

Plastics Interlaboratory Testing Program

Web Summary Report #131, 3rd Qtr 2024

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About CTS and the Plastics Interlaboratory Program

Founded in 1971, Collaborative Testing Services, Inc. (CTS) is a privately-owned company that specializes in interlaboratory tests for a wide variety of industries including rubber, plastics, fasteners and metals, containerboard, paper, color, agriculture, hemp, and wine, as well as proficiency tests for forensic laboratories. All of the tests are designed to assist organizations in achieving and maintaining quality control objectives. Labs from the U.S., as well as more than 100 countries currently participate in CTS programs.

Collaborative Testing Services initiated the Collaborative Reference Program for PLASTICS in 1992 at the request of industry, ASTM committee D-20 members, and accrediting bodies. Additional test methods are always under review and are incorporated into the program when possible.

The program allows laboratories to compare periodically the level and uniformity of their testing with that of other participating laboratories. It also provides a realistic assessment of the state of plastics testing proficiency.

For each test there is a summary of the statistics for the analysis and a graphical representation of the data. Also shown are notes concerning specific laboratory results, as well as significant findings related to instrument types or other testing variations. Refer to the KEY FOR SUMMARY REPORT for an explanation of terms and guidelines for interpreting the results.

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Key for Web Summary Report (Page 1 of 2)

WebCode	Assigned laboratory identification number (temporary) used to ensure lab confidentiality while permitting a lab to locate its data in the Plastics Web Summary Report published on the CTS web site. The WebCode for each analysis can be found in the Performance Analysis Report mailed to each participant.
Lab Mean	The average of the test results obtained by the participant.
Grand Mean	The average of the LAB MEANS for all included participants. Laboratories flagged with an X or an M (see DATA FLAG column) are excluded from the GRAND MEAN.
Difference from Grand Mean	The difference of the LAB MEAN from the GRAND MEAN.
Between-Lab Standard Deviation	An indication of the precision of measurement between the laboratories. The greater the spread of the LAB MEANS about the GRAND MEAN, the larger the BETWEEN-LAB STANDARD DEVIATION (and vice versa).
Comparative Performance Value	An indication of how well a laboratory's results agree with the other participants. The CPV is a ratio indicating the number of standard deviations from the GRAND MEAN. The closer a laboratory's COMPARATIVE PERFORMANCE VALUE is to zero, the more consistent its results are with the other participants' data (and vice versa). The critical value for each CPV will vary depending on the number of labs participating in a test.
Inst Code	A code indicating the manufacturer of the instrument used to perform the test (see separate INSTRUMENT CODE LIST for each test section) if instruments are tracked.
Data Flag	DATA FLAGS are assigned based on the simultaneous analysis of both samples tested. Refer to the following chart for an explanation of each symbol:

<u>DATA FLAG</u>	<u>STATISTICALLY INCLUDED/EXCLUDED</u>	<u>ACTION REQUIRED</u>
*	INCLUDED	CAUTION - review testing procedure and monitor future results. Results fall outside 95% ellipse but within a 99% ellipse that is calculated but not drawn.
X	EXCLUDED	STOP - immediate review of data and/or testing procedure is required. Results fall outside the 99% ellipse. See specific notes following each table for more information on why the data is excluded.
M	EXCLUDED	PROCEED - lab was unable to report data for at least one sample.

Graph - For each laboratory, the LAB MEAN for the first sample (x-axis) is plotted against the LAB MEAN for the second sample (y-axis) with each point representing a laboratory. The horizontal and vertical cross-hairs are the GRAND MEANS for each sample. When 20 or more laboratories are in the statistics, an ellipse is also drawn so that 95% of the time a randomly selected laboratory will be included inside the ellipse. Plotted data flags are explained above.

Common Problems Highlighted in Footnotes

1. **Extreme data** - The laboratory's results for one or both samples are so inconsistent with those of the other participants that the lab mean(s) fall outside the plot. The participant is advised to immediately review his data and/or testing procedure.
 2. **Systematic bias** - The laboratory's results are either consistently high or low for both samples when compared to the other participants (the plotted point falls near the top or bottom of the ellipse). This indicates that the participant is performing the test with a constant bias. Causes of systematic errors include improper calibration, the particular make/model of equipment or a modification to the testing procedure.
 3. **Inconsistency in testing between samples/sample sets** - The laboratory's results indicate that there are differences in the way the two samples tested (the plotted point falls to the side of the ellipse). This type of error may be attributed to the analyst deviating from the procedure when testing one of the samples or a material interaction occurrence with the instrument or room conditions. The inconsistency is reflected in the CPVs for the two samples, such as a +1.5 CPV for sample A and a -2.2 CPV for sample B. CTS also will specify if the laboratory's data for one sample are high/low compared to the other participants. If this inconsistency is slight, the lab's plotted point will be an * that falls on the edge of the ellipse.
 4. **Inconsistency in testing within a sample** - The laboratory's within-lab standard deviation for a specified sample is high when compared to the other participants, often causing the lab's plotted point to fall outside of the ellipse.
-

Labs flagged with an * are not typically included in the footnotes of a data table. These labs may locate their position in the control ellipse and use the definitions above to help identify the type of testing error. An * should serve as a caution flag, a "yellow light", to a lab. If this error is repeated in future rounds, a lab may need to stop and review its testing procedures. The initial data flag is not cause for alarm. Interlaboratory tests conducted at regular intervals permit a lab to recognize trends in testing.



Plastics Interlaboratory Testing Program

Results Summary for Report #131, 3rd Qtr 2024

Analysis 704 - Tensile Stress at Yield

Material: ABS/PC	Sample F03	7,241.36	psi	1.51% COV
	Sample F04	7,230.06	psi	1.57% COV

Analysis 705 - Tensile Stress at Break

Material: ABS/PC	Sample F03	6,560.46	psi	4.22% COV
	Sample F04	6,602.99	psi	4.68% COV

Analysis 706 - Percent Elongation at Yield

Material: ABS/PC	Sample F03	4.5358	Percent	3.36% COV
	Sample F04	4.5553	Percent	2.97% COV

Analysis 708 - Modulus of Elasticity

Material: ABS/PC	Sample F03	324.06	ksi	4.34% COV
	Sample F04	324.99	ksi	4.31% COV

Analysis 710 - Deflection Temp. Under Flexural Load (1.82 MPa)

Material: ABS	Sample E03	81.868	Degrees C	1.25% COV
	Sample E04	81.827	Degrees C	1.16% COV

Analysis 711 - Deflection Temp. Under Flexural Load (0.455 MPa)

Material: PP	Sample G03	92.791	Degrees C	2.70% COV
	Sample G04	93.283	Degrees C	2.77% COV

Analysis 712 - Temperature of Deflection (1.80 MPa)

Material: HIPS	Sample N03	77.816	Degrees C	1.22% COV
	Sample N04	77.834	Degrees C	1.14% COV

Analysis 715 - Vicat Temperature (Rate A)

Material: ABS	Sample H03	102.79	Degrees C	0.774% COV
	Sample H04	102.75	Degrees C	0.819% COV

Analysis 716 - Vicat Temperature (Rate B)

Material: ABS	Sample R03	103.82	Degrees C	2.50% COV
	Sample R04	103.80	Degrees C	2.43% COV

Analysis 718 - Specific Gravity

Material: ABS	Sample T03	1.0420	sp gr 23/23 C	0.243% COV
	Sample T04	1.0420	sp gr 23/23 C	0.234% COV

Analysis 720 - Flexural Modulus

Material: ABS	Sample J03	354.03	ksi	4.93% COV
	Sample J04	353.18	ksi	4.60% COV

Analysis 721 - Flexural Stress at 5% Strain

Material: ABS	Sample J03	10,066.68	psi	3.49% COV
	Sample J04	10,072.83	psi	3.83% COV

Analysis 722 - Flexural Stress at Yield

Material: ABS	Sample J03	10,118.64	psi	3.66% COV
	Sample J04	10,102.50	psi	3.76% COV

Analysis 730 - Tensile Stress at Yield, ISO Method

Material: ABS/PC	Sample C03	49.463	MPa	1.60% COV
	Sample C04	49.493	MPa	1.64% COV

Analysis 731 - Tensile Stress at Break, ISO Method

Material: ABS/PC	Sample C03	45.706	MPa	4.76% COV
	Sample C04	45.672	MPa	4.34% COV



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Analysis 732 - Strain at Yield, ISO Method

Material: ABS/PC	Sample C03	4.3309	Percent	4.32% COV
	Sample C04	4.3328	Percent	4.60% COV

Analysis 734 - Modulus of Elasticity, ISO Method

Material: ABS/PC	Sample C03	2,276.36	MPa	3.45% COV
	Sample C04	2,276.02	MPa	3.23% COV

Analysis 736 - Flexural Modulus

Material: ABS/PC	Sample K03	2,301.41	MPa	4.26% COV
	Sample K04	2,299.01	MPa	3.99% COV

Analysis 737 - Flexural Stress at 3.5% Strain

Material: ABS/PC	Sample K03	70.982	MPa	3.46% COV
	Sample K04	71.163	MPa	3.70% COV

Analysis 738 - Flexural Stress at Yield

Material: ABS/PC	Sample K03	79.260	MPa	3.50% COV
	Sample K04	79.447	MPa	4.14% COV

Analysis 750 - Flow Rate (190C or 230C/2.16 kg)

Material: LDPE	Sample X03	6.5979	grams/10 mins	4.42% COV
	Sample X04	6.4179	grams/10 mins	4.30% COV

Analysis 755 - Moisture Content

Material: ABS/PC	Sample Y03	0.12944	Percent	31.1% COV
	Sample Y04	0.12704	Percent	31.6% COV

Analysis 757 - Ash Content

Material: PP	Sample L03	20.784	Percent	0.260% COV
	Sample L04	20.787	Percent	0.296% COV

Analysis 758 - TGA

Material: PBT	Sample A03	69.457	Percent	3.19% COV
	Sample A04	69.405	Percent	2.65% COV

Analysis 760 - DSC Crystallization Temperature

Material: PP	Sample W03	119.22	Degrees Celsius	2.41% COV
	Sample W04	119.25	Degrees Celsius	2.44% COV

Analysis 761 - DSC Melt Temperature

Material: PP	Sample W03	165.16	Degrees Celsius	0.997% COV
	Sample W04	165.23	Degrees Celsius	1.09% COV

Analysis 762 - DSC Enthalpy of Crystallization

Material: PP	Sample W03	102.17	Joules Per Gram	8.27% COV
	Sample W04	102.79	Joules Per Gram	6.27% COV

Analysis 763 - DSC Enthalpy of Fusion

Material: PP	Sample W03	99.652	Joules Per Gram	10.9% COV
	Sample W04	100.02	Joules Per Gram	9.02% COV

Analysis 764 - DSC Glass Transition Temperature

Material: ABS	Sample V03	108.08	Degrees Celsius	2.45% COV
	Sample V04	108.31	Degrees Celsius	2.26% COV

Analysis 765 - Research Crystallization Peak Temperature

Material: PP	Sample W03	120.10	Degrees Celsius	1.85% COV
	Sample W04	120.04	Degrees Celsius	2.16% COV



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Analysis 766 - Research Melting Peak Temperature

Material: PP	Sample W03	164.51	Degrees Celsius	0.698% COV
	Sample W04	164.54	Degrees Celsius	0.722% COV

Analysis 767 - Research Heat of Crystallization

Material: PP	Sample W03	104.60	Joules Per Gram	8.28% COV
	Sample W04	104.71	Joules Per Gram	7.72% COV

Analysis 768 - Research Heat of Fusion

Material: PP	Sample W03	104.09	Joules Per Gram	9.17% COV
	Sample W04	104.02	Joules Per Gram	9.56% COV

Analysis 769 - Research Glass Transition Temperature

Material: ABS	Sample V03	107.10	Degrees Celsius	3.10% COV
	Sample V04	107.17	Degrees Celsius	3.06% COV

Analysis 770 - Tensile Stress at Yield, Films

Material: LDPE	Sample B03	1,659.30	psi	14.2% COV
	Sample B04	1,658.63	psi	13.4% COV

Analysis 771 - Tensile Stress at Break, Films

Material: LDPE	Sample B03	3,559.27	psi	6.24% COV
	Sample B04	3,551.88	psi	6.21% COV

Analysis 772 - Elongation at Yield, Films

Material: LDPE	Sample B03	43.974	Percent	50.5% COV
	Sample B04	43.859	Percent	50.9% COV

Analysis 773 - Elongation at Break, Films

Material: LDPE	Sample B03	917.22	Percent	17.8% COV
	Sample B04	921.30	Percent	17.7% COV

Analysis 774 - Thickness of Film Specimens

Material: LDPE	Sample B03	3.8011	mils	3.62% COV
	Sample B04	3.8158	mils	4.09% COV

Analysis 775 - Secant Modulus at 1% Strain

Material: LDPE	Sample B03	32,308.04	psi	14.1% COV
	Sample B04	33,214.36	psi	11.8% COV

Analysis 776 - Secant Modulus at 2% Strain

Material: LDPE	Sample B03	28,262.68	psi	11.3% COV
	Sample B04	28,896.81	psi	8.13% COV

Analysis 780 - Static Friction

Material: LDPE	Sample P03	0.20220	COF	23.9% COV
	Sample P04	0.19386	COF	29.3% COV

Analysis 781 - Kinetic Friction

Material: LDPE	Sample P03	0.13385	COF	13.6% COV
	Sample P04	0.12790	COF	17.7% COV

Analysis 782 - Tear Resistance of Film

Material: LDPE	Sample Q03	426.63	grams-force	7.28% COV
	Sample Q04	406.21	grams-force	12.0% COV

Analysis 785 - Percent Haze

Material: LDPE	Sample D03	11.484	Percent	6.66% COV
	Sample D04	11.643	Percent	5.86% COV



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Analysis 786 - Total Transmittance

Material: LDPE	Sample D03	92.850	Percent	0.919% COV
	Sample D04	93.099	Percent	0.929% COV

Analysis 790 - Notched Izod Impact

Material: HIPS	Sample S03	1.9310	ft.lbf/in	10.6% COV
	Sample S04	1.9207	ft.lbf/in	11.1% COV

Analysis 791 - Notched Izod Impact

Material: ABS	Sample Z03	22.872	kJ/m^2	3.75% COV
	Sample Z04	22.793	kJ/m^2	3.73% COV

Analysis 792 - Notched Charpy Impact

Material: ABS	Sample M03	22.891	kJ/m^2	4.67% COV
	Sample M04	23.071	kJ/m^2	4.41% COV



Plastics Interlaboratory Testing Program

Analysis 704

Report #131

3rd Qtr 2024

Tensile Stress at Yield - psi

WebCode	Data Flag	Sample F03			Sample F04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		7,238.0	-3.4	-0.03	7,276.0	45.9	0.41
2MX8P7		7,345.8	104.4	0.96	7,290.2	60.1	0.53
2NTPR9		7,128.7	-112.6	-1.03	7,122.0	-108.0	-0.95
3844KM		7,426.0	184.6	1.69	7,390.0	159.9	1.41
38MQGJ		7,260.4	19.0	0.17	7,254.0	23.9	0.21
3ZY3JT		7,280.4	39.0	0.36	7,268.0	37.9	0.33
47PTPN		7,202.0	-39.4	-0.36	7,262.0	31.9	0.28
4HXHHX		7,172.8	-68.6	-0.63	7,209.0	-21.1	-0.19
4TYVNQ		7,252.0	10.6	0.10	7,281.0	50.9	0.45
4XT3YL		7,307.8	66.4	0.61	7,272.9	42.8	0.38
6Q7MRU		7,109.6	-131.8	-1.20	7,144.0	-86.1	-0.76
8A9CWM	*	7,084.0	-157.4	-1.44	6,980.0	-250.1	-2.21
8EMYML		7,291.6	50.2	0.46	7,298.2	68.1	0.60
8VTZKT	X	7,291.7	50.3	0.46	6,745.2	-484.9	-4.28
8Z7ULK	*	7,366.0	124.6	1.14	7,464.0	233.9	2.07
8ZNUKF	*	7,301.2	59.8	0.55	7,385.0	154.9	1.37
92G376		7,374.6	133.2	1.22	7,383.8	153.7	1.36
A99Z7C		7,208.0	-33.4	-0.31	7,182.0	-48.1	-0.42
ADMFXP		7,300.0	58.6	0.54	7,274.0	43.9	0.39
AKL3RA	X	10,354.2	3,112.8	28.46	10,364.0	3,133.9	27.67
APXZ6N		7,216.4	-25.0	-0.23	7,216.8	-13.3	-0.12
AWH2L2	X	6,750.6	-490.8	-4.49	6,795.0	-435.1	-3.84
B3X9EQ		7,262.7	21.3	0.20	7,268.2	38.1	0.34
C8RP4P		7,055.4	-186.0	-1.70	7,052.0	-178.1	-1.57
CEAV3G		7,039.0	-202.4	-1.85	7,045.4	-184.7	-1.63
CTQT8H		7,406.0	164.6	1.51	7,360.0	129.9	1.15
CVUL2G		7,341.4	100.0	0.91	7,326.6	96.5	0.85
CYWM4Y		7,182.8	-58.6	-0.54	7,151.8	-78.3	-0.69
DJZHGM		7,075.4	-166.0	-1.52	7,053.2	-176.9	-1.56
ELK2RJ	*	7,464.0	222.6	2.04	7,362.4	132.3	1.17
EVPYLE		7,106.9	-134.4	-1.23	7,048.9	-181.2	-1.60
EXXYWM		7,212.0	-29.4	-0.27	7,248.0	17.9	0.16
FJB9CB	X	7,138.0	-103.4	-0.95	7,352.0	121.9	1.08
GAK8BR		7,234.8	-6.5	-0.06	7,163.2	-66.9	-0.59
GF66ZF		7,232.0	-9.4	-0.09	7,216.0	-14.1	-0.12



Plastics Interlaboratory Testing Program

Analysis 704

Report #131

3rd Qtr 2024

Tensile Stress at Yield - psi

WebCode	Data Flag	Sample F03			Sample F04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
GRKWPA		7,224.9	-16.5	-0.15	7,221.6	-8.5	-0.07
H4R8VB		7,187.0	-54.4	-0.50	7,147.2	-82.9	-0.73
HHNL TJ		7,323.4	82.0	0.75	7,314.6	84.5	0.75
L6CBTM		7,325.8	84.4	0.77	7,273.4	43.3	0.38
LZK2PF		7,446.3	204.9	1.87	7,405.7	175.6	1.55
MTBAUN		7,254.4	13.0	0.12	7,229.4	-0.7	-0.01
PYEW H9		7,094.0	-147.4	-1.35	7,106.2	-123.9	-1.09
PYUBPJ		7,268.6	27.2	0.25	7,270.4	40.3	0.36
QY864X		7,182.4	-59.0	-0.54	7,217.4	-12.7	-0.11
R9BHYR		7,188.1	-53.2	-0.49	7,240.3	10.3	0.09
RCNHUX		7,089.8	-151.6	-1.39	7,053.2	-176.9	-1.56
RD7CWT		7,111.2	-130.1	-1.19	7,100.3	-129.7	-1.15
RFCWH9		7,386.9	145.6	1.33	7,353.5	123.4	1.09
RLFQM2		7,309.4	68.0	0.62	7,306.4	76.3	0.67
T9MQ8J		7,409.6	168.2	1.54	7,381.0	150.9	1.33
TTTB2X		7,241.0	-0.4	0.00	7,264.4	34.3	0.30
TNUU3Y	*	7,028.0	-213.4	-1.95	6,946.0	-284.1	-2.51
UJ2BZE	X	5,660.4	-1,581.0	-14.46	6,014.6	-1,215.5	-10.73
VBPFG6		7,201.3	-40.0	-0.37	7,169.5	-60.5	-0.53
VH6YZ6		7,096.8	-144.6	-1.32	7,104.9	-125.2	-1.11
W9FTG7		7,119.2	-122.2	-1.12	7,098.8	-131.3	-1.16
WJ3KDW		7,250.8	9.4	0.09	7,278.2	48.1	0.42
XNJJX2		7,270.8	29.4	0.27	7,257.5	27.4	0.24
XWXJEX		7,273.1	31.8	0.29	7,229.3	-0.7	-0.01
XXCNCW		7,184.0	-57.4	-0.52	7,152.0	-78.1	-0.69
XXT2FY		7,162.8	-78.6	-0.72	7,166.8	-63.3	-0.56
Y9R72K		7,369.4	128.0	1.17	7,355.0	124.9	1.10
YHRWF2		7,222.2	-19.2	-0.18	7,194.4	-35.7	-0.31
YWDCJZ		7,217.1	-24.2	-0.22	7,195.7	-34.4	-0.30
Z6MVKB		7,375.8	134.4	1.23	7,337.2	107.1	0.95
ZDJQN2		7,430.9	189.6	1.73	7,415.0	184.9	1.63



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Analysis 704

Tensile Stress at Yield - psi

Report #131

3rd Qtr 2024

Summary Statistics

Sample F03

Sample F04

Grand Means

7,241.36 psi

7,230.06 psi

Stnd Dev Btwn Labs

109.36 psi

113.27 psi

Statistics based on 61 of 66 reporting participants

Sample F03: ABS/PC & Sample F04: ABS/PC

Comments on Assigned Data Flags for Test #704

AWH2L2 (X) - Data for both samples are low. Possible Systematic Error.

8VTZKT (X) - Data for sample F04 are low. Inconsistent within the determinations of both samples.

AKL3RA (X) - Data for both samples are high.

FJB9CB (X) - Inconsistent in testing between samples.

UJ2BZE (X) - Data for both samples are low. Possible Systematic Error.



Plastics Interlaboratory Testing Program

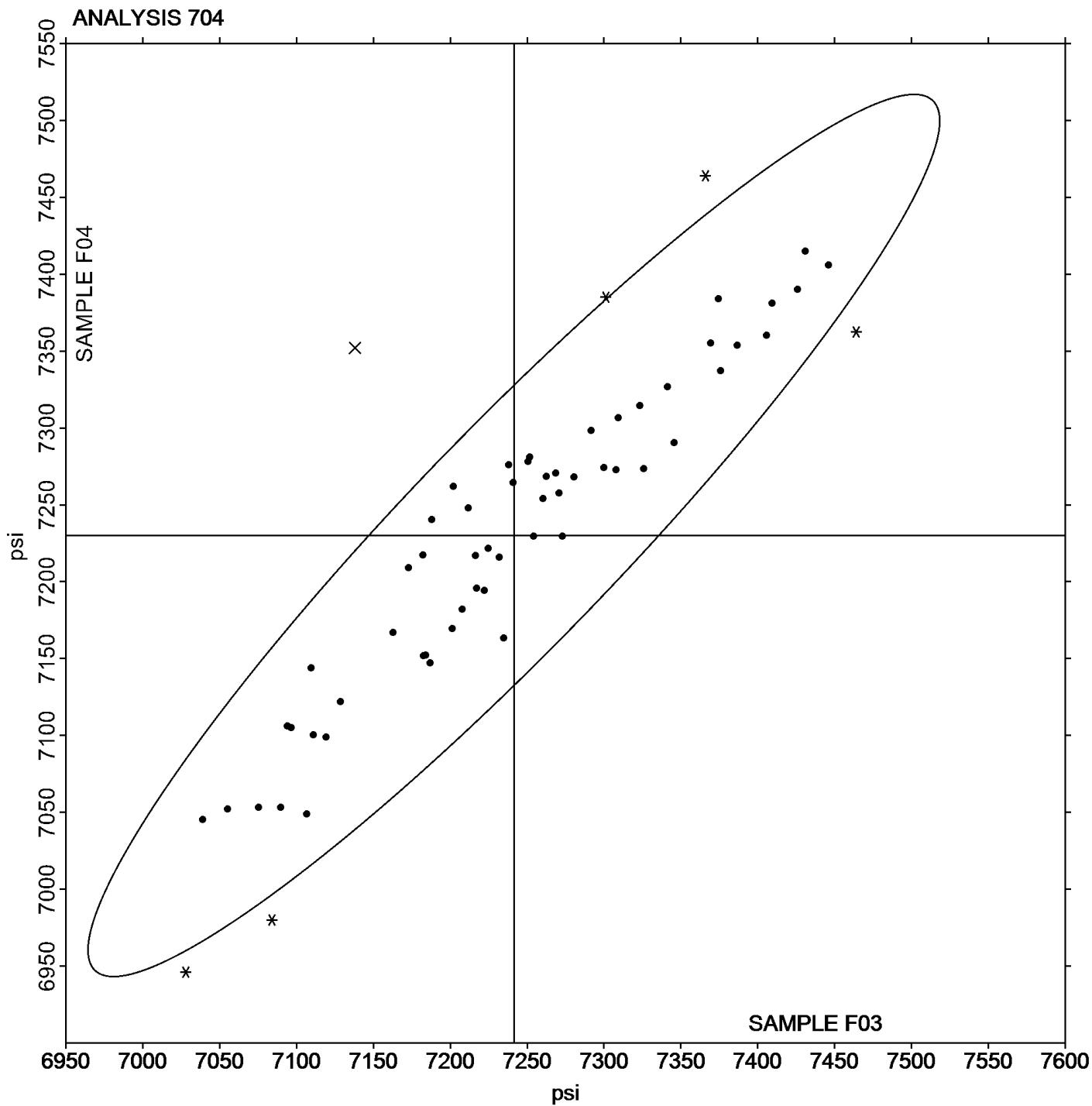
Analysis 704

Report #131

3rd Qtr 2024

Tensile Stress at Yield - psi

Grand Mean Sample F03: 7,241.36 psi Grand Mean Sample F04: 7,230.06 psi





Plastics Interlaboratory Testing Program

Analysis 705

Report #131

3rd Qtr 2024

Tensile Stress at Break - psi

WebCode	Data Flag	Sample F03			Sample F04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		6,662.0	101.5	0.37	6,854.0	251.0	0.81
2MX8P7	*	7,252.6	692.1	2.50	7,325.2	722.2	2.34
2NTPR9		6,346.9	-213.6	-0.77	6,331.4	-271.6	-0.88
3844KM		6,499.8	-60.7	-0.22	6,541.2	-61.8	-0.20
38MQGJ		6,335.6	-224.9	-0.81	6,380.6	-222.4	-0.72
47PTPN		6,362.0	-198.5	-0.72	6,932.0	329.0	1.06
4HXHHX		6,759.6	199.1	0.72	7,064.2	461.2	1.49
4TYVNQ		6,787.8	227.4	0.82	6,497.7	-105.2	-0.34
4XT3YL		6,224.0	-336.5	-1.21	6,263.7	-339.3	-1.10
6Q7MRU		6,779.8	219.3	0.79	6,908.8	305.8	0.99
8A9CWM	*	6,364.0	-196.5	-0.71	5,876.0	-727.0	-2.35
8EMYML		6,409.4	-151.1	-0.55	6,758.0	155.0	0.50
8VTZKT		6,635.5	75.1	0.27	6,289.8	-313.2	-1.01
8ZNUKF		6,573.6	13.1	0.05	6,714.4	111.4	0.36
92G376		6,333.0	-227.5	-0.82	6,515.8	-87.2	-0.28
A99Z7C		6,472.0	-88.5	-0.32	6,432.0	-171.0	-0.55
AKL3RA	X	9,112.8	2,552.3	9.21	9,213.6	2,610.6	8.45
APXZ6N		6,288.2	-272.3	-0.98	6,334.8	-268.2	-0.87
AWH2L2		6,312.8	-247.7	-0.89	6,252.4	-350.6	-1.13
BLDHEQ		6,831.0	270.5	0.98	6,854.3	251.3	0.81
C8RP4P		6,595.4	34.9	0.13	6,405.2	-197.8	-0.64
CEAV3G		6,091.2	-469.3	-1.69	6,304.4	-298.6	-0.97
CTQT8H		6,984.4	423.9	1.53	6,813.7	210.7	0.68
CYWM4Y		6,572.8	12.3	0.04	6,555.8	-47.2	-0.15
ELK2RJ		6,588.0	27.5	0.10	6,545.0	-58.0	-0.19
EVPYLE		6,207.7	-352.8	-1.27	6,352.7	-250.3	-0.81
EXXYWM		6,402.0	-158.5	-0.57	6,354.0	-249.0	-0.81
FJB9CB		6,227.0	-333.5	-1.20	6,469.8	-133.2	-0.43
GAK8BR		6,249.2	-311.3	-1.12	6,189.7	-413.3	-1.34
GF66ZF		6,638.4	77.9	0.28	6,607.6	4.6	0.01
GRKWPA	*	7,147.0	586.5	2.12	6,731.6	128.6	0.42
HHNL TJ		6,771.6	211.1	0.76	6,574.4	-28.6	-0.09
JCFHHC		6,176.4	-384.1	-1.39	6,402.2	-200.8	-0.65
L6CBTM	X	7,479.0	918.5	3.31	7,073.2	470.2	1.52
LZK2PF	*	7,312.9	752.4	2.71	7,278.1	675.1	2.18



Plastics Interlaboratory Testing Program

Analysis 705

Report #131

3rd Qtr 2024

Tensile Stress at Break - psi

WebCode	Data Flag	Sample F03			Sample F04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
MTBAUN		6,528.8	-31.7	-0.11	6,484.8	-118.2	-0.38
PYEWH9		6,634.2	73.7	0.27	6,509.8	-93.2	-0.30
PYUBPJ		6,679.2	118.7	0.43	6,663.8	60.8	0.20
QY864X		6,365.6	-194.9	-0.70	6,376.6	-226.4	-0.73
R9BHYR		6,593.5	33.0	0.12	6,903.9	300.9	0.97
RCNHUX		6,339.2	-221.3	-0.80	6,606.0	3.0	0.01
RD7CWT		6,287.4	-273.1	-0.99	6,243.0	-360.0	-1.16
RFCWH9		6,727.0	166.5	0.60	6,777.2	174.2	0.56
RLFQM2		7,038.6	478.1	1.73	7,106.8	503.8	1.63
T9MQ8J		6,632.4	71.9	0.26	6,788.6	185.6	0.60
TTTB2X		6,499.6	-60.9	-0.22	6,618.6	15.6	0.05
TUNU3Y		6,454.0	-106.5	-0.38	6,508.0	-95.0	-0.31
UJ2BZE		6,958.6	398.1	1.44	6,904.0	301.0	0.97
VBPFG6		6,725.5	165.1	0.60	6,758.8	155.8	0.50
VH6YZ6		6,223.3	-337.1	-1.22	6,239.0	-364.0	-1.18
W9FTG7		6,875.8	315.3	1.14	7,024.4	421.4	1.36
WJ3KDW		6,335.4	-225.1	-0.81	6,308.8	-294.2	-0.95
XNJJX2		6,785.5	225.0	0.81	7,253.1	650.1	2.10
XWXJEX		6,900.7	340.2	1.23	6,598.1	-4.9	-0.02
XXCNCW		6,450.0	-110.5	-0.40	6,396.0	-207.0	-0.67
XXT2FY		6,378.2	-182.3	-0.66	6,401.4	-201.6	-0.65
Y9R72K	*	6,476.5	-84.0	-0.30	7,100.6	497.6	1.61
YHRWF2		6,358.4	-202.1	-0.73	6,335.6	-267.4	-0.87
YWDCJZ		6,284.8	-275.6	-0.99	6,322.0	-281.0	-0.91
Z6MVKB	X	7,712.2	1,151.7	4.16	7,374.2	771.2	2.50
ZDJQN2		6,781.2	220.7	0.80	7,034.1	431.1	1.40

Summary Statistics

Sample F03

Sample F04

Grand Means

6,560.46 psi

6,602.99 psi

Stnd Dev Btwn Labs

277.15 psi

309.00 psi

Statistics based on 58 of 61 reporting participants

Sample F03: ABS/PC & Sample F04: ABS/PC



Plastics Interlaboratory Testing Program
Analysis 705
Tensile Stress at Break - psi

Report #131
3rd Qtr 2024

Comments on Assigned Data Flags for Test #705

AKL3RA (X) - Data for both samples are high. Possible Systematic Error.

L6CBTM (X) - Data for sample F03 are high. Inconsistent within the determinations of sample F03.

Z6MVKB (X) - Data for sample F03 are high. Inconsistent within the determinations of sample F04.



Plastics Interlaboratory Testing Program

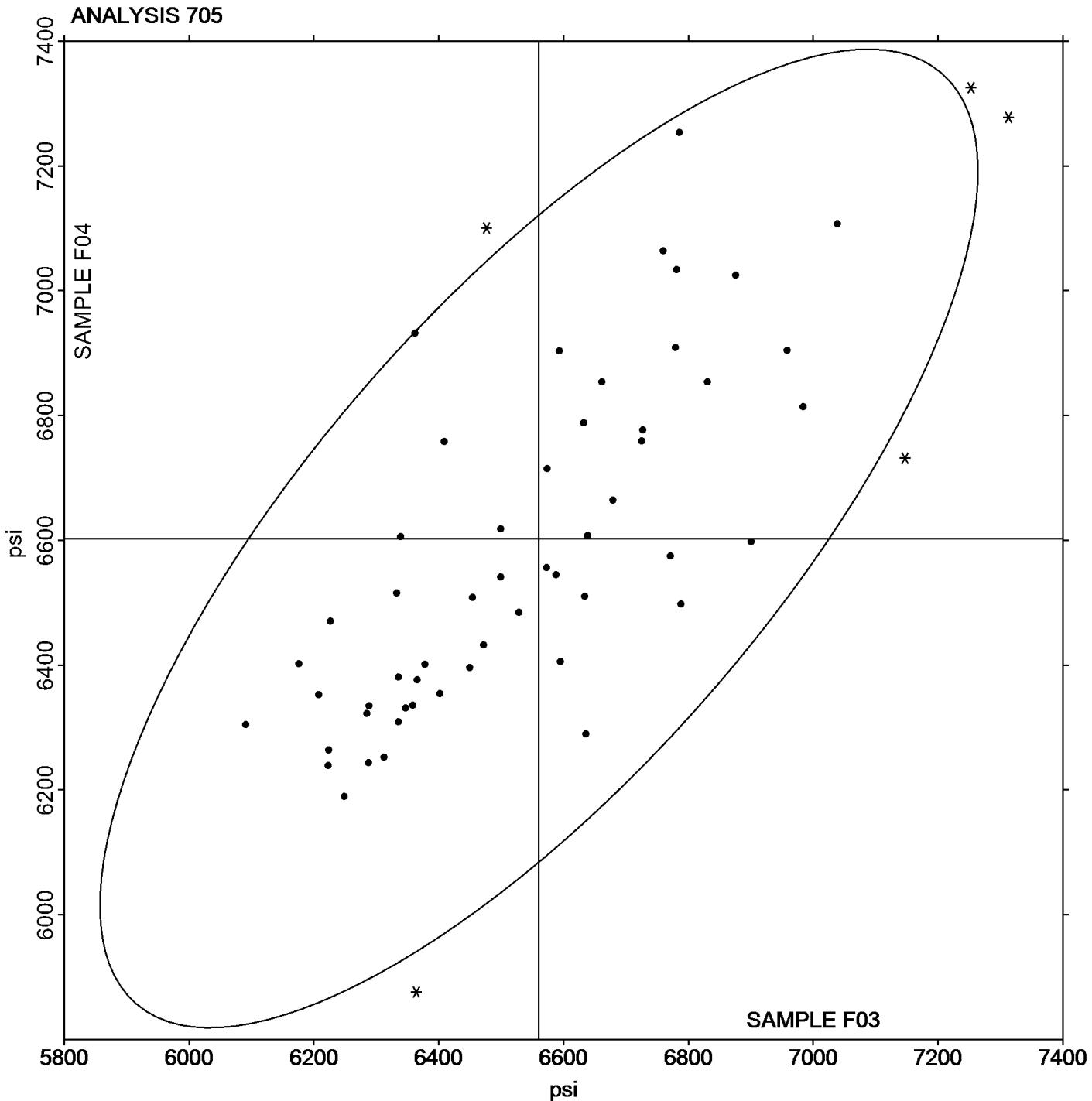
Analysis 705

Tensile Stress at Break - psi

Report #131

3rd Qtr 2024

Grand Mean Sample F03: 6,560.46 psi Grand Mean Sample F04: 6,602.99 psi





Plastics Interlaboratory Testing Program

Analysis 706

Report #131

3rd Qtr 2024

Percent Elongation at Yield - Percent

WebCode	Data Flag	Sample F03			Sample F04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
2MX8P7		4.557	0.022	0.14	4.616	0.061	0.45
2NTPR9		4.242	-0.294	-1.93	4.224	-0.332	-2.45
3844KM		4.864	0.328	2.15	4.788	0.233	1.72
38MQGJ		4.486	-0.050	-0.33	4.432	-0.123	-0.91
3ZY3JT		4.532	-0.004	-0.03	4.584	0.029	0.21
47PTPN		4.478	-0.058	-0.38	4.512	-0.043	-0.32
4HXHHX		4.516	-0.020	-0.13	4.566	0.011	0.08
4TYVNQ		4.616	0.080	0.53	4.626	0.071	0.52
4XT3YL		4.638	0.102	0.67	4.712	0.157	1.16
6Q7MRU		4.394	-0.142	-0.93	4.490	-0.065	-0.48
8VTZKT	X	4.656	0.120	0.79	4.298	-0.257	-1.90
8ZNUKF		4.650	0.114	0.75	4.512	-0.043	-0.32
92G376		4.738	0.202	1.33	4.764	0.209	1.54
A99Z7C		4.388	-0.148	-0.97	4.588	0.033	0.24
AKL3RA		4.580	0.044	0.29	4.536	-0.019	-0.14
APXZ6N		4.598	0.062	0.41	4.618	0.063	0.46
AWH2L2	X	3.994	-0.542	-3.56	4.072	-0.483	-3.58
B3X9EQ		4.446	-0.090	-0.59	4.492	-0.063	-0.47
C8RP4P		4.644	0.108	0.71	4.618	0.063	0.46
CEAV3G	X	3.708	-0.828	-5.43	3.718	-0.837	-6.19
CTQT8H		4.788	0.252	1.65	4.760	0.205	1.51
CYWM4Y		4.498	-0.038	-0.25	4.484	-0.071	-0.53
DJZHGM	*	4.164	-0.372	-2.44	4.400	-0.155	-1.15
ELK2RJ		4.578	0.042	0.28	4.688	0.133	0.98
EVPYLE		4.340	-0.196	-1.29	4.326	-0.229	-1.70
EXXYWM		4.526	-0.010	-0.06	4.572	0.017	0.12
FJB9CB		4.302	-0.234	-1.53	4.488	-0.067	-0.50
GAK8BR		4.424	-0.112	-0.73	4.426	-0.129	-0.96
GF66ZF		4.408	-0.128	-0.84	4.458	-0.097	-0.72
GRKWPA		4.640	0.104	0.68	4.580	0.025	0.18
HHNL TJ	X	3.244	-1.292	-8.48	3.234	-1.321	-9.77
L6CBTM		4.624	0.088	0.58	4.531	-0.024	-0.18
LZK2PF		4.580	0.044	0.29	4.500	-0.055	-0.41
MTBAUN		4.300	-0.236	-1.55	4.370	-0.185	-1.37
PYEWHL		4.478	-0.058	-0.38	4.432	-0.123	-0.91



Plastics Interlaboratory Testing Program

Analysis 706

Report #131

3rd Qtr 2024

Percent Elongation at Yield - Percent

WebCode	Data Flag	Sample F03			Sample F04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
PYUBPJ		4.370	-0.166	-1.09	4.494	-0.061	-0.45
QY864X		4.588	0.052	0.34	4.626	0.071	0.52
R9BHYR		4.580	0.044	0.29	4.660	0.105	0.77
RCNHUX		4.232	-0.304	-1.99	4.404	-0.151	-1.12
RD7CWT		4.848	0.312	2.05	4.754	0.199	1.47
RLFQM2		4.546	0.010	0.07	4.534	-0.021	-0.16
T9MQ8J		4.698	0.162	1.06	4.536	-0.019	-0.14
TTTB2X	*	4.516	-0.020	-0.13	4.286	-0.269	-1.99
TUNU3Y		4.396	-0.140	-0.92	4.632	0.077	0.57
VBPFG6		4.628	0.092	0.60	4.534	-0.021	-0.16
VH6YZ6		4.558	0.022	0.15	4.568	0.013	0.09
W9FTG7		4.398	-0.138	-0.90	4.444	-0.111	-0.82
WJ3KDW	*	4.824	0.288	1.89	4.944	0.389	2.88
XNJJX2		4.650	0.114	0.75	4.680	0.125	0.92
XWXJEX		4.516	-0.020	-0.13	4.440	-0.115	-0.85
XXCNCW		4.722	0.186	1.22	4.734	0.179	1.32
XXT2FY		4.578	0.042	0.28	4.718	0.163	1.20
Y9R72K		4.614	0.078	0.51	4.611	0.056	0.41
YHRWF2		4.540	0.004	0.03	4.536	-0.019	-0.14
YWDCJZ		4.560	0.024	0.16	4.592	0.037	0.27
ZDJQN2		4.484	-0.052	-0.34	4.456	-0.099	-0.73

Summary Statistics

Sample F03

Sample F04

Grand Means

4.5358 Percent

4.5553 Percent

Stnd Dev Btwn Labs

0.1524 Percent

0.1352 Percent

Statistics based on 52 of 56 reporting participants

Sample F03: ABS/PC & Sample F04: ABS/PC

Comments on Assigned Data Flags for Test #706

AWH2L2 (X) - Data for both samples are low. Possible Systematic Error. Inconsistent within the determinations of sample F03.

CEAV3G (X) - Data for both samples are low. Possible Systematic Error. Inconsistent within the determinations of sample F03.

8VTZKT (X) - Inconsistent in testing between samples.

HHNL TJ (X) - Data for both samples are low. Possible Systematic Error.



Plastics Interlaboratory Testing Program

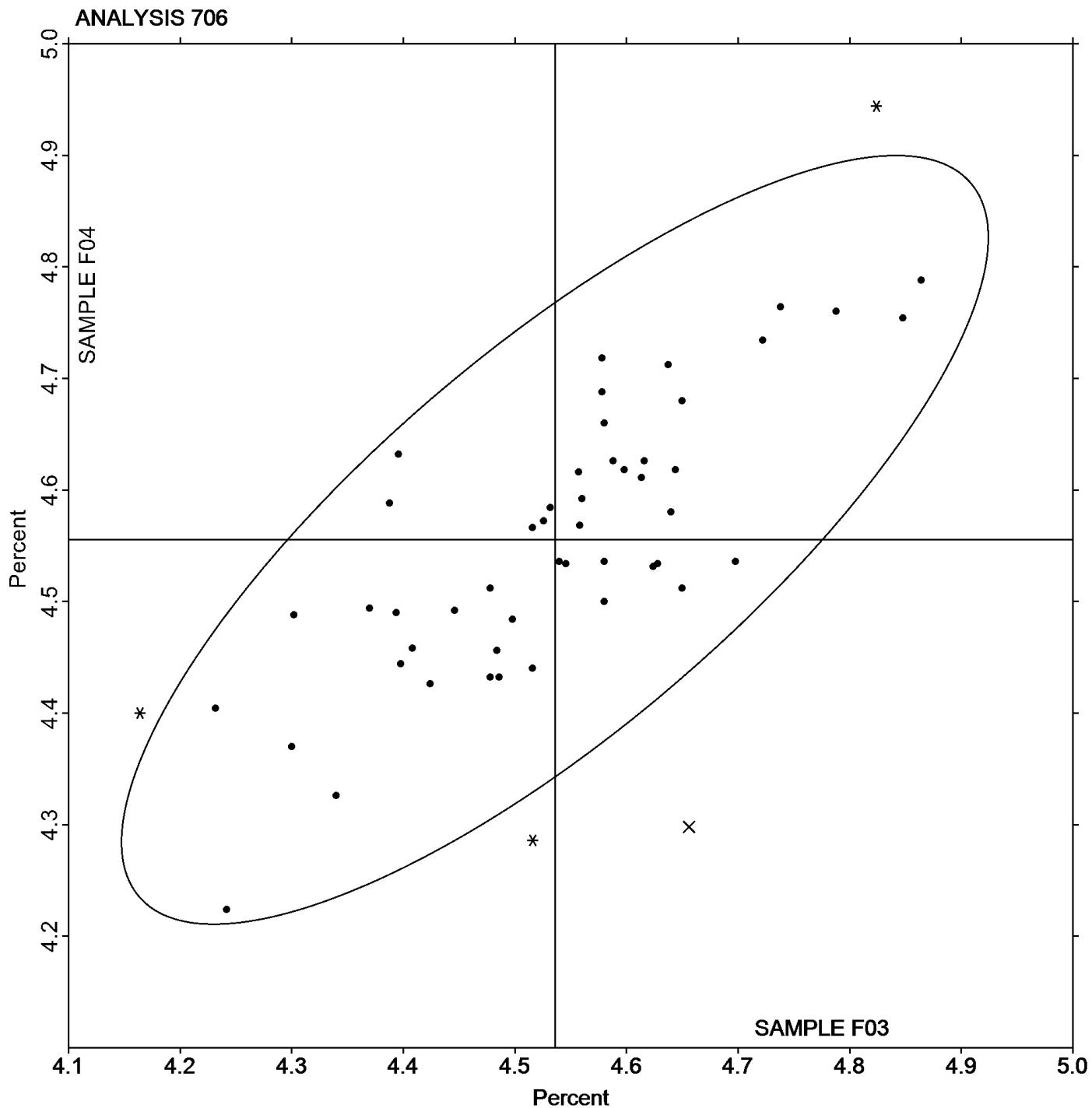
Analysis 706

Report #131

3rd Qtr 2024

Percent Elongation at Yield - Percent

Grand Mean Sample F03: 4.5358 Percent Grand Mean Sample F04: 4.5553 Percent





Plastics Interlaboratory Testing Program

Analysis 708

Report #131

3rd Qtr 2024

Modulus of Elasticity - ksi

WebCode	Data Flag	Sample F03			Sample F04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
2MX8P7		340.86	16.80	1.19	335.28	10.29	0.74
2NTPR9		330.00	5.94	0.42	323.81	-1.18	-0.08
3844KM		313.44	-10.62	-0.75	313.74	-11.25	-0.80
38MQGJ		331.96	7.90	0.56	328.72	3.73	0.27
3ZY3JT		311.14	-12.92	-0.92	313.50	-11.49	-0.82
47PTPN	X	375.00	50.94	3.62	329.72	4.73	0.34
4HXHHX		330.84	6.78	0.48	327.92	2.93	0.21
4TYVNQ		338.68	14.63	1.04	344.22	19.23	1.37
4XT3YL		313.51	-10.55	-0.75	314.67	-10.32	-0.74
6Q7MRU		318.04	-6.02	-0.43	319.76	-5.23	-0.37
8A9CWM	X	349.72	25.66	1.82	326.01	1.02	0.07
8VTZKT		309.45	-14.61	-1.04	300.03	-24.96	-1.78
8ZNUKF		315.57	-8.49	-0.60	319.95	-5.04	-0.36
92G376		333.60	9.54	0.68	327.20	2.21	0.16
A99Z7C	X	369.20	45.14	3.21	354.40	29.41	2.10
AKL3RA	X	451.84	127.78	9.08	453.46	128.47	9.18
APXZ6N		325.42	1.36	0.10	326.36	1.37	0.10
AWH2L2	*	322.58	-1.48	-0.11	338.27	13.28	0.95
B3X9EQ		334.95	10.89	0.77	332.40	7.41	0.53
C8RP4P		296.60	-27.46	-1.95	298.48	-26.51	-1.89
CEAV3G		350.18	26.12	1.86	343.42	18.43	1.32
CTQT8H		330.58	6.52	0.46	326.96	1.97	0.14
CYWM4Y		331.66	7.60	0.54	329.94	4.95	0.35
DJZHGM		338.52	14.46	1.03	337.00	12.01	0.86
EVPYLE		334.11	10.05	0.71	332.78	7.79	0.56
EXXYWM		321.40	-2.66	-0.19	328.80	3.81	0.27
FJB9CB		300.80	-23.26	-1.65	301.20	-23.79	-1.70
GAK8BR		328.95	4.89	0.35	323.44	-1.55	-0.11
GF66ZF		332.66	8.60	0.61	329.12	4.13	0.30
GRKWPA		319.84	-4.22	-0.30	320.80	-4.19	-0.30
HHNL TJ		331.82	7.76	0.55	333.28	8.29	0.59
L6CBTM		335.08	11.02	0.78	336.08	11.09	0.79
LZK2PF		310.38	-13.67	-0.97	310.09	-14.90	-1.06
MTBAUN		329.40	5.34	0.38	337.90	12.91	0.92
PYEW H9	X	254.98	-69.08	-4.91	262.58	-62.41	-4.46



Plastics Interlaboratory Testing Program

Analysis 708

Report #131

3rd Qtr 2024

Modulus of Elasticity - ksi

WebCode	Data Flag	Sample F03			Sample F04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
PYUBPJ		332.84	8.78	0.62	340.02	15.03	1.07
QY864X		296.12	-27.94	-1.99	300.86	-24.13	-1.72
R9BHYR		322.45	-1.61	-0.11	319.35	-5.64	-0.40
RCNHUX		302.30	-21.76	-1.55	299.06	-25.93	-1.85
RD7CWT	X	248.60	-75.46	-5.36	252.80	-72.19	-5.16
RLFQM2		344.94	20.88	1.48	338.58	13.59	0.97
T9MQ8J	X	285.88	-38.18	-2.71	316.28	-8.71	-0.62
TTTB2X		335.90	11.84	0.84	342.66	17.67	1.26
TUNU3Y	X	286.20	-37.86	-2.69	273.20	-51.79	-3.70
UJ2BZE	X	887.14	563.09	40.03	1,236.27	911.28	65.11
VBPFG6		328.24	4.18	0.30	333.32	8.33	0.60
VH6YZ6		309.90	-14.15	-1.01	309.71	-15.28	-1.09
W9FTG7		334.76	10.70	0.76	339.26	14.27	1.02
WJ3KDW	*	289.60	-34.46	-2.45	299.94	-25.05	-1.79
XNJJX2		329.36	5.30	0.38	337.78	12.79	0.91
XWXJEX		338.09	14.03	1.00	339.77	14.78	1.06
XXT2FY		309.04	-15.02	-1.07	309.02	-15.97	-1.14
Y9R72K		312.65	-11.41	-0.81	311.90	-13.09	-0.94
YHRWF2		318.98	-5.08	-0.36	328.24	3.25	0.23
YWDCJZ		316.39	-7.67	-0.55	317.69	-7.30	-0.52
ZDJQN2		347.11	23.05	1.64	352.27	27.28	1.95

Summary Statistics

Sample F03

Sample F04

Grand Means

324.057 ksi

324.991 ksi

Stnd Dev Btwn Labs

14.065 ksi

13.997 ksi

Statistics based on 47 of 56 reporting participants

Sample F03: ABS/PC & Sample F04: ABS/PC



Plastics Interlaboratory Testing Program
Analysis 708
Modulus of Elasticity - ksi

Report #131
3rd Qtr 2024

Comments on Assigned Data Flags for Test #708

T9MQ8J (X) - Data for sample F03 are low. Inconsistent within the determinations of sample F04.

47PTPN (X) - Data for sample F03 are high.

8A9CWM (X) - Inconsistent in testing between samples. Inconsistent within the determinations of both samples.

PYEWHT9 (X) - Data for both samples are low. Possible Systematic Error. Inconsistent within the determinations of both samples.

