Summary Data
For
ERDLVA-2G18G-65-70MV-70C

Customer: [redacted]
SO No: [redacted]
Model No: ERDLVA-2G18G-65-70MV-70C
Serial No: PL44913/2443

Tested By: Jim Hopson
Temperature: -40C TO +70C
Date 10/18/2024
Drawing No: 27642020 **Rev:** A1

TEST ITEM NO	PARAMETERS	SPECIFIED VALUE	TEST RESULTS	QA QC
1	Frequency Range:	2 to 18 GHz	**2 to 18 GHz**	PMI QA3
2	VSWR:	2.2:1 MAX @ 50 Ω	**1.88:1 MAX**	
3	Input Power:	(1) 1 W CW, Max. (2) 100 W Peak @ PW = 1 us & Duty Cycle = 1%, Max.	**Pass**	
4	VIDEO OUT TSS:	-71 dBm MAX	**-71 dBm**	
5	VIDEO OUT Dynamic Range:	-65 to 0 dBm	**-65 to 0 dBm**	
6	VIDEO OUT Log Slope Fixed:	70 ± 3mV/dB	**72.1/68.5 mv/db**	
7	VIDEO OUT Log Linearity:	±1.0 dB MAX @25C	**.56/-.61 db**	
8	VIDEO OUT Log Accuracy:	±2.3 dB MAX @25C	**1.15/-1.17 db**	
9	VIDEO OUT Absolute Log Accuracy:	±2.9 dB MAX Over Freq & temp	**1.28/-1.60 db**	
10	VIDEO OUT DC Offset:	0 ±70 mV (RF Input Terminated & DC Power On) @25C	**13 mV**	
11	VIDEO OUT Rise Time (10% to 90%):	28 ns MAX	**22.8 ns**	
12	VIDEO OUT Fall Time (90% to 10%):	300 ns MAX	**165.3 ns**	
13	VIDEO OUT Settling Time:	50 ns With in ±70 mV of final value @-10 dBm	**40ns**	

7311-F Grove Road Frederick, MD 21704 USA
Phone: (301)662-5019 Fax: (301)662-1731
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14	VIDEO OUT Recovery Time:	1 us MAX to within 1 dB of baseline for PW <10us & Power = -10dBm	**600 ns**	PMI QA3
15	VIDEO OUT Video Frequency Flatness:	±2.0 dB MAX @25C	**±1 dB MAX @25C**	
16	VIDEO OUT CW Immunity:	CW Immune Power TSS to -40 dBm	**Pass**	
		Pulse Peak Amplitude Loss; 2 dB MAX @ -40dBm CW	**<2dB**	
		Baseline shift 200mV @-40dBm CW	**< 200mV**	
		CW Immunity Time at CW = -40 dBm, ≤ 4 ms	**1.6 ms**	
		CW Recovery Time at CW = -40 dBm, ≤ 20 us	**<20 us**	
17	Pulse droop	1dB Max for 300us pulse at or above -65dBm	**<1dB**	
18	VIDEO OUT Pulse Response, input Signal:	100 ns to 300 us	**100 ns to 300 us**	
19	VIDEO LOAD Impedance:	75 ±1 Ω	**75Ω**	
20	VIDEO driver capability	100 ft RG11 into 75 ohm load	**Pass**	
21	Pulse density capability	10% duty cycle 100 ns, 70% duty cycle 300 us at peak power -10 dBm with 1 dB variable for pulse amplitude and baseline	**Pass**	
22	VIDEO OUT Noise Level (Vp-p):	160 mV max	**136 mV**	

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23	VIDEO OUT Propagation Delay:	50 ns MAX from RF 50% to 10% video (excluding cable)	**< 50 ns**	PMI QA3
24	Power Supply	+15 V @ 500 mA MAX -15 V @ 100 mA MAX	**+15 V @ 310 mA** **15 V @ 80 mA**	
25	Power Supply Ripple From DC to 10 MHz	100 mV MAX	**Pass**	

QA/QC Approval: K. Klamm Date: 10.23.24

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LOG TRANSFER VS. FREQUENCY
Model: ERDLVA-218-65-70MV-70
Tested By: Jim Hopson
Date: 10-18-24
Serial Number: PL44913
Test Temp: +25°C

