

(ON18H / 144LQFP) Electrical Distribution, Revision 26MAY2014

Per AECQ100RevG3, ED App. RevB, key datasheet parameter Cpk < 1.67 requires justification and QA approval.
 Note: Cpk is auto-calculated using both LSL and USL if provided. One-sided recalculation may be appropriate (i.e., leakage) to justify a low Cpk.

Parameter Name, as in Datasheet	Units	Lower Spec Limit (NA if no spec)	Upper Spec Limit (NA if no spec)	ATMC Baseline Time0 (Pre-HTOL)			ATMC Baseline Post-HTOL (1008hrs)			TSMC14 Time0 (Pre-HTOL)			TSMC14 Post-HTOL(1008)			Pre-TSMC14 vs Pre-ATMC, TO Mean Shift toward LSL	Pre-TSMC14 vs Pre-ATMC, TO Mean Shift toward USL	Post-TSMC14 vs Post-ATMC, Post Mean Shift toward LSL	Post-TSMC14 vs Post-ATMC, Post Mean Shift toward USL	Comment
				Temp	145	C	Temp	145	C	Temp	145	C	Temp	145	C	Shift within +/-1 sigma or less than +/-15% to spec	Shift within +/-1 sigma or less than +/-15% to spec	Shift within +/-1 sigma or less than +/-15% to spec	Shift within +/-1 sigma or less than +/-15% to spec	
				Avg	Std	Cpk	Avg	Std	Cpk	Avg	Std	Cpk	Avg	Std	Cpk	Avg	Std	Cpk	Avg	
Input leakage current PB6	uA	-1	1	-0.0732	0.0108	28.60	-0.0664	0.0123	25.30	-0.1028	0.0163	18.33	-0.0960	0.0151	19.97	3.30%	2.68%	3.27%	2.70%	PASS
Input leakage current PB3	uA	-1	1	-0.0151	0.0022	149.23	-0.0132	0.0020	164.47	-0.0200	0.0045	72.67	-0.0181	0.0038	86.73	0.50%	0.48%	0.50%	0.48%	PASS
Input leakage current PB2	uA	-1	1	-0.0156	0.0022	149.15	-0.0136	0.0019	173.05	-0.0201	0.0045	71.95	-0.0181	0.0039	83.62	0.46%	0.44%	0.46%	0.45%	PASS
Input leakage current PB1	uA	-1	1	-0.0149	0.0022	149.26	-0.0126	0.0019	173.23	-0.0197	0.0045	72.65	-0.0174	0.0040	82.88	0.49%	0.47%	0.49%	0.47%	PASS
Input leakage current PC12	uA	-1	1	-0.0249	0.0027	120.38	-0.0238	0.0030	108.47	-0.0301	0.0050	64.35	-0.0290	0.0048	66.95	0.54%	0.51%	0.54%	0.51%	PASS
Input leakage current PC11	uA	-1	1	-0.0253	0.0026	124.96	-0.0239	0.0030	108.46	-0.0304	0.0050	64.44	-0.0290	0.0047	68.46	0.52%	0.49%	0.52%	0.49%	PASS
Input leakage current PE5	uA	-1	1	-0.0056	0.0004	909.87	-0.0054	0.0004	766.91	-0.0044	0.0006	537.67	-0.0042	0.0005	661.65	-0.12%	-0.12%	-0.12%	-0.12%	PASS
Input leakage current PE6	uA	-1	1	-0.0059	0.0004	909.60	-0.0055	0.0005	637.99	-0.0045	0.0006	585.30	-0.0041	0.0006	594.99	-0.14%	-0.14%	-0.14%	-0.14%	PASS
