

## **Air Quality and Dust Monitoring Monthly Report – February 2025**

**Solihull Metropolitan Borough Council**



## Department for Transport

High Speed Two (HS2) Limited has been tasked by the Department for Transport (DfT) with managing the delivery of a new national high speed rail network. It is a non-departmental public body wholly owned by the DfT.

High Speed Two (HS2) Limited,  
Two Snowhill  
Snow Hill Queensway  
Birmingham B4 6GA

Telephone: 08081 434 434

General email enquiries: [HS2enquiries@hs2.org.uk](mailto:HS2enquiries@hs2.org.uk)

Website: [www.gov.uk/hs2](http://www.gov.uk/hs2)

A report prepared by EWCs and MWCCs on behalf of HS2 Ltd.

High Speed Two (HS2) Limited has actively considered the needs of blind and partially sighted people in accessing this document. The text will be made available in full on the HS2 website. The text may be freely downloaded and translated by individuals or organisations for conversion into other accessible formats. If you have other needs in this regard please contact High Speed Two (HS2) Limited.

© High Speed Two (HS2) Limited, 2025, except where otherwise stated.

Copyright in the typographical arrangement rests with High Speed Two (HS2) Limited.

This information is licensed under the Open Government Licence v2.0. To view this licence, visit [www.nationalarchives.gov.uk/doc/open-government-licence/version/2](http://www.nationalarchives.gov.uk/doc/open-government-licence/version/2) **OGL** or write to the Information Policy Team, The National Archives, Kew, London TW9 4DU, or e-mail: [psi@nationalarchives.gsi.gov.uk](mailto:psi@nationalarchives.gsi.gov.uk). Where we have identified any third-party copyright information you will need to obtain permission from the copyright holders concerned.



# Monthly Summary

- 1.1.1 This Summary Report is published in fulfilment of commitments detailed in the High Speed Rail (London-West Midlands) Environmental Minimum Requirements, Annex 1: Code of Construction Practice, for the nominated undertaker to present the results of air quality and dust monitoring undertaken in Solihull Metropolitan Borough Council (SMBC) during February 2025.
- 1.1.2 Figures 1 to Figure 3 in Appendix A present the current worksites together with the dust monitoring locations.
- 1.1.3 This summary should be read in conjunction with the overview monitoring report monthly available from [www.gov.uk/government/collections/monitoring-the-environmental-effects-of-hs2](http://www.gov.uk/government/collections/monitoring-the-environmental-effects-of-hs2), which highlights: the applicable standards and guidance, as well as the air quality and dust monitoring methodologies to be implemented by nominated undertakers throughout construction.
- 1.1.4 The current worksites, as presented in Appendix A, Figure 1 to Figure 3, include:

## **Sublot 2B2**

### Waste Lane Overbridge Satellite

- Tunnel excavation works.
- Breaking / cropping piles at M186 overbridge.
- Waste Lane diversion works.

### Carol Green Rail Underbridge

- Joint venture between Bachy Soletache and Balfour Beatty Ground Engineering (SB3) working for rigid inclusion works.
- Redressing the platforms.

## **Sublot 2B3**

### Balsall Common Viaduct

- Installation of bearings and concrete at Balsall Common Viaduct (BCV) Abutment (AB) 0 (Pending cover issue agreement).
- Rebar to Abutment at BCV AB17.
- Concrete to Abutment at BCV AB17.
- Curing for Abutment at BCV AB17.
- Strike shutter / concrete inspection / cover test.

### Park Lane

- M215 Overbridge works.

- Material stockpile and reload.
- Lavender Hall Lane overbridge works.
- M215 overbridge works.
- Parapet installation.

## **Sublot 5S**

### Coleshill Heath Road

- Landscape fill from various sources.
- Fill of Dig and Replace with Stabilisation (Stockpile).
- Ongoing stockpile management.

