual risks via risk assessments, method statements and activity plans as part of their safe system of work so that they are understood by the workforce. Any Pre Construction Information provided is treated as a live document and updated with any new site health and safety critical information.
- 7.2. The [ContractorSupplier](#) also considers the hazards that are normally associated with working on the Affected Property and on or around water. These include, but are not limited to, confined spaces, working at heights, asbestos containing materials, buried services, overhead utilities, hazardous materials, contaminated land, uneven surfaces, high and low voltage cables, vessels, boat operators, staff and passengers. The [ContractorSupplier](#) undertakes his own site hazard survey prior to starting works to verify and identify any other risks that may affect the works.

8 The Construction (Design and Management) Regulations 2015

- 8.1. The [ClientBuyer](#) is the [ClientBuyer](#) for the purposes of the Construction (Design and Management) Regulations 2015 (the CDM regulations).
- 8.2. To the extent that the CDM Regulations apply to this Contract, the Company appoints the [ContractorSupplier](#) to act as Principal Designer and Principal [ContractorSupplier](#) pursuant to Regulation 5 (1) of the CDM regulations, but reserves the right to appoint alternative suppliers to fulfil these roles.
- 8.3. The [ContractorSupplier](#) shall accept any such appointment made under clause 8.2 and agree to carry out all associated obligations imposed by the CDM Regulations. The [ContractorSupplier](#) and [ClientBuyer](#) shall provide each other with all the necessary assistance which they may reasonably require in order to fulfil their respective obligations under the CDM regulations.
- 8.4. The [ContractorSupplier](#) warrants to the [ClientBuyer](#) that it:
- (a) is competent to perform such of the duties allocated to it under 8.3
 - (b) Shall allocate adequate resources to enable it to comply with its obligations under the CDM regulations
- 8.5. The information contained within this and other supporting documentation for the Contract shall be considered as generic Pre Construction Information applicable across all works, and shall be supplemented with additional site/project specific PCI where available.
- 8.6. The [ContractorSupplier](#) shall be responsible for developing and implementing a Construction Phase Plan and for providing information as is necessary to maintain and develop the Health and Safety File in accordance with the CDM regulations.

- 8.7. The [ContractorSupplier](#) shall be provided with access to, and user rights to enable the use and amendment of all information required for the [ClientBuyer](#)'s Health & Safety File Management System.
- 8.8. The [ContractorSupplier](#) shall be responsible for coordination of health and safety on site and all works, including those by other [ContractorSuppliers](#) working under direct orders from the [ClientBuyer](#), under other statutory powers, or where no contractual agreement exists with the [ContractorSupplier](#).
- 8.9. Where the contract requires design input by the [ContractorSupplier](#), the [ContractorSupplier](#) shall undertake the duties and responsibilities of the Designer under the Regulations for that design function for which the [ContractorSupplier](#) is responsible. The [ContractorSupplier](#), in exercising this role, shall liaise as necessary with other designers involved in the project and where appointed the Principal Designer provides such information as is necessary to maintain and develop the Health and Safety File.
- 8.10. Where applicable, the [ClientBuyer](#) shall submit the F10 Notification informing the Health & Safety Executive (HSE)/Office of the Rail and Road (ORR) of planned construction works in accordance with the Regulations. The [ClientBuyer](#) requests that the [ContractorSupplier](#) displays the F10 Notification on site or in its site office in accordance with Regulation 6(3)(b) of the CDM Regulations 2015.

9 Incident Reporting, Investigation, Performance Monitoring

The [ContractorSupplier](#) shall ensure that appropriate measures are taken to protect his employees, boat operators, passengers, [ClientBuyer](#)'s staff and others from the risks that are associated with the site and activities undertaken thereupon. If, in the opinion of a member of the [ClientBuyer](#)'s staff, possessing the necessary identification, the [ContractorSupplier](#) is causing danger to the public, that officer has the authority to require immediate remedial action. Upon compliance with the instruction, the [ContractorSupplier](#) shall then contact the [ClientBuyer](#) to report the instructions given and the actions taken.

- 9.1. The [ContractorSupplier](#) reports all health, safety and environment incidents, accidents and near miss events which occur during the contract via the [ClientBuyer](#)'s agreed electronic reporting mechanism.
- 9.2. Where fatal or serious accidents occur – Major injuries and Dangerous Occurrence (as defined in the Reporting of Injuries, Diseases and Dangerous Occurrences Regulations - RIDDOR) - these are reported by the [ContractorSupplier](#) to the [ClientBuyer](#) immediately (by phone), entered on to the [ClientBuyer](#)'s agreed electronic reporting system within 24 hours, and are subject to a thorough formal investigation.
- 9.3. The [ContractorSupplier](#) shall also provide the [ClientBuyer](#) with a summary of all fatal and serious accidents every 3 months.
- 9.4. An injury is defined as fatal when death occurs in less than 30 days as a result of the accident. 'Fatal' does not include death from natural causes or suicide. A serious Injury is defined as an injury for which a person is detained in hospital as an in-patient, or any of the following injuries whether or not they are detained in hospital: fractures, concussion, internal injuries, crushing, burns (excluding friction burns), severe cuts, severe general shock requiring hospital treatment, injuries causing death 30 or more days after the accident.

- 9.5. The [Contractor/Supplier](#) shall provide the [Client/Buyer](#) with copies of RIDDOR returns and full details of all fatal and serious accidents. Such details shall include number of people involved, severity of injuries, date and time of the accident, precise location, nature of the accident (e.g. road traffic collision, failure of temporary works, fall from height), contributory factors, and weather conditions.
- 9.6. For incidents reportable under RIDDOR, Lost Time Injuries and Utility Strikes, the [Contractor/Supplier](#), within fourteen (14) days uploads a final written report (investigation) to the [Client/Buyer's](#) electronic reporting system detailing as a minimum the following:
- a) description of the incident;
 - b) immediate actions taken;
 - c) immediate causes;
 - d) root causes;
 - e) actions taken to prevent a recurrence;
 - f) skills, knowledge and experience of those involved – supervisors and operatives; and
 - g) details of plant/equipment used including calibration and maintenance
 - h) for utility strikes - eastings/northings and depth of affected service
- 9.7. For all other incidents, the [Contractor/Supplier](#), within fourteen (14) days submits an initial written report (investigation) and after twenty-eight (28) days a final report detailing, as a minimum the same items listed above.
- 9.8. With the agreement of the [Client/Buyer](#) a longer timescale to complete the final report may be agreed.
- 9.9. All investigation reports shall be completed to establish root causes and to a level of detail acceptable at the time to the [Client/Buyer](#). Any comments provided by the [Client/Buyer](#) are addressed by the [Contractor/Supplier](#) and an updated report submitted if required.
- 9.10. Nothing in this document supersedes the [Contractor/Supplier's](#) responsibility for statutory reporting of incidents/accidents.
- 9.11. To support the analysis of health and safety performance, the [Contractor/Supplier](#) provides the [Client/Buyer](#) with the details of the number of hours worked by the [Contractor/Supplier](#) and his [Subcontractor/Suppliers](#) during the last reporting period and a corresponding list of personnel working during the period. This data is to be submitted within the periodic report using the agreed format, and includes all the [Contractor/Supplier's](#) staff and personnel employed to provide the Works since the last report. The [Contractor/Supplier](#) also reports the cumulative number of hours worked since the *starting date*, categorised into management, site level supervision and operatives.

10 Non English Speaking Workers

- 10.1. The [Contractor/Supplier](#) describes within the Construction Phase Plan his arrangements to ensure that health and safety information is effectively communicated and understood by all non-fluent English speaking staff and [Subcontractor/Suppliers](#). This information includes but is not limited to:
- a) Site emergency procedures;

- b) First aid arrangements; and
- c) Risk assessments/method statements.

11 Personal Protective Equipment (PPE)

- 11.1. The [Contractor/Supplier](#) assesses and provides appropriate PPE for use of his employees and Sub[contractor/Supplier](#)s as follows:
 - a) Adopt a hierarchy of control reducing the need for protective equipment/clothing other than where such equipment/clothing is stipulated by legislation or other authoritative guidance
 - b) PPE provided is free of charge to all personnel, as required and appropriate, for the job task; and
 - c) PPE fits the individual and is cleaned, maintained and/or replaced to ensure that it remains effective at all time
- 11.2. The [Contractor/Supplier](#) ensures that all personnel wear PPE appropriate to the risks of each task and demonstrate that risk control systems are in place. The [Contractor/Supplier](#) shall ensure that protective clothing is effectively worn.
- 11.3. The [Client/Buyer](#)'s minimum requirements are:
 - a) hard hat with company branding;
 - b) eye protection (safety glasses or other suitable eye protection);
 - c) hand protection (gloves) (subject to a task specific risk assessment agreed by the [Contractor/Supplier](#), gloves may be omitted);
 - d) safety boots with ankle protection/support;
 - e) high visibility jacket (Class 3 – EN 471) and trousers with reflective strips for all *works* undertaken on the river piers with company branding;
 - f) Life jacket.
- 11.4. Dependant on the job task function and site conditions, personnel are also to be provided with:
 - a) respiratory protection equipment;
 - b) hearing protection; and
 - c) hot, wet or inclement weather protection.
- 11.5. The [Contractor/Supplier](#)'s PPE and clothing requirements are provided for use on Site to the [Client/Buyer](#), the [Client/Buyer](#)'s staff, visitors and other agents involved in the contract. The [Client/Buyer](#) confirms to the [Contractor/Supplier](#) what branding and logos are acceptable for all PPE.

