

Alaska Scientific Crime Detection Laboratory

DataMaster Certification Form

Issued: 2/2/2015
Effective: 2/2/2015

Version: DMCEF 2015 R0
Status: Active

Instrument S/N 100381 Analyst CRF Start Date 2/18/15

1. Diagnostic Test (attached)
2. Voltage Checks
 - a. Adjust voltages, if needed
 - i. Lamp (2.6V Maximum)
 - ii. Bias
 - iii. Cooler (2.0V Maximum)
 - iv. Chopper Frequency
 - v. Detector Voltage (-0.100V to 0.100V)
 - b. Set RFI
 - c. Adjust barometer reading to match NIST traceable barometer
 - d. Adjust volume setting, if needed (1.5L +/- 0.1L)
 - e. Print Technician Screen (attached)

3. Print Calibration Factors (attached)

4. Volume Test - Minimum 1.5 L (1.3L to 1.7L)

5. Linearity Test (attached)

a. Levels Used

- i. 0.020g/210L Mnf ILMO Lot 00813020 A1 Exp 3/1/15
- ii. 0.040g/210L Mnf ILMO Lot 00813040 A2 Exp 3/1/15
- iii. 0.080g/210L Mnf ILMO Lot 11313080 A1 Exp 6/1/15
- iv. 0.100g/210L Mnf ILMO Lot 00813100 A3 Exp 3/1/15
- v. 0.200g/210L Mnf Guth Lot 13220 Exp 8/5/15
 1. Simulator S/N DRS298 Date Calibrated 2/19/14
- vi. 0.300g/210L Mnf Guth Lot 13080 Exp 3/19/15
 1. Simulator S/N SD1177 Date Calibrated 2/20/14

6. Functional Tests (attached)

- a. Incomplete
- b. Invalid
- c. Interference
- d. Exceeded attempts

- i. Acetone - Mnf Guth Lot 14030 Level 0.100 Exp 1/20/16
 1. Simulator S/N SD1198 Date Calibrated 2/20/14
- ii. Isopropanol - Mnf Guth Lot 14030 Level 0.100 Exp 1/20/16
 1. Simulator S/N SD1202 Date Calibrated 2/20/14
- iii. Negative Control - Mnf Guth Lot 14030 Level 0.100 Exp 1/20/16
 1. Simulator S/N DR4161 Date Calibrated 2/19/14

e. RFI

7. Verify stylus is calibrated
8. Reset Options
9. Clear Memory
10. Verification of Calibration
11. Non-Drinking Subject Test (attached)
12. Upload
13. Remove tank prior to shut down

End Date 2/19/15

DIAGNOSTIC RECORD

Alaska Department of Public Safety
DATAMASTER dmt: 100381

Date: 02/18/2015
Time: 08:57:36

VERSIONS

DMT: 3.00
PIC: 3.02
Modem: 2.6
Questions: 2.2

TEMPERATURES

Sample Chamber = 48.7°C PASSED
Breath Tube = 48.0°C PASSED

PUMP INFO

Flow Rate = 5.022 L/M PASSED

DETECTOR INFO

PUMP ON PASSED
PUMP OFF PASSED

FILTER INFO

Filter 1 PASSED
Filter 2 PASSED
Filter 3 PASSED

INTERNAL STANDARD PASSED

Technician Screen

DATAMASTER dmt: 100381

Date: 02/18/2015
Time: 9:37 AM

Temperatures (°C)

Sample Cell: 48.9°C
Breath Tube: 46.9°C

Current Barometer 29.6 in
Volume (Ltr) 1.52

Settings

Lamp: 1.72 V
Bias: 79 V
Cooler: 1.65 V
Chopper: 539 Hz

Voltages (V)

Flow: 1.08 V
Detector: -0.035 V

CALIBRATION FACTORS

Alaska Department of Public Safety
DATAMASTER dmt: 100381

Date: 04/26/2011
Time: 08:49:42

OPERATOR NAME:
COLLEEN S OBRYANT
CERTIFICATE #: 6237

LOT #: GUTH100
BOTTLE #: 10260
EXPIRATION: 10/25/2012

Ca = 0.1000
CAL = 0.974069 0.800 <= CAL < 1.200
b1 = 0.0000 0.0000 <= b1 < 0.0040
b2 = 0.0029 0.0010 <= b2 < 0.0100
b3 = 0.0000 0.0000 <= b3 < 0.0040
Xq = 0.0904 0.0500 <= Xq < 0.2000
a21 = 1.090518 1.050 <= a21 < 1.300
a31 = 0.416583 0.300 <= a31 < 0.800

SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dmt: 100381

Date: 02/18/2015
Time: 10:01:04

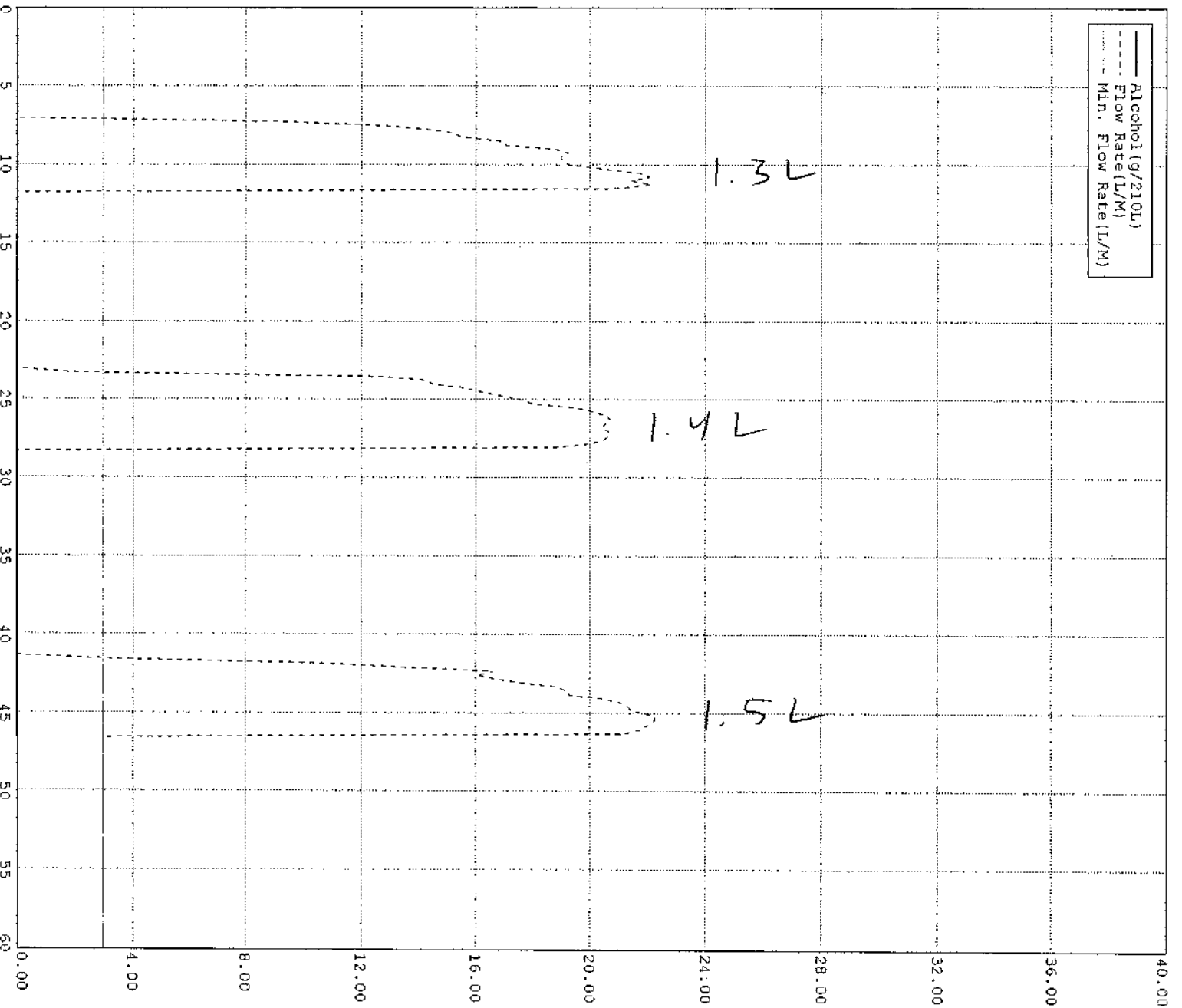
SUBJECT NAME:
TEST TEST
LICENSE #: XXXX

OPERATOR NAME:
MINIMUM VOLUME
OPERATOR'S #: XXXX

DEPT/AGENCY:
XXXX
CASE/REPORT: XXXX
TEST TYPE: TEST

EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.58: 0.079
LOF #: 11313080A1
EXPIRATION: 06/01/2015

DIAGNOSTIC CHECK	PASSED	10:02
BLANK TEST	0.000	10:02
INTERNAL STANDARD	VERIFIED	10:02
EXTERNAL STANDARD	0.079	10:02
BLANK TEST	0.000	10:03
SUBJECT SAMPLE (Vol=1.54L)	0.000	10:04
INTERNAL STANDARD	0.078	10:05
BLANK TEST	0.000	10:06