Input leakage current PE10	uA	-1	1	-0.0051	0.0004	920.69	-0.0052	0.0006	553.13	-0.0042	0.0007	460.06	-0.0043	0.0006	565.29	-0.09%	-0.09%	-0.09%	-0.09%	PASS
Input leakage current PA13	uA	-1	1	0.0124	0.0018	182.89	0.0126	0.0020	164.57	0.0107	0.0041	79.78	0.0109	0.0036	92.42	0.17%	0.17%	0.17%	0.17%	PASS
Input leakage current PA12	uA	-1	1	0.0266	0.0025	129.79	0.0247	0.0028	116.11	0.0306	0.0056	57.38	0.0287	0.0048	68.00	-0.39%	-0.41%	-0.39%	-0.41%	PASS
Input leakage current PA11	uA	-1	1	0.0273	0.0026	124.71	0.0255	0.0032	101.51	0.0313	0.0062	52.38	0.0295	0.0053	60.98	-0.39%	-0.42%	-0.39%	-0.42%	PASS
Input leakage current PB14	uA	-1	1	0.0004	0.0005	737.00	0.0005	0.0005	661.07	0.0050	0.0010	317.89	0.0050	0.0010	323.05	-0.46%	-0.46%	-0.46%	-0.46%	PASS
Input leakage current PB15	uA	-1	1	0.0006	0.0007	506.06	0.0005	0.0007	498.18	0.0049	0.0012	270.38	0.0048	0.0011	315.06	-0.43%	-0.43%	-0.43%	-0.43%	PASS
Input leakage current PC0	uA	-1	1	-0.0003	0.0005	686.37	0.0001	0.0007	450.14	0.0051	0.0012	277.11	0.0056	0.0012	281.21	-0.54%	-0.55%	-0.54%	-0.55%	PASS
Input leakage current PC1	uA	-1	1	0.0004	0.0006	575.49	0.0008	0.0009	370.16	0.0054	0.0010	342.22	0.0058	0.0007	464.25	-0.50%	-0.51%	-0.50%	-0.51%	PASS
Input leakage current XTAL	uA	-1	1	-0.0122	0.0024	137.19	-0.0111	0.0021	156.97	-0.0210	0.0074	44.02	-0.0199	0.0075	43.29	0.90%	0.86%	0.90%	0.86%	PASS
Input leakage current XTAL	uA	-1	1	0.0034	0.0004	746.52	0.0029	0.0005	659.07	0.0050	0.0010	335.93	0.0045	0.0009	361.69	-0.16%	-0.16%	-0.16%	-0.16%	PASS
Input leakage current XTAL	uA	-1	1	0.0351	0.0029	110.91	0.0345	0.0033	97.53	0.0362	0.0086	37.21	0.0356	0.0077	41.73	-0.11%	-0.12%	-0.11%	-0.12%	PASS
Input leakage current XTAL	uA	-1	1	0.0173	0.0015	218.38	0.0161	0.0018	182.20	0.0220	0.0032	103.15	0.0208	0.0026	124.54	-0.46%	-0.46%	-0.46%	-0.48%	PASS
Equivalent pull-up current PC10	uA	-130	NA	-30.3000	0.3685	90.19	-30.3000	0.4496	73.92	-26.1326	0.6145	56.34	-26.1326	0.3896	88.87	-4.01%	NA	-4.01%	NA	PASS
Equivalent pull-up current PC11	uA	-130	NA	-30.8000	0.3469	95.32	-30.8000	0.3192	103.91	-25.6044	0.4355	79.90	-25.3044	0.3387	103.03	-4.98%	NA	-4.96%	NA	PASS
Equivalent pull-up current PA13	uA	NA	-10	-45.7000	0.4526	26.29	-45.3000	0.4708	24.99	-43.6504	0.5537	20.26	-43.2504	0.7689	14.41	NA	-6.09%	NA	-6.16%	PASS
Equivalent pull-up current PA12	uA	NA	-10	-45.9000	0.5019	23.84	-45.7000	0.5612	21.20	-42.8613	0.4504	24.32	-42.6613	0.3931	27.70	NA	-9.25%	NA	-9.30%	PASS
