Incremental Heating			36Ar(a)	37Ar(ca)	38Ar(cl)	39Ar(k)	40Ar(r)	Age ± 2σ (Ma)	40Ar(r) (%)	39Ar(k) (%)	K/Ca ± 2σ
06C3085	0.21 W		0.000484	0.000876	0.000086	0.003420	0.006873	7.20 ± 6.77	5.05	0.19	1.7 ± 0.2
06C3086	0.53 W		0.000469	0.000435	0.000187	0.019325	0.004143	0.77 ± 1.55	2.90	1.06	19.1 ± 6.3
06C3087	0.71 W		0.000416	0.000501	0.000300	0.033422	0.015101	1.61 ± 0.76	10.94	1.83	28.7 ± 7.0
06C3089	0.94 W	✓	0.000614	0.001489	0.000894	0.093348	0.049574	1.90 ± 0.30	21.44	5.10	26.9 ± 3.2
06C3091	1.06 W	✓	0.000271	0.001238	0.000724	0.079755	0.048863	2.19 ± 0.33	37.83	4.36	27.7 ± 3.1
06C3092	1.24 W	✓	0.000406	0.002604	0.001089	0.119194	0.068189	2.04 ± 0.21	36.23	6.51	19.7 ± 1.3
06C3094	1.33 W	✓	0.000435	0.002624	0.001495	0.154870	0.089845	2.07 ± 0.16	41.07	8.46	25.4 ± 1.7
06C3095	1.56 W	✓	0.000652	0.003880	0.002196	0.232237	0.131972	2.03 ± 0.15	40.60	12.69	25.7 ± 1.4
06C3097	1.74 W	✓	0.000660	0.003413	0.002116	0.220013	0.122762	1.99 ± 0.14	38.58	12.02	27.7 ± 1.6
06C3098	2.06 W	✓	0.000653	0.003575	0.002225	0.235842	0.140238	2.12 ± 0.13	42.03	12.88	28.4 ± 1.6
06C3100	2.27 W	✓	0.000451	0.004747	0.001749	0.188783	0.107815	2.04 ± 0.16	44.67	10.31	17.1 ± 0.9
06C3101	2.65 W	✓	0.000446	0.005711	0.001707	0.179847	0.109440	2.17 ± 0.17	45.31	9.83	13.5 ± 0.7
06C3103	3.06 W	✓	0.000376	0.008861	0.001295	0.134064	0.077881	2.07 ± 0.23	41.18	7.32	6.5 ± 0.3
06C3104	3.51 W	✓	0.000186	0.003691	0.000637	0.069021	0.039111	2.02 ± 0.37	41.50	3.77	8.0 ± 0.4
06C3106	4.27 W		0.000156	0.001613	0.000437	0.049657	0.022785	1.64 ± 0.48	33.04	2.71	13.2 ± 1.4
06C3107	5.51 W		0.000088	0.001568	0.000172	0.017668	0.007029	1.42 ± 1.49	21.35	0.97	4.8 ± 0.4
		Σ	0.006762	0.046827	0.017310	1.830467	1.027875				

Information on Analysis

Sample = TAM-2 2F7-06
Material = Biotite 300-500µm
Location = Tama'i, Samoa
Analyst = Jamie Russell
Project = SAMOA
Mass Discrimination Law = LIN
Irradiation = OSU2F06
J = 0.00197590 ± 0.00000533
FCT-3 = 28.030 ± 0.003 Ma

Results	40(r)/39(k) ± 2σ	Age ± 2σ (Ma)	MSWD	39Ar(k) (%,n)	K/Ca ± 2σ
Age Plateau	0.5785 ± 0.0153 (± 2.64%)	2.07 ± 0.06 (± 2.70%)	0.57	93.25	10.2 ± 3.9
			84%	11	
	Minimal External Error ± 0.07		1.45	2σ Confidence Limit	
	Analytical Error ± 0.05		1.0000	Error Magnification	
Total Fusion Age	0.5615 ± 0.0172 (± 3.06%)	2.01 ± 0.06 (± 3.11%)		16	16.8 ± 0.7
	Minimal External Error ± 0.07				
	Analytical Error ± 0.06				

Normal Isochron			39(k)/36(a) ± 2σ	40(a+r)/36(a) ± 2σ	r.i.
06C3085	0.21 W		7.1 ± 0.3	281.3 ± 12.7	0.9615
06C3086	0.53 W		41.2 ± 2.5	304.3 ± 18.5	0.9956
06C3087	0.71 W		80.4 ± 4.7	331.8 ± 19.3	0.9940
06C3089	0.94 W	✓	152.0 ± 6.7	376.2 ± 16.5	0.9948
06C3091	1.06 W	✓	293.9 ± 26.7	475.6 ± 43.2	0.9983
06C3092	1.24 W	✓	293.9 ± 16.9	463.7 ± 26.6	0.9952
06C3094	1.33 W	✓	355.7 ± 18.9	501.9 ± 26.5	0.9953
06C3095	1.56 W	✓	356.2 ± 18.3	497.9 ± 25.5	0.9964
06C3097	1.74 W	✓	333.2 ± 15.1	481.4 ± 21.6	0.9914
06C3098	2.06 W	✓	361.0 ± 16.0	510.2 ± 22.6	0.9898
06C3100	2.27 W	✓	418.7 ± 26.6	534.6 ± 33.9	0.9959
06C3101	2.65 W	✓	403.2 ± 25.5	540.8 ± 34.1	0.9967
06C3103	3.06 W	✓	356.8 ± 27.8	502.8 ± 39.0	0.9974
06C3104	3.51 W	✓	370.8 ± 48.8	505.6 ± 66.5	0.9980
06C3106	4.27 W		318.4 ± 46.1	441.6 ± 64.0	0.9987
06C3107	5.51 W		201.8 ± 57.4	375.8 ± 107.0	0.9985

Results	40(a)/36(a) ± 2σ	40(r)/39(k) ± 2σ	Age ± 2σ (Ma)	MSWD
Normal Isochron	284.1373 ± 20.4016 ± 7.18%	0.6108 ± 0.0615 ± 10.06%	2.18 ± 0.22 ± 10.07%	0.50 88%
			Minimal External Error ± 0.22	
			Analytical Error ± 0.22	

Statistics				
	2σ Confidence Limit	1.94	Convergence	0.0000046369
	Error Magnification	1.0000	Number of Iterations	8
	Number of Data Points	11	Calculated Line	Weighted York-2