Frequency

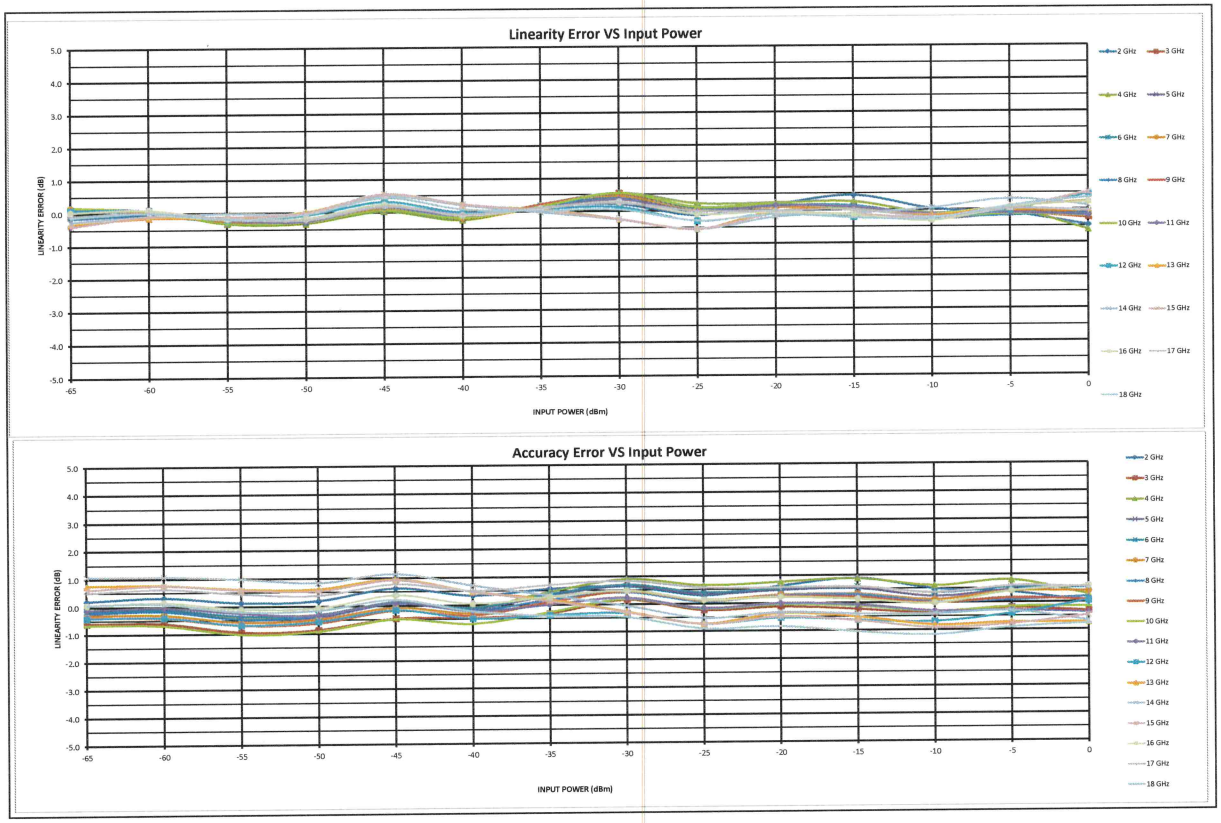
	-65	-60	-55	-50	-45	-40	-35	-30	-25	-20	-15	-10	-5	0	RF Input Power (dBm)
2 GHz	313	675	1016	1374	1759	2093	2463	2822	3152	3529	3902	4228	4573	4901	Measured Value (mV)
Intercept (mV) 4935	-11	-4	-17	-14	16	-4	11	15	-9	13	31	3	-7	-34	Error (mV)
Slope (mV/dB) 70.93	-0.16	-0.05	-0.25	-0.20	0.23	-0.06	0.15	0.22	-0.13	0.18	0.44	0.04	-0.10	-0.47	0.47 Linearity Error (dB)
	0.20	0.31	0.13	0.19	0.62	0.34	0.57	0.64	0.30	0.62	0.89	0.50	0.37	0.00	0.89 Accuracy Error (dB)
3 GHz	256	610	941	1300	1682	2026	2400	2788	3114	3476	3823	4166	4533	4878	Measured Value (mV)
Intercept (mV) 4894	10	6	-20	-19	6	-8	9	39	7	12	1	-13	-4	-16	Error (mV)
Slope (mV/dB) 71.50	0.14	0.09	-0.29	-0.26	0.08	-0.11	0.12	0.55	0.10	0.17	0.02	-0.18	-0.05	-0.23	0.55 Linearity Error (dB)
	-0.60	-0.60	-0.93	-0.86	-0.46	-0.46	-0.32	0.16	-0.24	-0.12	-0.22	-0.38	-0.19	-0.32	0.93 Accuracy Error (dB)
4 GHz	284	644	976	1336	1722	2063	2455	2841	3178	3539	3901	4236	4604	4920	Measured Value (mV)
Intercept (mV) 4964	6	6	-23	-23	2	-17	14	40	16	17	18	-7	0	-44	Error (mV)
Slope (mV/dB) 72.10	0.09	0.08	-0.32	-0.32	0.03	-0.24	0.20	0.55	0.23	0.23	0.26	-0.10	0.01	-0.61	0.61 Linearity Error (dB)
	-0.21	-0.12	-0.43	-0.35	0.10	-0.08	0.46	0.91	0.67	0.77	0.88	0.61	0.81	0.27	0.91 Accuracy Error (dB)
5 GHz	282	641	974	1333	1721	2061	2445	2823	3155	3518	3875	4208	4578	4940	Measured Value (mV)
Intercept (mV) 4946	7	7	-19	-20	9	-10	14	33	6	9	7	-20	-9	-6	Error (mV)
Slope (mV/dB) 71.87	0.10	0.10	-0.27	-0.28	0.12	-0.15	0.20	0.46	0.08	0.13	0.09	-0.27	-0.12	-0.09	0.46 Linearity Error (dB)
	-0.24	-0.17	-0.46	-0.39	0.09	-0.11	0.31	0.65	0.34	0.47	0.51	0.21	0.44	0.55	0.65 Accuracy Error (dB)
6 GHz	289	646	982	1339	1724	2063	2449	2827	3159	3523	3880	4217	4585	4937	Measured Value (mV)
Intercept (mV) 4950	9	6	-17	-19	7	-13	13	32	5	10	8	-14	-6	-13	Error (mV)
Slope (mV/dB) 71.84	0.12	0.09	-0.23	-0.26	0.10	-0.19	0.19	0.45	0.07	0.14	0.11	-0.20	-0.08	-0.18	0.45 Linearity Error (dB)
	-0.14	-0.10	-0.35	-0.31	0.13	-0.08	0.37	0.71	0.40	0.54	0.58	0.34	0.54	0.51	0.71 Accuracy Error (dB)
7 GHz	277	631	966	1327	1710	2048	2430	2811	3140	3506	3861	4200	4575	4928	Measured Value (mV)
Intercept (mV) 4935	13	8	-17	-15	9	-13	10	32	1	8	4	-17	-1	-7	Error (mV)
Slope (mV/dB) 71.87	0.18	0.10	-0.23	-0.21	0.12	-0.18	0.14	0.44	0.02	0.11	0.05	-0.23	-0.02	-0.10	0.44 Linearity Error (dB)
	-0.31	-0.31	-0.58	-0.48	-0.07	-0.29	0.10	0.48	0.13	0.30	0.31	0.10	0.40	0.38	0.58 Accuracy Error (dB)
8 GHz	284	641	974	1336	1721	2056	2435	2807	3136	3504	3860	4194	4552	4914	Measured Value (mV)
Intercept (mV) 4921	4	4	-20	-15	13	-9	13	28	0	11	10	-13	-12	-7	Error (mV)
Slope (mV/dB) 71.40	0.05	0.05	-0.28	-0.21	0.18	-0.13	0.18	0.39	0.00	0.15	0.14	-0.19	-0.17	-0.10	0.39 Linearity Error (dB)
	-0.21	-0.17	-0.46	-0.35	0.09	-0.18	0.17	0.43	0.07	0.27	0.30	0.02	0.07	0.19	0.46 Accuracy Error (dB)
9 GHz	271	623	958	1317	1702	2042	2429	2809	3139	3502	3854	4192	4558	4906	Measured Value (mV)
Intercept (mV) 4924	10	4	-20	-20	6	-12	16	37	9	13	6	-14	-7	-18	Error (mV)
Slope (mV/dB) 71.74	0.14	0.05	-0.28	-0.28	0.09	-0.17	0.22	0.52	0.12	0.18	0.09	-0.20	-0.10	-0.25	0.52 Linearity Error (dB)
	-0.39	-0.42	-0.69	-0.62	-0.18	-0.38	0.09	0.46	0.12	0.24	0.21	-0.01	0.16	0.07	0.69 Accuracy Error (dB)
10 GHz	252	604	935	1296	1680	2021	2404	2790	3118	3482	3831	4170	4536	4890	Measured Value (mV)
Intercept (mV) 4903	13	6	-21	-19	6	-12	12	39	9	14	4	-16	-9	-13	Error (mV)
Slope (mV/dB) 71.76	0.18	0.09	-0.30	-0.27	0.08	-0.17	0.17	0.55	0.12	0.19	0.06	-0.22	-0.12	-0.19	0.55 Linearity Error (dB)
	-0.66	-0.69	-1.01	-0.91	-0.49	-0.67	-0.27	0.19	-0.18	-0.04	-0.11	-0.32	-0.15	-0.15	1.01 Accuracy Error (dB)
11 GHz	291	651	989	1338	1722	2054	2423	2793	3120	3485	3834	4171	4527	4874	Measured Value (mV)
Intercept (mV) 4886	-5	2	-14	-18	13	-8	8	25	-1	11	7	-9	-6	-12	Error (mV)
Slope (mV/dB) 70.61	-0.08	0.02	-0.19	-0.25	0.19	-0.11	0.12	0.36	-0.01	0.16	0.10	-0.13	-0.09	-0.17	0.36 Linearity Error (dB)
	-0.11	-0.02	-0.25	-0.32	0.10	-0.21	0.00	0.23	-0.15	0.00	-0.07	-0.31	-0.28	-0.38	0.38 Accuracy Error (dB)
12 GHz	270	625	959	1321	1704	2035	2396	2754	3078	3448	3794	4144	4518	4905	Measured Value (mV)
Intercept (mV) 4873	8	8	-12	-5	23	0	6	9	-21	-6	-15	-19	0	32	Error (mV)
Slope (mV/dB) 70.93	0.11	0.12	-0.18	-0.07	0.33	-0.01	0.08	0.13	-0.30	-0.08	-0.21	-0.27	0.00	0.46	0.46 Linearity Error (dB)
	-0.41	-0.39	-0.67	-0.56	-0.15	-0.48	-0.38	-0.32	-0.75	-0.52	-0.63	-0.69	-0.41	0.06	0.75 Accuracy Error (dB)
13 GHz	352	707	1050	1404	1782	2103	2436	2758	3079	3459	3803	4135	4496	4849	Measured Value (mV)
Intercept (mV) 4832	-21	-9	-9	2	37	15	5	-16	-38	-1	0	-11	7	17	Error (mV)
Slope (mV/dB) 68.60	-0.31	-0.13	-0.13	0.03	0.54	0.22	0.07	-0.23	-0.55	-0.01	0.00	-0.16	0.10	0.25	0.55 Linearity Error (dB)
	0.75	0.77	0.61	0.61	0.95	0.48	0.19	-0.27	-0.73	-0.36	-0.51	-0.82	-0.72	-0.73	0.95 Accuracy Error (dB)
14 GHz	375	729	1077	1420	1796	2119	2446	2773	3094	3462	3811	4164	4525	4853	Measured Value (mV)
Intercept (mV) 4845	-17	-6	0	0	34	14	-1	-17	-38	-13	-6	4	22	8	Error (mV)
Slope (mV/dB) 68.50	-0.25	-0.08	0.00	0.00	0.49	0.21	-0.02	-0.25	-0.56	-0.19	-0.09	0.06	0.33	0.12	0.56 Linearity Error (dB)
	1.08	1.08	0.99	0.84	1.15	0.71	0.33	-0.05	-0.52	-0.32	-0.39	-0.41	-0.31	-0.68	1.15 Accuracy Error (dB)
15 GHz	342	706	1048	1399	1780	2102	2432	2756	3078	3451	3793	4128	4491	4867	Measured Value (mV)
Intercept (mV) 4831	-27	-6	-7	1	38	17	4	-16	-37	-7	9	-17	3	36	Error (mV)
Slope (mV/dB) 68.66	-0.39	-0.08	-0.10	0.01	0.56	0.25	0.05	-0.23	-0.54	-0.10	-0.12	-0.24	0.04	0.52	0.56 Linearity Error (dB)
	0.61	0.75	0.58	0.54	0.92	0.47	0.13	-0.29	-0.75	-0.48	-0.65	-0.92	-0.79	-0.48	0.92 Accuracy Error (dB)
16 GHz	303	664	1000	1356	1741	2073	2443	2811	3140	3500	3848	4191	4575	4942	Measured Value (mV)
Intercept (mV) 4926	3	8	-12	-12	17	-6	8	20	-7	-3	-10	-23	5	16	Error (mV)
Slope (mV/dB) 71.16	0.04	0.11	-0.17	-0.17	0.24	-0.09	0.11	0.28	-0.10	-0.04	-0.15	-0.33	0.07	0.23	0.33 Linearity Error (dB)
	0.06	0.16	-0.10	-0.07	0.37	0.06	0.29	0.48	0.13	0.21	0.13	-0.03	0.40	0.58	0.58 Accuracy Error (dB)
17 GHz	334	697	1038	1387	1770	2105	2473	2836	3171	3525	3880	4218	4589	4939	Measured Value (mV)
Intercept (mV) 4941	-7	3	-10	-15	14	-5	9	18	0	0	1	-15	2	-2	Error (mV)
Slope (mV/dB) 70.77	-0.09	0.04	-0.15	-0.21	0.20	-0.07	0.13	0.26	-0.01	0.00	0.01	-0.21	0.03	-0.02	0.26 Linearity Error (dB)
	0.50	0.62	0.44	0.37	0.78	0.51	0.71	0.84	0.57	0.57	0.58	0.36	0.60	0.54	0.84 Accuracy Error (dB)
18 GHz	304	660	993	1350	1730	2053	2395	2744	3067	3426	3765	4110	4483	4846	Measured Value (mV)
Intercept (mV) 4821	-8	1	-13	-3	30	7	2	4	-20	-8	-16	-18	9	25	Error (mV)
Slope (mV/dB) 69.37	-0.12	0.01	-0.19	-0.04	0.44	0.09	0.02	0.06	-0.29	-0.11	-0.23	-0.25	0.12	0.36	0.44 Linearity Error (dB)
	0.07	0.10	-0.19	-0.15	0.22	-0.22	-0.39	-0.46	-0.90	-0.83	-1.04	-1.17	-0.90	-0.77	1.17 Accuracy Error (dB)

Output Vos: 13.0 mV

Avg Slope: 70.8 mV/dB	375	729	1077	1420	1796	2119	2473	2841	3178	3539	3902	4236	4604	4942	Max Measured (mV)
Max Slope: 72.1 mv/dB	252	604	935	1296	1680	2021	2395	2744	3067	3426	3765	4110	4483	4846	Min Measured (mV)
Min Slope: 68.5 mv/dB	0.87	0.88	1.00	0.88	0.82	0.69	0.55	0.69	0.78	0.80	0.97	0.89	0.85	0.68	Flatness Error (+/-dB)

PL44913

+25°C


Linearity Error VS Input Power
LINEARITY ERROR (dB)
INPUT POWER (dBm)
2 GHz
3 GHz
4 GHz
5 GHz
6 GHz
7 GHz
8 GHz
9 GHz
10 GHz
11 GHz
12 GHz
13 GHz
14 GHz
15 GHz
16 GHz
17 GHz
18 GHz
Accuracy Error VS Input Power
LINEARITY ERROR (dB)
INPUT POWER (dBm)

