



Test Monitoring Center

@ Carnegie Mellon University
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<http://astmtmc.cmu.edu>
412-365-1000

MEMORANDUM: 18-030
DATE: October 15, 2018
TO: Dale Smith, Chairman, L-33-1 Surveillance Panel
FROM: Dylan Beck
SUBJECT: L-33-1 Testing from April 1, 2018 through September 30, 2018

Attached is a summary of testing activity this period.

DJB/djb/mem18-030.djb.doc

cc: Frank Farber

Jeff Clark

Scott Parke

L-33-1 Surveillance Panel

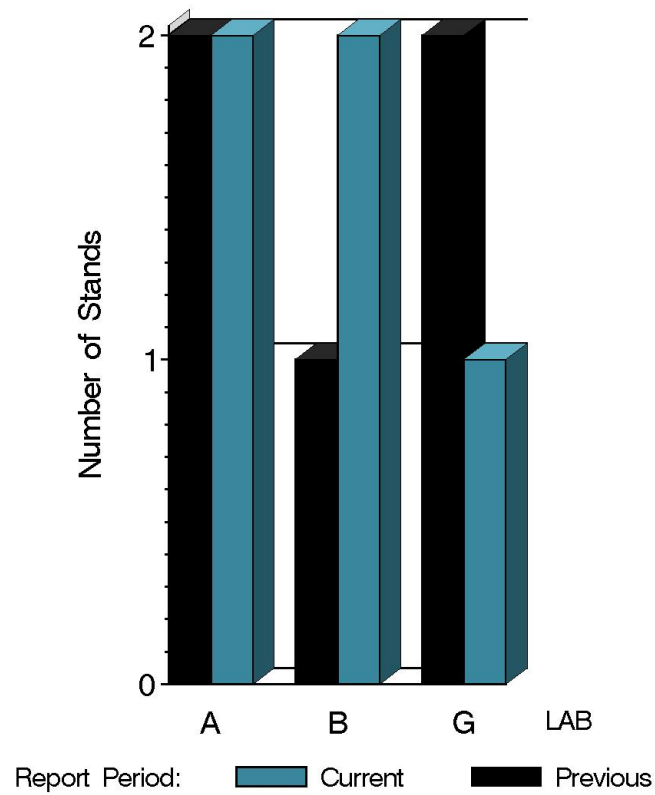
<http://www.astmtmc.cmu.edu/ftp/docs/gear/1331/semiannualreports/1331-10-2018.pdf>

Distribution: email

L-33-1 (D7038)

