

2010-01 DMS duplicates

Variability is assessed as the Relative % Difference.

No duplicates were rejected during this cruise.

See 2010-01_DMS_report.pdf for further details.

Precision statement for replicate samples drawn from a single Niskin bottle:

The pooled standard deviation for Dimethyl_Sulphide: Bottle for the range 0.22 to 0.78 nmol/l was 0.021,
k = 5 (0 outlier removed) where k is the number of pairs of duplicates.

The pooled standard deviation of pairs of samples (Sp) was calculated by:

$$Sp = \text{SQRT}\{\text{sum}(d^2)/2k\}$$

where k is the number of pairs and d is the difference between pairs.

Duplicate samples from a single Niskin bottle

Event Number	Sample Number	Station	Pressure dbar	DMS 1 nmol/l	DMS 2 nmol/l	Relative % Difference	Rejected yes / no
3	19	P2	20.6	0.22	0.22	0.0	
7	41	P4	20.6	0.24	0.24	0.0	
15	140	P12	19.5	0.78	0.75	3.9	
23	214	P16	19.2	0.29	0.35	18.8	no
37	347	P20	20.3	0.45	0.46	2.2	