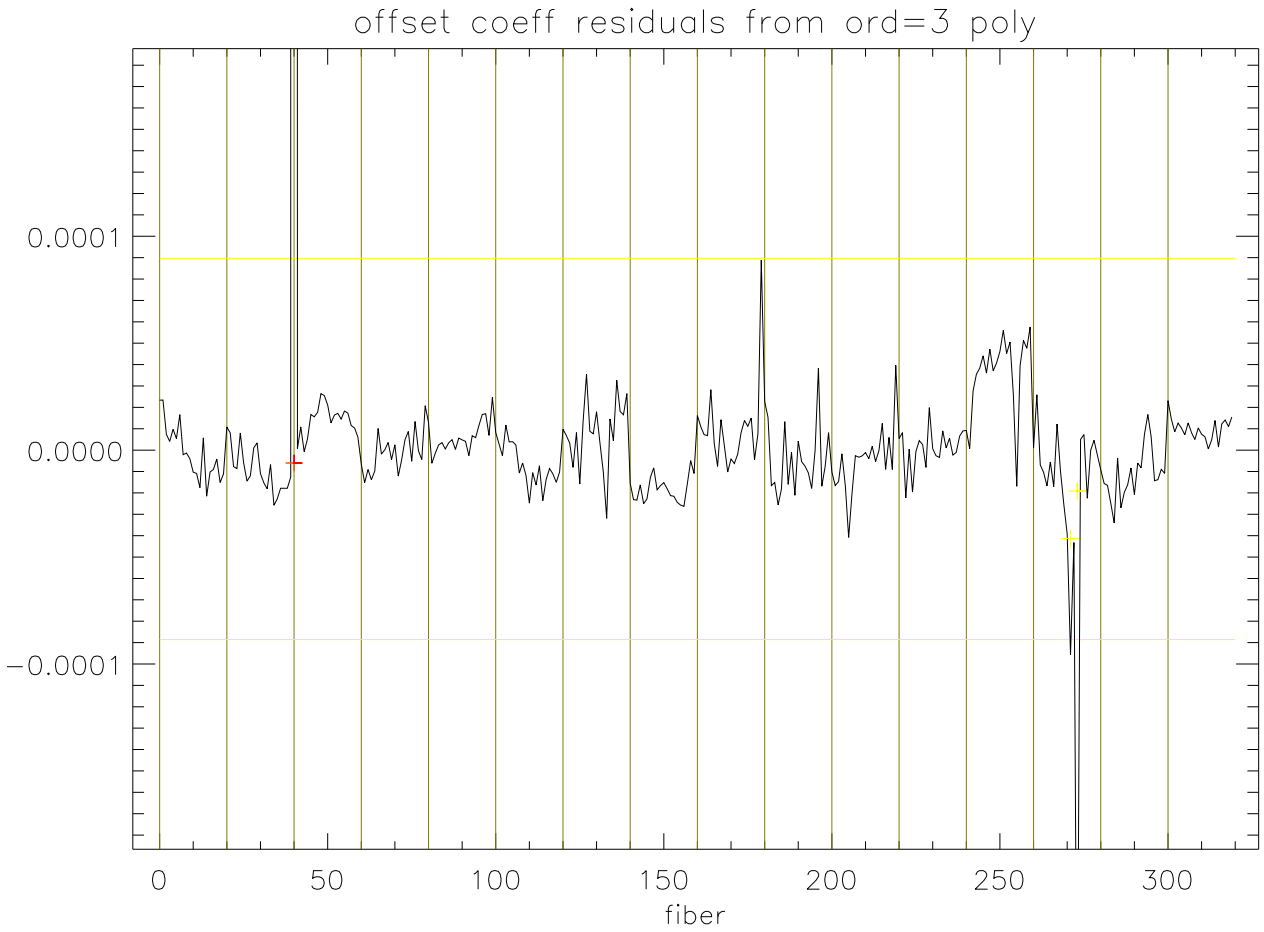
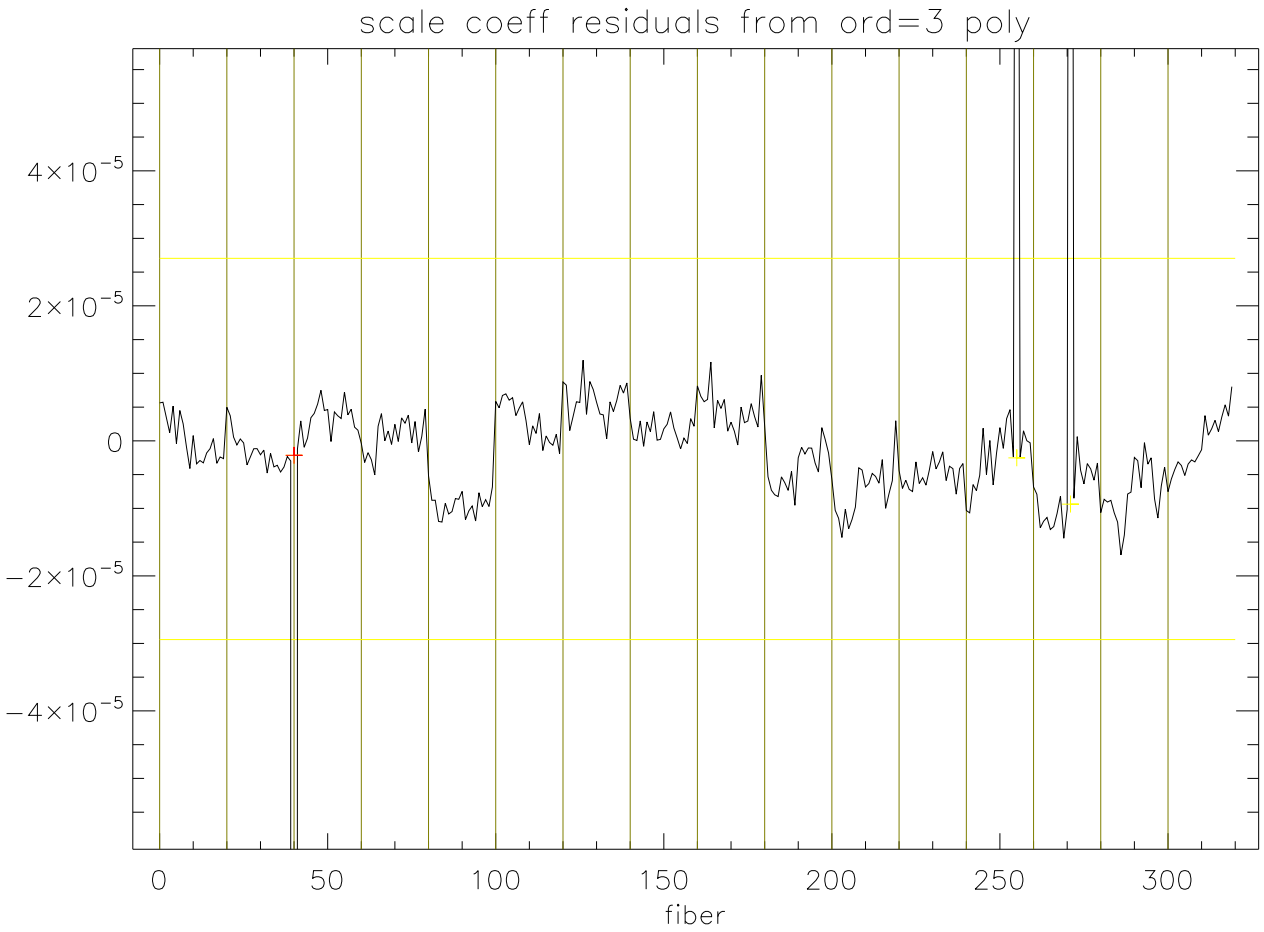
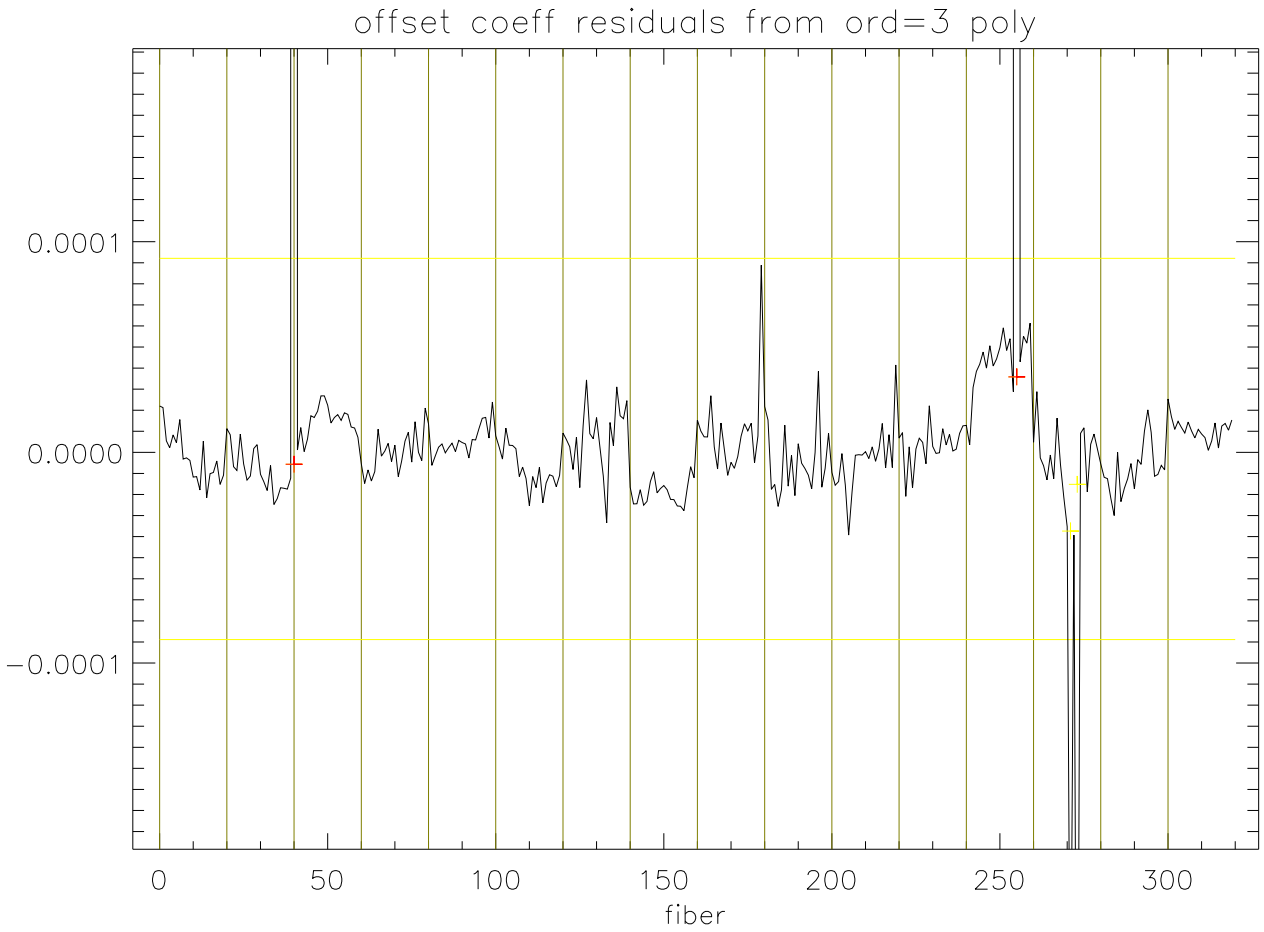
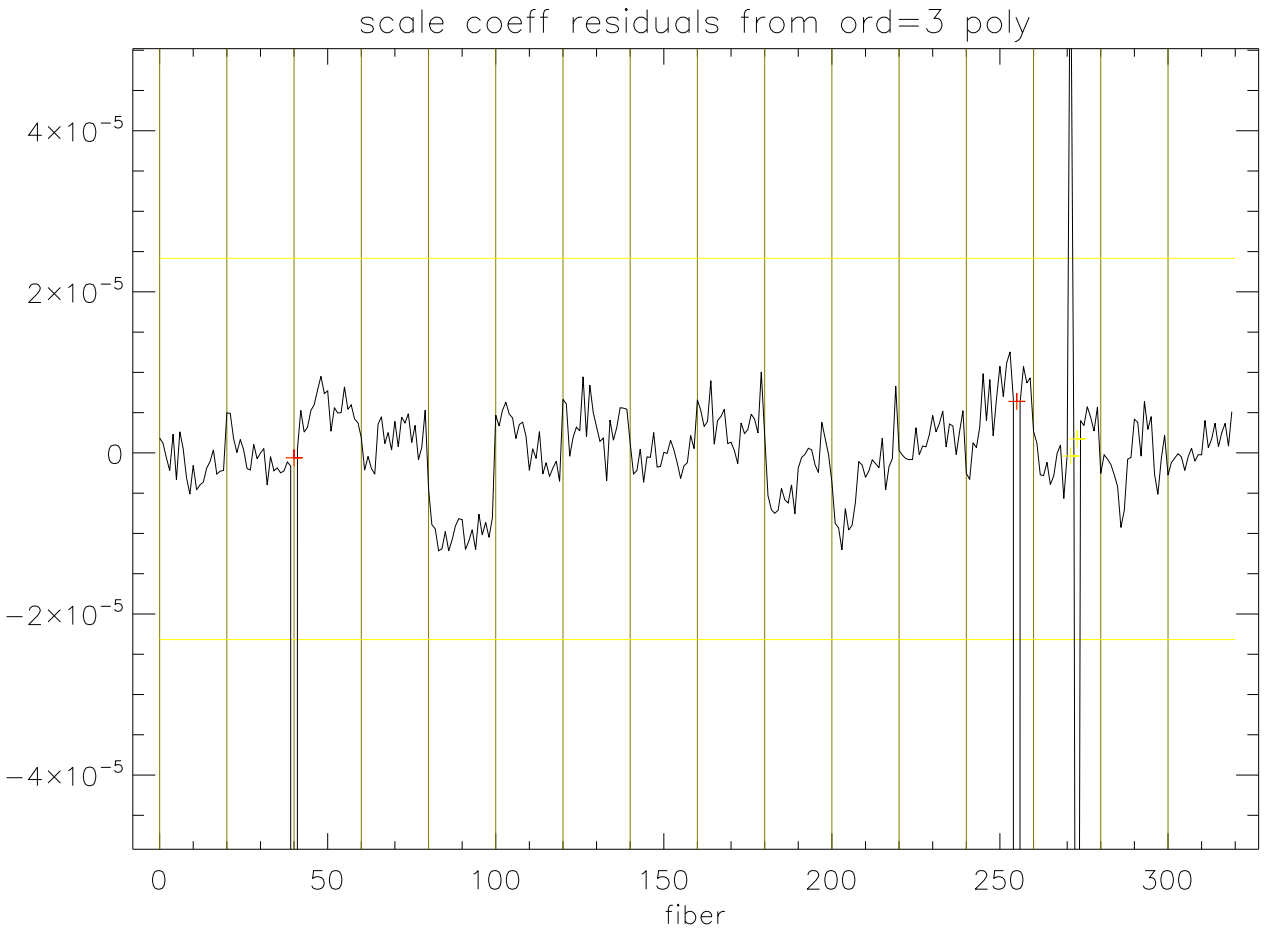
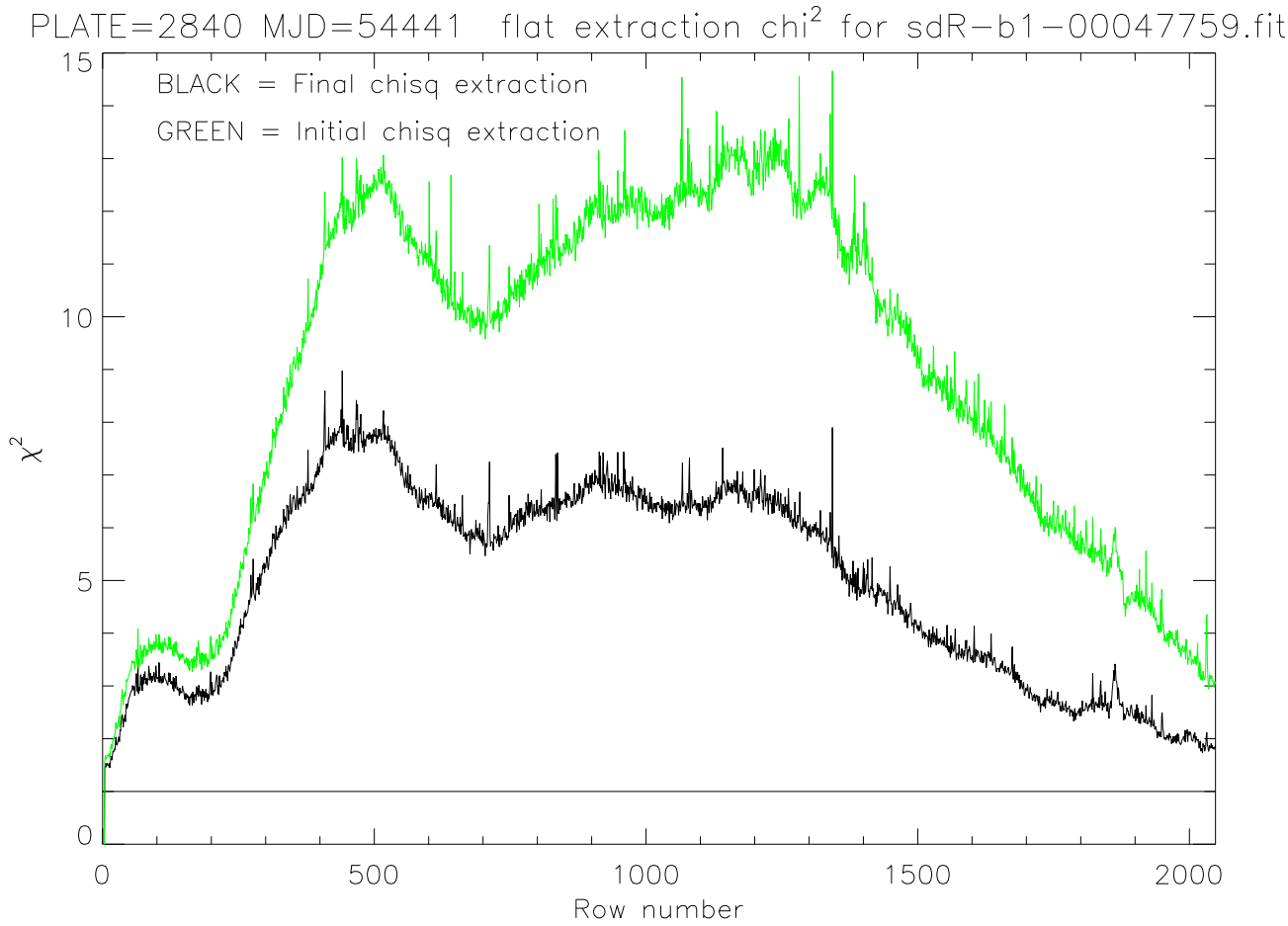
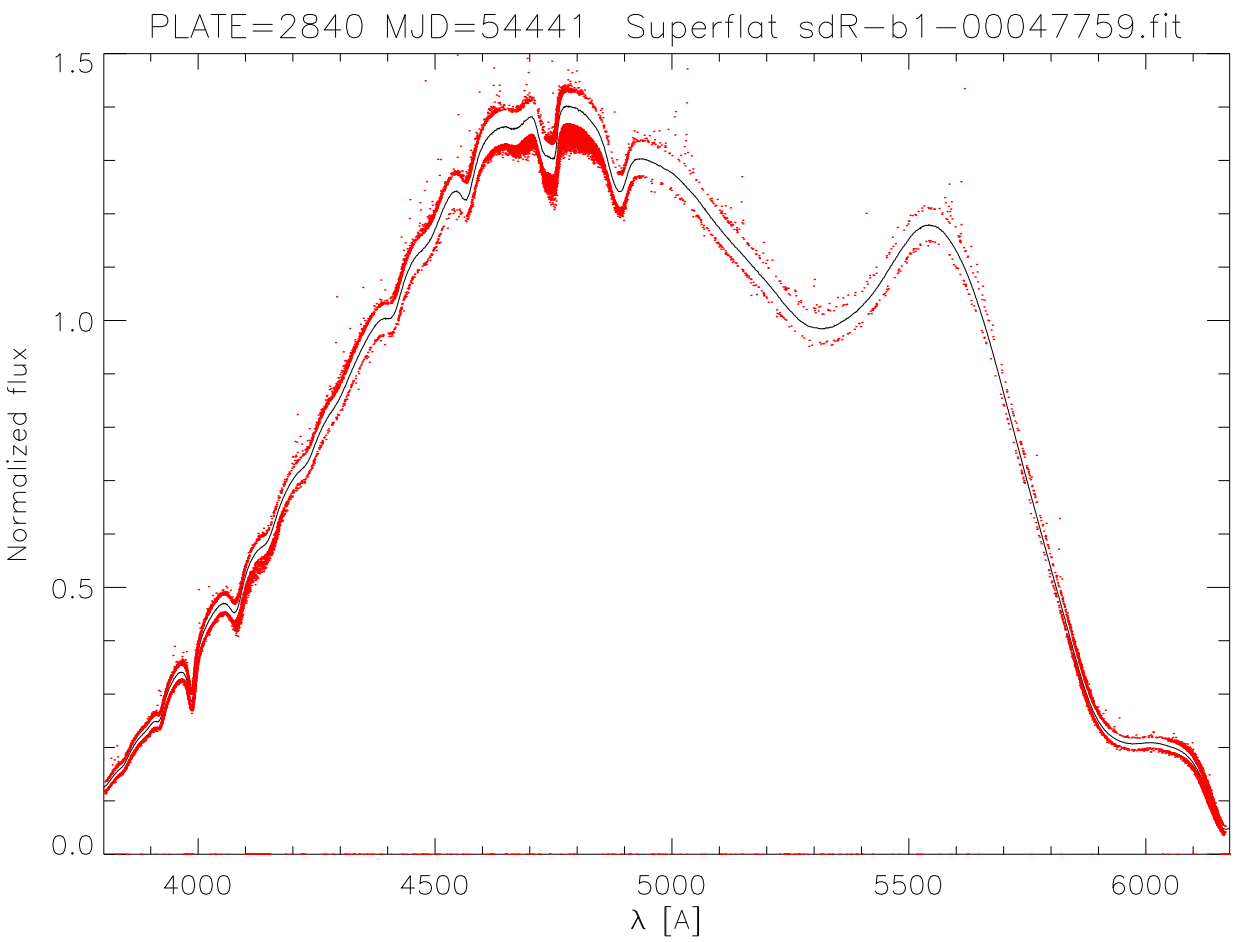

offset coeff residuals from ord=3 poly
0.0001
0.0000
−0.0001
0
50
100
150
200
250
300
fiber

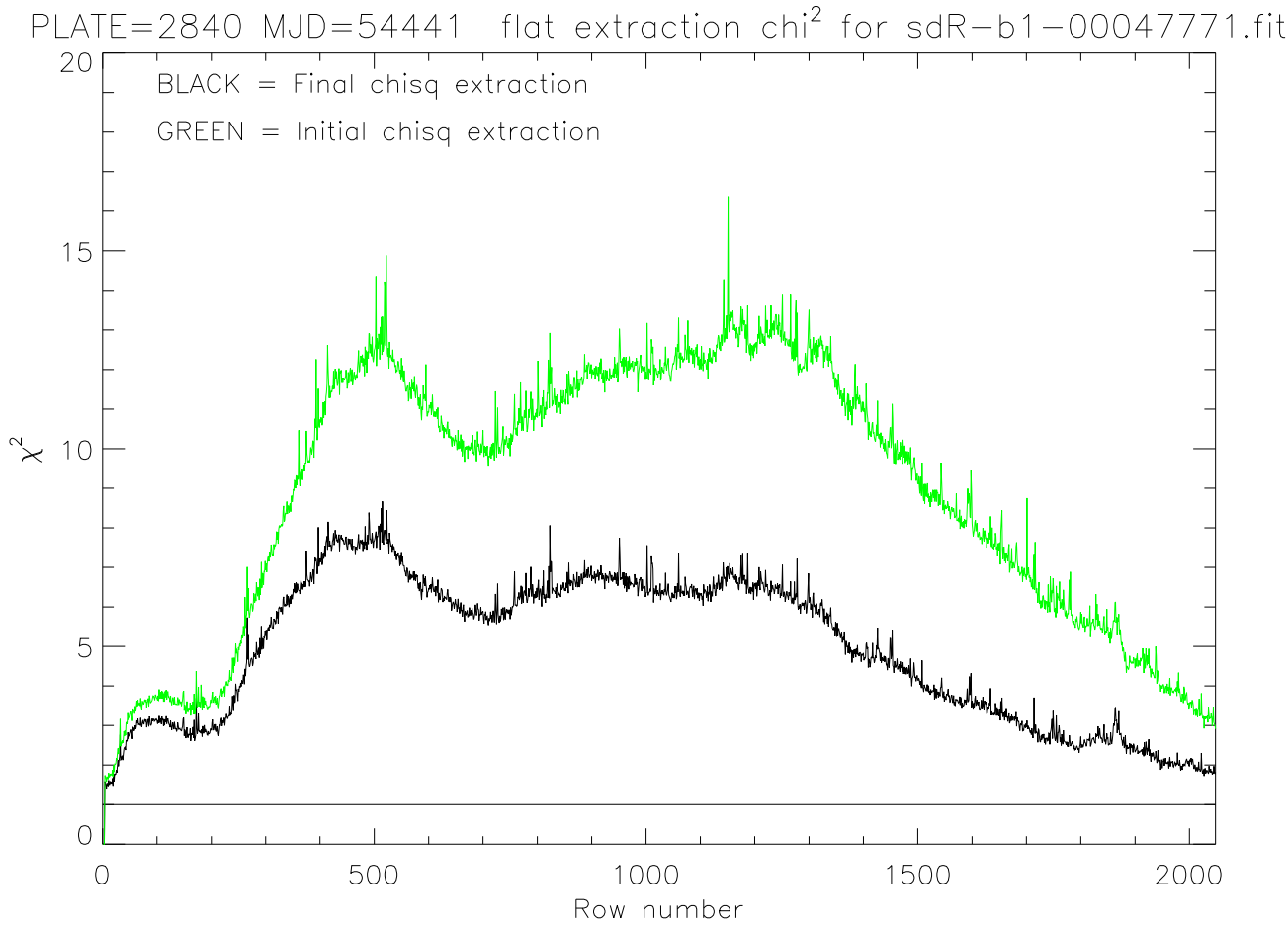

scale coeff residuals from ord=3 poly
4×10⁻⁵
2×10⁻⁵
0
−2×10⁻⁵
−4×10⁻⁵
0
50
100
150
200
250
300
fiber

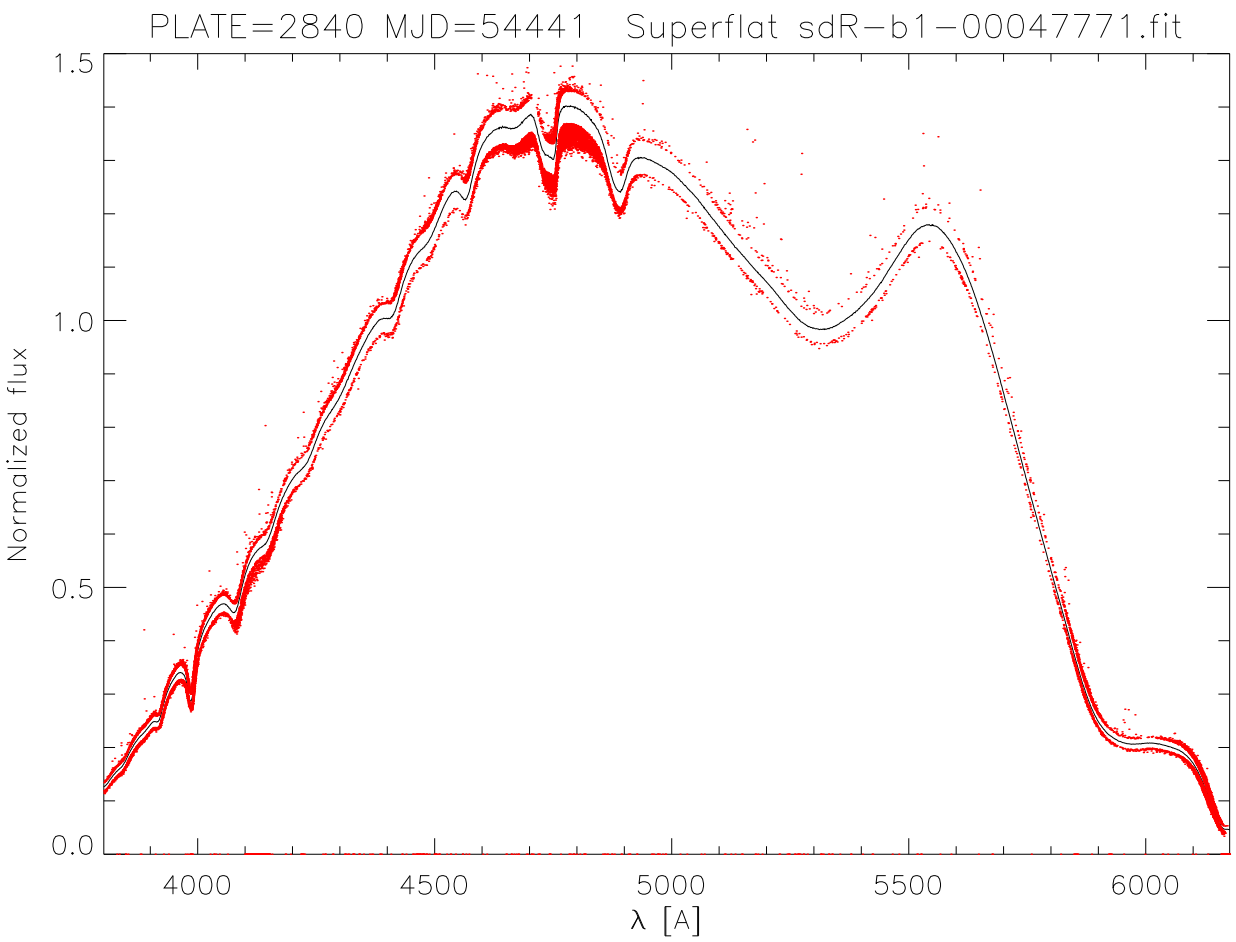

offset coeff residuals from ord=3 poly
0.0001
0.0000
−0.0001
0
50
100
150
200
250
300
fiber

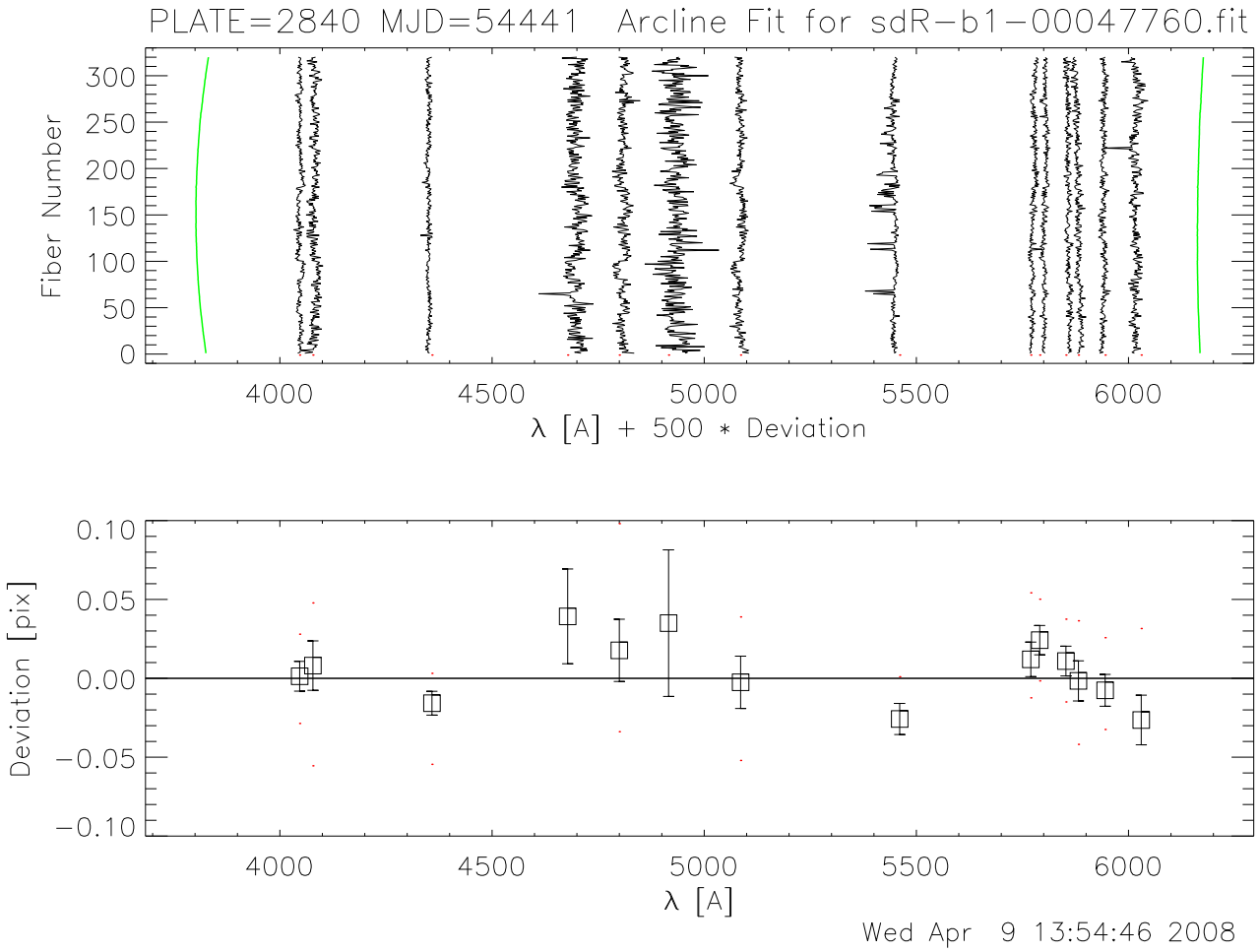

scale coeff residuals from ord=3 poly
4×10⁻⁵
2×10⁻⁵
0
−2×10⁻⁵
−4×10⁻⁵
0
50
100
150
200
250
300
fiber

