

Appendix 9C

Air Quality Automatic and Passive Monitoring Data

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Volume

0001

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- 9.1.1 The details of automatic monitoring undertaken by the six local authorities within the air quality Baseline Study Area (1km from the Draft Order Limits) are detailed in Table **9C 1.1**. Summary of the monitoring results for NO₂, and PM₁₀ are presented in Table **9C 1.2** and Table **9C 1.3**.
- 9.1.2 A summary of the passive monitoring locations and NO₂ passive monitoring data is presented in Table **9C 1.4** and Table **9C 1.5**.

Table 9C 1.1 Automatic monitoring site location and details

Local Authority	Site ID	Site Name	Site Type	X	Y	Pollutants monitored	In AQMA?	Monitoring technique	Distance to relevant exposure (m)	Distance to nearest road (m)	Inlet height (m)
Cheshire West and Chester	FMH	Frodsham	Urban Background	352445	378031	NO ₂ , PM ₁₀	No	Chemiluminescent, TEOM	24.0	7.0	2.5
Cheshire West and Chester	TLP	Thornton-le-Moors, Park Road	Industrial	344103	374330	NO ₂ , PM ₁₀ , SO ₂	Yes	Chemiluminescent UV-fluorescent BAM	38.0	N/A	2.5
St Helens	LW	St Helens Linkway	Roadside	350815	395260	NO ₂ , PM ₁₀	Yes	Chemiluminescent; BAM	165.0	5.4	2.4
St Helens	BR	St Helens Borough Road	Roadside	350403	394961	NO ₂	Yes	Chemiluminescent	23.0	2.5	1.5
Warrington	CM3	Chester Road	Roadside	360331	386454	NO ₂	Yes	Chemiluminescent	1.0	2.0	1.5

Table 9C 1.2 Annual mean NO₂ concentrations (µg/m³) monitoring at automatic monitoring sites within 1km of the Site boundary

Local Authority	Site ID	2018	2019	2020	2021	2022
Cheshire West and Chester	FMH	14.0 (0)	15.0 (0)	13.0 (0)	15.0 (0)	14.0 (0)
Cheshire West and Chester	TLP	13.0 (0)	13.0 (0)	9.0 (0)	11.0 (0)	11.0 (0)
St Helens	LW	33.0 (0)	33.0 (0)	25.0 (0)	26.0 (0)	28.0 (0)
St Helens	BR	30.0 (0)	29.0 (0)	26.0 (0)	24.0 (0)	25.0 (0)
Warrington	CM3	30.0 (0)	30.0 (1)	22.0 (0)	23.0 (0)	24.0 (0)
Notes: Results in brackets () show the number of 1-hour periods where concentrations greater than 200µg/m ³ have been recorded.						

Table 9C 1.3 Annual mean PM₁₀ concentrations (µg/m³) monitoring at automatic monitoring sites within 1km of the Site boundary

Local Authority	Site ID	2018	2019	2020	2021	2022
Cheshire West and Chester	FMH	16.0	15.0	12.0	13.0	15.0
Cheshire West and Chester	TLP	13.0	14.0	13.0	13.0	13.0
St Helens	LW	18.0	20.0	18.0	18.0	19.0

Table 9C 1.4 Diffusion tube sites location and details

Local Authority	Site ID	Site Name	Site Type	X	Y	In AQMA?	Distance to relevant exposure (m)	Distance to nearest road (m)	Inlet height (m)
Cheshire West and Chester	CFL	Church St Frodsham	Roadside	351762	377862	No	4.8	1.0	2.2
Cheshire West and Chester	DA	453 London Rd, Davenham	Roadside	365953	371113	No	0.1	1.6	2.0

