4VM PD 104609

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SECTION 1

RESULTS

Packing List

From: National Patent Analytical Systems Inc.
2090 Harrington Mem. Rd., Mansfield, Ohio 44903

Cust No. VT1678J **Ord Date** 12/5/11
Sales Order No. 45060

Ship Date 12/9/11
Packing List No. 69350

Cust Purch Ord No. KIRK KIMBALL

Ship To:
Vermont Dept of Health
195 Colchester Avenue
Burlington Vt 05401

Bill To:
Vermont Dept of Health
P O Box 70
Burlington Vt 05402

25.00
Freight

Attn: **Ship Via** FedEx

Comments Service for Instrument Serial Number 104609

Inv Part No	Quantity Ordered	This Shipment	Back Ordered	Total Ship To Date	Description	Customer Part No.	Drawing Part No. / Rev
9DMT	1.0	1		1.0	DATAMASTER DMT SERVICE RETURN		
S/N 104609						None Given	No Draw # / NONE
Serial Nos.							

Opened
12-14-11

National Patent
Analytical Systems, Inc.

On this date 12/5/11, NPAS received instrument # 104609.

The instrument was sent from the Vermont Department of Health (VDH) so that NPAS could install updated software as well as inspect the instrument. At NPAS' request VDH provided copies of the Technical Support Inquiries (TSI) regarding the instrument. The calibration history of the instrument remained in the instrument so that NPAS could review its history.

NPAS examined the internal configuration of the instrument and did / did not find physical manipulation or tampering of the components located within the instrument itself.

NPAS did performance and accuracy checks on a certified 0.100 ethanol standard. NPAS found that the instrument passed / failed the performance and accuracy checks.

NPAS reviewed the instrument as to its DataMaster DMT Inspection, QA and Conformance Testing Procedure and the instrument performed / did not perform within its procedure.

NPAS examined the calibration records and did / did not observe anomalies.

NPAS testing indicates that there is no reason why this instrument would not have performed accurately and reliably in the field.

Print Name of Evaluator: Michael Barbely

Signature of Evaluator and Date: Michael Barbely 12/9/11

Print Name of Reviewer: DAVID RADOMSKI

Signature of Reviewer and Date: David Radomski 12/9/11

Opened 12-14-11 MRC

2090 Harrington Memorial Road, Mansfield, Ohio 44901 Ph 419-526-6727 Fax 419-526-9446

DataMaster DMT Serial Number 104609

Power Up	CAL Factor	In-House & 2nd Source Calibration Check			Simulator Assignment	Certification	0.01% Acet. in 0.08% EtOH	0.04% MeOH in H_2O	0.04% IPA in H_2O	0.01% Acet. in 0.04% EtOH	0.02% Acet. in 0.04% EtOH	0.04% MeOH in 0.08% EtOH	0.04% IPA in 0.08% EtOH
		NIST Temp. °C	Lot. #	Result (g/210L)									
12-15-11	0.970478 12-15-11	34.0	GUTH 11050	0.098 12/15/11	G6517 12/21/11	12-16-11	100% 12-15-11 12/16/11	100% 12-20-11 12/20/11	100% 12-20-11 12/20/11	100% 12-19-11	100% 12-20-11	12/15/11 100% 12/16/11	100% 12-20-11
		34.1	12-39-100	0.099 12-15-11 12/16/11									

Linearity Test #1	Linearity Test #2	Linearity Test #3	Linearity Test #4	Linearity Test #5	Data Download	In-House & 2nd Source Calibration Check		
						NIST Temp.°C	Lot. #	Result (g/210L)
12/16/11	12/15/11	12-19-11	~~12-20-11~~ 12-20-11	12-20-11	12-20-11	34.1	GUTH 11050	0.099 12-20-11
						34.0	12-39-100	0.098 12-20-11

Notes: Power up started 12/14/11

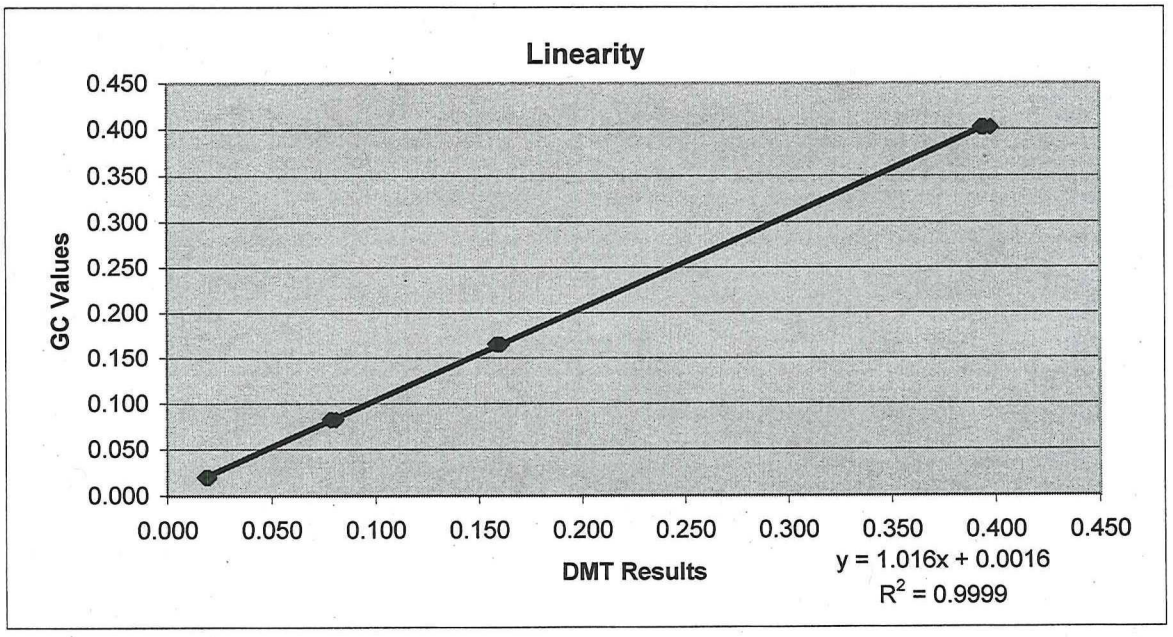
Calibration Solution NIST Temp = 34.0°C 12-15-11

H_2O Solution for Calibration NIST TEMP = 34.0°C 12-15-11

Analyst: 12/21/11 **Reviewer:** 12/21/11 **Reviewer:** 12-21-11

DataMaster DMT Serial Number 104609

Operator	Date	GC Value	DMT Average	Std Dev	% Recovery
KLK	12/16/2011	0.020	0.020	0.000	100
SRM	12/16/2011	0.082	0.079	0.000	96
SRM	12/16/2011	0.165	0.161	0.000	97
SRM	12/16/2011	0.402	0.398	0.000	99
SRM	12/19/2011	0.020	0.018	0.000	90
SRM	12/19/2011	0.082	0.078	0.000	95
SRM	12/19/2011	0.165	0.159	0.000	96
SRM	12/19/2011	0.402	0.393	0.000	97
KLK	12/19/2011	0.020	0.019	0.000	95
KLK	12/19/2011	0.082	0.078	0.000	95
KLK	12/19/2011	0.165	0.160	0.000	96
KLK	12/19/2011	0.402	0.394	0.000	98
KLK	12/20/2011	0.020	0.020	0.000	100
KLK	12/20/2011	0.165	0.158	0.000	95
KLK	12/20/2011	0.402	0.393	0.000	97
KLK	12/20/2011	0.082	0.081	0.001	98
KLK	12/20/2011	0.020	0.019	0.000	95
KLK	12/20/2011	0.082	0.078	0.000	95
KLK	12/20/2011	0.165	0.159	0.000	96
KLK	12/20/2011	0.402	0.395	0.001	98
			Average	0.0001	96
			Std Dev	0.0003	
			Range		90 - 100



Log On Record History

Test Date	Test Time	Name
12/14/2011	15:58:58	Kirk Kimball
12/15/2011	07:06:15	Kirk Kimball
12/15/2011	10:27:51	Kirk Kimball
12/15/2011	11:37:41	Kirk Kimball
12/15/2011	13:20:39	Steven Merrill
12/15/2011	13:59:17	Kirk Kimball
12/15/2011	14:32:10	Kirk Kimball
12/15/2011	15:08:35	Steven Merrill
12/15/2011	15:43:15	Kirk Kimball
12/16/2011	07:16:20	Steven Merrill
12/16/2011	12:48:06	Kirk Kimball
12/16/2011	13:04:51	Kirk Kimball
12/16/2011	13:44:11	Steven Merrill
12/19/2011	07:37:18	Steven Merrill
12/19/2011	08:27:56	Steven Merrill
12/19/2011	10:37:31	Kirk Kimball
12/19/2011	13:25:32	Kirk Kimball
12/19/2011	14:17:53	Kirk Kimball
12/19/2011	15:30:24	Kirk Kimball
12/20/2011	11:29:02	Kirk Kimball
12/20/2011	14:11:04	Kirk Kimball
12/20/2011	16:52:50	Kirk Kimball

SECTION 2

POWER UP TESTS

DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date:
Certification Date:
Installation Date:
Test Date: 12/14/2011
Test Time: 16:13:33

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 48.7°C
Breath Tube = 48.0°C
Digital Sim = 0.0°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.72 V
Bias Voltage = 80 V
Chopper Freq = 531 Hz

PUMP INFO
Flow Rate = 6.283 L/M

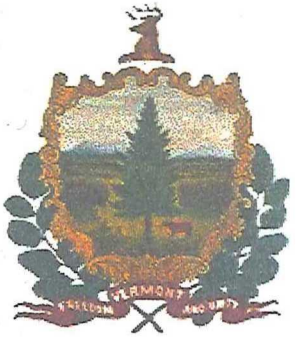
DETECTOR INFO

PUMP	ON	OFF
MAX(V)	-0.0094	-0.0063
MIN(V)	-0.0108	-0.0077

FILTER INFO
Filter 1 -0.007 Zero = true
Filter 2 0.316 Zero = true
Filter 3 -0.021 Zero = true

CALIBRATION CHECK
Xq = 0.077 1.25%

DIAGNOSTIC RESULT



DataMaster DMT: 104609
Location:
Calibration Date:
Certification Date:
Installation Date:
Test Date: 12/15/2011
Test Time: 07:06:16

```
VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 48.8°C
Breath Tube    = 47.2°C
Digital Sim    = 0.0°C

SETTINGS
Lamp Voltage   = 1.75 V
Cooler Voltage = 1.72 V
Bias Voltage   = 80 V
Chopper Freq   = 532 Hz

PUMP INFO
Flow Rate = 6.046 L/M

DETECTOR INFO
PUMP     ON         OFF
MAX(V)   -0.0557    -0.0530
MIN(V)   -0.0571    -0.0551

FILTER INFO
Filter 1  -0.055  Zero = true
Filter 2   0.271  Zero = true
Filter 3  -0.076  Zero = true

CALIBRATION CHECK
Xq  = 0.076  0.23%
```

DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date:
Certification Date:
Installation Date:
Test Date: 12/15/2011
Test Time: 10:53:03

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 48.9°C
Breath Tube = 47.6°C
Digital Sim = 0.0°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.69 V
Bias Voltage = 81 V
Chopper Freq = 533 Hz

PUMP INFO
Flow Rate = 6.139 L/M

DETECTOR INFO

PUMP	ON	OFF
MAX(V)	0.0014	0.0037
MIN(V)	0.0000	0.0018

FILTER INFO
Filter 1 0.002 Zero = true
Filter 2 0.325 Zero = true
Filter 3 -0.008 Zero = true

CALIBRATION CHECK
Xq = 0.077 1.02%

CALIBRATION REPORT

DataMaster DMT: 104609
Calibration Date: 12/15/2011
Calibrated by: KIRK L KIMBALL
Lot: 12-33-100

```
Ca   = 0.100
CAL  = 0.970478    0.800  <= CAL < 1.200
b1   = 0.000       0.000  <=  b1 < 0.004
b2   = 0.004       0.002  <=  b2 < 0.010
b3   = 0.000       0.000  <=  b3 < 0.004
Xq   = 0.077       0.050  <=  Xq < 0.200
a21  = 1.193048    1.050  <= a21 < 1.300
a31  = 0.445091    0.300  <= a31 < 0.800
```

Performed by KLK Date 12/15/2011

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/15/2011
Time: 15:09:48

SUPERVISOR NAME:
STEVEN R MERRILL

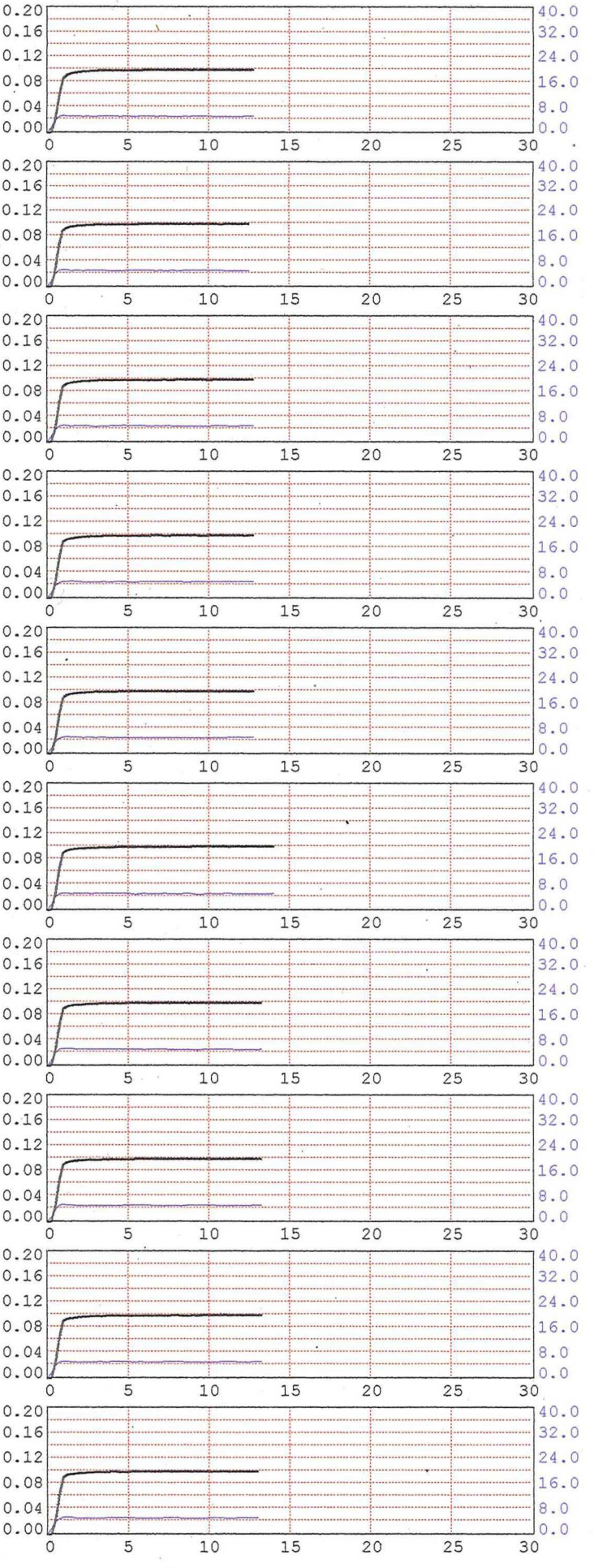
SOLUTION LOT #: GUTH 11050
SOLUTION CONCENTRATION: 0.100

BLANK TEST	0.000	15:10
CALIBRATION CHECK	PASSED	15:10
SIMULATOR VAPOR 33.8°C	0.099	15:11
SIMULATOR VAPOR 33.8°C	0.099	15:12
SIMULATOR VAPOR 33.8°C	0.099	15:13
SIMULATOR VAPOR 33.7°C	0.098	15:14
SIMULATOR VAPOR 33.8°C	0.099	15:15
SIMULATOR VAPOR 33.7°C	0.099	15:16
SIMULATOR VAPOR 33.8°C	0.099	15:17
SIMULATOR VAPOR 33.8°C	0.099	15:18
SIMULATOR VAPOR 33.8°C	0.099	15:19
SIMULATOR VAPOR 33.7°C	0.099	15:20
BLANK TEST	0.000	15:21

Average = 0.098
Std Dev = 0.000

2nd Source Cal Check 12/15/11 SR

12-15-11 KMC



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/15/2011
Time: 15:26:38

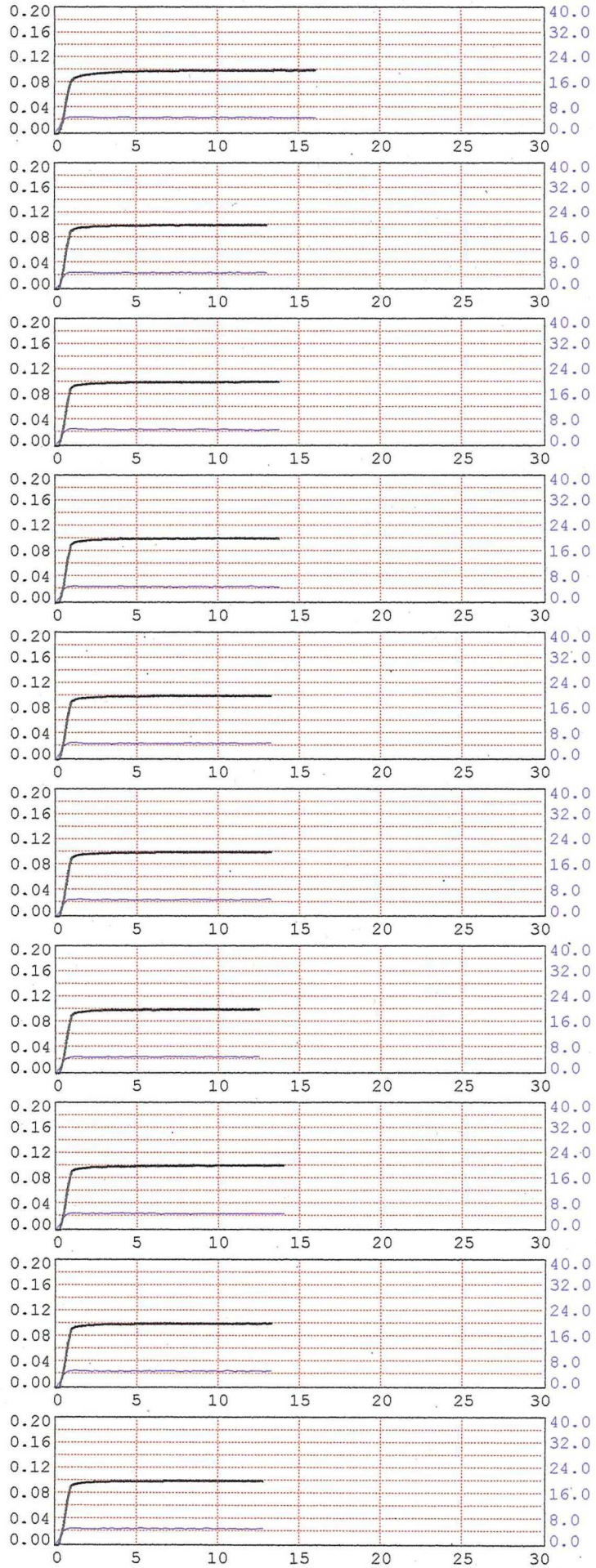
SUPERVISOR NAME:
STEVEN R MERRILL

SOLUTION LOT #: 12-39-100
SOLUTION CONCENTRATION: 0.100

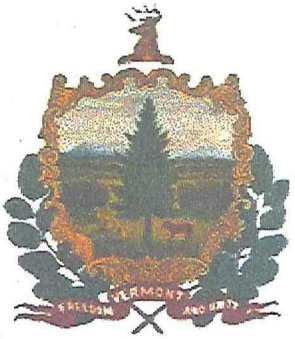
BLANK TEST	0.000	15:27
CALIBRATION CHECK	PASSED	15:27
SIMULATOR VAPOR 33.8°C	0.099	15:28
SIMULATOR VAPOR 33.7°C	0.099	15:29
SIMULATOR VAPOR 33.7°C	0.100	15:30
SIMULATOR VAPOR 33.7°C	0.100	15:31
SIMULATOR VAPOR 33.8°C	0.100	15:32
SIMULATOR VAPOR 33.8°C	0.100	15:33
SIMULATOR VAPOR 33.7°C	0.100	15:34
SIMULATOR VAPOR 33.8°C	0.101	15:35
SIMULATOR VAPOR 33.8°C	0.100	15:36
SIMULATOR VAPOR 33.8°C	0.099	15:37
BLANK TEST	0.000	15:38