Inverse Isochron			39(k)/40(a+r) ± 2σ	36(a)/40(a+r) ± 2σ	r.i.
06C3085	0.21 W		0.025115 ± 0.000321	0.003555 ± 0.000160	0.0296
06C3086	0.53 W		0.135511 ± 0.000776	0.003286 ± 0.000199	0.0358
06C3087	0.71 W		0.242322 ± 0.001545	0.003014 ± 0.000175	0.0370
06C3089	0.94 W	✓	0.404078 ± 0.001814	0.002658 ± 0.000116	0.0186
06C3091	1.06 W	✓	0.618052 ± 0.003266	0.002103 ± 0.000191	0.0338
06C3092	1.24 W	✓	0.633934 ± 0.003570	0.002157 ± 0.000124	0.0401
06C3094	1.33 W	✓	0.708812 ± 0.003633	0.001993 ± 0.000105	0.0178
06C3095	1.56 W	✓	0.715345 ± 0.003110	0.002008 ± 0.000103	0.0110
06C3097	1.74 W	✓	0.692132 ± 0.004088	0.002077 ± 0.000093	0.0284
06C3098	2.06 W	✓	0.707644 ± 0.004486	0.001960 ± 0.000087	0.0538
06C3100	2.27 W	✓	0.783135 ± 0.004535	0.001871 ± 0.000119	0.0176
06C3101	2.65 W	✓	0.745442 ± 0.003849	0.001849 ± 0.000117	0.0192
06C3103	3.06 W	✓	0.709703 ± 0.003980	0.001989 ± 0.000154	0.0159
06C3104	3.51 W	✓	0.733337 ± 0.006065	0.001978 ± 0.000260	0.0264
06C3106	4.27 W		0.720982 ± 0.005343	0.002265 ± 0.000328	0.0383
06C3107	5.51 W		0.537009 ± 0.008271	0.002661 ± 0.000758	0.0425

Results	40(a)/36(a) ± 2σ	40(r)/39(k) ± 2σ	Age ± 2σ (Ma)	MSWD
Inverse Isochron	283.9582 ± 20.4771 ± 7.21%	0.6122 ± 0.0606 ± 9.91%	2.19 ± 0.22 ± 9.91%	0.51 87%
			Minimal External Error ± 0.22	
			Analytical Error ± 0.22	

Statistics				
	2σ Confidence Limit	1.94	Convergence	0.0000053533
	Error Magnification	1.0000	Number of Iterations	3
	Number of Data Points	11	Calculated Line	Weighted York-2
	Spreading Factor	23.2%		

Institute of Geophysics and Planetary Physics
Scripps Institution of Oceanography, La Jolla, USA

Relative Abundances			36Ar	%1σ	37Ar	%1σ	38Ar	%1σ	39Ar	%1σ	40Ar	%1σ	Age ± 2σ (Ma)	40Ar(r) (%)	39Ar(k) (%)	K/Ca ± 2σ
06C3085	0.21 W		0.0004843	2.246	0.0008757	5.206	0.0002180	5.411	0.0034203	0.605	0.1361691	0.207	7.20 ± 6.77	5.05	0.19	1.7 ± 0.2
06C3086	0.53 W		0.0004687	3.028	0.0004351	16.266	0.0005088	2.658	0.0193254	0.226	0.1426416	0.176	0.77 ± 1.55	2.90	1.06	19.1 ± 6.3
06C3087	0.71 W		0.0004158	2.900	0.0005007	11.992	0.0007828	2.180	0.0334221	0.259	0.1379780	0.185	1.61 ± 0.76	10.94	1.83	28.7 ± 7.0
06C3089	0.94 W	✓	0.0006146	2.183	0.0014894	5.523	0.0021389	0.872	0.0933488	0.203	0.2311683	0.094	1.90 ± 0.30	21.44	5.10	26.9 ± 3.2
06C3091	1.06 W	✓	0.0002718	4.528	0.0012381	5.228	0.0017410	1.293	0.0797560	0.171	0.1291744	0.200	2.19 ± 0.33	37.83	4.36	27.7 ± 3.1
06C3092	1.24 W	✓	0.0004064	2.859	0.0026044	2.603	0.0026081	0.593	0.1191957	0.216	0.1882192	0.178	2.04 ± 0.21	36.23	6.51	19.7 ± 1.3
06C3094	1.33 W	✓	0.0004363	2.636	0.0026238	2.608	0.0034520	0.586	0.1548720	0.232	0.2187481	0.106	2.07 ± 0.16	41.07	8.46	25.4 ± 1.7
06C3095	1.56 W	✓	0.0006535	2.550	0.0038800	1.696	0.0051308	0.511	0.2322402	0.203	0.3250342	0.072	2.03 ± 0.15	40.60	12.69	25.7 ± 1.4
06C3097	1.74 W	✓	0.0006616	2.240	0.0034132	1.953	0.0049042	0.489	0.2200156	0.261	0.3182404	0.134	1.99 ± 0.14	38.58	12.02	27.7 ± 1.6
06C3098	2.06 W	✓	0.0006546	2.202	0.0035750	1.926	0.0052031	0.515	0.2358445	0.250	0.3336668	0.192	2.12 ± 0.13	42.03	12.88	28.4 ± 1.6
06C3100	2.27 W	✓	0.0004525	3.160	0.0047473	1.861	0.0041197	0.700	0.1887862	0.260	0.2413719	0.123	2.04 ± 0.16	44.67	10.31	17.1 ± 0.9
06C3101	2.65 W	✓	0.0004479	3.137	0.0057114	1.595	0.0039680	0.671	0.1798511	0.226	0.2415591	0.121	2.17 ± 0.17	45.31	9.83	13.5 ± 0.7
06C3103	3.06 W	✓	0.0003783	3.854	0.0088607	1.096	0.0029889	0.688	0.1340705	0.248	0.1891231	0.128	2.07 ± 0.23	41.18	7.32	6.5 ± 0.3
06C3104	3.51 W	✓	0.0001873	6.528	0.0036911	1.778	0.0015079	1.066	0.0690235	0.315	0.0942327	0.266	2.02 ± 0.37	41.50	3.77	8.0 ± 0.4
06C3106	4.27 W		0.0001565	7.216	0.0016127	5.056	0.0010676	1.490	0.0496583	0.186	0.0689563	0.319	1.64 ± 0.48	33.04	2.71	13.2 ± 1.4
06C3107	5.51 W		0.0000880	14.144	0.0015683	4.073	0.0004022	3.727	0.0176695	0.357	0.0329305	0.681	1.42 ± 1.49	21.35	0.97	4.8 ± 0.4
		Σ	0.0067780	0.783	0.0468267	0.623	0.0407420	0.202	1.8304998	0.072	3.0292136	0.041				

Information on Analysis and Constants Used in Calculations

Sample = TAM-2 2F7-06
Material = Biotite 300-500µm
Location = Tama'i, Samoa
Analyst = Jamie Russell
Project = SAMOA
Mass Discrimination Law = LIN
Irradiation = OSU2F06
J = 0.00197590 ± 0.00000533
FCT-3 = 28.030 ± 0.003 Ma
IGSN = KOP000049
Preferred Age = Plateau Age
Classification = Eruption Age
Experiment Type = Incremental Heating
Extraction Method = Bulk Laser Heating
Heating = 600 sec
Isolation = 15.00 min
Instrument = MAP215-50
Lithology = Trachybasalt
Lat-Lon = 13°45.3'S - 170°32.1'E

