Table DR1. Isotopic Data for U-Pb Analyses

| Samples[a] | Concentrations[b] | | | Pb Isotopic Compositions[c] | | | Radiogenic Ratios[d] | | | Ages (Ma)[e] | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | Wt(mg) | U(ppm) | Pb(ppm) | $^{206}Pb/^{204}Pb$ | $^{207}Pb/^{206}Pb$ | $^{208}Pb/^{206}Pb$ | $^{206}Pb/^{238}U$ | $^{207}Pb/^{235}U$ | $^{207}Pb/^{206}Pb$ | $^{206}Pb/^{238}U$ | $^{207}Pb/^{235}U$ | $^{207}Pb/^{206}Pb$ |
| **Van Horn Area** | | | | | | | | | | | | |
| Carrizo Mountain Group | | | | | | | | | | | | |
| Mylonitized rhyolite of Hackett Peak Formation | | | | | | | | | | | | |
| nm(0)AA | 0.4195 | 51`.27 | 13.83 | 607.3 | 0.11003 | 0.27549 | 0.22150 ±1.51 | 2.66111 ±1.56 | 0.08713 ±0.376 | 1290 ±19 | 1318 ±21 | 1363 ±7 |
| m(0)AA | 0.2987 | 82.34 | 20.62 | 803.1 | 0.10450 | 0.26201 | 0.20984 ±1.51 | 2.52313 ±1.52 | 0.08721 ±0.139 | 1228 ±19 | 1279 ±19 | 1365 ±3 |
| m(1)AA | 0.4893 | 16.74 | 4.57 | 539.3 | 0.11432 | 0.27745 | 0.22514 ±1.52 | 2.74916 ±1.56 | 0.08856 ±0.347 | 1309 ±20 | 1342 ±21 | 1395 ±7 |
| m(2)AA | 0.2902 | 32.93 | 8.57 | 1295.7 | 0.09852 | 0.24083 | 0.22720 ±1.52 | 2.75134 ±1.52 | 0.08783 ±0.077 | 1320 ±20 | 1342 ±20 | 1379 ±1 |
| m(3)AA | 1.0016 | 42.85 | 10.66 | 1977.9 | 0.09427 | 0.22184 | 0.21856 ±1.49 | 2.63076 ±1.50 | 0.08730 ±0.121 | 1274 ±19 | 1309 ±20 | 1367 ±2 |
| m(4)AA | 0.6737 | 29.22 | 7.45 | 2702.5 | 0.09258 | 0.22142 | 0.22614 ±1.50 | 2.72832 ±1.51 | 0.08750 ±0.077 | 1314 ±20 | 1336 ±20 | 1371 ±1 |
| Metarhyolite of Hackett Peak Formation | | | | | | | | | | | | |
| nm(2) -200 | 0.2000 | 131.5 | 30.56 | 3257.5 | 0.08909 | 0.32424 | 0.18944 ±0.48 | 2.22354 ±0.48 | 0.08513 ±0.060 | 1118 ±5 | 1188 ±6 | 1318 ±1 |
| nm(2) -200AA | 0.0815 | 67.47 | 15.23 | 939.3 | 0.10002 | 0.23743 | 0.19295 ±0.81 | 2.29176 ±0.97 | 0.08614 ±0.519 | 1137 ±9 | 1210 ±12 | 1341 ±10 |
| m(2.5) AA | 0.3265 | 18.19 | 4.30 | 975.5 | 0.09996 | 0.24194 | 0.20485 ±1.51 | 2.42050 ±1.52 | 0.08570 ±0.163 | 1201 ±18 | 1248 ±19 | 1331 ±3 |
| m(5) | 0.2000 | 89.4 | 21.29 | 5280.9 | 0.08772 | 0.20445 | 0.21329 ±0.46 | 2.51534 ±0.46 | 0.08553 ±0.060 | 1246 ±6 | 1276 ±6 | 1327 ±1 |
