Report of Calibration
PSC 4CH-MSS-AR Slow XY Corr_S/N 0019
2025-12-11 20:22:23

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
-1.001142	1.002810	-1.012507	-1.011063	1.003325	0.049853
-27.001443	27.029209	-26.848217	-26.820770	27.092987	0.031674

	dacSP	dcct1	dcct2	dacRB
Initial measured offsets:	-0.000663	-0.017703	-0.017260	0.000000
Initial measured gains:	1.001004	0.993670	0.992670	1.002431
Gain corrections:	1.001004	1.006371	1.007385	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	1.001894
27.000000	27.091194

Measured offset: -0.001541
Measured gain: 1.003435
Gain correction: 0.996577

Writing gain and offset constants for dacRB to PSC

Verification

Itest	dacSP	dcct1	dcct2	dacRB	err
-1.001304	1.001282	-1.001294	-1.001399	1.001455	0.048715
-27.001168	27.001362	-27.001081	-27.001137	27.001467	0.059911

	dacSP	dcct1	dcct2	dacRB
Final measured offsets:	0.000031	0.000007	-0.000100	0.000176
Final measured gains:	1.000008	0.999997	0.999995	0.999997

	dacSP	dcct1	dcct2	dacRB
Final measured offsets mean:	-0.000169	-0.000198	-0.000224	0.000608
Final measured offsets stdev:	0.000163	0.000140	0.000121	0.000239
Final measured gains mean:	0.999975	0.999982	0.999983	0.999990
Final measured gains stdev:	0.000019	0.000012	0.000011	0.000008

Saving channel 1 calibration constants to qspi

lab{2}Chan2
Burden resistor = 33.3333

Measuring initial gains and offsets

Itest	dacSP	dcct1	dcct2	dacRB	err
-1.000826	1.003653	-1.011571	-1.010537	0.998495	0.047149
-27.001235	27.002475	-26.810795	-26.827438	27.053772	0.037833

	dacSP	dcct1	dcct2	dacRB
Initial measured offsets:	-0.002888	-0.018489	-0.016774	0.000000
Initial measured gains:	0.999939	0.992262	0.992942	1.002171
Gain corrections:	0.999939	1.007798	1.007108	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	0.997574
27.000000	27.052666

Measured offset: -0.004545
Measured gain: 1.002119
Gain correction: 0.997886

Writing gain and offset constants for dacRB to PSC

Verification

Itest	dacSP	dcct1	dcct2	dacRB	err
-1.000993	1.001067	-1.001215	-1.001059	1.000370	0.023901
-27.001368	27.000570	-27.000977	-27.000990	27.000135	0.014696

	dacSP	dcct1	dcct2	dacRB
Final measured offsets:	-0.000107	-0.000246	-0.000083	-0.000707
Final measured gains:	0.999966	0.999976	0.999983	1.000010

	dacSP	dcct1	dcct2	dacRB
Final measured offsets mean:	0.000032	-0.000169	-0.000106	-0.000566
Final measured offsets stdev:	0.000077	0.000148	0.000129	0.000074
Final measured gains mean:	0.999975	0.999965	0.999967	1.000013
Final measured gains stdev:	0.000024	0.000020	0.000022	0.000017

Saving channel 2 calibration constants to qspi

lab{2}Chan3
Burden resistor = 33.3333

Measuring initial gains and offsets

Itest	dacSP	dcct1	dcct2	dacRB	err
-1.000699	1.003287	-1.010165	-1.010051	1.004629	0.041210
-27.001516	27.002289	-26.814680	-26.824001	27.093370	0.040142

	dacSP	dcct1	dcct2	dacRB
Initial measured offsets:	-0.002658	-0.017021	-0.016545	0.000000
Initial measured gains:	0.999930	0.992450	0.992813	1.003452
Gain corrections:	0.999930	1.007607	1.007239	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	1.003878
27.000000	27.091539

Measured offset: 0.000507
Measured gain: 1.003372
Gain correction: 0.996640

Writing gain and offset constants for dacRB to PSC

Verification

Itest	dacSP	dcct1	dcct2	dacRB	err
-1.000773	1.000971	-1.001040	-1.000929	1.002042	0.058786
-27.001559	27.001384	-27.001551	-27.001427	27.002436	0.026448

	dacSP	dcct1	dcct2	dacRB
Final measured offsets:	-0.000212	-0.000278	-0.000167	0.001072
Final measured gains:	0.999986	0.999989	0.999989	0.999999

	dacSP	dcct1	dcct2	dacRB
Final measured offsets mean:	-0.000020	-0.000210	-0.000178	0.001292
Final measured offsets stdev:	0.000128	0.000143	0.000150	0.000118
Final measured gains mean:	0.999983	0.999987	0.999987	0.999993
Final measured gains stdev:	0.000023	0.000023	0.000024	0.000006

Saving channel 3 calibration constants to qspi

lab{2}Chan4
Burden resistor = 33.3333

Measuring initial gains and offsets

Itest	dacSP	dcct1	dcct2	dacRB	err
-1.000409	1.006253	-1.010088	-1.010301	1.000814	0.038838
-27.001300	26.997008	-26.807522	-26.818962	27.067484	0.031556

	dacSP	dcct1	dcct2	dacRB
Initial measured offsets:	-0.006234	-0.017508	-0.017288	0.000000
Initial measured gains:	0.999610	0.992175	0.992607	1.002921
Gain corrections:	0.999610	1.007887	1.007448	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	1.000611
27.000000	27.065960

Measured offset: -0.001902
Measured gain: 1.002513
Gain correction: 0.997493

Writing gain and offset constants for dacRB to PSC

Verification

Itest	dacSP	dcct1	dcct2	dacRB	err
-1.000616	1.000400	-1.000780	-1.000729	1.000770	0.029933
-27.001536	27.001080	-27.001047	-27.001270	27.001263	0.047701

	dacSP	dcct1	dcct2	dacRB
Final measured offsets:	0.000207	-0.000189	-0.000127	0.000378
Final measured gains:	0.999991	0.999975	0.999985	0.999993

	dacSP	dcct1	dcct2	dacRB
Final measured offsets mean:	0.000027	-0.000225	-0.000187	0.000296
Final measured offsets stdev:	0.000182	0.000039	0.000049	0.000242
Final measured gains mean:	0.999986	0.999986	0.999989	0.999980
Final measured gains stdev:	0.000019	0.000009	0.000008	0.000009

Saving channel 4 calibration constants to qspi

Test data reviewed by _____ Date_____