

Appendix A. COMPOSITIONS AND MINERAL ASSEMBLAGES FROM 650°C

Assemblage	#	N	S%	As%	Fe%	Co%	Ni%	Total wt.%
Alc+Gdf	Gdf49	4	28.35(0.75)	37.80(0.61)	2.10(0.85)	19.42(1.27)	12.33(1.23)	100.10(0.15)
Alc+Gdf	Gdf56	2	32.78(0.07)	33.54(0.11)	0.08(0.03)	33.52(0.19)	0.09(0.04)	100.22(0.15)
Alc+Gdf	Gdf57	3	30.40(0.63)	35.86(0.69)	0.12(0.04)	28.56(0.55)	5.06(0.649)	100.61(0.76)
Alc+Gdf	Al49	4	19.92(0.94)	46.28(0.88)	3.12(0.98)	23.92(0.92)	7.27(0.94)	100.90(0.41)
Alc+Gdf	Al56	2	31.76(0.98)	34.03(0.45)	0.13(0.03)	33.71(0.13)	0.06(0.03)	100.33(0.49)
Alc+Gdf	Al57	3	27.21(0.42)	39.03(0.57)	0.11(0.02)	29.94(0.44)	3.71(0.26)	100.16(0.11)
Alc+dss	Al39	12	20.87(0.58)	45.37(0.55)	2.15(0.65)	29.18(0.96)	2.43(0.57)	100.82(0.32)
Alc+dss	Al47	11	21.27(0.90)	45.01(0.93)	0.85(0.38)	31.91(0.79)	0.97(0.58)	100.52(0.38)
Alc+dss	Al56	7	18.59(0.28)	47.51(0.31)	0.09(0.02)	33.67(0.09)	0.14(0.06)	101.16(0.51)
Alc+dss	dss 39	10	2.59(0.36)	62.60(0.31)	3.50(1.08)	27.16(1.91)	4.15(1.18)	100.78(0.44)
Alc+dss	dss 47	12	2.67(0.43)	63.29(0.41)	1.31(1.31)	31.43(0.85)	1.31(0.54)	100.04(0.51)
Alc+dss	dss 56	4	1.67(0.24)	64.49(0.35)	0.13(0.01)	33.57(0.22)	0.15(0.01)	99.94(0.51)
Alc+Gdf+Sk+Po	Po17	12	52.70(0.44)	0.08(0.04)	45.13(0.43)	0.36(0.16)	1.55(0.14)	99.06(0.45)
Alc+Gdf+Sk+Po	Po23	15	53.10(0.49)	0.06(0.03)	44.95(0.41)	0.41(0.28)	1.48(0.14)	99.31(0.34)
Alc+Gdf+Sk+Po	Po31	15	52.71(0.32)	0.08(0.04)	45.53(0.48)	0.41(0.30)	1.28(0.07)	99.42(0.39)
Alc+Gdf+Sk+Po	Po38	17	52.60(0.40)	0.06(0.03)	45.80(0.33)	0.46(0.25)	1.09(0.05)	99.33(0.45)
Alc+Gdf+Sk+Po	Po46	8	52.38(0.13)	0.07(0.04)	46.73(0.45)	0.79(0.37)	0.03(0.02)	99.39(0.16)
Alc+Gdf+Sk+Po	Sk17	22	0.89(0.21)	73.97(0.41)	4.45(0.47)	16.11(0.71)	4.58(0.46)	101.57(0.58)
Alc+Gdf+Sk+Po	Sk23	41	0.81(0.17)	74.14(0.37)	3.32(0.45)	18.40(0.81)	3.32(0.42)	101.40(0.53)
Alc+Gdf+Sk+Po	Sk31	81	0.82(0.25)	73.74(0.47)	1.87(0.50)	21.78(0.92)	1.78(0.42)	101.44(0.44)
Alc+Gdf+Sk+Po	Sk38	30	0.78(0.26)	73.66(0.52)	0.78(0.20)	24.15(0.27)	0.63(0.19)	101.15(0.58)
Alc+Gdf+Sk+Po	Sk46	18	0.92(0.25)	73.50(0.30)	0.96(0.30)	24.58(0.33)	0.04(0.03)	101.33(0.49)
Alc+Gdf+Sk+Po	Gdf17	5	30.95(0.65)	35.58(0.45)	4.34(1.13)	18.88(2.60)	10.43(1.50)	100.54(0.34)
Alc+Gdf+Sk+Po	Gdf23	14	32.66(0.88)	33.59(0.78)	2.34(0.64)	25.03(1.56)	6.46(1.07)	100.27(0.43)
Alc+Gdf+Sk+Po	Gdf31	29	33.19(0.79)	32.97(0.70)	1.23(0.44)	29.77(1.25)	2.87(1.03)	100.20(0.31)
Alc+Gdf+Sk+Po	Gdf38	22	33.91(0.70)	32.22(0.48)	1.01(0.45)	32.02(0.74)	0.85(0.54)	99.89(0.59)
Alc+Gdf+Sk+Po	Gdf46	21	34.08(0.58)	32.01(0.51)	0.85(0.36)	32.91(0.47)	0.11(0.08)	99.60(0.60)
Alc+Gdf+Sk+Po	Al17	6	20.02(1.48)	46.03(1.63)	4.59(1.19)	22.41(2.50)	6.95(1.33)	100.31(0.49)
Alc+Gdf+Sk+Po	Al23	20	23.43(1.59)	42.82(1.61)	2.72(0.82)	26.20(1.22)	4.93(0.72)	100.42(0.45)
Alc+Gdf+Sk+Po	Al31	15	26.30(1.55)	39.95(1.45)	1.78(0.66)	29.40(1.21)	2.60(0.95)	100.39(0.30)
Alc+Gdf+Sk+Po	Al38	7	29.41(0.84)	36.87(0.53)	1.07(0.59)	31.87(0.98)	0.79(0.20)	99.81(0.58)
Alc+Gdf+Sk+Po	Al46	6	29.83(0.83)	35.97(0.51)	1.16(0.74)	32.71(0.67)	0.09(0.06)	99.44(0.50)
Alc+Gdf+dss	Gdf27	36	22.30(0.96)	44.03(1.11)	3.75(0.83)	6.35(2.86)	23.57(2.15)	100.15(0.62)
Alc+Gdf+dss	Gdf28	33	19.78(0.62)	46.52(0.53)	4.50(0.50)	0.08(0.09)	29.12(0.49)	100.05(0.75)
Alc+Gdf+dss	Gdf32	6	25.40(0.43)	40.30(0.27)	2.30(0.27)	15.94(0.24)	16.05(0.50)	100.59(0.32)
Alc+Gdf+dss	Gdf35	15	20.03(0.64)	46.36(0.58)	4.23(0.48)	0.73(0.18)	28.65(0.52)	100.14(0.61)
Alc+Gdf+dss	Gdf43	14	24.38(0.84)	41.73(0.74)	2.77(0.43)	12.56(1.67)	18.56(1.54)	100.37(0.60)
Alc+Gdf+dss	Gdf48	6	26.51(0.77)	39.72(0.82)	1.05(0.57)	18.13(1.13)	14.61(0.93)	100.42(1.00)