| Pegmatite intruding metarhyolite of Hackett Peak Formation | | | | | | | | | | | | |
| nm(0)A A -100 | .0289 | 75.03 | 19.71 | 234.6 | 0.14487 | 0.31615 | 0.22480 ±3.66 | 2.70680 ±3.72 | 0.08733 ±0.597 | 1307 ±48 | 1330 ±49 | 1368 ±11 |
| m(0)-200 | .1507 | 87.27 | 20.08 | 570.5 | 0.10877 | 0.23783 | 0.19838 ±2.13 | 2.32649 ±2.14 | 0.08506 ±0.168 | 1167 ±25 | 1220 ±26 | 1317 ±3 |
| m(1)-200 | .0313 | 25.36 | 7.87 | 162.6 | 0.16665 | 0.38650 | 0.22395 ±3.00 | 2.63623 ±3.06 | 0.08537 ±0.537 | 1303 ±39 | 1311 ±40 | 1324 ±10 |
| Gabbro or mafic diorite | | | | | | | | | | | | |
| ClearAA | 0.0231 | 87.71 | 36.18 | 87.58 | 0.24378 | 0.66790 | 0.22135 ±3.51 | 2.63387 ±3.59 | 0.08630 ±0.631 | 1289 ±45 | 1310 ±47 | 1345 ±12 |
| Colored | 0.0164 | 504.1 | 113.8 | 2261.6 | 0.10640 | 0.08938 | 0.22081 ±2.07 | 3.08159 ±2.07 | 0.10122 ±0.081 | 1286 ±27 | 1428 ±30 | 1646 ±2 |
| Allamore Formation | | | | | | | | | | | | |
| A-285 Ash Bed | | | | | | | | | | | | |
| AA | 0.0200 (est) | 252.3 | 27.4 | 285.7 | 0.13066 | 0.32344 | 0.08273 ±0.63 | 0.94108 ±0.82 | 0.08250 ±0.501 | 512.4 ±3 | 673.4 ±6 | 1257 ±10 |
| Stubby | 0.0300 (est) | 240.4 | 47.1 | 332.3 | 0.12414 | 0.30804 | 0.15129 ±2.33 | 1.71912 ±2.33 | 0.08241 ±0.170 | 908.2 ±21 | 1016 ±24 | 1255 ±3 |
| Frag-ments | 0.0200 (est) | 476.6 | 59.3 | 183.3 | 0.15804 | 0.36269 | 0.08661 ±1.02 | 0.98127 ±1.09 | 0.08217 ±0.369 | 535.5 ±5 | 694.3 ±8 | 1249 ±7 |
| A-200 Ash Bed | | | | | | | | | | | | |
| Large AA | 0.0150 | 95.3 | 28.0 | 214.4 | 0.14786 | 0.37794 | 0.21026 ±0.96 | 2.45090 ±1.76 | 0.08454 ±1.37 | 1230 ±12 | 1258 ±22 | 1305 ±27 |
| equant AA | .0.0500 | 110.9 | 22.3 | 1974.2 | 0.09275 | 0.18079 | 0.18421 ±2.08 | 2.18510 ±2.09 | 0.08603 ±0.223 | 1090 ±23 | 1176 ±25 | 1339 ±4 |
| prisms AA | 0.0250 | 328.3 | 64.7 | 1359.2 | 0.09157 | 0.19856 | 0.17660 ±0.94 | 1.98924 ±0.96 | 0.08169 ±0.184 | 1048 ±10 | 1112 ±11 | 1238 ±4 |
| equant | 0.0532 | 187.3 | 33.1 | 800.0 | 0.09944 | 0.21633 | 0.15300 ±0.49 | 1.74375 ±0.54 | 0.08266 ±0.234 | 917.7 ±4 | 1025 ±6 | 1261 ±5 |
| prismatic | 0.0391 | 271.0 | 46.2 | 284.5 | 0.13118 | 0.29310 | 0.13082 ±0.56 | 1.49068 ±1.07 | 0.08264 ±0.863 | 792.5 ±4 | 926.6 ±10 | 1261 ±17 |

