

# Transport for London Green Bond Framework 2020

January 2020



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## I. Introduction

Transport for London (TfL) is part of the Greater London Authority (GLA) family led by the Mayor of London. We are the integrated transport authority responsible for delivering the Mayor's aims for transport.

We have a key role in shaping what life is like in London. We are committed to creating a fairer, greener, healthier and more prosperous city. The Mayor's Transport Strategy<sup>1</sup> (MTS) published in 2018 sets a target for 80 per cent of all journeys to be made on foot, by cycle or using public transport by 2041. To make this a reality, we prioritise health and the quality of people's experience in everything we do.

We manage the city's red route strategic roads and, through collaboration with the London boroughs, can help shape the character of all London's streets. These are the places where Londoners travel, work, shop and socialise. Making them places for people to walk, cycle and spend time will reduce car dependency and improve air quality, revitalise town centres, boost businesses and connect communities.

We run most of London's public transport services, including the London Underground, London Buses, the Docklands Light Railway, London Overground, TfL Rail, London Trams, London River Services, London Dial-a-Ride, Victoria Coach Station, Cycle Hire scheme (currently Santander Cycles) and the cable car services across the river Thames (Emirates Air Line). The quality and accessibility of these services is fundamental to Londoners' quality of life. By improving and expanding public transport, we can make people's lives easier and increase the appeal of sustainable travel over private car use.

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<sup>1</sup> <https://www.london.gov.uk/what-we-do/transport/our-vision-transport/mayors-transport-strategy-2018>

## 2. TfL's approach to the environment

TfL supports the Mayor's environmental strategy and goals included in the MTS and the London Environment Strategy<sup>2</sup> (LES). TfL plays an important role in achieving these, and our corporate strategies and policies are developed to align with these. The current MTS and LES were published in 2018.

### 2.1. Mayoral strategies

The MTS sets out the Mayor's policies and proposals to reshape transport in London over the next two decades. We deliver this strategy in partnership with London's boroughs and other transport providers.

The LES sets out the Mayor's actions to address London's environmental challenges, including air quality improvements, climate change mitigation and adaptation, the circular economy and green infrastructure. The LES sets a target for London to be a zero carbon city by 2050, in line with the UK government's subsequent national net zero target.

The MTS and LES documents are aligned; achievement of the MTS' overarching aim of 80 per cent of all journeys to be made on foot, by cycle or using public transport by 2041, underpins the greenhouse gas reduction and air quality improvements set in the LES.

With regards to TfL's actions, the MTS and LES set out the Mayor's actions to reduce greenhouse gas and air pollutant emissions from London's transport system, enhance green infrastructure and biodiversity, and ensure the transport network adapts to climate change.

We also have an important role to play in leading by example in delivery of the LES, by tackling environmental challenges and procuring responsibly – delivering, driving and enabling best practice. These are powerful demonstrators of best practice or new technologies and we can use our scale to help drive down costs to enable others to follow suit. Examples include delivering sustainable drainage systems, net gain for biodiversity, zero emission support fleets and reducing single use plastic.

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<sup>2</sup> <https://www.london.gov.uk/what-we-do/environment/london-environment-strategy>

## 2.2. Corporate strategy and policies

We have a Corporate Environment Framework, published in 2014, one of the principle aims of this framework is to show the contribution that TfL's directly managed activities can make towards achieving the Mayor's environmental goals. It covers the environmental impacts of our directly managed activities and operations, for example, delivery and operation of transport services, projects, maintenance and office functions. It also describes measures that will help us to deliver, and where possible improve, environmental legal compliance and meet other needs, for example, national requirements.

We are due to launch a new Corporate Environment Plan in Summer 2020, which will replace the current Corporate Environment Framework. It sets out a new ambitious vision, strategy and approach that ensure we address the climate emergency and achieve world class environmental performance of transport infrastructure. This will have clear and transparent corporate environmental targets to ensure we are leading on tackling issues of increasing importance to our staff and stakeholders, now and in the future.

The Corporate Environment Plan brings together all of TfL's environmental goals, from the Mayor of London, national requirements and good practice. It is being developed by the Corporate Environment Team in consultation and collaboration with colleagues across TfL policy and delivery departments, as well as the GLA and other key stakeholders. It summarises the key context in which we operate and the environmental principles which we use as a foundation for achieving our goals.

The Corporate Environment Plan sets out the extent of our longer term ambition with an overview of our approach, initial plans, objectives and targets so that we can track progress. We can use this plan as a way to summarise to our stakeholders what our environmental approach and requirements are.