	Reporting Data	Calibrated on 9-30-18
Number of Labs	3	3
Number of Stands	5	5

BY-LAB STAND
DISTRIBUTION



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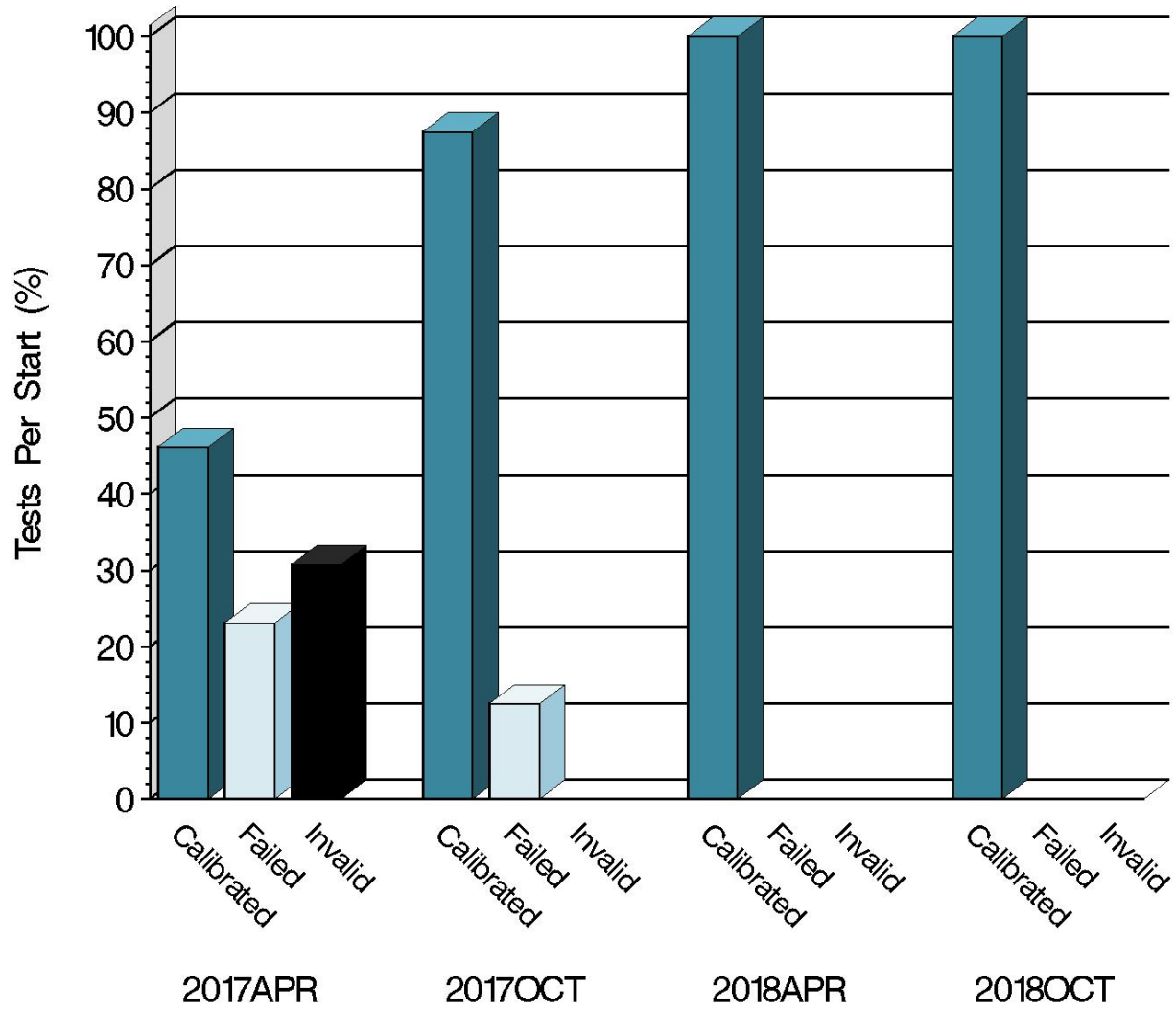
Test Distribution by Oil and Validity

					Totals	
					Last Period	This Period
		123-2	155	155-1		
Accepted for calibration	AC	3	0	2	7	5
Rejected (Mild)	OC	0	0	0	0	0
Rejected (Severe)	OC	0	0	0	0	0
Rejected (Precision)	OC	0	0	0	0	0
Invalidated calibration	LC	0	0	0	0	0
Aborted	XC	0	0	0	0	0
Unacceptable info run	MI	0	0	0	0	0
Accepted information run	NI	0	0	0	1	0
Total		3	0	2	8	5