Tumbledown Formation

Basal Siliclastic Unit

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TDSS-1 | 0.0100 (est) | 69.2 | 15.3 | 328.3 | 0.12157 | 0.31586 | 0.17547 ±2.21 | 1.98190 ±2.34 | 0.08192 ±0.563 | 1042 ±23 | 1109 ±26 | 1243 ±7 |
| TDSS-2 | 0.0200 (est) | 296.1 | 61.4 | 607.6 | 0.10620 | 0.22852 | 0.17605 ±0.287 | 2.03190 ±0.621 | 0.08371 ±0.389 | 1045 ±3 | 1126 ±7 | 1286 ±5 |

Upper Felsite

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TDFT-1 | 0.0500 (est) | 93.2 | 18.5 | 437.6 | 0.11321 | 0.22222 | 0.16747 ±0.50 | 1.88910 ±0.56 | 0.08181 ±0.482 | 998.1 ±5 | 1077 ±6 | 1241 ±6 |
| TDFT-2AA | 0.0500 (est) | 27.3 | 6.1 | 191.1 | 0.15458 | 0.32248 | 0.16333 ±0.72 | 1.85230 ±0.85 | 0.08225 ±0.479 | 975.3 ±7 | 1064 ±9 | 1251 ±6 |
| TDFT-3AA | 0.0500 (est) | 94.8 | 15.2 | 713.4 | 0.10133 | 0.19467 | 0.14123 ±0.47 | 1.60620 ±0.51 | 0.08248 ±0.159 | 851.6 ±4 | 972.6 ±5 | 1257 ±2 |
| TDFT-4AA | 0.0700 (est) | 63.8 | 13.0 | 360.1 | 0.12033 | 0.22580 | 0.16919 ±0.50 | 1.91600 ±0.55 | 0.08213 ±0.240 | 1008 ±5 | 1087 ±6 | 1249 ±3 |
| TDFT-5AA | 0.0400 (est) | 239.1 | 26.4 | 1405.4 | 0.09206 | 0.16836 | 0.10121 ±0.64 | 1.15280 ±0.77 | 0.08268 ±0.159 | 621.5 ±4 | 778.6 ±6 | 1260 ±2 |
| TDFT-6AA | 0.0700 (est) | 61.2 | 9.6 | 615.5 | 0.10419 | 0.20638 | 0.13670 ±0.61 | 1.55170 ±0.63 | 0.08233 ±0.239 | 825.9 ±5 | 951.2 ±6 | 1253 ±3 |
| TDFT-7 | 0.0500 (est.) | 162.1 | 24.8 | 1325.9 | 0.09250 | 0.16803 | 0.13864 ±0.48 | 1.57680 ±0.52 | 0.08249 ±0.239 | 837.0 ±4 | 961.1 ±5 | 1257 ±3 |