AKL3RA (X) - Data for both samples are high.

RD7CWT (X) - Data for both samples are low. Possible Systematic Error.

A99Z7C (X) - Data for sample F03 are high. Inconsistent within the determinations of both samples.

TUNU3Y (X) - Data for sample F04 are low.

UJ2BZE (X) - Extreme data.



Plastics Interlaboratory Testing Program

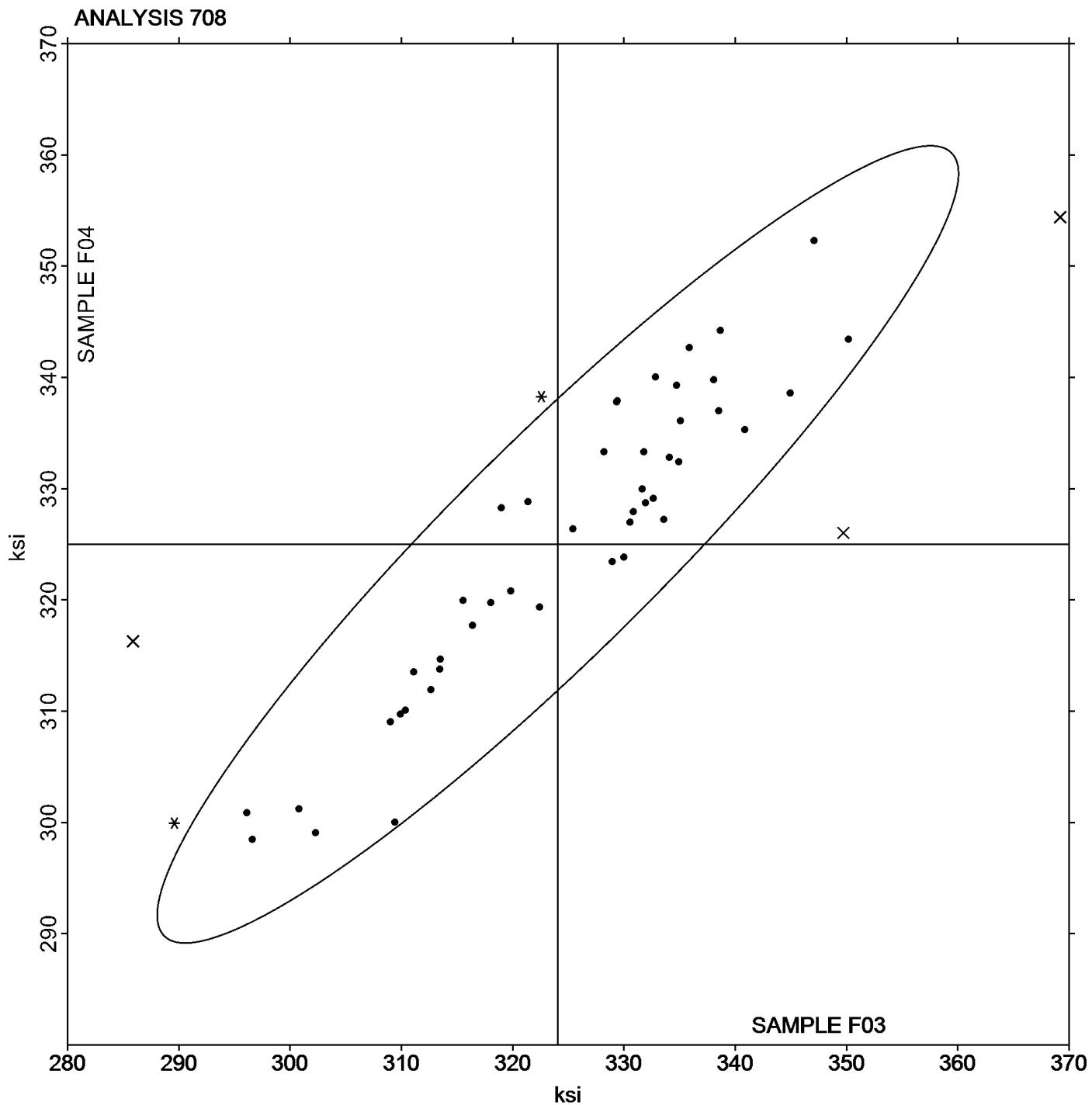
Analysis 708

Modulus of Elasticity - ksi

Report #131

3rd Qtr 2024

Grand Mean Sample F03: 324.06 ksi Grand Mean Sample F04: 324.99 ksi





Plastics Interlaboratory Testing Program

Analysis 710

Report #131

3rd Qtr 2024

Deflection Temp. Under Flexural Load (1.82 MPa) - Degrees C

WebCode	Data Flag	Sample E03			Sample E04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
24746Y		81.90	0.03	0.03	81.80	-0.03	-0.03	CF
47PTPN		83.17	1.30	1.27	83.03	1.20	1.26	ZW
4HXHHX		83.13	1.26	1.23	83.18	1.35	1.42	CE
6Q7MRU		81.95	0.08	0.08	82.08	0.25	0.26	IN
6ZUF4Q		81.58	-0.29	-0.29	81.70	-0.13	-0.13	TO
8EMYML		81.83	-0.04	-0.04	82.13	0.30	0.31	TO
92XABL		81.80	-0.07	-0.07	81.88	0.05	0.05	TO
CYWM4Y		82.78	0.91	0.89	83.05	1.22	1.29	IN
DJZHGM		81.58	-0.29	-0.29	81.18	-0.65	-0.69	TO
ELK2RJ		79.85	-2.02	-1.98	79.70	-2.13	-2.24	CE
EVPYLE		80.18	-1.69	-1.66	80.20	-1.63	-1.71	TO
FU9CEK		79.68	-2.19	-2.15	80.03	-1.80	-1.90	XA
GF66ZF		82.82	0.95	0.93	82.66	0.83	0.87	DN
H8RDAG		82.35	0.48	0.47	82.18	0.35	0.37	IN
KL3UFA		80.95	-0.92	-0.90	81.53	-0.30	-0.32	IN
KLLXMB		81.63	-0.24	-0.24	81.48	-0.35	-0.37	TO
LZK2PF		81.53	-0.34	-0.34	82.08	0.25	0.26	IN
R9BHYR		81.78	-0.09	-0.09	82.05	0.22	0.24	CF
RD7CWT		84.15	2.28	2.23	83.80	1.97	2.08	AT
RGL4L2		81.93	0.06	0.06	81.90	0.07	0.08	CE
RLFQM2		80.60	-1.27	-1.24	80.70	-1.13	-1.19	TO
TUNU3Y	*	82.64	0.77	0.75	81.63	-0.19	-0.21	TO
VBPFG6		82.63	0.76	0.74	82.53	0.70	0.74	IN
VH6YZ6		81.93	0.06	0.06	81.55	-0.28	-0.29	TY
W9FTG7		82.63	0.76	0.74	82.60	0.77	0.81	IN
XWXJEX		81.41	-0.46	-0.45	80.84	-0.99	-1.04	TO
XXT2FY		80.75	-1.12	-1.10	81.08	-0.75	-0.79	CE
YWDCJZ		82.40	0.53	0.52	82.00	0.17	0.18	TY
ZDJQN2		82.70	0.83	0.81	82.48	0.65	0.68	IN



Plastics Interlaboratory Testing Program

Analysis 710

Report #131

3rd Qtr 2024

Deflection Temp. Under Flexural Load (1.82 MPa) - Degrees C

Summary Statistics

Sample E03

Sample E04

Grand Means

81.868 Degrees C

81.827 Degrees C

Stnd Dev Btwn Labs

1.021 Degrees C

0.950 Degrees C

Statistics based on 29 of 29 reporting participants

Sample E03: ABS & Sample E04: ABS

Key to Instrument Codes Reported by Participants

AT Atlas

CE Ceast

CF Coesfeld

DN DYNISCO

IN Instron

TO Tinius Olsen

TY Toyoseiki

XA Special In-House Instrument

ZW Zwick



Plastics Interlaboratory Testing Program

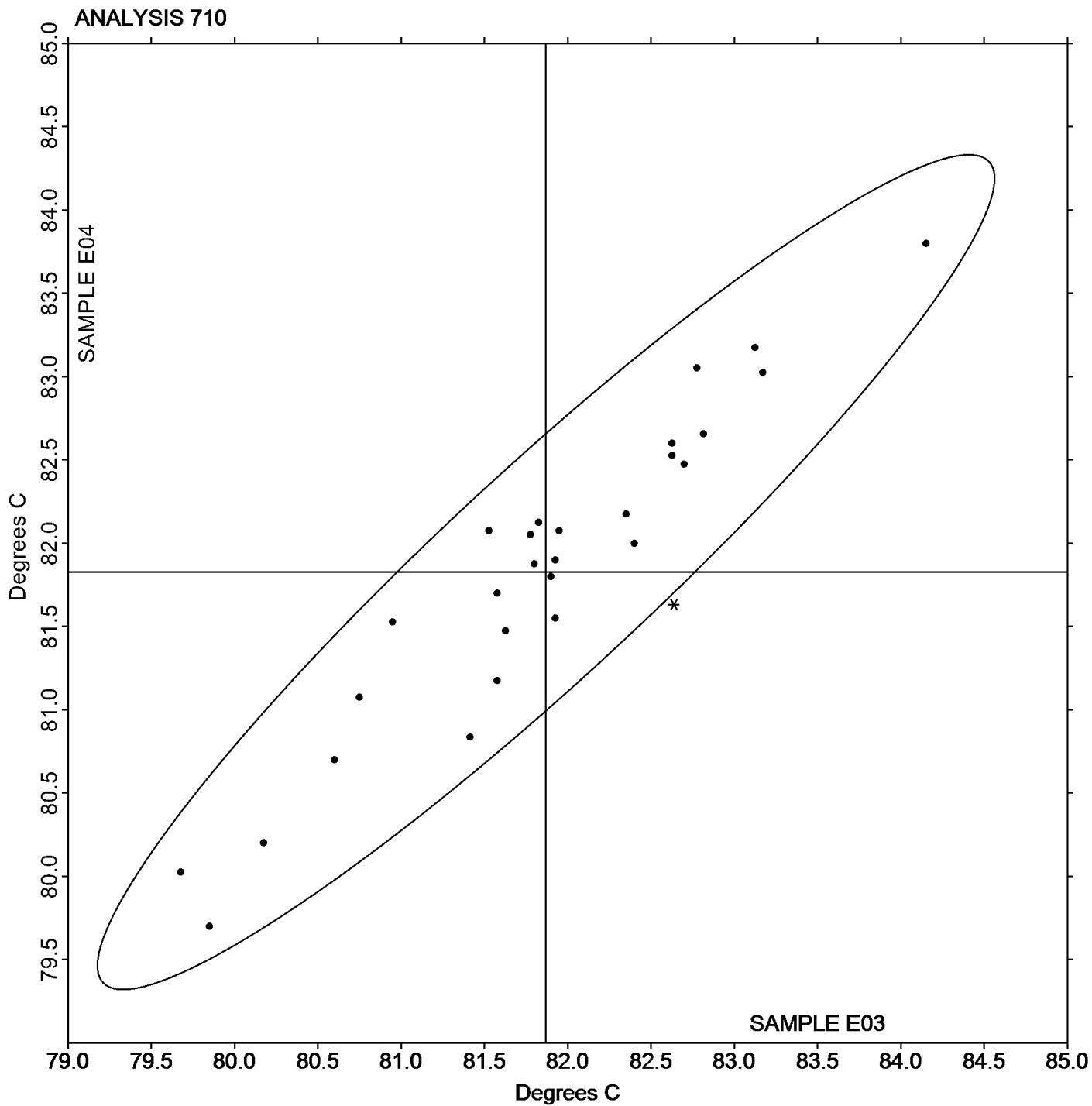
Analysis 710

Report #131

3rd Qtr 2024

Deflection Temp. Under Flexural Load (1.82 MPa) - Degrees C

Grand Mean Sample E03: 81.868 Degrees C Grand Mean Sample E04: 81.827 Degrees C





Plastics Interlaboratory Testing Program

Analysis 711

Report #131

3rd Qtr 2024

Deflection Temp. Under Flexural Load (0.455 MPa) - Degrees C

WebCode	Data Flag	Sample G03			Sample G04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
24746Y		96.7	3.9	1.54	96.7	3.4	1.30	CE
47PTPN		95.3	2.5	1.01	94.0	0.7	0.26	ZW
8EMYML		97.2	4.4	1.74	96.7	3.4	1.33	TO
8Z7ULK		90.2	-2.6	-1.04	90.4	-2.9	-1.12	XX
ADMFXP		92.8	0.0	-0.02	91.3	-2.0	-0.78	XX
DJZHGM		90.5	-2.3	-0.92	88.8	-4.5	-1.75	TO
KLLXMB		90.1	-2.7	-1.08	95.3	2.0	0.79	XX
PGAMD3		91.8	-1.0	-0.40	92.0	-1.3	-0.52	IN
PYEWH9		94.1	1.3	0.51	94.5	1.2	0.47	IN
VBPFG6		90.2	-2.6	-1.05	92.4	-0.9	-0.36	IN
XXT2FY		92.0	-0.8	-0.34	92.3	-1.0	-0.39	CE
ZDJQN2		94.5	1.7	0.66	96.8	3.5	1.34	IN
ZU3GMZ		91.3	-1.5	-0.61	91.8	-1.5	-0.59	TO

Summary Statistics

Sample G03

Sample G04

Grand Means

92.79 Degrees C

93.28 Degrees C

Stnd Dev Btwn Labs

2.51 Degrees C

2.58 Degrees C

Statistics based on 13 of 13 reporting participants

Sample G03: PP & Sample G04: PP

Key to Instrument Codes Reported by Participants

CE Ceast

IN Instron

TO Tinius Olsen

XX Instrument manufacturer not specified by lab

ZW Zwick



Plastics Interlaboratory Testing Program

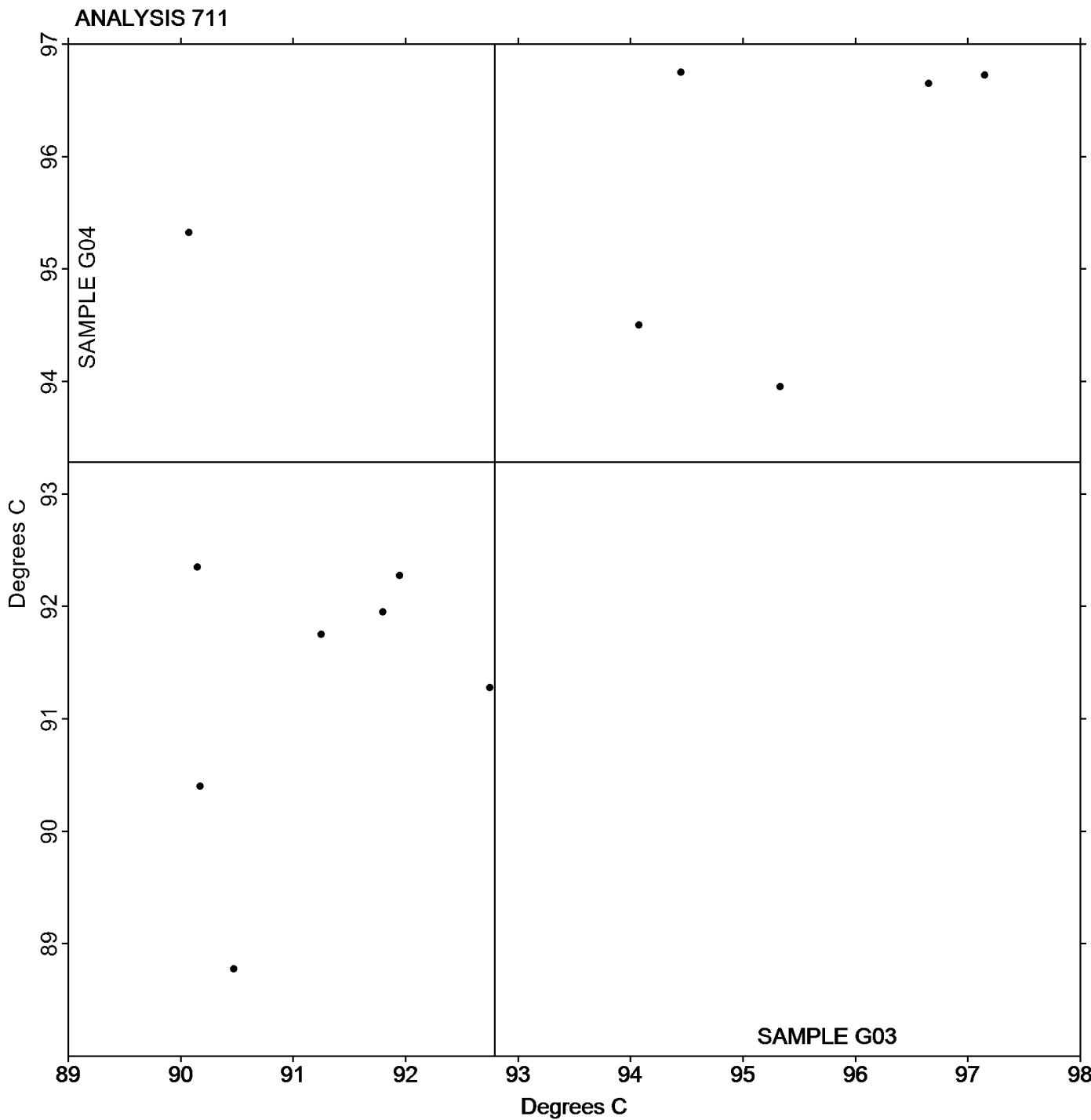
Analysis 711

Report #131

3rd Qtr 2024

Deflection Temp. Under Flexural Load (0.455 MPa) - Degrees C

Grand Mean Sample G03: 92.791 Degrees C Grand Mean Sample G04: 93.283 Degrees C



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 712

Report #131

3rd Qtr 2024

Temp. of Deflection Under Flexural Load (1.80 MPa) - Degrees C

WebCode	Data Flag	Sample N03			Sample N04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
24746Y		78.07	0.25	0.26	78.00	0.17	0.19	CF
3B7VWU		78.14	0.32	0.34	78.08	0.24	0.27	ZW
3MDQ8J		79.05	1.23	1.30	79.03	1.19	1.34	CE
3ZY3JT	*	76.53	-1.29	-1.36	76.98	-0.86	-0.96	CE
4HXHHX		78.21	0.39	0.42	78.53	0.69	0.78	CE
62PY6R		77.15	-0.67	-0.70	77.03	-0.81	-0.91	IN
6BB8L9		78.03	0.21	0.22	78.20	0.37	0.41	IN
6HYMHT		76.43	-1.39	-1.46	76.63	-1.21	-1.36	CE
6Q7MRU		77.33	-0.49	-0.52	77.50	-0.33	-0.37	IN
7HQA7F		78.40	0.58	0.62	78.53	0.69	0.78	XX
8Z7ULK	X	81.20	3.38	3.56	81.33	3.49	3.92	XX
97T483		78.05	0.23	0.25	77.93	0.09	0.10	IN
9UGKQT		78.03	0.21	0.22	78.03	0.19	0.21	CF
ADMFXP		78.88	1.06	1.12	78.63	0.79	0.89	XX
AHZN4Z		78.27	0.45	0.47	78.23	0.40	0.45	IN
AMVAU3		77.13	-0.69	-0.73	77.18	-0.66	-0.74	IN
CP67BN		78.15	0.33	0.35	78.13	0.29	0.33	IN
CYWM4Y		78.18	0.36	0.38	78.23	0.39	0.44	IN
DTMQVJ		77.73	-0.09	-0.10	77.55	-0.28	-0.32	CE
EKR2XE		77.45	-0.37	-0.38	77.43	-0.41	-0.46	CE
ELK2RJ		75.45	-2.37	-2.49	75.55	-2.28	-2.56	CE
F4YQNH		78.48	0.66	0.69	78.10	0.27	0.30	TO
G9PNAQ		79.50	1.68	1.77	79.50	1.67	1.87	XX
HNJ4FC	X	72.40	-5.42	-5.70	72.43	-5.41	-6.07	ZW
KD9TT6		76.25	-1.57	-1.65	76.35	-1.48	-1.67	TO
LZK2PF		78.25	0.43	0.46	78.25	0.42	0.47	IN
QT6YNV		79.55	1.73	1.83	79.25	1.42	1.59	CE
RD7CWT		79.33	1.51	1.59	79.35	1.52	1.70	AT
RFUZ27		76.75	-1.07	-1.12	76.78	-1.06	-1.19	TO
RN8RQ4		77.85	0.03	0.04	77.78	-0.06	-0.07	CE
RR3N8H		77.60	-0.22	-0.23	77.80	-0.03	-0.04	XX
TMNAZ4		78.70	0.88	0.93	78.73	0.89	1.00	CE
TUNU3Y	X	77.28	-0.53	-0.56	77.91	0.07	0.08	TO
V87EJX		76.71	-1.11	-1.17	76.77	-1.07	-1.20	TO
VBPGF6		77.95	0.13	0.14	77.90	0.07	0.07	IN



Plastics Interlaboratory Testing Program

Analysis 712

Report #131

3rd Qtr 2024

Temp. of Deflection Under Flexural Load (1.80 MPa) - Degrees C

WebCode	Data Flag	Sample N03			Sample N04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
VHQ9ED		78.35	0.53	0.56	78.38	0.54	0.61	XX
VH6YZ6		78.15	0.33	0.35	78.10	0.27	0.30	TY
VJZH37		76.08	-1.74	-1.83	76.10	-1.73	-1.95	TO
X8ZNKT		78.24	0.43	0.45	78.25	0.42	0.47	ZW
XXT2FY		76.58	-1.24	-1.31	76.80	-1.03	-1.16	CE
YWDCJZ		77.58	-0.24	-0.25	77.58	-0.26	-0.29	TY
ZDJQN2		78.33	0.51	0.54	78.45	0.62	0.69	IN

Summary Statistics	Sample N03	Sample N04
Grand Means	77.816 Degrees C	77.834 Degrees C
Stnd Dev Btwn Labs	0.950 Degrees C	0.891 Degrees C

Statistics based on 39 of 42 reporting participants

Sample N03: HIPS & Sample N04: HIPS

Comments on Assigned Data Flags for Test #712

8Z7ULK (X) - Data for both samples are high. Possible Systematic Error.

HNJ4FC (X) - Data for both samples are low. Possible Systematic Error.

TUNU3Y (X) - Inconsistent in testing between samples.

Key to Instrument Codes Reported by Participants

AT	Atlas	CE	Ceast
CF	Coesfeld	IN	Instron
TO	Tinius Olsen	TY	Toyoseiki
XX	Instrument manufacturer not specified by lab	ZW	Zwick



Plastics Interlaboratory Testing Program

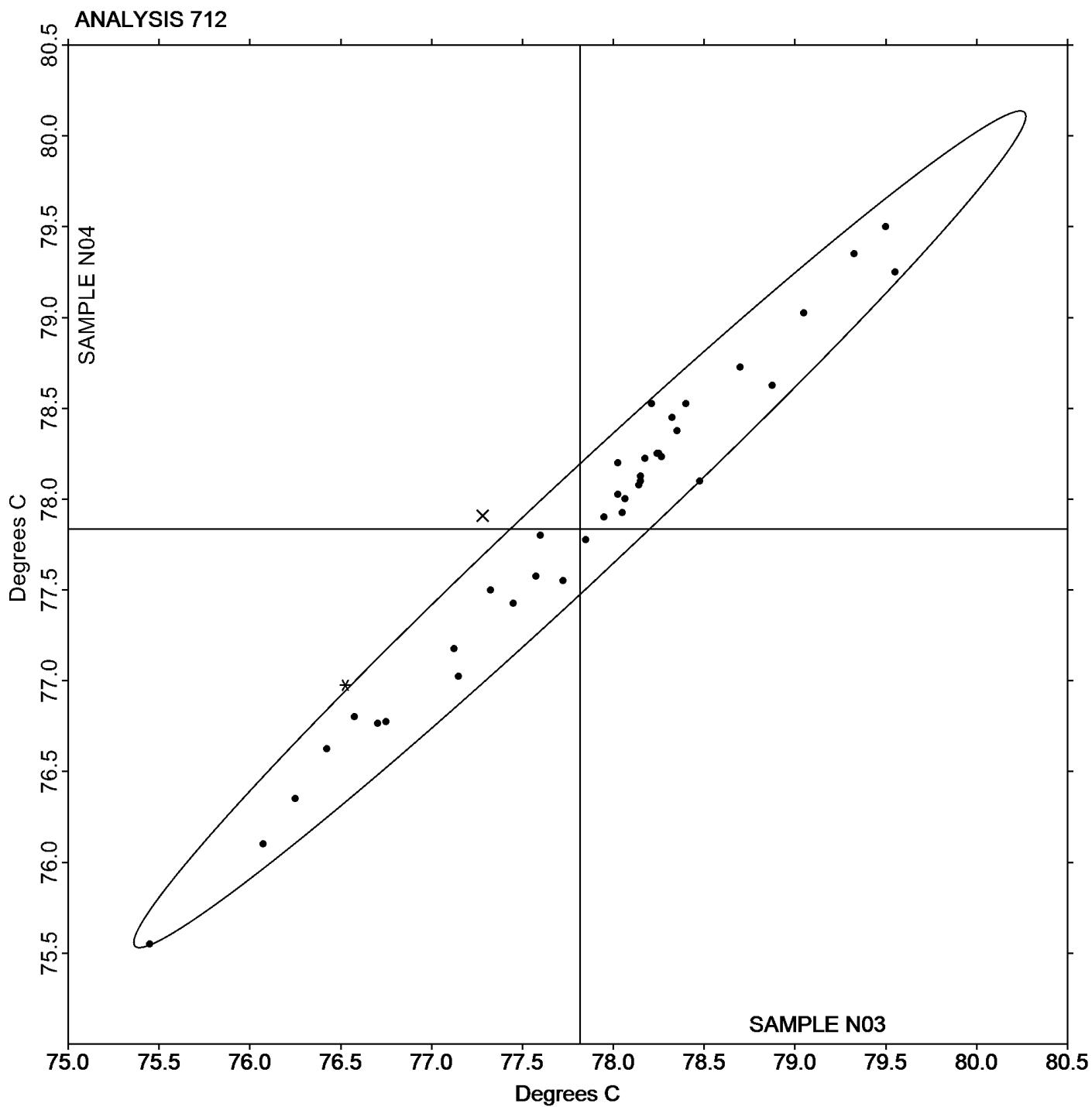
Analysis 712

Report #131

3rd Qtr 2024

Temp. of Deflection Under Flexural Load (1.80 MPa) - Degrees C

Grand Mean Sample N03: 77.816 Degrees C Grand Mean Sample N04: 77.834 Degrees C





Plastics Interlaboratory Testing Program

Analysis 715

Report #131

3rd Qtr 2024

Vicat Softening Temperature (Rate A)

WebCode	Data Flag	Sample H03			Sample H04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
24746Y		102.73	-0.06	-0.08	102.70	-0.05	-0.06	CF
47PTPN		103.55	0.76	0.95	103.34	0.59	0.70	WZ
4HXHHX		103.50	0.71	0.89	103.38	0.64	0.76	CE
7ETMXL		102.70	-0.09	-0.12	102.67	-0.08	-0.09	RO
97T483		102.72	-0.08	-0.10	102.72	-0.03	-0.04	IN
APXZ6N		102.35	-0.44	-0.56	102.35	-0.40	-0.47	CE
AV87XN		102.28	-0.51	-0.64	102.17	-0.58	-0.69	IN
B3X9EQ		103.07	0.28	0.35	103.00	0.25	0.30	WZ
C6NKYH		104.10	1.31	1.64	104.23	1.49	1.77	CE
CP67BN		103.02	0.22	0.28	102.77	0.02	0.02	IN
CYWM4Y		102.95	0.16	0.20	103.08	0.34	0.40	IN
EKR2XE		101.63	-1.16	-1.46	101.42	-1.33	-1.58	CE
ELK2RJ		100.77	-2.03	-2.55	100.58	-2.16	-2.57	CE
EVPLYE		101.67	-1.13	-1.42	101.50	-1.25	-1.48	TO
HNJ4FC		102.83	0.04	0.05	103.12	0.37	0.44	WZ
LZK2PF		102.10	-0.69	-0.87	101.95	-0.80	-0.95	AT
R9BHYR		103.70	0.91	1.14	103.63	0.89	1.05	CF
RD7CWT	X	102.02	-0.78	-0.98	102.85	0.10	0.12	TO
TLW8FA		103.12	0.32	0.41	103.08	0.34	0.40	CE
TMNAZ4		103.02	0.22	0.28	103.00	0.25	0.30	CF
TUNU3Y	X	98.10	-4.69	-5.90	106.27	3.52	4.19	TO
VBPFG6		103.28	0.49	0.62	103.33	0.59	0.70	IN
XXT2FY		102.62	-0.18	-0.22	102.63	-0.11	-0.13	CE
YWDCJZ		102.38	-0.41	-0.52	102.45	-0.30	-0.35	TY
ZDJQN2		104.17	1.37	1.73	104.07	1.32	1.57	CF

Summary Statistics	Sample H03	Sample H04
Grand Means	102.794 Degrees C	102.746 Degrees C
Stnd Dev Btwn Labs	0.795 Degrees C	0.841 Degrees C

Statistics based on 23 of 25 reporting participants

Sample H03: ABS & Sample H04: ABS



Plastics Interlaboratory Testing Program
Analysis 715
Vicat Softening Temperature (Rate A)

Report #131
3rd Qtr 2024

Comments on Assigned Data Flags for Test #715

RD7CWT (X) - Inconsistent in testing between samples. Inconsistent within the determinations of sample H04.

TUNU3Y (X) - Data for sample H03 are low and data for sample H04 are high. Inconsistent in testing between samples. Inconsistent within the determinations of sample H03.

Key to Instrument Codes Reported by Participants

AT Atlas

CF Coesfeld

RO Rosand

TY Toyoseiki

CE Ceast

IN Instron

TO Tinius Olsen

WZ Zwick



Plastics Interlaboratory Testing Program

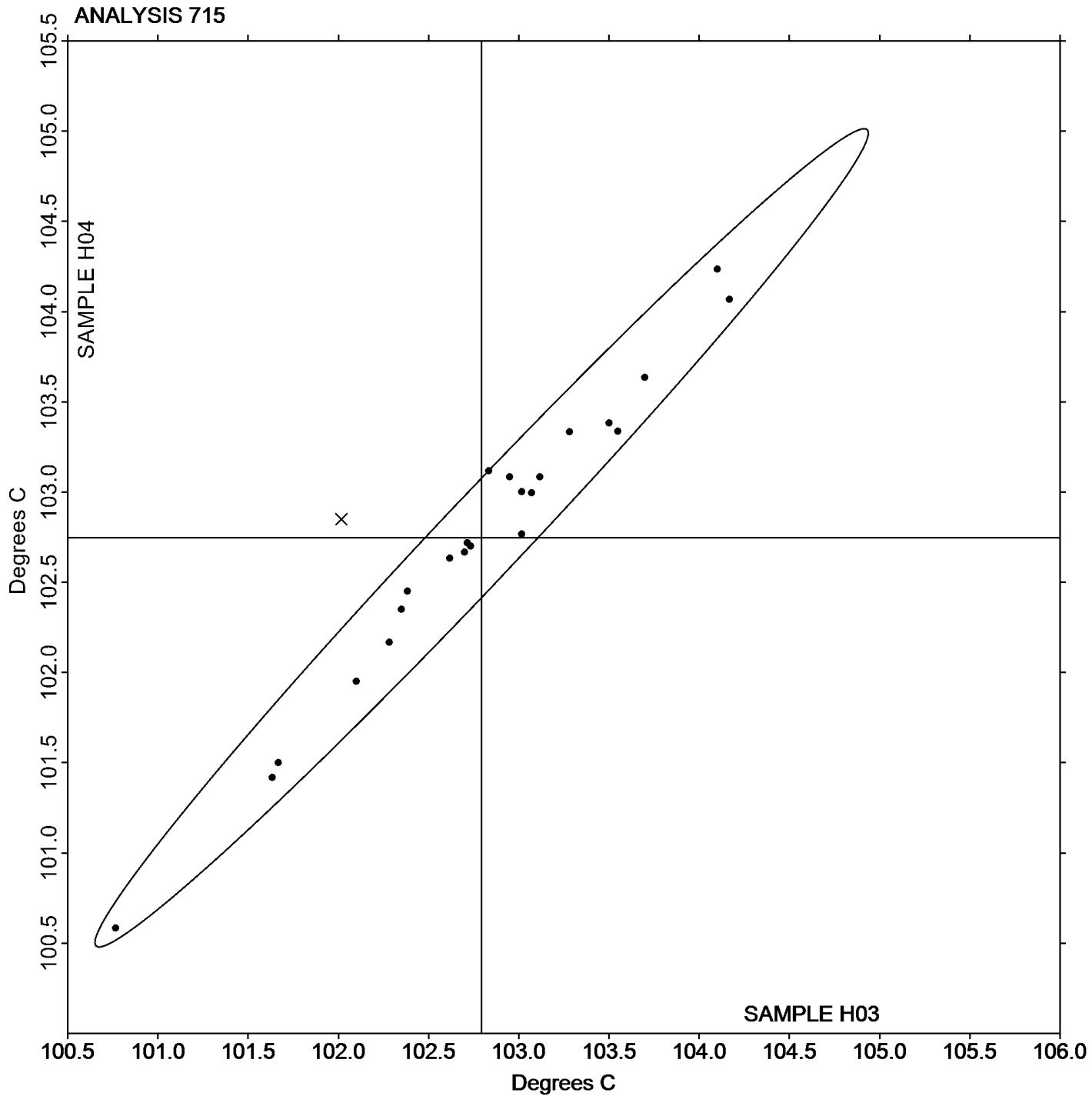
Analysis 715

Vicat Softening Temperature (Rate A)

Report #131

3rd Qtr 2024

Grand Mean Sample H03: 102.79 Degrees C Grand Mean Sample H04: 102.75 Degrees C





Plastics Interlaboratory Testing Program

Analysis 716

Report #131

3rd Qtr 2024

Vicat Softening Temperature (Rate B)

WebCode	Data Flag	Sample R03			Sample R04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
24746Y		105.17	1.34	0.52	105.07	1.26	0.50	CF
47PTPN	*	97.24	-6.58	-2.53	97.08	-6.73	-2.67	WZ
4HXHHX		105.37	1.54	0.59	105.33	1.53	0.61	CE
7ETMXL		104.08	0.26	0.10	105.03	1.23	0.49	RO
APXZ6N		103.75	-0.07	-0.03	103.97	0.16	0.07	CE
AV87XN	*	95.72	-8.11	-3.12	96.23	-7.57	-3.00	IN
B3X9EQ		104.56	0.73	0.28	104.35	0.54	0.22	DN
C6NKYH		104.13	0.31	0.12	104.10	0.30	0.12	CE
CP67BN		105.05	1.23	0.47	104.62	0.81	0.32	IN
CYWM4Y		105.15	1.33	0.51	105.12	1.31	0.52	IN
EKR2XE		102.88	-0.94	-0.36	102.75	-1.05	-0.42	CE
ELK2RJ		101.88	-1.94	-0.75	102.10	-1.70	-0.68	CE
EVPYLE		103.00	-0.82	-0.32	103.00	-0.80	-0.32	TO
HNJ4FC		104.93	1.11	0.43	104.95	1.15	0.46	WZ
LZK2PF		104.08	0.26	0.10	104.07	0.26	0.10	AT
R9BHYR		105.70	1.88	0.72	105.53	1.73	0.69	CF
RD7CWT	*	105.50	1.68	0.65	104.10	0.30	0.12	TO
TMNAZ4		104.45	0.63	0.24	104.37	0.56	0.22	CF
TUNU3Y		106.23	2.40	0.92	106.44	2.63	1.04	TO
VBPGF6		105.30	1.48	0.57	105.33	1.53	0.61	IN
YWDCJZ		104.47	0.64	0.25	104.52	0.71	0.28	TY
ZDJQN2		105.48	1.66	0.64	105.62	1.81	0.72	CF

Summary Statistics	Sample R03	Sample R04
Grand Means	103.824 Degrees C	103.803 Degrees C
Stnd Dev Btwn Labs	2.597 Degrees C	2.519 Degrees C
Statistics based on 22 of 22 reporting participants		

Sample R03: ABS & Sample R04: ABS



Plastics Interlaboratory Testing Program
Analysis 716
Vicat Softening Temperature (Rate B)

Report #131
3rd Qtr 2024

Key to Instrument Codes Reported by Participants

AT	Atlas	CE	Ceast
CF	Coesfeld	DN	DYNISCO
IN	Instron	RO	Rosand
TO	Tinius Olsen	TY	Toyoseiki
WZ	Zwick		



Plastics Interlaboratory Testing Program

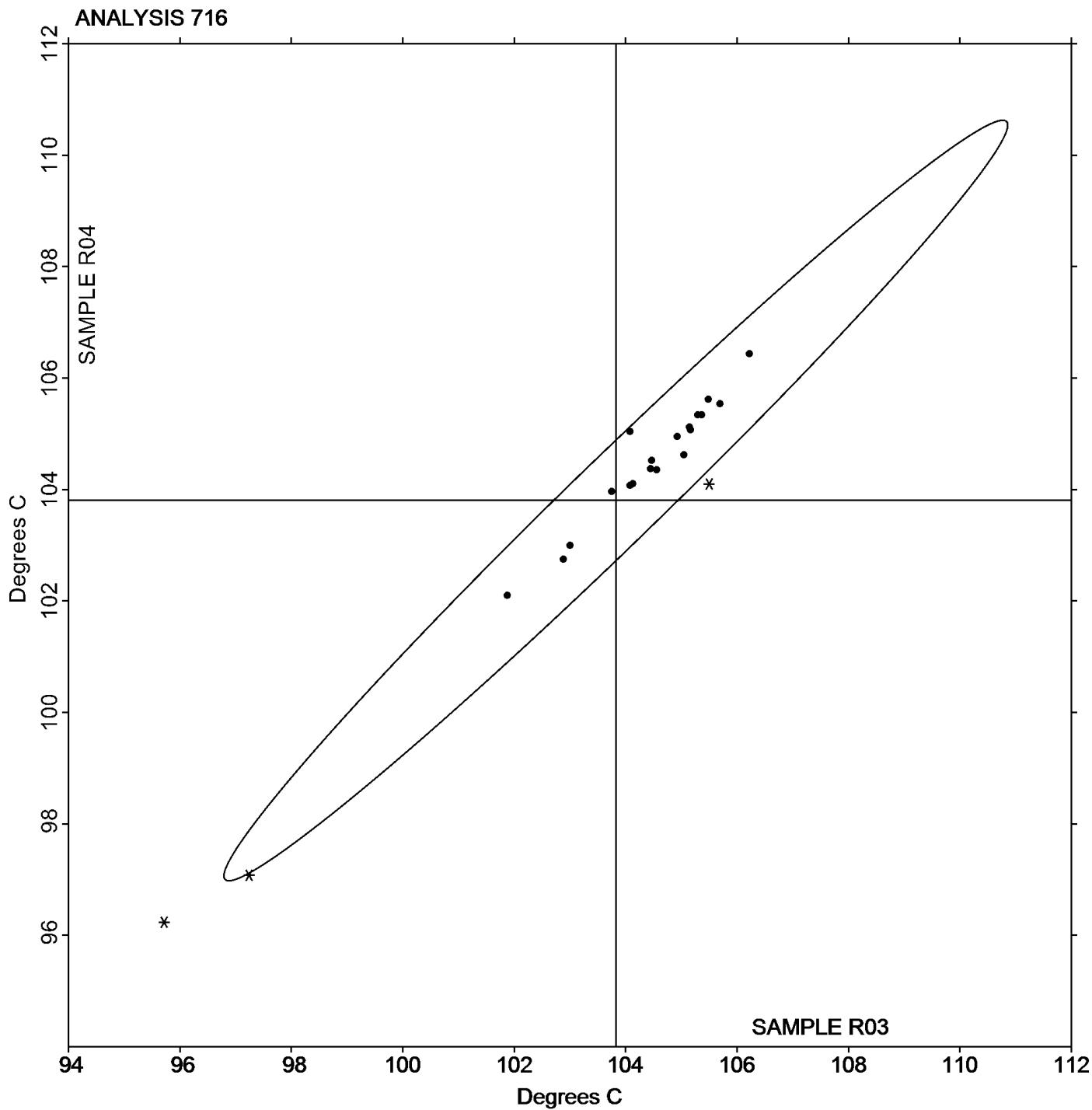
Analysis 716

Report #131

3rd Qtr 2024

Vicat Softening Temperature (Rate B)

Grand Mean Sample R03: 103.82 Degrees C Grand Mean Sample R04: 103.80 Degrees C





Plastics Interlaboratory Testing Program

Analysis 718

Specific Gravity - sp gr 23/23 C

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample T03			Sample T04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		1.04100	-0.00099	-0.39	1.04000	-0.00203	-0.83
27DGQ8		1.04400	0.00201	0.79	1.04467	0.00264	1.08
2E6WFB		1.03777	-0.00423	-1.67	1.03830	-0.00373	-1.53
2FWT3K		1.04400	0.00201	0.79	1.04400	0.00197	0.81
2PMFV2		1.03977	-0.00223	-0.88	1.03957	-0.00246	-1.01
2YRNMC		1.04100	-0.00099	-0.39	1.04057	-0.00146	-0.60
3B7VWU		1.04337	0.00137	0.54	1.04353	0.00151	0.62
3MDQ8J		1.03967	-0.00233	-0.92	1.03833	-0.00369	-1.51
3RM7G8	X	1.03833	-0.00366	-1.45	1.03433	-0.00769	-3.15
47PTPN		1.03630	-0.00569	-2.25	1.03723	-0.00479	-1.96
4HXHHX		1.04533	0.00334	1.32	1.04600	0.00397	1.63
4LDA9Q		1.04233	0.00034	0.13	1.04233	0.00031	0.13
62PY6R		1.04480	0.00281	1.11	1.04607	0.00404	1.65
6HYMHT		1.04100	-0.00099	-0.39	1.04100	-0.00103	-0.42
6Q7MRU	X	1.05000	0.00801	3.16	1.04000	-0.00203	-0.83
6ZUF4Q		1.04540	0.00341	1.35	1.04497	0.00294	1.20
7F4TR2		1.03970	-0.00229	-0.91	1.03880	-0.00323	-1.32
7XK2NW		1.03703	-0.00496	-1.96	1.03833	-0.00369	-1.51
87Q2ZH		1.04437	0.00237	0.94	1.04313	0.00111	0.45
8EMYML		1.04417	0.00217	0.86	1.04413	0.00211	0.86
8PNCRR		1.03933	-0.00266	-1.05	1.03933	-0.00269	-1.10
8ZULK		1.03733	-0.00466	-1.84	1.03833	-0.00369	-1.51
977HUC	X	1.04260	0.00061	0.24	1.03763	-0.00439	-1.80
97T483	X	1.03733	-0.00466	-1.84	1.04100	-0.00103	-0.42
9N9FYT		1.04380	0.00181	0.71	1.04377	0.00174	0.71
9TZQQH		1.04000	-0.00199	-0.79	1.04000	-0.00203	-0.83
9UGKQT		1.04417	0.00217	0.86	1.04427	0.00224	0.92
A6EYBP		1.04040	-0.00159	-0.63	1.04000	-0.00203	-0.83
AAMKYM		1.04243	0.00044	0.17	1.04281	0.00079	0.32
ADMFXP		1.04327	0.00127	0.50	1.04293	0.00091	0.37
AHZN4Z		1.03837	-0.00363	-1.43	1.03817	-0.00386	-1.58
AMVAU3		1.03903	-0.00296	-1.17	1.03963	-0.00239	-0.98
APXZ6N		1.04277	0.00077	0.31	1.04340	0.00137	0.56
AXDMET		1.04193	-0.00006	-0.02	1.04240	0.00037	0.15
B8B66L		1.04100	-0.00099	-0.39	1.04100	-0.00103	-0.42



Plastics Interlaboratory Testing Program

Analysis 718

Specific Gravity - sp gr 23/23 C

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample T03			Sample T04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
BCNRUK		1.04127	-0.00073	-0.29	1.04287	0.00084	0.34
CEAV3G		1.04310	0.00111	0.44	1.04473	0.00271	1.11
CP67BN		1.04497	0.00297	1.17	1.04500	0.00297	1.22
CTQT8H		1.04500	0.00301	1.19	1.04500	0.00297	1.22
CVUL2G		1.04123	-0.00076	-0.30	1.04130	-0.00073	-0.30
CYWM4Y	X	1.02947	-0.01253	-4.95	1.03337	-0.00866	-3.54
DJZHGM	X	1.04040	-0.00159	-0.63	1.03787	-0.00416	-1.70
DW8DRC		1.04097	-0.00103	-0.41	1.04170	-0.00033	-0.13
E2EL98		1.04087	-0.00113	-0.45	1.04170	-0.00033	-0.13
EKR2XE		1.03657	-0.00543	-2.14	1.03677	-0.00526	-2.15
ELK2RJ		1.03773	-0.00426	-1.68	1.03850	-0.00353	-1.44
EWKHMF		1.04350	0.00151	0.60	1.04403	0.00201	0.82
GF66ZF		1.04297	0.00097	0.38	1.04303	0.00101	0.41
H3DXH6		1.04307	0.00108	0.43	1.04351	0.00149	0.61
H4R8VB		1.04557	0.00357	1.41	1.04433	0.00231	0.94
HNJ4FC		1.04280	0.00081	0.32	1.04320	0.00117	0.48
HW86PU	X	1.03667	-0.00533	-2.10	1.03000	-0.01203	-4.92
JBTWVF		1.04033	-0.00166	-0.66	1.04093	-0.00109	-0.45
JMYWLE		1.04363	0.00164	0.65	1.04370	0.00167	0.68
JRA3YY	*	1.04797	0.00597	2.36	1.04667	0.00464	1.90
KD9TT6		1.04067	-0.00133	-0.52	1.04080	-0.00123	-0.50
KJG8JG		1.04300	0.00101	0.40	1.04293	0.00091	0.37
KL3UFA	X	1.04353	0.00154	0.61	1.04617	0.00414	1.69
LZK2PF		1.04410	0.00211	0.83	1.04410	0.00207	0.85
M3KGRC		1.04413	0.00214	0.85	1.04503	0.00301	1.23
MTBAUN		1.03900	-0.00299	-1.18	1.03900	-0.00303	-1.24
MX7ZZY		1.04000	-0.00199	-0.79	1.04000	-0.00203	-0.83
N9K9K7	X	1.03560	-0.00639	-2.53	1.03790	-0.00413	-1.69
NQ4BVZ		1.04467	0.00267	1.06	1.04523	0.00321	1.31
NU4MRZ		1.04437	0.00237	0.94	1.04450	0.00247	1.01
PDXH4N		1.04533	0.00334	1.32	1.04400	0.00197	0.81
QDTD9C		1.04010	-0.00189	-0.75	1.04107	-0.00096	-0.39
QGRN6C		1.04353	0.00154	0.61	1.04280	0.00077	0.32
QKAYA3	*	1.04777	0.00577	2.28	1.04610	0.00407	1.67
QT6YNV		1.03967	-0.00233	-0.92	1.03867	-0.00336	-1.38



Plastics Interlaboratory Testing Program

Analysis 718

Specific Gravity - sp gr 23/23 C

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample T03			Sample T04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
QY864X		1.04317	0.00117	0.46	1.04337	0.00134	0.55
RBHX9J		1.04157	-0.00043	-0.17	1.04150	-0.00053	-0.22
RD7CWT		1.04033	-0.00166	-0.66	1.04033	-0.00169	-0.69
RFCWH9		1.04267	0.00067	0.27	1.04167	-0.00036	-0.15
RFUZ27		1.03967	-0.00233	-0.92	1.04033	-0.00169	-0.69
RTX7AJ		1.04307	0.00107	0.42	1.04403	0.00201	0.82
TUNU3Y		1.03833	-0.00366	-1.45	1.03767	-0.00436	-1.78
U47VXY		1.04343	0.00144	0.57	1.04347	0.00144	0.59
VBPFG6		1.03850	-0.00349	-1.38	1.03867	-0.00336	-1.38
VBQ9ED		1.04323	0.00124	0.49	1.04370	0.00167	0.68
VDVU96		1.03957	-0.00243	-0.96	1.03967	-0.00236	-0.97
VJZH37		1.04317	0.00117	0.46	1.04183	-0.00019	-0.08
VYWP7Y		1.04450	0.00251	0.99	1.04457	0.00254	1.04
W9FTG7		1.04147	-0.00053	-0.21	1.04077	-0.00126	-0.52
X8ZNKT		1.04100	-0.00099	-0.39	1.03967	-0.00236	-0.97
XWXJEX	X	1.04067	-0.00133	-0.52	1.03833	-0.00369	-1.51
XXT2FY		1.04550	0.00351	1.39	1.04500	0.00297	1.22
YWDCJZ		1.04167	-0.00033	-0.13	1.04233	0.00031	0.13
ZBCDYM		1.04233	0.00034	0.13	1.04200	-0.00003	-0.01
ZDJQN2		1.04363	0.00164	0.65	1.04333	0.00131	0.53

Summary Statistics

Sample T03

Sample T04

Grand Means

1.041994 sp gr 23/23 C

1.042027 sp gr 23/23 C

Stnd Dev Btwn Labs

0.002531 sp gr 23/23 C

0.002443 sp gr 23/23 C

Statistics based on 80 of 90 reporting participants

Sample T03: ABS & Sample T04: ABS



Plastics Interlaboratory Testing Program

Analysis 718

Specific Gravity - sp gr 23/23 C

Report #131

3rd Qtr 2024

Comments on Assigned Data Flags for Test #718

- 97T483 (X) - Inconsistent in testing between samples.
- N9K9K7 (X) - Inconsistent in testing between samples. Inconsistent within the determinations of both samples.
- KL3UFA (X) - Inconsistent in testing between samples. Inconsistent within the determinations of sample T03.
- XWXJEX (X) - Inconsistent in testing between samples. Inconsistent within the determinations of both samples.
- 6Q7MRU (X) - Data for sample T03 are high. Inconsistent within the determinations of sample T03.
- DJZHGM (X) - Inconsistent in testing between samples.
- 977HUC (X) - Inconsistent in testing between samples.
- 3RM7G8 (X) - Data for sample T04 are low.
- CYWM4Y (X) - Data for both samples are low. Possible Systematic Error.
- HW86PU (X) - Data for sample T04 are low. Inconsistent within the determinations of sample T03.

