



# Oakley Square (north) Safe and Healthy Streets Consultation – Fact Sheet

This document sets out data and other information gathered pre-scheme installation and during the trial period of the Oakley Square (north) Safe and Healthy Streets scheme located at the northern end of Oakley Square at the junction with Crowndale Road. It has been gathered and analysed to help assess the impact of the scheme during the trial period of operation. The data and feedback are summarised below.

## Air quality data

Camden monitors air quality across the borough. Air quality monitors called ‘diffusion tubes’ are in place on Crowndale Road. This was installed for the purpose of monitoring this trial scheme. Therefore, there is no data prior to 2021. However, the site will continue to be monitored as part of ongoing air quality data collection.

The raw and provisional month average NO<sub>2</sub> concentration measures at the site in 2021 are recorded in **Table 1**. Normally, this data would be ‘bias adjusted’ and annualised using the [LLAQM.TG\(19\) methodology](#). However, since the ‘bias adjustment factors’ for 2021 will not be available until 2022, this data is presented in ‘raw’ form and must therefore be considered indicative and provisional at this stage. Bias adjustment factors are continually reviewed and vary each year and are not published until the April of the following year. Therefore, we are unable to provide annual figures for the monitoring that has taken place at this site in 2021 until April 2022.

There are a couple of important caveats when considering ‘raw’ diffusion tube data:

- Typically, diffusion tubes over-estimate NO<sub>2</sub> concentrations and we therefore expect the annual mean for 2021 to be lower than the average of the individual month average NO<sub>2</sub> concentrations shown in the table; and  
We estimate that road transport contributes about half of NO<sub>2</sub> emissions in Camden. Approximately 40% is from buildings, from the use of natural gas for heating and power. Therefore, NO<sub>2</sub> emissions are always higher during colder periods when there is increased heating demand in residential and commercial properties which is why NO<sub>2</sub> concentrations are typically higher during winter months.

**Table 1: Raw and provisional month-average diffusion tube NO<sub>2</sub> data (2021), µg/m<sup>3</sup>**

Raw provisional month-average diffusion tube NO <sub>2</sub> data, µg/m <sup>3</sup>								
Site	Jan-21	Feb-21	Mar-21	Apr-21	May-21	Jun-21	Jul-21	Aug-21
<b>Crowndale Road</b>	-	64.14	56.64	43.86	52.46	42.67	49.72	44.28

The data shows NO<sub>2</sub> concentrations reducing significantly between January 2021 and August 2021. As stated above, much of this effect may be due to the warmer weather in later months. However, once annual means can be calculated for 2021, this will provide a more accurate picture of the air quality impact of the scheme.

The National Air Quality Objective annual mean limit for NO<sub>2</sub> is 40µg/m<sup>3</sup>, so the Crowndale Road site is recording levels that exceed that limit on a month-by-month basis. However, as stated above the annual mean has not yet been calculated and is likely to be lower than the average of the levels shown in **Table 1**.

We also note that that the expansion of the ULEZ on 25th October 2022 may have a beneficial impact on local air quality across the borough.

