



NORTH CAROLINA

DEPARTMENT
OF
JUSTICE



1937

STATE BUREAU OF INVESTIGATION



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Appendix C



Calibration/Monitoring Logs



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200__	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept	Oct.	Nov.	Dec
30												
31												

forms/qc/tempchrt.wpd

Balance Check Weight Log

Balance: _____ Number: _____ Location: _____ Year: _____

Month: January Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: February Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: March Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: April Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: May Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: June Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: July Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: August Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: September Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: October Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: November Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

Month: December Analyst: _____

Weight	1 mg	5 mg	10mg	25mg	50mg	100mg	500mg	1g	5g	10g	25g	50g	100g	150g	200g
Reading															

forms/qc/balance.wpd

Temperature Monitoring

The working temperatures of all incubators, water baths, refrigerators, freezers, and heat blocks will be checked either before each use or daily, depending on the application, with a lab or integral digital thermometer. The temperature will be recorded on the Temperature Quality Control Record, and these forms will be maintained by the QC Officer in the Unit.

When necessary, lab and integral thermometers will be calibrated at the working temperature against a National Institute of Standards and Technology certified thermometer.

Example Given:

For calibrating a thermometer used in a 56°C water bath (with internal digital thermometer):

1. Place both the certified thermometer in the water bath.
2. Adjust the temperature of the water bath until the certified thermometer reads 56°C
3. Document the temperature readout of the digital water bath thermometer. Note any discrepancies on the "Temperature Quality Control Record".
4. If the lab thermometer has a significant difference ($\pm 0.5^\circ \text{C}$) in temperature with the certified thermometer, the unit must be repaired.

Temperature Verification for the Perkin Elmer Thermocyclers

Use the manufacturer's instructions for each of the different Perkin Elmer thermocyclers in the laboratory.

MOLECULAR GENETICS SECTION

Thermocycler Verification Log

Heater Test (Circle One): PassedFailed

Chiller Test (Circle One): PassedFailed

Temperature Calibration Verification Test

T(45): _____ 45°C - T(45) - .0°C T=_____OK NOT OK

T(85): _____ 85°C - T(85) - .1°C T=_____OK NOT OK

Temperature Non-Uniformity Test:

A1	A2	A3	A4	A5	A6	A7	A8	A9	A10	A11	A12
B1	B2	B3	B4	B5	B6	B7	B8	B9	B10	B11	B12
C1	C2	C3	C4	C5	C6	C7	C8	C9	C10	C11	C12
D1	D2	D3	D4	D5	D6	D7	D8	D9	D10	D11	D12
E1	E2	E3	E4	E5	E6	E7	E8	E9	E10	E11	E12
F1	F2	F3	F4	F5	F6	F7	F8	F9	F10	F11	F12
G1	G2	G3	G4	G5	G6	G7	G8	G9	G10	G11	G12
H1	H2	H3	H4	H5	H6	H7	H8	H9	H10	H11	H12

High T(94)- Low T(94)

High T(37)- Low T(37)

OK NOT OK

OK NOT OK

9700 Thermocycler: 1 2 3

Analyst: _____ Date: _____

Temperature Verification Unit Used (Unit/SN): _____

Calibration Due: _____

MOLECULAR GENETICS SECTION



Thermocycler Verification Log

Heater Test (Circle One): PassedFailed

Chiller Test (Circle One): PassedFailed

Temperature Calibration Varification Test:

T(92): _____ 92°C - T(92) T=_____ OK NOT OK

T(56): _____ 56°C - T(56) T=_____ OK NOT OK

T(20): _____ 20°C - T(20) T=_____ OK NOT OK

Temperature Verification Uniformity Test:

A1	A2	A3	A4	A5	A6	A7	A8
B1	B2	B3	B4	B5	B6	B7	B8
C1	C2	C3	C4	C5	C6	C7	C8

High T(95)- Low T(95)

High T(40)- Low T(40)

OK NOT OK

OK NOT OK

Analyst: _____

Date: _____

PE 2400 Thermocycler:

Temperature Verification Unit Used (Unit/SN): _____

Calibration Due: _____

MOLECULAR GENETICS SECTION



Thermocycler Verification Log

Temperature Calibration Verification Test:

T(40): _____ 40°C - T(40) - .0°C T=_____ OK NOT OK

T(95): _____ 95°C - T(95) - .1°C T=_____ OK NOT OK

Temperature Non-Uniformity Test:

A1	A2	A3	A4	A5	A6	A7	A8	A9	A10	A11	A12
B1	B2	B3	B4	B5	B6	B7	B8	B9	B10	B11	B12
C1	C2	C3	C4	C5	C6	C7	C8	C9	C10	C11	C12
D1	D2	D3	D4	D5	D6	D7	D8	D9	D10	D11	D12
E1	E2	E3	E4	E5	E6	E7	E8	E9	E10	E11	E12
F1	F2	F3	F4	F5	F6	F7	F8	F9	F10	F11	F12
G1	G2	G3	G4	G5	G6	G7	G8	G9	G10	G11	G12
H1	H2	H3	H4	H5	H6	H7	H8	H9	H10	H11	H12

High T(95)- Low T(95)

High T(40)- Low T(40)

OK NOT OK

OK NOT OK

9600 Thermocycler: 1 2 3

Analyst: _____ Date: _____

Temperature Verification Unit Used (Unit/SN): _____

Calibration Due: _____

CALIBRATED

ID#:
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