

**Combined uncertainty in the theoretical values (%) for the EMEP laboratory intercomparison Round 42**

Sample type G	H+	SO <sub>4</sub> -S	NO <sub>3</sub> -N	Na	NH <sub>4</sub> -N	Cl	Mg	Ca	K	pH	Cond.
G1	0.31	0.57	0.25	0.24	0.16	0.21	0.21	0.43	0.16	0.31	0.30
G2	0.34	0.64	1.10	0.21	1.08	0.15	0.21	0.50	0.15	0.34	0.43
G3	0.65	0.89	0.77	0.22	0.74	0.14	0.21	0.57	0.15	0.65	0.44
G4	0.69	0.94	0.24	0.19	0.14	0.15	0.21	0.61	0.15	0.69	0.30

Sample type H	As	Cd	Cr	Cu	NI	Pb	Zn
H1	0.56	0.62	0.52	0.52	0.52	0.57	0.55
H2	0.73	0.64	0.47	0.71	0.84	0.46	1.11
H3	0.47	0.51	0.63	0.73	0.88	0.63	0.71
H4	0.57	0.52	0.52	0.68	0.36	0.52	0.54

Sample type B	SO <sub>2</sub>	HNO <sub>3</sub>
B1	2.2	1.9
B3	1.3	1.4
B4	1.3	1.2
B5	1.7	1.8

Sample type C	NO <sub>2</sub>
C1	0.26
C2	0.33
C3	0.24
C4	0.47

Sample type J	NH <sub>3</sub>
J2	1.1
J3	1.1
J4	2.2
J5	1.7