

Project Number: G104239938

Date Issued: 12/12/2023

ETL Verified Certificate of Conformance number: 9909667CRT-003

Test Report Number: 104239938CRT-021



Applicant:

Berk-Tek LLC
132 White Oak Rd
New Holland, PA 17557

Manufacturer:

Berk-Tek LLC
132 White Oak Rd
New Holland, PA 17557

Applicant Contact: Mr. Michael Boland

Mfg. Contact: Mr. Michael Boland

Dear Mr. Boland

Intertek is pleased to provide this letter report covering the testing of your 4-pair, 24 AWG, U/UTP, CM, cord (stranded) cable covered by ETL Verified certificate of conformance number 9909667CRT-003. The sample was randomly selected by an Intertek inspector from your manufacturing facility, Berk-Tek LLC, on 11/30/2023 for Quarter 3 2023 re-testing follow-up testing.

The testing was performed at Intertek located in Cortland, NY from 12/12/2023 through 12/12/2023, to the ANSI/TIA-568.2-D standard(s) for category 6 and passed the applicable requirements.

We have appreciated this opportunity to be of service to you. If there are any questions regarding this letter or any other services offered by Intertek, Please do not hesitate to contact us.

Sincerely,

A handwritten signature in black ink that reads "Antoine Pelletier".

Antoine Pelletier
Project Engineer
Global Cabling Products Testing
e-mail: antoine.pelletier@intertek.com
Phone: (607) 758-6718

A handwritten signature in black ink that reads "Craig L. Williams".

Craig L. Williams
Technician
Global Cabling Products Testing
Phone: (607) 758-6321

Summary

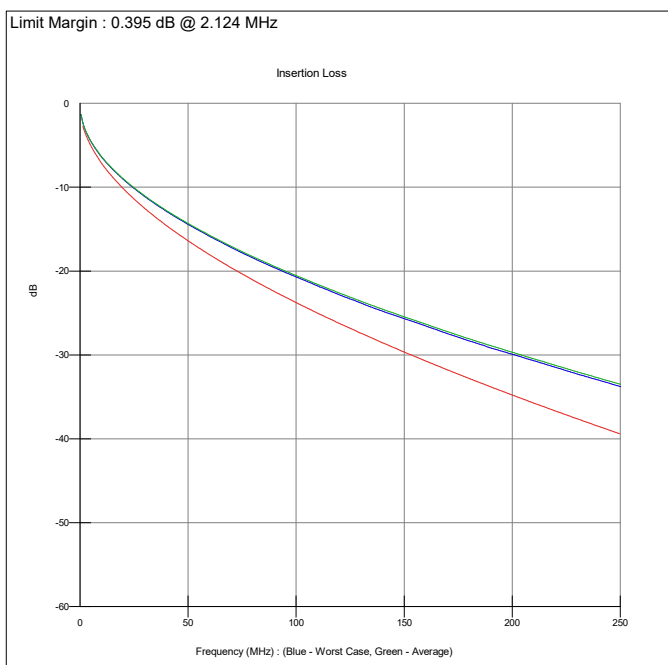
Client	Berk-Tek	Report No	104239938CRT-021
Specification	ANSI-TIA-568-2-D Cat 6 Cable		
Part No	LM-1000 CM Patch	Length (m)	100.
Test Started	12/12/2023 2:14:25 PM	Temperature	22.5 °C
Description	4 Pair 24 AWG UUTP CM Stranded		
Operator Name	Craig Williams	Test Status	Complies

DC Resistance (Ohms)		
Worst Case	Average	Spec
8.2	8.0	14.0
8.2	8.0	14.0

DC Resistance Unbalance (%)		
Worst Case	Average	Spec
0.3	0.2	5.0

DC Resistance Unbalance Pair-Pair (%)		
Worst Case	Average	Spec
1.7	1.0	5.0

Capacitance Unbalance Pair-Ground (pF/100m)		
Worst Case	Average	Spec
27.2	17.3	330.0