The key elements of the plan are:

- Addressing Climate Change – supporting the UK and London's net zero carbon targets and adapting to the changing climate
- Emissions – reducing transport emissions of air pollutants and carbon



- Green Infrastructure – managing our natural capital and driving net gain for biodiversity
- Resource Management – improving resource use and waste management
- Corporate Responsibility – managing and reducing noise, incidents and complaints

TfL operates a well-developed Health, Safety and Environmental Management System (HSEMS) to ensure that our environmental impacts and performance are well managed. The HSEMS is regularly reviewed to take into account changes in business activities, responsibilities and legislation.

At the heart of the HSEMS is the Health, Safety and Environment (HSE) Policy, supported by a number of standards and procedures, that set requirements for our activities. The HSE policy calls TfL to comply both with the spirit and the letter of environmental legislation and to improve our environmental management and performance.

We manage the environmental performance of our projects and programmes through procurement and project management processes. We use these, as part of our HSEMS to manage and mitigate environmental risks and opportunities. There are relevant processes throughout the project life cycle that review how to maximise environmental outcomes and reduce environmental impacts, from early project optioneering through to design stages and delivery and benefits realisation. We use external, international sustainability rating frameworks CEEQUAL for Civil Engineering and BREEAM for buildings and have an early stage sustainability assessment to inform concept design.

TfL businesses and many of our contractors produce annual Environmental Improvement Programmes, which set objectives, priorities and targets for the year ahead. We will continue to deliver some of our environmental performance in partnership with our supply chain, setting specifications, franchise and contract requirements that are closely aligned to our goals and targets.

### **3. Framework Overview**

This TfL Green Bond Framework 2020 (the Framework) expands on the previous framework published in 2015, and is in accordance with

the ICMA Green Bond Principles (GBP) 2018<sup>3</sup>. This Framework enables TfL to raise finance in the form of Green Bonds for capital projects that support the delivery of the strategy and objectives described above.

In alignment with the GBP, for each Green Bond issued, TfL asserts that it will adopt the following, as set out in this Framework:

- i. Use of Proceeds
- ii. Process for Project Evaluation and Selection
- iii. Management of Proceeds
- iv. Reporting

We will aim to, where possible, adhere to best practices in the market and will review the Framework's alignment to updated versions of the GBP as and when they are released. As such, this Framework may be updated and amended in the manner described in Section 5 ("Amendments to this Framework") below.

### 3.1. Use of Proceeds

An amount equivalent to the net proceeds raised from any TfL Green Bond issued under this Framework will be allocated, in part or in full, to finance new eligible green expenditures (Eligible Green Projects) and/or to refinance existing Eligible Green Projects whose disbursements occurred no earlier than 24 months prior to the issue date of the TfL Green Bond.

The table below outlines the eligibility criteria for these Eligible Green Projects and their alignment with the UN Sustainable Development Goals and the underlying target.

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<sup>3</sup> ICMA's Green Bond Principles 2018 <https://www.icmagroup.org/green-social-and-sustainability-bonds/green-bond-principles-gbp/>



ICMA Green Bond Principles project category	Eligibility criteria	Alignment with UN SDG Targets
Clean Transportation	<ul style="list-style-type: none"> <li>• Construction of new passenger rail lines and line extensions</li> <li>• Refurbishment or maintenance of existing rail infrastructure</li> <li>• Construction and development of new stations and technical centres</li> <li>• Investments in new or renewed passenger electric rolling stock</li> <li>• Investment in train signalling systems</li> <li>• Investment in the conversion of London's bus fleet to zero emission</li> <li>• Investment in zero emission vehicles and related infrastructure, including electric vehicle charging points</li> <li>• Investment in cycling and walking infrastructure and public realm improvements</li> </ul>	<p>SDG 9.1: Develop quality, reliable, sustainable and resilient infrastructure, including regional and transborder infrastructure, to support economic development and human well-being, with a focus on affordable and equitable access for all</p> <p>SDG 9.4: By 2030, upgrade infrastructure and retrofit industries to make them sustainable, with increased resource-use efficiency and greater adoption of clean and environmentally sound technologies and industrial processes</p> <p>SDG 11.2: By 2030, provide access to safe, affordable, accessible and sustainable transport systems for all, improving road safety, notably by expanding public transport</p>
Pollution Prevention and Control	<ul style="list-style-type: none"> <li>• Investment in measures to improve air quality, including emissions-based road charging schemes</li> </ul>	<p>SDG 3.9: By 2030, substantially reduce the number of deaths and illnesses from hazardous chemicals and air, water and soil pollution and contamination</p> <p>SDG 11.6: By 2030, reduce the adverse per capita environmental impact of cities, including by paying special attention to air quality and municipal and other waste management</p>
Renewable Energy	<ul style="list-style-type: none"> <li>• Investment in renewable energy generation, including solar energy</li> </ul>	<p>SDG 7.2: By 2030, increase substantially the share of renewable energy in the global energy mix</p>

The table above summarises our project categories and eligibility criteria. Further information on each category including example projects are set out in the following sections.