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CALIBRATION ATTEMPT SUMMARY



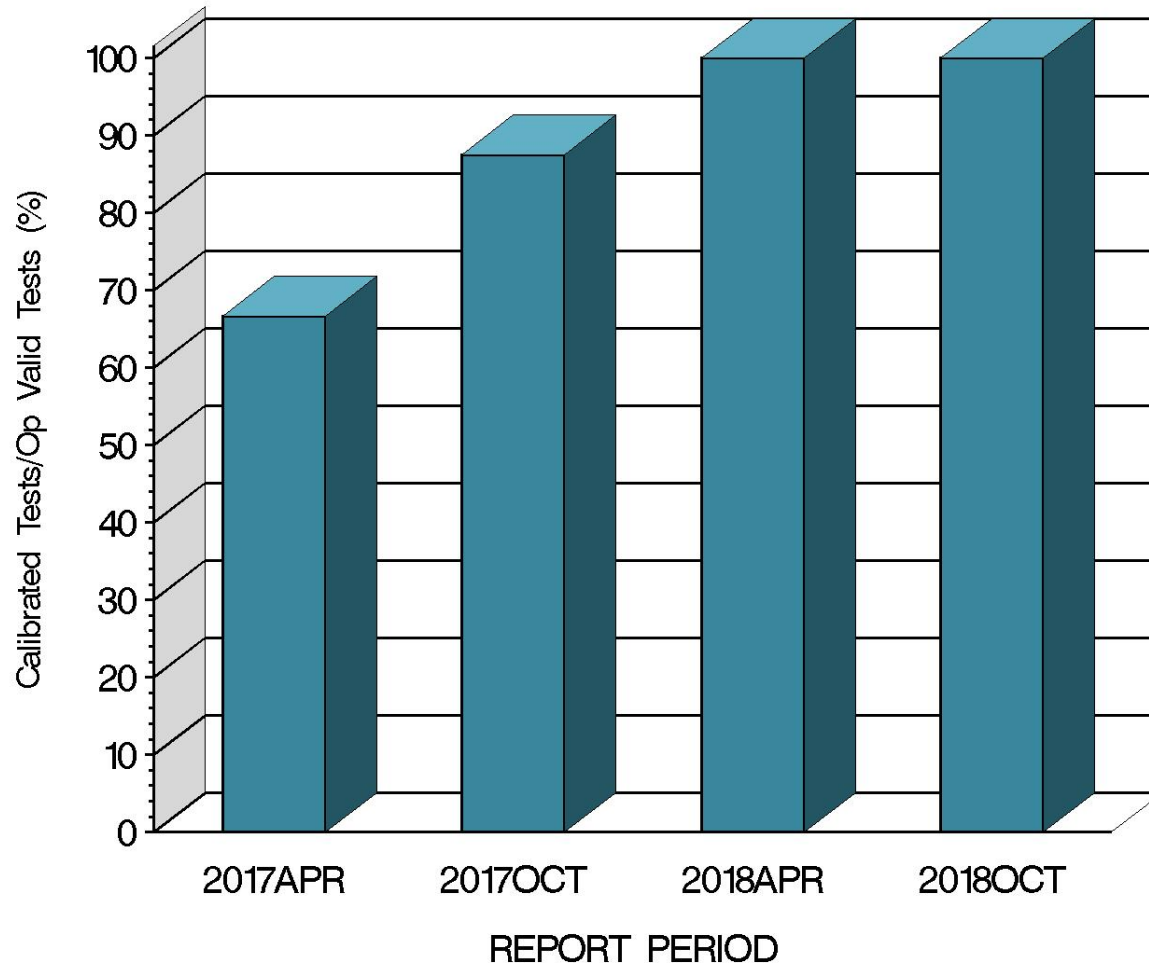
Resolution

Report Period

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OPERATIONALLY VALID TESTS
MEETING ACCEPTANCE CRITERIA



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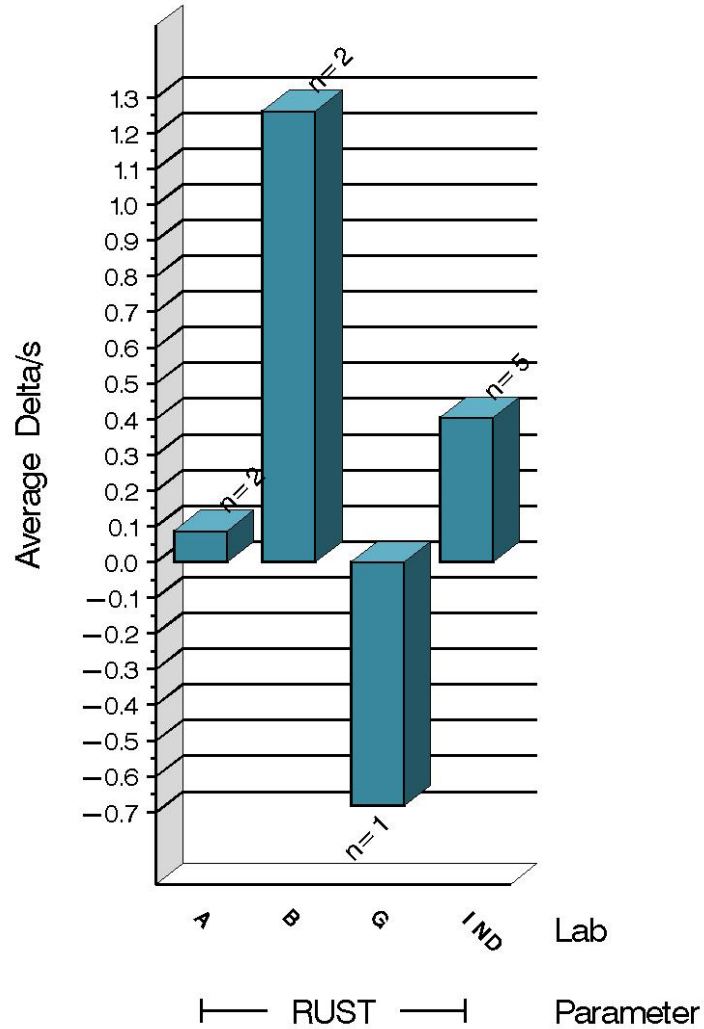
L-33-1 (D7038)

CAUSES FOR LOST TESTS

Lab	Cause	Oil			Validity			Loss Rate		
		123-2	155	155-1	RC	LC	XC	Lost	Starts	%
	No tests were lost this period							0	5	0%
	Lost	0	0	0	0	0	0			
	Starts	3	0	2	5	5	5			
	%	0%	0%	0%	0%	0%	0%			

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TEST SEVERITY
DELTA/S BY LAB