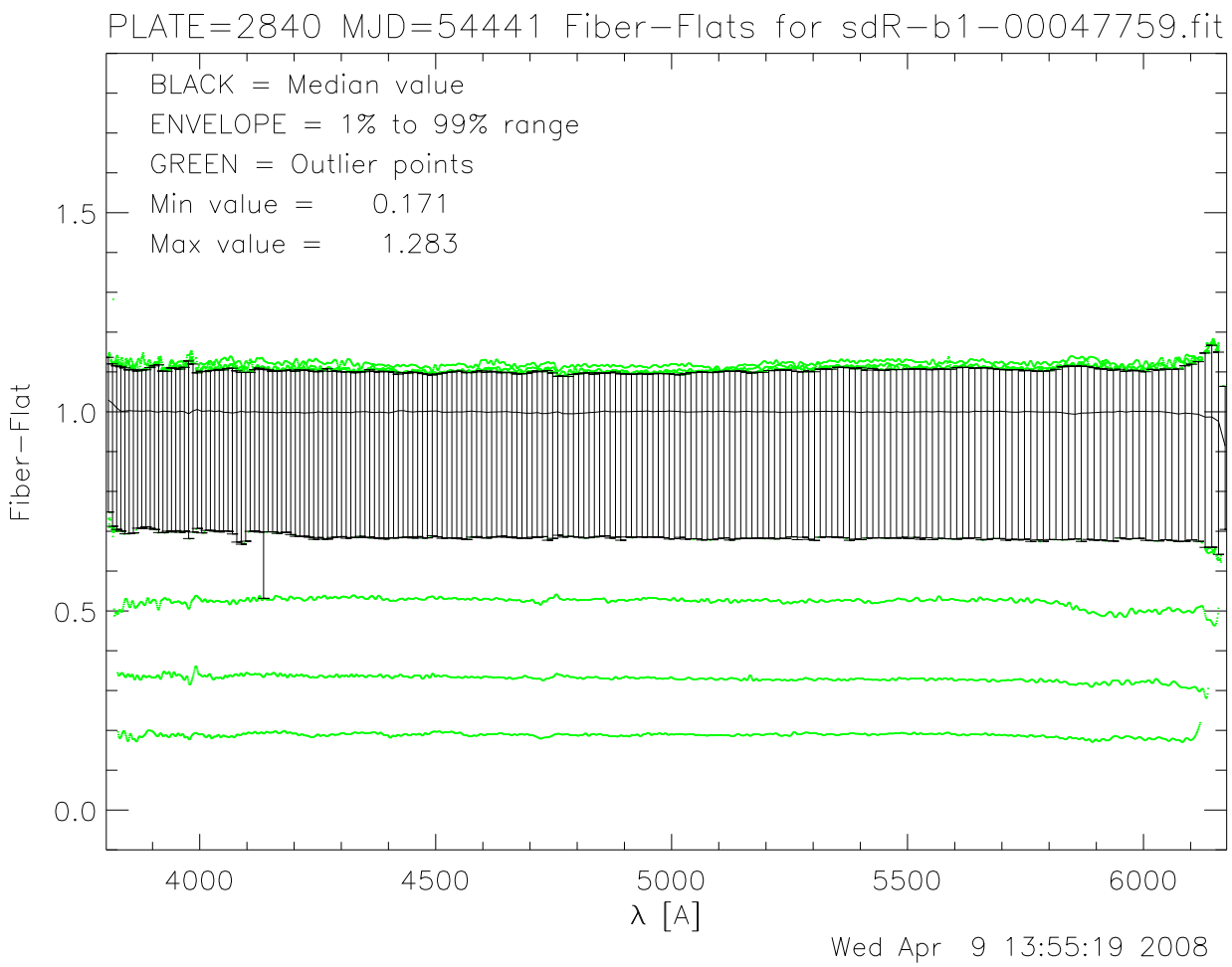

PLATE=2840 MJD=54441 flat extraction chi^2 for sdR-b1-00047759.fit
BLACK = Final chisq extraction
GREEN = Initial chisq extraction
χ^2
Row number
0
5
10
15
0
500
1000
1500
2000

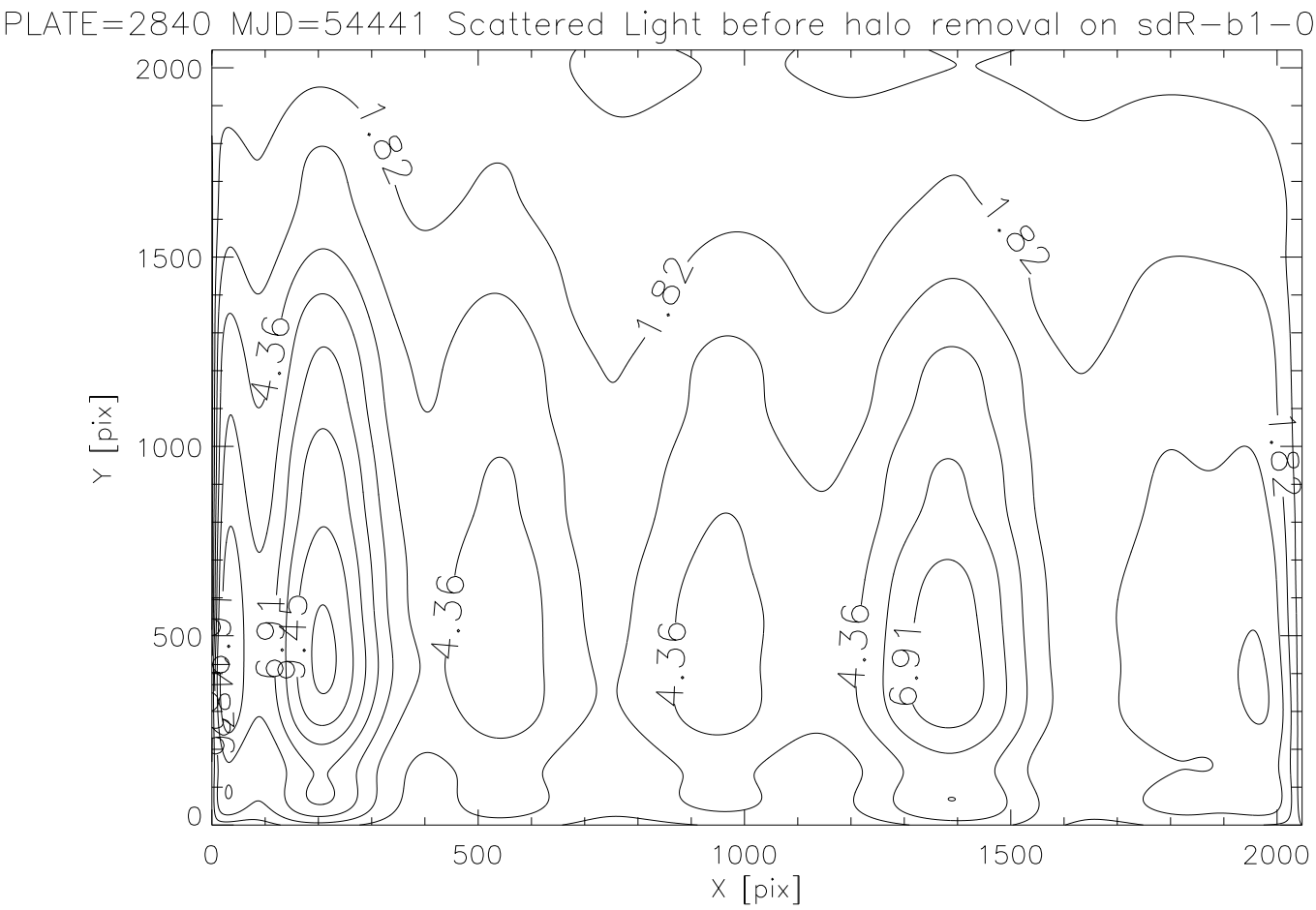

PLATE=2840 MJD=54441 Superflat sdR-b1-00047759.fit
Normalized flux
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]

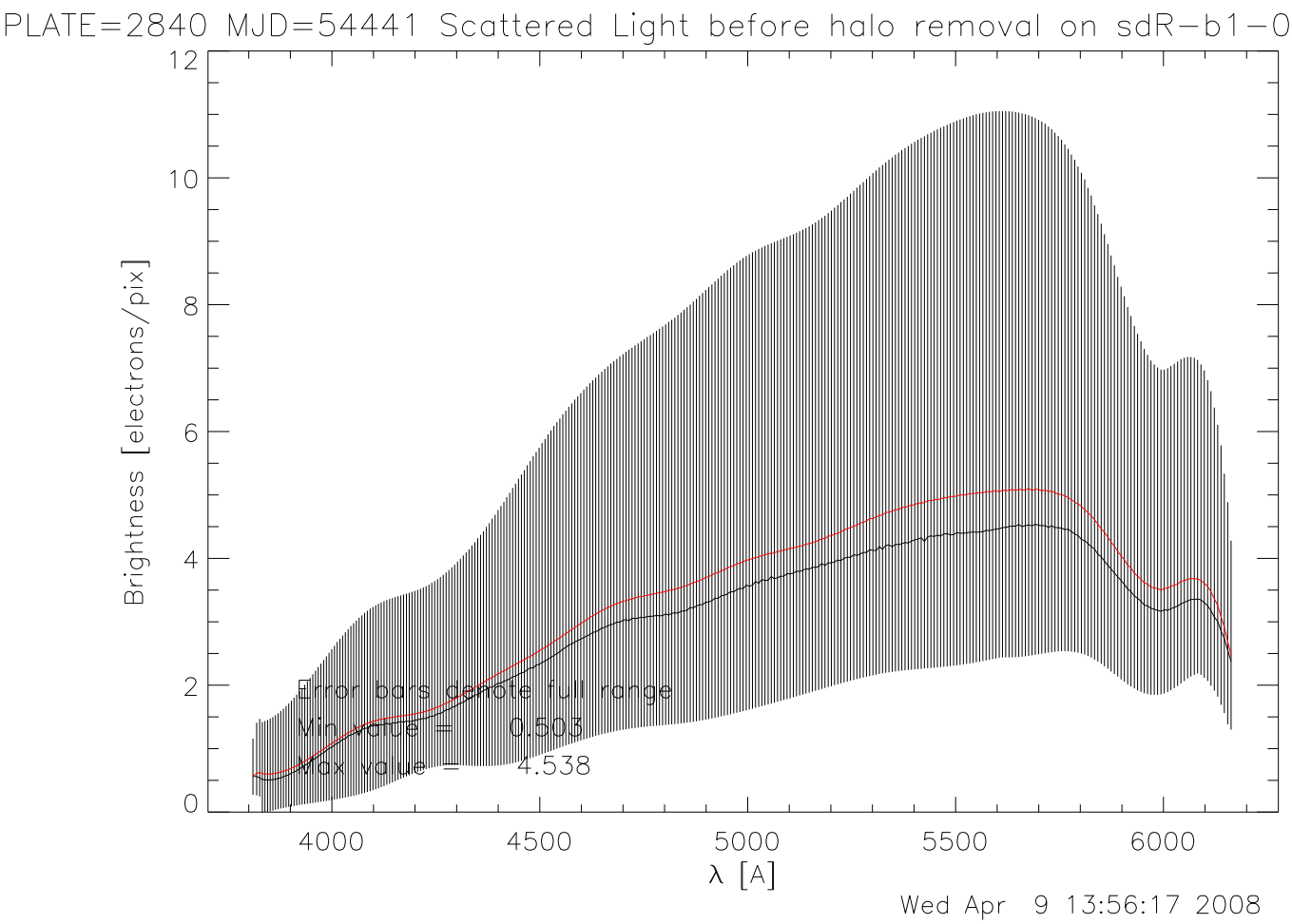

PLATE=2840 MJD=54441 flat extraction chi^2 for sdR-b1-00047771.fit
BLACK = Final chisq extraction
GREEN = Initial chisq extraction
χ^2
Row number
0
5
10
15
20
0
500
1000
1500
2000

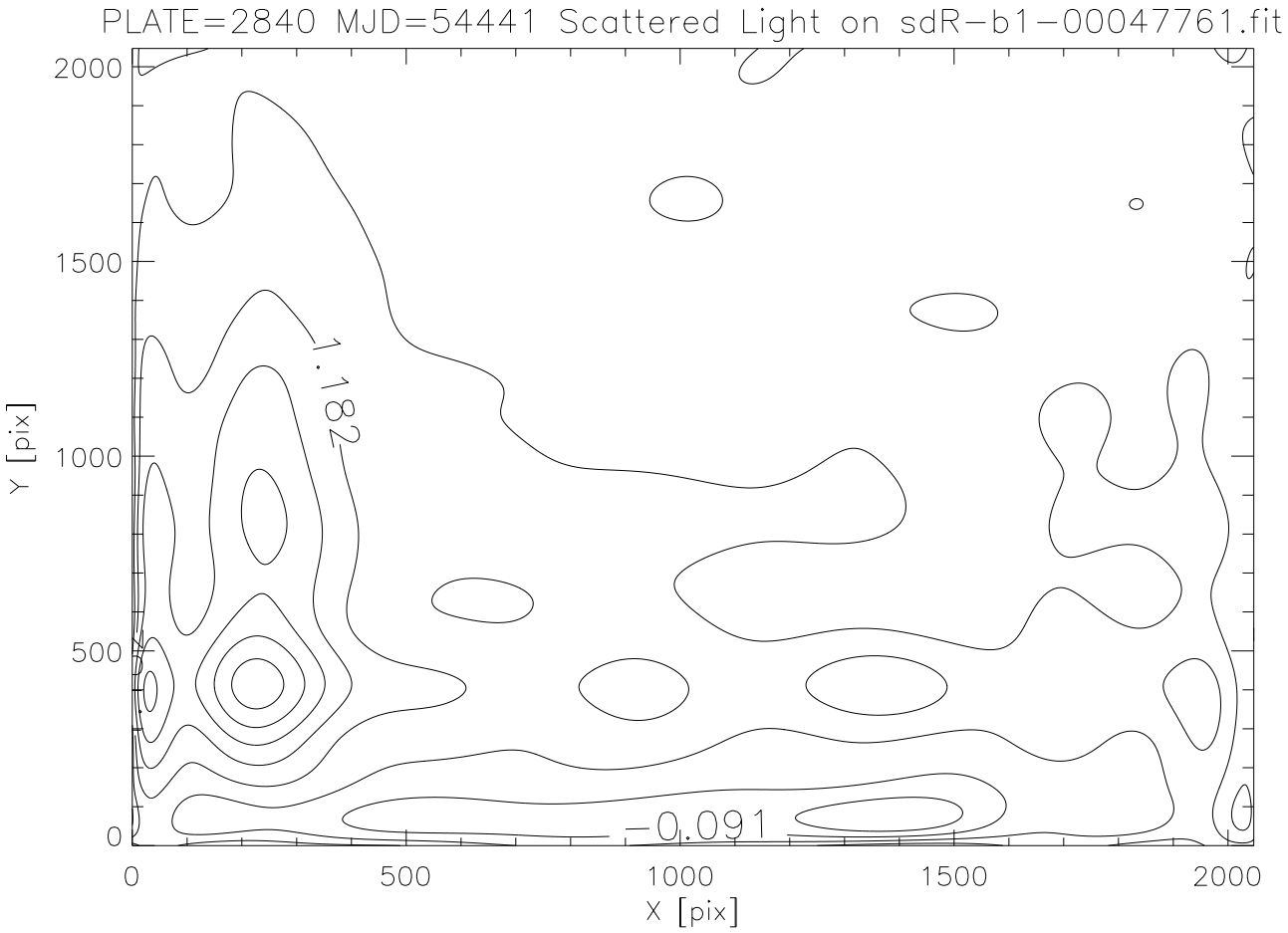

PLATE=2840 MJD=54441 Superflat sdR-b1-00047771.fit
Normalized flux
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]

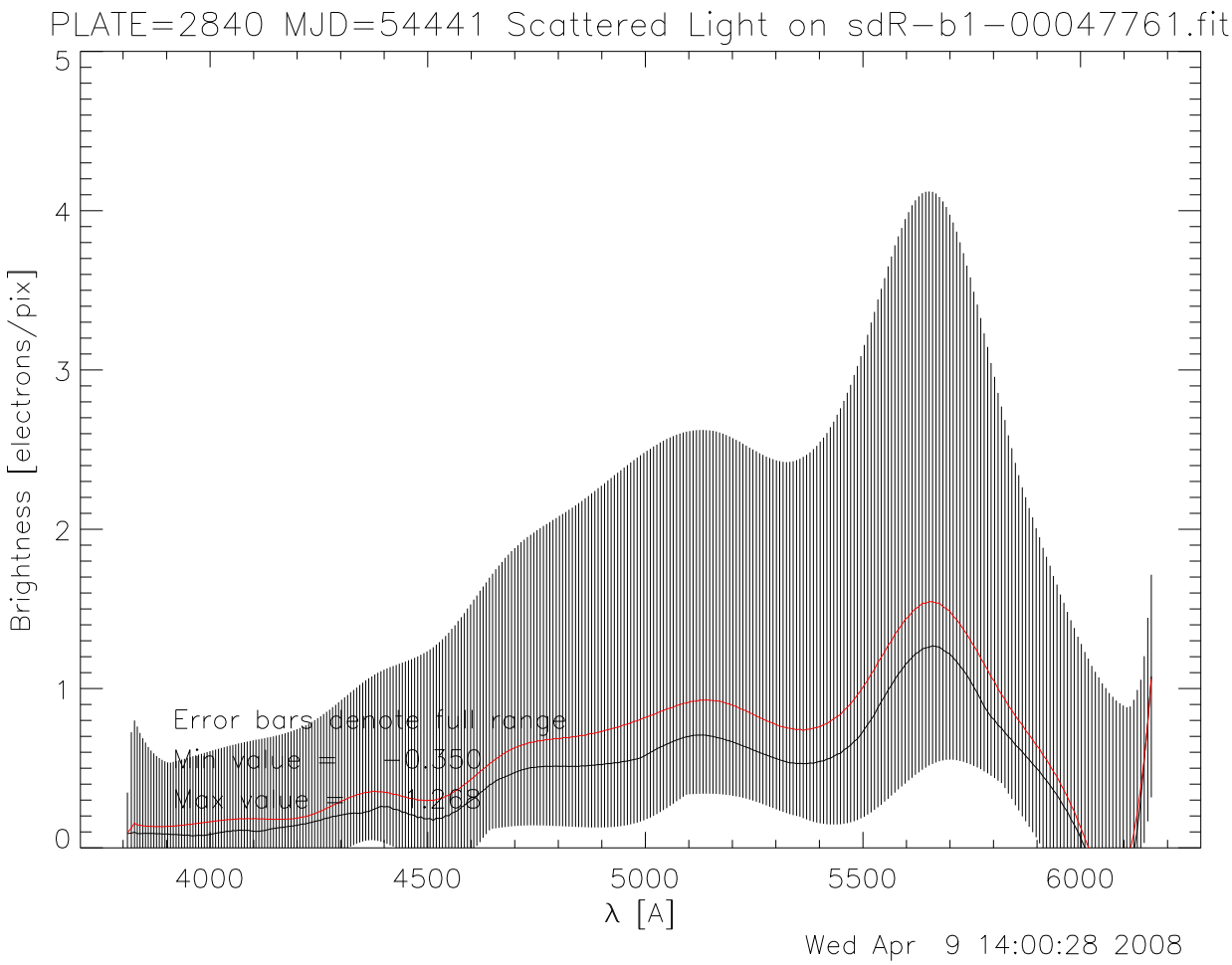

PLATE=2840 MJD=54441 Arcline Fit for sdR-b1-00047760.fit
Fiber Number
300
250
200
150
100
50
0
4000
4500
5000
5500
6000
λ [A] + 500 * Deviation
Deviation [pix]
0.10
0.05
0.00
−0.05
−0.10
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 13:54:46 2008

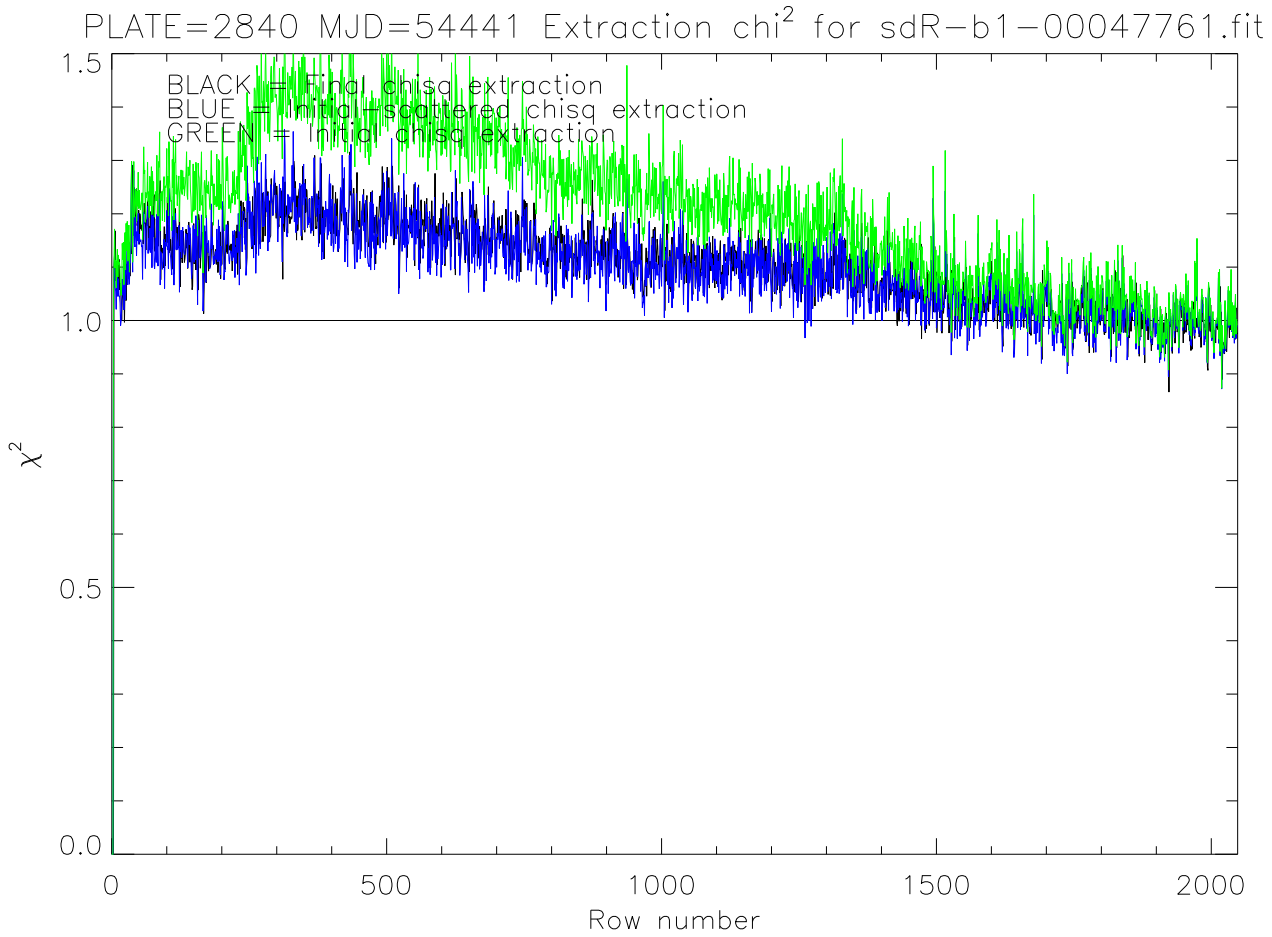

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b1-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.171
Max value = 1.283
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 13:55:19 2008

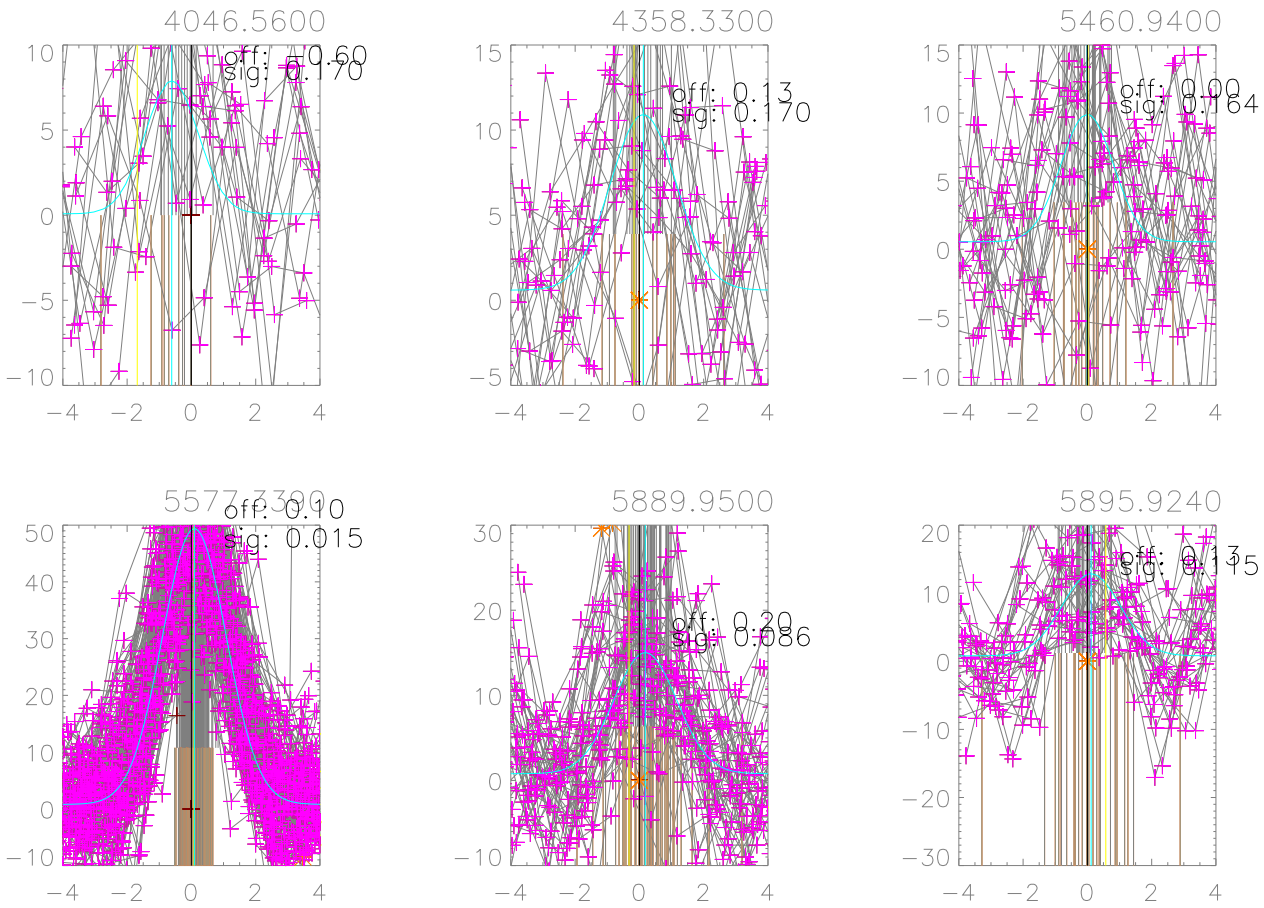

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR−b1−00047761.f
Y [pix]
X [pix]
0
500
1000
1500
2000
1.82
4.36
6.91
8.45

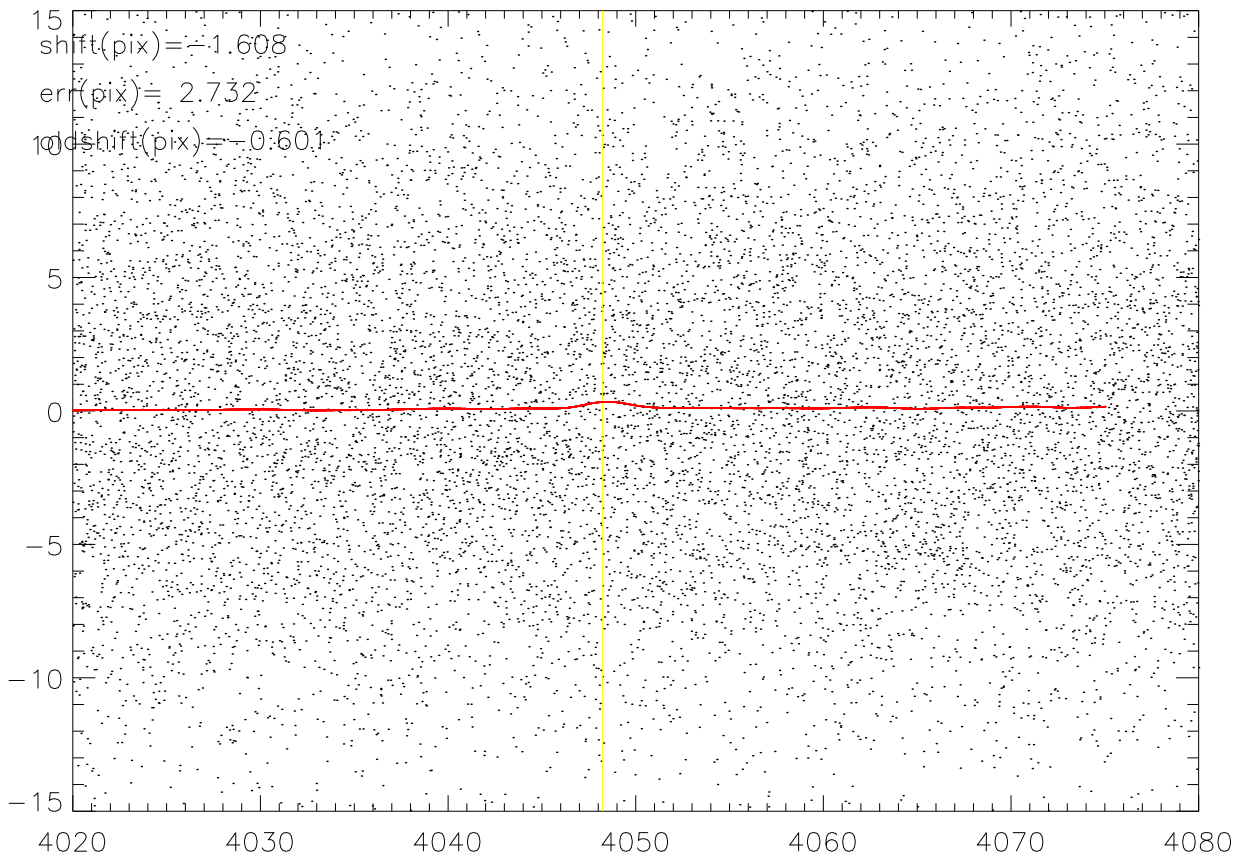

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b1-00047761.f
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.503
Max value = 4.538
Wed Apr 9 13:56:17 2008