### 3.1.1. Clean Transportation

This category includes investment to maintain and increase London's public transport capacity, including rail network expansion (such as new lines or extensions), investment in new assets (such as rolling stock, signalling and stations) as well as the renewal of the existing rail infrastructure (such as track assets) to improve journey times and increase capacity.

It also includes direct investment to improve the environmental performance of TfL's public transport network, for example the conversion of TfL's bus fleet to zero emission to reduce emissions of greenhouse gases and air pollutants, including electric and hydrogen fuel cell vehicles.

Improving the roads through encouraging electric vehicles (such as investment in electric vehicle charging infrastructure) and investment in cycling, walking and public realm is also included in this category.

These contribute to the overall increase in public transport capacity that in turn allows us to reach the overarching MTS goal of 80 per cent of journeys in London to be made by walking, cycling and public transport, and supports environmental benefits including reductions in emissions of greenhouse gases and air pollutants from the shift away from private car use.

### 3.1.2. Pollution Prevention and Control

This category covers TfL's capital investment to deliver measures to improve London's air quality identified in the MTS and LES. This includes investment in the infrastructure required to enforce road charging schemes such as London's Ultra Low Emission Zone (such as Automatic Number Plate Recognition systems), under which road vehicles entering central London are required to meet strict emissions standards or pay a daily charge. Such schemes deliver reductions in emissions of nitrous oxides and particulate matter in support of the ambitious goals for London's air quality set in the LES. They can also achieve additional reductions in greenhouse gas emissions.





### 3.1.3. Renewable Energy

This category covers TfL's capital investment in renewable energy generation. Current and planned projects are primarily focussed on solar generation on rooftops of our operational properties or on TfL's land. Further opportunities for the renewable energy generation are also to be considered.

### 3.1.4. Additional Environmental Benefits of TfL's Investment Programme

In addition to developing and delivering projects within the GBP project categories above, our investment programme includes other environmental benefits, for example, in targeting net gain for biodiversity in infrastructure schemes; adapting to the changing climate; waste reduction and promotion of the circular economy.

We also have some discrete investment in energy efficiency projects as part of our actions to reach net zero carbon operations. These energy efficiency and carbon reduction improvements are however primarily embedded within our investment in transport infrastructure.

## 3.2. Process for Project Evaluation and Selection

The Project Evaluation and Selection Process will ensure that the proceeds of TfL's Green Bond(s) issued under this Framework are allocated to new or existing expenditures that meet the eligibility criteria set out above in Section 3.1 ("Use of Proceeds").

Group Financial Accounting will oversee the project evaluation and selection process, with support from Corporate Finance, TfL's Safety, Health and Environment and City Planning teams (the working group).

On an annual basis, this working group will review the aggregate pool of green expenditures for alignment with the eligibility criteria listed in Section 3.1 ("Use of Proceeds"). This group will also review the Management of Proceeds (as described in Section 3.3) and facilitate Reporting (as described in Section 3.4).

Project selection – management of environmental impact

Section 2.3 ("Health, Safety and Environmental Management System") sets out how we ensure we manage our environmental impact and ensure we meet necessary standards and requirements. All of TfL's activities are subject to our HSE Policy, which was published in

December 2016, and our Environmental Management Framework. Large investment projects undertake Sustainability Assessments at an early stage of the project lifecycle.

### 3.3. Management of Proceeds

An amount equal to the net proceeds of the issue of the Notes will be allocated to the general TfL cash pool and tracked so that this cash is linked to TfL's expenditure in the Eligible Green Project Categories. So long as the Notes are outstanding, the balance of the net proceeds will be reduced, at the end of each period, by amounts allocated during that accounting period to fund spend in the Eligible Green Project Categories. We intend to fully allocate the proceeds within 24 months after the issuance date of each Green Bond.

Pending such allocation, the balance will be invested in cash or short-term, liquid money market instruments in accordance with TfL's Treasury Management Strategy & Policies.

