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Supplementary Materials

Au and Te Minerals in Seafloor Massive Sulphides from Semyenov-2 Hydrothermal Field, Mid-Atlantic Ridge

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Received: 4 March 2019; Accepted: 10 May 2019; Published: 14 May 2019

Table S2. Chemistry of SMS Samples from Semyenov-2 Hydrothermal Field.

Sample	S, wt%	Fe	Cu	Zn	SiO_2	CaO	MgO	Pb, ppm	Cd	Ag	Au	Te
293-T-1	13.85	7.9	55.0	0.023	5.48	0.31	0.31	50	<2	11	0.75	28.8
293-T-1/2	13.97	3.88	41.9	0.014	27.92	0.03	0.13	150	<2	41	2.86	14.8
277-T-2	11.8	16.72	44.4	0.43	1.08	0.02	0.04	26	10	23	2.55	12.3
277-T-3	32.3	15.11	48.98	0.21	0.55	0.29	0.33	472	11	60	4.43	81
277-T-3/1	17.66	22.04	38.6	0.15	1.26	0.08	0.08	109	3	11	3.66	73
277-T-5	13.56	12.73	47.26	0.15	1.3	0.02	0.02	10	4	170	4.46	56.6
277-T-6	10.57	17.01	49.6	0.3	0.98	0.02	0.03	8	7	12	1.57	47.4
277-T-7	27.81	13.44	38.97	0.17	14.48	0.05	0.16	106	12	58	4.66	96
277-T-7/1	16.94	9.09	41.6	0.25	15.1	0.21	0.1	141	10	73	2.41	55.4
277-T-9	11.11	16.18	45.8	0.18	0.5	0.06	0.04	11	4	23	0.66	67.5
277-T-9/1a	18.8	15.22	50.28	0.23	1.01	0.02	0.04	6	3	17	1.36	58.2
277-T-9/2	19.22	11.38	43.5	0.24	1.22	0.06	0.03	15	6	53	2.5	63.8
277-T-4	15.93	23.6	36.3	1.22	1.28	0.02	0.03	10	28	10	14.4	55.7
277-T-4b	13.2	21.34	30.1	0.69	1.31	0.02	0.02	6	4	3	5.76	58.8
277-T-8	12.47	17.07	44.2	1.12	1.64	0.06	0.32	50	18	36	10.1	56.9
275-T-1	27.68	21.32	23.84	8.44	12.56	0.08	0.18	240	280	127	22.26	28
287-M-1/1	21.05	12.11	11.15	23.19	29.31	0.06	0.07	640	750	464	32.9	20.4
287-M-1/1a	21.12	13.04	12.13	19.21	29.49	0.11	0.1	820	590	278	15.6	22

287-B-1	28.52	24.08	19.65	8.04	13.8	<0.01	0.05	110	280	158	17.1	24.7
287-B-1/1	28.22	18.24	16.98	20.84	14.24	<0.01	0.05	190	870	470	60.5	28.3
287-B-1/2	30.17	21.28	16.58	12.82	13.94	<0.01	0.04	165	485	254	40.2	25.1
287-T-1a	2.53	13.18	4.02	2.73	17.78	24.4	2.2	3700	75	1820	128	24.1
287-T-1	5.07	8.82	7.98	7.87	16.25	8.28	2.7	1100	165	1180	188	23.3
240-T-1	8.14	22.4	26.4	1.26	6.46	3.08	0.43	17	15	108	0.35	25
240-T-2	4.42	6.66	9.8	0.3	2.42	30	0.28	7	3	282	20.6	23
240-M-1	3.1	12.45	7.12	0.65	4.85	30	0.52	40	6	64	4.96	22
240-M-1/1	3.56	17.08	10.04	1.11	8.25	20.2	0.87	80	4	41	8.6	27
293-KA-1	7.05	2.8	37.1	0.021	5.18	24.2	1.56	50	<2	14	1.74	15.6
293-KA-2	2.2	3.35	35.9	0.034	26.63	0.31	1.56	260	<2	6	0.89	14.4
Average	15.2	14.5	30.9	3.9	9.5	5.5	0.42	312	190	207	20.8	40
Lower detection limit	1.0 wt%	0.01 wt%	0.0005 wt%	0.0005 wt%	0.05 wt%	<0.01 wt%	<0.01 wt%	5 ppm	2 ppm	0.2 ppm	0.002 ppm	0.5 ppm
Method	Gravimetric method	Atomic absorption	Atomic absorption	Atomic absorption	Photometric method	Atomic absorption	Atomic absorption	Atomic absorption	Atomic absorption	Atomic absorption	Atomic absorption	ICP-MS