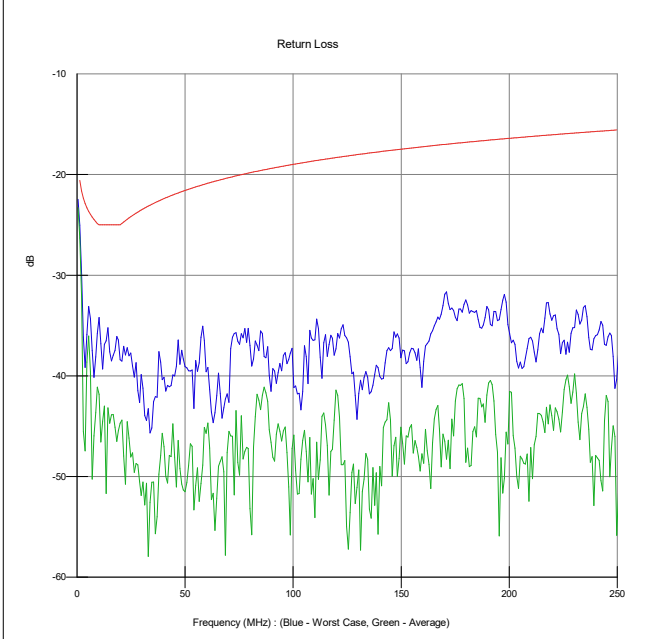


Insertion Loss			
Freq	Worst Case	Average	Spec
1.	1.9	1.9	2.5
4.	4.1	4.0	4.5
8.	5.7	5.7	6.4
10.	6.4	6.4	7.1
16.	8.1	8.0	9.1
20.	9.1	9.0	10.2
25.	10.1	10.1	11.4
31.25	11.4	11.3	12.8
62.5	16.2	16.1	18.5
100.	20.7	20.5	23.8
250.	33.8	33.5	39.4

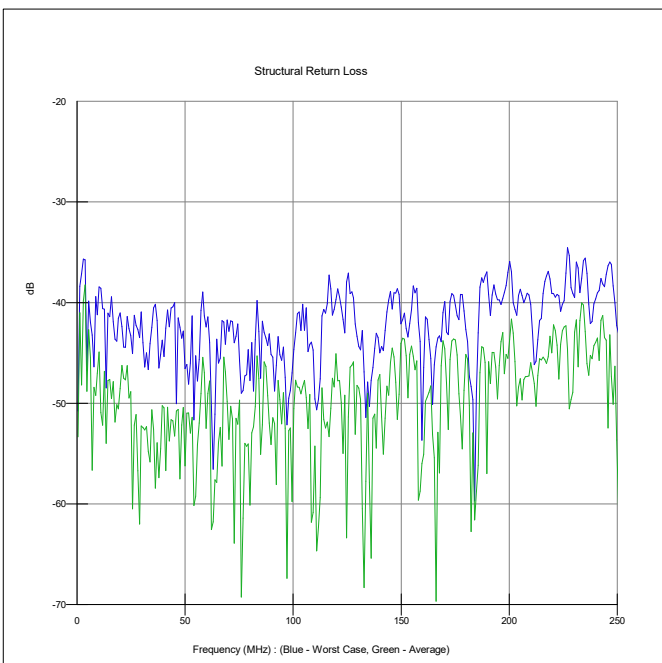
Summary

Client	Berk-Tek	Report No	104239938CRT-021
Specification	ANSI-TIA-568-2-D Cat 6 Cable		
Part No	LM-1000 CM Patch	Length (m)	100.
Test Started	12/12/2023 2:14:25 PM	Temperature	22.5 °C
Description	4 Pair 24 AWG UUTP CM Stranded		
Operator Name	Craig Williams	Test Status	Complies

Limit Margin : 4.432 dB @ 1.312 MHz



Return Loss			
Freq	Worst Case	Average	Spec
1.	24.1	25.1	20.2
4.	38.2	44.7	23.0
8.	39.7	45.4	24.5
10.	34.7	41.6	25.0
16.	38.5	43.9	25.0
20.	38.4	44.7	25.0
25.	38.0	48.0	24.2
31.25	43.7	52.5	23.3
62.5	44.0	52.1	20.7
100.	39.4	46.5	19.0
250.	39.6	54.5	15.6

