## Supplemental information

# A new reduced-morphology model for CA1 pyramidal cells and its validation and comparison with other models using HippoUnit

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**Supplementary Table S1: Uniformly distributed passive parameters, active ionic conductances and reversal potentials of channels for each section of the To21 model**

| Mechanism | Somatic | Axonal | Basal | Apical | Trunk |
|---|---|---|---|---|---|
| $C_m$ ($\mu F/cm^2$) | 1 | 1 | 1 | 1 | 1 |
| $R_A$ ($\Omega/cm^2$) | 115.3958 | 85.2024 | 115.3958 | 115.3958 | 115.3958 |
| $g_{Na}$ ($S/cm^2$) | 0.035 | 0.035 | 0.03828 | 0.03828 | 0.025 |
| $g_{Kdr}$ ($S/cm^2$) | 0.0015 | 0.01166 | 0.004304 | 0.004304 | 0.02 |
| $g_{KM}$ ($S/cm^2$) | 0.001 | 0.02647 | - | - | - |
| $g_{KCa}$ ($S/cm^2$) | 0.0015 | - | 9.0311e-05 | 9.0311e-05 | 9.0311e-05 |
| $g_{KCagk}$ ($S/cm^2$) | 4.4820e-05 | - | 4.4820e-05 | 4.4820e-05 | 4.4820e-05 |
| $g_{CaL}$ ($S/cm^2$) | 0.0005 | - | 8.0325e-06 | 8.0325e-06 | 8.0325e-06 |
| $g_{CaN}$ ($S/cm^2$) | 2.2619e-06 | - | 2.2619e-06 | 2.2619e-06 | 2.2619e-06 |
| $g_{CaT}$ ($S/cm^2$) | 0.00005 | - | 1.1849e-06 | 1.1849e-06 | 1.1849e-06 |
| $g_L$ ($S/cm^2$) | 9.03139e-05 | 0.0001289 | 9.03139e-05 | 9.03139e-05 | 9.03139e-05 |
| $[Ca^{2+}]_o$ (mM) | 50e-6 | - | 50e-6 | 50e-6 | 50e-6 |
| $\tau_{Ca}$ (ms) | 100 | - | 100 | 100 | 100 |
| $E_{Na}$ (mV) | 50 | 50 | 50 | 50 | 50 |
| $E_K$ (mV) | -90 | -90 | -90 | -90 | -90 |

**Supplementary Table S2: $K_A$, $I_h$ conductances and reversal potential of passive current in individual sections of the To21**

| **Section / Mechanism** | **$g_{KA}$ (S/cm$^2$)** | **$g_{Ih}$ (S/cm$^2$)** | **$E_L$ (mV)** |
|---|---|---|---|
| Soma | 0.0075 | 1.9042e-05 | -65.7269 |
| Axon | 0.1637 | - | -79.9171 |
| Proximal SO dendrite | 0.001433 | 5.0462e-05 | -67.5602 |
| Distal SO dendrite | 0.02522 | 0.0001361 | -72.5602 |
| Thick proximal SR dendrite | 0.1 | 5.04624e-05 | -67.5602 |
| Thick medium SR dendrite | 0.15 | 0.0001076 | -70.8936 |
| Thick distal SR dendrite | 0.2 | 0.0001933 | -75.8936 |
| Thin SR dendrite 1 | 0.006259 | 9.3308e-05 | -70.06023 |
| Thin SR dendrite 1 | 0.03834 | 0.0001504 | -73.3936 |
| Thin SR dendrite 1 | 0.1613 | 0.0002361 | -78.3936 |
| Thick SLM dendrite | 0.1855 | 0.0002789 | -80.8936 |
| Medium SLM dendrite | 0.1926 | 0.0003361 | -84.2269 |
| Thin SLM dendrite | 0.1936 | 0.0003789 | -86.7269 |

**Supplementary Table S3: Active and passive properties used in models**

| Channel / Current name | Mod file | Sections | | | | |
|---|---|---|---|---|---|---|
| | | C10 | CP15 | Tu19 | To21 | M18 |
| Leak conductance | pas | soma, rad, lm, ori, axon | soma, rad, lm, ori, axon | soma, rad, lm, ori, axon | soma, rad, lm, ori, axon | soma, rad, lm, ori, axon |
| HH mechanism | hha2 | soma, axon | soma, axon | soma, axon | | |
| HH mechanism | hha_old | rad, lm, ori | rad, obl, lm, ori | rad, obl, lm, ori | | |
| H current | h | soma, rad, ori | | soma, rad, ori | | |
| H current | hd | | | | soma, rad, obl, lm, ori | soma, rad, obl, lm, ori |
| H current | hd2 | | soma, rad, obl, ori | | | |
| $Na^+$ current for axon | nax | | | | soma, rad, lm, ori, axon | soma, rad, lm, ori, axon |
| Proximal A-type $K^+$ current | kap | soma, rad, ori | soma, rad, obl,ori | soma, rad, ori | soma, axon | soma, axon |
| A-type $K^+$ current | kad | rad, lm, ori | rad, obl, lm, ori | rad, obl, lm, ori | rad, obl, lm, ori | rad, obl, lm, ori |
| Delayed rectifier $K^+$ current | kdr | | | | soma, rad, lm, ori, axon | soma, rad, lm, ori, axon |
| M-type $K^+$ current | km | soma, rad, ori, axon | soma, rad, obl, ori, axon | soma, rad, ori, axon | | |
| M-type $K^+$ current | kmb | | | | soma, axon | soma, axon |
| $Ca^{2+}$-activated sAHP $K^+$ current | kca | soma, rad, ori | soma, rad, obl, ori | soma, rad, ori | soma, rad, obl, lm, ori | soma, rad, obl, lm, ori |

| | | | | | | |
|---|---|---|---|---|---|---|
| $Ca^{2+}$-activated mAHP $K^+$ current | mykca | soma, rad, ori | | soma, rad, ori | | |
| $Ca^{2+}$-activated $K^+$ current | cagk | | | | soma, rad, obl, lm, ori | soma, rad, obl, lm, ori |
| $Ca^{2+}$-activated $K^+$ current | cagk2 | | soma, rad, obl, ori | | | |
| HVA L-type $Ca^{2+}$ current | cal | soma | soma | soma | soma, rad, obl, lm, ori | soma, rad, obl, lm, ori |
| HVA L-type $Ca^{2+}$ current | calH | rad, ori | rad, obl, ori | rad, ori | | |
| HVA N-type $Ca^{2+}$ current | can | | | | soma, rad, obl, lm, ori | soma, rad, obl, lm, ori |
| MVA R-type $Ca^{2+}$ current | somacar | soma | soma | soma | | |
| MVA R-type $Ca^{2+}$ current | car | rad, ori | rad, obl, ori | rad, ori | | |
| LVA T-type $Ca^{2+}$ current | cat | soma, rad, ori | soma, rad, obl, ori | soma, rad, ori | soma, rad, obl, lm, ori | soma, rad, obl, lm, ori |
| Calcium pump | cad | soma, rad, ori | soma, rad, obl, ori | soma, rad, ori | | |
| Calcium accumulation | cacum | | | | soma, rad, obl, lm, ori | soma, rad, obl, lm, ori |