12 First Aid, Occupational Health, Drugs and Alcohol

- 12.1. The [Contractor/Supplier](#) makes suitable and sufficient arrangements for first aid based on the:

- a) nature and size of the works;
 - b) size and distribution of the workforce;
 - c) needs of traveling, remote and lone workers;
 - d) hours of work; and
 - e) multi-occupied work sites.
- 12.2. The [ContractorSupplier](#) ensures access to an occupational health services provider. The occupational health service shall be active at all times when work is being undertaken.
- 12.3. The [ContractorSupplier](#) uses and consults specialist providers, where necessary, to promote health surveillance, health awareness and general occupational health arrangements.
- 12.4. The [ContractorSupplier](#) operates a drugs and alcohol policy and implements suitable arrangements to verify compliance with that policy including undertaking the necessary alcohol and drug testing. In addition the [ContractorSupplier](#) co-operates with the [ClientBuyer](#) regarding the execution of random testing and/or for cause alcohol and drug tests where required. The [ContractorSupplier](#) provides records of testing if requested by the [ClientBuyer](#).
- 12.5. The following **occupational health services** shall be available for each individual engaged by the [ContractorSupplier](#) (including the employees of site-based [SubcontractorSuppliers](#) and suppliers of any tier including labour only supply):
- a) testing for drugs and alcohol in individuals in accordance with the **[ContractorSupplier's](#) policy**;
 - b) providing pre-employment medicals;
 - c) providing health questionnaires on commencement for all individuals including site and office-based staff;
 - d) providing specific health appraisals for those referred following evaluation of questionnaires;
 - e) providing specific health surveillance for those requiring it where identified under regulations and/or risk assessment;
 - f) providing occupational hygiene services to support and assess ill health prevention management;
 - g) contributing to the effectiveness of attendance management, rehabilitation and return-to-work programmes and support for ill health incidence investigation where necessary; and
 - h) providing health promotion programmes applicable to maintenance and construction operatives' workplace, lifestyle and wellbeing.
- 12.6. The [ContractorSupplier](#) shall implement occupational health protocols for the following health surveillance:
- a) Hand Arm Vibration syndrome surveillance;
 - b) Fatigue management;
 - c) Stress management;
 - d) Respiratory health.

13 Welfare Arrangements

- 13.1. The [Contractor/Supplier](#) provides welfare facilities to support the overall occupational health programme. Welfare facilities are established and maintained in working order. All toilet, washing, changing, personal storage and rest areas are easily accessible and have adequate heating, lighting and ventilation. Facilities may need to be provided at more than one location to ensure workers have easy access.
- 13.2. The [Contractor/Supplier](#) ensures good hygiene standards are provided throughout the welfare and office facilities. As a minimum the [Contractor/Supplier](#) ensures that welfare facilities for construction sites fulfil the requirements set out in Schedule 2 of the CDM regulations.
- 13.3. The [Contractor/Supplier](#) shall provide an outline of their arrangements regarding provisions for transient work, including reactive and planned short term works.

14 Equipment, Materials or Substances Hazardous to Health

- 14.1. The [Contractor/Supplier](#) shall ensure that the [Client/Buyer](#) is notified of any substances hazardous to health which may be used in connection with the [Order Contract](#). Full information, including manufacturers' hazard data sheets and the [Contractor/Supplier](#)'s own Control of Substances Hazardous to Health (COSHH) assessment, shall be provided by the [Contractor/Supplier](#) to the [Client/Buyer](#) for approval 28 calendar days prior to the use of any substance hazardous to health under the COSHH Regulations 2002.
- 14.2. The [Contractor/Supplier](#) shall take all necessary steps to avoid creating a dust nuisance, and shall ensure the works are carried out in accordance with the GLA and London Councils publication "The Control of Dust and Emissions from Construction and Demolition; (2014) and any revisions. If, in the opinion of the [Client/Buyer](#), the [Contractor/Supplier](#) is not dealing adequately with the control of dust, the [Client/Buyer](#) may instruct the [Contractor/Supplier](#) to carry out such additional measures as the [Client/Buyer](#) considers are necessary, at the [Contractor/Supplier](#)'s expense.
- 14.3. Brows, pontoons and footways shall be protected from dust or spray arising from any works which might otherwise reduce visibility. The [Contractor/Supplier](#) shall take measures to prevent debris, dust, spray or other materials from affecting any live brows, pontoons or footway.
- 14.4. The [Contractor/Supplier](#) shall ensure that the protective measures stated in Highways Agency Advice Note SA 8/94 'Use of Substances Hazardous to Health in Highway Construction', incorporating subsequent amendments are enforced.
- 14.5. Storage of hazardous materials, including compressed gas cylinders, may be contained within commercial, retail, residential or public buildings adjacent to/or on the road networks that are not under the control of/or known to the [Client/Buyer](#). The [Contractor/Supplier](#) shall remove all hazardous materials they are responsible for at the end of each working day and shall ensure that any used in conjunction with works are stored and secured appropriately when in use.

15 Asbestos

- 15.1. The [ClientBuyer](#) supplies all information in his possession in respect of the presence of asbestos containing materials within the Site/structure. The information is included in the Pre-Construction Information/asbestos register. Based on this information, the [ContractorSupplier](#) liaises with the [ClientBuyer](#) to determine where additional surveys are required and the type of survey to be undertaken.
- 15.2. Where no surveys exist the [ContractorSupplier](#) consults the [ClientBuyer](#) on the requirement for, number and type of any asbestos survey before the start of the works.
- 15.3. The [ContractorSupplier](#) shall have in place a procedure for ensuring that, if asbestos is encountered or suspected, the 'Control of Asbestos Regulations' and all other mandatory Regulations are complied with. If asbestos is encountered or suspected, the [ContractorSupplier](#) shall stop all works in the immediate vicinity of the suspect material and isolate the area.
- 15.4. The [ContractorSupplier](#) shall notify the [ClientBuyer](#) (or his site representative) who shall instruct the appropriate action to be taken. Such action may include testing of the suspect material (using a UKAS accredited laboratory) and arrangements for the removal of the material, if necessary, using a licensed [ContractorSupplier](#).
- 15.5. The [ContractorSupplier](#) shall also report a Near Miss via the agreed reporting process. The [ContractorSupplier](#) prepares a report of the incident and provides it to the [ClientBuyer](#) in accordance with the requirements described under Incident Reporting, Performance Monitoring, and arranges for the location and condition of the asbestos containing material and all relevant information to be included in the Health and Safety File.
- 15.6. The [ContractorSupplier](#) shall liaise with the [ClientBuyer](#) ensuring that all relevant information on the asbestos containing material, location, condition, type, remedial action, etc. is provided in order for the [ClientBuyer](#)'s asbestos register to be updated.

16 Emergency Plan and Fire Safety

- 16.1. The [ContractorSupplier](#)'s **Emergency Preparedness Plan** (EPP) is submitted to the [ClientBuyer](#) for review prior to commencement of work. In addition to describing the emergency arrangements for the works and activities on Site i.e. entry to confined spaces, working at height, hot works, striking utilities during excavations, hazards working on or near water, damage to third party structures, the plan considers potential impacts beyond the boundaries of the site, especially where there are interfaces with operational assets and neighbours etc. Any existing site specific EPPs shall be provided as part of the Pre-Construction Information, and are incorporated into the [ContractorSupplier](#)'s EPP as appropriate. The emergency arrangements for the works may be included in the Construction Phase Plan if preferred by the [ContractorSupplier](#).
- 16.2. The [ContractorSupplier](#) provides fire prevention and fire precautions training to all employees, particularly fire wardens/marshals and training for key emergency management personnel as required for the effective implementation of the procedures.

- 16.3. The [ContractorSupplier](#) in consultation with the [ClientBuyer](#) arranges simulated emergency exercises at an agreed frequency following the commencement of the contract, and as appropriate for site and office locations.
- 16.4. Immediately following an emergency or following a simulated emergency exercise, the [ContractorSupplier](#) reviews the actions taken against the requirements set out in the EPP and revises the EPP accordingly. The output of these reviews are provided to the [ClientBuyer](#).
- 16.5. The [ContractorSupplier](#)'s EPP includes emergency pollution control measures compliant with Environment Agency (EA) guidelines including emergency phone numbers and the method of notifying local authorities and statutory authorities.
- 16.6. The [ContractorSupplier](#) ensures that all works are compliant with the relevant legislation, standards and guidance on fire safety.
- 16.7. Combustible materials shall not be inappropriately stored beneath or within any structure.
- 16.8. The [ContractorSupplier](#) ensures that regular site inspections include those of the [ContractorSupplier](#)'s fire safety arrangements, are recorded and the completed forms are maintained as appropriate.
- 16.9. In accordance with the Regulatory Reform (Fire Safety Order) and Fire Safety on Construction Sites (HSG168) published by the Health and Safety Executive, as appropriate, the [ContractorSupplier](#) produces fire risk assessments identifying the nature and level of risk for the scope of works.
- 16.10. In the event of a fire emergency the [ContractorSupplier](#) complies with the requirements of the EPP in order to ensure a timely evacuation of the Site and to account for all personnel.
- 16.11. The [ContractorSupplier](#) complies with the requirements of the LFEPA or other relevant fire authority for the provision of the Site access points. Where appropriate, the accesses are designed to the requirements of LFEPA Publication: Fire Safety Guidance Note Number 29 Access for Fire Appliances. The access points shall also be suitable for access for ambulances.

