

## Bradford Clean Air Zone – Traffic Displacement Monitoring

The Council has carried out extensive traffic monitoring outside the CAZ, both prior to and following the introduction of the zone to assess potential displacement of traffic

### Introduction

Traffic displacement could be an effect where vehicles affected by the zone may choose to reroute their journeys to avoid the zone and the resultant charges once the zone is live. This means the effects of displacement are limited to the chargeable section of the fleet, those being older commercial vehicles which do not have the benefit of an exemption. It is important to identify if displacement is occurring as additional commercial traffic could be a nuisance for local communities and cause additional air quality problems in areas which were previously cleaner.

### Exemptions

Many older commercial vehicles which would otherwise be affected by the charges and the CAZ have the benefit of an exemption. Details of the vehicles that have an exemption available are found at the following link <https://www.bradford.gov.uk/breathe-better-bradford/what-help-is-available/exemptions/>. There is both local exemptions and national exemptions, an exemption would mean that an otherwise chargeable commercial vehicle is no longer affected by the CAZ charge and will not be displaced by the presence of the zone.

In addition to national exemptions, the Council has issued 9,500 vehicle exemptions to mainly local vehicles

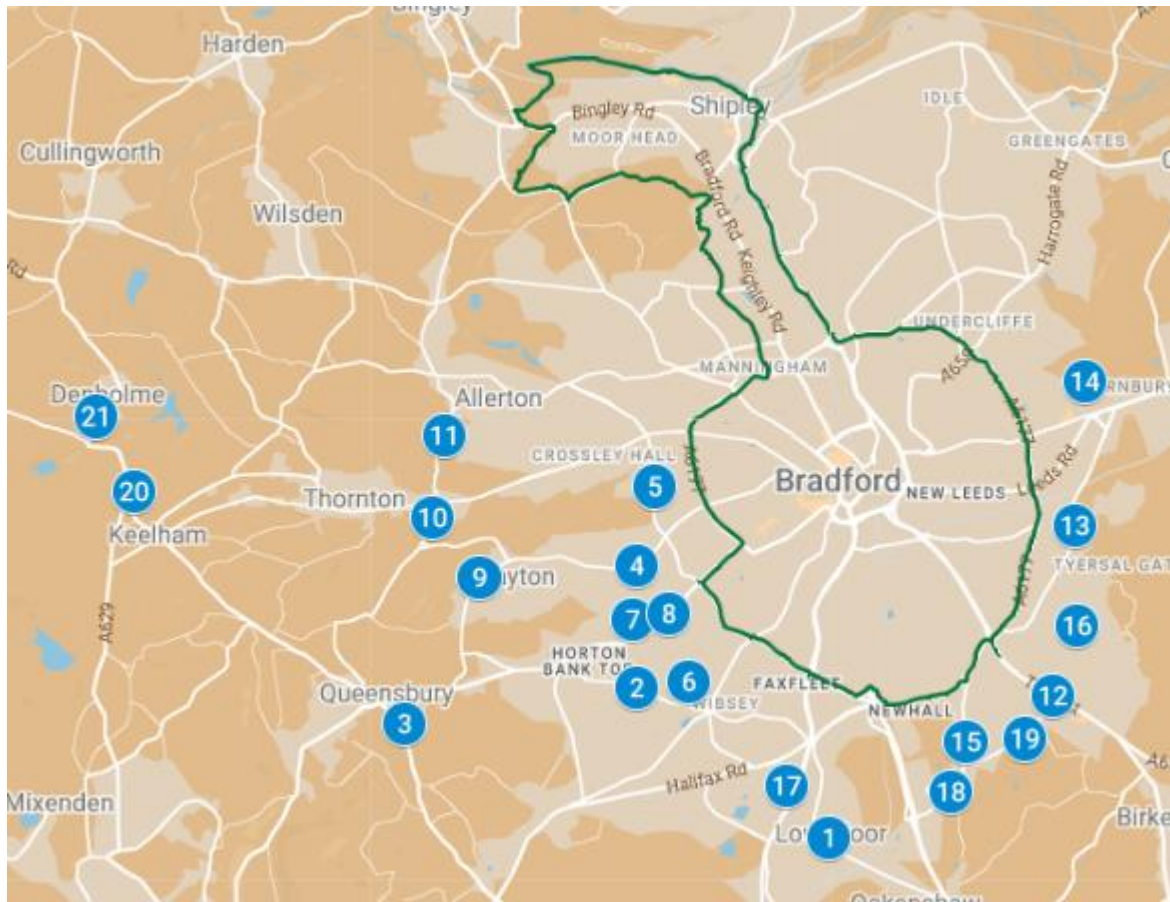
### Methodology

The Clean Air Zone team have worked with Highways to identify sites where displacement may occur. These are routes that could be used by vehicles traversing around the edge of the CAZ, in order to reach their destination without entering the zone.