Equivalent pull-up current PA11	uA	NA	-10	-45.6000	0.4480	26.49	-45.5000	0.5006	23.64	-42.9262	0.5731	19.15	-42.8262	0.4494	24.35	NA	-8.12%	NA	-8.15%	PASS
Equivalent pull-down current PA9	uA	10	NA	32.8000	0.4633	16.40	31.9000	0.9152	7.98	30.0040	0.4010	16.63	29.1040	0.2855	22.30	13.98%	NA	14.64%	NA	PASS
Equivalent pull-down current PA8	uA	10	NA	32.8000	0.2817	26.98	32.4000	0.4798	15.56	30.5157	0.4381	15.61	30.1157	1.2960	5.17	11.13%	NA	11.36%	NA	PASS
Equivalent pull-down current PA7	uA	10	NA	32.8000	0.3365	22.59	32.5000	0.7773	9.65	30.3814	0.4901	13.86	30.0814	0.3630	18.44	11.87%	NA	12.04%	NA	PASS
Equivalent pull-down current PG6	uA	NA	130	50.2000	0.3291	80.83	50.0000	0.6185	43.12	49.8355	0.4863	54.95	49.6355	0.8078	33.16	NA	0.45%	NA	0.45%	PASS
Equivalent pull-down current PG5	uA	NA	130	50.6000	0.4022	65.80	49.9000	0.8077	43.94	48.9510	0.7025	38.46	48.2510	0.5787	47.09	NA	2.03%	NA	2.02%	PASS
Equivalent pull-down current PG4	uA	NA	130	49.0000	0.4909	55.00	49.1000	0.7903	34.12	50.0302	0.4588	58.10	50.1302	0.1859	143.21	NA	-1.29%	NA	-1.29%	PASS
Input leakage current AN3_PC2	uA	-1	1	0.0026	0.0007	457.19	0.0028	0.0010	342.47	0.1593	0.0167	16.79	0.1595	0.0144	19.51	-13.52%	-18.64%	-13.52%	-18.65%	Justify, both labs avg is different, TSMC14 post HTOL drift is minimal
Input leakage current AN6_PE7	uA	-1	1	0.0029	0.0007	485.14	0.0029	0.0007	453.62	0.1594	0.0165	16.96	0.1594	0.0142	19.72	-13.50%	-18.62%	-13.50%	-18.62%	
Input leakage current AN11_PB9	uA	-1	1	0.0078	0.0011	300.67	0.0072	0.0010	338.07	0.1640	0.0170	16.40	0.1634	0.0149	18.67	-13.42%	-18.69%	-13.43%	-18.67%	
Input leakage current AN7_PE9	uA	-1	1	0.0030	0.0007	470.79	0.0030	0.0007	473.61	0.1613	0.0181	15.49	0.1613	0.0152	18.43	-13.63%	-18.87%	-13.63%	-18.87%	
Input leakage current AN12_PB10	uA	-1	1	0.0075	0.0011	300.76	0.0069	0.0011	300.94	0.1663	0.0183	15.21	0.1657	0.0155	18.00	-13.62%	-19.05%	-13.62%	-19.04%	
Input leakage current AN13_PB11	uA	-1	1	0.0065	0.0009	360.98	0.0063	0.0009	379.90	0.1661	0.0185	15.06	0.1659	0.0154	18.04	-13.69%	-19.14%	-13.69%	-19.14%	
Offset error	LSB	-6	6	0.0274	0.1506	13.22	0.4826	0.3393	5.42	1.2922	0.3433	4.57	1.7474	0.4497	3.15	-17.34%	-26.87%	-16.33%	-29.74%	
Total unadjusted error ADC0 neg test	LSB	-10	10	-1.8000	0.2156	12.68	-1.5000	0.2738	10.35	-0.7870	0.3544	8.66	-0.4870	0.4182	7.58	-11.00%	-9.39%	-10.65%	-9.66%	PASS