LOG TRANSFER VS. FREQUENCY
Model: ERDLVA-218-65-70MV-70
Tested By: Jim Hopson
Date: 10-11-24
Serial Number: PL44913
Test Temp: -40°C

Frequency		-65	-60	-55	-50	-45	-40	-35	-30	-25	-20	-15	-10	-5	0	RF Input Power (dBm)
2 GHz	Intercept (mV) 4980	285	649	986	1344	1738	2077	2452	2831	3174	3556	3934	4270	4610	4931	Measured Value (mV)
	Slope (mV/dB) 72.29	3	6	-18	-22	11	-12	2	19	1	21	38	13	-9	-49	Error (mV)
		0.05	0.08	-0.26	-0.30	0.15	-0.16	0.02	0.27	0.01	0.30	0.53	0.17	-0.12	-0.68	0.68 Linearity Error (dB)
		-0.07	-0.02	-0.34	-0.37	0.10	-0.20	0.01	0.27	0.03	0.33	0.58	0.25	-0.04	-0.58	0.58 Accuracy Error (dB)
3 GHz	Intercept (mV) 4937	230	591	924	1284	1675	2020	2401	2801	3141	3506	3863	4207	4570	4899	Measured Value (mV)
	Slope (mV/dB) 72.58	10	8	-22	-25	4	-14	4	41	18	20	14	-5	-5	-38	Error (mV)
		0.14	0.11	-0.30	-0.34	0.05	-0.20	0.05	0.56	0.25	0.28	0.20	-0.06	-0.06	-0.53	0.56 Linearity Error (dB)
		-0.83	-0.82	-1.20	-1.20	-0.78	-0.78	-0.70	-0.15	-0.43	-0.36	-0.40	-0.63	-0.59	-1.02	1.20 Accuracy Error (dB)
4 GHz	Intercept (mV) 5025	271	632	966	1326	1722	2068	2466	2870	3222	3583	3952	4293	4651	4964	Measured Value (mV)
	Slope (mV/dB) 73.36	15	9	-24	-31	-2	-23	9	46	31	25	27	1	-7	-61	Error (mV)
		0.20	0.12	-0.33	-0.42	-0.02	-0.31	0.12	0.62	0.42	0.34	0.37	0.02	-0.10	-0.83	0.83 Linearity Error (dB)
		-0.26	-0.25	-0.62	-0.62	-0.12	-0.32	0.20	0.81	0.70	0.71	0.83	0.56	0.53	-0.12	0.83 Accuracy Error (dB)
5 GHz	Intercept (mV) 5007	268	627	961	1322	1716	2063	2455	2851	3198	3560	3924	4263	4626	4983	Measured Value (mV)
	Slope (mV/dB) 73.17	18	11	-21	-26	2	-17	9	40	21	17	15	-12	-15	-24	Error (mV)
		0.24	0.15	-0.29	-0.36	0.03	-0.23	0.13	0.54	0.28	0.23	0.20	-0.16	-0.20	-0.32	0.54 Linearity Error (dB)
		-0.31	-0.32	-0.69	-0.68	-0.21	-0.39	0.05	0.55	0.37	0.39	0.44	0.15	0.19	0.14	0.69 Accuracy Error (dB)
6 GHz	Intercept (mV) 5015	284	648	979	1337	1734	2078	2468	2860	3207	3570	3936	4278	4639	4987	Measured Value (mV)
	Slope (mV/dB) 73.00	14	13	-21	-28	4	-17	8	35	17	15	16	-7	-11	-28	Error (mV)
		0.19	0.18	-0.28	-0.38	0.06	-0.23	0.11	0.48	0.24	0.21	0.22	-0.09	-0.15	-0.38	0.48 Linearity Error (dB)
		-0.08	-0.03	-0.44	-0.47	0.04	-0.18	0.23	0.67	0.49	0.53	0.61	0.36	0.37	0.20	0.67 Accuracy Error (dB)
7 GHz	Intercept (mV) 5002	269	632	964	1325	1717	2061	2452	2845	3190	3554	3920	4263	4628	4979	Measured Value (mV)
	Slope (mV/dB) 73.06	16	14	-19	-24	3	-18	7	35	15	13	14	-8	-9	-23	Error (mV)
		0.22	0.19	-0.27	-0.33	0.04	-0.25	0.10	0.48	0.20	0.18	0.19	-0.11	-0.12	-0.31	0.48 Linearity Error (dB)
		-0.29	-0.25	-0.64	-0.63	-0.19	-0.42	0.01	0.47	0.25	0.31	0.39	0.15	0.21	0.09	0.64 Accuracy Error (dB)
8 GHz	Intercept (mV) 4990	279	641	977	1340	1729	2071	2454	2842	3187	3555	3919	4259	4613	4964	Measured Value (mV)
	Slope (mV/dB) 72.60	8	7	-20	-20	6	-15	5	30	12	17	18	-5	-14	-26	Error (mV)
		0.11	0.10	-0.27	-0.27	0.09	-0.20	0.07	0.42	0.17	0.24	0.25	-0.06	-0.19	-0.35	0.42 Linearity Error (dB)
		-0.15	-0.13	-0.46	-0.43	-0.03	-0.28	0.04	0.42	0.21	0.32	0.37	0.09	0.01	-0.12	0.46 Accuracy Error (dB)
9 GHz	Intercept (mV) 4999	270	633	968	1325	1718	2066	2457	2852	3197	3558	3920	4262	4624	4967	Measured Value (mV)
	Slope (mV/dB) 72.93	11	9	-20	-28	1	-16	10	41	21	17	15	-8	-10	-32	Error (mV)
		0.15	0.13	-0.28	-0.38	0.01	-0.22	0.14	0.56	0.29	0.24	0.20	-0.11	-0.14	-0.44	0.56 Linearity Error (dB)
		-0.28	-0.24	-0.59	-0.63	-0.18	-0.35	0.08	0.56	0.35	0.36	0.39	0.13	0.16	-0.08	0.63 Accuracy Error (dB)
10 GHz	Intercept (mV) 4985	255	621	953	1313	1706	2050	2445	2840	3184	3546	3907	4247	4609	4951	Measured Value (mV)
	Slope (mV/dB) 72.89	8	10	-23	-27	2	-19	12	42	22	19	16	-9	-11	-34	Error (mV)
		0.11	0.14	-0.31	-0.37	0.02	-0.26	0.16	0.58	0.30	0.26	0.22	-0.12	-0.15	-0.46	0.58 Linearity Error (dB)
		-0.49	-0.41	-0.80	-0.80	-0.34	-0.57	-0.09	0.40	0.17	0.20	0.21	-0.07	-0.05	-0.30	0.80 Accuracy Error (dB)
11 GHz	Intercept (mV) 4974	292	656	996	1348	1740	2080	2450	2840	3185	3547	3910	4255	4610	4941	Measured Value (mV)
	Slope (mV/dB) 72.07	2	6	-14	-23	9	-11	-2	28	12	14	17	1	-4	-33	Error (mV)
		0.03	0.08	-0.20	-0.31	0.12	-0.16	-0.02	0.39	0.17	0.20	0.23	0.02	-0.06	-0.46	0.46 Linearity Error (dB)
		0.03	0.08	-0.20	-0.31	0.13	-0.15	-0.02	0.40	0.18	0.21	0.25	0.04	-0.04	-0.44	0.44 Accuracy Error (dB)
12 GHz	Intercept (mV) 4945	278	640	974	1337	1726	2064	2426	2800	3140	3507	3865	4211	4583	4957	Measured Value (mV)
	Slope (mV/dB) 71.93	9	11	-15	-11	18	-4	-1	13	-7	1	-1	-15	-2	12	Error (mV)
		0.12	0.15	-0.20	-0.16	0.25	-0.05	-0.02	0.18	-0.09	0.01	-0.01	-0.20	-0.03	0.17	0.25 Linearity Error (dB)
		-0.17	-0.14	-0.51	-0.47	-0.07	-0.38	-0.35	-0.16	-0.44	-0.35	-0.38	-0.57	-0.41	-0.22	0.57 Accuracy Error (dB)
13 GHz	Intercept (mV) 4931	361	713	1062	1416	1796	2128	2460	2811	3152	3532	3894	4225	4588	4927	Measured Value (mV)
	Slope (mV/dB) 70.27	-3	-2	-5	-2	27	7	-12	-12	-23	6	17	-4	8	-4	Error (mV)
		-0.04	-0.03	-0.07	-0.03	0.38	0.10	-0.17	-0.18	-0.32	0.08	0.24	-0.05	0.11	-0.06	0.38 Linearity Error (dB)
		0.99	0.87	0.72	0.63	0.90	0.51	0.12	-0.01	-0.27	0.00	0.03	-0.38	-0.34	-0.63	0.99 Accuracy Error (dB)
14 GHz	Intercept (mV) 4934	382	736	1089	1438	1808	2141	2465	2823	3164	3528	3891	4245	4608	4921	Measured Value (mV)
	Slope (mV/dB) 69.95	-5	-1	3	2	22	5	-20	-12	-21	-7	7	11	24	-13	Error (mV)
		-0.07	-0.01	0.04	0.03	0.32	0.08	-0.29	-0.17	-0.30	-0.10	0.09	0.15	0.34	-0.18	0.34 Linearity Error (dB)
		1.28	1.19	1.09	0.94	1.07	0.69	0.19	0.16	-0.11	-0.05	-0.02	-0.10	-0.06	-0.72	1.28 Accuracy Error (dB)
15 GHz	Intercept (mV) 4922	363	720	1068	1424	1802	2134	2459	2816	3158	3526	3881	4215	4574	4926	Measured Value (mV)
	Slope (mV/dB) 69.95	-12	-5	-7	0	28	10	-15	-7	-15	3	9	-7	2	4	Error (mV)
		-0.17	-0.07	-0.10	-0.01	0.40	0.15	-0.21	-0.10	-0.21	0.05	0.12	-0.10	0.03	0.06	0.40 Linearity Error (dB)
		1.01	0.97	0.80	0.74	0.99	0.60	0.11	0.06	-0.19	-0.08	-0.15	-0.52	-0.53	-0.65	1.01 Accuracy Error (dB)
16 GHz	Intercept (mV) 4999	320	679	1021	1373	1761	2105	2467	2848	3195	3556	3913	4259	4639	5011	Measured Value (mV)
	Slope (mV/dB) 72.21	15	12	-7	-16	11	-6	-5	15	1	1	-3	-18	1	12	Error (mV)
		0.20	0.17	-0.09	-0.22	0.16	-0.08	-0.07	0.21	0.02	0.01	-0.04	-0.25	0.01	0.16	0.25 Linearity Error (dB)
		0.42	0.40	0.15	0.03	0.42	0.19	0.22	0.51	0.32	0.33	0.29	0.09	0.37	0.53	0.53 Accuracy Error (dB)
17 GHz	Intercept (mV) 5043	368	728	1078	1430	1810	2156	2522	2903	3258	3606	3970	4318	4682	5029	Measured Value (mV)
	Slope (mV/dB) 71.97	3	3	-7	-14	6	-8	-2	19	14	2	7	-5	-1	-14	Error (mV)
		0.04	0.05	-0.09	-0.20	0.08	-0.11	-0.03	0.27	0.20	0.03	0.09	-0.07	-0.02	-0.19	0.27 Linearity Error (dB)
		1.08	1.08	0.94	0.82	1.10	0.90	0.98	1.27	1.20	1.03	1.08	0.91	0.96	0.78	1.27 Accuracy Error (dB)
18 GHz	Intercept (mV) 4933	347	704	1049	1404	1782	2116	2451	2828	3169	3521	3876	4213	4590	4936	Measured Value (mV)
	Slope (mV/dB) 70.49	-4	0	-7	-5	21	2	-15	10	-2	-2	0	-15	9	3	Error (mV)
		-0.06	0.00	-0.10	-0.07	0.30	0.04	-0.21	0.14	-0.03	-0.03	0.00	-0.21	0.13	0.04	0.30 Linearity Error (dB)
		0.79	0.75	0.54	0.46	0.71	0.35	0.00	0.23	-0.04	-0.15	-0.22	-0.55	-0.31	-0.51	0.79 Accuracy Error (dB)