17 Behavioural Safety

- 17.1. The [ContractorSupplier](#) implements a behavioural based safety programme aiming to:
- a) lead by example;
 - b) increase awareness of behaviours;
 - c) develop a no name/no blame culture with the workforce;
 - d) recognise safe behaviour, challenge and manage unsafe behaviour;
 - e) identify and remove hazards;
 - f) provide positive observations and feedback;
 - g) reduce at risk behaviours/conditions; and
 - h) increase immediate corrective action.
- 17.2. The [ContractorSupplier](#) appoints behavioural safety leaders from within their workforce. The behavioural safety leaders are required to:

- a) attend behavioural safety briefings;
- b) manage behavioural safety logs;
- c) lead by example and embody the values of behavioural safety;
- d) walk the Site and raise all safety concerns;
- e) raise awareness and brief teams on behavioural safety and encourage all [ContractorSupplier](#) personnel to raise safety concerns, remove hazards as they find them and record and report them as required;
- f) liaise with the [ClientBuyer](#) and escalate any issues that may need resolving; and
- g) attend behavioural safety leader meetings.

17.3. The [ContractorSupplier](#) undertakes a safety culture survey programme of the workforce and staff and includes the [ClientBuyer](#). The survey is based on an industry recognised survey tool. The [ContractorSupplier](#) reports on the progress towards a world class safety culture based upon the findings of the survey at appropriate forums.

18 Health and Safety Innovation, Best Practice and Campaigns

- 18.1. The [ContractorSupplier](#) identifies, trials and implements health and safety innovations in consultation with the [ClientBuyer](#).
- 18.2. During the contract it is anticipated that a number of industry best practices shall be developed and rolled out. Where identified the [ContractorSupplier](#) adopts such industry best practice to improve health and safety performance. Such industry best practice may comprise of health and safety standards and behavioural techniques and processes along with general site safety 'best practices' adopted from specific [ContractorSuppliers](#).

19 Site Mobilisation and Start of Works

- 19.1. The [ContractorSupplier](#) does not start construction works until he has fulfilled all of his obligations under the CDM Regulations and the [ContractorSupplier](#) has received formal notification from the [ClientBuyer](#) to proceed with the works.
- 19.2. A pre-commencement readiness assessment is undertaken by the [ClientBuyer](#) to ensure that the [ContractorSupplier](#) has in place the documentation, consents, processes, permits, licences and controls to allow works to proceed. The [ContractorSupplier](#) supplies all necessary information and/or access to information that the [ClientBuyer](#) requires to support this process.
- 19.3. Due to the nature of the works under the contract, the [ContractorSupplier](#) shall expect to engage with other specialist and/or [ClientBuyer](#) nominated [ContractorSupplier](#)'s i.e. Port of London Authority (PLA), Environmental Agency (EA), Marine Office (MO), Local Authority (LA), Boat Operators and Utility Companies. The [ContractorSupplier](#) shall ensure that site boundaries are established to ensure construction sites between other [ContractorSuppliers](#) do not clash.
- 19.4. At times works shall be undertaken close to or affecting London Underground, London Rail, Network Rail sites, the River Thames, or other watercourses and third party structures,. Where such works take place, the [ContractorSupplier](#) shall liaise with the

appropriate authorities ensuring that any specific works requirements are fully met.

20 Site Security Arrangements

- 20.1. All sites shall be secured so as to provide protection of the public and workforce during works and prevent unauthorised access, particularly during hours when the site is unoccupied.
- 20.2. Additional or enhanced security arrangements may be required in areas that pose a high security risk. The security arrangements shall be reviewed prior to works commencing on each site and the [ContractorSupplier](#) shall notify the [ClientBuyer](#) representative of the specific arrangements being proposed.
- 20.3. Information on specific security risks, where known, shall be made available to the [ContractorSupplier](#) before works commence on site. The [ContractorSupplier](#) shall make security arrangements for protection of the works, workforce and equipment according to the particular risks posed by the location of each site.

21 Information

- 21.1. The [ContractorSupplier](#) ensures that:
- a) Health and Safety records relevant to the *works*, including induction, training and equipment inspection and testing records, are available for inspection on request;
 - b) copies of all relevant health and safety information to particular site activities is held by the team carrying out the work including method statements, risk assessments, written briefings, permits to work and safety alerts/bulletins;
 - c) safety briefings are provided to all persons carrying out work tasks subject to method statement, risk assessments and permit controls and written records maintained of briefings signed by all persons carrying out the tasks (these briefings are completed when the task or condition changes);
 - d) the *works* are suitably supervised and that operatives are aware of the person supervising their work activities and their whereabouts at all times;
 - e) supervisors receive induction on the health and safety requirements and of their specific responsibilities for health and safety aspects.

22 Site Supervision

- 22.1. The [ContractorSupplier](#) ensures that competent persons supervise and manage the *works* and that there are arrangements in place to specifically address the supervision of new personnel and any others at particular risk. The arrangements also include those for addressing foreseeable emergencies. The supervisory arrangements are reviewed for adequacy and suitability in connection with any lone or isolated work.
- 22.2. Before commencement of works, the [ContractorSupplier](#) shall provide the [ClientBuyer](#) with a written procedure setting out their monitoring arrangements, identifying the person(s) with responsibility for undertaking the monitoring. This may be incorporated or appended to the contract level Construction Phase Plan (CPP).

- 22.3. The [Contractor/Supplier](#) ensures that persons appointed to supervisory and management positions have the necessary skills, knowledge and experience for the role, and are regularly assessed. Training and induction includes demonstration by example of good practice and the impact of poor practice.

23 Confined Spaces

- 23.1. The [Contractor/Supplier](#) evaluates the workplace to determine which spaces (if any) are confined spaces and develops a written risk assessment and method statement identifying the controls required for the safe operation of a safe system of work in accordance with the Confined Space Regulations and INDG258: Safe Work in Confined Spaces. The risk assessment and method statement include the confined space entry permit and the control systems required for working in confined spaces including communication, evacuation and rescue.
- 23.2. The [Contractor/Supplier](#) eliminates the need to enter confined spaces wherever possible. Where entry to a confined space is necessary the [Contractor/Supplier](#) ensures that a safe system of work is identified that documents all hazards, safety precautions and safe working practices associated with all confined space activities performed by employees.
- 23.3. The [Contractor/Supplier](#) ensures his safe system of work includes:
- a) checks that employees have the necessary skills, knowledge and experience to enter a confined space, are appropriately healthy (e.g. lung function for use of breathing apparatus) and have received adequate training;
 - b) an adequate communication system to enable clear communication between those inside and outside of the confined space;
 - c) testing and monitoring of the atmosphere within a confined space for hazardous gas, fume or vapour and checks on the concentration of oxygen prior to entry; and
 - d) a requirement for emergency arrangements to be in place before any person enters or works in a confined space and contingency plans appropriate to the nature of the confined space, the risks identified and consequently the likely nature of an emergency rescue.

24 Working at Height

- 24.1. The [Contractor/Supplier](#) complies with the Working at Height Regulations and eliminates the need to work at height wherever possible. Where working at height is necessary the [Contractor/Supplier](#) ensures that a safe system of work is identified that documents all hazards, safety precautions and safe working practices associated with all working at height activities performed by employees.
- 24.2. The [Contractor/Supplier](#) ensures that the work is properly planned, appropriately supervised and that employees have the skills, knowledge and experience to work at height. The [Contractor/Supplier](#) ensures that collective measures take precedence over personal protective measures i.e. fall prevention equipment.

- 24.3. The [ContractorSupplier](#) implements an inspection and testing regime for all equipment identified as assisting in any working at height operation to ensure that it is compliant with statutory regulations, maintaining records of all inspections and tests.

25 Lifting Operations

- 25.1. The [ContractorSupplier](#) complies with the Lifting Operations and Lifting Equipment Regulations (LOLER), producing a risk assessment and lifting plan identifying the nature and level of risks associated with a proposed lifting operation. The [ContractorSupplier](#) briefs the content of the risk assessment and lifting plan to all employees involved in lifting operations.
- 25.2. The [ContractorSupplier](#) ensures that all employees involved in lifting operations have the required skills, knowledge and experience.
- 25.3. The [ContractorSupplier](#) implements or sources adequate training for employees who operate or test/examine lifting equipment. Training records are kept and where lifting operations are planned, copies of these records are available to the [ClientBuyer](#).
- 25.4. The [ContractorSupplier](#) ensures that any persons who operate lifting equipment or conduct inspections, examinations or tests have the required skills, knowledge and experience to ensure that the safe system of work is compliant with statutory regulations and the approved code of practice for safe use of lifting equipment published by the Health and Safety Executive.
- 25.5. The [ContractorSupplier](#) ensures that there are adequate competent persons to approve all lift plans on the worksite in accordance with LOLER. No lifts are carried out without this prior acceptance.

26 Excavation and Dredging

- 26.1. The [ContractorSupplier](#) ensures that all excavations / dredging are planned before construction works commence, taking reasonable steps to obtain and review up to date survey drawings, as-built drawings, utility records, ground penetrating radar, hydrographic surveys and other appropriate survey information when planning works.
- 26.2. In conjunction with suitable detection methods, sufficient trial holes are undertaken by the [ContractorSupplier](#) to confirm the location of all buried utilities. The [ContractorSupplier](#) employs a permit to dig process and ensure that all employees undertaking excavations / dredging have the necessary skills, knowledge and experience.
- 26.3. The [ContractorSupplier](#) ensures that reference is made to the Health and Safety Executives Guidance Note HSG 47 Avoiding Danger from Underground Services.
- 26.4. Some sites shall be located close to a range of public transport infrastructures i.e. Underground, excavations required. The [ContractorSupplier](#) shall make all necessary preparations prior to commencing work including but not limited to, liaison with the Local Authority, the River Authority and infrastructure owners.