Alc+Gdf+dss	Gdf50	5	26.72(0.76)	39.38(0.58)	2.17(0.14)	16.90(1.02)	14.83(0.83)	100.49(0.11)
Assemblage	#	N	S%	As%	Fe%	Co%	Ni%	Total wt.%
Alc+Gdf+dss	Gdf57	6	26.38(0.84)	39.86(0.55)	0.32(0.09)	19.16(0.60)	14.28(0.70)	100.20(0.98)
Alc+Gdf+dss	Al27	8	12.91(0.77)	53.47(0.69)	11.55(0.39)	6.68(0.54)	15.39(0.42)	100.93(0.26)
Alc+Gdf+dss	Al28	3	12.83(1.13)	53.15(0.83)	15.50(0.62)	0.04(0.02)	18.48(0.32)	100.24(0.22)
Alc+Gdf+dss	Al32	5	13.31(0.85)	52.47(0.50)	5.26(0.93)	16.61(1.01)	12.34(0.98)	101.02(0.28)
Alc+Gdf+dss	Al35	5	12.70(0.50)	53.43(0.19)	13.99(0.63)	2.84(1.53)	17.05(0.90)	100.59(0.77)
Alc+Gdf+dss	Al43	17	12.76(0.33)	53.25(0.36)	8.65(1.41)	10.95(2.14)	14.39(1.04)	100.73(0.40)
Alc+Gdf+dss	Al48	10	16.90(1.25)	49.20(0.88)	2.07(1.07)	25.13(1.29)	6.72(0.81)	100.66(0.32)
Alc+Gdf+dss	Al50	7	14.79(1.47)	51.49(1.18)	4.28(0.98)	20.56(1.65)	8.79(1.05)	100.73(0.15)
Alc+Gdf+dss	Al57	6	17.88(2.09)	48.07(2.12)	0.39(0.10)	27.81(1.34)	5.84(1.29)	100.32(1.07)
Alc+Gdf+Lö	Lö27	30	5.86(0.94)	60.33(1.06)	12.49(1.22)	9.94(1.70)	11.38(1.03)	100.27(0.58)
Alc+Gdf+dss	dss 28	3	6.64(1.23)	59.30(1.33)	18.40(0.23)	0.17(0.28)	15.49(0.48)	99.98(0.73)
Alc+Gdf+dss	dss 32	36	4.36(1.02)	61.81(0.98)	6.76(1.09)	18.88(1.87)	8.20(1.00)	100.61(0.46)
Alc+Gdf+dss	dss 35	26	5.44(1.61)	60.73(1.68)	14.05(4.86)	7.67(8.29)	12.11(3.49)	100.30(0.71)
Alc+Gdf+dss	dss 43	25	5.13(0.94)	61.06(0.96)	10.26(0.93)	13.22(1.26)	10.34(0.70)	100.76(0.27)
Alc+Gdf+dss	dss 48	25	2.17(0.63)	64.09(0.70)	2.33(0.82)	27.81(1.449)	3.61(0.82)	100.78(0.37)
Alc+Gdf+dss	dss 50	21	3.00(0.69)	63.21(0.67)	4.24(0.46)	23.83(0.70)	5.72(0.41)	100.82(0.16)
Alc+Gdf+dss	dss 57	3	2.56(0.90)	64.07(0.69)	0.10(0.02)	30.66(0.08)	2.60(0.28)	100.58(0.87)
Alc+dss+Sk+Po	Po18	6	52.96(0.37)	0.09(0.03)	44.72(0.23)	0.57(0.27)	1.67(0.20)	98.02(1.20)
Alc+dss+Sk+Po	Po26	6	52.69(0.28)	0.17(0.16)	45.09(0.42)	0.25(0.12)	1.81(0.13)	98.74(1.16)
Alc+dss+Sk+Po	Po29	5	52.79(0.43)	0.17(0.17)	45.90(0.44)	1.12(0.09)	0.02(0.01)	97.72(1.28)
Alc+dss+Sk+Po	Po30	5	52.66(0.29)	0.06(0.02)	45.66(0.18)	0.54(0.28)	1.08(0.02)	97.76(0.78)
Alc+dss+Sk+Po	Po34	6	53.29(0.40)	0.07(0.03)	44.84(0.31)	0.28(0.27)	1.54(0.07)	98.48(0.72)
Alc+dss+Sk+Po	Po39	6	52.79(0.21)	0.06(0.05)	45.86(0.16)	0.12(0.05)	1.17(0.04)	98.86(0.58)
Alc+dss+Sk+Po	Po41	7	53.04(0.53)	0.06(0.03)	44.82(0.29)	0.34(0.28)	1.73(0.21)	98.47(0.96)
Alc+dss+Sk+Po	Po42	6	53.22(0.75)	0.08(0.02)	44.75(1.00)	0.57(0.39)	1.38(0.03)	97.02(1.47)
Alc+dss+Sk+Po	Po49	4	52.49(0.48)	0.07(0.02)	46.06(0.46)	0.08(0.03)	1.30(0.05)	98.68(0.89)
Alc+dss+Sk+Po	Sk18	18	0.92(0.20)	73.85(0.42)	4.17(0.54)	17.06(1.16)	4.00(0.68)	103.39(0.86)
Alc+dss+Sk+Po	Sk26	24	0.94(0.25)	73.81(0.47)	4.65(0.89)	15.98(1.50)	4.61(0.87)	102.76(0.87)
Alc+dss+Sk+Po	Sk29	8	0.98(0.42)	73.42(0.54)	0.97(0.47)	24.58(0.42)	0.05(0.03)	102.17(0.71)
Alc+dss+Sk+Po	Sk30	8	0.84(0.29)	73.98(0.47)	0.78(0.18)	23.78(0.29)	0.62(0.18)	103.41(0.31)
Alc+dss+Sk+Po	Sk34	10	0.98(0.22)	73.62(0.52)	5.59(0.94)	14.21(1.59)	5.60(0.95)	102.99(0.92)
Alc+dss+Sk+Po	Sk39	3	0.71(0.26)	73.44(0.18)	1.59(0.17)	22.63(0.43)	1.62(0.18)	101.46(2.24)
Alc+dss+Sk+Po	Sk41	13	0.77(0.20)	73.87(0.29)	2.18(0.51)	20.91(1.13)	2.26(0.52)	103.12(0.60)
Alc+dss+Sk+Po	Sk42	9	0.75(0.12)	73.68(0.59)	2.10(0.51)	21.25(1.04)	2.23(0.52)	103.25(0.59)
Alc+dss+Sk+Po	Sk49	3	0.58(0.56)	73.36(0.35)	1.55(0.13)	22.66(0.25)	1.84(0.27)	102.31(0.50)
Alc+dss+Sk+Po	Al18	6	15.10(0.40)	51.50(0.59)	10.95(1.23)	12.58(1.61)	9.88(0.77)	99.13(1.63)
Alc+dss+Sk+Po	Al26	5	14.38(0.54)	51.96(0.30)	12.93(0.01)	8.94(1.02)	11.80(1.29)	99.27(1.94)
Alc+dss+Sk+Po	Al29	11	23.87(0.88)	42.24(0.82)	2.38(0.50)	31.45(0.60)	0.05(0.03)	99.73(0.76)