**Franklin Mountains Area**

Castner Marble Ash Beds

CAT-1

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| nm(2) +200 prisms | 0.0994 | 235.6 | 44.4 | 439.2 | 0.11469 | 0.27016 | 0.15384 ±2.07 | 1.76382 ±2.08 | 0.08315 ±0.089 | 922.5 ±19 | 1032 ±21 | 1273 ±2 |
| m(2) +200 prisms | 0.0377 | 178.5 | 32.6 | 495.4 | 0.11026 | 0.25044 | 0.15754 ±2.22 | 1.79430 ±2.24 | 0.08261 ±0.270 | 943.1 ±21 | 1043 ±23 | 1260 ±5 |
| m(2) +200 round | 0.0368 | 379.7 | 56.3 | 421.0 | 0.11736 | 0.22678 | 0.12610 ±2.11 | 1.47427 ±2.12 | 0.08480 ±0.146 | 765.6 ±16 | 919.9 ±20 | 1311 ±3 |
| nm(3) -200 | 0.2041 | 275.1 | 41.4 | 732.0 | 0.10244 | 0.29202 | 0.12311 ±2.24 | 1.41799 ±2.24 | 0.08354 ±0.077 | 748.4 ±17 | 896.5 ±20 | 1282 ±1 |
| m(3) -200 | 0.2063 | 115.1 | 20.5 | 640.1 | 0.10554 | 0.29375 | 0.14577 ±2.07 | 1.68665 ±2.07 | 0.08392 ±0.079 | 877.2 ±18 | 1003 ±21 | 1291 ±1 |
| Prisms AA | 0.025 | 137.2 | 28.0 | 1634.0 | 0.08970 | 0.24469 | 0.17877 ±2.14 | 2.04793 ±2.14 | 0.08308 ±0.134 | 1060 ±23 | 1132 ±24 | 1271 ±3 |
| Bulk AA | 0.1661 | 185.9 | 42.9 | 6405.3 | 0.08827 | 0.24195 | 0.20171 ±2.06 | 2.40207 ±2.06 | 0.08637 ±0.069 | 1184 ±24 | 1243 ±26 | 1346 ±1 |
| Leached | 0.1793 | 172.8 | 32.6 | 4641.2 | 0.06687 | 0.24307 | 0.16604 ±2.06 | 1.87626 ±2.07 | 0.08195 ±0.093 | 990.3 ±20 | 1072 ±22 | 1244 ±2 |

CAT-2

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| nm(10) equant | 0.0868 | 239.1 | 29.3 | 2768.5 | 0.08445 | 0.22408 | 0.10859 ±2.27 | 1.19885 ±2.28 | 0.08007 ±0.179 | 664.6 ±15 | 800.1 ±18 | 1199 ±3 |
| m(10) | 0.0530 | 324.1 | 38.4 | 1704.1 | 0.08709 | 0.21252 | 0.10544 ±2.32 | 1.15793 ±2.59 | 0.07965 ±1.13 | 646.2 ±15 | 781.0 ±20 | 1188 ±22 |
| -200AA | 0.0263 | 52.9 | 11.1 | 782.8 | 0.09702 | 0.30650 | 0.17728 ±2.32 | 2.01446 ±2.33 | 0.08241 ±0.176 | 1052 ±24 | 1120 ±26 | 1255 ±3 |
| leached | 0.1025 | 34.1 | 3.8 | 1608.2 | 0.08476 | 0.22650 | 0.09831 ±2.09 | 1.07532 ±2.09 | 0.07933 ±0.079 | 604.5 ±13 | 741.3 ±15 | 1180 ±2 |

Red Bluff granite

FM-157

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| nm(0)AA | 0.2494 | 28.5 | 5.2 | 1148.9 | 0.08877 | 0.20345 | 0.16832 ±1.51 | 1.77552 ±1.51 | 0.07651 ±0.120 | 1003 ±15 | 1036 ±16 | 1108 ±2 |
| m(2) large AA | 1.0350 | 378.3 | 59.8 | 3543.3 | 0.07979 | 0.16182 | 0.14739 ±1.49 | 1.54172 ±1.50 | 0.07586 ±0.057 | 886.3 ±13 | 947.2 ±14 | 1091 ±1 |
| m(1) small AA | 1.1209 | 258.8 | 41.6 | 1376.3 | 0.08579 | 0.19384 | 0.14475 ±1.49 | 1.50810 ±1.55 | 0.07557 0.376 | 871.4 ±13 | 933.7 ±14 | 1084 ±7 |
| m(1) large AA | 1.6682 | 372.3 | 55.3 | 3162.0 | 0.08015 | 0.15613 | 0.13887 ±1.54 | 1.45027 ±1.54 | 0.07574 ±0.075 | 838.3 ±13 | 910.0 ±14 | 1088 ±1 |

[a] nm = nonmagnetic; m = magnetic; numbers in parentheses indicate tilt on Frantz separator at 1.7 amperes; AA = air abraded

