



HPNW
HEALTH PHYSICS NORTHWEST

January 7, 2022

Sarah Precise
President of Operations
Trivitron Imaging Solutions
DBA: Kennedy Vinyl
11665 Alabama Highway 79
Scottsboro, Alabama 35768

Dear Sarah:

Enclosed are the attenuation and lead equivalency results for the samples that were recently submitted to Health Physics Northwest. At your request, all tests were conducted in accordance with ASTM test Method F2547-18. The documentation on the following pages contains all of the information regarding this testing.

If you have any questions, please contact our office.

Sincerely,

Matt Brien, BS
Medical Physicist

Encl.

ASTM test Method F2547 - 18 14.2.1 Test Information

Date of Testing	January 4, 2022
Place of Testing	Health Physics Northwest
Name of Individual Performing the Testing	Matt Brien, BS Health Physics Northwest
Manufacturer / Model of X-ray Generator	Del Medical / VZW2556RB3-A3
Manufacturer / Model of X-ray Tube	Varex Imaging Corporation / A-192

Testing Parameters

Set kVp	89	99
Measured kVp	90.0	99.9
mAs	64	40
Half-Value Layer (mm Al)	4.3	5.2

All exposure and kVp measurements performed with an Unfors RaySafe X2 R/F sensor, Serial No.: 208271 calibrated February 5, 2021.

ASTM test Method F2547-18 14.2.2 Sample Identification

Sample Designation	1
Product	VLW-250-1 ply
Weight/Target	29.14
Gauge	30.5
Manufacture Date	12/22/21

Sample Designation	2
Product	VLW-250-2 ply
Weight/Target	28.97-29.00
Gauge	30.5, 30.5
Manufacture Date	12/22/21

Sample Designation	3
Product	VLW-250-1 ply
Weight/Target	29.52
Gauge	31.5
Manufacture Date	12/22/21

Sample Designation	4
Product	VLW-250-2 ply
Weight/Target	29.44-29.54
Gauge	31-31
Manufacture Date	12/22/21

Sample Designation	5
Product	NL-250-2 ply
Weight/Target	28.02-28.03
Gauge	31-31
Manufacture Date	12/8/20

ASTM test Method F2547-18 14.2.3 Test Results

		Attenuation	
Sample	Layers	90 kVp	100 kVp
1	1	88.2%	84.3%
2	2	96.3%	94.5%
3	1	88.8%	84.8%
4	2	96.4%	94.7%
5	2	97.5%	95.8%

		Lead Equivalency (mm Pb)	
Sample	Layers	90 kVp	100 kVp
1	1	0.23	0.23
2	2	0.47	0.47
3	1	0.24	0.24
4	2	0.48	0.48
5	2	0.57	0.54