



Wavelength Calibration Data

Built For: University of California Berkeley
 Order Number: 1415292
 Model: USB2000-VIS-NIR
 Description: USB Fiber Optic Spectrometer
 Grating: 600 Lines Blazed at 500 nm
 Bandwidth: 350 - 1000 nm
 Options Installed: ILX511b Detector, OFLV-3 Filter, 25um Slit
 Serial Number: USB2G4461 Master

λ	Pixel #	Predicted λ	$\Delta\lambda$
365.015	68	365.228	-0.213
404.656	173	404.634	0.022
407.781	181	407.617	0.164
435.835	257	435.817	0.018
546.074	561	546.053	0.021
576.959	648	576.822	0.137
579.065	654	578.931	0.134
696.543	997	696.593	-0.050
706.722	1028	706.941	-0.219
727.294	1090	727.489	-0.195
738.398	1123	738.346	0.052
751.465	1163	751.431	0.034
763.510	1200	763.460	0.050
772.421	1228	772.516	-0.095
794.817	1298	794.974	-0.157
811.531	1350	811.490	0.041
826.452	1398	826.606	-0.154
842.465	1449	842.531	-0.066
852.144	1480	852.141	0.003
866.794	1527	866.611	0.183
912.297	1677	911.973	0.324
922.450	1711	922.079	0.371
965.778	1861	965.875	-0.097
978.450	1906	978.759	-0.309

Calibration Coefficients

First Coefficient: 0.380346298
 Second Coefficient: -2.07052E-05
 Third Coefficient: -1.50532E-09
 Intercept: 339.4611458
 Regression Fit: 0.999999575

Stray Light Measurements (AU)

Holmium Oxide (444nm): 1.30
 Yellow Dye: 2.28
 Blue Dye: 3.46
 Molybdate: N/A
 OG550 Filter: 2.52
 RG850 Filter: 3.78
 FG3 Filter: 1.16

Linearity Test

Serial Number **USB2G4461**

Tech: Debra.Jenkins

Intercept 0.922933

Linearity: **99.82492**

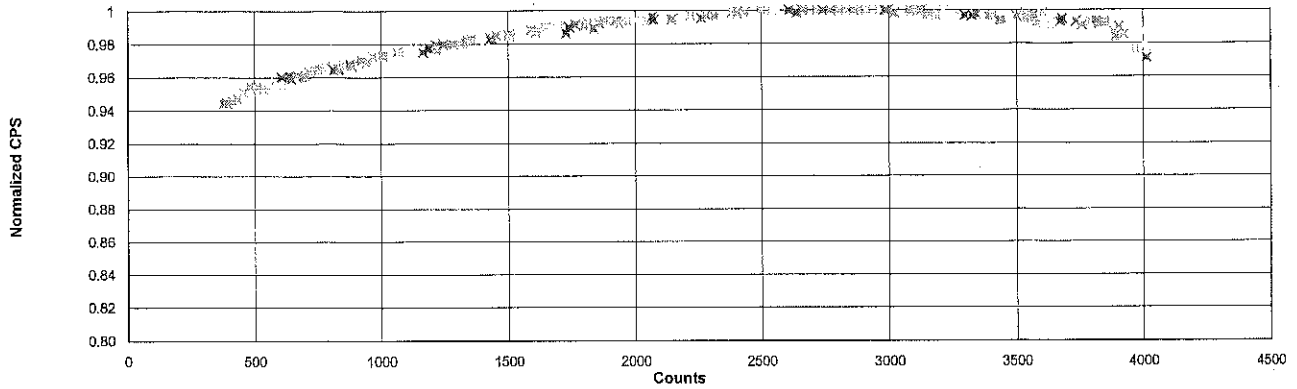
Coefficient 1 5.33866e-005
Coefficient 2 4.87668e-008
Coefficient 3 -1.13226e-010
Coefficient 4 8.89842e-014
Coefficient 5 -3.46819e-017
Coefficient 6 6.65068e-021
Coefficient 7 -5.00411e-025



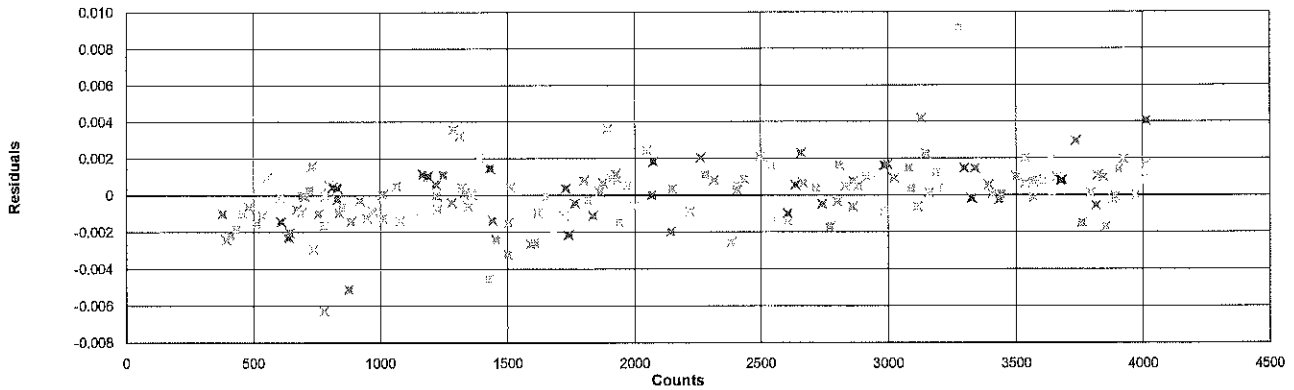
Tested: 10/31/13

Test # 91,517.00

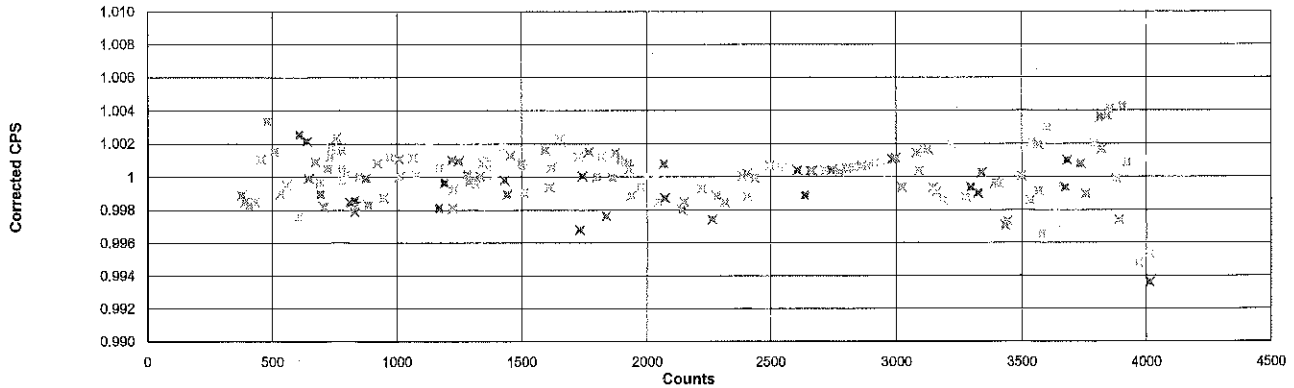
Normalized Output



Residuals



Linearized Output



Max 1.00934732

Min 0.99360377