Average = 0.099
Std Dev = 0.000

Inhouse
Cal Check
[illegible]
12-15-11



DIAGNOSTIC RESULT



DataMaster DMT: 104609
Location:
Calibration Date: 12/15/2011
Certification Date:
Installation Date:
Test Date: 12/16/2011
Test Time: 07:16:21

```
VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 48.9°C
Breath Tube    = 47.8°C
Digital Sim    = 0.0°C

SETTINGS
Lamp Voltage   = 1.75 V
Cooler Voltage = 1.69 V
Bias Voltage   = 80 V
Chopper Freq   = 533 Hz

PUMP INFO
Flow Rate = 6.163 L/M

DETECTOR INFO
PUMP     ON         OFF
MAX(V)   -0.0248    -0.0232
MIN(V)   -0.0266    -0.0248

FILTER INFO
Filter 1  -0.025  Zero = true
Filter 2   0.300  Zero = true
Filter 3  -0.039  Zero = true

CALIBRATION CHECK
Xq  = 0.077  0.22%
```

CERTIFICATION REPORT

DataMaster DMT: 104609
Calibration Date: 12/15/2011
Certification Date: 12/16/2011
Certified by: STEVEN R MERRILL

Diagnostic Results

```
VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 48.7°C
Breath Tube    = 47.6°C
Digital Sim    = 0.0°C

SETTINGS
Lamp Voltage   = 1.75 V
Cooler Voltage = 1.70 V
Bias Voltage   = 80 V
Chopper Freq   = 533 Hz

PUMP INFO
Flow Rate = 6.194 L/M

DETECTOR INFO
PUMP     ON         OFF
MAX(V)   -0.0238    -0.0217
MIN(V)   -0.0254    -0.0238

FILTER INFO
Filter 1  -0.023  Zero = true
Filter 2   0.301  Zero = true
Filter 3  -0.040  Zero = true

CALIBRATION CHECK
Xq  = 0.076  1.12%
```

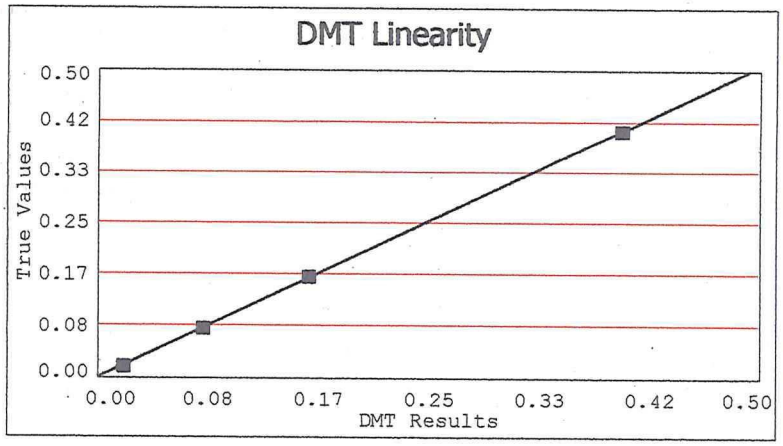
Options

```
OPTIONS
Units
   Alcohol..................... g/210L
Simulator
   Tolerance Check............. yes
   Standard Type............... wet
   Nominal..................... 0.100
   Digital Simulator........... Guth34CNP
Subject
   Ask Questions............... yes
   Number of Tests............. 2
   Alcohol Display............. yes
   Volume Display.............. yes
   Query Refusal............... yes
   Copies...................... 3
   Simulator Before............ yes
   Simulator Between........... yes
   Simulator After............. no
   Observation Time............ 0
Supervisor
   Number of Tests............. 10
Calibration
   Standard Type............... wet
   Nominal..................... 0.100
   Nominal(Dry Gas)............ 0.100
   Number of Tests............. 1
Printer
   Printer On.................. yes
Software Configuration
   Data Collection............. yes
```

Linearity Check Results

True Value	Reported Average	Std Dev
0.020 g/210L Lot # 12-46-020	0.019 g/210L	0.0000
0.082 g/210L Lot # 12-41-080	0.079 g/210L	0.0000
0.165 g/210L Lot # 12-42-160	0.159 g/210L	0.0000
0.402 g/210L Lot # 12-47-400	0.395 g/210L	0.0000

$R^2 = 0.9999$



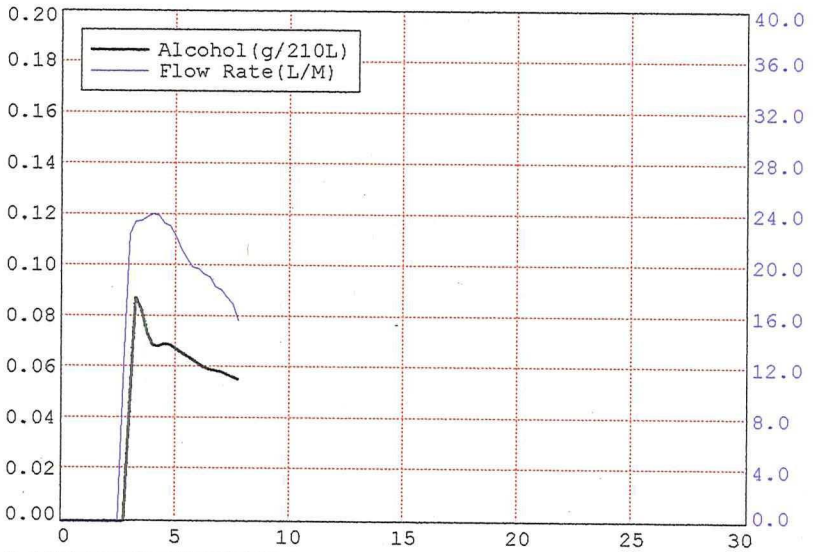
Acetone Interference Test

Lot # 12-37-080A1

Interference Detected

Mouth Alcohol Test

Mouth Alcohol Detected

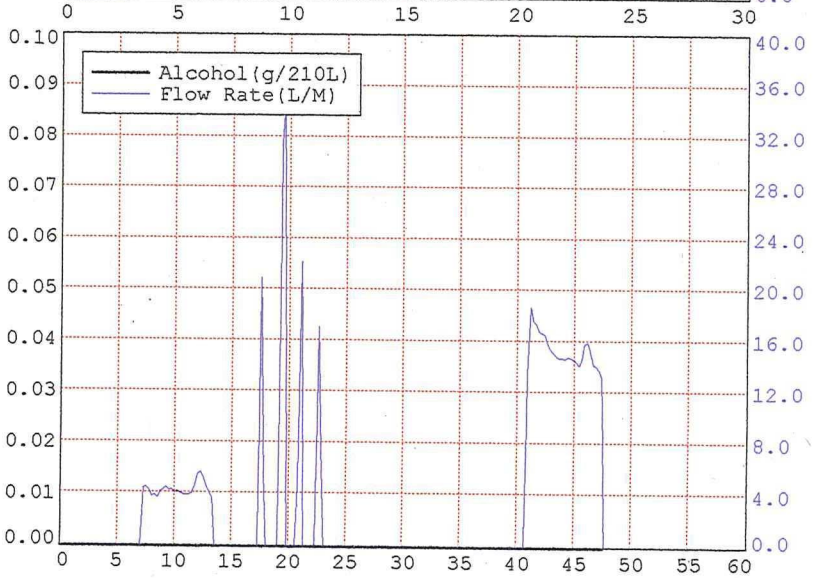


RF Detection Test

Passed

Sample Acceptance Test

Passed



CERTIFICATION PASSED

Performed by KJK Date 12/16/2011

Reviewed by _____ Date 12/16/11

DMT Serial Number #104609

12/16/2011 12:44 PM

SECTION 3

LINEARITY TESTS

DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date: 12/15/2011
Certification Date: 12/16/2011
Installation Date:
Test Date: 12/16/2011
Test Time: 12:48:11

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 48.9°C
Breath Tube = 47.3°C
Digital Sim = 0.0°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.70 V
Bias Voltage = 80 V
Chopper Freq = 529 Hz

PUMP INFO
Flow Rate = 6.192 L/M

DETECTOR INFO

PUMP	ON	OFF
MAX(V)	-0.0372	-0.0327
MIN(V)	-0.0386	-0.0346

FILTER INFO
Filter 1 -0.035 Zero = true
Filter 2 0.291 Zero = true
Filter 3 -0.062 Zero = true

CALIBRATION CHECK
Xq = 0.076 1.23%

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/16/2011
Time: 13:07:49

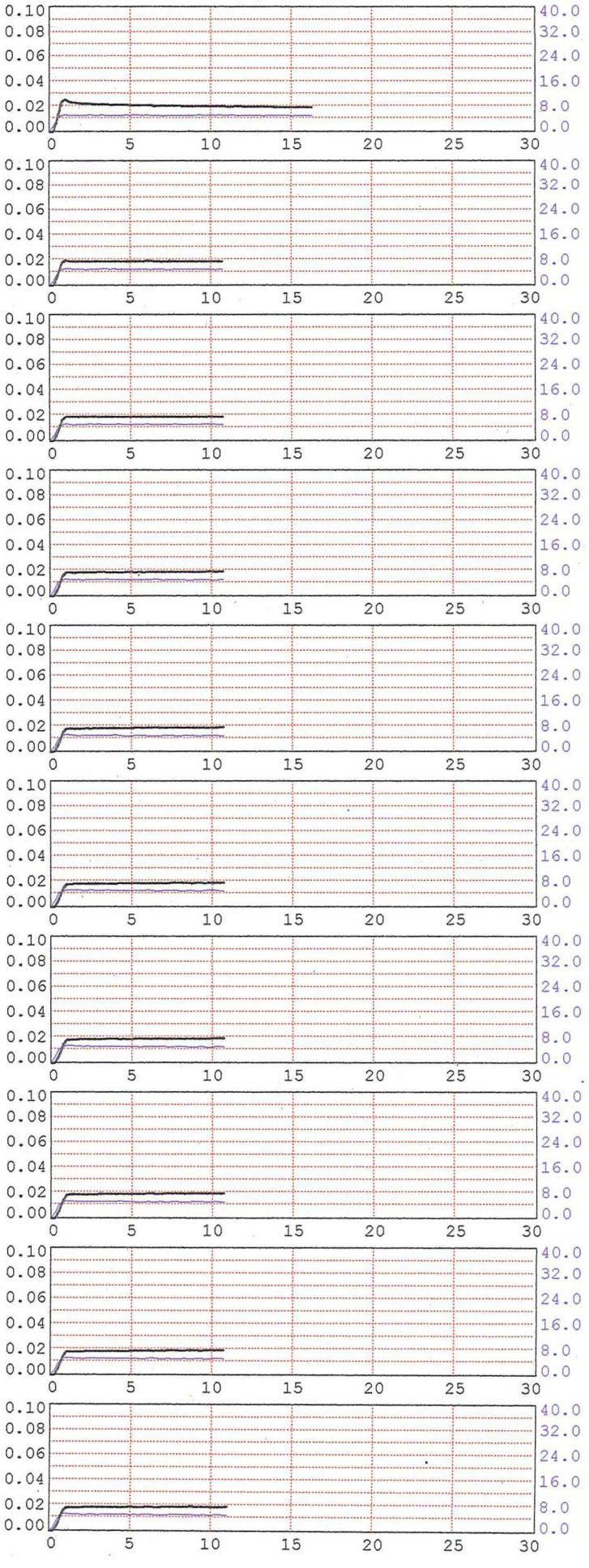
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-46-020
SOLUTION CONCENTRATION: 0.020

BLANK TEST	0.000	13:08
CALIBRATION CHECK	PASSED	13:08
SIMULATOR VAPOR 33.8°C	0.020	13:09
SIMULATOR VAPOR 33.8°C	0.020	13:10
SIMULATOR VAPOR 33.8°C	0.020	13:11
SIMULATOR VAPOR 33.8°C	0.020	13:12
SIMULATOR VAPOR 33.8°C	0.020	13:13
SIMULATOR VAPOR 33.8°C	0.020	13:14
SIMULATOR VAPOR 33.7°C	0.020	13:15
SIMULATOR VAPOR 33.7°C	0.020	13:16
SIMULATOR VAPOR 33.8°C	0.020	13:17
SIMULATOR VAPOR 33.8°C	0.020	13:18
BLANK TEST	0.000	13:19

Average = 0.020
Std Dev = 0.000

LI 12/16/11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/16/2011
Time: 13:45:20

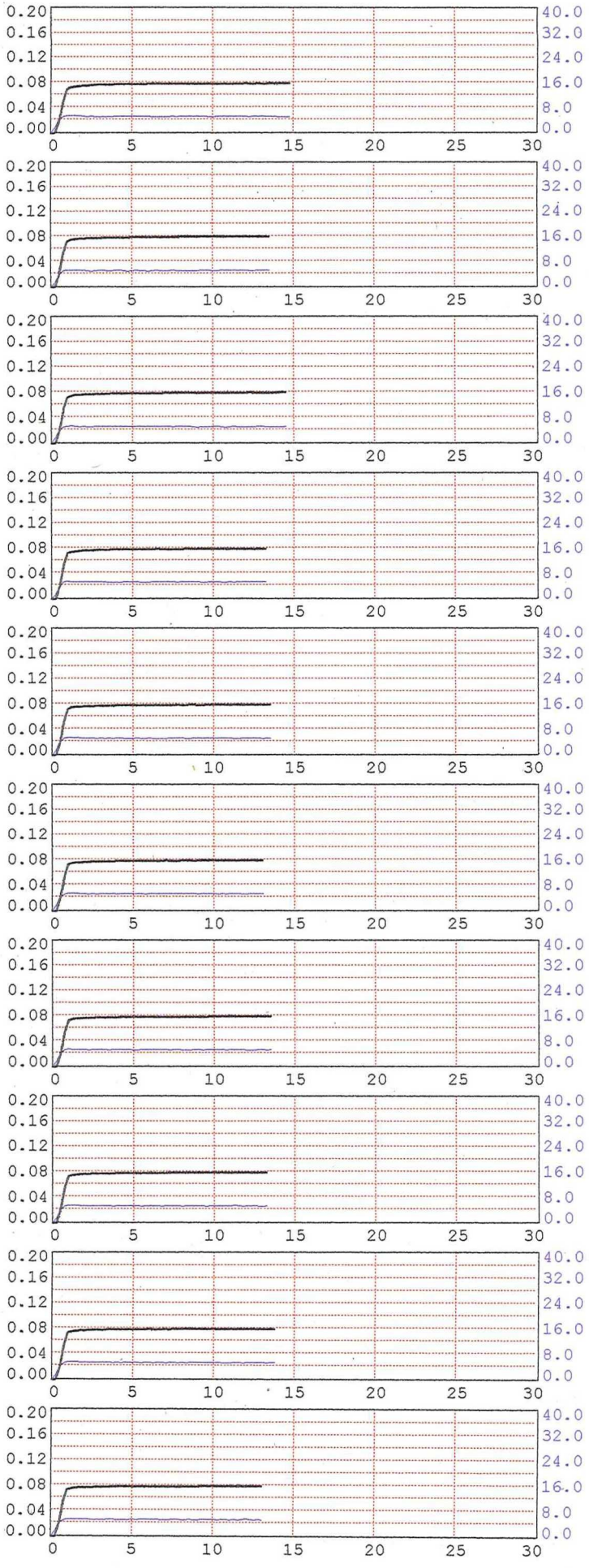
SUPERVISOR NAME:
STEVEN R MERRILL

SOLUTION LOT #: 12-41-080
SOLUTION CONCENTRATION: 0.082

BLANK TEST	0.000	13:46
CALIBRATION CHECK	PASSED	13:46
SIMULATOR VAPOR 33.8°C	0.079	13:46
SIMULATOR VAPOR 33.8°C	0.080	13:47
SIMULATOR VAPOR 33.7°C	0.080	13:48
SIMULATOR VAPOR 33.8°C	0.079	13:49
SIMULATOR VAPOR 33.8°C	0.079	13:51
SIMULATOR VAPOR 33.8°C	0.079	13:52
SIMULATOR VAPOR 33.8°C	0.079	13:53
SIMULATOR VAPOR 33.8°C	0.079	13:54
SIMULATOR VAPOR 33.8°C	0.079	13:55
SIMULATOR VAPOR 33.8°C	0.079	13:56
BLANK TEST	0.000	13:57

Average = 0.079
Std Dev = 0.000

EI 12/16/11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/16/2011
Time: 14:01:02