Alc+dss+Sk+Po	Al30	9	21.21(1.13)	44.98(1.20)	2.75(0.56)	28.79(1.62)	2.27(1.07)	100.53(0.56)
Alc+dss+Sk+Po	Al34	6	14.92(0.74)	51.69(0.79)	13.95(0.87)	7.09(0.65)	12.35(0.50)	100.86(1.17)
Alc+dss+Sk+Po	Al39	9	19.94(0.75)	46.24(0.69)	4.37(0.37)	25.39(0.89)	4.06(0.91)	100.01(1.23)
Assemblage	#	N	S%	As%	Fe%	Co%	Ni%	Total wt.%
Alc+dss+Sk+Po	Al41	9	14.99(0.81)	51.37(0.79)	8.83(0.94)	15.94(1.77)	8.87(0.95)	99.69(0.91)
Alc+dss+Sk+Po	Al42	5	18.92(0.80)	47.54(0.92)	6.16(1.77)	21.84(2.50)	5.54(0.94)	99.38(1.39)
Alc+dss+Sk+Po	Alc49	4	19.53(0.83)	46.75(0.83)	4.25(0.26)	25.13(0.36)	4.35(0.59)	101.34(1.02)
Alc+dss+Sk+Po	dss 18	5	4.14(0.99)	62.00(0.49)	11.09(0.72)	14.30(0.81)	8.47(0.68)	101.27(0.80)
Alc+dss+Sk+Po	dss 26	4	4.51(0.21)	61.45(0.67)	13.49(0.67)	11.13(0.80)	9.34(0.28)	101.24(1.82)
Alc+dss+Sk+Po	dss 29	17	1.71(0.59)	64.30(0.54)	3.91(0.84)	29.95(0.95)	0.07(0.02)	100.48(1.08)
Alc+dss+Sk+Po	dss 30	13	1.70(0.61)	64.26(0.50)	3.99(0.61)	28.07(1.21)	1.98(0.76)	100.34(0.30)
Alc+dss+Sk+Po	dss 34	6	5.06(0.28)	61.35(0.36)	15.06(1.66)	8.06(0.32)	10.48(1.56)	102.08(0.60)
Alc+dss+Sk+Po	dss 39	6	3.06(0.29)	63.32(0.19)	6.05(0.74)	23.39(1.52)	4.19(1.14)	100.86(1.059)
Alc+dss+Sk+Po	dss 41	9	3.68(0.38)	62.37(0.42)	9.46(0.55)	17.08(0.74)	7.41(1.09)	100.15(1.17)
Alc+dss+Sk+Po	dss 42	6	3.09(0.64)	62.98(0.51)	8.36(0.55)	19.11(0.53)	6.46(0.82)	101.25(0.71)
Alc+dss+Sk+Po	dss 49	8	3.45(0.54)	62.75(0.62)	7.28(0.56)	20.86(0.67)	5.67(0.76)	100.89(0.83)
Alc+dss+ α	α 20	9	17.29(2.28)	48.93(2.21)	19.88(0.62)	0.04(0.03)	13.86(0.46)	99.67(1.03)
Alc+dss+ α	α 21	4	18.74(2.66)	47.00(2.55)	19.07(0.35)	2.73(0.97)	12.46(1.23)	99.88(0.58)
Alc+dss+ α	Al20	7	14.46(0.65)	51.65(0.69)	17.09(0.57)	1.79(1.55)	15.02(1.24)	100.68(0.70)
Alc+dss+ α	Al21	7	15.20(0.59)	51.04(0.87)	18.09(0.36)	0.02(0.01)	15.65(0.41)	100.28(0.51)
Alc+dss+ α	dss 20	10	6.25(1.01)	60.05(1.07)	17.49(1.26)	2.84(1.64)	13.37(1.40)	100.85(1.83)
Alc+dss+ α	dss 21	6	6.81(2.39)	59.41(2.42)	18.90(0.66)	0.05(0.04)	14.84(0.69)	100.63(0.75)
Alc+dss+ α +Sk+Po	Po	11	52.69(0.34)	0.06(0.03)	45.91(0.30)	0.09(0.02)	1.25(0.09)	98.79(0.68)
Alc+dss+ α +Sk+Po	Sk	25	0.89(0.16)	73.70(0.24)	5.23(0.52)	14.99(1.02)	5.20(0.60)	103.29(0.58)
Alc+dss+ α +Sk+Po	α	7	18.04(0.82)	48.05(0.83)	18.90(0.23)	4.17(0.42)	10.85(0.74)	101.29(0.95)
Alc+dss+ α +Sk+Po	Al	8	14.63(1.06)	51.45(1.27)	17.12(0.51)	3.71(0.76)	13.08(0.44)	101.37(0.59)
Alc+dss+ α +Sk+Po	dss	5	5.07(1.30)	61.08(1.17)	16.33(0.37)	6.16(0.44)	11.37(0.41)	102.35(0.49)
dss+ α	α 14	3	19.47(1.09)	46.46(0.78)	20.41(1.39)	1.94(0.63)	11.73(1.28)	99.55(0.80)
dss+ α	α 15	14	17.87(1.16)	48.01(1.14)	21.05(1.35)	0.02(0.02)	13.05(1.47)	99.97(0.78)
dss+ α	dss 14	3	4.50(0.66)	61.56(0.96)	18.22(0.54)	2.06(0.38)	13.65(0.52)	100.76(0.24)
dss+ α	dss 15	4	4.08(1.00)	61.87(1.18)	19.89(1.07)	0.15(0.21)	14.01(1.30)	100.62(0.85)
Gdf+Krt	Gdf54	7	14.37(0.67)	51.85(0.77)	1.13(0.09)	0.97(0.47)	31.68(0.30)	101.29(0.50)
Gdf+Krt	Gdf55	13	15.83(1.00)	50.83(1.019)	1.09(0.12)	0.02(0.02)	32.23(0.16)	101.12(1.43)
Gdf+Krt	Gdf65	12	14.77(0.32)	52.04(0.34)	0.18(0.06)	2.50(0.70)	30.51(0.58)	100.75(0.65)
Gdf+Krt	Gdf66	20	16.31(1.01)	50.05(1.17)	0.18(0.10)	0.04(0.04)	33.41(0.21)	100.85(0.98)
Gdf+Krt	Krt54	2	11.61(0.82)	54.88(0.69)	0.41(0.06)	0.78(0.13)	32.33(0.06)	100.22(0.33)
Gdf+Krt	Krt55	3	12.91(0.54)	53.75(0.29)	0.83(0.11)	0.01(0.00)	32.50(0.17)	101.74(0.21)
Gdf+Krt	Krt65	3	11.66(0.52)	55.09(0.48)	0.13(0.07)	1.11(0.11)	32.01(0.11)	101.74(0.40)
Gdf+Krt	Krt66	4	11.52(1.22)	54.95(1.15)	0.25(0.10)	0.04(0.03)	33.25(0.25)	100.24(0.91)

<i>dss</i> +Gdf	Gdf36	3	19.18(0.84)	46.98(0.84)	3.71(0.27)	0.10(0.04)	30.02(0.28)	101.02(0.24)
<i>dss</i> +Gdf	Gdf42	10	24.93(1.85)	40.92(1.73)	2.17(0.70)	13.30(2.36)	18.34(2.25)	100.78(1.41)
<i>dss</i> +Gdf	Gdf43	11	22.48(1.68)	43.25(1.73)	2.41(0.66)	9.32(0.98)	22.54(1.26)	101.54(1.14)
<i>dss</i> +Gdf	Gdf44	5	18.29(1.04)	47.58(1.00)	3.48(0.37)	0.14(0.08)	30.52(0.49)	101.63(0.46)
<i>dss</i> +Gdf	Gdf51	19	25.52(0.96)	40.44(1.11)	1.61(0.67)	15.30(1.82)	16.82(1.47)	100.89(0.97)