### Coleshill Heath Road Underbridge

- Fill of Dig and Replace (D&R) with Stabilisation (Stockpile).
- 2 Excavation Phase 1 to PWE South D&R.
- Demobilisation of SB3.
- Pile cropping.
- 2<sup>nd</sup> pour rebar installation.
- 2<sup>nd</sup> pour formwork installation.
- Rebar fixing.
- Excavating concrete pads for 2<sup>nd</sup> pour props.
- SB3 mobilisation.

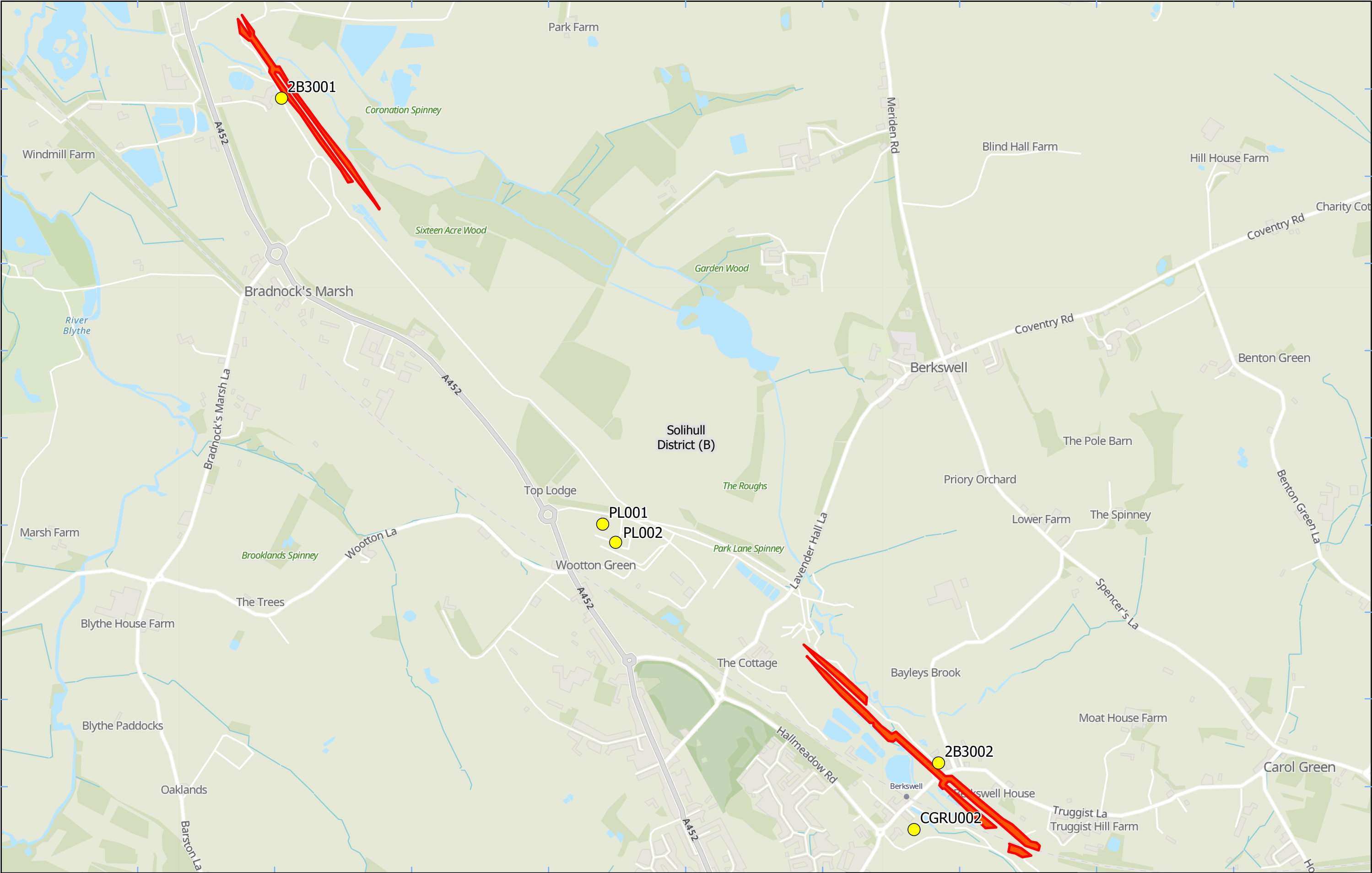
- 1.1.5 Ten (10) dust monitors are installed around these worksites, where works are underway. These sites returned a low to medium dust risk rating.
- 1.1.6 Dust monitoring locations and results are presented in Appendix B, Table 1, together with line charts of monthly data from the dust monitors presented in Figure 4. All continuous dust monitoring is undertaken using indicative monitors. Despite being Environment Agency (MCERTS) certified, indicative monitors carry a higher level of uncertainty than reference monitors, and therefore cannot be strictly compared with Air Quality Standards for human health and the environment. The purpose of the monitoring undertaken is to ensure the effectiveness of the on-site mitigation.
- 1.1.7 The trigger level for PM<sub>10</sub> concentrations of 190 µg/m<sup>3</sup>, over a 1-hour period, in accordance with the updated guidance document '*Guidance on Monitoring in the Vicinity of Demolition and Construction Sites – (October 2018)*' has been applied.
- 1.1.8 Details of the trigger alert investigations and remediations are presented in Appendix B, Table 2.
- 1.1.9 Data capture was below 90% for multiple monitors due to:

- Monitor 2B3001 – A battery refresh was done on 27th February 2025. After this site visit, the power supply issues were resolved.
- Monitor 2B3002 – A battery refresh was done on 18th February 2025. After this site visit, the power supply issues were resolved.
- Monitor CHRU001 – A battery refresh is scheduled for 7th March 2025, and a field calibration is scheduled for 14th March 2025.
- Monitor DLE001 – A battery refresh was done on 20th February 2025. After this site visit, the power supply issues were resolved.
- Monitor DLE002 – A battery refresh was done on 18th February 2025. After this site visit, the power supply issues were resolved.
- Monitor CGRU002 – A calibration was done on 6th February 2025, and a monitor swap out and monitor move were done on 25th February 2025. After these site visits, the monitor issues were resolved.
- Monitor PL002 – A full dust work up is scheduled for 4th March 2025.

1.1.10 There were no (0) complaints received during this reporting period (February 2025).

# Appendix A – Worksites and Monitoring Locations

Figures 1-3: Worksites and Monitoring Locations within SMBC




**Legend**

 Dust Monitor  District Borough Unitary Boundaries

 Worksite

Service Layer Credits: GB Topographic: Contains OS data © Crown Copyright and database right 2025  
Contains data from OS Zoomstack

Map Number
Map Name
<b>Worksite and Monitoring Locations In SMBC (Sheet 1)</b>
<b>Solihull Metropolitan Borough</b>




HS2 Ltd accept no responsibility for any circumstances, which arise from the reproduction of this map after alteration, amendment or abbreviation or if it is issued in part or issued incomplete in any way.

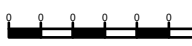
Registered in England. Registration number 06791686.  
Registered office: 2 Snowhill, Queensway,  
Birmingham B4 6GA.

© Crown copyright and database rights 2025.  
Ordnance Survey Licence Number 100049190.