Results by Methodology (as reported by laboratory)

Test Methodology	Sample T03 ABS				Sample T04 ABS				Labs Incl / Rpt
	Group Mean	Btwn Lab STD	Diff from GM	Group Mean	Btwn Lab STD	Diff from GM			
ASTM D792 Method A (water)	1.042360	0.002380	0.000	1.042370	0.002283	0.000			53/61
ASTM D792 Method B (not water)	1.040183	0.005344	-0.002	1.040292	0.004325	-0.002			4/4
ASTM D1505	1.045500	0.000000	0.004	1.045000	0.000000	0.003			1/1
ISO 1183	1.041280	0.001979	-0.001	1.041379	0.002267	-0.001			22/24



Plastics Interlaboratory Testing Program

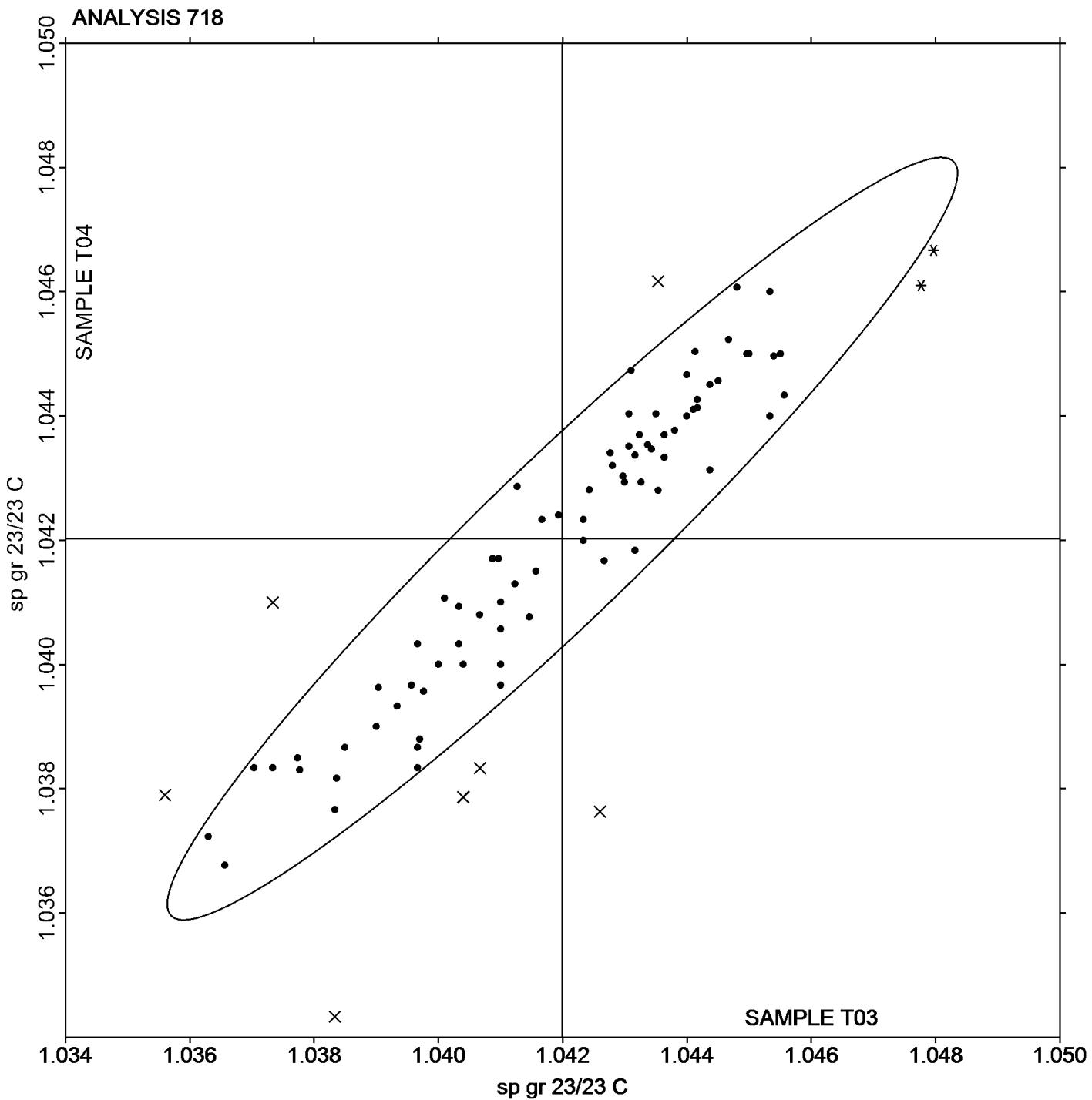
Analysis 718

Specific Gravity - sp gr 23/23 C

Report #131

3rd Qtr 2024

Grand Mean Sample T03: 1.0420 sp gr 23/23 C Grand Mean Sample T04: 1.0420 sp gr 23/23 C





Plastics Interlaboratory Testing Program

Analysis 720

Flexural Modulus- ksi

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample J03			Sample J04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
3844KM		366.6	12.6	0.72	358.4	5.2	0.32
3ZY3JT		362.1	8.1	0.46	368.6	15.4	0.95
47PTPN	X	271.8	-82.3	-4.71	280.5	-72.6	-4.47
4HXHHX		360.4	6.4	0.37	358.3	5.1	0.32
4ZFGMV		370.9	16.9	0.97	370.2	17.0	1.05
8A9CWM		364.4	10.4	0.59	359.0	5.8	0.36
8EMYML		345.7	-8.4	-0.48	347.8	-5.4	-0.33
8VUTJ2		317.3	-36.7	-2.11	317.2	-36.0	-2.22
8Z7ULK		353.9	-0.1	-0.01	351.9	-1.3	-0.08
8ZNUKF		357.9	3.8	0.22	357.1	4.0	0.24
939YTD		372.0	17.9	1.03	372.8	19.6	1.21
ADMFXP		366.9	12.9	0.74	365.5	12.3	0.76
APXZ6N		360.1	6.1	0.35	363.5	10.3	0.64
AWH2L2		354.1	0.1	0.01	352.7	-0.5	-0.03
BLDHEQ		383.8	29.7	1.70	373.7	20.5	1.26
CEAV3G		318.9	-35.1	-2.01	321.5	-31.7	-1.95
CTQT8H		343.2	-10.8	-0.62	340.2	-13.0	-0.80
CYWM4Y		347.7	-6.3	-0.36	349.5	-3.7	-0.23
DJZHGM		370.7	16.7	0.96	368.8	15.7	0.96
ELK2RJ	X	402.7	48.7	2.79	412.0	58.8	3.62
EUBJ8D		353.0	-1.1	-0.06	353.4	0.2	0.01
EVPLYLE		351.8	-2.2	-0.13	352.5	-0.7	-0.04
EXXYWM		338.8	-15.2	-0.87	344.8	-8.4	-0.52
FG7LY8		341.0	-13.0	-0.74	341.6	-11.6	-0.71
GF66ZF		362.1	8.1	0.46	360.1	6.9	0.42
GRKWPA		359.8	5.7	0.33	358.7	5.5	0.34
HHNL TJ		365.9	11.9	0.68	363.5	10.3	0.64
KL3UFA		331.9	-22.1	-1.27	333.6	-19.6	-1.21
KLLXMB	*	398.7	44.7	2.56	391.7	38.5	2.37
LZK2PF		338.6	-15.5	-0.89	338.3	-14.9	-0.92
PYUBPJ		364.9	10.9	0.62	366.7	13.5	0.83
R9BHYR		329.5	-24.5	-1.41	325.8	-27.4	-1.69
RCNHUX		361.0	6.9	0.40	359.7	6.6	0.40
RD7CWT	X	334.6	-19.4	-1.11	365.0	11.8	0.73
RGL4L2		346.1	-8.0	-0.46	341.4	-11.8	-0.72



Plastics Interlaboratory Testing Program

Analysis 720

Report #131

3rd Qtr 2024

Flexural Modulus- ksi

WebCode	Data Flag	Sample J03			Sample J04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
RLFQM2	*	398.4	44.4	2.54	389.7	36.5	2.25
T989P8		356.1	2.1	0.12	356.3	3.1	0.19
T9MQ8J	*	340.5	-13.5	-0.77	352.9	-0.3	-0.02
VBPFG6		371.9	17.8	1.02	372.5	19.3	1.19
VYWP7Y		343.6	-10.5	-0.60	344.6	-8.6	-0.53
W4KRM4		334.7	-19.3	-1.11	327.3	-25.9	-1.59
W9FTG7		348.3	-5.8	-0.33	352.7	-0.5	-0.03
WJ3KDW		356.3	2.3	0.13	355.4	2.2	0.14
XNJJX2		361.9	7.9	0.45	363.4	10.2	0.63
XWXJEX		371.5	17.5	1.00	366.5	13.3	0.82
XXT2FY		342.0	-12.0	-0.69	343.6	-9.6	-0.59
Y9R72K		337.7	-16.4	-0.94	332.3	-20.9	-1.29
YWDCJZ		328.5	-25.6	-1.46	330.8	-22.4	-1.38
ZDJQN2		345.6	-8.5	-0.48	345.4	-7.8	-0.48
ZZCMFZ		342.6	-11.4	-0.65	337.6	-15.6	-0.96

Summary Statistics

Sample J03

Sample J04

Grand Means

354.03 ksi

353.18 ksi

Stnd Dev Btwn Labs

17.45 ksi

16.23 ksi

Statistics based on 47 of 50 reporting participants

Sample J03: ABS & Sample J04: ABS

Comments on Assigned Data Flags for Test #720

47PTPN (X) - Data for both samples are low. Possible Systematic Error.

ELK2RJ (X) - Data for both samples are high. Possible Systematic Error.

RD7CWT (X) - Inconsistent in testing between samples.



Plastics Interlaboratory Testing Program

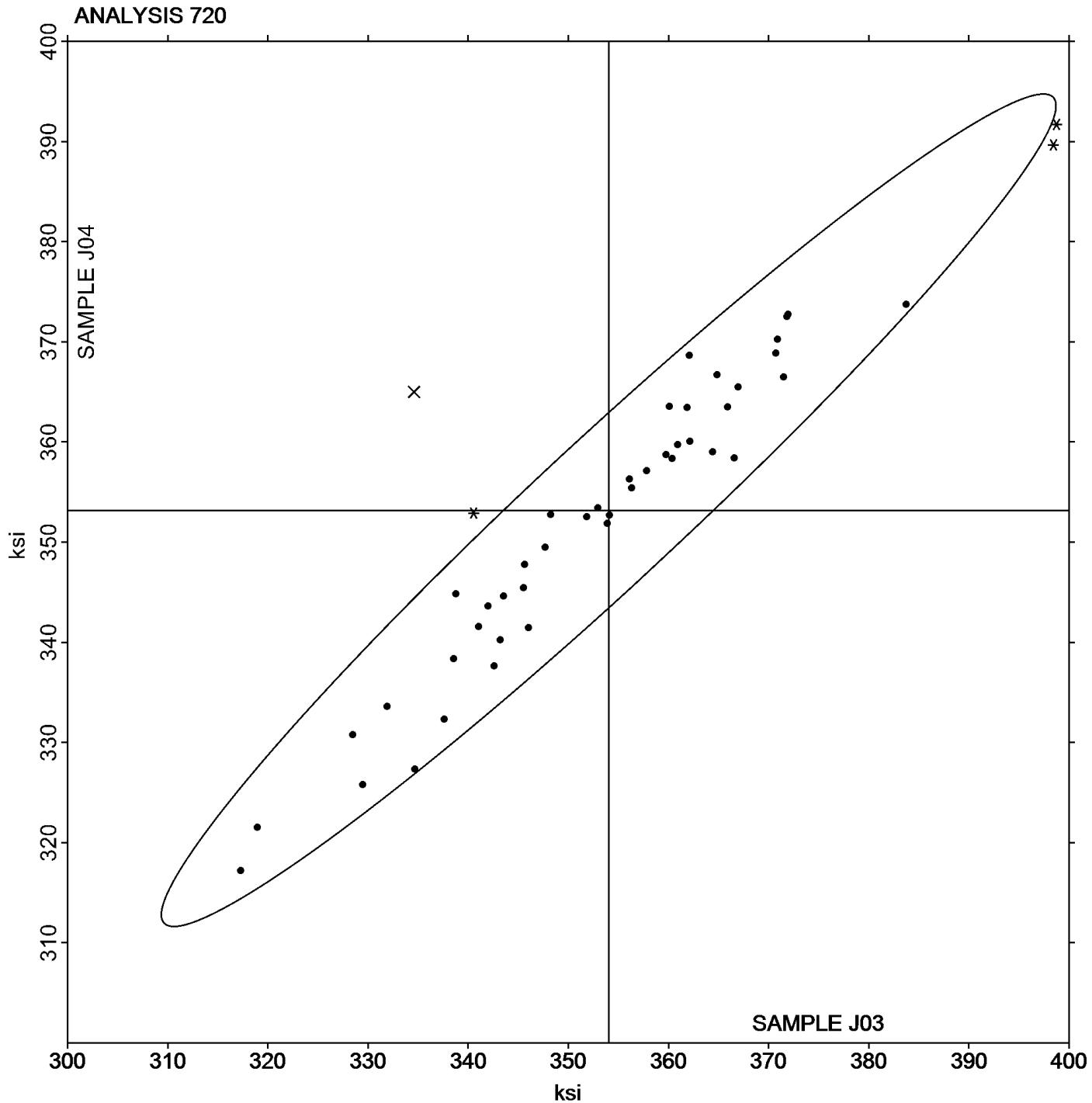
Analysis 720

Flexural Modulus- ksi

Report #131

3rd Qtr 2024

Grand Mean Sample J03: 354.03 ksi Grand Mean Sample J04: 353.18 ksi





Plastics Interlaboratory Testing Program

Analysis 721

Report #131

3rd Qtr 2024

Flexural Stress at 5% Strain - psi

WebCode	Data Flag	Sample J03			Sample J04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
3844KM	*	11,103	1,036	2.95	11,146	1,073	2.78
47PTPN		9,926	-141	-0.40	9,932	-141	-0.36
4HXHHX		10,380	313	0.89	10,362	289	0.75
4ZFGMV		10,018	-49	-0.14	10,061	-12	-0.03
8EMYML		10,095	28	0.08	10,114	42	0.11
8VUTJ2		9,381	-686	-1.95	9,372	-700	-1.81
8ZNUKF		10,360	293	0.83	10,220	147	0.38
939YTD		9,967	-100	-0.28	10,048	-25	-0.07
APXZ6N		10,252	185	0.53	10,293	220	0.57
AWH2L2		9,525	-542	-1.54	9,492	-581	-1.50
CEAV3G		9,614	-453	-1.29	9,662	-410	-1.06
CTQT8H		10,040	-27	-0.08	9,930	-143	-0.37
CYWM4Y		9,869	-198	-0.56	9,902	-171	-0.44
DJZHGM		10,131	64	0.18	10,219	147	0.38
ELK2RJ		10,669	602	1.71	10,785	713	1.85
EUBJ8D		9,580	-487	-1.39	9,574	-499	-1.29
EVPYLE		10,298	231	0.66	10,240	167	0.43
EXXYWM		10,046	-21	-0.06	10,094	21	0.05
FG7LY8		10,537	470	1.34	10,524	451	1.17
GRKWPA		9,802	-264	-0.75	9,647	-426	-1.10
HHNL TJ		10,304	237	0.67	10,244	171	0.44
KL3UFA	*	10,302	236	0.67	10,526	454	1.18
KLLXMB	X	9,963	-104	-0.30	9,033	-1,040	-2.69
LZK2PF		10,440	373	1.06	10,485	412	1.07
PYUBPJ		10,213	146	0.42	10,222	149	0.39
R9BHYR		9,863	-204	-0.58	9,796	-277	-0.72
RD7CWT	X	10,515	448	1.28	9,905	-168	-0.43
RGL4L2		10,105	38	0.11	10,065	-8	-0.02
RLFQM2	X	10,480	413	1.18	10,176	103	0.27
T989P8		10,170	104	0.29	10,249	176	0.46
T9MQ8J		9,933	-134	-0.38	9,853	-219	-0.57
VBPFG6		10,078	11	0.03	10,079	6	0.02
VYWP7Y		10,055	-11	-0.03	10,082	9	0.02
W4KRM4		9,949	-118	-0.34	10,054	-19	-0.05
W9FTG7		9,824	-242	-0.69	9,917	-155	-0.40



Plastics Interlaboratory Testing Program

Analysis 721

Report #131

3rd Qtr 2024

Flexural Stress at 5% Strain - psi

WebCode	Data Flag	Sample J03			Sample J04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
WJ3KDW		10,051	-16	-0.04	9,968	-105	-0.27
XNJJX2		10,535	469	1.33	10,656	583	1.51
XWXJEX		10,021	-45	-0.13	10,105	32	0.08
Y9R72K		9,861	-206	-0.59	9,750	-323	-0.84
YWDCJZ		9,845	-221	-0.63	9,805	-268	-0.69
ZDJQN2		10,207	140	0.40	10,256	183	0.47
ZZCMFZ		9,254	-813	-2.31	9,109	-963	-2.50

Summary Statistics

Sample J03

Sample J04

Grand Means

10,066.7 psi

10,072.8 psi

Stnd Dev Btwn Labs

351.4 psi

386.0 psi

Statistics based on 39 of 42 reporting participants

Sample J03: ABS & Sample J04: ABS

Comments on Assigned Data Flags for Test #721

RLFQM2 (X) - Inconsistent in testing between samples.

KLLXMB (X) - Data for sample J04 are low. Inconsistent within the determinations of both samples.

RD7CWT (X) - Inconsistent in testing between samples.



Plastics Interlaboratory Testing Program

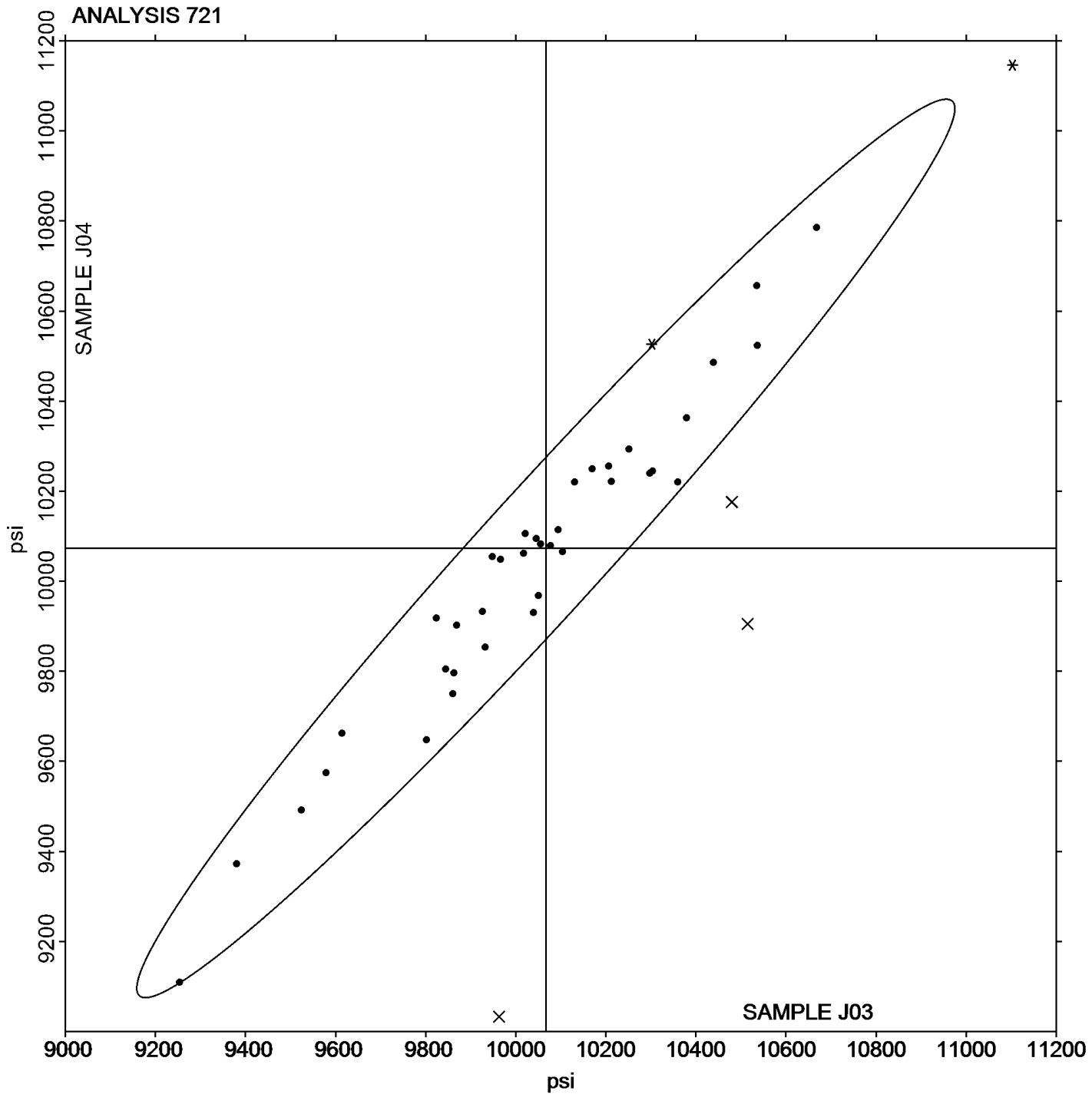
Analysis 721

Report #131

3rd Qtr 2024

Flexural Stress at 5% Strain - psi

Grand Mean Sample J03: 10,066.68 psi Grand Mean Sample J04: 10,072.83 psi





Plastics Interlaboratory Testing Program

Analysis 722

Report #131

3rd Qtr 2024

Flexural Stress at Yield - psi

WebCode	Data Flag	Sample J03			Sample J04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
3844KM	*	11,130	1,011	2.73	11,168	1,065	2.80
3ZY3JT		9,474	-645	-1.74	9,422	-681	-1.79
47PTPN		9,946	-173	-0.47	9,958	-145	-0.38
4HXHHX		10,376	257	0.69	10,358	255	0.67
4ZFGMV		10,037	-82	-0.22	10,070	-33	-0.09
8A9CWM		10,480	361	0.98	10,420	317	0.83
8EMYML		10,166	47	0.13	10,221	119	0.31
8VUTJ2		9,390	-729	-1.97	9,387	-716	-1.88
8ZNUKF		10,358	239	0.65	10,236	134	0.35
939YTD		10,033	-85	-0.23	10,110	8	0.02
APXZ6N		10,275	156	0.42	10,301	198	0.52
AWH2L2		9,634	-485	-1.31	9,583	-520	-1.37
BLDHEQ	*	11,066	948	2.56	10,872	769	2.02
CEAV3G		9,676	-443	-1.20	9,705	-398	-1.05
CTQT8H		10,044	-75	-0.20	9,940	-163	-0.43
CYWM4Y		9,882	-236	-0.64	9,912	-190	-0.50
EUBJ8D		9,629	-490	-1.32	9,633	-470	-1.24
EVPYLE		10,327	208	0.56	10,240	137	0.36
EXXYWM		10,106	-13	-0.03	10,098	-5	-0.01
FG7LY8		10,552	433	1.17	10,537	434	1.14
GF66ZF		9,929	-190	-0.51	9,908	-194	-0.51
GRKWPA		9,816	-303	-0.82	9,648	-455	-1.20
HHNL TJ		9,873	-245	-0.66	9,819	-284	-0.75
KL3UFA		10,311	192	0.52	10,530	428	1.12
KLLXMB	X	10,029	-90	-0.24	9,109	-994	-2.61
LZK2PF		10,480	361	0.97	10,507	404	1.06
PYUBPJ		10,255	137	0.37	10,269	166	0.44
RCNHUX		10,296	177	0.48	10,327	224	0.59
RGL4L2		10,134	15	0.04	10,111	8	0.02
RLFQM2	*	10,493	375	1.01	10,196	93	0.25
T989P8		10,196	78	0.21	10,265	162	0.43
T9MQ8J		9,988	-131	-0.35	9,905	-198	-0.52
VYWP7Y		10,006	-112	-0.30	10,059	-43	-0.11
W4KRM4		9,961	-157	-0.43	10,065	-38	-0.10
W9FTG7	M	9,838	-281	-0.76	No data reported for this sample		



Plastics Interlaboratory Testing Program

Analysis 722

Report #131

3rd Qtr 2024

Flexural Stress at Yield - psi

WebCode	Data Flag	Sample J03			Sample J04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
XNJJX2		10,540	421	1.14	10,664	562	1.48
XWXJEX		10,090	-28	-0.08	10,140	37	0.10
Y9R72K		9,886	-233	-0.63	9,776	-326	-0.86
YWDCJZ		9,857	-262	-0.71	9,813	-289	-0.76
ZDJQN2		10,196	77	0.21	10,239	136	0.36
ZZCMFZ		9,741	-378	-1.02	9,589	-514	-1.35

Summary Statistics

Sample J03

Sample J04

Grand Means

10,118.6 psi

10,102.5 psi

Stnd Dev Btwn Labs

370.3 psi

380.3 psi

Statistics based on 39 of 41 reporting participants

Sample J03: ABS & Sample J04: ABS

Comments on Assigned Data Flags for Test #722

KLLXMB (X) - Inconsistent in testing between samples. Inconsistent within the determinations of both samples.

W9FTG7 (M) - Participant did not submit data for sample J04.



Plastics Interlaboratory Testing Program

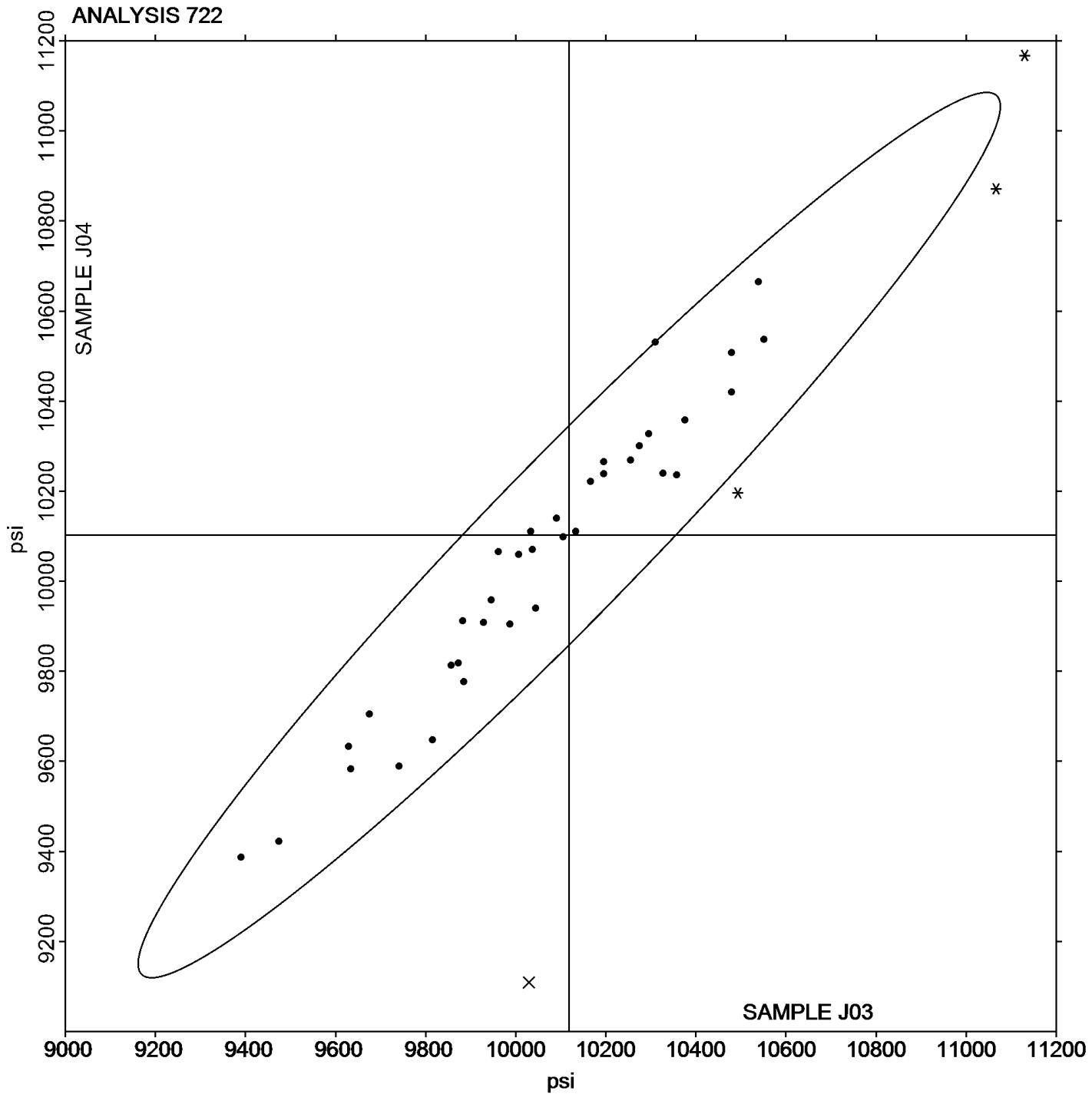
Analysis 722

Flexural Stress at Yield - psi

Report #131

3rd Qtr 2024

Grand Mean Sample J03: 10,118.64 psi Grand Mean Sample J04: 10,102.50 psi





Plastics Interlaboratory Testing Program

Analysis 730

Report #131

3rd Qtr 2024

Tensile Stress at Yield - MPa

WebCode	Data Flag	Sample C03			Sample C04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		50.04	0.58	0.73	50.04	0.55	0.67
2E6WFB		49.27	-0.19	-0.24	49.24	-0.25	-0.31
2NTPR9		49.45	-0.02	-0.02	49.63	0.13	0.17
2PMFV2		50.31	0.85	1.07	50.37	0.88	1.08
3B7VWU		49.56	0.10	0.12	49.54	0.05	0.06
3JECKT		49.15	-0.31	-0.39	49.20	-0.29	-0.36
3MDQ8J		48.34	-1.12	-1.42	48.38	-1.12	-1.37
3RM7G8		50.02	0.56	0.71	49.57	0.08	0.10
3VAK6G		47.98	-1.48	-1.87	47.99	-1.50	-1.85
434DQF		49.46	0.00	0.00	49.30	-0.19	-0.24
4HXHHX		49.28	-0.18	-0.23	49.59	0.10	0.12
62PY6R		49.50	0.04	0.05	49.32	-0.17	-0.21
6BB8L9		48.64	-0.82	-1.03	48.75	-0.75	-0.92
6HYMHT		49.04	-0.42	-0.53	49.06	-0.43	-0.53
6Q7MRU		48.95	-0.51	-0.64	49.00	-0.49	-0.61
7HQA7F		49.46	0.00	0.00	49.68	0.19	0.23
7XK2NW		49.18	-0.28	-0.35	49.04	-0.46	-0.56
8EMYML		50.59	1.12	1.42	50.86	1.37	1.68
8Z7ULK	X	51.94	2.48	3.13	51.18	1.69	2.07
94J472	*	51.46	1.99	2.52	51.63	2.14	2.63
9UGKQT		49.00	-0.46	-0.59	49.20	-0.29	-0.36
ADMFXP		49.65	0.19	0.24	49.45	-0.05	-0.06
AHZN4Z		49.72	0.26	0.32	49.70	0.21	0.25
AMVAU3		49.79	0.33	0.41	49.72	0.23	0.28
AQUJ8Q		49.14	-0.33	-0.41	48.90	-0.59	-0.73
AV87XN		50.96	1.50	1.89	51.32	1.83	2.25
B8B66L		50.40	0.94	1.19	50.33	0.84	1.03
BCNRUK		49.01	-0.46	-0.57	48.96	-0.53	-0.66
BHD8MX		49.09	-0.37	-0.47	48.97	-0.52	-0.64
CP67BN		49.69	0.23	0.29	50.25	0.76	0.93
CWP64H		49.92	0.45	0.57	49.99	0.50	0.62
CYWM4Y	*	49.71	0.25	0.31	49.14	-0.36	-0.44
DTMQVJ		48.40	-1.06	-1.34	48.52	-0.98	-1.20
EKR2XE		49.63	0.16	0.21	49.72	0.23	0.28
ELK2RJ	*	50.47	1.01	1.27	49.91	0.41	0.51



Plastics Interlaboratory Testing Program

Analysis 730

Report #131

3rd Qtr 2024

Tensile Stress at Yield - MPa

WebCode	Data Flag	Sample C03			Sample C04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
F4YQNH		49.25	-0.21	-0.27	49.32	-0.18	-0.22
FXTYBD		49.06	-0.40	-0.50	49.10	-0.39	-0.48
HNJ4FC		50.42	0.96	1.21	50.34	0.85	1.04
HW86PU	X	48.58	-0.88	-1.11	49.82	0.32	0.40
JW37PH	X	45.07	-4.39	-5.55	45.11	-4.39	-5.39
KD9TT6		48.84	-0.62	-0.79	48.60	-0.89	-1.10
KLLXMB		51.06	1.60	2.02	50.95	1.46	1.79
L42BU8		49.89	0.43	0.54	49.90	0.40	0.50
LZK2PF		50.36	0.90	1.13	50.34	0.85	1.04
PMHNY7		47.77	-1.70	-2.14	47.75	-1.74	-2.14
PYEWH9		48.58	-0.88	-1.11	48.79	-0.71	-0.87
Q3UP93		49.34	-0.12	-0.15	49.50	0.00	0.00
QKAYA3	*	49.80	0.34	0.43	50.40	0.91	1.11
QT6YNV		48.36	-1.10	-1.39	48.30	-1.20	-1.47
RFUZ27	X	54.26	4.80	6.06	54.40	4.91	6.03
RGL4L2		48.81	-0.66	-0.83	48.51	-0.99	-1.21
RN8RQ4		50.38	0.92	1.16	50.74	1.25	1.53
RR3N8H		49.24	-0.22	-0.28	49.40	-0.09	-0.11
TMNAZ4		49.54	0.08	0.10	49.56	0.07	0.08
TUNU3Y		48.00	-1.46	-1.85	48.06	-1.43	-1.76
UKWT2F		49.03	-0.44	-0.55	49.07	-0.43	-0.53
V87EJX	X	50.05	0.59	0.74	48.89	-0.61	-0.75
VBPFG6		49.49	0.02	0.03	49.58	0.08	0.10
VBQ9ED		49.66	0.20	0.25	49.65	0.16	0.20
VDVU96		49.03	-0.44	-0.55	49.01	-0.48	-0.59
VH6YZ6		48.83	-0.63	-0.79	48.97	-0.52	-0.64
VJX3FX	*	48.76	-0.71	-0.89	49.40	-0.10	-0.12
VJZH37		49.63	0.17	0.21	49.51	0.01	0.02
W9FTG7		48.36	-1.10	-1.39	48.47	-1.02	-1.25
X8ZNKT	X	49.57	0.11	0.13	48.54	-0.95	-1.17
XXT2FY		49.18	-0.29	-0.36	49.27	-0.23	-0.28
YC9LBD	X	49.12	-0.34	-0.43	49.94	0.45	0.55
YWDCJZ		49.18	-0.28	-0.36	49.28	-0.22	-0.26
Z6MVKB		51.42	1.96	2.47	51.38	1.89	2.32
ZDJQN2		50.70	1.23	1.56	50.67	1.18	1.45



Plastics Interlaboratory Testing Program

Analysis 730

Report #131

3rd Qtr 2024

Tensile Stress at Yield - MPa

WebCode	Data Flag	Sample C03			Sample C04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
ZU3GMZ		49.40	-0.06	-0.08	49.50	0.01	0.01
Summary Statistics							
Grand Means				Sample C03			
49.463 MPa				Sample C04			
Stnd Dev Btwn Labs				0.792 MPa			
				0.813 MPa			
Statistics based on 64 of 71 reporting participants							

Sample C03: ABS/PC & Sample C04: ABS/PC

Comments on Assigned Data Flags for Test #730

- YC9LBD (X) - Inconsistent in testing between samples. Inconsistent within the determinations of sample C03.
- 8Z7ULK (X) - Data for sample C03 are high. Inconsistent within the determinations of sample C04.
- V87EJX (X) - Inconsistent in testing between samples.
- RFUZ27 (X) - Data for both samples are high. Possible Systematic Error.
- JW37PH (X) - Data for both samples are low. Possible Systematic Error.
- X8ZNKT (X) - Inconsistent in testing between samples.
- HW86PU (X) - Inconsistent in testing between samples. Inconsistent within the determinations of sample C03.



Plastics Interlaboratory Testing Program

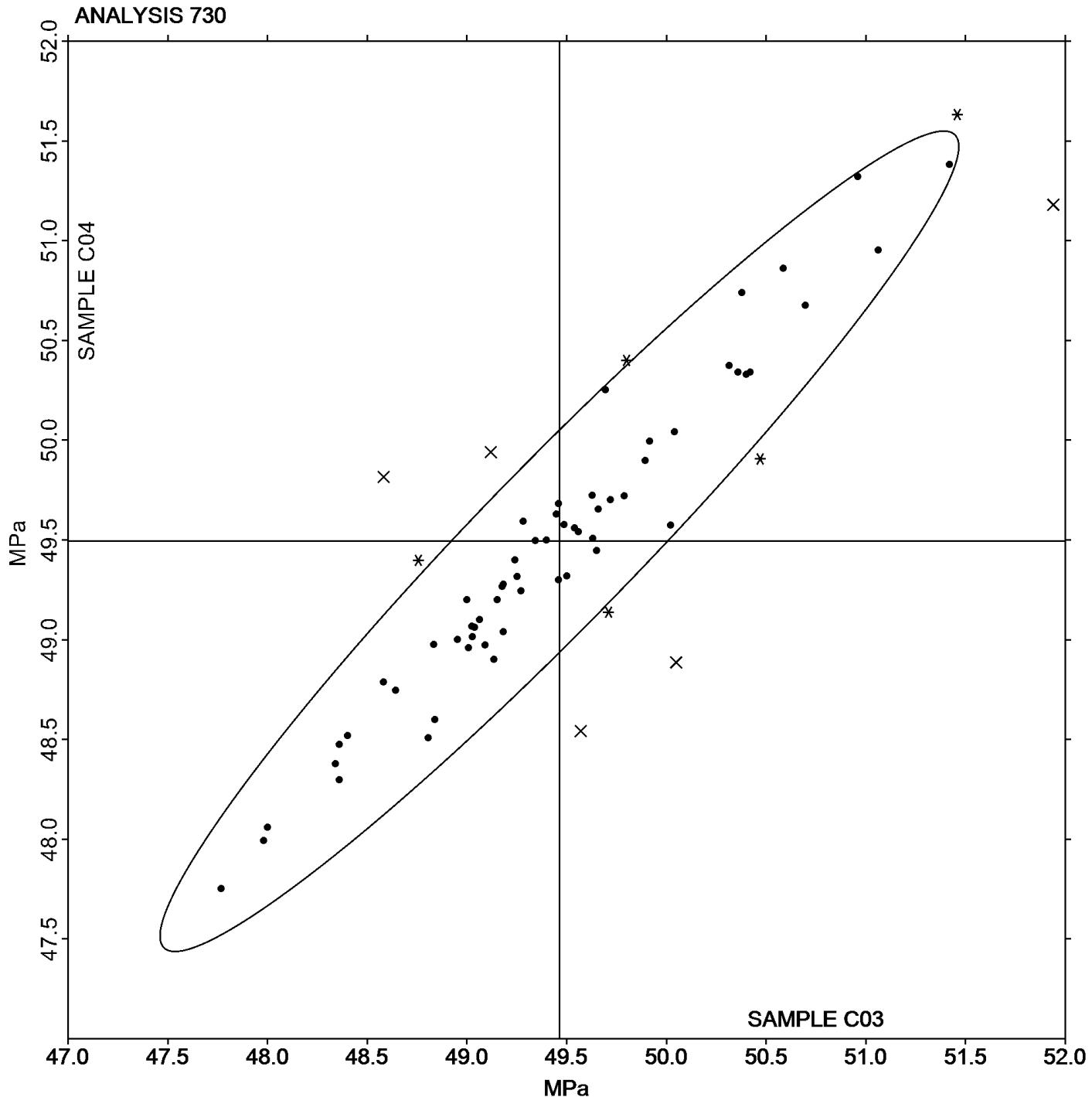
Analysis 730

Tensile Stress at Yield - MPa

Report #131

3rd Qtr 2024

Grand Mean Sample C03: 49.463 MPa Grand Mean Sample C04: 49.493 MPa





Plastics Interlaboratory Testing Program

Analysis 731

Report #131

3rd Qtr 2024

Tensile Stress at Break - MPa

WebCode	Data Flag	Sample C03			Sample C04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		45.06	-0.65	-0.30	45.54	-0.13	-0.07
2E6WFB		43.69	-2.02	-0.93	43.81	-1.86	-0.94
2NTPR9		47.94	2.23	1.02	45.57	-0.10	-0.05
2PMFV2		45.23	-0.48	-0.22	45.22	-0.45	-0.23
3B7VWU		44.68	-1.03	-0.47	44.82	-0.85	-0.43
3JECKT		46.63	0.93	0.43	45.34	-0.33	-0.17
3MDQ8J		46.62	0.91	0.42	43.79	-1.89	-0.95
3RM7G8		48.50	2.80	1.29	45.55	-0.13	-0.06
3VAK6G		44.61	-1.10	-0.50	43.51	-2.16	-1.09
434DQF		48.72	3.01	1.38	45.86	0.19	0.10
4HXHHX		47.65	1.95	0.89	47.11	1.44	0.73
62PY6R		44.56	-1.15	-0.53	46.24	0.57	0.29
6BB8L9		48.68	2.98	1.37	47.28	1.61	0.81
6HYMHT		49.04	3.33	1.53	49.06	3.39	1.71
6Q7MRU		47.70	1.99	0.91	45.72	0.05	0.03
7HQA7F		44.95	-0.76	-0.35	46.27	0.60	0.30
7XK2NW		47.59	1.89	0.87	46.18	0.51	0.26
8EMYML		49.04	3.33	1.53	48.07	2.40	1.21
94J472	*	49.00	3.29	1.51	51.21	5.54	2.80
9UGKQT		47.71	2.00	0.92	48.33	2.66	1.34
AHZN4Z		46.22	0.51	0.24	45.20	-0.47	-0.24
AQUJ8Q		47.44	1.74	0.80	45.54	-0.13	-0.06
AV87XN		45.12	-0.59	-0.27	44.50	-1.17	-0.59
B8B66L		45.42	-0.29	-0.13	43.85	-1.82	-0.92
BHD8MX		43.79	-1.91	-0.88	44.73	-0.94	-0.48
CP67BN		47.45	1.74	0.80	46.69	1.02	0.52
CWP64H		44.03	-1.67	-0.77	46.17	0.50	0.25
CYWM4Y		44.26	-1.45	-0.67	43.67	-2.00	-1.01
DTMQVJ		46.94	1.23	0.57	44.50	-1.17	-0.59
EKR2XE		50.78	5.08	2.33	48.08	2.41	1.21
ELK2RJ		44.75	-0.95	-0.44	44.29	-1.38	-0.70
F4YQNH		44.09	-1.61	-0.74	44.14	-1.53	-0.77
FXTYBD		43.38	-2.33	-1.07	44.49	-1.18	-0.60
HNJ4FC		42.02	-3.69	-1.69	41.32	-4.35	-2.20
HW86PU		45.88	0.17	0.08	47.79	2.11	1.07



Plastics Interlaboratory Testing Program

Analysis 731

Report #131

3rd Qtr 2024

Tensile Stress at Break - MPa

WebCode	Data Flag	Sample C03			Sample C04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
JW37PH		45.07	-0.63	-0.29	45.11	-0.56	-0.28
KD9TT6		42.46	-3.25	-1.49	42.50	-3.17	-1.60
KLLXMB		46.65	0.95	0.44	46.23	0.56	0.28
L42BU8		43.54	-2.17	-1.00	45.10	-0.58	-0.29
LZK2PF		48.66	2.95	1.36	48.16	2.49	1.26
PMHNY7		41.17	-4.53	-2.08	41.19	-4.48	-2.26
PYEWHL9		44.67	-1.04	-0.48	44.70	-0.97	-0.49
Q3UP93		43.98	-1.73	-0.79	44.42	-1.25	-0.63
QT6YNV		45.65	-0.05	-0.02	47.06	1.39	0.70
RFUZ27	*	50.52	4.81	2.21	51.30	5.63	2.84
RGL4L2		43.64	-2.07	-0.95	45.40	-0.28	-0.14
RN8RQ4		45.30	-0.41	-0.19	45.64	-0.03	-0.02
RR3N8H	*	44.38	-1.33	-0.61	48.66	2.99	1.51
TMNAZ4		44.72	-0.99	-0.45	45.32	-0.35	-0.18
TUNU3Y		47.24	1.53	0.70	45.70	0.03	0.01
UKWT2F		48.14	2.43	1.12	46.30	0.63	0.32
V87EJX		46.30	0.60	0.27	46.29	0.62	0.31
VBPFG6		47.83	2.12	0.98	46.56	0.89	0.45
VBQ9ED		45.69	-0.02	-0.01	45.08	-0.59	-0.30
VDVU96		44.26	-1.45	-0.66	45.83	0.16	0.08
VH6YZ6		41.84	-3.86	-1.78	41.97	-3.70	-1.87
VJX3FX		44.11	-1.60	-0.74	44.01	-1.67	-0.84
VJZH37		43.27	-2.43	-1.12	43.38	-2.29	-1.16
W9FTG7		47.25	1.55	0.71	48.01	2.34	1.18
X8ZNKT		43.59	-2.12	-0.97	44.47	-1.20	-0.61
XXT2FY		43.85	-1.86	-0.85	45.98	0.30	0.15
YC9LBD		44.00	-1.71	-0.78	46.46	0.79	0.40
YWDCJZ		41.71	-4.00	-1.84	42.14	-3.53	-1.78
Z6MVKB		47.74	2.03	0.93	47.72	2.05	1.03
ZDJQN2		45.23	-0.47	-0.22	46.93	1.26	0.64
ZU3GMZ		44.98	-0.73	-0.33	47.25	1.58	0.80



Plastics Interlaboratory Testing Program

Analysis 731

Report #131

3rd Qtr 2024

Tensile Stress at Break - MPa

Summary Statistics

Sample C03

Sample C04

Grand Means

45.706 MPa

45.672 MPa

Stnd Dev Btwn Labs

2.176 MPa

1.982 MPa

Statistics based on 66 of 66 reporting participants

Sample C03: ABS/PC & Sample C04: ABS/PC



Plastics Interlaboratory Testing Program

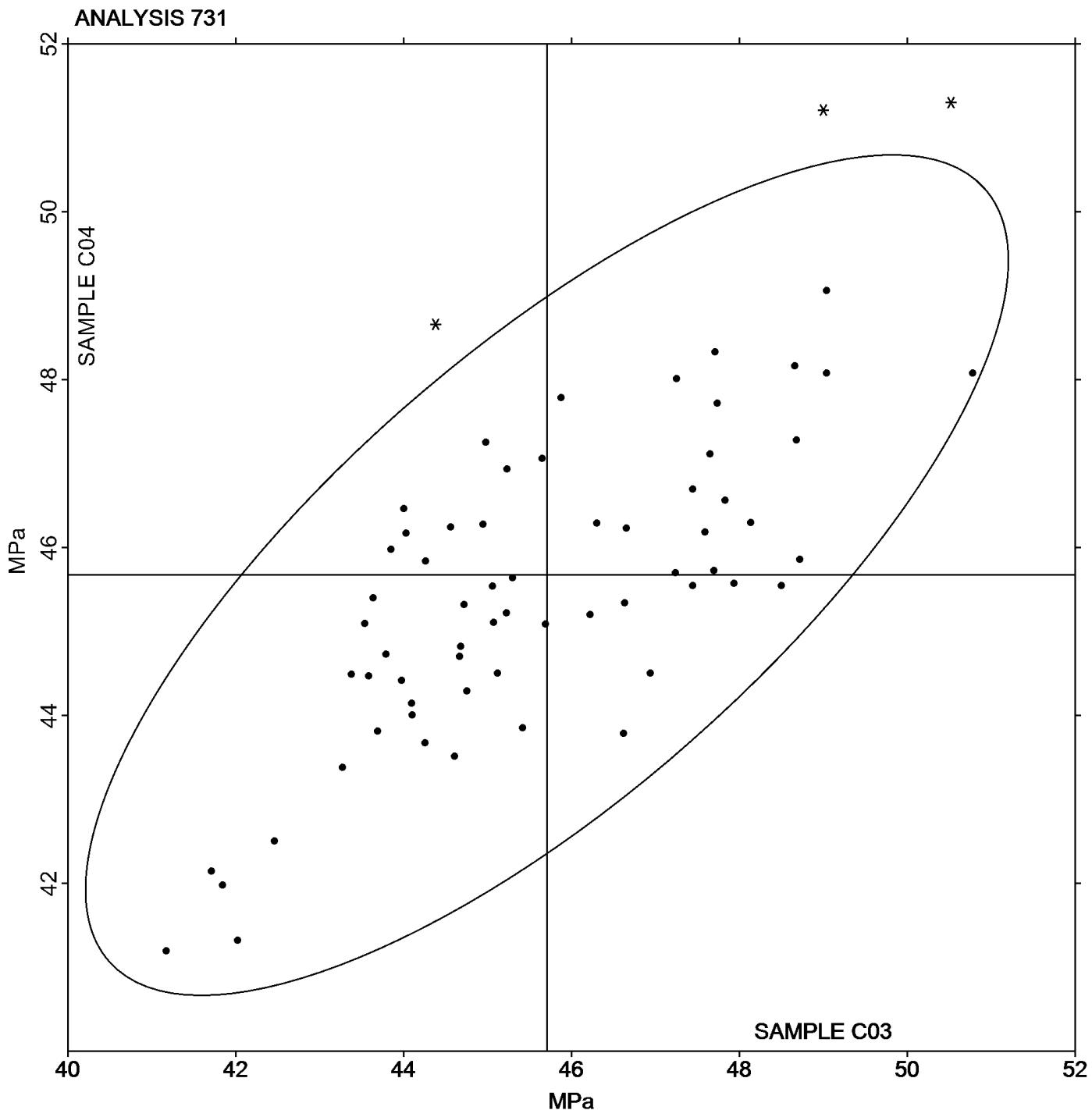
Analysis 731

Tensile Stress at Break - MPa

Report #131

3rd Qtr 2024

Grand Mean Sample C03: 45.706 MPa Grand Mean Sample C04: 45.672 MPa





Plastics Interlaboratory Testing Program

Analysis 732

Percent Strain at Yield

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample C03			Sample C04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		4.420	0.089	0.48	4.440	0.107	0.54
2E6WFB		4.056	-0.275	-1.47	4.064	-0.269	-1.35
2NTPR9		4.380	0.049	0.26	4.396	0.063	0.32
3B7VWU		4.306	-0.025	-0.13	4.320	-0.013	-0.06
3JECKT		4.434	0.103	0.55	4.470	0.137	0.69
3MDQ8J		4.349	0.018	0.10	4.256	-0.076	-0.38
3RM7G8		4.422	0.091	0.49	4.404	0.071	0.36
3VAK6G	*	3.886	-0.445	-2.38	3.762	-0.570	-2.86
434DQF	X	119.800	115.469	617.76	121.800	117.467	589.91
4HXHHX		4.346	0.015	0.08	4.288	-0.045	-0.22
62PY6R		4.149	-0.182	-0.98	4.154	-0.179	-0.90
6BB8L9		4.260	-0.071	-0.38	4.220	-0.113	-0.57
6HYMHT	X	3.380	-0.951	-5.09	3.360	-0.973	-4.89
6Q7MRU		4.538	0.207	1.11	4.432	0.099	0.50
7HQA7F		4.190	-0.141	-0.75	4.262	-0.070	-0.35
7XK2NW		4.306	-0.025	-0.13	4.286	-0.047	-0.23
94J472		4.572	0.241	1.29	4.514	0.181	0.91
97T483		4.030	-0.301	-1.61	4.038	-0.295	-1.48
9UGKQT		4.462	0.131	0.70	4.440	0.107	0.54
AHZN4Z		4.280	-0.051	-0.27	4.240	-0.093	-0.47
AQUJ8Q		4.416	0.085	0.46	4.484	0.151	0.76
AV87XN		4.432	0.101	0.54	4.494	0.161	0.81
B8B66L	*	4.924	0.593	3.17	4.920	0.587	2.95
BCNRUK		4.112	-0.219	-1.17	4.188	-0.145	-0.73
BHD8MX		4.169	-0.162	-0.87	4.206	-0.127	-0.64
CP67BN	*	4.164	-0.167	-0.89	4.394	0.061	0.31
CWP64H		4.264	-0.067	-0.36	4.288	-0.045	-0.22
CYWM4Y		4.262	-0.069	-0.37	4.268	-0.065	-0.33
DTMQVJ		4.276	-0.055	-0.29	4.318	-0.015	-0.07
EKR2XE		4.474	0.143	0.77	4.452	0.119	0.60
ELK2RJ		4.480	0.149	0.80	4.352	0.019	0.10
F4YQNH		4.594	0.263	1.41	4.512	0.179	0.90
FXTYBD		4.491	0.160	0.86	4.643	0.310	1.56
HNJ4FC		4.220	-0.111	-0.59	4.300	-0.033	-0.16
HW86PU	X	125.150	120.819	646.38	123.830	119.497	600.10



Plastics Interlaboratory Testing Program

Analysis 732

Percent Strain at Yield

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample C03			Sample C04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
JW37PH		4.063	-0.268	-1.44	4.130	-0.203	-1.02
KD9TT6		4.348	0.017	0.09	4.344	0.011	0.06
KLLXMB		4.340	0.009	0.05	4.378	0.045	0.23
L42BU8		4.272	-0.059	-0.32	4.200	-0.133	-0.67
LZK2PF		4.480	0.149	0.80	4.480	0.147	0.74
PMHNY7	*	4.671	0.340	1.82	4.811	0.478	2.40
PYEWHL9		4.208	-0.123	-0.66	4.108	-0.225	-1.13
Q3UP93		4.356	0.025	0.13	4.308	-0.025	-0.12
QT6YNV	X	4.340	0.009	0.05	3.839	-0.493	-2.48
RFUZ27	*	3.900	-0.431	-2.31	4.060	-0.273	-1.37
RGL4L2		4.240	-0.091	-0.49	4.184	-0.149	-0.75
RN8RQ4		4.480	0.149	0.80	4.520	0.187	0.94
RR3N8H		4.300	-0.031	-0.17	4.300	-0.033	-0.16
TMNAZ4		4.320	-0.011	-0.06	4.320	-0.013	-0.06
TUNU3Y	X	1.756	-2.575	-13.78	1.578	-2.755	-13.83
UKWT2F		4.229	-0.102	-0.55	4.219	-0.114	-0.57
V87EJX		4.787	0.456	2.44	4.723	0.390	1.96
VBPFG6		4.352	0.021	0.11	4.382	0.049	0.25
VBQ9ED		4.424	0.093	0.50	4.408	0.075	0.38
VDVU96		4.494	0.163	0.87	4.448	0.115	0.58
VH6YZ6		4.294	-0.037	-0.20	4.288	-0.045	-0.22
VJX3FX		4.310	-0.021	-0.11	4.370	0.037	0.19
VJZH37		4.158	-0.173	-0.92	3.994	-0.339	-1.70
W9FTG7		4.352	0.021	0.11	4.426	0.093	0.47
X8ZNKT	*	4.044	-0.287	-1.53	3.884	-0.449	-2.25
XXT2FY		4.434	0.103	0.55	4.610	0.277	1.39
YC9LBD		4.260	-0.071	-0.38	4.380	0.047	0.24
YWDCJZ		4.242	-0.089	-0.48	4.278	-0.055	-0.28
Z6MVKB	X	4.733	0.402	2.15	4.467	0.134	0.67
ZDJQN2		4.412	0.081	0.43	4.388	0.055	0.28
ZU3GMZ		4.420	0.089	0.48	4.220	-0.113	-0.57



Plastics Interlaboratory Testing Program

Analysis 732

Percent Strain at Yield

Report #131

3rd Qtr 2024

Summary Statistics

Sample C03

Sample C04

Grand Means

4.3309 Percent

4.3328 Percent

Stnd Dev Btwn Labs

0.1869 Percent

0.1991 Percent

Statistics based on 60 of 66 reporting participants

Sample C03: ABS/PC & Sample C04: ABS/PC

Comments on Assigned Data Flags for Test #732

6HYMHT (X) - Data for both samples are low. Possible Systematic Error.