Age Equations = Conventional
Negative Intensities = Allowed
Decay Constant 40K = 5.530 ± 0.048 E-10 1/a
Decay Constant 39Ar = 2.940 ± 0.016 E-07 1/h
Decay Constant 37Ar = 8.230 ± 0.012 E-04 1/h
Decay Constant 36Cl = 2.236 ± 0.045 E-06 1/a
Production Ratio 36/38 in Cl = 316.0 ± 15.8

Results	40(r)/39(k) ± 2σ	Age ± 2σ (Ma)	MSWD	39Ar(k) (%,n)	K/Ca ± 2σ
Age Plateau	0.5785 ± 0.0153	2.07 ± 0.06	0.57	93.25	10.2 ± 3.9
	± 2.64%	± 2.70%	84%	11	
	Minimal External Error	± 0.07	1.45	2σ Confidence Limit	
	Analytical Error	± 0.05	1.0000	Error Magnification	
Total Fusion Age	0.5615 ± 0.0172	2.01 ± 0.06		16	16.8 ± 0.7
	± 3.06%	± 3.11%			
	Minimal External Error	± 0.07			
	Analytical Error	± 0.06			
Normal Isochron	0.6108 ± 0.0615	2.18 ± 0.22	0.50	93.25	
	± 10.06%	± 10.07%	88%	11	
	Minimal External Error	± 0.22	1.94	2σ Confidence Limit	
	Analytical Error	± 0.22	1.0000	Error Magnification	
Inverse Isochron	0.6122 ± 0.0606	2.19 ± 0.22	0.51	93.25	
	± 9.91%	± 9.91%	87%	11	
	Minimal External Error	± 0.22	1.94	2σ Confidence Limit	
	Analytical Error	± 0.22	1.0000	Error Magnification	

Degassing Patterns			36Ar(a)	%1σ	36Ar(c)	%1σ	36Ar(ca)	%1σ	36Ar(cl)	%1σ	37Ar(ca)	%1σ	38Ar(a)	%1σ	38Ar(c)	%1σ	38Ar(k)	%1σ	38Ar(ca)	%1σ	38Ar(cl)	%1σ	39Ar(k)	%1σ	39Ar(ca)	%1σ	40Ar(r)	%1σ	40Ar(a)	%1σ	40Ar(c)	%1σ	40Ar(k)	%1σ
06C3085	0.21 W		0.000484	2.25	0.000000	0.00	0.000000	5.22	0.000000	14.92	0.000876	5.21	0.000090	2.25	0.000000	0.00	0.000041	0.61	0.000000	22.51	0.000086	15.86	0.003420	0.61	0.000001	5.52	0.006873	46.94	0.143037	2.25	0.000000	0.00	0.000006	24.91
06C3086	0.53 W		0.000469	3.03	0.000000	0.00	0.000000	16.27	0.000000	9.13	0.000435	16.27	0.000088	3.03	0.000000	0.00	0.000234	0.25	0.000000	27.28	0.000187	10.60	0.019325	0.23	0.000000	16.37	0.004143	101.41	0.138466	3.03	0.000000	0.00	0.000032	24.90
06C3087	0.71 W		0.000416	2.90	0.000000	0.00	0.000000	12.00	0.000000	7.87	0.000501	11.99	0.000078	2.90	0.000000	0.00	0.000405	0.28	0.000000	24.97	0.000300	9.54	0.033422	0.26	0.000000	12.13	0.015101	23.66	0.122822	2.90	0.000000	0.00	0.000055	24.90
06C3089	0.94 W	✓	0.000614	2.18	0.000000	0.00	0.000000	5.53	0.000000	5.79	0.001489	5.52	0.000115	2.18	0.000000	0.00	0.001130	0.23	0.000000	22.59	0.000894	7.91	0.093348	0.20	0.000001	5.82	0.049574	8.01	0.181440	2.18	0.000000	0.00	0.000154	24.90
06C3091	1.06 W	✓	0.000271	4.54	0.000000	0.00	0.000000	5.24	0.000000	6.23	0.001238	5.23	0.000051	4.54	0.000000	0.00	0.000966	0.20	0.000000	22.52	0.000724	8.24	0.079755	0.17	0.000001	5.54	0.048863	7.46	0.080180	4.54	0.000000	0.00	0.000132	24.90
06C3092	1.24 W	✓	0.000406	2.87	0.000000	0.00	0.000001	2.63	0.000000	5.58	0.002604	2.60	0.000076	2.87	0.000000	0.00	0.001443	0.24	0.000000	22.05	0.001089	7.76	0.119194	0.22	0.000002	3.18	0.068189	5.06	0.119833	2.87	0.000000	0.00	0.000197	24.90
06C3094	1.33 W	✓	0.000435	2.64	0.000000	0.00	0.000001	2.63	0.000000	5.56	0.002624	2.61	0.000081	2.64	0.000000	0.00	0.001875	0.25	0.000000	22.05	0.001495	7.74	0.154870	0.23	0.000002	3.19	0.089845	3.79	0.128648	2.64	0.000000	0.00	0.000256	24.90
06C3095	1.56 W	✓	0.000652	2.56	0.000000	0.00	0.000001	1.74	0.000000	5.53	0.003880	1.70	0.000122	2.56	0.000000	0.00	0.002812	0.23	0.000000	21.97	0.002196	7.72	0.232237	0.20	0.000003	2.50	0.131972	3.74	0.192679	2.56	0.000000	0.00	0.000383	24.90
06C3097	1.74 W	✓	0.000660	2.24	0.000000	0.00	0.000001	1.99	0.000000	5.52	0.003413	1.95	0.000123	2.24	0.000000	0.00	0.002664	0.28	0.000000	21.99	0.002116	7.71	0.220013	0.26	0.000002	2.68	0.122762	3.58	0.195115	2.24	0.000000	0.00	0.000363	24.90
06C3098	2.06 W	✓	0.000653	2.21	0.000000	0.00	0.000001	1.96	0.000000	5.53	0.003575	1.93	0.000122	2.21	0.000000	0.00	0.002856	0.27	0.000000	21.98	0.002225	7.72	0.235842	0.25	0.000003	2.66	0.140238	3.07	0.193039	2.21	0.000000	0.00	0.000389	24.90
06C3100	2.27 W	✓	0.000451	3.17	0.000000	0.00	0.000001	1.90	0.000000	5.65	0.004747	1.86	0.000084	3.17	0.000000	0.00	0.002286	0.28	0.000000	21.98	0.001749	7.80	0.188783	0.26	0.000003	2.61	0.107815	3.93	0.133246	3.17	0.000000	0.00	0.000311	24.90
06C3101	2.65 W	✓	0.000446	3.15	0.000000	0.00	0.000002	1.64	0.000000	5.62	0.005711	1.60	0.000083	3.15	0.000000	0.00	0.002178	0.25	0.000000	21.96	0.001707	7.78	0.179847	0.23	0.000004	2.43	0.109440	3.80	0.131822	3.15	0.000000	0.00	0.000297	24.90
06C3103	3.06 W	✓	0.000376	3.88	0.000000	0.00	0.000002	1.16	0.000000	5.63	0.008861	1.10	0.000070	3.88	0.000000	0.00	0.001624	0.27	0.000000	21.93	0.001295	7.79	0.134064	0.25	0.000006	2.13	0.077881	5.54	0.111021	3.88	0.000000	0.00	0.000221	24.90
06C3104	3.51 W	✓	0.000186	6.57	0.000000	0.00	0.000001	1.82	0.000000	5.97	0.003691	1.78	0.000035	6.57	0.000000	0.00	0.000836	0.33	0.000000	21.97	0.000637	8.04	0.069021	0.32	0.000003	2.55	0.039111	9.26	0.055008	6.57	0.000000	0.00	0.000114	24.90
06C3106	4.27 W		0.000156	7.24	0.000000	0.00	0.000000	5.07	0.000000	6.52	0.001613	5.06	0.000029	7.24	0.000000	0.00	0.000601	0.21	0.000000	22.48	0.000437	8.46	0.049657	0.19	0.000001	5.38	0.022785	14.68	0.046089	7.24	0.000000	0.00	0.000082	24.90
06C3107	5.51 W		0.000088	14.22	0.000000	0.00	0.000000	4.09	0.000000	10.35	0.001568	4.07	0.000016	14.22	0.000000	0.00	0.000214	0.37	0.000000	22.28	0.000172	11.67	0.017668	0.36	0.000001	4.47	0.007029	52.43	0.025872	14.22	0.000000	0.00	0.000029	24.90
		Σ	0.006762	0.78	0.000000	0.00	0.000013	0.63	0.000003	1.70	0.046827	0.62	0.001264	0.78	0.000000	0.00	0.022167	0.08	0.000001	6.81	0.017310	2.35	1.830467	0.07	0.000033	0.84	1.027875	1.53	1.998319	0.78	0.000000	0.00	0.003020	7.53
		Σ							0.006778	0.78	0.046827	0.62									0.040742	1.00			1.830500	0.07							3.029214	0.73