**Doc Number:**



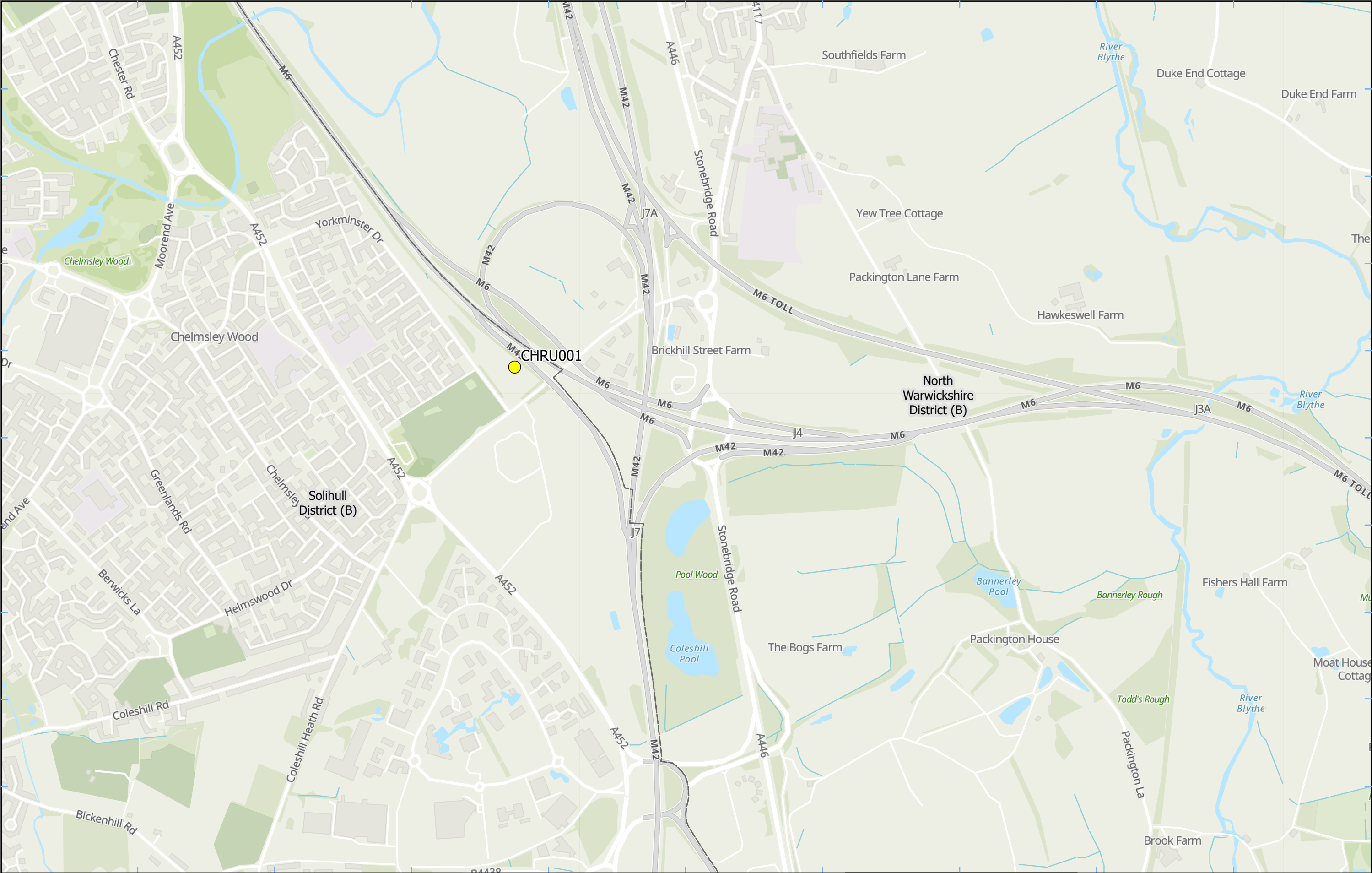
Scale at A3: 1:12,000



Metres

**Date:** 02/04/25





<b>Legend</b> Dust Monitor District Borough Unitary Boundaries	Map Number	 HS2 Ltd accept no responsibility for any circumstances, which arise from the reproduction of this map after alteration, amendment or abbreviation or if it is issued in part or issued incomplete in any way. 
	Map Name	
	Monitoring Locations In SMBC (Sheet 2)	Scale at A3: 1:12,000 
Service Layer Credits: GB Topographic: Contains OS data © Crown Copyright and database right 2023 Contains data from OS Zoomstack	Solihull Metropolitan Borough	Registered in England. Registration number 06791686. Registered office: 2 Snowhill, Queensway, Birmingham B4 6GA. © Crown copyright and database rights 2024. Ordnance Survey Licence Number 100049190. Doc Number:
		Date: 26/03/24