Total unadjusted error ADC0 pos test	LSB	-10	10	1.2000	0.2982	9.84	1.7000	0.2976	9.30	1.8169	0.3397	8.03	2.3169	0.5028	5.09	-5.22%	-7.54%	-5.01%	-8.03%	PASS
Total unadjusted error ADC1 neg test	LSB	-10	10	-1.7000	0.1972	14.03	-1.5000	0.2225	12.73	-0.7961	0.2409	12.74	-0.5961	0.3357	9.34	-9.82%	-8.37%	-9.61%	-8.53%	PASS
Total unadjusted error ADC1 pos test	LSB	-10	10	1.2000	0.2523	11.63	1.6000	0.2868	9.76	2.0247	0.3253	8.17	2.4247	0.3095	8.16	-6.86%	-10.34%	-6.84%	-10.89%	PASS
Signal-to-noise ratio	dB	67	NA	68.9000	0.6454	0.98	68.8000	0.7485	0.80	70.2163	0.1702	6.30	70.1163	0.1257	8.26	-40.93%	NA	-42.24%	NA	Justify, TSMC14 avg move away from limit
Operating current	mA	NA	318	219.5000	3.2000	10.26	218.2000	3.2000	10.40	250.1139	6.6704	3.39	248.8139	6.0446	3.82	NA	-45.10%	NA	-44.25%	Justify, both labs avg is different, TSMC14 post HTOL drift is minimal
Operating current in VDD STOP mode	mA	NA	105	25.7000	2.5000	10.57	24.8000	2.0000	13.37	41.2043	6.5698	3.24	40.3043	6.0940	3.54	NA	-24.30%	NA	-23.97%	
Operating current in VDD HALT mode	mA	NA	115	33.9000	3.4000	7.95	32.1000	2.1000	13.16	49.8313	6.9494	3.13	48.0313	6.4429	3.46	NA	-24.45%	NA	-23.79%	
RC oscillator frequency (target 16MHz) LV	ns	58.75	66.25	62.9000	0.3813	2.93	62.9000	0.3484	3.21	63.1576	0.3053	3.38	63.1576	0.3111	3.31	-5.85%	-8.33%	-5.85%	-8.33%	PASS

Parameter Name, as in Datasheet	Units	Lower Spec Limit (NA if no spec)	Upper Spec Limit (NA if no spec)	ATMC Baseline Time0 (Pre-HTOL)			ATMC Baseline Post-HTOL (1008hrs)			TSMC14 Time0 (Pre-HTOL)			TSMC14 Post-HTOL(1008)			Pre-TSMC14 vs Pre-ATMC, T0 Mean Shift toward LSL	Pre-TSMC14 vs Pre-ATMC, T0 Mean Shift toward USL	Post-TSMC14 vs Post-ATMC, Post Mean Shift toward LSL	Post-TSMC14 vs Post-ATMC, Post Mean Shift toward USL	Comment
				Temp	-40	C	Temp	-40	C	Temp	-40	C	Temp	-40	C	Shift within +/- 1 sigma or less than +/- 15% to	Shift within +/- 1 sigma or less than +/- 15% to	Shift within +/- 1 sigma or less than +/- 15% to	Shift within +/- 1 sigma or less than +/- 15% to	
				Avg	Std	Cpk	Avg	Std	Cpk	Avg	Std	Cpk	Avg	Std	Cpk					
Input leakage current PB6	uA	-1	1	-0.0015	0.0004	888.03	-0.0017	0.0002	1375.64	-0.0001	0.0003	1054.04	-0.0003	0.0003	957.66	-0.14%	-0.14%	-0.14%	-0.14%	PASS