Assemblage	#	N	S%	As%	Fe%	Co%	Ni%	Total wt. %
<i>dss</i> +Gdf	Gdf52	48	21.19(1.41)	44.83(1.47)	2.58(0.62)	7.70(2.34)	23.69(2.43)	100.93(1.28)
<i>dss</i> +Gdf	Gdf53	15	19.17(1.39)	47.09(1.149)	2.36(0.779)	4.57(1.46)	26.80(1.50)	100.37(0.98)
<i>dss</i> +Gdf	Gdf54-1	30	17.02(1.65)	49.45(1.59)	2.27(0.83)	0.93(0.79)	30.33(0.41)	100.44(1.35)
<i>dss</i> +Gdf	Gdf54-2	6	15.68(1.31)	51.03(1.12)	1.47(0.29)	2.08(0.66)	29.77(0.80)	100.54(1.43)
<i>dss</i> +Gdf	Gdf58	3	25.72(0.28)	40.32(0.13)	0.07(0.02)	17.89(0.39)	15.41(0.30)	100.39(1.36)
<i>dss</i> +Gdf	Gdf59	10	22.82(1.09)	43.48(1.11)	0.35(0.08)	15.27(0.81)	18.09(0.79)	100.89(1.35)
<i>dss</i> +Gdf	Gdf60	8	20.40(1.03)	45.93(1.06)	0.29(0.13)	11.23(0.58)	22.14(0.58)	99.99(1.19)
<i>dss</i> +Gdf	Gdf61	6	19.33(0.50)	47.02(0.75)	0.27(0.09)	8.78(1.11)	24.60(1.10)	101.58(0.819)
<i>dss</i> +Gdf	Gdf62	4	18.33(1.70)	47.96(1.829)	0.26(0.06)	7.34(0.40)	26.11(0.34)	99.93(1.00)
<i>dss</i> +Gdf	Gdf63	8	17.25(1.269)	48.96(1.41)	0.31(0.09)	5.37(1.33)	28.12(1.09)	99.43(1.90)
<i>dss</i> +Gdf	Gdf64	23	15.06(1.49)	51.49(1.48)	0.32(0.09)	3.12(0.76)	30.00(0.62)	101.65(0.95)
<i>dss</i> +Gdf	<i>dss</i> 36	3	5.11(0.55)	60.98(0.44)	16.24(0.27)	0.10(0.04)	17.58(0.28)	101.02(0.24)
<i>dss</i> +Gdf	<i>dss</i> 42	17	5.27(1.53)	60.88(1.51)	5.56(1.22)	19.21(1.98)	9.08(1.08)	101.41(1.14)
<i>dss</i> +Gdf	<i>dss</i> 43	23	5.77(0.56)	60.28(0.56)	6.37(2.12)	16.80(1.86)	10.79(1.17)	101.57(0.83)
<i>dss</i> +Gdf	<i>dss</i> 44-1	4	8.84(1.21)	57.18(1.33)	9.06(1.74)	8.01(0.83)	16.91(0.77)	101.11(0.36)
<i>dss</i> +Gdf	<i>dss</i> 44-2	3	9.45(0.55)	56.91(0.48)	6.22(0.94)	8.67(0.24)	18.78(0.59)	102.20(1.12)
<i>dss</i> +Gdf	<i>dss</i> 44-3	3	8.59(0.36)	59.35(0.18)	13.18(0.60)	4.14(0.28)	16.64(0.30)	101.43(0.30)
<i>dss</i> +Gdf	<i>dss</i> 51	12	5.43(1.34)	60.59(1.02)	2.12(0.79)	23.96(1.13)	8.06(0.73)	101.59(0.93)
<i>dss</i> +Gdf	<i>dss</i> 52	19	7.26(1.13)	58.50(0.99)	6.33(0.78)	14.61(1.46)	13.29(1.16)	102.23(0.79)
<i>dss</i> +Gdf	<i>dss</i> 53	19	8.42(0.59)	57.20(0.63)	4.71(1.22)	12.11(1.50)	17.56(0.87)	102.13(0.74)
<i>dss</i> +Gdf	<i>dss</i> 54-1	5	8.75(0.48)	56.68(0.42)	4.19(0.44)	9.29(0.42)	21.10(0.65)	102.78(0.79)
<i>dss</i> +Gdf	<i>dss</i> 54-2	8	8.38(0.73)	57.58(0.35)	2.54(0.87)	12.36(1.37)	19.14(1.09)	101.96(0.67)
<i>dss</i> +Gdf	<i>dss</i> 58	13	4.10(0.58)	61.65(0.35)	0.19(0.04)	26.66(0.72)	7.40(0.81)	99.68(1.41)
<i>dss</i> +Gdf	<i>dss</i> 59	16	4.86(0.88)	61.29(0.70)	0.25(0.08)	25.10(0.40)	8.51(0.57)	99.19(1.47)
<i>dss</i> +Gdf	<i>dss</i> 60	18	5.60(0.46)	60.28(0.46)	0.23(0.08)	21.53(1.66)	12.36(1.88)	99.38(1.43)
<i>dss</i> +Gdf	<i>dss</i> 61	15	6.32(0.51)	59.57(0.29)	0.26(0.07)	19.58(0.40)	14.25(0.53)	100.03(1.23)
<i>dss</i> +Gdf	<i>dss</i> 62	10	6.79(0.48)	59.39(0.25)	0.23(0.09)	18.53(0.23)	15.07(0.29)	99.46(1.79)
<i>dss</i> +Gdf	<i>dss</i> 63	19	6.81(0.30)	59.29(0.26)	0.27(0.05)	17.77(0.27)	15.85(0.34)	98.94(1.62)
<i>dss</i> +Gdf	<i>dss</i> 64	9	7.37(0.51)	58.93(0.52)	0.30(0.05)	16.11(0.65)	17.30(0.45)	100.35(1.85)
<i>dss</i> + α +Sk+Po	Po9	3	53.09(0.16)	0.05(0.02)	46.54(0.18)	0.12(0.02)	0.20(0.00)	98.51(0.43)
<i>dss</i> + α +Sk+Po	Po10	3	53.01(0.48)	0.08(0.05)	46.41(0.37)	0.06(0.029)	0.44(0.08)	99.39(1.01)
<i>dss</i> + α +Sk+Po	Po12	4	53.20(0.11)	0.07(0.04)	46.24(0.15)	0.11(0.02)	0.38(0.02)	99.23(1.30)
<i>dss</i> + α +Sk+Po	Po13	6	53.07(0.26)	0.07(0.07)	45.75(0.31)	0.10(0.02)	1.01(0.05)	98.52(0.36)
<i>dss</i> + α +Sk+Po	Po19	10	52.79(0.18)	0.06(0.04)	45.83(0.19)	0.09(0.02)	1.22(0.09)	98.93(0.57)

<i>dss</i> + α +Sk+Po	Po20	3	52.30(0.38)	0.17(0.16)	46.15(0.53)	0.06(0.01)	1.33(0.01)	97.42(0.87)
<i>dss</i> + α +Sk+Po	Sk9	9	1.95(0.30)	73.15(0.26)	10.31(1.17)	6.18(2.37)	8.41(1.20)	103.46(1.15)
<i>dss</i> + α +Sk + Po	Sk10	3	2.25(0.13)	72.17(0.25)	14.09(0.28)	0.03(0.02)	11.45(0.18)	102.43(0.08)
<i>dss</i> + α +Sk+Po	Sk12	6	1.80(0.32)	73.33(0.32)	9.28(0.68)	8.28(1.59)	7.32(0.54)	103.01(1.36)
<i>dss</i> + α +Sk+Po	Sk13	5	1.31(0.18)	73.31(0.47)	7.11(1.47)	12.63(2.82)	5.63(1.40)	102.09(0.78)
<i>dss</i> + α +Sk+Po	Sk19	9	0.82(0.17)	73.47(0.14)	6.49(0.55)	14.72(1.04)	4.50(0.49)	103.20(0.35)
<i>dss</i> + α +Sk+Po	Sk20	6	1.24(0.25)	73.05(0.36)	5.42(1.24)	16.50(1.97)	3.80(0.90)	101.77(0.42)