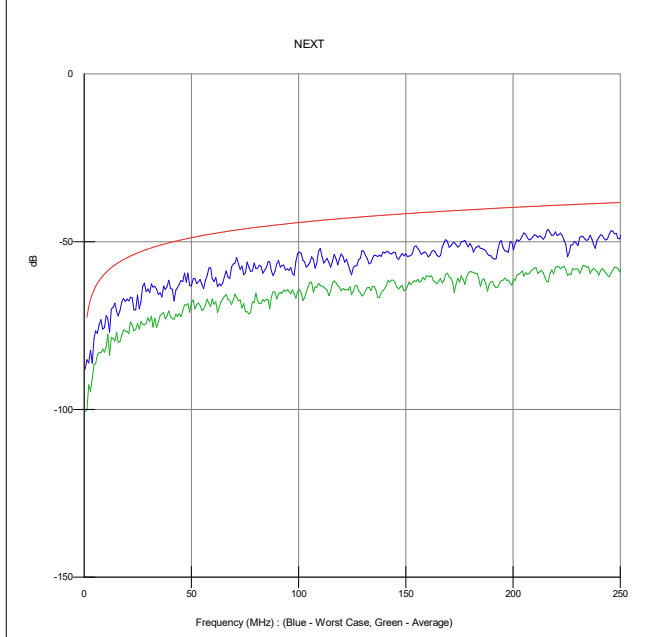


Structural Return Loss			
Freq	Worst Case	Average	Spec
1.	44.3	45.7	
4.	39.9	41.5	
8.	44.9	48.6	
10.	40.8	45.5	
16.	40.1	49.4	
20.	41.0	48.5	
25.	43.6	50.9	
31.25	46.5	52.6	
62.5	52.6	62.3	
100.	46.6	54.6	
250.	45.1	55.7	

Summary

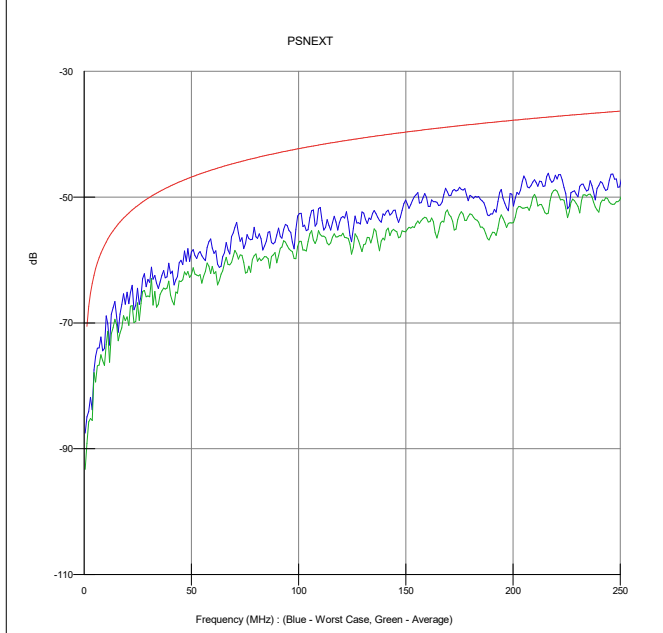
Client	Berk-Tek	Report No	104239938CRT-021
Specification	ANSI-TIA-568-2-D Cat 6 Cable		
Part No	LM-1000 CM Patch	Length (m)	100.
Test Started	12/12/2023 2:14:25 PM	Temperature	22.5 °C
Description	4 Pair 24 AWG UUTP CM Stranded		
Operator Name	Craig Williams	Test Status	Complies

Limit Margin : 7.032 dB @ 216.459 MHz



NEXT			
Freq	Worst Case	Average	Spec
1.	86.5	100.3	73.7
4.	84.6	89.6	65.3
8.	75.9	82.9	60.8
10.	73.1	81.8	59.3
16.	72.0	80.0	56.2
20.	67.2	76.7	54.8
25.	67.0	74.6	53.3
31.25	63.2	72.4	51.9
62.5	63.5	70.5	47.4
100.	53.3	64.5	44.3
250.	48.7	58.6	38.3