## Supplementary S4: Somatic Features Test detailed results

| minimum voltage | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | -99.9313 | 9.7377 | -143.502 | 4.474481 | -114.562 | 1.502482 | -139.077 | 4.020009 | -116.241 | 1.674941 | -107.226 | 0.749093 |
| -0.8 | -94.3532 | 8.1946 | -129.832 | 4.329578 | -103.146 | 1.07296 | -125.937 | 3.854259 | -107.22 | 1.570129 | -99.8416 | 0.669758 |
| -0.6 | -88.5859 | 6.8969 | -114.919 | 3.818052 | -91.5606 | 0.431303 | -111.759 | 3.359989 | -98.1312 | 1.384 | -92.372 | 0.548952 |
| -0.4 | -85.2382 | 9.5815 | -98.8119 | 1.416657 | -81.1776 | 0.423797 | -96.6202 | 1.187912 | -89.1218 | 0.405319 | -84.8206 | 0.043588 |
| -0.2 | -77.8483 | 6.489 | -81.5999 | 0.578153 | -72.9466 | 0.755387 | -80.5927 | 0.42293 | -80.4264 | 0.397309 | -77.212 | 0.098053 |

| sag_amplitude | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | 6.5995 | 3.3034 | 29.70236 | 6.99366 | 19.83881 | 4.007783 | 24.84155 | 5.522205 | 10.50972 | 1.183697 | 8.411166 | 0.548425 |
| -0.8 | 5.2681 | 2.3817 | 26.86898 | 9.069521 | 16.12122 | 4.55688 | 22.8738 | 7.392074 | 8.832507 | 1.496581 | 6.887593 | 0.679973 |
| -0.6 | 4.159 | 1.8053 | 21.3321 | 9.512601 | 10.83257 | 3.696655 | 18.21476 | 7.785829 | 6.662081 | 1.386518 | 5.180959 | 0.566088 |
| -0.4 | 5.3459 | 8.0929 | 13.91442 | 1.05877 | 5.91847 | 0.07075 | 11.74933 | 0.79124 | 4.253484 | 0.134984 | 3.421264 | 0.237818 |
| -0.2 | 2.8362 | 4.2211 | 5.934662 | 0.734041 | 2.560699 | 0.065268 | 4.794064 | 0.463828 | 1.926938 | 0.215409 | 1.705372 | 0.267899 |

| sag_ratio1 | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | 0.2087 | 0.0645 | 0.37262 | 2.541388 | 0.411113 | 3.138189 | 0.335229 | 1.961684 | 0.239728 | 0.481059 | 0.223746 | 0.233264 |
| -0.8 | 0.2082 | 0.064 | 0.406845 | 3.103836 | 0.437601 | 3.584394 | 0.375204 | 2.609435 | 0.253672 | 0.710507 | 0.228003 | 0.309414 |
| -0.6 | 0.2144 | 0.0623 | 0.417225 | 3.255624 | 0.42893 | 3.443502 | 0.389323 | 2.807746 | 0.258923 | 0.714653 | 0.227847 | 0.215841 |
| -0.4 | 0.2526 | 0.1541 | 0.397308 | 0.939053 | 0.397963 | 0.943305 | 0.371267 | 0.770067 | 0.254387 | 0.011595 | 0.22527 | 0.17735 |
| -0.2 | 0.257 | 0.0941 | 0.333225 | 0.81004 | 0.385595 | 1.366581 | 0.306937 | 0.53068 | 0.24011 | 0.179485 | 0.225017 | 0.339878 |

| sag_ratio2 | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | 0.7913 | 0.0645 | 0.62738 | 2.541388 | 0.588887 | 3.138189 | 0.664771 | 1.961684 | 0.760272 | 0.481059 | 0.776254 | 0.233264 |
| -0.8 | 0.7918 | 0.064 | 0.593155 | 3.103836 | 0.562399 | 3.584394 | 0.624796 | 2.609435 | 0.746328 | 0.710507 | 0.771997 | 0.309414 |
| -0.6 | 0.7856 | 0.0623 | 0.582775 | 3.255624 | 0.57107 | 3.443502 | 0.610677 | 2.807746 | 0.741077 | 0.714653 | 0.772153 | 0.215841 |
| -0.4 | 0.7474 | 0.1541 | 0.602692 | 0.939053 | 0.602037 | 0.943305 | 0.628733 | 0.770067 | 0.745613 | 0.011595 | 0.77473 | 0.17735 |
| -0.2 | 0.743 | 0.0941 | 0.666775 | 0.81004 | 0.614405 | 1.366581 | 0.693063 | 0.53068 | 0.75989 | 0.179485 | 0.774983 | 0.339878 |

| steady_state_hyper | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | -93.2488 | 7.4089 | -113.8 | 2.773865 | -94.7232 | 0.199005 | -114.235 | 2.83262 | -105.733 | 1.68497 | -98.8149 | 0.751271 |
| -0.8 | -89.0217 | 6.3605 | -102.963 | 2.191916 | -87.0245 | 0.314008 | -103.064 | 2.207658 | -98.3877 | 1.472522 | -92.9541 | 0.618254 |
| -0.6 | -84.475 | 5.6016 | -93.5865 | 1.626593 | -80.728 | 0.668919 | -93.5447 | 1.619118 | -91.4692 | 1.248603 | -87.1909 | 0.484847 |
| -0.4 | -79.8991 | 4.9027 | -84.8975 | 1.019515 | -75.2591 | 0.946413 | -84.8709 | 1.014085 | -84.8682 | 1.013534 | -81.3991 | 0.305945 |
| -0.2 | -75.0316 | 4.5793 | -75.6653 | 0.138378 | -70.3858 | 1.014512 | -75.7986 | 0.167499 | -78.4994 | 0.757272 | -75.5064 | 0.103679 |

| steady_state_voltage | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | -69.5976 | 3.9296 | -62.4239 | 1.825554 | -65.6239 | 1.011228 | -63.8388 | 1.465497 | -71.425 | 0.465036 | -68.4643 | 0.288407 |
| -0.8 | -69.6693 | 3.8566 | -62.4762 | 1.865148 | -65.6313 | 1.047033 | -63.7841 | 1.52602 | -71.5044 | 0.475843 | -68.5947 | 0.278649 |
| -0.6 | -69.5911 | 3.989 | -62.6098 | 1.750147 | -65.7119 | 0.972474 | -63.8513 | 1.438906 | -71.6485 | 0.515776 | -68.7731 | 0.205076 |
| -0.4 | -69.5138 | 4.1133 | -62.7529 | 1.643677 | -65.8523 | 0.890152 | -64.1807 | 1.296552 | -71.8579 | 0.569886 | -69.004 | 0.12393 |
| -0.2 | -69.454 | 4.2827 | -63.3324 | 1.429384 | -66.0392 | 0.797343 | -64.6143 | 1.130061 | -72.1189 | 0.622241 | -69.2908 | 0.038097 |
| 0.2 | -69.5194 | 4.2995 | -63.1246 | 1.487343 | -66.8658 | 0.617196 | -65.019 | 1.046737 | -72.6744 | 0.733813 | -70.0288 | 0.118477 |

