

Appendix F – CLOCS Standards for Construction Logistics – managing work related road risk

CLOCS

Standard for construction logistics

Managing work
related road risk



Looking out
for vulnerable
road users

Construction Logistics and Cyclist Safety (CLOCS) - looking out for vulnerable road users

CLOCS aims to achieve a visionary change in the way the construction industry manages work related road risk. This is being achieved through three industry led workstreams:

- Improving vehicle safety through design and manufacture of safer new vehicles and fitment of appropriate safety equipment to existing vehicles
- Addressing the safety imbalance in the construction industry through ensuring road safety is considered as important as health and safety on site
- Encouraging wider adoption of best practice across the construction logistics industry through taking best in class examples, developing a common national standard and embedding a new cultural norm

CLOCS has developed the *CLOCS Standard for construction logistics: Managing work related road risk*, a common standard for use by the construction logistics industry.

Implemented by construction clients through contracts, it provides a framework that enables ownership in managing road risk which can be adhered to in a consistent way by fleet operators.

Representatives from different organisations - vehicle manufacturers, construction logistics clients, operators, regulatory and enforcement bodies are actively engaged with CLOCS.

The CLOCS programme represents a united response to road safety across the industry and greater social responsibility which will save lives.

Visit www.clocs.org.uk for further information.

Acknowledgements

The *CLOCS Standard for construction logistics: Managing work related road risk* has been developed in collaboration with key industry stakeholders.

The Health and Safety Executive welcomes this industry led initiative facilitated by Transport for London as a positive step towards improving the management of work related road risk.

The expert contributions made from organisations and individuals consulted in the development of this Standard are gratefully acknowledged.

The *CLOCS Standard* will be reviewed at intervals not exceeding two years, and any amendments arising from the review will be published in an amended version. The *CLOCS Standard* does not purport to include all the necessary provisions of a contract. Users are responsible for its correct application.



Acknowledgement is given to the following organisations in the development of the CLOCS Standard:



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Introduction

1.1 Background and context

Population growth

The population of the UK is expected to rise to 81 million by 2060 making it one of the most densely populated countries in Europe*. Our towns and cities are busier than at any other time in history creating unique challenges to address.

A growing population means growing demand for places to live, work and spend time and an inevitable rise in development and construction activity - often against a backdrop of considerable constraints on space. We need to ensure we develop the skills and capability to embrace this growth.

Developing our towns and cities in a sustainable manner is vital to our economy, our social wellbeing and the environment we live in. Improving connectivity, the urban realm and encouraging more active forms of travel are high on the agenda of responsible development in order to better integrate communities, improve quality of life and ease pressures on the transport network.

A rising population places considerable strain on already busy transport networks necessitating changes in travel behaviour and the modes of travel used. A number of UK city and regional authorities already have high levels of walking and cycling and are increasingly recognising the benefits of promoting these modes as healthy and sustainable ways to travel.

Vulnerable road users and the large vehicles required for construction projects are sharing the roads more than ever. Our historic towns and cities and many of the large vehicles required to service them

were not designed with this type or level of activity in mind, creating challenges to be managed and overcome.

Road safety

Where the numbers of people walking and cycling are growing in parallel to higher levels of development and associated construction activity there is increasing pressure on already constrained road space leading to the potential for conflict.

Cycling is on the increase nationally, but has been particularly notable in London where it has almost doubled since 2000. There are now nearly 600,000 cycle trips made each day with numbers rising each year.

However, this growth has been coupled with concerns about cycle safety. Although there have been reductions in the overall number of people killed and seriously injured on roads across the UK, the number of cyclist fatalities increased between 2011 and 2012.

There are particular concerns about the over representation of large goods vehicles in collisions with cyclists and pedestrians that have fatal and serious outcomes. Nationally, large goods vehicles over 3.5 tonnes are involved in approximately 15 per cent of cyclist and 10 per cent of pedestrian fatalities.

