Healthy School Streets Consultation – Ecole Jeannine Manuel (Bedford Square) Permanent Proposals

Monitoring Factsheet

This document sets out monitoring data gathered during the trial period of the Ecole Jeannine Manuel Healthy School Street scheme on the southern section of Bedford Square. 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.

Traffic Count Data

Traffic data before and after the implementation of the scheme was collected through automatic traffic counts (ATCs) on streets within and outside the scheme area and is displayed in Table 1. 'Before scheme' data was collected in March 2021 and 'after scheme' data was collected in January 2022 and June 2022 when the scheme was live.

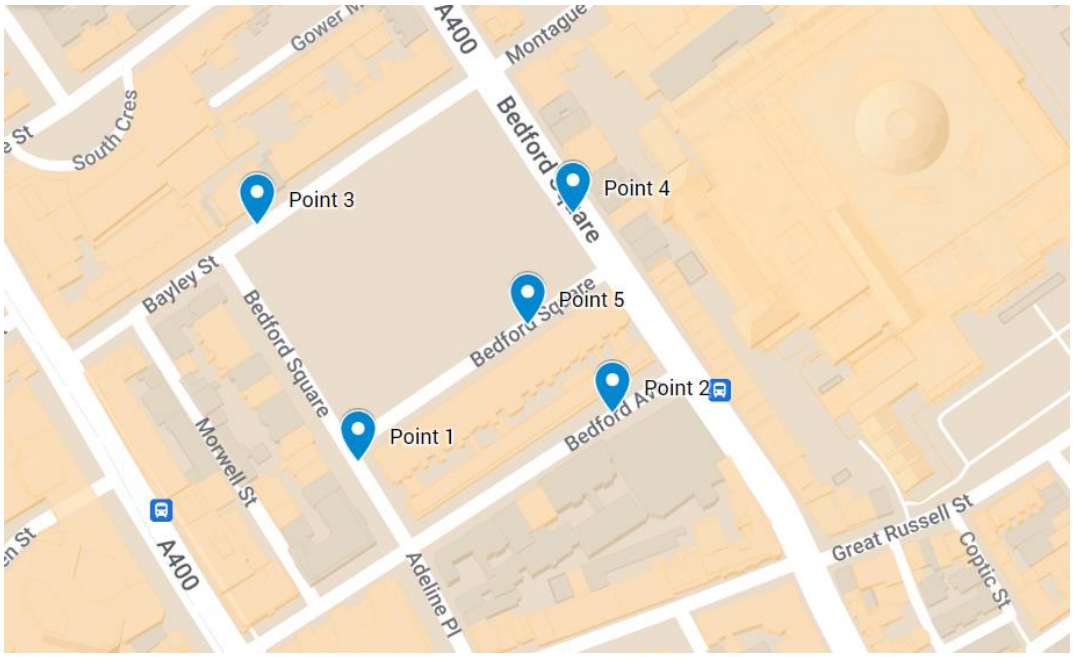
Weekly traffic counts (car, van, lorry, bus, cycle, and motorcycle) were taken over the following five-day periods:

- The week commencing 15th March 2021 (before scheme)
- The week commencing 21st January 2022 (during scheme trial)
- The week commencing 27th June 2022 (during scheme trial)

The counts covered the total number of vehicles on Monday to Friday in school term time, when all pupils were attending Ecole Jeannine Manuel.

Traffic counts were analysed during the morning (8.00am – 9.00am) and afternoon (3pm – 4.30pm) Healthy School Street operational times. The traffic count locations are shown in **Figure 1** below. Cycle count data is analysed separately later in this factsheet.

Figure 1 – Location of Traffic Counts



The traffic count data is summarised in Table 1 below, which shows daily average traffic flows based on the weekly counting periods noted on page 1.