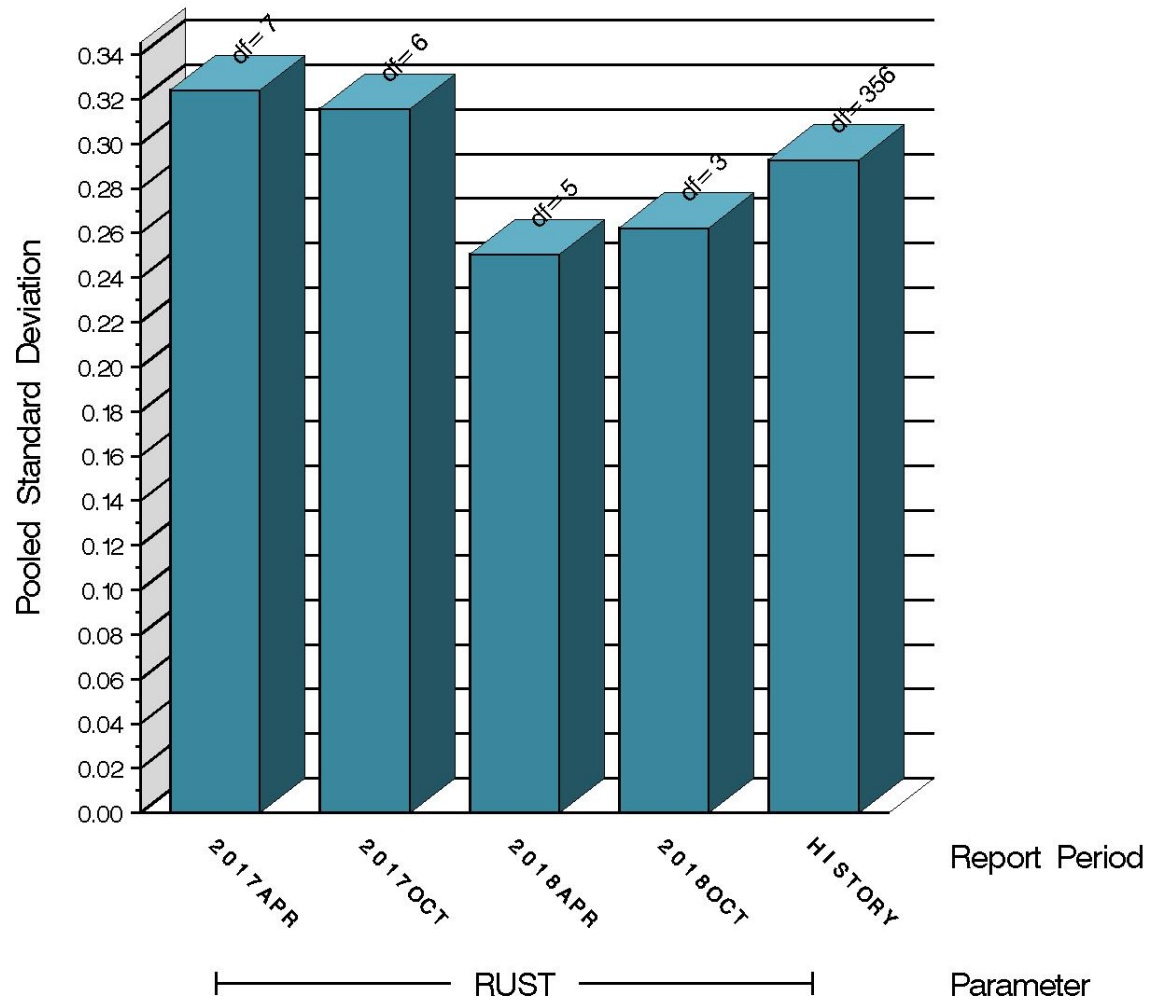
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Average Δ /s by Lab		
Lab	n	RUST
A	2	0.087

B	2	1.263
G	1	-0.682
Industry	5	0.404
Shift	5	0.101 merits

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TEST PRECISION
POOLED STANDARD DEVIATION
BY SIX-MONTH ASTM REPORT PERIOD



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SUMMARY OF SEVERITY & PRECISION

Severity

No severity limits were exceeded this period.