27 Overhead Power Lines

- 27.1. The ~~Contractor~~[Supplier](#) shall become familiar with and follow the guidance contained in the HSE publication "Avoiding danger from overhead power lines" Guidance Note GS6.
- 27.2. The ~~Contractor~~[Supplier](#) shall prepare a suitable and sufficient risk assessment before any works below overhead power lines are undertaken, particularly where the use of plant/equipment is required to perform the works.

28 Hot Works

- 28.1. All hot works (welding, soldering, flame cutting, disc cutting of metal, etc.) shall be subject to a written risk assessment, method statement and permit to work system. The [Contractor](#)~~Supplier~~ shall maintain suitable first aid and fire fighting equipment on site whilst hot works are taking place and staff shall be trained in its use. Members of the public shall be protected from all hot works operations and from UV rays generated from welding operations.
- 28.2. On transient sites, as a minimum a fire extinguisher of the suitable type shall be available on vehicles used to transport staff/materials. On fixed sites, arrangements for fire protection shall be detailed in the Construction Phase Plan (CPP) and shall include arrangements for protecting facilities on and adjacent to the site.
- 28.3. All compressed gas cylinders used during hot works shall be adequately secured and all regulators/hoses shall be subject to regular inspection. The [Contractor](#)~~Supplier~~ shall maintain records of inspection and make these available to the [Client](#)~~Buyer~~ upon request.

29 Construction Plant and Equipment

- 29.1. The [Contractor](#)~~Supplier~~ ensures that all plant and equipment operators have the skills, knowledge and experience for the plant/equipment they are required to operate and that they have been assessed as competent.
- 29.2. The [Contractor](#)~~Supplier~~ ensures that all plant and equipment, including hired plant/equipment, is maintained, inspected and tested in accordance with manufacturers instruction and/or requirements within legislation. The [Contractor](#)~~Supplier~~ ensures that all plant/equipment is only maintained (including changing cutting blades) by personnel qualified to do so and that the results from all maintenance, inspection and testing are recorded.

30 River Traffic Management and Pedestrian Segregation

- 30.1. The [Contractor](#)~~Supplier~~ ensures that they follow the guidance set out in Transport for London's Temporary Traffic Management Handbook when working on the TLRN, and that adequate provision is made for traffic management to either the Safety at Street Works and Road Works Code of Practice or Chapter 8 of the Traffic Signs Manual, whichever is the most appropriate for the risks and type of works. All Traffic Management are only installed and maintained by employees with the necessary skills, knowledge and experience and hold an appropriate valid competence scheme card.

30.2. The [ContractorSupplier](#) ensures that adequate pedestrian management/segregation is included within traffic management arrangements and consults with the [ClientBuyer](#) before implementation.

30.3. Subject to the degree of risk and location, the [ContractorSupplier](#) implements such arrangements as are necessary employees to inspect and maintain pedestrian segregation arrangements.

31 Site Inspections and Assurance

31.1. The [ContractorSupplier](#) agrees with the [ClientBuyer](#) a programme of active assurance activities including Site inspection and audits, and takes account of the nature of the work, previous results and any other relevant factors. The [ContractorSupplier](#) provides for information a copy of the completed audit/inspection report to the [ClientBuyer](#) no later than five (5) business days after the audit inspection.

31.2. The [ContractorSupplier](#) shall accommodate the gathering of assurance and monitoring of health, safety and environmental performance by the [ClientBuyer](#) using the Supplier HSE Assessment Tool. The default frequency for assessment against the criteria is quarterly, though this may be varied by the [ClientBuyer](#) in light of the level of activity or performance. The [ContractorSupplier](#) participates in the assessment through the provision of information and evidence requested by the [ClientBuyer](#) in respect of the criteria. The results of the assessment shall be discussed with the [ContractorSupplier](#) upon completion. If required, the [ContractorSupplier](#) shall be asked to prepare an Action Plan in response; progress against which is monitored as part of subsequent assessments. The full assessment criteria in place at the time shall be shared with the [ContractorSupplier](#) ahead of the assessment.

31.3. Inspections and audits are undertaken by the [ContractorSupplier's](#) health and safety support, supervisors and other management staff. Sub[contractorSupplier](#)s carry out regular health and safety inspections of their own workforce and provide information to the [ContractorSupplier](#).

31.4. The inspections are performed in coordination with the [ClientBuyer's](#) own inspection schedule to avoid duplication and to maximise the use of resources and effectiveness of the inspection system.

31.5. The [ContractorSupplier](#) addresses all actions and recommendations arising from inspections within the agreed timescales, regardless of who has undertaken the inspection.

31.6. The [ContractorSupplier](#) holds a regular Health and Safety Supplier Meeting. The [ContractorSupplier](#), Sub[contractorSupplier](#)s and members of the workforce attend the meetings. The [ClientBuyer](#) is invited to attend.

31.7. The [ContractorSupplier](#) shall, where suitable, participate in the [ClientBuyer's](#) site recognition scheme. The site recognition initiative is about establishing a guiding light on what work sites should look and feel like from a health, safety and environmental perspective. To achieve the expected standard, a site team shall go beyond basic compliance with health, safety and environmental requirements and achieve industry recognised best practice. More detail about the site recognition scheme process and assessment is available in G1365 'Beacon site/team – achieving best practice guidance' and checklist F5389. Where suitable, the [ContractorSupplier](#) shall undertake a joint assessment with the [ClientBuyer](#) and be formally assessed with the aim to achieve 'Beacon' status (team or site award) within an agreed timescale with the [ClientBuyer](#).

32 Senior Management Tours

- 32.1. Senior managers from the [ContractorSupplier](#) and the [ClientBuyer](#) complete health, safety and environment (HSE) tours in accordance with the programme expectations. The frequency of HSE tours is agreed with the [ClientBuyer](#) but is at least quarterly. The [ContractorSupplier](#)'s senior managers and those of his Sub[contractorSuppliers](#) contribute actively in these tours as part of the joint commitment to deliver health and safety excellence.
- 32.2. Representatives from the workforce are engaged in tours to build relationships between management and the workforce in the drive to world class health and safety performance.
- 32.3. The basis of any tour is to engage with the workforce, address the criteria listed below, provide an opportunity for employees and the [ContractorSupplier](#) to raise any health, safety or environment concerns, and to seek assurance that health, safety and environment systems across the project are understood and followed.
- 32.4. The [ContractorSupplier](#) ensures that senior management tours focus on:
- a) acknowledgement/engagement of all persons involved in an activity;
 - b) management of any particular issues, problems or risks;
 - c) identification and addressing of the health, safety and environment concerns found during the tour;
 - d) seeking assurance that health, safety and environment systems are understood and being followed by ensuring that standards and expectations for best practice are realised in all work areas and practices;
 - e) culture (safety culture and behaviours);
 - f) health, safety and environment performance data;
 - g) changes, either organisational or activity;
 - h) project activity;
 - i) incident or accident data; and
 - j) review of methods of work, quality of briefings, site documentation.

33 Works in the Vicinity of the Tidal Thames

General

- 32.1 When work has to be carried out on or in the vicinity of water several additional hazards are introduced and shall be carefully evaluated and controlled.
- 32.2 Consequently all aspects of the work shall need to be considered during the risk assessment process, including the hazards presented by working on or near water.
- 32.3 The Construction (Design and Management) Regulations 2015 require [ClientBuyers](#) engaged in construction work to take all reasonably practical measures to prevent persons falling into water; to minimise the risk of drowning in the event of a fall into water; and to provide suitable rescue equipment (rescue boat) and training in the use of it. Also, the

transportation by water to or from work sites shall be done safely; and any vessels used shall be suitable, properly maintained, under the control of a competent person and not overcrowded or overloaded.

- 32.4 In addition to the above, the Merchant Shipping Acts, and related Regulations and Codes of Practice apply to passenger carrying crafts, workboats, pontoons, lifebuoys etc. Merchant Shipping Legislation is administered by the Maritime and Coastguard Agency (MCA).

Hazards when working on or near water

- 32.5 Any workplace over, on or near water presents a danger that persons might slip or fall into the water, be swept off their feet by wave action, tide action, strong currents or swell from passing water traffic. Adverse weather is also a factor that can increase the danger, and work conditions can change quickly. Whether or not a person is injured by falling in the water, there is an immediate risk of drowning and/or being carried away by water currents.
- 32.6 Precautions shall be taken, firstly to prevent persons entering the water and, secondly, to ensure that anyone who inadvertently enters the water shall float and are rescued in the shortest possible time. A standby rescue boat allows in water rescue in the shortest possible time. When working on or near water the [Contractor/Supplier](#) shall establish safe systems of work based on a thorough risk assessment and that staff are properly trained in Riverside Personal Safety Training Course and instructed.
- 32.7 When working on or near water consideration shall also be given to the health implications of falls into the water. The water may be polluted, for example when working near sewage discharge points, and there is the ever-present risk of contracting leptospirosis (or Weil's disease) from water contaminated by rat urine.

Causes of Entry into water

- 32.8 These include:
- Falls from height
 - Trips, slips, stumbles from low level
 - Persons being knocked over by moving objects (e.g. crane loads, vehicles, etc.)
 - Loss of balance (e.g. by high winds, sudden boat movements, etc.)
 - Failure or absence of edge barriers
 - Failure or absence of fall prevention equipment, ropes, lines.
 - Floating platforms or vessels sinking.
 - Tide action, waves or swell from passing waterborne traffic.