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 0.4 | -69.9092 | 4.3278 | -62.4665 | 1.71975 | -67.7537 | 0.498056 | -65.2082 | 1.086224 | -72.9296 | 0.697906 | -70.5483 | 0.147685 |
| 0.6 | -70.4804 | 4.4183 | -63.1015 | 1.670079 | -69.4552 | 0.232045 | -65.1616 | 1.203817 | -73.1886 | 0.612942 | -70.9008 | 0.095145 |
| 0.8 | -71.0353 | 4.5287 | -63.0051 | 1.773178 | -70.3308 | 0.155573 | -65.0142 | 1.329549 | -73.7491 | 0.599241 | -71.3203 | 0.062926 |
| 1 | -71.4634 | 4.6282 | -62.8556 | 1.859862 | -68.8692 | 0.560524 | -64.8954 | 1.419117 | -75.1967 | 0.806631 | -72.2052 | 0.160283 |

| steady_state_voltage_stimed | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | -93.3319 | 7.415 | -113.8 | 2.760376 | -94.7232 | 0.187634 | -114.235 | 2.819082 | -105.732 | 1.672252 | -98.8146 | 0.739403 |
| -0.8 | -89.0851 | 6.3924 | -102.963 | 2.17106 | -87.0245 | 0.322359 | -103.064 | 2.186724 | -98.3873 | 1.455193 | -92.954 | 0.605235 |
| -0.6 | -84.4268 | 5.6363 | -93.5865 | 1.625131 | -80.728 | 0.656249 | -93.5447 | 1.617702 | -91.4691 | 1.24946 | -87.191 | 0.490429 |
| -0.4 | -79.8923 | 4.9452 | -84.8975 | 1.012128 | -75.2591 | 0.936904 | -84.8709 | 1.006745 | -84.8683 | 1.006224 | -81.3993 | 0.304739 |
| -0.2 | -75.0121 | 4.6192 | -75.6653 | 0.141404 | -70.3859 | 1.001517 | -75.7986 | 0.170274 | -78.4995 | 0.754979 | -75.5067 | 0.107067 |

| voltage_after_stim | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | -69.3894 | 3.9679 | -63.5579 | 1.469665 | -66.1671 | 0.812099 | -64.746 | 1.170237 | -71.9566 | 0.646996 | -69.0578 | 0.083559 |
| -0.8 | -69.466 | 3.8948 | -63.6235 | 1.50008 | -66.1689 | 0.846545 | -64.8247 | 1.19166 | -72.0032 | 0.651427 | -69.1014 | 0.093622 |
| -0.6 | -69.3704 | 3.9926 | -63.7122 | 1.417173 | -66.1715 | 0.801202 | -64.5498 | 1.207395 | -72.0678 | 0.675604 | -69.1682 | 0.050646 |
| -0.4 | -69.2686 | 4.1337 | -63.85 | 1.31083 | -66.1808 | 0.746991 | -64.6739 | 1.111534 | -72.1548 | 0.698212 | -69.2685 | 1.8E-05 |
| -0.2 | -69.2831 | 4.3611 | -63.6983 | 1.280596 | -66.2059 | 0.705601 | -64.8275 | 1.021664 | -72.2665 | 0.684092 | -69.418 | 0.030922 |
| 0.2 | -69.6822 | 4.3321 | -63.4454 | 1.439664 | -66.6499 | 0.69997 | -65.2957 | 1.012562 | -72.5532 | 0.662728 | -69.922 | 0.055357 |
| 0.4 | -70.1913 | 4.4134 | -63.2654 | 1.569287 | -67.333 | 0.647648 | -65.4486 | 1.074607 | -72.7184 | 0.572587 | -70.3563 | 0.037392 |
| 0.6 | -70.7661 | 4.4566 | -63.2193 | 1.693388 | -69.8526 | 0.204976 | -65.4991 | 1.181848 | -72.9096 | 0.480962 | -70.5052 | 0.058535 |
| 0.8 | -71.3324 | 4.5909 | -63.1756 | 1.776735 | -70.9258 | 0.088557 | -65.5154 | 1.267082 | -73.1969 | 0.406123 | -70.724 | 0.132533 |
| 1 | -71.6974 | 4.6722 | -63.1406 | 1.831435 | -68.4495 | 0.695164 | -65.4901 | 1.328552 | -75.0332 | 0.71397 | -71.147 | 0.117812 |

| voltage_base | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | -69.6021 | 4.3921 | -63.7901 | 1.323274 | -66.3057 | 0.750531 | -64.9736 | 1.053815 | -72.4012 | 0.63731 | -69.6332 | 0.007079 |
| -0.8 | -69.5867 | 4.3825 | -63.7901 | 1.322659 | -66.3057 | 0.748661 | -64.9736 | 1.052609 | -72.4012 | 0.64222 | -69.6332 | 0.010608 |
| -0.6 | -69.4911 | 4.4034 | -63.7901 | 1.294671 | -66.3057 | 0.723397 | -64.9736 | 1.025903 | -72.4012 | 0.660882 | -69.6332 | 0.032268 |
| -0.4 | -69.3713 | 4.352 | -63.7901 | 1.282434 | -66.3057 | 0.704413 | -64.9736 | 1.010492 | -72.4012 | 0.696215 | -69.6332 | 0.060177 |
| -0.2 | -69.3718 | 4.3803 | -63.7901 | 1.274263 | -66.3057 | 0.699976 | -64.9736 | 1.004077 | -72.4012 | 0.691603 | -69.6332 | 0.059674 |
| 0.2 | -69.2003 | 4.4582 | -63.7901 | 1.213528 | -66.3057 | 0.649277 | -64.9736 | 0.948064 | -72.4012 | 0.717986 | -69.6332 | 0.0971 |
| 0.4 | -69.2273 | 4.4598 | -63.7901 | 1.219147 | -66.3057 | 0.655098 | -64.9736 | 0.953778 | -72.4012 | 0.711675 | -69.6332 | 0.091011 |
| 0.6 | -69.5721 | 4.4253 | -63.7901 | 1.306567 | -66.3057 | 0.738121 | -64.9736 | 1.03913 | -72.4012 | 0.639307 | -69.6332 | 0.013805 |
| 0.8 | -69.7343 | 4.4319 | -63.7901 | 1.34122 | -66.3057 | 0.77362 | -64.9736 | 1.07418 | -72.4012 | 0.601757 | -69.6332 | 0.022814 |
| 1 | -69.931 | 4.5857 | -63.7901 | 1.339131 | -66.3057 | 0.790568 | -64.9736 | 1.081048 | -72.4012 | 0.53868 | -69.6332 | 0.064943 |

| voltage_deflection | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | -23.6514 | 5.7217 | -50.0036 | 4.605667 | -28.4319 | 0.835499 | -49.2638 | 4.476368 | -33.1899 | 1.667067 | -29.0974 | 0.95181 |
| -0.8 | -19.3666 | 4.7267 | -39.1669 | 4.189041 | -20.7331 | 0.289107 | -38.092 | 3.961612 | -25.8449 | 1.370582 | -23.2366 | 0.818747 |
| -0.6 | -15.0155 | 3.5413 | -29.7901 | 4.172078 | -14.4366 | 0.163457 | -28.5731 | 3.828423 | -18.9264 | 1.104371 | -17.4734 | 0.694061 |
| -0.4 | -10.4888 | 2.5469 | -21.101 | 4.166724 | -8.96779 | 0.5972 | -19.8993 | 3.694883 | -12.3254 | 0.721103 | -11.6815 | 0.468298 |
| -0.2 | -5.6461 | 1.5728 | -11.8688 | 3.956466 | -4.09451 | 0.986514 | -10.8271 | 3.294106 | -5.9566 | 0.197419 | -5.78882 | 0.090745 |

| voltage_deflection_begin | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | -27.9145 | 7.2572 | -55.525 | 3.804569 | -37.4865 | 1.318972 | -57.2856 | 4.047173 | -35.5329 | 1.049777 | -32.1209 | 0.579624 |
| -0.8 | -22.9462 | 6.025 | -44.3134 | 3.546416 | -27.8917 | 0.820833 | -45.6701 | 3.771608 | -28.1468 | 0.863171 | -25.8871 | 0.488108 |