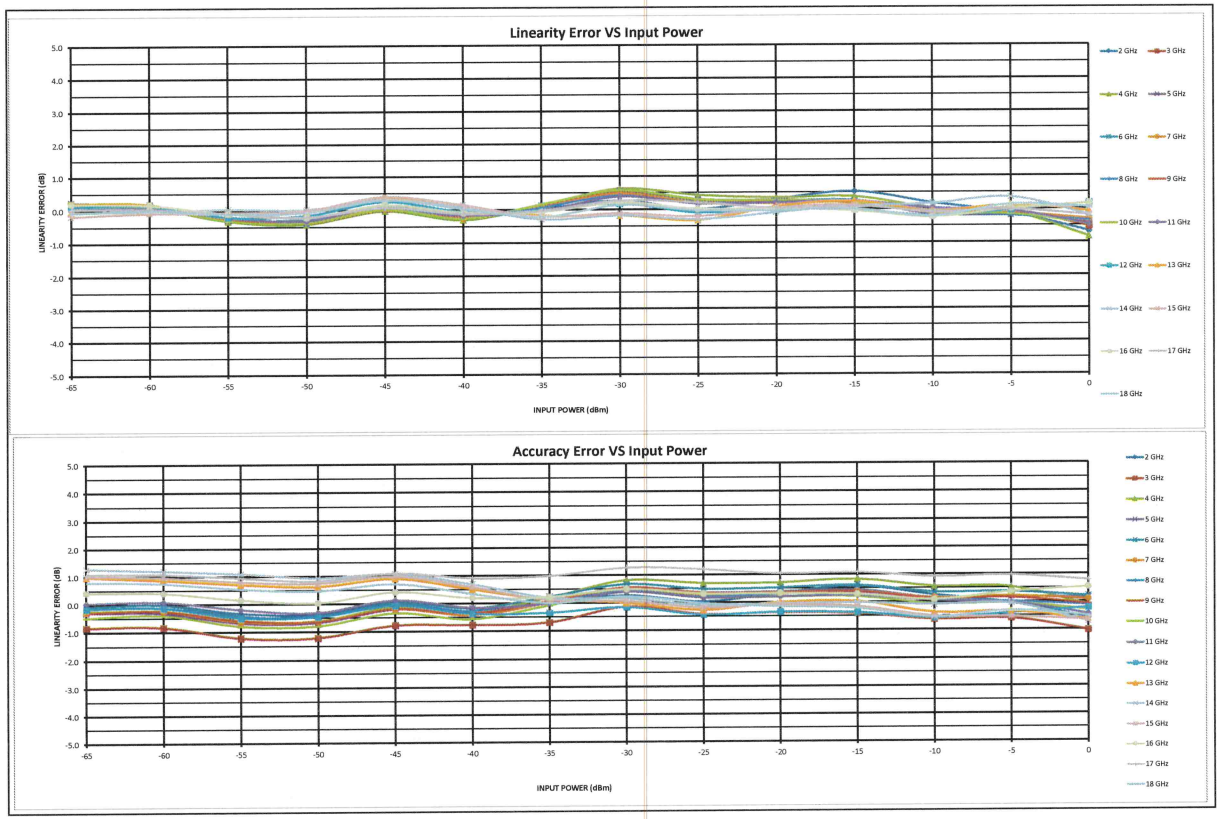
Output Vos: -7.0 mV

Avg Slope:	72.0 mV/dB
Max Slope:	73.4 mv/dB
Min Slope:	69.9 mv/dB

382	736	1089	1438	1810	2156	2522	2903	3258	3606	3970	4318	4682	5029	Max Measured (mV)
230	591	924	1284	1675	2020	2401	2800	3140	3506	3863	4207	4570	4899	Min Measured (mV)
1.05	1.01	1.15	1.07	0.94	0.94	0.84	0.71	0.82	0.69	0.74	0.77	0.78	0.90	Flatness Error (+/-dB)

PL44913

-40°C


Linearity Error VS Input Power
LINEARITY ERROR (dB)
INPUT POWER (dBm)
2 GHz
3 GHz
4 GHz
5 GHz
6 GHz
7 GHz
8 GHz
9 GHz
10 GHz
11 GHz
12 GHz
13 GHz
14 GHz
15 GHz
16 GHz
17 GHz
18 GHz
Accuracy Error VS Input Power
LINEARITY ERROR (dB)
INPUT POWER (dBm)

LOG TRANSFER VS. FREQUENCY
Model: ERDLVA-218-65-70MV-70
Tested By: Jim Hopson
Date: 10-18-24
Serial Number: PL44913
Test Temp: +70°C