Local Authority	Site ID	Site Name	Site Type	X	Y	In AQMA?	Distance to relevant exposure (m)	Distance to nearest road (m)	Inlet height (m)
Cheshire West and Chester	FH	72 High St Frodsham	Roadside	352146	378139	Yes	0.2	2.0	2.5
Cheshire West and Chester	FJ	Fluin Lane (r/o 76 Chester Rd).	Roadside	352171	378140	Yes	0.5	2.0	2.5
Cheshire West and Chester	FM	Fluin Lane (r/o 10 Manor Fm Ct)	Roadside	352189	378094	Yes	0.3	2.0	2.5
Cheshire West and Chester	FRC	Rock Cottage, Frodsham (67)	Roadside	352023	378121	No	1.3	1.6	2.5
Cheshire West and Chester	FT	Fluin Lane (terrace)	Roadside	352176	378105	Yes	0.2	1.7	2.0
Cheshire West and Chester	MUL	1 Mulberry Close, Elton	Roadside	346258	375321	No	0.0	27.0	2.0
St Helens	7, 10,31	160 Southworth Road	Roadside	350403	394961	No	10.0	3.2	2.0

Local Authority	Site ID	Site Name	Site Type	X	Y	In AQMA?	Distance to relevant exposure (m)	Distance to nearest road (m)	Inlet height (m)
St Helens	13	22 Union Bank Lane	Roadside	352391	390301	No	0.0	7.6	1.8
St Helens	18, 22	Linkway Monitor	Roadside	350815	395265	Yes	165.0	5.4	2.4
St Helens	19, 24	55 Borough Road	Roadside	350438	395005	Yes	0.0	2.6	2.3
St Helens	28	206 Borough Road	Roadside	350156	394848	Yes	0.0	6.4	1.9
St Helens	29	25 Prescot Road	Roadside	350456	395135	No	0.0	1.9	2.4
St Helens	30	4 Union Bank Lane	Roadside	352262	390226	No	0.0	7.5	1.9
St Helens	33	Warrington Road, Rainhill Stoops	Roadside	350386	389936	No	5.1	11.9	1.9
Warrington	DT12	WA85 Old Liverpool Road 4	Roadside	359430	387947	No	4.0	2.0	2.5
Warrington	DT13	WA68 Chester Road	Roadside	360648	387388	Yes	3.0	3.0	2.5
Warrington	DT14	WA93 Walton Terrace	Roadside	360450	386052	Yes	3.0	2.0	2.5
Warrington	DT15	WA76 Wilderspool Causeway	Roadside	360880	387247	Yes	2.5	2.5	2.5

Local Authority	Site ID	Site Name	Site Type	X	Y	In AQMA?	Distance to relevant exposure (m)	Distance to nearest road (m)	Inlet height (m)
Warrington	DT16	WA118 Wilderspool Causeway 3	Roadside	361220	386874	Yes	10.0	3.0	2.5
Warrington	DT17	WA94 Wilderspool Causeway 2	Roadside	361319	386508	Yes	0.0	2.0	2.5
Warrington	DT18	WA90 Stockton Heath 3	Roadside	361470	385981	No	3.0	2.0	2.5
Warrington	DT19	WA135 Grappenhall Rd	Roadside	361537	386122	No	5.0	4.0	2.5
Warrington	DT20	WA136 Walton Rd	Roadside	361336	385956	No	1.0	1.5	2.5
Warrington	DT21	WA77 Knutsford Road 1	Roadside	361898	387430	Yes	0.0	3.0	2.5
Warrington	DT22	WA92 Kingsway South (Latchford)	Roadside	362810	387187	Yes	0.0	3.0	2.5
Warrington	DT23	WA105 Latchford Village 2	Roadside	362779	387288	Yes	1.0	1.5	2.5
Warrington	DT24	WA115 Latchford Village 3	Roadside	362604	387222	Yes	1.0	1.5	2.5

Local Authority	Site ID	Site Name	Site Type	X	Y	In AQMA?	Distance to relevant exposure (m)	Distance to nearest road (m)	Inlet height (m)
Warrington	DT36	WA141 Grange Avenue 1	Roadside	362469	387781	No	5.0	2.7	2.5
Warrington	DT37	WA142 Grange Avenue 2	Roadside	362446	387337	No	7.5	1.5	2.5
Warrington	DT38	WA143 Kingsway South 2	Roadside	362779	387627	Yes	9.0	1.0	2.5
Warrington	DT39	WA144	Roadside	360854	386674	No	8.0	4.8	2.5
Warrington	DT40	WA145 Gainsborough Road 2	Roadside	360411	386506	No	9.0	3.5	2.5
Cheshire East	CE65	Intack Farm, Intack Lane, High Legh	Other	367000	383414	No	0.1	6.9	1.5