Limit Margin : 8.945 dB @ 216.459 MHz

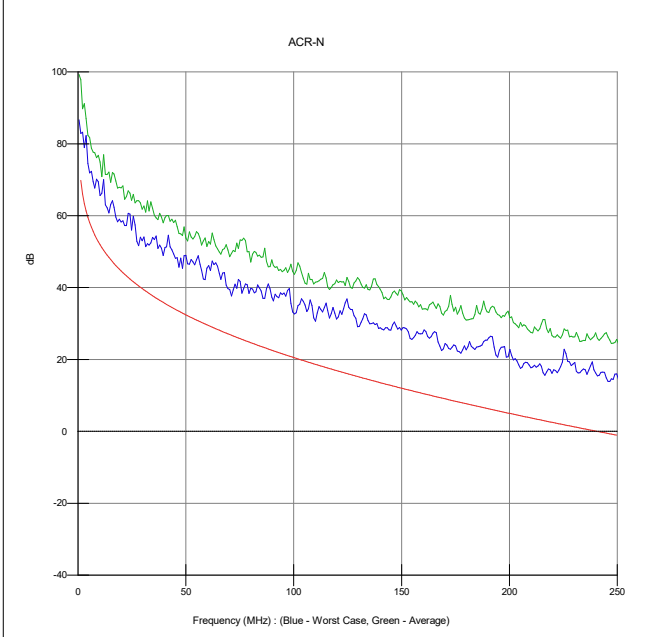


PSNEXT			
Freq	Worst Case	Average	Spec
1.	86.2	90.7	71.7
4.	81.8	83.1	63.3
8.	73.6	75.3	58.8
10.	70.4	74.4	57.3
16.	71.2	72.7	54.2
20.	65.2	69.1	52.8
25.	64.9	67.3	51.3
31.25	61.5	63.3	49.9
62.5	61.0	63.7	45.4
100.	52.8	57.4	42.3
250.	48.0	50.3	36.3

Summary

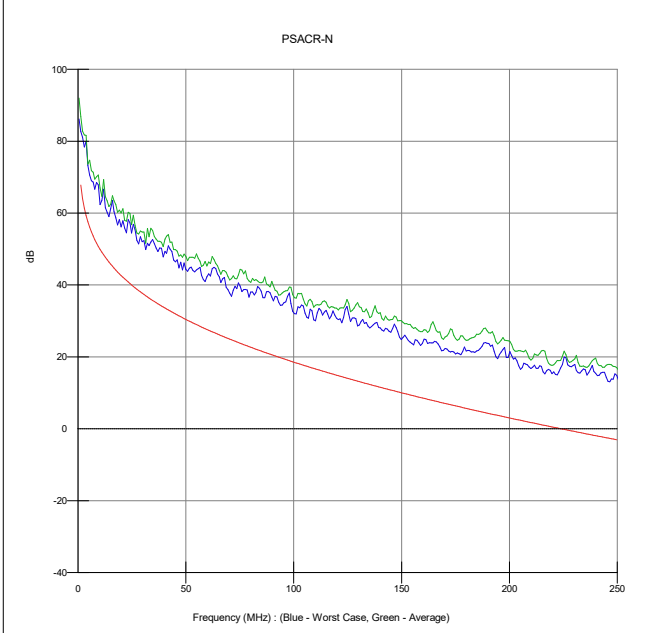
Client	Berk-Tek	Report No	104239938CRT-021
Specification	ANSI-TIA-568-2-D Cat 6 Cable		
Part No	LM-1000 CM Patch	Length (m)	100.
Test Started	12/12/2023 2:14:25 PM	Temperature	22.5 °C
Description	4 Pair 24 AWG UUTP CM Stranded		
Operator Name	Craig Williams	Test Status	Complies

Limit Margin : 10.910 dB @ 71.133 MHz



ACR-N			
Freq	Worst Case	Average	Spec
1.	84.6	98.4	71.3
4.	80.6	85.6	60.8
8.	70.3	77.2	54.4
10.	66.7	75.5	52.2
16.	64.0	72.0	47.2
20.	58.3	67.8	44.6
25.	57.0	64.6	41.9
31.25	52.0	61.2	39.1
62.5	47.4	54.5	28.9
100.	32.9	44.0	20.5
250.	15.5	25.2	-1.1