A map of the CAZ zone can be seen at the following link [Where is the Clean Air Zone? | Bradford Council](#)



The sites where displacement monitoring has taken place are identified in the following map;



Traffic data has been collected at each site for the following;

- One week pre-CAZ
- One week immediately following introduction of the zone
- One week in November ~6 weeks after introduction of the zone.

The data has been collected using a video survey method using wide angled high definition cameras;



## Results

### Automatic traffic counting with cameras

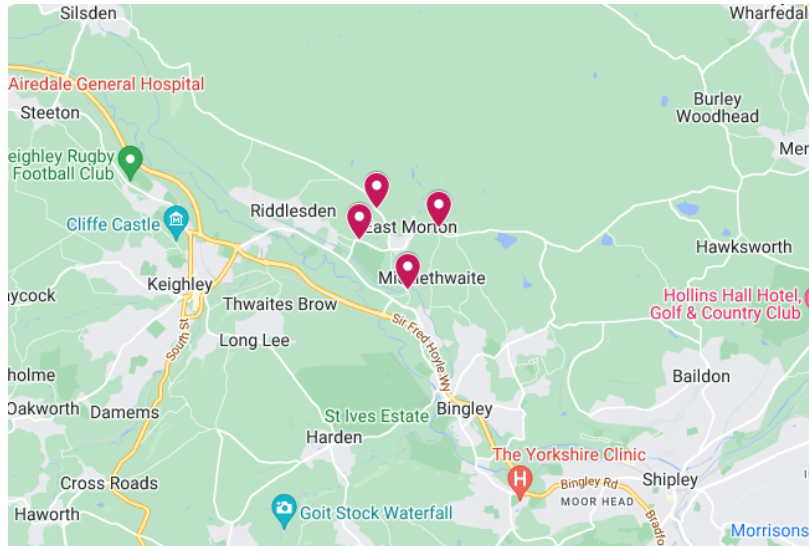
Site	Location	Post CAZ - Nov	
		avg % commercial	+/- % change avg % commercial vehicles (against pre-CAZ Baseline)
Site 1	Cleckheaton Road	23.03%	-0.50%
Site 2	Beacon Road	16.37%	-0.17%
Site 3	Brighouse & Denholme Road	18.07%	+0.68 *
Site 4	Clayton Road	10.11%	-0.55%
Site 5	Cemetery Road	11.52%	-0.01%
Site 6	Moore Avenue	10.42%	-0.79%
Site 7	Hollybank Road	8.97%	-1.01%
Site 8	Gt Horton Road	8.95%	-0.25%
Site 9	The Avenue	13.65%	-0.96%
Site 10	Chat Hill Road	12.91%	-0.35%
Site 11	Allerton Lane	13.41%	-1.25%
Site 12	Tong Street	23.42%	-0.66%
Site 13	Dick Lane	14.66%	-1.50%
Site 14	Gain Lane	10.96%	-1.12%
Site 15	Bierley Lane	14.63%	-1.01%
Site 16	Broadstone Way		Camera stolen **
Site 17	Netherlands Avenue	9.80%	-1.96%
Site 18	Rockhill Lane		Camera stolen **
Site 19	Shetcliffe Lane		Camera stolen **
Site 20	Brighouse Rd		Road Closure
Site 21	Main Road, Denholme	20.91%	-0.51%

\* October data only camera stolen in November

\*\*The Police have made an arrest following the theft of cameras

## Manual Counts

Additional monitoring has also been carried out manually counting traffic at the following additional locations in East Morton post CAZ (21-25<sup>th</sup> November 2022);



This data has been compared to traffic counting collected in 2019 by the department of Transport (DfT). The 2022 data shows a ~9% reduction in traffic volumes when compared with the data collected in 2019.

## **Conclusions**

The CAZ in Bradford applies to older commercial vehicles, these are the only vehicles which are affected by the introduction of the zone. Data from the CAZ Automatic Number Plate Recognition (ANPR) cameras analysed by DVLA indicates that only ~2.5% of vehicles travelling in the zone are chargeable.

The traffic counting undertaken outside the CAZ to ascertain if displacement is occurring indicates the following;

- There is no significant increase in the % of commercial traffic on displacement routes outside of the Clean Air Zone following introduction of the CAZ
- There is a reduction in the overall traffic volumes counted at East Morton compared with data collected by DfT in 2019

These metrics indicates that there is no displacement of commercial vehicles occurring as a result of the introduction of the CAZ, this is evidenced by no increase in the percentage of commercial vehicles in traffic flows at any of the monitoring sites, with the exception of a small increase (0.68%) in Queensbury in the October data. This is in common with other cities who have introduced a Class C Clean Air Zone.