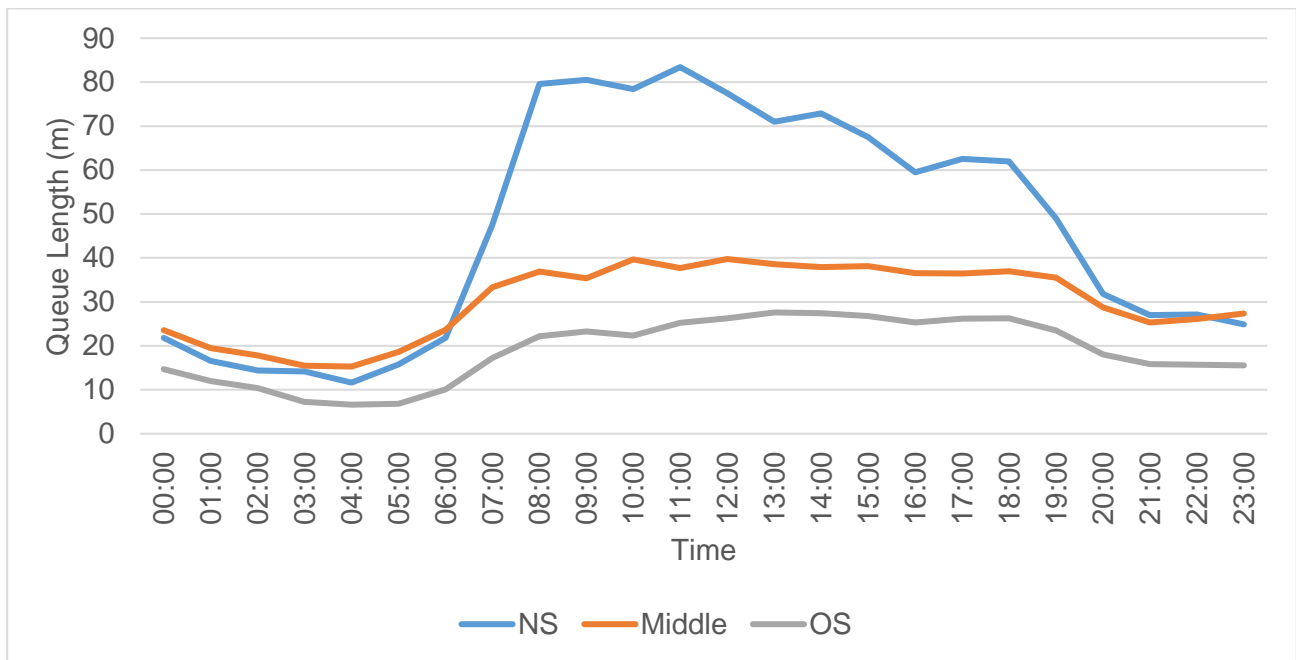
## Queue lengths data

Queue lengths were studied on Crowndale Road, at the junction with Eversholt Street. Surveys were undertaken for a 14-day period between 15th November – 28th November 2021. The data collected provides the queue lengths in metres for 3 lanes travelling westbound on Crowndale Road (with one lane turning left into the junction with Eversholt Street).

**Figure 1** shows the average hourly queue length for each surveyed lane: nearside (NS), outside (OS) and middle. Motor vehicles in the NS lane turn left onto Eversholt Street. Queue lengths in the middle and OS lanes (straight-on) are noticeably shorter than the NS lane. Queue lengths in all lanes increase during the daytime before reducing to 30m (or less) at 20:00. NS lane experiences the longest queue length (83m) at 11:00. The peak queue length observed in the middle lane is 40m at 10:00 and 12:00, whilst the peak queue length observed in the OS lane is 28m at 13:00.

The longer queue lengths observed in the NS lane may be due to motor vehicles no longer using Oakley Square (north) to cut out the corner from Crowndale Road to Eversholt Street due to the trial vehicle restriction in place. Another cause may be the left turn ban at the junction of Oakley Square (south) and Eversholt Street. These two schemes on Oakley Square may be causing congestion in the left turn lane of the Crowndale Road – Eversholt Street junction, and Officers are therefore working closely with TfL to allow the left turn from Oakley Square (south) to Eversholt Street, whilst ensuring cycle safety is in place, when TfL's revised plans for the Hampstead Road corridor are brought forward in early 2022.

**Figure 1: Average hourly queue lengths on Crowndale Avenue**



## Cycle flows

Automatic traffic counts (ATCs) which count vehicles by type (cycle, motorcycle, car, van, lorry and bus) were undertaken for 14 days comprising of 15<sup>th</sup> – 28<sup>th</sup> November 2021. The data count locations are shown in **Figure 2** as follows (location numbers shown in **Table 2 and 3** correspond to the map):

- Oakley Square (north) (ATC 02);
- Crowndale Road (ATC 03); and
- Eversholt Street (ATC 04).

**Figure 2: Location of Traffic Counts**

A high number of cyclists are using Eversholt Street in both directions. A smaller number of cyclists are using Crowndale Road (WB), and this may be due to cyclists turning left down Oakley Square (south) to use the protected cycle lane available.