Limit Margin : 12.106 dB @ 71.133 MHz

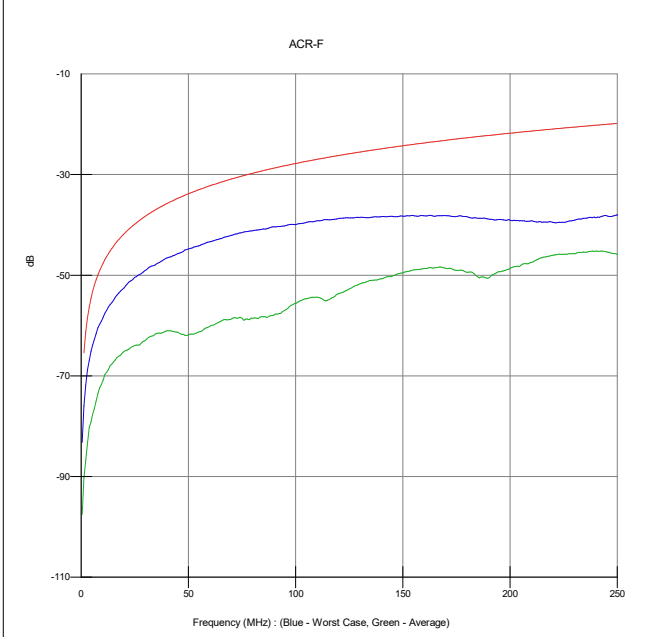


PSACR-N			
Freq	Worst Case	Average	Spec
1.	84.3	88.8	69.3
4.	77.8	79.1	58.8
8.	68.0	69.6	52.4
10.	64.0	68.1	50.2
16.	63.2	64.7	45.2
20.	56.2	60.1	42.6
25.	54.9	57.3	39.9
31.25	50.3	52.0	37.1
62.5	44.8	47.6	26.9
100.	32.3	36.8	18.5
250.	14.5	16.8	-3.1

Summary

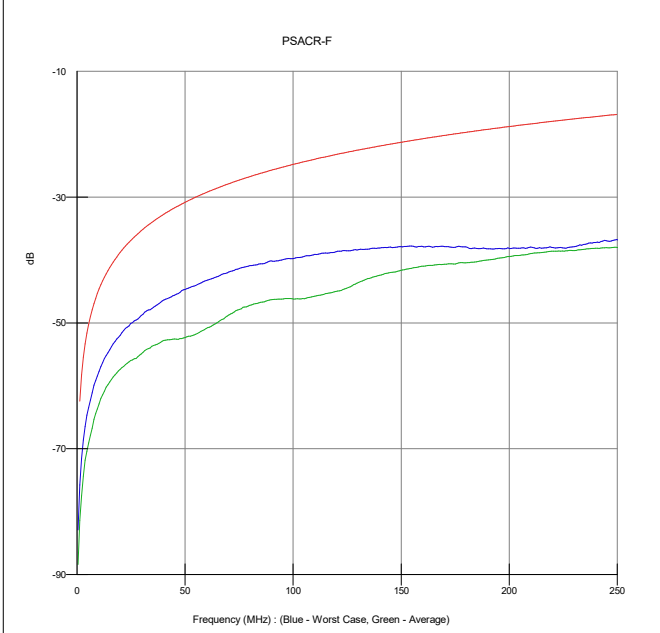
Client	Berk-Tek	Report No	104239938CRT-021
Specification	ANSI-TIA-568-2-D Cat 6 Cable		
Part No	LM-1000 CM Patch	Length (m)	100.
Test Started	12/12/2023 2:14:25 PM	Temperature	22.5 °C
Description	4 Pair 24 AWG UUTP CM Stranded		
Operator Name	Craig Williams	Test Status	Complies

Limit Margin : 10.347 dB @ 2.936 MHz



ACR-F			
Freq	Worst Case	Average	Spec
1.	78.8	93.1	67.0
4.	66.4	79.9	55.8
8.	60.3	73.3	49.7
10.	58.6	71.1	47.8
16.	54.4	66.8	43.7
20.	52.5	65.2	41.8
25.	50.4	64.0	39.8
31.25	48.6	62.4	37.9
62.5	43.0	59.7	31.9
100.	39.9	55.6	27.8
250.	38.1	45.8	19.9