Frequency

			-65	-60	-55	-50	-45	-40	-35	-30	-25	-20	-15	-10	-5	0	RF Input Power (dBm)
2 GHz	Intercept (mV)	4873	319	667	997	1352	1736	2064	2436	2791	3108	3480	3850	4173	4516	4845	Measured Value (mV)
	Slope (mV/dB)	70.10	2	0	-21	-16	17	-5	16	21	-13	9	28	1	-7	-28	Error (mV)
			0.03	0.00	-0.30	-0.23	0.24	-0.08	0.23	0.29	-0.18	0.12	0.40	0.01	-0.10	-0.41	0.41 Linearity Error (dB)
			0.29	0.26	-0.02	0.06	0.55	0.23	0.55	0.63	0.16	0.48	0.77	0.38	0.29	-0.01	0.77 Accuracy Error (dB)
3 GHz	Intercept (mV)	4839	262	594	920	1275	1649	1995	2366	2755	3072	3429	3771	4116	4480	4832	Measured Value (mV)
	Slope (mV/dB)	70.91	32	10	-19	-19	1	-8	9	43	6	8	-5	-14	-5	-7	Error (mV)
			0.45	0.14	-0.27	-0.26	0.01	-0.11	0.12	0.61	0.08	0.11	-0.06	-0.20	-0.07	-0.10	0.61 Linearity Error (dB)
			-0.53	-0.78	-1.12	-1.05	-0.70	-0.70	-0.45	0.11	-0.36	-0.25	-0.36	-0.43	-0.23	-0.19	1.12 Accuracy Error (dB)
4 GHz	Intercept (mV)	4900	284	627	954	1310	1693	2032	2418	2805	3129	3487	3845	4177	4544	4862	Measured Value (mV)
	Slope (mV/dB)	71.32	20	6	-23	-24	3	-15	14	45	12	14	15	-10	1	-38	Error (mV)
			0.28	0.09	-0.32	-0.33	0.04	-0.21	0.20	0.63	0.17	0.19	0.21	-0.14	0.01	-0.53	0.63 Linearity Error (dB)
			-0.21	-0.31	-0.63	-0.54	-0.07	-0.22	0.30	0.83	0.46	0.58	0.70	0.44	0.69	0.23	0.83 Accuracy Error (dB)
5 GHz	Intercept (mV)	4883	292	631	955	1311	1695	2033	2410	2788	3109	3468	3821	4154	4521	4881	Measured Value (mV)
	Slope (mV/dB)	71.04	26	10	-21	-20	9	-9	13	36	2	5	3	-19	-7	-2	Error (mV)
			0.37	0.14	-0.30	-0.28	0.12	-0.12	0.18	0.51	0.02	0.08	0.05	-0.27	-0.10	-0.03	0.51 Linearity Error (dB)
			-0.10	-0.25	-0.62	-0.53	-0.04	-0.21	0.18	0.58	0.17	0.31	0.35	0.11	0.36	0.51	0.62 Accuracy Error (dB)
6 GHz	Intercept (mV)	4884	292	632	956	1313	1695	2033	2410	2789	3108	3470	3823	4158	4524	4876	Measured Value (mV)
	Slope (mV/dB)	71.03	25	10	-21	-19	8	-10	12	36	0	7	5	-16	-5	-8	Error (mV)
			0.36	0.14	-0.30	-0.27	0.11	-0.13	0.17	0.51	0.00	0.10	0.07	-0.22	-0.07	-0.11	0.51 Linearity Error (dB)
			-0.10	-0.24	-0.61	-0.50	-0.04	-0.21	0.18	0.60	0.16	0.33	0.38	0.17	0.40	0.43	0.61 Accuracy Error (dB)
7 GHz	Intercept (mV)	4869	288	618	948	1304	1683	2026	2397	2775	3092	3453	3802	4141	4514	4866	Measured Value (mV)
	Slope (mV/dB)	70.96	32	7	-18	-17	7	-4	12	35	-3	3	-2	-18	0	-3	Error (mV)
			0.45	0.10	-0.25	-0.24	0.10	-0.06	0.17	0.49	-0.04	0.05	-0.03	-0.25	0.00	-0.04	0.49 Linearity Error (dB)
			-0.16	-0.44	-0.72	-0.63	-0.21	-0.31	-0.01	0.40	-0.07	0.09	0.08	-0.07	0.26	0.29	0.72 Accuracy Error (dB)
8 GHz	Intercept (mV)	4852	294	632	959	1318	1697	2032	2402	2769	3086	3449	3800	4134	4489	4854	Measured Value (mV)
	Slope (mV/dB)	70.41	18	4	-21	-14	13	-4	14	29	-6	5	4	-14	-11	2	Error (mV)
			0.26	0.06	-0.30	-0.20	0.19	-0.06	0.20	0.41	-0.09	0.07	0.05	-0.20	-0.16	0.02	0.41 Linearity Error (dB)
			-0.07	-0.24	-0.56	-0.43	-0.01	-0.22	0.07	0.31	-0.16	0.03	0.05	-0.17	-0.10	0.12	0.56 Accuracy Error (dB)
9 GHz	Intercept (mV)	4852	280	614	938	1296	1672	2015	2388	2768	3085	3445	3792	4130	4491	4842	Measured Value (mV)
	Slope (mV/dB)	70.75	27	8	-22	-18	4	-6	13	39	2	9	2	-14	-7	-10	Error (mV)
			0.39	0.11	-0.31	-0.25	0.06	-0.09	0.18	0.55	0.03	0.12	0.03	-0.20	-0.10	-0.13	0.55 Linearity Error (dB)
			-0.27	-0.50	-0.86	-0.75	-0.37	-0.47	-0.13	0.30	-0.17	-0.02	-0.06	-0.23	-0.07	-0.05	0.86 Accuracy Error (dB)
10 GHz	Intercept (mV)	4824	259	578	906	1267	1639	1985	2355	2739	3057	3416	3756	4100	4461	4822	Measured Value (mV)
	Slope (mV/dB)	70.86	41	5	-21	-14	3	-5	11	40	4	9	-5	-16	-9	-2	Error (mV)
			0.57	0.08	-0.30	-0.20	0.05	-0.07	0.15	0.57	0.06	0.12	-0.08	-0.22	-0.13	-0.03	0.57 Linearity Error (dB)
			-0.57	-1.01	-1.32	-1.16	-0.84	-0.90	-0.61	-0.12	-0.57	-0.44	-0.58	-0.66	-0.50	-0.34	1.32 Accuracy Error (dB)
11 GHz	Intercept (mV)	4799	293	637	962	1311	1689	2021	2379	2744	3057	3417	3757	4094	4441	4802	Measured Value (mV)
	Slope (mV/dB)	69.44	7	4	-18	-16	14	-1	10	28	-6	6	-1	-11	-11	3	Error (mV)
			0.10	0.06	-0.26	-0.24	0.21	-0.01	0.14	0.40	-0.09	0.09	-0.01	-0.16	-0.16	0.04	0.40 Linearity Error (dB)
			-0.08	-0.17	-0.52	-0.53	-0.13	-0.38	-0.26	-0.04	-0.57	-0.42	-0.56	-0.74	-0.78	-0.62	0.78 Accuracy Error (dB)
12 GHz	Intercept (mV)	4796	276	611	934	1296	1672	2005	2354	2709	3023	3384	3725	4078	4446	4839	Measured Value (mV)
	Slope (mV/dB)	69.94	26	11	-16	-3	23	6	6	11	-25	-14	-22	-19	-1	43	Error (mV)
			0.37	0.16	-0.23	-0.05	0.33	0.09	0.08	0.16	-0.36	-0.19	-0.32	-0.27	-0.01	0.61	0.61 Linearity Error (dB)
			-0.33	-0.54	-0.92	-0.75	-0.37	-0.61	-0.62	-0.54	-1.06	-0.89	-1.02	-0.97	-0.71	-0.09	1.06 Accuracy Error (dB)
13 GHz	Intercept (mV)	4741	350	690	1020	1374	1751	2067	2396	2704	3012	3383	3719	4057	4408	4772	Measured Value (mV)
	Slope (mV/dB)	67.38	-11	-8	-15	2	42	21	13	-15	-44	-10	-11	-10	4	31	Error (mV)
			-0.17	-0.12	-0.22	0.03	0.63	0.32	0.20	-0.23	-0.66	-0.15	-0.17	-0.15	0.06	0.46	0.66 Linearity Error (dB)
			0.73	0.59	0.31	0.37	0.76	0.28	-0.02	-0.62	-1.21	-0.91	-1.11	-1.27	-1.26	-1.05	1.27 Accuracy Error (dB)
14 GHz	Intercept (mV)	4765	376	718	1053	1397	1774	2090	2414	2728	3035	3396	3739	4095	4445	4788	Measured Value (mV)
	Slope (mV/dB)	67.36	-10	-5	-7	0	40	20	7	-16	-46	-22	-15	4	17	23	Error (mV)
			-0.15	-0.08	-0.10	0.00	0.60	0.29	0.10	-0.24	-0.68	-0.32	-0.23	0.06	0.25	0.34	0.68 Linearity Error (dB)
			1.10	0.99	0.78	0.70	1.09	0.61	0.24	-0.27	-0.88	-0.72	-0.82	-0.73	-0.73	-0.82	1.10 Accuracy Error (dB)
15 GHz	Intercept (mV)	4754	334	685	1018	1365	1745	2061	2394	2706	3014	3381	3717	4058	4417	4806	Measured Value (mV)
	Slope (mV/dB)	67.77	-15	-2	-8	0	41	18	12	-15	-45	-17	-20	-18	2	52	Error (mV)
			-0.22	-0.04	-0.12	0.00	0.60	0.27	0.18	-0.21	-0.67	-0.25	-0.30	-0.26	0.03	0.77	0.77 Linearity Error (dB)
			0.50	0.52	0.28	0.24	0.67	0.19	-0.05	-0.59	-1.18	-0.94	-1.13	-1.26	-1.13	-0.57	1.26 Accuracy Error (dB)
16 GHz	Intercept (mV)	4863	301	638	965	1319	1698	2034	2400	2772	3090	3445	3791	4135	4513	4882	Measured Value (mV)
	Slope (mV/dB)	70.61	28	12	-14	-13	12	-5	8	27	-8	-6	-13	-22	3	19	Error (mV)
			0.39	0.17	-0.20	-0.19	0.18	-0.07	0.12	0.39	-0.11	-0.08	-0.18	-0.31	0.04	0.27	0.39 Linearity Error (dB)
			0.03	-0.15	-0.48	-0.42	0.00	-0.19	0.04	0.36	-0.10	-0.02	-0.08	-0.16	0.25	0.52	0.52 Accuracy Error (dB)
17 GHz	Intercept (mV)	4851	302	640	968	1317	1695	2033	2398	2771	3093	3447	3795	4130	4495	4853	Measured Value (mV)
	Slope (mV/dB)	70.32	22	8	-15	-18	9	-5	8	30	0	3	-1	-17	-4	2	Error (mV)
			0.31	0.12	-0.22	-0.25	0.12	-0.07	0.12	0.42	0.00	0.04	-0.01	-0.25	-0.06	0.03	0.42 Linearity Error (dB)
			0.04	-0.12	-0.43	-0.44	-0.04	-0.21	0.01	0.34	-0.06	0.01	-0.02	-0.23	-0.01	0.11	0.44 Accuracy Error (dB)
18 GHz	Intercept (mV)	4736	279	606	932	1289	1659	1990	2323	2673	2991	3344	3679	4034	4395	4770	Measured Value (mV)
	Slope (mV/dB)	68.92	23	5	-13	-1	25	11	0	5	-22	-13	-23	-12	4	34	Error (mV)
			0.33	0.08	-0.19	-0.01	0.36	0.16	-0.01	0.07	-0.31	-0.19	-0.33	-0.18	0.06	0.50	0.50 Linearity Error (dB)
			-0.28	-0.61	-0.95	-0.85	-0.56	-0.82	-1.06	-1.06	-1.51	-1.47	-1.68	-1.60	-1.44	-1.08	1.68 Accuracy Error (dB)