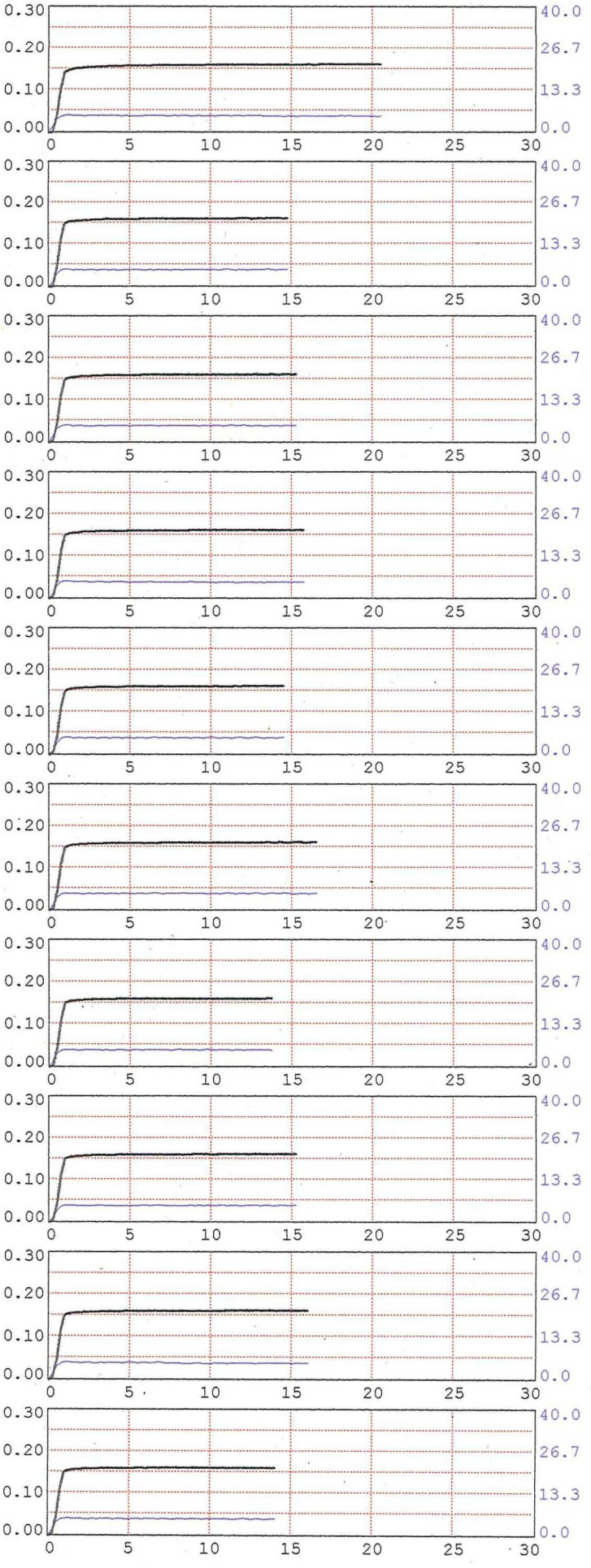
SUPERVISOR NAME:
STEVEN R MERRILL

SOLUTION LOT #: 12-42-160
SOLUTION CONCENTRATION: 0.165

BLANK TEST	0.000	14:01
CALIBRATION CHECK	PASSED	14:02
SIMULATOR VAPOR 33.7°C	0.161	14:02
SIMULATOR VAPOR 33.7°C	0.161	14:03
SIMULATOR VAPOR 33.8°C	0.161	14:04
SIMULATOR VAPOR 33.8°C	0.162	14:05
SIMULATOR VAPOR 33.8°C	0.161	14:06
SIMULATOR VAPOR 33.7°C	0.161	14:08
SIMULATOR VAPOR 33.8°C	0.161	14:09
SIMULATOR VAPOR 33.7°C	0.161	14:10
SIMULATOR VAPOR 33.7°C	0.161	14:11
SIMULATOR VAPOR 33.8°C	0.161	14:12
BLANK TEST	0.000	14:13

Average = 0.161
Std Dev = 0.000

12/16/11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/16/2011
Time: 14:17:43

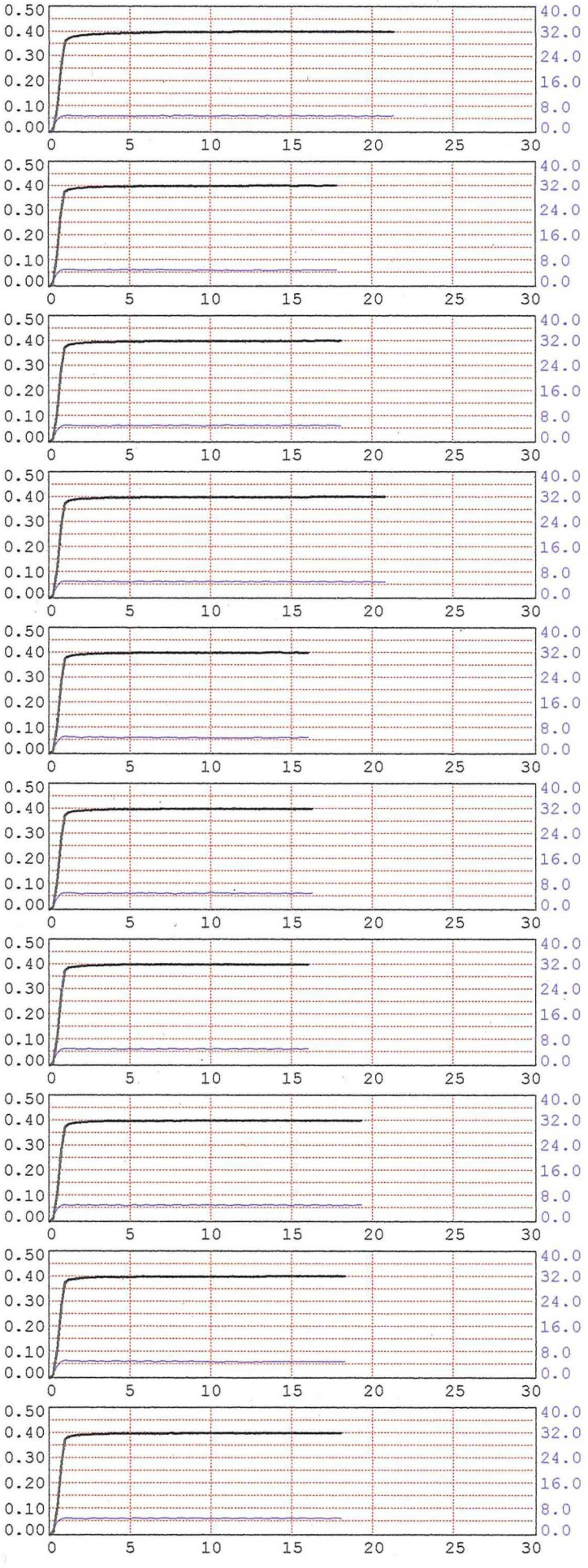
SUPERVISOR NAME:
STEVEN R MERRILL

SOLUTION LOT #: 12-47-400
SOLUTION CONCENTRATION: 0.402

BLANK TEST	0.000	14:18
CALIBRATION CHECK	PASSED	14:18
SIMULATOR VAPOR 33.7°C	0.400	14:19
SIMULATOR VAPOR 33.8°C	0.399	14:20
SIMULATOR VAPOR 33.8°C	0.399	14:21
SIMULATOR VAPOR 33.7°C	0.399	14:22
SIMULATOR VAPOR 33.8°C	0.398	14:23
SIMULATOR VAPOR 33.8°C	0.398	14:25
SIMULATOR VAPOR 33.8°C	0.398	14:26
SIMULATOR VAPOR 33.7°C	0.399	14:27
SIMULATOR VAPOR 33.8°C	0.399	14:28
SIMULATOR VAPOR 33.8°C	0.398	14:29
BLANK TEST	0.000	14:30

Average = 0.398
Std Dev = 0.000

LI 12/16/11



DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date: 12/15/2011
Certification Date: 12/16/2011
Installation Date:
Test Date: 12/19/2011
Test Time: 07:37:21

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 49.1°C
Breath Tube = 44.4°C
Digital Sim = 0.0°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.69 V
Bias Voltage = 80 V
Chopper Freq = 532 Hz

PUMP INFO
Flow Rate = 6.151 L/M

DETECTOR INFO

PUMP	ON	OFF
MAX(V)	-0.0661	-0.0616
MIN(V)	-0.0679	-0.0636

FILTER INFO
Filter 1 -0.063 Zero = true
Filter 2 0.260 Zero = true
Filter 3 -0.101 Zero = true

CALIBRATION CHECK
Xq = 0.076 2.24%

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/19/2011
Time: 08:36:37

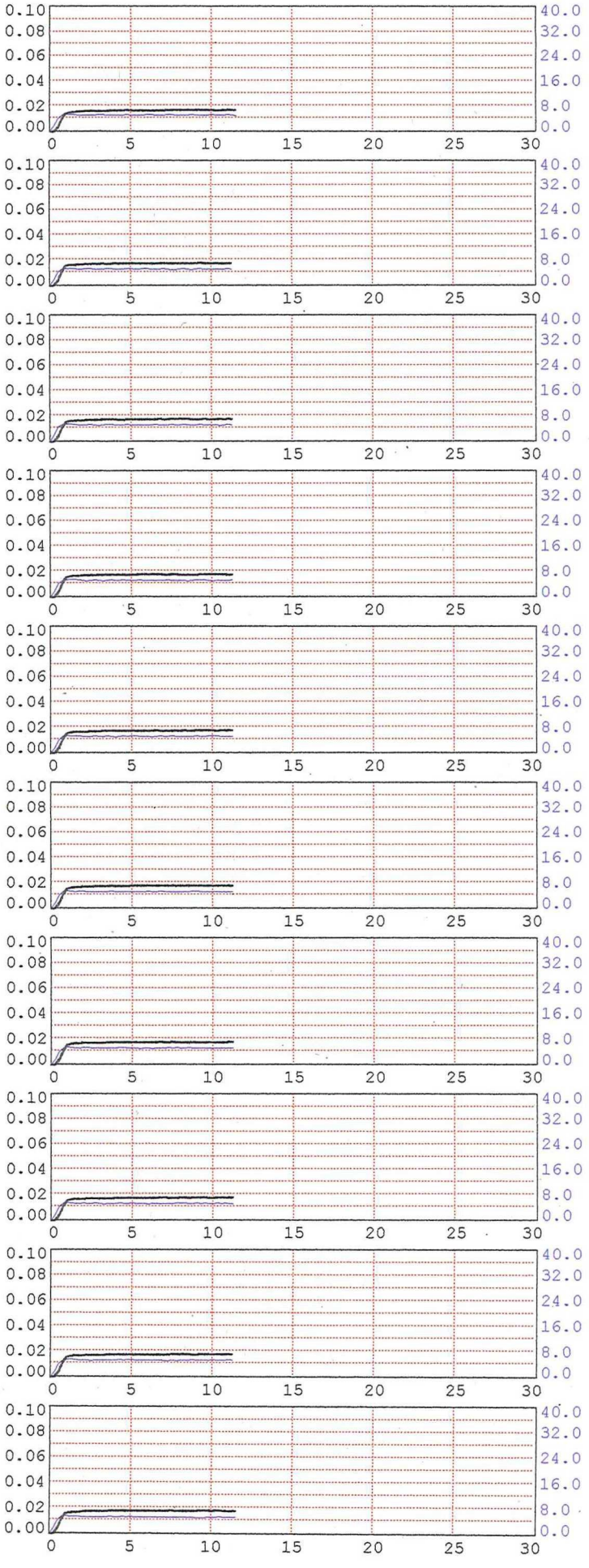
SUPERVISOR NAME:
STEVEN R MERRILL

SOLUTION LOT #: 12-46-020
SOLUTION CONCENTRATION: 0.020

BLANK TEST	0.000	08:37
CALIBRATION CHECK	PASSED	08:37
SIMULATOR VAPOR 33.9°C	0.018	08:37
SIMULATOR VAPOR 33.8°C	0.018	08:38
SIMULATOR VAPOR 33.9°C	0.019	08:39
SIMULATOR VAPOR 33.9°C	0.019	08:41
SIMULATOR VAPOR 33.9°C	0.019	08:42
SIMULATOR VAPOR 33.9°C	0.019	08:43
SIMULATOR VAPOR 33.7°C	0.018	08:44
SIMULATOR VAPOR 33.8°C	0.018	08:45
SIMULATOR VAPOR 33.9°C	0.018	08:46
SIMULATOR VAPOR 33.9°C	0.019	08:47
BLANK TEST	0.000	08:48

Average = 0.018
Std Dev = 0.000

LJ 12/19/11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/19/2011
Time: 08:55:15

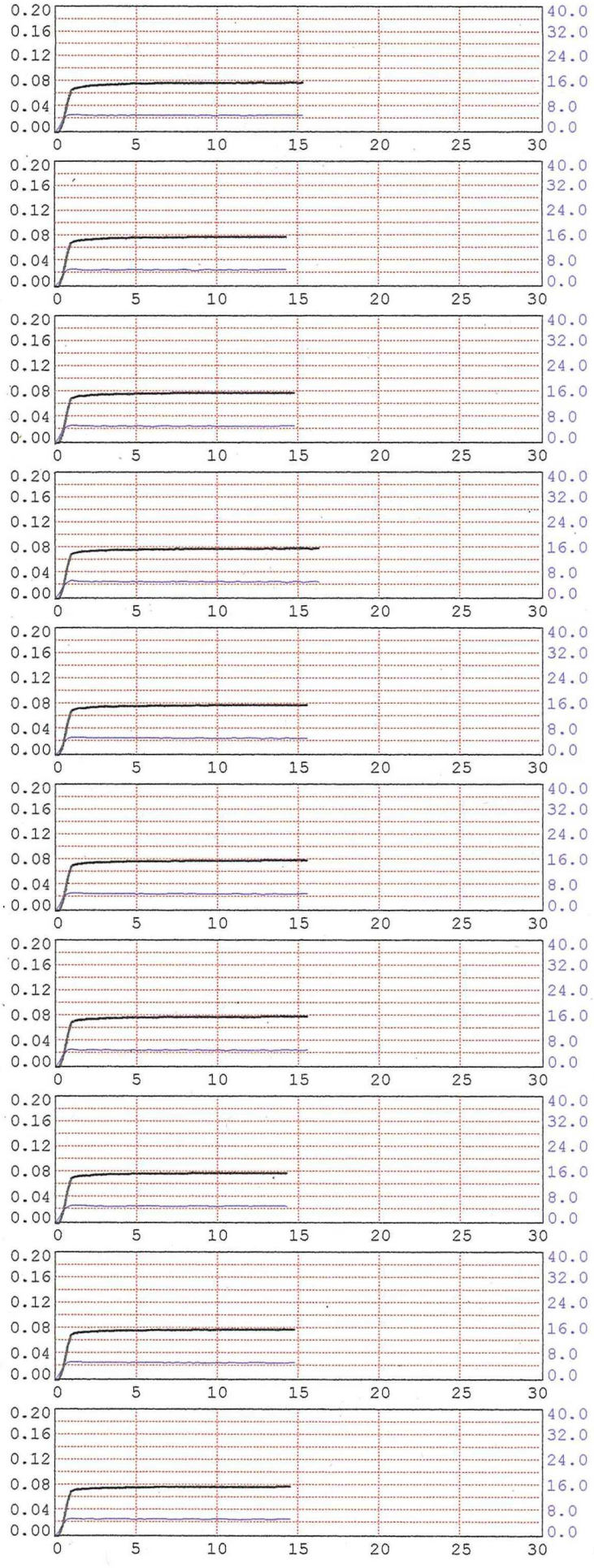
SUPERVISOR NAME:
STEVEN R MERRILL

SOLUTION LOT #: 12-41-080
SOLUTION CONCENTRATION: 0.082

BLANK TEST	0.000	08:56
CALIBRATION CHECK	PASSED	08:56
SIMULATOR VAPOR 33.9°C	0.078	08:56
SIMULATOR VAPOR 33.9°C	0.078	08:57
SIMULATOR VAPOR 33.9°C	0.079	08:58
SIMULATOR VAPOR 33.8°C	0.079	08:59
SIMULATOR VAPOR 33.8°C	0.079	09:01
SIMULATOR VAPOR 33.8°C	0.079	09:02
SIMULATOR VAPOR 33.8°C	0.079	09:03
SIMULATOR VAPOR 33.9°C	0.079	09:04
SIMULATOR VAPOR 33.8°C	0.078	09:05
SIMULATOR VAPOR 33.8°C	0.078	09:06
BLANK TEST	0.000	09:07

Average = 0.078
Std Dev = 0.000

LJ 12/19/11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/19/2011
Time: 09:11:14

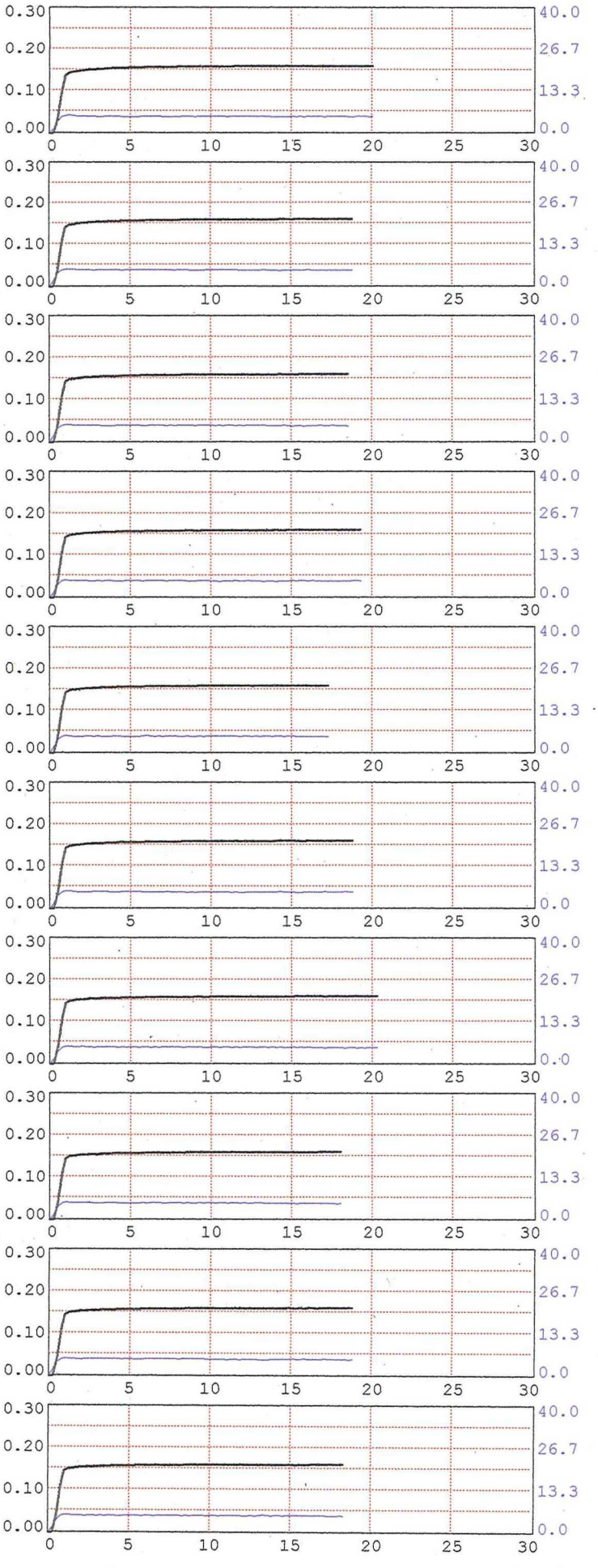
SUPERVISOR NAME:
STEVEN R MERRILL

SOLUTION LOT #: 12-42-160
SOLUTION CONCENTRATION: 0.165

BLANK TEST	0.000	09:12
CALIBRATION CHECK	PASSED	09:12
SIMULATOR VAPOR 33.8°C	0.159	09:12
SIMULATOR VAPOR 33.9°C	0.160	09:13
SIMULATOR VAPOR 33.9°C	0.160	09:15
SIMULATOR VAPOR 33.9°C	0.160	09:16
SIMULATOR VAPOR 33.8°C	0.160	09:17
SIMULATOR VAPOR 33.9°C	0.160	09:18
SIMULATOR VAPOR 33.8°C	0.160	09:19
SIMULATOR VAPOR 33.8°C	0.160	09:20
SIMULATOR VAPOR 33.8°C	0.160	09:22
SIMULATOR VAPOR 33.8°C	0.160	09:23
BLANK TEST	0.000	09:24