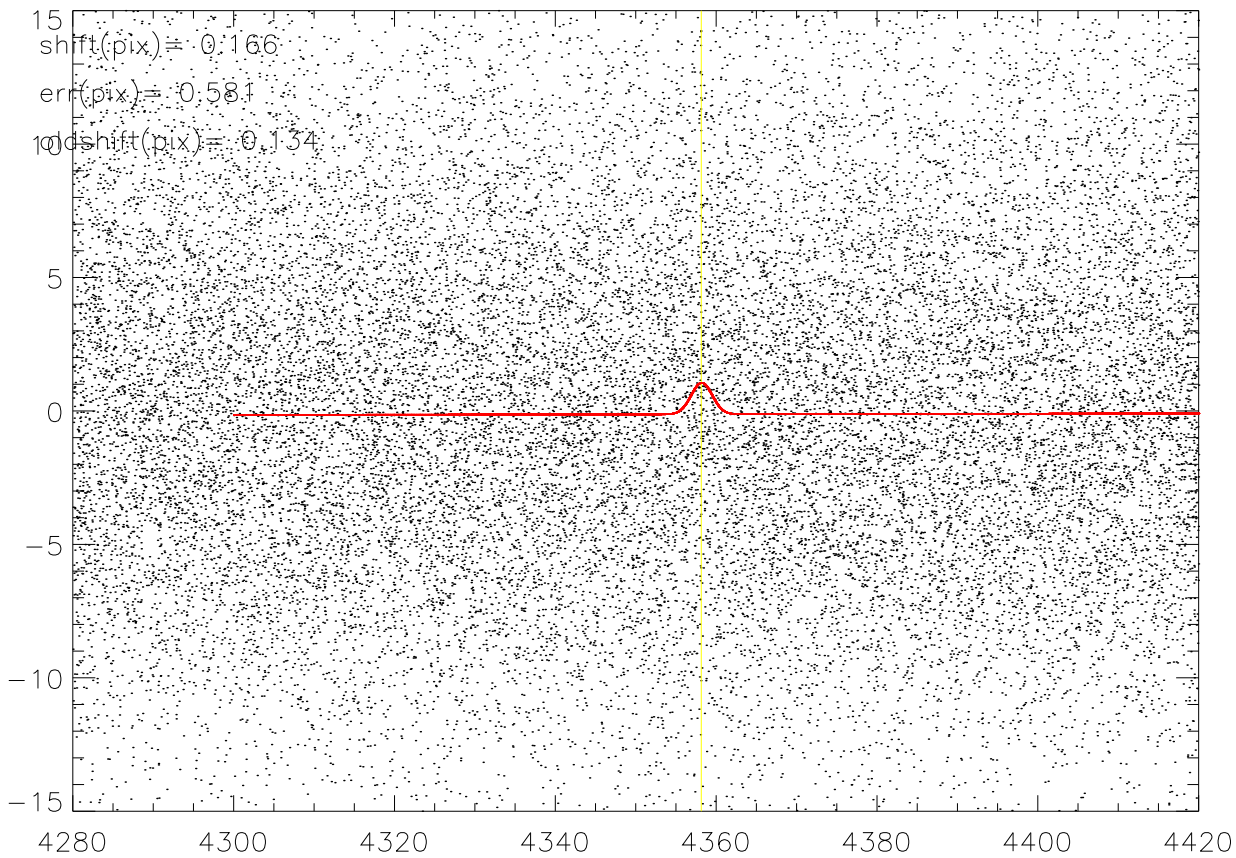

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047761.fit
2000
1500
1000
500
0
Y [pix]
1.182
-0.091
0
500
1000
1500
2000
X [pix]

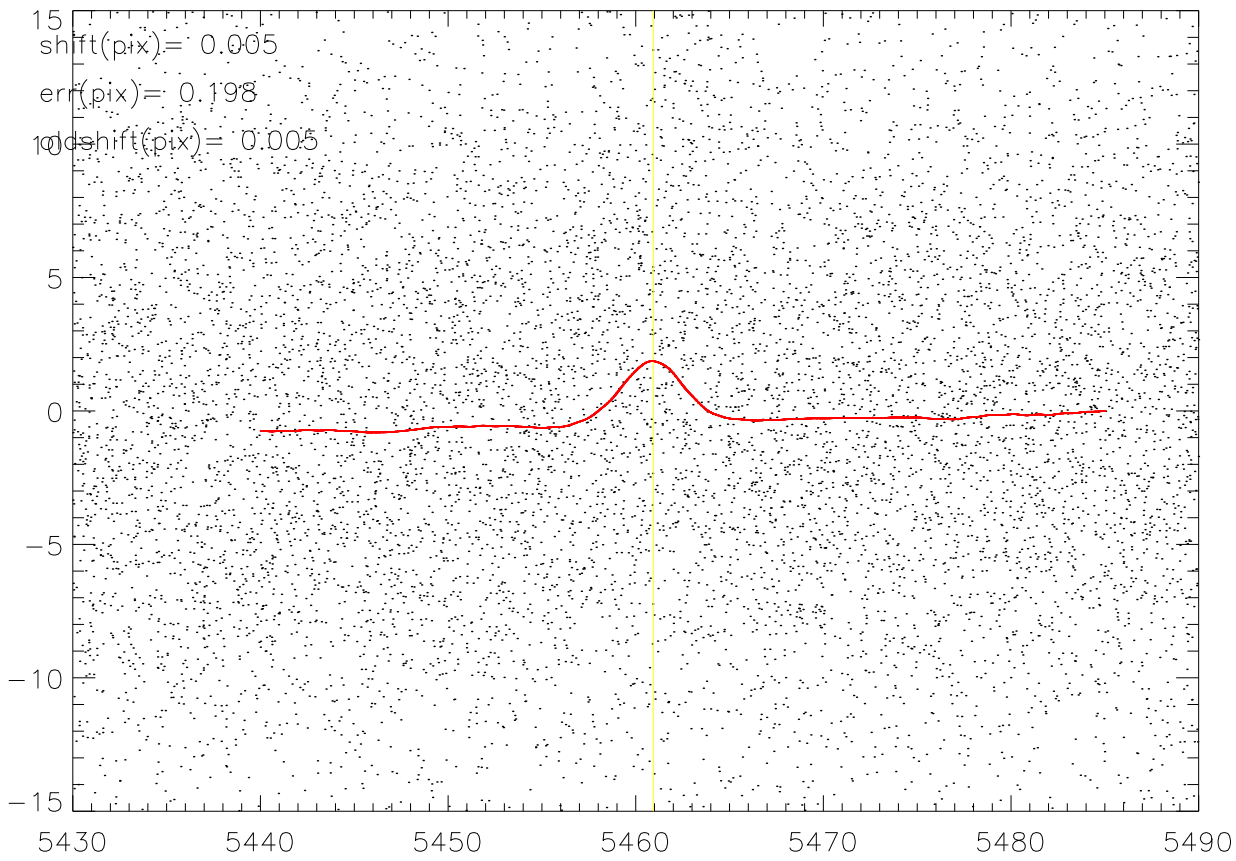

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047761.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = -0.350
Max value = 2.68
Wed Apr 9 14:00:28 2008

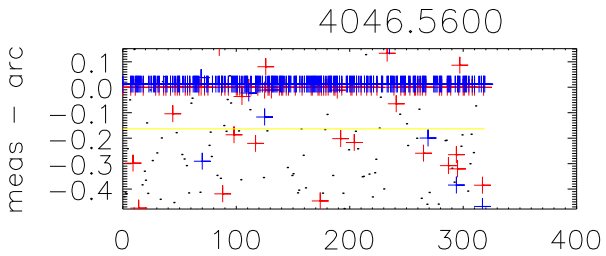

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b1-00047761.fit
BLACK = Final chisq extraction
BLUE = mitul-scattered chisq extraction
GREEN = initial chisq extraction
χ^2
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

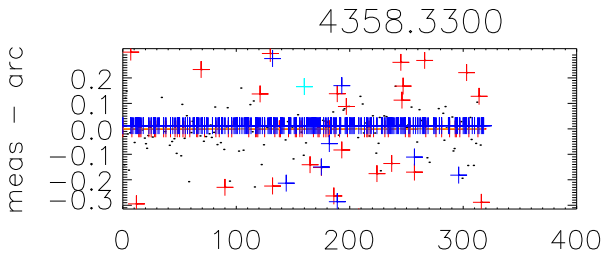

4046.5600
off: -0.60
sig: 0.70
4358.3300
off: 0.13
sig: 0.170
5460.9400
off: 0.00
sig: 0.164
5577.3300
off: 0.10
sig: 0.015
5889.9500
off: 0.20
sig: 0.086
5895.9240
off: 0.13
sig: 0.115

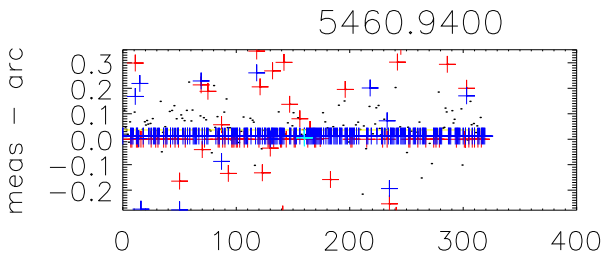

shift(pix)=−1.608
err(pix)= 2.732
oldshift(pix)=−0.601
15
10
5
0
−5
−10
−15
4020
4030
4040
4050
4060
4070
4080

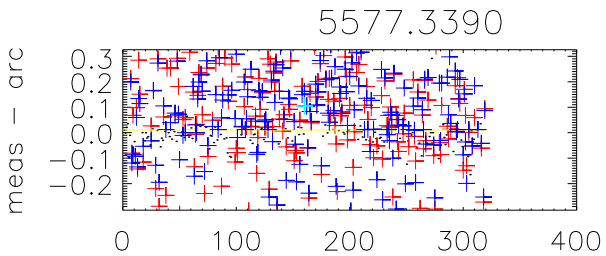

shift(pix)= 0.166
err(pix)= 0.581
oldshift(pix)= 0.134
15
10
5
0
−5
−10
−15
4280
4300
4320
4340
4360
4380
4400
4420

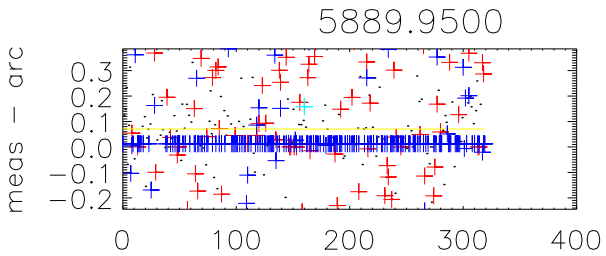

shift(pix)= 0.005
err(pix)= 0.198
oldshift(pix)= 0.005
15
10
5
0
−5
−10
−15
5430
5440
5450
5460
5470
5480
5490

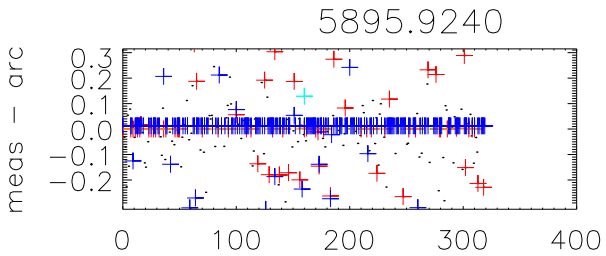

4046.5600
meas − arc
0.1
0.0
−0.1
−0.2
−0.3
−0.4
0
100
200
300
400

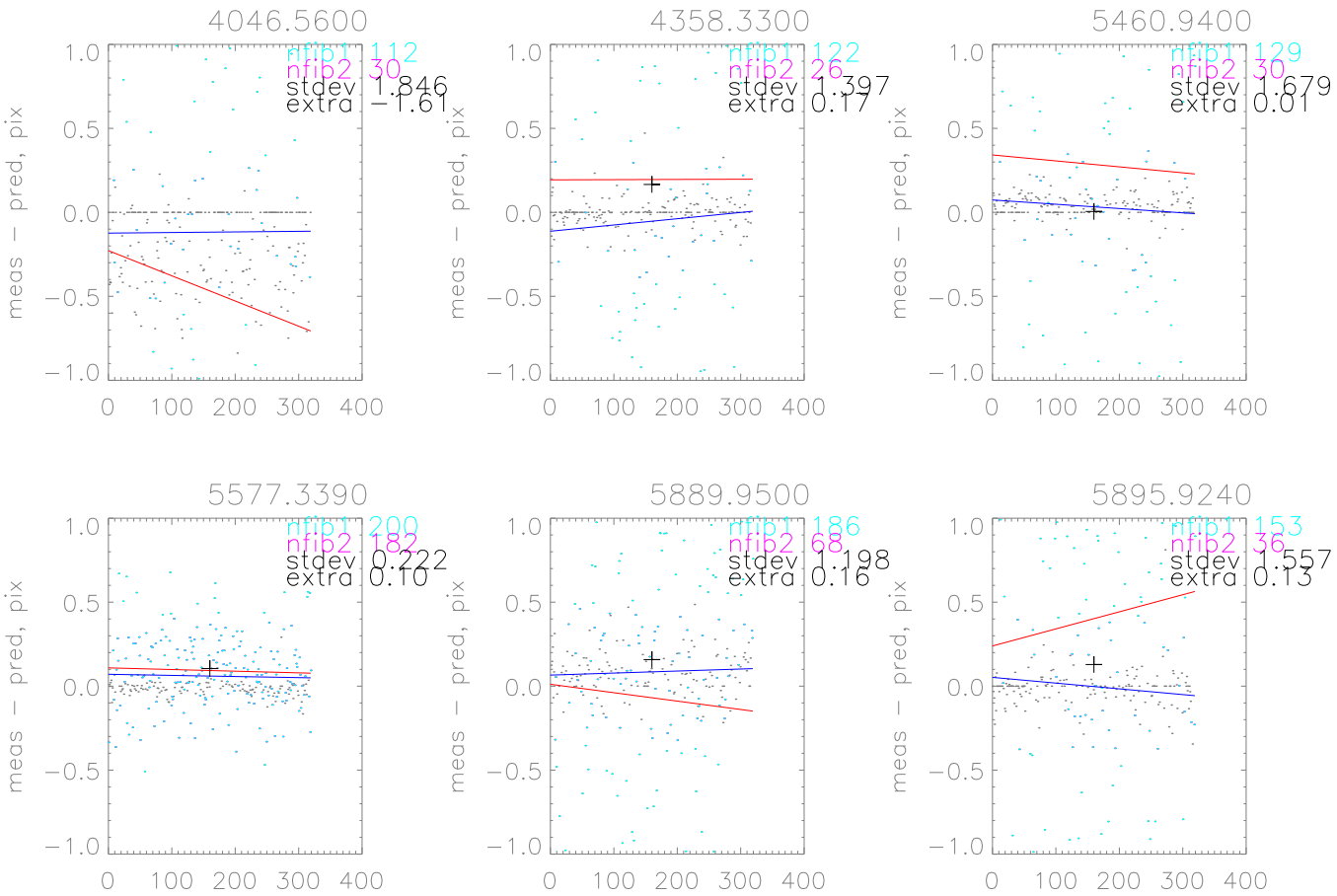

4358.3300
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

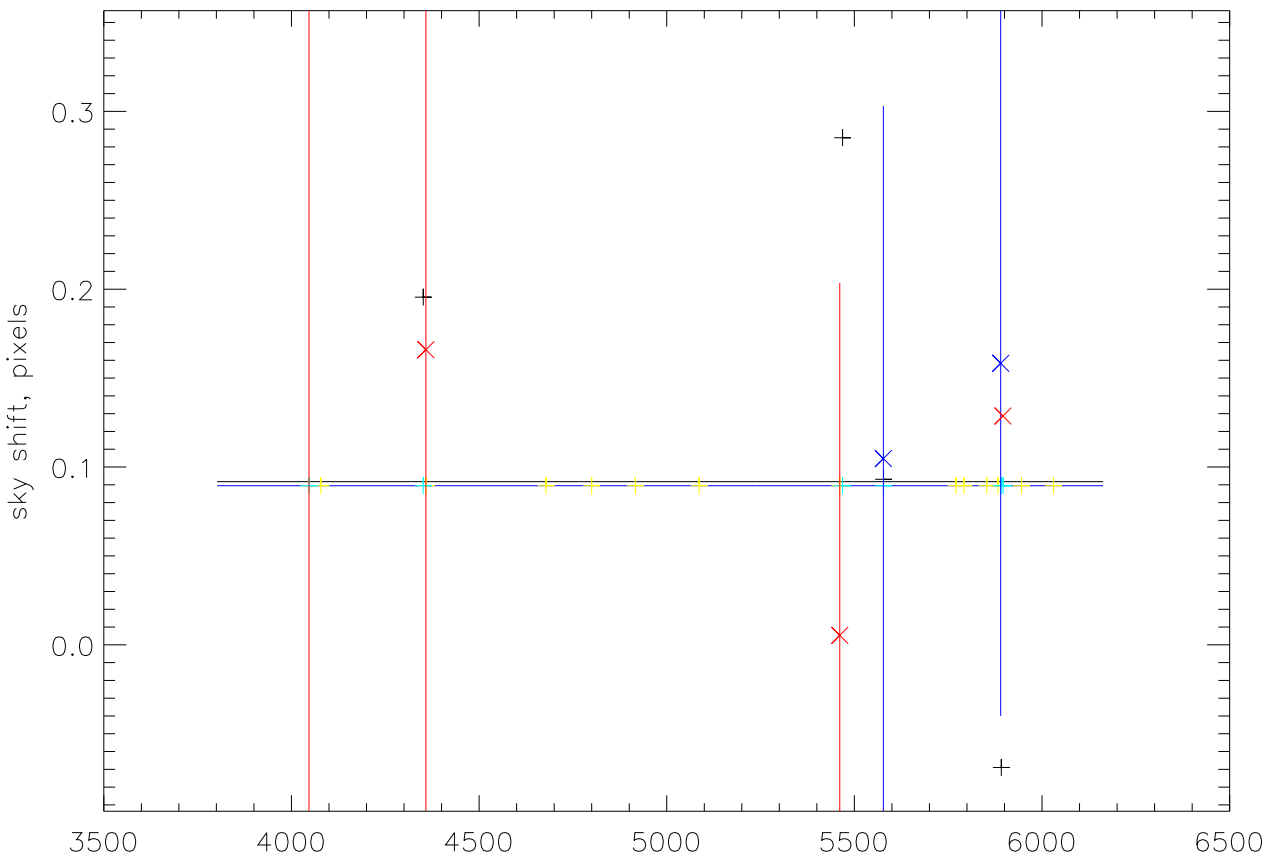

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

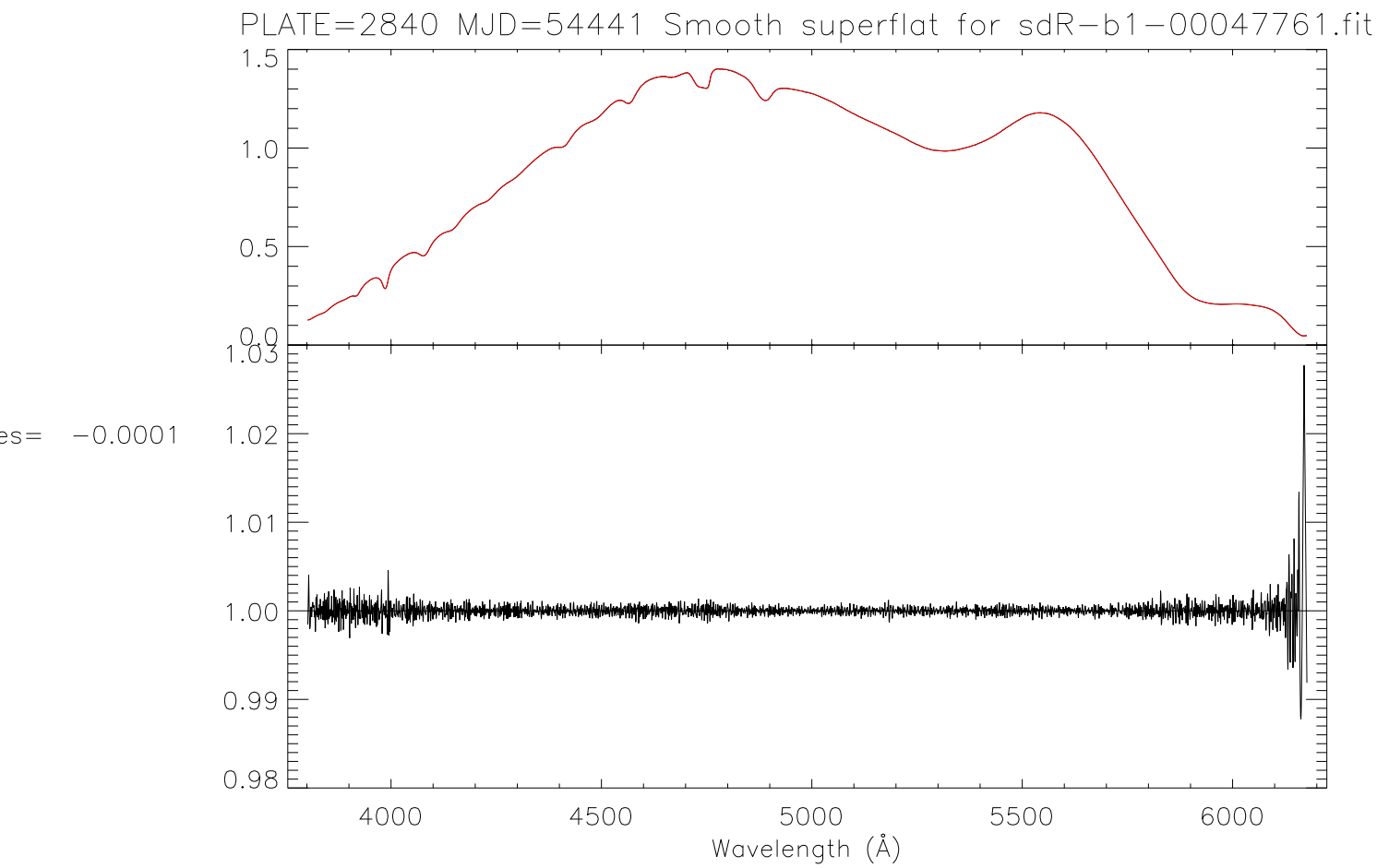

5577.3390
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400


5889.9500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

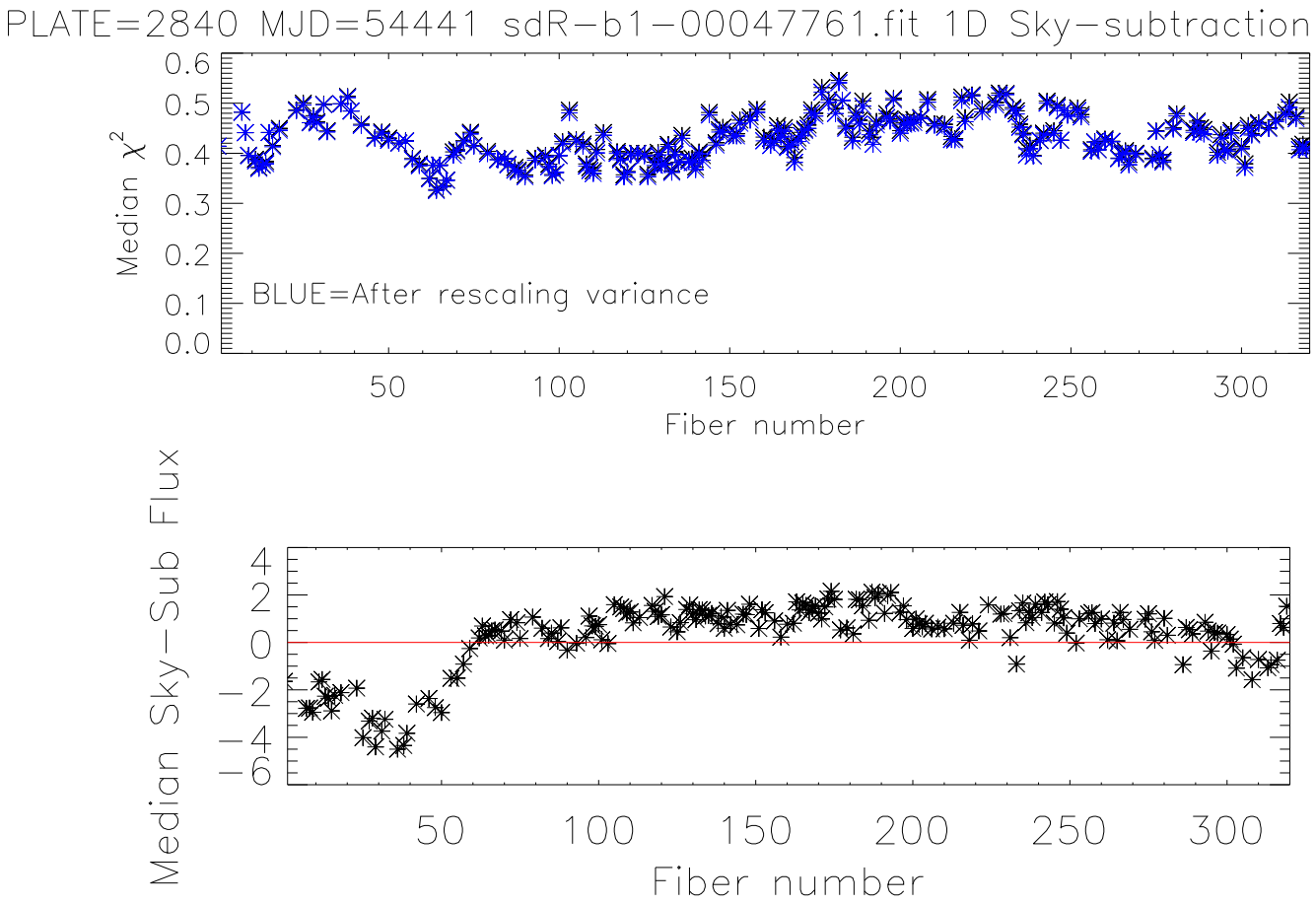

5895.9240
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

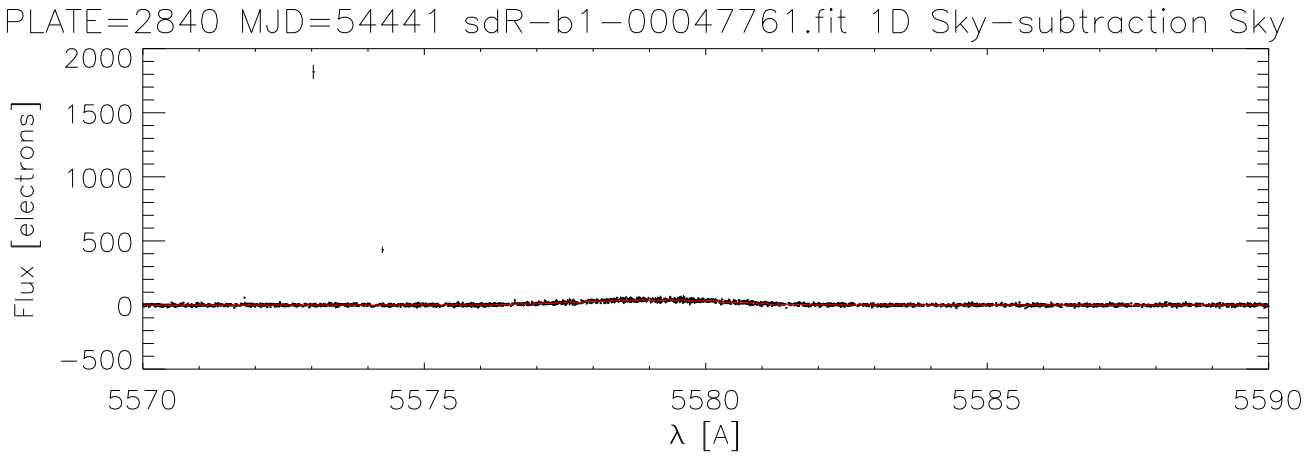

4046.5600
nfib1 112
nfib2 30
stdev 1.846
extra −1.61
4358.3300
nfib1 122
nfib2 26
stdev 1.397
extra 0.17
5460.9400
nfib1 129
nfib2 30
stdev 1.679
extra 0.01
5577.3390
nfib1 200
nfib2 182
stdev 0.222
extra 0.10
5889.9500
nfib1 186
nfib2 68
stdev 1.198
extra 0.16
5895.9240
nfib1 153
nfib2 36
stdev 1.557
extra 0.13
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0
100
200
300
400

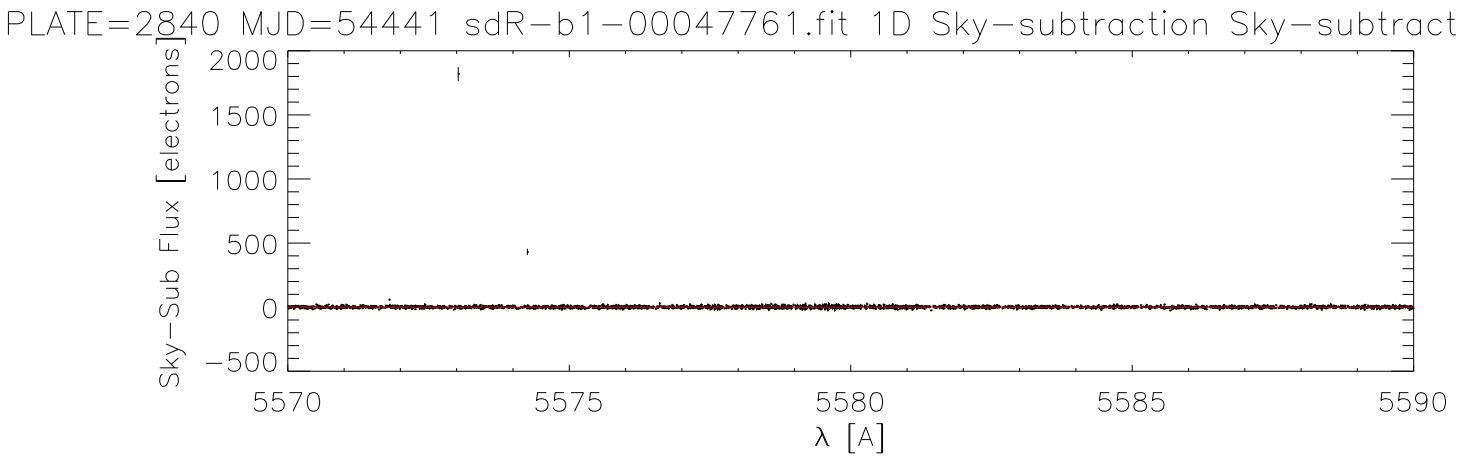

sky shift, pixels
0.3
0.2
0.1
0.0
3500
4000
4500
5000
5500
6000
6500

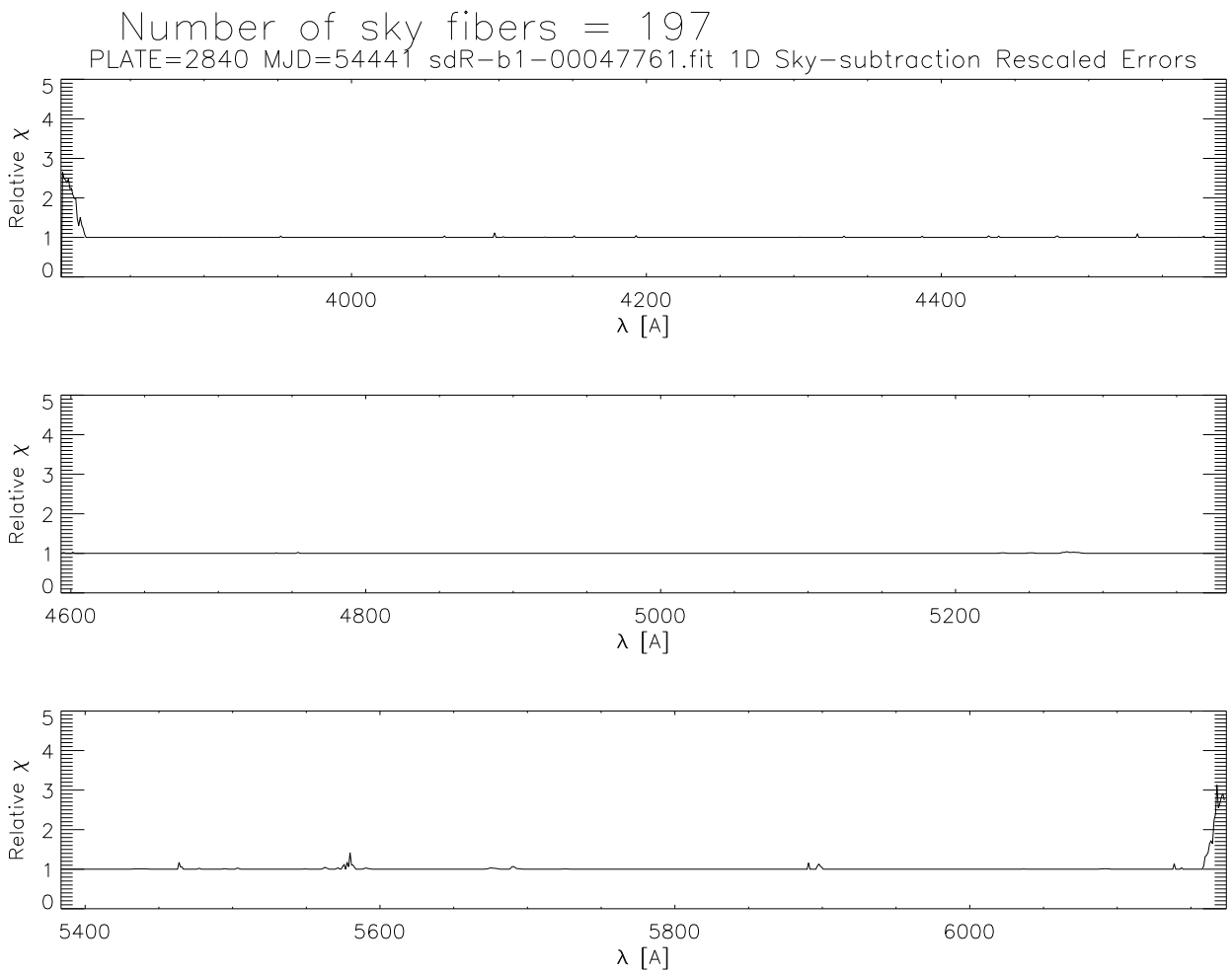

PLATE=2840 MJD=54441 Smooth superflat for sdR-b1-00047761.fit
1.5
1.0
0.5
0.0
1.03
1.02
1.01
1.00
0.99
0.98
4000
4500
5000
5500
6000
Wavelength (Å)