LINEARITY CHECK

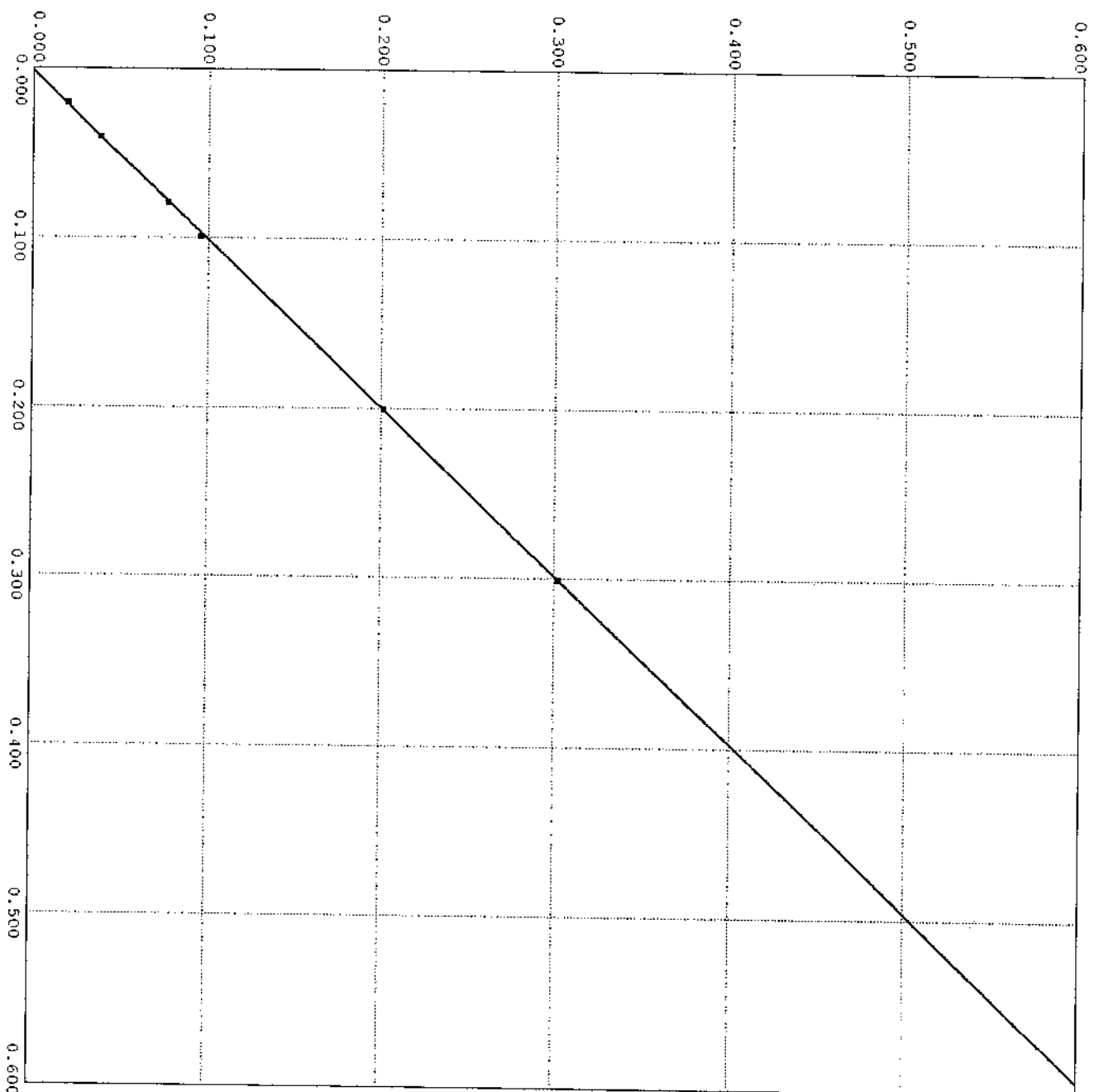
Alaska Department of Public Safety
 DATAMASTER dnt: 100381

Date: 02/18/2015
 Time: 12:55:14

SUPERVISOR NAME:
 CHARLES FOSTER
 OPERATOR'S #: 7734

TARGET	AVERAGE	STD. DEV.
0.020	0.0204	0.0005
0.040	0.0396	0.0005
0.079	0.0780	0.0000
0.099	0.0966	0.0005
0.200	0.2024	0.0009
0.300	0.3030	0.0007

SLOPE = 1.014134
 R² = 0.999835



LINEARITY CHECK: Control Test 1

Alaska Department of Public Safety
DATAMASTER dmt: 100381

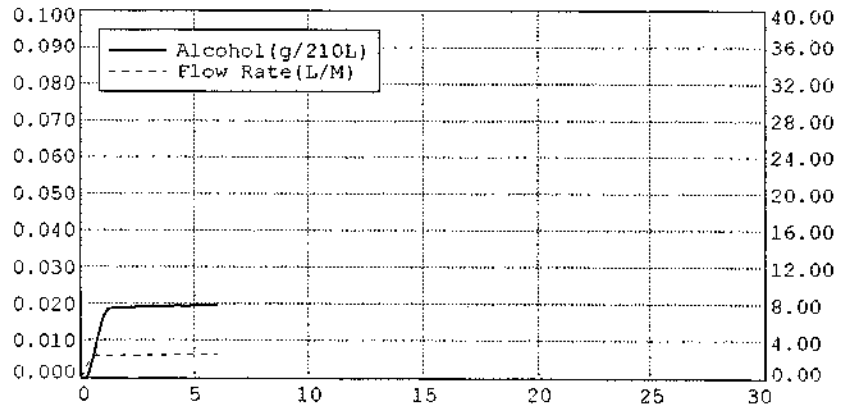
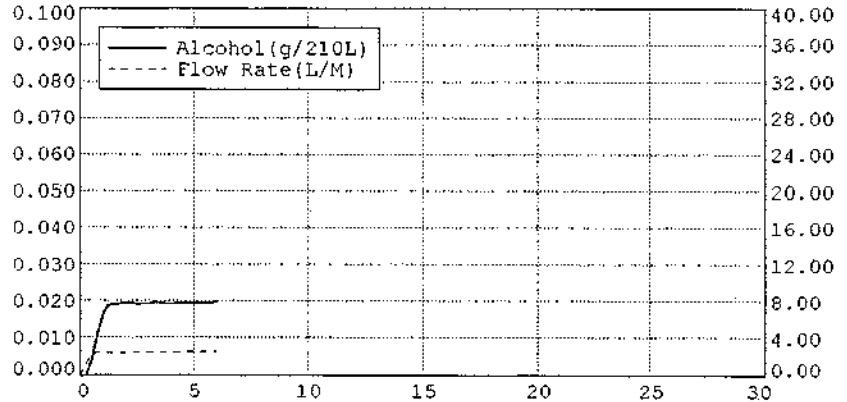
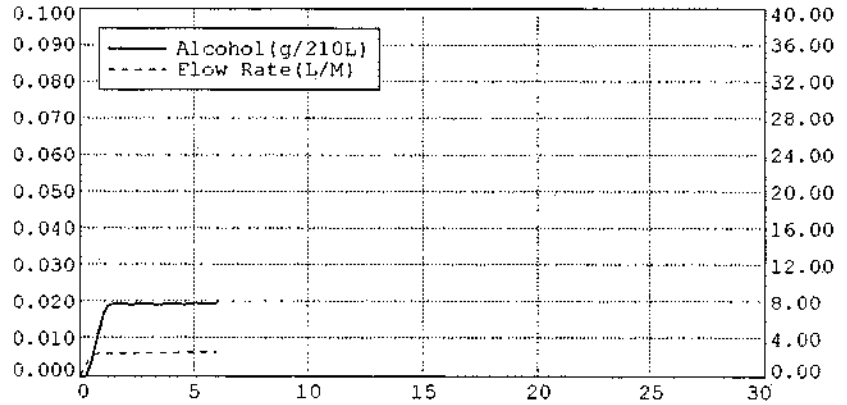
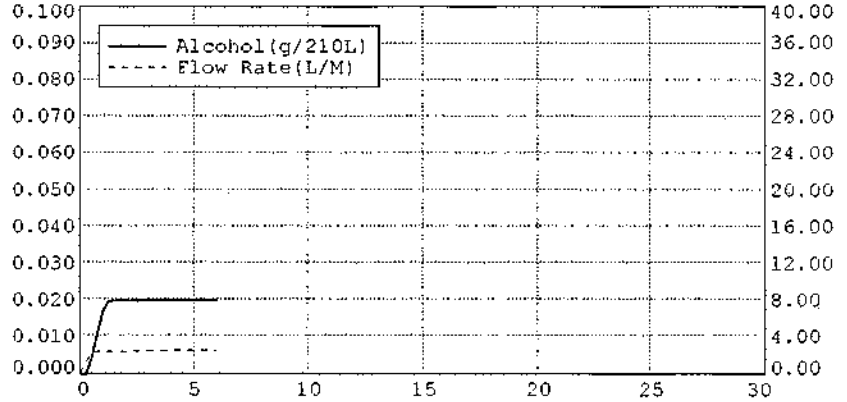
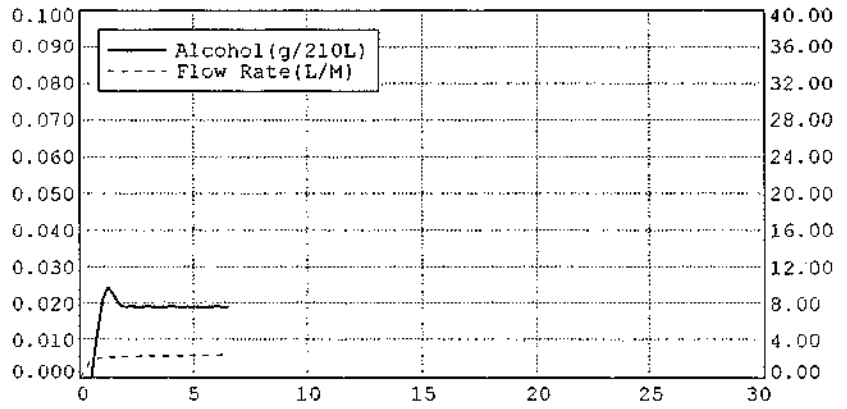
Date: 02/18/2015
Time: 12:55:16

EXTERNAL STANDARD INFORMATION

NOMINAL: 0.020
TARGET AT 29.62: 0.020
LOT #: 00813020A1
EXPIRATION: 03/01/2015
TANK PRESSURE: 348 psi

BLANK TEST	0.000	13:23
INTERNAL STANDARD	VERIFIED	13:24
EXTERNAL STANDARD	0.020	13:24
BLANK TEST	0.000	13:25
EXTERNAL STANDARD	0.021	13:25
BLANK TEST	0.000	13:26
EXTERNAL STANDARD	0.020	13:26
BLANK TEST	0.000	13:27
EXTERNAL STANDARD	0.020	13:27
BLANK TEST	0.000	13:28
EXTERNAL STANDARD	0.021	13:28
BLANK TEST	0.000	13:29