434DQF (X) - Extreme data.

QT6YNV (X) - Inconsistent in testing between samples. Inconsistent within the determinations of sample C04.

TUNU3Y (X) - Data for both samples are low. Inconsistent within the determinations of both samples.

Z6MVKB (X) - Inconsistent in testing between samples. Inconsistent within the determinations of both samples.

HW86PU (X) - Extreme data.



Plastics Interlaboratory Testing Program

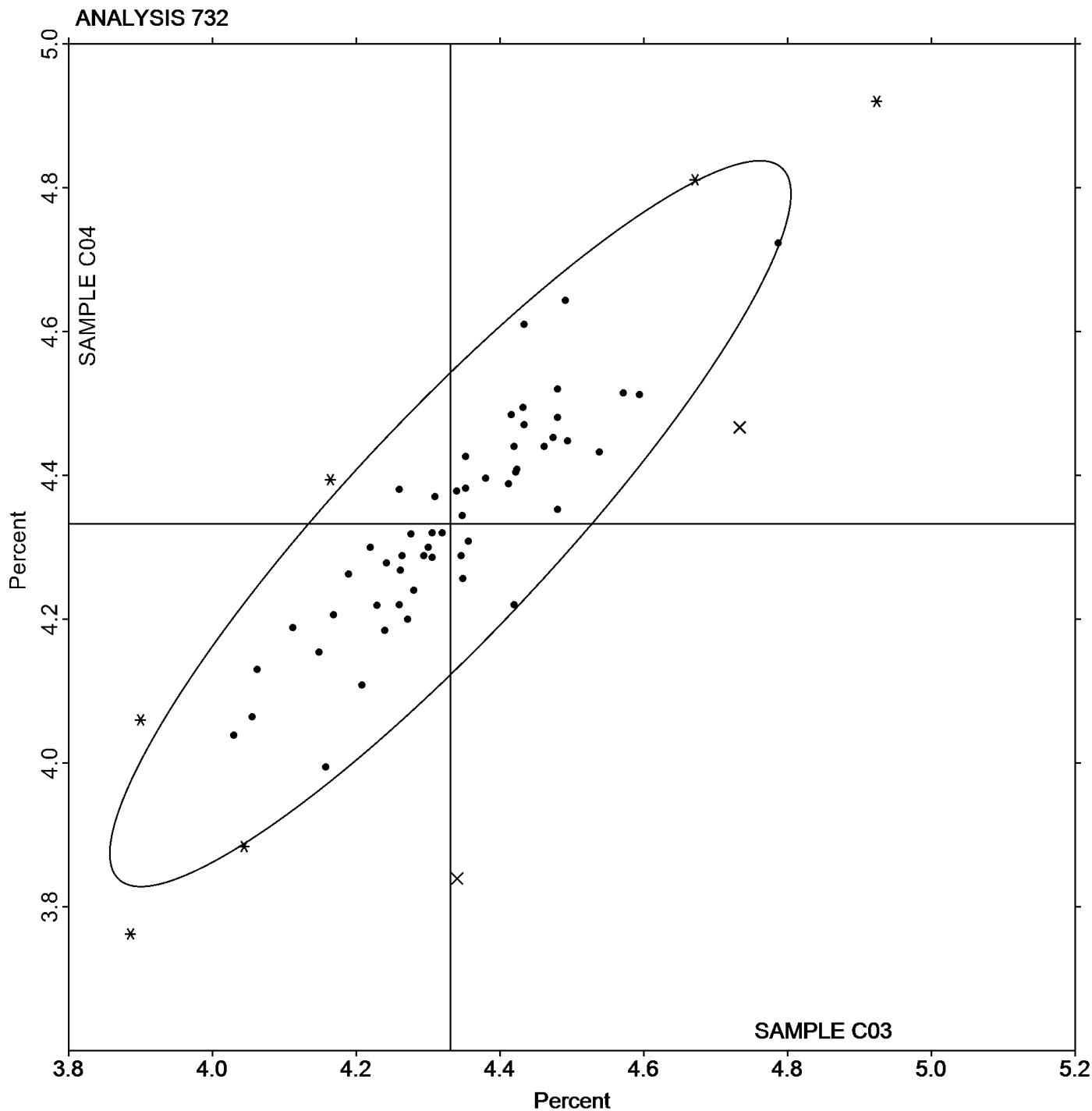
Analysis 732

Report #131

3rd Qtr 2024

Percent Strain at Yield

Grand Mean Sample C03: 4.3309 Percent Grand Mean Sample C04: 4.3328 Percent





Plastics Interlaboratory Testing Program

Analysis 734

Report #131

3rd Qtr 2024

Modulus of Elasticity - MPa

WebCode	Data Flag	Sample C03			Sample C04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		2,304	28	0.35	2,290	14	0.19
2E6WFB		2,231	-46	-0.58	2,231	-45	-0.61
2NTPR9		2,220	-56	-0.72	2,224	-52	-0.70
2PMFV2	X	844	-1,433	-18.26	691	-1,585	-21.56
3B7VWU		2,371	95	1.21	2,374	98	1.33
3JECKT		2,260	-16	-0.21	2,287	11	0.15
3MDQ8J	X	2,573	297	3.78	2,631	355	4.82
3RM7G8		2,309	32	0.41	2,293	17	0.24
3VAK6G		2,298	22	0.28	2,266	-10	-0.14
434DQF		2,131	-145	-1.85	2,206	-70	-0.95
4HXHHX		2,266	-10	-0.13	2,286	10	0.13
62PY6R		2,328	52	0.66	2,376	100	1.36
6BB8L9		2,328	52	0.66	2,376	100	1.36
6HYMHT	X	2,940	664	8.46	2,901	625	8.50
6Q7MRU	*	2,115	-161	-2.05	2,218	-58	-0.79
7HQA7F		2,328	52	0.66	2,327	51	0.70
7XK2NW		2,206	-70	-0.90	2,240	-36	-0.49
94J472		2,243	-33	-0.42	2,249	-27	-0.37
9UGKQT		2,249	-27	-0.34	2,255	-21	-0.29
AHVN4Z		2,415	138	1.76	2,381	105	1.43
AQUJ8Q		2,270	-6	-0.08	2,304	28	0.38
AV87XN		2,356	80	1.02	2,319	43	0.58
B8B66L		2,213	-63	-0.80	2,259	-17	-0.23
BCNRUK		2,308	31	0.40	2,295	18	0.25
BHD8MX		2,303	27	0.34	2,300	24	0.32
CP67BN		2,255	-22	-0.27	2,247	-29	-0.40
CWP64H		2,416	139	1.78	2,401	125	1.70
CYWM4Y		2,283	7	0.09	2,241	-35	-0.47
DTMQVJ		2,250	-26	-0.34	2,226	-50	-0.68
EKR2XE		2,213	-63	-0.81	2,203	-73	-1.00
F4YQNH	X	1,827	-449	-5.72	1,938	-338	-4.60
FXTYBD	X	2,260	-17	-0.21	2,397	121	1.65
HNJ4FC		2,300	24	0.30	2,288	12	0.16
HW86PU		2,283	6	0.08	2,364	88	1.20
JW37PH		2,284	8	0.10	2,265	-11	-0.15



Plastics Interlaboratory Testing Program

Analysis 734

Report #131

3rd Qtr 2024

Modulus of Elasticity - MPa

WebCode	Data Flag	Sample C03			Sample C04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
KD9TT6		2,265	-12	-0.15	2,275	-1	-0.01
KLLXMB		2,383	106	1.36	2,365	89	1.21
L42BU8	X	2,378	101	1.29	2,125	-151	-2.06
LZK2PF	*	2,068	-208	-2.66	2,080	-196	-2.67
PMHNY7		2,303	27	0.34	2,227	-49	-0.67
PYEWHL9		2,281	5	0.06	2,194	-82	-1.11
Q3UP93		2,407	130	1.66	2,349	73	0.99
QT6YNV	X	2,892	616	7.85	3,267	991	13.48
RFUZ27		2,415	139	1.77	2,431	155	2.11
RGL4L2		2,210	-67	-0.85	2,207	-69	-0.93
RN8RQ4		2,266	-10	-0.13	2,270	-6	-0.08
RR3N8H		2,292	15	0.20	2,278	2	0.03
TMNAZ4		2,280	4	0.05	2,287	11	0.15
TUNU3Y		2,130	-146	-1.87	2,164	-112	-1.52
UKWT2F		2,336	59	0.76	2,322	46	0.63
V87EJX		2,212	-65	-0.83	2,214	-62	-0.84
VBPFG6		2,252	-24	-0.31	2,201	-75	-1.02
VBQ9ED		2,241	-36	-0.45	2,242	-34	-0.46
VDVU96		2,233	-43	-0.55	2,160	-116	-1.58
VH6YZ6		2,187	-89	-1.14	2,190	-86	-1.17
VJX3FX		2,237	-39	-0.50	2,253	-23	-0.32
VJZH37	*	2,424	147	1.88	2,475	199	2.71
W9FTG7		2,278	1	0.02	2,285	9	0.12
X8ZNKT		2,282	6	0.07	2,290	14	0.19
XXT2FY	X	2,165	-112	-1.42	2,053	-223	-3.03
YC9LBD		2,238	-38	-0.49	2,250	-26	-0.35
YWDCJZ		2,200	-76	-0.97	2,192	-84	-1.14
ZDJQN2		2,463	186	2.37	2,402	126	1.72
ZU3GMZ		2,257	-19	-0.24	2,264	-12	-0.17



Plastics Interlaboratory Testing Program

Report #131

Analysis 734

3rd Qtr 2024

Modulus of Elasticity - MPa

Summary Statistics

Sample C03

Sample C04

Grand Means

2,276.4 MPa

2,276.0 MPa

Stnd Dev Btwn Labs

78.4 MPa

73.5 MPa

Statistics based on 56 of 64 reporting participants

Sample C03: ABS/PC & Sample C04: ABS/PC

Comments on Assigned Data Flags for Test #734

6HYMHT (X) - Data for both samples are high. Possible Systematic Error.

F4YQNH (X) - Data for both samples are low. Possible Systematic Error.

XXT2FY (X) - Data for sample C04 are low. Inconsistent within the determinations of sample C04.

FXTYBD (X) - Inconsistent in testing between samples. Inconsistent within the determinations of both samples.

2PMFV2 (X) - Extreme data.

QT6YNV (X) - Data for both samples are high. Inconsistent within the determinations of both samples.

3MDQ8J (X) - Data for both samples are high. Possible Systematic Error.

L42BU8 (X) - Inconsistent in testing between samples. Inconsistent within the determinations of both samples.



Plastics Interlaboratory Testing Program

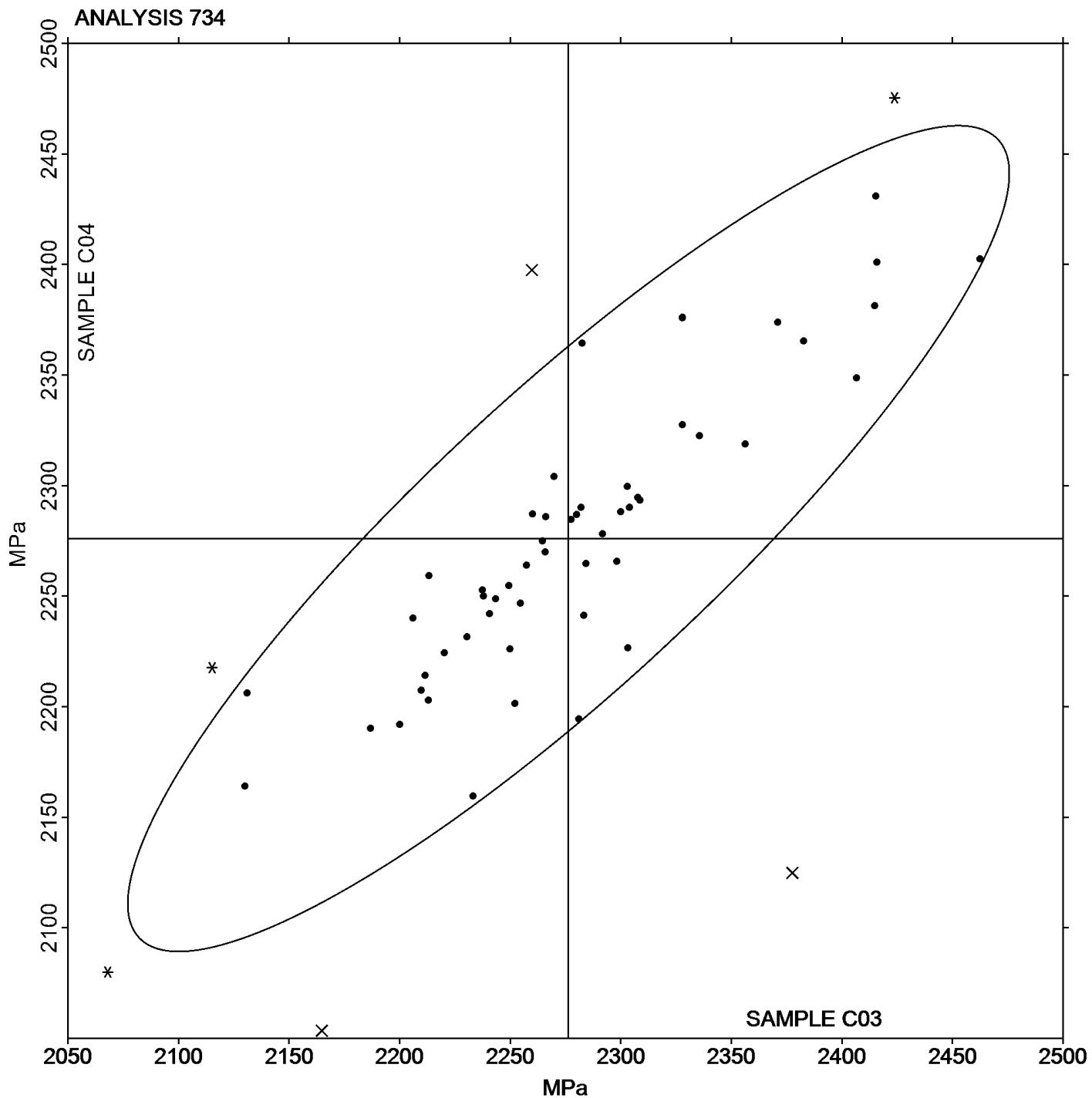
Report #131

3rd Qtr 2024

Analysis 734

Modulus of Elasticity - MPa

Grand Mean Sample C03: 2,276.36 MPa Grand Mean Sample C04: 2,276.02 MPa





Plastics Interlaboratory Testing Program

Analysis 736

Report #131

3rd Qtr 2024

Flexural Modulus - MPa

WebCode	Data Flag	Sample K03			Sample K04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		2,312	11	0.11	2,312	13	0.14
2E6WFB	*	2,573	272	2.77	2,570	271	2.95
3B7VWU		2,332	30	0.31	2,333	34	0.37
3MDQ8J		2,352	51	0.52	2,347	48	0.52
3RM7G8	*	2,188	-114	-1.16	2,249	-50	-0.55
434DQF		2,198	-103	-1.05	2,208	-91	-0.99
4HXHHX		2,481	179	1.83	2,455	156	1.70
62PY6R		2,488	187	1.90	2,444	145	1.58
6BB8L9		2,290	-12	-0.12	2,274	-25	-0.27
6HYMHT		2,150	-152	-1.55	2,130	-169	-1.84
6Q7MRU		2,364	62	0.64	2,396	97	1.06
6ZUF4Q		2,237	-64	-0.66	2,251	-48	-0.52
7HQA7F		2,278	-23	-0.24	2,274	-25	-0.28
8Z7ULK		2,180	-121	-1.24	2,160	-139	-1.51
94J472		2,427	125	1.28	2,436	137	1.49
97T483		2,220	-81	-0.83	2,200	-99	-1.08
9UGKQT		2,260	-42	-0.42	2,271	-28	-0.31
ADMFXP		2,284	-17	-0.18	2,294	-5	-0.05
AHZN4Z		2,442	140	1.43	2,449	150	1.63
AMVAU3		2,403	102	1.04	2,380	81	0.88
AQUJ8Q		2,147	-155	-1.58	2,185	-114	-1.24
AV87XN	*	2,520	219	2.23	2,461	162	1.77
B3X9EQ		2,221	-80	-0.82	2,228	-71	-0.78
BCNRUK		2,253	-48	-0.49	2,261	-38	-0.42
BHD8MX		2,197	-105	-1.07	2,220	-79	-0.86
CP67BN		2,401	99	1.01	2,396	97	1.05
CWP64H		2,263	-38	-0.39	2,252	-47	-0.51
CYWM4Y		2,364	62	0.64	2,342	43	0.47
DTMQVJ		2,288	-14	-0.14	2,285	-14	-0.15
EKR2XE		2,262	-39	-0.40	2,274	-25	-0.27
ELK2RJ	X	2,683	382	3.90	2,634	335	3.64
F4YQNH		2,223	-78	-0.80	2,226	-73	-0.80
FXTYBD		2,233	-69	-0.70	2,241	-58	-0.63
HNJ4FC		2,376	75	0.76	2,394	95	1.03
HW86PU	X	2,505	203	2.07	2,587	288	3.14



Plastics Interlaboratory Testing Program

Analysis 736

Report #131

3rd Qtr 2024

Flexural Modulus - MPa

WebCode	Data Flag	Sample K03			Sample K04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
KD9TT6		2,328	27	0.27	2,336	37	0.40
KLLXMB	X	2,641	340	3.47	2,567	268	2.91
LXBXXP	X	2,785	483	4.93	2,677	378	4.11
LZK2PF		2,300	-2	-0.02	2,297	-2	-0.02
PMHNY7		2,103	-198	-2.02	2,117	-182	-1.98
Q3UP93		2,250	-52	-0.53	2,255	-44	-0.48
QKAYA3		2,319	18	0.18	2,317	18	0.20
QT6YNV		2,349	48	0.49	2,339	40	0.44
RFUZ27		2,215	-86	-0.88	2,195	-104	-1.13
RR3N8H		2,385	84	0.86	2,379	80	0.87
TMNAZ4		2,306	5	0.05	2,298	-1	-0.01
TUNU3Y	X	2,696	395	4.03	2,730	431	4.69
V87EJX		2,299	-2	-0.02	2,249	-50	-0.54
VBPFG6		2,337	35	0.36	2,328	29	0.32
VBQ9ED		2,332	30	0.31	2,310	11	0.12
VDVU96		2,238	-63	-0.65	2,239	-60	-0.66
VJZH37		2,357	56	0.57	2,387	88	0.96
W9FTG7		2,192	-110	-1.12	2,173	-126	-1.37
X8ZNKT		2,244	-57	-0.59	2,264	-35	-0.38
XXT2FY		2,394	93	0.94	2,382	83	0.91
YWDCJZ		2,200	-101	-1.03	2,234	-65	-0.71
ZDJQN2		2,278	-24	-0.24	2,245	-54	-0.59
ZU3GMZ		2,344	43	0.43	2,308	9	0.10

Summary Statistics

Sample K03

Sample K04

Grand Means

2,301.4 MPa

2,299.0 MPa

Stnd Dev Btwn Labs

98.0 MPa

91.8 MPa

Statistics based on 53 of 58 reporting participants

Sample K03: ABS/PC & Sample K04: ABS/PC



Plastics Interlaboratory Testing Program
Analysis 736
Flexural Modulus - MPa

Report #131
3rd Qtr 2024

Comments on Assigned Data Flags for Test #736

- KLLXMB (X) - Data for both samples are high. Possible Systematic Error.
- ELK2RJ (X) - Data for both samples are high. Possible Systematic Error. Inconsistent within the determinations of sample K03.
- TUNU3Y (X) - Data for both samples are high. Possible Systematic Error.
- LXBXXP (X) - Data for both samples are high. Possible Systematic Error. Inconsistent within the determinations of sample K04.
- HW86PU (X) - Data for sample K04 are high.



Plastics Interlaboratory Testing Program

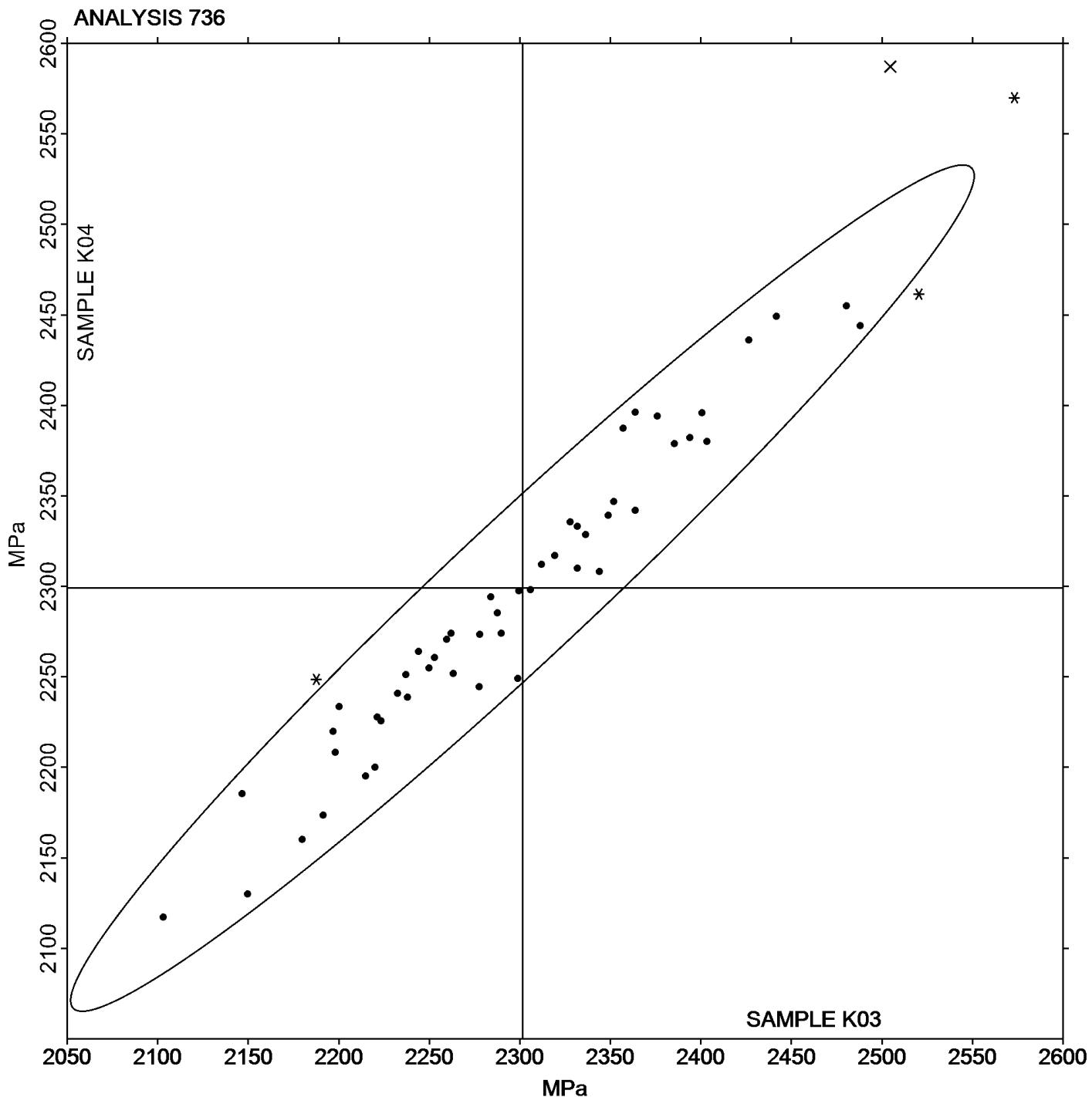
Analysis 736

Report #131

3rd Qtr 2024

Flexural Modulus - MPa

Grand Mean Sample K03: 2,301.41 MPa Grand Mean Sample K04: 2,299.01 MPa





Plastics Interlaboratory Testing Program

Report #131

Analysis 737

3rd Qtr 2024

Flexural Stress at 3.5% Strain - MPa

WebCode	Data Flag	Sample K03			Sample K04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		74.78	3.80	1.54	74.94	3.78	1.43
2E6WFB		73.74	2.76	1.12	73.71	2.55	0.97
3B7VWU		70.96	-0.02	-0.01	70.91	-0.25	-0.10
3MDQ8J		68.18	-2.80	-1.14	68.26	-2.90	-1.10
3RM7G8		68.04	-2.94	-1.20	68.56	-2.60	-0.99
4HXHHX		75.27	4.28	1.74	74.68	3.52	1.34
62PY6R	X	70.78	-0.20	-0.08	67.74	-3.42	-1.30
6HYMHT		70.44	-0.54	-0.22	70.38	-0.78	-0.30
6Q7MRU	*	69.64	-1.34	-0.54	67.88	-3.28	-1.25
6ZUF4Q		68.31	-2.67	-1.09	68.47	-2.69	-1.02
7HQA7F	X	2,278.03	2,207.05	897.41	2,273.52	2,202.36	836.41
94J472		73.18	2.19	0.89	73.58	2.42	0.92
9UGKQT		71.09	0.10	0.04	71.29	0.13	0.05
AHZN4Z		70.92	-0.06	-0.03	71.20	0.04	0.01
AQUJ8Q		67.94	-3.05	-1.24	68.03	-3.14	-1.19
AV87XN		73.84	2.86	1.16	73.66	2.50	0.95
B3X9EQ		67.86	-3.12	-1.27	68.21	-2.95	-1.12
BCNRUK		70.16	-0.83	-0.34	70.36	-0.80	-0.30
BHD8MX		71.14	0.16	0.06	72.33	1.17	0.44
CP67BN		73.40	2.42	0.98	73.42	2.26	0.86
CWP64H		71.78	0.80	0.32	70.86	-0.30	-0.12
CYWM4Y		70.11	-0.87	-0.36	69.54	-1.63	-0.62
DTMQVJ		69.95	-1.03	-0.42	71.68	0.51	0.19
EKR2XE		70.25	-0.73	-0.30	70.34	-0.82	-0.31
ELK2RJ		73.84	2.86	1.16	75.64	4.48	1.70
F4YQNH		69.64	-1.34	-0.54	69.44	-1.73	-0.66
FXTYBD		66.75	-4.23	-1.72	66.81	-4.35	-1.65
HNJ4FC		76.46	5.48	2.23	76.02	4.86	1.85
HW86PU	*	74.70	3.72	1.51	76.79	5.63	2.14
KLLXMB	*	69.62	-1.36	-0.55	71.82	0.66	0.25
LZK2PF		71.56	0.58	0.24	71.46	0.30	0.11
Q3UP93		69.73	-1.25	-0.51	70.08	-1.09	-0.41
QT6YNV		68.73	-2.25	-0.92	68.60	-2.57	-0.97
RFUZ27		71.88	0.90	0.36	71.50	0.34	0.13
RR3N8H		72.94	1.96	0.80	73.45	2.29	0.87



Plastics Interlaboratory Testing Program

Analysis 737

Report #131

3rd Qtr 2024

Flexural Stress at 3.5% Strain - MPa

WebCode	Data Flag	Sample K03			Sample K04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
TMNAZ4		71.26	0.28	0.11	70.88	-0.28	-0.11
TUNU3Y		76.76	5.78	2.35	77.38	6.22	2.36
V87EJX		69.77	-1.21	-0.49	68.74	-2.42	-0.92
VBPFG6		70.56	-0.42	-0.17	70.53	-0.63	-0.24
VBQ9ED		70.84	-0.14	-0.06	71.10	-0.06	-0.02
VDVU96		68.28	-2.70	-1.10	68.45	-2.71	-1.03
VJZH37		72.28	1.30	0.53	72.92	1.76	0.67
W9FTG7		67.28	-3.70	-1.50	67.27	-3.89	-1.48
X8ZNKT		70.42	-0.56	-0.23	70.37	-0.80	-0.30
YWDCJZ		67.96	-3.02	-1.23	68.42	-2.74	-1.04
ZDJQN2		70.96	-0.02	-0.01	71.19	0.02	0.01

Summary Statistics

Sample K03

Sample K04

Grand Means

70.982 MPa

71.163 MPa

Stnd Dev Btwn Labs

2.459 MPa

2.633 MPa

Statistics based on 44 of 46 reporting participants

Sample K03: ABS/PC & Sample K04: ABS/PC

Comments on Assigned Data Flags for Test #737

62PY6R (X) - Inconsistent in testing between samples.

7HQA7F (X) - Extreme data.



Plastics Interlaboratory Testing Program

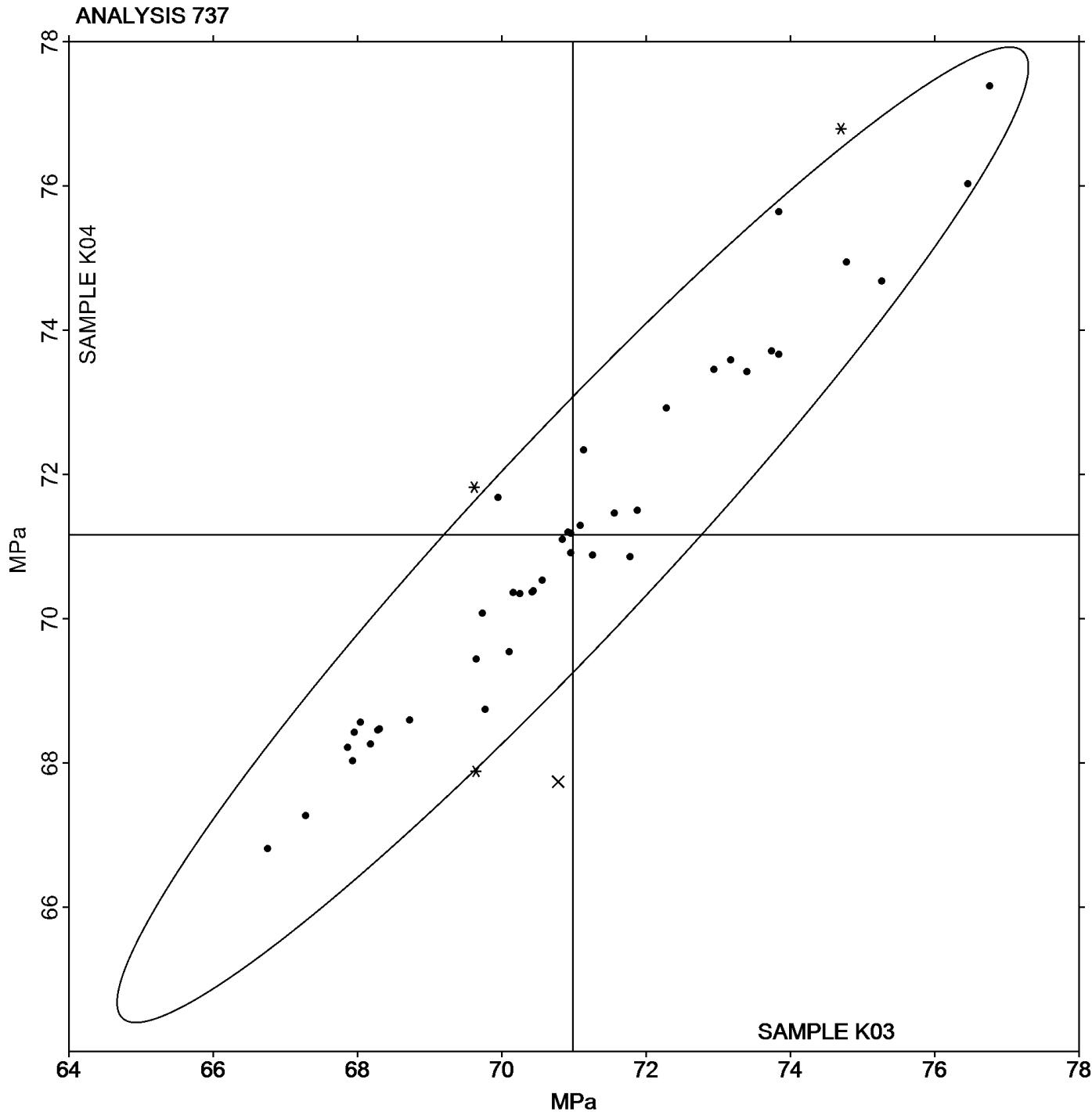
Analysis 737

Report #131

3rd Qtr 2024

Flexural Stress at 3.5% Strain - MPa

Grand Mean Sample K03: 70.982 MPa Grand Mean Sample K04: 71.163 MPa





Plastics Interlaboratory Testing Program

Analysis 738

Report #131

3rd Qtr 2024

Flexural Stress at Yield - MPa

WebCode	Data Flag	Sample K03			Sample K04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		84.39	5.13	1.85	84.34	4.89	1.49
2E6WFB		74.35	-4.91	-1.77	74.40	-5.05	-1.54
3MDQ8J		75.04	-4.22	-1.52	75.05	-4.40	-1.34
3RM7G8		76.75	-2.51	-0.90	77.52	-1.93	-0.59
434DQF		80.18	0.92	0.33	80.50	1.05	0.32
4HXHHX		84.44	5.18	1.87	84.15	4.70	1.43
6BB8L9		83.25	3.99	1.44	82.90	3.45	1.05
6HYMHT		79.52	0.26	0.09	79.48	0.03	0.01
6Q7MRU		75.92	-3.34	-1.21	73.46	-5.99	-1.82
6ZUF4Q		77.23	-2.03	-0.73	77.40	-2.05	-0.62
7HQA7F		78.80	-0.46	-0.17	78.82	-0.63	-0.19
94J472		81.53	2.27	0.82	81.81	2.36	0.72
9UGKQT		78.63	-0.63	-0.23	78.96	-0.49	-0.15
AHZN4Z		79.24	-0.02	-0.01	79.68	0.23	0.07
AQUJ8Q		78.97	-0.29	-0.11	78.75	-0.70	-0.21
AV87XN		79.78	0.52	0.19	81.88	2.43	0.74
B3X9EQ		74.64	-4.62	-1.67	75.19	-4.26	-1.29
BHD8MX		79.21	-0.05	-0.02	80.57	1.12	0.34
CWP64H		80.25	0.99	0.36	79.37	-0.08	-0.02
CYWM4Y		78.68	-0.58	-0.21	78.21	-1.24	-0.38
DTMQVJ	*	79.11	-0.15	-0.05	82.32	2.87	0.87
EKR2XE		80.09	0.83	0.30	80.35	0.90	0.27
ELK2RJ		81.49	2.23	0.80	83.11	3.66	1.11
F4YQNH		79.14	-0.12	-0.04	78.77	-0.67	-0.20
HNJ4FC		76.46	-2.80	-1.01	76.02	-3.42	-1.04
HW86PU		81.91	2.65	0.96	84.51	5.07	1.54
KD9TT6		80.90	1.64	0.59	81.28	1.83	0.56
KLLXMB	X	73.59	-5.67	-2.05	77.44	-2.01	-0.61
LZK2PF		82.66	3.40	1.23	82.93	3.49	1.06
PMHNY7	*	72.11	-7.15	-2.58	70.67	-8.78	-2.67
Q3UP93		79.04	-0.22	-0.08	79.84	0.39	0.12
QT6YNV		75.47	-3.79	-1.37	75.46	-3.99	-1.21
RFUZ27		81.44	2.18	0.78	81.26	1.81	0.55
TMNAZ4		81.12	1.86	0.67	80.18	0.73	0.22
TUNU3Y	*	75.94	-3.32	-1.20	72.80	-6.65	-2.02



Plastics Interlaboratory Testing Program

Analysis 738

Report #131

3rd Qtr 2024

Flexural Stress at Yield - MPa

WebCode	Data Flag	Sample K03			Sample K04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
VHQ9ED		80.74	1.48	0.53	81.40	1.95	0.59
VDVU96		77.72	-1.54	-0.56	77.95	-1.50	-0.46
VJZH37		80.80	1.54	0.56	81.61	2.16	0.66
X8ZNKT		81.34	2.08	0.75	81.42	1.98	0.60
YWDCJZ		78.04	-1.22	-0.44	78.70	-0.75	-0.23
ZDJQN2		82.42	3.16	1.14	83.54	4.09	1.25
ZU3GMZ		80.94	1.68	0.61	80.78	1.33	0.41

Summary Statistics

Sample K03

Sample K04

Grand Means

79.260 MPa

79.447 MPa

Stnd Dev Btwn Labs

2.772 MPa

3.286 MPa

Statistics based on 41 of 42 reporting participants

Sample K03: ABS/PC & Sample K04: ABS/PC

Comments on Assigned Data Flags for Test #738

KLLXMB (X) - Inconsistent in testing between samples.



Plastics Interlaboratory Testing Program

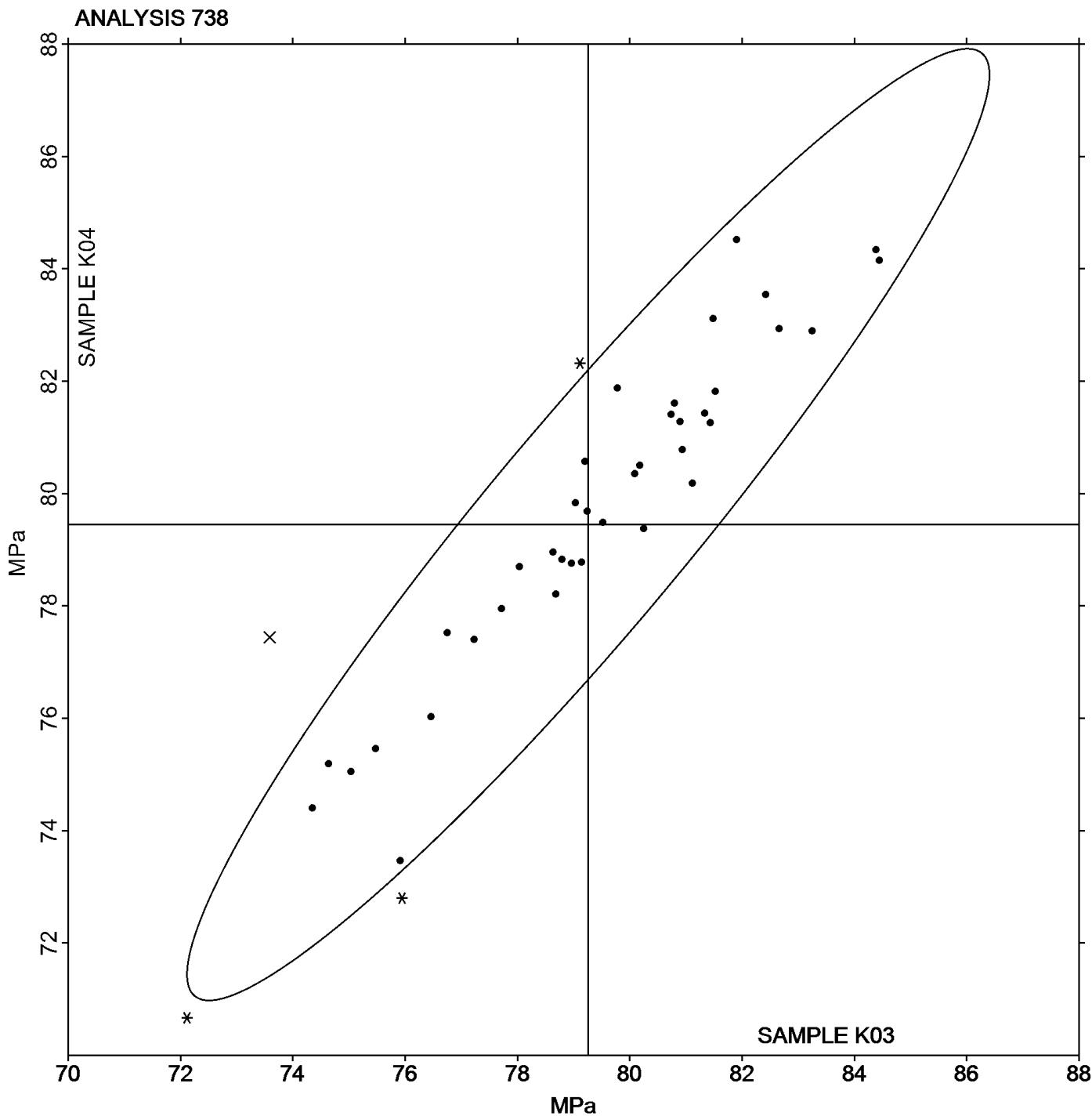
Analysis 738

Report #131

3rd Qtr 2024

Flexural Stress at Yield - MPa

Grand Mean Sample K03: 79.260 MPa Grand Mean Sample K04: 79.447 MPa





Plastics Interlaboratory Testing Program

Analysis 750

Report #131

3rd Qtr 2024

Flow Rates of Thermoplastics (190 or 230C/2.16 kg) - g/10 mins

WebCode	Data Flag	Sample X03			Sample X04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
24746Y		6.69	0.09	0.32	6.34	-0.08	-0.30	GO
2QY77Q		7.01	0.41	1.41	6.89	0.47	1.71	TO
2YRNCM		6.59	-0.01	-0.04	6.36	-0.06	-0.23	WZ
38MQGJ		7.23	0.63	2.17	6.91	0.49	1.78	TO
3AQH9W		6.53	-0.07	-0.23	6.45	0.04	0.13	GO
3B7VWU		6.67	0.07	0.25	6.46	0.04	0.16	DY
3MDQ8J		6.80	0.20	0.68	6.63	0.21	0.75	TO
3RM7G8	X	16.45	9.85	33.80	8.80	2.38	8.64	CE
3VAK6G		6.75	0.15	0.51	6.46	0.04	0.15	WZ
3ZY3JT	*	7.40	0.80	2.75	7.10	0.68	2.47	TO
434DQF		6.41	-0.19	-0.66	6.35	-0.07	-0.25	WZ
47PTPN		6.55	-0.05	-0.18	6.36	-0.06	-0.23	WZ
4HXHHX		6.15	-0.45	-1.55	6.14	-0.28	-1.01	KA
4TYVNQ		6.20	-0.40	-1.37	6.00	-0.42	-1.52	KA
62PY6R	X	8.15	1.55	5.31	8.32	1.90	6.89	DY
6BB8L9	X	16.44	9.84	33.77	16.52	10.10	36.64	TO
6JAP6R		6.85	0.26	0.88	6.65	0.23	0.84	TO
6Q7MRU		6.40	-0.20	-0.68	6.15	-0.27	-0.97	TO
6R2CRG		6.58	-0.02	-0.08	6.29	-0.13	-0.48	TO
6ZFX37		6.73	0.13	0.45	6.52	0.10	0.37	TO
76ZFTM	X	8.48	1.88	6.46	8.41	1.99	7.21	TO
8EMYML		6.85	0.25	0.86	6.55	0.13	0.48	TO
8PNCRR		6.13	-0.47	-1.61	6.04	-0.38	-1.39	DY
8Z7ULK		6.52	-0.08	-0.27	6.26	-0.16	-0.57	XX
A4E79B		6.76	0.16	0.54	6.68	0.26	0.95	TO
A6EYBP		6.35	-0.25	-0.86	6.39	-0.03	-0.12	TO
A8DG4B		6.81	0.21	0.71	6.66	0.24	0.86	TO
A99Z7C		6.74	0.14	0.49	6.61	0.19	0.70	TO
ADMFXP		6.73	0.13	0.44	6.47	0.05	0.20	XX
AHZN4Z		6.24	-0.36	-1.25	6.13	-0.29	-1.04	DY
AJQJP9		6.31	-0.29	-0.99	6.48	0.06	0.21	TO
APXZ6N		6.60	0.00	0.01	6.45	0.03	0.12	WZ
AQUJ8Q		6.80	0.20	0.69	6.60	0.18	0.66	TO
AV87XN	X	6.19	-0.41	-1.40	6.53	0.11	0.41	TO
B3X9EQ		6.08	-0.52	-1.79	6.17	-0.25	-0.89	DY



Plastics Interlaboratory Testing Program

Report #131

Analysis 750

3rd Qtr 2024

Flow Rates of Thermoplastics (190 or 230C/2.16 kg) - g/10 mins

WebCode	Data Flag	Sample X03			Sample X04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
BYYXHQ		6.93	0.33	1.12	6.63	0.21	0.78	DY
CP67BN		6.61	0.01	0.02	6.74	0.32	1.15	DY
CVUL2G		6.20	-0.40	-1.37	6.10	-0.32	-1.15	KA
CYWM4Y		6.35	-0.25	-0.85	6.40	-0.02	-0.06	CE
DZHGM		6.60	0.00	0.01	6.25	-0.17	-0.61	CE
DTMQVJ		6.97	0.37	1.26	6.47	0.05	0.19	DY
DW8DRC		6.35	-0.25	-0.85	6.25	-0.17	-0.61	TO
EKR2XE		7.06	0.46	1.59	6.83	0.41	1.48	TO
EVPLYE		6.77	0.17	0.57	6.53	0.11	0.39	TO
G9PNAQ		6.74	0.14	0.49	6.48	0.06	0.23	XX
GF66ZF		6.35	-0.25	-0.85	6.36	-0.06	-0.21	WZ
H8RDAG		6.60	0.00	0.01	6.60	0.18	0.66	TO
HNJ4FC	*	6.70	0.10	0.35	6.90	0.48	1.75	WZ
HT8TUU	X	0.65	-5.94	-20.39	0.63	-5.79	-21.00	TO
HW86PU		6.35	-0.25	-0.85	6.05	-0.37	-1.33	CE
HZA8DB	X	8.46	1.87	6.40	7.74	1.32	4.79	CE
JBTWVF		6.00	-0.60	-2.05	5.75	-0.67	-2.42	WZ
JCVYD6		6.80	0.20	0.69	6.49	0.07	0.26	TO
JRA3YY		6.40	-0.20	-0.69	6.25	-0.17	-0.61	TO
JW37PH	X	15.97	9.37	32.15	12.78	6.36	23.06	TO
KD9TT6	*	6.71	0.11	0.37	6.11	-0.31	-1.13	TO
LXBXXP		6.16	-0.43	-1.49	5.79	-0.63	-2.28	DY
LZK2PF		7.10	0.50	1.71	6.73	0.31	1.11	TO
N7ZLMC	X	5.96	-0.64	-2.19	6.36	-0.06	-0.23	TO
PDXH4N		6.49	-0.11	-0.39	6.50	0.08	0.30	TO
PKRMV4		6.61	0.01	0.04	6.50	0.08	0.28	GO
QT6YNV		6.86	0.26	0.90	6.55	0.14	0.49	TO
R3LZJV		6.83	0.23	0.78	6.59	0.17	0.61	TO
R9BHYR	X	13.32	6.72	23.06	12.24	5.82	21.12	WZ
RCNHUX		6.60	0.00	0.01	6.45	0.03	0.12	RR
RD7CWT		7.10	0.50	1.72	6.78	0.36	1.30	TO
RFUZ27		6.76	0.16	0.54	6.73	0.31	1.11	WZ
RR3N8H		6.56	-0.04	-0.13	6.61	0.19	0.68	WZ
RTX7AJ		6.40	-0.20	-0.68	6.20	-0.22	-0.79	WZ
TMNAZ4		6.72	0.12	0.40	6.60	0.18	0.64	GO



Plastics Interlaboratory Testing Program

Analysis 750

Report #131

3rd Qtr 2024

Flow Rates of Thermoplastics (190 or 230C/2.16 kg) - g/10 mins

WebCode	Data Flag	Sample X03			Sample X04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
TUNU3Y	*	5.80	-0.80	-2.74	5.60	-0.82	-2.97	TO
VBPFG6		6.59	0.00	-0.01	6.37	-0.04	-0.16	TO
VBQ9ED		6.79	0.19	0.64	6.58	0.16	0.59	WZ
VDEM3M		6.70	0.10	0.35	6.65	0.23	0.84	TO
VYWP7Y		6.28	-0.32	-1.10	6.17	-0.25	-0.90	TO
X28N7X		6.95	0.35	1.21	6.55	0.13	0.48	TO
X8ZNKT		6.42	-0.18	-0.61	6.29	-0.13	-0.48	WZ
XBZYFT		6.75	0.15	0.52	6.55	0.13	0.48	TO
XNJJX2		6.71	0.11	0.38	6.58	0.16	0.57	CE
XWXJEX		6.39	-0.20	-0.70	5.94	-0.48	-1.73	TO
XXT2FY		6.53	-0.07	-0.23	6.15	-0.27	-0.99	TO
YTGF8T	X	16.00	9.40	32.26	15.50	9.08	32.94	TO
YTWMKW	X	5.60	-1.00	-3.42	5.55	-0.87	-3.15	TO
YWDCJZ		6.52	-0.08	-0.28	6.29	-0.13	-0.48	TY
ZDJQN2		6.30	-0.30	-1.02	6.25	-0.17	-0.61	WZ
ZU3GMZ		6.49	-0.11	-0.39	6.29	-0.13	-0.48	TO

Summary Statistics

Grand Means

Sample X03

Sample X04

6.598 grams/10 mins

6.418 grams/10 mins

Stnd Dev Btwn Labs

0.291 grams/10 mins

0.276 grams/10 mins

Statistics based on 74 of 86 reporting participants

Sample X03: LDPE & Sample X04: LDPE



Plastics Interlaboratory Testing Program

Analysis 750

Report #131

3rd Qtr 2024

Flow Rates of Thermoplastics (190 or 230C/2.16 kg) - g/10 mins

Comments on Assigned Data Flags for Test #750

- YTGF8T (X) - Extreme data.
- 62PY6R (X) - Data for both samples are high. Possible Systematic Error. Inconsistent within the determinations of sample X04.
- N7ZLMC (X) - Inconsistent in testing between samples.
- YTWMKW (X) - Data for both samples are low. Possible Systematic Error.
- AV87XN (X) - Inconsistent in testing between samples.
- JW37PH (X) - Extreme data.
- R9BHYR (X) - Extreme data.
- 76ZFTM (X) - Data for both samples are high. Possible Systematic Error.
- HZA8DB (X) - Data for both samples are high. Possible Systematic Error.
- 3RM7G8 (X) - Data for both samples are high. Extreme data for sample X03.
- HT8TUU (X) - Extreme data.
- 6BB8L9 (X) - Extreme data.