This may somewhat explain the lower flows observed on Oakley Square (north) despite the motor vehicle restricted access at the junction with Crowndale Road.

These results are presented in **Table 2**.



**Table 2: Traffic Count Data: Daily Average Cycle Counts**

Road	ATC	Direction	Daily Average Cycle Counts
Oakley Square (north)	ATC 02	NB	50
		SB	20
		Total (two-way)	70
Crowndale Road	ATC 03	EB	105
		WB	74
		Total (two-way)	179
Eversholt Street	ATC 04	NB	210
		SB	175
		Total (two-way)	385

*EB = Eastbound, WB = Westbound, NB = Northbound, SB = Southbound. Total (two-way) = total (two-way) traffic flow.*

## Traffic count data

**After-scheme** motor vehicle data was collected from 15<sup>th</sup> – 28<sup>th</sup> November 2021 using ATCs, counting vehicles by type: cycle, motorcycle, car, van, lorry and bus. Data is logged in 15-minute intervals over the full 24 hour period on those days.

**Before-scheme** data is presented using ATCs that were undertaken as part of traffic monitoring undertaken by Camden Council across the borough. Oakley Square (north) data was collected in March 2017. Crowndale Road data was collected in November 2017. Both sets of data were collected over a fortnight. To calculate weekly flows the summary data from the ATC surveys is used, which includes an average weekday, as well as an average Saturday and an average Sunday. These figures are averages of 14 days of surveys i.e. an average weekday is produced using the ten weekdays in a fortnight and an average Saturday is produced using data from two Saturdays. This data was produced as a guide to speeds and flows across the borough.

The traffic count locations for the 2021 data can be seen in Figure 2. For the 2017 counts:

- AH34 is at a similar location to ATC 02, on Oakley Square (north);
- AH96 is at a similar location to ATC 03, on Crowndale Road between the junctions with Oakley Square (north) and Eversholt Street; and
- The DfT data collection occurred at a similar location to ATC 04, on Eversholt Street between the junctions with Crowndale Road and Oakley Square (north).

The data in **Table 3** represents the average 24-hour day motor vehicle flows. As would be expected, traffic flows on Oakley Square (north) are much lower than the surrounding, busier roads – Crowndale Road and Eversholt Street.

**Table 3: Traffic Count Data: Daily Average Motor Vehicle Counts (excluding cycles)**

Motor Vehicles - daily average vehicle counts						
Road	Direction	ATC	2017	ATC	2021	Change (%)
Oakley Square (north)*	NB	AH34	923	ATC 02	674	-37%
	SB		1,381		39	-3448%

Motor Vehicles - daily average vehicle counts						
Road	Direction	ATC	2017	ATC	2021	Change (%)
	Total (two-way)		2,304		713	-223%
Crowndale Road	EB	AH 96	3,734	ATC 03	1,977	-89%
	WB		4,938		5,421	9%
	Total (two-way)		8,672		7,398	-17%
Eversholt Street	NB	DfT data*	6,020	ATC 04	6,194	3%
	SB		2,378		4,605	48%
	Total (two-way)		8,398		10,799	22%

South-bound vehicles on Oakley Square (north) in 2021 may be either vehicles turning around on street, having entered northbound, or vehicles contravening the ban

2017 DfT data is an estimation based on previous physical count.

Comparing the **Before**-scheme and **After**-scheme data, as would be expected, Oakley Square (north) southbound experiences a significant drop (-3448%) in traffic due to the trial turning ban instated on the junction with Crowndale Road.

Traffic flows also reduced on Crowndale Road eastbound by 89%. This may be due to Bayham Street vehicles which previously may have turned left onto Crowndale Road and cut through Oakley Square (north) to get to Eversholt Street. With this movement no longer possible due to the turning ban on Oakley Square (north), all vehicles must now turn right onto Crowndale to get to Eversholt Street.