Average = 0.159
Std Dev = 0.000

L2 12/19/11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/19/2011
Time: 09:31:29

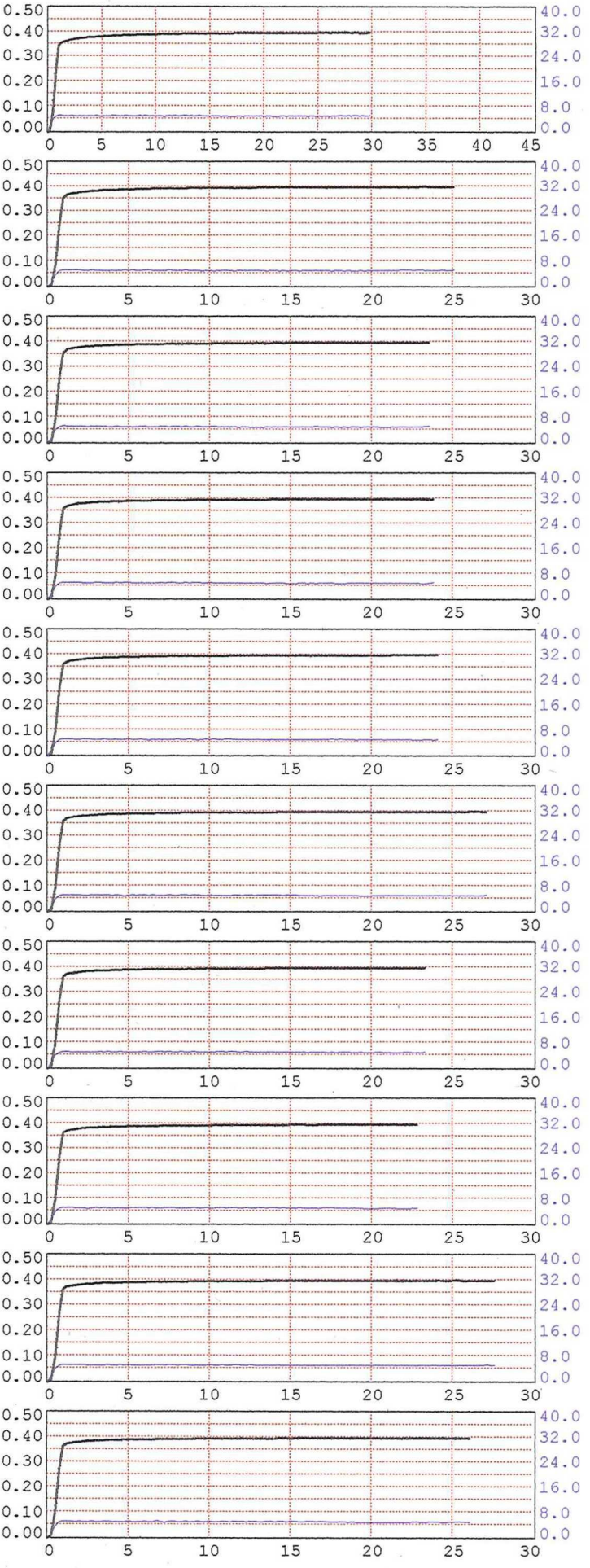
SUPERVISOR NAME:
STEVEN R MERRILL

SOLUTION LOT #: 12-47-400
SOLUTION CONCENTRATION: 0.402

BLANK TEST	0.000	09:32
CALIBRATION CHECK	PASSED	09:32
SIMULATOR VAPOR 33.8°C	0.394	09:33
SIMULATOR VAPOR 33.8°C	0.394	09:34
SIMULATOR VAPOR 33.8°C	0.393	09:35
SIMULATOR VAPOR 33.9°C	0.393	09:36
SIMULATOR VAPOR 33.9°C	0.395	09:38
SIMULATOR VAPOR 33.9°C	0.394	09:39
SIMULATOR VAPOR 33.8°C	0.393	09:40
SIMULATOR VAPOR 33.9°C	0.393	09:42
SIMULATOR VAPOR 33.8°C	0.394	09:43
SIMULATOR VAPOR 33.9°C	0.394	09:44
BLANK TEST	0.000	09:45

Average = 0.393
Std Dev = 0.000

LJ 12/19/11 ST



DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date: 12/15/2011
Certification Date: 12/16/2011
Installation Date:
Test Date: 12/19/2011
Test Time: 13:25:34

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 48.8°C
Breath Tube = 47.0°C
Digital Sim = 33.9°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.69 V
Bias Voltage = 80 V
Chopper Freq = 532 Hz

PUMP INFO
Flow Rate = 6.105 L/M

DETECTOR INFO

PUMP	ON	OFF
MAX(V)	-0.0535	-0.0502
MIN(V)	-0.0549	-0.0522

FILTER INFO
Filter 1 -0.052 Zero = true
Filter 2 0.272 Zero = true
Filter 3 -0.077 Zero = true

CALIBRATION CHECK
Xq = 0.076 1.23%

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/19/2011
Time: 14:18:36

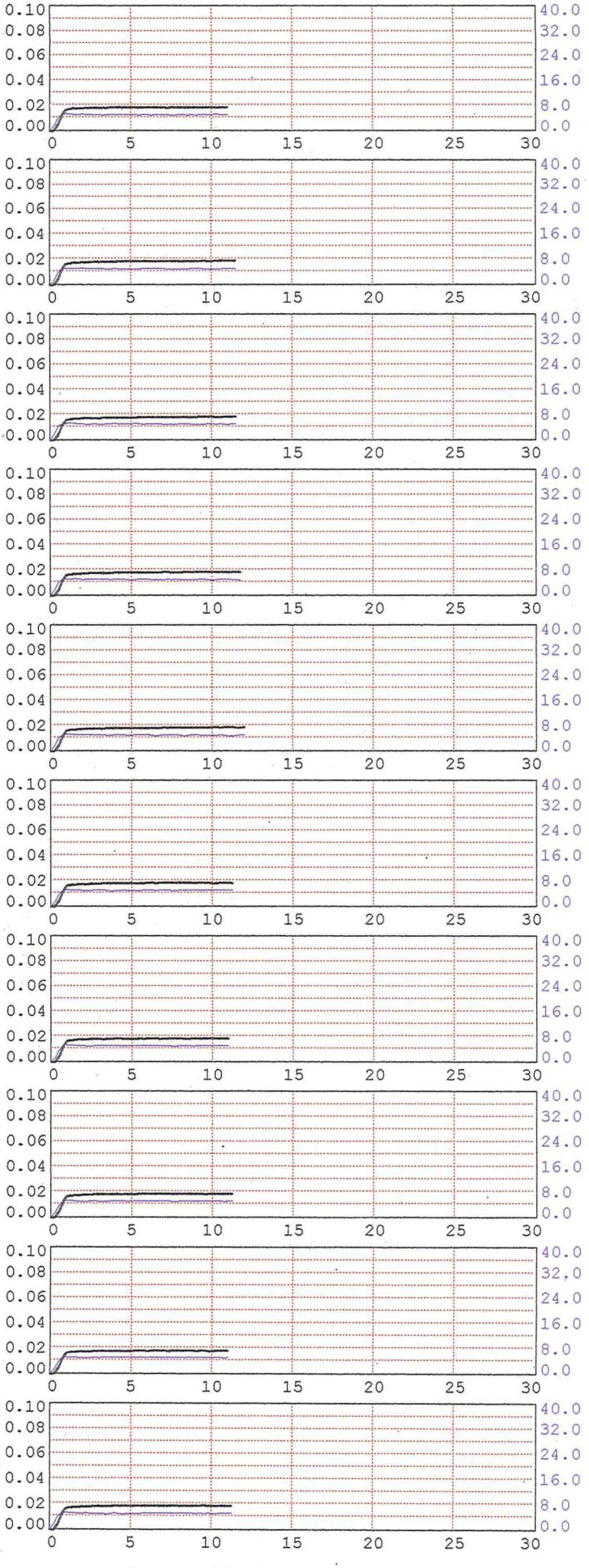
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-46-020
SOLUTION CONCENTRATION: 0.020

BLANK TEST	0.000	14:19
CALIBRATION CHECK	PASSED	14:19
SIMULATOR VAPOR 33.8°C	0.019	14:19
SIMULATOR VAPOR 33.9°C	0.020	14:20
SIMULATOR VAPOR 33.7°C	0.019	14:21
SIMULATOR VAPOR 33.9°C	0.020	14:23
SIMULATOR VAPOR 33.8°C	0.019	14:24
SIMULATOR VAPOR 33.8°C	0.019	14:25
SIMULATOR VAPOR 33.9°C	0.019	14:26
SIMULATOR VAPOR 33.8°C	0.019	14:27
SIMULATOR VAPOR 33.8°C	0.019	14:28
SIMULATOR VAPOR 33.8°C	0.019	14:29
BLANK TEST	0.000	14:30

Average = 0.019
Std Dev = 0.000

L-3
12-19-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/19/2011
Time: 14:40:18

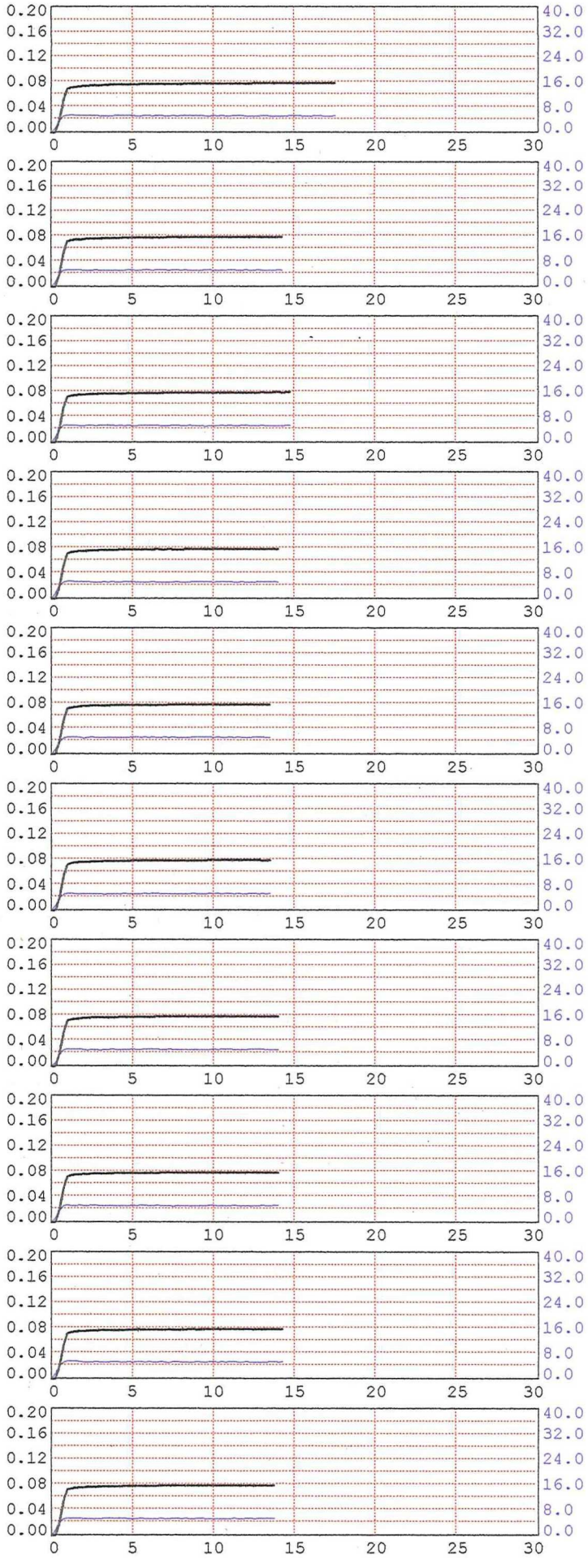
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-41-080
SOLUTION CONCENTRATION: 0.082

BLANK TEST	0.000	14:41
CALIBRATION CHECK	PASSED	14:41
SIMULATOR VAPOR 33.8°C	0.078	14:41
SIMULATOR VAPOR 33.8°C	0.079	14:42
SIMULATOR VAPOR 33.8°C	0.079	14:43
SIMULATOR VAPOR 33.9°C	0.079	14:45
SIMULATOR VAPOR 33.8°C	0.079	14:46
SIMULATOR VAPOR 33.9°C	0.079	14:47
SIMULATOR VAPOR 33.8°C	0.079	14:48
SIMULATOR VAPOR 33.8°C	0.079	14:49
SIMULATOR VAPOR 33.8°C	0.079	14:50
SIMULATOR VAPOR 33.8°C	0.079	14:51
BLANK TEST	0.000	14:52

Average = 0.078
Std Dev = 0.000

L-3 Pass 12-19-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/19/2011
Time: 15:01:12

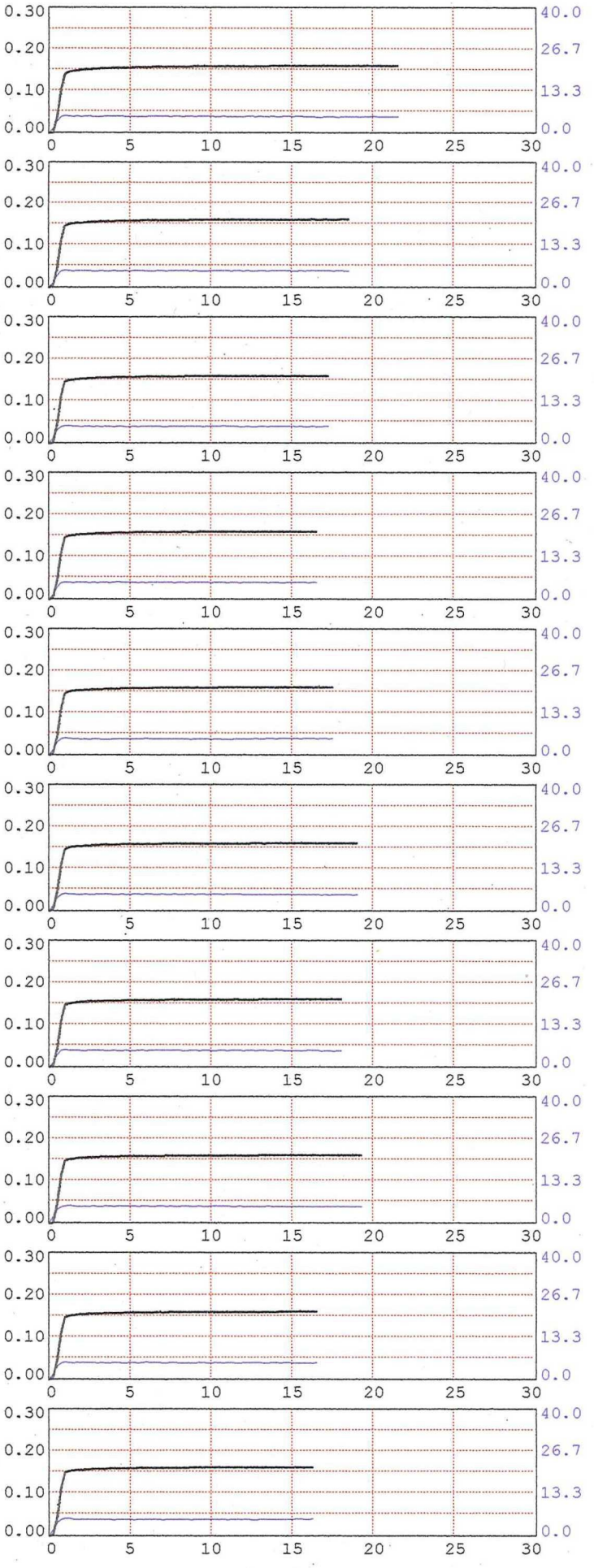
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-42-160
SOLUTION CONCENTRATION: 0.165

BLANK TEST	0.000	15:02
CALIBRATION CHECK	PASSED	15:02
SIMULATOR VAPOR 33.9°C	0.159	15:02
SIMULATOR VAPOR 33.8°C	0.160	15:03
SIMULATOR VAPOR 33.9°C	0.160	15:05
SIMULATOR VAPOR 33.8°C	0.159	15:06
SIMULATOR VAPOR 33.8°C	0.160	15:07
SIMULATOR VAPOR 33.8°C	0.160	15:08
SIMULATOR VAPOR 33.8°C	0.160	15:09
SIMULATOR VAPOR 33.8°C	0.161	15:10
SIMULATOR VAPOR 33.9°C	0.160	15:11
SIMULATOR VAPOR 33.8°C	0.161	15:13
BLANK TEST	0.000	15:13

Average = 0.160
Std Dev = 0.000

L-3
Rec'd
12-19-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/19/2011
Time: 15:33:57

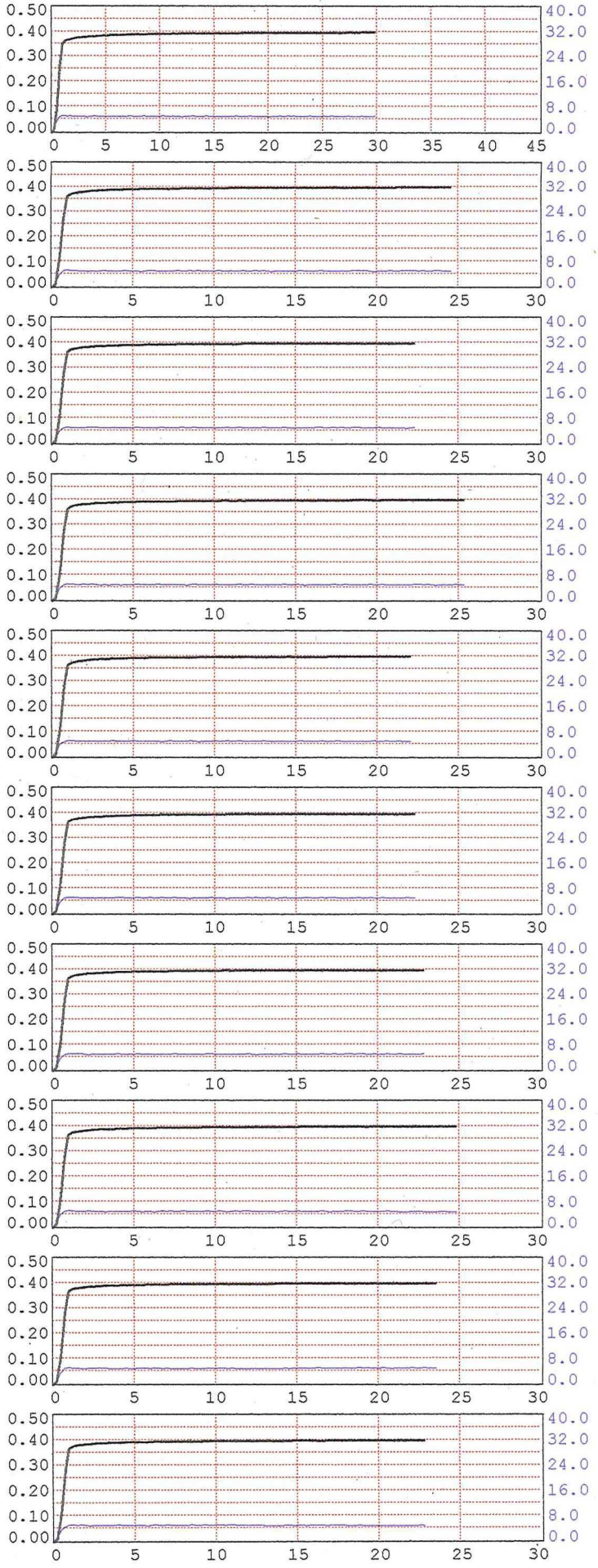
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-47-400
SOLUTION CONCENTRATION: 0.402