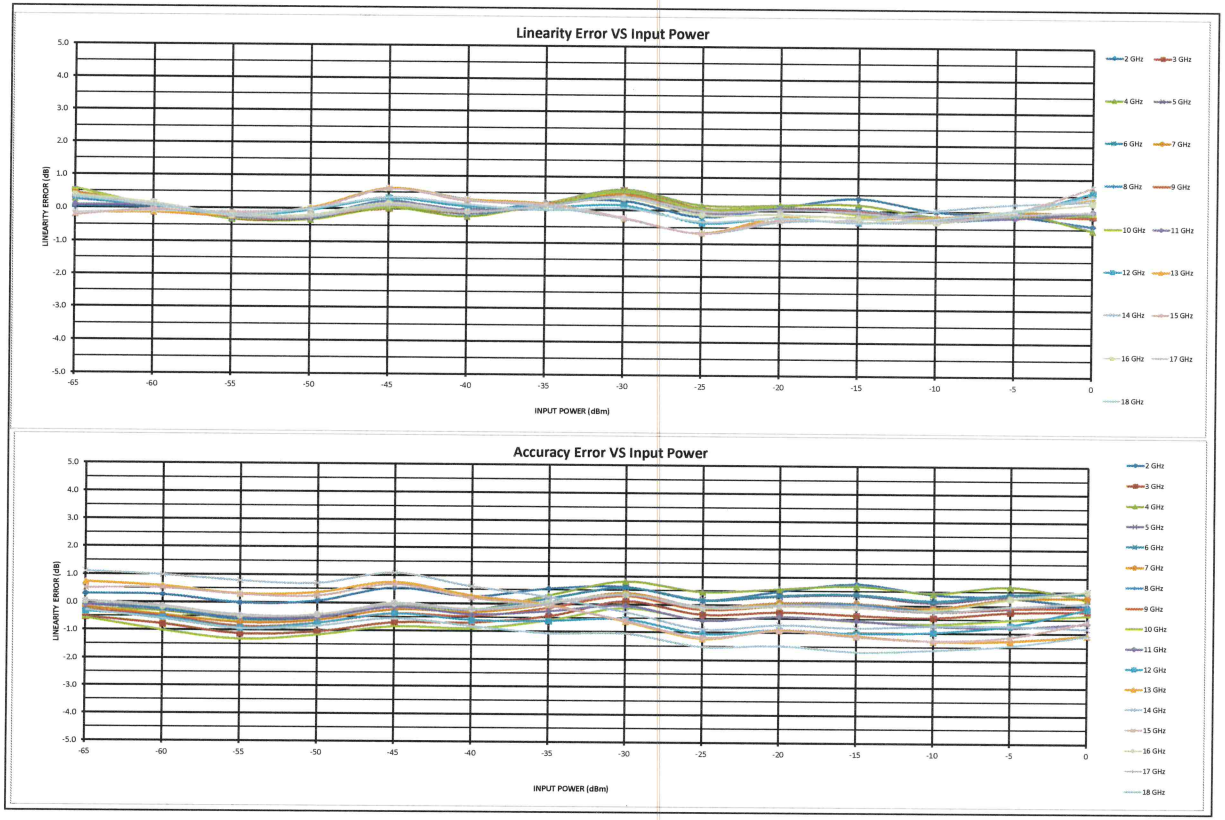
Output Vos: 61.0 mV

Avg Slope:	69.9 mV/dB
Max Slope:	71.3 mv/dB
Min Slope:	67.4 mv/dB

376	718	1053	1397	1774	2090	2436	2805	3129	3487	3850	4177	4544	4882	Max Measured (mV)
259	578	906	1267	1639	1985	2323	2673	2991	3344	3679	4034	4395	4770	Min Measured (mV)
0.84	1.00	1.05	0.93	0.96	0.75	0.81	0.94	0.99	1.02	1.22	1.02	1.07	0.80	Flatness Error (+/-dB)

PL44913

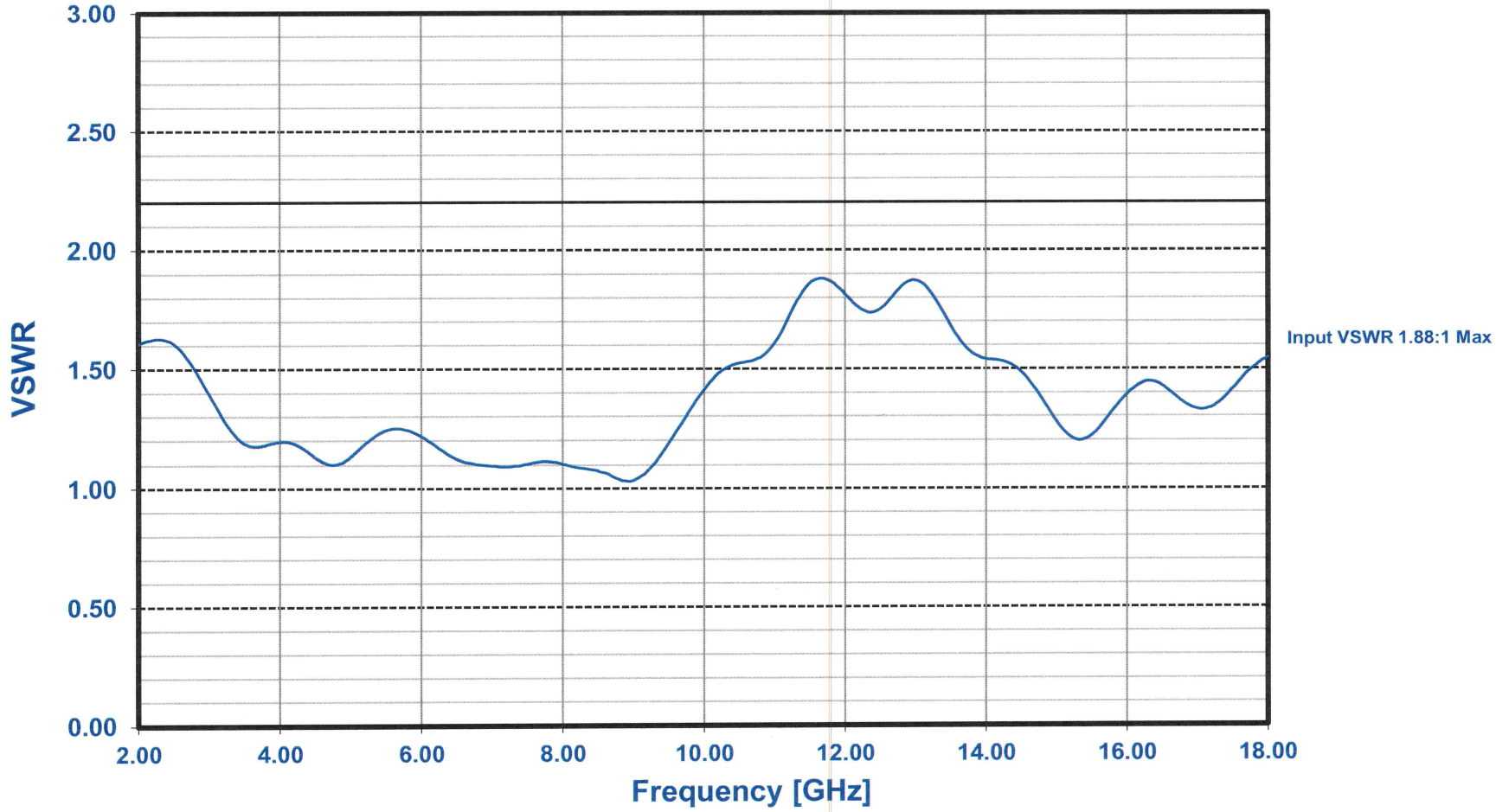
+70°C


Linearity Error VS Input Power
LINEARITY ERROR (dB)
INPUT POWER (dBm)
2 GHz
3 GHz
4 GHz
5 GHz
6 GHz
7 GHz
8 GHz
9 GHz
10 GHz
11 GHz
12 GHz
13 GHz
14 GHz
15 GHz
16 GHz
17 GHz
18 GHz
Accuracy Error VS Input Power
LINEARITY ERROR (dB)
INPUT POWER (dBm)

