



Test Monitoring Center

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412-365-1000

MEMORANDUM: 13-033

DATE: May 22, 2013

TO: Yong-Li McFarland,
Chairman, Engine Oil Water Tolerance Surveillance Panel

FROM: Michael T. Kasimirsky *Michael T. Kasimirsky*

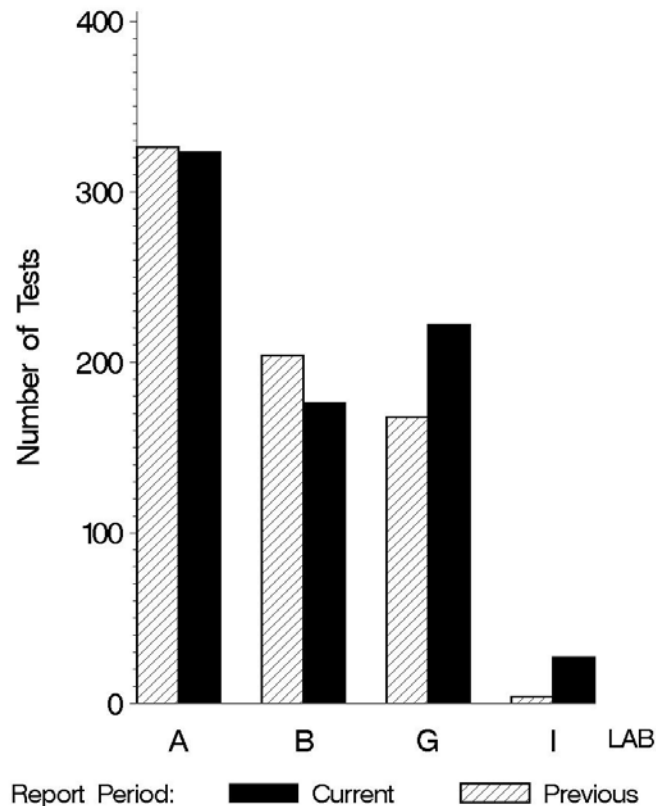
SUBJECT: EOWT Testing from October 1, 2012 through March 31, 2013

A total of 748 EOWT tests were reported to the Test Monitoring Center during the period from October 1, 2012 through March 31, 2013. Following is a summary of testing activity this period.

	Reporting Data
Number of Labs	4

Tests reported this period were distributed as shown below:

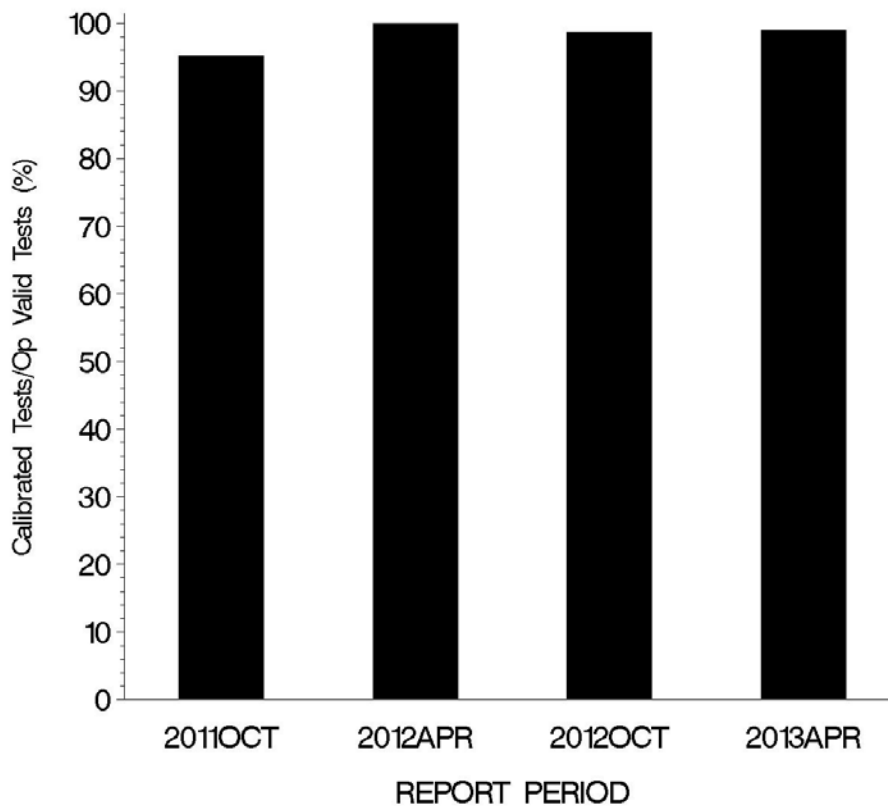
NUMBER OF TESTS REPORTED BY LAB AND REPORT PERIOD



Test Distribution by Oil, Treat Level and Validity

		By Oil				By Treat Level				Totals	
		77-1	77-2	78-1	78-2	0.6	1.0	2.0	3.0	This Period	Last Period
Accepted for Calibration	AC	300	72	4	323	176	173	176	174	699	662
Acceptable Donated Tests	NI	31	8	0	0	9	10	10	10	39	28
Unacceptable Donated Tests	MI	1	0	0	0	1	0	0	0	1	0