<b>Legend</b> <div><div></div> Dust Monitor</div> <div><div></div> District Borough Unitary Boundaries</div>	Map Number	<div><div>HS2 Ltd accept no responsibility for any circumstances, which arise from the reproduction of this map after alteration, amendment or abbreviation or if it is issued in part or issued incomplete in any way.</div></div> <div><div>Registered in England. Registration number 06791686. Registered office: 2 Snowhill, Queensway, Birmingham B4 6GA.</div><div>© Crown copyright and database rights 2024. Ordnance Survey Licence Number 100049190.</div></div>
	Map Name	
	Monitoring Locations In SMBC (Sheet 3)	Solihull Metropolitan Borough

Service Layer Credits: GB Topographic: Contains OS data © Crown Copyright and database right 2023  
Contains data from OS Zoomstack

## Appendix B – Dust Monitoring Results

Table 1: Dust Monitoring Locations and Results

Monitoring site ID	Coordinates (X,Y)	Location description	Dust risk rating for site	Monitoring site active during period	Change to site since previous period report	Mean 1-hour PM <sub>10</sub> concentration (µg/m <sup>3</sup> )	Minimum 1-hour PM <sub>10</sub> concentration (µg/m <sup>3</sup> )	Maximum 1-hour PM <sub>10</sub> concentration (µg/m <sup>3</sup> )	Number of 1-hour periods exceeding trigger level of 190 µg/m <sup>3</sup>	Data capture Month (%)
2B3001	422322, 280034	Sublot 2B3, at Marsh Farm	M	Yes	No	15.5	0.1	72.2	0	49.7
2B3002	424601, 277729	Sublot 2B3, at Cherry Tree Cottage	M	Yes	No	11.9	0.1	57.1	0	76.0
CHRU001	419300, 286793	Bluebell Drive, Coleshill Heath Road Underbridge	L	Yes	No	11.3	0.1	50.2	0	82.6
PL001	423436, 278557	Park Lane	M	Yes	No	15.9	0.2	65.3	0	100.0
PL002	423481, 278494	Final Home, Park Lane	M	Yes	No	16.6	0.1	93.4	0	76.2
DLE001	421035, 281818	Diddington Lane	M	Yes	No	14.0	0.2	55.1	0	76.0
DLE002	421139, 282222	Hampton Hill Farmhouse	M	Yes	No	12.3	0.2	95.2	0	74.3
BIS001	420284, 283503	Hollywell Brook	M	Yes	No	18.6	0.2	294.0	3	100.0
CGRU002	424516, 277498	Annora House	M	Yes	No	2.6	0.1	41.2	0	81.8

Monitoring site ID	Coordinates (X,Y)	Location description	Dust risk rating for site	Monitoring site active during period	Change to site since previous period report	Mean 1-hour PM <sub>10</sub> concentration (µg/m <sup>3</sup> )	Minimum 1-hour PM <sub>10</sub> concentration (µg/m <sup>3</sup> )	Maximum 1-hour PM <sub>10</sub> concentration (µg/m <sup>3</sup> )	Number of 1-hour periods exceeding trigger level of 190 µg/m <sup>3</sup>	Data capture Month (%)
BBE001	421656, 281313	Patrick Farmhouse	M	Yes	No	16.0	0.1	48.0	0	95.5