Input leakage current PB3	uA	-1	1	-0.0016	0.0003	1078.42	-0.0016	0.0003	1081.57	-0.0001	0.0003	1093.78	-0.0001	0.0003	1149.53	-0.15%	-0.15%	-0.15%	-0.15%	PASS
Input leakage current PB2	uA	-1	1	-0.0018	0.0003	960.27	-0.0019	0.0003	998.20	-0.0001	0.0004	869.65	-0.0000	0.0002	1374.29	-0.19%	-0.19%	-0.19%	-0.19%	PASS
Input leakage current PB1	uA	-1	1	-0.0013	0.0001	3122.89	-0.0013	0.0001	3414.36	-0.0001	0.0003	1083.32	-0.0000	0.0004	1011.59	-0.12%	-0.12%	-0.12%	-0.12%	PASS
Input leakage current PC12	uA	-1	1	-0.0014	0.0001	2558.54	-0.0014	0.0001	2639.70	0.0000	0.0003	983.32	0.0000	0.0004	835.93	-0.14%	-0.14%	-0.14%	-0.14%	PASS
Input leakage current PC11	uA	-1	1	-0.0014	0.0002	1901.01	-0.0014	0.0001	2342.48	0.0000	0.0004	912.96	0.0000	0.0003	1155.42	-0.14%	-0.14%	-0.14%	-0.14%	PASS
Input leakage current PE5	uA	-1	1	-0.0015	0.0002	1581.91	-0.0014	0.0002	1651.12	0.0000	0.0004	889.87	0.0001	0.0003	1324.09	-0.15%	-0.15%	-0.15%	-0.15%	PASS
Input leakage current PE6	uA	-1	1	-0.0015	0.0003	958.35	-0.0013	0.0002	1636.68	0.0001	0.0004	758.60	0.0003	0.0002	1433.93	-0.16%	-0.16%	-0.16%	-0.16%	PASS
Input leakage current PE10	uA	-1	1	-0.0017	0.0002	2094.19	-0.0015	0.0004	852.33	0.0001	0.0004	751.60	0.0003	0.0004	948.96	-0.18%	-0.18%	-0.18%	-0.18%	PASS
Input leakage current PA13	uA	-1	1	-0.0013	0.0005	652.49	-0.0010	0.0006	553.43	0.0001	0.0005	622.05	0.0004	0.0003	1137.09	-0.14%	-0.14%	-0.14%	-0.14%	PASS
Input leakage current PA12	uA	-1	1	-0.0016	0.0006	529.85	-0.0013	0.0007	464.36	-0.0001	0.0003	1075.01	0.0002	0.0003	1090.86	-0.15%	-0.15%	-0.15%	-0.15%	PASS
Input leakage current PA11	uA	-1	1	-0.0017	0.0003	1301.90	-0.0017	0.0004	805.34	0.0001	0.0005	717.48	0.0001	0.0004	937.39	-0.18%	-0.18%	-0.18%	-0.18%	PASS
Input leakage current PB14	uA	-1	1	-0.0019	0.0003	1308.30	-0.0019	0.0002	1356.85	-0.0002	0.0005	678.37	-0.0002	0.0005	607.95	-0.17%	-0.17%	-0.17%	-0.17%	PASS
Input leakage current PB15	uA	-1	1	-0.0021	0.0002	1883.54	-0.0021	0.0003	1311.13	-0.0001	0.0005	613.92	-0.0001	0.0005	635.42	-0.20%	-0.20%	-0.20%	-0.20%	PASS
Input leakage current PC0	uA	-1	1	-0.0021	0.0001	3516.21	-0.0021	0.0002	1532.17	-0.0001	0.0003	1038.81	-0.0001	0.0004	774.80	-0.20%	-0.20%	-0.20%	-0.20%	PASS
Input leakage current PC1	uA	-1	1	-0.0017	0.0002	1558.63	-0.0018	0.0005	641.35	-0.0001	0.0003	1154.27	-0.0002	0.0007	475.10	-0.16%	-0.16%	-0.16%	-0.16%	PASS