[b] Total U and Pb, corrected for analytical blank

[c] Measured ratios, not corrected for blank or mass discrimination

[d] Ratios corrected for mass discrimination, analytical blank and non-radiogenic Pb (Stacey and Kramers, 1975 model); uncertainties (2 sigma) given in percent

[e] Absolute errors given at 2 sigma

## Table DR2: $^{40}Ar/^{39}Ar$ Analytical Data
## Laser Fusion Data

| Increment | 36Ar/ 40Ar | ± | 39Ar/ 40Ar | ± | 39ArK moles | Cum% 39Ar | 40Ar % | Age (Ma) | ± (Ma) |
|---|---|---|---|---|---|---|---|---|---|
| **CMG Hornblende J = 8.29E-03 ± 1.25E-04** | | | | | | | | | |
| 1 | 5.29E-05 | 4.06E-05 | 9.39E-03 | 2.44E-04 | 1.71E-15 | 9.66 | 98.42 | 1128.04 | 27.19 |
| 2 | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | 2.39E-04 | 8.68E-05 | 9.40E-03 | 5.75E-04 | 3.81E-16 | 11.81 | 92.92 | 1079.60 | 55.90 |
| 4 | 1.14E-04 | 3.42E-05 | 1.03E-02 | 3.05E-04 | 1.39E-15 | 19.65 | 96.62 | 1036.88 | 27.45 |
| 5 | 3.13E-05 | 2.55E-05 | 1.08E-02 | 3.23E-04 | 1.63E-15 | 28.84 | 99.06 | 1022.38 | 26.88 |
| 6 | 3.45E-05 | 9.17E-05 | 1.08E-02 | 6.40E-04 | 5.51E-16 | 31.95 | 98.97 | 1016.46 | 51.90 |
| 7 | 1.43E-04 | 1.65E-04 | 1.06E-02 | 6.54E-04 | 4.26E-16 | 34.35 | 95.75 | 1009.95 | 63.03 |
| 8 | 8.69E-05 | 8.29E-05 | 9.97E-03 | 5.81E-04 | 5.40E-16 | 37.40 | 97.42 | 1070.25 | 52.65 |
| 9 | 1.69E-05 | 7.86E-05 | 1.01E-02 | 9.16E-04 | 3.92E-16 | 39.61 | 99.49 | 1080.64 | 77.46 |
| 10 | 1.42E-04 | 4.96E-05 | 1.09E-02 | 4.58E-04 | 8.02E-16 | 44.14 | 95.78 | 987.53 | 35.92 |
| 11 | 1.66E-04 | 3.56E-05 | 1.04E-02 | 3.32E-04 | 1.19E-15 | 50.86 | 95.09 | 1016.75 | 28.73 |
| 12 | 3.87E-05 | 2.30E-05 | 1.03E-02 | 1.52E-04 | 2.38E-15 | 64.28 | 98.84 | 1053.86 | 17.71 |
| 13 | 7.27E-05 | 3.07E-05 | 1.02E-02 | 2.57E-04 | 2.71E-15 | 79.58 | 97.84 | 1053.21 | 24.54 |
| 14 | 8.00E-05 | 1.03E-04 | 1.01E-02 | 6.67E-04 | 3.84E-16 | 81.74 | 97.62 | 1063.97 | 60.06 |
| 15 | 1.32E-04 | 2.69E-04 | 9.43E-03 | 8.39E-04 | 3.52E-16 | 83.73 | 96.08 | 1104.56 | 101.13 |
| 16 | 8.64E-05 | 1.08E-04 | 1.05E-02 | 3.01E-04 | 4.84E-16 | 86.46 | 97.43 | 1029.08 | 36.07 |
| 17 | 2.10E-04 | 1.52E-04 | 9.04E-03 | 9.73E-04 | 2.10E-16 | 87.64 | 93.78 | 1119.43 | 99.11 |
| 18 | 0.00E+00 | 1.79E-04 | 8.48E-03 | 1.17E-03 | 2.56E-16 | 89.09 | 100.0 | 1229.62 | 132.67 |
| 19 | 2.13E-05 | 7.67E-05 | 1.07E-02 | 3.53E-04 | 7.20E-16 | 93.15 | 99.36 | 1033.43 | 33.83 |
| 20 | 5.01E-05 | 3.65E-05 | 1.04E-02 | 4.84E-04 | 1.21E-15 | 100.00 | 98.50 | 1046.94 | 39.92 |