Model Number: ERDLVA-2G18G-65-70MV-70C
Serial Number: PL44913
Date: 10/18/2024

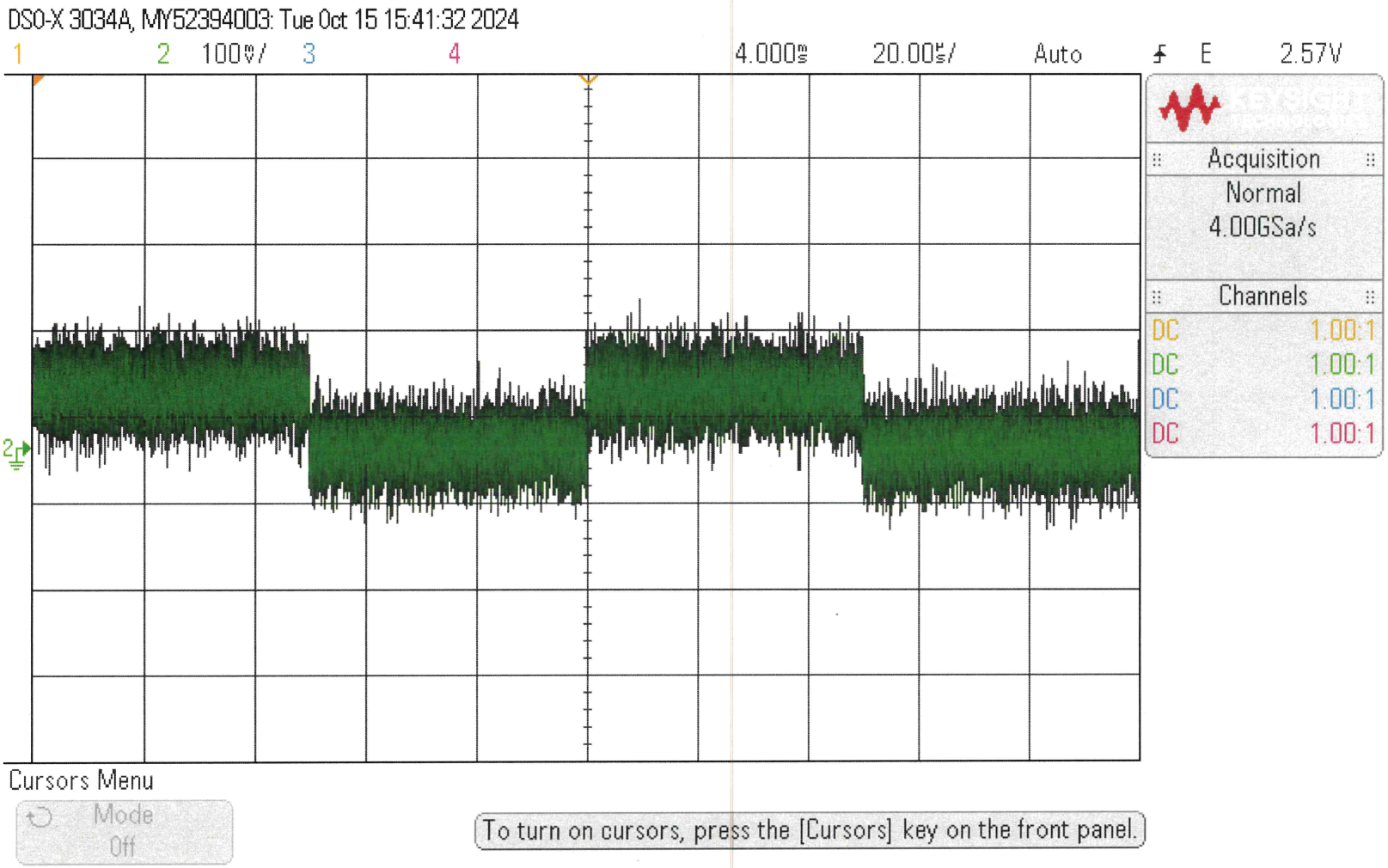
Temperature: +25C

VSWR GRAPH

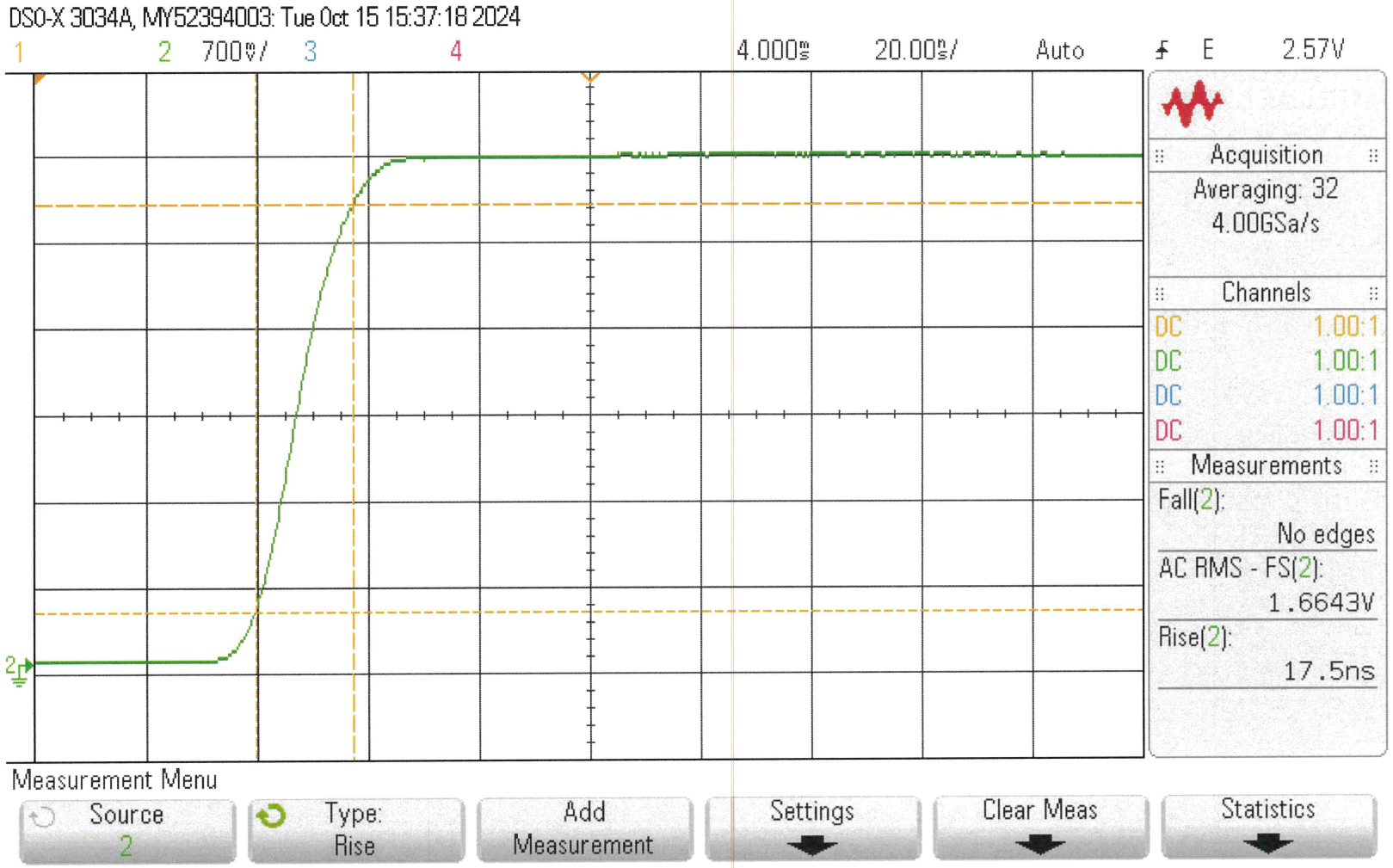


PL44913

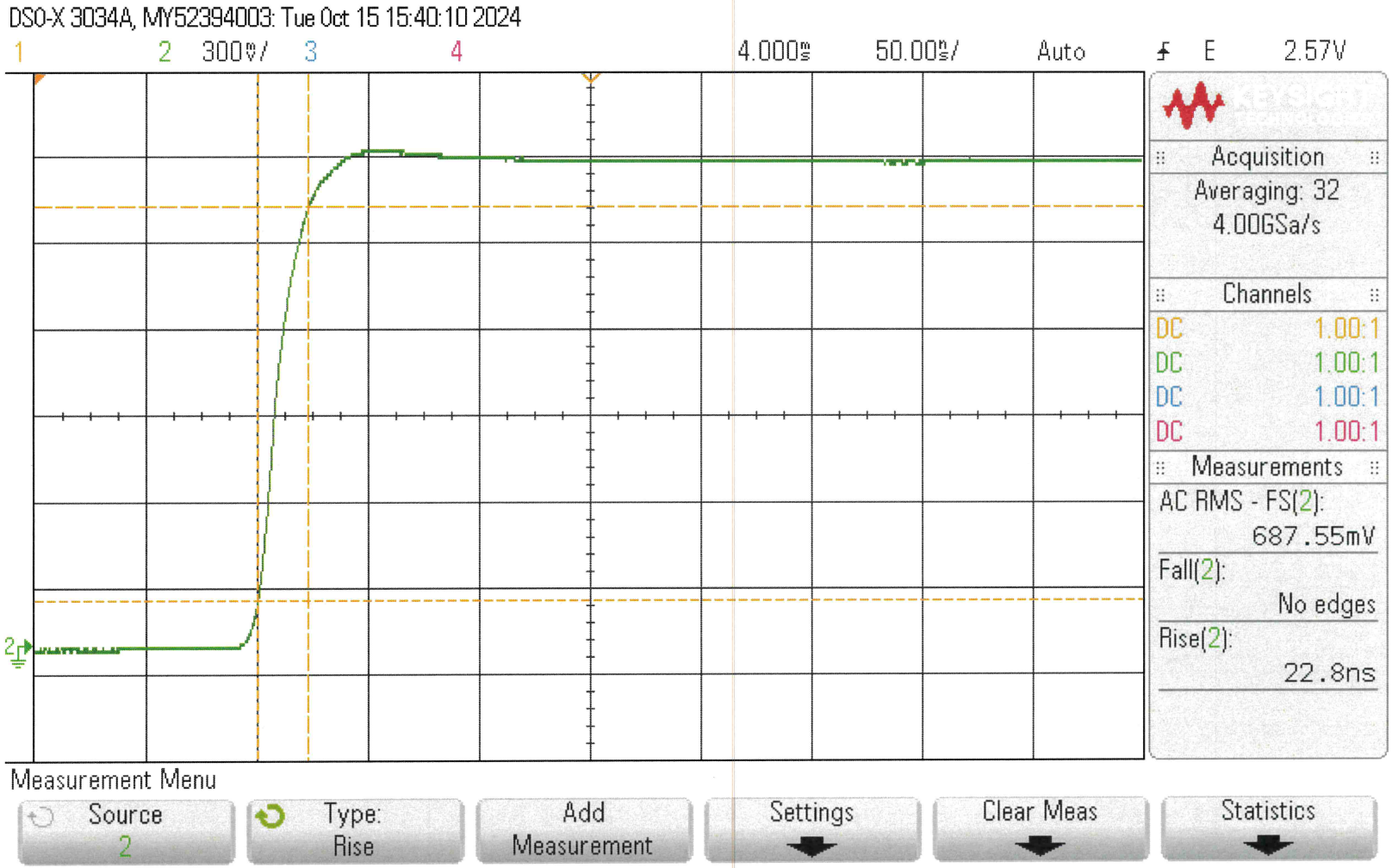
TSS -71dbm