Additional Parameters			40(r)/39(k)	1σ	40(r+a)	1σ	40Ar/39Ar	1σ	37Ar/39Ar	1σ	36Ar/39Ar	1σ	Time (days)	37Ar (decay)	39Ar (decay)	40Ar (moles)
06C3085	0.21 W		2.009943	0.94352	0.136163	0.00028	39.811548	0.25471	0.256014	0.01342	0.141594	0.00329	86.791	5.56877110	1.00061361	1.378E-20
06C3086	0.53 W		0.214401	0.21742	0.142610	0.00025	7.381028	0.02113	0.022512	0.00366	0.024255	0.00074	86.812	5.57106312	1.00061376	1.444E-20
06C3087	0.71 W		0.451817	0.10689	0.137923	0.00026	4.128344	0.01315	0.014980	0.00180	0.012442	0.00036	86.833	5.57335608	1.00061391	1.396E-20
06C3089	0.94 W	✓	0.531065	0.04254	0.231014	0.00022	2.476392	0.00554	0.015955	0.00088	0.006584	0.00014	86.875	5.57802135	1.00061421	2.339E-20
06C3091	1.06 W	✓	0.612664	0.04573	0.129043	0.00026	1.619619	0.00426	0.015524	0.00081	0.003408	0.00015	86.917	5.58269053	1.00061451	1.307E-20
06C3092	1.24 W	✓	0.572089	0.02898	0.188023	0.00034	1.579077	0.00442	0.021850	0.00057	0.003410	0.00010	86.938	5.58498828	1.00061465	1.905E-20
06C3094	1.33 W	✓	0.580130	0.02204	0.218493	0.00024	1.412445	0.00360	0.016942	0.00044	0.002817	0.00007	86.981	5.58966329	1.00061495	2.214E-20
06C3095	1.56 W	✓	0.568262	0.02126	0.324651	0.00025	1.399560	0.00301	0.016707	0.00029	0.002814	0.00007	87.001	5.59196391	1.00061510	3.289E-20
06C3097	1.74 W	✓	0.557977	0.02005	0.317877	0.00044	1.446445	0.00425	0.015513	0.00031	0.003007	0.00007	87.044	5.59664475	1.00061540	3.221E-20
06C3098	2.06 W	✓	0.594628	0.01833	0.333278	0.00065	1.414775	0.00446	0.015158	0.00029	0.002776	0.00006	87.065	5.59894825	1.00061555	3.377E-20
06C3100	2.27 W	✓	0.571104	0.02249	0.241060	0.00031	1.278546	0.00368	0.025146	0.00047	0.002397	0.00008	87.107	5.60363494	1.00061585	2.443E-20
06C3101	2.65 W	✓	0.608517	0.02319	0.241262	0.00030	1.343106	0.00344	0.031756	0.00051	0.002491	0.00008	87.128	5.60594131	1.00061599	2.445E-20
06C3103	3.06 W	✓	0.580921	0.03223	0.188902	0.00025	1.410623	0.00393	0.066090	0.00074	0.002822	0.00011	87.170	5.61063386	1.00061629	1.914E-20
06C3104	3.51 W	✓	0.566658	0.05249	0.094119	0.00025	1.365228	0.00563	0.053476	0.00097	0.002713	0.00018	87.192	5.61302010	1.00061644	9.536E-21
06C3106	4.27 W		0.458850	0.06735	0.068874	0.00022	1.388615	0.00512	0.032476	0.00164	0.003151	0.00023	87.233	5.61764152	1.00061674	6.978E-21
06C3107	5.51 W		0.397835	0.20857	0.032901	0.00022	1.863699	0.01434	0.088757	0.00363	0.004981	0.00070	87.255	5.62003074	1.00061689	3.333E-21