Average = 0.0204
Std Dev = 0.0005



LINEARITY CHECK: Control Test 2

Alaska Department of Public Safety
 DATAMASTER dmt: 100381

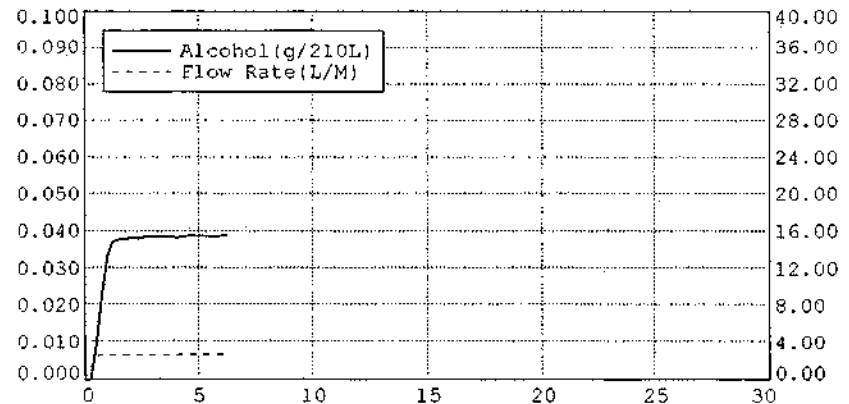
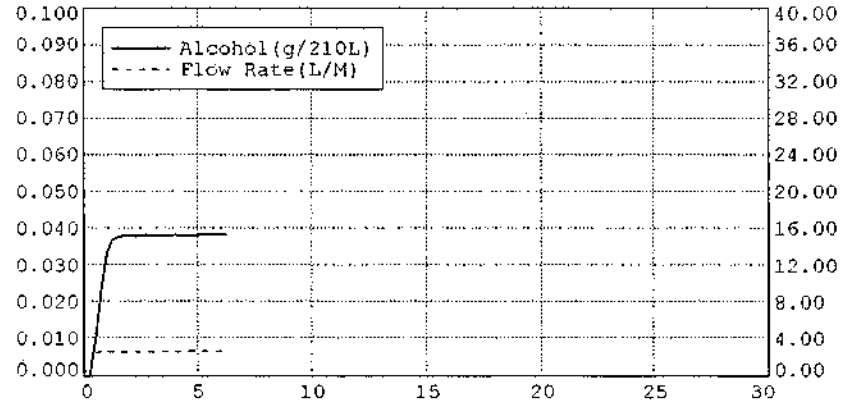
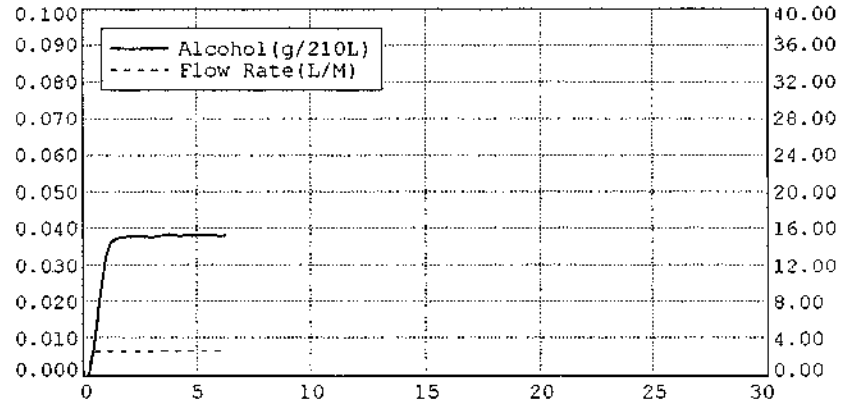
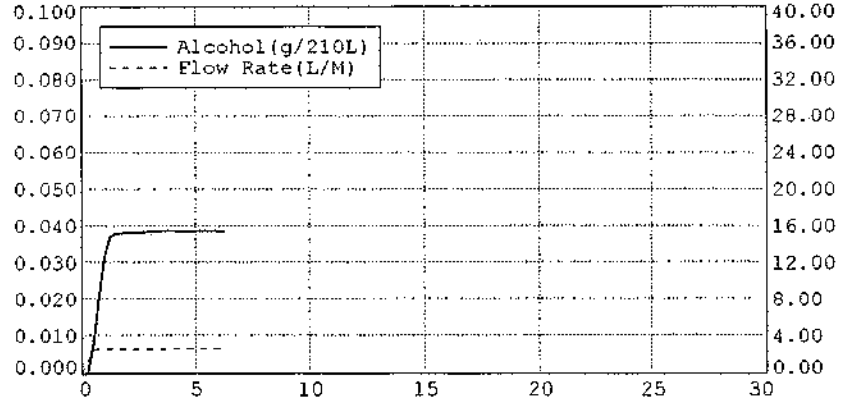
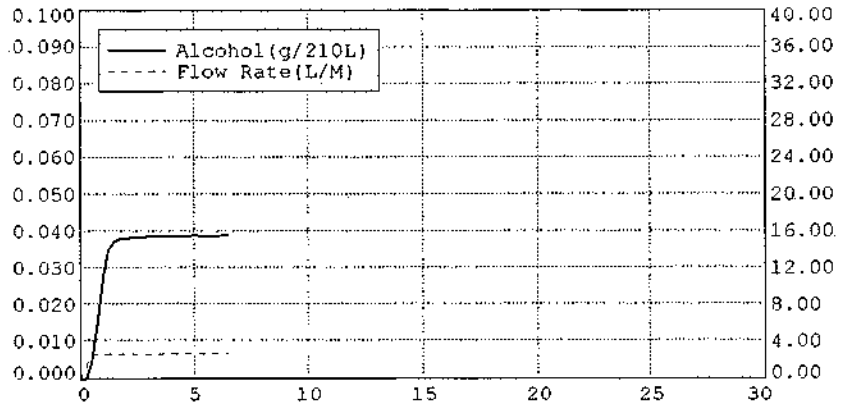
Date: 02/18/2015
 Time: 13:31:26

EXTERNAL STANDARD INFORMATION

NOMINAL: 0.040
 TARGET AT 29.62: 0.040
 LOT #: 00813040A2
 EXPIRATION: 03/01/2015
 TANK PRESSURE: 616 psi

BLANK TEST	0.000	13:32
INTERNAL STANDARD	VERIFIED	13:33
EXTERNAL STANDARD	0.040	13:33
BLANK TEST	0.000	13:34
EXTERNAL STANDARD	0.040	13:34
BLANK TEST	0.000	13:35
EXTERNAL STANDARD	0.039	13:35
BLANK TEST	0.000	13:36
EXTERNAL STANDARD	0.039	13:36
BLANK TEST	0.000	13:37
EXTERNAL STANDARD	0.040	13:37
BLANK TEST	0.000	13:38

Average = 0.0396
 Std Dev = 0.0005



LINEARITY CHECK: Control Test 3

Alaska Department of Public Safety
 DATAMASTER dmt: 100381

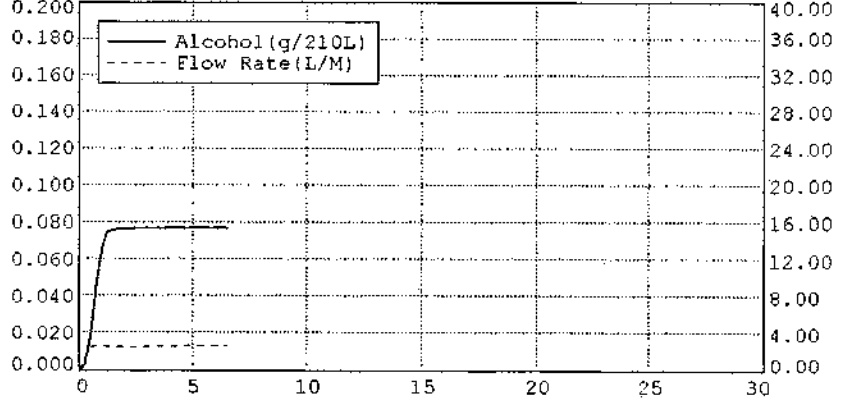
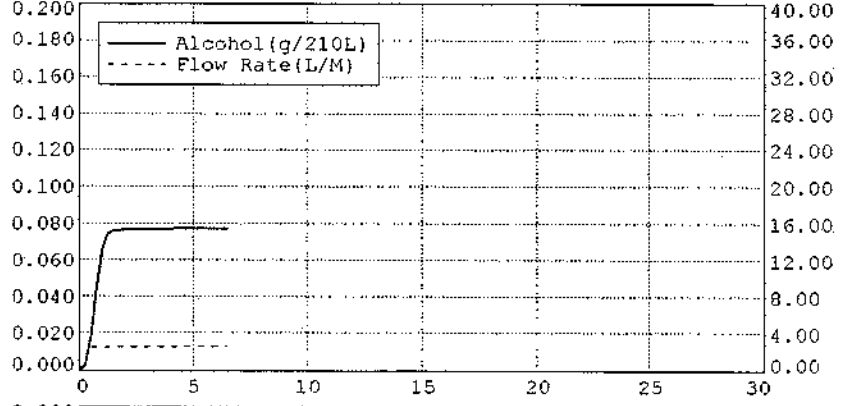
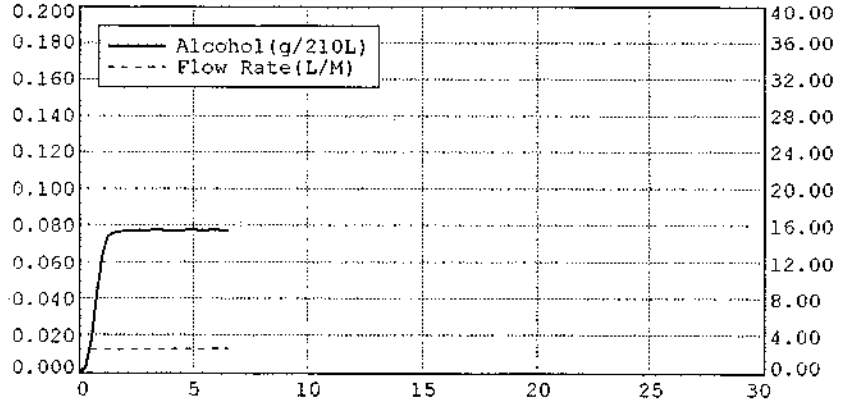
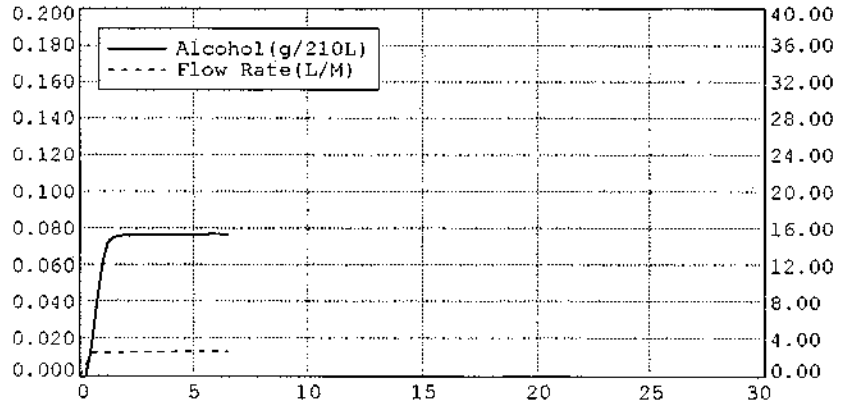
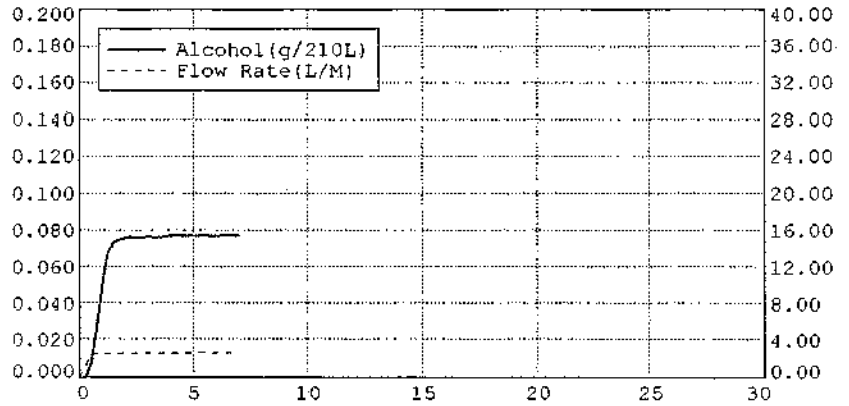
Date: 02/18/2015
 Time: 13:40:53