Assemblage	#	N	S%	As%	Fe%	Co%	Ni%	Total wt.%
<i>dss</i> + α +Sk+Po	α 9	2	22.21(0.63)	44.25(0.39)	24.41(0.06)	0.41(0.03)	8.72(0.15)	101.27(0.90)
<i>dss</i> + α +Sk+Po	α 10	2	22.75(0.81)	43.80(0.91)	24.25(0.21)	0.08(0.01)	9.13(0.11)	100.16(0.10)
<i>dss</i> + α +Sk+Po	α 12	3	21.40(0.51)	44.91(0.59)	23.38(0.19)	2.05(0.29)	8.25(0.03)	99.97(0.47)
<i>dss</i> + α +Sk+Po	α 13	3	20.82(0.29)	45.61(0.22)	21.02(0.69)	3.89(0.35)	8.66(0.40)	101.74(1.18)
<i>dss</i> + α +Sk+Po	α 19	3	19.80(0.45)	46.51(0.37)	19.10(0.18)	4.51(0.11)	10.09(0.22)	101.31(1.21)
<i>dss</i> + α +Sk+Po	α 20	2	17.74(0.61)	48.31(0.63)	18.31(0.08)	3.94(0.12)	11.70(0.02)	100.76(0.53)
<i>dss</i> + α +Sk+Po	<i>dss</i> 9	4	3.09(0.49)	63.08(0.71)	22.45(0.17)	0.49(0.28)	10.91(0.44)	100.84(0.54)
<i>dss</i> + α +Sk+Po	<i>dss</i> 10	2	2.50(0.09)	63.33(0.18)	23.20(0.21)	0.05(0.02)	10.91(0.12)	100.55(1.12)
<i>dss</i> + α +Sk+Po	<i>dss</i> 12	3	4.39(1.30)	62.27(1.47)	20.72(0.20)	1.77(0.26)	10.86(0.25)	102.03(0.68)
<i>dss</i> + α +Sk+Po	<i>dss</i> 13	4	5.19(1.41)	61.19(1.41)	19.11(0.93)	3.26(1.18)	11.25(0.33)	102.86(0.21)
<i>dss</i> + α +Sk+Po	<i>dss</i> 19	8	5.77(0.64)	60.49(0.52)	17.80(0.14)	4.69(0.25)	11.26(0.17)	102.68(0.77)
<i>dss</i> + α +Sk+Po	<i>dss</i> 20	3	4.21(0.51)	61.84(0.44)	16.42(0.09)	6.42(0.19)	11.11(0.25)	102.43(0.59)
Lö+Sk+Po	Po11	6	53.00(0.16)	0.10(0.08)	46.69(0.22)	0.20(0.07)	0.02(0.01)	99.16(0.34)
Lö+Sk+Po	Po16	7	52.15(0.23)	0.05(0.02)	47.48(0.28)	0.31(0.31)	0.02(0.01)	99.56(0.26)
Lö+Sk+Po	Po5	5	52.65(0.15)	0.03(0.01)	47.04(0.13)	0.07(0.01)	0.20(0.02)	99.36(0.22)
Lö+Sk+Po	Sk11	27	1.66(0.40)	72.78(0.48)	2.31(0.78)	23.22(0.74)	0.03(0.02)	101.40(0.30)
Lö+Sk+Po	Sk16	21	1.12(0.38)	73.32(0.52)	1.46(0.49)	24.06(0.42)	0.04(0.02)	101.56(0.40)
Lö+Sk+Po	Sk22	6	0.99(0.48)	73.40(0.64)	1.11(0.45)	24.43(0.36)	0.06(0.03)	101.04(0.39)
Lö+Sk+Po	Sk5	20	1.33(0.30)	73.32(0.34)	5.33(1.45)	17.05(2.31)	2.96(0.87)	101.89(0.39)
Lö+Sk+Po	Lö11	9	4.48(1.53)	61.75(1.44)	25.75(0.89)	7.98(0.85)	0.02(0.02)	100.87(0.36)
Lö+Sk+Po	Lö16	3	1.24(0.98)	64.85(0.62)	19.14(0.34)	14.68(0.20)	0.08(0.00)	101.26(0.61)
Lö+Sk+Po	Lö22	3	1.38(0.25)	64.54(0.51)	6.50(4.06)	27.65(3.66)	0.26(0.08)	101.01(0.83)
Lö+Sk+Po	Lö5	3	4.65(0.93)	61.57(0.85)	23.39(1.01)	6.69(1.13)	3.71(0.56)	101.13(0.42)
Apy+Sk+Po	Apy12	10	30.33(0.70)	35.27(0.73)	32.48(0.69)	0.91(0.47)	1.01(0.20)	100.10(0.50)
Apy+Sk+Po	Sk12	7	1.16(0.18)	73.12(0.23)	5.12(0.90)	16.77(1.27)	3.83(0.51)	101.91(0.47)
Apy+Sk+Po	Po12	7	53.12(0.31)	0.07(0.04)	46.31(0.26)	0.09(0.03)	0.41(0.06)	99.30(1.10)
Apy+Lö+Sk+Po	Po5	4	52.64(0.17)	0.03(0.01)	47.05(0.15)	0.08(0.00)	0.20(0.03)	98.79(0.48)
Apy+Lö+Sk+Po	Po6	4	52.60(0.14)	0.13(0.07)	46.97(0.07)	0.05(0.01)	0.25(0.06)	98.03(0.91)
Apy+Lö+Sk+Po	Po7	7	53.12(0.31)	0.07(0.04)	46.46(0.26)	0.09 (0.03)	0.25(0.06)	98.30(1.10)
Apy+Lö+Sk+Po	Po8	3	53.09(0.16)	0.05(0.02)	46.51(0.16)	0.16(0.02)	0.20(0.00)	98.51(0.43)
Apy+Lö+Sk+Po	Sk5	12	1.71(0.29)	73.00(0.39)	6.82(0.48)	14.50(0.93)	3.97(0.55)	103.55(1.22)
Apy+Lö+Sk+Po	Sk6	2	2.49(0.18)	72.21(0.35)	14.15(0.39)	0.04(0.03)	11.10(0.25)	102.43(0.11)

Apy+Lö+Sk+Po	Sk7	4	1.99(0.54)	72.59(0.59)	3.12(0.51)	22.20(0.56)	0.10(0.05)	102.23(0.38)
Apy+Lö+Sk+Po	Sk8	16	1.37(0.21)	73.21(0.27)	5.01(0.46)	17.43(0.74)	2.98(0.43)	103.65(0.60)
Apy+Lö+Sk+Po	Apy5	3	27.89(0.43)	38.61(0.14)	28.52(0.88)	4.19(0.48)	0.79(0.21)	101.09(0.77)
Apy+Lö+Sk+Po	Apy6	4	28.42(0.40)	38.02(0.76)	31.92(0.55)	0.02(0.019)	1.62(0.04)	99.11(0.68)
Apy+Lö+Sk+Po	Apy7	2	26.84(0.34)	39.47(0.38)	26.02(4.12)	7.65(4.08)	0.02(0.01)	100.37(0.22)
Apy+Lö+Sk+Po	Apy8	6	27.19(0.97)	38.75(0.74)	29.11(1.88)	4.01(1.97)	0.94(0.66)	101.01(0.69)
Apy+Lö+Sk+Po	Lö5	8	5.12(1.26)	61.37(1.21)	25.23(1.00)	2.14(1.23)	6.13(0.71)	101.68(0.83)
Apy+Lö+Sk+Po	Lö6	6	4.71(1.19)	61.42(1.13)	26.92(1.13)	0.03(0.02)	6.93(0.90)	100.84(1.02)
Apy+Lö+Sk+Po	Lö7	6	4.98(1.55)	61.38(1.43)	26.96(2.21)	6.62(2.29)	0.07(0.04)	101.07(0.35)

Assemblage	#	N	S%	As%	Fe%	Co%	Ni%	Total wt.%
Apy+Lö+Sk+Po	Lö8	8	4.05(1.33)	62.20(1.29)	25.57(1.58)	3.11(2.45)	5.07(1.50)	102.48(0.83)
Apy+Lö	Apy1	9	29.76 (0.60)	36.55(0.72)	33.64(0.18)	0.01(0.01)	0.03(0.02)	100.66 (0.65)
Apy+Lö	Apy2	3	28.18 (0.25)	38.25(0.25)	32.29(0.25)	1.25(0.27)	0.02(0.01)	100.37 (0.51)
Apy+Lö	Apy3	4	29.58 (1.54)	36.60(1.91)	32.79(0.64)	0.02(0.02)	1.01(0.24)	99.37 (1.91)
Apy+Lö	Apy5	3	29.54 (0.79)	36.77 (0.51)	31.07 (0.24)	2.15 (0.70)	0.46 (0.28)	101.61 (0.79)
Apy+Lö	Apy7	3	27.33 (2.19)	39.26 (2.30)	30.92 (1.76)	2.46 (2.02)	0.02 (0.02)	100.46 (0.76)
Apy+Lö	Apy13	4	29.57(1.12)	36.90 (1.45)	32.35(0.53)	0.02(0.01)	1.16(0.12)	101.03(0.45)
Apy+Lö	Lö1	12	1.35 (0.99)	64.95 (0.93)	33.62 (0.15)	0.03 (0.02)	0.05 (0.03)	102.92 (0.47)
Apy+Lö	Lö2	3	2.09 (0.16)	64.04 (0.24)	29.67 (1.03)	4.19 (1.06)	0.02 (0.01)	103.11 (0.23)
Apy+Lö	Lö3	5	3.98 (0.83)	62.52 (0.80)	29.57 (0.20)	0.01 (0.01)	3.90 (0.28)	101.46 (1.62)
Apy+Lö	Lö7	6	3.25 (1.38)	63.11(1.27)	28.36 (2.22)	5.22 (2.18)	0.06 (0.04)	101.02 (0.32)
Apy+Lö	Lö5	5	4.05 (0.12)	62.39 (0.12)	27.62 (0.54)	3.32 (0.94)	2.68 (0.56)	101.73 (0.52)
Apy+Lö	Lö13	5	4.11(2.09)	62.30(2.14)	28.68(0.88)	0.02(0.01)	4.88(0.77)	102.23(0.34)
Apy+Po	Po1	3	52.56 (0.05)	0.05(0.03)	47.36 (0.06)	0.01 (0.00)	0.02 (0.01)	98.76 (0.73)

Assemblage gives the phase association. # indicate phase and sample no. N is the number of microprobe analyses.