Hazards of Falling into Water

- 32.9 The most immediate danger is of drowning. Factors that can contribute to this are:

- a. Shock from sudden immersion in cold water
- b. Weight of waterlogged clothing
- c. Life jacket not being worn (or not inflating)
- d. Incapacity following injury – caused by striking an object during a fall, or whilst in the water.
- e. Fatigue or hypothermia where rescue is not immediate.

Precautions for working on or near water

~~32.10 Whenever reasonably practicable fixed edge protection shall be provided to prevent people falling into water.~~

~~32.11 Where edge barriers are not reasonably practicable at exposed edges, e.g. quay edges, appropriate warning signs and/or edge markings shall be displayed to highlight the danger.~~

Commented [AM1]: Does this apply to EVID?

Work Outside Of Edge Barriers

~~32.12 Safety boat required at all times. Safety Nets can provide good fall protection for those carrying out occasional work outside edge barriers though are not 100% fail proof. E.g. maintenance activities. An alternative is the use of a full body harness attached by lanyard to a suitable anchorage point or proprietary fall prevention anchorage system. Such equipment needs to be selected by a competent person to ensure it is suitable for the task, checked and maintained to ensure it is kept in good order and the users instructed and trained in its use. Emergency rescue arrangements also need to be in place. These shall include the provision of a safety boat as a safe means of recovering persons being lowered down after being suspended from a fall~~

Work from Mobile Elevating Work Platforms

~~32.13~~ 32.10 Safety Boat Required. When working next to water, a harness shall not be worn due to the risk of drowning if the work platform falls into the water. Life jackets shall be worn.

Workplace Tidiness

~~32.14~~ 32.11 This is of special importance when working on or near water. Tools, equipment, ropes and other materials not in use shall be stored away. Waste shall be cleared up promptly, and materials stacked or positioned with care.

~~32.15~~ 32.12 Slippery surfaces increase the risk of people falling into water and shall be properly treated to ensure good grip. Water weed, slime, bird droppings etc. shall be cleaned off. Oily or greasy surfaces shall have absorbent granules or grit spread on them, and icy or frosty surfaces shall be treated with salt or grit.

Weather Conditions

~~32-46~~32.13 The prevailing conditions and local weather forecast shall be taken into account at the beginning of each shift. Rain, rising winds, fog, mist, tidal conditions etc. are all potential dangers.

Protective Clothing and Equipment

~~32-47~~32.14 Hard hats are part of the ~~Client~~Buyer's minimum requirement. The risk of people being struck on the head prior to falling into water is a significant risk. Footwear with good, non-slip soles shall be worn when working on or near water. Rubber boots shall not be worn as, once filled, they act as a weight and could drag the wearer under water.

Life Jacket

~~32-48~~32.15 This is a personal safety device which, when fully inflated (if inflatable), shall provide sufficient buoyancy to turn and support even an unconscious person face upwards. These shall be worn at all times whilst working on boats and where there is a foreseeable risk of drowning when working near to water. Those using life jackets need to be trained and instructed in their proper use and storage, and the equipment regularly inspected and maintained.

Rescue Equipment and Procedures

~~32-48~~32.16 Planning of works shall include the need for rescue equipment, such as Maritime and Coastguard Agency (MCA) coded Standby rescue boat including SOLAS (Safety of life at sea) safety equipment. MCA approved lifebuoys or rescue lines shall be positioned at intervals along the work area. Daily checks shall be made to ensure that lifebuoys and lines are in their proper place.

~~32-20~~32.17 It is important that:

- a) Lone working is avoided to ensure there is always someone to raise the alarm.
- b) Each person is trained in Riverside Personal Safety Training Course in what to do in the event of an emergency.
- c) An emergency rescue plan is in place for the work activity. As a minimum, the elements of a rescue procedure consists of:
 - i. A routine for raising the alarm.
 - ii. A drill to provide the rescue boat facilities.
 - iii. A routine for getting the rescued person(s) appropriate medical assistance. i.e. all rescue boat skippers to hold HSE first aid at work.

~~32-24~~32.18 Rescue procedures need to be practised at regular intervals involving all persons who would be required to participate in a rescue.

~~Work Boats and Vessels~~

Commented [AM2]: Does this apply to EVID?

~~32.2232.19~~ These shall meet MCA requirements in terms of their construction, use, equipment, (including safety, communication and rescue equipment) and the competence of the operator. In most circumstances it will be necessary to provide a rescue boat standing by during work activities on or near water. For example work near tidal water or fast flowing rivers. Practice exercises in respect of rescuing people from the water shall need to be carried out.



Doing the right thing locally and globally

Sustainability Report 2021

MAYOR OF LONDON

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Commissioner's foreword

Transport for London (TfL) is one of the world's leading and most successful integrated transport authorities. TfL has gained global respect for its innovative and progressive approach to the delivery of a world-class service that shapes the lives of the citizens it serves.

The global coronavirus pandemic has had a devastating impact on our lives, society, the UK economy and our finances. We recognise the challenges we are faced with and we are passionate about playing our part in leading London and the wider UK economy out of the coronavirus pandemic to build a better, green, just and inclusive recovery.

We are doing this by leveraging our partnerships and our position to contribute to the national recovery. With one of the most mature low-carbon transport systems in Europe and a vast supply chain, 68 per cent of which is outside London, we are uniquely positioned to support the Government's national priorities to progress to a carbon-free future and create wealth and employment that will level up the national economy. Our capital expenditure is already biased towards the green recovery and, with the right capital investment, we can accelerate this to meet the 2030 ambition to decarbonise transport.

I'm proud to work for an organisation that cares deeply about helping to build a fair, prosperous and environmentally sustainable London and wider world. I see evidence of this every day in what we do.

We are a big organisation, and with that comes big responsibility. The long-term success of cities and organisations depends on them operating sustainably. Those that do not, will no longer be viable in the decade

ahead. We intend to not only be viable in the coming decade, but to continue to serve London for generations to come. This is why we are thinking in broader terms – how we impact society and communities, health, the environment and the economy – not only for the reasons of corporate social responsibility, but to support our goal of becoming financially sustainable.

While we have come a long way, there is still a lot of progress to be made. I am determined to drive continual improvement at TfL to maximise our contributions towards the global Sustainable Development Goals, to get better at understanding the impact of our day to day and business planning decisions on our sustainability outcomes, and to create a fair and inclusive organisation that represents the city it serves.

A key step on this journey is the publication of our first TfL Sustainability Report. This report outlines the kind of organisation we want to be and underscores our commitment to continually challenge ourselves to provide an even better service for everyone.



Andy Byford
Commissioner



'I'm proud to work for an organisation that cares deeply about helping to build a fair, prosperous and environmentally sustainable London'

Our reporting

Sustainable development is core to our purpose

We are the integrated strategic transport authority for London and one of largest public transport operators in the world.

We regulate and contract for many vital transport services, renew and maintain an expansive and complex asset base, provide new infrastructure, are a landlord, and have a significant commercial portfolio, including property development and advertising. We directly employ around 27,000 people.

Sustainable development is core to our purpose. Our strategies, plans and regular reporting on sustainability performance are centred around the principles of:

- Social development
- Improvement of the environment
- Economic development

In delivering these principles we aim to play our part in achieving the United Nations Sustainable Development Goals, which are listed on page 8. These are a collection of 17 interlinked global goals designed to be a 'blueprint to achieve a better and more sustainable future for all'. The Sustainable Development Goals were set up in 2015 by the United Nations General Assembly and are intended to be achieved by 2030.

To guide our approach to reporting, we are using the Global Reporting Initiative Sustainable Reporting Standards, and have structured this report around the 'three pillars of sustainability': Society, Environment and Economy.

This Sustainability Report is our first, and sets out our work in this area, highlighting where we want to improve. Page 44 provides a list of our reports and other sources where more detailed information can be found in relation to our sustainable development impact.

We aim to play our part in achieving the United Nations Sustainable Development Goals



Why now?

There is a widespread ambition that the legacy of the pandemic should be to deliver a better, greener future

We believe that we are well placed to help London build back better. This report aims to set out our work to date in this area and to provide a framework embedding sustainability into everything we do.

The desire to tackle issues of social inequality and improve social cohesion is stronger than it has ever been. The United Nations recently published the Intergovernmental Panel on Climate Change (IPCC) Sixth Assessment Report on the physical science of climate change, which makes very clear that this is a critical decade for accelerating action on climate change. It is essential that governments deliver on the Paris Agreement with robust and tangible plans at the COP26 summit in Glasgow in November 2021.

With sufficient funding, TfL can play a leading role helping the UK address the climate emergency. We have witnessed increasingly serious and frequent weather events and tackling the climate and ecological crisis has become a central theme in almost all public policy and discourse. We must use our influence and position as one of the world's leading transport authorities to secure a green, just and inclusive recovery for London and the wider UK economy.

As well as our ambition to continue to operate more sustainably across our operations, we are leveraging our partnerships to contribute to the national

recovery. We are a member of the London Recovery Board, a group of leaders committed to overseeing London's long-term recovery effort, and signatories of the Anchor Institutions Charter, aimed at maximising employment opportunities and helping young people to flourish through their procurement and recruitment power. We continue to put safe, reliable, clean and affordable walking, cycling and public transport at the heart of our decisions to encourage customers back to public transport and avoid a car-led recovery, thereby building on the environmental gains seen during the lockdowns.

We currently have a Safety, Sustainability and Human Resources panel (SSHRP) which considers our operating performance in relation to sustainability, among other things. We have now produced this TfL Sustainability Report, which brings together all of our existing actions and ambition into one place for the first time. It includes key aspects of our activities and performance metrics with much more detail than is available in our other reports (see page 44).