EXTERNAL STANDARD INFORMATION

NOMINAL: 0.080
 TARGET AT 29.62: 0.079
 LOT #: 11313080A1
 EXPIRATION: 06/01/2015
 TANK PRESSURE: 551 psi

BLANK TEST	0.000	13:41
INTERNAL STANDARD	VERIFIED	13:42
EXTERNAL STANDARD	0.078	13:42
BLANK TEST	0.000	13:43
EXTERNAL STANDARD	0.078	13:43
BLANK TEST	0.000	13:44
EXTERNAL STANDARD	0.078	13:44
BLANK TEST	0.000	13:45
EXTERNAL STANDARD	0.078	13:45
BLANK TEST	0.000	13:46
EXTERNAL STANDARD	0.078	13:46
BLANK TEST	0.000	13:47

Average = 0.0780
 Std Dev = 0.0000



LINEARITY CHECK: Control Test 4

Alaska Department of Public Safety
DATAMASTER dmt: 100381

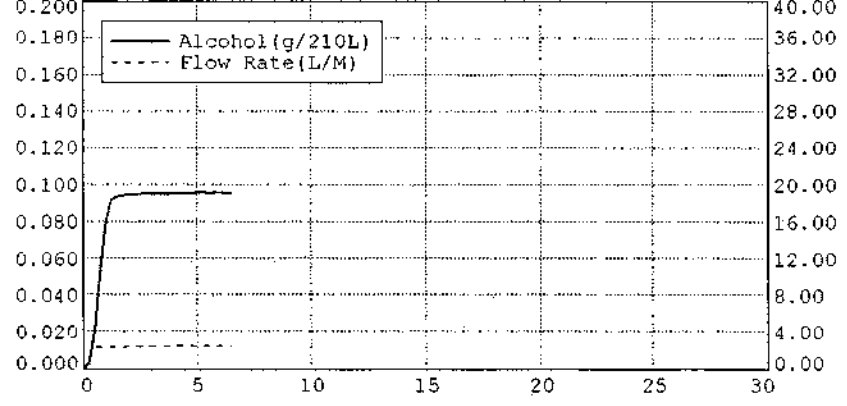
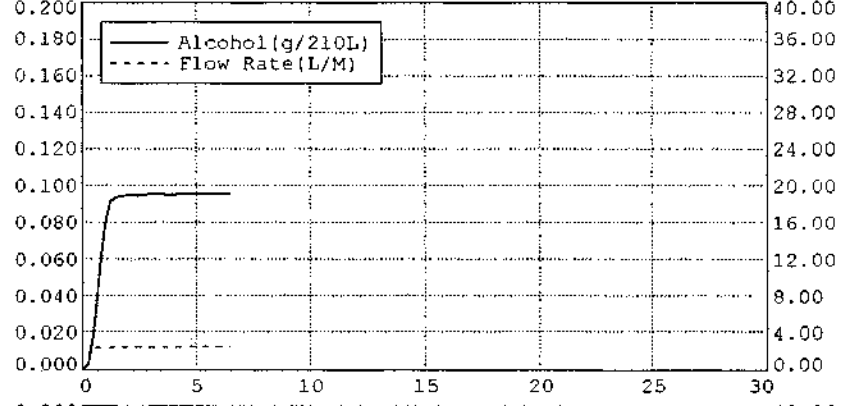
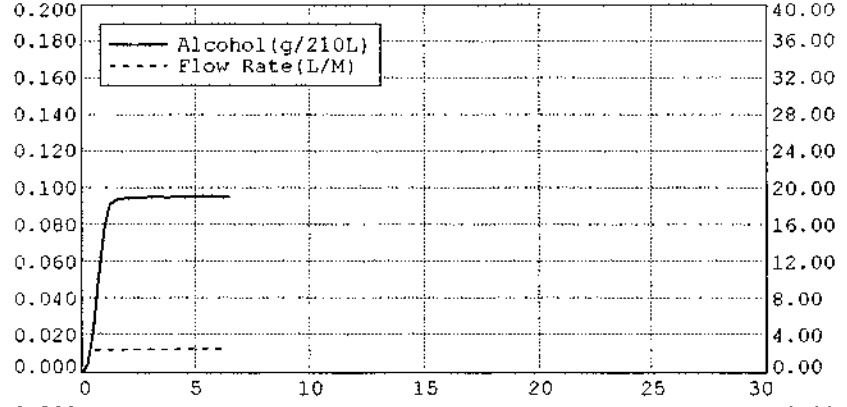
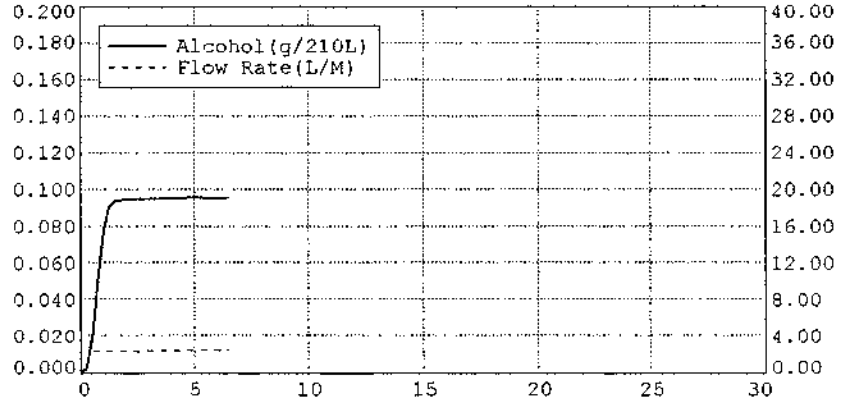
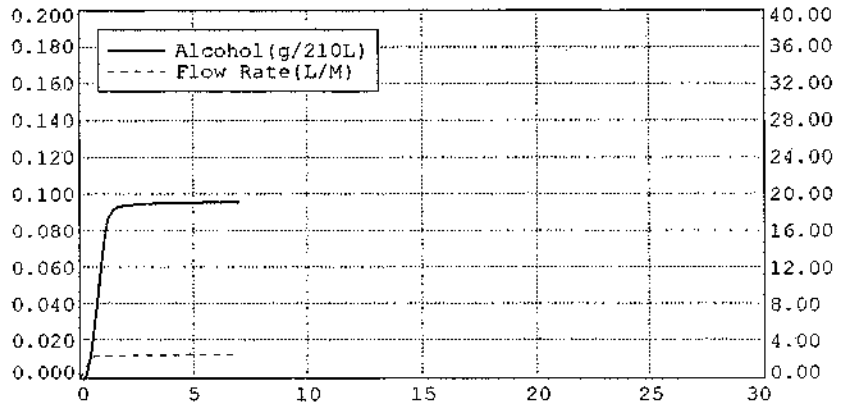
Date: 02/18/2015
Time: 13:49:28

EXTERNAL STANDARD INFORMATION

NOMINAL: 0.100
TARGET AT 29.62: 0.099
LOT #: 00813100A3
EXPIRATION: 03/01/2015
TANK PRESSURE: 338 psi

BLANK TEST	0.000	13:50
INTERNAL STANDARD	VERIFIED	13:50
EXTERNAL STANDARD	0.097	13:51
BLANK TEST	0.000	13:52
EXTERNAL STANDARD	0.096	13:52
BLANK TEST	0.000	13:53
EXTERNAL STANDARD	0.096	13:53
BLANK TEST	0.000	13:54
EXTERNAL STANDARD	0.097	13:54
BLANK TEST	0.000	13:55
EXTERNAL STANDARD	0.097	13:55
BLANK TEST	0.000	13:56

Average = 0.0966
Std Dev = 0.0005



LINEARITY CHECK: Control Test 5

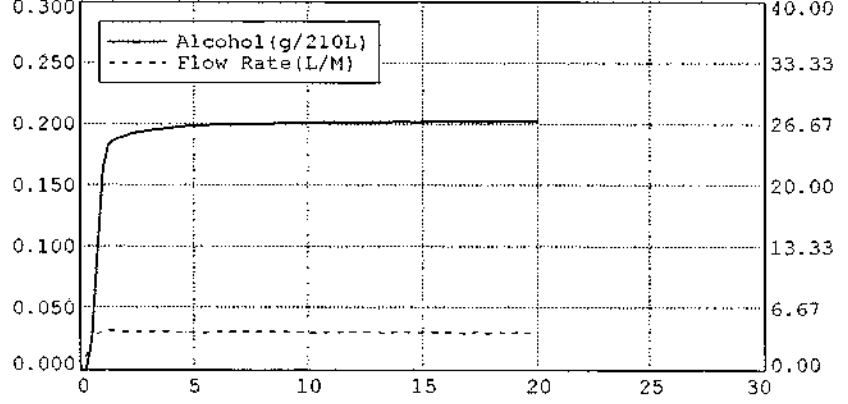
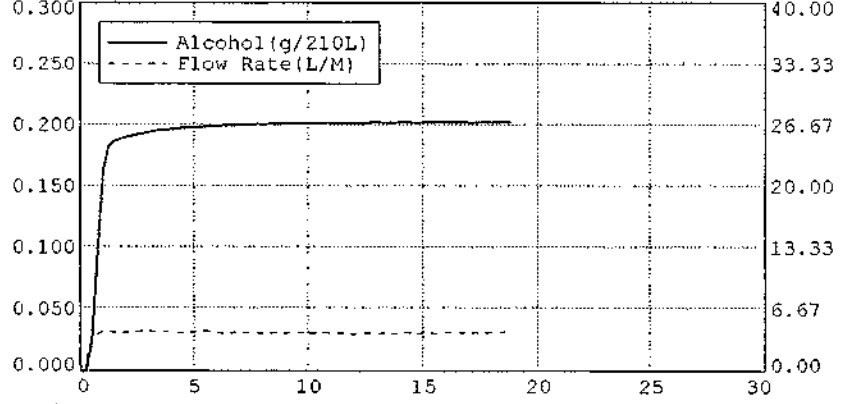
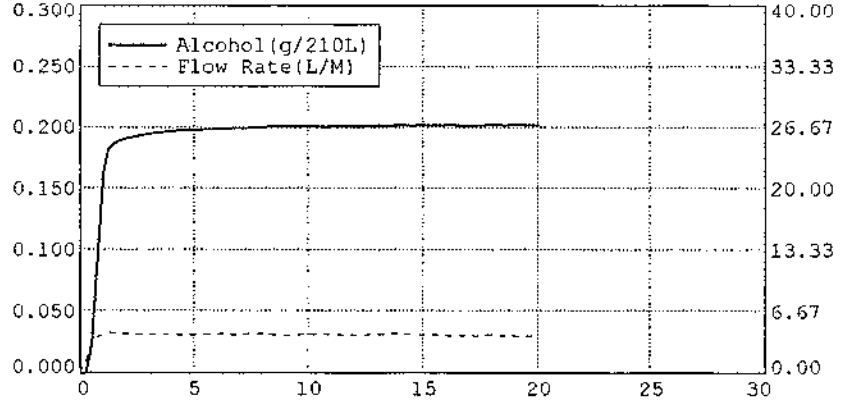
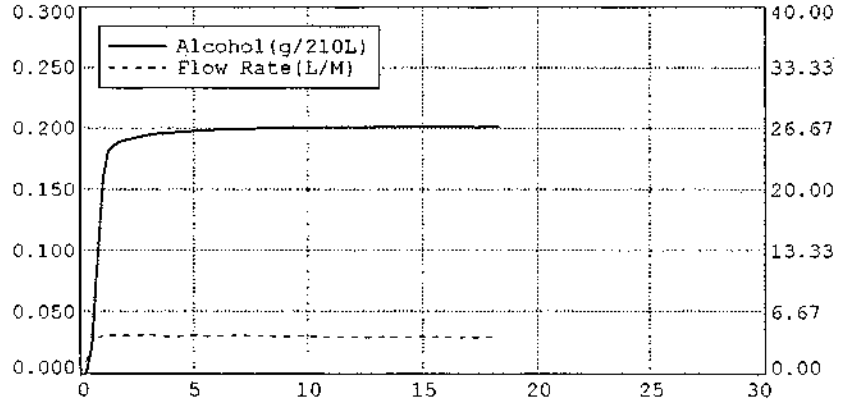
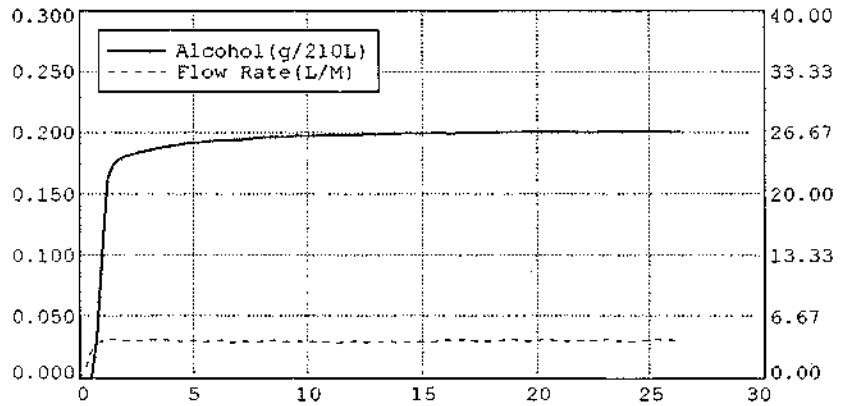
Alaska Department of Public Safety
 DATAMASTER dmt: 100381