BLANK TEST	0.000	15:34
CALIBRATION CHECK	PASSED	15:34
SIMULATOR VAPOR 33.8°C	0.395	15:35
SIMULATOR VAPOR 33.8°C	0.395	15:36
SIMULATOR VAPOR 33.9°C	0.394	15:38
SIMULATOR VAPOR 33.8°C	0.395	15:39
SIMULATOR VAPOR 33.7°C	0.395	15:40
SIMULATOR VAPOR 33.8°C	0.394	15:41
SIMULATOR VAPOR 33.8°C	0.394	15:43
SIMULATOR VAPOR 33.9°C	0.396	15:44
SIMULATOR VAPOR 33.9°C	0.395	15:45
SIMULATOR VAPOR 33.9°C	0.395	15:46
BLANK TEST	0.000	15:47

Average = 0.394
Std Dev = 0.000

L-3
12-19-11



DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date: 12/15/2011
Certification Date: 12/16/2011
Installation Date:
Test Date: 12/20/2011
Test Time: 11:30:43

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 48.8°C
Breath Tube = 46.5°C
Digital Sim = 33.9°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.69 V
Bias Voltage = 80 V
Chopper Freq = 533 Hz

PUMP INFO
Flow Rate = 6.301 L/M

DETECTOR INFO

PUMP	ON	OFF
MAX(V)	-0.0683	-0.0646
MIN(V)	-0.0695	-0.0659

FILTER INFO
Filter 1 -0.065 Zero = true
Filter 2 0.262 Zero = true
Filter 3 -0.095 Zero = true

CALIBRATION CHECK
Xq = 0.077 0.79%

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 11:33:41

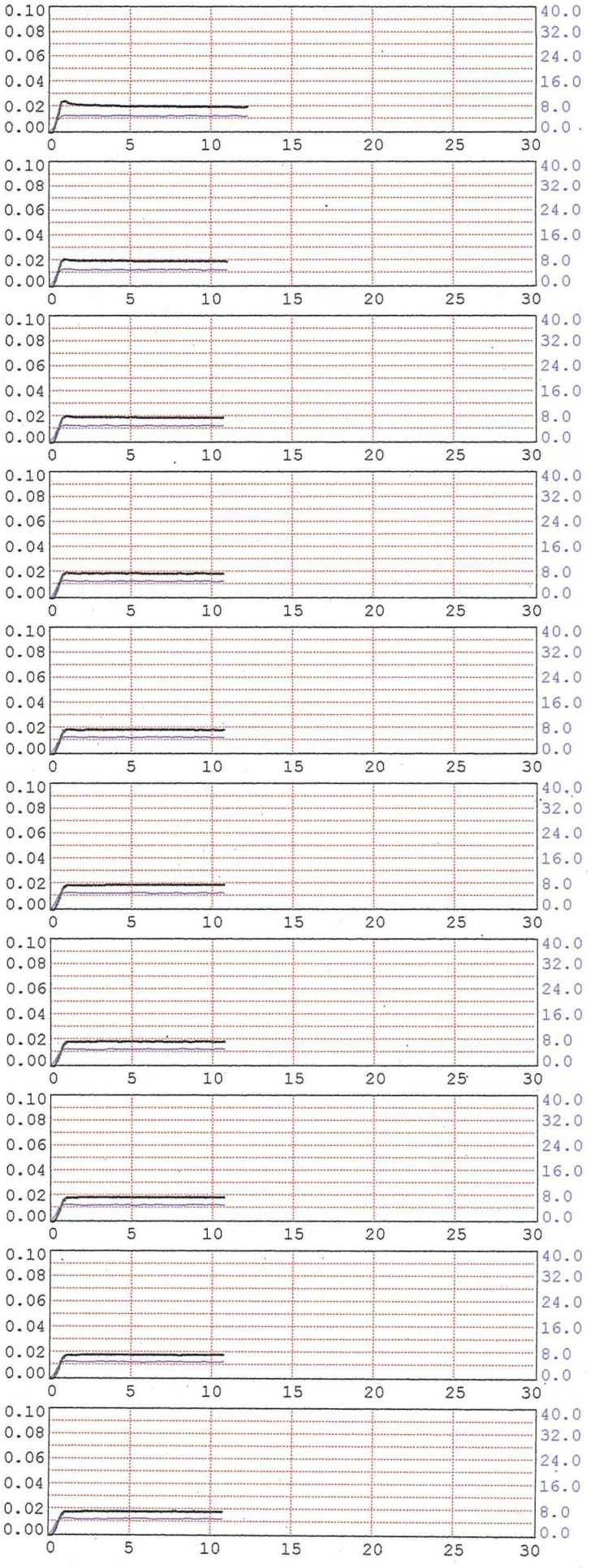
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-46-020
SOLUTION CONCENTRATION: 0.020

BLANK TEST	0.000	11:34
CALIBRATION CHECK	PASSED	11:34
SIMULATOR VAPOR 33.8°C	0.021	11:34
SIMULATOR VAPOR 33.9°C	0.021	11:36
SIMULATOR VAPOR 33.9°C	0.021	11:37
SIMULATOR VAPOR 33.8°C	0.020	11:38
SIMULATOR VAPOR 33.8°C	0.020	11:39
SIMULATOR VAPOR 33.8°C	0.020	11:40
SIMULATOR VAPOR 33.9°C	0.020	11:41
SIMULATOR VAPOR 33.9°C	0.020	11:42
SIMULATOR VAPOR 33.8°C	0.019	11:43
SIMULATOR VAPOR 33.8°C	0.020	11:44
BLANK TEST	0.000	11:45

Average = 0.020
Std Dev = 0.000

L-4
KLK
12-20-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 12:10:32

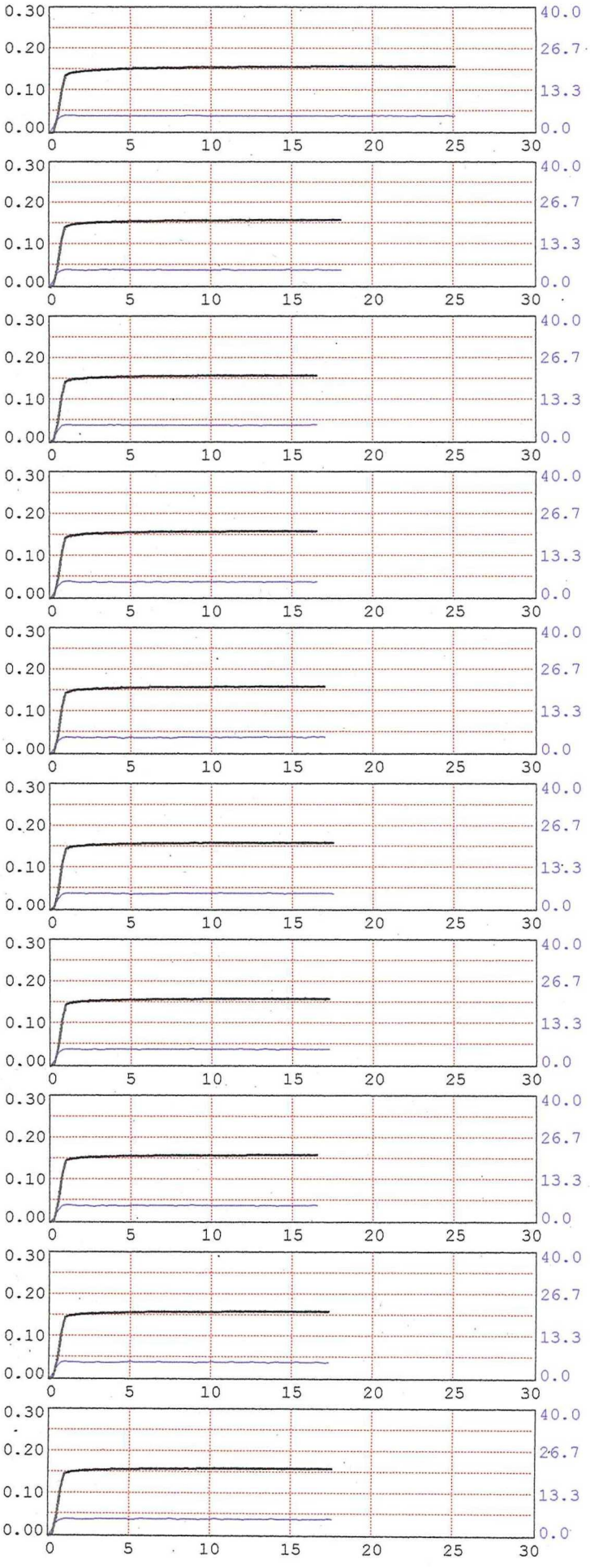
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-42-160
SOLUTION CONCENTRATION: 0.165

BLANK TEST	0.000	12:11
CALIBRATION CHECK	PASSED	12:11
SIMULATOR VAPOR 33.9°C	0.158	12:12
SIMULATOR VAPOR 33.8°C	0.158	12:13
SIMULATOR VAPOR 33.9°C	0.158	12:14
SIMULATOR VAPOR 33.8°C	0.159	12:15
SIMULATOR VAPOR 33.9°C	0.159	12:16
SIMULATOR VAPOR 33.8°C	0.160	12:17
SIMULATOR VAPOR 33.8°C	0.159	12:18
SIMULATOR VAPOR 33.9°C	0.159	12:20
SIMULATOR VAPOR 33.8°C	0.159	12:21
SIMULATOR VAPOR 33.8°C	0.160	12:22
BLANK TEST	0.000	12:23

Average = 0.158
Std Dev = 0.000

1-4
pass
12-20-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 12:25:25

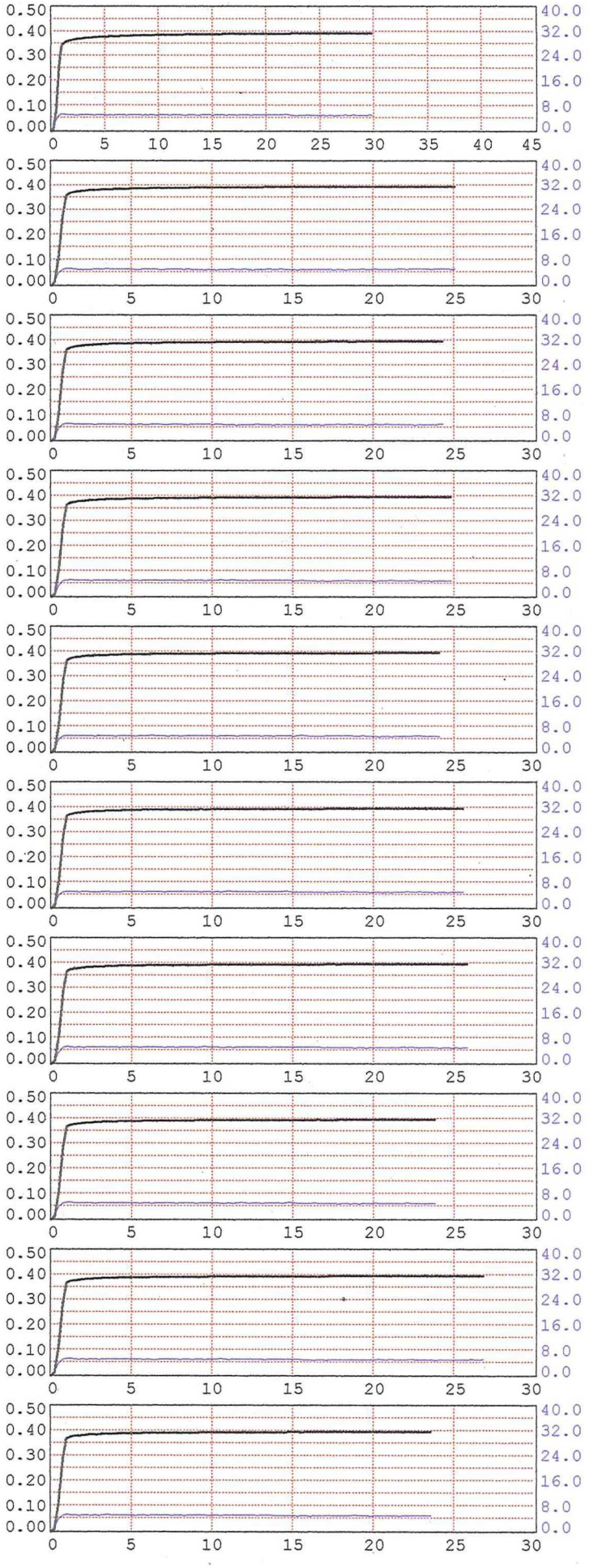
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-47-400
SOLUTION CONCENTRATION: 0.402

BLANK TEST	0.000	12:26
CALIBRATION CHECK	PASSED	12:26
SIMULATOR VAPOR 33.8°C	0.391	12:27
SIMULATOR VAPOR 33.9°C	0.392	12:28
SIMULATOR VAPOR 33.9°C	0.393	12:29
SIMULATOR VAPOR 33.8°C	0.393	12:30
SIMULATOR VAPOR 33.8°C	0.393	12:32
SIMULATOR VAPOR 33.8°C	0.394	12:33
SIMULATOR VAPOR 33.8°C	0.394	12:34
SIMULATOR VAPOR 33.9°C	0.394	12:36
SIMULATOR VAPOR 33.8°C	0.393	12:37
SIMULATOR VAPOR 33.8°C	0.394	12:38
BLANK TEST	0.000	12:39

Average = 0.393
Std Dev = 0.000

L-4
MKK
12-20-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 12:54:37

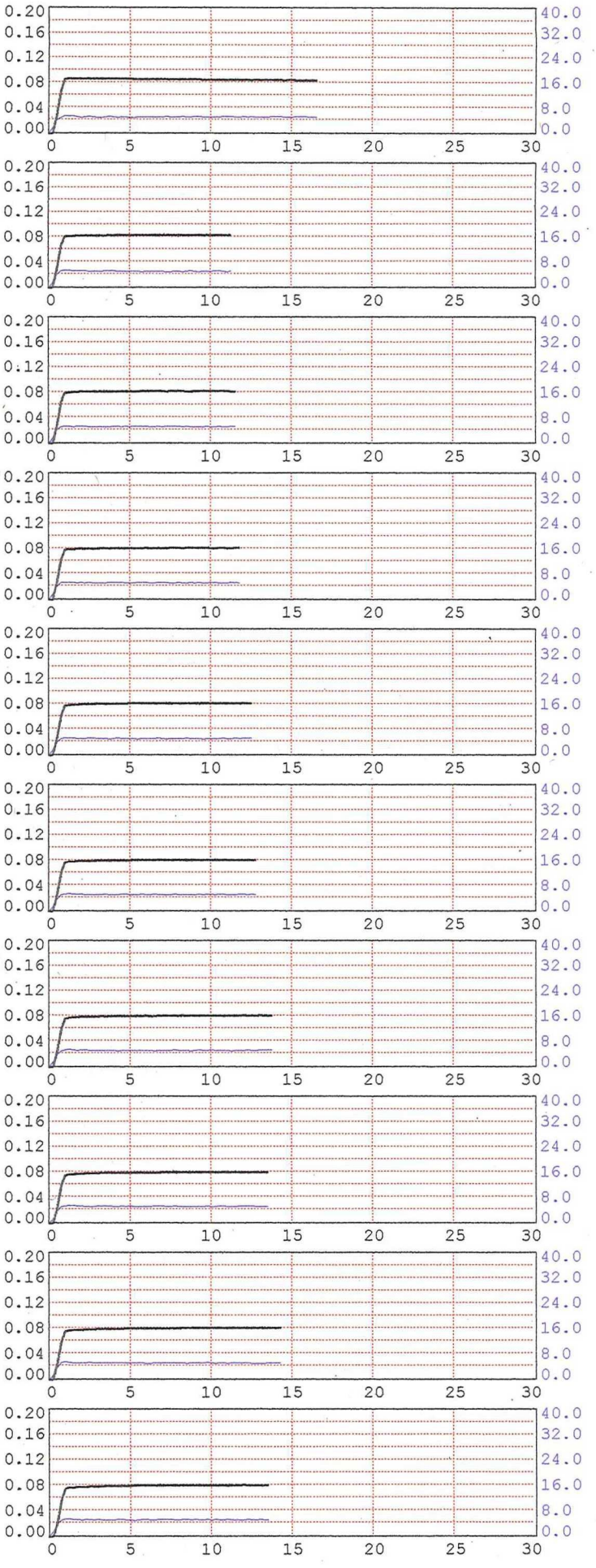
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-41-080
SOLUTION CONCENTRATION: 0.082

BLANK TEST	0.000	12:55
CALIBRATION CHECK	PASSED	12:55
SIMULATOR VAPOR 33.9°C	0.085	12:56
SIMULATOR VAPOR 33.8°C	0.084	12:57
SIMULATOR VAPOR 33.8°C	0.082	12:58
SIMULATOR VAPOR 33.8°C	0.081	12:59
SIMULATOR VAPOR 33.8°C	0.082	13:00
SIMULATOR VAPOR 33.9°C	0.081	13:01
SIMULATOR VAPOR 33.9°C	0.081	13:02
SIMULATOR VAPOR 33.8°C	0.081	13:03
SIMULATOR VAPOR 33.8°C	0.081	13:04
SIMULATOR VAPOR 33.8°C	0.081	13:05
BLANK TEST	0.000	13:06

Average = 0.081
Std Dev = 0.001

L-4
KLK
12-20-11
Oring changed on sim
at time of new soln.
KLK 12-20-11



DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date: 12/15/2011
Certification Date: 12/16/2011
Installation Date:
Test Date: 12/20/2011
Test Time: 13:37:28

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 49.1°C
Breath Tube = 46.9°C
Digital Sim = 33.9°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.70 V
Bias Voltage = 80 V
Chopper Freq = 536 Hz

PUMP INFO
Flow Rate = 6.456 L/M

DETECTOR INFO

PUMP	ON	OFF
MAX(V)	-0.0378	-0.0350
MIN(V)	-0.0390	-0.0368

FILTER INFO
Filter 1 -0.036 Zero = true
Filter 2 0.286 Zero = true
Filter 3 -0.043 Zero = true