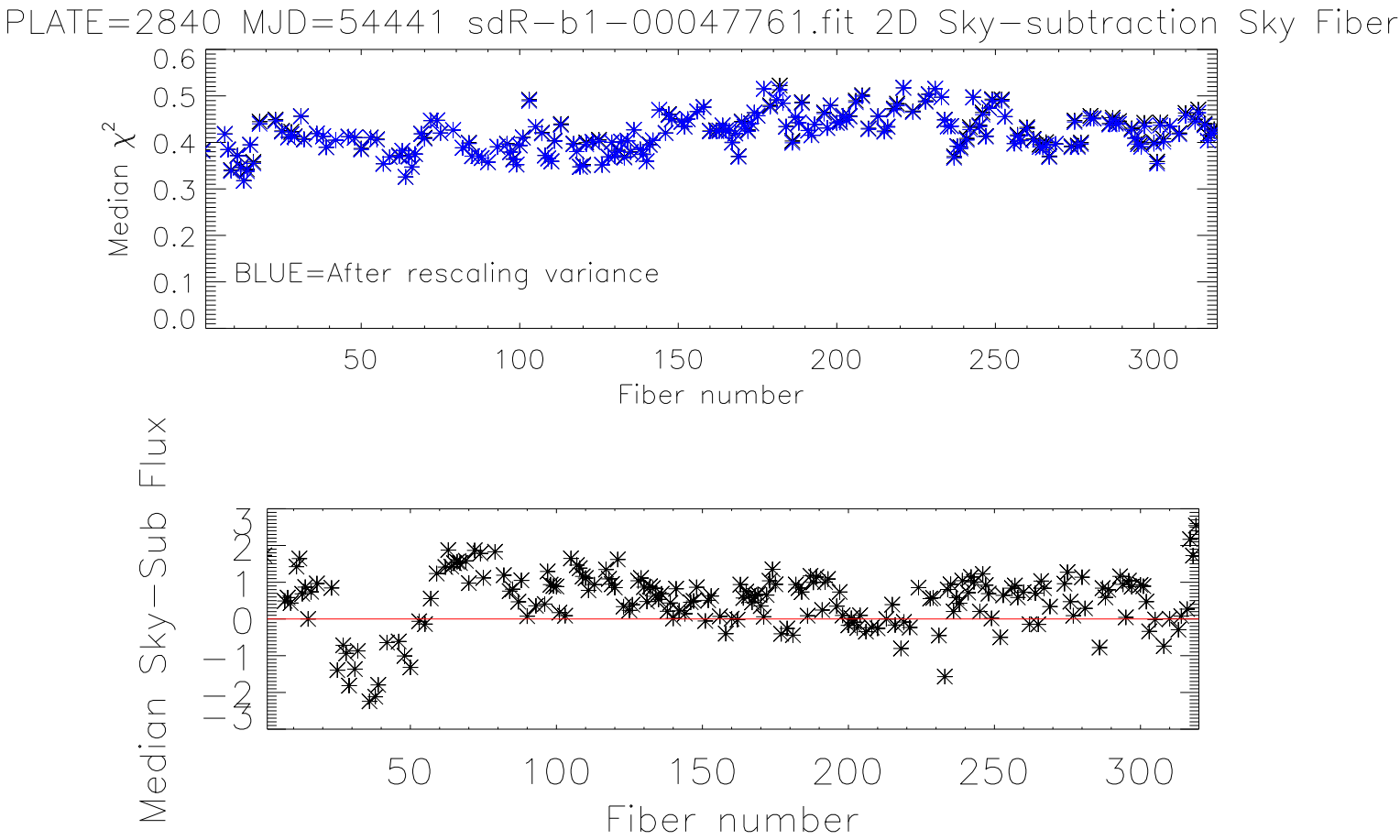
es= −0.0001

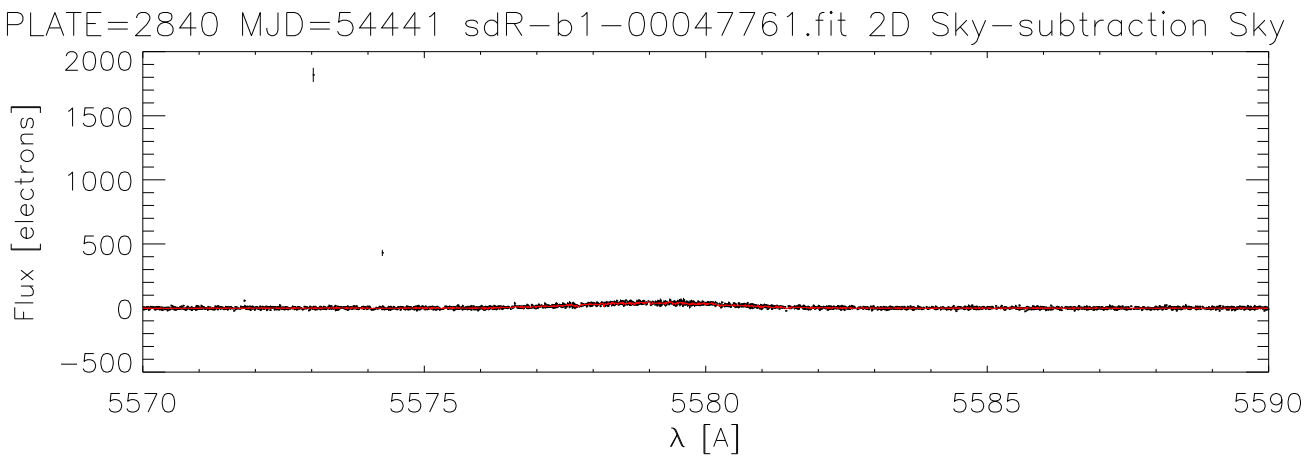

PLATE=2840 MJD=54441 sdR-b1-00047761.fit 1D Sky-subtraction Sky Fiber
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

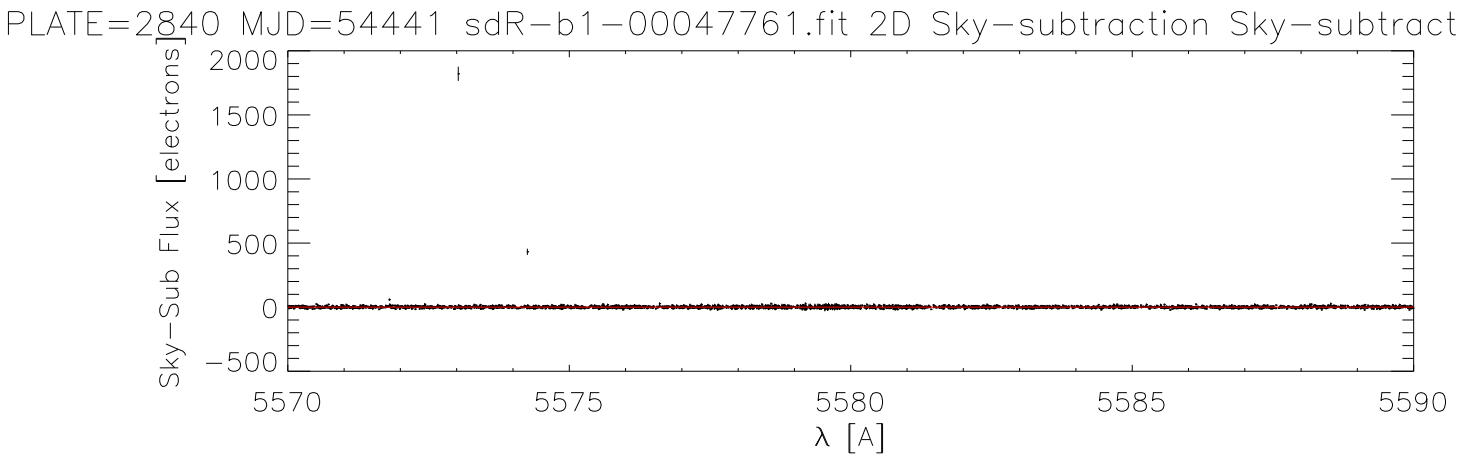

PLATE=2840 MJD=54441 sdR-b1-00047761.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
2000
1500
1000
500
0
-500
5570
5575
5580
5585
5590
λ [A]

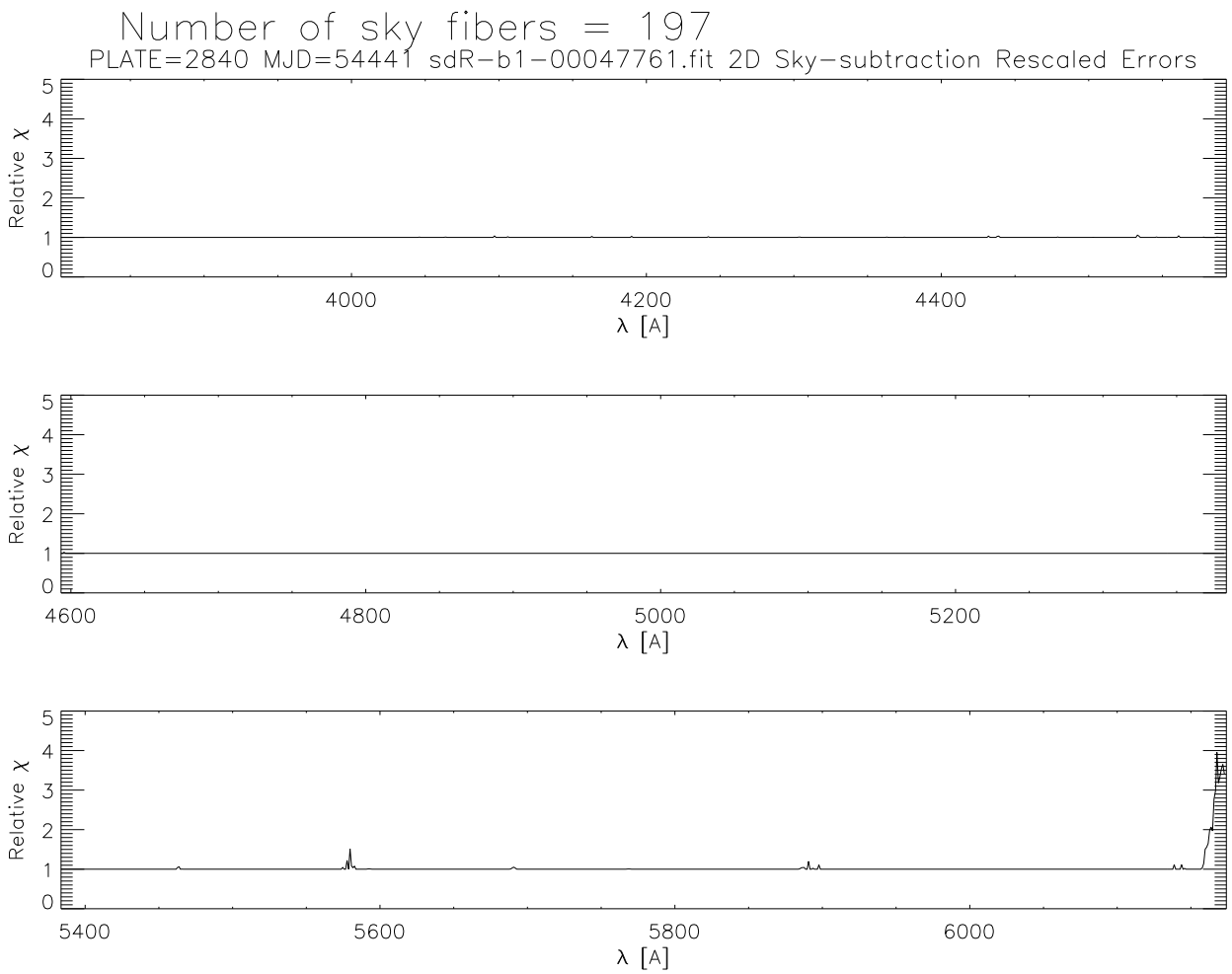

PLATE=2840 MJD=54441 sdR-b1-00047761.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
2000
1500
1000
500
0
-500
5570
5575
5580
5585
5590
λ [A]

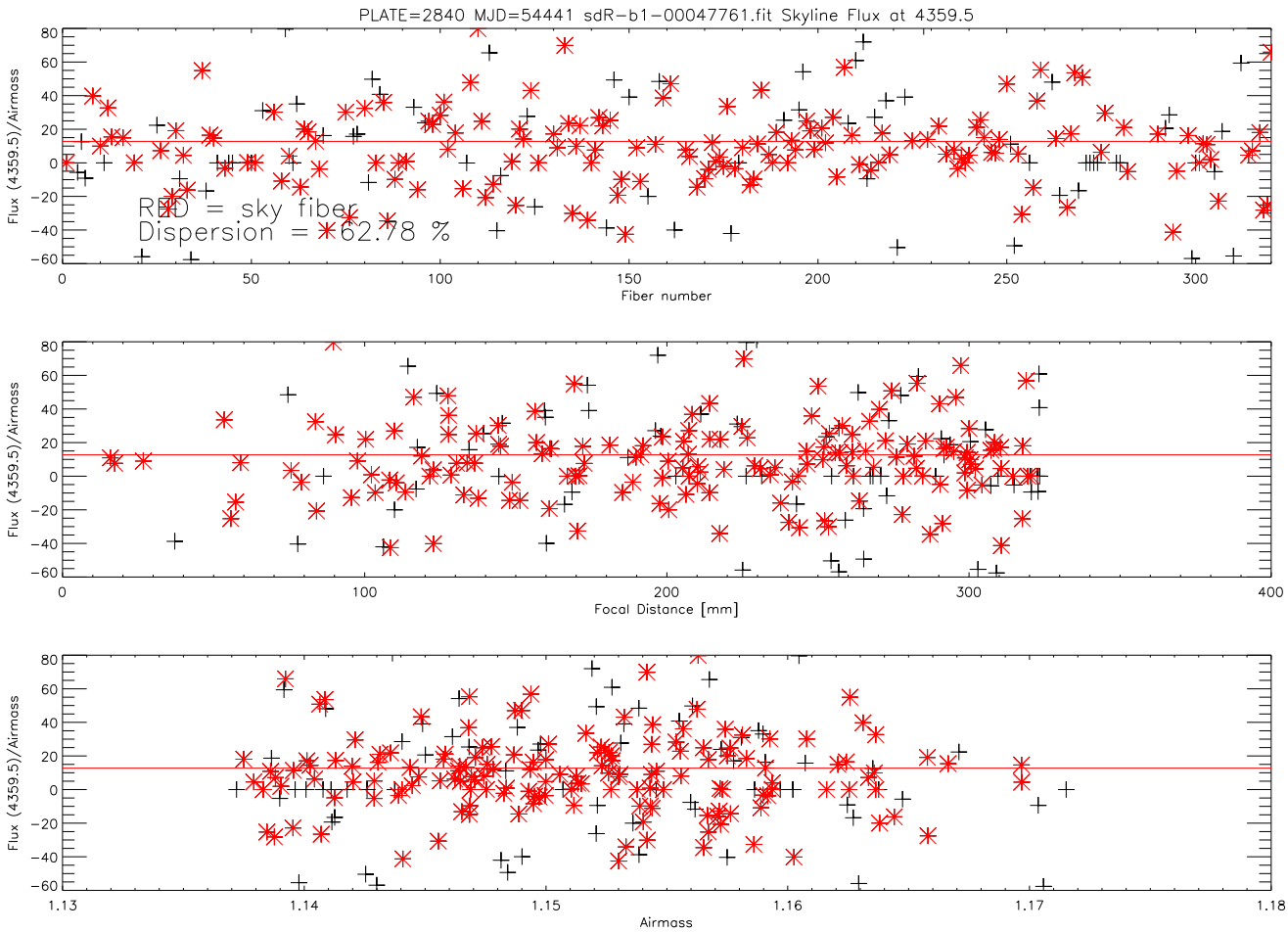

Number of sky fibers = 197
PLATE=2840 MJD=54441 sdR-b1-00047761.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

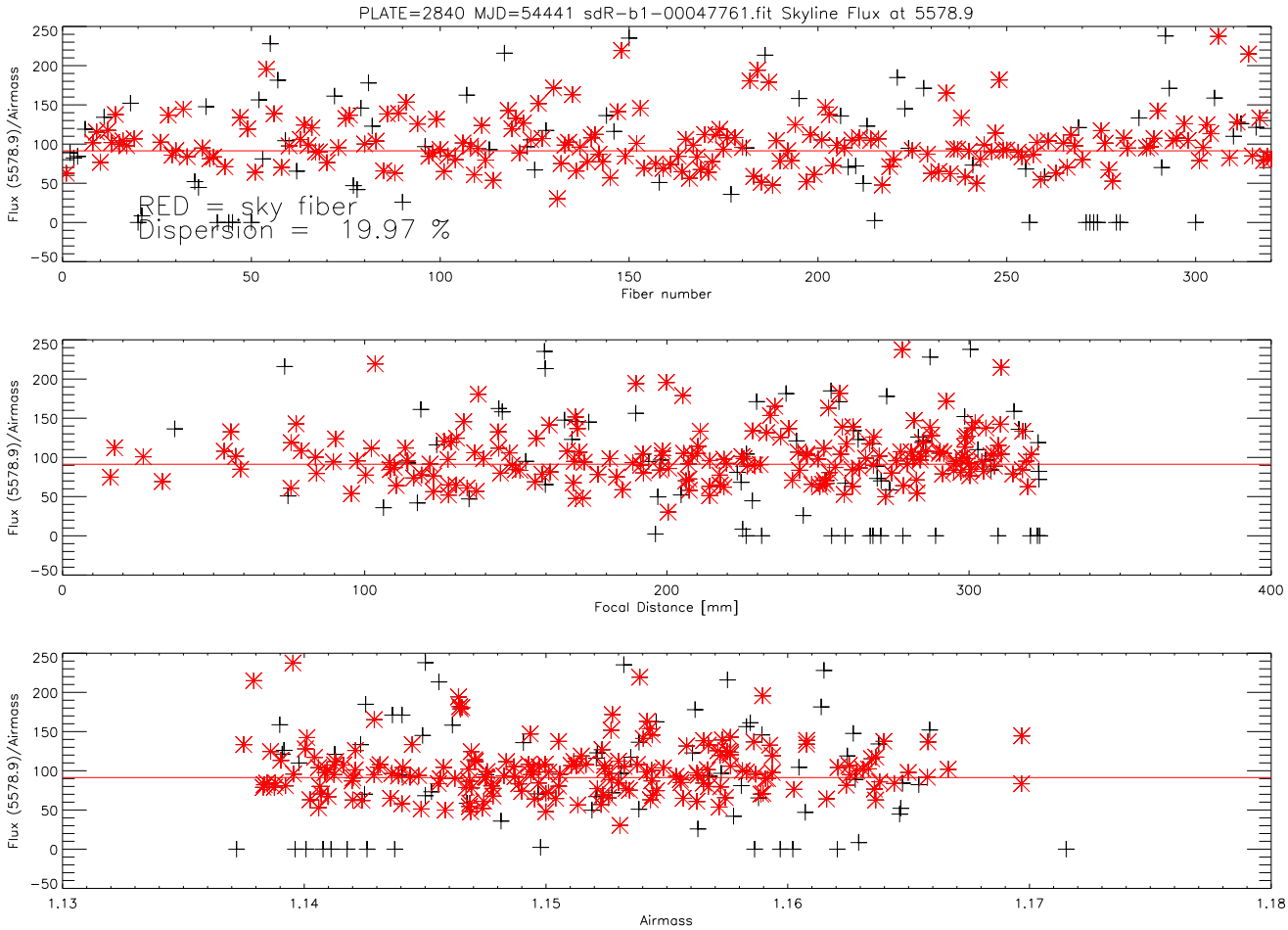

PLATE=2840 MJD=54441 sdR-b1-00047761.fit 2D Sky-subtraction Sky Fiber
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

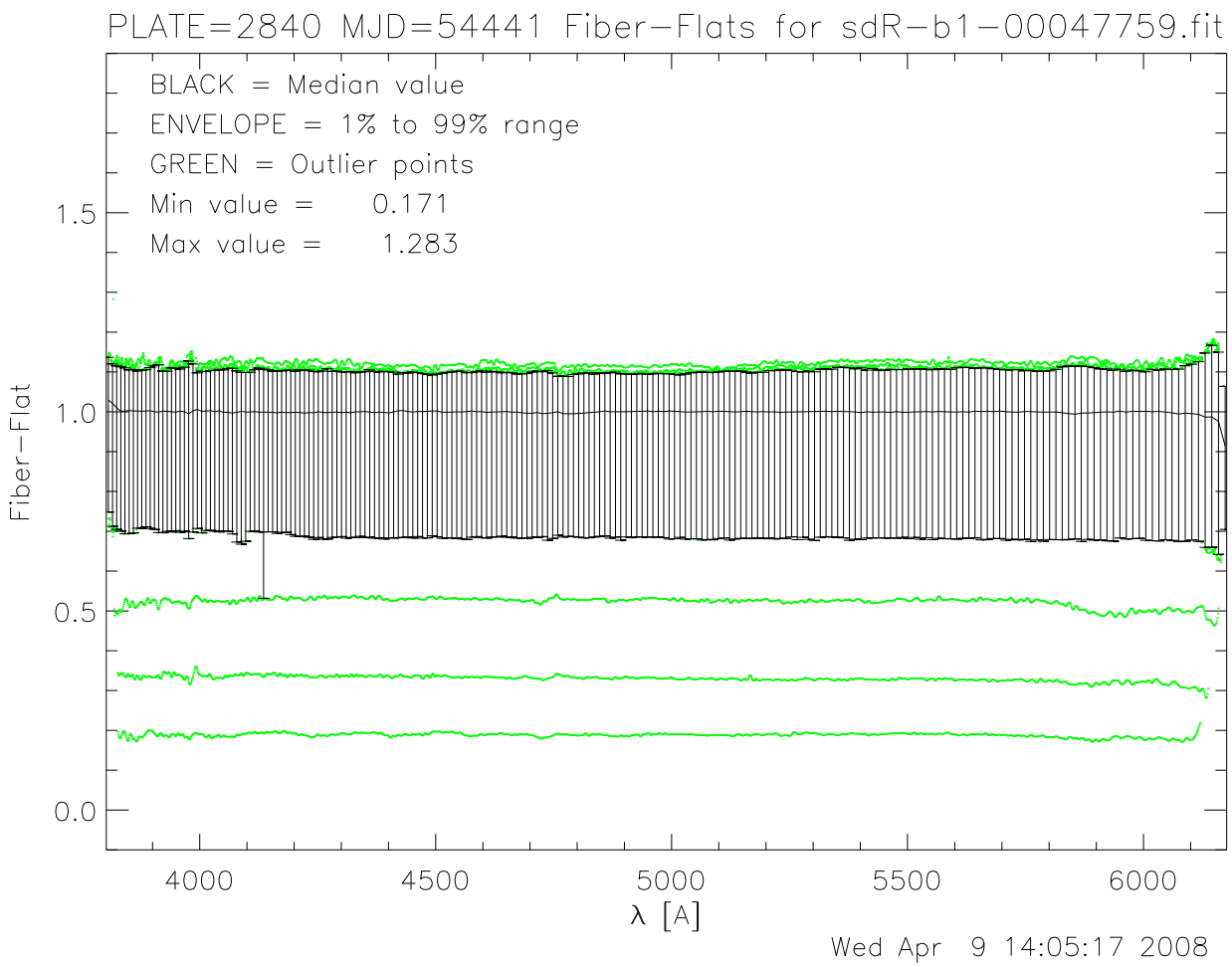

PLATE=2840 MJD=54441 sdR-b1-00047761.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
2000
1500
1000
500
0
-500
5570
5575
5580
5585
5590
λ [A]

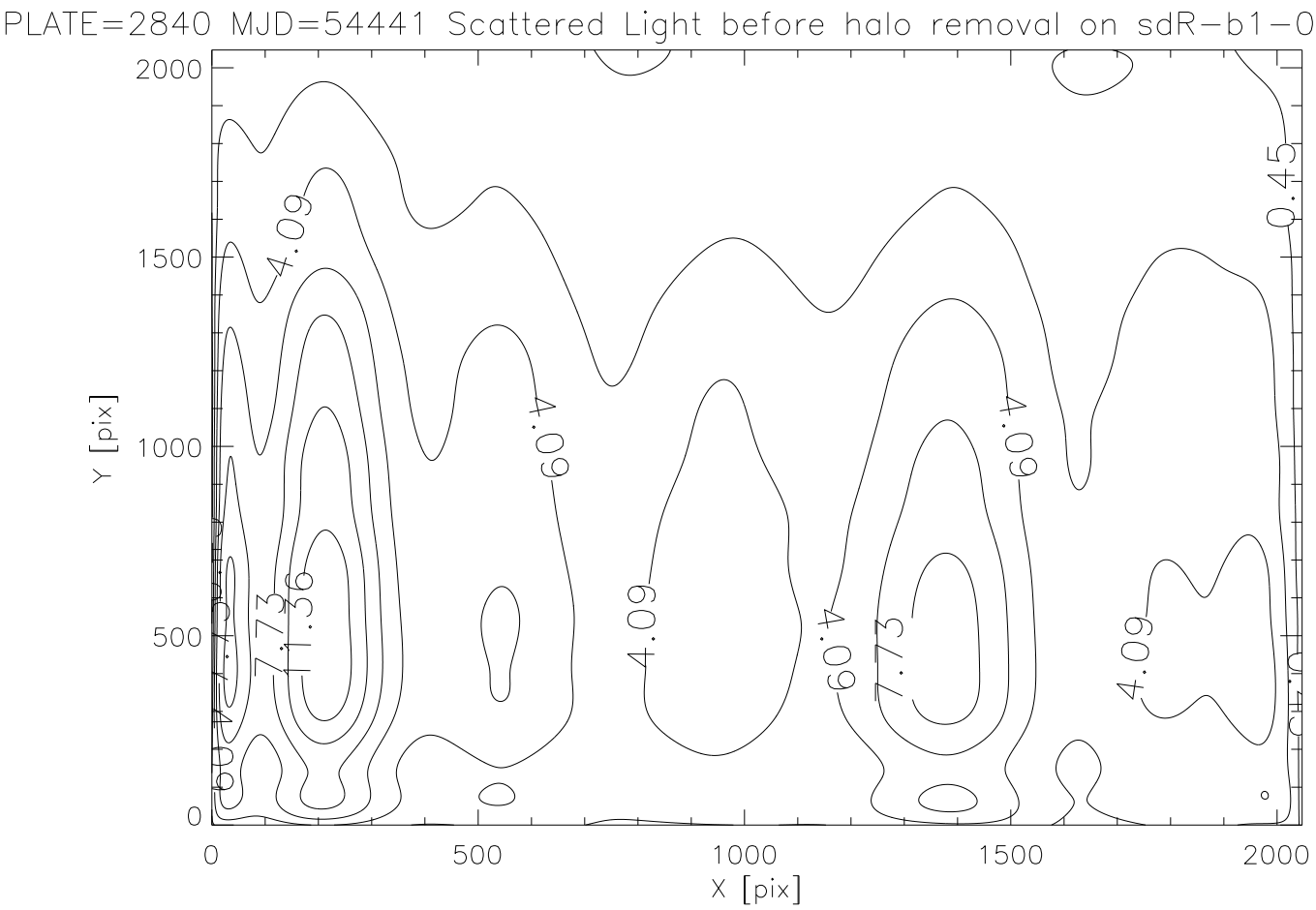

PLATE=2840 MJD=54441 sdR-b1-00047761.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
2000
1500
1000
500
0
-500
5570
5575
5580
5585
5590
λ [A]

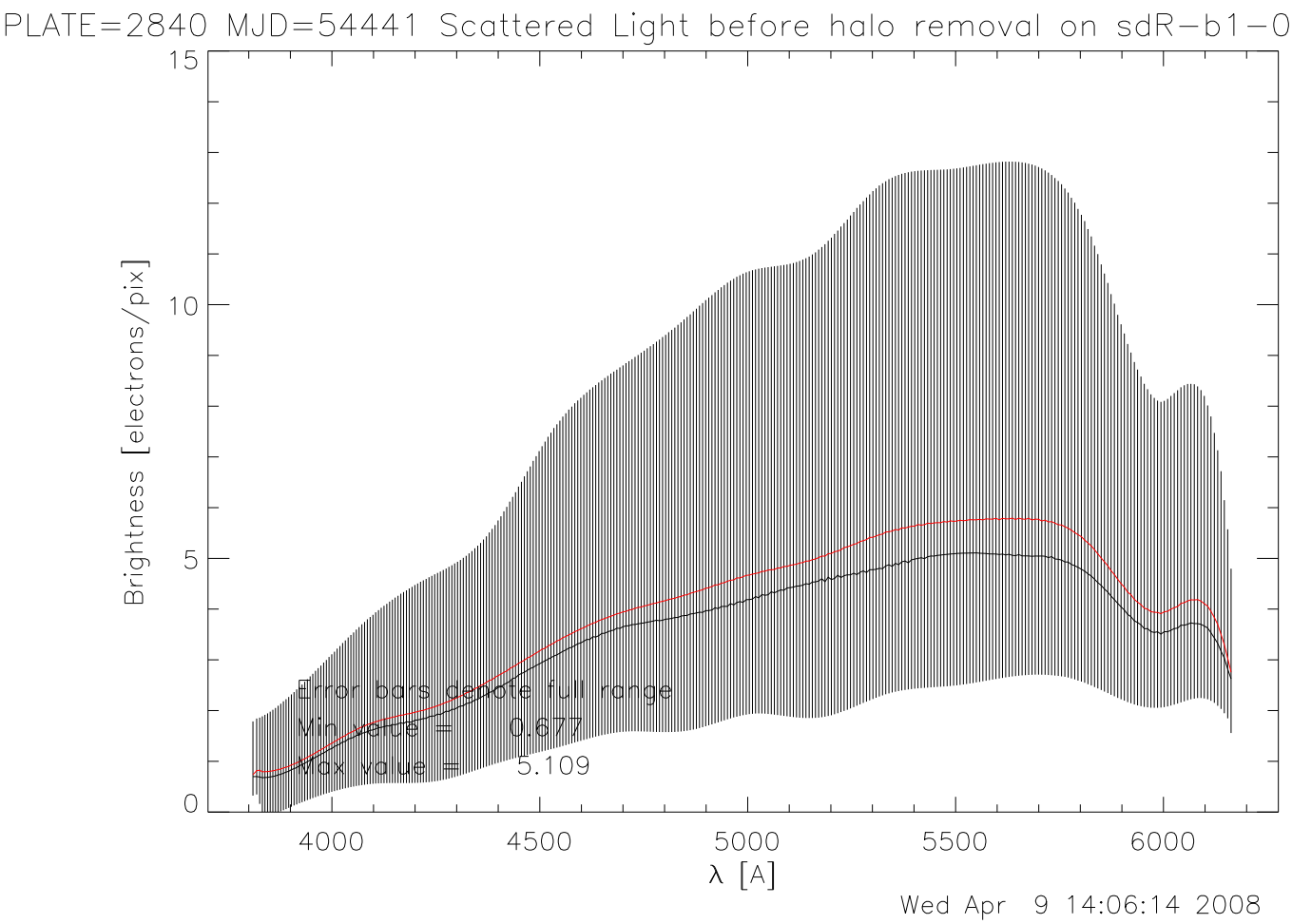

Number of sky fibers = 197
PLATE=2840 MJD=54441 sdR-b1-00047761.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