Procedure Blanks		36Ar	1σ	37Ar	1σ	38Ar	1σ	39Ar	1σ	40Ar	1σ
06C3085	0.21 W	0.000002	0.000007	0.000022	0.000006	0.000000	0.000007	0.000012	0.000011	0.003342	0.000016
06C3086	0.53 W	0.000009	0.000009	0.000096	0.000009	0.000059	0.000010	0.000077	0.000007	0.003360	0.000206
06C3087	0.71 W	0.000011	0.000009	0.000064	0.000009	0.000032	0.000010	0.000048	0.000007	0.003504	0.000204
06C3089	0.94 W	0.000014	0.000009	0.000040	0.000009	0.000006	0.000010	0.000035	0.000007	0.003601	0.000201
06C3091	1.06 W	0.000017	0.000009	0.000045	0.000009	0.000003	0.000010	0.000056	0.000007	0.003589	0.000199
06C3092	1.24 W	0.000019	0.000009	0.000051	0.000009	0.000006	0.000010	0.000071	0.000007	0.003586	0.000198
06C3094	1.33 W	0.000023	0.000009	0.000061	0.000009	0.000015	0.000010	0.000102	0.000007	0.003638	0.000197
06C3095	1.56 W	0.000024	0.000009	0.000063	0.000009	0.000018	0.000010	0.000114	0.000007	0.003702	0.000196
06C3097	1.74 W	0.000028	0.000009	0.000054	0.000009	0.000020	0.000010	0.000124	0.000007	0.003906	0.000196
06C3098	2.06 W	0.000029	0.000009	0.000045	0.000009	0.000019	0.000010	0.000123	0.000007	0.004030	0.000197
06C3100	2.27 W	0.000031	0.000009	0.000023	0.000009	0.000012	0.000010	0.000106	0.000007	0.004267	0.000198
06C3101	2.65 W	0.000031	0.000009	0.000013	0.000009	0.000007	0.000010	0.000093	0.000007	0.004342	0.000198
06C3103	3.06 W	0.000028	0.000009	0.000008	0.000009	0.000007	0.000010	0.000065	0.000007	0.004290	0.000201
06C3104	3.51 W	0.000025	0.000009	0.000020	0.000009	0.000007	0.000010	0.000054	0.000007	0.004097	0.000202
06C3106	4.27 W	0.000015	0.000009	0.000091	0.000009	0.000015	0.000010	0.000054	0.000007	0.003233	0.000205
06C3107	5.51 W	0.000007	0.000009	0.000162	0.000009	0.000035	0.000010	0.000072	0.000007	0.002449	0.000207

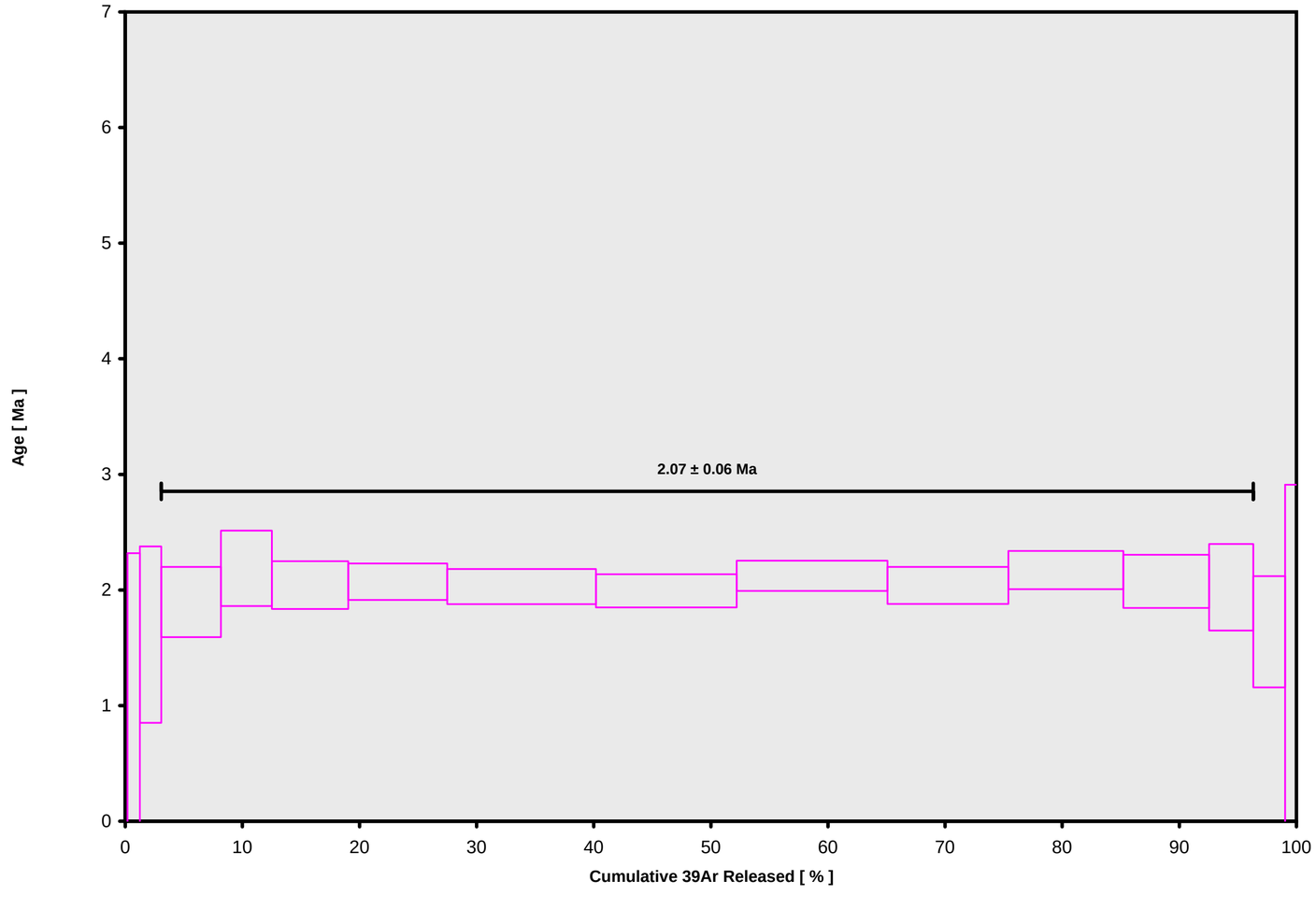
Intercept Values		36Ar	1σ	r2		37Ar	1σ	r2		38Ar	1σ	r2		39Ar	1σ	r2		40Ar	1σ	r2	
06C3085	0.21 W	0.000485	0.000008	0.4813	LIN #	0.000178	0.000006	0.8761	EXP #	0.000216	0.000009	0.0283	LIN #	0.003385	0.000016	0.9790	EXP #	0.137152	0.000276	0.9101	EXP # 9
06C3086	0.53 W	0.000477	0.000011	0.4206	LIN #	0.000172	0.000009	0.8440	EXP #	0.000562	0.000009	0.6921	LIN #	0.019131	0.000029	0.9717	EXP #	0.143505	0.000142	0.9547	EXP # 1 7
06C3087	0.71 W	0.000426	0.000008	0.2531	LIN #	0.000152	0.000006	0.9113	EXP #	0.000807	0.000013	0.1777	LIN #	0.033002	0.000067	0.9807	EXP # 1	0.139063	0.000150	0.9443	EXP # 6
06C3089	0.94 W	0.000627	0.000009	0.2923	LIN #	0.000304	0.000012	0.7788	EXP #	0.002124	0.000014	0.8506	LIN #	0.092068	0.000115	0.9948	LIN # 6	0.230732	0.000081	0.9968	LIN # 7 11 12
06C3091	1.06 W	0.000288	0.000009	0.1919	LIN #	0.000265	0.000008	0.8837	LIN #	0.001727	0.000019	0.5594	LIN #	0.078687	0.000047	0.9988	EXP #	0.130480	0.000161	0.7505	LIN # 1 2 3
06C3092	1.24 W	0.000424	0.000007	0.0246	LIN #	0.000514	0.000008	0.8750	EXP #	0.002589	0.000008	0.9383	LIN # 8 10	0.117598	0.000171	0.9941	LIN # 1	0.188525	0.000266	0.9338	EXP # 3 7
06C3094	1.33 W	0.000458	0.000007	0.0001	LIN #	0.000527	0.000008	0.7825	LIN #	0.003433	0.000014	0.9701	LIN # 1 9	0.152820	0.000255	0.9898	LIN #	0.218604	0.000120	0.9923	EXP # 1
06C3095	1.56 W	0.000676	0.000014	0.0751	LIN #	0.000751	0.000007	0.9106	EXP #	0.005099	0.000018	0.9506	LIN #	0.229125	0.000286	0.9945	EXP # 4	0.323146	0.000127	0.9980	LIN # 1 2 5
06C3097	1.74 W	0.000687	0.000011	0.2351	LIN #	0.000659	0.000008	0.8537	EXP #	0.004876	0.000015	0.9724	LIN #	0.217038	0.000448	0.9840	LIN # 8 12	0.316606	0.000373	0.9797	LIN # 1
06C3098	2.06 W	0.000682	0.000011	0.0175	LIN #	0.000679	0.000008	0.8919	EXP #	0.005171	0.000018	0.9468	LIN #	0.232665	0.000448	0.9888	EXP # 1	0.331921	0.000599	0.9704	LIN # 1 2
06C3100	2.27 W	0.000482	0.000011	0.0008	LIN #	0.000864	0.000012	0.5334	EXP #	0.004090	0.000023	0.8517	LIN # 1	0.186212	0.000382	0.9858	LIN # 1	0.241391	0.000217	0.9764	LIN # 1 2
06C3101	2.65 W	0.000477	0.000011	0.1110	LIN #	0.001025	0.000013	0.6061	LIN #	0.003936	0.000021	0.9100	LIN #	0.177426	0.000283	0.9901	EXP #	0.241696	0.000211	0.9568	LIN # 12
06C3103	3.06 W	0.000405	0.000011	0.0333	LIN #	0.001578	0.000012	0.1453	EXP #	0.002967	0.000015	0.9278	LIN #	0.132258	0.000250	0.9890	EXP # 1	0.190105	0.000134	0.9848	EXP #
06C3104	3.51 W	0.000211	0.000009	0.0005	LIN #	0.000673	0.000007	0.7168	EXP #	0.001500	0.000011	0.7336	LIN #	0.068118	0.000185	0.9782	EXP #	0.096658	0.000145	0.7874	LIN # 1
06C3106	4.27 W	0.000171	0.000007	0.0041	LIN #	0.000375	0.000011	0.5930	EXP #	0.001073	0.000012	0.5287	LIN #	0.049031	0.000046	0.9972	LIN # 8 12	0.070975	0.000077	0.9820	EXP #
06C3107	5.51 W	0.000094	0.000009	0.0197	LIN #	0.000437	0.000007	0.0756	EXP #	0.000433	0.000011	0.7028	LIN #	0.017500	0.000055	0.9624	EXP # 7	0.034788	0.000084	0.9939	EXP # 1 2