Date: 02/18/2015
 Time: 14:00:51

EXTERNAL STANDARD INFORMATION
 NOMINAL: 0.200
 LOT #: 13220
 EXPIRATION: 08/05/2015

BLANK TEST	0.000	14:02
INTERNAL STANDARD	VERIFIED	14:02
EXTERNAL STANDARD	0.201	14:03
BLANK TEST	0.000	14:04
EXTERNAL STANDARD	0.202	14:04
BLANK TEST	0.000	14:05
EXTERNAL STANDARD	0.203	14:05
BLANK TEST	0.000	14:06
EXTERNAL STANDARD	0.203	14:07
BLANK TEST	0.000	14:08
EXTERNAL STANDARD	0.203	14:08
BLANK TEST	0.000	14:09

Average = 0.2024
 Std Dev = 0.0009



LINEARITY CHECK: Control Test 6

Alaska Department of Public Safety
 DATAMASTER dmt: 100381

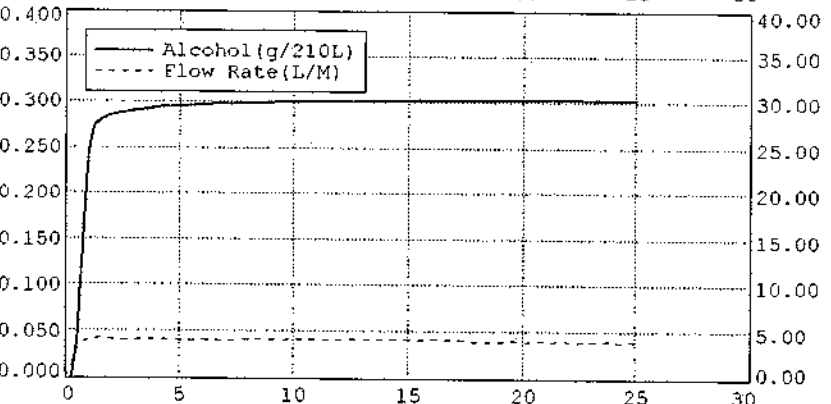
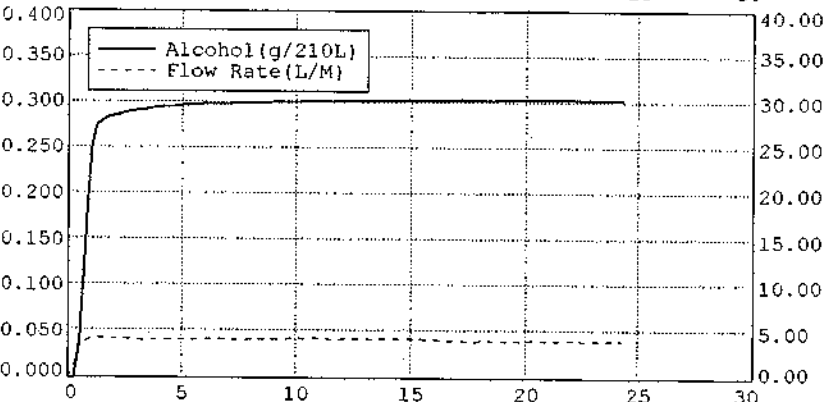
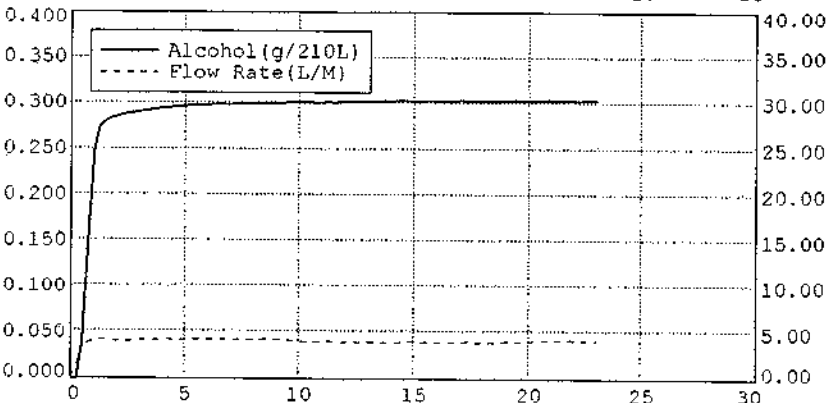
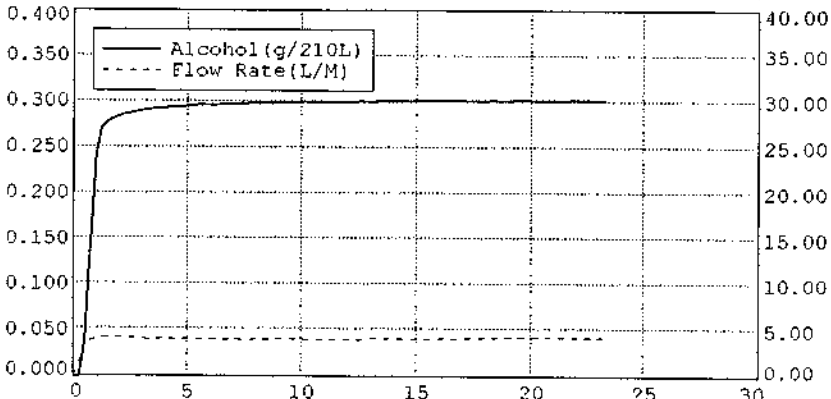
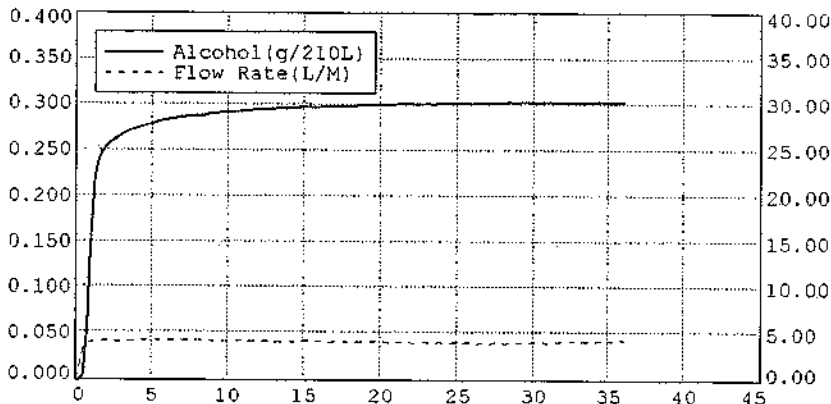
Date: 02/18/2015
 Time: 14:15:43

EXTERNAL STANDARD INFORMATION

NOMINAL: 0.300
 LOT #: 13080
 EXPIRATION: 03/19/2015

BLANK TEST	0.000	14:16
INTERNAL STANDARD	VERIFIED	14:16
EXTERNAL STANDARD	0.303	14:17
BLANK TEST	0.000	14:18
EXTERNAL STANDARD	0.302	14:19
BLANK TEST	0.000	14:20
EXTERNAL STANDARD	0.303	14:20
BLANK TEST	0.000	14:21
EXTERNAL STANDARD	0.303	14:21
BLANK TEST	0.000	14:22
EXTERNAL STANDARD	0.304	14:23
BLANK TEST	0.000	14:24