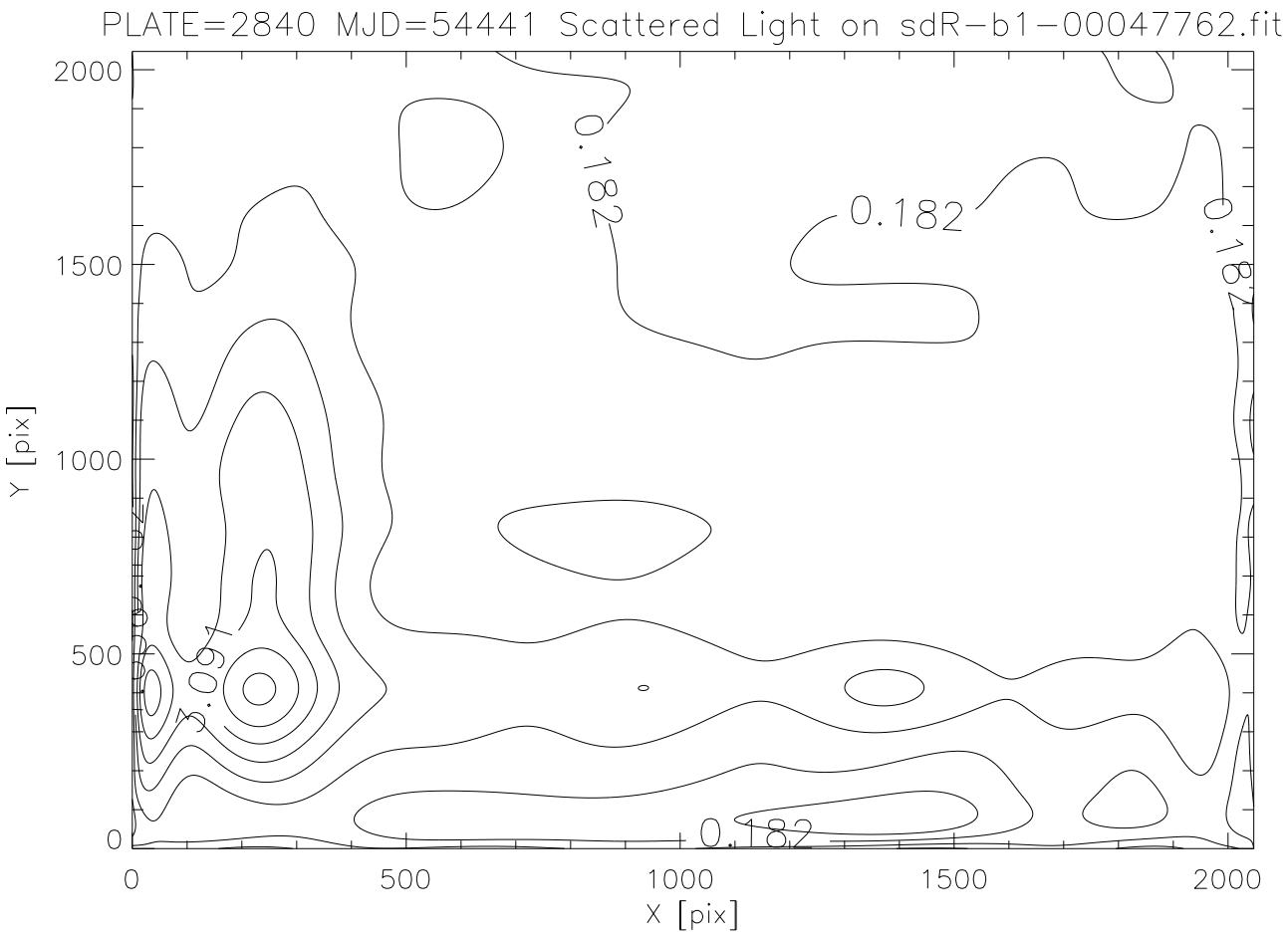

PLATE=2840 MJD=54441 sdR-b1-00047761.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
Fiber number
RED = sky fiber
Dispersion = 62.78 %
Flux (4359.5)/Airmass
Focal Distance [mm]
Flux (4359.5)/Airmass
Airmass

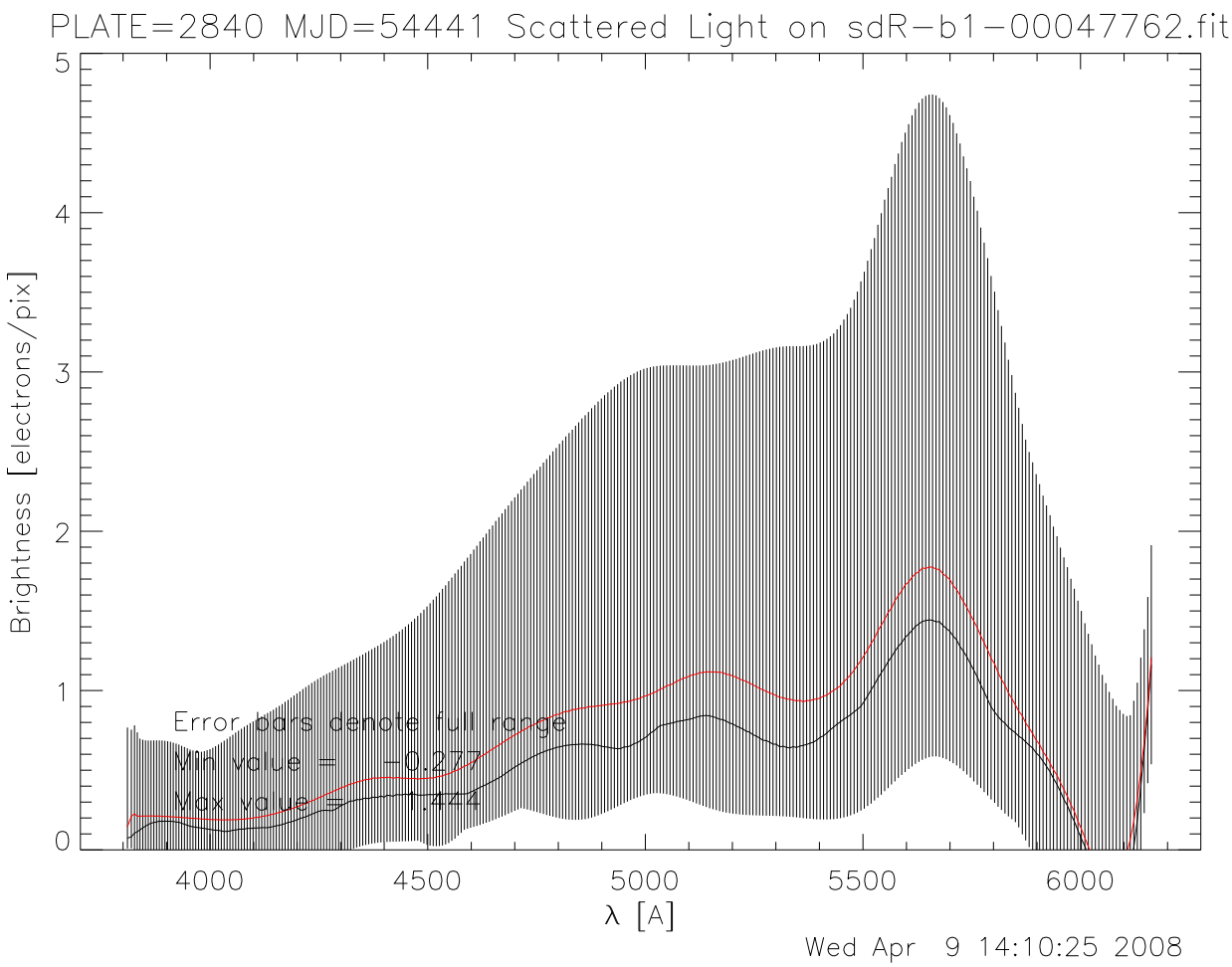

PLATE=2840 MJD=54441 sdR-b1-00047761.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
Fiber number
RED = sky fiber
Dispersion = 19.97 %
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

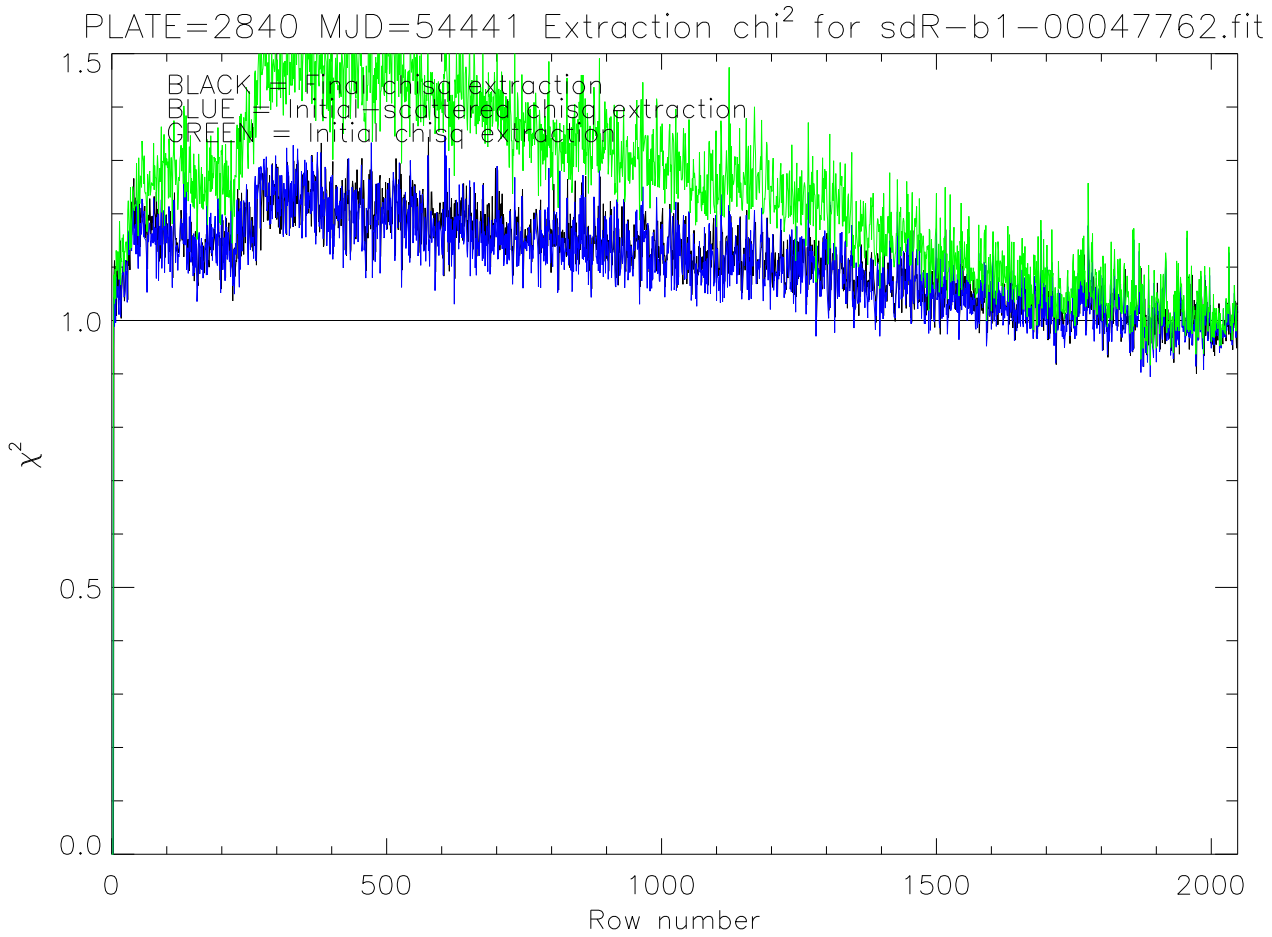

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b1-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.171
Max value = 1.283
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 14:05:17 2008

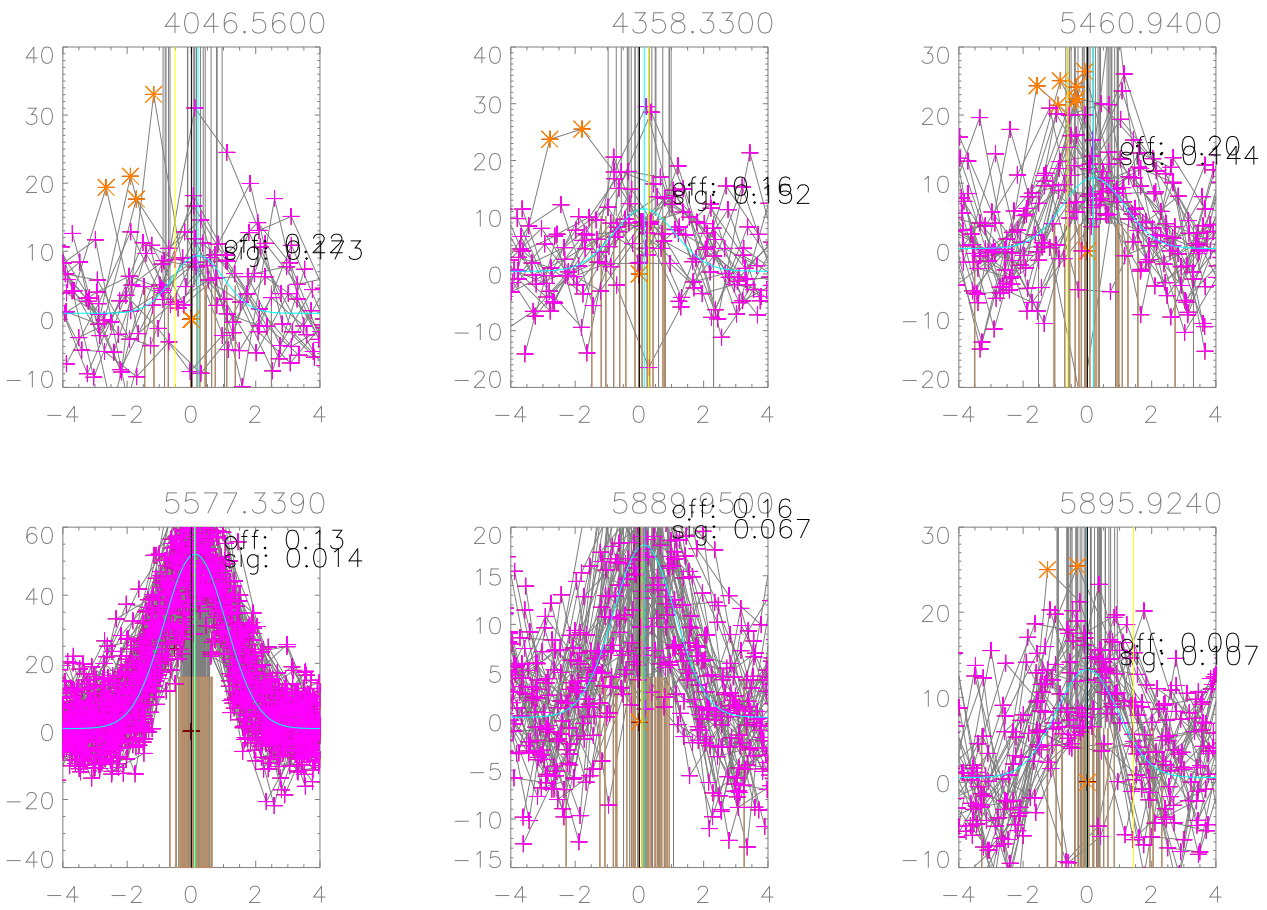

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b1-00047762.f
Y [pix]
X [pix]
0
500
1000
1500
2000
4.09
7.73
11.36
0.45

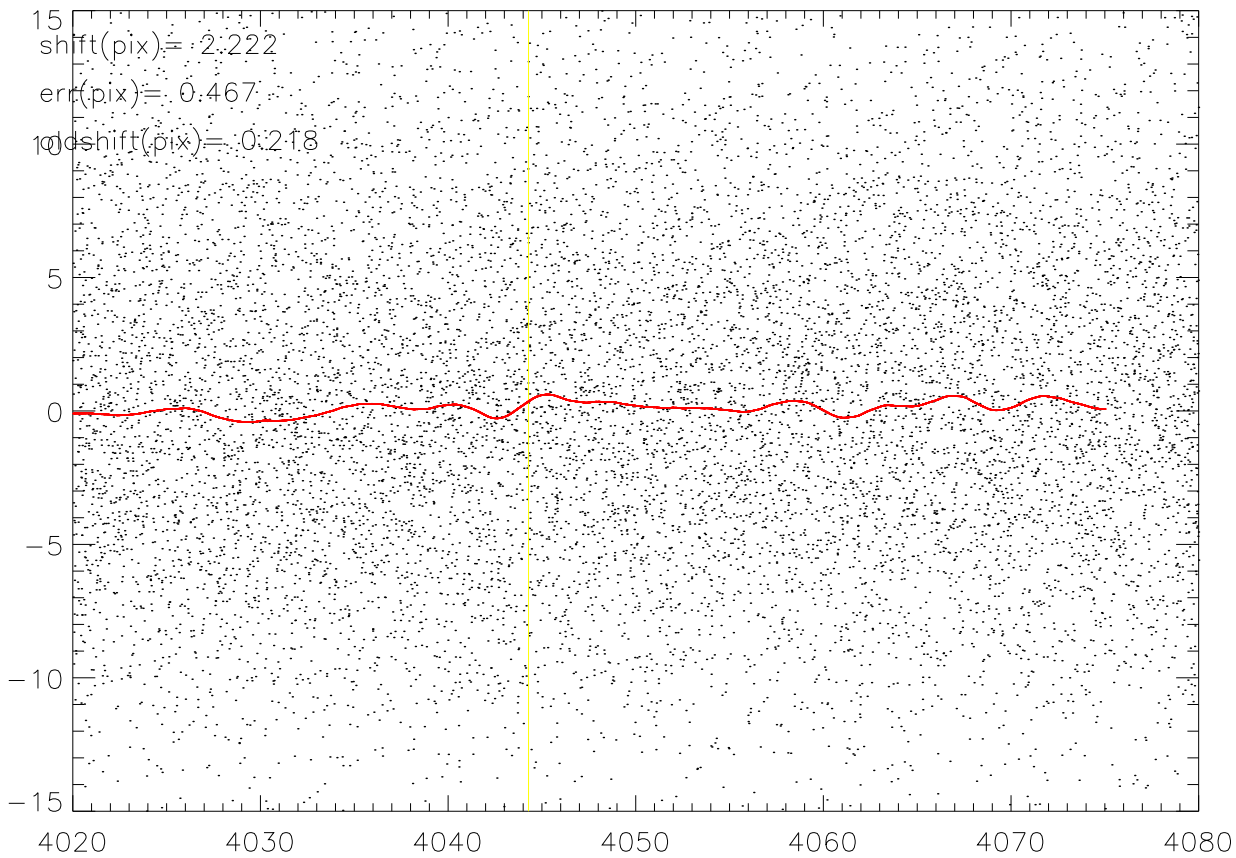

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b1-00047762.f
Brightness [electrons/pix]
15
10
5
0
4000
4500
5000
5500
6000
λ [A]
Error bars denote full range
Min value = 0.677
Max value = 5.109
Wed Apr 9 14:06:14 2008

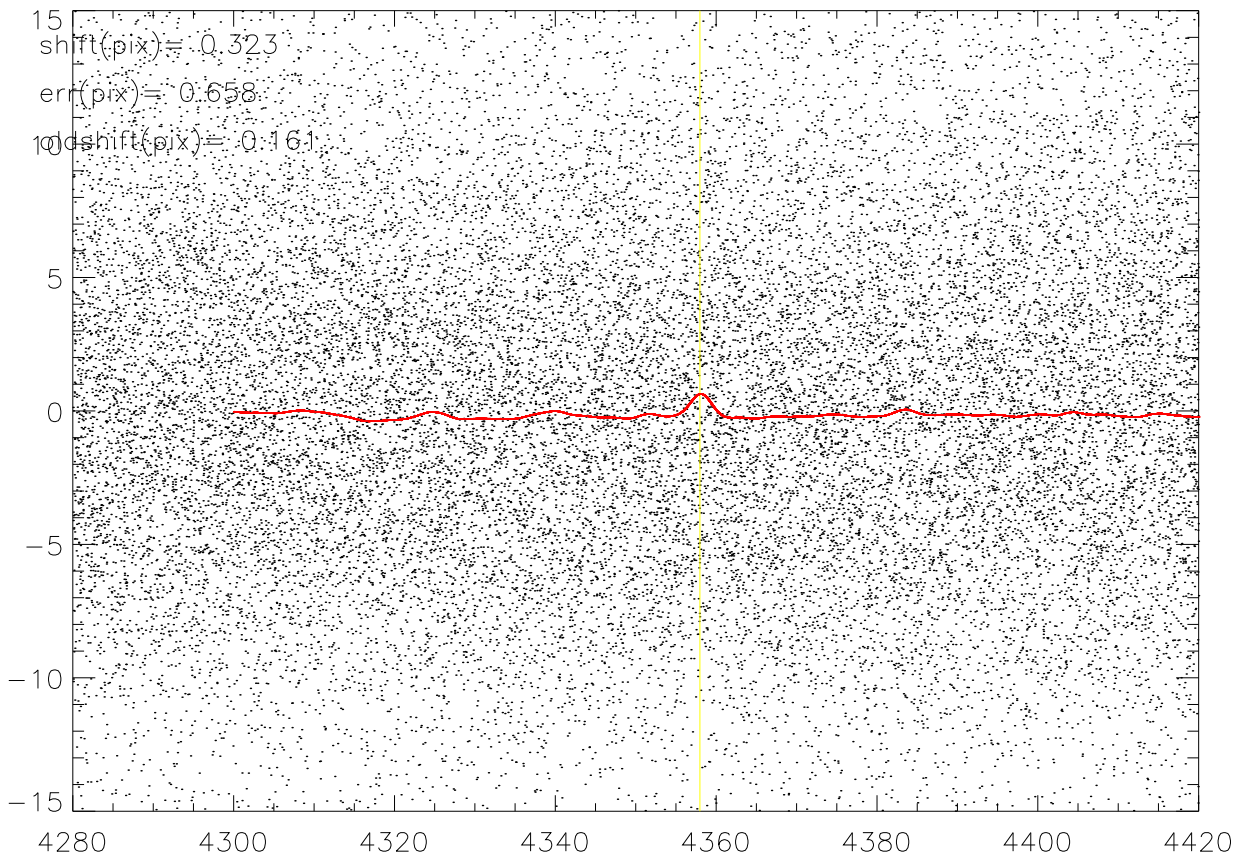

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047762.fit
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
0.182
0.182
0.182
0.182
0.091

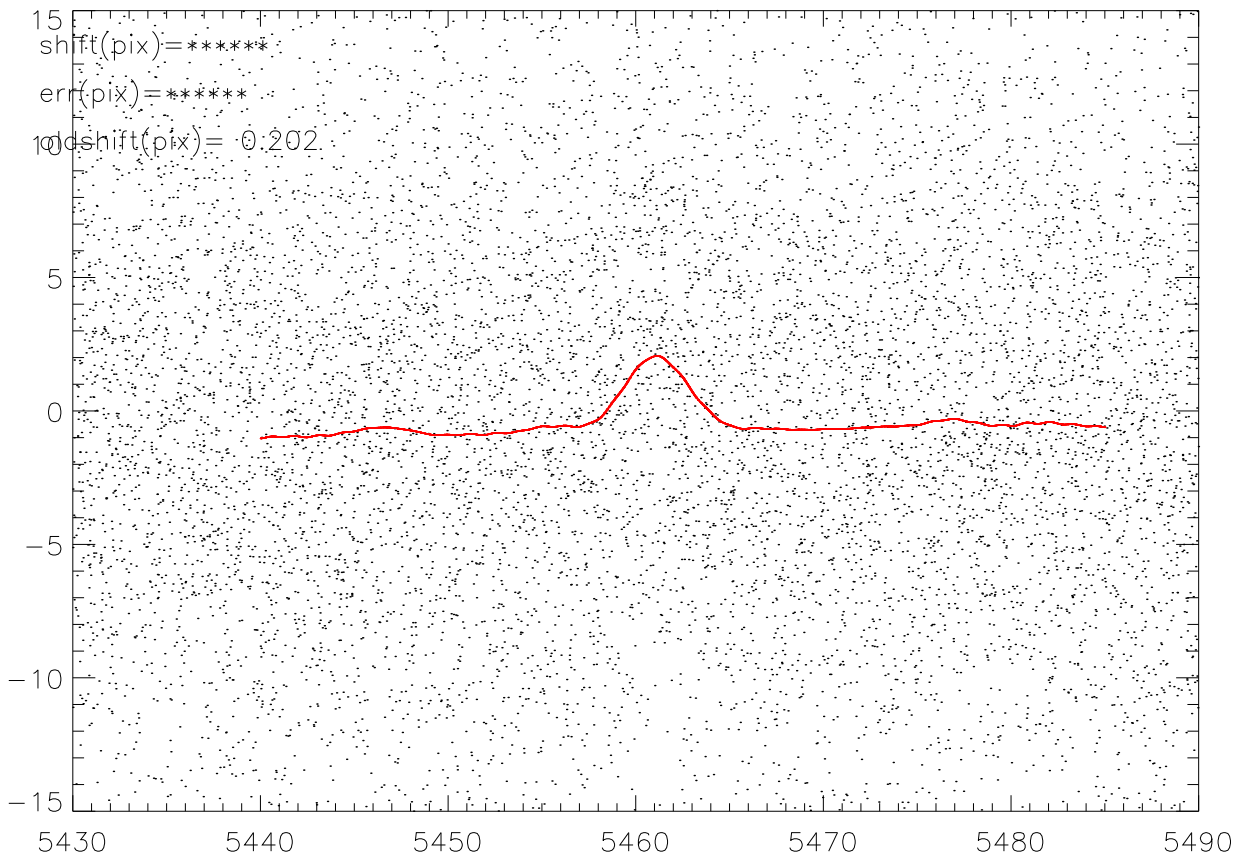

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047762.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = -0.277
Max value = 1.424
Wed Apr 9 14:10:25 2008

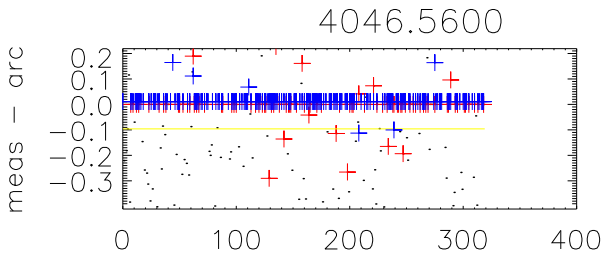

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b1-00047762.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
1.5
1.0
0.5
0.0
χ^2
0
500
1000
1500
2000
Row number

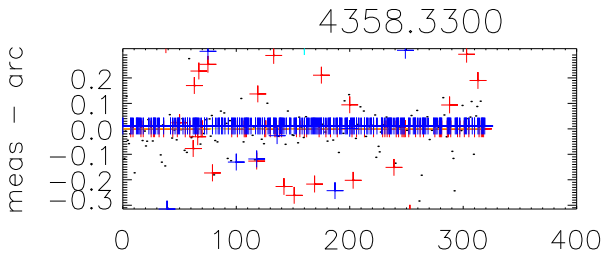

4046.5600
off: 0.22
sig: 0.473
4358.3300
off: 0.16
sig: 0.152
5460.9400
off: 0.20
sig: 0.244
5577.3390
off: 0.13
sig: 0.014
5889.9500
off: 0.16
sig: 0.067
5895.9240
off: 0.00
sig: 0.107

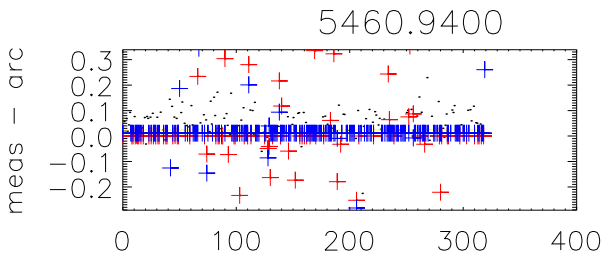

shift(pix)= 2.222
err(pix)= 0.467
oldshift(pix)= 0.218
15
10
5
0
−5
−10
−15
4020
4030
4040
4050
4060
4070
4080

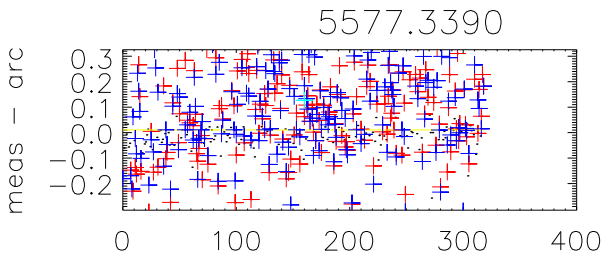

shift(pix)= 0.323
err(pix)= 0.658
oldshift(pix)= 0.161
15
10
5
0
−5
−10
−15
4280
4300
4320
4340
4360
4380
4400
4420

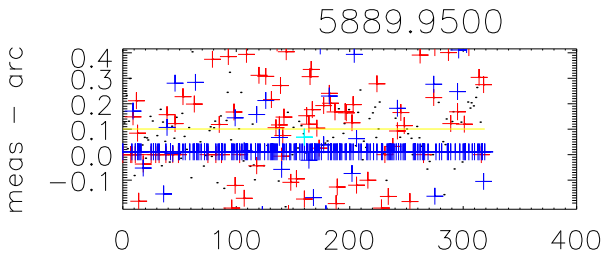

shift(pix)=******
err(pix)=******
oldshift(pix)= 0.202
15
10
5
0
−5
−10
−15
5430
5440
5450
5460
5470
5480
5490

