

**Supplementary 3, ESM\_3.** Содержания петрогенных оксидов (мас. %), редких и редкоземельных элементов (ppm) в диоритах Северо-Щигровского массива

Компоненты	3507 /237	3507/ 258.2	3507/ 277.5	3507/ 263.4	3505/ 270	3505/ 278	4122/ 268.7	4122/ 280	4122/ 292.8	4129/ 282	4129/ 335.8
SiO <sub>2</sub>	62.38	62.83	61.24	62.93	58.46	60.70	61.84	62.93	62.89	59.35	55.24
TiO <sub>2</sub>	0.61	0.61	0.60	0.61	0.82	0.66	0.64	0.61	0.62	0.84	0.69
Al <sub>2</sub> O <sub>3</sub>	16.38	15.96	16.25	15.32	16.48	16.61	15.21	15.32	15.18	15.89	14.24
Fe <sub>2</sub> O <sub>3</sub>	6.26	6.51	7.27	6.37	8.79	7.13	7.13	6.37	6.57	7.85	8.81
MgO	2.81	2.86	2.95	2.57	3.56	3.04	3.10	2.57	3.00	3.51	3.80
MnO	0.09	0.09	0.09	0.09	0.11	0.09	0.08	0.09	0.08	0.10	0.10
CaO	4.66	4.31	4.78	5.27	5.39	5.06	3.07	5.27	2.92	5.62	7.43
Na <sub>2</sub> O	3.58	3.39	3.56	3.30	3.23	3.61	3.45	3.30	3.25	3.43	2.90
K <sub>2</sub> O	3.01	3.24	3.02	3.25	2.86	2.87	3.50	3.25	3.16	2.99	2.22
P <sub>2</sub> O <sub>5</sub>	0.22	0.20	0.24	0.28	0.30	0.23	0.22	0.28	0.23	0.42	0.31
П.п.п.	1.24	1.29	1.17	2.70	1.20	0.59	0.80	2.70	0.95	1.46	2.67
Сумма	99.60	99.62	99.61	99.49	99.55	99.58	99.04	99.49	98.85	99.34	98.41
X <sub>Mg</sub>	0.54	0.53	0.53	0.44	0.45	0.52	0.44	0.44	0.45	0.47	0.44
K <sub>2</sub> O/Na <sub>2</sub> O	0.81	1.05	0.84	0.99	0.89	0.85	0.99	0.99	0.97	0.87	0.76
K <sub>2</sub> O+Na <sub>2</sub> O	6.59	6.63	6.57	6.55	6.10	6.47	6.95	6.55	6.41	6.42	5.12
A/CNK	0.86	0.82	0.86	0.83	0.90	0.80		0.83		0.83	
Li	20.0	17.0	19.5	25.8	23.8	23.0		35.8		18.0	
Be	1.5	1.5	1.3	1.4	1.3	1.3		1.3		1.8	
Sc	12.4	6.4	11.6	13.3	17.2	16.2		12.5		17.3	
V	91.2	72.4	107	99.6	163	107		116		149	
Cr	15.2	10.9	14.9	10.7	24.5	19.3		12.6		37.5	
Co	13.7	10.0	15.3	16.6	22.1	20.5		16.2		19.9	
Ni	19.6	14.8	20.8	14.5	32.0	29.2		18.0		36.7	
Cu	14.5	16.8	20.4	38.5	19.6	12.6		18.2		43.0	
Zn	70.3	40.2	63.5	58.9	94.2	86.2		69.3		119	
Ga	20.2	22.3	18.1	16.7	19.3	19.5		18.5		18.3	
Rb	62.5	46.8	78.8	90.3	78.0	75.0		66.3		78.3	
Sr	695	573	710	698	781	772		730		897	
Y	24.1	12.6	15.5	24.0	27.4	24.5		24.0		33.9	
Zr	157	162	142	223	220	243		220		312	
Nb	11.3	6.4	6.9	12.2	12.8	9.9		11.8		14.4	
Mo	0.90	0.48	1.0	1.0	0.72	0.50		0.59		1.5	
Cs	1.8	1.7	2.3	2.5	1.8	1.6		5.4		1.5	
Ba	1242	1122	1205	1270	1460	1460		1426		1496	
La	32.1	28.7	30.6	65.2	41.3	38.0		47.9		45.3	
Ce	63.0	49.9	57.7	109	89.0	76.6		91.2		97.4	
Pr	7.6	5.3	6.2	10.8	10.8	8.9		10.2		10.9	
Nd	30.6	19.6	23.3	38.3	42.8	35.0		36.2		43.0	
Sm	6.2	3.3	4.2	6.2	7.7	6.3		6.4		8.1	
Eu	1.6	1.0	1.2	1.5	2.0	1.7		1.7		2.1	
Gd	5.5	2.9	3.7	5.1	6.5	5.5		5.5		7.0	
Tb	0.83	0.42	0.53	0.74	0.96	0.80		0.77		0.98	
Dy	4.5	2.3	2.9	4.0	5.0	4.5		4.3		5.5	
Ho	0.88	0.45	0.58	0.82	0.98	0.87		0.81		1.1	
Er	2.5	1.3	1.7	2.3	2.9	2.5		2.4		3.1	
Tm	0.34	0.18	0.23	0.33	0.41	0.36		0.34		0.46	
Yb	2.1	1.2	1.6	2.3	2.7	2.3		2.2		3.0	
Lu	0.31	0.19	0.24	0.35	0.40	0.36		0.33		0.45	
Hf	5.2	12.2	4.4	5.9	6.2	6.5		5.0		7.4	
Ta	1.4	0.60	0.50	1.0	1.2	0.68		0.83		1.32	
W	0.26	0.69	0.33	0.47	0.28	0.31		0.42		0.40	
Pb	15.2	12.4	15.2	21.7	13.2	14.1		14.1		17.4	
Bi	0.052	0.051	0.087	0.26	0.064	0.061		0.077		0.14	
Th	4.8	4.8	6.8	13.4	6.3	7.5		7.7		7.8	
U	2.1	1.0	2.3	4.3	2.3	2.8		1.8		4.1	
ΣREE	158.1	116.7	134.7	246.9	213.5	183.7		210.2		228.4	
Eu/Eu*	0.84	0.99	0.93	0.82	0.86	0.88		0.87		0.85	
(Gd/Yb) <sub>n</sub>	2.17	2.00	1.91	1.83	1.99	1.98		2.03		1.93	
(La/Yb) <sub>n</sub>	11.0	17.2	13.7	20.3	11.0	11.9		15.4		10.8	
(La/Sm) <sub>n</sub>	3.34	5.61	4.70	6.79	3.46	3.89		4.81		3.61	
Sr/Y	29	45	46	29	29	32		30		26	