Total Gas Age 1053.03 ± 16.15 Ma
Error Wtd. Mean 1048.17 ± 7.10 Ma
39Ar Wtd. Mean 1053.40 ± 8.35 Ma

| | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| **CMG Muscovite J = 8.29E-03 + 1.25E-04** | | | | | | | | | |
| 1 | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 2 | 6.17E-06 | 1.33E-05 | 1.03E-02 | 1.68E-04 | 2.49E-15 | 4.80 | 99.80 | 1062.34 | 18.07 |
| 3 | 7.67E-06 | 1.42E-05 | 1.05E-02 | 1.85E-04 | 2.77E-15 | 10.14 | 99.76 | 1045.36 | 18.64 |
| 4 | 1.50E-05 | 1.26E-05 | 1.05E-02 | 1.68E-04 | 3.02E-15 | 15.96 | 99.54 | 1044.71 | 17.69 |
| 5 | 8.05E-06 | 1.11E-05 | 1.11E-02 | 1.66E-04 | 3.13E-15 | 21.99 | 99.75 | 1007.07 | 16.62 |
| 6 | 8.48E-06 | 1.44E-05 | 1.08E-02 | 1.58E-04 | 2.42E-15 | 26.66 | 99.73 | 1026.22 | 16.76 |
| 7 | 9.06E-06 | 1.43E-05 | 1.08E-02 | 2.60E-04 | 2.41E-15 | 31.30 | 99.72 | 1022.90 | 22.37 |
| 8 | 4.24E-06 | 1.29E-05 | 1.11E-02 | 2.33E-04 | 2.63E-15 | 36.37 | 99.86 | 1005.21 | 20.15 |
| 9 | 6.63E-06 | 1.03E-05 | 1.05E-02 | 1.94E-04 | 3.62E-15 | 43.35 | 99.79 | 1050.14 | 19.16 |
| 10 | 2.07E-05 | 1.26E-05 | 1.05E-02 | 2.16E-04 | 3.02E-15 | 49.17 | 99.37 | 1043.34 | 20.40 |

| | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| 11 | 5.35E-06 | 1.18E-05 | 1.06E-02 | 2.95E-04 | 2.69E-15 | 54.35 | 99.83 | 1042.74 | 25.25 |
| 12 | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 13 | 8.30E-07 | 1.30E-05 | 1.06E-02 | 2.95E-04 | 2.68E-15 | 59.52 | 99.96 | 1045.63 | 25.42 |
| 14 | 7.48E-06 | 1.18E-05 | 1.06E-02 | 2.89E-04 | 3.14E-15 | 65.57 | 99.76 | 1043.80 | 24.95 |
| 15 | 3.60E-06 | 1.61E-05 | 1.08E-02 | 2.14E-04 | 2.43E-15 | 70.25 | 99.88 | 1026.32 | 19.85 |
| 16 | 5.82E-06 | 1.24E-05 | 1.07E-02 | 1.34E-04 | 3.01E-15 | 76.06 | 99.81 | 1035.43 | 15.72 |
| 17 | 1.02E-05 | 9.20E-06 | 1.07E-02 | 2.12E-04 | 3.70E-15 | 83.18 | 99.68 | 1034.46 | 19.76 |
| 18 | 1.07E-05 | 1.44E-05 | 1.06E-02 | 2.06E-04 | 2.63E-15 | 88.25 | 99.67 | 1038.61 | 19.72 |
| 19 | 4.81E-06 | 1.29E-05 | 1.08E-02 | 1.59E-04 | 3.02E-15 | 94.08 | 99.84 | 1029.38 | 16.83 |
| 20 | 4.54E-06 | 1.12E-05 | 1.08E-02 | 1.37E-04 | 3.07E-15 | 100.00 | 99.85 | 1023.26 | 15.57 |