CALIBRATION CHECK
Xq = 0.077 0.79%

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 14:12:05

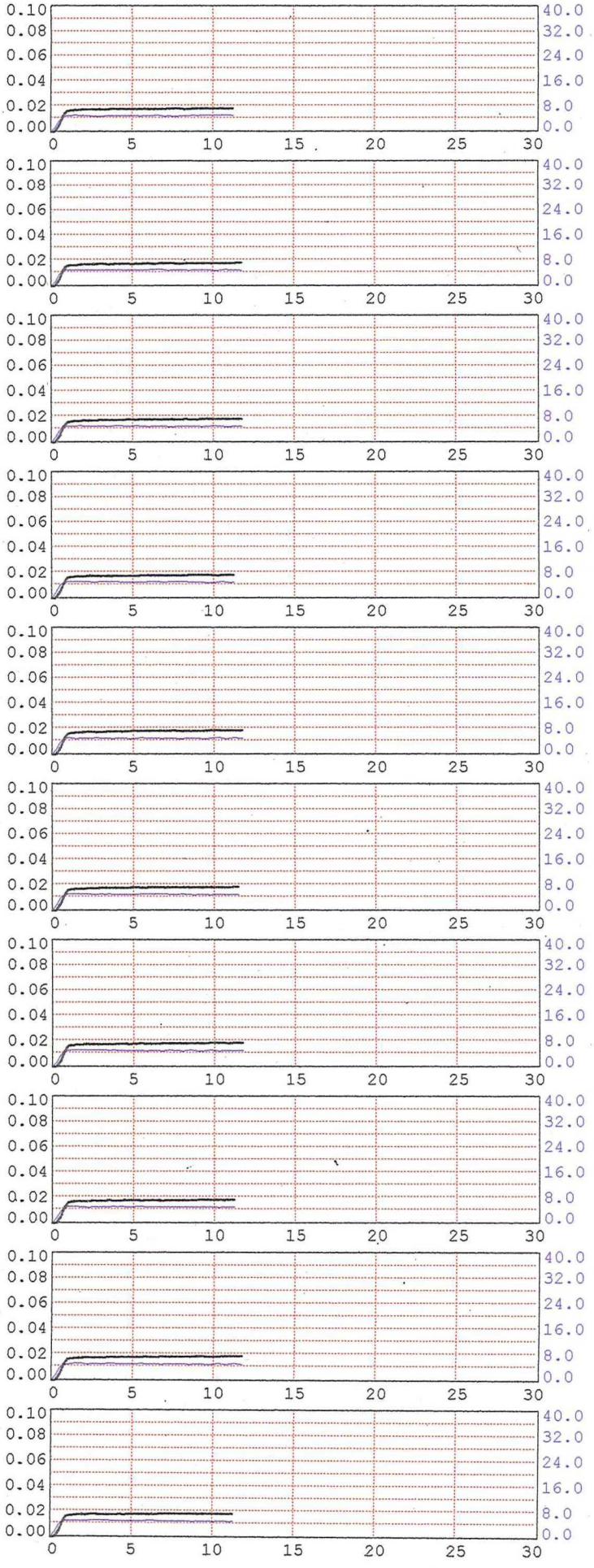
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-46-020
SOLUTION CONCENTRATION: 0.020

BLANK TEST	0.000	14:12
CALIBRATION CHECK	PASSED	14:13
SIMULATOR VAPOR 33.8°C	0.019	14:13
SIMULATOR VAPOR 33.9°C	0.019	14:14
SIMULATOR VAPOR 33.8°C	0.019	14:15
SIMULATOR VAPOR 33.9°C	0.019	14:16
SIMULATOR VAPOR 33.9°C	0.019	14:17
SIMULATOR VAPOR 33.8°C	0.019	14:18
SIMULATOR VAPOR 33.8°C	0.019	14:19
SIMULATOR VAPOR 33.9°C	0.019	14:20
SIMULATOR VAPOR 33.8°C	0.019	14:21
SIMULATOR VAPOR 33.9°C	0.019	14:22
BLANK TEST	0.000	14:23

Average = 0.019
Std Dev = 0.000

L-5
KLK
12-20-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 14:30:45

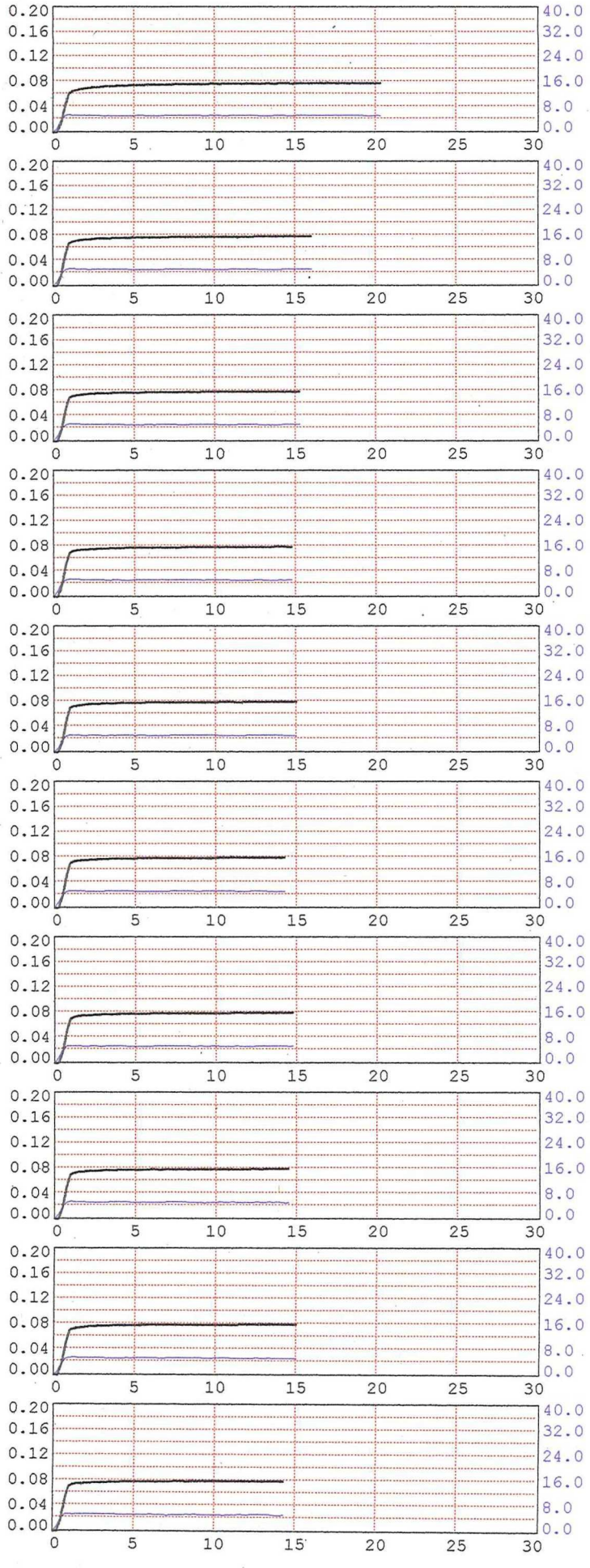
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-41-080
SOLUTION CONCENTRATION: 0.082

BLANK TEST	0.000	14:31
CALIBRATION CHECK	PASSED	14:31
SIMULATOR VAPOR 33.8°C	0.078	14:32
SIMULATOR VAPOR 33.8°C	0.078	14:33
SIMULATOR VAPOR 33.8°C	0.079	14:34
SIMULATOR VAPOR 33.9°C	0.079	14:35
SIMULATOR VAPOR 33.7°C	0.079	14:36
SIMULATOR VAPOR 33.8°C	0.079	14:37
SIMULATOR VAPOR 33.8°C	0.079	14:38
SIMULATOR VAPOR 33.8°C	0.079	14:39
SIMULATOR VAPOR 33.9°C	0.079	14:41
SIMULATOR VAPOR 33.9°C	0.080	14:42
BLANK TEST	0.000	14:42

Average = 0.078
Std Dev = 0.000

L-5
KKMC
12-20-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 14:46:36

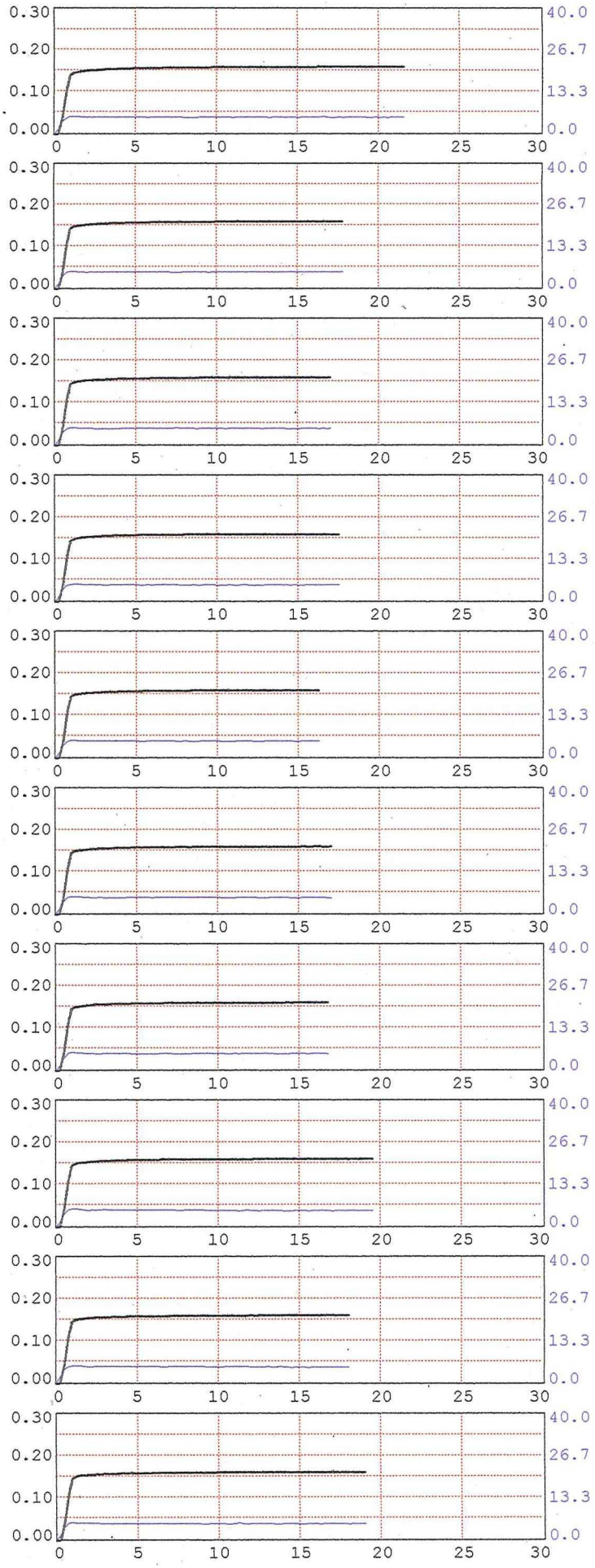
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-42-160
SOLUTION CONCENTRATION: 0.165

BLANK TEST	0.000	14:47
CALIBRATION CHECK	PASSED	14:47
SIMULATOR VAPOR 33.8°C	0.159	14:48
SIMULATOR VAPOR 33.8°C	0.159	14:49
SIMULATOR VAPOR 33.9°C	0.159	14:50
SIMULATOR VAPOR 33.9°C	0.159	14:51
SIMULATOR VAPOR 33.8°C	0.159	14:52
SIMULATOR VAPOR 33.8°C	0.160	14:53
SIMULATOR VAPOR 33.9°C	0.160	14:54
SIMULATOR VAPOR 33.9°C	0.160	14:56
SIMULATOR VAPOR 33.9°C	0.161	14:57
SIMULATOR VAPOR 33.8°C	0.161	14:58
BLANK TEST	0.000	14:59

Average = 0.159
Std Dev = 0.000

L-5
MMC
12-20-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 15:04:26

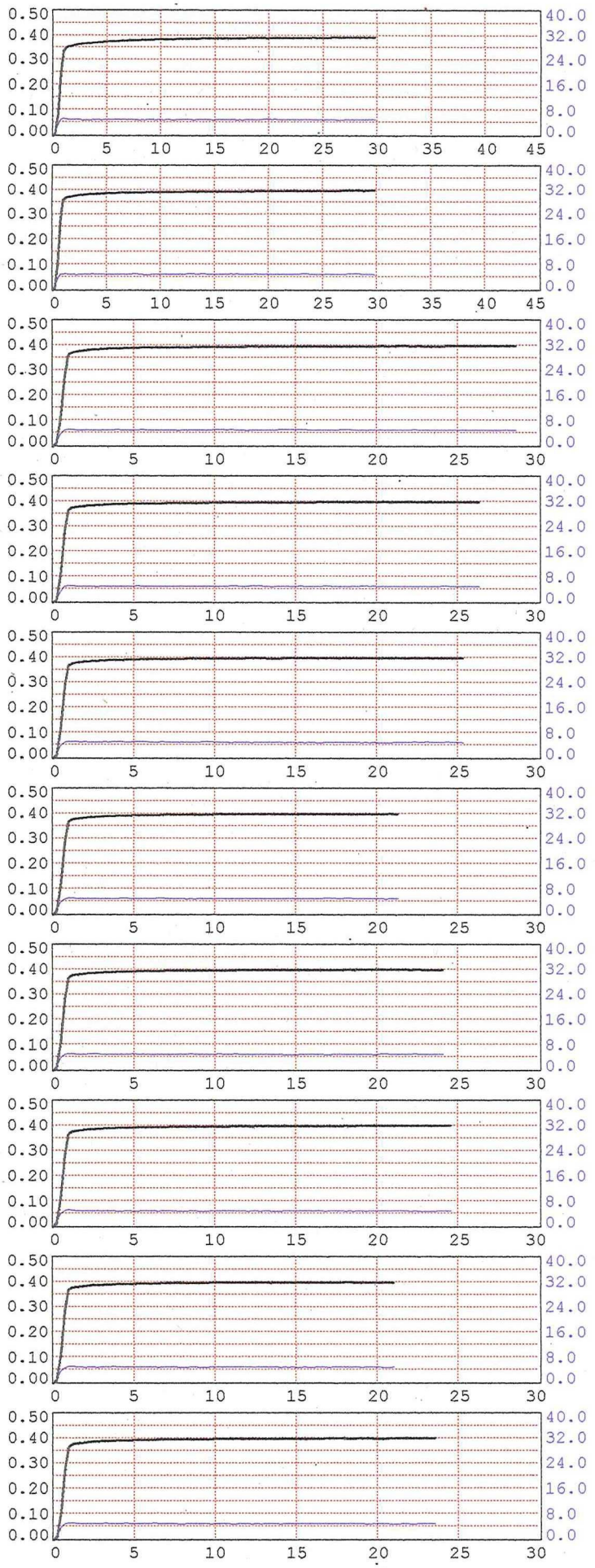
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-47-400
SOLUTION CONCENTRATION: 0.402

BLANK TEST	0.000	15:05
CALIBRATION CHECK	PASSED	15:05
SIMULATOR VAPOR 33.8°C	0.392	15:06
SIMULATOR VAPOR 33.8°C	0.395	15:07
SIMULATOR VAPOR 33.8°C	0.395	15:08
SIMULATOR VAPOR 33.8°C	0.396	15:10
SIMULATOR VAPOR 33.8°C	0.397	15:11
SIMULATOR VAPOR 33.9°C	0.397	15:12
SIMULATOR VAPOR 33.9°C	0.397	15:13
SIMULATOR VAPOR 33.8°C	0.397	15:15
SIMULATOR VAPOR 33.8°C	0.396	15:16
SIMULATOR VAPOR 33.8°C	0.397	15:17
BLANK TEST	0.000	15:18

Average = 0.395
Std Dev = 0.001

L-5
[illegible]
12-20-11



SECTION 4

INTERFERENCE TESTS

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

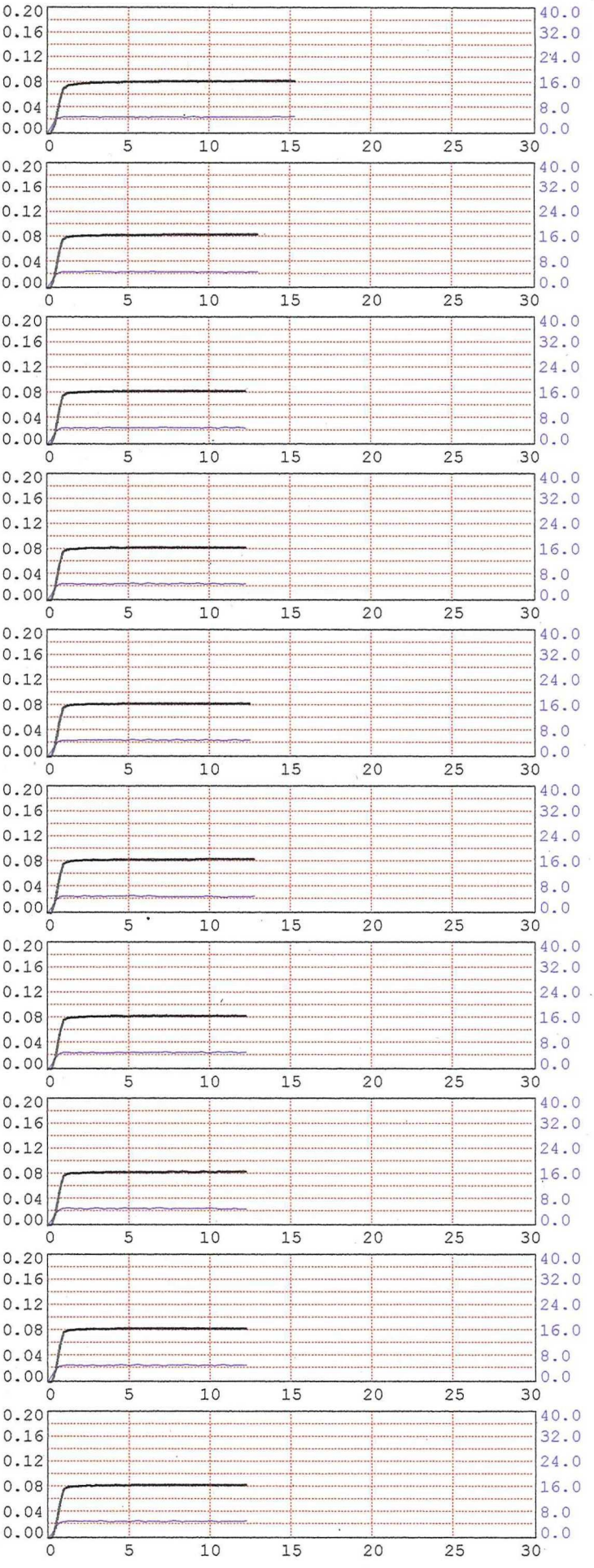
Date: 12/15/2011
Time: 15:43:36

SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-37-080A1
SOLUTION CONCENTRATION: 0.081

BLANK TEST	0.000	15:44
CALIBRATION CHECK	PASSED	15:44
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:44
SIMULATOR VAPOR 33.7°C	INTERFERENCE	15:46
SIMULATOR VAPOR 33.7°C	INTERFERENCE	15:47
SIMULATOR VAPOR 33.7°C	INTERFERENCE	15:48
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:49
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:50
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:51
SIMULATOR VAPOR 33.7°C	INTERFERENCE	15:52
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:53
SIMULATOR VAPOR 33.7°C	INTERFERENCE	15:54
BLANK TEST	0.000	15:55

100%
0.01 Acetone
0.081 Ethyl
KLK
12-15-11



DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date: 12/15/2011
Certification Date:
Installation Date:
Test Date: 12/15/2011
Test Time: 15:40:50