S%, As%, Fe%, Co% and Ni% are the composition in atomic %. The minerals are alloclasite (Alc), arsenopyrite (Apy) $\alpha(\text{Fe}_{0.65}\text{Ni}_{0.35})\text{As}_{1.4}\text{S}_{0.6}$ (α), cobaltite (Cbt), Gersdorffite (Gdf), diarsenide solid-solution (*dss*), Krtutovite (Krt), löllingite (Lö), pyrrhotite (Po), Krtutovite (Krt), safflorite (Saf) and skutterudite (Sk).

Appendix B. COMPOSITIONS AND MINERAL ASSEMBLAGES FROM 500°C

Assemblage	#	N	S%	As%	Fe%	Co%	Ni%	Total
Apy+Lö	Lö1	11	1.73(0.85)	64.59(0.80)	33.18(0.29)	0.49(0.25)	0.01(0.01)	100.22(0.99)
Apy+Lö	Apy1	22	31.89(1.18)	34.51(1.18)	33.10(0.54)	0.47(0.53)	0.02(0.01)	99.34(0.95)
Saf+Lö+Sk+Po	Sk2	13	2.24(0.37)	72.07(0.70)	0.57(0.12)	25.18(0.70)	0.10(0.08)	100.78(0.28)
Saf+Lö+Sk+Po	Sa2	8	1.34(0.58)	65.03(0.52)	7.22(1.60)	26.40(1.60)	0.02(0.01)	101.11(0.35)
Saf+Lö+Sk+Po	Po2	12	52.48(0.88)	0.15(0.09)	47.87(1.29)	0.31(0.03)	0.02(0.01)	99.90(1.05)
Saf+Lö+Sk+Po	Lö2	3	2.13(0.83)	64.02(0.85)	26.08(1.98)	7.72(1.95)	0.04(0.01)	101.57(0.15)
Apy+Lö	Apy3	11	32.02(1.29)	34.39(1.24)	33.34(0.57)	0.18(0.52)	0.08(0.02)	98.66(0.42)
Apy+Lö	Lö3	2	0.90(0.13)	65.41(0.06)	32.94(0.29)	0.05(0.05)	0.71(0.27)	100.83(0.30)
Apy+dss	dss4	7	1.83(1.07)	64.62(1.01)	28.76(0.46)	0.08(0.09)	4.71(0.45)	100.70(0.78)
Apy+dss	Apy4	3	31.55(0.27)	34.91(0.26)	32.58(0.06)	0.14(0.01)	0.80(0.05)	100.04(0.32)
Apy+dss+Lö	Lö4	3	1.10(0.27)	65.38(0.28)	32.75(0.16)	0.01(0.00)	0.76(0.20)	100.57(0.57)
Apy+dss+Lö	dss4	7	1.37(0.63)	65.03(0.67)	29.70(0.33)	0.03(0.03)	3.87(0.37)	100.46(1.01)
Apy+dss+Lö	Apy4	2	31.44(0.95)	34.86(0.93)	33.34(0.08)	0.01(0.00)	0.35(0.10)	99.41(1.53)
dss+Sk	Sk4	3	0.86(0.38)	72.97(0.49)	11.05(0.45)	0.02(0.01)	15.10(0.57)	101.17(0.11)
Apy+dss	Apy5	2	31.01(0.18)	35.46(0.01)	32.51(0.03)	0.03(0.03)	1.00(0.22)	98.65(0.04)
Apy+dss	dss5	10	2.08(1.38)	64.32(1.39)	27.06(1.09)	0.07(0.09)	6.46(1.09)	100.85(0.91)
Saf	Sa6	3	3.24(1.59)	63.08(1.67)	0.15(0.03)	33.30(0.12)	0.21(0.05)	101.24(0.39)
Apy+dss	dss6	10	2.31(0.87)	63.96(0.91)	26.47(1.20)	1.31(0.619)	5.96(0.72)	101.11(0.89)
Apy	Apy6	3	30.76(0.95)	35.65(1.00)	31.61(1.94)	0.59(0.56)	1.38(2.37)	100.68(0.78)
Apy+dss	Apy6	2	31.60(1.37)	34.78(1.23)	32.58(0.25)	0.30(0.04)	0.74(0.07)	99.16(0.57)
Apy+dss+Lö	Lö7	2	0.80(0.16)	65.73(0.13)	32.83(0.20)	0.05(0.01)	0.58(0.21)	101.17(0.54)
Apy+dss+Lö	dss7	9	1.94(1.19)	64.43(1.25)	27.96(1.13)	1.44(0.75)	4.22(0.62)	100.37(1.02)
Apy+dss+Lö	Apy7	12	31.37(1.52)	35.09(1.44)	31.55(0.50)	1.50(0.47)	0.50(0.18)	98.60(0.28)
Apy+dss+Sk+Po	Sk7	11	2.70(0.36)	71.48(0.77)	1.72(0.26)	21.33(0.58)	2.82(0.49)	101.72(0.23)
Apy+dss+Sk+Po	Po7	6	51.88(0.52)	0.71(0.33)	46.34(0.64)	0.03(0.01)	0.90(0.03)	98.45(0.39)
Apy+dss+Sk+Po	dss7	3	2.82(2.30)	63.55(2.38)	24.00(0.55)	1.53(0.56)	8.10(0.26)	99.76(1.54)
Apy+dss+Sk+Po	Apy7	4	30.82(0.69)	35.49(0.65)	30.90(0.50)	1.18(0.04)	1.62(0.41)	100.37(1.27)
Saf+Lö+Krt+Sk+Po	Sk8	9	0.94(0.22)	73.57(0.27)	0.75(0.12)	23.09(0.39)	1.64(0.43)	101.35(0.44)
Saf+Lö+Krt+Sk+Po	Sa8	5	2.62(0.44)	63.73(0.45)	1.87(0.88)	30.88(0.70)	0.89(0.26)	100.28(0.78)
Saf+Lö+Krt+Sk+Po	Krt8	4	2.27(0.23)	64.16(0.26)	1.39(0.09)	1.18(0.11)	31.00(0.22)	100.66(0.29)
Saf+Lö+Krt+Sk+Po	Po8	12	52.10(0.66)	0.15(0.09)	45.98(0.48)	0.07(0.02)	0.54(0.03)	99.84(0.91)
Saf+Lö+Krt+Sk+Po	Lö8	3	1.81(0.23)	64.53(0.33)	26.40(0.12)	6.60(0.70)	0.66(0.66)	101.55(0.28)
Alc+Saf+Gdf+Sk+Po	Sk9	9	0.52(0.12)	73.70(0.40)	0.39(0.10)	22.91(0.25)	2.52(0.17)	101.34(0.35)
Alc+Saf+Gdf+Sk+Po	Sa9	6	4.16(0.15)	62.17(0.17)	0.49(0.13)	32.72(0.08)	0.46(0.07)	100.73(0.28)
Alc+Saf+Gdf+Sk+Po	Po9	4	52.70(0.56)	0.31(0.29)	47.03(0.66)	0.18(0.07)	0.54(0.00)	100.33(0.11)
Alc+Saf+Gdf+Sk+Po	Gdf9	5	22.00(0.56)	44.35(0.68)	0.98(0.45)	4.41(0.46)	28.25(0.46)	100.74(0.50)
Alc+Saf+Gdf+Sk+Po	Al9	6	20.95(0.56)	45.51(0.59)	0.83(0.16)	29.88(0.30)	2.82(0.20)	100.20(1.16)
dss+Sk+Po	Sk10	17	1.70(0.52)	73.04(0.55)	0.84(0.40)	22.46(1.12)	1.97(1.06)	101.19(0.82)