Rejected Tests	OC	2	0	0	6	2	3	2	1	8	10
Operationally Invalid (lab)	LC	0	0	0	0	0	0	0	0	0	0
Operationally Invalid (lab/TMC)	RC	0	0	0	0	0	0	0	0	0	0
Aborted Calibration	XC	1	0	0	0	0	1	0	0	1	2
Total		335	80	4	329	188	187	188	185	748	702

**OPERATIONALLY VALID TESTS
MEETING ACCEPTANCE CRITERIA**



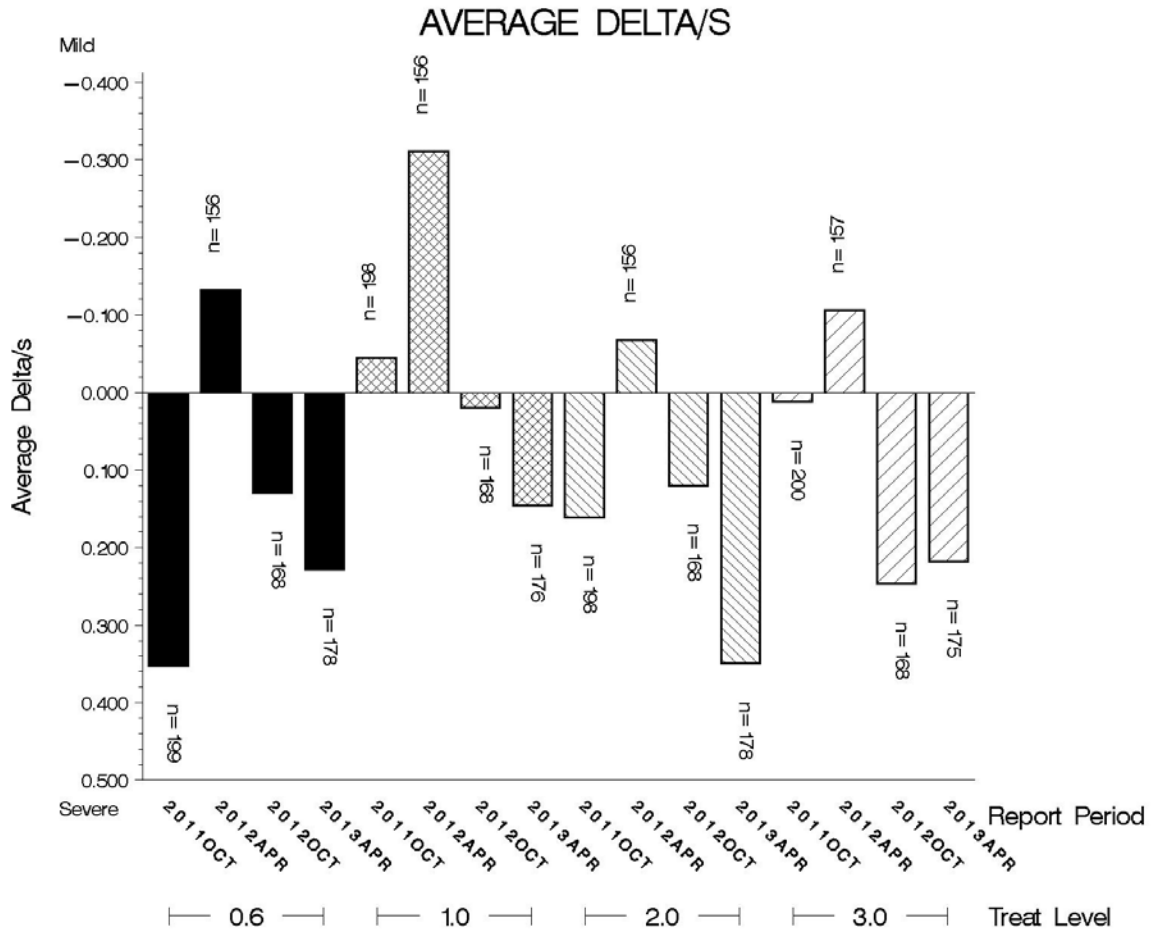
The above chart shows the percentage of accepted operationally valid tests.