Sample Parameters		Sample	Material	Location	Analyst	Temp	Standard (in Ma)	%1σ	J	%1σ	MDF	%1σ	Volume Ratio	Sensitivity (mol/volt)	Day	Month	Year	Hour	Min	Resist	Irradiation	Project	Experiment	Nmb	Standard Name
06C3085	0.21 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	0.21	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0172	1.012E-19	01	SEP	2006	10	02	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3086	0.53 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	0.53	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0174	1.012E-19	01	SEP	2006	10	32	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3087	0.71 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	0.71	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0174	1.012E-19	01	SEP	2006	11	02	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3089	0.94 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	0.94	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0175	1.012E-19	01	SEP	2006	12	03	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3091	1.06 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	1.06	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0175	1.012E-19	01	SEP	2006	13	04	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3092	1.24 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	1.24	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0174	1.012E-19	01	SEP	2006	13	34	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3094	1.33 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	1.33	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0173	1.012E-19	01	SEP	2006	14	35	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3095	1.56 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	1.56	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0173	1.012E-19	01	SEP	2006	15	05	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3097	1.74 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	1.74	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0175	1.012E-19	01	SEP	2006	16	06	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3098	2.06 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	2.06	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0174	1.012E-19	01	SEP	2006	16	36	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3100	2.27 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	2.27	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0176	1.012E-19	01	SEP	2006	17	37	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3101	2.65 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	2.65	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0174	1.012E-19	01	SEP	2006	18	07	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3103	3.06 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	3.06	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0174	1.012E-19	01	SEP	2006	19	08	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3104	3.51 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	3.51	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0173	1.012E-19	01	SEP	2006	19	39	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3106	4.27 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	4.27	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.0171	1.012E-19	01	SEP	2006	20	39	001	OSU2F06	Samoa	06C3085	01	FCT-3
06C3107	5.51 W	TAM-2 2F7-06	Biotite 300-500µm	Tama'i, Samoa	Jamie Russell	5.51	28.03	0.01	0.0019759	0.27	1.00378	0.16	1.017	1.012E-19	01	SEP	2006	21	10	001	OSU2F06	Samoa	06C3085	01	FCT-3

Irradiation Constants		40/36(a)	%1σ	40/36(c)	%1σ	38/36(a)	%1σ	38/36(c)	%1σ	39/37(ca)	%1σ	38/37(ca)	%1σ	36/37(ca)	%1σ	40/39(k)	%1σ	38/39(k)	%1σ	36/38(cl)	%1σ	K/Ca	%1σ	K/Cl	%1σ	Ca/Cl	%1σ
06C3085	0.21 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3086	0.53 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3087	0.71 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3089	0.94 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3091	1.06 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3092	1.24 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3094	1.33 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3095	1.56 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3097	1.74 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3098	2.06 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3100	2.27 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3101	2.65 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3103	3.06 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3104	3.51 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3106	4.27 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0
06C3107	5.51 W	295.5	0	0.018	35	0.1869	0	1.493	3	0.000709	1.83	0.000032	21.9	0.000269	0.37	0.00165	24.9	0.01211	0.1	0	0	0.43	2	0	0	0	0

40Ar/39Ar Geochronology Laboratory
COAS, Oregon State University, Corvallis, USA

06C3085.AGE >>> TAM-2 2F7-06 >>> SAMOA PROJECT



Ar-Ages in Ma

WEIGHTED PLATEAU
2.07 ± 0.06
TOTAL FUSION
2.01 ± 0.06
NORMAL ISOCHRON
2.18 ± 0.22
INVERSE ISOCHRON
2.19 ± 0.22

MSWD (PROBABILITY)
0.57 (84%)