We will report progress against the plans and ambitions set out in this report annually to the SSHRP. Over time, we will evolve our approach to reporting using the Global Reporting Initiatives to guide us in terms of sustainability reporting. We will use our new Vision and Values plan to help drive sustainable development throughout the organisation as described further on page 43.

This is the beginning of our journey to get better at telling a powerful and robust story on our sustainability agenda

We want to secure a green and inclusive recovery for London

Our scale and reach*

We are a large and diverse organisation

We run most of London's public transport services.

9.7million

trips are completed each day via public transport, this accounts for 36 per cent of trips in London.



Underground, Elizabeth line, Buses, DLR, London Overground, London Trams, London Dial-a-Ride, London River Services, London Taxi and Private Hire, Santander Cycles, Victoria Coach Station and Emirates Air Line

Our services at a glance

9,000
buses



22
Hydrogen buses



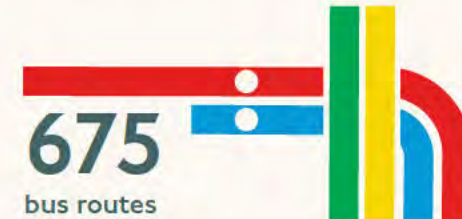
>500
electric buses



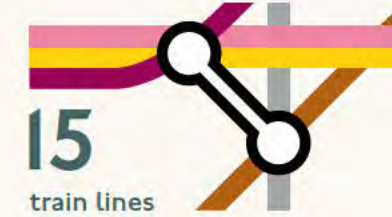
764km
of track connecting



675
bus routes



15
train lines



734
trains active during peak times



457
train stations



Our wider portfolio

5,700
acre estate



we are a large land owner, landlord and commercial developer

1,580
of 10,000
planned homes underway



3,000
tenanted properties



Our people

We directly and indirectly employ a large number of people:



Around **27,000**
directly employed colleagues

>100,000
indirectly employed colleagues

Regulator for Taxi and Private Hire:



13,884
London taxis



78,049
Private hire vehicles

Highway authority for the TfL Road Network:



5%
of London road network



580km
of road

30%
of traffic carried on the TfL Road Network

During 2019/20, we spent in excess of

£6.7bn

on goods, services and works required to deliver and upgrade services.

Our 65

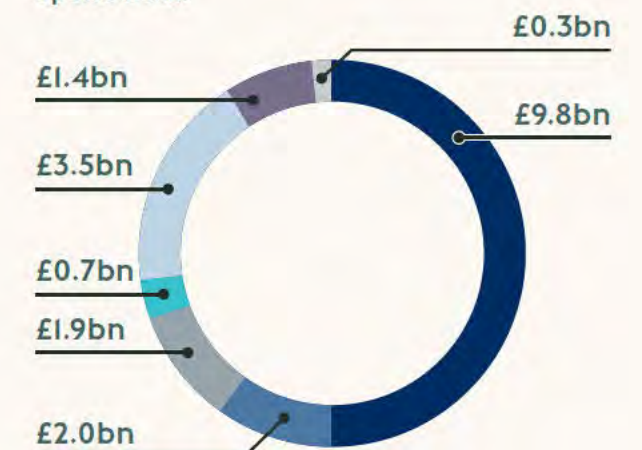
key suppliers, across the UK, represent around £4.5bn of our spend



Our finances

We are adapting our organisation to meet the financial challenges we are facing

Spend Data:



■ Total income
■ Grant
■ Government Support
■ Crossrail funding
■ Fares
■ Other income
■ Cash reserve movement

* Data as at 31 March 2021

TfL Sustainability Framework

Doing the right thing locally and globally

We operate to deliver the Mayor's Transport Strategy which sets out the Mayor's plans to transform London's streets, improve public transport and help to create thriving communities across London's 32 boroughs and the City of London. We have developed action plans that detail how the Mayor and TfL will achieve the Mayor's Transport Strategy policies and proposals.

In addition to delivering the Mayor's Transport Strategy, we play a significant role in delivering other Mayoral strategies and plans. This includes the London Plan, Health Inequalities, Housing and Economic Strategies, and the London Environment Strategy, which is the first integrated strategy to bring together approaches to every aspect of London's environment. Our strategic reporting framework consists of our annual Budget, our five year Business Plan and our Long Term Capital Plan, which set out the key priorities through which we implement the Mayor's Transport Strategy and deliver the best value for London.

The TfL Sustainability Report sits within our strategic reporting framework. It sets out the sustainability benefits of everything we do across our organisation both internally and externally, but it does not cover all the London-wide efforts to deliver the Mayor's Transport Strategy, which can only be fully realised by the collective effort and partnership working with many organisations, such as government and London boroughs.

Our sustainability framework is underpinned by the three pillars of sustainability – society, environment and economy – and these form a triple bottom line across our entire operations. Our social sustainability demonstrates the social value of our transport services, beyond the economic benefits, in improving the lives of Londoners and creating thriving communities, while our financial sustainability and environmental sustainability are positively linked.

We will build our financial sustainability by focusing our capital investment on a green recovery and by making progress on considering the external environmental costs of our activities. This will accelerate our progress towards decarbonising transport by 2030 and increase our overall environmental sustainability. We must demonstrate bold leadership on sustainability and we expect the same from our suppliers, the stakeholders and partners we work with.



Society



Environment



Economy

How TfL aligns with United Nations Sustainable Development Goals



**SUSTAINABLE
DEVELOPMENT GOALS**



Society

How we maximise social value and achieve 'Vision Zero' for safety, to improve the lives of one another locally and globally

Most relevant Sustainable Development Goals

3, 4, 5, 10



Environment

How we will protect and regenerate the environment through our activities, promoting environmental sustainability to help secure a greener, zero emission and more resilient recovery for London

Most relevant Sustainable Development Goals

7, 12, 13, 15



Economy

How we operate to keep the organisation financially sustainable, our wider contributions to the economy and how we are supporting London, and the UK economy, to emerge from the coronavirus pandemic stronger

Most relevant Sustainable Development Goals

1, 8, 9, 11



Society

Caring about our colleagues, customers and communities through safe, healthy and accessible transport services

- + **Safe:** Safety is our top priority. Our Vision Zero ambition aims to eliminate deaths and serious injuries on our transport networks, construction and operational sites.
- + **Inclusive:** We strive to have an accessible and inclusive workplace and transport network.
- + **Healthy:** Enabling more cycling and walking will support a healthier, more inclusive London. We want a healthy and happy workforce.
- + **Thriving:** We encourage the connectivity among people, trade and culture, celebrating London's unique identity.



Environment

Operating in a sustainable way, to protect and regenerate the natural world

- + **Climate:** We will reduce carbon emissions from our activities and ensure we are ready for the impacts of climate change.
- + **Air quality:** We will transform our vehicle fleets to zero emission and support broader efforts to clean London's air.
- + **Sustainable resources:** We will design for the circular life-cycle of resources and materials, supporting London's goal of being a zero-waste city.
- + **Green infrastructure:** We will increasingly protect, connect and enhance our green infrastructure, including the biodiversity, habitats and ecosystems services on our estate.



Economy

Being financially sustainable to provide a resilient and good quality of life for all

- + **Economic impact:** We will deliver a transport system for London that supports economic development, and create more sustainable buildings and homes.
- + **Responsible procurement:** We deliver social value and support our supply chain to become greener, fairer and more inclusive.
- + **Financial stability:** Reduction on operational expenditure funding support from central government.
- + **Security risk management:** We manage existing and emerging security risks and adopt a zero-tolerance approach to any fraud, bribery or corruption committed against us.

TfL sustainability performance metrics

Society

Theme	Measure	2018/19	2019/20	Change
Safe	Killed or seriously injured people on our streets**	3,905	3,070	-21%
	Customer and workforce injuries	10,058	9,729	-3%
Inclusive	Representative index	43%	47%	+4%
	Relative additional journey time using the step-free network	9.1 mins	8.3 mins	-48 secs
Healthy	Number of colleagues who feel there is adequate support in place to help them manage their health, safety and wellbeing	59%	60%	+1%
	Number of employees completing the MIND Mental Health Awareness training	—***	475	---
Thriving	Number of people progressing from pre-employment programmes to employment within 12 months	36%	29%	-7%
	TfL Apprentice intakes to be representative of London****	56.07%	59.33%	+3.26%
	TfL Graduate intakes to be representative of London****	48.26%	53.77%	+5.51%

* of those who disclosed

** Data is for Calendar year 2019 and Calendar 2020 as per DfT reporting on Road Collision Statistics

*** Training started in 2019/20

**** Measure is a comparison of our apprentices and graduates to London's economically active population.

Environment

Theme	Measure	2018/19	2019/20	Change
Climate	Operational carbon emissions (thousand tonnes per annum)	1,146	1,040	-9%
Air Quality	Percentage of bus fleet that are zero emission	1.7%	3.5%	+1.8%
	Percentage of support vehicles that are zero emission	3%	2.6%	-0.4%
Sustainable resources	Percentage of commercial and Industrial waste recycled	48%	41.6%	-6.4%
	Percentage of construction, demolition and excavation waste reused	98.8%	98.2%	-0.6%
Green infrastructure	Number of trees on our road network	23,059	24,234	+5.1%

Economy

Theme	Measure	2018/19	2019/20	Change
Economic impact	Number of new homes delivered	86	180	+109%
Responsible Procurement	Number of new supply chain apprenticeship starts each year: including BAME and Women	521 (53%, 23%*)	619 (62%, 18%*)	+18.8%
	Number of job starts: including previously workless	911 (39%*)	1,027 (46%*)	+12.7%
Security Risk Management	Number of colleagues undertaking fraud awareness training	1,618 (6%)	1,828 (7%)	+1%



Society

Caring about our colleagues, communities and customers through safe, healthy and accessible transport services



Safe

Safety is our number one priority and is fundamental to everything we do. We are working to build a world where no colleague or customer is injured. We have set a 'Vision Zero' objective to eliminate all deaths and serious injuries on London's transport network and it aims to address safety through a comprehensive 'Safe System' approach.