Average = 0.3030
 Std Dev = 0.0087



SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dnt: 100381

Date: 02/19/2015
Time: 09:45:06

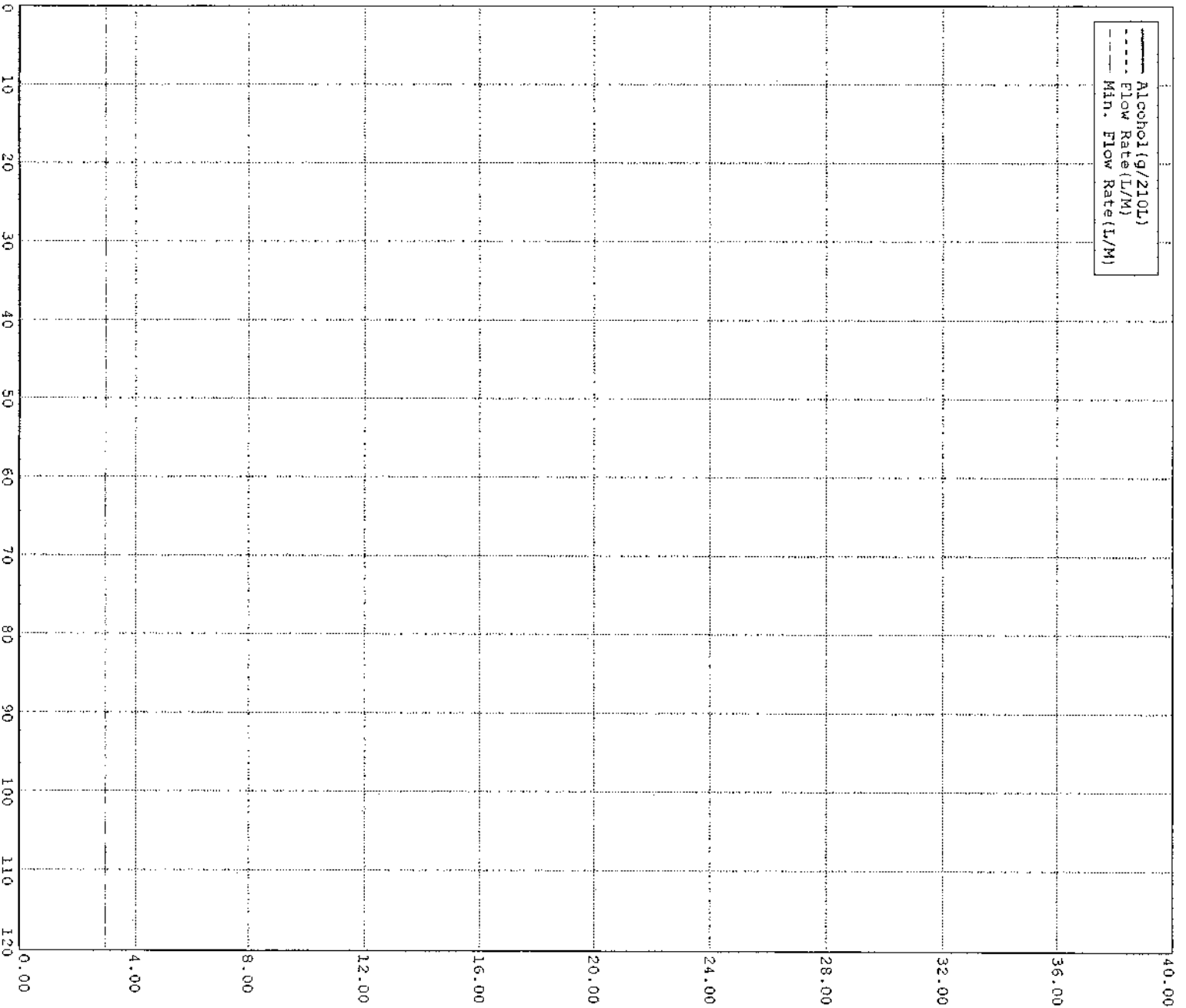
SUBJECT NAME:
TEST TEST
LICENSE #: XXXX

OPERATOR NAME:
INCOMPLETE XXXX
OPERATOR'S #: XXXX

DEPT/AGENCY:
XXXX
CASE/REPORT: XXXX
TEST TYPE: TEST

EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.85: 0.080
LOT #: 11313080A1
EXPIRATION: 06/01/2015

DIAGNOSTIC CHECK	PASSED	09:46
BLANK TEST	0.000	09:46
INTERNAL STANDARD	VERIFIED	09:46
EXTERNAL STANDARD	0.079	09:46
BLANK TEST	0.000	09:47
SUBJECT SAMPLE	INCOMPLETE	09:49



SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dnt: 100381

Date: 02/19/2015
Time: 09:52:52

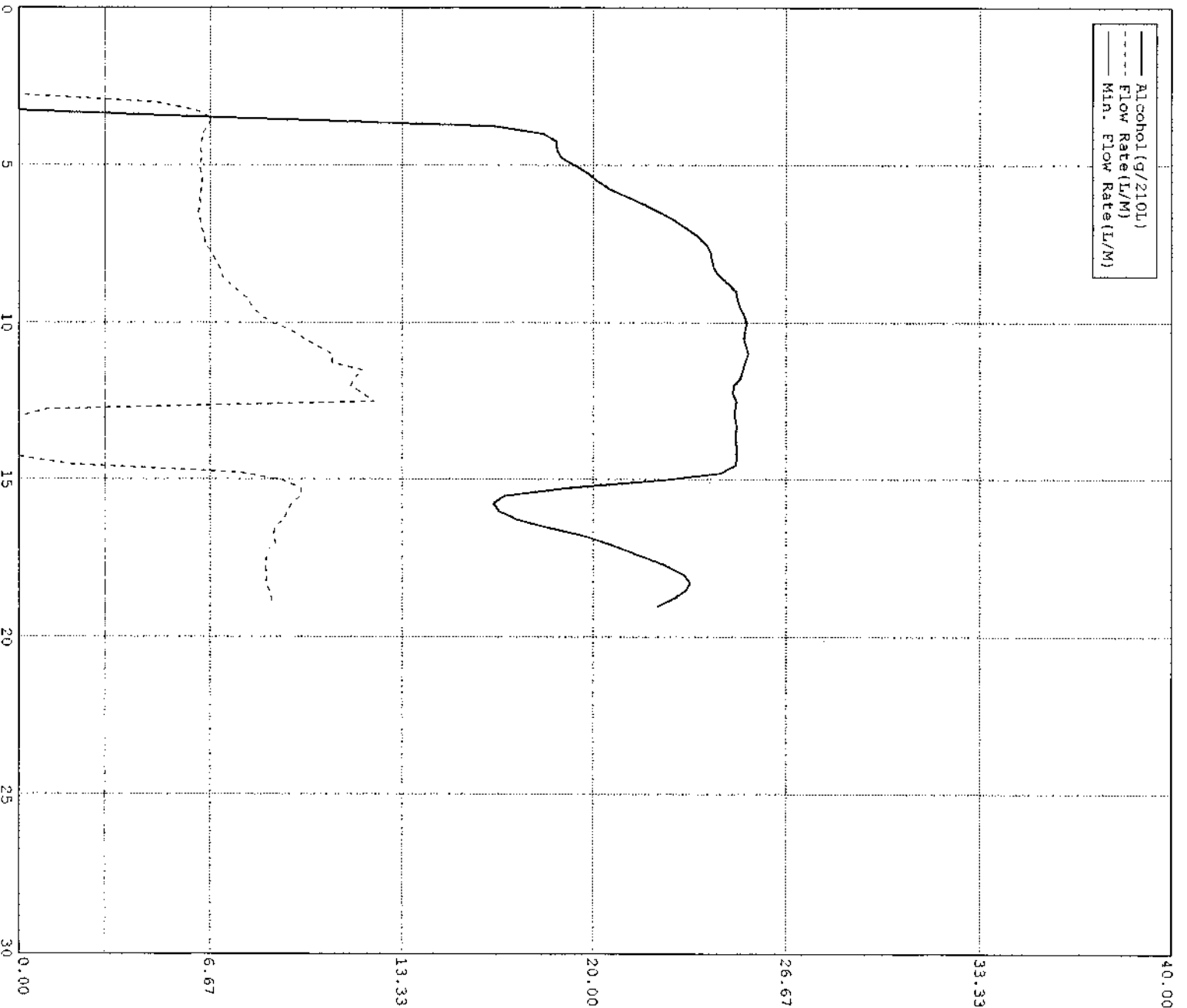
SUBJECT NAME:
TEST TEST
LICENSE #: XXXX

OPERATOR NAME:
INVALID XXXX
OPERATOR'S #: XXXX

DEPT/AGENCY:
XXXX
CASE/REPORT: XXXX
TEST TYPE: TEST

EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.86: 0.080
LOT #: 11313080A1
EXPIRATION: 06/01/2015

DIAGNOSTIC CHECK	PASSED	09:56
BLANK TEST	0.000	09:56
INTERNAL STANDARD	VERIFIED	09:56
EXTERNAL STANDARD	0.079	09:56
BLANK TEST	0.000	09:57
SUBJECT SAMPLE	INVALID	09:58



SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dmt: 100381

Date: 02/19/2015
Time: 10:17:04

SUBJECT NAME:
TEST TEST
LICENSE #: XXXX

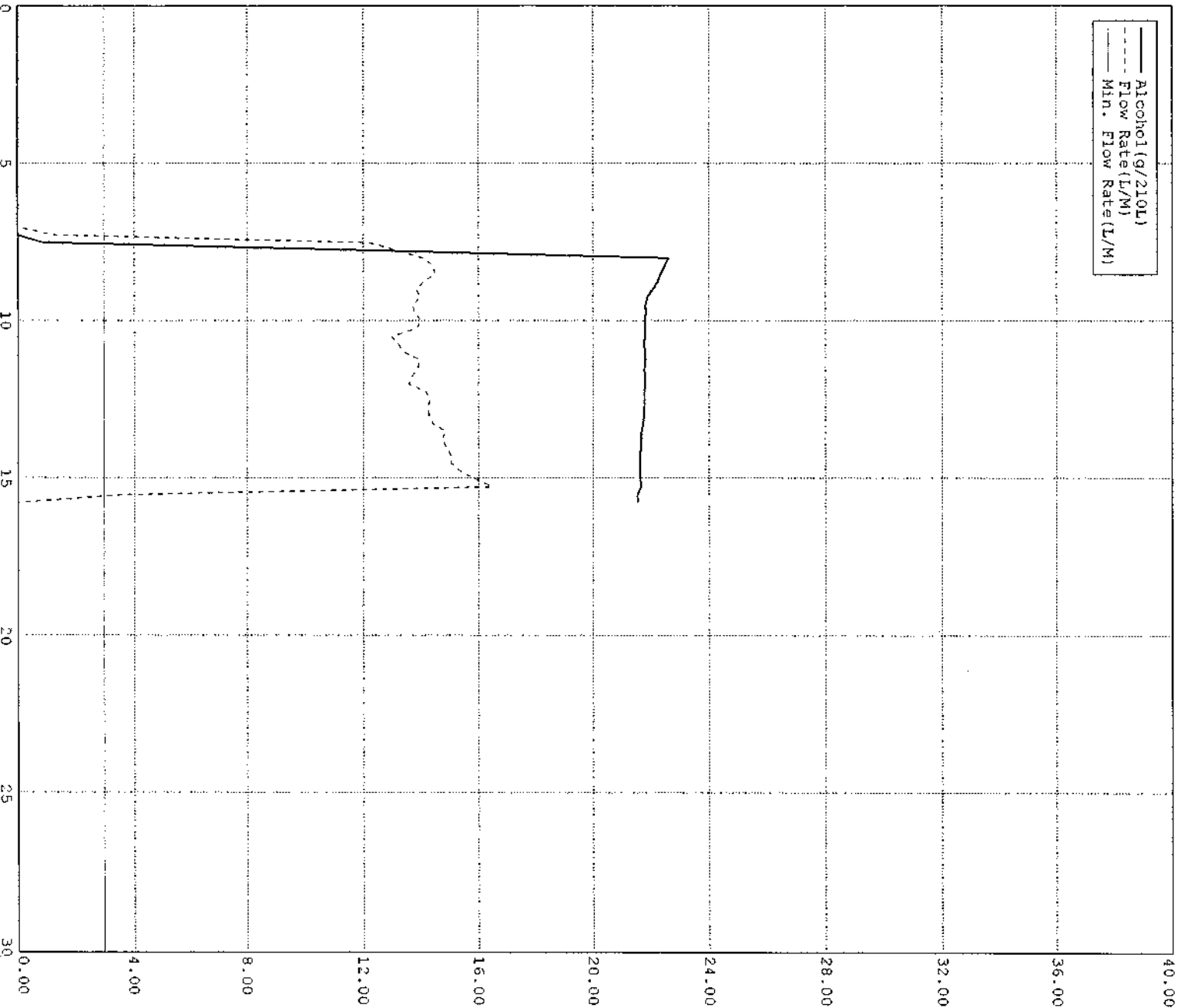
OPERATOR NAME:
INTERFERENCE ACETONE
OPERATOR'S #: XXXX

DEPT/AGENCY:
XXXX
CASE/REPORT: XXXX
TEST TYPE: TEST

EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.86: 0.080
LOT #: 11313080A1
EXPIRATION: 06/01/2015