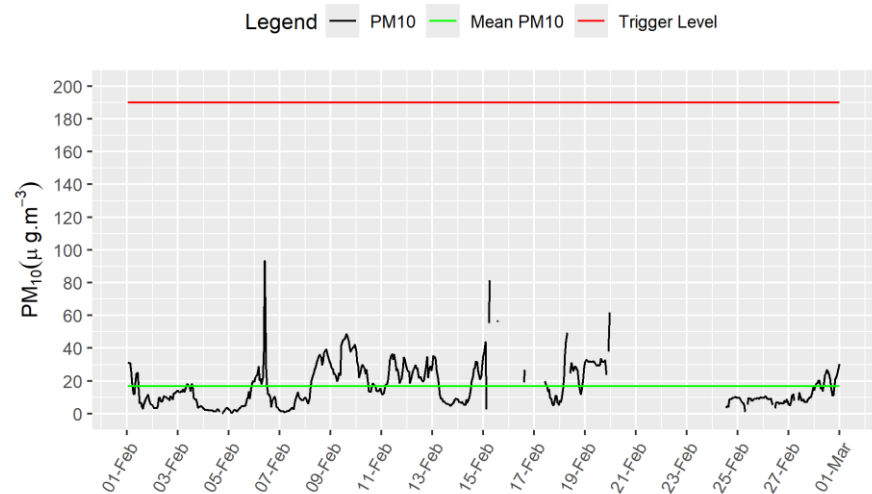
Table 2: Summary of exceedances during period (February 2025)

Monitoring site ID	Period exceeding trigger level	Investigation	Outcomes / Resolution / Remedial measures implemented
BIS001	01/02/2025 16:01 – 17:00; 294 µg/m <sup>3</sup> 17:01 – 18:00; 244 µg/m <sup>3</sup> 18:01 – 19:00; 197 µg/m <sup>3</sup>	There were no relevant site activities happening near the monitor at the time of the exceedances, so these exceedances are not considered to be associated with current HS2 construction works.	N/A

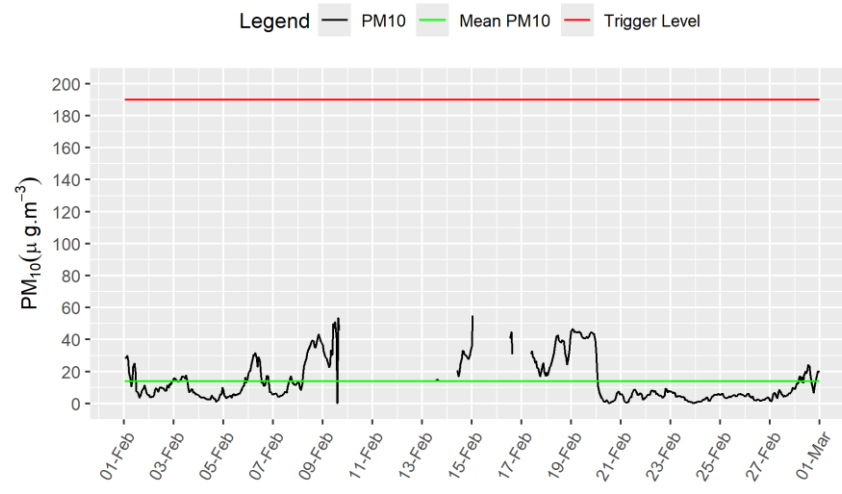
Figure 4: Construction dust 1-hour mean indicative PM<sub>10</sub> concentration for all dust monitors