Road safety

To ensure vehicles on our network are safe, our Direct Vision Standard, which was launched in October 2019 and came into force in March 2021, will progressively work to ban the most dangerous lorries from our roads. The Direct Vision Standard is a safety permit system for heavy goods vehicles which assigns a star rating based on how much the driver can see directly through the cab window, in order to reduce lethal blind spots. Measures such as this sit within a comprehensive approach that lowers speed limits, designs streets that are safer and welcoming for all, and works with partners to promote and enforce safe behaviours.

By the end of 2020, there had been a 52 per cent decline in the total number of people killed or seriously injured in traffic incidents on London's streets against the 2005-09 baseline. However, road safety progress has slowed in recent years, reflecting the trend also experienced by other European cities. There are still around 4,000 people killed or seriously injured in road collisions every year in London, the vast majority of which result from collisions with cars.

Public transport

Our public transport network has seen a continuing downward trend in incidents that injure our customers or colleagues. The number of fatal or serious injuries is much lower on public transport than in road collisions. We are committed to achieving Vision Zero on public transport and have a range of programmes designed to further increase safety – including our suicide prevention programme which has reduced the number of incidents on our network.

Work-related violence and aggression

We are also committed to the personal safety and security of all colleagues. We fund and work in partnership with the British Transport Police (BTP) and the Metropolitan Police Service (MPS) to tackle issues associated with work-related violence and aggression. Our strategy to eradicate work-related violence and aggression focuses on the prevention of incidents, providing support to colleagues when an incident does occur, and continuously improving in how we protect and support everyone working to keep London moving safely.

As part of our ongoing work-related violence and aggression strategy, we have introduced 4,500 body-worn video cameras for frontline colleagues in areas where they have the most frequent contact with the public.



4,500

body worn video cameras for frontline colleagues have been rolled out

We are committed to achieving 'Vision Zero' on our network



Secure and low crime transport network

Everyone has the right to be safe – and feel safe – when travelling in London. If streets and public transport do not feel safe to use, then inevitably, people are more likely to take other options, including more car trips. We fund and work in partnership with the MPS and BTP to tackle crime, fear of crime and antisocial behaviour as well as non-compliance with rules and regulations that are in place to keep our people and customers safe. Our work to maintain a low-crime environment continues. During 2019/20, 9.7 million trips were made on our transport network daily, with very few customers experiencing or witnessing a crime. For every one million passenger journeys there were eleven reported crimes, the majority of these being theft offences.

We are responsible for the TfL Road Network, which makes up five per cent of London's roads and carries up to 30 per cent of the city's traffic. Our priority in managing the TfL Road Network is to keep traffic moving safely.

Contraventions on the TfL Road Network create safety risks, increase congestion and disrupt traffic for everyone including buses, deliveries and emergency services. To minimise contraventions we use fines called Penalty Charge Notices. The last time the penalty charge was increased was 10 years ago and we are concerned that it no longer provides an effective deterrent. As a result, we are proposing to increase the fine level from £130 to £160. This proposal is subject to the outcome of a public consultation which will end on 19 September. We are now spending time considering all the responses we receive before seeking Mayor and Secretary of State approval.

We are prioritising action to deal with high harm offences such as sexual offences and harassment, hate crime, and serious violence. We are working hard to keep knives off our network. We are also working to safeguard vulnerable people using or seeking refuge on our network, including children and adults at risk.

Construction

We manage some of the largest capital delivery and maintenance works in the UK, so our approach to Safety, Health and Environment (SHE) is critical. We've made significant progress in SHE performance over the past five years and, to further this work, have launched a SHE Capital Delivery and Maintenance Strategy for all colleagues at TfL who work on construction activity, with the ultimate aim of zero harm across all activities. As an organisation, TfL has a unique opportunity to influence practices and standards across the construction industry. Whether directly through our own suppliers, local boroughs and partner organisations, or indirectly via the stakeholders they work with, we aim to set the benchmark for safety performance, improving standards and developing ways of working across the whole of the industry.

We are prioritising action to deal with high harm offences



Our plans to improve

Driver fatigue is a risk to road safety. We are working across the organisation to conduct fatigue risk screening, enabling us to better break down, define and quantify the factors that contribute to fatigue. This gives us a better definition and understanding of specific fatigue risk factors to help us develop, target and prioritise interventions. We are developing interventions to reduce fatigue risk through staff training, including providing supportive guidance to their family and friends, while more technical interventions around rostering and scheduling are being investigated across a number of our transport services.

As part of this screening process, we have also started to establish baseline data to enable us to monitor and track progress and improvements in reducing fatigue risk, with key performance indicators being developed to support this. The fatigue programme also continues to work with our occupational health and wellbeing team to support people through initiatives such as online sleep clinics and sleep assessment surveys.

We know that slips, trips and falls on buses are a key cause of injury to our bus customers. A longer-term strategy is being developed and will consider vehicle improvements, such as to flooring and lighting, and outcomes from predictive technology being trialled that warns drivers of hazards to help give them more time to be able to brake smoothly. It will include a benchmarking review of best practices from other transport authorities. At the end of the financial year, we had 455 buses that met the first generation of the Bus Safety

Standard. From late 2021, new vehicles will start meeting the second generation of this standard, which requires new buses to have camera monitoring systems in place of side mirrors, offering a wider field of view and clearer visibility in low light. It also includes toggling to help drivers identify the brake pedal and its relative position from their feet. There will be new safeguards to the brake system to prevent buses rolling away without a driver in the cab, and enhancements to bus interiors to help reduce the risk of customer injuries.

We want to establish ourselves as the UK's leading construction industry client, driving improved performance across our capital delivery and maintenance works and intervening before incidents occur. This relies on making better decisions based on meaningful data, building a positive learning culture and developing a more consistent approach to the way we operate. The SHE Capital Delivery and Maintenance Strategy adopts a Zero Harm approach, built on our Vision Zero ambition, to ensure that harm is consistently reduced across TfL's capital delivery and maintenance programmes year-on-year, until we reach zero. We aim to reduce harmful incidents by 50 per cent over the next five years. To do this we will work to improve our supplier management practices, increase the safety competence of our people, develop our data reporting and analysis, and design out harm from the start of the project lifecycle.



We aim to reduce harmful incidents by 50 per cent

Inclusive

Inclusive workforce

We are committed to creating a more inclusive and values-based culture and a workforce that is more diverse at all levels. Our Executive Committee has signed an Anti-Racism Leadership Charter, and we have held more than 100 Listening sessions across our organisation to understand the lived experience of one another to ensure we are taking the right actions to make our culture more inclusive.

There are several key ingredients to creating a more inclusive, values-based organisation, which include:

- Understanding and improving our culture
- Creating more inclusive leaders
- Developing more inclusive line managers
- Fostering more inclusive behaviours
- Supporting a more inclusive approach to career development
- Inclusive policies and practices

Closing the ethnicity and gender pay gaps are key to creating an inclusive organisation.

Our latest median pay gaps (2020 data) are:

Ethnicity

9.6% 

Gender

18.8% 

We achieved a

50/50 

gender split in our London Underground Fleet Level 3 Engineering apprenticeship scheme

We're creating a more inclusive and values-based culture



Lift to platform 2

We continue to improve accessibility on the Tube and London Overground by making more stations step-free

An accessible network for all

We are committed to enabling everyone to complete their journeys how and when they want, in a convenient, safe and dignified way. We seek to address the needs of everyone, including people with hidden impairments, from planning a journey to arriving at a chosen destination. In addition to Turn up and go at our stations and a fully accessible bus network, our services include Dial-A-Ride, Taxicard and other community transport.

We collaborate closely with diverse partners whose views we value and learn from. Increasingly, we are co-creating solutions to inclusive design questions to harness the skills, knowledge and expertise of our partners, suppliers, customers and stakeholders. Our relationship with groups such as the Independent Disability Advisory Group and the Valuing People Network help us better understand our customers' experiences so we can improve our approach to inclusive design and customer service. Our goal is to understand the impact of our policies, projects and programmes on disabled customers and all individuals who share protected characteristics under equality legislation.

Our investment in improving the physical accessibility of our built environment continues. All of our pedestrian crossings and pavements are accessible with tactile paving, audible signals and/or rotating cones on the pushbutton. Legible London maps located at station entrances and bus shelters make it quicker and easier for people to find their way when travelling around the Capital.

We also tackle other barriers to travel, including those faced by our customers who may be visually or hearing impaired or those with cognitive and sensory impairments. These include accessible bus stops, audio announcements, visual announcements, hearing loops and speech-to-text software, and seating and toilets for older and disabled customers, pregnant women and families with small children.

We continue to improve accessibility on the Tube and London Overground by making more stations step free. Currently 89 Tube stations, 60 London Overground stations and most of the 25 stations served by TfL Rail have step-free access. The entire London bus network, all DLR stations and tram stops are step free.

