



# Test Monitoring Center

6555 Penn Avenue  
Pittsburgh, PA 15206-4489  
(412) 365-1000

MEMORANDUM: 02-095

DATE: October 16, 2002

TO: Gordon R. Farnsworth, Chairman, Sequence VIA/VIB Reference Oil and Fuel Subpanel

FROM: Richard Grundza

SUBJECT: Sequence VIB Reference Oil Tests Statistics, Reference Oil 538

The following are the statistics for Sequence VIB reference oil 538, based on 30 test results. These targets are effective for reference oil tests completing on or after October 16, 2002.

Parameter	Mean	Standard Deviation
FEI1	1.89	0.22
FEI2	1.55	0.21

Figures 1 and 2 plot the results by laboratory and the Shewhart acceptance ranges for FEI1 and FEI2, respectively. Please note that laboratory results in Figures 1 and 2 have not been severity adjusted. Figure 3 summarizes the results used in the target calculation.

Attachments

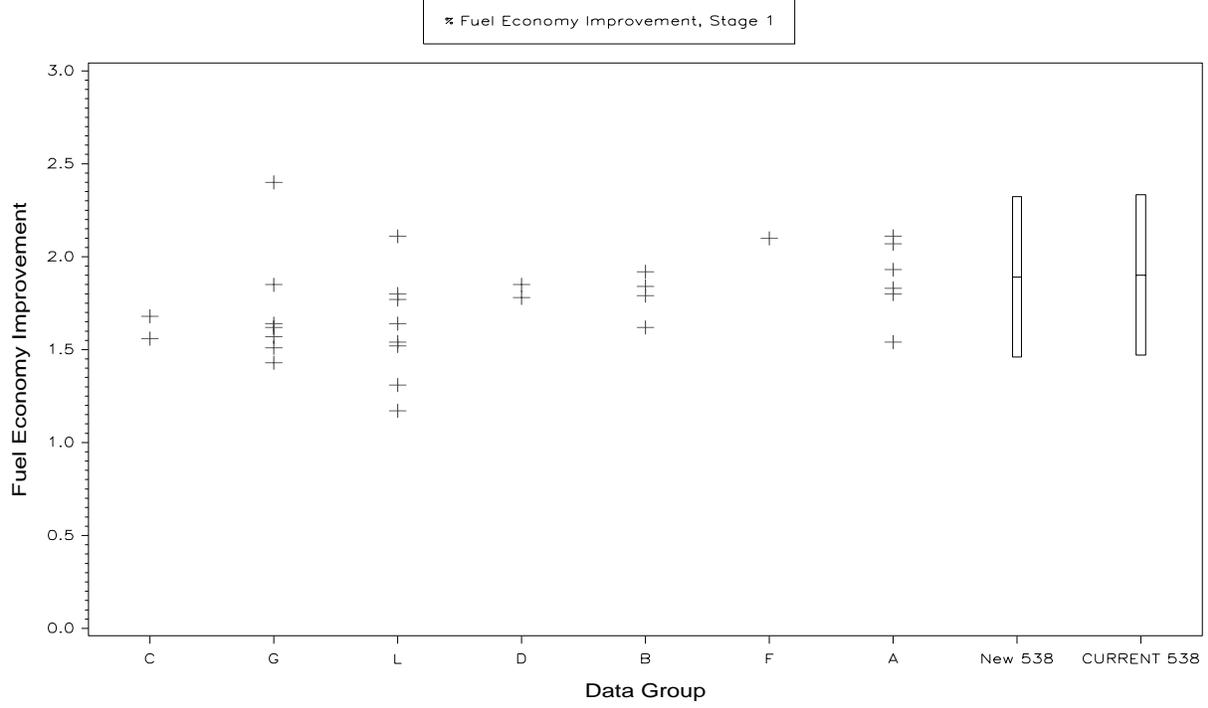
REG/reg

c: Sequence VIB Surveillance Panel  
Sequence VIB Test Engineers  
John Zalar, TMC  
Frank Farber, TMC  
<ftp://ftp.astmtmc.cmu.edu/docs/gas/sequencevi/memos/mem02-095.pdf>

Distribution: email

Sequence VIB (Reference Oil 538)  
 Test Target Data Set and Shewart Severity Limits

Figure 1



Sequence VIB (Reference Oil 538)  
 Test Target Data Set and Shewart Severity Limits