Therefore, the data also shows a traffic increase of 48% on Eversholt Street. This is likely to be due to an increase in traffic coming from Bayham Street to Eversholt Street via Crowndale Road, alongside an increase in vehicles that would have turned left into Eversholt Street from Oakley Square (south) (and are now prevented from doing so due to the left-turn ban on Oakley Square (south)). An increase on Crowndale Road (westbound) of 9% may also be due to vehicles not being able to turn left into Eversholt Street from Oakley Square (south).

## Total traffic data

It is recognised that the Covid-19 pandemic has had an impact on general traffic levels throughout London and in Camden.

However, analysis (comparing this data to the dates of the scheme traffic counts) shows that:

- **Inner London** – Average daily traffic volumes on the Inner London Transport for London Road Network were 5% higher in October 2021 relative to October 2020 based on data available from TfL; and
- **Camden** – Average daily traffic volumes were approximately 3% higher in July 2021 relative to October 2020 (excluding school holidays) based on data from Vehicle Activated Signs at 13 sites in Camden (October 2021 data is not yet available).

Therefore, the November 2021 survey data discussed in the 'Traffic count data' section should be broadly representative of the 'normal' traffic levels in the area.

## Restriction contravention

Video surveillance was used to assess whether any vehicles are making the prohibited turn into Oakley Square (north) at the junction with Crowndale Road (vehicles are permitted to exit Oakley Square at this junction). Surveys were undertaken for a 14-day period (15/11/21-28/11/21) and the number of daily contraventions per vehicle type is shown **Table 4**.

**Table 4: Restricted Movements on Oakley Square (north)**

Dates	MC	Car	LGV	Total
15/11/2021	5	1	0	6
16/11/2021	1	2	2	5
17/11/2021	6	1	0	7
18/11/2021	3	0	2	5
19/11/2021	3	0	0	3
20/11/2021	2	0	0	2
21/11/2021	1	0	0	1
22/11/2021	3	0	1	4
23/11/2021	4	0	0	4
24/11/2021	8	4	0	12
25/11/2021	3	2	0	5
26/11/2021	4	2	1	7
27/11/2021	4	2	0	6
28/11/2021	0	4	0	4
<b>Average per day</b>	<b>3</b>	<b>1</b>	<b>0</b>	<b>5</b>

*N.B. Total issues due to rounding. MC = motorcycle; LGV = Light Goods Vehicle.*

**Table 4** identifies on average, only 1 car and 3 motorcycles were observed turning into Oakley Square (north) per day, where the motor vehicle restrictions is in place. Larger vehicles like HGVs were not recorded making the banned turn during the survey. While some motor vehicles are still accessing Oakley Square (north) via the junction with Crowndale Road, contravention is relatively low.

As shown in the ATC data, **Table 4** highlights the number of cyclists accessing Oakley Square (north) through the motor vehicle free access. On average, 5 cyclists are accessing Oakley Square (north) daily, however on one day, a total of 12 cyclists were observed turning into Oakley Square (north) via the junction with Crowndale Road.

Camden is not proposing camera enforcement at this restriction since contravention is relatively low. In addition, it is possible that TfL will reinstate the left turn from Oakley Square (south) onto Eversholt Street. Doing so would mean vehicles can use Oakley Square (south) for southbound movements.

## Collision data

STATS19 collision data (collected by TfL) has been reviewed for the most recent period available, running from 1 January 2017 to 30 June 2021. Collision data has been analysed between Hampstead Road, Harrington Square, Lidlington Place, Oakley Square (north

and south), Crowndale Road and Eversholt Street, including the junction south of Camden High Street.

Analysis of the data indicates a total of 49 collisions occurred between 1 January 2017 to 2 December 2020, before the scheme was implemented. Of the 49 collisions, 38 collisions were classed as slight in severity and 11 collisions were classed as serious. Six collisions caused casualties to cyclists; 17 collisions involved casualties to pedestrians.

Following the scheme implementation, a total of 6 collisions have been recorded between 3 December 2020 and 30 June 2021. 5 collisions were classed as slight in severity, one of which caused a casualty to a pedestrian. A single collision recorded between 3 December 2020 and 30 June 2021 was classed as fatal in severity and occurred on Oakley Square (north), 80m south of the junction with Crowndale Road.