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 49.2°C
Breath Tube = 47.1°C
Digital Sim = 33.7°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.69 V
Bias Voltage = 81 V
Chopper Freq = 534 Hz

PUMP INFO
Flow Rate = 6.233 L/M

DETECTOR INFO

PUMP	ON	OFF
MAX(V)	0.0142	0.0159
MIN(V)	0.0124	0.0142

FILTER INFO
Filter 1 0.015 Zero = true
Filter 2 0.336 Zero = true
Filter 3 0.020 Zero = true

CALIBRATION CHECK
Xq = 0.077 0.34%

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104009

Date: 12/15/2011
Time: 16:29:22

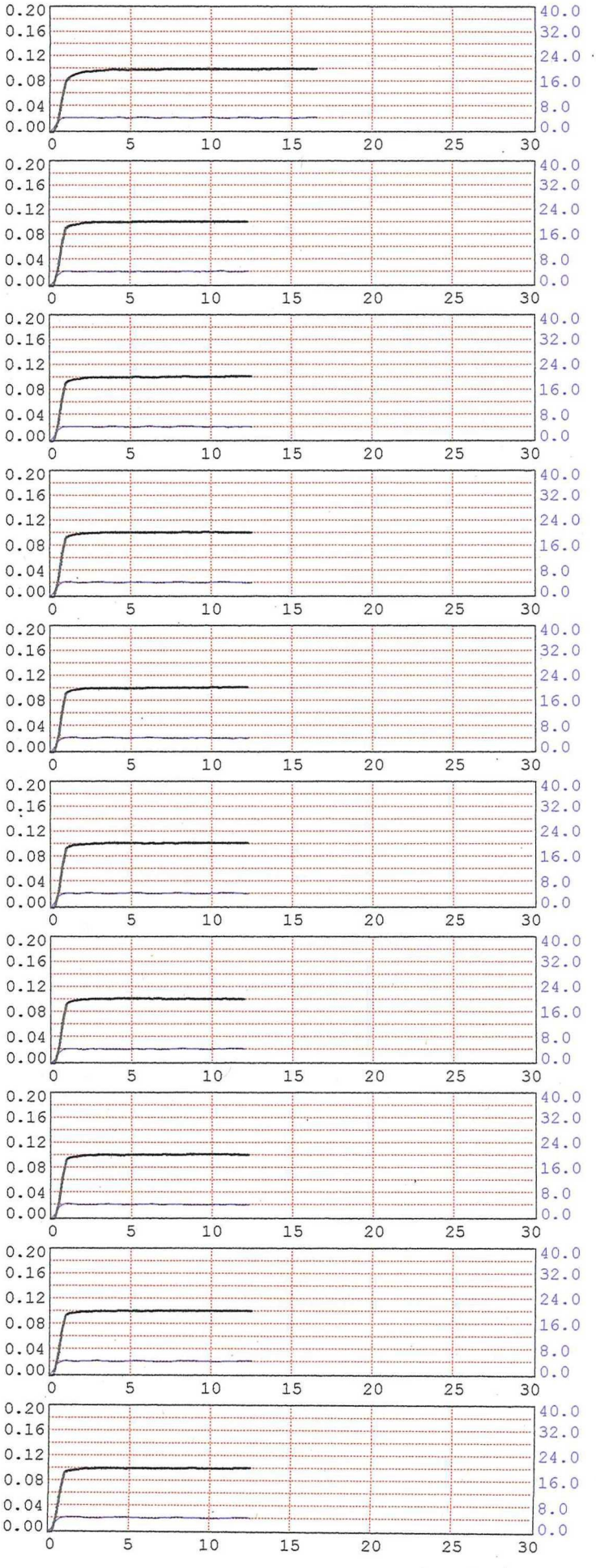
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-29-080M
SOLUTION CONCENTRATION: 0.081

BLANK TEST	0.000	16:30
CALIBRATION CHECK	PASSED	16:30
SIMULATOR VAPOR 33.6°C	INTERFERENCE	16:30
SIMULATOR VAPOR 33.7°C	INTERFERENCE	16:31
SIMULATOR VAPOR 33.7°C	INTERFERENCE	16:32
SIMULATOR VAPOR 33.7°C	INTERFERENCE	16:33
SIMULATOR VAPOR 33.6°C	INTERFERENCE	16:34
SIMULATOR VAPOR 33.7°C	INTERFERENCE	16:36
SIMULATOR VAPOR 33.7°C	INTERFERENCE	16:37
SIMULATOR VAPOR 33.7°C	INTERFERENCE	16:38
SIMULATOR VAPOR 33.7°C	INTERFERENCE	16:39
SIMULATOR VAPOR 33.7°C	INTERFERENCE	16:40
BLANK TEST	0.000	16:41

100% 12/16/11

0.04 MeOH / 0.081 EtOH



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

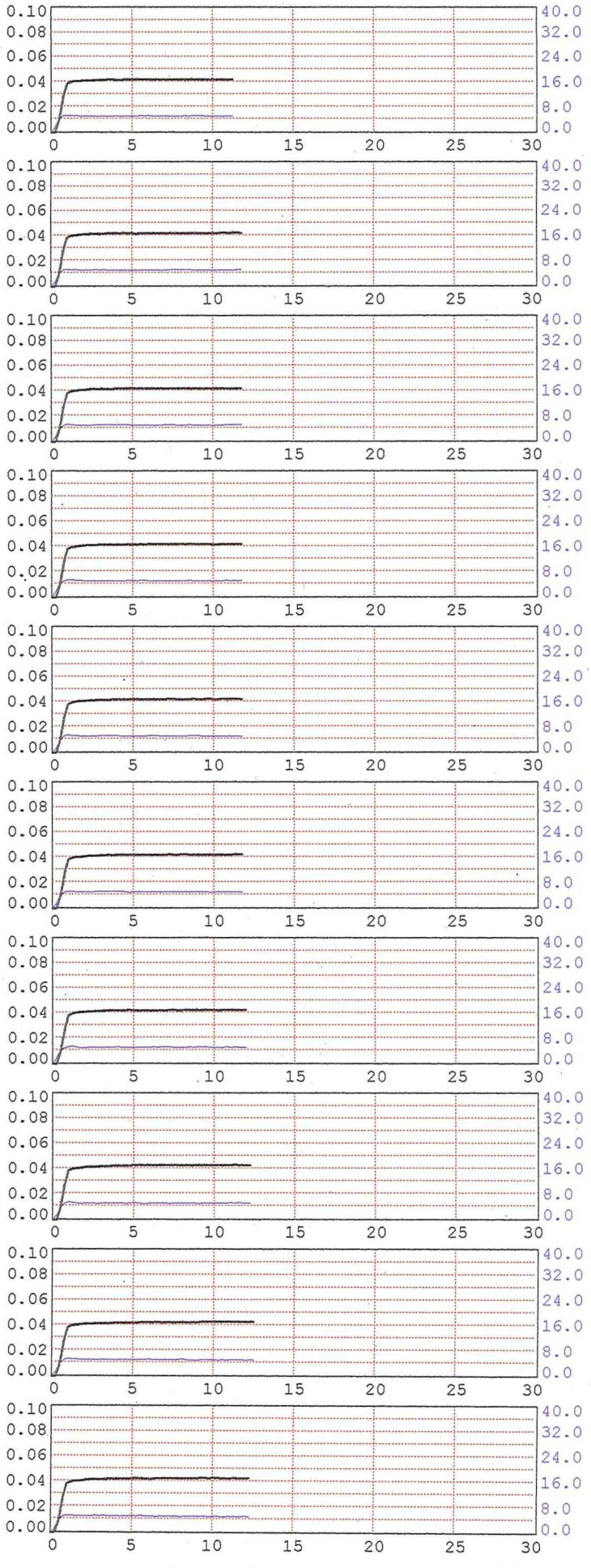
Date: 12/19/2011
Time: 10:39:14

SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-26-040A1
SOLUTION CONCENTRATION: 0.040

BLANK TEST	0.000	10:40
CALIBRATION CHECK	PASSED	10:40
SIMULATOR VAPOR 33.9°C	INTERFERENCE	10:40
SIMULATOR VAPOR 33.8°C	INTERFERENCE	10:41
SIMULATOR VAPOR 33.8°C	INTERFERENCE	10:42
SIMULATOR VAPOR 33.9°C	INTERFERENCE	10:43
SIMULATOR VAPOR 33.8°C	INTERFERENCE	10:44
SIMULATOR VAPOR 33.8°C	INTERFERENCE	10:45
SIMULATOR VAPOR 33.8°C	INTERFERENCE	10:46
SIMULATOR VAPOR 33.8°C	INTERFERENCE	10:47
SIMULATOR VAPOR 33.9°C	INTERFERENCE	10:48
SIMULATOR VAPOR 33.8°C	INTERFERENCE	10:49
BLANK TEST	0.000	10:50

10% 0.01 Acetone 0.040 EtOH 12-19-11 KLK



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

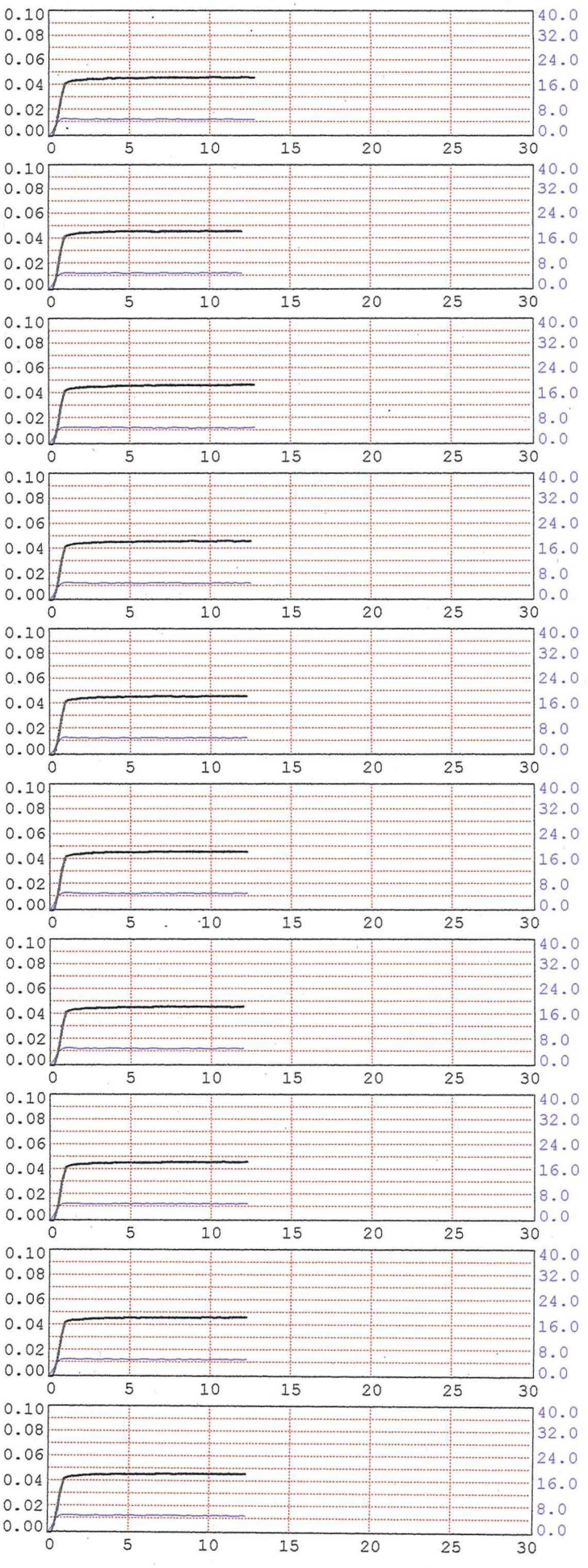
Date: 12/19/2011
Time: 10:56:25

SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-26-040A2
SOLUTION CONCENTRATION: 0.040

BLANK TEST	0.000	10:57
CALIBRATION CHECK	PASSED	10:57
SIMULATOR VAPOR 33.9°C	INTERFERENCE	10:57
SIMULATOR VAPOR 33.9°C	INTERFERENCE	10:58
SIMULATOR VAPOR 33.8°C	INTERFERENCE	10:59
SIMULATOR VAPOR 33.8°C	INTERFERENCE	11:00
SIMULATOR VAPOR 33.8°C	INTERFERENCE	11:01
SIMULATOR VAPOR 33.8°C	INTERFERENCE	11:03
SIMULATOR VAPOR 33.9°C	INTERFERENCE	11:04
SIMULATOR VAPOR 33.8°C	INTERFERENCE	11:05
SIMULATOR VAPOR 33.9°C	INTERFERENCE	11:06
SIMULATOR VAPOR 33.8°C	INTERFERENCE	11:07
BLANK TEST	0.000	11:08

10070
0.02 Acetone
0.040 EtOH
12-19-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

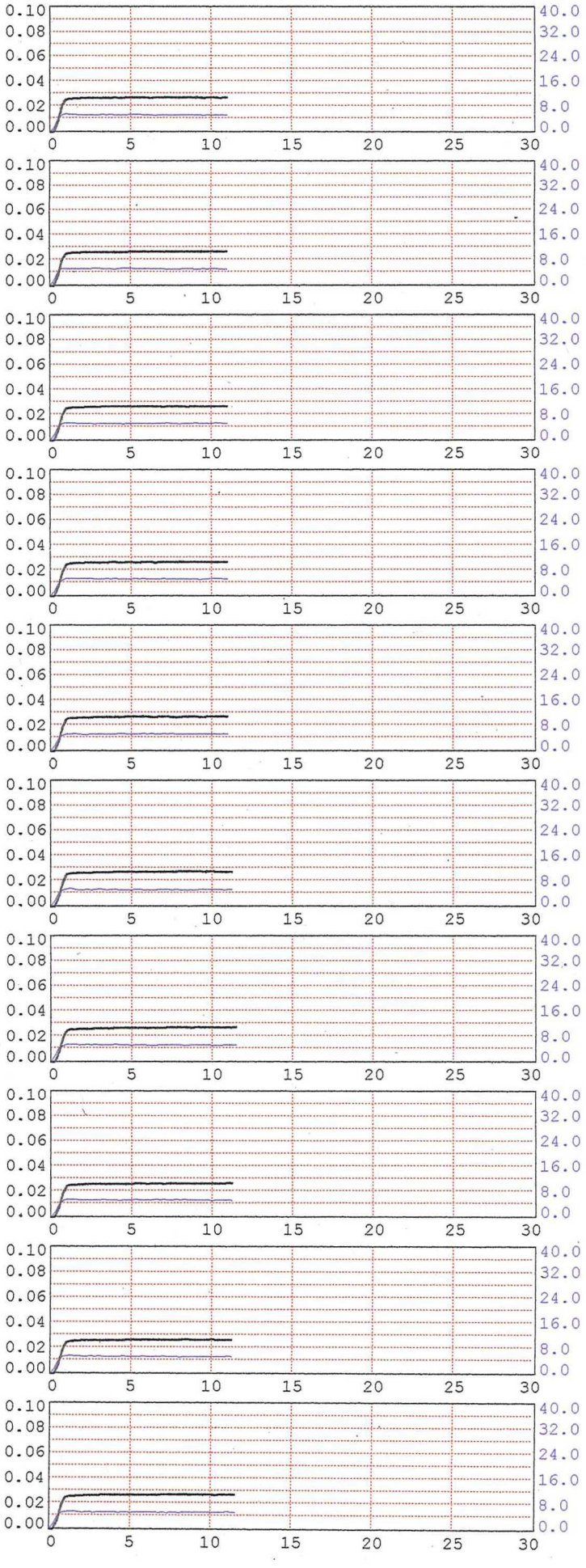
Date: 12/20/2011
Time: 13:19:02

SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-44-040I
SOLUTION CONCENTRATION: 0.040

BLANK TEST	0.000	13:19
CALIBRATION CHECK	PASSED	13:20
SIMULATOR VAPOR 33.8°C	INTERFERENCE	13:20
SIMULATOR VAPOR 33.8°C	INTERFERENCE	13:21
SIMULATOR VAPOR 33.8°C	INTERFERENCE	13:22
SIMULATOR VAPOR 33.8°C	INTERFERENCE	13:23
SIMULATOR VAPOR 33.9°C	INTERFERENCE	13:24
SIMULATOR VAPOR 33.8°C	INTERFERENCE	13:25
SIMULATOR VAPOR 33.8°C	INTERFERENCE	13:26
SIMULATOR VAPOR 33.8°C	INTERFERENCE	13:27
SIMULATOR VAPOR 33.8°C	INTERFERENCE	13:28
SIMULATOR VAPOR 33.8°C	INTERFERENCE	13:29
BLANK TEST	0.000	13:30

100% 0.04 IPA in H_2O 12-20-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

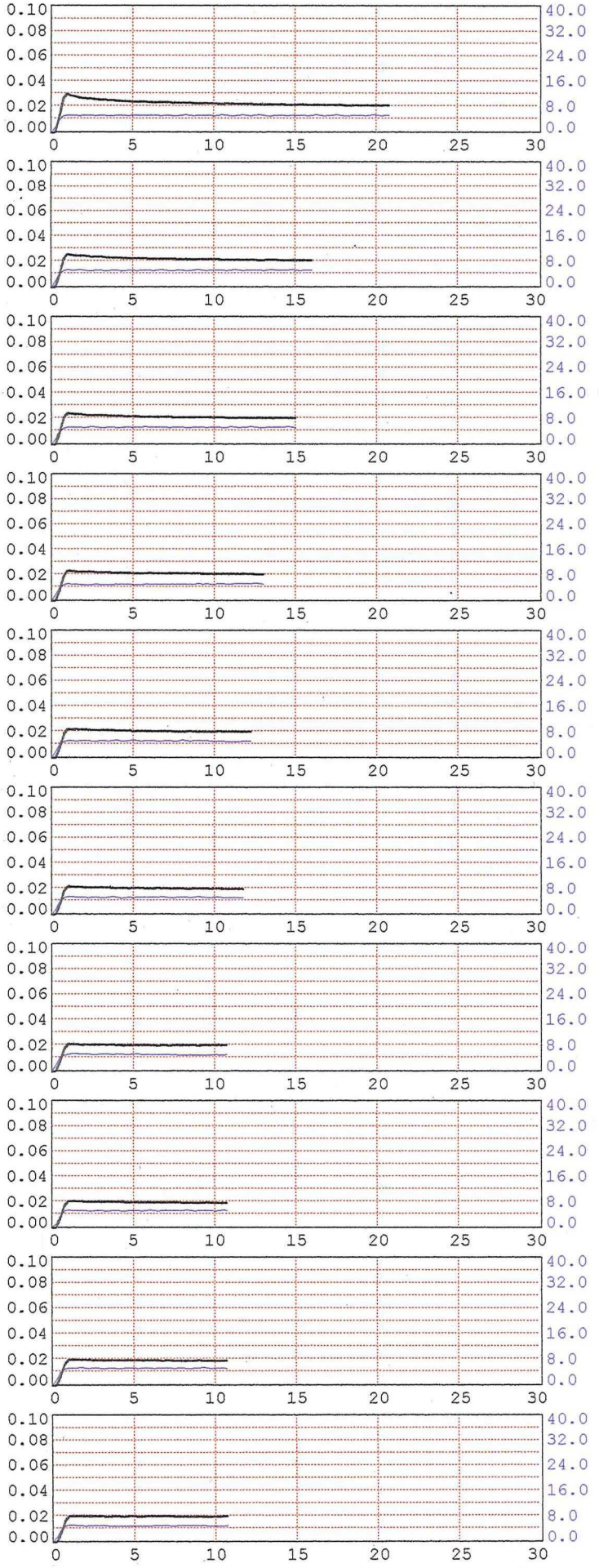
Date: 12/20/2011
Time: 15:24:17

SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-43-040M
SOLUTION CONCENTRATION: 0.040