Figure 2

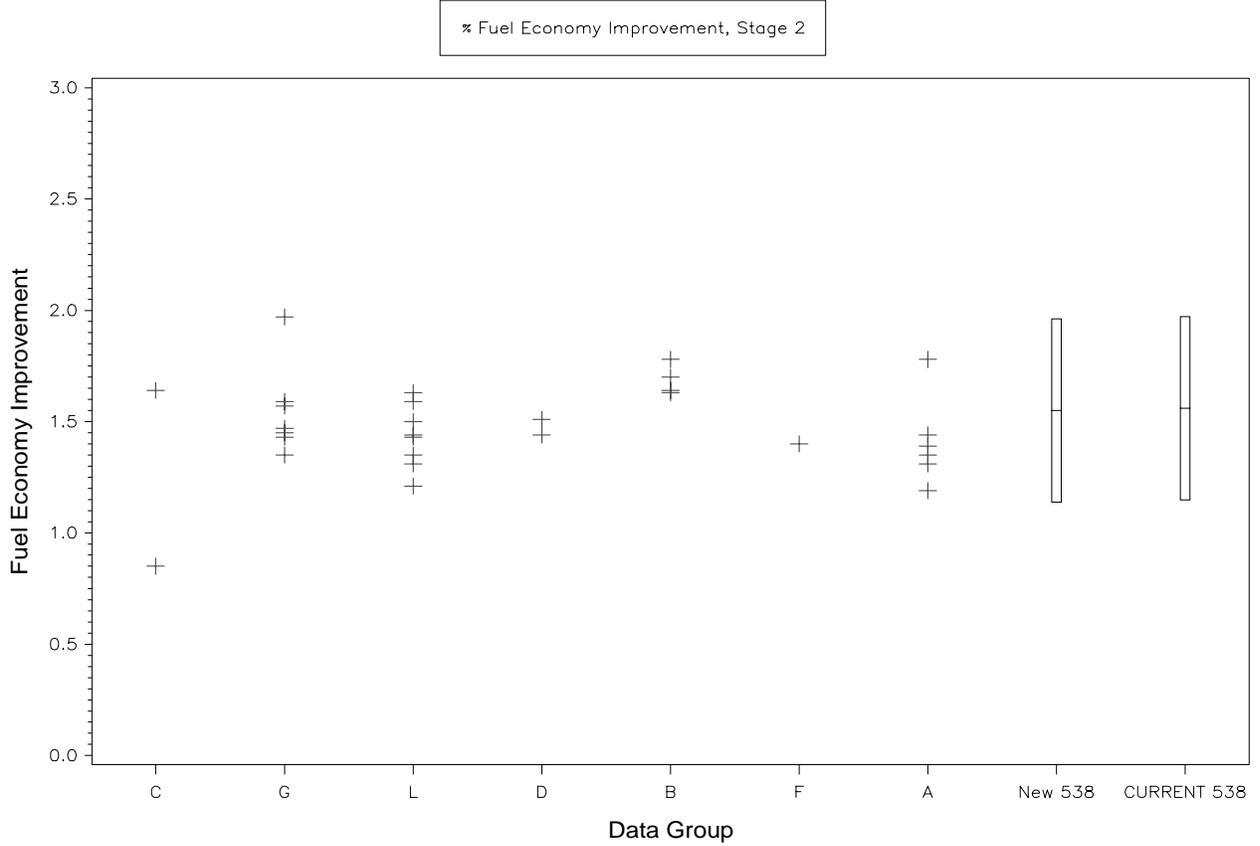


Figure 3

## Summary of 538 Results

Lab	FEI1	SA	Corrected FEI1	FEI2	SA	Corrected FEI2	New Engine
A	2.07	0	2.07	1.78	0.07	1.85	No
B	1.84	0	1.84	1.64	0.02	1.66	Yes
C	1.68	0.18	1.86	0.85	0.16	1.01	Yes
D	1.85	0.13	1.98	1.51	0.04	1.55	Yes
F	2.1	0.07	2.17	1.40	0.10	1.50	No
L	2.11	0.05	2.16	1.63	0.09	1.72	No
G	2.40	0.02	2.42	1.97	-0.09	1.88	No
G	1.57	0.20	1.77	1.57	0.06	1.63	Yes
A	2.11	0.00	2.11	1.39	0.09	1.48	No
G	1.43	0.19	1.62	1.47	0.04	1.51	Yes
G	1.64	0.31	1.95	1.59	0.03	1.62	Yes
C	1.56	0.25	1.81	1.64	0.11	1.75	No
A	1.83	0.09	1.92	1.35	0.14	1.49	No
L	1.52	0.35	1.87	1.44	0.10	1.54	Yes
L	1.8	0.30	2.10	1.59	0.04	1.63	Yes
B	1.62	0.13	1.75	1.63	-0.01	1.62	Yes
L	1.17	0.27	1.44	1.35	0.08	1.43	Yes
G	1.51	0.24	1.75	1.43	0.05	1.48	Yes
L	1.54	0.27	1.81	1.43	0.09	1.52	Yes
L	1.64	0.32	1.96	1.50	0.10	1.60	Yes
L	1.31	0.23	1.54	1.31	0.09	1.40	Yes
A	1.80	0.12	1.92	1.31	0.13	1.44	Yes
D	1.78	0.01	1.79	1.44	0.03	1.47	Yes
A	1.93	0.02	1.95	1.44	0.10	1.54	No
B	1.92	0.01	1.93	1.70	-0.01	1.69	Yes
G	1.85	0.11	1.96	1.35	0.03	1.38	No
B	1.79	0.02	1.81	1.78	0.04	1.82	Yes
L	1.77	0.03	1.80	1.21	0.15	1.36	Yes
G	1.62	0.22	1.84	1.45	0.11	1.56	Yes
A	1.54	0.14	1.68	1.30	0.07	1.37	Yes
Mean	1.74		1.89	1.48		1.55	
S	0.26		0.20	0.21		0.17	