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| -0.6 | -17.5106 | 4.5662 | -33.9076 | 3.590952 | -18.5854 | 0.235374 | -34.6453 | 3.752512 | -20.8893 | 0.739934 | -19.6405 | 0.466457 |
| -0.4 | -11.9487 | 3.1191 | -23.9453 | 3.846161 | -10.6276 | 0.423554 | -24.0022 | 3.864406 | -13.7577 | 0.579982 | -13.2831 | 0.427818 |
| -0.2 | -6.1813 | 1.6983 | -13.6942 | 4.423765 | -4.54291 | 0.964725 | -13.0238 | 4.029024 | -6.71017 | 0.311411 | -6.69751 | 0.30396 |

| **voltage_deflection_vb_ssse** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| -1 | -23.7298 | 5.8063 | -50.0099 | 4.526143 | -28.4175 | 0.80735 | -49.2618 | 4.397285 | -33.3304 | 1.653484 | -29.1814 | 0.938908 |
| -0.8 | -19.4985 | 4.6597 | -39.1732 | 4.222318 | -20.7188 | 0.261875 | -38.0899 | 3.989822 | -25.986 | 1.392267 | -23.3208 | 0.820292 |
| -0.6 | -14.9357 | 3.6064 | -29.7964 | 4.12064 | -14.4223 | 0.142361 | -28.571 | 3.780865 | -19.0679 | 1.145797 | -17.5578 | 0.727073 |
| -0.4 | -10.521 | 2.5677 | -21.1073 | 4.122883 | -8.95343 | 0.610496 | -19.8972 | 3.651601 | -12.4671 | 0.757898 | -11.7661 | 0.48491 |
| -0.2 | -5.6403 | 1.549 | -11.8751 | 4.025065 | -4.0802 | 1.007167 | -10.825 | 3.34712 | -6.09827 | 0.295658 | -5.87347 | 0.15053 |

| **Spikecount** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 1.4774 | 2.0734 | 32 | 14.72104 | 0 | 0.712549 | 23 | 10.38034 | 0 | 0.712549 | 0 | 0.712549 |
| 0.4 | 3.9763 | 3.3616 | 47 | 12.79858 | 1 | 0.885382 | 37 | 9.823804 | 0 | 1.182859 | 3 | 0.290427 |
| 0.6 | 6.6785 | 4.0206 | 56 | 12.2672 | 1 | 1.412351 | 45 | 9.531289 | 1 | 1.412351 | 9 | 0.577401 |
| 0.8 | 9.3075 | 4.1665 | 62 | 12.64671 | 1 | 1.99388 | 54 | 10.72663 | 4 | 1.273851 | 12 | 0.646226 |
| 1 | 11.325 | 4.6197 | 73 | 13.35043 | 3 | 1.802065 | 59 | 10.31993 | 15 | 0.795506 | 16 | 1.01197 |

| **Spikecount_stimint** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 1.4774 | 2.0734 | 32 | 14.72104 | 0 | 0.712549 | 23 | 10.38034 | 0 | 0.712549 | 0 | 0.712549 |
| 0.4 | 3.9763 | 3.3616 | 46 | 12.5011 | 1 | 0.885382 | 37 | 9.823804 | 0 | 1.182859 | 3 | 0.290427 |
| 0.6 | 6.6785 | 4.0206 | 56 | 12.2672 | 1 | 1.412351 | 45 | 9.531289 | 1 | 1.412351 | 9 | 0.577401 |

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 0.8 | 9.3075 | 4.1665 | 62 | 12.64671 | 1 | 1.99388 | 54 | 10.72663 | 4 | 1.273851 | 12 | 0.646226 |
| 1 | 11.325 | 4.6197 | 73 | 13.35043 | 3 | 1.802065 | 59 | 10.31993 | 15 | 0.795506 | 16 | 1.01197 |

| inv_time_to_first_spike | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 23.5725 | 33.9424 | 217.3913 | 5.710227 | 0 | 0.694485 | 128.2051 | 3.082653 | 0 | 0.694485 | 0 | 0.694485 |
| 0.4 | 59.1824 | 66.4808 | 400 | 5.126557 | 123.4568 | 0.966811 | 285.7143 | 3.407478 | 0 | 0.890218 | 93.45794 | 0.515571 |
| 0.6 | 97.5343 | 89.619 | 555.5556 | 5.110761 | 263.1579 | 1.848086 | 400 | 3.375018 | 113.6364 | 0.179672 | 169.4915 | 0.802924 |
| 0.8 | 148.3142 | 114.7306 | 714.2857 | 4.933048 | 370.3704 | 1.935457 | 526.3158 | 3.294689 | 200 | 0.450497 | 250 | 0.886301 |
| 1 | 196.2319 | 136.6747 | 833.3333 | 4.661444 | 454.5455 | 1.889988 | 625 | 3.137143 | 277.7778 | 0.596642 | 322.5806 | 0.924449 |

| inv_first_ISI | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 14.0118 | 23.7191 | 87.7193 | 3.107517 | 0 | 0.590739 | 64.51613 | 2.129268 | 0 | 0.590739 | 0 | 0.590739 |
| 0.4 | 40.8817 | 40.4993 | 131.5789 | 2.239477 | 0 | 1.009442 | 100 | 1.459736 | 0 | 1.009442 | 27.70083 | 0.325459 |
| 0.6 | 68.5665 | 47.4419 | 113.6364 | 0.950001 | 0 | 1.445273 | 128.2051 | 1.257088 | 0 | 1.445273 | 53.47594 | 0.318085 |
| 0.8 | 93.8851 | 46.4426 | 46.08295 | 1.029274 | 0 | 2.02153 | 151.5152 | 1.240888 | 47.61905 | 0.996199 | 72.46377 | 0.461243 |
| 1 | 116.3015 | 43.2083 | 68.96552 | 1.09553 | 7.782101 | 2.511541 | 185.1852 | 1.594223 | 87.7193 | 0.661498 | 90.90909 | 0.587674 |

| inv_second_ISI | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 4.5983 | 8.9653 | 83.33333 | 8.782197 | 0 | 0.5129 | 58.47953 | 6.009975 | 0 | 0.5129 | 0 | 0.5129 |
| 0.4 | 20.0842 | 21.6747 | 212.766 | 8.889708 | 0 | 0.92662 | 96.15385 | 3.509605 | 0 | 0.92662 | 7.401925 | 0.585119 |
| 0.6 | 41.8257 | 29.8653 | 238.0952 | 6.571825 | 0 | 1.400478 | 204.0816 | 5.432925 | 0 | 1.400478 | 34.60208 | 0.241873 |
| 0.8 | 62.9663 | 30.2882 | 178.5714 | 3.816837 | 0 | 2.078905 | 222.2222 | 5.258019 | 6.23053 | 1.873197 | 54.94505 | 0.264831 |