Results by Methodology (as reported by laboratory)

Test Methodology	Sample X03 LDPE			Sample X04 LDPE			Labs Incl / Rpt
	Group Mean	Btwn Lab STD	Diff from GM	Group Mean	Btwn Lab STD	Diff from GM	
Procedure A of ASTM D1238	6.570	0.354	-0.028	6.404	0.314	-0.014	33/41
Procedure B of ASTM D1238	6.640	0.252	0.042	6.428	0.239	0.010	20/21
Procedure A of ISO 1133	6.553	0.203	-0.045	6.387	0.240	-0.031	15/18
Procedure B of ISO 1133	6.724	0.211	0.126	6.538	0.279	0.120	6/6

Key to Instrument Codes Reported by Participants

CE	Ceast	DY	Dynisco
GO	Gottfert	KA	Kayeness
RR	Ray Ran	TO	Tinius Olsen
TY	Toyoseiki Seisakusho	WZ	Zwick
XX	Instrument manufacturer not specified by lab		



Plastics Interlaboratory Testing Program

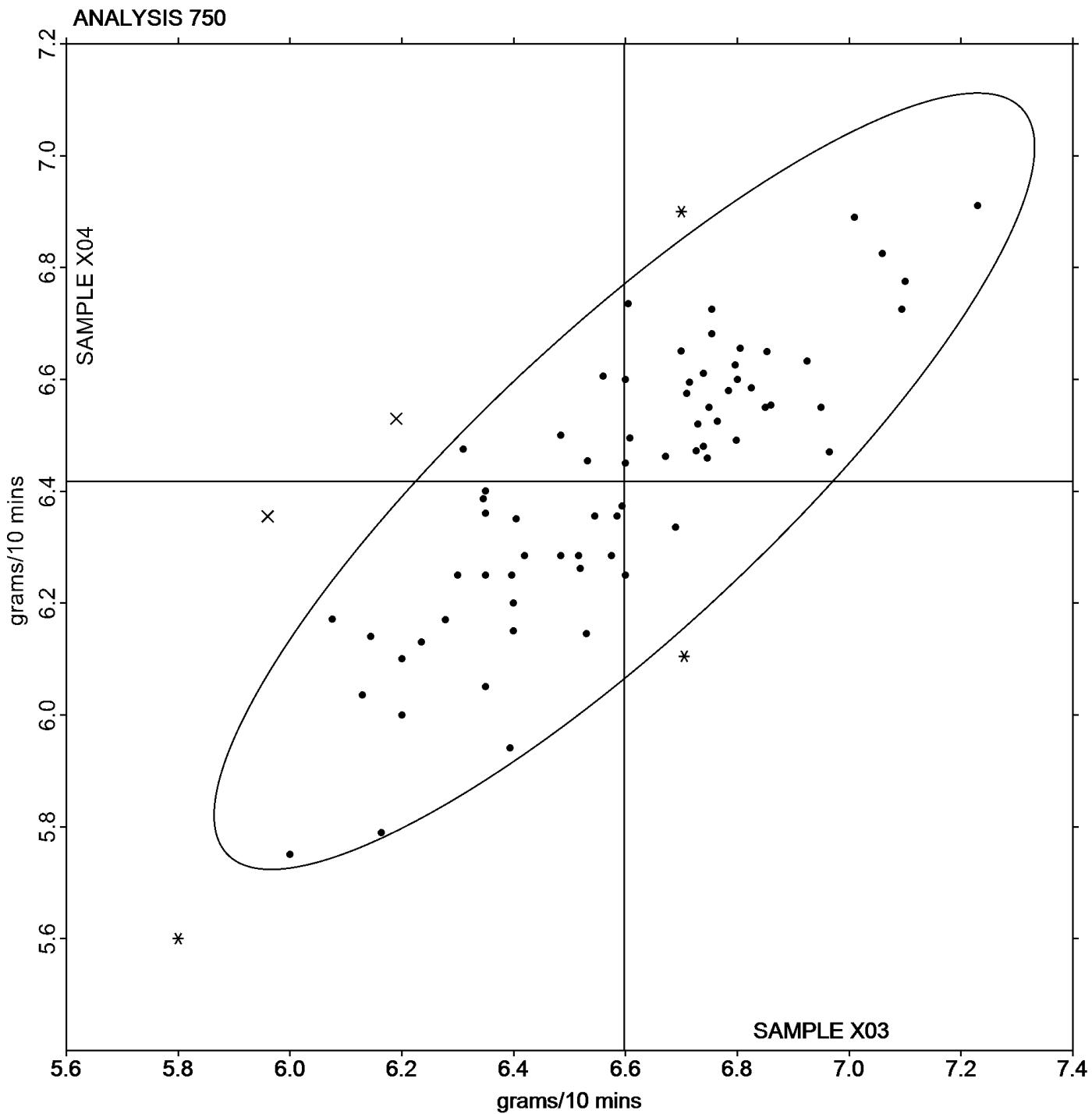
Analysis 750

Report #131

3rd Qtr 2024

Flow Rates of Thermoplastics (190 or 230C/2.16 kg) - g/10 mins

Grand Mean Sample X03: 6.5979 grams/10 mins Grand Mean Sample X04: 6.4179 grams/10 mins





Plastics Interlaboratory Testing Program

Analysis 755

Moisture Content of Plastics

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample Y03			Sample Y04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
3844KM		0.12407	-0.00538	-0.13	0.11830	-0.00874	-0.22	AZ
3AQH9W		0.03233	-0.09711	-2.41	0.03800	-0.08904	-2.22	MU
3B7VWU		0.14307	0.01362	0.34	0.15290	0.02586	0.64	CT
4HXHHX		0.10067	-0.02878	-0.71	0.09300	-0.03404	-0.85	MU
6HYMHT	*	0.23047	0.10102	2.51	0.20633	0.07929	1.97	MK
6Q7MRU		0.12933	-0.00011	0.00	0.12200	-0.00504	-0.13	MU
7F4TR2		0.10100	-0.02844	-0.71	0.09750	-0.02954	-0.74	SB
8EMYML		0.09300	-0.03644	-0.90	0.09133	-0.03571	-0.89	BA
8PNCRR		0.15163	0.02219	0.55	0.13063	0.00359	0.09	AZ
94J472		0.13400	0.00456	0.11	0.13533	0.00829	0.21	CT
9UGKQT		0.09000	-0.03944	-0.98	0.09000	-0.03704	-0.92	MU
A6EYBP		0.13700	0.00756	0.19	0.13400	0.00696	0.17	MU
AJQJP9	*	0.23167	0.10222	2.54	0.24500	0.11796	2.94	MU
APXZ6N		0.14300	0.01356	0.34	0.12500	-0.00204	-0.05	ML
AV87XN		0.13333	0.00389	0.10	0.15000	0.02296	0.57	AZ
CP67BN		0.13249	0.00305	0.08	0.11939	-0.00765	-0.19	MJ
CYWM4Y		0.13600	0.00656	0.16	0.13500	0.00796	0.20	MU
DW8DRC		0.10367	-0.02578	-0.64	0.10633	-0.02071	-0.52	XX
GF66ZF		0.13833	0.00889	0.22	0.13667	0.00963	0.24	MU
H8RDAG		0.09683	-0.03261	-0.81	0.11167	-0.01537	-0.38	MD
JW37PH		0.13180	0.00236	0.06	0.13010	0.00306	0.08	AZ
KVRN7D		0.15667	0.02722	0.68	0.16333	0.03629	0.90	MU
MTBAUN		0.10950	-0.01994	-0.50	0.11050	-0.01654	-0.41	MU
QKAYA3		0.21497	0.08552	2.12	0.21353	0.08649	2.15	CT
RFUZ27		0.09633	-0.03311	-0.82	0.07933	-0.04771	-1.19	MU
RR3N8H		0.14453	0.01509	0.37	0.14077	0.01373	0.34	BA
RVQ3WT		0.13000	0.00056	0.01	0.13500	0.00796	0.20	CS
V87EJX		0.12633	-0.00311	-0.08	0.12200	-0.00504	-0.13	MU
VYWP7Y		0.12423	-0.00521	-0.13	0.12240	-0.00464	-0.12	AZ
X8ZNKT		0.07463	-0.05481	-1.36	0.07193	-0.05511	-1.37	MU
XWXJEX		0.12627	-0.00318	-0.08	0.11303	-0.01401	-0.35	ML
XXT2FY		0.12500	-0.00444	-0.11	0.12500	-0.00204	-0.05	AZ



Plastics Interlaboratory Testing Program

Analysis 755

Moisture Content of Plastics

Report #131

3rd Qtr 2024

Summary Statistics

Sample Y03

Sample Y04

Grand Means

0.129442 Percent

0.127041 Percent

Stnd Dev Btwn Labs

0.040283 Percent

0.040166 Percent

Statistics based on 32 of 32 reporting participants

Sample Y03: ABS/PC & Sample Y04: ABS/PC

Results by Methodology (as reported by laboratory)

Test Methodology	Sample Y03 ABS/PC			Sample Y04 ABS/PC			Labs Incl / Rpt
	Group Mean	Btwn Lab STD	Diff from GM	Group Mean	Btwn Lab STD	Diff from GM	
ASTM D6869	0.138233	0.035432	0.0088	0.137255	0.039917	0.0102	11/11
ISO 15512 Method B	0.112020	0.074546	-0.0174	0.103520	0.064784	-0.0235	5/5
ASTM D6980	0.121510	0.020232	-0.0079	0.125581	0.023708	-0.0015	7/7
ASTM D7191	0.138817	0.041673	0.0094	0.133533	0.041516	0.0065	6/6

Key to Instrument Codes Reported by Participants

AZ Arizona Instruments Moisture Analyzer

BA Brabender Aquatrac

CS Cosa Instruments

CT Computrac Moisture Analyzer

MD Mettler Toledo DL37

MJ Mitsubishi KF Analyzer Series

MK Mitsubishi KF Analyzer CA

ML Metrohm Coulometer

MU Mettler Toledo

SB Sartorius Mark 3

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

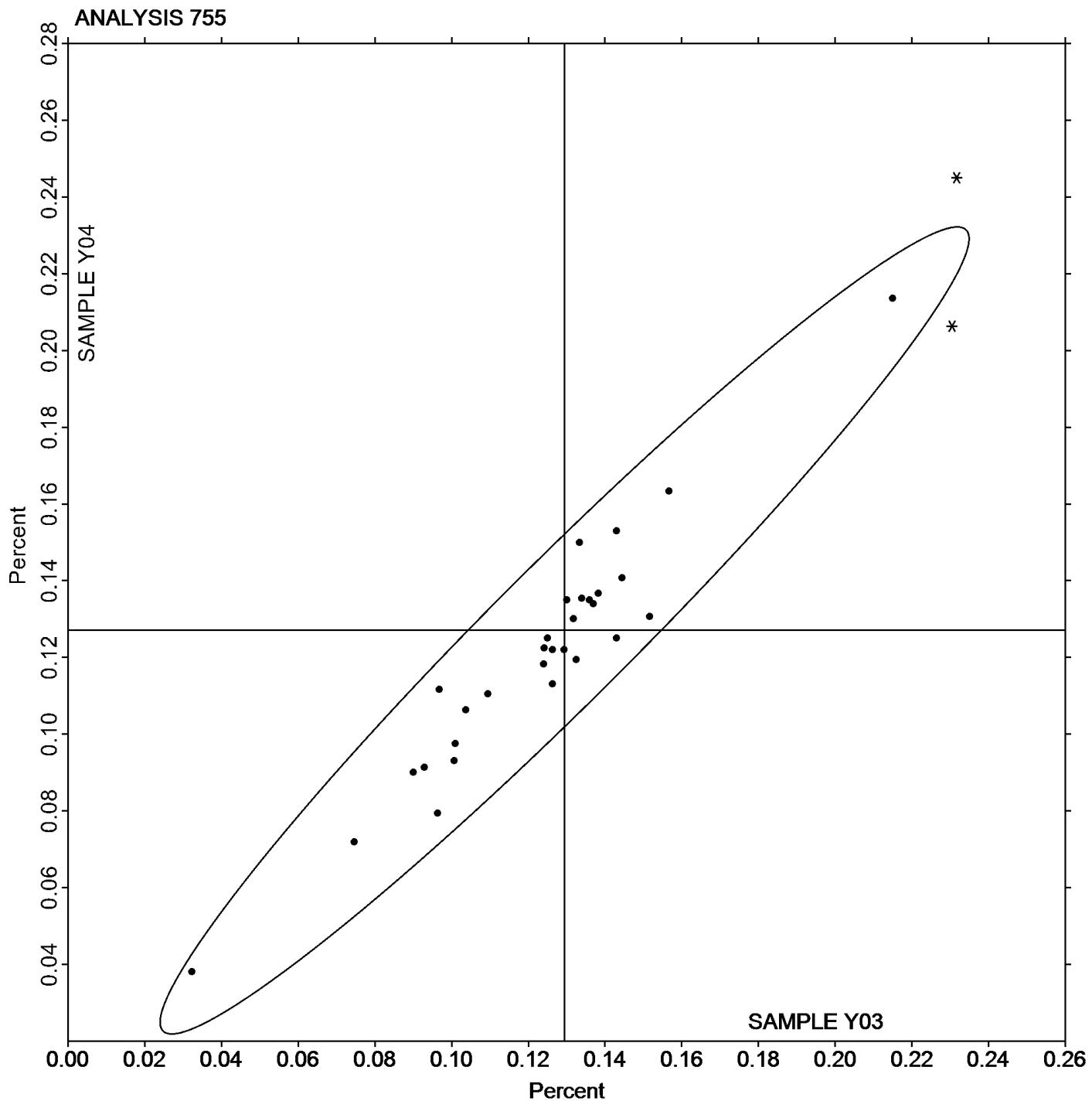
Analysis 755

Moisture Content of Plastics

Report #131

3rd Qtr 2024

Grand Mean Sample Y03: 0.12944 Percent Grand Mean Sample Y04: 0.12704 Percent





Plastics Interlaboratory Testing Program

Analysis 757

Report #131

3rd Qtr 2024

Ash Content in Thermoplastics - Percent

WebCode	Data Flag	Sample L03			Sample L04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
24746Y		20.825	0.041	0.76	20.825	0.038	0.62
3AQH9W		20.839	0.055	1.01	20.928	0.141	2.29
3B7VWU		20.805	0.021	0.39	20.810	0.023	0.37
3MDQ8J		20.795	0.011	0.20	20.810	0.023	0.37
3ZY3JT		20.840	0.056	1.04	20.820	0.033	0.54
47PTPN	X	20.605	-0.179	-3.30	20.505	-0.282	-4.58
4HXHHX		20.772	-0.012	-0.22	20.714	-0.073	-1.19
6HYMHT	X	20.100	-0.684	-12.63	20.000	-0.787	-12.79
6JAP6R		20.820	0.036	0.67	20.812	0.024	0.40
6Q7MRU	X	20.500	-0.284	-5.24	20.795	0.008	0.13
8Z7ULK	*	20.740	-0.044	-0.81	20.645	-0.142	-2.31
94J472	X	19.995	-0.789	-14.57	19.850	-0.937	-15.22
9UGKQT	X	20.305	-0.479	-8.85	20.370	-0.417	-6.77
ADMFXP	*	20.720	-0.064	-1.18	20.630	-0.157	-2.55
APXZ6N	X	20.810	0.026	0.48	21.055	0.268	4.35
AV87XN	X	19.900	-0.884	-16.33	19.800	-0.987	-16.03
B8B66L		20.780	-0.004	-0.07	20.825	0.038	0.62
BC8QVN		20.815	0.031	0.57	20.810	0.023	0.37
CP67BN		20.790	0.006	0.11	20.755	-0.032	-0.52
DMHRLE		20.750	-0.034	-0.63	20.800	0.013	0.21
DW8DRC	*	20.635	-0.149	-2.75	20.680	-0.107	-1.74
EKR2XE		20.785	0.001	0.02	20.725	-0.062	-1.01
ELK2RJ	X	21.010	0.226	4.18	20.980	0.193	3.13
FPYPAV	X	20.310	-0.474	-8.75	20.720	-0.067	-1.09
FU9CEK		20.792	0.008	0.16	20.857	0.070	1.13
GF66ZF		20.840	0.056	1.04	20.800	0.013	0.21
H4R8VB		20.775	-0.009	-0.16	20.790	0.003	0.05
LXBXXP		20.845	0.061	1.13	20.780	-0.007	-0.11
LZK2PF		20.815	0.031	0.57	20.805	0.018	0.29
PDXH4N	X	20.915	0.131	2.42	20.675	-0.112	-1.82
QCYRFK		20.800	0.016	0.30	20.855	0.068	1.10
QKAYA3	X	20.760	-0.024	-0.44	20.550	-0.237	-3.85
QT6YNV		20.760	-0.024	-0.44	20.815	0.028	0.45
RCNHUX	X	20.790	0.006	0.11	20.435	-0.352	-5.72
RD7CWT	X	20.350	-0.434	-8.01	19.875	-0.912	-14.82



Plastics Interlaboratory Testing Program

Analysis 757

Report #131

3rd Qtr 2024

Ash Content in Thermoplastics - Percent

WebCode	Data Flag	Sample L03			Sample L04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
RFUZ27		20.685	-0.099	-1.83	20.700	-0.087	-1.41
RR3N8H		20.860	0.076	1.41	20.855	0.068	1.10
RTX7AJ		20.780	-0.004	-0.07	20.800	0.013	0.21
RVQ3WT		20.825	0.041	0.76	20.865	0.078	1.27
TLW8FA		20.760	-0.024	-0.44	20.785	-0.002	-0.03
TMNAZ4	*	20.655	-0.129	-2.38	20.730	-0.057	-0.93
TUNU3Y	X	20.275	-0.509	-9.40	20.250	-0.537	-8.72
VBPFG6		20.825	0.041	0.76	20.810	0.023	0.37
VDEM3M		20.790	0.006	0.11	20.810	0.023	0.37
VJZH37		20.900	0.116	2.14	20.870	0.083	1.35
VYWP7Y		20.785	0.001	0.02	20.820	0.033	0.54
W9FTG7		20.755	-0.029	-0.53	20.715	-0.072	-1.17
X28N7X		20.780	-0.004	-0.07	20.795	0.008	0.13
X8ZNKT		20.698	-0.086	-1.58	20.725	-0.062	-1.00
XWXJEX		20.820	0.036	0.67	20.825	0.038	0.62
XXT2FY		20.815	0.031	0.57	20.810	0.023	0.37
ZBCDYM		20.809	0.025	0.46	20.758	-0.029	-0.47
ZCHXLM		20.751	-0.033	-0.61	20.769	-0.019	-0.30
ZDJQN2		20.725	-0.059	-1.09	20.750	-0.037	-0.60

Summary Statistics	Sample L03	Sample L04
Grand Means	20.7839 Percent	20.7871 Percent
Stnd Dev Btwn Labs	0.0541 Percent	0.0616 Percent
Statistics based on 40 of 54 reporting participants		

Sample L03: PP & Sample L04: PP

**Comments on Assigned Data Flags for Test #757**

- FPYPAV (X) - Data for sample L03 are low. Inconsistent within the determinations of sample L04.
- 47PTPN (X) - Data for both samples are low.
- 6HYMHT (X) - Data for both samples are low.
- APXZ6N (X) - Data for sample L04 are high. Inconsistent within the determinations of sample L04.
- 6Q7MRU (X) - Data for sample L03 are low.
- AV87XN (X) - Data for both samples are low. Inconsistent within the determinations of sample L04.
- ELK2RJ (X) - Data for both samples are high.
- 9UGKQT (X) - Data for both samples are low.
- RD7CWT (X) - Data for both samples are low. Inconsistent within the determinations of sample L04.
- RCNHUX (X) - Data for sample L04 are low.
- TUNU3Y (X) - Data for both samples are low. Inconsistent within the determinations of both samples.
- QKAYA3 (X) - Data for sample L04 are low. Inconsistent within the determinations of sample L04.
- 94J472 (X) - Data for both samples are low.
- PDXH4N (X) - Inconsistent in testing between samples. Inconsistent within the determinations of sample L04.



Plastics Interlaboratory Testing Program

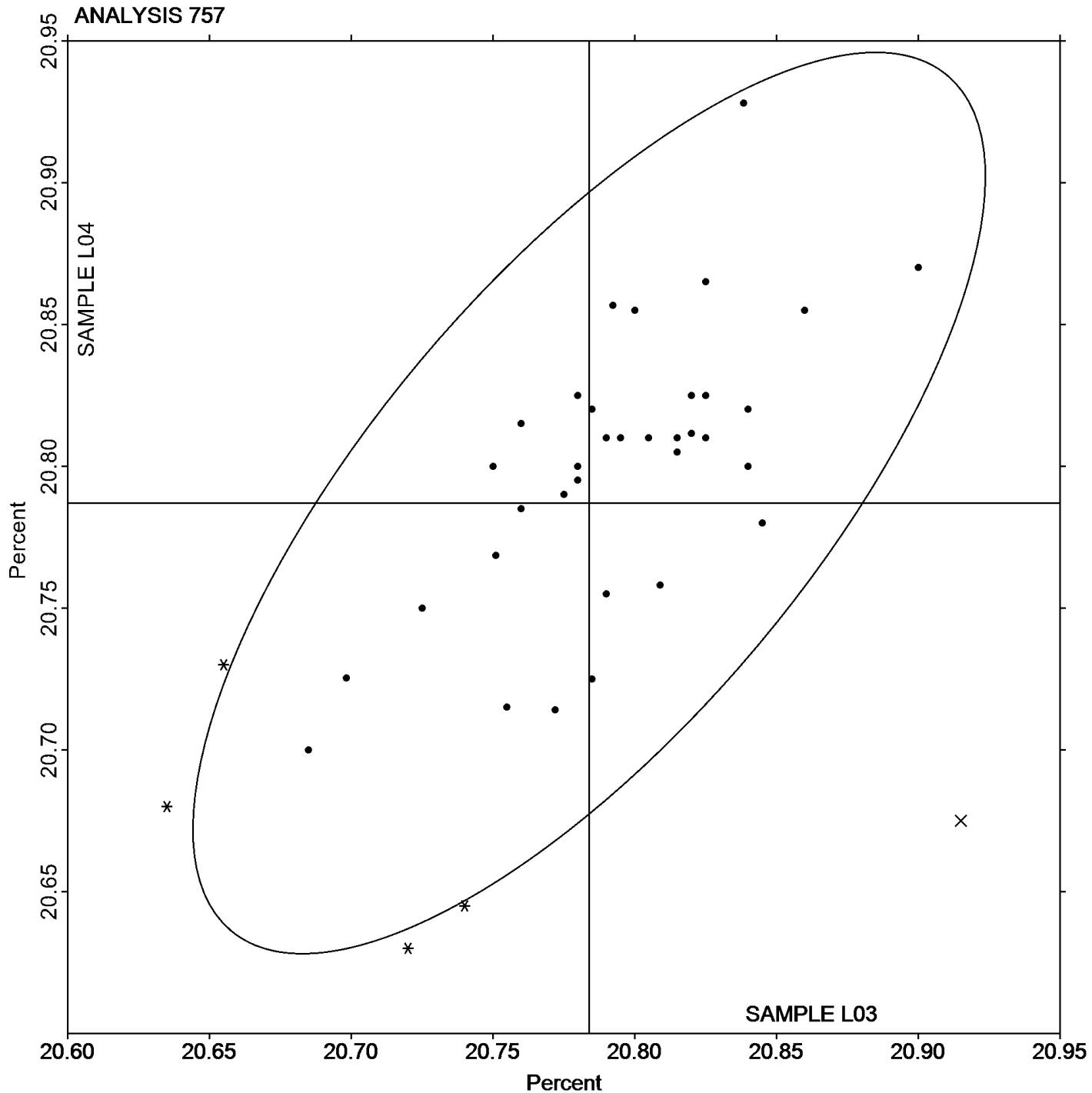
Report #131

Analysis 757

3rd Qtr 2024

Ash Content in Thermoplastics - Percent

Grand Mean Sample L03: 20.784 Percent Grand Mean Sample L04: 20.787 Percent





Plastics Interlaboratory Testing Program

Report #131

Analysis 758

3rd Qtr 2024

Thermogravimetric Analysis

WebCode	Data Flag	Sample A03			Sample A04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
3B7VWU		70.22	0.76	0.34	70.40	0.99	0.54	TA
4DMLFA		69.84	0.38	0.17	70.21	0.81	0.44	TA
4HXHHX		65.62	-3.84	-1.73	66.54	-2.87	-1.56	TA
64WJQ8		70.05	0.59	0.27	71.03	1.63	0.88	TA
9P36YF		70.52	1.06	0.48	71.52	2.11	1.15	TA
CP67BN		70.51	1.05	0.47	70.67	1.27	0.69	TA
CWP64H		70.27	0.81	0.37	69.97	0.56	0.31	XX
DTMQVJ		70.56	1.10	0.49	69.85	0.44	0.24	TA
FJB9CB		70.25	0.79	0.36	70.35	0.95	0.51	TA
HNJ4FC		69.74	0.28	0.13	69.88	0.47	0.26	TA
QY864X		70.00	0.54	0.24	69.99	0.59	0.32	TA
R9BHRY		70.60	1.14	0.51	70.31	0.91	0.49	TA
RLFQM2		70.42	0.96	0.43	70.48	1.07	0.58	TA
TLW8FA		65.51	-3.95	-1.78	66.14	-3.26	-1.78	PE
ULDRGX	*	74.61	5.15	2.32	71.18	1.77	0.96	TA
W8MPXW		66.65	-2.81	-1.27	67.18	-2.23	-1.21	TA
W9FTG7		70.44	0.98	0.44	70.33	0.92	0.50	TA
XWXJEX		67.95	-1.51	-0.68	66.40	-3.00	-1.64	TA
ZDJQN2		65.97	-3.49	-1.57	66.30	-3.10	-1.69	TA

Summary Statistics		Sample A03	Sample A04
Grand Means		69.457 Percent	69.405 Percent
Stnd Dev Btwn Labs		2.218 Percent	1.838 Percent

Statistics based on 19 of 19 reporting participants

Sample A03: PBT & Sample A04: PBT

Results by Methodology (as reported by laboratory)

Test Methodology	Sample A03			Sample A04			Labs Incl / Rpt
	Group Mean	Btwn Lab STD	Diff from GM	Group Mean	Btwn Lab STD	Diff from GM	
ASTM D3850	69.015	2.969	-0.44	68.982	2.166	-0.42	10/10
ISO 11358	69.822	0.878	0.37	69.747	1.530	0.34	7/7



Plastics Interlaboratory Testing Program
Analysis 758
Thermogravimetric Analysis

Report #131
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Key to Instrument Codes Reported by Participants

- PE** Perkins Elmer Instruments **TA** TA Instruments
XX Instrument manufacturer not specified by lab



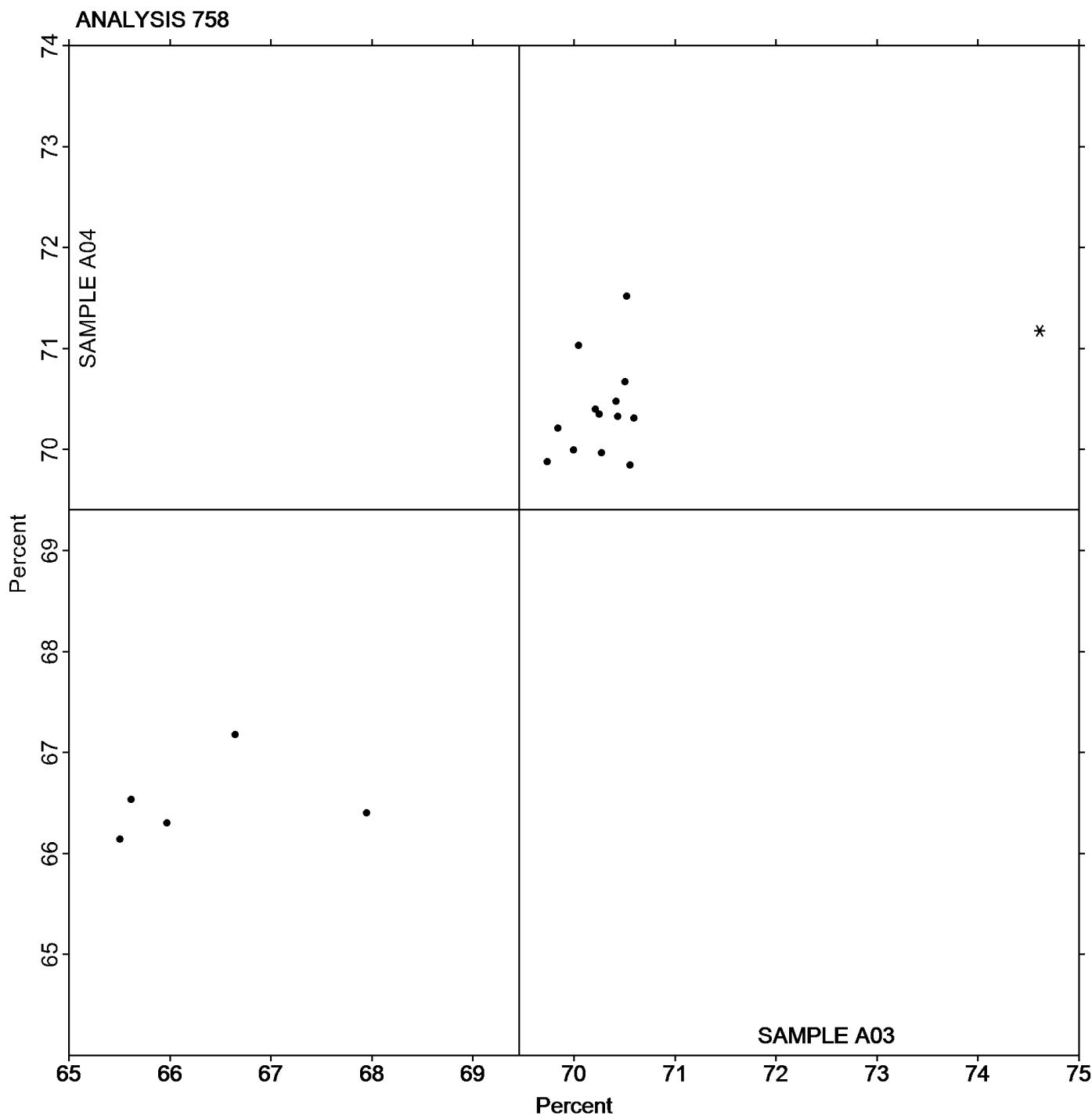
Plastics Interlaboratory Testing Program

Analysis 758 Thermogravimetric Analysis

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3rd Qtr 2024

Grand Mean Sample A03: 69.457 Percent Grand Mean Sample A04: 69.405 Percent



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Report #131

Analysis 760

3rd Qtr 2024

DSC Crystallization Temperature

WebCode	Data Flag	Sample W03			Sample W04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		120.27	1.04	0.36	119.67	0.42	0.14	NZ
2YRNMC		117.64	-1.59	-0.55	116.37	-2.88	-0.99	TA
3B7VWU		119.53	0.30	0.11	118.68	-0.57	-0.20	TA
62PY6R	*	117.33	-1.89	-0.66	114.94	-4.31	-1.48	TA
64WJQ8	*	114.27	-4.96	-1.73	116.97	-2.28	-0.78	TA
8Z7ULK		122.81	3.59	1.25	123.36	4.11	1.41	TA
9UGKQT		118.70	-0.52	-0.18	118.70	-0.55	-0.19	TA
ADMFXP		123.17	3.94	1.37	122.61	3.36	1.15	TA
AHVN4Z		117.69	-1.53	-0.53	117.90	-1.35	-0.46	TA
AMVAU3	X	172.25	53.03	18.45	171.80	52.55	18.04	TA
CP67BN		119.03	-0.20	-0.07	119.04	-0.21	-0.07	TA
CWP64H		114.11	-5.11	-1.78	115.73	-3.52	-1.21	XX
DC3QBE		116.58	-2.65	-0.92	116.69	-2.56	-0.88	PE
DTMQVJ		119.45	0.23	0.08	120.94	1.69	0.58	TA
DW8DRC		115.50	-3.72	-1.30	116.07	-3.18	-1.09	NZ
FJB9CB		120.79	1.57	0.54	121.31	2.06	0.71	TA
H8RDAG		125.29	6.06	2.11	125.30	6.05	2.08	TA
HNJ4FC		115.89	-3.33	-1.16	115.15	-4.10	-1.41	TA
HW86PU		118.14	-1.09	-0.38	118.44	-0.81	-0.28	MT
JW37PH	*	126.67	7.45	2.59	127.25	8.00	2.75	TA
LVQ63B		120.27	1.04	0.36	120.47	1.22	0.42	TA
PMHNY7		120.25	1.03	0.36	120.35	1.10	0.38	MT
Q7NLV8		119.20	-0.02	-0.01	119.80	0.55	0.19	NZ
QNPQXA		118.86	-0.36	-0.13	118.94	-0.31	-0.11	TA
R9BHYR		121.18	1.95	0.68	121.26	2.01	0.69	TA
TMNAZ4		121.41	2.19	0.76	120.43	1.18	0.40	TA
TUNU3Y		117.87	-1.35	-0.47	117.40	-1.85	-0.64	PE
ULDRGX		120.88	1.66	0.58	121.11	1.86	0.64	TA
W9FTG7		119.23	0.01	0.00	118.93	-0.32	-0.11	TA
X8ZNKT		117.59	-1.63	-0.57	117.86	-1.39	-0.48	TA
YHFV6Z	M	134.51	15.28	5.32	No data reported for this sample			SH
ZDJQN2		117.14	-2.08	-0.73	115.84	-3.41	-1.17	TA



Plastics Interlaboratory Testing Program
Analysis 760
DSC Crystallization Temperature

Report #131
3rd Qtr 2024

Summary Statistics

Sample W03

Sample W04

Grand Means

119.224 Degrees Celsius

119.251 Degrees Celsius

Stnd Dev Btwn Labs

2.874 Degrees Celsius

2.914 Degrees Celsius

Statistics based on 30 of 32 reporting participants

Sample W03: PP & Sample W04: PP

Comments on Assigned Data Flags for Test #760

YHFV6Z (M) - Participant did not submit data for sample W04.

AMVAU3 (X) - Extreme data.

Key to Instrument Codes Reported by Participants

MT Mettler Toledo Instruments

NZ Netzsch Instruments

PE Perkins Elmer Instruments

SH Shimadzu

TA TA Instruments

XX Instrument manufacturer not specified by lab



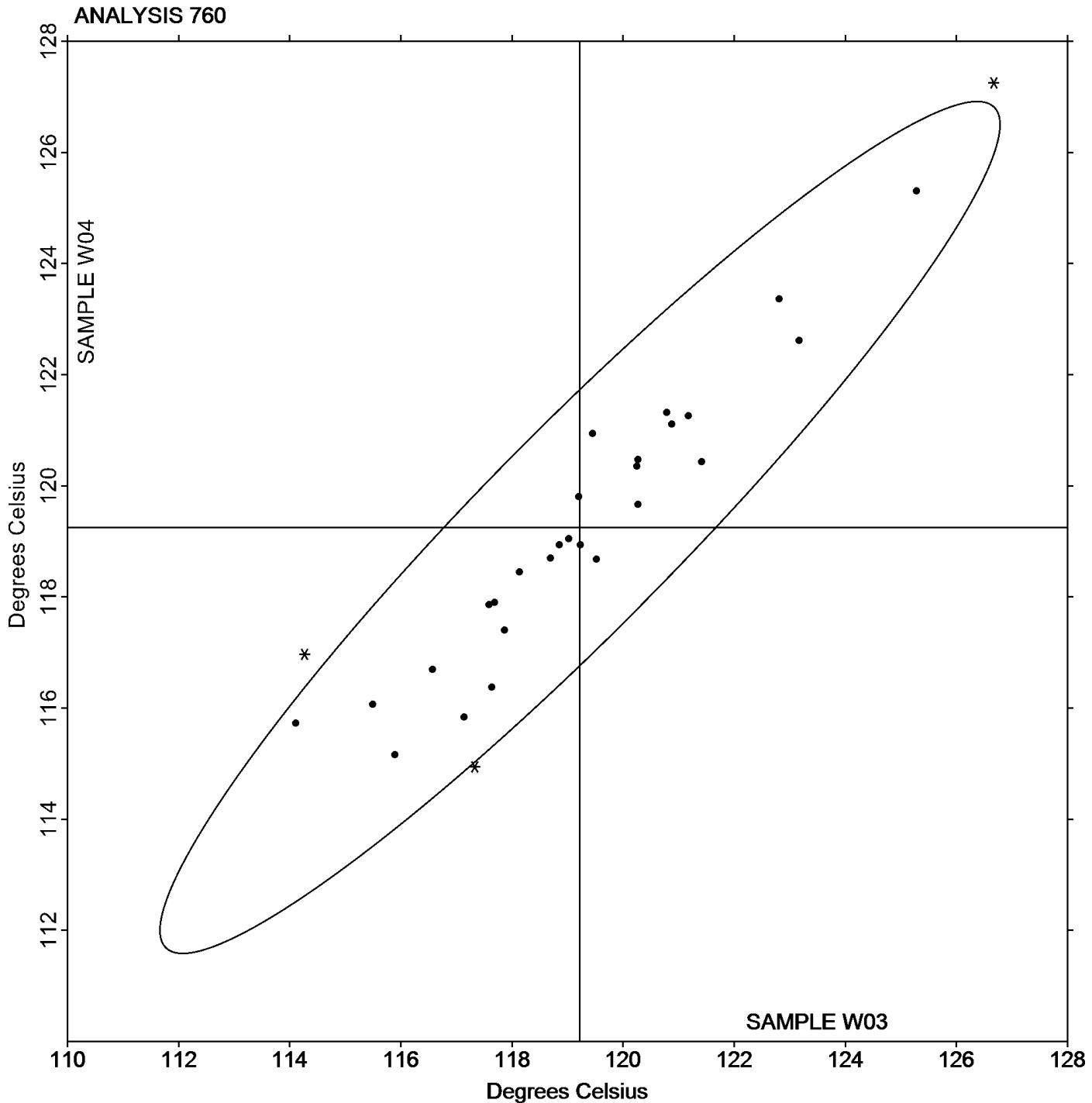
Plastics Interlaboratory Testing Program

Analysis 760 DSC Crystallization Temperature

Report #131

3rd Qtr 2024

Grand Mean Sample W03: 119.22 Degrees Celsius Grand Mean Sample W04: 119.25 Degrees Celsius





Plastics Interlaboratory Testing Program

Report #131

Analysis 761

3rd Qtr 2024

DSC Melt Temperature

WebCode	Data Flag	Sample W03			Sample W04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		162.63	-2.53	-1.53	162.17	-3.06	-1.69	NZ
2YRNCM		165.41	0.25	0.15	164.35	-0.87	-0.48	TA
3B7VWU		165.72	0.56	0.34	166.80	1.58	0.87	TA
3VAK6G		166.43	1.27	0.77	166.20	0.97	0.54	PE
3ZY3JT		165.70	0.54	0.33	165.73	0.51	0.28	MT
62PY6R	*	167.68	2.52	1.53	169.70	4.47	2.48	TA
64WJQ8		165.20	0.04	0.02	165.27	0.04	0.02	TA
6HYMHT		165.76	0.60	0.37	165.81	0.58	0.32	TA
6JAP6R		165.47	0.31	0.19	165.37	0.15	0.08	TA
8EMYML		161.77	-3.39	-2.06	161.63	-3.59	-1.99	TA
8Z7ULK		166.62	1.46	0.89	166.24	1.02	0.56	XX
9UGKQT		165.00	-0.16	-0.10	165.27	0.04	0.02	TA
AAMKYM	*	163.32	-1.84	-1.12	165.86	0.63	0.35	PE
ADMFXP		165.53	0.37	0.22	166.05	0.82	0.46	XX
AHZN4Z		163.72	-1.44	-0.88	163.81	-1.42	-0.78	TA
CP67BN		165.45	0.29	0.17	165.26	0.03	0.02	TA
CWP64H		163.33	-1.83	-1.11	163.55	-1.67	-0.93	XX
DC3QBE		166.13	0.97	0.59	166.82	1.60	0.88	PE
DTMQVJ		164.74	-0.42	-0.26	164.61	-0.62	-0.34	TA
DW8DRC		168.47	3.31	2.01	167.97	2.74	1.52	NZ
FJB9CB		165.62	0.46	0.28	164.86	-0.37	-0.20	TA
H8RDAG		164.63	-0.53	-0.32	164.73	-0.49	-0.27	TA
HW86PU		167.45	2.29	1.39	165.78	0.55	0.31	MT
JW37PH		165.54	0.38	0.23	165.88	0.66	0.36	TA
LVQ63B		164.47	-0.69	-0.42	164.60	-0.63	-0.35	TA
PMHNY7		165.10	-0.06	-0.04	164.53	-0.70	-0.39	MT
Q7NLV8		162.93	-2.23	-1.35	162.70	-2.53	-1.40	NZ
QKAYA3	X	248.85	83.69	50.82	251.77	86.54	47.89	TA
QNPQXA		165.28	0.12	0.08	164.83	-0.40	-0.22	TA
R9BHYR		163.12	-2.04	-1.24	162.16	-3.07	-1.70	TA
TMNAZ4		164.04	-1.12	-0.68	165.20	-0.03	-0.01	TA
TUNU3Y		167.26	2.10	1.28	166.38	1.15	0.64	PE
ULDRGX		162.21	-2.95	-1.79	162.16	-3.07	-1.70	TA
W9FTG7		166.53	1.37	0.83	166.27	1.04	0.58	TA
X8ZNKT		163.10	-2.06	-1.25	163.39	-1.84	-1.02	TA



Plastics Interlaboratory Testing Program

Analysis 761

DSC Melt Temperature

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample W03			Sample W04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
XWXJEX		167.75	2.59	1.58	169.40	4.17	2.31	TA
YHFV6Z		167.24	2.08	1.26	166.81	1.59	0.88	SH
ZDJQN2		164.56	-0.60	-0.36	165.18	-0.04	-0.02	TA

Summary Statistics	Sample W03	Sample W04
Grand Means	165.160 Degrees Celsius	165.225 Degrees Celsius
Stnd Dev Btwn Labs	1.647 Degrees Celsius	1.807 Degrees Celsius
Statistics based on 37 of 38 reporting participants		

Sample W03: PP & Sample W04: PP

Comments on Assigned Data Flags for Test #761

QKAYA3 (X) - Extreme data.

