TO-15 Low Level Method, MDL and RL

The TO-15 Low Level Method is used to achieve the lowest possible MDL for the TO-15 compounds by full scan, and is used for samples in the range of 0.1 ppbv to 5 ppbv, The detection limits listed are for clean, ambient air samples that have no matrix effects, or canister dilution factor.

	CAS	Compound	MDL ppbV	RL ppbv	MDL ug/m3	RL ug/m3
1	75-71-8	Dichlorodifluoromethane	0.10	0.25	0.50	1.24
2	74-87-3	Chloromethane	0.10	0.25	0.21	0.52
3	76-14-2	Freon 114	0.10	0.25	0.70	1.75
4	75-01-4	Vinyl chloride	0.10	0.25	0.26	0.64
5	106-99-0	1,3-Butadiene	0.10	0.25	0.22	0.55
6	74-83-9	Bromomethane	0.10	0.25	0.39	0.97
7	75-00-3	Chloroethane	0.10	0.25	0.26	0.66
8	75-69-4	Trichlorofluoromethane	0.10	0.25	0.56	1.41
9	67-64-1	Acetone	0.10	0.25	0.24	0.60
10	75-35-4	1,1-Dichloroethene	0.10	0.25	0.40	0.99
11	76-13-1	Freon 113	0.10	0.25	0.77	1.92
12	107-05-1	Allyl chloride	0.10	0.25	0.31	0.78
13	75-09-2	Methylene Chloride	0.10	0.25	0.35	0.87
14	75-15-0	Carbon disulfide	0.10	0.25	0.31	0.78
15	156-60-5	trans-1,2-Dichloroethene	0.05	0.13	0.20	0.50
16	1634-04-4	Methyl tert butyl ether	0.05	0.13	0.18	0.45
17	75-34-3	1,1-Dichloroethane	0.10	0.25	0.41	1.01
18	108-05-4	Vinyl acetate	0.10	0.25	0.35	0.88
19	78-93-3	2-Butanone	0.10	0.25	0.30	0.74
20	110-54-3	Hexane	0.05	0.13	0.18	0.44
21	141-78-6	Ethyl acetate	0.10	0.25	0.36	0.90
22	109-99-9	Tetrahydrofuran	0.10	0.25	0.30	0.74
23	156-59-2	cis-1,2-Dichloroethene	0.10	0.25	0.40	0.99
24	67-66-3	Chloroform	0.10	0.25	0.49	1.22
25	71-55-6	1,1,1-Trichloroethane	0.10	0.25	0.55	1.37
26	107-06-2	1,2-Dichloroethane	0.10	0.25	0.41	1.01
27	563-58-6	1,1-Dichloropropene	0.05	0.13	0.23	0.57
28	110-82-7	Cyclohexane	0.05	0.13	0.17	0.43
29	71-43-2	Benzene	0.10	0.25	0.32	0.80
30	56-23-5	Carbon tetrachloride	0.10	0.25	0.63	1.58
31	540-84-1	2,2,4-Trimethylpentane	0.05	0.13	0.23	0.59
32	142-82-5	n-Heptane	0.05	0.13	0.21	0.51
33	78-87-5	1,2-Dichloropropane	0.10	0.25	0.46	1.16

	CAS	Compound	MDL ppbV	RL ppbv	MDL ug/m3	RL ug/m3
34	123-91-1	1,4 Dioxane	0.20	0.50	0.72	1.81
35	79-01-6	Trichloroethene	0.10	0.25	0.54	1.35
36	75-27-4	Bromodichloromethane	0.05	0.13	0.34	0.84
37	108-10-1	4-Methyl-1-pentanone	0.05	0.13	0.21	0.51
38	10061-01-5	cis-1,3-Dichloropropene	0.10	0.25	0.45	1.14
39	108-88-3	Toluene	0.10	0.25	0.38	0.94
40	10061-02-6	trans-1,3-Dichloropropene	0.10	0.25	0.45	1.14
41	79-00-5	1,1,2-Trichloroethane	0.10	0.25	0.55	1.37
42	591-78-6	2-Hexanone	0.05	0.13	0.21	0.51
43	142-28-9	1,3-Dichloropropane	0.05	0.13	0.23	0.58
44	124-48-1	Dibromochloromethane	0.05	0.13	0.43	1.07
45	106-93-4	1,2-Dibromoethane	0.10	0.25	0.77	1.93
46	127-18-4	Tetrachloroethene	0.05	0.13	0.34	0.85
47	108-90-7	Chlorobenzene	0.10	0.25	0.46	1.15
48	100-41-4	Ethylbenzene	0.10	0.25	0.44	1.09
49	1330-20-7	m,p-Xylene	0.10	0.25	0.44	1.09
50	100-42-5	Styrene	0.10	0.25	0.43	1.07
51	75-25-2	Bromoform	0.02	0.06	0.26	0.64
52	95-47-6	o-Xylene	0.10	0.25	0.44	1.09
53	79-34-5	1,1,2,2-Tetrachloroethane	0.05	0.13	0.34	0.86
54	96-18-4	1,2,3-Trichloropropane	0.05	0.13	0.30	0.76
55	622-96-8	4-Ethyltoluene	0.05	0.13	0.25	0.62
56	108-67-8	1,3,5-Trimethylbenzene	0.10	0.25	0.49	1.23
57	95-63-6	1,2,4-Trimethylbenzene	0.10	0.25	0.49	1.23
58	541-73-1	1,3-Dichlorobenzene	0.05	0.13	0.30	0.75
59	100-44-7	Benzyl chloride	0.05	0.13	0.26	0.65
60	106-46-7	1,4-Dichlorobenzene	0.05	0.13	0.30	0.75
61	95-50-1	1,2-Dichlorobenzene	0.05	0.13	0.30	0.75
62	120-82-1	1,2,4-Trichlorobenzene	0.1	0.25	0.74	1.86
63	87-68-3	Hexachlorobutadiene	0.1	0.25	1.1	2.67