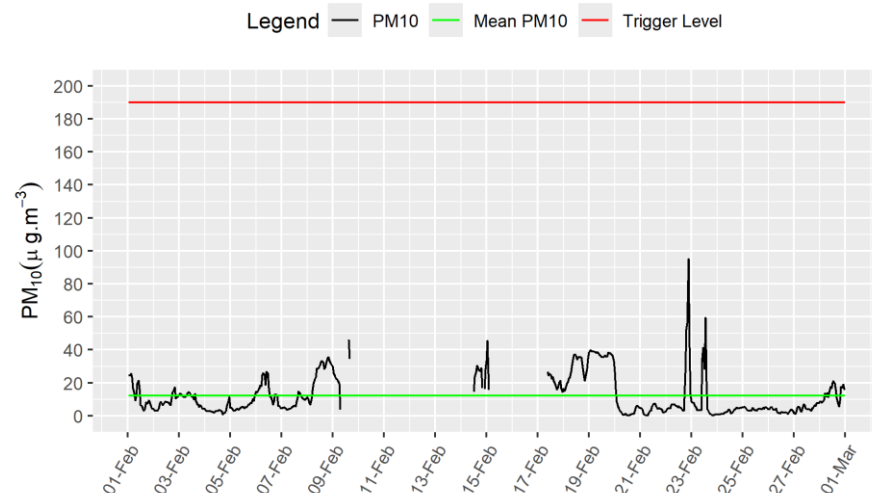
PL002



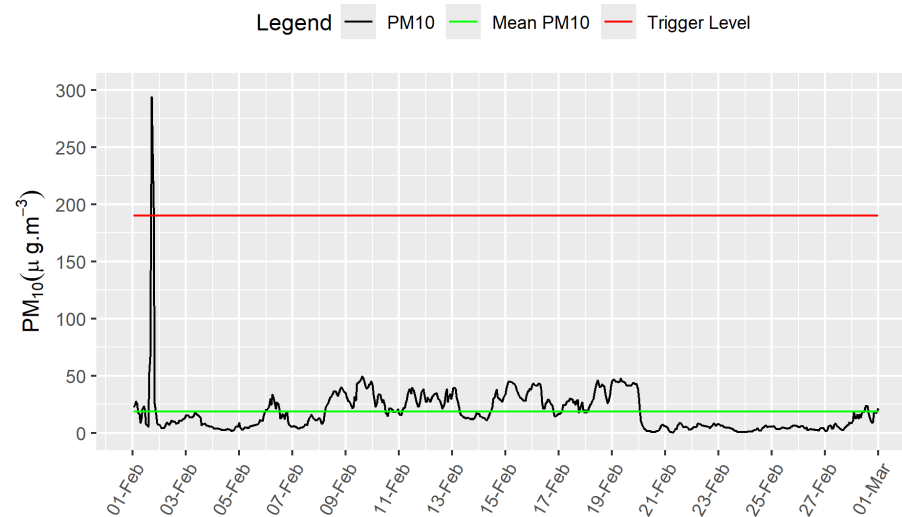
DLE001



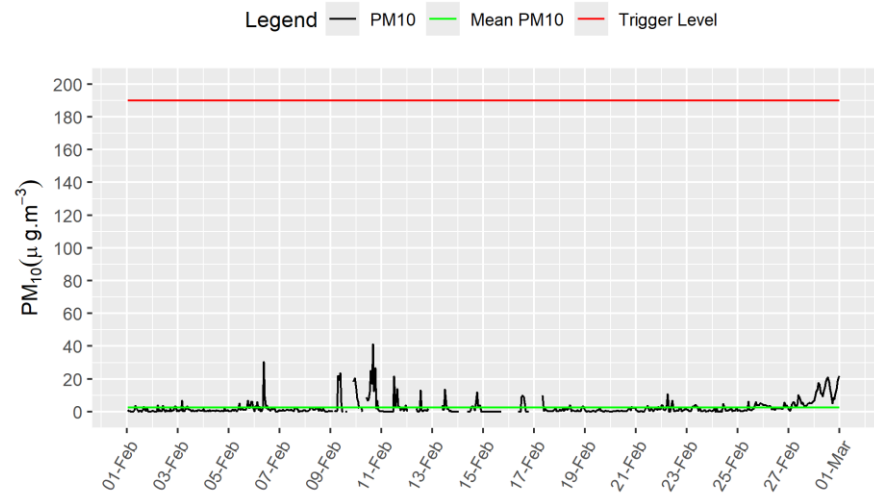
DLE002



BIS001



CGRU002



BBE001