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | 80.6491 | 31.1475 | 250 | 5.437062 | 5.574136 | 2.410305 | 112.3596 | 1.018074 | 82.64463 | 0.064067 | 74.07407 | 0.211093 |

| inv_third_ISI | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 2.4873 | 5.8108 | 78.74016 | 13.12261 | 0 | 0.428048 | 56.49718 | 9.29474 | 0 | 0.428048 | 0 | 0.428048 |
| 0.4 | 12.5847 | 14.2164 | 232.5581 | 15.47322 | 0 | 0.885224 | 92.59259 | 5.627859 | 0 | 0.885224 | 0 | 0.885224 |
| 0.6 | 25.5306 | 19.4195 | 238.0952 | 10.94594 | 0 | 1.314689 | 117.6471 | 4.743503 | 0 | 1.314689 | 21.36752 | 0.214376 |
| 0.8 | 39.8159 | 20.768 | 144.9275 | 5.061231 | 0 | 1.917175 | 196.0784 | 7.524197 | 8.673027 | 1.499561 | 38.16794 | 0.079351 |
| 1 | 53.2365 | 20.1677 | 227.2727 | 8.629453 | 0 | 2.639691 | 106.383 | 2.635228 | 64.10256 | 0.538785 | 56.81818 | 0.177595 |

| inv_fourth_ISI | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 1.2653 | 4.6328 | 77.51938 | 16.45961 | 0 | 0.273118 | 56.17978 | 11.85341 | 0 | 0.273118 | 0 | 0.273118 |
| 0.4 | 8.7874 | 12.1634 | 227.2727 | 17.96252 | 0 | 0.722446 | 91.74312 | 6.820109 | 0 | 0.722446 | 0 | 0.722446 |
| 0.6 | 18.5295 | 16.8817 | 181.8182 | 9.672526 | 0 | 1.097609 | 57.14286 | 2.287291 | 0 | 1.097609 | 19.53125 | 0.059339 |
| 0.8 | 30.6315 | 16.9188 | 142.8571 | 6.633192 | 0 | 1.810501 | 250 | 12.96596 | 0 | 1.810501 | 29.15452 | 0.087298 |
| 1 | 40.7579 | 15.8266 | 200 | 10.06167 | 0 | 2.575278 | 172.4138 | 8.318647 | 48.30918 | 0.477126 | 46.2963 | 0.349942 |

| inv_fifth_ISI | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 0.6903 | 3.5827 | 77.51938 | 21.44446 | 0 | 0.192676 | 56.17978 | 15.48817 | 0 | 0.192676 | 0 | 0.192676 |
| 0.4 | 6.3819 | 10.3146 | 151.5152 | 14.07066 | 0 | 0.618725 | 90.90909 | 8.194907 | 0 | 0.618725 | 0 | 0.618725 |
| 0.6 | 14.6701 | 15.6837 | 138.8889 | 7.920248 | 0 | 0.935372 | 99.0099 | 5.377545 | 0 | 0.935372 | 19.49318 | 0.307522 |
| 0.8 | 24.9452 | 18.1057 | 147.0588 | 6.744485 | 0 | 1.377754 | 86.95652 | 3.424961 | 0 | 1.377754 | 26.38522 | 0.079534 |
| 1 | 34.2529 | 17.3915 | 166.6667 | 7.613706 | 0 | 1.96952 | 138.8889 | 6.016502 | 38.75969 | 0.259138 | 39.84064 | 0.321291 |

| inv_last_ISI | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 6.2691 | 17.9501 | 78.125 | 4.003092 | 0 | 0.349252 | 55.55556 | 2.745748 | 0 | 0.349252 | 0 | 0.349252 |
| 0.4 | 8.1811 | 6.6758 | 111.1111 | 15.41838 | 0 | 1.225486 | 90.90909 | 12.39222 | 0 | 1.225486 | 7.401925 | 0.116716 |
| 0.6 | 12.8949 | 7.5643 | 138.8889 | 16.6564 | 0 | 1.704705 | 113.6364 | 13.31802 | 0 | 1.704705 | 19.49318 | 0.872292 |
| 0.8 | 17.3649 | 6.667 | 163.9344 | 21.98433 | 0 | 2.604605 | 133.3333 | 17.3944 | 8.673027 | 1.303716 | 25.97403 | 1.291304 |
| 1 | 21.0827 | 7.7745 | 185.1852 | 21.10779 | 5.574136 | 1.994799 | 149.2537 | 16.48608 | 30.95975 | 1.270442 | 33.44482 | 1.590085 |

| maximum_voltage | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | -19.8966 | 44.7483 | 17.05651 | 0.825799 | -60.6518 | 0.910765 | 14.41184 | 0.766698 | -65.2766 | 1.014116 | -61.7413 | 0.935113 |
| 0.4 | 9.3048 | 37.7778 | 17.13169 | 0.207182 | 11.18398 | 0.049743 | 15.16358 | 0.155085 | -58.5645 | 1.79654 | 38.04696 | 0.760821 |
| 0.6 | 29.5141 | 10.1374 | 17.06687 | 1.227852 | 10.89965 | 1.836216 | 14.74341 | 1.457049 | 25.16374 | 0.42914 | 38.10062 | 0.847014 |
| 0.8 | 30.4901 | 7.6295 | 17.80262 | 1.66295 | 11.63042 | 2.471941 | 15.49157 | 1.96586 | 25.32588 | 0.676875 | 37.44165 | 0.911141 |
| 1 | 29.4959 | 8.0014 | 19.21274 | 1.28517 | 12.3398 | 2.144138 | 16.27486 | 1.652341 | 23.18031 | 0.78931 | 37.24258 | 0.968165 |

| maximum_voltage_from_voltagebase | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 49.3037 | 44.0619 | 80.84666 | 0.715878 | 5.653893 | 0.990647 | 79.38548 | 0.682716 | 7.124662 | 0.957268 | 7.891874 | 0.939856 |
| 0.4 | 78.5321 | 37.0959 | 80.92184 | 0.06442 | 77.48968 | 0.028101 | 80.13722 | 0.043269 | 13.83669 | 1.744004 | 107.6802 | 0.785749 |
| 0.6 | 99.0862 | 11.1674 | 80.85702 | 1.632357 | 77.20534 | 1.959351 | 79.71705 | 1.734437 | 97.56497 | 0.136221 | 107.7338 | 0.774362 |
| 0.8 | 100.2244 | 7.9104 | 81.59277 | 2.355334 | 77.93612 | 2.817592 | 80.46521 | 2.497875 | 97.72711 | 0.315697 | 107.0748 | 0.866004 |
| 1 | 99.4269 | 7.9299 | 83.00289 | 2.07115 | 78.64549 | 2.62064 | 81.2485 | 2.292387 | 95.58154 | 0.484919 | 106.8758 | 0.939339 |

| number_initial_spikes | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.2 | 0.4903 | 0.7617 | 3 | 3.294867 | 0 | 0.643692 | 2 | 1.982014 | 0 | 0.643692 | 0 | 0.643692 |
| 0.4 | 1.0097 | 1.0759 | 6 | 4.638256 | 1 | 0.009016 | 4 | 2.779348 | 0 | 0.93847 | 1 | 0.009016 |
| 0.6 | 1.7879 | 1.2638 | 6 | 3.332885 | 1 | 0.623437 | 4 | 1.750356 | 1 | 0.623437 | 2 | 0.167827 |
| 0.8 | 2.35 | 1.2058 | 4 | 1.368386 | 1 | 1.119589 | 6 | 3.027036 | 2 | 0.290264 | 3 | 0.539061 |
| 1 | 3.0742 | 0.9131 | 6 | 3.204249 | 1 | 2.271602 | 6 | 3.204249 | 3 | 0.081262 | 3 | 0.081262 |