DIAGNOSTIC CHECK PASSED 10:20
BLANK TEST 0.000 10:20
INTERNAL STANDARD VERIFIED 10:20
Xq = 0.092 (1.45%)
EXTERNAL STANDARD 0.079 10:20
X[1] = 0.0791 (-0.0018) (0.0013)
BLANK TEST 0.000 10:21
SUBJECT SAMPLE XXX 10:21
X[1] = 0.1086 (-0.0147) (0.0006)

Interference Detected



SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dmt: 100381

Date: 02/19/2015
Time: 10:28:59

SUBJECT NAME:
TEST TEST
LICENSE #: XXXX

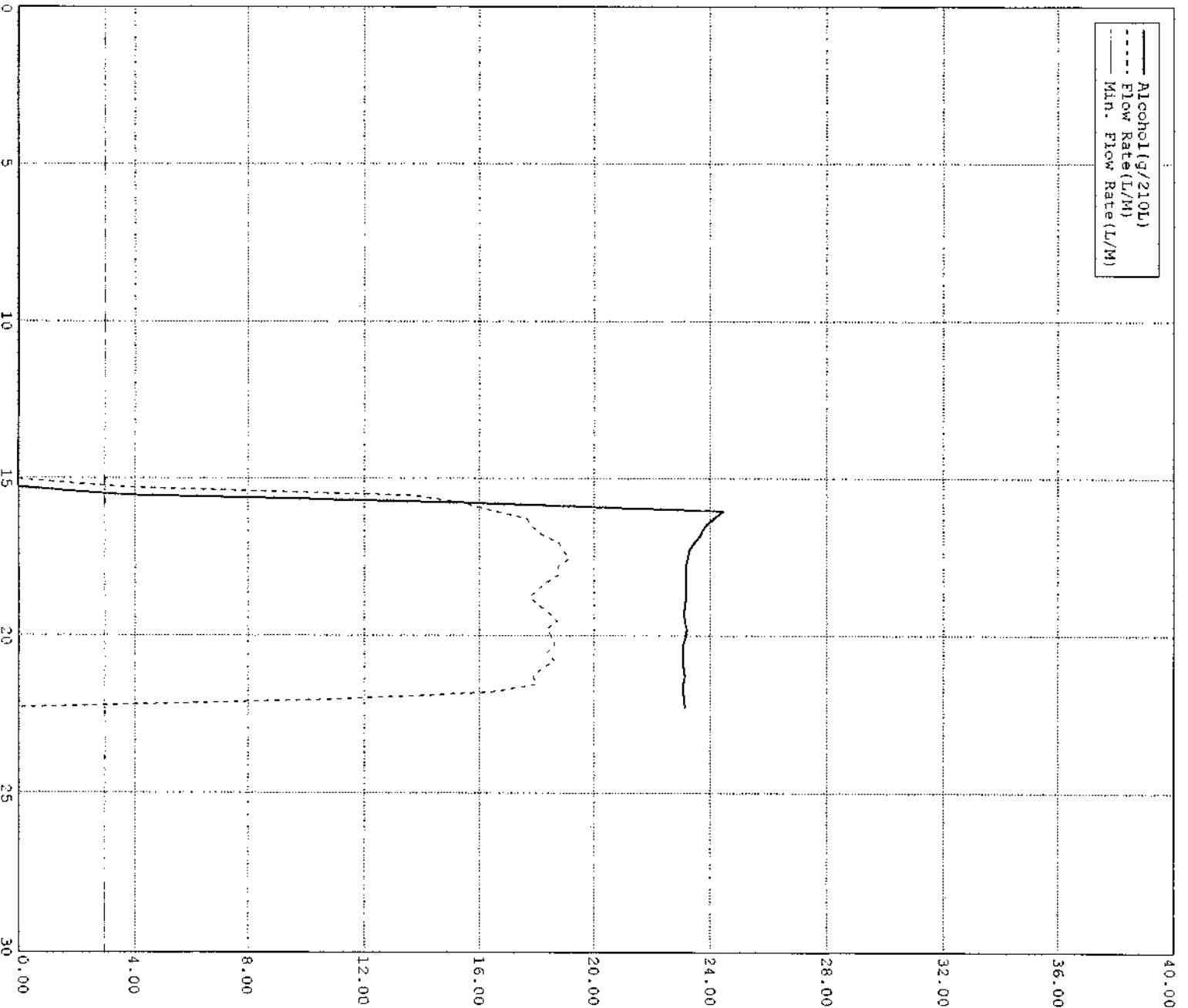
OPERATOR NAME:
INTERFERENCE IPA
OPERATOR'S #: XXXX

DEPT/AGENCY:
XXXX
CASE/REPORT: XXXX
TEST TYPE: TEST

EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.87: 0.080
LOT #: 11313080A1
EXPIRATION: 06/01/2015

DIAGNOSTIC CHECK PASSED 10:30
BLANK TEST 0.000 10:30
INTERNAL STANDARD VERIFIED 10:30
Xq = 0.092 (1.74%)
EXTERNAL STANDARD 0.079 10:30
X[1] = 0.0795 (-0.0004) (0.0014)
BLANK TEST 0.000 10:31
SUBJECT SAMPLE XXXX 10:32
X[1] = 0.1161 (-0.0199) (0.0003)

Interference Detected



SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dmt: 100381

Date: 02/19/2015
Time: 10:38:42

SUBJECT NAME:
TEST TEST
LICENSE #: XXXX

OPERATOR NAME:
INTERFERENCE NEGATIVE
OPERATOR'S #: XXXX

DEPT/AGENCY:
XXXX
CASE/REPORT: XXXX
TEST TYPE: TEST

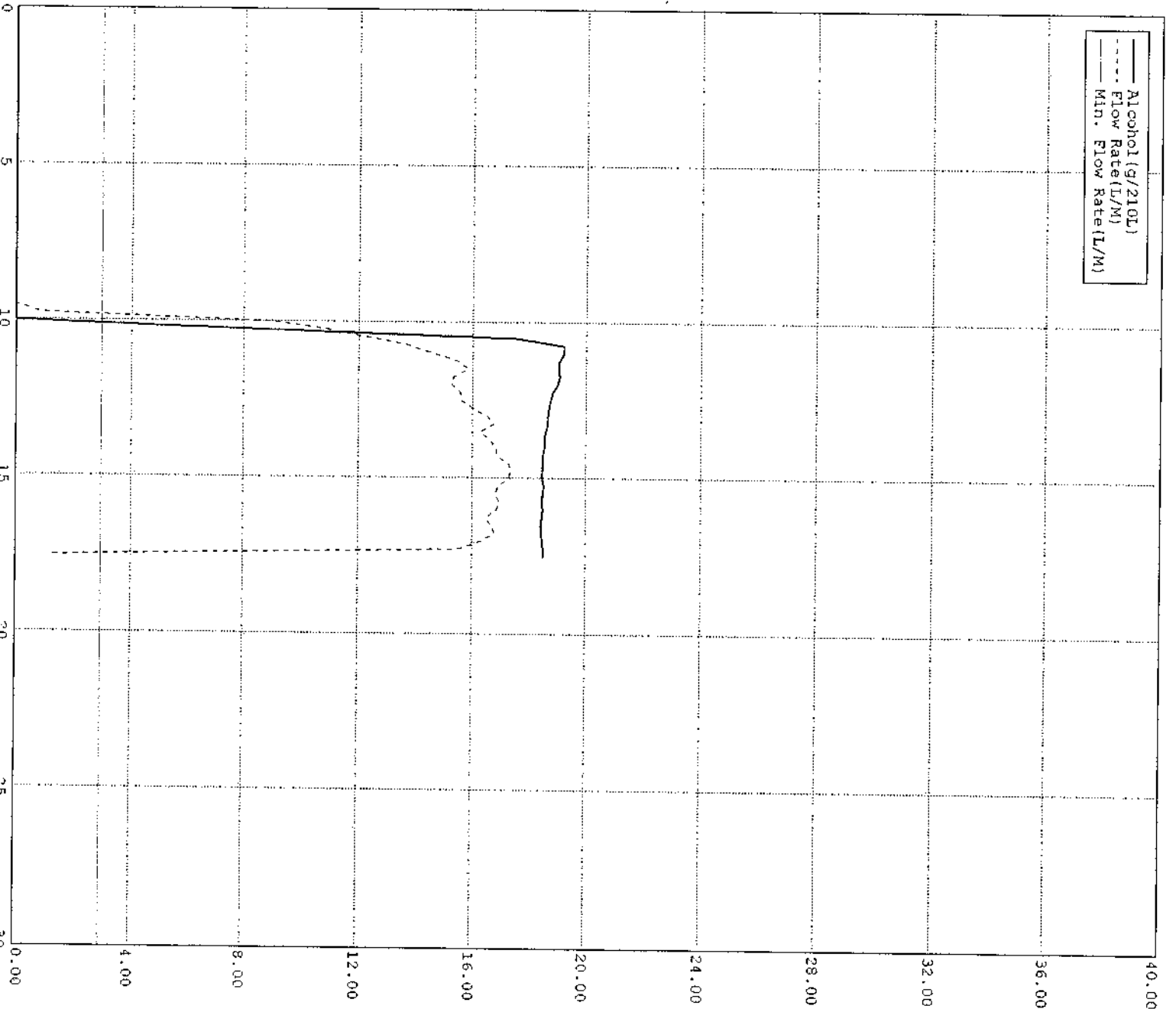
EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.87: 0.080
LOT #: 11313080A1
EXPIRATION: 06/01/2015