Input leakage current EXTERNAL	uA	-1	1	-0.0014	0.0001	3231.72	-0.0013	0.0001	2792.79	-0.0001	0.0003	993.91	0.0000	0.0004	890.28	-0.13%	-0.13%	-0.13%	-0.13%	PASS
Input leakage current XTAL	uA	-1	1	-0.0010	0.0001	2597.50	-0.0011	0.0001	3165.08	0.0002	0.0003	996.87	0.0001	0.0003	1060.63	-0.12%	-0.12%	-0.12%	-0.12%	PASS
Input leakage current EXTERNAL	uA	-1	1	-0.0019	0.0002	2108.37	-0.0019	0.0002	1973.31	-0.0002	0.0005	627.74	-0.0002	0.0004	836.34	-0.17%	-0.17%	-0.17%	-0.17%	PASS
Input leakage current XTAL	uA	-1	1	-0.0020	0.0002	1803.07	-0.0021	0.0002	2122.74	-0.0002	0.0005	731.85	-0.0003	0.0005	688.76	-0.18%	-0.18%	-0.18%	-0.18%	PASS
Equivalent pull-up current PC10	uA	-130	NA	-46.1000	0.6131	45.62	-48.3000	0.5343	50.97	-42.6799	0.7055	41.26	-44.8799	0.5175	54.83	-3.92%	NA	-4.02%	NA	PASS
Equivalent pull-up current PC2	uA	-130	NA	-45.9000	0.6266	44.74	-48.1000	0.5956	45.84	-42.4028	0.6435	45.37	-44.6028	0.5933	47.98	-3.99%	NA	-4.10%	NA	PASS
Equivalent pull-up current PA13	uA	NA	-10	-72.5000	1.1000	18.94	-70.1000	0.8770	22.84	-68.7112	1.0019	19.53	-66.3112	0.7233	25.95	NA	-6.45%	NA	-6.73%	PASS
Equivalent pull-up current PA12	uA	NA	-10	-73.9000	0.9686	21.99	-71.8000	0.8803	23.40	-68.7628	0.8898	22.01	-66.6628	0.7697	24.54	NA	-8.74%	NA	-9.07%	PASS
Equivalent pull-up current PA11	uA	NA	-10	-73.8000	1.0000	21.27	-71.5000	0.9206	22.27	-69.0004	0.9033	21.77	-66.7004	0.7911	23.89	NA	-8.13%	NA	-8.46%	PASS
Equivalent pull-down current PA9	uA	10	NA	56.2000	0.9076	16.97	58.5000	1.2000	13.47	53.9625	0.7394	19.82	56.2625	0.4301	35.85	5.09%	NA	4.84%	NA	PASS
Equivalent pull-down current PA8	uA	10	NA	57.1000	0.8820	17.80	59.9000	0.7436	22.37	54.2773	0.6700	22.03	57.0773	0.6695	23.44	6.38%	NA	6.00%	NA	PASS
Equivalent pull-down current PA7	uA	10	NA	57.1000	1.2000	13.08	60.1000	1.3000	12.85	54.1463	0.7578	19.42	57.1463	0.6257	25.12	6.69%	NA	6.26%	NA	PASS
Equivalent pull-down current PG6	uA	NA	130	95.1000	1.0000	11.63	92.5000	1.1000	11.36	89.2603	1.0439	13.01	86.6603	0.9604	15.04	NA	14.33%	NA	13.47%	PASS
Equivalent pull-down current PG5	uA	NA	130	94.7000	1.2000	9.81	91.8000	1.1000	11.58	89.1587	0.9763	13.94	86.2587	1.5300	9.53	NA	13.57%	NA	12.67%	PASS
Input leakage current AN3_PC2	uA	-1	1	-0.0019	0.0005	704.87	-0.0021	0.0006	589.04	-0.0004	0.0003	1015.85	-0.0006	0.0006	567.38	-0.15%	-0.15%	-0.15%	-0.15%	PASS