| AHP1_depth_from_peak | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 92.1793 | 4.917 | 53.45427 | 7.875744 | 79.92442 | 2.49235 | 60.7462 | 6.39274 | 80.74757 | 2.324939 | 95.95562 | 0.768012 |
| 1 | 91.6409 | 4.9559 | 52.86194 | 7.824808 | 78.80065 | 2.590902 | 55.6124 | 7.26982 | 72.99292 | 3.762783 | 91.81418 | 0.034965 |

| AHP2_depth_from_peak | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 82.8879 | 8.2237 | 42.47975 | 4.913621 | | | 47.16344 | 4.344086 | 78.57216 | 0.524792 | 98.16248 | 1.857386 |
| 1 | 79.8599 | 8.0481 | 18.95082 | 7.568132 | 77.40772 | 0.304691 | 23.71602 | 6.976042 | 60.52692 | 2.402179 | 90.82322 | 1.362225 |

| AHP_depth | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 11.673 | 4.0636 | 15.32397 | 0.898458 | -1.9883 | 3.361871 | 14.67699 | 0.739244 | 14.94095 | 0.804202 | 5.458804 | 1.529234 |
| 1 | 12.5085 | 4.6265 | 18.29296 | 1.250289 | -0.92749 | 2.904137 | 16.84044 | 0.936331 | 17.17374 | 1.008374 | 7.58971 | 1.063177 |

| AHP_depth_abs |
|---|

| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 0.8 | -58.0613 | 5.8413 | -48.4662 | 1.642635 | -68.294 | 1.751783 | -50.2966 | 1.329268 | -57.4603 | 0.102893 | -64.1744 | 1.046529 |
| 1 | -57.4225 | 6.6545 | -45.4972 | 1.792068 | -67.2332 | 1.474293 | -48.1332 | 1.395942 | -55.2275 | 0.329854 | -62.0435 | 0.694414 |

| AHP_depth_diff | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 0.4578 | 0.2903 | -0.20813 | 2.293947 | | | -0.40245 | 2.963298 | -1.07706 | 5.287155 | -0.59906 | 3.640572 |
| 1 | 0.4563 | 0.3038 | -0.45688 | 3.005843 | -0.61474 | 3.525482 | -0.15819 | 2.022668 | -0.48096 | 3.085114 | -0.58831 | 3.438495 |

| AHP_depth_from_peak | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 81.4373 | 8.7435 | 62.94088 | 2.115448 | 79.92442 | 0.173029 | 62.85901 | 2.124811 | 79.62343 | 0.207453 | 101.2524 | 2.266267 |
| 1 | 77.2394 | 9.281 | 54.84437 | 2.412998 | 77.77065 | 0.057241 | 60.23919 | 1.831722 | 74.95904 | 0.245702 | 98.49897 | 2.290655 |

| AHP_time_from_peak | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 2.1146 | 0.2597 | 4.191935 | 7.998981 | 8.5 | 24.5876 | 4.575926 | 9.477574 | 7.725 | 21.60339 | 6.908333 | 18.45873 |
| 1 | 2.2066 | 0.2753 | 3.846575 | 5.957048 | 7.3 | 18.50127 | 4.354237 | 7.80108 | 7.066667 | 17.65371 | 6.5375 | 15.73157 |

| AP1_peak | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 30.4901 | 7.6295 | 17.80262 | 1.66295 | 11.63042 | 2.471941 | 15.49157 | 1.96586 | 25.32588 | 0.676875 | 37.26235 | 0.887641 |
| 1 | 29.4878 | 8.0018 | 19.21274 | 1.284094 | 12.3398 | 2.143018 | 16.27486 | 1.651246 | 23.18031 | 0.788258 | 37.24258 | 0.969129 |

| AP2_AP1_peak_diff | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | -4.2233 | 2.8446 | -24.0869 | 6.982932 | | | -6.7832 | 0.899915 | -4.02435 | 0.069939 | -0.32377 | 1.370853 |
| 1 | -5.6801 | 3.1828 | -38.2749 | 10.24093 | -2.48044 | 1.005297 | -27.2139 | 6.765666 | -13.5833 | 2.483103 | -3.51317 | 0.680826 |

| AP2_amp | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 77.7102 | 7.0102 | 24.59139 | 7.57736 | | | 51.95838 | 3.673479 | 67.87002 | 1.403694 | 83.10238 | 0.76919 |
| 1 | 75.764 | 7.0631 | 11.37635 | 9.116061 | 64.26596 | 1.627903 | 27.70747 | 6.803887 | 53.06723 | 3.213429 | 78.59207 | 0.4004 |

| AP2_begin_voltage | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | -51.4433 | 7.0197 | -30.8757 | 2.92998 | | | -43.25 | 1.167186 | -46.5685 | 0.694447 | -46.1638 | 0.752099 |
| 1 | -51.9563 | 7.6988 | -30.4386 | 2.794949 | -54.4066 | 0.318271 | -38.6465 | 1.72882 | -43.4702 | 1.102258 | -44.8627 | 0.921396 |

| AP2_begin_width | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 2.0749 | 0.537 | 1.7 | 0.698138 | | | 4.2 | 3.957356 | 2.5 | 0.79162 | 3.1 | 1.908939 |
| 1 | 2.2177 | 0.5446 | 2.1 | 0.216122 | 3.3 | 1.98733 | 3.3 | 1.98733 | 2.1 | 0.216122 | 3.2 | 1.803709 |

| AP2_peak | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 0.8 | 26.2669 | 9.5008 | -6.28433 | 3.426157 | | | 8.708374 | 1.84811 | 21.30153 | 0.522627 | 36.93858 | 1.123241 |
| 1 | 23.8077 | 10.123 | -19.0622 | 4.234901 | 9.859355 | 1.377886 | -10.939 | 3.432451 | 9.596994 | 1.403804 | 33.72941 | 0.980115 |

| **AP2_width** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 0.7907 | 0.1227 | 18.333 | 142.969 | | | 1.233277 | 3.606982 | 0.6627 | 1.043198 | 1.23267 | 3.602039 |
| 1 | 0.8552 | 0.1207 | 10.95451 | 83.67283 | 1.540434 | 5.677166 | 1.18124 | 2.70124 | 0.758359 | 0.802326 | 1.242332 | 3.207392 |

| **AP_amplitude** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 72.712 | 8.9022 | 58.66097 | 1.578378 | | | 57.24089 | 1.737898 | 68.10506 | 0.517506 | 83.58688 | 1.221594 |
| 1 | 68.9557 | 9.4164 | 51.47802 | 1.856089 | 64.17996 | 0.507173 | 55.67496 | 1.410384 | 64.58947 | 0.463683 | 82.1769 | 1.404061 |

| **AP_amplitude_change** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | -0.1681 | 0.0809 | -0.28105 | 1.39619 | | | -0.28863 | 1.489811 | -0.30311 | 1.668848 | -0.21805 | 0.61744 |
| 1 | -0.2138 | 0.0925 | -0.3798 | 1.794642 | -0.18393 | 0.322882 | -0.31476 | 1.091428 | -0.32425 | 1.194026 | -0.2311 | 0.187015 |

