Report of Calibration
PSC 4CH-MSF-AR-Fast XY Corr_S/N 0007
2025-12-18 13:57:29

Calibration Current standard: BNL PSC ATE S/N 001
Calibration Volt standard: HP 3458A-002 S/N 2823A 23647
Calibration Resistance standard: Fluke 742A-1 S/N 1063008
End Header

lab{2}Chan1
Burden resistor = 33.3333

Measuring initial gains and offsets

Itest	dacSP	dcct1	dcct2	dacRB	err
-0.999898	1.000207	-1.009169	-1.010301	0.999345	-0.019215
-27.000990	26.992918	-26.815113	-26.826445	27.043730	0.041314

	dacSP	dcct1	dcct2	dacRB
Initial measured offsets:	-0.000632	-0.016776	-0.017515	0.000000
Initial measured gains:	0.999678	0.992495	0.992887	1.001988
Gain corrections:	0.999678	1.007562	1.007164	1.000000

Writing gain and offset corrections for dacSP, dcct1, and dcct2 to PSC

Measuring DAC readback gain and offset

DAC SP	DAC RB
1.000000	0.999575
27.000000	27.042677

Measured offset: -0.002083
Measured gain: 1.001658
Gain correction: 0.998345

Writing gain and offset constants for dacRB to PSC

Verification

Itest	dacSP	dcct1	dcct2	dacRB	err
-0.999935	1.000155	-0.999911	-1.000109	1.000468	-0.008788
-27.000615	27.000344	-27.001923	-27.001619	27.000942	-0.004325

	dacSP	dcct1	dcct2	dacRB
Final measured offsets:	-0.000238	0.000076	-0.000142	0.000303
Final measured gains:	0.999981	1.000051	1.000032	1.000011

	dacSP	dcct1	dcct2	dacRB
Final measured offsets mean:	-0.000329	-0.000130	-0.000206	0.000321
Final measured offsets stdev:	0.000203	0.000155	0.000114	0.000057
Final measured gains mean:	0.999973	1.000036	1.000029	0.999998
Final measured gains stdev:	0.000008	0.000009	0.000005	0.000013

Saving channel 1 calibration constants to qspi

Burden resistor = 33.3333

Measuring initial gains and offsets

Itest	dacSP	dcct1	dcct2	dacRB	err
-0.999571	1.001463	-1.008105	-1.006899	0.992969	-0.054093
-27.001093	26.981494	-26.791597	-26.810341	26.988167	0.048656

	dacSP	dcct1	dcct2	dacRB
Initial measured offsets:	-0.002718	-0.016916	-0.014943	0.000000
Initial measured gains:	0.999173	0.991615	0.992382	1.000584
Gain corrections:	0.999173	1.008456	1.007677	1.000000

Writing gain and offset corrections for dacSP, dcct1, and dcct2 to PSC

Measuring DAC readback gain and offset

DAC SP	DAC RB
1.000000	0.993347
27.000000	26.987246

Measured offset: -0.006418
Measured gain: 0.999765
Gain correction: 1.000235

Writing gain and offset constants for dacRB to PSC

Verification

Itest	dacSP	dcct1	dcct2	dacRB	err
-0.999915	1.000520	-1.000321	-1.000236	1.001094	-0.038600
-27.000686	27.000238	-27.002071	-27.001659	27.000278	-0.000612

	dacSP	dcct1	dcct2	dacRB
Final measured offsets:	-0.000645	-0.000367	-0.000295	0.000594
Final measured gains:	0.999960	1.000038	1.000025	0.999979

	dacSP	dcct1	dcct2	dacRB
Final measured offsets mean:	-0.000607	-0.000216	-0.000298	0.000172
Final measured offsets stdev:	0.000068	0.000114	0.000108	0.000325
Final measured gains mean:	0.999962	1.000041	1.000031	0.999984
Final measured gains stdev:	0.000004	0.000005	0.000006	0.000007

Saving channel 2 calibration constants to qspi

Burden resistor = 33.3333

Measuring initial gains and offsets

Itest	dacSP	dcct1	dcct2	dacRB	err
-0.999760	1.000616	-1.008726	-1.009472	0.999663	-0.050948
-27.000756	26.991885	-26.803247	-26.816051	27.017902	0.053815

	dacSP	dcct1	dcct2	dacRB
Initial measured offsets:	-0.001230	-0.016905	-0.017187	0.000000
Initial measured gains:	0.999626	0.992059	0.992523	1.001038
Gain corrections:	0.999626	1.008005	1.007534	1.000000

Writing gain and offset corrections for dacSP, dcct1, and dcct2 to PSC

Measuring DAC readback gain and offset

DAC SP	DAC RB
1.000000	1.000074
27.000000	27.016960

Measured offset: -0.000576
Measured gain: 1.000649
Gain correction: 0.999351

Writing gain and offset constants for dacRB to PSC

Verification

Itest	dacSP	dcct1	dcct2	dacRB	err
-0.999665	1.000377	-0.999953	-0.999811	1.000326	-0.026391
-27.000583	27.000285	-27.001871	-27.001587	26.999966	0.010303

	dacSP	dcct1	dcct2	dacRB
Final measured offsets:	-0.000751	-0.000250	-0.000113	-0.000040
Final measured gains:	0.999961	1.000038	1.000033	0.999990

	dacSP	dcct1	dcct2	dacRB
Final measured offsets mean:	-0.000568	-0.000097	-0.000136	-0.000051
Final measured offsets stdev:	0.000111	0.000110	0.000083	0.000118
Final measured gains mean:	0.999963	1.000039	1.000034	0.999996
Final measured gains stdev:	0.000005	0.000008	0.000008	0.000012

Saving channel 3 calibration constants to qspi

Burden resistor = 33.3333

Measuring initial gains and offsets

Itest	dacSP	dcct1	dcct2	dacRB	err
-0.999898	1.000604	-1.008970	-1.007687	0.993566	-0.053128
-27.000899	26.983978	-26.797260	-26.797516	26.983194	0.046897

	dacSP	dcct1	dcct2	dacRB
Initial measured offsets:	-0.001383	-0.017252	-0.015910	0.000000
Initial measured gains:	0.999322	0.991819	0.991878	1.000241
Gain corrections:	0.999322	1.008248	1.008188	1.000000

Writing gain and offset corrections for dacSP, dcct1, and dcct2 to PSC

Measuring DAC readback gain and offset

DAC SP	DAC RB
1.000000	0.994076
27.000000	26.982302

Measured offset: -0.005471
Measured gain: 0.999547
Gain correction: 1.000453

Writing gain and offset constants for dacRB to PSC

Verification

Itest	dacSP	dcct1	dcct2	dacRB	err
-0.999843	1.000420	-1.000133	-1.000251	0.999739	-0.034054
-27.000845	27.000376	-27.001907	-27.001802	27.000217	-0.000241

	dacSP	dcct1	dcct2	dacRB
Final measured offsets:	-0.000617	-0.000260	-0.000386	-0.000701
Final measured gains:	0.999960	1.000030	1.000021	1.000020

	dacSP	dcct1	dcct2	dacRB
Final measured offsets mean:	-0.000626	-0.000181	-0.000228	-0.000120
Final measured offsets stdev:	0.000065	0.000067	0.000091	0.000405
Final measured gains mean:	0.999970	1.000033	1.000028	1.000002
Final measured gains stdev:	0.000025	0.000012	0.000007	0.000011

Saving channel 4 calibration constants to qspi

Test data reviewed by _____ Date_____