Key to Instrument Codes Reported by Participants

MT Mettler Toledo Instruments

NZ Netzsch Instruments

PE Perkins Elmer Instruments

SH Shimadzu

TA TA Instruments

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

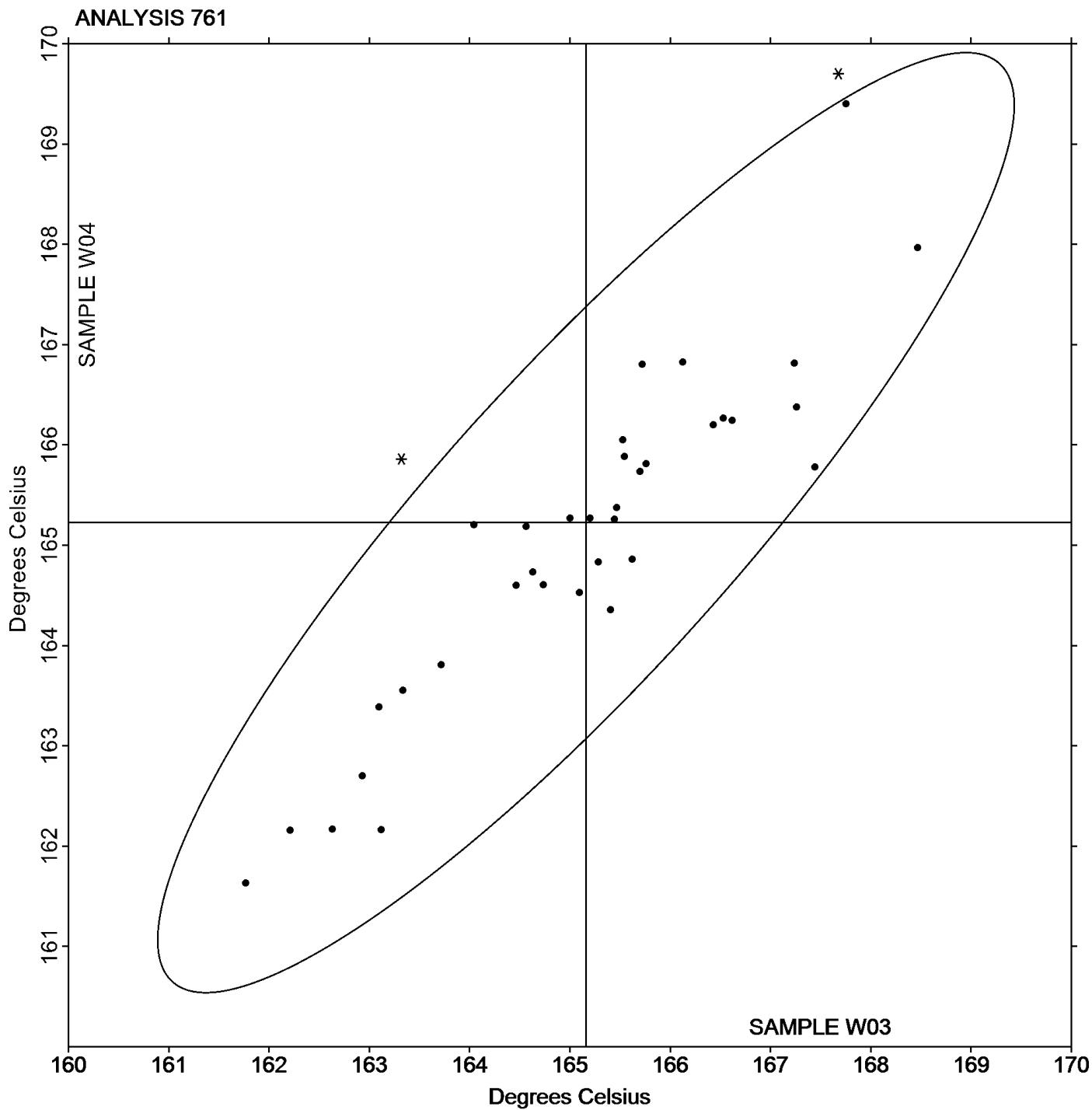
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Analysis 761

DSC Melt Temperature

Grand Mean Sample W03: 165.16 Degrees Celsius **Grand Mean Sample W04: 165.23 Degrees Celsius**





Plastics Interlaboratory Testing Program

Analysis 762

DSC Enthalpy of Crystallization

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample W03			Sample W04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		99.28	-2.89	-0.34	96.66	-6.13	-0.95	NZ
2YRNMC		102.60	0.43	0.05	101.90	-0.89	-0.14	TA
3B7VWU		102.63	0.47	0.06	100.87	-1.92	-0.30	TA
62PY6R		100.18	-1.99	-0.24	94.62	-8.17	-1.27	TA
64WJQ8		116.93	14.76	1.75	106.62	3.84	0.60	TA
9UGKQT		108.85	6.68	0.79	110.47	7.69	1.19	TA
AHXN4Z		105.21	3.04	0.36	105.32	2.53	0.39	TA
CP67BN		107.75	5.59	0.66	107.76	4.98	0.77	TA
CWP64H		89.29	-12.88	-1.52	94.35	-8.44	-1.31	XX
DC3QBE		92.33	-9.84	-1.16	94.42	-8.37	-1.30	PE
DTMQVJ		104.90	2.73	0.32	106.33	3.55	0.55	TA
DW8DRC		92.03	-10.13	-1.20	99.74	-3.04	-0.47	NZ
FJB9CB		96.09	-6.07	-0.72	96.66	-6.13	-0.95	TA
H8RDAG		102.87	0.70	0.08	104.83	2.05	0.32	TA
HW86PU	*	89.73	-12.43	-1.47	103.33	0.55	0.09	XX
LVQ63B		103.05	0.88	0.10	102.90	0.11	0.02	TA
PMHNY7		113.79	11.62	1.38	113.42	10.64	1.65	MT
Q7NLV8		100.81	-1.36	-0.16	100.63	-2.16	-0.33	XX
QNPQXA		93.94	-8.23	-0.97	97.21	-5.57	-0.86	TA
R9BHYR		96.31	-5.86	-0.69	107.03	4.25	0.66	TA
TMNAZ4		110.64	8.47	1.00	106.99	4.20	0.65	TA
TUNU3Y		96.91	-5.26	-0.62	96.33	-6.46	-1.00	PE
ULDRGX	*	125.63	23.47	2.78	121.90	19.11	2.97	TA
W9FTG7		102.25	0.08	0.01	101.50	-1.29	-0.20	TA
X8ZNKT		98.60	-3.56	-0.42	97.66	-5.13	-0.80	TA
ZDJQN2		103.74	1.57	0.19	102.97	0.18	0.03	TA

Summary Statistics

Sample W03

Sample W04

Grand Means

102.166 Joules Per Gram

102.785 Joules Per Gram

Stnd Dev Btwn Labs

8.451 Joules Per Gram

6.445 Joules Per Gram

Statistics based on 26 of 26 reporting participants

Sample W03: PP & Sample W04: PP



Plastics Interlaboratory Testing Program
Analysis 762
DSC Enthalpy of Crystallization

Report #131
3rd Qtr 2024

Key to Instrument Codes Reported by Participants

MT Mettler Toledo Instruments

NZ Netzsch Instruments

PE Perkins Elmer Instruments

TA TA Instruments

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

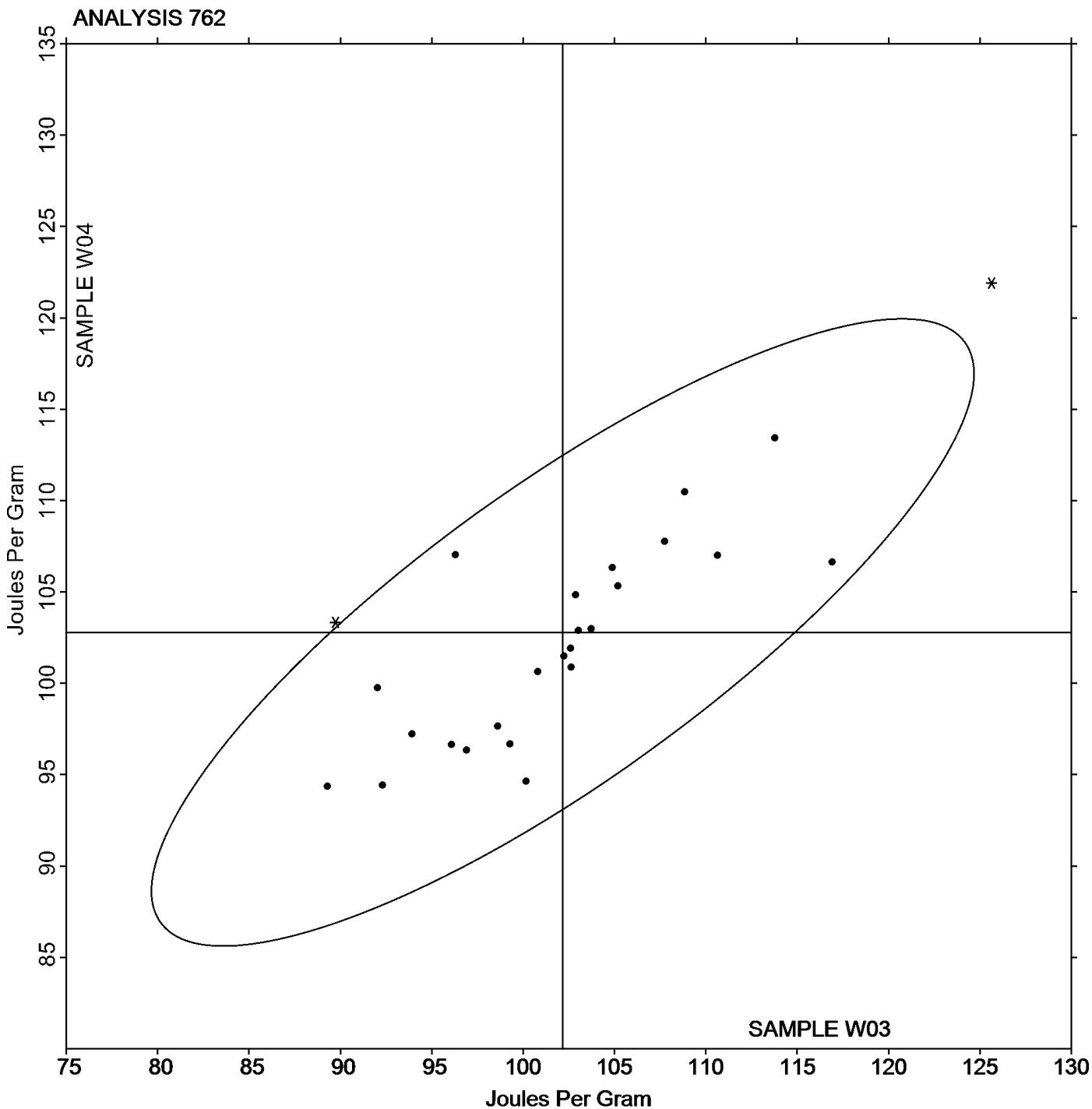
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Analysis 762

3rd Qtr 2024

DSC Enthalpy of Crystallization

Grand Mean Sample W03: 102.17 Joules Per Gram Grand Mean Sample W04: 102.79 Joules Per Gram





Plastics Interlaboratory Testing Program

Analysis 763

DSC Enthalpy of Fusion

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample W03			Sample W04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		101.00	1.35	0.12	97.13	-2.89	-0.32	NZ
2YRNQM		101.73	2.08	0.19	103.83	3.81	0.42	TA
3B7VWU		95.61	-4.04	-0.37	93.68	-6.34	-0.70	TA
3VAK6G		116.57	16.91	1.56	106.17	6.14	0.68	PE
62PY6R		92.11	-7.55	-0.69	86.76	-13.26	-1.47	TA
64WJQ8		112.89	13.24	1.22	105.57	5.55	0.61	TA
9UGKQT		114.23	14.58	1.34	115.99	15.97	1.77	TA
AHZN4Z		107.79	8.14	0.75	109.34	9.32	1.03	TA
CP67BN		105.33	5.68	0.52	105.45	5.43	0.60	TA
CWP64H		80.06	-19.59	-1.80	93.06	-6.96	-0.77	XX
DC3QBE		90.18	-9.48	-0.87	90.05	-9.98	-1.11	PE
DTMQVJ		99.74	0.08	0.01	101.15	1.13	0.12	TA
DW8DRC		87.86	-11.80	-1.09	94.38	-5.64	-0.62	NZ
FJB9CB		89.69	-9.97	-0.92	89.84	-10.18	-1.13	TA
H8RDAG		102.20	2.55	0.23	103.97	3.94	0.44	TA
HW86PU	*	70.87	-28.79	-2.65	79.63	-20.39	-2.26	XX
LVQ63B		104.51	4.86	0.45	102.90	2.87	0.32	TA
PMHNY7		109.52	9.86	0.91	109.61	9.58	1.06	MT
Q7NLV8		103.97	4.31	0.40	104.17	4.14	0.46	NZ
QNPQXA		93.40	-6.25	-0.58	95.16	-4.87	-0.54	TA
R9BHYR		101.76	2.11	0.19	112.63	12.61	1.40	XX
TMNAZ4		114.97	15.32	1.41	110.55	10.52	1.17	TA
TUNU3Y		89.79	-9.86	-0.91	86.87	-13.15	-1.46	PE
ULDRGX		104.99	5.33	0.49	106.30	6.28	0.70	TA
W9FTG7		90.94	-8.72	-0.80	91.45	-8.57	-0.95	TA
X8ZNKT		103.45	3.79	0.35	99.83	-0.19	-0.02	TA
ZDJQN2		105.47	5.82	0.54	105.18	5.16	0.57	TA

Summary Statistics	Sample W03	Sample W04
Grand Means	99.652 Joules Per Gram	100.024 Joules Per Gram
Stnd Dev Btwn Labs	10.860 Joules Per Gram	9.025 Joules Per Gram

Statistics based on 27 of 27 reporting participants

Sample W03: PP & Sample W04: PP



Plastics Interlaboratory Testing Program
Analysis 763
DSC Enthalpy of Fusion

Report #131
3rd Qtr 2024

Key to Instrument Codes Reported by Participants

MT Mettler Toledo Instruments

NZ Netzsch Instruments

PE Perkins Elmer Instruments

TA TA Instruments

XX Instrument manufacturer not specified by lab



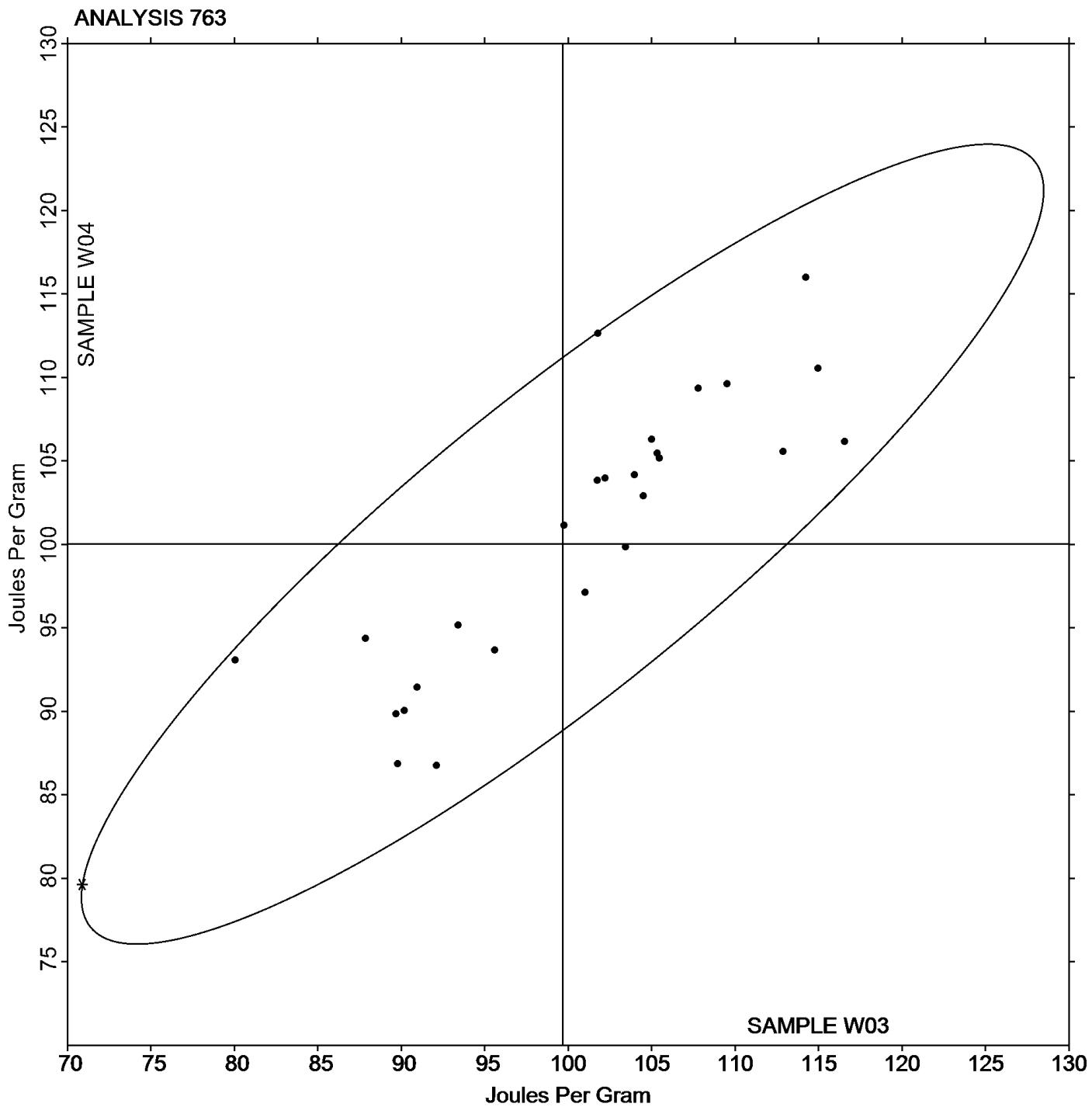
Plastics Interlaboratory Testing Program

Analysis 763
DSC Enthalpy of Fusion

Report #131

3rd Qtr 2024

Grand Mean Sample W03: 99.652 Joules Per Gram Grand Mean Sample W04: 100.02 Joules Per Gram





Plastics Interlaboratory Testing Program

Analysis 764

DSC Glass Transition Temperature

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample V03			Sample V04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		104.60	-3.48	-1.32	105.53	-2.77	-1.13	NZ
2YRNCM		109.18	1.10	0.42	109.57	1.27	0.52	TA
3B7VWU		107.01	-1.07	-0.40	106.95	-1.36	-0.56	TA
62PY6R		111.81	3.73	1.41	112.14	3.83	1.56	TA
64WJQ8		107.77	-0.32	-0.12	107.70	-0.61	-0.25	TA
9UGKQT		105.60	-2.48	-0.94	105.77	-2.54	-1.04	TA
AHZN4Z		108.89	0.81	0.30	109.46	1.16	0.47	TA
CP67BN		107.29	-0.79	-0.30	107.00	-1.31	-0.53	TA
CWP64H		109.61	1.53	0.58	109.68	1.37	0.56	XX
DC3QBE		108.16	0.08	0.03	107.95	-0.36	-0.15	PE
DTMQVJ	*	113.97	5.89	2.22	112.34	4.03	1.65	TA
DW8DRC		112.43	4.35	1.64	112.30	3.99	1.63	NZ
FJB9CB		109.58	1.50	0.57	110.22	1.91	0.78	TA
H8RDAG		106.47	-1.62	-0.61	106.23	-2.07	-0.85	TA
HNJ4FC		107.93	-0.15	-0.06	108.16	-0.15	-0.06	TA
HW86PU	*	106.63	-1.45	-0.55	108.47	0.16	0.07	MT
JW37PH		108.26	0.18	0.07	108.63	0.32	0.13	TA
LVQ63B	*	101.00	-7.08	-2.67	102.00	-6.31	-2.58	TA
PMHNY7		108.61	0.53	0.20	108.66	0.35	0.14	MT
Q7NLV8		106.33	-1.75	-0.66	106.70	-1.61	-0.66	NZ
QNPQXA		105.78	-2.30	-0.87	106.39	-1.92	-0.78	TA
R9BHYR		107.05	-1.03	-0.39	107.63	-0.68	-0.28	TA
TMNAZ4		110.31	2.23	0.84	110.52	2.21	0.90	TA
TUNU3Y		107.32	-0.76	-0.29	106.66	-1.65	-0.67	PE
ULDRGX		105.74	-2.34	-0.88	105.65	-2.65	-1.08	TA
W9FTG7		105.87	-2.22	-0.84	106.37	-1.94	-0.79	TA
X8ZNKT		109.38	1.30	0.49	108.99	0.68	0.28	TA
YHFV6Z		112.32	4.24	1.60	112.72	4.41	1.80	SH
ZDJQN2		109.47	1.39	0.52	110.52	2.22	0.91	TA



Plastics Interlaboratory Testing Program
Analysis 764
DSC Glass Transition Temperature

Report #131
3rd Qtr 2024

Summary Statistics

Sample V03

Sample V04

Grand Means

108.083 Degrees Celsius

108.306 Degrees Celsius

Stnd Dev Btwn Labs

2.648 Degrees Celsius

2.449 Degrees Celsius

Statistics based on 29 of 29 reporting participants

Sample V03: ABS & Sample V04: ABS

Key to Instrument Codes Reported by Participants

MT Mettler Toledo Instruments

NZ Netzsch Instruments

PE Perkins Elmer Instruments

SH Shimadzu

TA TA Instruments

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

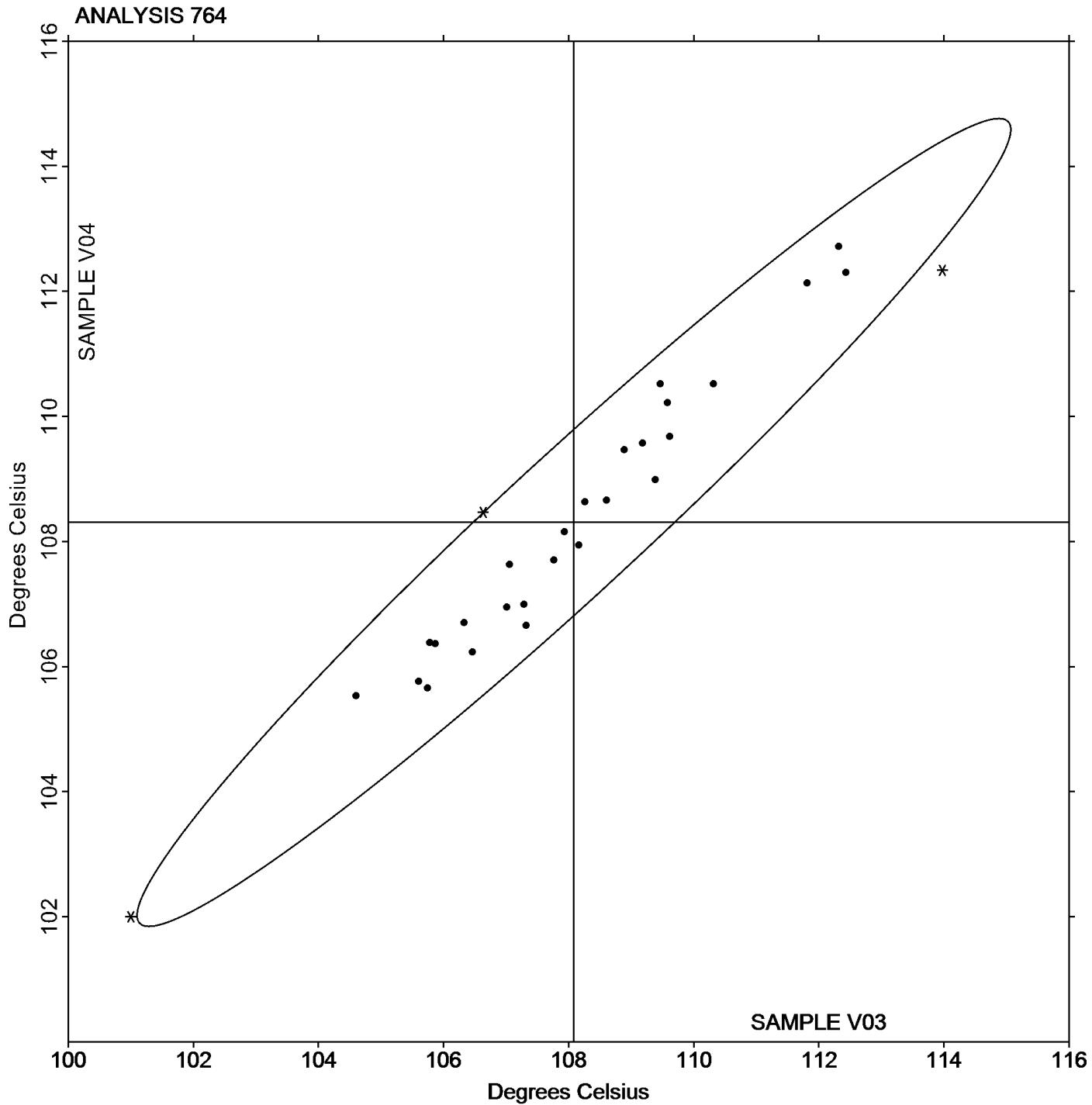
Analysis 764

DSC Glass Transition Temperature

Report #131

3rd Qtr 2024

Grand Mean Sample V03: 108.08 Degrees Celsius Grand Mean Sample V04: 108.31 Degrees Celsius





Plastics Interlaboratory Testing Program

Analysis 765

Report #131

3rd Qtr 2024

Research Crystallization Peak Temperature

WebCode	Data Flag	Sample W03			Sample W04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		120.00	-0.10	-0.04	118.83	-1.21	-0.47	NZ
9UGKQT		118.70	-1.40	-0.63	118.70	-1.34	-0.52	TA
CP67BN		123.35	3.26	1.47	123.87	3.83	1.48	TA
DTMQVJ		120.24	0.15	0.07	121.64	1.60	0.62	TA
FJB9CB		120.79	0.69	0.31	121.15	1.10	0.43	TA
H8RDAG		125.27	5.17	2.33	125.30	5.26	2.03	TA
HNJ4FC	M	116.55	-3.55	-1.60	No data reported for this sample			XX
LVQ63B		120.27	0.17	0.08	120.47	0.42	0.16	TA
QNPQXA		118.86	-1.24	-0.56	118.94	-1.11	-0.43	TA
RLFQM2		119.40	-0.70	-0.31	119.10	-0.94	-0.36	XX
ULDRGX		120.88	0.78	0.35	121.11	1.07	0.41	TA
X8ZNKT		117.59	-2.50	-1.13	117.86	-2.18	-0.84	TA
XXT2FY		118.77	-1.33	-0.60	117.77	-2.28	-0.88	TA
ZDJQN2		117.14	-2.96	-1.33	115.84	-4.20	-1.62	TA

Summary Statistics

Sample W03

Sample W04

Grand Means

120.097 Degrees Celsius

120.044 Degrees Celsius

Stnd Dev Btwn Labs

2.222 Degrees Celsius

2.588 Degrees Celsius

Statistics based on 13 of 14 reporting participants

Sample W03: PP & Sample W04: PP

Comments on Assigned Data Flags for Test #765

HNJ4FC (M) - Participant did not submit data for sample W04.

Key to Instrument Codes Reported by Participants

NZ Netzsch Instruments

TA TA Instruments

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

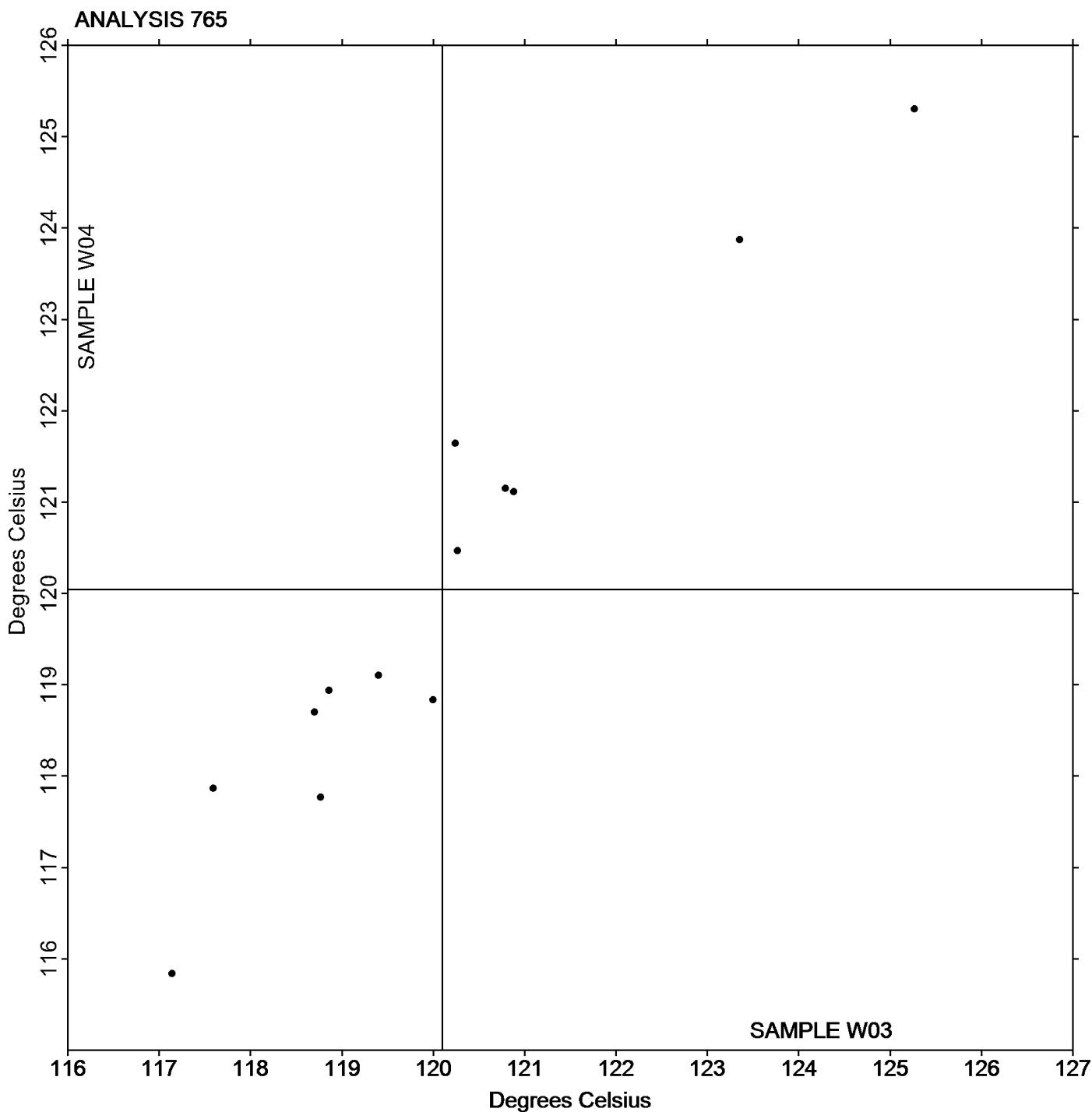
Report #131

Analysis 765

3rd Qtr 2024

Research Crystallization Peak Temperature

Grand Mean Sample W03: 120.10 Degrees Celsius Grand Mean Sample W04: 120.04 Degrees Celsius



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 766

Report #131

3rd Qtr 2024

Research Melting Peak Temperature

WebCode	Data Flag	Sample W03			Sample W04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		163.17	-1.34	-1.17	162.87	-1.67	-1.41	NZ
6JAP6R		165.47	0.96	0.84	165.37	0.83	0.70	TA
9UGKQT		165.00	0.49	0.43	165.27	0.73	0.61	TA
CP67BN		164.94	0.44	0.38	165.24	0.70	0.59	TA
DTMQVJ		165.69	1.18	1.03	166.19	1.65	1.38	TA
FJB9CB		165.62	1.12	0.97	164.86	0.32	0.27	TA
H8RDAG		164.63	0.13	0.11	164.73	0.19	0.16	XX
LVQ63B		164.47	-0.04	-0.04	164.60	0.06	0.05	TA
QNPQXA		165.28	0.78	0.68	164.83	0.29	0.24	TA
RLFQM2		165.80	1.29	1.13	165.77	1.23	1.03	XX
ULDRGX		162.21	-2.30	-2.00	162.16	-2.38	-2.01	TA
X8ZNKT		163.10	-1.41	-1.23	163.39	-1.15	-0.97	TA
XXT2FY		163.17	-1.34	-1.17	163.13	-1.41	-1.19	TA
ZDJQN2		164.56	0.06	0.05	165.18	0.64	0.54	TA

Summary Statistics	Sample W03	Sample W04
Grand Means	164.508 Degrees Celsius	164.541 Degrees Celsius
Stnd Dev Btwn Labs	1.148 Degrees Celsius	1.188 Degrees Celsius
Statistics based on 14 of 14 reporting participants		

Sample W03: PP & Sample W04: PP

Key to Instrument Codes Reported by Participants

NZ Netzsch Instruments

TA TA Instruments

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

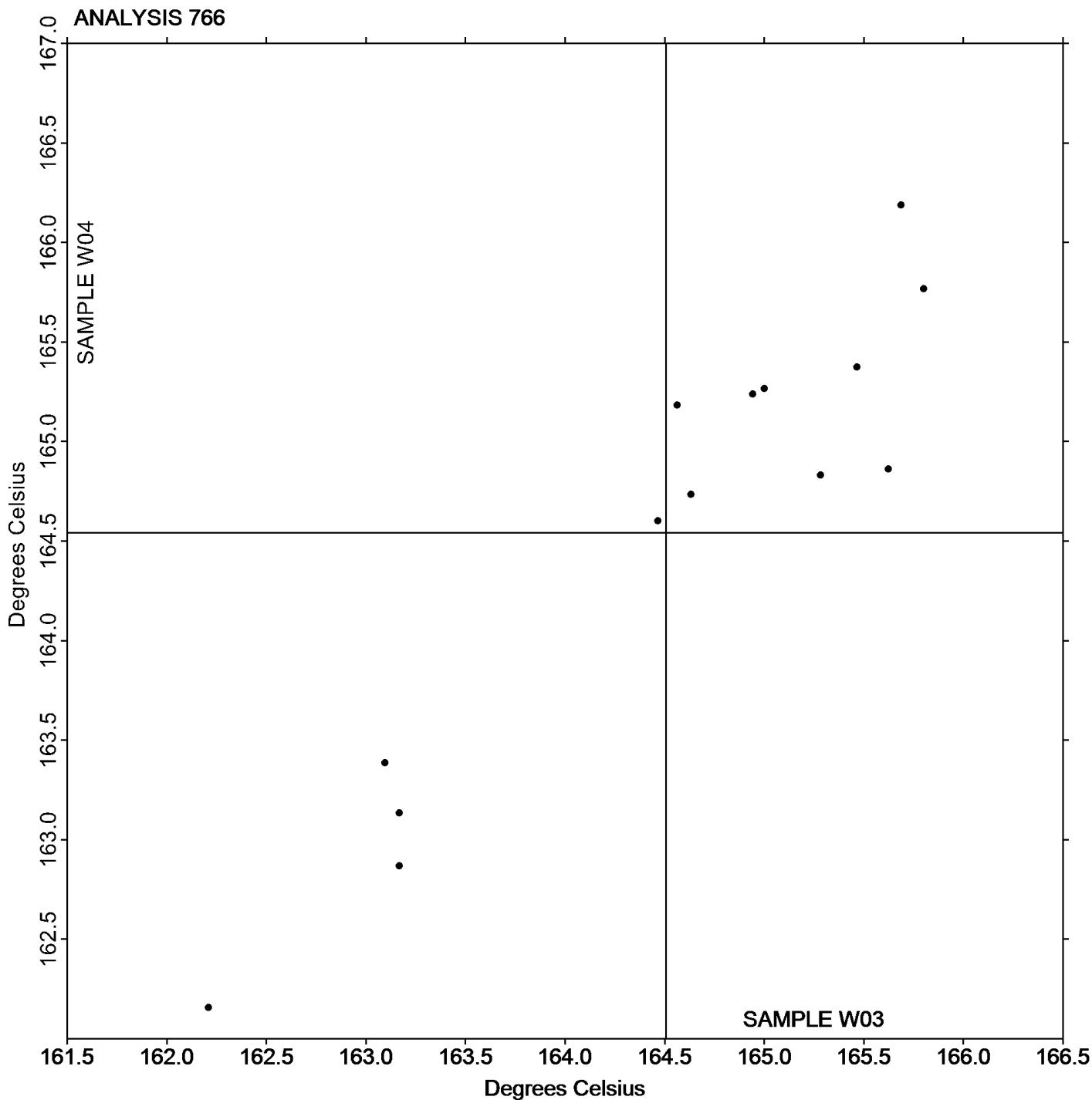
Report #131

Analysis 766

3rd Qtr 2024

Research Melting Peak Temperature

Grand Mean Sample W03: 164.51 Degrees Celsius Grand Mean Sample W04: 164.54 Degrees Celsius



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 767

Research Heat of Crystallization

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample W03			Sample W04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		108.33	3.74	0.43	105.63	0.93	0.11	NZ
9UGKQT		108.85	4.25	0.49	110.47	5.77	0.71	TA
CP67BN		115.91	11.31	1.31	117.77	13.06	1.62	TA
DTMQVJ		104.25	-0.35	-0.04	105.08	0.37	0.05	TA
FJB9CB		96.22	-8.37	-0.97	96.44	-8.27	-1.02	TA
H8RDAG		102.87	-1.73	-0.20	104.83	0.13	0.02	XX
LVQ63B		103.05	-1.55	-0.18	102.90	-1.81	-0.22	TA
QNPQXA		93.94	-10.66	-1.23	97.21	-7.49	-0.93	TA
RLFQM2		96.69	-7.91	-0.91	94.57	-10.13	-1.25	XX
ULDRGX		125.63	21.04	2.43	121.90	17.19	2.13	TA
X8ZNKT		98.60	-5.99	-0.69	97.66	-7.05	-0.87	TA
XXT2FY		101.67	-2.93	-0.34	103.75	-0.96	-0.12	TA
ZDJQN2		103.74	-0.86	-0.10	102.97	-1.74	-0.22	TA

Summary Statistics

Sample W03

Sample W04

Grand Means

104.596 Joules Per Gram

104.706 Joules Per Gram

Stnd Dev Btwn Labs

8.658 Joules Per Gram

8.086 Joules Per Gram

Statistics based on 13 of 13 reporting participants

Sample W03: PP & Sample W04: PP

Key to Instrument Codes Reported by Participants

NZ Netzsch Instruments

TA TA Instruments

XX Instrument manufacturer not specified by lab



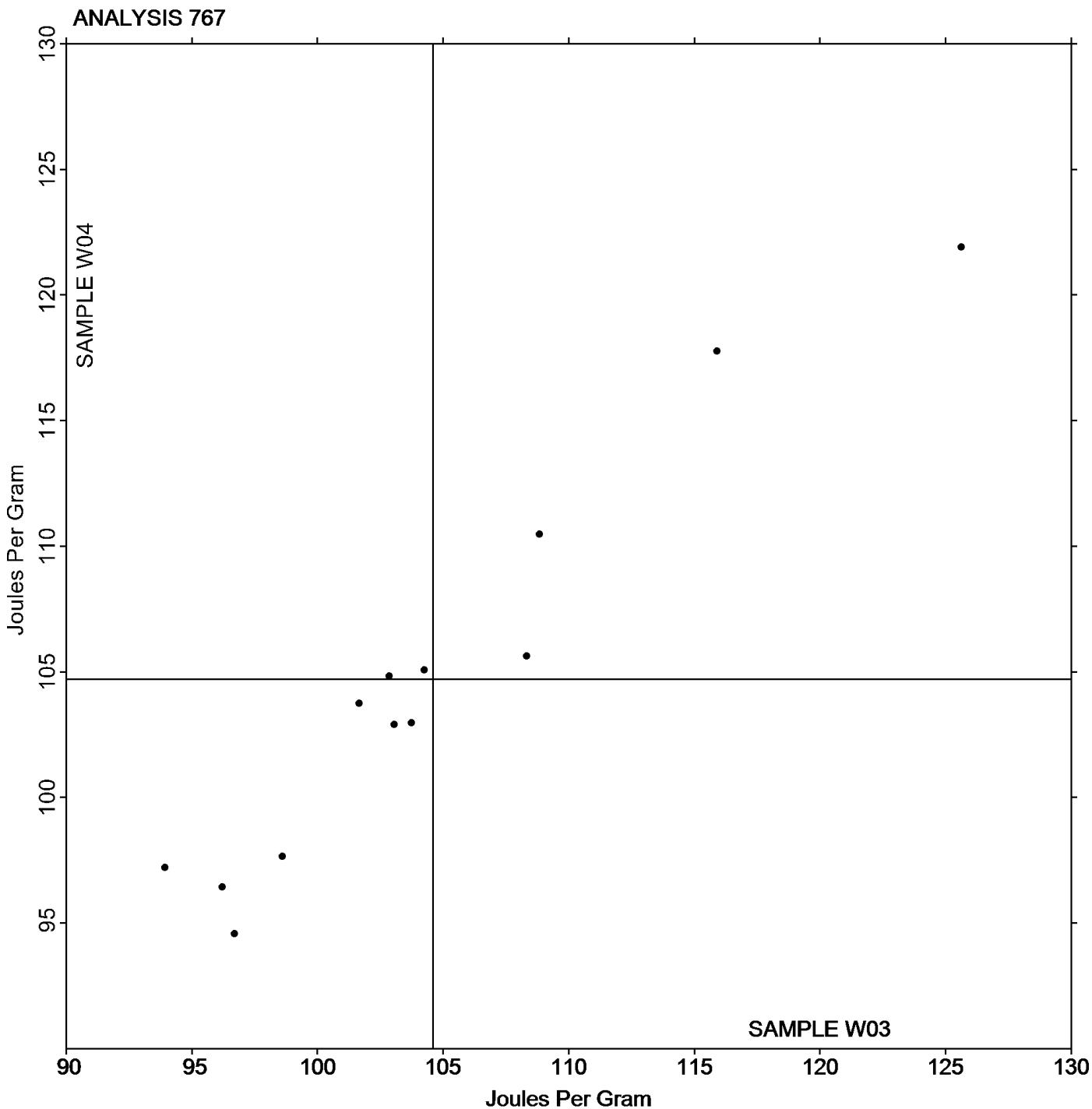
Plastics Interlaboratory Testing Program

Analysis 767 Research Heat of Crystallization

Report #131

3rd Qtr 2024

Grand Mean Sample W03: 104.60 Joules Per Gram Grand Mean Sample W04: 104.71 Joules Per Gram



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Report #131

Analysis 768

3rd Qtr 2024

Research Heat of Fusion

WebCode	Data Flag	Sample W03			Sample W04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		115.27	11.18	1.17	112.90	8.88	0.89	NZ
9UGKQT		114.23	10.14	1.06	115.99	11.97	1.20	TA
CP67BN		119.23	15.14	1.59	120.73	16.72	1.68	TA
DTMQVJ		100.81	-3.27	-0.34	101.03	-2.99	-0.30	TA
FJB9CB		90.56	-13.53	-1.42	89.49	-14.53	-1.46	TA
H8RDAG		102.20	-1.89	-0.20	103.97	-0.05	-0.01	XX
LVQ63B		104.51	0.42	0.04	103.03	-0.99	-0.10	TA
QNPQXA		93.40	-10.69	-1.12	95.16	-8.86	-0.89	TA
RLFQM2		87.72	-16.37	-1.72	86.70	-17.31	-1.74	XX
ULDRGX		104.99	0.90	0.09	106.30	2.28	0.23	TA
X8ZNKT		103.45	-0.64	-0.07	99.83	-4.18	-0.42	TA
XXT2FY		111.31	7.22	0.76	111.92	7.90	0.79	TA
ZDJQN2		105.47	1.38	0.14	105.18	1.16	0.12	TA

Summary Statistics

Sample W03

Sample W04

Grand Means

104.087 Joules Per Gram

104.018 Joules Per Gram

Stnd Dev Btwn Labs

9.540 Joules Per Gram

9.947 Joules Per Gram

Statistics based on 13 of 13 reporting participants

Sample W03: PP & Sample W04: PP

Key to Instrument Codes Reported by Participants

NZ Netzsch Instruments

TA TA Instruments

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

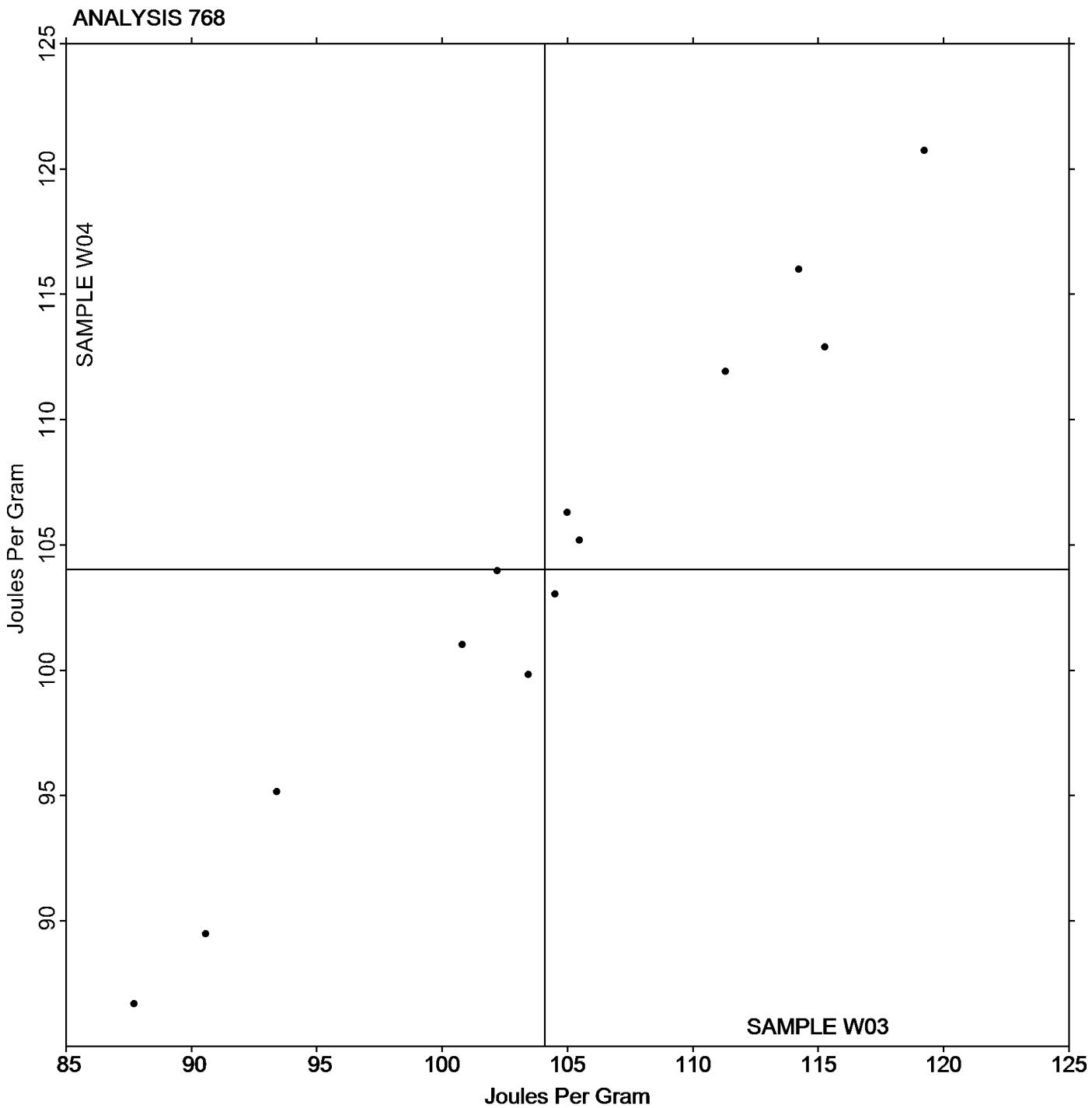
Analysis 768

Research Heat of Fusion

Report #131

3rd Qtr 2024

Grand Mean Sample W03: 104.09 Joules Per Gram Grand Mean Sample W04: 104.02 Joules Per Gram



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 769

Report #131

3rd Qtr 2024

Research Glass Transition Temperature

WebCode	Data Flag	Sample V03			Sample V04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2MX8P7		106.73	-0.37	-0.11	106.50	-0.67	-0.20	NZ
9UGKQT		105.60	-1.50	-0.45	105.77	-1.40	-0.43	TA
CP67BN		105.75	-1.35	-0.41	105.35	-1.82	-0.56	TA
DTMQVJ		113.47	6.36	1.92	113.37	6.21	1.89	TA
FJB9CB		109.27	2.16	0.65	109.48	2.31	0.71	TA
H8RDAG		106.47	-0.64	-0.19	106.23	-0.93	-0.29	XX
LVQ63B		101.00	-6.10	-1.84	102.00	-5.17	-1.58	TA
QNPQXA		105.78	-1.32	-0.40	106.39	-0.78	-0.24	TA
RLFQM2		110.77	3.66	1.10	110.53	3.37	1.03	XX
ULDRGX		105.74	-1.36	-0.41	105.65	-1.51	-0.46	TA
X8ZNKT		109.38	2.28	0.69	108.99	1.82	0.56	TA
XXT2FY		102.90	-4.20	-1.26	102.40	-4.77	-1.46	TA
ZDJQN2		109.47	2.37	0.71	110.52	3.36	1.02	TA

Summary Statistics

Sample V03

Grand Means

107.102 Degrees Celsius

Sample V04

107.168 Degrees Celsius

Stnd Dev Btwn Labs

3.323 Degrees Celsius

3.275 Degrees Celsius

Statistics based on 13 of 13 reporting participants

Sample V03: ABS & Sample V04: ABS

Key to Instrument Codes Reported by Participants

NZ Netzsch Instruments

TA TA Instruments

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

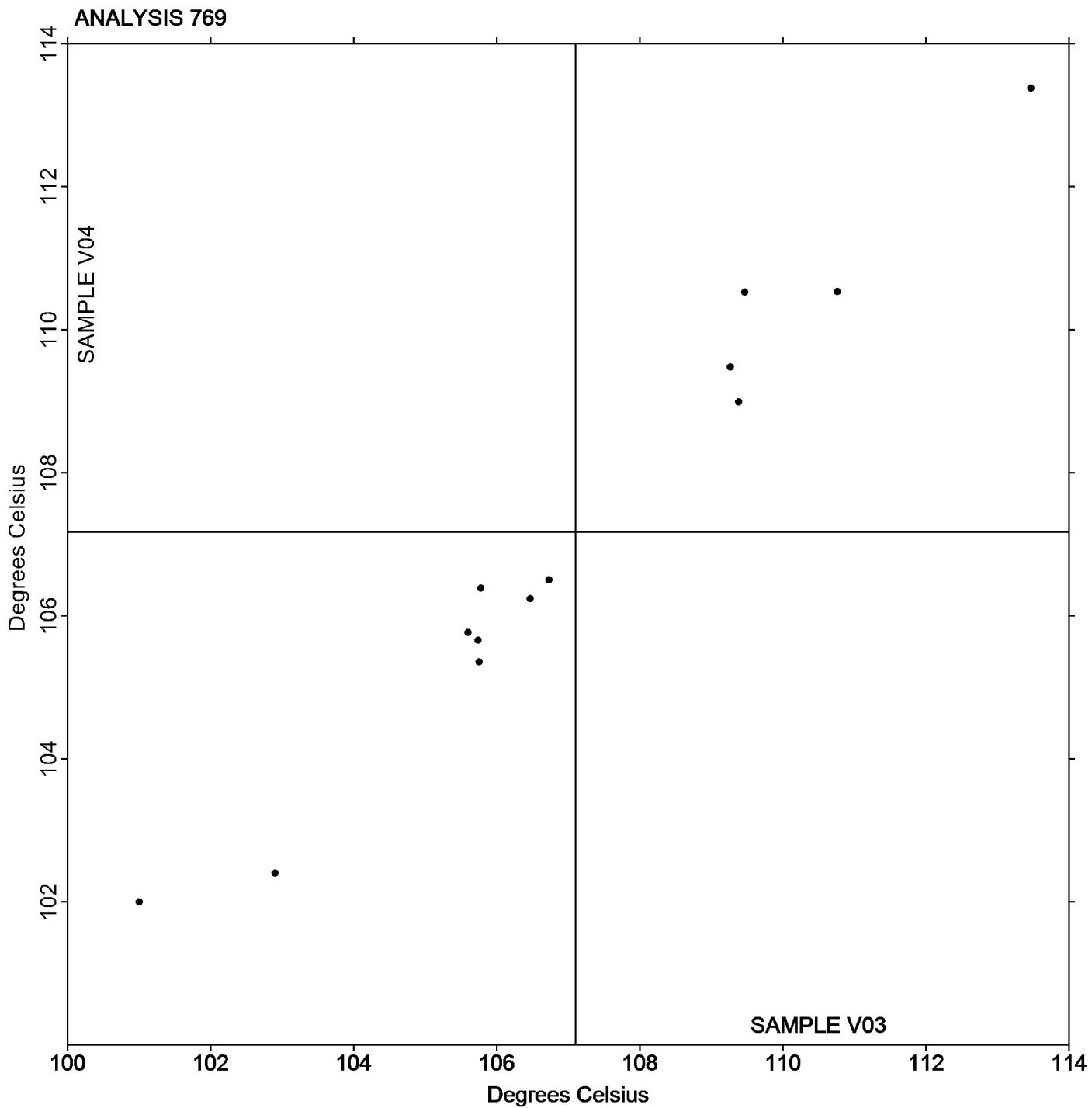
Analysis 769

Research Glass Transition Temperature

Report #131

3rd Qtr 2024

Grand Mean Sample V03: 107.10 Degrees Celsius Grand Mean Sample V04: 107.17 Degrees Celsius



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 770

Report #131

3rd Qtr 2024

Tensile Stress at Yield, Film Samples - psi

WebCode	Data Flag	Sample B03			Sample B04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2NTPR9		1,782	123	0.52	1,665	6	0.03	IN
2QG6FH		1,617	-42	-0.18	1,620	-39	-0.17	TO
B3X9EQ		1,549	-111	-0.47	1,757	99	0.44	SH
DM2QLX		1,805	146	0.62	1,752	93	0.42	IN
FHFPBA		1,804	144	0.61	1,769	111	0.50	MT
FLE29V		1,601	-58	-0.25	1,621	-37	-0.17	IM
JBTWVF		1,752	92	0.39	1,706	48	0.21	IN
KL3UFA		2,039	380	1.61	1,858	199	0.90	MT
LFB7VN		1,310	-349	-1.48	1,368	-291	-1.31	IN
PKRMV4		1,799	139	0.59	1,768	109	0.49	IN
R9BHYR		1,774	115	0.49	1,770	111	0.50	WZ
VBPFG6		1,590	-69	-0.29	1,607	-52	-0.23	IN
VYWP7Y		1,769	110	0.47	1,785	126	0.57	MT
W4KRM4		1,761	102	0.43	1,777	118	0.53	WZ
XWHAGQ	*	931	-728	-3.09	878	-780	-3.51	IN
XXT2FY		1,704	45	0.19	1,699	40	0.18	IN
YHFV6Z		1,646	-13	-0.06	1,772	114	0.51	WZ
ZF6HRQ	M	1,507	-152	-0.65	No data reported for this sample			WZ
ZXKQTR		1,635	-24	-0.10	1,683	24	0.11	IN

Summary Statistics

Sample B03

Sample B04

Grand Means

1,659.3 psi

1,658.6 psi

Stnd Dev Btwn Labs

235.4 psi

222.4 psi

Statistics based on 18 of 19 reporting participants

Sample B03: LDPE & Sample B04: LDPE

Comments on Assigned Data Flags for Test #770

ZF6HRQ (M) - Participant did not submit data for sample B04.