| **AP_amplitude_from_voltagebase** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 93.084 | 11.1059 | 78.26485 | 1.334349 | 77.93612 | 1.363949 | 77.536 | 1.399976 | 94.56439 | 0.133297 | 106.7112 | 1.227024 |
| 1 | 89.7448 | 11.789 | 73.13733 | 1.408726 | 76.84316 | 1.094379 | 77.07963 | 1.074321 | 92.13278 | 0.20256 | 106.0887 | 1.386367 |

| **AP_begin_voltage** |
|---|

| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 0.8 | -49.3576 | 6.4407 | -44.2408 | 0.794445 | | | -44.7338 | 0.717905 | -46.9961 | 0.366646 | -46.5256 | 0.439701 |
| 1 | -49.1419 | 7.24 | -42.2679 | 0.949453 | -54.5437 | 0.746098 | -43.6409 | 0.759813 | -45.1043 | 0.557686 | -45.7739 | 0.465196 |

| AP_begin_width | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 1.7972 | 0.3422 | 3.972131 | 6.355731 | | | 4.028302 | 6.519877 | 2.433333 | 1.858952 | 3.027273 | 3.594602 |
| 1 | 1.8931 | 0.3592 | 3.859722 | 5.475006 | 3.3 | 3.916759 | 4.07931 | 6.086332 | 2.364286 | 1.311764 | 3.033333 | 3.174369 |

| AP_duration | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 1.9937 | 0.1717 | 2.732787 | 4.304525 | | | 2.924528 | 5.421248 | 2.1 | 0.619103 | 3.163636 | 6.81384 |
| 1 | 2.0392 | 0.1693 | 2.198611 | 0.94159 | 3.55 | 8.923804 | 2.886207 | 5.002994 | 2.1 | 0.359126 | 3.153333 | 6.580823 |

| AP_duration_change | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 0.1391 | 0.0966 | -0.34518 | 5.013203 | | | -0.28565 | 4.39697 | -0.68182 | 8.498118 | -0.49524 | 6.566647 |
| 1 | 0.1828 | 0.0904 | -0.40362 | 6.486966 | -0.33333 | 5.70944 | -0.21053 | 4.350955 | -0.57846 | 8.421035 | -0.39148 | 6.352694 |

| AP_duration_half_width | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 0.8029 | 0.0943 | 1.262295 | 4.871634 | | | 1.469811 | 7.07223 | 0.7 | 1.091198 | 1.236364 | 4.596645 |
| 1 | 0.8315 | 0.0942 | 1.211111 | 4.029842 | 1.4 | 6.035032 | 1.598276 | 8.139871 | 0.7 | 1.395966 | 1.253333 | 4.478061 |

| AP_duration_half_width_change | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 0.1537 | 0.1399 | -0.46875 | 4.449249 | | | -0.41308 | 4.0513 | -0.3 | 3.243031 | -0.12143 | 1.966609 |
| 1 | 0.2238 | 0.1138 | -0.57638 | 7.031471 | -0.22222 | 3.919352 | -0.35298 | 5.068387 | -0.3 | 4.602812 | -0.16667 | 3.431166 |

| AP_fall_rate | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | -52.9764 | 9.141 | -15.8216 | 4.064629 | -22.4207 | 3.342705 | -20.1243 | 3.593926 | -43.7642 | 1.007789 | -35.2976 | 1.93401 |
| 1 | -48.6185 | 9.8823 | -13.0491 | 3.599303 | -23.9712 | 2.494082 | -19.7777 | 2.918431 | -43.3879 | 0.529289 | -35.11 | 1.366939 |

| AP_fall_time | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 1.5073 | 0.1191 | 1.708065 | 1.68568 | 3.1 | 13.3728 | 2.074074 | 4.758808 | 1.5 | 0.061293 | 2.433333 | 7.775259 |
| 1 | 1.5263 | 0.142 | 1.265753 | 1.834835 | 2.9 | 9.673944 | 1.967797 | 3.109131 | 1.44 | 0.607746 | 2.4 | 6.152817 |

| AP_height | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 23.3497 | 10.9233 | 14.4747 | 0.812483 | 11.63042 | 1.072869 | 12.56237 | 0.987553 | 22.16316 | 0.108625 | 37.07802 | 1.256792 |
| 1 | 19.8138 | 11.8553 | 9.347181 | 0.882864 | 10.53747 | 0.782463 | 12.10599 | 0.650158 | 19.73156 | 0.006937 | 36.45549 | 1.403734 |

| AP_rise_rate | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 0.8 | 160.9801 | 45.3824 | 76.48788 | 1.861784 | | | 79.12712 | 1.803628 | 108.1219 | 1.164729 | 116.6858 | 0.976025 |
| 1 | 146.3948 | 43.2626 | 62.81344 | 1.931954 | 80.22495 | 1.529493 | 74.09294 | 1.671232 | 99.49018 | 1.084184 | 112.5158 | 0.783101 |

| AP_rise_rate_change | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | -0.2631 | 0.1487 | 0.333875 | 4.01463 | | | 0.870629 | 7.624274 | 4.817439 | 34.16637 | 3.358744 | 24.35672 |
| 1 | -0.3416 | 0.1404 | -0.07933 | 1.868044 | 1.241176 | 11.27333 | 0.47272 | 5.800002 | 2.843277 | 22.68431 | 2.293171 | 18.76617 |

| AP_rise_time | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 0.4864 | 0.0935 | 1.036066 | 5.878776 | | | 0.85283 | 3.919039 | 0.633333 | 1.57148 | 0.718182 | 2.47895 |
| 1 | 0.5129 | 0.1001 | 0.947222 | 4.338883 | 0.8 | 2.868132 | 0.92069 | 4.073823 | 0.657143 | 1.440988 | 0.733333 | 2.202131 |

| AP_width | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 0.9107 | 0.1229 | 1.883607 | 7.916245 | | | 1.745283 | 6.790749 | 0.866667 | 0.358286 | 1.572727 | 5.386715 |
| 1 | 0.9291 | 0.1458 | 1.798611 | 5.963725 | 1.25 | 2.20096 | 1.765517 | 5.736744 | 0.821429 | 0.738487 | 1.613333 | 4.692958 |

| APlast_amp | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 65.4508 | 11.0654 | 58.42831 | 0.634635 | 63.44244 | 0.181499 | 59.88565 | 0.502932 | 68.13201 | 0.242306 | 84.06944 | 1.6826 |
| 1 | 60.9569 | 12.1796 | 52.35967 | 0.705871 | 64.09396 | 0.257566 | 57.85012 | 0.255081 | 66.34042 | 0.442011 | 82.43395 | 1.763362 |

| ISI_values |
|---|

| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 0.8 | 48.4821 | 30.9888 | 6.206667 | 1.364217 | | | 7.496154 | 1.322605 | 137.9 | 2.885491 | 34.72 | 0.444099 |
| 1 | 34.5385 | 12.0706 | 5.395775 | 2.414356 | 179.4 | 12.00118 | 6.798246 | 2.298167 | 27.68462 | 0.567816 | 26.65 | 0.65353 |

| amp_drop_first_last | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 11.8027 | 6.7405 | 3.260094 | 1.267355 | | | 1.081422 | 1.590576 | 4.457614 | 1.089694 | 0.353906 | 1.698508 |
| 1 | 14.9766 | 7.6991 | 9.624035 | 0.69522 | 2.926542 | 1.565126 | 2.886807 | 1.570287 | 2.444336 | 1.627757 | 0.792784 | 1.842269 |