Table 1 –Traffic Count Data: Average Vehicle Counts (Monday to Friday, AM and PM Healthy School Street restriction times)

Site number	Location	AM Peak (08:00-09:00)					PM Peak (15:00-16:30)				
		Mar-21	Jan-22	Jun-22	Change (Mar 21 to Jan 2022)	Change (Mar 21 to Jun 2022)	Mar-21	Jan-22	Jun-22	Change (Mar 21 to Jan 22)	Change (Mar 21 to Jun 22)
1	Adeline Place	51	65	72	27%	41%	46	58	58	26%	26%
2	Bedford Avenue	21	78	94	271%	348%	27	77	97	185%	259%
3	Bedford Square North	63	69	66	10%	5%	70	72	85	3%	21%
4	Bedford Square East	491	505	610	3%	24%	795	779	951	-2%	20%
5	Bedford Square South	68	15	22	-78%	-68%	60	18	12	-70%	-80%
Total across all sites		694	732	864	5%	24%	998	1004	1203	1%	21%

When comparing the traffic count data from March 2021 (before scheme) to June 2022 (during scheme trial) for Bedford Square South (Site 5), which is the section of Bedford Square with Healthy School Street restrictions, it can be seen that there is an average 68% reduction in vehicles during the morning restrictions and an 80% reduction during the afternoon restrictions. This equates to 46 fewer vehicles in the morning and 48 fewer

vehicles in the afternoon. Bedford Square North (Site 3) saw an average increase of 5% (3 vehicles) in the morning and 21% (85 vehicles) in the afternoon, while Bedford Square East saw rises of 24% (119 vehicles) and 20% (156 vehicles) during the same periods. The increases in traffic seen on Bedford Square East may also be linked to the fact that Gower Street and Bloomsbury Street became two way for motor traffic from the 28th February 2021 as part of the West End Project (WEP). The 12-month WEP monitoring report can be viewed separately, here.

Outside of Bedford Square, Adeline Place saw an average increase of 41% (21 vehicles) during the morning restriction times and 26% (12 vehicles) during the afternoon, while Bedford Avenue saw a 348% increase (73 vehicles) and 258% increase (70 vehicles) during the same time periods. Some of the increase seen on these streets may be attributed to parents that continue to drive using these streets to drop off and pick up their children, although the increase seen on Bedford Avenue is also likely to be due to the aforementioned changes to Gower Street and Bloomsbury Street.

When interpreting the above data, it is important to note that in March 2021, some Covid-19 restrictions were still in place, and the Central Activities Zone (CAZ) within London continued to be supressed at that time. Recovery has since taken place. For example, traffic levels on the Inner London Transport for London road network were 14% higher in spring (March) 2022 than summer (July) 2021. Some of the increases in motor vehicle traffic on some streets in the study area may therefore be related to the recovery the CAZ has experienced between the survey dates shown in this report. If the scheme is made permanent, we would continue to monitor its impacts and to work with the school to encourage and support parents to consider other sustainable modes of transport. The Council is also developing proposals for changes to Adeline Place which will be consulted on in due course and would be funded through developer section 106 contributions.

Traffic Speed Data

The traffic count data collected can also be used to analyse vehicle speeds. A comparison of speeds before and after the trial scheme was implemented is shown in Table 2. The data includes the average speed of all vehicle classes (including cycles).

Table 2 – Traffic Speed Data: Daily Average (Monday-Friday, AM and PM restriction times)

Site number	Location	AM Peak (08:00-09:00)					PM Peak (15:00-16:30)				
		Mar-21	Jan-22	Jun-22	Change (Mar 21 to Jan 2022)	Change (Mar 21 to Jun 2022)	Mar-21	Jan-22	Jun-22	Change (Mar 21 to Jan 2022)	Change (Mar 21 to Jun 2022)
1	Adeline Place	11 mph	13 mph	12 mph	+2 mph	+1 mph	11 mph	13 mph	13 mph	+2 mph	+2 mph
2	Bedford Avenue	17 mph	16 mph	17 mph	-1 mph	No change	18 mph	16 mph	17 mph	-2 mph	-1 mph
3	Bedford Square North	14 mph	14 mph	14 mph	No change	No change	16 mph	15 mph	14 mph	-1 mph	-2 mph
4	Bedford Square East	19 mph	14 mph	15 mph	-5 mph	-4 mph	20 mph	15 mph	16 mph	-5 mph	-4 mph
5	Bedford Square South	11 mph	13 mph	12 mph	+2 mph	+1 mph	14 mph	14 mph	14 mph	No change	No change

The data shows a 1mph increase in average speed during the morning restrictions and no change during the afternoon restrictions on Bedford Square South. Bedford Square East saw 4mph reductions in average speeds during both restriction periods, while the other roads surveyed saw small changes ranging from -2mph to +2mph. During both periods of the restrictions average vehicle speeds are below the 20mph speed limit.