Table 9C 1.5 Annual mean NO₂ concentrations (µg/m³) monitoring at diffusion tube sites within 1km of the Site boundary

Local Authority	Site ID	Site Name	2018	2019	2020	2021	2022
Cheshire West and Chester	CFL	Church St Frodsham	30.5	29.9	21.6	23.3	22.8
Cheshire West and Chester	DA	453 London Rd, Davenham	-	19.1	14.9	15.8	16.3
Cheshire West and Chester	FH	72 High St Frodsham	38.5	36.9	27.4	28.8	28.2
Cheshire West and Chester	FJ	Fluin Lane (r/o 76 Chester Rd).	38.2	36.9	28.6	28.3	28.4
Cheshire West and Chester	FM	Fluin Lane (r/o 10 Manor Fm Ct)	35.0	29.4	24.3	28.5	27.5
Cheshire West and Chester	FRC	Rock Cottage, Frodsham (67)	34.0	31.0	24.3	25.6	23.9
Cheshire West and Chester	FT	Fluin Lane (terrace)	32.1	29.8	23.7	24.1	24.3

Local Authority	Site ID	Site Name	2018	2019	2020	2021	2022
Cheshire West and Chester	MUL	1 Mulberry Close, Elton	-	16.8	13.4	14.2	14.0
St Helens	7, 10,31	160 Southworth Road	34.9	31.4	31.5	36.5	27.8
St Helens	13	22 Union Bank Lane	24.4	22.2	19.0	22.5	17.0
St Helens	18, 22	Linkway Monitor	30.4	30.7	25.4	30.8	27.1
St Helens	19, 24	55 Borough Road	48.1	44.3	42.7	49.7	40.5
St Helens	28	206 Borough Road	25.7	25.2	22.1	27.3	21.7
St Helens	29	25 Prescot Road	25.5	25.6	21.4	25.9	21.4
St Helens	30	4 Union Bank Lane	20.7	19.8	17.4	20.4	16.4
St Helens	33	Warrington Road, Rainhill Stoops	33.4	30.7	27.1	30.4	26.1

Local Authority	Site ID	Site Name	2018	2019	2020	2021	2022
Warrington	DT12	WA85 Old Liverpool Road 4	35.5	31.7	26.2	28.2	24.9
Warrington	DT13	WA68 Chester Road	36.6	34.1	25.5	28.6	26.3
Warrington	DT14	WA93 Walton Terrace	34.5	31.4	26.1	25.2	23.6
Warrington	DT15	WA76 Wilderspool Causeway	31.0	28.8	22.0	24.5	22.0
Warrington	DT16	WA118 Wilderspool Causeway 3	30.1	29.7	20.6	24.3	22.7
Warrington	DT17	WA94 Wilderspool Causeway 2	33.7	30.6	21.2	24.8	20.2
Warrington	DT18	WA90 Stockton Heath 3	27.5	25.1	17.7	21.0	18.5
Warrington	DT19	WA135 Grappenhall Rd	-	-	18.1	21.1	-

Local Authority	Site ID	Site Name	2018	2019	2020	2021	2022
Warrington	DT20	WA136 Walton Rd	-	-	21.7	24.1	-
Warrington	DT21	WA77 Knutsford Road 1	30.2	29.9	21.5	25.1	23.0
Warrington	DT22	WA92 Kingsway South (Latchford)	35.2	32.5	22.9	29.0	26.5
Warrington	DT23	WA105 Latchford Village 2	39.9	34.8	26.5	31.0	28.9
Warrington	DT24	WA115 Latchford Village 3	33.7	31.0	22.2	26.8	22.7
Warrington	DT36	WA141 Grange Avenue 1	-	-	-	-	15.0
Warrington	DT37	WA142 Grange Avenue 2	-	-	-	-	17.6

Local Authority	Site ID	Site Name	2018	2019	2020	2021	2022
Warrington	DT38	WA143 Kingsway South 2	-	-	-	-	22.5
Warrington	DT39	WA144	-	-	-	-	16.5
Warrington	DT40	WA145 Gainsborough Road 2	-	-	-	-	17.4
Cheshire East	CE65	Intack Farm, Intack Lane, High Legh	35.7	27.2	20.5	22.6	20.7

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