Assemblage	#	N	S%	As%	Fe%	Co%	Ni%	Total
<i>dss</i> +Sk+Po	Po10	4	52.21(0.43)	0.24(0.34)	46.68(0.77)	0.13(0.03)	0.73(0.05)	99.35(0.63)
<i>dss</i> +Sk+Po	<i>dss</i> 10	4	4.46(0.74)	61.98(0.69)	21.34(1.11)	2.68(0.47)	9.53(0.33)	99.77(0.87)
Saf	Sa11	5	2.92(0.59)	63.51(0.59)	0.05(0.02)	33.26(0.14)	0.26(0.04)	100.79(0.28)
Alc+Gdf	All1	6	24.37(0.71)	42.04(0.65)	0.13(0.09)	32.63(0.22)	0.83(0.02)	100.78(0.24)
Apy+ <i>dss</i> +Lö+Sk+Po	Sk12	12	1.61(0.30)	73.02(0.71)	1.32(0.32)	22.72(0.60)	1.33(0.45)	101.02(1.22)
Apy+ <i>dss</i> +Lö+Sk+Po	Po12	9	52.30(0.23)	0.25(0.29)	46.97(0.34)	0.04(0.02)	0.45(0.03)	99.25(0.63)
Apy+ <i>dss</i> +Lö+Sk+Po	Lö12	5	1.43(2.50)	64.97(2.44)	31.05(0.23)	1.94(0.26)	0.60(0.07)	101.02(0.58)
Apy+ <i>dss</i> +Lö+Sk+Po	<i>dss</i> 12	5	3.00(1.19)	63.26(1.23)	24.35(0.39)	3.48(1.08)	5.90(1.40)	99.94(1.47)
Apy+ <i>dss</i> +Lö+Sk+Po	Apy12	5	30.23(1.61)	36.17(1.54)	30.04(0.38)	2.67(0.31)	0.89(0.27)	98.64(0.29)
Saf	Sa13	2	4.81(1.65)	61.49(1.67)	0.31(0.04)	33.31(0.04)	0.09(0.01)	100.17(0.29)
<i>dss</i> +Gdf+Sk+Po	Sk13	13	0.57(0.13)	74.42(0.28)	1.37(0.68)	19.49(1.18)	4.19(0.58)	101.62(0.22)
<i>dss</i> +Gdf+Sk+Po	Po13	3	52.40(0.51)	0.45(0.47)	46.36(0.70)	0.13(0.08)	0.99(0.08)	98.60(0.18)
<i>dss</i> +Gdf+Sk+Po	<i>dss</i> 13	4	3.46(1.41)	62.88(1.42)	20.71(1.08)	1.69(0.74)	11.26(0.32)	100.17(1.44)
Alc+Saf+Sk+Po	Sk14	7	1.57(0.45)	73.33(0.14)	0.31(0.18)	24.03(0.55)	0.75(0.48)	100.63(0.52)
Alc+Saf+Sk+Po	Sa14	2	3.87(1.68)	62.36(1.68)	0.59(0.07)	32.93(0.11)	0.25(0.04)	101.00(0.31)
Alc+Saf+Sk+Po	Po14	5	53.22(0.36)	0.09(0.12)	46.36(0.27)	0.16(0.03)	0.17(0.02)	100.12(1.21)
Alc+Saf+Sk+Po	All4	14	22.29(0.82)	44.12(0.80)	0.84(0.18)	31.64(0.20)	1.11(0.32)	100.22(0.80)
Saf	Sa15	5	3.44(1.06)	62.90(0.98)	0.12(0.08)	33.52(0.21)	0.01(0.00)	101.64(0.39)
Alc+Sa	All5	10	14.62(0.47)	51.78(0.52)	0.22(0.11)	33.36(0.13)	0.03(0.03)	100.48(0.88)
Alc+Sa	Sa15	3	6.43(0.19)	60.03(0.27)	0.12(0.02)	33.42(0.09)	0.01(0.00)	101.10(0.26)
Alc+Saf+Sk+Po	Sa15	7	3.89(0.94)	62.41(0.92)	0.68(0.22)	33.00(0.19)	0.03(0.02)	100.65(0.46)
Alc+Saf+Sk+Po	All5	5	22.91(1.40)	43.37(1.48)	1.41(0.40)	32.21(0.42)	0.09(0.09)	99.38(0.61)
Alc+Saf+Sk+Po	Sk15	11	1.68(0.32)	72.80(0.73)	0.11(0.05)	25.29(0.71)	0.11(0.06)	99.47(1.12)
Alc+Saf+Sk+Po	Po15	4	52.49(0.33)	0.29(0.42)	45.92(0.23)	0.09(0.06)	1.21(0.12)	99.28(0.64)
<i>dss</i> +Gdf	Gdf16	4	20.46(0.92)	45.90(0.95)	2.67(0.13)	0.04(0.03)	30.93(0.20)	100.26(1.24)
<i>dss</i> +Gdf	<i>dss</i> 16	10	4.23(2.22)	62.15(2.23)	21.21(1.16)	0.03(0.03)	12.38(1.24)	100.45(0.76)
Gdf+Krt	Krt16	20	1.68(0.97)	64.62(0.96)	0.45(0.16)	0.04(0.03)	33.21(0.15)	100.67(0.79)
Gdf+Krt	Gdf16	4	16.42(1.07)	49.84(1.09)	0.69(0.20)	0.02(0.02)	33.04(0.21)	100.97(0.84)
<i>dss</i> +Gdf+Krt	Krt16	18	1.47(0.82)	64.89(0.77)	1.51(0.51)	0.05(0.04)	32.08(0.49)	100.21(0.91)
<i>dss</i> +Gdf+Krt	Gdf16	9	18.39(2.26)	47.93(2.20)	1.73(0.39)	0.03(0.03)	31.92(0.42)	100.49(0.93)
<i>dss</i> +Gdf+Krt	<i>dss</i> 16	8	5.11(3.22)	61.29(3.14)	17.91(0.61)	0.42(0.56)	15.27(0.45)	100.32(1.15)
<i>dss</i> +Gdf	<i>dss</i> 17	8	4.63(2.11)	61.79(2.24)	20.03(1.61)	0.71(0.81)	12.85(1.21)	100.21(0.89)
<i>dss</i> +Gdf	Gdf17	2	20.45(0.32)	45.98(0.30)	2.84(0.32)	0.26(0.04)	30.47(0.38)	101.47(0.64)
Apy+ <i>dss</i> +Gdf+Sk+Po	Sk17	12	1.47(0.19)	73.03(0.74)	2.30(0.27)	19.00(1.01)	4.22(0.39)	101.46(0.28)
Apy+ <i>dss</i> +Gdf+Sk+Po	Po17	4	51.81(0.43)	0.41(0.26)	46.75(0.24)	0.03(0.01)	1.01(0.03)	98.69(0.19)
Apy+ <i>dss</i> +Gdf+Sk+Po	Gdf17	16	20.99(3.15)	45.37(3.17)	2.84(0.59)	1.17(0.25)	29.62(0.59)	100.36(0.81)
Apy+ <i>dss</i> +Gdf+Sk+Po	<i>dss</i> 17	12	3.57(1.38)	62.77(1.35)	23.35(0.59)	0.22(0.25)	10.09(0.59)	100.46(0.81)
Apy+ <i>dss</i> +Gdf+Sk+Po	Apy17	7	30.32(1.02)	35.99(0.99)	31.47(0.43)	0.07(0.05)	2.15(0.47)	98.85(0.29)
Saf+Gdf+Krt+Sk+Po	Sk17	17	0.58(0.21)	73.99(0.35)	0.54(0.19)	21.81(0.35)	3.12(0.22)	101.58(0.40)