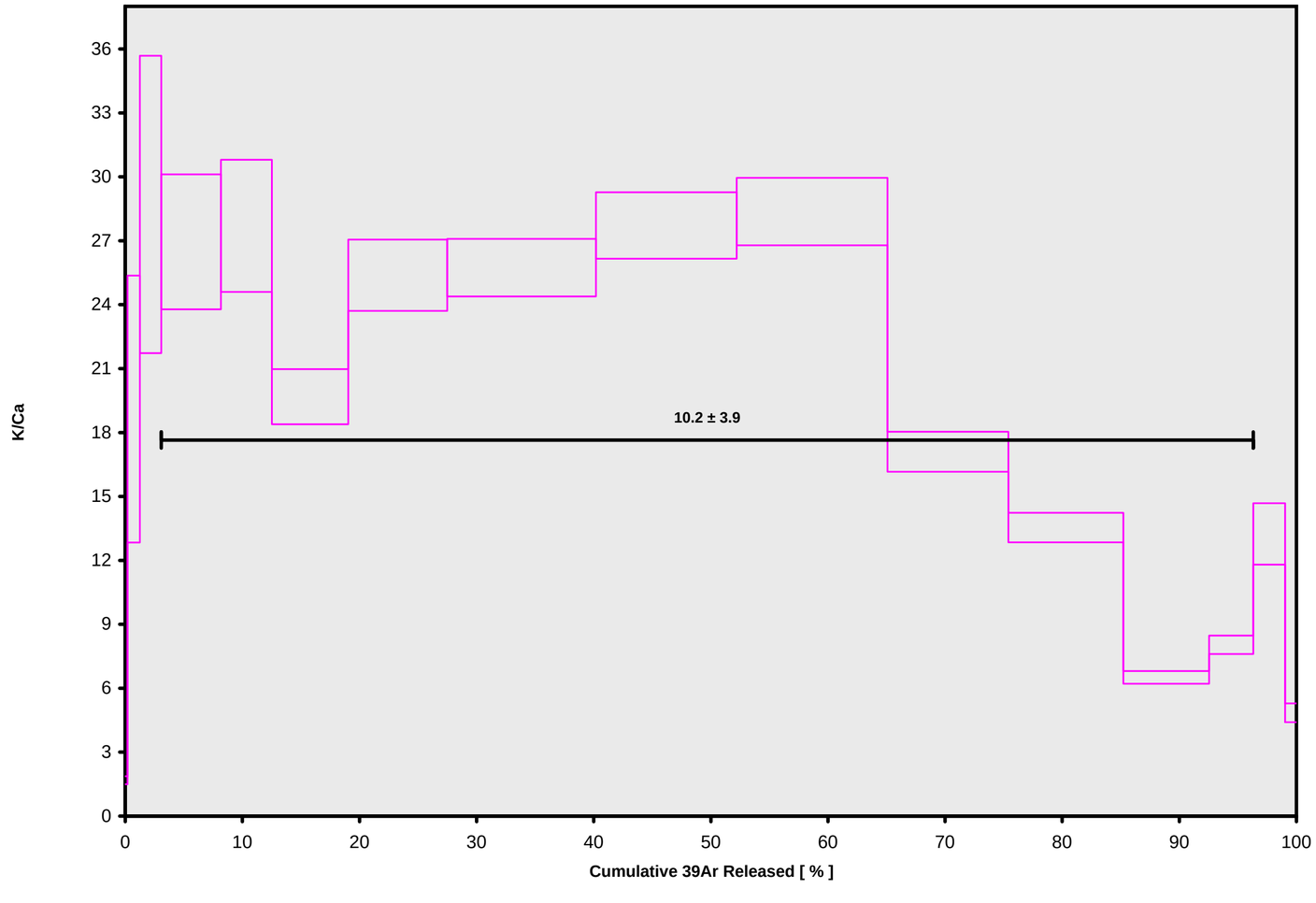
Sample Info

Biotite 300-500µm
Tama'i, Samoa
Jamie Russell

IRR = OSU2F06
J = 0.00197590 ± 0.00000533

40Ar/39Ar Geochronology Laboratory
COAS, Oregon State University, Corvallis, USA

06C3085.AGE >>> TAM-2 2F7-06 >>> SAMOA PROJECT



Ar-Ages in Ma

WEIGHTED PLATEAU
2.07 ± 0.06
TOTAL FUSION
2.01 ± 0.06
NORMAL ISOCHRON
2.18 ± 0.22
INVERSE ISOCHRON
2.19 ± 0.22

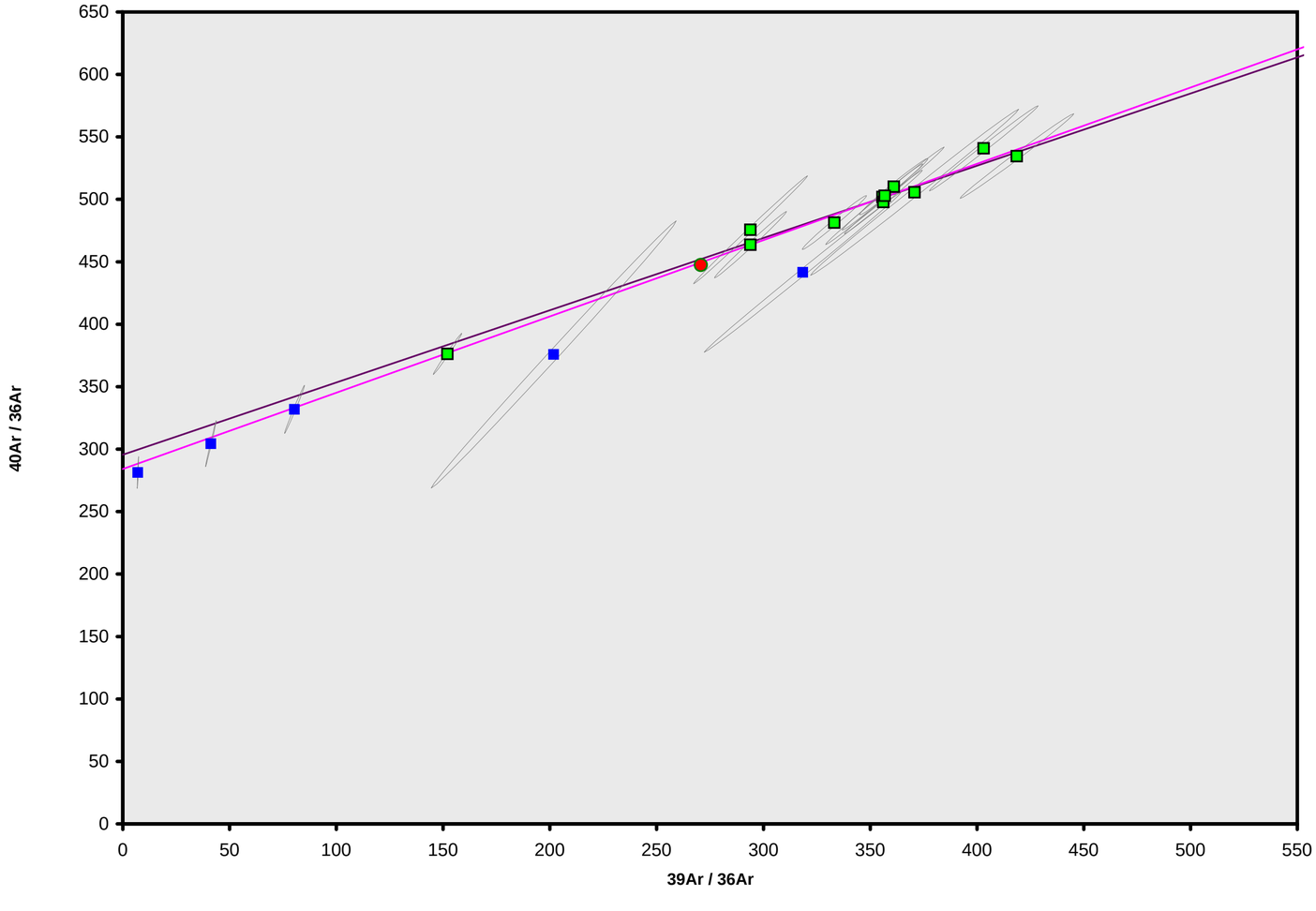
Sample Info

Biotite 300-500µm
Tama'i, Samoa
Jamie Russell

IRR = OSU2F06
J = 0.00197590 ± 0.00000533

40Ar/39Ar Geochronology Laboratory
COAS, Oregon State University, Corvallis, USA

06C3085.AGE >>> TAM-2 2F7-06 >>> SAMOA PROJECT



Ar-Ages in Ma

WEIGHTED PLATEAU
2.07 ± 0.06
TOTAL FUSION