| amp_drop_first_second | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 4.2233 | 2.8446 | 24.08695 | 6.982932 | | | 6.783199 | 0.899915 | 4.024351 | 0.069939 | 0.323771 | 1.370853 |
| 1 | 5.6801 | 3.1828 | 38.27494 | 10.24093 | 2.48044 | 1.005297 | 27.21386 | 6.765666 | 13.58332 | 2.483103 | 3.513167 | 0.680826 |

| amp_drop_second_last | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 7.5794 | 5.5013 | -20.8269 | 5.163553 | | | -5.70178 | 2.414189 | 0.433264 | 1.29899 | 0.030135 | 1.372269 |
| 1 | 9.2965 | 6.0702 | -28.6509 | 6.251426 | 0.446101 | 1.458008 | -24.3271 | 5.539118 | -11.139 | 3.366526 | -2.72038 | 1.979652 |

| doublet_ISI | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 15.0424 | 9.8883 | 21.7 | 0.673281 | | | 6.6 | 0.853777 | 21 | 0.60249 | 13.8 | 0.125643 |
| 1 | 10.1299 | 4.2819 | 14.5 | 1.020598 | 128.5 | 27.64429 | 5.4 | 1.104626 | 11.4 | 0.296621 | 11 | 0.203204 |

| fast_AHP | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 8.2685 | 2.869 | 4.434988 | 1.336184 | | | 5.360864 | 1.013467 | 11.02092 | 0.959367 | 18.14957 | 3.44408 |
| 1 | 7.9004 | 2.4961 | 3.106849 | 1.920416 | 13.14176 | 2.09982 | 4.654415 | 1.300423 | 10.47681 | 1.032174 | 16.72169 | 3.534029 |

| fast_AHP_change | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 0.2827 | 0.8433 | -1.14951 | 1.698339 | | | -1.28196 | 1.855403 | -1.66785 | 2.312991 | -2.6904 | 3.525552 |
| 1 | | | | | | | | | | | | |

| irregularity_index | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 10.1155 | 9.5916 | 0.105 | 1.043674 | | | 0.303846 | 1.022942 | 22.6 | 1.301608 | 2.05 | 0.840892 |
| 1 | 7.3445 | 9.1538 | 0.08169 | 0.79342 | 0 | 0.802344 | 0.14386 | 0.786629 | 1.569231 | 0.630915 | 1.171429 | 0.674373 |

| max_amp_difference | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 4.8977 | 2.7676 | 24.08695 | 6.933534 | | | 27.22874 | 8.068738 | 4.024351 | 0.315562 | 0.573725 | 1.562356 |
| 1 | 6.0333 | 2.8755 | 38.27494 | 11.21253 | 2.48044 | 1.235562 | 27.21386 | 7.36587 | 13.58332 | 2.625637 | 3.513167 | 0.876416 |

| mean_frequency | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |

| | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 0.8 | 31.5698 | 10.6864 | 156.7636 | 11.71524 | 370.3704 | 31.7039 | 135.5762 | 9.732595 | 13.25381 | 1.713953 | 32.87671 | 0.122297 |
| 1 | 37.5047 | 9.4431 | 183.0491 | 15.41278 | 9.674299 | 2.947168 | 149.5564 | 11.86599 | 40.01067 | 0.265376 | 41.32231 | 0.404276 |

| **min_AHP_values** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | -58.0613 | 5.8413 | -48.4662 | 1.642635 | -68.294 | 1.751783 | -50.2966 | 1.329268 | -57.4603 | 0.102893 | -64.1744 | 1.046529 |
| 1 | -57.4225 | 6.6545 | -45.4972 | 1.792068 | -67.2332 | 1.474293 | -48.1332 | 1.395942 | -55.2275 | 0.329854 | -62.0435 | 0.694414 |

| **min_voltage_between_spikes** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | -58.9266 | 5.8058 | -48.5823 | 1.781712 | | | -50.2836 | 1.488678 | -57.0627 | 0.321034 | -64.0736 | 0.88653 |
| 1 | -58.4913 | 6.7084 | -45.2405 | 1.975258 | -67.0046 | 1.269052 | -48.2188 | 1.531292 | -55.1333 | 0.500566 | -61.9533 | 0.516068 |

| **peak_voltage** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 23.3497 | 10.9233 | 14.4747 | 0.812483 | 11.63042 | 1.072869 | 12.56237 | 0.987553 | 22.16316 | 0.108625 | 37.07802 | 1.256792 |
| 1 | 19.8138 | 11.8553 | 9.347181 | 0.882864 | 10.53747 | 0.782463 | 12.10599 | 0.650158 | 19.73156 | 0.006937 | 36.45549 | 1.403734 |

| **spike_half_width** | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Step (nA)** | **Experiment mean** | **Experiment std** | **C10 value** | **C10 error** | **CP15 value** | **CP15 error** | **Tu19 value** | **Tu19 error** | **To21 value** | **To21 error** | **M18 value** | **M18 error** |
| 0.8 | 0.7784 | 0.117 | 1.906132 | 9.638731 | 1.686305 | 7.759868 | 1.593291 | 6.964883 | 0.715492 | 0.537673 | 1.306373 | 4.512586 |
| 1 | 0.8323 | 0.1475 | 1.735355 | 6.122407 | 1.59268 | 5.155117 | 1.743344 | 6.176572 | 0.677314 | 1.050752 | 1.314855 | 3.271556 |

| **spike_width2** |
|---|

| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 0.8 | 0.7538 | 0.103 | 1.495442 | 7.200404 | | | 1.467964 | 6.933634 | 0.612595 | 1.370919 | 1.075016 | 3.118601 |
| 1 | 0.7911 | 0.119 | 1.638763 | 7.123216 | 1.40962 | 5.19765 | 1.630358 | 7.052588 | 0.598542 | 1.618138 | 1.085496 | 2.473916 |

| time_to_first_spike | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 14.1697 | 13.3451 | 1.4 | 0.956883 | 2.7 | 0.859469 | 1.9 | 0.919416 | 5 | 0.687121 | 4 | 0.762055 |
| 1 | 8.6998 | 6.7175 | 1.2 | 1.116457 | 2.2 | 0.967592 | 1.6 | 1.056911 | 3.6 | 0.759181 | 3.1 | 0.833614 |

| time_to_second_spike | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 29.2121 | 22.1682 | 23.1 | 0.275715 | | | 8.5 | 0.934316 | 26 | 0.144897 | 17.8 | 0.514796 |
| 1 | 18.8298 | 10.3516 | 15.7 | 0.302349 | 130.7 | 10.80704 | 7 | 1.142799 | 15 | 0.369972 | 14.1 | 0.456915 |

| time_to_last_spike | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Step (nA) | Experiment mean | Experiment std | C10 value | C10 error | CP15 value | CP15 error | Tu19 value | Tu19 error | To21 value | To21 error | M18 value | M18 error |
| 0.8 | 302.7331 | 85.1578 | 395.5 | 1.089353 | 2.7 | 3.52326 | 398.3 | 1.122233 | 301.8 | 0.010957 | 365 | 0.731194 |
| 1 | 309.4068 | 100.0108 | 398.8 | 0.893835 | 310.1 | 0.006931 | 394.5 | 0.85084 | 374.9 | 0.654861 | 387.2 | 0.777848 |