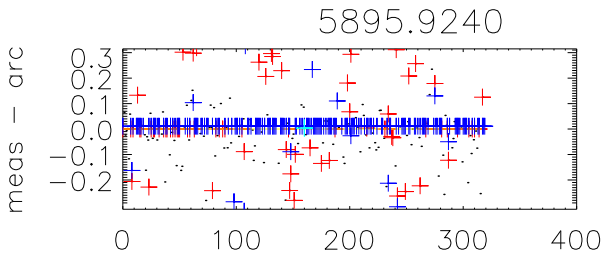

4046.5600
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

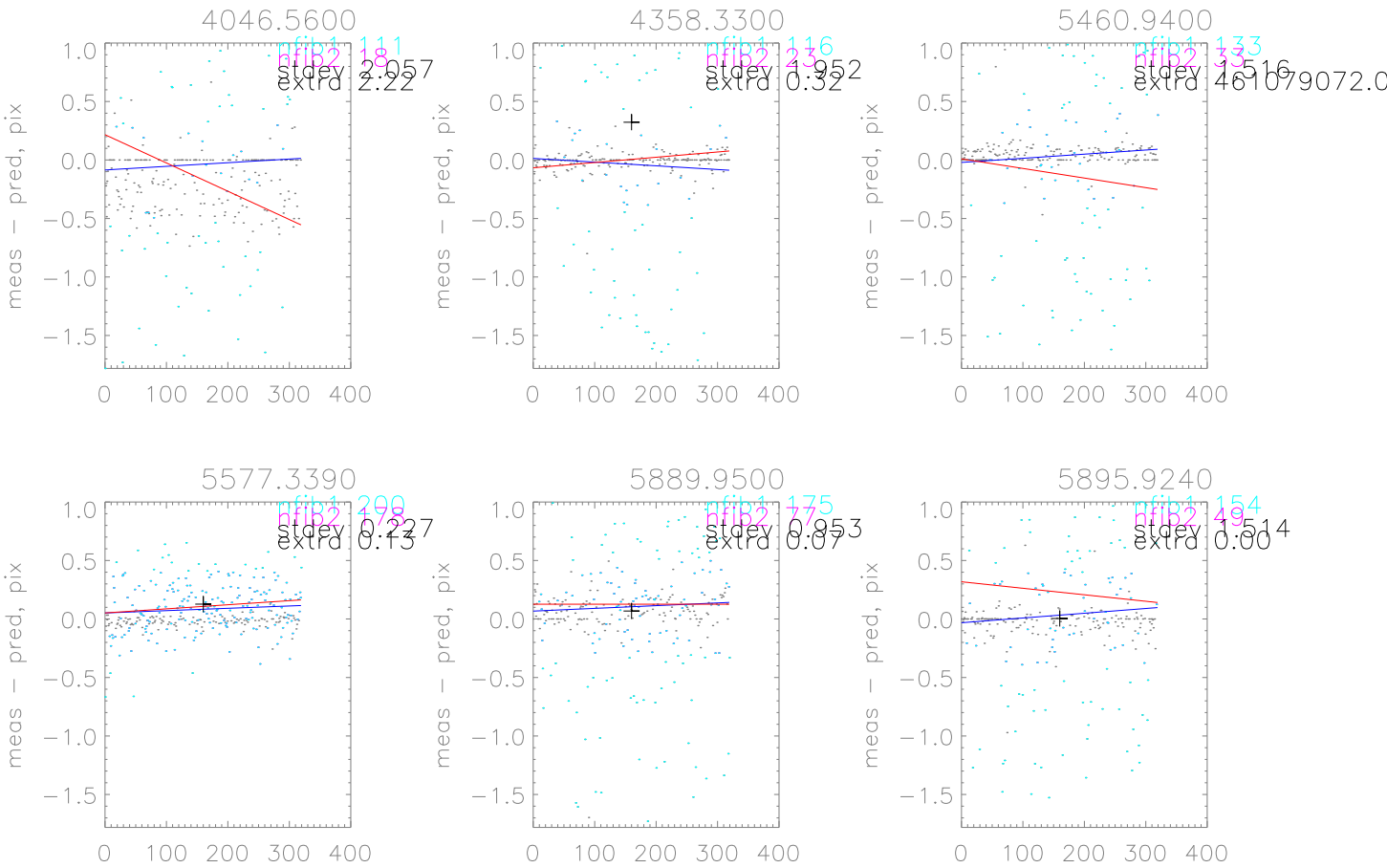

4358.3300
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

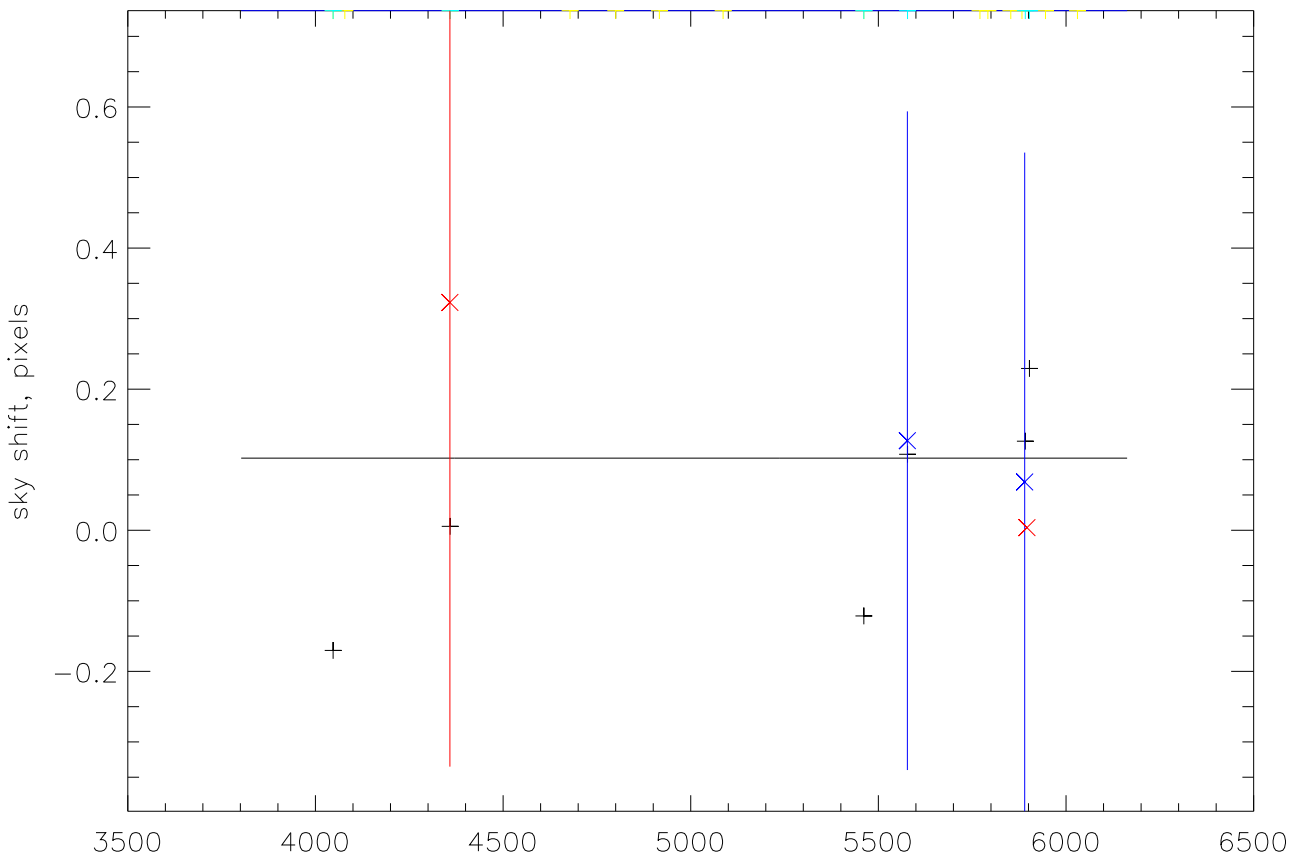

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400


5577.3390
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

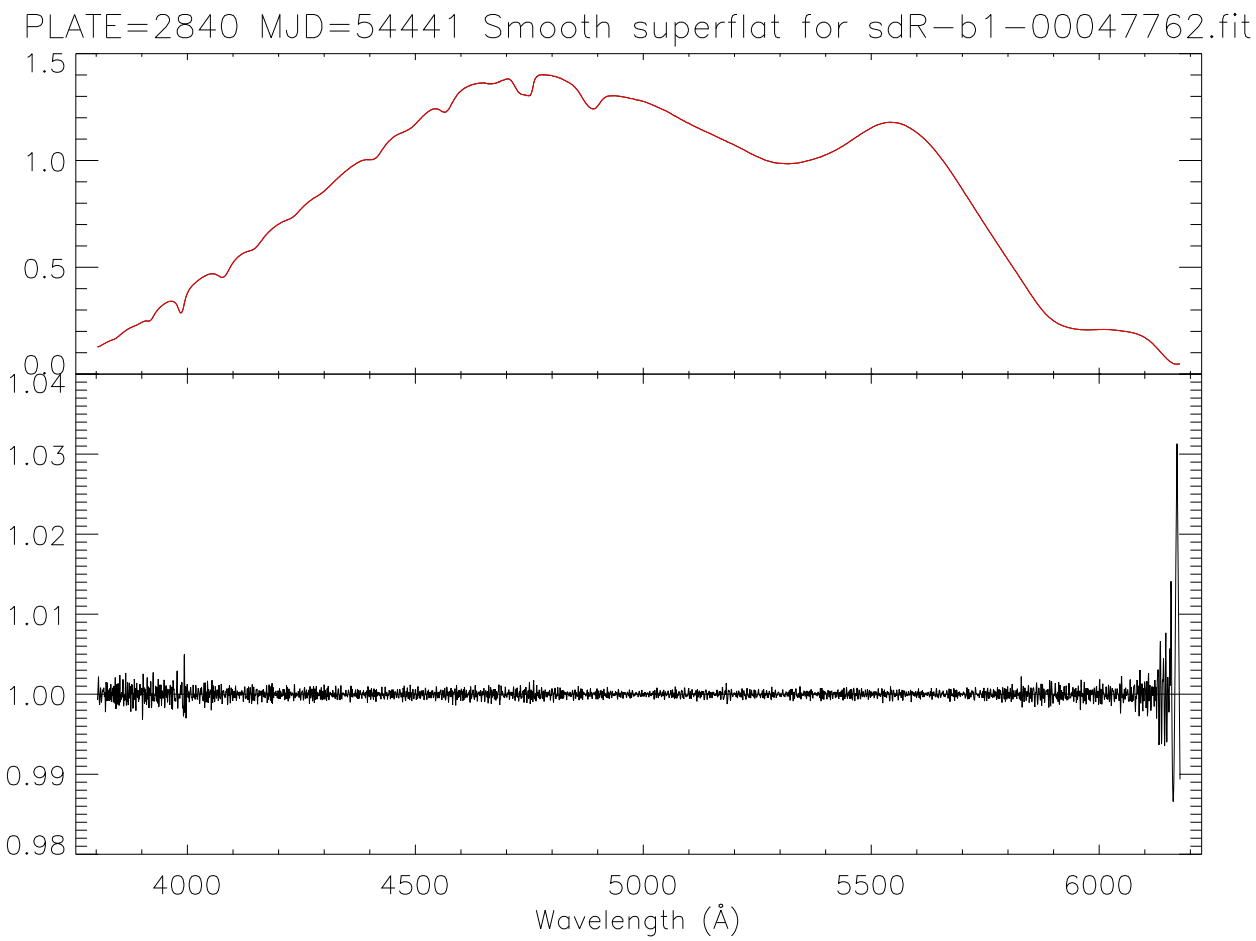

5889.9500
meas − arc
0.4
0.3
0.2
0.1
0.0
−0.1
0
100
200
300
400

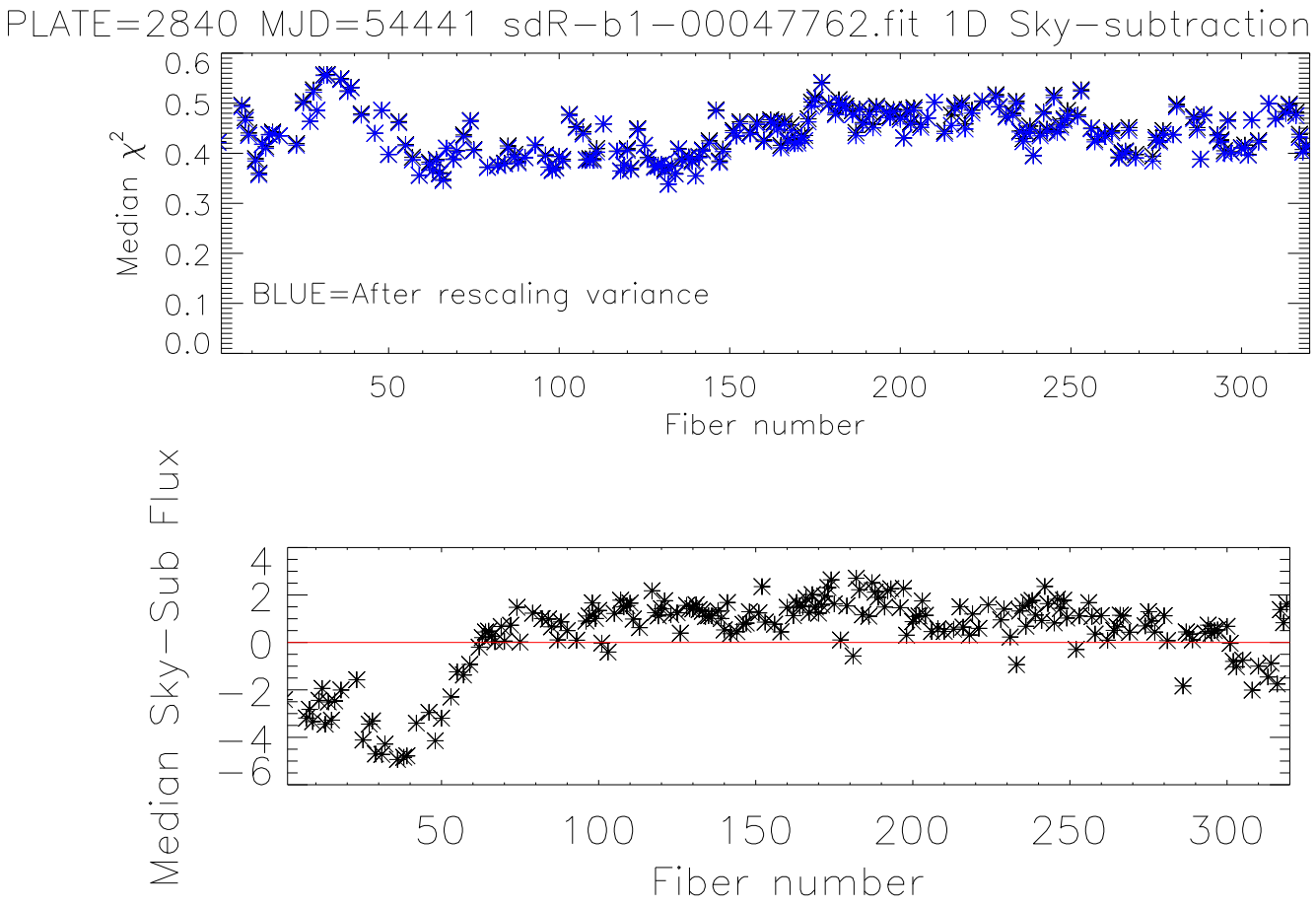

5895.9240
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

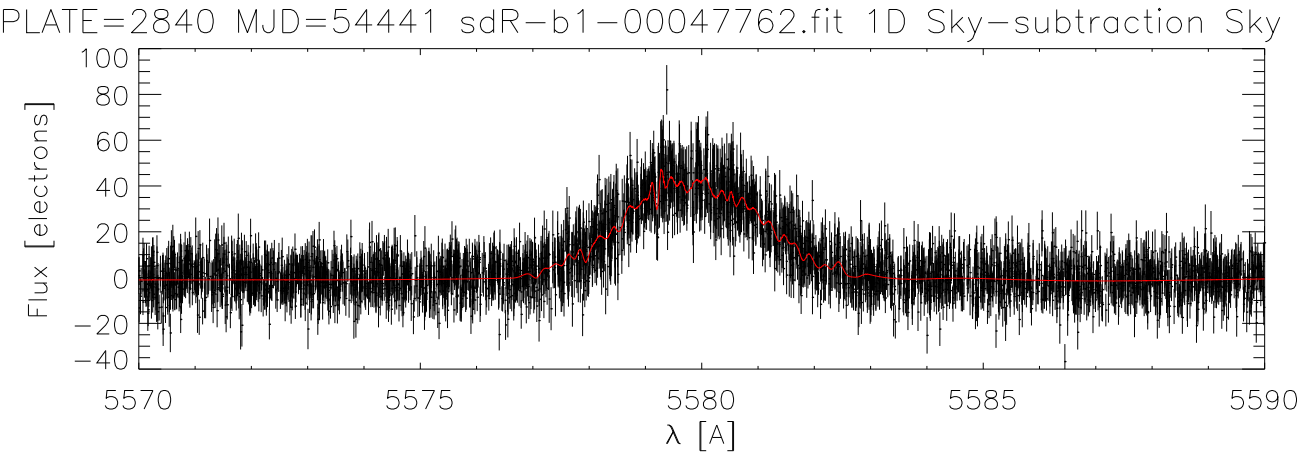

4046.5600
nfib1 111
nfib2 18
stdev 2.057
extrd 2.22
4358.3300
nfib1 116
nfib2 23
stdev 1.952
extrd 0.32
5460.9400
nfib1 133
nfib2 33
stdev 1.516
extrd 461079072.0
5577.3390
nfib1 200
nfib2 178
stdev 0.227
extrd 0.13
5889.9500
nfib1 175
nfib2 77
stdev 0.953
extrd 0.07
5895.9240
nfib1 154
nfib2 49
stdev 1.514
extrd 0.00
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
−1.5
0
100
200
300
400

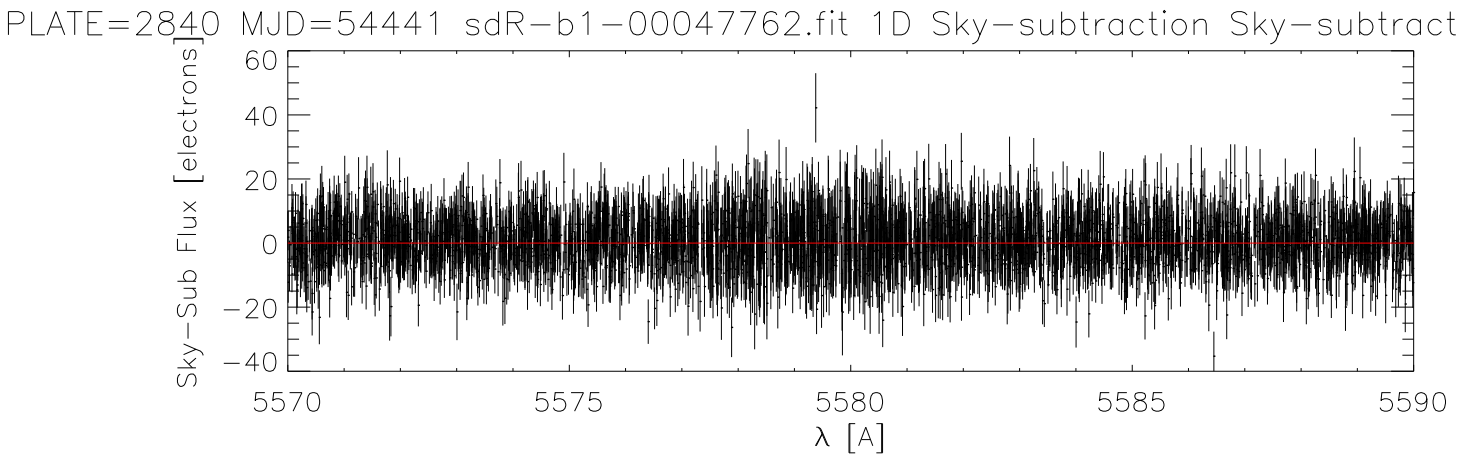

sky shift, pixels
0.6
0.4
0.2
0.0
−0.2
3500
4000
4500
5000
5500
6000
6500

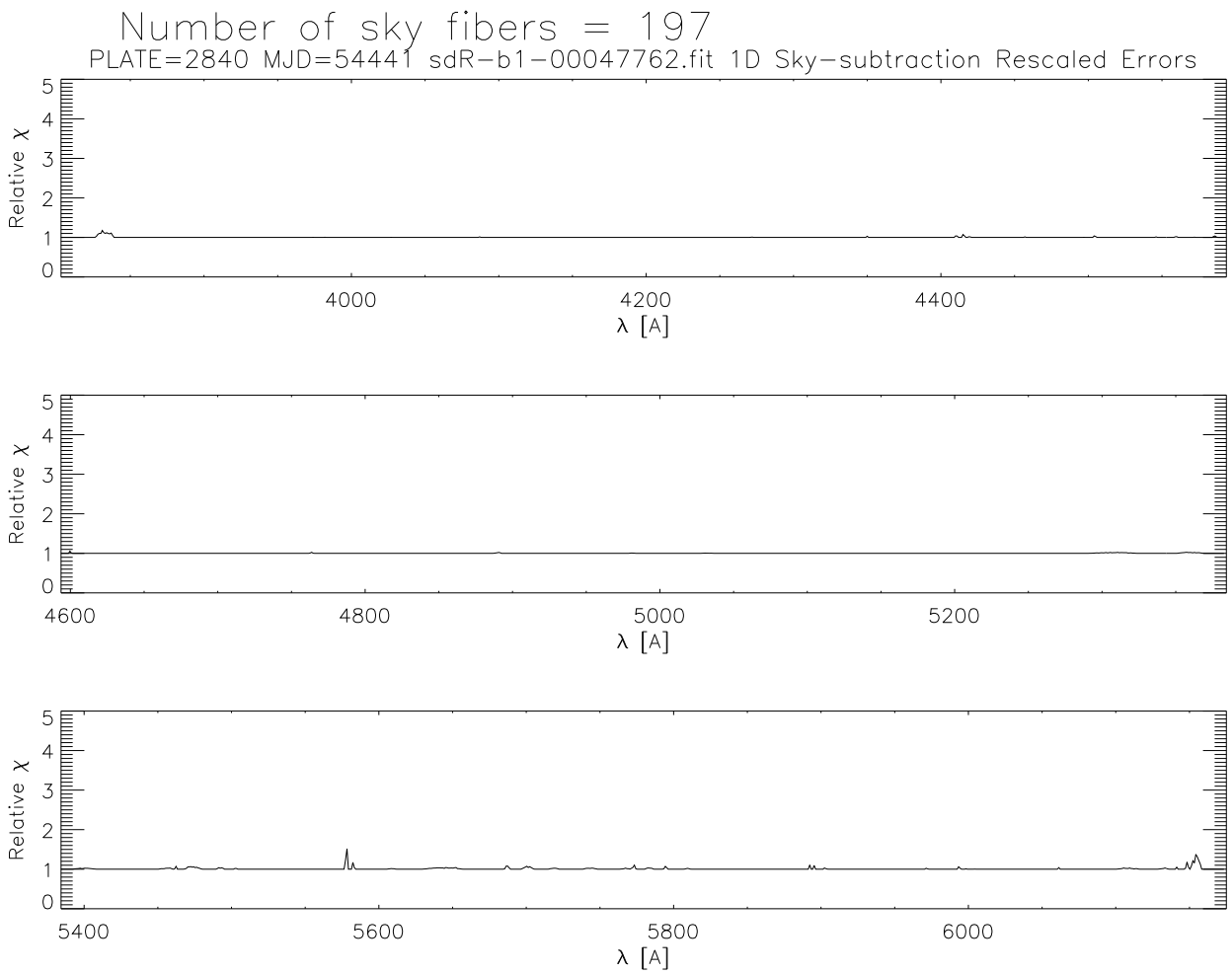
es= −0.0001

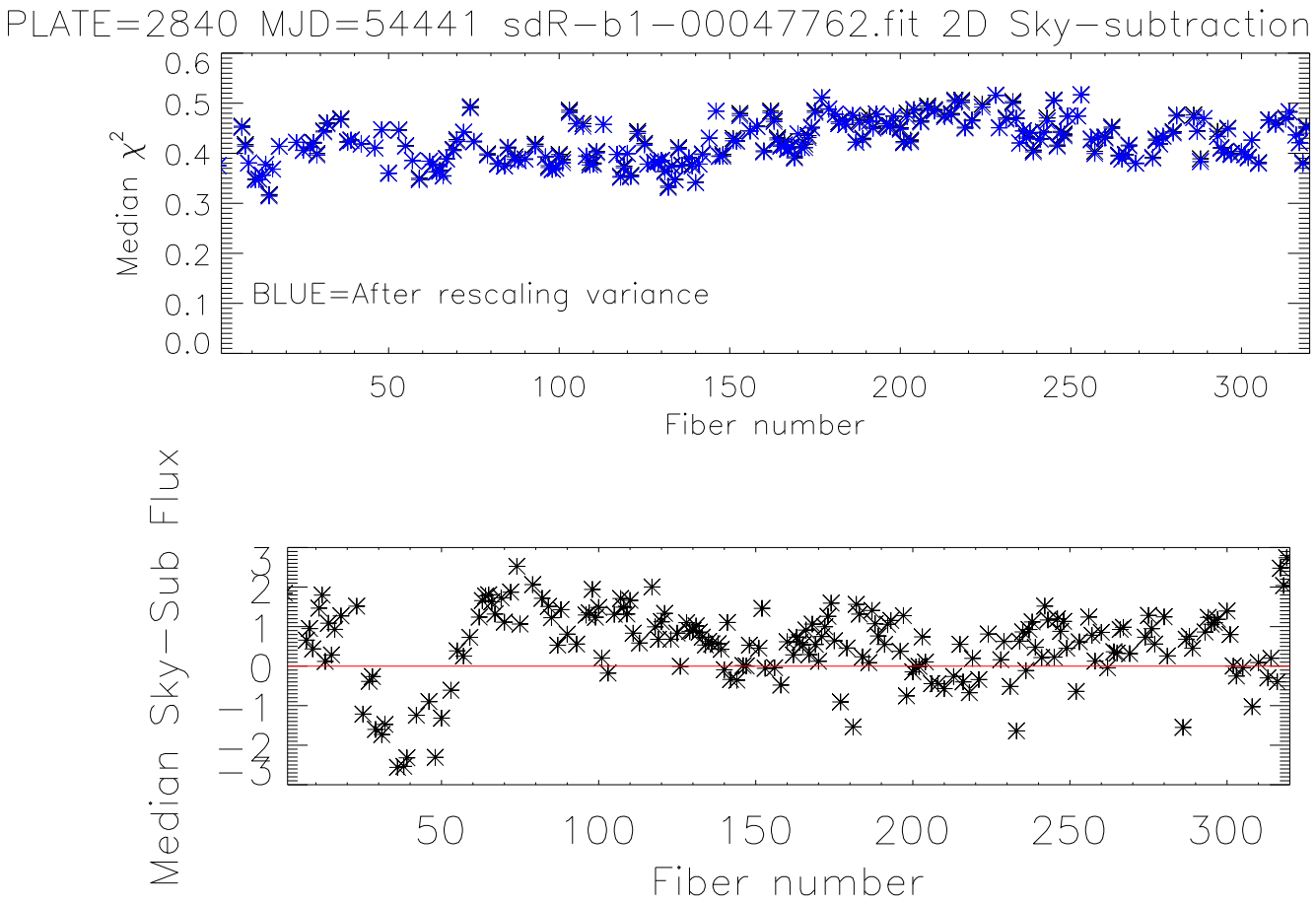

PLATE=2840 MJD=54441 Smooth superflat for sdR−b1−00047762.fit
1.5
1.0
0.5
0.0
1.04
1.03
1.02
1.01
1.00
0.99
0.98
4000
4500
5000
5500
6000
Wavelength (Å)

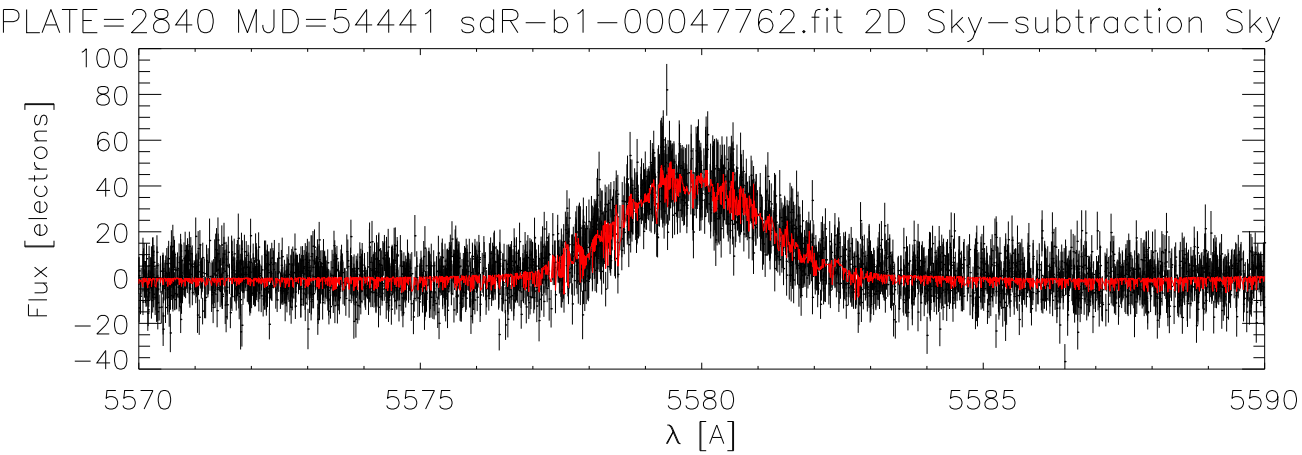

PLATE=2840 MJD=54441 sdR-b1-00047762.fit 1D Sky-subtraction Sky Fiber
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

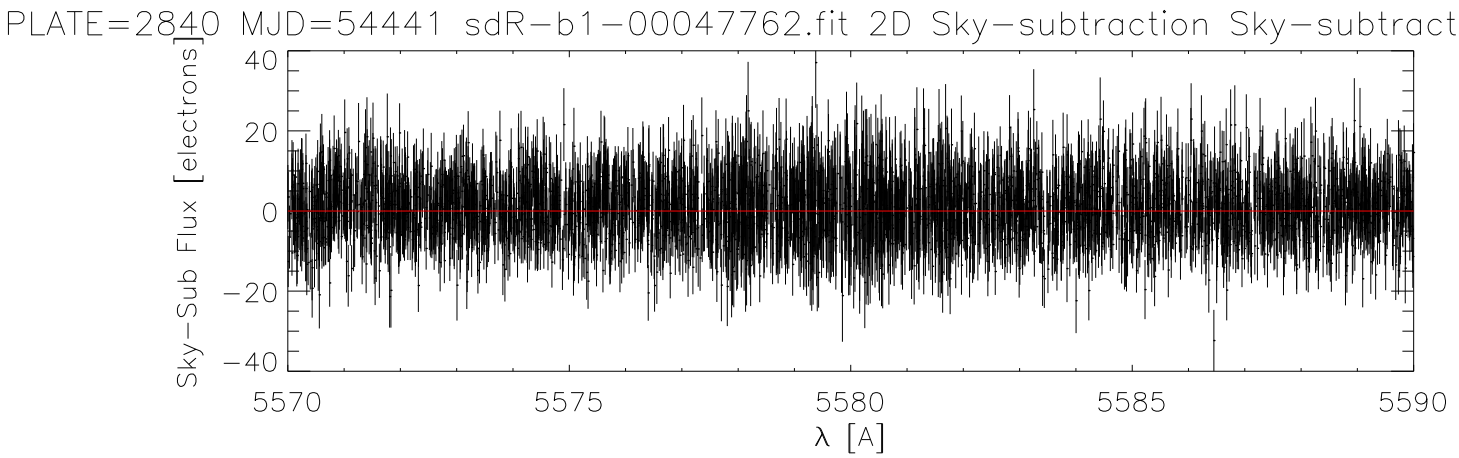

PLATE=2840 MJD=54441 sdR-b1-00047762.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
100
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

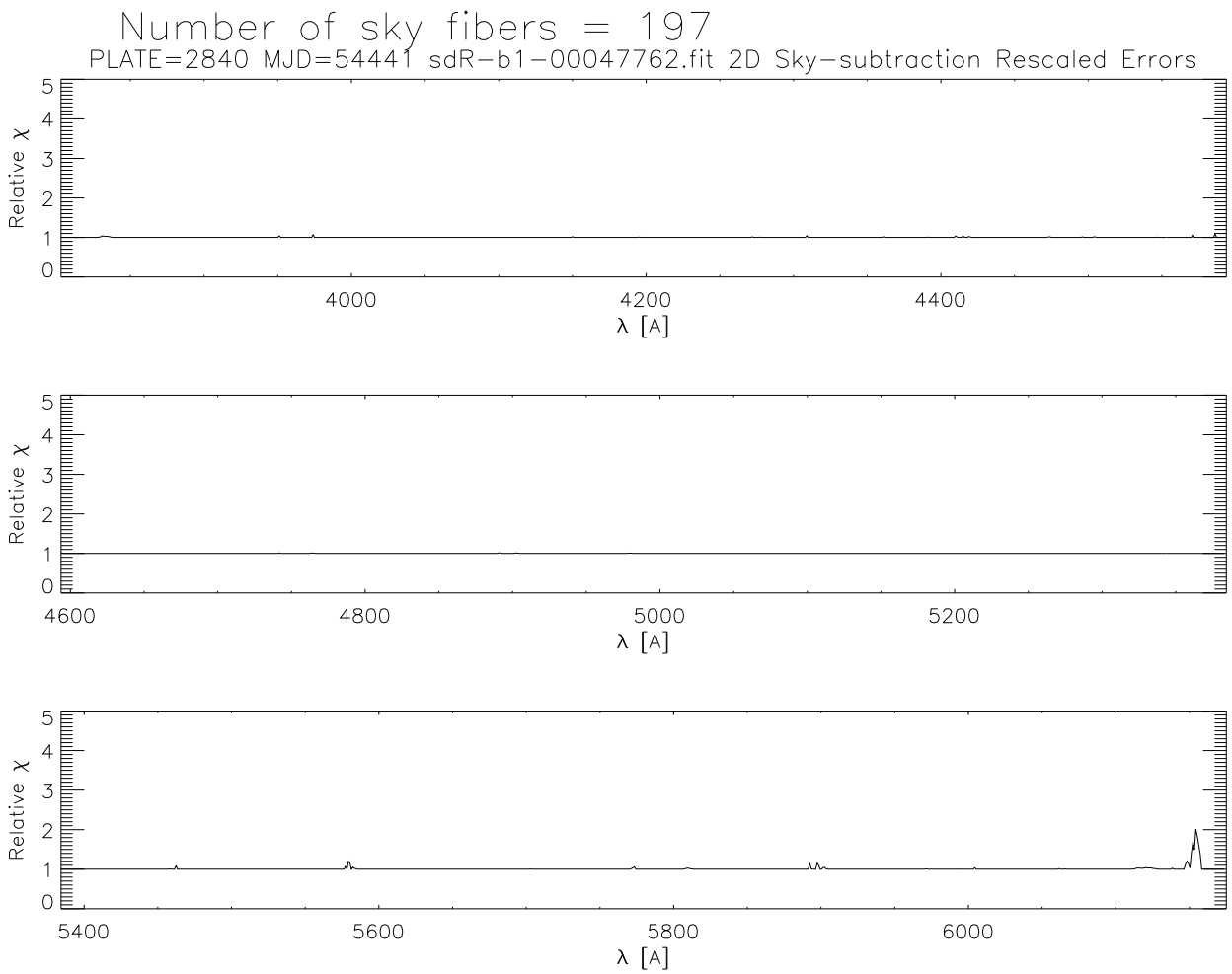

PLATE=2840 MJD=54441 sdR-b1-00047762.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