2.01 ± 0.06
NORMAL ISOCHRON
2.18 ± 0.22
INVERSE ISOCHRON
2.19 ± 0.22

MSWD (PROBABILITY)
0.50 (88%)

40AR/36AR INTERCEPT
284.1 ± 20.4

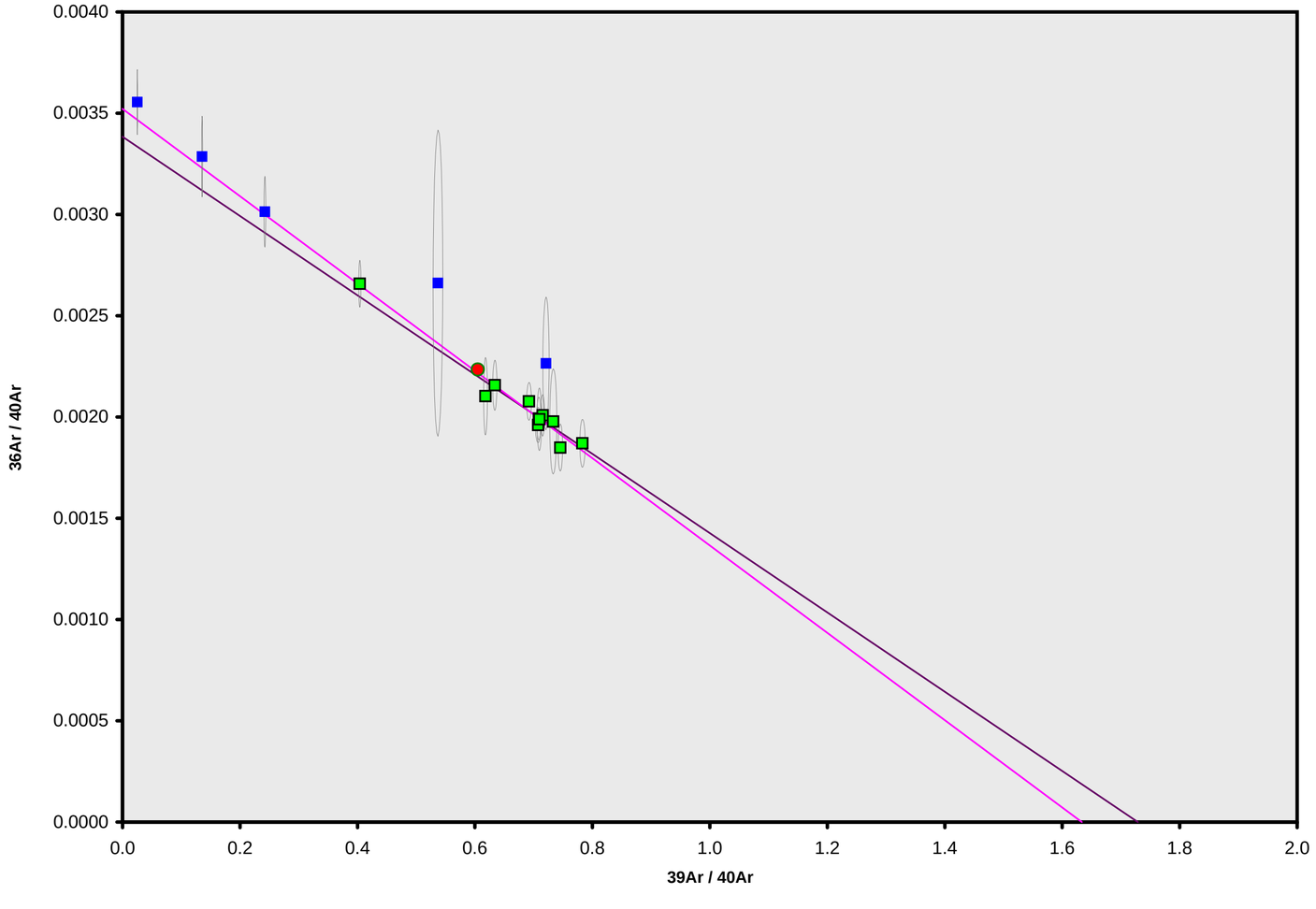
Sample Info

Biotite 300-500µm
Tama'i, Samoa
Jamie Russell

IRR = OSU2F06
J = 0.00197590 ± 0.00000533

40Ar/39Ar Geochronology Laboratory
COAS, Oregon State University, Corvallis, USA

06C3085.AGE >>> TAM-2 2F7-06 >>> SAMOA PROJECT



Ar-Ages in Ma

WEIGHTED PLATEAU
2.07 ± 0.06
TOTAL FUSION
2.01 ± 0.06
NORMAL ISOCHRON
2.18 ± 0.22
INVERSE ISOCHRON
2.19 ± 0.22

MSWD (PROBABILITY)
0.51 (87%)

SPREADING FACTOR
23.2%

40AR/36AR INTERCEPT
284.0 ± 20.5

Sample Info

Biotite 300-500µm
Tama'i, Samoa
Jamie Russell

IRR = OSU2F06
J = 0.00197590 ± 0.00000533