Precision

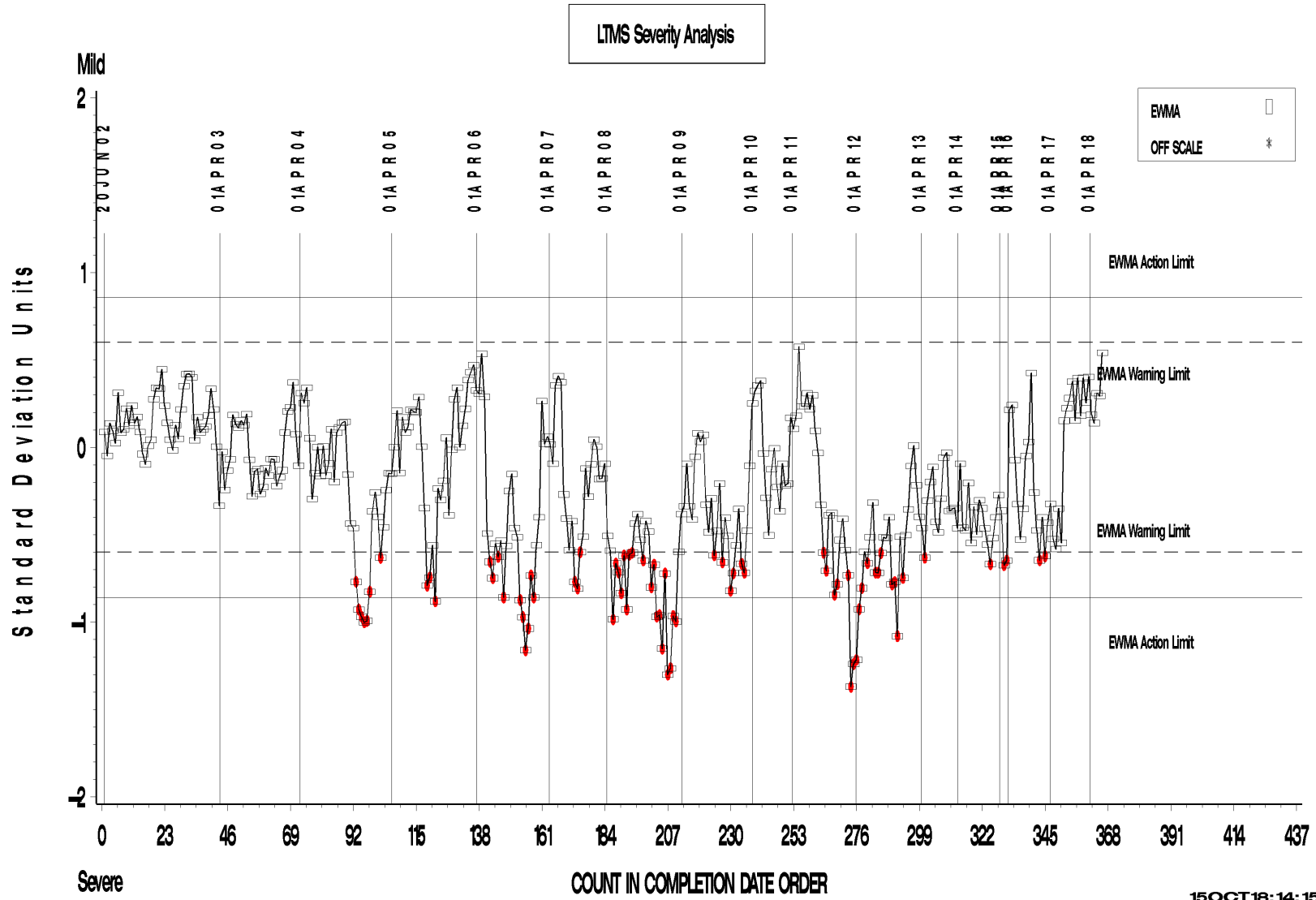
The action limit was exceeded during this period but finished the period below the warning limit.

Industry control charts follow.

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L-33-1 INDUSTRY OPERATIONALLY VALID DATA