DIAGNOSTIC CHECK	PASSED	10:40
INTERNAL STANDARD	0.000	10:40
INTERNAL STANDARD	VERIFIED	10:41
Xq = 0.091 (1.16%)		
EXTERNAL STANDARD	0.079	10:41
X[1] = 0.0791 (-0.0008)	(0.0017)	
BLANK TEST	0.000	10:42
SUBJECT SAMPLE (Vol=1.97L)	0.093	10:42
X[1] = 0.0933 (-0.0013)	(0.0004)	
BLANK TEST	0.000	10:43
EXTERNAL STANDARD	0.079	10:43
X[1] = 0.0790 (-0.0011)	(0.0022)	
BLANK TEST	0.000	10:44

Filter 2 Average = -0.0010

Filter 3 Average = 0.0017

CTF 2/19/15



SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dat: 100381

Date: 02/19/2015
Time: 12:05:27

SUBJECT NAME:
TEST TEST
LICENSE #: XXXX

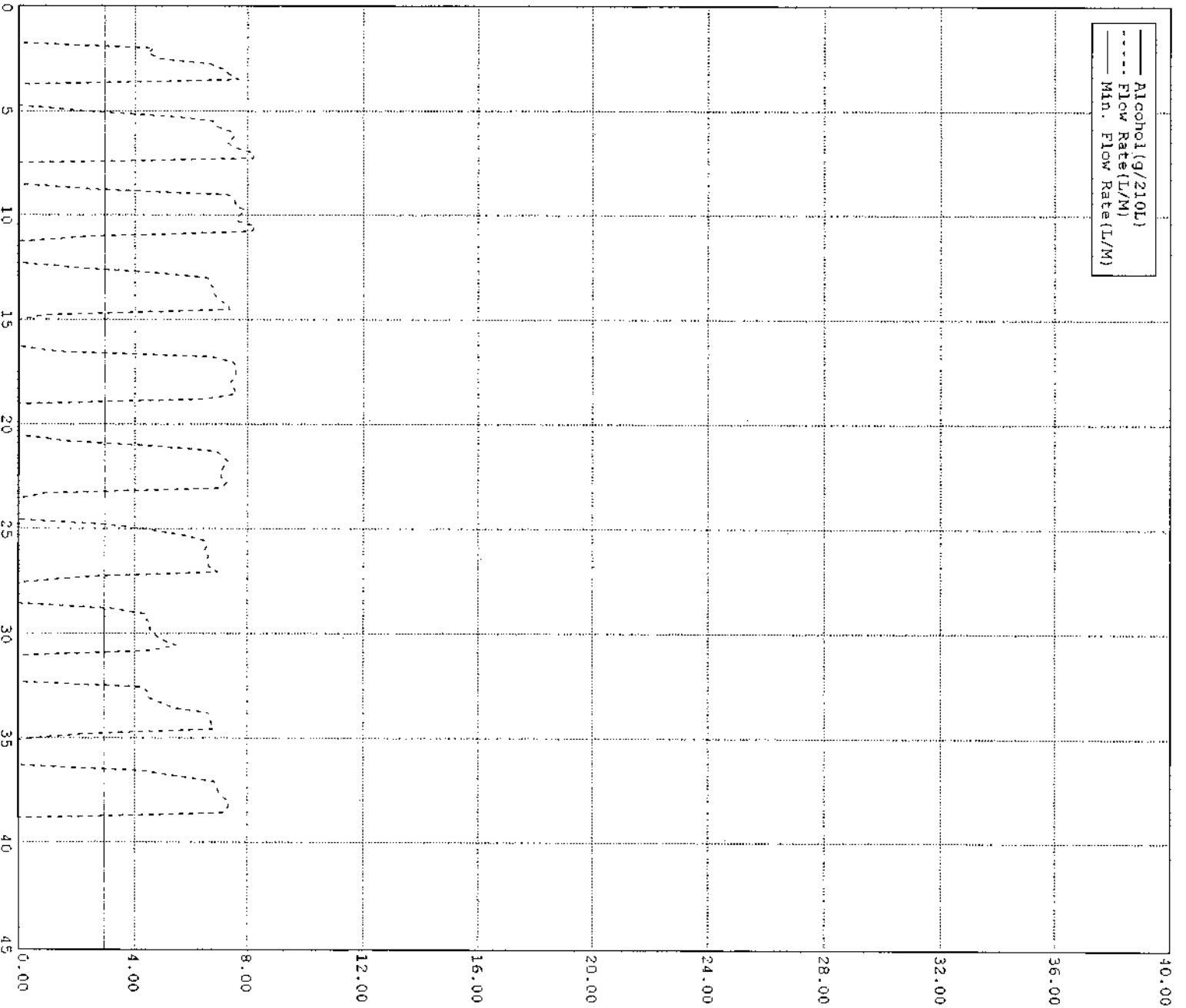
OPERATOR NAME:
EXCEEDED ATTEMPTS
OPERATOR'S #: XXXX

DEPT/AGENCY:
XXXX
CASE/REPORT: XXXX
TEST TYPE: TEST

EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.89: 0.080
LOT #: 11313080A1
EXPIRATION: 06/01/2015

DIAGNOSTIC CHECK	PASSED	12:06
BLANK TEST	0.000	12:06
INTERNAL STANDARD	VERIFIED	12:06
EXTERNAL STANDARD	0.080	12:06
BLANK TEST	0.000	12:07
SUBJECT SAMPLE	XXX	12:08

Maximum Attempts Exceeded



SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dmt: 100381

Date: 02/19/2015
Time: 12:10:30

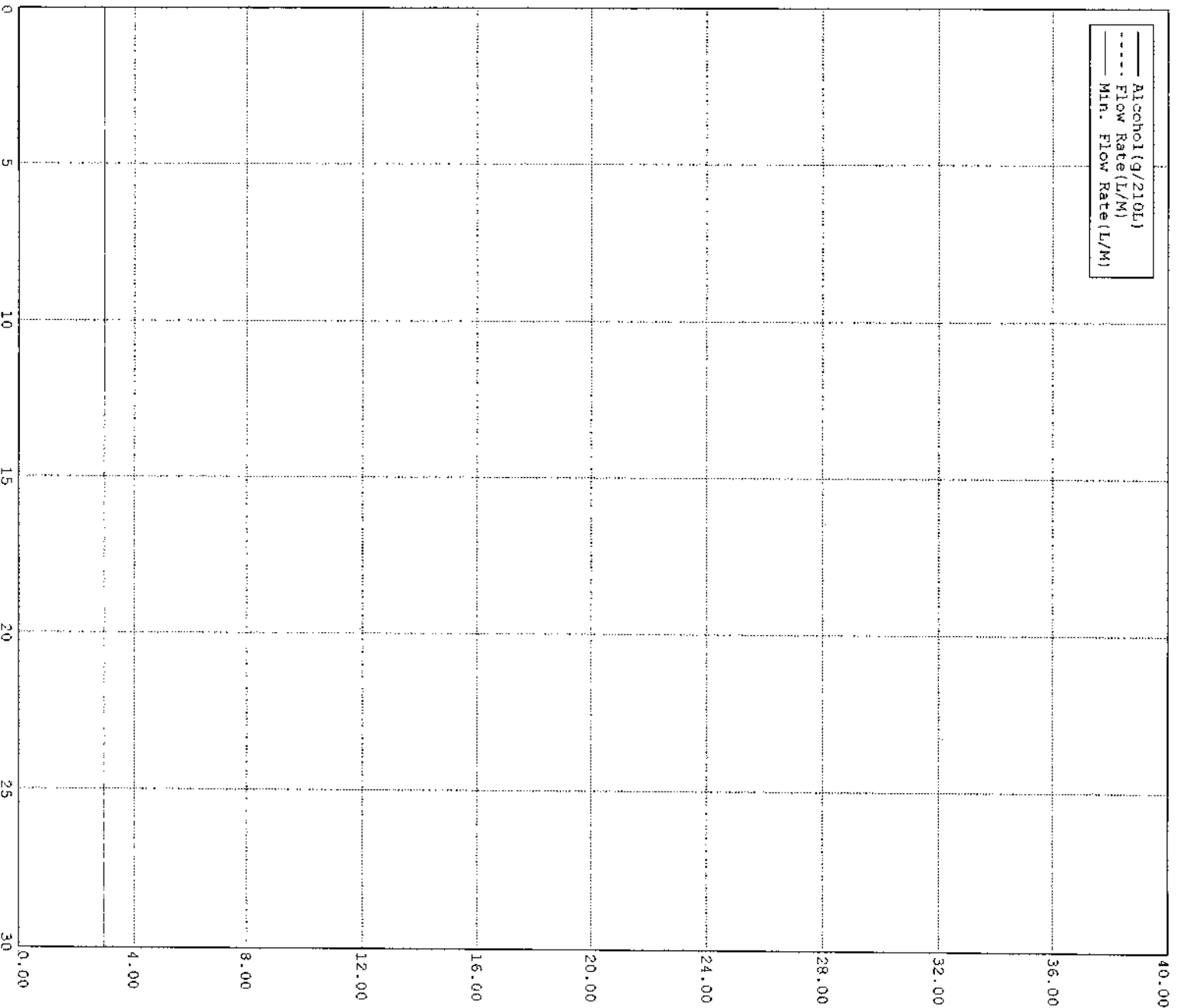
SUBJECT NAME:
TEST TEST
LICENSE #: XXXX

OPERATOR NAME:
RFI XXXX
OPERATOR'S #: XXXX

DEPT/AGENCY:
XXXX
CASE/REPORT: XXXX
TEST TYPE: TEST

EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.89: 0.080
LOT #: 11313080A1
EXPIRATION: 06/01/2015

DIAGNOSTIC CHECK
BIANK TEST PASSED 12:11
INTERNAL STANDARD VERIFIED 12:11
EXTERNAL STANDARD 0.079 12:12
BIANK TEST 0.006 12:13
RFI DETECTED



SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dmt: 100381

Date: 02/19/2015
Time: 12:31:40

SUBJECT NAME:
TEST TEST
LICENSE #: XXXX

OPERATOR NAME:
CHARLES FOSTER
OPERATOR'S #: 7734

DEPT/AGENCY:
XXXX
CASE/REPORT: XXXX
TEST TYPE: TEST

EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.89: 0.080
LOT #: 11313080A1
EXPIRATION: 06/01/2015

DIAGNOSTIC CHECK	PASSED	12:32
BLANK TEST	0.000	12:32
INTERNAL STANDARD	VERIFIED	12:32
EXTERNAL STANDARD	0.079	12:33
BLANK TEST	0.000	12:34
SUBJECT SAMPLE (Vol=1.98L)	0.000	12:34
BLANK TEST	0.000	12:35
EXTERNAL STANDARD	0.080	12:35
BLANK TEST	0.000	12:36