BLANK TEST	0.000	15:25
CALIBRATION CHECK	PASSED	15:25
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:25
SIMULATOR VAPOR 33.7°C	INTERFERENCE	15:26
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:27
SIMULATOR VAPOR 33.7°C	INTERFERENCE	15:29
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:30
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:31
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:32
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:33
SIMULATOR VAPOR 33.7°C	INTERFERENCE	15:34
SIMULATOR VAPOR 33.8°C	INTERFERENCE	15:35
BLANK TEST	0.000	15:36

100%
0.04 MeOH
in
Water
KKK
12-20-11



DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date: 12/15/2011
Certification Date: 12/16/2011
Installation Date:
Test Date: 12/20/2011
Test Time: 15:39:40

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 49.4°C
Breath Tube = 45.4°C
Digital Sim = 0.0°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.70 V
Bias Voltage = 81 V
Chopper Freq = 536 Hz

PUMP INFO
Flow Rate = 6.408 L/M

DETECTOR INFO

PUMP	ON	OFF
MAX(V)	-0.0276	-0.0264
MIN(V)	-0.0291	-0.0278

FILTER INFO
Filter 1 -0.028 Zero = true
Filter 2 0.292 Zero = true
Filter 3 -0.025 Zero = true

CALIBRATION CHECK
Xq = 0.077 0.22%

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

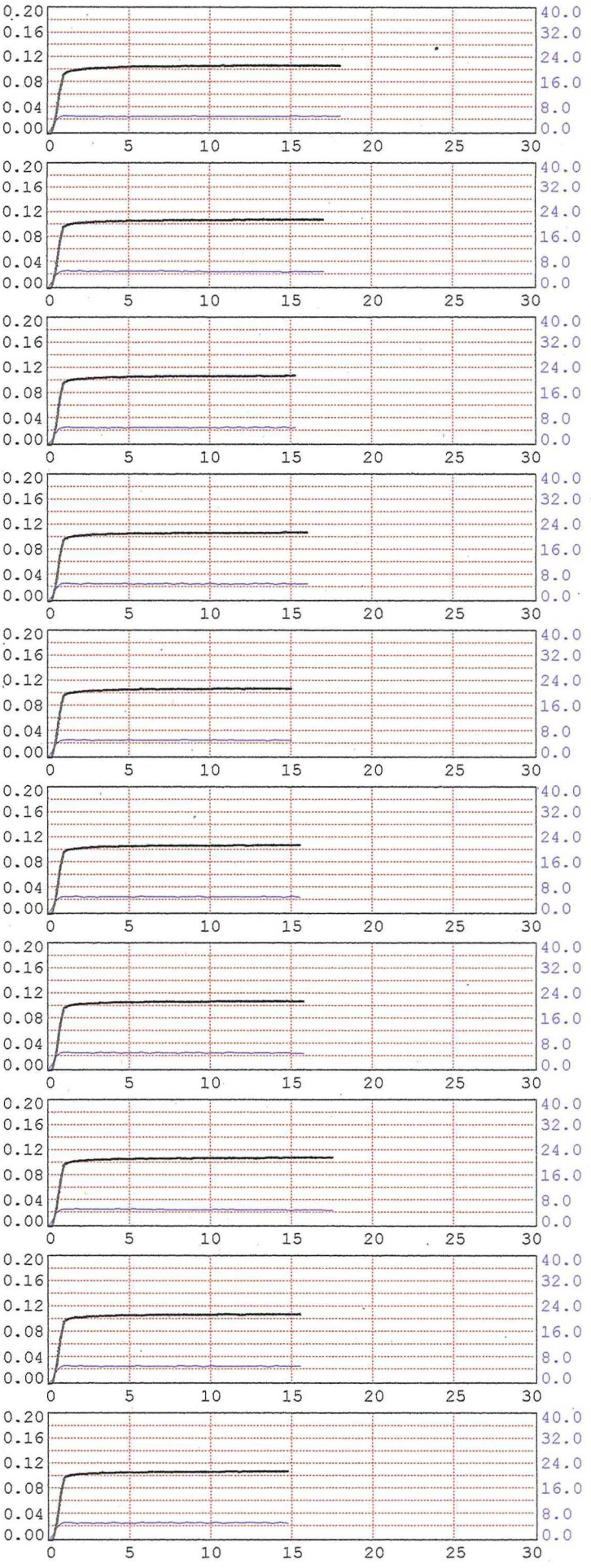
Date: 12/20/2011
Time: 15:49:06

SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-29-080I
SOLUTION CONCENTRATION: 0.081

BLANK TEST	0.000	15:50
CALIBRATION CHECK	PASSED	15:50
SIMULATOR VAPOR 34.0°C	INTERFERENCE	15:50
SIMULATOR VAPOR 34.0°C	INTERFERENCE	15:51
SIMULATOR VAPOR 34.0°C	INTERFERENCE	15:52
SIMULATOR VAPOR 34.0°C	INTERFERENCE	15:53
SIMULATOR VAPOR 34.0°C	INTERFERENCE	15:54
SIMULATOR VAPOR 34.1°C	INTERFERENCE	15:56
SIMULATOR VAPOR 34.0°C	INTERFERENCE	15:57
SIMULATOR VAPOR 34.0°C	INTERFERENCE	15:58
SIMULATOR VAPOR 34.0°C	INTERFERENCE	15:59
SIMULATOR VAPOR 34.0°C	INTERFERENCE	16:00
BLANK TEST	0.000	16:01

100% EPA
0.04
0.081 Ethyl
12-20-11



SECTION 5

FINAL CALIBRATION CHECK TESTS

DIAGNOSTIC RESULT

DataMaster DMT: 104609
Location:
Calibration Date: 12/15/2011
Certification Date: 12/16/2011
Installation Date:
Test Date: 12/20/2011
Test Time: 16:08:58

VERSIONS
DMT: 1.00
PIC: 2.05
Modem: 2.1
Questions: 2.0

TEMPERATURES

Sample Chamber = 48.8°C
Breath Tube = 45.3°C
Digital Sim = 34.0°C

SETTINGS
Lamp Voltage = 1.75 V
Cooler Voltage = 1.69 V
Bias Voltage = 81 V
Chopper Freq = 536 Hz

PUMP INFO
Flow Rate = 6.274 L/M

DETECTOR INFO

PUMP	ON	OFF
MAX(V)	-0.0311	-0.0278
MIN(V)	-0.0325	-0.0291

FILTER INFO
Filter 1 -0.029 Zero = true
Filter 2 0.293 Zero = true
Filter 3 -0.032 Zero = true

CALIBRATION CHECK
Xq = 0.077 0.56%

ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 16:14:42

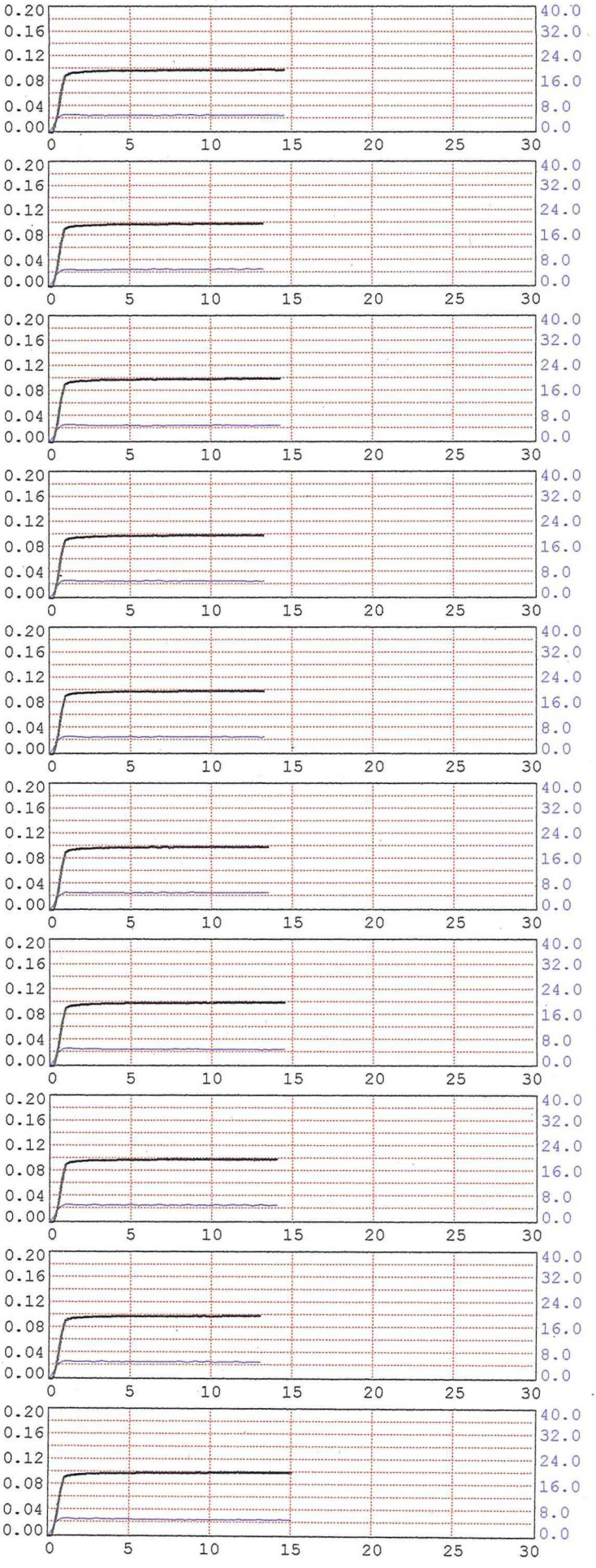
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-39-100
SOLUTION CONCENTRATION: 0.100

BLANK TEST	0.000	16:15
CALIBRATION CHECK	PASSED	16:15
SIMULATOR VAPOR 34.0°C	0.098	16:16
SIMULATOR VAPOR 34.0°C	0.099	16:17
SIMULATOR VAPOR 33.9°C	0.099	16:18
SIMULATOR VAPOR 34.0°C	0.099	16:19
SIMULATOR VAPOR 34.0°C	0.099	16:20
SIMULATOR VAPOR 34.0°C	0.099	16:21
SIMULATOR VAPOR 34.0°C	0.099	16:22
SIMULATOR VAPOR 34.0°C	0.099	16:23
SIMULATOR VAPOR 34.0°C	0.098	16:24
SIMULATOR VAPOR 33.9°C	0.099	16:25
BLANK TEST	0.000	16:26

Average = 0.098
Std Dev = 0.000

In house Cal check KLK 12-20-11



ACCURACY & PRECISION REPORT

STATE OF VERMONT

DataMater DMT: 104609

Date: 12/20/2011
Time: 16:55:05

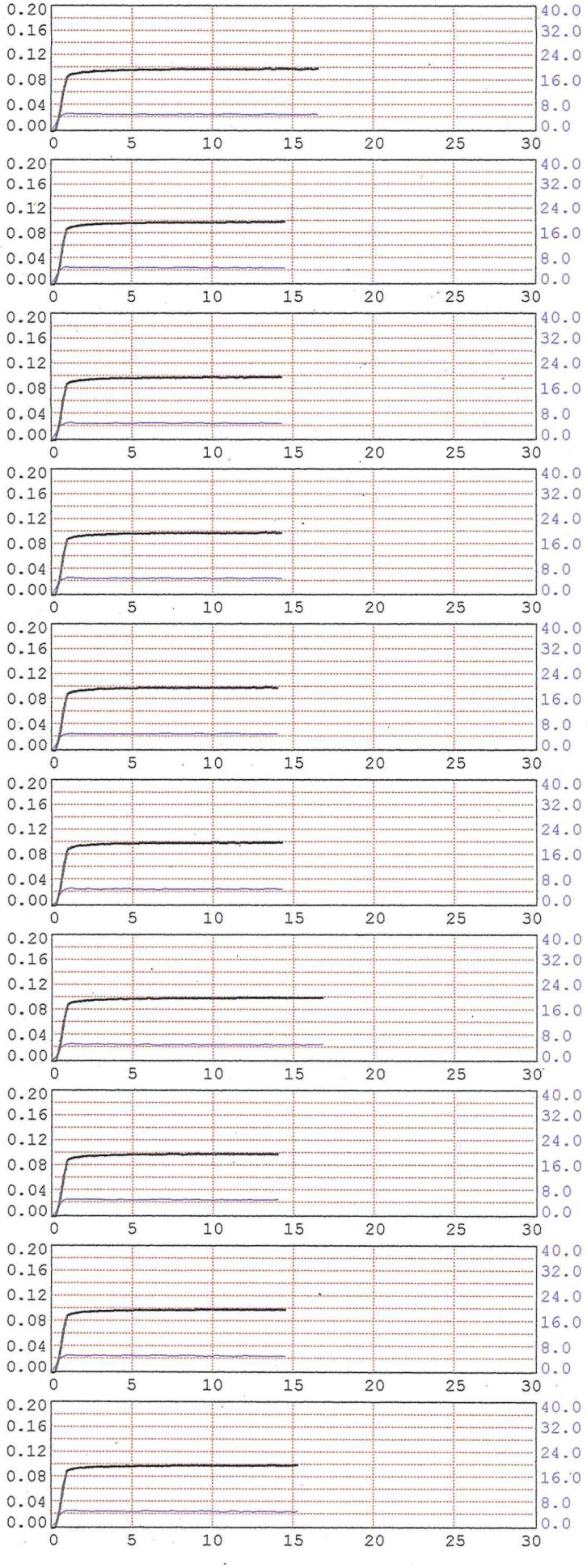
SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: GUTH 11050
SOLUTION CONCENTRATION: 0.100

BLANK TEST	0.000	16:55
CALIBRATION CHECK	PASSED	16:56
SIMULATOR VAPOR 34.0°C	0.099	16:56
SIMULATOR VAPOR 33.9°C	0.099	16:57
SIMULATOR VAPOR 34.0°C	0.099	16:58
SIMULATOR VAPOR 34.0°C	0.099	16:59
SIMULATOR VAPOR 34.0°C	0.099	17:00
SIMULATOR VAPOR 34.0°C	0.100	17:01
SIMULATOR VAPOR 34.0°C	0.100	17:03
SIMULATOR VAPOR 34.0°C	0.099	17:04
SIMULATOR VAPOR 34.0°C	0.098	17:05
SIMULATOR VAPOR 34.0°C	0.100	17:06
BLANK TEST	0.000	17:07

Average = 0.099
Std Dev = 0.000

2nd Source Calcheck KKK 12-20-11



SECTION 6

ERROR REPORTS

ACCURACY & PRECISION REPORT

STATE OF VERMONT

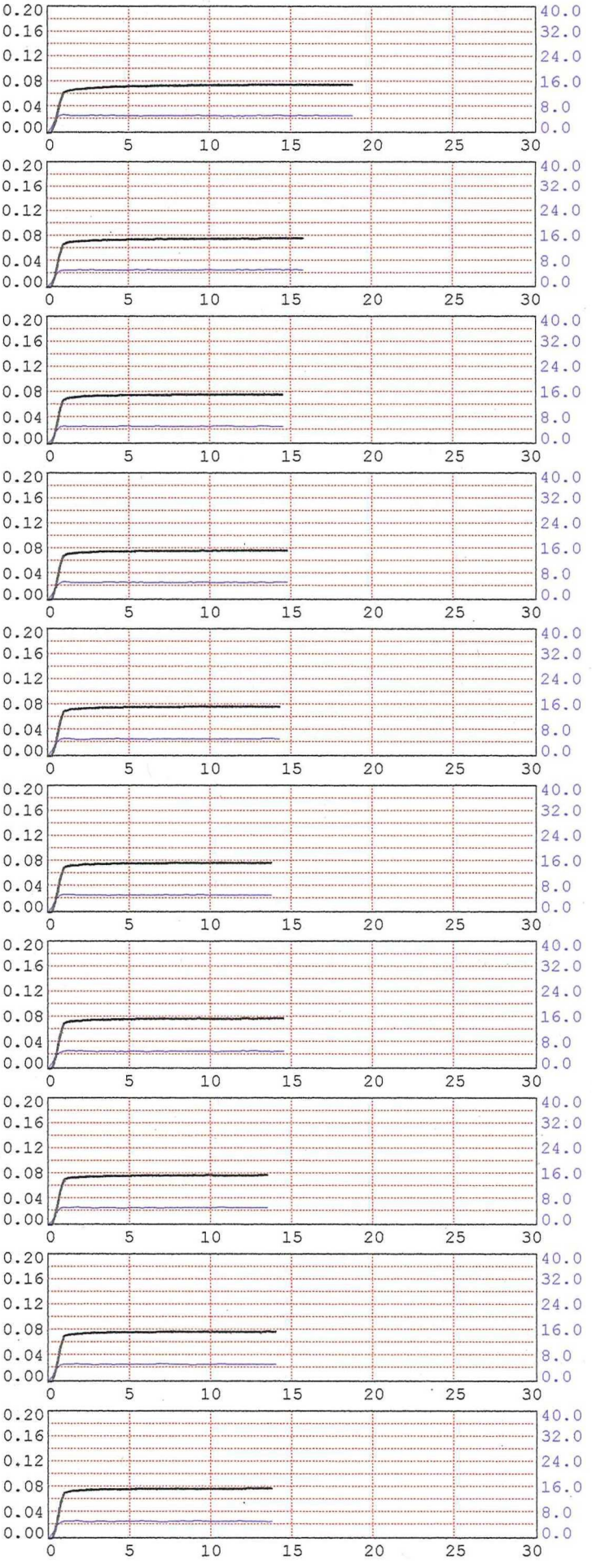
DataMater DMT: 104609

Date: 12/20/2011
Time: 11:50:20

SUPERVISOR NAME:
KIRK L KIMBALL

SOLUTION LOT #: 12-41-080
SOLUTION CONCENTRATION: 0.082

BLANK TEST	0.000	11:51
CALIBRATION CHECK	PASSED	11:51
SIMULATOR VAPOR 33.8°C	0.077	11:51
SIMULATOR VAPOR 33.8°C	0.077	11:52
SIMULATOR VAPOR 33.8°C	0.077	11:53
SIMULATOR VAPOR 33.8°C	0.078	11:55
SIMULATOR VAPOR 33.8°C	0.078	11:56
SIMULATOR VAPOR 33.9°C	0.078	11:57
SIMULATOR VAPOR 33.9°C	0.078	11:58
SIMULATOR VAPOR 33.9°C	0.078	11:59
SIMULATOR VAPOR 33.8°C	0.078	12:00
SIMULATOR VAPOR 33.8°C	0.078	12:01
BLANK TEST	0.000	12:02

Average = 0.077
Std Dev = 0.000

> 5% from actual
Reanalyze a 0.08 EtOH soln.
[illegible]
12-20-11