Key to Instrument Codes Reported by Participants

IM Instru-Met Instruments

IN Instron

MT MTS/Sintech

SH Shimadzu

TO Tinius Olsen

WZ Zwick



Plastics Interlaboratory Testing Program

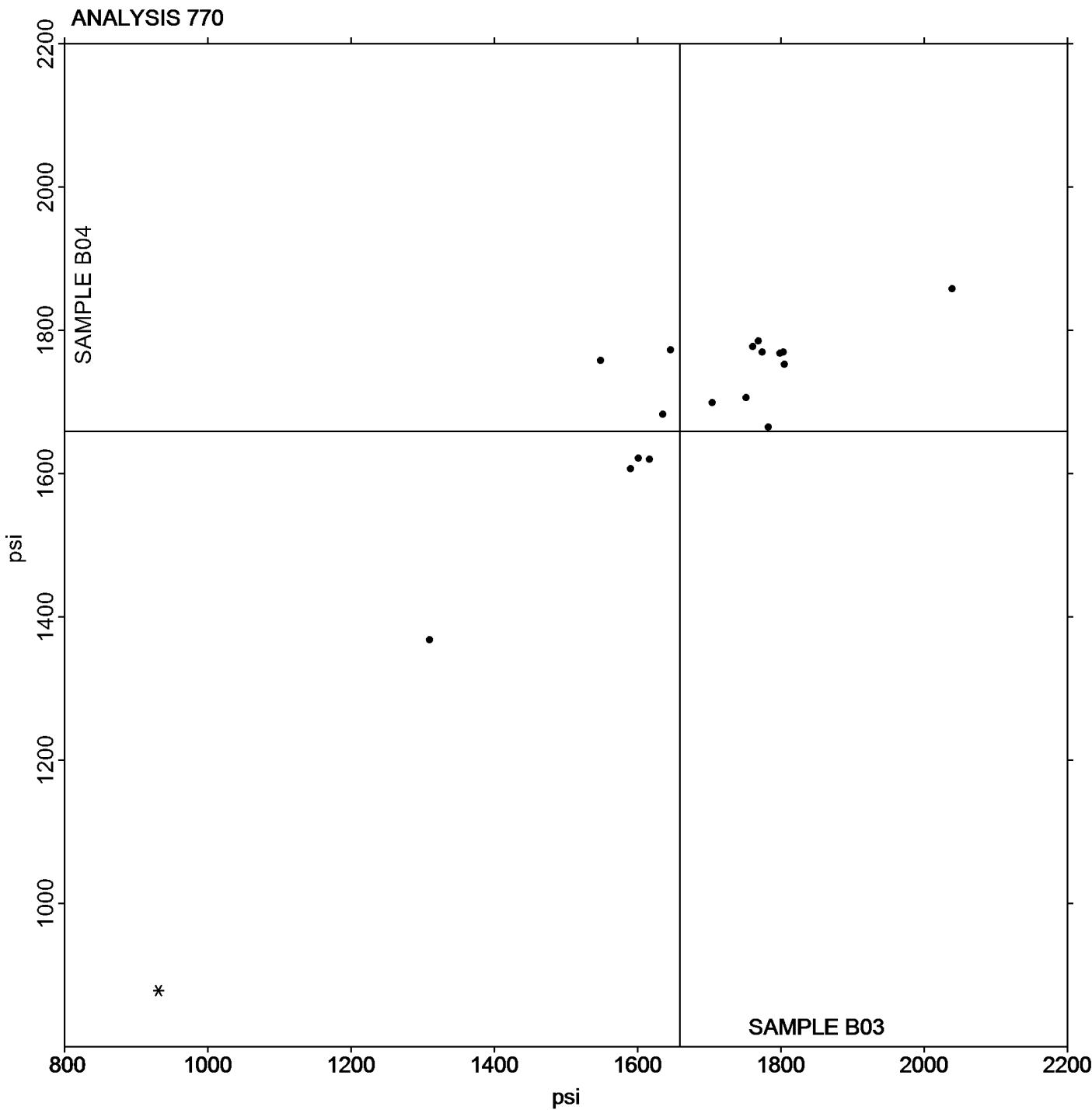
Analysis 770

Tensile Stress at Yield, Film Samples - psi

Report #131

3rd Qtr 2024

Grand Mean Sample B03: 1,659.30 psi Grand Mean Sample B04: 1,658.63 psi





Plastics Interlaboratory Testing Program

Analysis 771

Report #131

3rd Qtr 2024

Tensile Stress at Break, Film Samples - psi

WebCode	Data Flag	Sample B03			Sample B04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2NTPR9		3,671	112	0.50	3,392	-160	-0.72	IN
2QG6FH		3,402	-157	-0.71	3,421	-131	-0.60	TO
8NBRYH		3,616	57	0.26	3,452	-100	-0.45	IN
B3X9EQ		3,295	-264	-1.19	3,229	-323	-1.47	SH
DM2QLX		3,432	-127	-0.57	3,318	-234	-1.06	IN
FHFPBA		3,823	264	1.19	3,889	337	1.53	MT
FLE29V		3,407	-152	-0.69	3,599	47	0.21	IM
JBTWVF		3,910	350	1.58	3,793	241	1.09	IN
KL3UFA	*	4,035	476	2.15	3,625	73	0.33	MT
KLLXMB	X	17,806	14,247	64.19	18,234	14,682	66.61	UC
LFB7VN		3,592	33	0.15	3,636	84	0.38	IN
PKRMV4		3,278	-281	-1.27	3,370	-182	-0.83	IN
R9BHYR		3,507	-52	-0.24	3,617	65	0.30	WZ
VBPFG6		3,546	-14	-0.06	3,666	114	0.52	IN
VYWP7Y		3,768	208	0.94	3,920	368	1.67	MT
W4KRM4		3,642	83	0.37	3,744	193	0.87	WZ
XWHAGQ		3,146	-414	-1.86	3,145	-407	-1.85	IN
XXT2FY		3,563	4	0.02	3,650	98	0.45	IN
YHFV6Z		3,552	-8	-0.03	3,702	151	0.68	WZ
ZF6HRQ	M	2,477	-1,082	-4.88	No data reported for this sample			WZ
ZXKQTR		3,442	-117	-0.53	3,317	-235	-1.07	IN

Summary Statistics

Sample B03

Sample B04

Grand Means

3,559.3 psi

3,551.9 psi

Stnd Dev Btwn Labs

221.9 psi

220.4 psi

Statistics based on 19 of 21 reporting participants

Sample B03: LDPE & Sample B04: LDPE

Comments on Assigned Data Flags for Test #771

KLLXMB (X) - Extreme data.

ZF6HRQ (M) - Participant did not submit data for sample B04.



Plastics Interlaboratory Testing Program

Analysis 771

Report #131

3rd Qtr 2024

Tensile Stress at Break, Film Samples - psi

Key to Instrument Codes Reported by Participants

IM Instru-Met Instruments

IN Instron

MT MTS/Sintech

SH Shimadzu

TO Tinius Olsen

UC United

WZ Zwick



Plastics Interlaboratory Testing Program

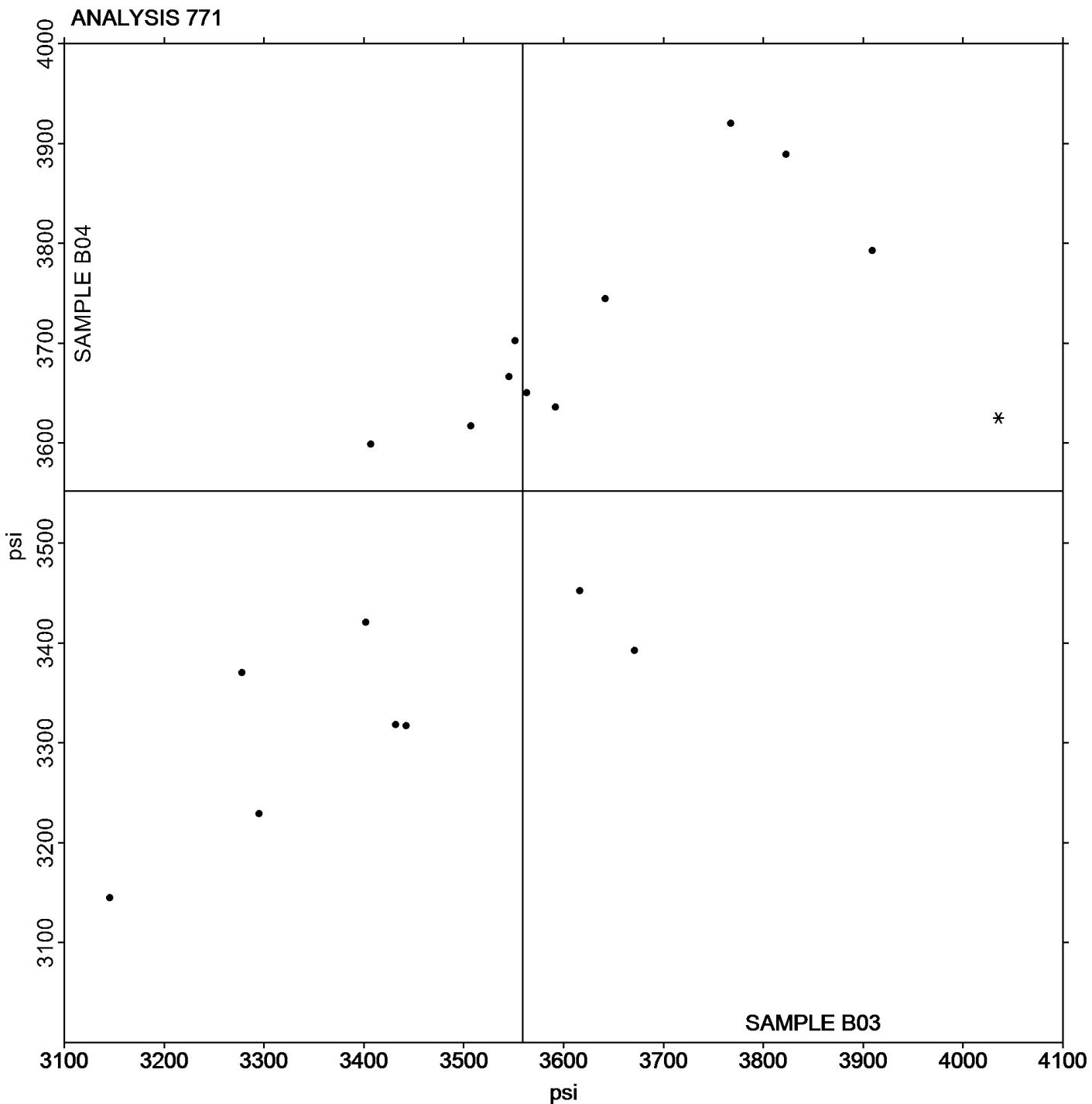
Analysis 771

Report #131

3rd Qtr 2024

Tensile Stress at Break, Film Samples - psi

Grand Mean Sample B03: 3,559.27 psi Grand Mean Sample B04: 3,551.88 psi



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 772

Percent Elongation at Yield, Films

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample B03			Sample B04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2NTPR9	X	12.29	-31.68	-1.43	71.96	28.10	1.26	IN
2QG6FH		22.86	-21.11	-0.95	22.71	-21.15	-0.95	TO
B3X9EQ		58.86	14.88	0.67	60.26	16.40	0.73	SH
DM2QLX		64.10	20.13	0.91	68.30	24.44	1.09	IN
FHFPBA		56.10	12.13	0.55	54.79	10.93	0.49	MT
FLE29V		11.83	-32.14	-1.45	12.55	-31.31	-1.40	IM
JBTWVF		55.72	11.75	0.53	55.80	11.94	0.53	IN
KL3UFA		66.33	22.36	1.01	66.47	22.61	1.01	MT
LFB7VN		9.55	-34.42	-1.55	9.05	-34.81	-1.56	IN
PKRMV4		12.40	-31.57	-1.42	12.19	-31.67	-1.42	IN
R9BHYR		76.04	32.06	1.44	72.38	28.52	1.28	WZ
VBPFG6		8.06	-35.92	-1.62	8.09	-35.77	-1.60	IN
VYWP7Y		45.07	1.10	0.05	44.29	0.43	0.02	MT
W4KRM4		54.80	10.83	0.49	56.36	12.50	0.56	WZ
XWHAGQ		51.60	7.62	0.34	50.13	6.27	0.28	IN
XXT2FY		46.96	2.99	0.13	42.08	-1.78	-0.08	IN
YHFV6Z		45.20	1.23	0.06	46.30	2.44	0.11	WZ
ZF6HRQ	M	27.00	-16.97	-0.76	No data reported for this sample			WZ
ZXKQTR		62.09	18.12	0.81	63.86	20.00	0.90	IN

Summary Statistics

Sample B03

Sample B04

Grand Means

43.974 Percent

43.859 Percent

Stnd Dev Btwn Labs

22.228 Percent

22.333 Percent

Statistics based on 17 of 19 reporting participants

Sample B03: LDPE & Sample B04: LDPE

Comments on Assigned Data Flags for Test #772

ZF6HRQ (M) - Participant did not submit data for sample B04.

2NTPR9 (X) - Inconsistent in testing between samples.

Key to Instrument Codes Reported by Participants

IM Instru-Met Instruments

IN Instron

MT MTS/Sintech

SH Shimadzu

TO Tinius Olsen

WZ Zwick



Plastics Interlaboratory Testing Program

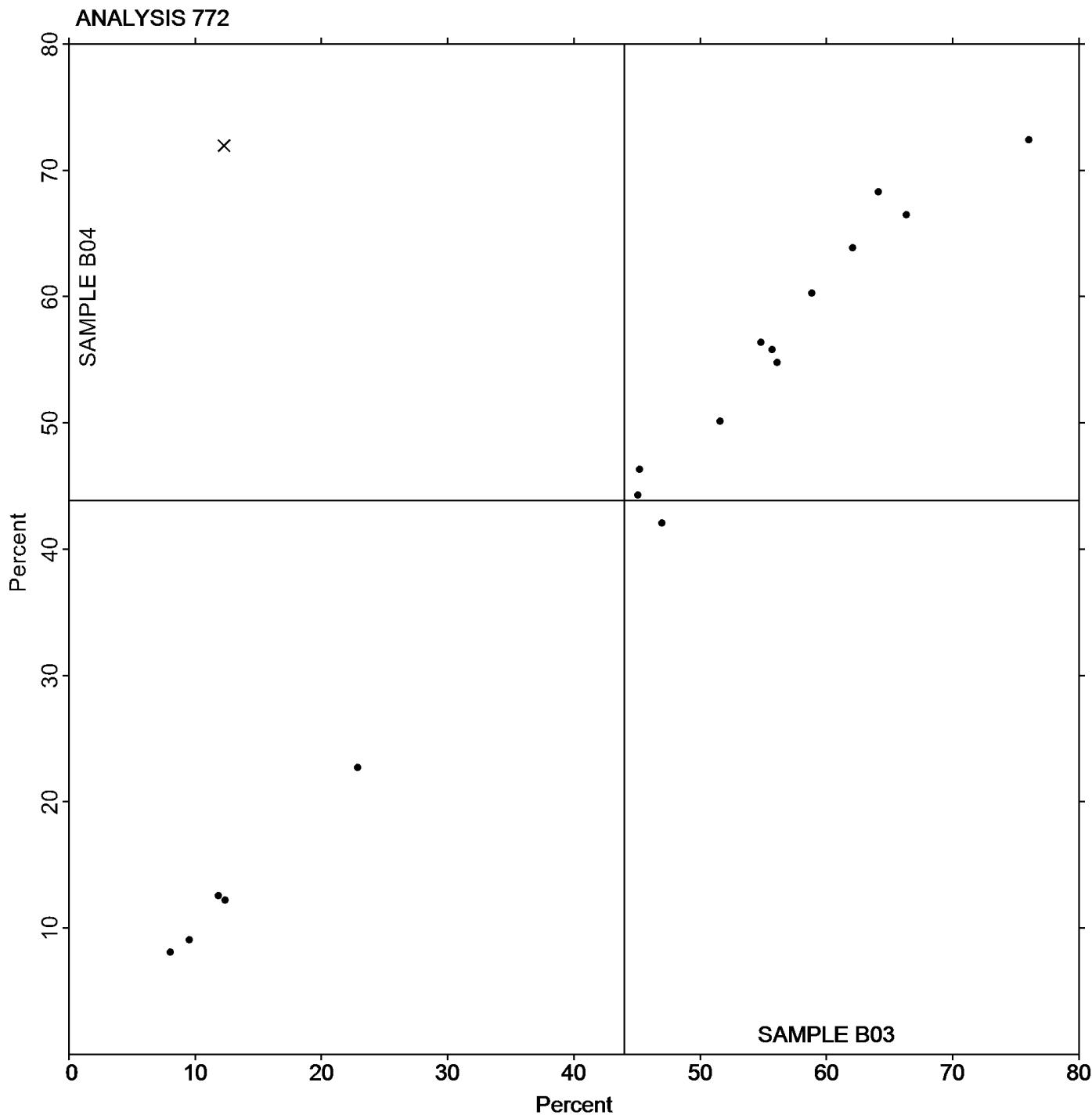
Analysis 772

Percent Elongation at Yield, Films

Report #131

3rd Qtr 2024

Grand Mean Sample B03: 43.974 Percent Grand Mean Sample B04: 43.859 Percent



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Report #131

Analysis 773

3rd Qtr 2024

Percent Elongation at Break, Film Samples

WebCode	Data Flag	Sample B03			Sample B04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2NTPR9		1,042.7	125.5	0.77	1,053.2	131.9	0.81	IN
2QG6FH		1,104.0	186.8	1.15	1,094.0	172.7	1.06	TO
8NBRYH		909.9	-7.3	-0.04	916.2	-5.1	-0.03	IN
B3X9EQ		933.4	16.2	0.10	834.2	-87.1	-0.54	SH
DM2QLX		1,037.0	119.8	0.74	1,023.0	101.7	0.62	IN
FHFPA		842.0	-75.2	-0.46	910.1	-11.2	-0.07	MT
FLE29V		905.1	-12.1	-0.07	944.1	22.8	0.14	IM
JBTWVF		1,049.2	132.0	0.81	1,051.8	130.5	0.80	IN
KL3UFA		885.7	-31.5	-0.19	884.9	-36.4	-0.22	MT
LFB7VN		935.7	18.5	0.11	943.9	22.6	0.14	IN
PKRMV4		627.1	-290.1	-1.78	652.3	-269.0	-1.65	IN
R9BHYR		1,190.0	272.8	1.67	1,240.0	318.7	1.96	WZ
VBPFG6		670.4	-246.8	-1.51	679.0	-242.3	-1.49	IN
W4KRM4		1,109.7	192.5	1.18	1,124.3	203.0	1.25	WZ
XWHAGQ		848.1	-69.1	-0.42	880.7	-40.6	-0.25	IN
XXT2FY		699.7	-217.5	-1.34	720.7	-200.6	-1.23	IN
YHFV6Z		708.0	-209.2	-1.28	698.0	-223.3	-1.37	WZ
ZF6HRQ	M	942.0	24.8	0.15	No data reported for this sample			WZ
ZXKQTR		1,012.2	95.0	0.58	933.1	11.8	0.07	IN

Summary Statistics

Sample B03

Sample B04

Grand Means

917.22 Percent

921.30 Percent

Stnd Dev Btwn Labs

162.93 Percent

162.78 Percent

Statistics based on 18 of 19 reporting participants

Sample B03: LDPE & Sample B04: LDPE

Comments on Assigned Data Flags for Test #773

ZF6HRQ (M) - Participant did not submit data for sample B04.

Key to Instrument Codes Reported by Participants

IM Instru-Met Instruments

IN Instron

MT MTS/Sintech

SH Shimadzu

TO Tinius Olsen

WZ Zwick



Plastics Interlaboratory Testing Program

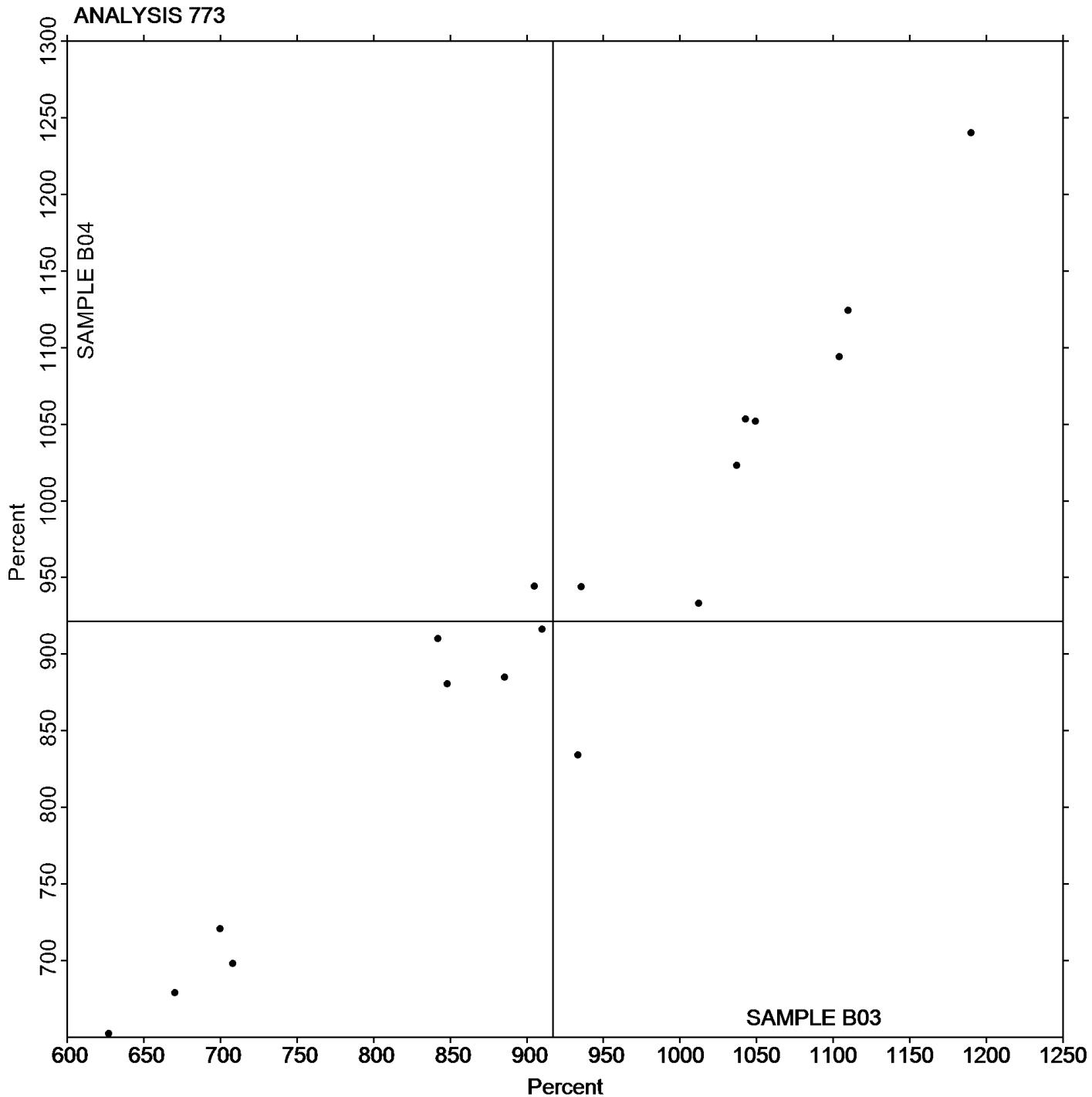
Analysis 773

Report #131

3rd Qtr 2024

Percent Elongation at Break, Film Samples

Grand Mean Sample B03: 917.22 Percent Grand Mean Sample B04: 921.30 Percent



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 774

Report #131

3rd Qtr 2024

Thickness of Film Tensile Samples - mils

WebCode	Data Flag	Sample B03			Sample B04		
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV
2NTPR9		3.6850	-0.1161	-0.84	3.9600	0.1442	0.92
2QG6FH		3.8977	0.0966	0.70	3.9135	0.0977	0.63
7DYXC6		3.4780	-0.3231	-2.35	3.5270	-0.2888	-1.85
8NBRYH		3.7730	-0.0281	-0.20	3.8980	0.0822	0.53
9WYZYY		3.8516	0.0505	0.37	3.8351	0.0193	0.12
B3X9EQ	*	3.6929	-0.1082	-0.79	3.3425	-0.4733	-3.03
DM2QLX		3.7700	-0.0311	-0.23	3.8650	0.0492	0.31
DNWAMY		3.7760	-0.0251	-0.18	3.7420	-0.0738	-0.47
FHFPA		3.6700	-0.1311	-0.95	3.9240	0.1082	0.69
FLE29V		4.0020	0.2009	1.46	4.0560	0.2402	1.54
JBTWVF		3.8020	0.0009	0.01	3.9460	0.1302	0.83
KL3UFA		3.5500	-0.2511	-1.83	3.7500	-0.0658	-0.42
KLLXMB		3.9200	0.1189	0.86	3.8500	0.0342	0.22
LFB7VN		3.8600	0.0589	0.43	3.6800	-0.1358	-0.87
PKRMV4		3.7914	-0.0097	-0.07	3.7914	-0.0244	-0.16
R9BHYR		3.7178	-0.0834	-0.61	3.7005	-0.1153	-0.74
VBPFG6		4.0430	0.2419	1.76	3.7680	-0.0478	-0.31
VYWP7Y		3.8830	0.0819	0.60	3.9960	0.1802	1.15
W4KRM4		3.8701	0.0689	0.50	3.8858	0.0700	0.45
XWHAGQ		3.7200	-0.0811	-0.59	3.7400	-0.0758	-0.49
XXT2FY		3.7590	-0.0421	-0.31	3.7930	-0.0228	-0.15
YHFV6Z		3.9646	0.1634	1.19	3.9016	0.0858	0.55
ZF6HRQ	M	3.8819	0.0808	0.59	No data reported for this sample		
ZXKQTR		3.9490	0.1479	1.08	3.8980	0.0822	0.53

Summary Statistics

Sample B03

Sample B04

Grand Means

3.80114 mils

3.81580 mils

Stnd Dev Btwn Labs

0.13751 mils

0.15623 mils

Statistics based on 23 of 24 reporting participants

Sample B03: LDPE & Sample B04: LDPE

Comments on Assigned Data Flags for Test #774

ZF6HRQ (M) - Participant did not submit data for sample B04.



Plastics Interlaboratory Testing Program

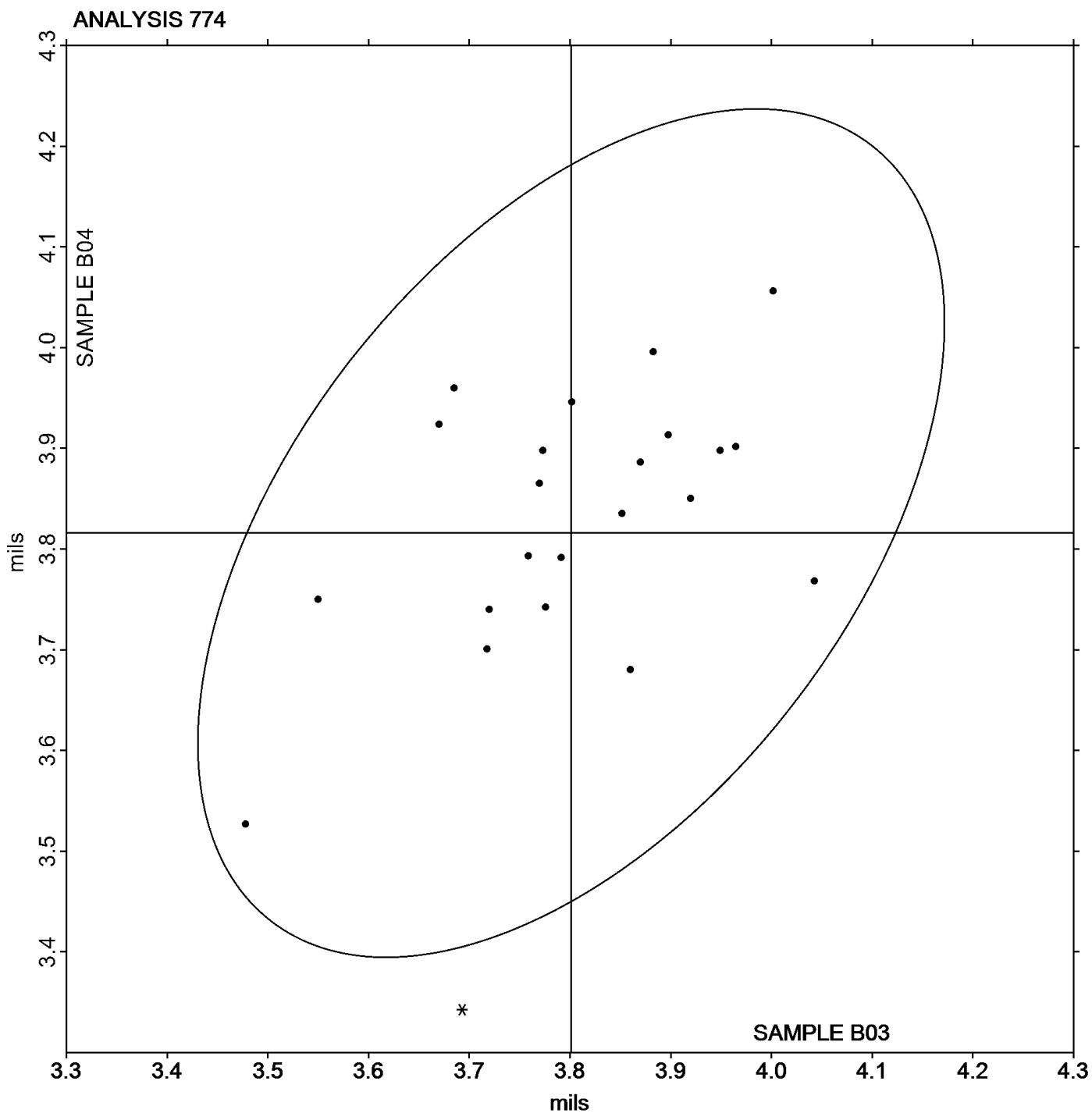
Analysis 774

Report #131

3rd Qtr 2024

Thickness of Film Tensile Samples - mils

Grand Mean Sample B03: 3.8011 mils Grand Mean Sample B04: 3.8158 mils





Plastics Interlaboratory Testing Program

Analysis 775

Report #131

3rd Qtr 2024

Secant Modulus at 1% Strain - psi

WebCode	Data Flag	Sample B03			Sample B04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2NTPR9		32,437	129	0.03	35,494	2,279	0.58	IN
2QG6FH		29,220	-3,088	-0.68	29,300	-3,914	-1.00	TO
9WYZYY		33,633	1,325	0.29	33,456	242	0.06	IN
B3X9EQ		21,197	-11,111	-2.43	24,580	-8,634	-2.21	SH
DM2QLX		37,823	5,515	1.21	39,181	5,967	1.52	IN
FLE29V		33,086	778	0.17	34,001	787	0.20	IM
JBTWVF		33,358	1,049	0.23	33,641	427	0.11	IN
LFB7VN		27,343	-4,965	-1.09	30,091	-3,123	-0.80	IN
R9BHXR		34,244	1,936	0.42	35,288	2,074	0.53	WZ
VBPFG6		30,101	-2,207	-0.48	31,498	-1,716	-0.44	IN
VYWP7Y		34,626	2,318	0.51	34,406	1,192	0.30	MT
W4KRM4		36,261	3,953	0.87	35,958	2,744	0.70	WZ
XXT2FY		39,000	6,692	1.46	38,546	5,331	1.36	IN
ZF6HRQ	M	8	-32,300	-7.07	No data reported for this sample			WZ
ZXKQTR		29,984	-2,324	-0.51	29,560	-3,654	-0.93	IN

Summary Statistics

Sample B03

Sample B04

Grand Means

32,308.0 psi

33,214.4 psi

Stnd Dev Btwn Labs

4,568.5 psi

3,915.0 psi

Statistics based on 14 of 15 reporting participants

Sample B03: LDPE & Sample B04: LDPE

Comments on Assigned Data Flags for Test #775

ZF6HRQ (M) - Participant did not submit data for sample B04.

Key to Instrument Codes Reported by Participants

IM Instru-Met Instruments

IN Instron

MT MTS/Sintech

SH Shimadzu

TO Tinius Olsen

WZ Zwick



Plastics Interlaboratory Testing Program

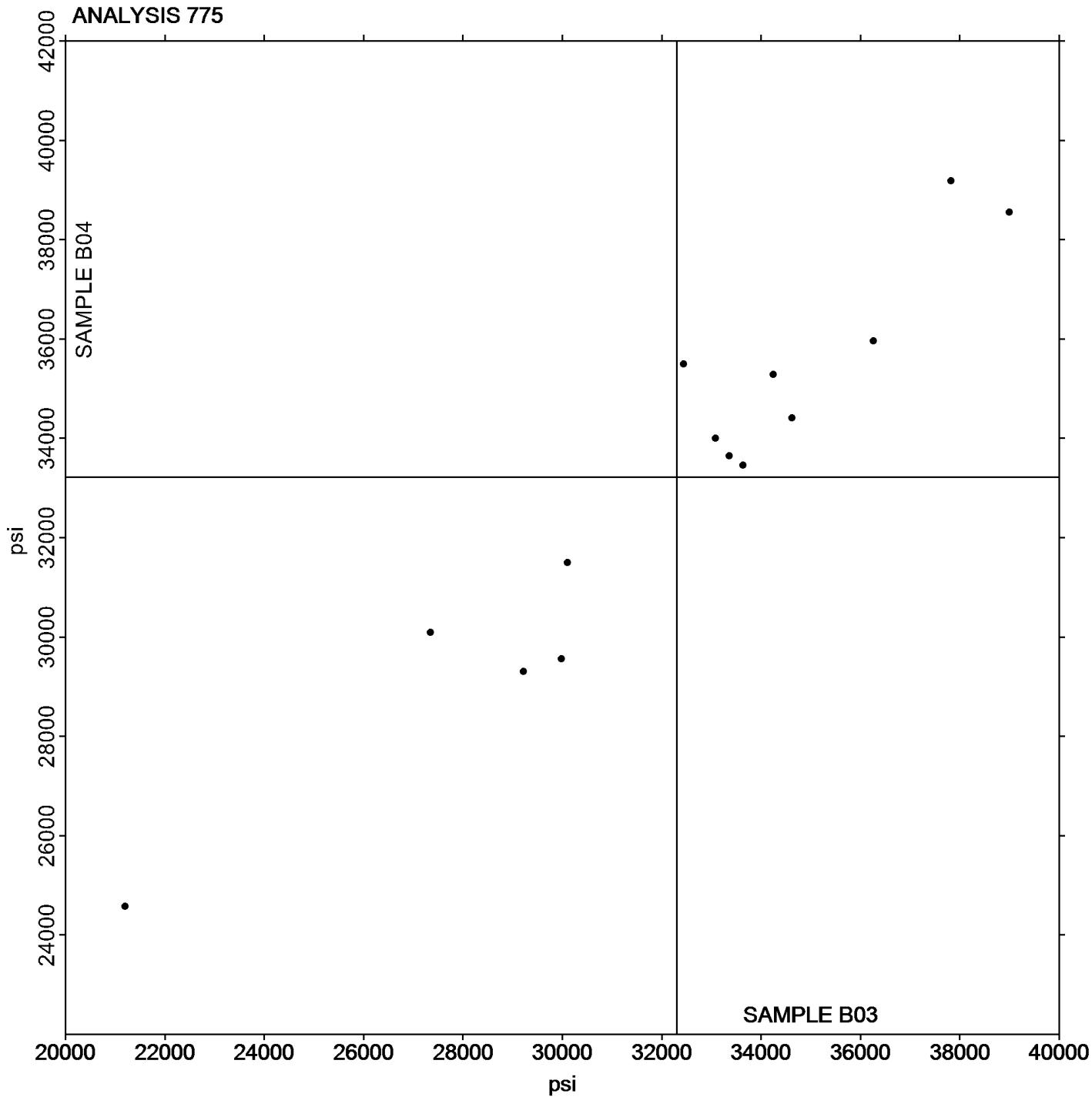
Analysis 775

Report #131

3rd Qtr 2024

Secant Modulus at 1% Strain - psi

Grand Mean Sample B03: 32,308.04 psi Grand Mean Sample B04: 33,214.36 psi



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 776

Report #131

3rd Qtr 2024

Secant Modulus at 2% Strain - psi

WebCode	Data Flag	Sample B03			Sample B04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2NTPR9		28,268	5	0.00	30,271	1,374	0.58	IN
2QG6FH		31,060	2,797	0.88	31,050	2,153	0.92	TO
9WYZYY		28,467	204	0.06	28,297	-600	-0.26	IN
B3X9EQ		23,316	-4,946	-1.55	27,197	-1,700	-0.72	SH
DM2QLX		29,777	1,514	0.47	30,783	1,887	0.80	XX
FHFPBA		35,290	7,027	2.20	33,719	4,822	2.05	MT
FLE29V		27,794	-469	-0.15	28,336	-561	-0.24	IM
JBTWVF		28,072	-191	-0.06	28,509	-388	-0.17	IN
LFB7VN		23,273	-4,990	-1.56	25,963	-2,934	-1.25	IN
VBPFG6		26,980	-1,283	-0.40	28,061	-835	-0.36	MT
VYWP7Y		28,652	389	0.12	28,349	-548	-0.23	MT
W4KRM4		29,541	1,278	0.40	29,356	459	0.20	WZ
XXT2FY		30,686	2,423	0.76	30,493	1,596	0.68	IN
ZF6HRQ	M	12	-28,251	-8.85	No data reported for this sample			WZ
ZXKQTR		24,503	-3,759	-1.18	24,170	-4,726	-2.01	IN

Summary Statistics

Sample B03

Sample B04

Grand Means

28,262.7 psi

28,896.8 psi

Stnd Dev Btwn Labs

3,193.7 psi

2,349.4 psi

Statistics based on 14 of 15 reporting participants

Sample B03: LDPE & Sample B04: LDPE

Comments on Assigned Data Flags for Test #776

ZF6HRQ (M) - Participant did not submit data for sample B04.

Key to Instrument Codes Reported by Participants

IM Instru-Met Instruments

IN Instron

MT MTS/Sintech

SH Shimadzu

TO Tinius Olsen

WZ Zwick

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

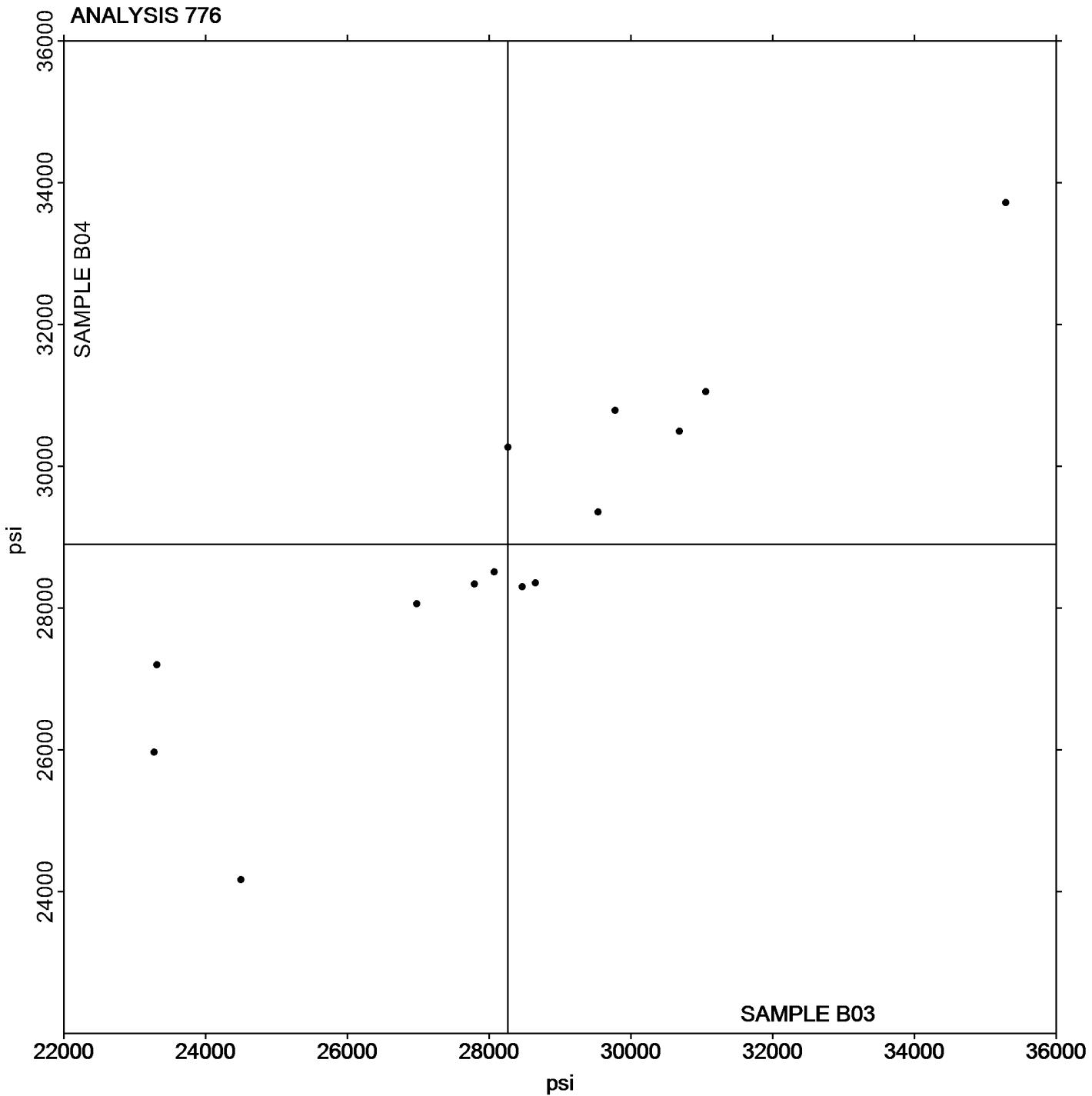
Analysis 776

Report #131

3rd Qtr 2024

Secant Modulus at 2% Strain - psi

Grand Mean Sample B03: 28,262.68 psi Grand Mean Sample B04: 28,896.81 psi



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 780

Report #131

3rd Qtr 2024

Coefficient of Static Friction

WebCode	Data Flag	Sample P03			Sample P04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2QG6FH		0.1292	-0.0730	-1.51	0.1292	-0.0647	-1.14	RD
CM2BRL		0.1984	-0.0038	-0.08	0.1593	-0.0346	-0.61	IG
CTQT8H		0.1191	-0.0831	-1.72	0.1223	-0.0715	-1.26	IG
FHFPBA		0.2200	0.0178	0.37	0.2240	0.0301	0.53	TH
FLE29V		0.2034	0.0012	0.02	0.1974	0.0035	0.06	TH
JBTWVF		0.2640	0.0618	1.28	0.3212	0.1273	2.24	TM
KL3UFA		0.1728	-0.0294	-0.61	0.1474	-0.0465	-0.82	TO
R9BHYR		0.1968	-0.0054	-0.11	0.1694	-0.0245	-0.43	TH
RCNHUX		0.2366	0.0344	0.71	0.1926	-0.0013	-0.02	MI
VBPFG6		0.2348	0.0326	0.68	0.2204	0.0265	0.47	MI
VYWP7Y		0.2778	0.0756	1.57	0.2708	0.0769	1.35	MT
XXT2FY		0.1538	-0.0484	-1.00	0.1562	-0.0377	-0.66	TH
YHFV6Z		0.2220	0.0198	0.41	0.2100	0.0161	0.28	SA

Summary Statistics

Sample P03

Sample P04

Grand Means

0.20220 COF

0.19386 COF

Stnd Dev Btwn Labs

0.04829 COF

0.05678 COF

Statistics based on 13 of 13 reporting participants

Sample P03: LDPE & Sample P04: LDPE

Key to Instrument Codes Reported by Participants

IG Instron

MI MTS Insight

MT MTS Q-Test

RD RDM CF

SA Shimadzu Autograph

TH Thwing Albert Friction/Peel Tester Model 225-1

TM TMI Slip and Friction Tester

TO Tinius Olsen



Plastics Interlaboratory Testing Program

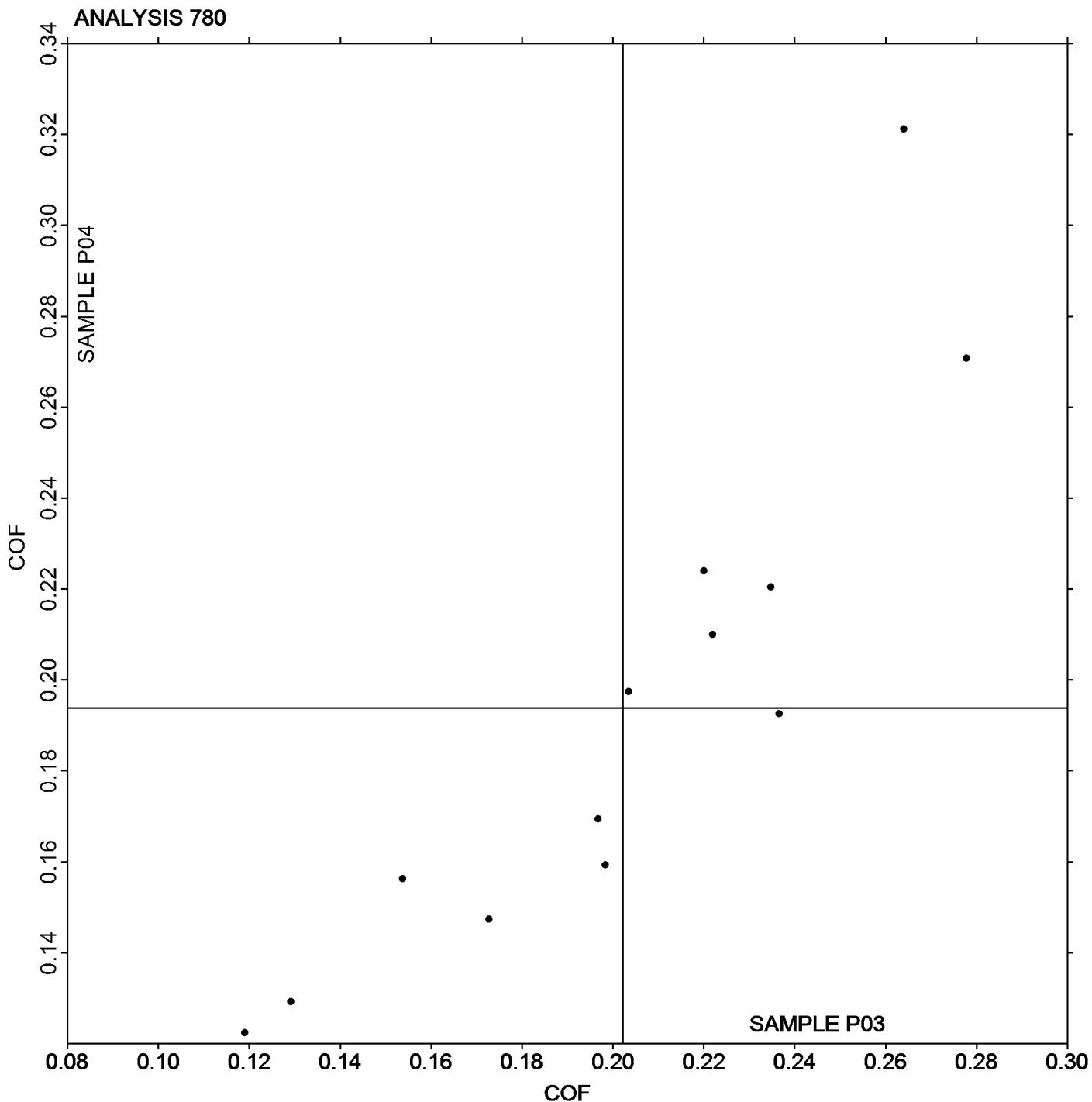
Analysis 780

Report #131

3rd Qtr 2024

Coefficient of Static Friction

Grand Mean Sample P03: 0.20220 COF Grand Mean Sample P04: 0.19386 COF



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 781

Report #131

3rd Qtr 2024

Coefficient of Kinetic Friction

WebCode	Data Flag	Sample P03			Sample P04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2QG6FH		0.1180	-0.0159	-0.87	0.1196	-0.0083	-0.37	RD
CM2BRL	*	0.1305	-0.0034	-0.18	0.0834	-0.0445	-1.97	IG
CTQT8H		0.1132	-0.0207	-1.13	0.1168	-0.0111	-0.49	IG
FHFPBA		0.1332	-0.0007	-0.04	0.1262	-0.0017	-0.08	TH
FLE29V		0.1188	-0.0151	-0.83	0.1158	-0.0121	-0.53	TH
JBTWVF		0.1242	-0.0097	-0.53	0.1200	-0.0079	-0.35	TM
KL3UFA		0.1798	0.0459	2.52	0.1720	0.0441	1.95	TO
R9BHYR		0.1172	-0.0167	-0.91	0.1160	-0.0119	-0.53	TH
RCNHUX		0.1338	-0.0001	0.00	0.1138	-0.0141	-0.62	MI
VBPFG6		0.1360	0.0021	0.12	0.1372	0.0093	0.41	MI
VYWP7Y		0.1568	0.0229	1.26	0.1604	0.0325	1.43	MT
XXT2FY		0.1386	0.0047	0.26	0.1436	0.0157	0.69	TH
YHFV6Z		0.1400	0.0061	0.34	0.1380	0.0101	0.45	SA

Summary Statistics

Sample P03

Sample P04

Grand Means

0.13385 COF

0.12790 COF

Stnd Dev Btwn Labs

0.01823 COF

0.02266 COF

Statistics based on 13 of 13 reporting participants

Sample P03: LDPE & Sample P04: LDPE

Key to Instrument Codes Reported by Participants

IG Instron

MI MTS Insight

MT MTS Q-Test

RD RDM CF

SA Shimadzu Autograph

TH Thwing Albert Friction/Peel Tester Model 225-1

TM TMI Slip and Friction Tester

TO Tinius Olsen



Plastics Interlaboratory Testing Program

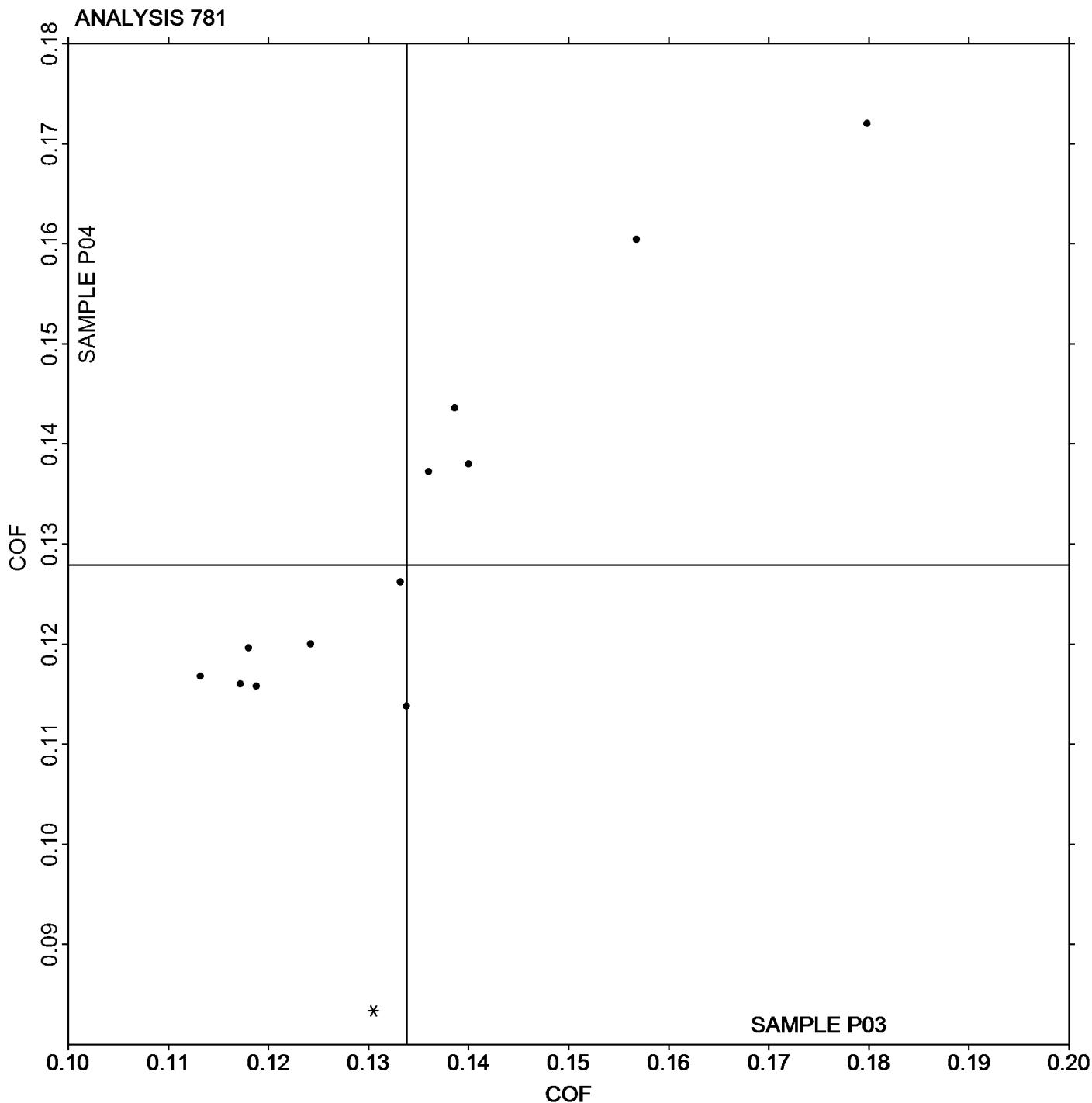
Analysis 781

Report #131

3rd Qtr 2024

Coefficient of Kinetic Friction

Grand Mean Sample P03: 0.13385 COF Grand Mean Sample P04: 0.12790 COF



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 782

Tear Resistance of Films

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample Q03			Sample Q04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
7ETMXML	X	1,952.0	1,525.4	49.09	2,028.8	1,622.6	33.34	TA
92XABL		419.5	-7.1	-0.23	361.4	-44.8	-0.92	TE
B3X9EQ		463.2	36.6	1.18	467.2	61.0	1.25	EM
FLE29V		403.7	-22.9	-0.74	414.0	7.8	0.16	EM
JBTWVF		453.9	27.3	0.88	348.0	-58.2	-1.20	TM
PKRMV4		461.8	35.2	1.13	411.3	5.1	0.10	SZ
R9BHYR		392.3	-34.3	-1.10	353.6	-52.6	-1.08	TA
VBPFG6		432.6	6.0	0.19	421.8	15.6	0.32	TE
XXT2FY		386.0	-40.6	-1.31	472.3	66.1	1.36	TE

Summary Statistics	Sample Q03	Sample Q04
Grand Means	426.63 grams-force	406.21 grams-force
Stnd Dev Btwn Labs	31.08 grams-force	48.67 grams-force
Statistics based on 8 of 9 reporting participants		

Sample Q03: LDPE & Sample Q04: LDPE

Comments on Assigned Data Flags for Test #782

7ETMXML (X) - Extreme data.