We have launched the TfL Go app to welcome customers back on the network and make it easier to plan their journeys. As well as providing real-time updates on bus arrivals and train times at every station through the use of a unique 'real-time' map feature, it enables our customers with accessibility needs to plan a journey with a step-free route by showing real-time station closures, platform access and lift status, as well as toilet availability at our stations.

We are raising awareness of accessible technology design by introducing accessibility standards, principles, tools and techniques that will enable the production of more accessible documents and more accessible application design among our developers.

We want everyone to have safe and convenient journeys

Connecting communities

An inclusive transport network is crucial to connect people to jobs, shops, schools, health services, friends and family, and all the other places they need to go. It is vital to support more Londoners to have healthy and active lives to reduce inequality, promote social integration and increase opportunities for employment while helping to tackle loneliness and improve mental wellbeing.

The bus network has the most coverage of our public transport modes. This ensures almost all Londoners are connected to their local area, wherever they live. In addition, our extensive Night Bus network supports night workers who are more likely to have lower incomes. Bus connections serve commuters, shopping and leisure demand in all parts of London, provide an affordable and accessible public transport choice for those who need it, bring children to school and key workers to hospitals, connect Londoners with their families, GPs and local shopping areas, and link people to the wider public transport network by connecting residential areas to stations.

Inclusive supply chain

In the recovery from the coronavirus pandemic, we recognise the specific impacts and challenges facing businesses and Small and Medium Enterprises (SMEs). We have identified some of the barriers that prevent small and diverse businesses gaining access to and winning TfL contracts. Our 'Small and Diverse Business Procurement Action Plan' sets out the interventions we will implement to ensure our procurement processes are more accessible and inclusive to London's diverse businesses.

Paying the invoices of our SME suppliers within ten working days supports their cash flow. We will go further than this and encourage our key suppliers to pay more than 95 per cent of their invoices within 60 days, in at least one of the previous two reporting periods, in line with the government's approach.

We are encouraging our suppliers to recruit a more diverse workforce. To support this aim we are participating on a cross-industry Diversity Data Benchmarking initiative, led by Highways England, along with Network Rail and HS2, benchmarking our key suppliers' workforce diversity data.

Some of our major projects delivered in partnership with our supply chain, demonstrate the social value of our work. On the Barking Riverside Extension project, the Morgan Sindall VolkerFitzpatrick joint venture worked closely with the local community on various outreach programmes.

These included learning initiatives with local schools to promote a healthy lifestyle, supporting an event at the London Transport Museum to encourage and inspire the next generation into construction, supporting fundraising events to provide learning experiences for a local school, providing training and volunteering opportunities for local people and donating to the Barking foodbank warehouse that supports more than 50 families locally. They also adopted sustainable development practices as part of these local initiatives by partnering up with a local community wood recycling trust which re-used some of the timber waste produced as a result of the project.

An inclusive transport network is crucial to connect people to jobs, shops, schools, health services and more

Our bus network provides an affordable choice for all



Our partnerships

We leverage our partnerships to contribute to a safer, healthier and thriving London. We work closely with London boroughs through the Healthy Streets programme to deliver walking, cycling and safety schemes that create greener, healthier and more attractive places in which to live, play and do business, within our diverse communities.

Our commercial and media partnerships help to shape the rich culture and vibrancy of London by giving businesses the unique opportunity to align campaigns, filming or photography work with our well-established TfL brand. The Santander Cycle Hire scheme is a bespoke partnership that has had a huge impact on the millions of customers who travel across our network every day.

As London's largest landowner, we provide a wide range of commercial rental properties that are close to transport hubs, putting businesses ranging from pop ups and small businesses to global brands, closer to their customers.

We work closely with London boroughs through the Healthy Streets programme to deliver walking, cycling and safety schemes

Our partnerships contribute to a more vibrant London

Healthy

Our colleagues' mental and physical health are paramount to having a healthy and happy workforce. We offer a series of preventative health and wellbeing initiatives, including those which promote physical activity, healthy diet and sleep hygiene as part of a healthy lifestyle. These include:

- Online portals. An internal site with guidance and resources for mental and physical health and maintaining a safe work environment; a wellbeing channel with recorded exercise; Pilates and wellbeing sessions, and free subscription to Kaido, a digital team-building experience that helps employees improve their health while having fun together
- Confidential support helplines. Our Employee Assistance Programme offers emotional support and advice for work-related or personal difficulties
- Physical and mental health interventions. To tackle obesity, fatigue and help identify early signs of medical health conditions, our employees have free access to Slimming World, sleep clinics and health assessments
- Occupational Health services. The Medical Advisory team undertake safety critical medicals to ensure that colleagues involved in safety critical roles are able to do their role safely. They provide advice to managers and colleagues on health conditions which are impacting on them at work. They undertake health surveillance for those who are exposed to noise, vibration and chemicals. Throughout the pandemic the team have provided in-depth advice about COVID-19 and undertaken nearly 3,000 individual risk assessments

- Peer Supporter Schemes. Health and Wellbeing Champions, the Supporting Colleagues Network, and Trauma Support Group encourage a positive and supportive environment

Our wider health impacts

Health is a central theme of the Mayor's Transport Strategy, which we are primarily responsible for delivering, in partnership with key stakeholders, such as London Boroughs. Schemes such as Healthy Streets deliver walking and cycling schemes which promote active travel, which has significant health benefits, such as reduction in heart disease and improving mental health. The improvement in London's air quality from a reduction in harmful road transport emissions has had transformative health benefits and is discussed more under the environment pillar of this report.

Health and wellbeing in numbers



1,228

joined Kaido to take part in the Around the World challenge



150

people have benefitted from our free access to Slimming World



We offer health and wellbeing initiatives to all our employees



Our plans to improve

We will continue to provide the opportunity for colleagues to improve their mental and physical health in line with Public Health England and National Institute for Health and Care guidelines.

The focus in the next year will be:

- Improving data collection on health so that we can better target our initiatives
- Preventing health problems by promotion of healthy habits through a number of initiatives
- Improving routine medicals to include health promotion

We aim to:

- Ensure all line managers across our organisation have appropriate training and resources to enable them to better support the health and wellbeing of our employees and ensure they understand the role they play in preventing work-related ill health and also understand the effect of health and wellbeing on improved organisational performance
- Improve how the business can effectively communicate what is on offer for our employees on health and wellbeing
- Ensure that health and wellbeing is seen as important as safety across the organisation



More than

2,100

colleagues accessed our online mental health awareness training



We want to ensure our employees can prioritise their wellbeing



Thriving

Creating access to the skills and training people need to enter the workplace helps address skills shortages in London and across our industry. We want to break down barriers to employment by ensuring that we are accessible to all Londoners, regardless of their background. Successful programmes we deliver include:

- Our flagship Steps into Work programme. A targeted 12-month employability scheme for individuals with learning disabilities and/or on the autistic spectrum, that incorporates a work skill qualification alongside work placement rotations supported by specialist trained job coaches
- Our Catalyst programme. This is a partnership between our Supplier Skills team and our supply chain. It's a four-week employability programme providing industry recognised qualifications, work experience and employability skills to underrepresented groups and those with barriers to employment, leading to interviews for roles with our suppliers. We also host an annual supply chain recruitment fair during National Apprenticeship Week
- Education to Work outreach. This helps young people raise their career and education aspirations and achievements through targeted engagement focusing on supporting those impacted by high deprivation. Activities include mentoring, volunteering programmes and experiences of the world of work. By working with young people, their educators and carers, we also aim to break down negative perceptions about careers in transport and help underrepresented groups overcome barriers to entering the industry

- Our Construction skills programme. Aimed at Londoners aged 16-plus who are not currently working in construction specifically women, those with a health condition/disability and those from Black, Asian and minority ethnic backgrounds
- Stuart Ross Communications Internship. A diversity initiative aimed at creating career opportunities in communications, public relations, public affairs and marketing for students of Black Asian and minority ethnic backgrounds, who are under-represented in these sectors, regionally and nationally
- Armed Forces Covenant. An ongoing commitment to support former members back into full-time civilian employment
- Graduate and apprenticeship programmes. These support the Government's agenda of increasing job creation for 18-24-year olds and help build a diverse pipeline of talent to meet our future skills needs for 2023 and beyond

We want to break down barriers to employment by ensuring that we are accessible to all Londoners

We provide career opportunities for 18-24-year olds

Other notable activity

Culture and Heritage

London Transport Museum

London Transport Museum is a great place for all ages to enjoy and learn how transport shapes our city. Gallery activities and outreach programmes across London inspire young Londoners to be habitual public transport users and we actively support children and young people to be curious about STEM subjects (Science, Technology, Engineering and Mathematics). The Museum works with its Enjoyment to Employment coalition partners to promote careers in transport and engineering. In March 2021, London Transport Museum published the Rethinking Sustainable Cities report, which explores how we can change our cities for the better by protecting our planet and people, and launched its Green Journey to decarbonise our own operations by 2030. The Museum's Climate Crossroads programme is engaging its visitors with a green future vision for London and exploring the innovations, skills and jobs needed to build a sustainable future. The programme is supported by Mott MacDonald and Cubic Transportation Systems.

Public spaces and art

We have a long-standing history of art and design on our network, with many of our transport designs being design classics. Our long-running Art on the Underground programme aims to change the way people experience our city by inviting artists to create pieces of art for display across the network. Most recently, David Hockney, one of the UK's most influential living artists, has redesigned TfL's iconic roundel in a special artwork called 'Hockney Circus' as part of a takeover of Piccadilly Circus station.



Our long-running Art on the Underground programme aims to change the way people experience our city

Our cultural programmes aim to inspire young Londoners



Environment

Operating in a sustainable way,
to protect and regenerate the
natural world



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