Assemblage	#	N	S%	As%	Fe%	Co%	Ni%	Total
Saf+Gdf+Krt+Sk+Po	Sa17	7	3.73(1.03)	62.61(1.01)	0.31(0.05)	32.33(0.33)	1.02(0.29)	101.37(0.55)
Saf+Gdf+Krt+Sk+Po	Krt17	12	3.51(0.82)	62.86(0.84)	0.67(0.16)	0.73(0.25)	32.23(0.28)	100.53(0.86)
Saf+Gdf+Krt+Sk+Po	Po17	4	53.03(0.81)	0.15(0.03)	46.91(0.38)	0.23(0.04)	0.69(0.02)	99.98(0.32)
Saf+Gdf+Krt+Sk+Po	Gdf17	3	21.86(0.38)	44.43(0.10)	1.84(0.10)	3.01(0.25)	28.86(0.37)	100.50(0.44)
dss+Gdf+Krt+Sk+Po	Sk17	8	0.51(0.21)	74.28(0.41)	0.65(0.31)	20.48(0.59)	4.09(0.45)	101.57(0.46)
dss+Gdf+Krt+Sk+Po	Krt17	10	2.01(1.48)	64.37(1.48)	1.72(0.43)	0.35(0.14)	31.56(0.43)	99.63(1.61)
dss+Gdf+Krt+Sk+Po	Po17	5	52.50(0.26)	0.09(0.03)	46.37(0.28)	0.22(0.01)	0.82(0.03)	99.26(0.37)
dss+Gdf+Krt+Sk+Po	Gdf17	16	21.27(2.58)	45.10(2.59)	2.64(0.53)	1.62(0.48)	29.37(0.76)	99.71(1.18)
dss+Gdf+Krt+Sk+Po	dss17	5	4.81(1.77)	61.55(1.77)	18.61(0.72)	2.52(0.33)	12.50(0.74)	98.91(0.77)
Gdf+Krt	Krt18	12	2.58(0.94)	63.78(0.95)	0.35(0.16)	0.21(0.10)	33.08(0.20)	100.95(0.70)
Gdf+Krt	Gdf18	29	16.74(0.99)	49.61(1.02)	0.52(0.28)	0.69(0.61)	32.44(0.72)	100.07(1.21)
Alc+Saf+Gdf	Sa19	2	4.78(0.69)	61.47(0.80)	0.04(0.04)	33.19(0.12)	0.54(0.04)	100.55(0.21)
Alc+Saf+Gdf	Gdf19	3	21.37(0.91)	44.98(0.88)	0.10(0.07)	5.73(0.33)	27.82(0.35)	100.74(0.80)
Alc+Saf+Gdf	Al19	28	20.13(0.97)	46.24(0.95)	0.47(0.31)	31.25(0.64)	1.92(0.39)	100.55(0.35)
Saf+Gdf+Krt	Sa20	4	4.01(0.68)	62.34(0.68)	0.04(0.05)	32.66(0.12)	0.95(0.06)	100.92(0.12)
Saf+Gdf+Krt	Krt20	5	4.33(0.69)	61.96(0.85)	0.21(0.11)	0.93(0.26)	32.57(0.29)	100.60(0.79)
Saf+Gdf+Krt	Gdf20	2	18.50(1.00)	47.90(1.06)	0.11(0.02)	3.27(1.20)	30.22(1.12)	100.19(0.25)
Saf	Sa21	6	5.37(0.63)	60.96(0.66)	0.25(0.04)	33.30(0.10)	0.12(0.03)	100.62(0.67)
Alc+Sa	Sa21	6	3.84(0.24)	62.53(0.31)	0.22(0.13)	33.11(0.24)	0.30(0.13)	100.66(0.27)
Alc+Sa	Al21	4	18.50(2.71)	48.04(2.46)	0.36(0.22)	32.51(0.43)	0.59(0.01)	99.20(0.84)
Alc+Co	Co21	4	33.80(1.07)	32.74(1.10)	0.96(0.67)	32.36(0.62)	0.14(0.04)	98.94(0.37)
Alc+Co	Al21	10	23.86(1.07)	42.48(0.96)	0.96(0.67)	32.92(0.59)	(0.46(0.48)	100.74(0.49)
Alc+Sk+Po	Sk21	3	1.78(0.16)	73.44(0.33)	0.15(0.07)	22.65(0.90)	1.98(0.64)	100.05(1.53)
Alc+Sk+Po	Po21	18	53.20(0.58)	0.11(0.06)	46.54(0.88)	0.38(0.09)	0.11(0.05)	99.82(0.99)
Alc+Sk+Po	Al21	8	23.38(0.71)	43.02(0.76)	0.79(0.16)	32.46(0.20)	0.35(0.23)	99.96(0.67)
Saf	Sa22	2	4.28(0.74)	62.04(0.72)	0.19(0.03)	33.41(0.04)	0.08(0.04)	99.83(1.36)
Alc+Sa	Al22	3	14.29(0.46)	52.05(0.61)	0.09(0.01)	33.54(0.16)	0.03(0.02)	99.84(1.24)
Alc+Sa	Sa22	4	5.19(0.99)	61.16(0.89)	0.10(0.03)	33.46(0.12)	0.09(0.01)	100.29(1.34)
Saf	Sa23	9	4.19(1.00)	62.19(0.96)	0.18(0.11)	33.41(0.15)	0.03(0.02)	100.60(0.91)
Alc+Sa	Al23	6	16.64(1.81)	49.79(1.84)	1.11(0.39)	32.45(0.38)	0.02(0.01)	100.00(0.90)
Alc+Sa	Sa23	3	5.61(0.71)	60.79(0.73)	0.18(0.04)	33.40(0.08)	0.01(0.00)	101.18(0.49)
Apy+Lö+Sk+Po	Sk23	11	2.64(0.25)	71.48(0.24)	1.08(0.14)	24.66(0.16)	0.13(0.06)	101.58(0.39)
Apy+Lö+Sk+Po	Po23	5	51.86(0.43)	0.18(0.08)	47.74(0.38)	0.20(0.04)	0.03(0.01)	98.73(1.24)
Apy+Lö+Sk+Po	Lö23	7	2.17(1.14)	64.18(1.14)	32.66(0.18)	0.96(0.08)	0.04(0.029)	100.67(1.32)
Apy+Lö+Sk+Po	Apy23	6	30.45(2.60)	35.95(2.58)	30.22(1.22)	3.36(1.36)	0.03(0.02)	99.42(0.88)
Saf+Sk+Po	Sa23	4	2.18(0.66)	64.15(0.63)	2.54(0.39)	31.11(0.36)	0.02(0.01)	99.85(0.36)
Saf+Sk+Po	Sa22	6	3.43(1.94)	62.93(2.01)	1.60(0.34)	32.04(0.41)	0.01(0.01)	99.56(0.98)
Saf+Sk+Po	Sk22_23	2	1.31(0.25)	73.73(0.36)	0.40(0.19)	23.99(0.41)	0.63(0.46)	100.94(0.01)
Saf+Sk+Po	Po22_23	12	52.42(0.53)	0.12(0.05)	47.81(0.83)	0.45(0.06)	0.03(0.01)	100.61(0.66)

Assemblage gives the phase association. # indicate phase and sample no. N is the number of microprobe analyses.
S%, As%, Fe%, Co% and Ni% are the composition in atomic %. The minerals are alloclasite (Alc), arsenopyrite (Apy)
 $\alpha(\text{Fe}_{0.65}\text{Ni}_{0.35})\text{As}_{1.4}\text{S}_{0.6}$ (α), cobaltite (Cbt), Gersdorffite (Gdf), diarsenide solid-solution (*dss*), Krutovite (Krt), löllingite (Lö), pyrrhotite (Po), safflorite (Saf) and skutterudite (Sk).