There is a particular issue in London and between 2008 and 2013, 55 per cent of cycling fatalities involved a vehicle over 3.5 tonnes, despite these vehicles representing just 4 per cent of the road miles travelled in the capital. However,

*ONS Sub-National Population Projections (2011) (Principal Projection)

this issue is not restricted to collisions with cyclists - in London there were twice as many pedestrians and motorcyclists killed in collisions involving vehicles over 3.5 tonnes over the same period.

Analysis of the cycling figures found that a disproportionate number of the vehicles involved were construction related.

Addressing the challenge

As a result, Transport for London (TfL) commissioned a review of the construction logistics sector's transport activities with an aim of understanding the causes of collisions with vulnerable road users and how they may be prevented. The Construction Logistics and Cyclist Safety report was published in February 2013. The document highlighted issues with the way Work Related Road Risk (WRRR) was managed across the industry and raised concern over the limitations of current construction vehicle cab design with regard to minimising blind-spots.

Following the publication of this document a high profile event was held at City Hall in London on 2 May 2013 attended by construction logistics representatives who publicly

demonstrated their commitment to change. Communication of findings of the report and buy in from the industry led to the formation of industry working groups which have identified what could be done to reduce the risks posed by large vehicles to cyclists and other vulnerable road users. One of the steps identified was to develop and promote adherence to a nationally recognised standard for managing WRRR.

On 4 September 2013, the Mayor of London, TfL and Department for Transport (DfT) announced plans for a joint industrial HGV Task Force to enforce regulations against construction HGVs and a review of national exemptions, demonstrating a high level of national commitment to addressing this issue.

The WRRR requirements within this document represent a key step in demonstrating the commitment of construction logistics industry organisations to improving road safety. Embedding work related road safety in our culture is critical if we are to develop the skills and capability to manage and embrace inevitable population growth and travel demand throughout the UK.



1.2 Development of a national standard

The *CLOCS Standard for construction logistics: Managing work related road risk* is the direct result of collaboration between developers, construction logistic operators and industry associations. This document draws together emerging practice from a number of individual standards, policies and codes of practice into one WRRR standard that can be implemented by developers and adhered to in a consistent way by fleet operators. Each requirement has been developed with the aim of reducing the risk of a collision between large goods vehicles in the construction sector and vulnerable road users such as cyclists and pedestrians.

The standard and requirements have been developed by the construction industry for use in the construction industry and may not be appropriate for other sectors within the logistics industry. Other logistics sectors are encouraged to consider this approach and to define a standard appropriate to their sector where needed.

Structure of the standard

The *CLOCS Standard for construction logistics: Managing work related road risk* provides the standard for both construction logistic operators and construction clients.

Sections 2.1 and 2.2 are applicable to both operators and clients. Sections 3.1 to 3.3 are aimed at construction logistic operators and cover the three core areas of managing operations, vehicles and drivers.

Section 3.4 covers essential elements of site and project safety, giving specific responsibility to the construction client.

Terminology

Each section states the **requirement** (this is the exact requirement to be adhered to), explains the **purpose** of the requirement and offers a **demonstration** (indicates how the requirement should be met and demonstrated).

Certain language is used within this document with the following meanings:

- **Fleet operator** - any organisation or part thereof which operates one or more vehicle(s)
- **Client** - an organisation employing fleet operator contractors. This may be a developer employing a primary contractor or a primary contractor employing a sub-contractor
- **Shall** - to indicate something which is mandatory as part of the requirement or in order to achieve the requirement
- **Should** - to indicate something which is recommended as emerging practice
- **May** - to indicate permission or an emerging practice option
- **Vulnerable road user** - a pedestrian, cyclist, motorcyclist or person of reduced mobility
- **Approved** - officially deemed acceptable by the client to meet a specific requirement or quality

Applicability and exemptions

2.1 Applicability

Scope

Applicable to all commercial vehicles delivering to, collecting from or servicing a project, premises or property where this standard applies unless otherwise indicated by the client.

All fleet operators serving contracts resulting in the use of vehicles for delivery and servicing activities are included in the scope of this standard unless otherwise indicated by the client.