Total Gas Age 1035.09 + 19.99 Ma
Error Wtd. Mean 1033.76 + 4.43 Ma
39Ar Wtd. Mean 1035.03 + 4.61 Ma

## Furnace Incremental Heating Data

| Temp. (K) | 36Ar/40Ar | ± | 39Ar/40Ar | ± | 39ArK moles | Cum% 39Ar | 40Ar % | Age (Ma) | ± (Ma) |
|---|---|---|---|---|---|---|---|---|---|
| **CMG Hornblende J = 8.29E-03 + 1.25E-04** | | | | | | | | | |
| 1100 | 6.71E-05 | 1.71E-05 | 1.14E-02 | 9.42E-06 | 2.94E-13 | 47.50 | 98.00 | 968.84 | 11.96 |
| 1150 | 2.05E-05 | 3.00E-05 | 1.07E-02 | 2.47E-05 | 1.15E-13 | 65.99 | 99.38 | 1028.36 | 13.85 |
| 1175 | 1.38E-05 | 2.93E-05 | 1.12E-02 | 3.45E-05 | 5.90E-14 | 75.51 | 99.58 | 997.52 | 13.55 |
| 1200 | 2.02E-05 | 1.84E-05 | 1.20E-02 | 1.05E-04 | 3.90E-14 | 81.81 | 99.39 | 942.11 | 13.42 |
| 1225 | 2.69E-05 | 2.08E-05 | 1.28E-02 | 8.05E-05 | 2.68E-14 | 86.14 | 99.19 | 896.47 | 12.35 |
| 1250 | 1.33E-05 | 5.17E-05 | 1.23E-02 | 6.99E-05 | 1.73E-14 | 88.93 | 99.59 | 924.80 | 16.10 |
| 1275 | 1.76E-05 | 4.93E-05 | 1.07E-02 | 1.70E-04 | 1.38E-14 | 91.15 | 99.47 | 1029.07 | 20.67 |
| 1300 | 7.08E-05 | 9.37E-05 | 9.78E-03 | 1.83E-04 | 1.23E-14 | 93.13 | 97.89 | 1089.73 | 30.37 |
| 1350 | 2.43E-05 | 2.88E-05 | 9.03E-03 | 1.50E-04 | 1.42E-14 | 95.43 | 99.27 | 1168.01 | 20.65 |
| 1550 | 5.84E-04 | 3.07E-05 | 7.57E-03 | 5.27E-05 | 2.19E-14 | 98.97 | 82.74 | 1163.00 | 17.07 |
| 1700 | 0.00E+00 | 2.13E-04 | 1.06E-02 | 2.72E-04 | 6.41E-15 | 100.00 | 100.0 | 1041.67 | 55.03 |

Total Gas Age 993.35 + 11.53 Ma
Error Wtd. Mean 994.41 + 4.57 Ma
39Ar Wtd. Mean 992.66 + 4.25 Ma

**CMG K-Feldspar J = 8.30E-3 + 7.73E-05**

| | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| 900 | 1.03E-03 | 2.54E-05 | 1.13E-02 | 9.16E-06 | 2.20E-13 | 15.72 | 69.62 | 747.17 | 8.73 |
| 1000 | 6.50E-05 | 8.22E-06 | 1.40E-02 | 1.76E-05 | 1.19E-13 | 24.25 | 98.06 | 826.94 | 6.45 |
| 1100 | 1.88E-05 | 1.31E-05 | 1.27E-02 | 1.21E-05 | 2.41E-13 | 41.50 | 99.43 | 904.22 | 7.21 |
| 1200 | 7.08E-05 | 9.42E-06 | 1.66E-02 | 1.61E-05 | 2.11E-13 | 56.61 | 97.89 | 717.77 | 5.80 |
| 1250 | 1.01E-04 | 5.98E-06 | 1.84E-02 | 2.93E-05 | 2.08E-13 | 71.50 | 97.01 | 654.41 | 5.28 |
| 1300 | 9.77E-05 | 1.50E-05 | 1.58E-02 | 2.25E-05 | 1.65E-13 | 83.32 | 97.09 | 744.10 | 6.39 |
| 1350 | 7.64E-05 | 3.05E-05 | 1.35E-02 | 2.32E-05 | 1.03E-13 | 90.67 | 97.72 | 851.35 | 8.97 |

| | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| 1400 | 1.28E-04 | 1.94E-05 | 1.17E-02 | 5.48E-05 | 3.46E-14 | 93.14 | 96.21 | 937.38 | 8.78 |
| 1500 | 2.33E-04 | 1.38E-04 | 1.14E-02 | 1.98E-04 | 9.69E-15 | 93.83 | 93.09 | 932.21 | 35.00 |
| 1600 | 1.45E-04 | 3.33E-05 | 1.06E-02 | 5.18E-05 | 5.32E-14 | 97.64 | 95.71 | 1008.08 | 11.35 |
| 1700 | 1.22E-04 | 4.97E-05 | 1.00E-02 | 8.71E-05 | 3.29E-14 | 100.00 | 96.38 | 1056.57 | 15.88 |

Total Gas Age 796.37 + 6.03 Ma
Error Wtd. Mean 789.62 + 2.18 Ma
39Ar Wtd. Mean 793.32 + 2.26 Ma

**I-10 K-Feldspar J = 8.30E-03 + 7.73E-05**

| | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| 800 | 3.73E-04 | 1.07E-05 | 1.10E-02 | 1.12E-05 | 2.09E-13 | 3.66 | 88.97 | 923.52 | 7.24 |
| 900 | 5.38E-05 | 6.54E-06 | 3.28E-02 | 1.49E-05 | 6.59E-13 | 15.19 | 98.36 | 401.47 | 3.43 |
| 1000 | 3.85E-06 | 5.78E-06 | 3.01E-02 | 1.43E-05 | 6.44E-13 | 26.45 | 99.84 | 439.26 | 3.70 |
| 1100 | 2.08E-05 | 2.31E-06 | 2.55E-02 | 1.14E-05 | 7.09E-13 | 38.86 | 99.35 | 506.05 | 4.13 |
| 1200 | 2.04E-05 | 2.45E-06 | 2.92E-02 | 2.03E-05 | 1.06E-12 | 57.37 | 99.36 | 448.80 | 3.72 |
| 1300 | 3.97E-05 | 3.58E-06 | 2.45E-02 | 1.20E-05 | 7.15E-13 | 69.87 | 98.79 | 520.24 | 4.24 |
| 1350 | 3.56E-05 | 2.58E-06 | 2.30E-02 | 2.64E-05 | 3.92E-13 | 76.73 | 98.92 | 550.56 | 4.47 |
| 1400 | 5.22E-05 | 3.32E-06 | 2.23E-02 | 1.85E-05 | 6.60E-13 | 88.28 | 98.43 | 562.69 | 4.55 |
| 1500 | 6.89E-05 | 8.02E-06 | 2.23E-02 | 2.37E-05 | 2.14E-13 | 92.02 | 97.93 | 560.60 | 4.67 |
| 1600 | 6.01E-05 | 5.94E-06 | 2.29E-02 | 1.60E-05 | 2.45E-13 | 96.32 | 98.19 | 548.58 | 4.50 |
| 1700 | 5.64E-05 | 6.01E-06 | 2.32E-02 | 2.65E-05 | 2.11E-13 | 100.00 | 98.30 | 543.82 | 4.49 |

Total Gas Age 510.57 + 4.28 Ma
Error Wtd. Mean 509.84 + 1.27 Ma
39Ar Wtd. Mean 507.80 + 1.26 Ma

Note: All errors given at $2\sigma$