Key to Instrument Codes Reported by Participants

EM Elmendorf Tear Tester

SZ Textest FX 3700

TA Thwing-Albert

TE Thwing-Albert Pro Tear

TM TMI No. 83-1100



Plastics Interlaboratory Testing Program

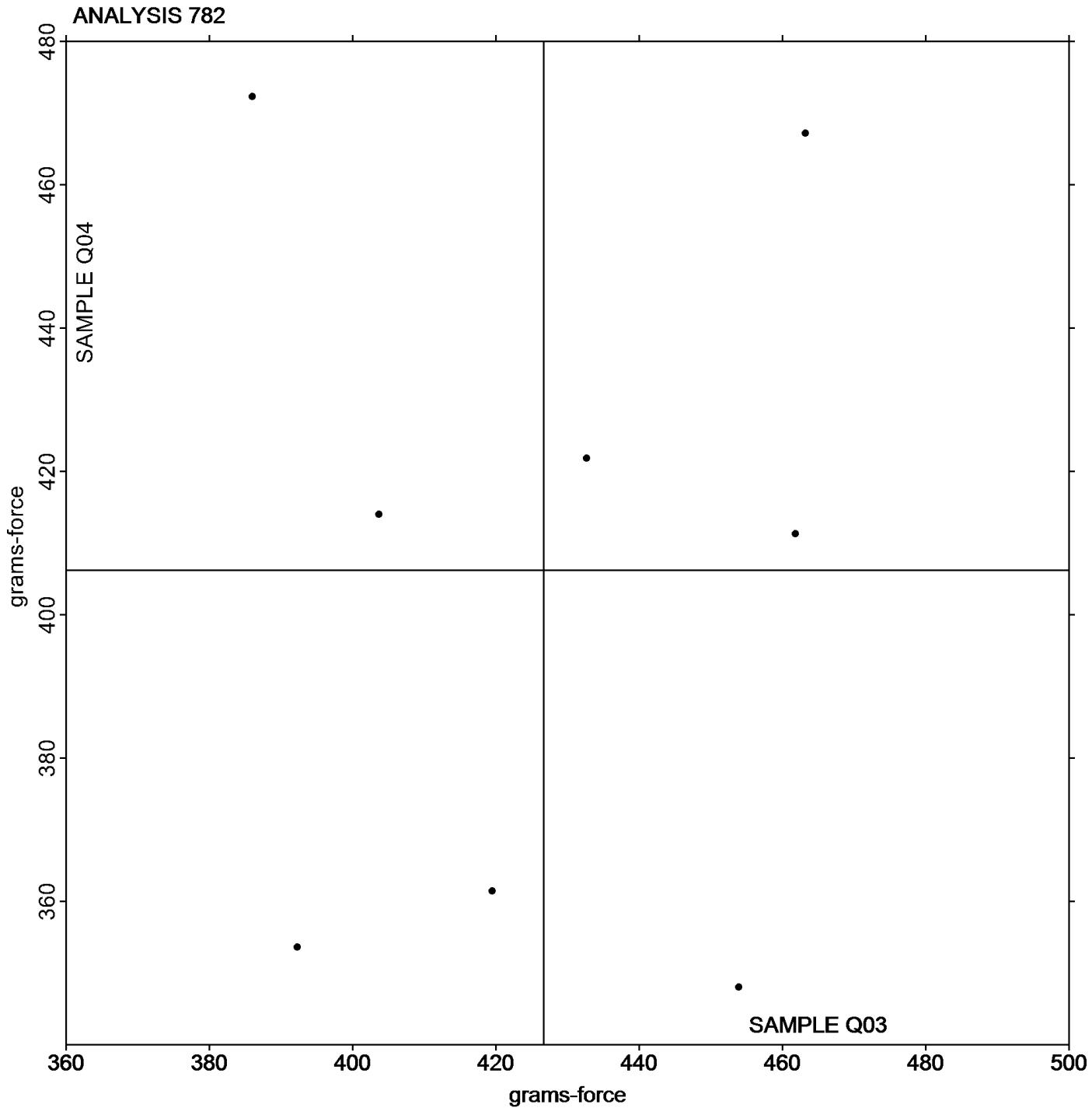
Analysis 782

Tear Resistance of Films

Report #131

3rd Qtr 2024

Grand Mean Sample Q03: 426.63 grams-force Grand Mean Sample Q04: 406.21 grams-force



If fewer than 20 laboratories are included in an analysis, a control ellipse will not be drawn on the two-sample plot.



Plastics Interlaboratory Testing Program

Analysis 785

Percent Haze of Film

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample D03			Sample D04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
38MQGJ		11.988	0.504	0.66	11.900	0.257	0.38	BJ
67GCLL		11.813	0.329	0.43	11.408	-0.235	-0.34	BJ
6Q7MRU		12.063	0.579	0.76	12.275	0.632	0.93	BJ
7DYXC6		11.950	0.466	0.61	12.245	0.602	0.88	BJ
7ETMXL		11.438	-0.046	-0.06	11.438	-0.205	-0.30	BJ
7XK2NW		11.186	-0.297	-0.39	11.434	-0.209	-0.31	BJ
92XABL		12.139	0.655	0.86	12.351	0.708	1.04	BT
BYYYXHQ	X	19.288	7.804	10.20	20.150	8.507	12.46	BJ
C4T3XF		11.775	0.291	0.38	12.300	0.657	0.96	XX
CML6EG	*	13.339	1.855	2.42	13.536	1.893	2.77	XR
D6LHKW		10.786	-0.697	-0.91	10.746	-0.897	-1.31	XR
D9H4EK		11.453	-0.031	-0.04	11.091	-0.552	-0.81	BJ
DTMQVJ		12.038	0.554	0.72	11.688	0.045	0.07	BJ
FLE29V		11.325	-0.159	-0.21	11.210	-0.433	-0.63	BJ
HNJ4FC		9.828	-1.656	-2.16	10.400	-1.243	-1.82	HL
HT8TUU	*	10.530	-0.954	-1.25	12.200	0.557	0.82	BJ
JBTWVF		11.738	0.254	0.33	12.138	0.495	0.72	BJ
MGKH8Y		11.118	-0.366	-0.48	11.340	-0.303	-0.44	XR
PKRMV4		10.828	-0.656	-0.86	10.994	-0.649	-0.95	BJ
R9BHYR	X	12.900	1.416	1.85	8.918	-2.725	-3.99	BJ
T74J24		11.599	0.115	0.15	11.953	0.310	0.45	BJ
TLW8FA		11.850	0.366	0.48	11.600	-0.043	-0.06	BJ
VBPFG6		10.613	-0.871	-1.14	11.088	-0.555	-0.81	BJ
WJEJ2D		12.375	0.891	1.17	11.613	-0.030	-0.04	BJ
XPX7AN		12.505	1.021	1.33	12.500	0.857	1.26	BJ
XXT2FY		11.343	-0.141	-0.18	11.120	-0.523	-0.77	BJ
YWDCJZ		11.595	0.111	0.15	11.534	-0.109	-0.16	BJ
Z8QQ2T		10.688	-0.796	-1.04	10.513	-1.130	-1.66	HL
ZYUV4U	*	10.161	-1.322	-1.73	11.746	0.103	0.15	XX



Plastics Interlaboratory Testing Program

Analysis 785

Percent Haze of Film

Report #131

3rd Qtr 2024

Summary Statistics

Sample D03

Sample D04

Grand Means

11.4836 Percent

11.6429 Percent

Stnd Dev Btwn Labs

0.7651 Percent

0.6826 Percent

Statistics based on 27 of 29 reporting participants

Sample D03: LDPE & Sample D04: LDPE

Comments on Assigned Data Flags for Test #785

BYYXHQ (X) - Data for both samples are high. Possible Systematic Error.

R9BHYR (X) - Data for sample D04 are low.

Key to Instrument Codes Reported by Participants

BJ BYK-Gardner Haze-Gard Plus/i

BT BYK Gardner TCS Series

HL Hunterlab Ultrascan

XR X-Rite Spectrocolorimeter (any model)

XX Instrument make/model not specified by lab



Plastics Interlaboratory Testing Program

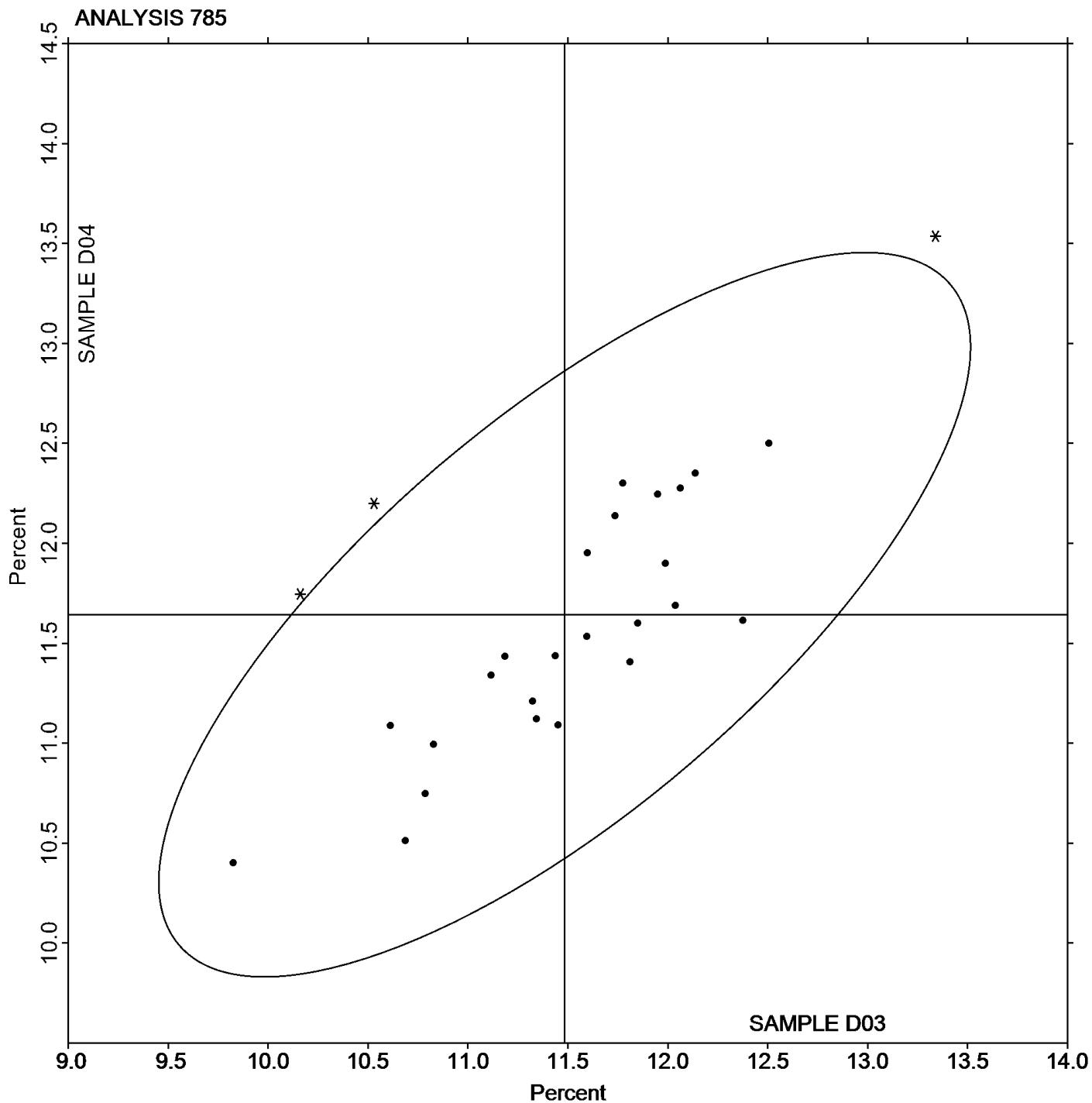
Analysis 785

Percent Haze of Film

Report #131

3rd Qtr 2024

Grand Mean Sample D03: 11.484 Percent Grand Mean Sample D04: 11.643 Percent





Plastics Interlaboratory Testing Program

Analysis 786

Report #131

3rd Qtr 2024

Total Luminous Transmittance of Film

WebCode	Data Flag	Sample D03			Sample D04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
38MQGJ		92.54	-0.31	-0.37	92.75	-0.35	-0.40	BJ
67GCLL		93.28	0.43	0.50	93.39	0.29	0.33	BJ
6Q7MRU	X	88.54	-4.31	-5.05	88.55	-4.55	-5.26	BJ
7DYXC6		93.66	0.81	0.95	93.75	0.65	0.75	BJ
7ETMXL		94.00	1.15	1.35	94.35	1.25	1.45	BJ
7XK2NW		93.83	0.98	1.14	94.10	1.00	1.16	BJ
92XABL		92.39	-0.46	-0.54	92.53	-0.57	-0.66	BT
BYYYXHQ	X	92.44	-0.41	-0.48	89.90	-3.20	-3.70	BJ
C4T3XF		92.68	-0.17	-0.20	92.75	-0.35	-0.40	XX
CML6EG		92.13	-0.72	-0.85	92.27	-0.83	-0.96	XR
D6LHKW		91.27	-1.58	-1.85	91.44	-1.66	-1.92	XR
D9H4EK		94.14	1.29	1.51	94.39	1.29	1.49	BJ
DTMQVJ		93.16	0.31	0.37	93.40	0.30	0.35	BJ
FLE29V		93.65	0.80	0.94	93.95	0.85	0.98	BJ
HNJ4FC		91.13	-1.72	-2.02	91.41	-1.69	-1.95	XX
HT8TUU	*	92.41	-0.44	-0.51	92.99	-0.11	-0.13	BJ
JBTWVF		93.28	0.43	0.50	93.50	0.40	0.46	BJ
MGKH8Y		91.66	-1.19	-1.40	91.91	-1.19	-1.38	XR
N9K9K7		92.29	-0.56	-0.66	92.54	-0.56	-0.65	BJ
PKRMV4		93.11	0.26	0.31	93.38	0.28	0.32	BJ
R9BHYR		92.98	0.13	0.15	93.38	0.28	0.32	BJ
T74J24		93.61	0.76	0.89	93.79	0.69	0.80	BJ
TLW8FA		93.26	0.41	0.48	93.65	0.55	0.64	BJ
VBPFG6		93.03	0.18	0.21	93.24	0.14	0.16	BJ
WJEJ2D		93.45	0.60	0.70	93.80	0.70	0.81	BJ
XPX7AN		93.20	0.35	0.40	93.50	0.40	0.46	BJ
XXT2FY		93.45	0.60	0.70	93.73	0.63	0.72	BJ
YWDCJZ		93.06	0.21	0.24	93.26	0.16	0.19	BJ
Z8QQ2T		90.96	-1.89	-2.21	91.28	-1.82	-2.11	HL
ZYUV4U		92.23	-0.62	-0.73	92.38	-0.72	-0.84	XX



Plastics Interlaboratory Testing Program

Analysis 786

Report #131

3rd Qtr 2024

Total Luminous Transmittance of Film

Summary Statistics

Sample D03

Sample D04

Grand Means

92.850 Percent

93.099 Percent

Stnd Dev Btwn Labs

0.853 Percent

0.865 Percent

Statistics based on 28 of 30 reporting participants

Sample D03: LDPE & Sample D04: LDPE

Comments on Assigned Data Flags for Test #786

6Q7MRU (X) - Data for both samples are low. Possible Systematic Error.

BYYXHQ (X) - Data for sample D04 are low. Inconsistent within the determinations of sample D04.

Key to Instrument Codes Reported by Participants

BJ BYK-Gardner Haze-Gard Plus/i

BT BYK Gardner TCS Plus Spectrophotometer

HL Hunterlab Ultrascan XE

XR X-Rite Spectrocolorimeter (any model)

XX Instrument make/model not specified by lab



Plastics Interlaboratory Testing Program

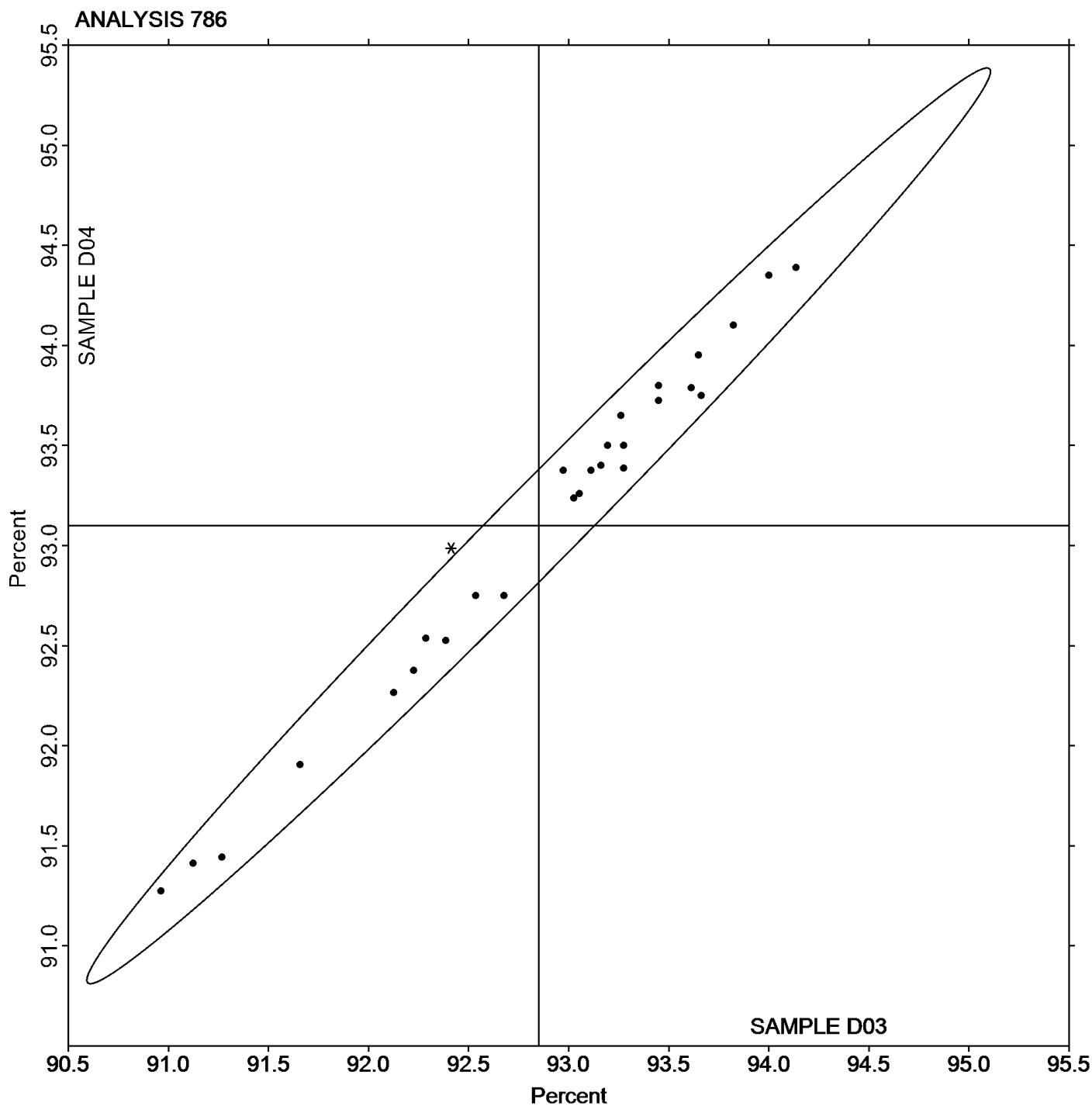
Analysis 786

Report #131

3rd Qtr 2024

Total Luminous Transmittance of Film

Grand Mean Sample D03: 92.850 Percent Grand Mean Sample D04: 93.099 Percent





Plastics Interlaboratory Testing Program

Analysis 790

Notched Izod Impact - ft.lbf/in

Report #131

3rd Qtr 2024

WebCode	Data Flag	Sample S03			Sample S04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
24746Y		1.95	0.02	0.08	1.89	-0.03	-0.14	CE
2PMFV2		2.24	0.31	1.52	2.22	0.30	1.43	TM
3844KM		1.85	-0.08	-0.39	1.82	-0.10	-0.46	TO
38MQGJ		1.83	-0.10	-0.49	1.82	-0.10	-0.45	CE
3ZY3JT		1.78	-0.15	-0.76	1.71	-0.21	-0.99	TO
47PTPN	*	2.45	0.52	2.55	2.47	0.55	2.60	WZ
4HXHHX		1.96	0.03	0.14	1.99	0.06	0.30	CE
6BB8L9		1.77	-0.16	-0.80	1.75	-0.17	-0.79	TO
6Q7MRU		1.92	-0.01	-0.03	1.91	-0.01	-0.04	WZ
6ZUF4Q		1.74	-0.19	-0.94	1.85	-0.07	-0.31	TO
8EMYML		1.90	-0.03	-0.15	1.91	-0.01	-0.04	IN
8ZULK		1.96	0.03	0.16	1.96	0.03	0.16	XX
ADMFXP		1.95	0.02	0.09	1.79	-0.13	-0.60	XX
APXZ6N		1.93	0.00	0.00	1.92	0.00	-0.02	TO
B3X9EQ		2.00	0.07	0.34	2.01	0.09	0.43	WZ
C6NKYH		1.93	0.00	0.01	1.98	0.06	0.30	TO
CYWM4Y		1.82	-0.11	-0.54	1.82	-0.10	-0.48	IN
DJZHGM	*	1.90	-0.03	-0.14	1.70	-0.22	-1.02	TO
EVPYLE		2.08	0.15	0.73	2.16	0.24	1.14	TO
FU9CEK		2.02	0.09	0.43	1.93	0.00	0.02	DS
H8RDAG		1.87	-0.06	-0.29	1.90	-0.02	-0.08	IN
HT8TUU		1.56	-0.37	-1.82	1.51	-0.41	-1.95	TO
KL3UFA		1.85	-0.08	-0.38	1.81	-0.11	-0.51	WZ
KLLXMB		2.09	0.16	0.80	1.94	0.02	0.07	TO
LZK2PF		1.87	-0.06	-0.32	1.78	-0.14	-0.67	WZ
N7ZLMC		1.95	0.02	0.10	2.10	0.18	0.82	BA
PDXH4N		1.45	-0.48	-2.34	1.48	-0.44	-2.08	TO
PGEZ66	X	2.70	0.77	3.77	2.71	0.79	3.71	SA
R9BHYR		2.05	0.12	0.57	2.05	0.12	0.59	WZ
RCNHUX		1.88	-0.05	-0.23	1.89	-0.03	-0.13	TO
RD7CWT		2.45	0.52	2.56	2.42	0.50	2.35	BA
RLFQM2		1.77	-0.16	-0.77	1.79	-0.13	-0.62	TO
TUNU3Y	X	2.56	0.63	3.10	1.54	-0.38	-1.81	TO
VBPFG6		1.97	0.04	0.19	1.96	0.04	0.17	TO
VH6YZ6		1.90	-0.03	-0.16	1.90	-0.02	-0.09	TY



Plastics Interlaboratory Testing Program

Analysis 790

Report #131

3rd Qtr 2024

Notched Izod Impact - ft.lbf/in

WebCode	Data Flag	Sample S03			Sample S04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
W9FTG7		2.11	0.18	0.89	2.12	0.20	0.92	TM
WA9G2M	X	2.35	0.42	2.04	1.99	0.06	0.30	TO
XNJJX2		1.60	-0.33	-1.62	1.60	-0.32	-1.51	IN
XWXJEX		1.58	-0.35	-1.73	1.57	-0.35	-1.65	TO
XXCNCW		2.33	0.40	1.97	2.35	0.43	2.01	TM
XXT2FY		1.99	0.06	0.31	2.03	0.11	0.50	CE
YTGF8T		1.83	-0.10	-0.49	1.83	-0.09	-0.41	TO
YTWMKW		2.08	0.15	0.73	2.06	0.14	0.65	TM
YWDCJZ		1.95	0.02	0.12	1.99	0.07	0.31	TY
ZDJQN2		1.96	0.02	0.12	1.98	0.06	0.29	WZ

Summary Statistics	Sample S03	Sample S04
Grand Means	1.931 ft.lbf/in	1.921 ft.lbf/in
Stnd Dev Btwn Labs	0.204 ft.lbf/in	0.213 ft.lbf/in

Statistics based on 42 of 45 reporting participants

Sample S03: HIPS & Sample S04: HIPS

Comments on Assigned Data Flags for Test #790

PGEZ66 (X) - Data for both samples are high. Possible Systematic Error. Inconsistent within the determinations of sample S03.

WA9G2M (X) - Inconsistent in testing between samples. Inconsistent within the determinations of both samples.

TUNU3Y (X) - Data for sample S03 are high.

Key to Instrument Codes Reported by Participants

BA	Baldwin	CE	Ceast
DS	Dynisco	IN	Instron
SA	Satec	TM	TMI
TO	Tinius Olsen	TY	Toyoseiki
WZ	Zwick	XX	Instrument manufacturer not specified by lab



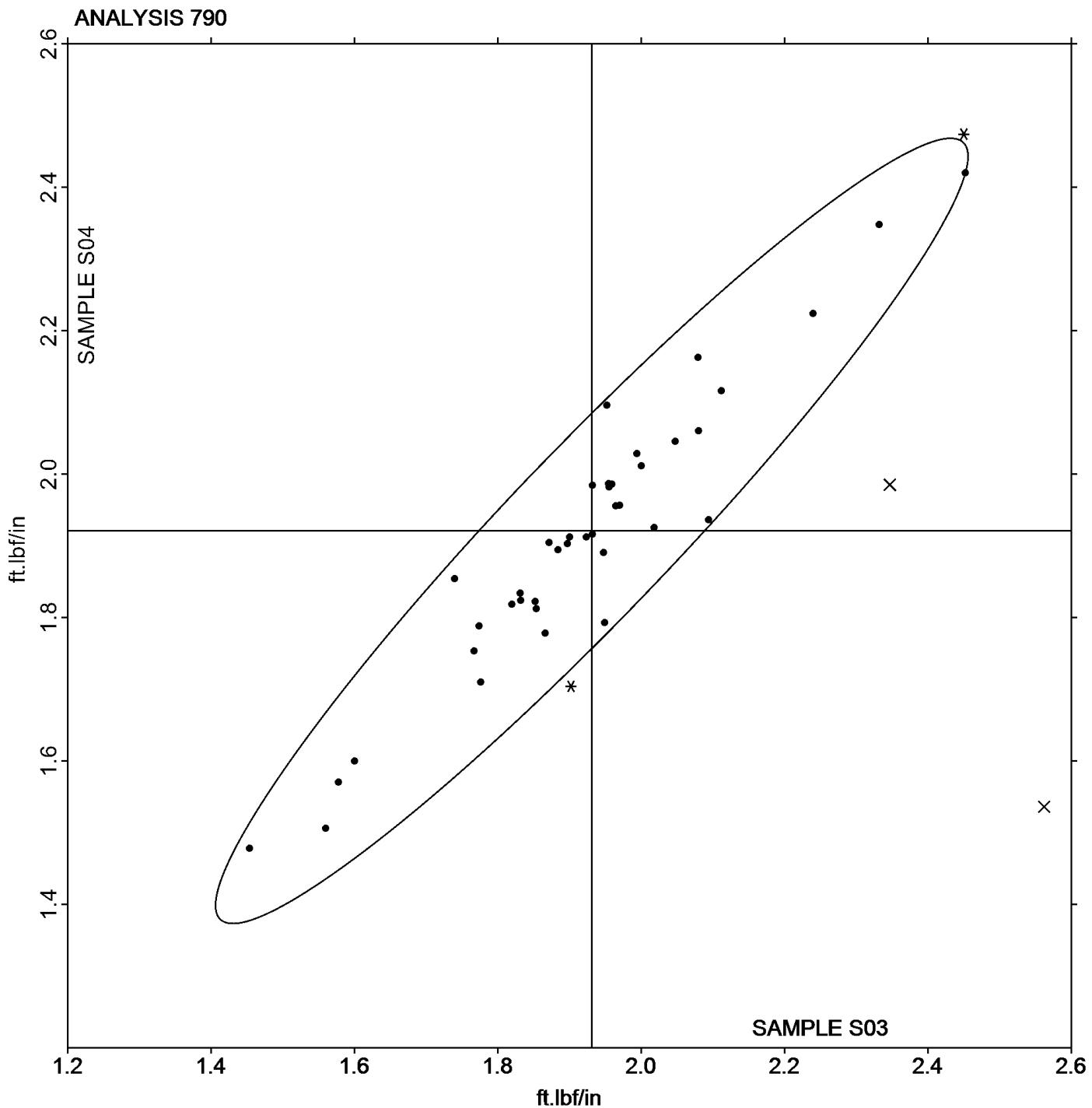
Plastics Interlaboratory Testing Program

Analysis 790 Notched Izod Impact - ft.lbf/in

Report #131

3rd Qtr 2024

Grand Mean Sample S03: 1.9310 ft.lbf/in Grand Mean Sample S04: 1.9207 ft.lbf/in





Plastics Interlaboratory Testing Program

Analysis 791

Report #131

3rd Qtr 2024

Notched Izod Impact - kJ/m²

WebCode	Data Flag	Sample Z03			Sample Z04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
2E6WFB		22.82	-0.05	-0.06	22.79	0.00	0.00	IN
2YRNCM		22.99	0.11	0.13	23.07	0.28	0.33	CE
3MDQ8J		23.22	0.35	0.41	22.83	0.04	0.05	TO
3RM7G8		23.83	0.96	1.12	23.73	0.93	1.10	CE
62PY6R		24.17	1.29	1.51	24.18	1.38	1.63	CE
6BB8L9		22.48	-0.39	-0.46	22.22	-0.57	-0.67	TO
6HYMHT		23.97	1.10	1.28	23.85	1.05	1.24	WZ
7HQA7F		22.09	-0.78	-0.91	22.49	-0.31	-0.36	TO
8Z7ULK	*	20.33	-2.54	-2.96	20.54	-2.25	-2.65	XX
94J472		22.82	-0.05	-0.06	22.79	0.00	0.00	TO
ADMFXP		21.56	-1.31	-1.53	21.46	-1.33	-1.57	XX
AHXN4Z		24.35	1.48	1.72	24.35	1.55	1.83	CE
AMVAU3		22.57	-0.31	-0.36	22.64	-0.15	-0.18	TY
AQUJ8Q		22.83	-0.04	-0.05	22.85	0.05	0.06	CE
BCNRUK		22.16	-0.71	-0.83	21.99	-0.80	-0.94	CE
CWP64H		22.78	-0.09	-0.11	22.99	0.19	0.23	XX
DTMQVJ		23.33	0.46	0.54	23.57	0.78	0.91	XX
E2EL98		21.97	-0.91	-1.06	22.13	-0.67	-0.78	IN
EKR2XE		22.84	-0.03	-0.04	22.72	-0.07	-0.09	CE
ELK2RJ		22.48	-0.39	-0.46	22.22	-0.57	-0.67	TO
HW86PU	X	26.01	3.14	3.66	26.75	3.96	4.66	XX
KD9TT6		21.89	-0.98	-1.14	21.35	-1.44	-1.70	TM
LZK2PF		22.80	-0.07	-0.09	22.50	-0.29	-0.34	WZ
PDXH4N	X	18.04	-4.83	-5.63	18.05	-4.75	-5.59	TO
QKAYA3		22.94	0.06	0.07	22.40	-0.40	-0.47	IN
QT6YNV		22.78	-0.09	-0.10	22.74	-0.06	-0.06	TO
RFUZ27		22.88	0.01	0.01	23.06	0.27	0.31	TO
TMNAZ4		22.02	-0.85	-0.99	21.78	-1.01	-1.19	WZ
TUNU3Y		22.22	-0.65	-0.76	21.94	-0.85	-1.00	TO
VBPFG6		23.38	0.51	0.59	22.74	-0.05	-0.06	TO
VH6YZ6		22.45	-0.42	-0.49	22.95	0.15	0.18	TY
X8ZNKT		23.60	0.72	0.84	23.26	0.46	0.55	WZ
XXCNCW		24.28	1.41	1.64	23.85	1.05	1.24	XX
XXT2FY		24.30	1.43	1.66	24.04	1.25	1.47	CE
YWDCJZ		23.34	0.47	0.55	23.67	0.88	1.04	XX



Plastics Interlaboratory Testing Program

Analysis 791

Report #131

3rd Qtr 2024

Notched Izod Impact - kJ/m²

WebCode	Data Flag	Sample Z03			Sample Z04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
ZDJQN2		23.19	0.32	0.38	23.30	0.51	0.60	WZ
ZU3GMZ	X	15.70	-7.17	-8.36	15.88	-6.91	-8.14	TM

Summary Statistics

Sample Z03

Sample Z04

Grand Means

22.872 kJ/m²

22.793 kJ/m²

Stnd Dev Btwn Labs

0.858 kJ/m²

0.850 kJ/m²

Statistics based on 34 of 37 reporting participants

Sample Z03: ABS & Sample Z04: ABS

Comments on Assigned Data Flags for Test #791

ZU3GMZ (X) - Data for both samples are low. Possible Systematic Error.

HW86PU (X) - Data for both samples are high. Possible Systematic Error.

PDXH4N (X) - Data for both samples are low. Possible Systematic Error.

Key to Instrument Codes Reported by Participants

CE Ceast

IN Instron

TM TMI

TO Tinius Olsen

TY Toyoseiki

WZ Zwick

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

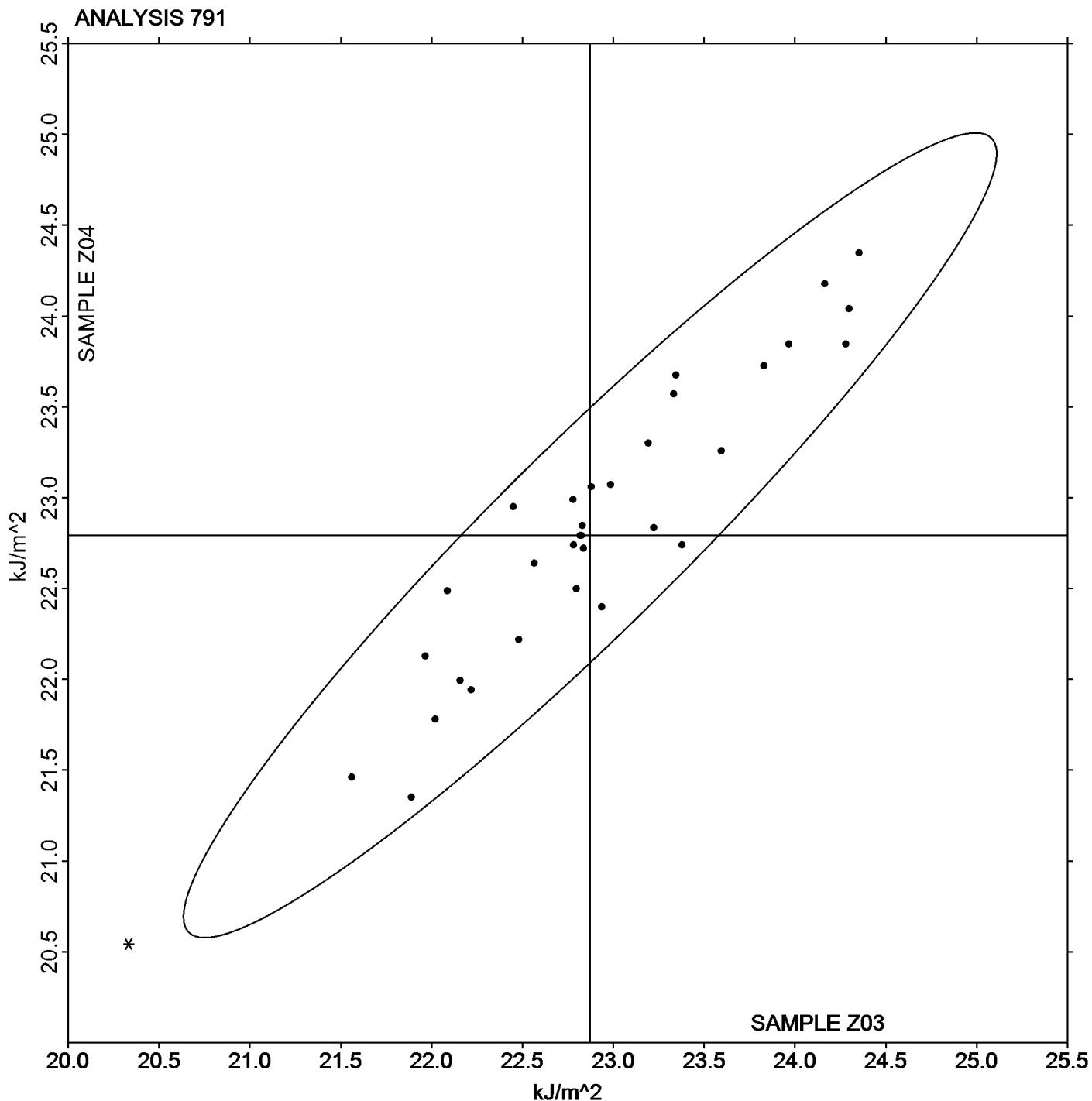
Analysis 791

Report #131

3rd Qtr 2024

Notched Izod Impact - kJ/m^2

Grand Mean Sample Z03: 22.872 kJ/m^2 Grand Mean Sample Z04: 22.793 kJ/m^2





Plastics Interlaboratory Testing Program

Analysis 792

Report #131

3rd Qtr 2024

Notched Charpy Impact - kJ/m ^ 2

WebCode	Data Flag	Sample M03			Sample M04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
24746Y		21.74	-1.15	-1.08	22.90	-0.17	-0.17	WZ
2E6WFB		23.50	0.61	0.57	23.67	0.60	0.59	IN
2YRNCM		22.91	0.02	0.02	23.04	-0.03	-0.03	CE
3B7VWU		22.14	-0.75	-0.70	22.35	-0.72	-0.71	WZ
3MDQ8J		22.62	-0.27	-0.25	22.26	-0.81	-0.80	TO
3RM7G8		20.99	-1.90	-1.78	21.12	-1.95	-1.92	CE
62PY6R		23.95	1.06	0.99	23.94	0.86	0.85	CE
6HYMHT		23.79	0.90	0.84	24.02	0.95	0.94	WZ
6Q7MRU		22.12	-0.77	-0.72	22.28	-0.79	-0.78	WZ
8Z7ULK	*	22.48	-0.41	-0.38	21.70	-1.37	-1.35	XX
94J472		20.74	-2.15	-2.01	21.19	-1.88	-1.85	TO
97T483		23.15	0.26	0.24	23.03	-0.05	-0.04	IN
98ZL8J		21.94	-0.95	-0.89	22.31	-0.76	-0.75	TM
9UGKQT		22.56	-0.33	-0.31	23.05	-0.02	-0.02	WZ
A6EYBP		20.84	-2.05	-1.92	21.36	-1.71	-1.68	CE
AAMKYM		21.26	-1.63	-1.52	21.81	-1.26	-1.24	TO
ADMFXP		21.48	-1.41	-1.32	21.90	-1.17	-1.15	XX
AHZN4Z	*	25.10	2.21	2.07	25.72	2.65	2.60	CE
AMVAU3		22.79	-0.10	-0.09	22.94	-0.13	-0.13	TY
AQUJ8Q		24.72	1.83	1.71	25.00	1.93	1.90	CE
AV87XN		24.84	1.95	1.82	24.58	1.51	1.49	CE
B3X9EQ	X	27.19	4.30	4.02	27.49	4.42	4.35	WZ
BCNRUK		23.50	0.61	0.57	23.38	0.31	0.31	CE
BHD8MX		22.69	-0.20	-0.18	23.45	0.37	0.37	WZ
CP67BN		23.38	0.49	0.46	23.46	0.39	0.38	WZ
CVUL2G		22.46	-0.43	-0.40	22.78	-0.29	-0.28	XX
CWP64H		22.53	-0.36	-0.33	22.69	-0.38	-0.37	WZ
DJZHGM		22.76	-0.13	-0.12	22.12	-0.95	-0.94	TO
DTMQVJ		22.45	-0.44	-0.41	23.34	0.27	0.27	WZ
EKR2XE		22.44	-0.45	-0.42	22.45	-0.63	-0.61	CE
ELK2RJ		22.64	-0.25	-0.23	22.84	-0.23	-0.23	TO
EVPYLE	X	26.85	3.96	3.70	27.12	4.04	3.98	TO
F4YQNH		23.79	0.90	0.84	23.39	0.32	0.31	TO
H8RDAG		23.54	0.65	0.61	24.06	0.99	0.97	IN
HNJ4FC		22.62	-0.27	-0.25	22.49	-0.58	-0.57	TO



Plastics Interlaboratory Testing Program

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WebCode	Data Flag	Sample M03			Sample M04			Instr Code
		Lab Mean	Diff from Grand Mean	CPV	Lab Mean	Diff from Grand Mean	CPV	
HW86PU		23.69	0.80	0.75	24.43	1.35	1.33	XX
KD9TT6		23.25	0.36	0.34	24.14	1.07	1.05	TM
LZK2PF		22.86	-0.03	-0.03	22.97	-0.10	-0.10	WZ
PMHNY7	X	20.54	-2.35	-2.20	19.87	-3.20	-3.15	XX
QKAYA3		24.01	1.12	1.05	23.17	0.10	0.10	IN
QT6YNV		22.49	-0.40	-0.37	22.26	-0.81	-0.80	TO
R9BHYR		23.12	0.23	0.22	23.33	0.25	0.25	WZ
RD7CWT	X	28.00	5.11	4.78	27.07	3.99	3.93	XX
RFUZ27		22.76	-0.13	-0.12	23.20	0.13	0.13	TO
RGL4L2		24.01	1.12	1.05	23.71	0.64	0.63	PO
RR3N8H		24.46	1.57	1.47	24.22	1.15	1.13	WZ
TMNAZ4		22.62	-0.27	-0.25	22.86	-0.21	-0.21	WZ
TUNU3Y		23.12	0.23	0.21	23.58	0.51	0.50	TO
VBPFG6		21.90	-0.99	-0.93	22.82	-0.25	-0.25	TO
VBQ9ED		22.06	-0.83	-0.78	22.19	-0.88	-0.87	WZ
WJ3KDW		22.25	-0.64	-0.60	22.49	-0.58	-0.57	CE
X8ZNKT		23.18	0.29	0.27	22.54	-0.53	-0.52	WZ
XWXJEX		21.43	-1.47	-1.37	21.92	-1.15	-1.14	TO
XXCNCW	*	26.17	3.28	3.06	25.89	2.82	2.77	XX
XXT2FY		24.20	1.31	1.22	24.62	1.55	1.52	CE
YTGF8T		23.21	0.31	0.29	23.34	0.27	0.26	TO
YWDCJZ		22.97	0.08	0.08	23.24	0.16	0.16	TY
Z6MVKB		21.88	-1.01	-0.94	22.22	-0.85	-0.84	XX
ZDJQN2		22.16	-0.73	-0.68	22.37	-0.71	-0.69	WZ
ZU3GMZ		23.58	0.69	0.64	23.86	0.79	0.78	TM

Summary Statistics	Sample M03	Sample M04
Grand Means	22.891 kJ/m ²	23.071 kJ/m ²
Stnd Dev Btwn Labs	1.070 kJ/m ²	1.017 kJ/m ²

Statistics based on 56 of 60 reporting participants

Sample M03: ABS & Sample M04: ABS



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Comments on Assigned Data Flags for Test #792

EVPYLE (X) - Data for both samples are high. Possible Systematic Error.

PMHNY7 (X) - Data for sample M04 are low.

B3X9EQ (X) - Data for both samples are high. Possible Systematic Error. Inconsistent within the determinations of both samples.

RD7CWT (X) - Data for both samples are high. Possible Systematic Error.

Key to Instrument Codes Reported by Participants

CE Ceast

PO POE

TO Tinius Olsen

WZ Zwick

IN Instron

TM TMI

TY Toyoseiki

XX Instrument manufacturer not specified by lab



Plastics Interlaboratory Testing Program

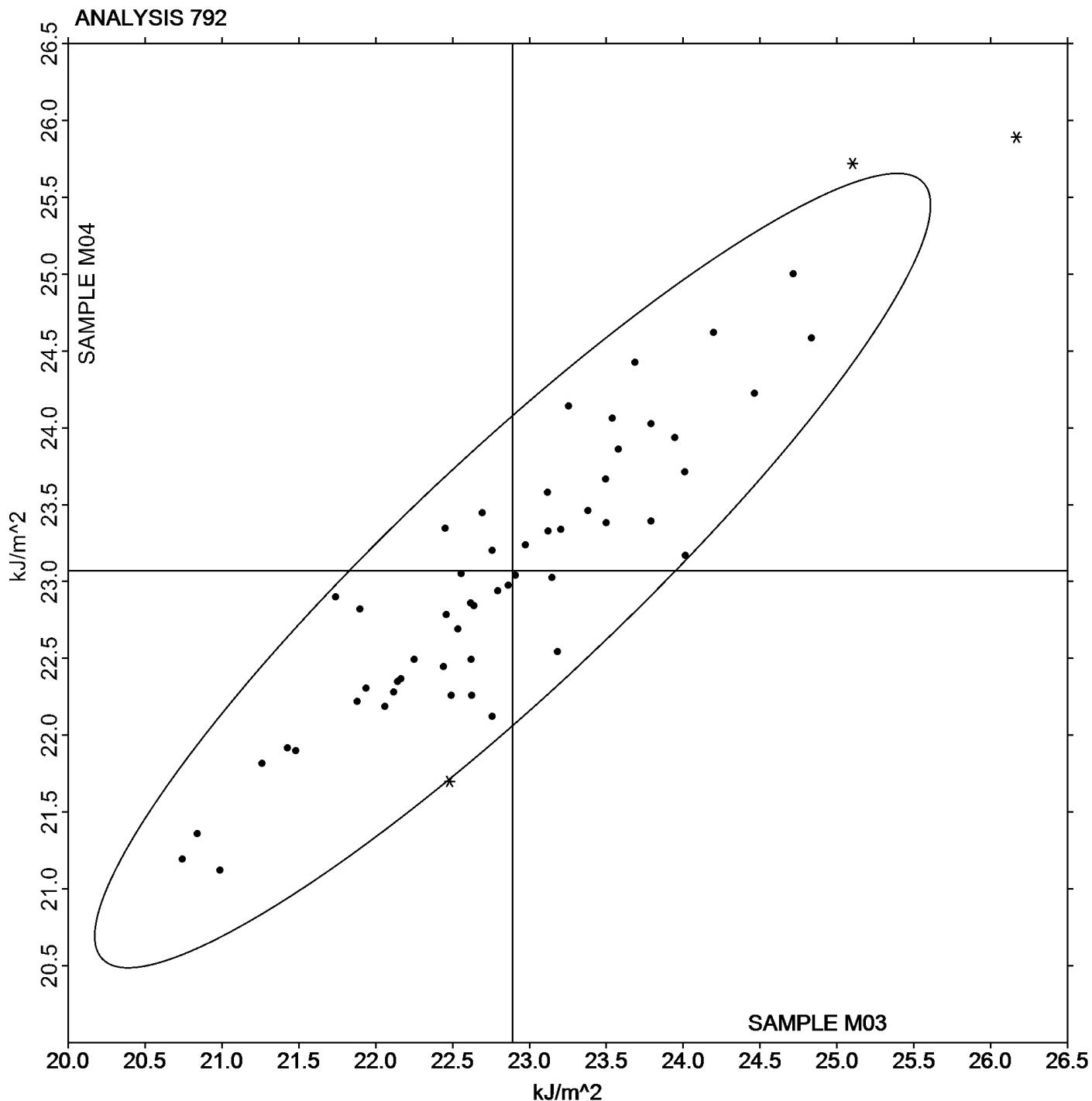
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Notched Charpy Impact - kJ/m^2

Grand Mean Sample M03: 22.891 kJ/m^2 Grand Mean Sample M04: 23.071 kJ/m^2



-End of Report-