FINAL RUST RESULT



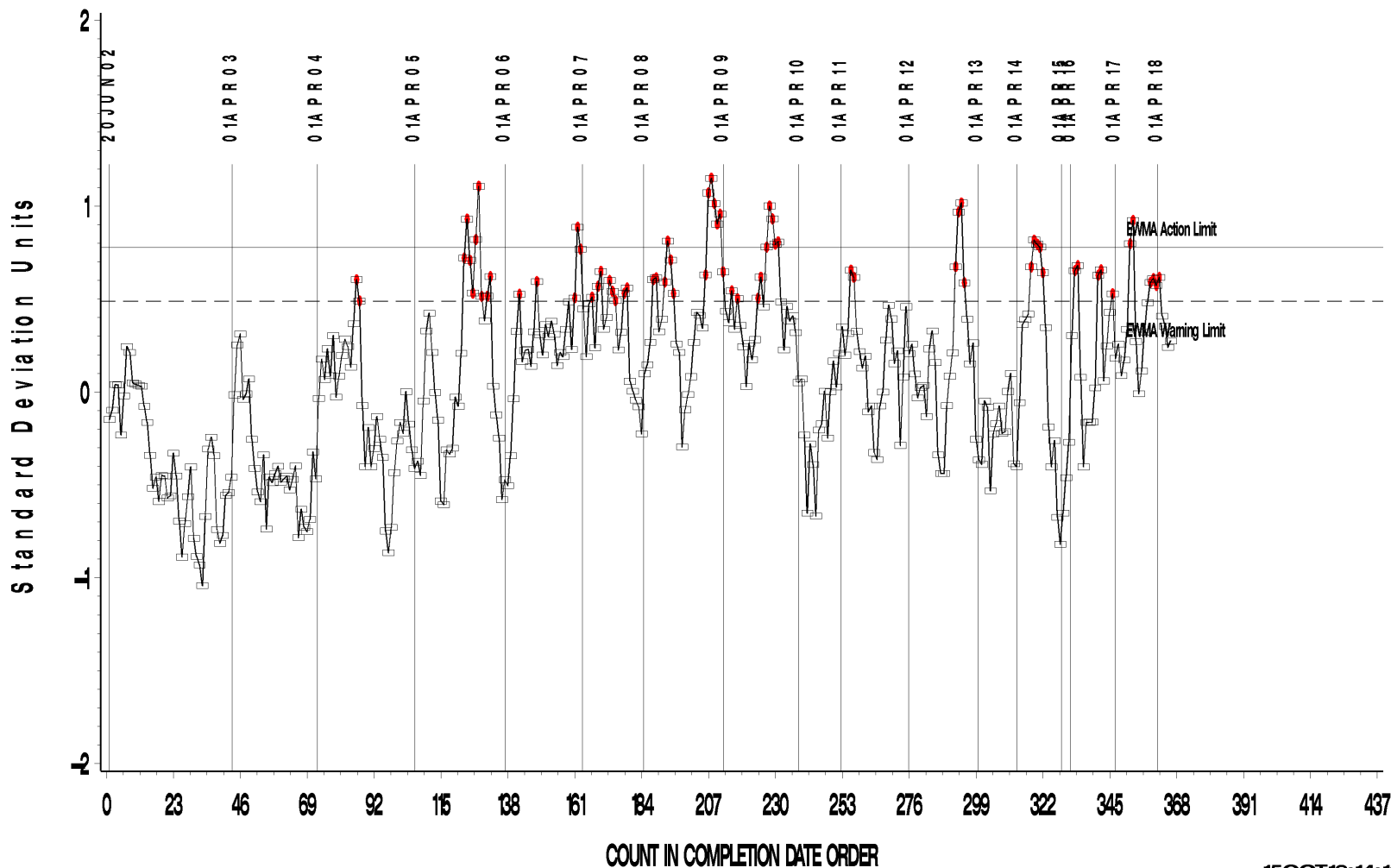
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L-33-1 INDUSTRY OPERATIONALLY VALID DATA