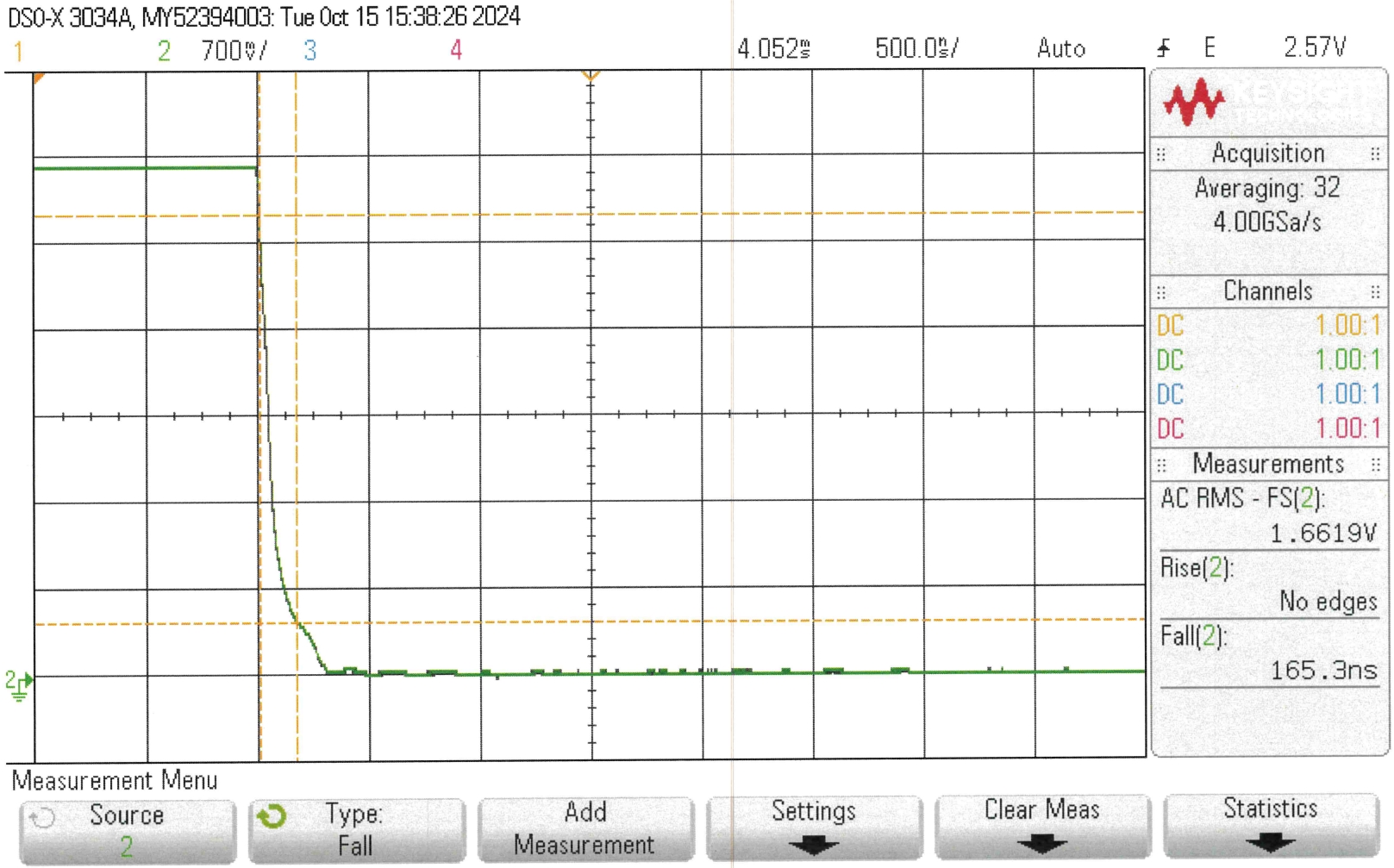
PL44913
settle



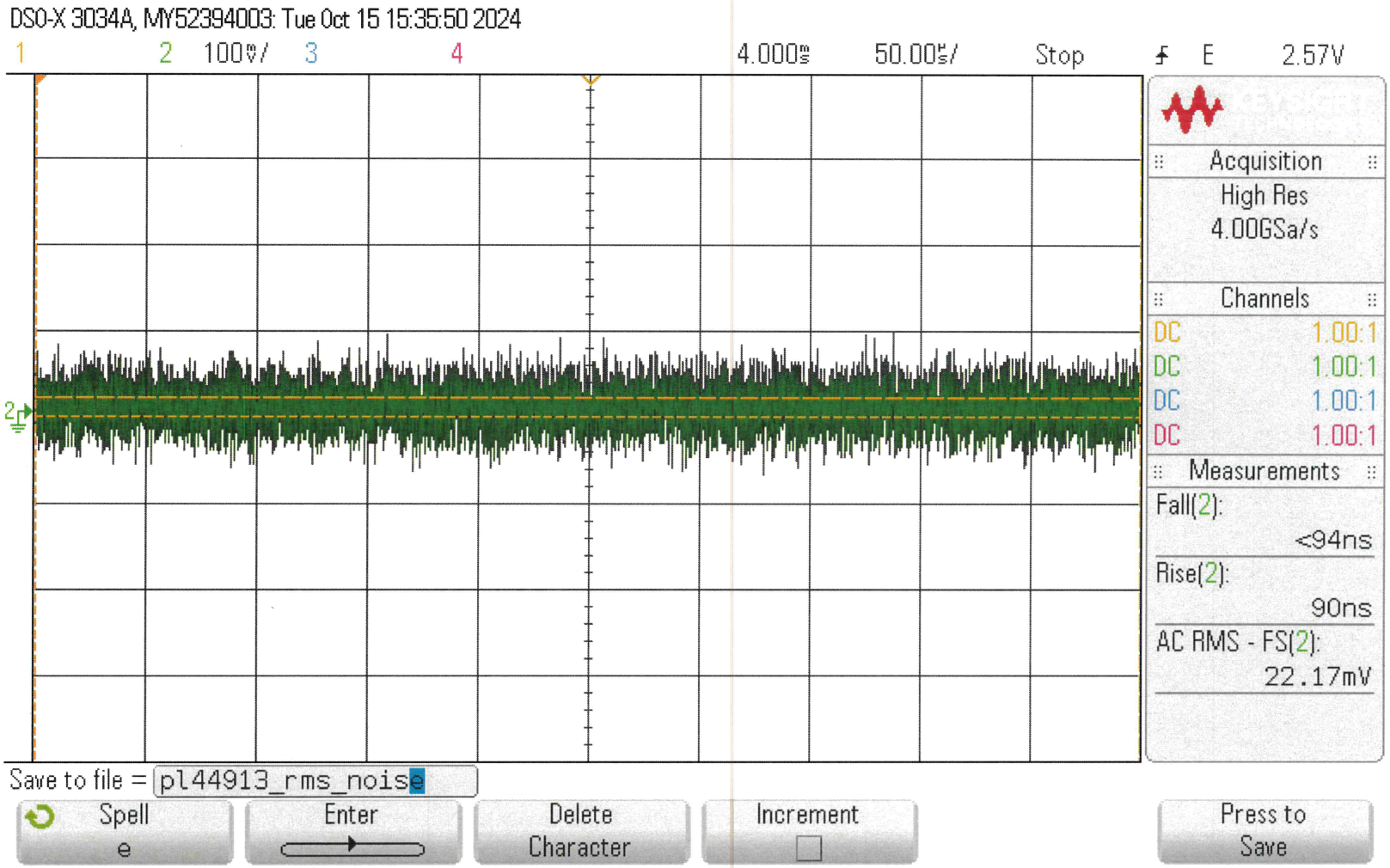
PL 441913
Rise Time -45 dbm



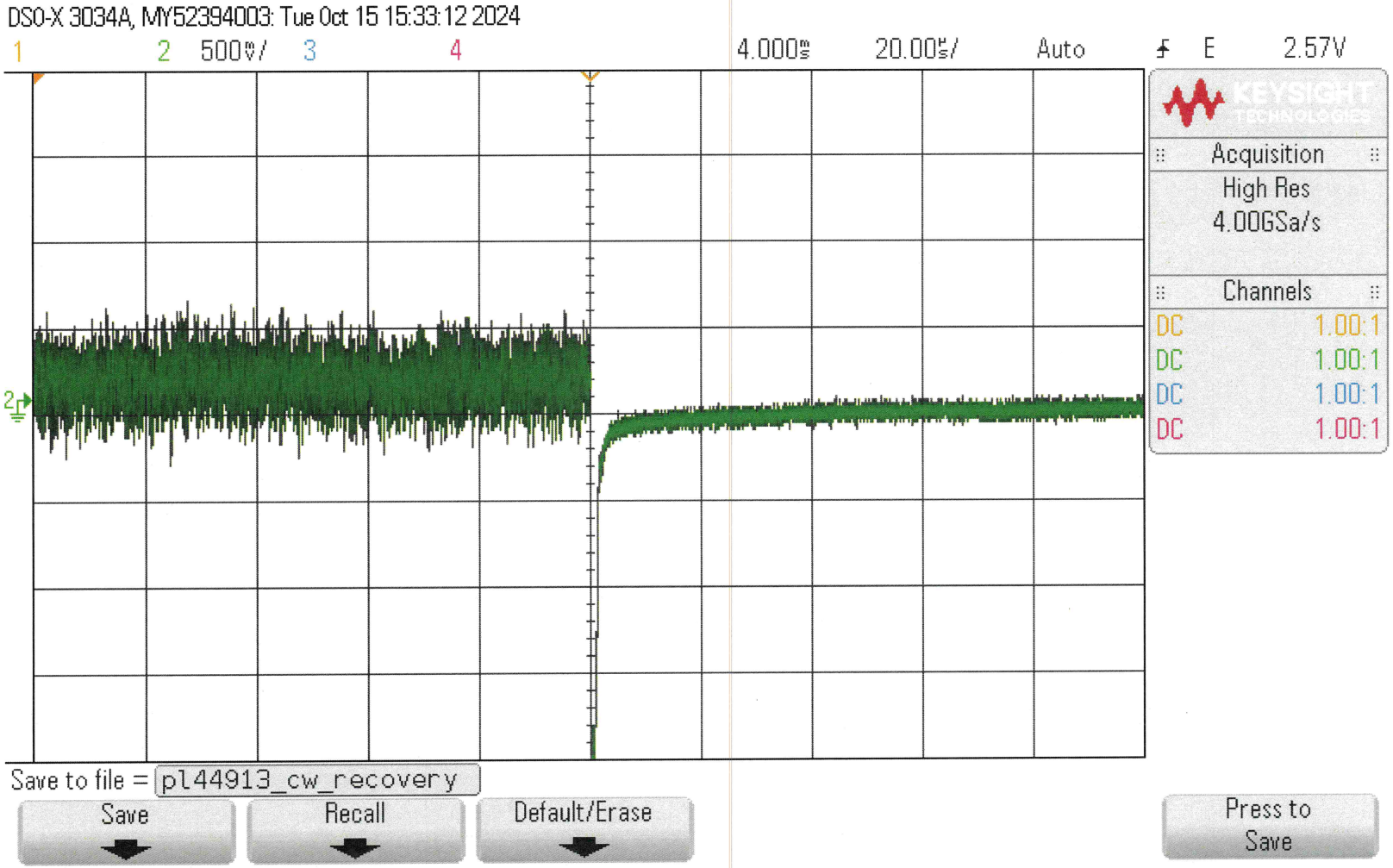
PL44913
Recovery Fall



PL44913
RMS noise



PL44913
CW Recovery



PL44913
CW Immune