

Alaska Scientific Crime Detection Laboratory

DataMaster Calibration Form

Effective: 1/23/2024

Version: 4.0

Instrument #: 100255 Analyst or Technician Name: Carlie Glaister

DataMaster DMT Calibration Start Date: 2/23/24

Diagnostic Test

- Perform Diagnostic Test (View Details)
- Internal Standard Value \leq 3.00%

Technician Screen and Calibration Factors

- Adjust Voltages (if needed)
 - Lamp (2.60 V Maximum)
 - Bias
 - Cooler (2.00 V Maximum)
 - Chopper Frequency
 - Detector Voltage (-0.100V to 0.100V)
- Set RFI Sensitivity
- Adjust internal barometer reading to match NIST-traceable barometer
Barometer/Thermometer/Hygrometer S/N: 230307229
Calibration Due Date: 5/2/25
- Verify Volume Setting (1.50 L +/- 0.10 L), adjust if needed
- Print Technician Screen
- Print "Cal Factors"

Minimum Volume Test

- Perform Minimum Volume (Subject) Test: 1.5 liters (1.3 L to 1.7 L)

As Left Linearity Testing

Barometric Pressure (in Hg) 29.22 Temperature(C) 23.6 Relative Humidity(%) 19

Approved Concentrations (g/210L): 0.020, 0.040, 0.080, 0.100, 0.150, 0.300

Functional Tests

- Incomplete
- Invalid
- Interference (Volatiles) - *Print with View Details*
- Maximum Attempts Exceeded
- Radio Frequency Interference (RFI)

1. Acetone Reagent Lot Number: _____ Expiration Date: _____
Simulator S/N: _____ Thermometer Verification Performed?
2. Isopropanol Reagent Lot Number: _____ Expiration Date: _____
Simulator S/N: _____ Thermometer Verification Performed?
3. Negative (Ethanol Only) Lot Number: _____ Expiration Date: _____
Simulator S/N: _____ Thermometer Verification Performed?

Calibrated External Thermometer S/N: _____
Calibration Due Date: _____

Administrative

- Verify Stylus Calibration
- Reset Options
- Clear Memory
- Verification of Calibration (VOC)
- Perform Non-Drinking Subject Test
- Upload Instrument
- Remove Dry Gas Tank Before Shutdown
- Add Ready for Tech Review Note

Completion

Lab Work End Date: 2/23/24

Data Interpretation Date (Technician): _____ (if applicable)

Data Interpretation Date (Analyst): 2/23/24

All printed copies are uncontrolled.

Approved by: Chemistry Supervisor

DIAGNOSTIC RECORD

Alaska Department of Public Safety
DATAMASTER dmt: 100255

Date: 02/23/2024
Time: 09:43:13

VERSIONS
DMT: 3.02
PIC: 2.05
Modem: 2.6
Questions: 2.2

TEMPERATURES

Sample Chamber = 48.9°C PASSED
(44.0°C - 52.0°C)
Breath Tube = 45.8°C PASSED
(38.0°C - 50.0°C)

SETTINGS

Lamp Voltage = 1.58 V PASSED
(0.95 V - 2.21 V)
Cooler Voltage = 1.69 V PASSED
(1.01 V - 2.37 V)
Bias Voltage = 80 V PASSED
(48 V - 112 V)
Chopper Freq = 526 Hz PASSED
(475 Hz - 575 Hz)
Barometer = 29.6 in

PUMP INFO

Flow Rate = 4.787 L/M PASSED
(3.500 L/M - 6.500 L/M)

DETECTOR INFO

PUMP ON PASSED
(0.002 V <= 0.010 V)
PUMP OFF PASSED
(0.002 V <= 0.010 V)

FILTER INFO

Filter 1 PASSED
Filter 2 PASSED
Filter 3 PASSED

INTERNAL STANDARD

Xq = 0.076 0.23% (0.00% - 4.00%) PASSED

Calibration Rejected

Technician Screen

DATAMASTER dmt: 100255

Date: 02/23/2024
Time: 10:07 AM

Temperatures (°C)

Sample Cell: 50.3°C
Breath Tube: 45.4°C

Current Barometer 29.1 in
Volume (Ltr) 1.47

Settings

Lamp: 1.58 V
Bias: 80 V
Cooler: 1.74 V
Chopper: 526 Hz

Voltages (V)

Flow: 1.04 V
Detector: -0.073 V

Calibration Rejected

CALIBRATION FACTORS

Alaska Department of Public Safety
DATAMASTER dmt: 100255

Date: 01/11/2024
Time: 13:08:11

OPERATOR NAME:
CARLIE GLAISTER
CERTIFICATE #: 10436

Ca = 0.1000
CAL = 0.968015 0.800 <= CAL < 1.200
b1 = 0.0016 0.0000 <= b1 < 0.0040
b2 = 0.0080 0.0010 <= b2 < 0.0100
b3 = 0.0013 0.0000 <= b3 < 0.0040
Xq = 0.0763 0.0500 <= Xq < 0.2000
a21 = 1.216854 1.050 <= a21 < 1.300
a31 = 0.431723 0.300 <= a31 < 0.800

Calibration Rejected

SUBJECT TEST

Alaska Department of Public Safety
DATAMASTER dmt: 100255

Date: 02/23/2024
Time: 10:24:29

SUBJECT NAME:
TEST TEST
LICENSE #: XXX

OPERATOR NAME:
CARLIE GLAISTER
OPERATOR'S #: 10436

DEPT/AGENCY:
MINIMUM VOLUME TEST
CASE/REPORT: XXX
TEST TYPE: TEST

EXTERNAL STANDARD INFORMATION
NOMINAL: 0.080
TARGET AT 29.16: 0.078
LOT #: AG310901
EXPIRATION: 04/19/2025

DIAGNOSTIC CHECK	PASSED	10:25
BLANK TEST	0.000	10:25
INTERNAL STANDARD	VERIFIED	10:25
EXTERNAL STANDARD	0.077	10:25
BLANK TEST	0.000	10:26
SUBJECT SAMPLE (Vol=1.53L)	0.000	10:27
BLANK TEST	0.000	10:28
EXTERNAL STANDARD	0.077	10:28
BLANK TEST	0.000	10:29

Handwritten signature

