

Table S3.

Textural characteristics of inclusions at eruptive centers HLN2A9, HLN2A6 and HLN2A7.

Melt Inclusion										Bubble	
Sample	Analysis	Crystal Size	Shape ⁽¹⁾	Type ⁽²⁾	Class ⁽³⁾	Sector ⁽⁴⁾	Inc. Axis	Inc. Vol. ⁽⁵⁾	Texture	S.B. (a x b) ⁽⁶⁾	Ratio ⁽⁷⁾
		(μm)					a x b (μm)	cm^3		(μm)	(Vol. %)
HLN2A9											
HLN2A91_1	FTIR+EMP	390 x 389	Spheric	Closed	G3	A3	29.3 x 17.8	4.9E-09	Glassy	8.5 x 7.0	4.5
HLN2A911	FTIR	390 x 389	Spheric	Closed	G3	A3	-	-	Glassy	-	-
HLN2A91_2	FTIR+EMP	390 x 389	Spheric	Closed	G3	A3	22.1 x 18.7	4.1E-09	Glassy	6.1 x 7.2	4.1
HLN2A91_3	EMP	390 x 389	Spheric	Closed	G2	A1	13.6 x 10.2	7.4E-10	Glassy	-	-
HLN2A91_4	FTIR+EMP	390 x 389	Spheric	Closed	G4	A4	14.4 x 9.3	6.6E-10	Glassy	4.6 x 5.1	9.6
HLN2A91_5	FTIR	390 x 389	Spheric	Closed	G3	A2	16.1 x 11.9	1.2E-09	Glassy	3.9 x 4.5	2.7
HLN2A91_6	FTIR	390 x 389	Spheric	Closed	G3	A2	14.4 x 11.0	9.3E-10	Glassy	3.6 x 4.5	4.3
HLN2A91_7	FTIR	390 x 389	Spheric	Closed	G3	A2	18.7 x 13.6	1.8E-09	Glassy	4.4 x 3.2	1.3
HLN2A91_8	FTIR	390 x 389	Spheric	Closed	G2	A1	13.6 x 11.3	9.2E-10	Glassy	-	-
HLN2A91_11	FTIR	390 x 389	Spheric	Closed	G3	A3	12.8 x 10.4	6.0E-10	Glassy	4.8 x 3.9	5.5
HLN2A91_12	FTIR	390 x 389	Spheric	Closed	G3	A3	10.2 x 9.8	4.1E-10	Glassy	4.5 x 3.3	5.1
HLN2A91_13R	FTIR	390 x 389	Spheric	Closed	G4	A5	11.5 x 9.7	9.6E-10	Glassy	4.8 x 3.8	6.6
HLN2A921	FTIR+EMP	325 x 312	Spheric	Closed	G4(?)	-	24.8 x 15.4	3.1E-09	Glassy	8.1 x 7.3	7.3
HLN2A922 (a)	FTIR+EMP	325 x 312	Elipsoidal	Closed	G2	-	21.9 x 14.6	2.5E-09	Opaque	-	-
HLN2A93	FTIR+EMP	226 x 272	Spheric	Closed	G3	-	24.6 x 28.1	1.0E-08	Glassy	7.3 x 6.3	1.5
HLN2A94	FTIR	267 x 170	Spheric	Closed	G3	-	15.9 x 17.8	2.7E-09	Glassy	4.3 x 4.9	2.1
HLN2A95	FTIR	366 x 211	Spheric	Closed	G3	-	24.1 x 19.0	4.6E-09	Glassy	5.6 x 5.9	2.3
HLN2A96	FTIR	307 x 364	Spheric	Closed	G3	-	9.5 x 10.4	5.5E-10	Opaque	2.6 x 2.4	1.5
HLN2A961	FTIR+EMP	307 x 364	Spheric	Closed	G3	Border	9.5 x 10.4	5.5E-10	Opaque	2.6 x 2.4	1.5
HLN2A962	FTIR+EMP	307 x 364	Spheric	Closed	G3	Core	13.3 x 13.8	1.3E-09	Opaque	5.4 x 5.2	5.9
HLN2A963	FTIR	307 x 364	Spheric	Closed	G3	Core	7.5 x 9.2	3.4E-10	Opaque	2.0 x 3.4	3.7
HLN2A964	FTIR+EMP	307 x 364	Irregular	reentrant	G6R	Core	66.6 x 24.5	2.1E-08	Opaque	-	-
HLN2A965	FTIR+EMP	307 x 364	Irregular	reentrant	G6R	Core	49.1 x 22.9	1.4E-08	Opaque	-	-
HLN2A971	EMP	260 x 336	Spheric	Closed	G3	Core ring	17.5 x 12.3	1.4E-09	Opaque	4.2 x 3.9	2.4
HLN2A972	FTIR+EMP	260 x 336	Spheric	Closed	G3	Core ring	9.4 x 9.9	4.9E-10	Opaque	3.4 x 3.1	3.7
HLN2A973	FTIR+EMP	260 x 336	Spheric	Closed	G3	Core ring	10.4 x 11.8	7.6E-10	Glassy	3.6 x 5.8	8.8