Limit Margin : 12.924 dB @ 12.678 MHz

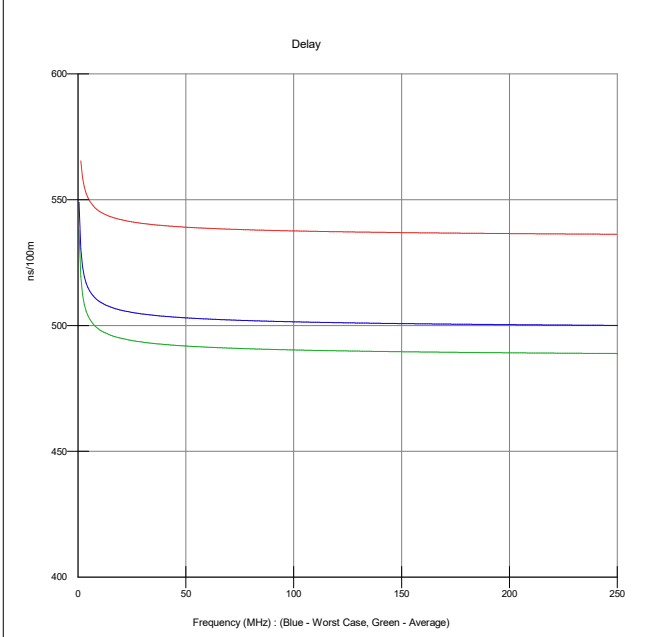


PSACR-F			
Freq	Worst Case	Average	Spec
1.	78.6	84.1	64.0
4.	65.9	71.4	52.8
8.	59.7	65.1	46.7
10.	57.9	63.1	44.8
16.	53.7	58.9	40.7
20.	52.0	57.4	38.8
25.	50.1	55.9	36.8
31.25	48.3	54.4	34.9
62.5	42.9	50.4	28.9
100.	39.8	46.2	24.8
250.	36.8	38.0	16.9

Summary

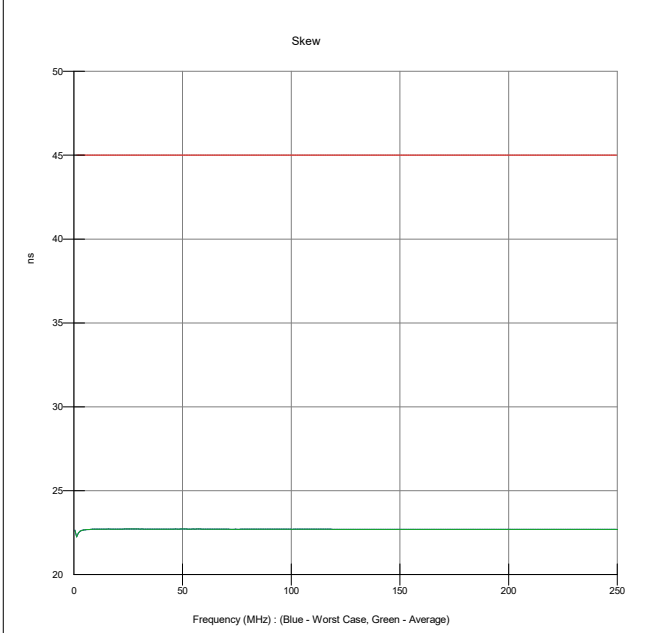
Client	Berk-Tek	Report No	104239938CRT-021
Specification	ANSI-TIA-568-2-D Cat 6 Cable		
Part No	LM-1000 CM Patch	Length (m)	100.
Test Started	12/12/2023 2:14:25 PM	Temperature	22.5 °C
Description	4 Pair 24 AWG UUTP CM Stranded		
Operator Name	Craig Williams	Test Status	Complies

Limit Margin : 34.980 ns/100m @ 1.312 MHz



Delay			
Freq	Worst Case	Average	Spec
1.	537.6	526.6	568.0
4.	516.4	505.2	552.1
8.	510.9	499.7	546.7
10.	509.5	498.3	545.4
16.	507.1	495.9	543.0
20.	506.1	494.9	542.0
25.	505.2	494.0	541.2
31.25	504.4	493.3	540.4
62.5	502.5	491.3	538.6
100.	501.5	490.3	537.6
250.	500.1	488.9	536.3