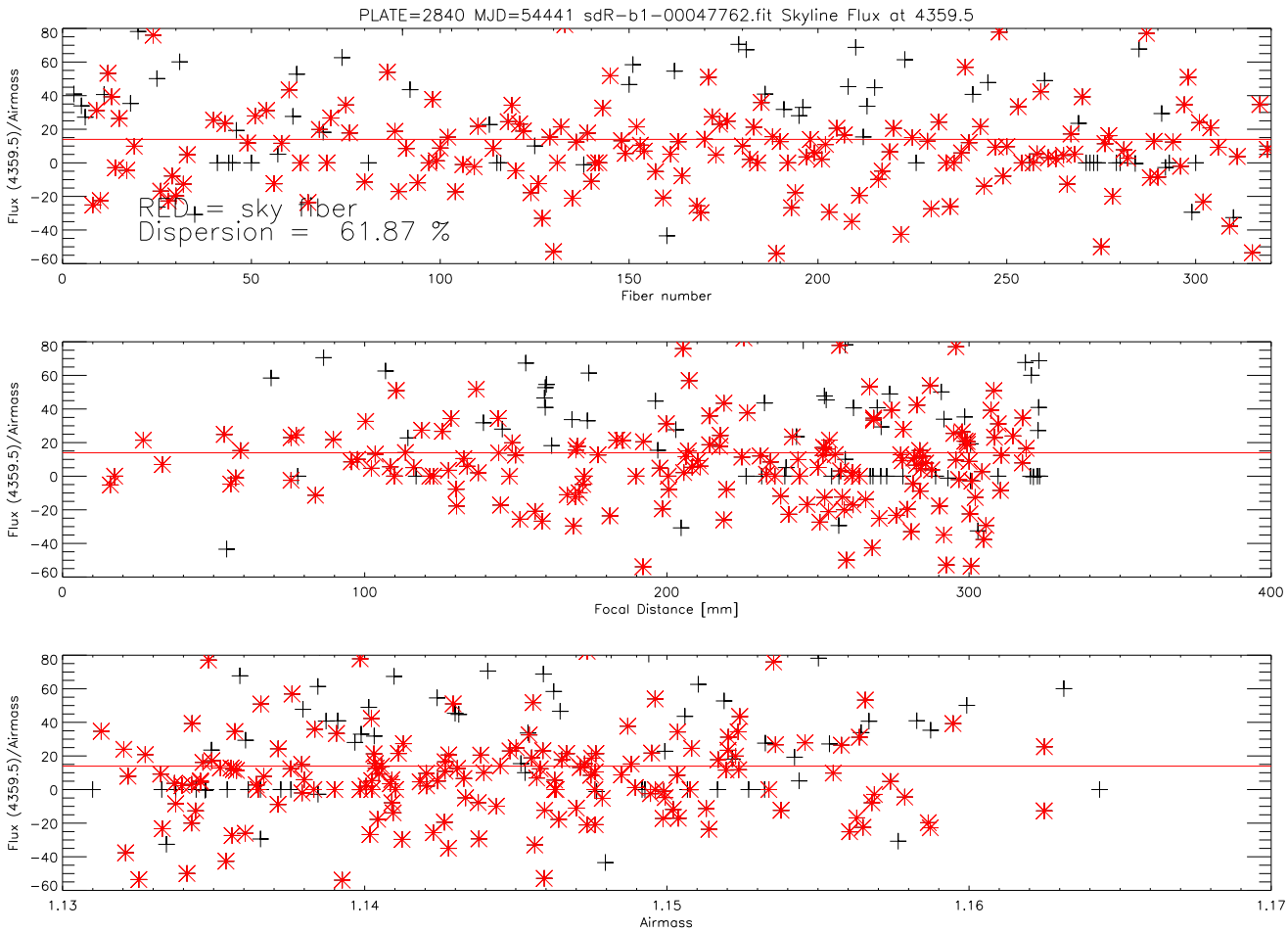

Number of sky fibers = 197
PLATE=2840 MJD=54441 sdR-b1-00047762.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

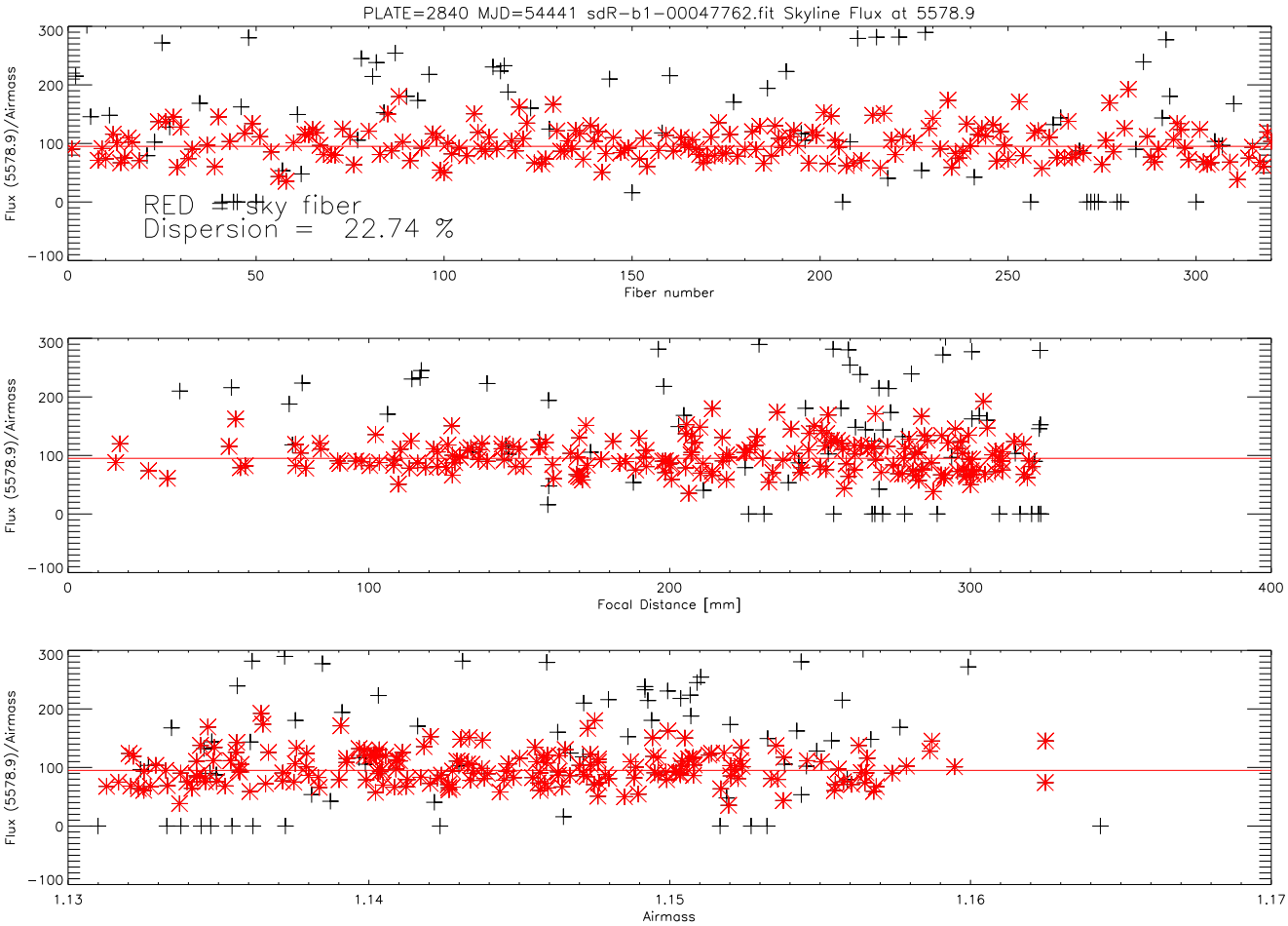

PLATE=2840 MJD=54441 sdR-b1-00047762.fit 2D Sky-subtraction Sky Fiber
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

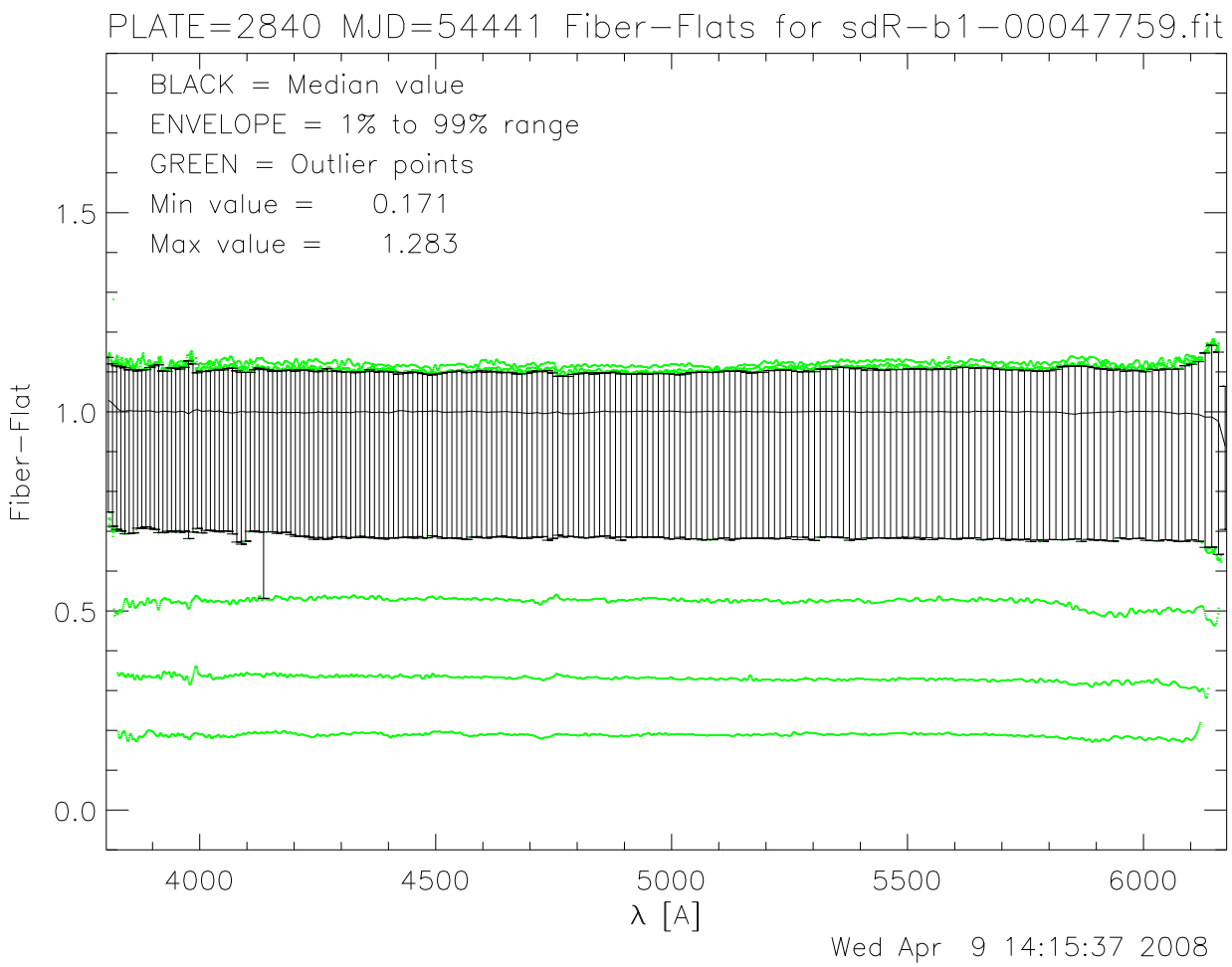

PLATE=2840 MJD=54441 sdR-b1-00047762.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
100
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

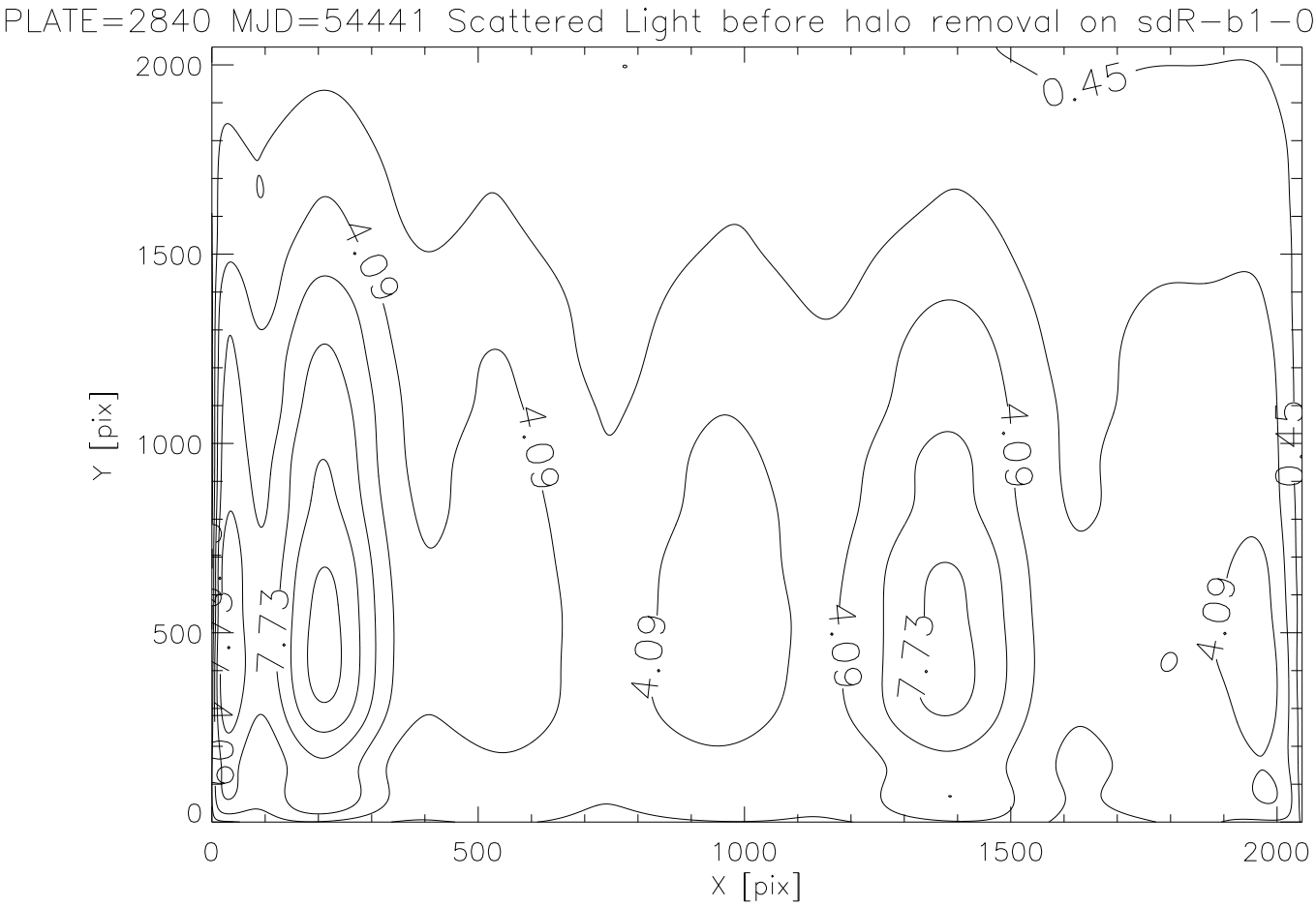

PLATE=2840 MJD=54441 sdR-b1-00047762.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

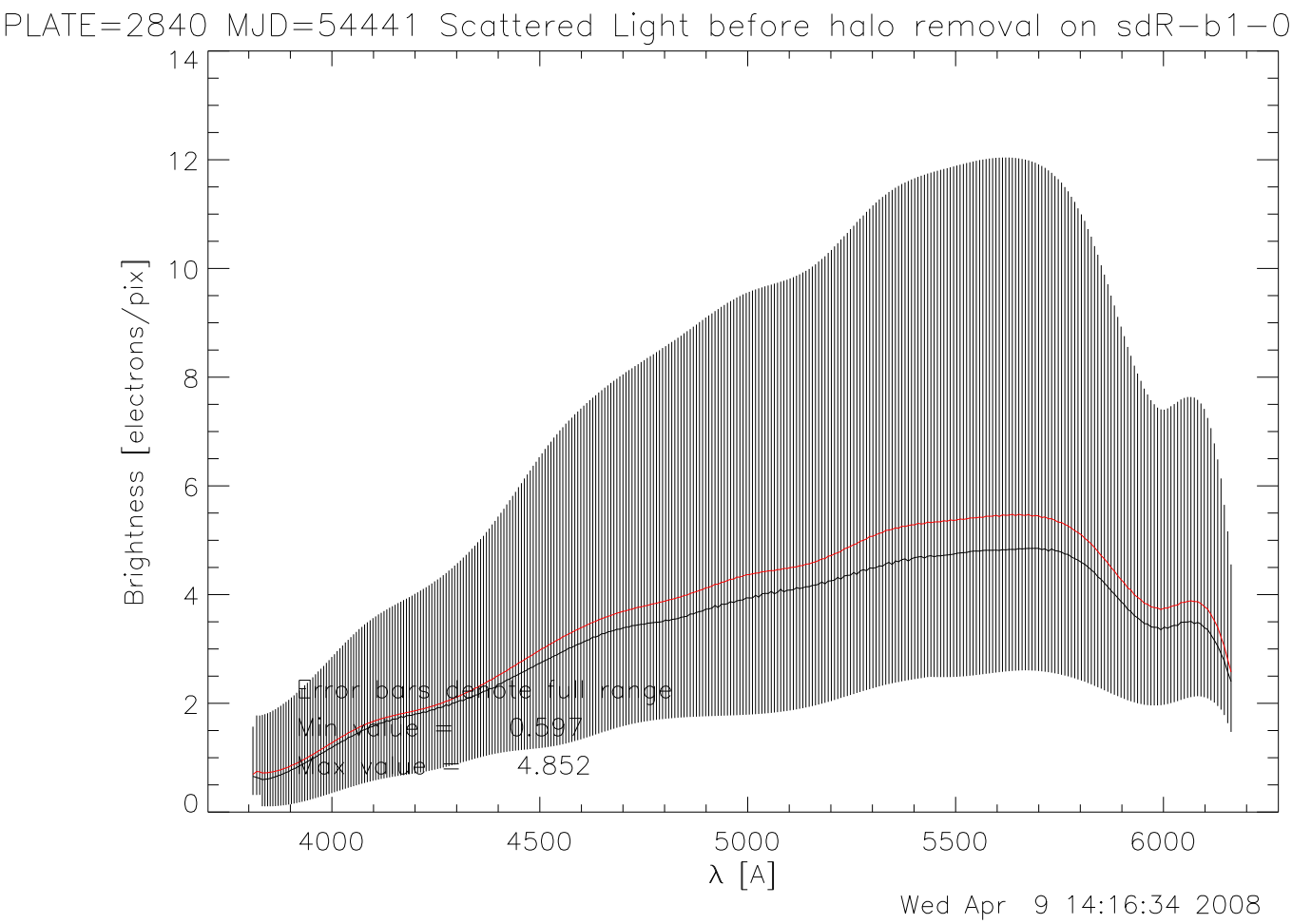

Number of sky fibers = 197
PLATE=2840 MJD=54441 sdR-b1-00047762.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

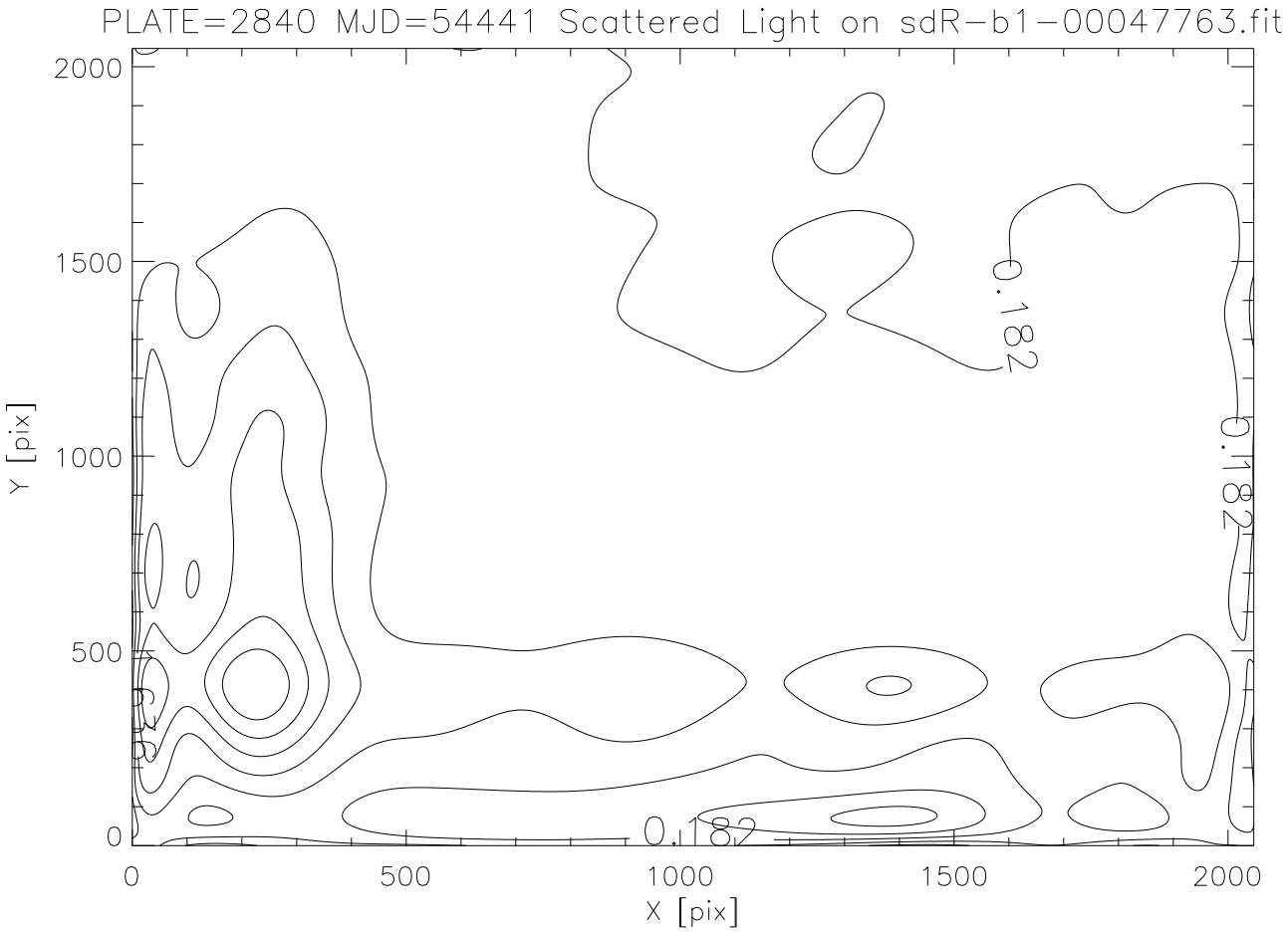

PLATE=2840 MJD=54441 sdR-b1-00047762.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
Fiber number
RED = sky fiber
Dispersion = 61.87 %
Flux (4359.5)/Airmass
Focal Distance [mm]
Flux (4359.5)/Airmass
Airmass

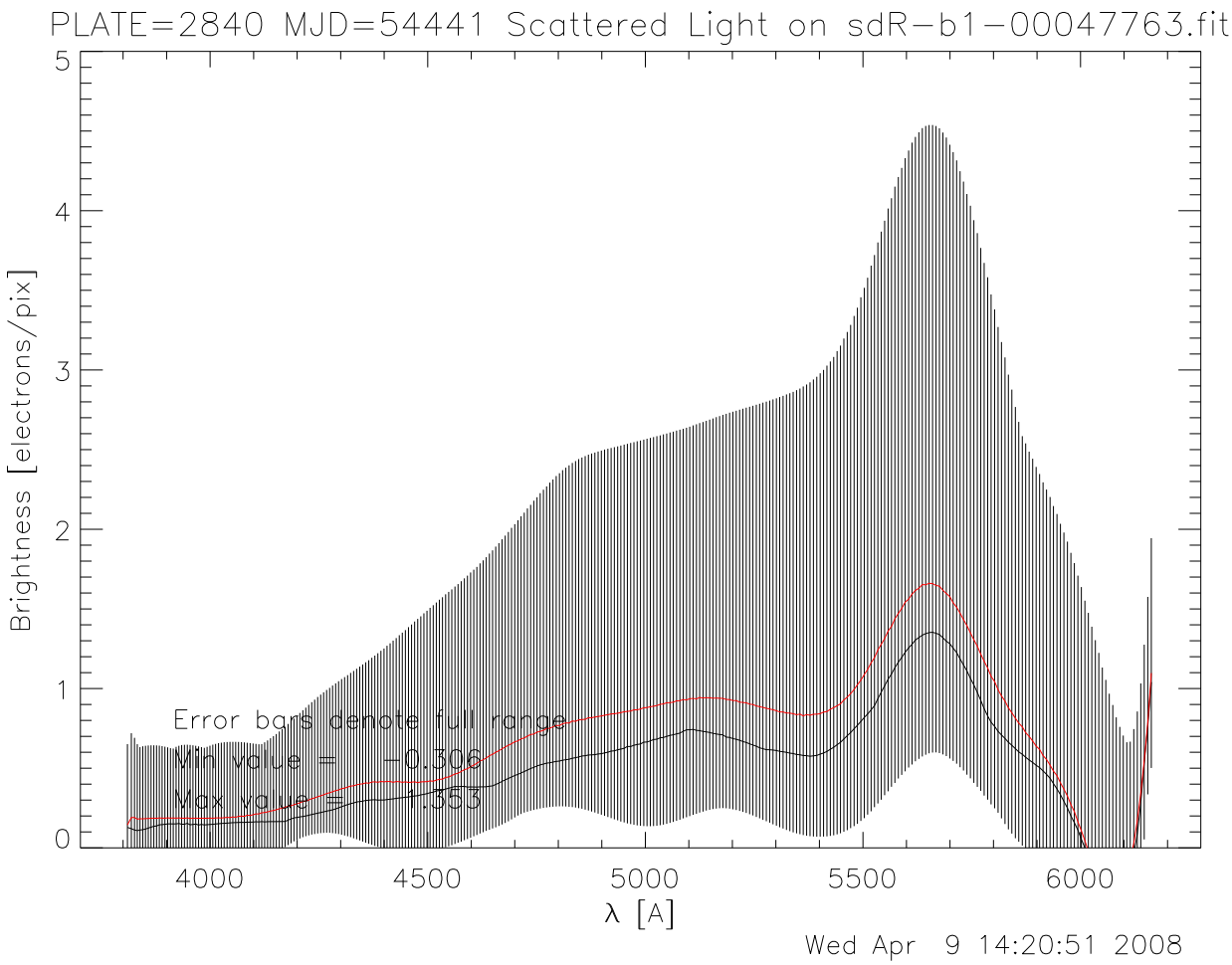

PLATE=2840 MJD=54441 sdR-b1-00047762.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
RED sky fiber
Dispersion = 22.74 %
Fiber number
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

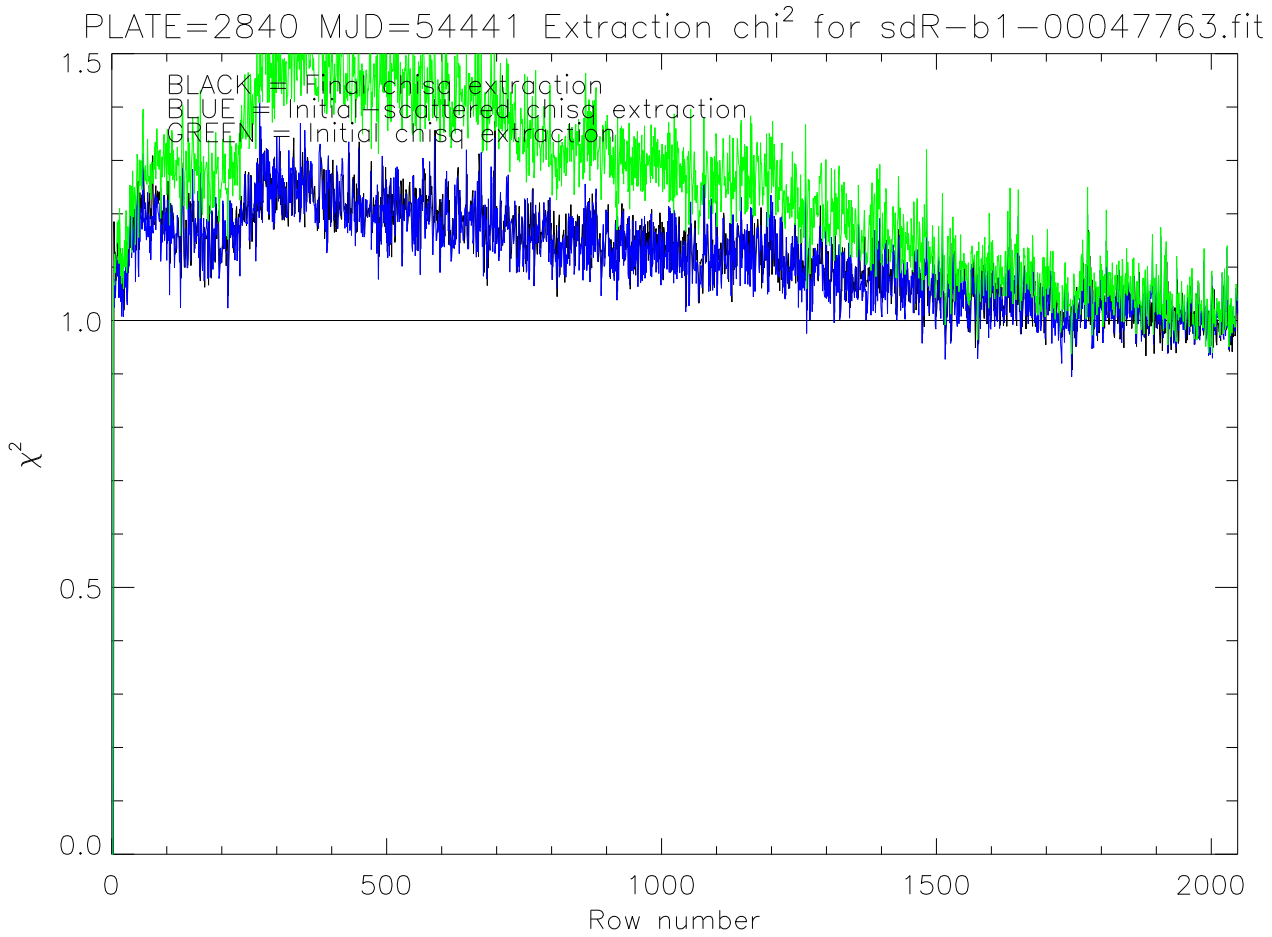

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b1-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.171
Max value = 1.283
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 14:15:37 2008