All fleet operators shall comply with the standard in the timeframe instructed by the client in agreeing the contract. This shall not be more than 90 days from the start of a contract unless special circumstances apply.

This document applies to commercial vehicles ranging from vans over 3.5 tonnes gross vehicle weight to articulated vehicles over 44 tonnes gross vehicle weight, including abnormal indivisible loads and engineering plant.

Demonstration

Clients shall specify whether the standard applies within contracts based on their assessment of risk. The client will determine, within their own contracts, whether this standard:

- Applies to all vehicles or vehicles over 3.5 tonnes gross vehicle weight only
- Applies to non-construction vehicles such as those providing additional services (e.g. catering)



2.2 Exemptions

Scope

Under certain circumstances special exemptions may be granted, for example:

- Companies who deliver or service a site infrequently (to be specified by the contracting entity)
- Where it is proved to be neither practical nor possible to comply with a requirement in that the functionality of a vehicle will be impaired
- Utility companies who are not part of the project but who have a statutory undertaking to access assets on site

Demonstration

Based on an assessment of the level of risk, the client shall determine the definition of 'infrequent' within the contract.

Fleet operators shall present any case for exemptions to the client. They shall demonstrate why the exemption is necessary, rather than relying on current legal exemptions.

Clients may set their own criteria for which vehicle types fall into scope and any exemptions applied to specific operations.



CLOCS Standard for construction logistic operators and clients: Managing work related road risk

3.1 Operations

3.1.1 Quality operation

Requirement

Fleet operators shall ensure the transport operation meets the standard of an approved independent fleet management audit.

Purpose


To ensure a baseline level of compliance against all regulatory requirements relevant to the road transport operation.

Demonstration

This shall be demonstrated through current certification from an approved independent audit body (such as the Fleet Operator Recognition Scheme (FORS) or other FORS-equivalent standard).

Certification shall be within the period specified by the client / contracting entity. This period shall not be more than 90 days from contract award.

Certification shall be renewed on an annual basis.

 **For further information:**

- www.fors-online.org.uk

3.1.2 Collision reporting

Requirement

Fleet operators shall capture, investigate and analyse road traffic collision information that results in injury or damage to vehicles and property. All collisions shall be reported to their client or contracting entity.

Purpose


To create transparency in the supply chain and enable fleet operators and clients to work together to mitigate the risk of road traffic collisions and prevent re-occurrence.

Demonstration

A log of all collisions shall be maintained which shall include details of all evidence required to investigate an incident.

Reporting shall include lessons learned and remedial measures identified to help prevent re-occurrence of similar incidents.

Fleet operators should use an approved reporting mechanism such as CLOCS Manager (www.clocs-manager.org.uk) to report all traffic collisions that result in injuries or damage to vehicles and property.

 **For further information:**

- [CLOCS Toolkit - Managing collision reporting and analysis](#)

3.1.3 Traffic routing

Requirement

Fleet operators shall ensure that any vehicle routes to sites or premises specified by clients are adhered to unless directed otherwise.

Purpose

To reduce the probability of collisions on routes to and from sites and premises.

Demonstration

Fleet operators shall properly communicate any routing and access requirements provided by clients to all drivers accessing a site.

Mobile or very temporary sites (e.g. emergency street works) are not subject to a routing requirement.

The circumstances (if any) under which drivers may deviate from a specified route such as temporary road closure, or road traffic accidents shall be clearly specified by the client.

Please also see Section 3.4.5 - Traffic routing.

Fleet operators should provide driver training, briefings or pre-programmed navigation systems to ensure the driver is aware of the specified route, the circumstances (if any) of deviating from the route and the resulting consequences of not adhering to the route.

There should be clear evidence that any deviations from the route as notified by the client or the public authority are addressed with the driver. The driver may be required to sign to acknowledge the infraction.

Fleet operators may ask drivers to demonstrate that they have understood any traffic routing or site access requirements by signing for them.