HLN2A974	FTIR+EMP	260 x 336	Irregular	Closed	G2	Core ring	11.3 x 8.7	4.6E-10	Opaque	-	-
HLN2A99	FTIR+EMP	421 x 205	Spheric	Closed	G3	-	45.1 x 32.9	2.6E-08	Glassy	10.6 x 10.1	2.3
HLN2A992	EMP	421 x 205	Spheric	Closed	G3	-	45.1 x 32.5	2.6E-08	Glassy	10.6 x 10.2	2.3
HLN2A993	EMP	421 x 205	Elipsoidal	Closed	G3	-	8.2 x 5.1	1.1E-10	Glassy	1.9 x 2.7	6.6
HLN2A994	FTIR	421 x 205	Spheric	Closed	G2	-	7.06 x 5.9	1.3E-10	Glassy	-	-
HLN2A99glass	FTIR+EMP	421 x 205	Open	Groundmass	-	-	-	-	Glassy	-	-
HLN2A9glass	FTIR+EMP	421 x 205	Open	Groundmass	-	-	-	-	Glassy	-	-
HLN2A6											
HLN2A6F3	FTIR+EMP	170 x 142	Spheric	Closed	G3	-	33 x 25.9	1.2E-08	Opaque	5.0 x 5.6	0.7
HLN2A6F5	FTIR	299 x 144	Spheric	Closed	G2	-	33.5 x 36.9	2.4E-08	Opaque	-	-
HLN2A6F6	FTIR+EMP	293 x 207	Irregular	Hourglass	G6R	-	78.3 x 37.8	5.9E-08	Opaque	-	-
HLN2A6F7 (a)	FTIR+EMP	245 x 240	Spheric	Closed	G2	-	48.7 x 40.7	4.2E-08	Glassy	-	-
HLN2A6F32	FTIR+EMP	170 x 142	Spheric	Closed	G3	-	33 x 25.3	1.2E-08	Opaque	5.0 x 5.6	0.7
HLN2A6F41	FTIR	206 x 197	Irregular	reentrant	G6R	-	33 x 25.9	9.0E-09	Opaque	-	-
HLN2A6F42	FTIR	206 x 197	Spheric	reentrant	G6R	-	26.7 x 25.3	4.3E-10	Opaque	-	-
HLN2A6F81	FTIR+EMP	258 x 297	Elipsoidal	reentrant	G6R	-	10.2 x 8.9	1.4E-07	Opaque	4.7 x 2.5	0.01
HLN2A6F82	FTIR	258 x 297	Elipsoidal	reentrant	G6R	-	31.8 x 172.7	5.0E-07	Opaque	-	-
HLN1A6F11	FTIR	240 x 155	Spheric	Closed	G2	-	20.5 x 10.2	9.1E-10	Glassy	-	-
HLN2A6F6glass	FTIR+EMP	293 x 207	Open	Groundmass	-	-	-	-	Bubble+glassy	-	-
HLN2A6F7glass	FTIR+EMP	245 x 240	Open	Groundmass	-	-	-	-	Glassy	-	-
HLN2A7											
HLN2A7	FTIR+EMPA	132 x 181	Spheric	Closed	G2	-	27.1 x 18.4	4.80E-09	Glassy	5.1 x 3.7	0.8

(a) : Selected sample for degassing models

⁽¹⁾ Shape: Indicates the original shape of the inclusion prior to sample preparation⁽²⁾ Type: Closed indicates that the inclusion is completely isolated. Reentrant indicates that the inclusion is connected to the outside of the crystal. Hourglass indicates that the inclusion is connected to the outside of the crystal by a thin capillary. Groundmass is the glass in contact with the main crystal.⁽³⁾ Class: Classification made on population defined from Robidoux et al. (2018)⁽⁴⁾ Sector: Refer to sectors inside the crystals where inclusions has the same textural characteristics. Sample HLN2A91 contain A1, A2, A3, A4 and A5 described in figure 4⁽⁵⁾ Inc. Vol. : Calculated as elipsoidal axes where: Volume = $4/3 \pi (a \times b \times c)$ ⁽⁶⁾ Bubble dimensions considering shortest axis equal to depth of the bubble (S.B. stand for shrinkage bubble)⁽⁷⁾ Ratio: Relative bubble inclusion volume ratio