Input leakage current AN6_PE7	uA	-1	1	-0.0017	0.0003	981.61	-0.0020	0.0003	1120.47	-0.0001	0.0006	551.62	-0.0004	0.0005	610.47	-0.16%	-0.16%	-0.16%	-0.16%	PASS
Input leakage current AN11_PB9	uA	-1	1	-0.0017	0.0003	1109.96	-0.0017	0.0005	669.01	-0.0002	0.0007	472.25	-0.0002	0.0042	78.89	-0.15%	-0.15%	-0.15%	-0.15%	PASS
Input leakage current AN7_PE9	uA	-1	1	-0.0019	0.0003	1106.79	-0.0020	0.0005	733.39	-0.0002	0.0004	808.13	-0.0003	0.0004	849.55	-0.17%	-0.17%	-0.17%	-0.17%	PASS
Input leakage current AN12_PB10	uA	-1	1	-0.0018	0.0008	417.22	-0.0021	0.0007	454.36	-0.0003	0.0006	558.77	-0.0006	0.0005	652.62	-0.15%	-0.15%	-0.15%	-0.15%	PASS
Input leakage current AN13_PB11	uA	-1	1	-0.0022	0.0004	803.38	-0.0024	0.0003	966.67	-0.0004	0.0006	589.42	-0.0006	0.0005	685.54	-0.18%	-0.18%	-0.18%	-0.18%	PASS
Offset error	LSB	-6	6	-0.2129	0.1628	11.85	-0.1032	0.1888	10.41	1.3000	0.2095	7.48	1.4097	0.8017	1.91	-20.72%	-32.19%	-20.42%	-32.96%	Both fabs avg is different. TSMC14 post HTOL drift is minimal
Total unadjusted error ADC0 neg test	LSB	-10	10	1.5000	0.2567	11.04	1.2000	0.2486	11.80	1.7603	0.2218	12.39	1.4603	0.8652	3.29	-2.21%	-3.16%	-2.27%	-3.05%	Justify, TSMC14 avg move towards center of limit.
Total unadjusted error ADC0 pos test	LSB	-10	10	-1.3000	0.4301	6.74	-2.2000	0.9860	2.64	-0.3295	0.2423	13.30	-1.2295	1.0620	2.75	-10.04%	-9.40%	-11.07%	-8.64%	PASS
Total unadjusted error ADC1 pos test	LSB	-10	10	1.8000	0.2574	10.62	1.1000	0.3263	9.09	1.9897	0.2631	10.15	1.2897	0.5884	4.93	-1.58%	-2.37%	-1.68%	-2.18%	PASS
Signal-to-noise ratio	dB	67	NA	69.6000	0.6759	1.28	69.7000	0.6971	1.29	70.7125	0.1565	7.91	70.8125	0.1398	9.09	-29.97%	NA	-29.18%	NA	Justify, TSMC14 avg move away from limit.
Operating current	mA	NA	279	198.7000	3.2000	8.36	193.3000	3.5000	8.16	206.8069	1.9654	12.24	201.4069	1.4734	17.55	NA	-11.23%	NA	-10.45%	PASS
Operating current in VDD STOP mode	mA	NA	20	3.1000	0.0389	144.82	3.1000	0.0276	204.11	3.0055	0.0263	215.48	3.0055	0.0260	217.66	NA	0.56%	NA	0.56%	PASS
Operating current in VDD HALT mode	mA	NA	25	9.5000	0.1207	42.81	9.4000	0.0836	62.20	8.9659	0.0622	85.99	8.8659	0.0613	87.66	NA	3.33%	NA	3.31%	PASS
RC oscillator frequency (target 16MHz) LV	ns	58.75	66.25	62.5000	0.3524	3.55	62.6000	0.3254	3.74	64.0239	0.3522	2.11	64.1239	0.3538	2.00	-28.89%	-68.45%	-28.36%	-71.67%	Both fabs avg is different. TSMC14 post HTOL drift is minimal