3.2 Vehicles

3.2.1 Warning signage

Requirement

Fleet operators shall ensure that prominent signage is fitted to all vehicles over 3.5 tonnes gross vehicle weight that visually warns other road users not to get too close to the vehicle.

Purpose

To reduce the risk of close proximity incidents and increase road safety.

Demonstration

All vehicles over 3.5 tonnes gross vehicle weight shall display external pictorial stickers and markings to warn vulnerable road users not to get too close to the vehicle.

Vehicles 3.5 tonnes gross vehicle weight or less may display external pictorial stickers to warn vulnerable road users not to get too close to the vehicle.

Signage should not be offensive and should not give instructional advice to the vulnerable road user. The text point size should be legible by a cyclist at a reasonable distance from the vehicle.

3.2.2 Side under-run protection

Requirement

Fleet operators shall ensure fitment of side-guards to all rigid mixer, tipper and waste type vehicles over 3.5 tonnes gross vehicle weight that are currently exempt from fitment.

Purpose

To minimise the probability and severity of under-run collisions with vulnerable road users.

Demonstration

Fleet operators shall provide evidence that all rigid mixer, tipper and waste type vehicles over 3.5 tonnes gross vehicle weight are fitted with side-guards.

Fitment shall be on both sides of the vehicle unless this is proved impractical or impossible.



For further information:

- CLOCS Guide - vehicle safety equipment, sections 2.2, 2.3 and 2.4



3.2.3 Blind-spot minimisation

Requirement

Fleet operators shall ensure all vehicles over 3.5 tonnes gross vehicle weight have front, side and rear blind-spots completely eliminated or minimised as far as is practical and possible through a combination of fully operational direct and indirect vision aids and driver audible alerts.

Purpose

To improve visibility for drivers and reduce the risk of close proximity blind-spot collisions.

Demonstration

A combination of appropriate vision aids and driver audible alerts shall be fitted to the front nearside of all vehicles over 3.5 tonnes gross vehicle weight.

In addition, appropriate indirect vision aids shall also be fitted to the rear of all rigid vehicles over 7.5 tonnes gross vehicle weight.

Class V and VI mirrors shall be fitted to all vehicles where they can be mounted, with no part of the mirror being less than two metres from the ground.

All indirect vision systems shall be fully operational.

Fleet operators shall make regular checks and take all reasonable measures to ensure all indirect vision systems remain fully operational.

Fleet operators shall take steps to ensure that drivers recognise that use of indirect vision systems is an integral part of their job.

Fleet operators may consider purchasing vehicle with increased driver direct vision.



3.2.4 Vehicle manoeuvring warnings

Requirement

Fleet operators shall ensure all vehicles over 3.5 tonnes gross vehicle weight are equipped with enhanced audible means to warn other road users of a vehicle's left manoeuvre.

Purpose

To reduce the risk of close proximity collisions by audibly alerting vulnerable road users to vehicle hazards.

Demonstration

Vehicles over 3.5 tonnes gross vehicle weight shall be fitted with equipment to audibly warn vulnerable road users when a vehicle is turning left.

All vehicle manoeuvring warning systems shall be fully operational.

Fleet operators shall make regular checks and take all reasonable measures to ensure audible warning devices remain fully operational.

Fleet operators shall take steps to ensure that drivers recognise that activation of the device is an integral part of their job.

Vehicles over 3.5 tonnes gross vehicle weight should be fitted with operational equipment to audibly warn vulnerable road users when a vehicle is turning right or reversing.

Vehicles under 3.5 tonnes gross vehicle weight may be fitted with operational equipment to audibly warn vulnerable road users when a vehicle is reversing.

Enhanced audible warnings may be supplemented by visual warnings to vulnerable road users

Audible warning devices should be fitted with a manual on/off switch or reset button for circumstances, such as working at night, where it may be appropriate for the device to be de-activated.

For left-hand drive vehicles, the blind-spot is on the off-side and affects the vehicle when turning right. Audible warnings should therefore warn of a vehicle's right manoeuvre.



For further information:

- CLOCS Guide - vehicle safety equipment, section 2.5