Cycle Flows

A comparison of cycle flows for the roads surveyed is shown in Table 3.

Table 3 - Cycle Count Data: Daily Average Counts (Monday to Friday, AM and PM restriction times)

Site number	Location	AM Peak (08:00-09:00)					PM Peak (15:00-16:30)				
		Mar-21	Jan-22	Jun-22	Change (Mar 21 to Jan 2022)	Change (Mar 21 to Jun 2022)	Mar-21	Jan-22	Jun-22	Change (Mar 21 to Jan 2022)	Change (Mar 21 to Jun 2022)
1	Adeline Place	8	13	22	63%	175%	8	12	19	50%	138%
2	Bedford Avenue	8	17	17	113%	113%	6	10	8	67%	33%
3	Bedford Square North	21	8	18	-62%	-14%	22	15	33	-32%	50%
4	Bedford Square East	4	112	306	2700%	7550%	4	102	234	2450%	5750%
5	Bedford Square South	3	9	16	200%	433%	4	6	7	50%	75%
Total across all sites		44	159	379	261%	761%	44	145	301	230%	584%

When comparing March 2021 (pre-scheme) with June 2022 (during scheme), the data for Bedford Square South shows an average increase of 13 cycles during the morning restrictions and an increase of 3 cycles during the afternoon restrictions. Bedford Square North showed a reduction of 3 cycles in the morning and an increase of 11 cycles recorded in the afternoon. Adeline Place saw increases of 14 cycles during the morning and 11 cycles during the afternoon, while Bedford Avenue saw increases of 9 cycles and 2 cycles during the same periods.

Bedford Square East showed the highest increases in cycling, with an average increase of 302 cycles recorded during the morning and increase of 132 during the afternoon. This street had protected cycle lanes installed as part of the West End Project, which also complement other changes in the local area to provide safer and more direct routes for people cycling, including the cycle contraflow on Bedford Square South which was introduced as part of the Healthy School Street trial.

Hands up and school surveys/travel planning

During the consultation we will be working closely with Ecole Jeannine Manuel to learn more about what pupils think of the Healthy School Street scheme. The school has also carried out 'hands up' surveys with pupils before and after the trial scheme was installed. These surveys allow us to record how children travel to school by asking them to put their hand up when their mode of transport is read out. Table 4 shows a comparison of travel behaviour before and after the trial scheme was implemented.

Table 4 – Hands up survey data – academic years 2018/19 and 2021/22

Survey date (academic year)	Number of Participants	Percentage of total pupils	Transport Mode			
			Walking	Cycling/scooting	Public Transport	Motor vehicle
2018/19	441	100%	76	24	315	26
			17%	5%	71%	6%
2021/22	579	100%	74	43	411	51
			13%	7%	71%	8%

While the data shows that there has been an increase in the percentage of children that are driven to school from 6% in 2018/19 to 8% in 2021/22, the percentage of children cycling to school has also increased by 2% during this period, and over 90% of children continue to complete the school run by active or public transport. This demonstrates the need for schemes to support children to travel in this way and ensure that they continue to do so in safe and welcoming environment. The school currently has a Silver accreditation on the TfL STARS programme and we will continue to work with them to support and encourage parents and children to travel to school by active and sustainable modes of transport.

Air Quality Monitoring

We have air quality monitoring diffusion tubes in place on Bedford Avenue and the northern and southern sections of Bedford Square, the locations for which are shown in Figure 3. The diffusion tubes have been installed to monitor the impacts of the Healthy School Street trial and the results are shown in Table 4.