Causes for Lost Tests

Lab	Cause	Oil				Validity			Loss Rate		
		77-1	77-2	78-1	78-2	LC	RC	XC	Lost	Starts	%
A	Mixing Error	●						●	1	748	0.1%
	Total	1	0	0	0	0	0	1			
	Starts	335	80	4	329	748	748	748			
	%	0.3%	0%	0%	0%	0%	0%	0.1%			

Average Δ 's by Lab and Treat Level

Treat Level	Lab	n	CFAYI
0.6	A	77	-0.146
	B	42	-0.171
	G	52	1.082
	I	7	0.408
	Industry	178	0.228
1.0	A	76	-0.159
	B	42	-0.147
	G	51	0.760
	I	7	0.733
	Industry	176	0.146
2.0	A	77	0.155
	B	42	-0.196
	G	52	1.024
	I	7	0.751
	Industry	178	0.350
3.0	A	76	-0.101
	B	42	-0.282
	G	51	1.019
	I	6	0.950
	Industry	175	0.218

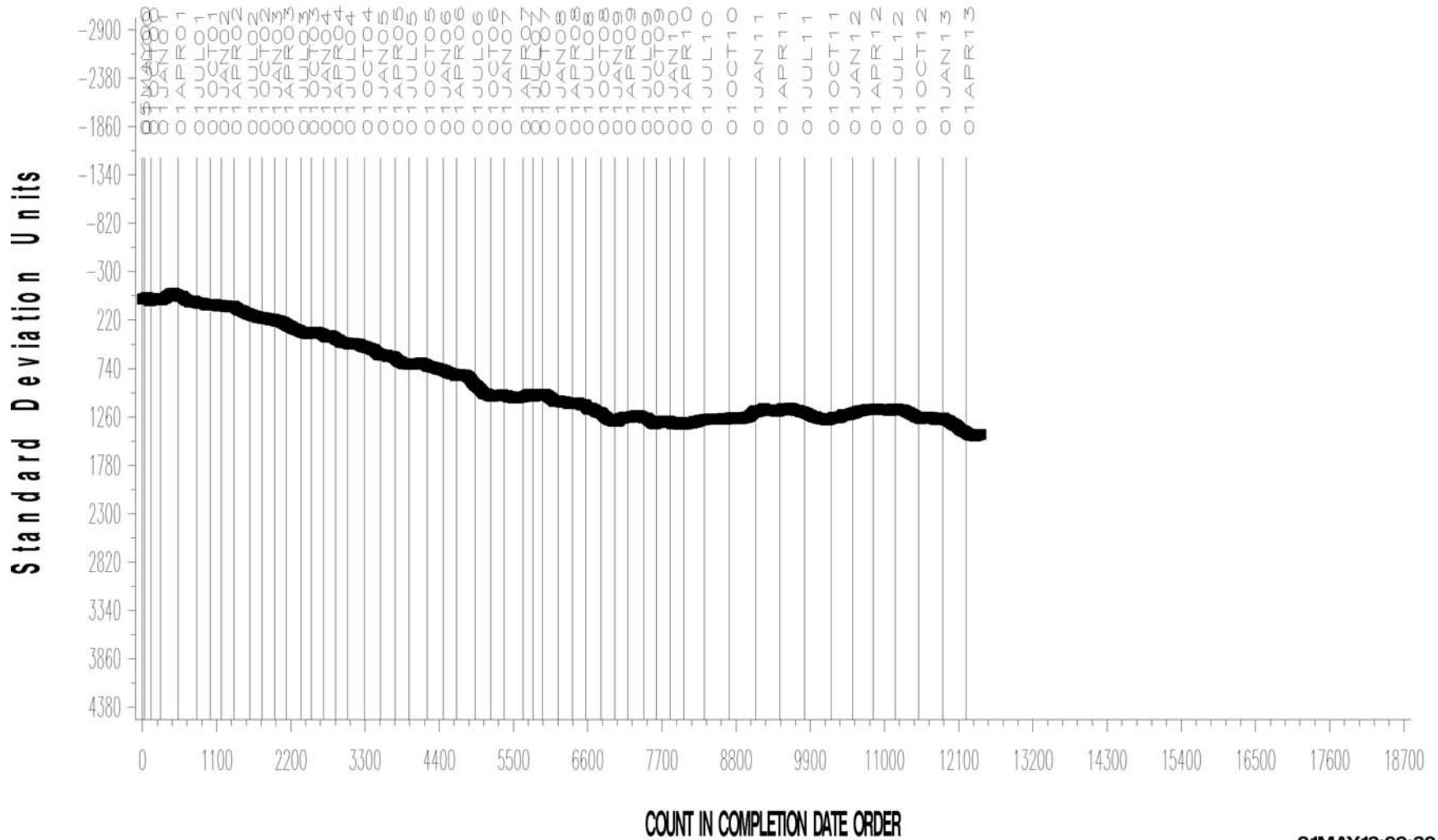


EOWT INDUSTRY OPERATIONALLY VALID DATA



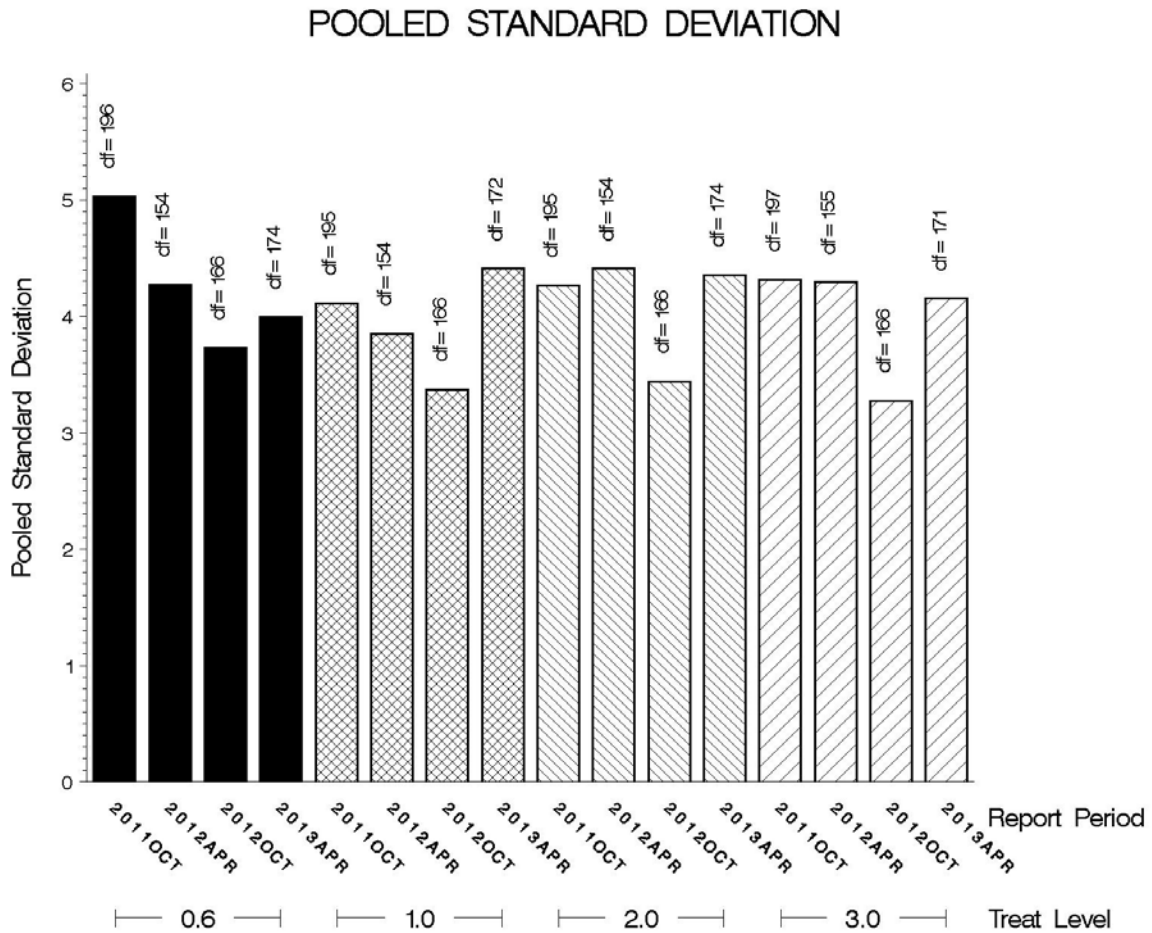
20 – 25 ML CHANGE IN FLOWRATE AVG.

CUSUM Severity Analysis



POOLED S:

Shown below are bar charts comparing the pooled standard deviation values for the EOWT test parameters over the last four report periods.



STATUS OF REFERENCE OIL SUPPLY:

At the end of this report period, the testing oil supply stood as outlined in the following table:

Oil	Cans @ Labs	@ TMC	
		Cans	Gallons
77-1	71	362	27.9
77-2	52	3392	261.2
78-1	8	0	0.0
78-2	90	1864	143.6
Total	221	5618	432.7

Be aware that this table presumes that all of each of these oils at the TMC is dedicated to EOWT use. This is not the case, as oils 78-1 and 78-2 are also used in the EOFT test.

INFORMATION LETTER

No information letters were issued during this report period.

SUMMARY

- Over the course of this report period, CFA severity, as measured by cusum plotting, is trending slightly severe.
- Precision, as measured by pooled standard deviation, has degraded when compared to the previous period, but is still comparable to historical levels.
- The TMC supply of reference oil 78-1 has been exhausted.

MTK/mtk/astm0413.doc/mem13-033.doc.doc

c: F. M. Farber

J. A. Clark

EOWT Surveillance Panel

<ftp://ftp.astmtmc.cmu.edu/docs/bench/eowt/semiannualreports/eowt-04-2013.pdf>

Distribution: email