At each year end, the working group will review the capital spend incurred and identify the expenditure on the Eligible Green Project Categories. A final selection will then be made from this expenditure and Group Financial Accounting will select the amount of borrowings equating to no more of the accrued project spend up to that period to be deducted from the balance of net proceeds. This includes any amendments which might be required for accounting, tax or other reasons, and formally allocate the borrowing against the Eligible Green Project Categories. It is this final allocation which we will report to investors on an annual basis. For the avoidance of doubt, the annual allocation of the net proceeds of the TfL Green Bond will be restricted to projects included in any of the Eligible Green Project Categories.

To manage this oversight process, we will establish a Green Bond Register.

The Green Bond Register will contain relevant information including:

(1) Details of the Bond(s): ISIN, pricing date, maturity date, etc.

(2) Details of Eligible Use of Proceeds, including:

- Eligible Green Projects
- Amount allocated

- Other necessary information so that the aggregate of issuance proceeds allocated to the Eligible Use of Proceeds is recorded at all times

Until the maturity of the relevant TfL Green Bond(s), in case of divestment or cancellation of an allocated Eligible Green Project, or if an allocated project no longer meets the eligibility criteria, we commit to reallocate the proceeds to other Eligible Green Projects depending on availability. These changes would be tracked thoroughly and included in reporting to maximise transparency and to prevent double counting.

### 3.4. Reporting

We will make and keep readily available reporting on the allocation of net proceeds to the Eligible Green Projects and wherever feasible reporting on the impact of the Eligible Green Projects. We will report on the following:

- Total amount allocated to Eligible Green Projects (by category);
- The year of investment / disbursement;
- The balance of unallocated proceeds.

We will provide impact reporting on the expected environmental benefits of the Eligible Green Projects that the TfL Green Bond proceeds have been allocated to, by category. We aim to estimate ex-ante the theoretical environmental impact metrics and, where feasible, will aim to provide ex-post impact measurements. Depending on the projects allocated, examples of relevant metrics include:

- Public transport journey time and network capacity benefits
  - Estimated modal shift from road transport to public transport, walking and cycling
  - Estimated total GHG emissions avoided
  - Reduction in energy consumption
  - Units (MWh) of renewable electricity generated
  - Reduction of NO<sub>x</sub> and particulate matter emissions
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We commit to report within a year from the launch of a TfL Green Bond, and annually thereafter, until full allocation of the net proceeds. This reporting will be made publicly available on TfL's website.

In addition, TfL publishes its Travel in London<sup>4</sup> report annually. The report provides information to monitor progress of the implementation of the MTS, including monitoring the overarching aim for 80 per cent of all journeys to be made on foot, by cycle or using public transport by 2041. The Travel in London report also monitors the overall impact of London's transport system on greenhouse gas emissions and air quality.

We also report on the environmental performance of our direct operations on an annual basis through our Health Safety and Environment report<sup>5</sup>. Metrics reported include:

- Energy consumption and total greenhouse gas emissions of TfL and its business units
- Emissions of greenhouse gases of TfL public transport services per passenger km travelled
- Emissions of nitrous oxides and particulate matter from TfL operations
- Construction and demolition waste

## **4. External Review**

### **4.1. Second Party Opinion**

We have engaged Sustainalytics to provide an External Review in the form of a Second Party Opinion on this Green Bond Framework, to confirm its alignment with the 2018 ICMA Green Bond Principles.

The Second Party Opinion will be publicly available on TfL's website.

### **4.2. External Verification**

We are committed to engage an assurance provider, or an External Reviewer to verify the compliance of the allocated proceeds against the TfL Green Bond Framework on an annual basis, until the full allocation of an amount equal to the net proceeds and thereafter

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<sup>4</sup> <https://tfl.gov.uk/corporate/publications-and-reports/travel-in-london-reports>

<sup>5</sup> <https://tfl.gov.uk/corporate/publications-and-reports/health-safety-and-environment>

only in case of a material change to the use of proceeds, such as asset sale or divestment.

The resulting report will be publicly available on TfL's website.

## **5. Amendments to this Framework**

The Corporate Finance team will review this Framework on a regular basis, including its alignment to updated versions of the GBP as and when they are released, with the aim of adhering to best practices in the market. Such review may result in this Framework being updated and amended. The updates, if not minor in nature, will be subject to the relevant internal approvals and would require an updated External Review. Any future updated version of this Framework that may exist will either keep or improve the current levels of transparency and reporting disclosures, including the corresponding review by an External Reviewer. The updated Framework, if any, will be published on TfL's website and will replace this Framework.



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