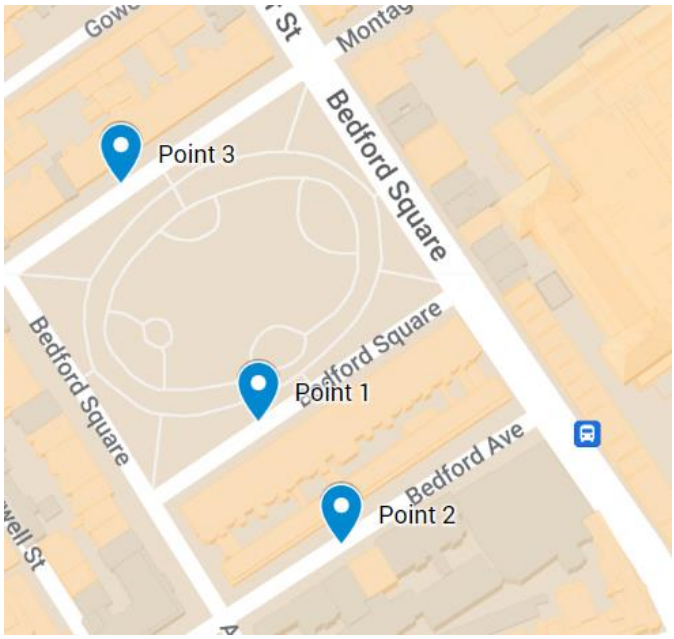
Table 4 – Raw diffusion tube NO2 Data 2021-2022

	Raw NO_2 concentration, $\mu g/m^3$			Change in NO_2 concentration	
Site	**2021 (Feb-April)**	**2022 (Feb-April)**	**Months included**	**Change in $\mu g/m^3$**	**% change**
1 - Ecole Jeannine Manuel (Bedford Square south)	30.73	29.18	Feb/Mar/Apr	-1.56	-5.1%
2 - Ecole Jeannine Manuel (Bedford Avenue)	33.32	33.59	Feb/Mar/Apr	0.27	0.8%
3 - Ecole Jeannine Manuel (Bedford Square north)	30.86	32.63	Feb/Mar/Apr	1.77	5.7%
Average change across all sites				0.16	0.5%

The data presented in Table 4 is raw and unratified without applying the national bias adjustment factors. This is because the analysis has only used a selection of months rather than the full calendar annual mean NO_2 concentrations which is not available. However, it shows us that Bedford Square South, outside the school, had a 5.1% decrease in NO_2 levels when comparing the data for February to April 2021 (before the scheme was introduced) to February to April 2022 (after the scheme was introduced). Outside the scheme area, Bedford Square North and Bedford Avenue had increases of 5.7% and 0.8% respectively when comparing the same months surveyed before and after the scheme was introduced. It also shows us that for the months surveyed, all sites were below the current legal limit of 40ug/m3, and the Council has committed to achieving the updated World Health Organisation's standards of 10ug/m3 by 2034.

It is important to note that transport contributes around 31% of total NO_2 emissions in Camden over the course of a year. The majority of the remainder comes from gas use in building heating systems. This means that there is significant seasonal variation in outdoor NO_2 concentrations when heating demand is higher during cold weather. The change in NO_2 concentration at a particular location won't entirely be the result of changes in traffic volumes and there are other local factors affecting air quality.

Figure 3 – Location of air quality monitoring diffusion tubes on Bedford Square and Bedford Avenue



Feedback During the Experimental Traffic Order Period

Eleven comments on the scheme were received on Commonplace during the trial Experimental Traffic Order period. Within this total, nine of the respondents were positive towards the changes, with two being negative.

The comments received that were positive towards the trial changes included:

- The scheme encourages respondents to walk and cycle.
- Air quality and traffic levels had improved.
- Improved safety for children to walk, scoot and cycle to school.
- The exemption for the school bus encourages families to use the service and allows the service to be safer and more efficient.
- The scheme should be extended, or other measures introduced, to reduce traffic levels on other nearby streets such as Gower Street and New Oxford Street.
- The scheme has made it easier to complete the school run and there has been an increase in the number of parents cycling to school with their children.

The comments received that were negative towards the trial changes included:

- Journey times by motor vehicle have become longer.
- Air quality is still bad, and the scheme does not address air quality issues in the wider local area.
- There have been no improvements in road safety as a result of the scheme.
- There has been a small increase in traffic levels on Bedford Avenue.

On the 10th March 2022, Sustrans were contracted to visit the school during drop off time to discuss the trial changes with parents and carers. In addition to the above comments, the following points were also discussed:

- Some parents were unhappy that the scheme had made dropping off their children by car more difficult.
- While some parents had initially been unhappy with the scheme and had received fines for ignoring the restrictions, they had subsequently seen its benefits and become supportive.
- Concerns that some people still ignored the restrictions.
- Concerns that, as parents can no longer drop off their children outside the school, they now have to do so on other streets that are busier and have higher vehicle speeds.