Limit Margin : 22.288 ns @ 57.331 MHz

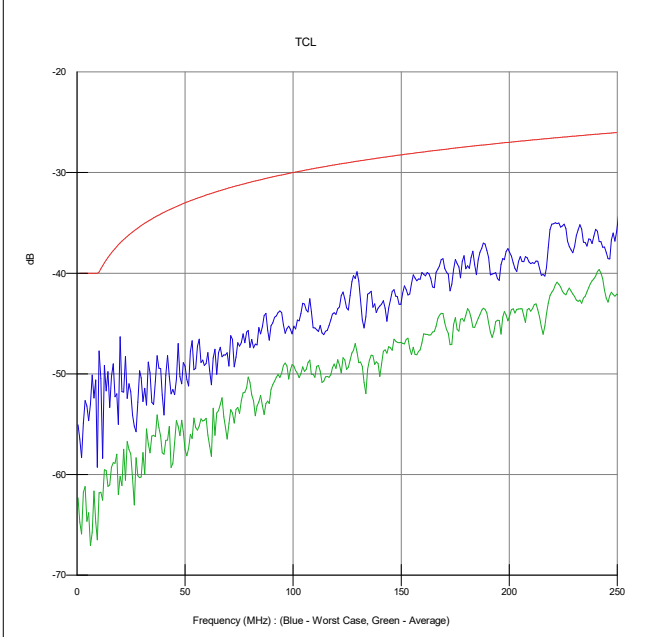


Skew			
Freq	Worst Case	Average	Spec
1.	22.4	22.4	45.0
4.	22.6	22.6	45.0
8.	22.7	22.7	45.0
10.	22.7	22.7	45.0
16.	22.7	22.7	45.0
20.	22.7	22.7	45.0
25.	22.7	22.7	45.0
31.25	22.7	22.7	45.0
62.5	22.7	22.7	45.0
100.	22.7	22.7	45.0
250.	22.7	22.7	45.0

Summary

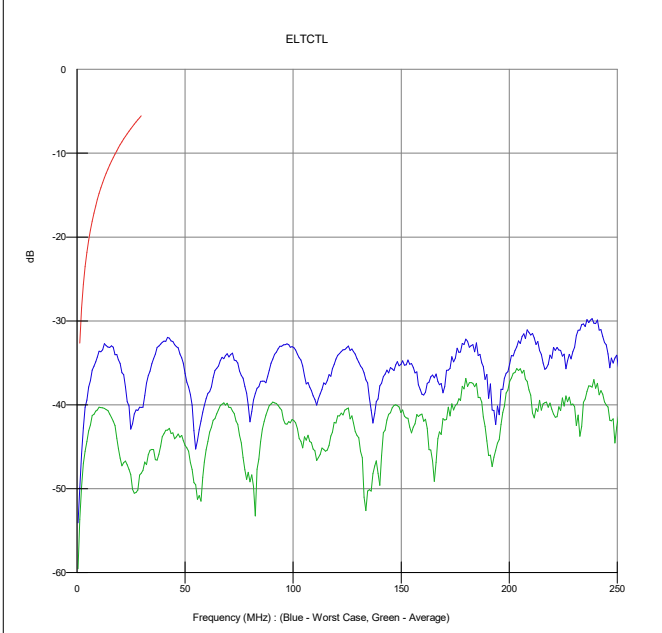
Client	Berk-Tek	Report No	104239938CRT-021
Specification	ANSI-TIA-568-2-D Cat 6 Cable		
Part No	LM-1000 CM Patch	Length (m)	100.
Test Started	12/12/2023 2:14:25 PM	Temperature	22.5 °C
Description	4 Pair 24 AWG UUTP CM Stranded		
Operator Name	Craig Williams	Test Status	Complies

Limit Margin : 7.834 dB @ 10.243 MHz



TCL			
Freq	Worst Case	Average	Spec
1.	55.9	63.8	40.0
4.	52.8	62.3	40.0
8.	52.0	62.4	40.0
10.	51.2	63.2	39.9
16.	50.5	59.2	38.0
20.	46.4	60.2	37.0
25.	52.2	58.4	36.0
31.25	51.6	59.7	35.1
62.5	50.6	56.4	32.0
100.	45.6	49.2	30.0
250.	35.3	42.1	26.0

Limit Margin : 16.775 dB @ 3.748 MHz



ELTCTL			
Freq	Worst Case	Average	Spec
1.	51.5	55.9	34.2
4.	40.0	45.2	23.0
8.	35.3	41.1	16.9
10.	33.8	40.4	15.0
16.	33.0	41.6	10.9
20.	35.1	46.4	9.0
25.	42.8	48.7	7.0
31.25	39.1	46.9	
62.5	37.5	42.4	
100.	33.1	41.8	
250.	34.5	42.3	