FINAL RUST RESULT

LTMS Precision Analysis



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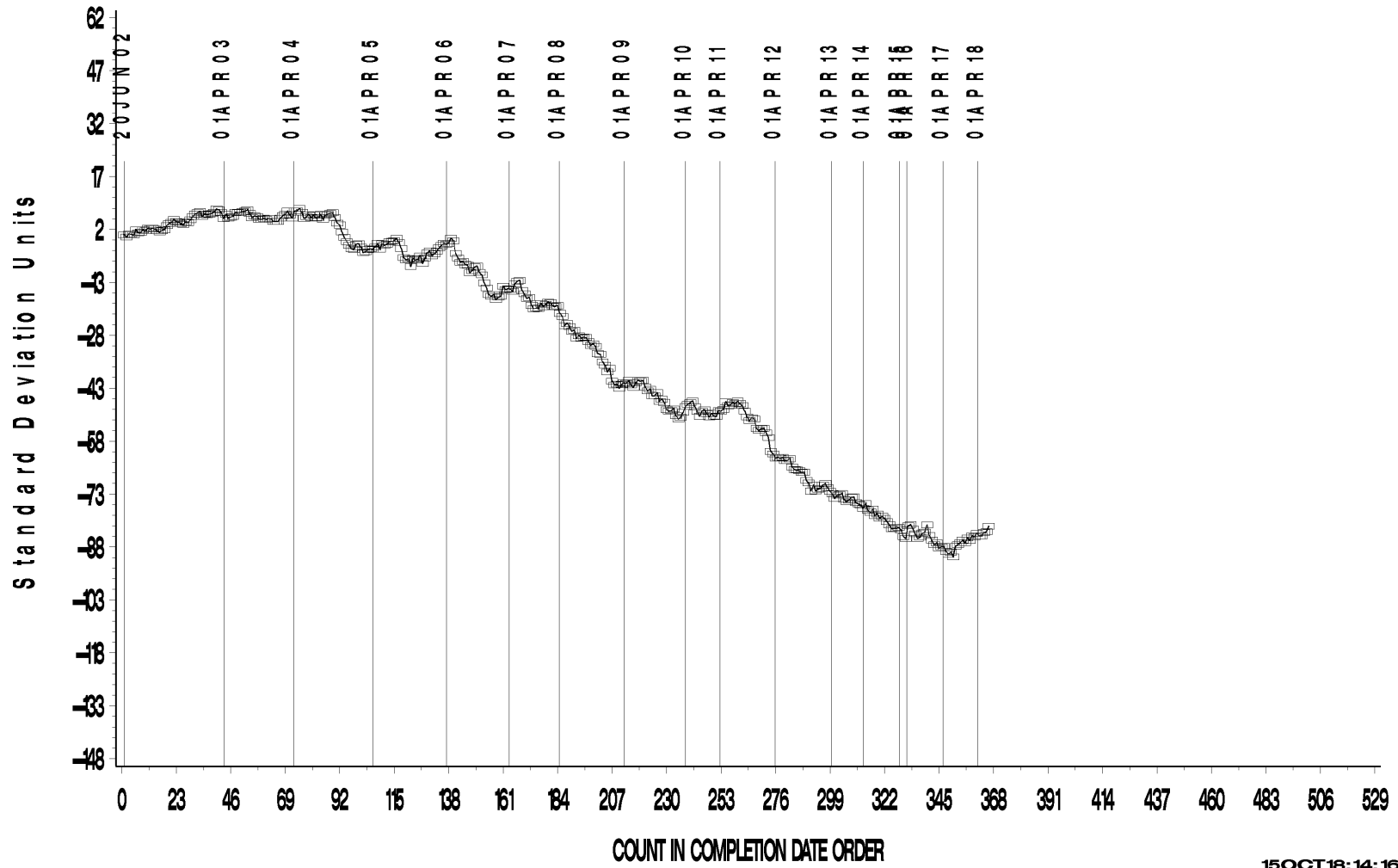
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L-33-1 INDUSTRY OPERATIONALLY VALID DATA

FINAL RUST RESULT

CUSUM Severity Analysis



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TIMELINE ADDITIONS

Effective Date	Information Letter	Event
20180808	18-2	Correction to information letter 17-1 that incorrectly used 6°C instead of 0.6°C
20180906	18-3	Removal of maximum number of downtime occurrences. Changed to allowing an unlimited number of downtime occurrences as long as the validity criteria is still met.

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LAB VISITS

No L-33-1 lab visits were conducted during this period.

INFORMATION LETTERS

Information Letters 18-2 and 18-3 were issued during this period. Letter 18-2 corrected a type that was included in 17-1. Letter 18-3 removed the allowed number of downtimes from the procedure to replace with an unlimited number of downtimes as long as the validity criteria of the test is still met.

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STATUS OF REFERENCE OIL SUPPLY

Oil	Cans @ Labs	@ TMC	
		Cans	Gallons
123-2	11	108	108.0
155	0	15	15.0
155-1	13	167	167.2
Total	24	290	290.2

The TMC quantity remaining presumes usage only for L-33-1 testing. Oil 155/155-1 is also used in other test areas (L-37, L-37-1, L-60-1, and HTCT).