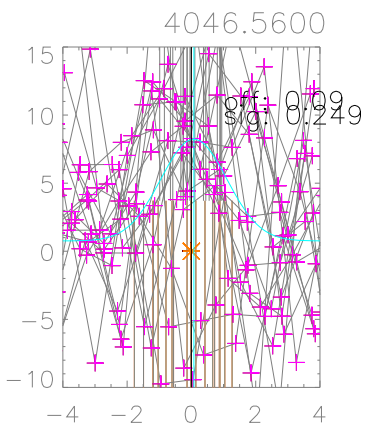

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR−b1−00047763.f
0.45
4.09
7.73
Y [pix]
X [pix]
0
500
1000
1500
2000

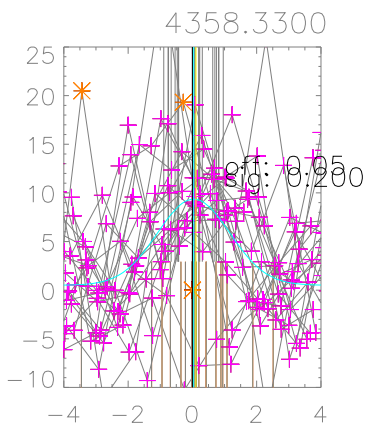

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b1-00047763.f
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.597
Max value = 4.852
Wed Apr 9 14:16:34 2008

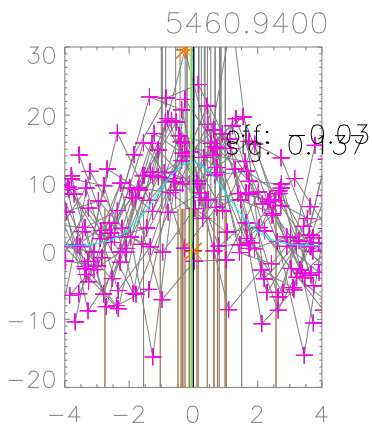

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047763.fit
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
0.182
0.182
0.182

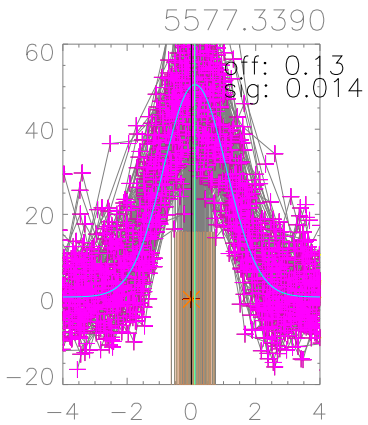

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047763.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = -0.306
Max value = 1.353
Wed Apr 9 14:20:51 2008

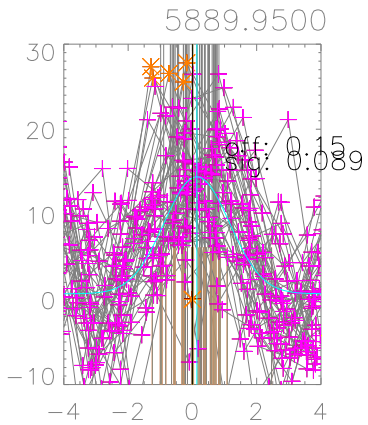

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b1-00047763.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
1.5
1.0
0.5
0.0
χ^2
0
500
1000
1500
2000
Row number

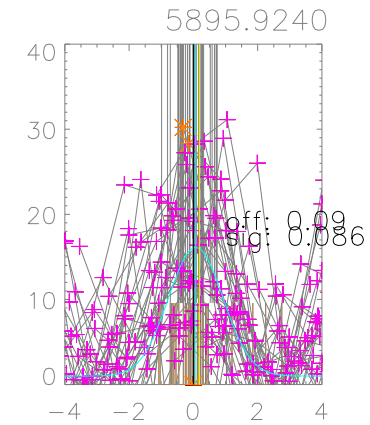

4046.5600
off: 0.09
sig: 0.249

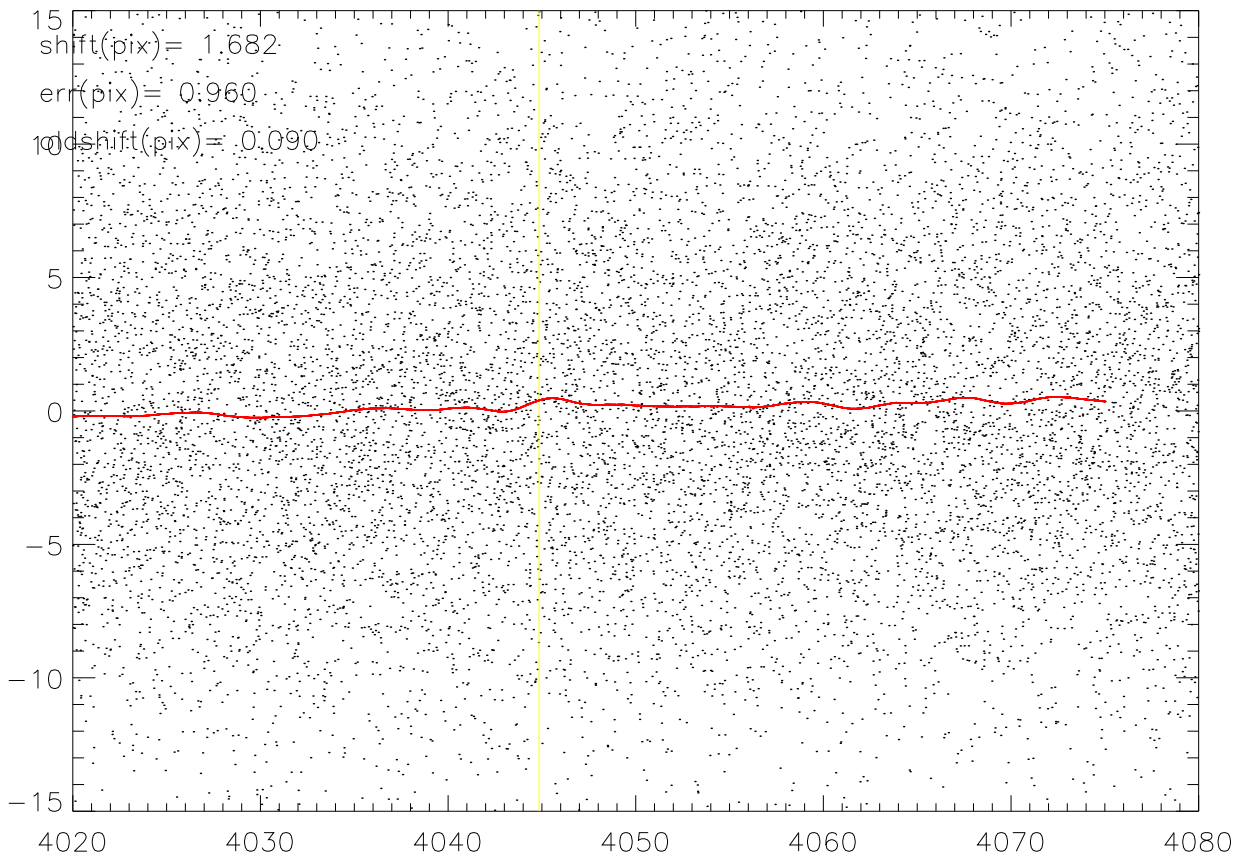

4358.3300
off: 0.05
sig: 0.200

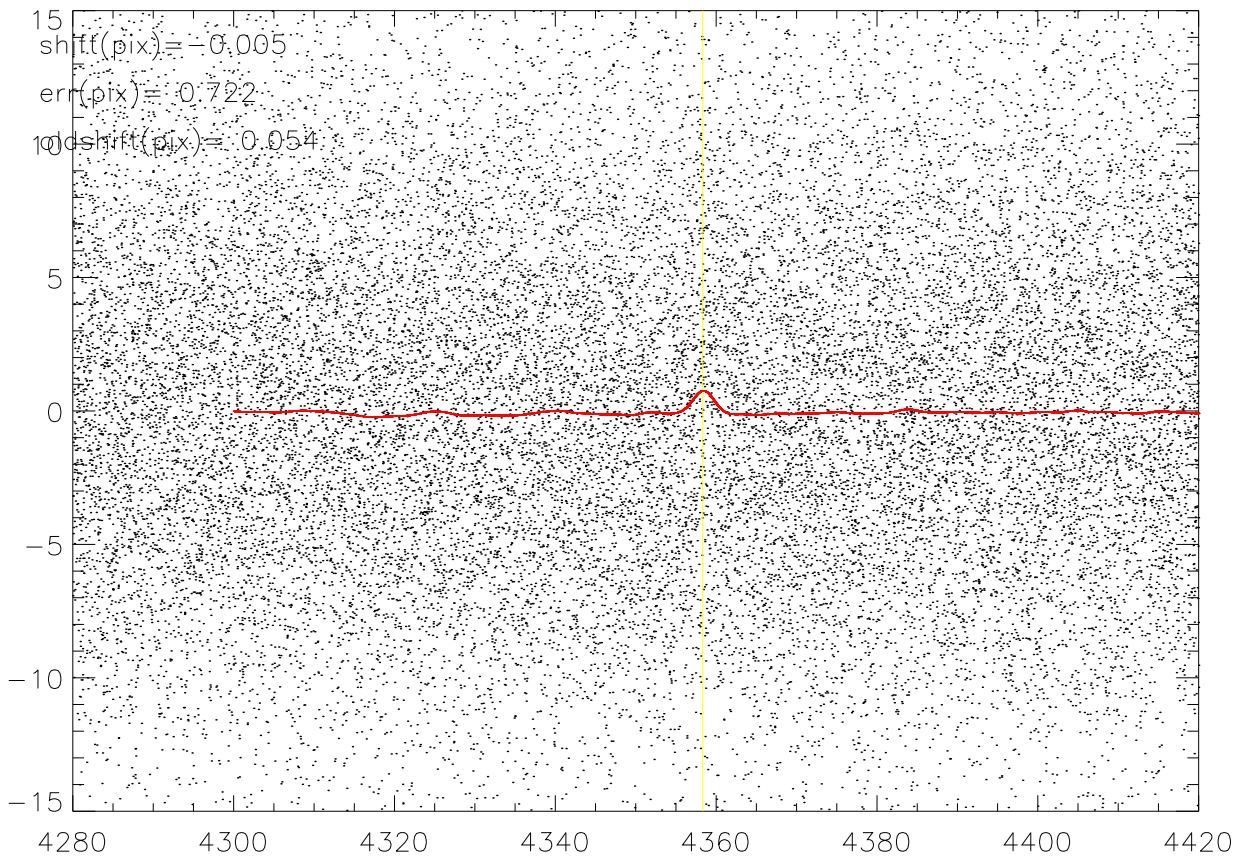

5460.9400
off: 0.03
sig: 0.137

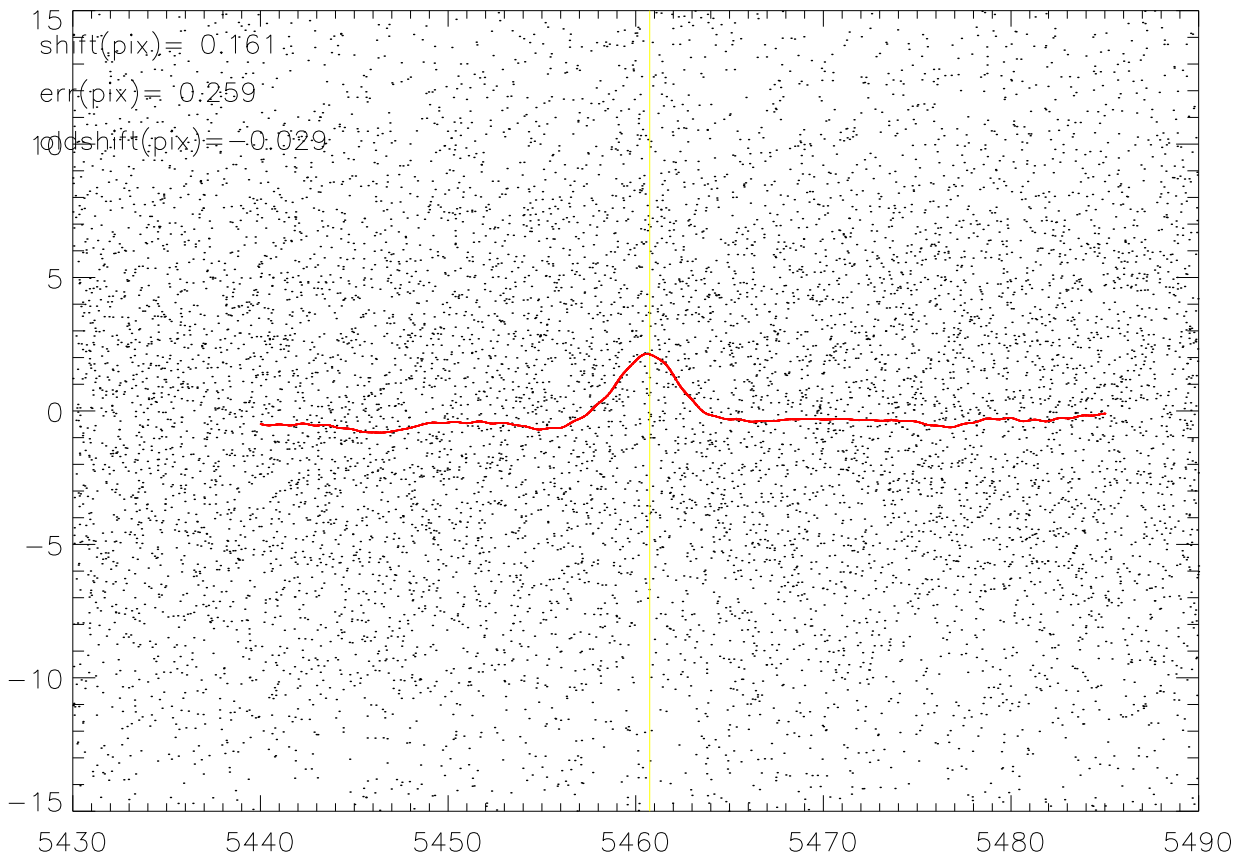

5577.3390
off: 0.13
sig: 0.014

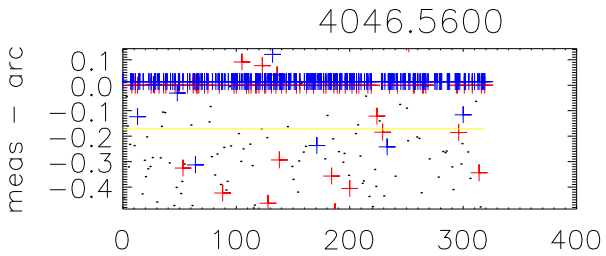

5889.9500
off: 0.15
sig: 0.089

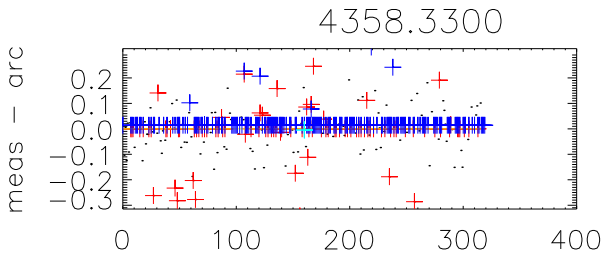

5895.9240
off: 0.09
sig: 0.086

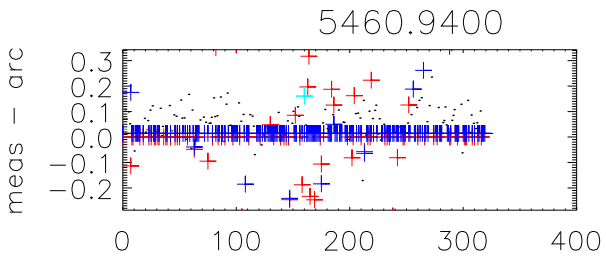

shift(pix)= 1.682
err(pix)= 0.960
oldshift(pix)= 0.090
15
10
5
0
−5
−10
−15
4020
4030
4040
4050
4060
4070
4080

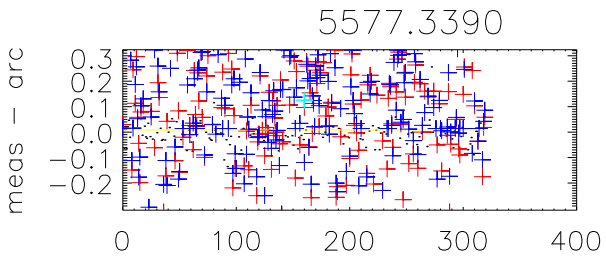

shift(pix)=−0.005
err(pix)= 0.722
oldshift(pix)= 0.054
15
10
5
0
−5
−10
−15
4280
4300
4320
4340
4360
4380
4400
4420

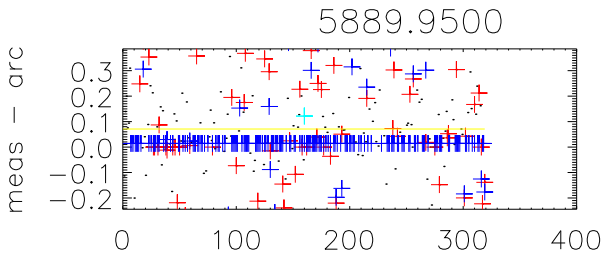

shift(pix)= 0.161
err(pix)= 0.259
oldshift(pix)=−0.029
15
10
5
0
−5
−10
−15
5430
5440
5450
5460
5470
5480
5490

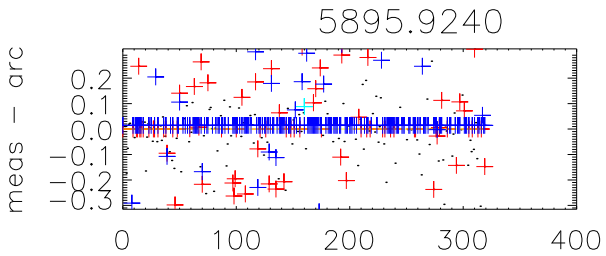

4046.5600
meas − arc
0.1
0.0
−0.1
−0.2
−0.3
−0.4
0
100
200
300
400

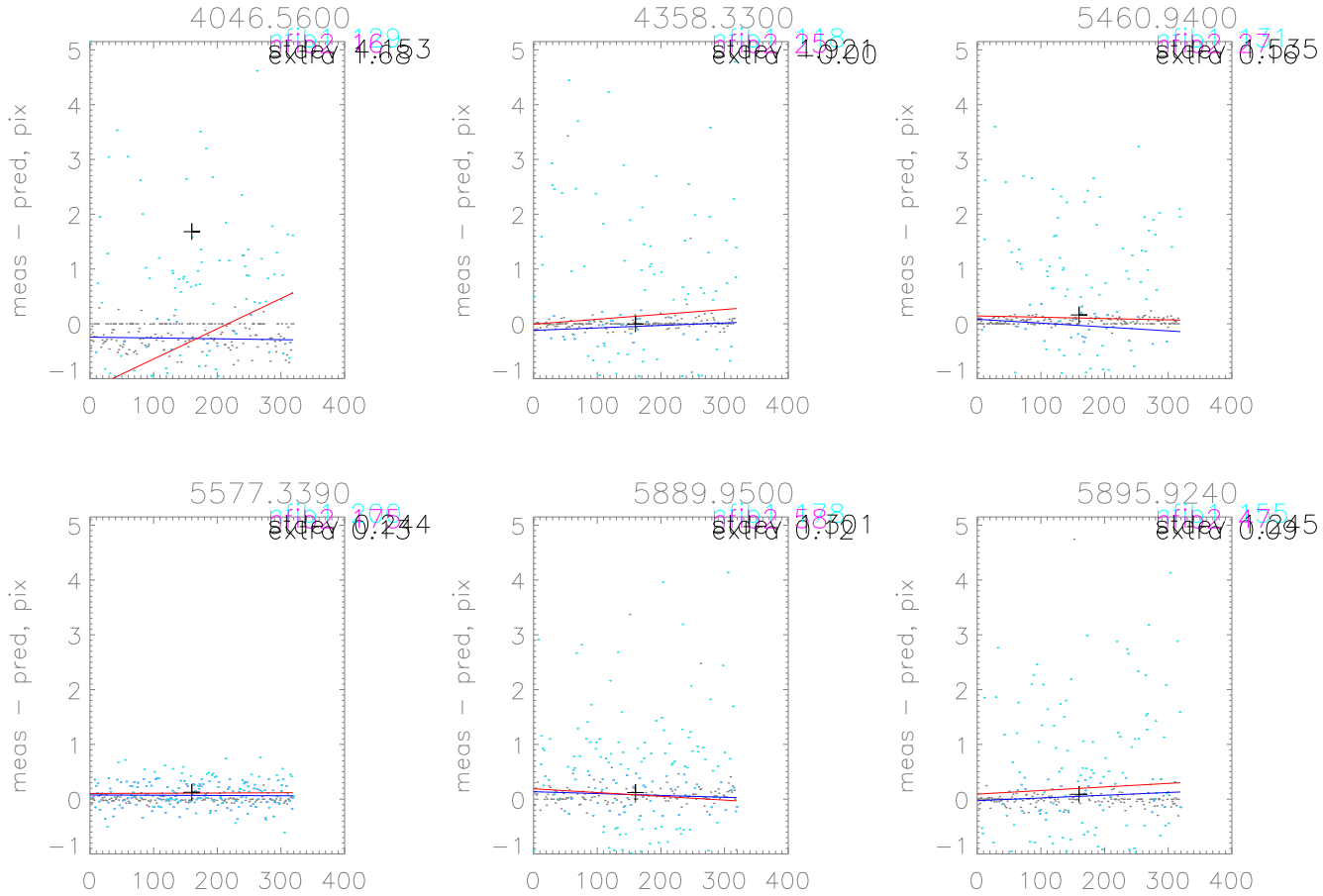

4358.3300
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

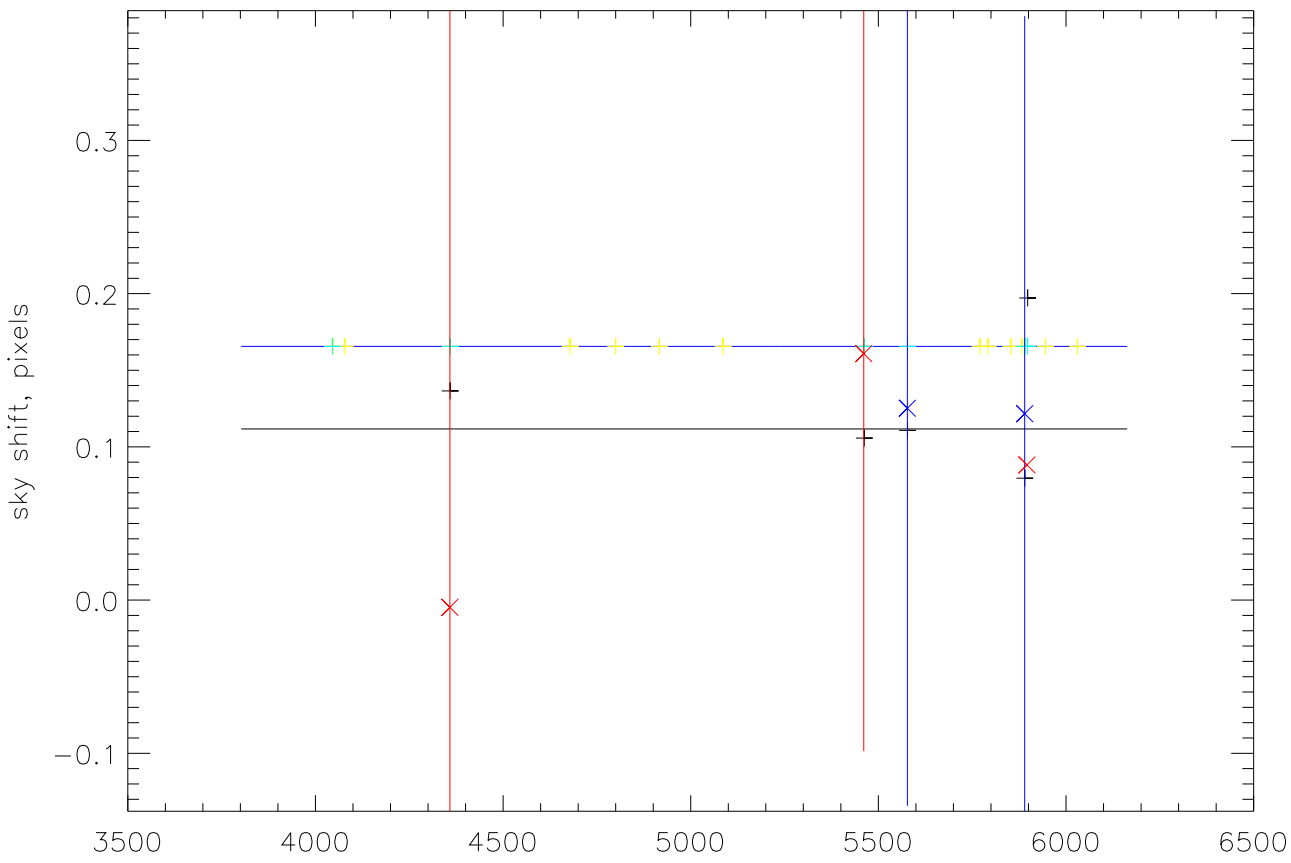

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

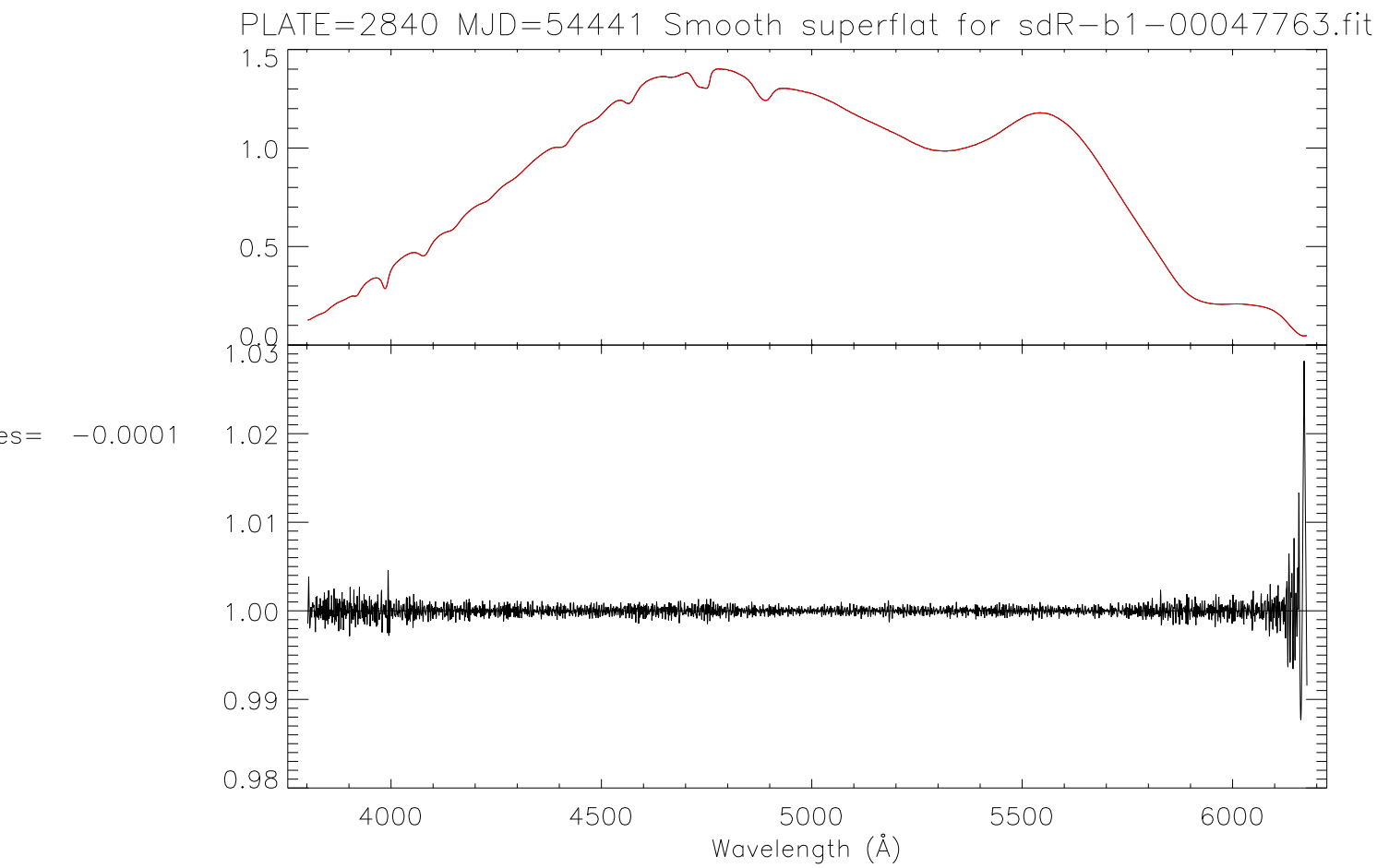

5577.3390
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400


5889.9500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

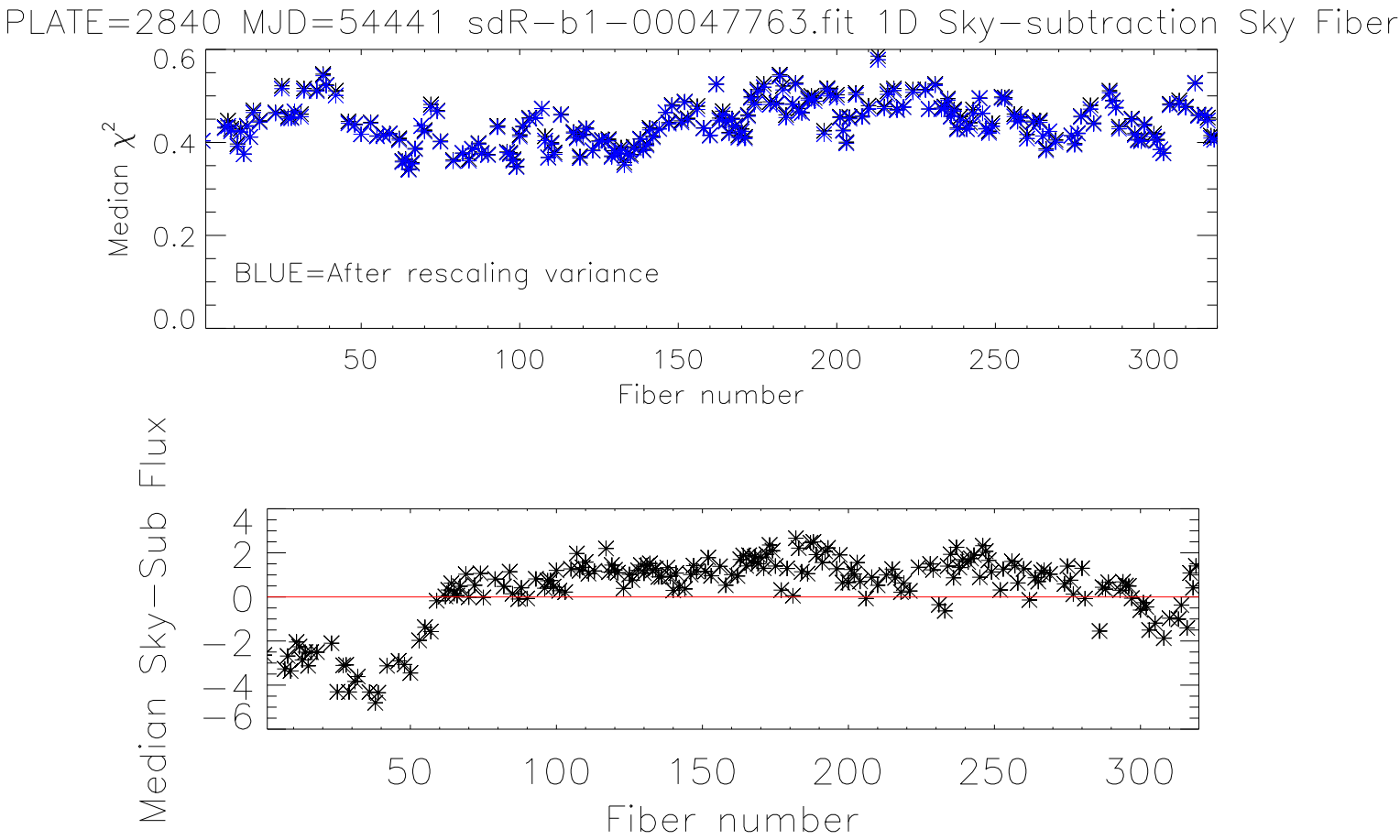

5895.9240
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

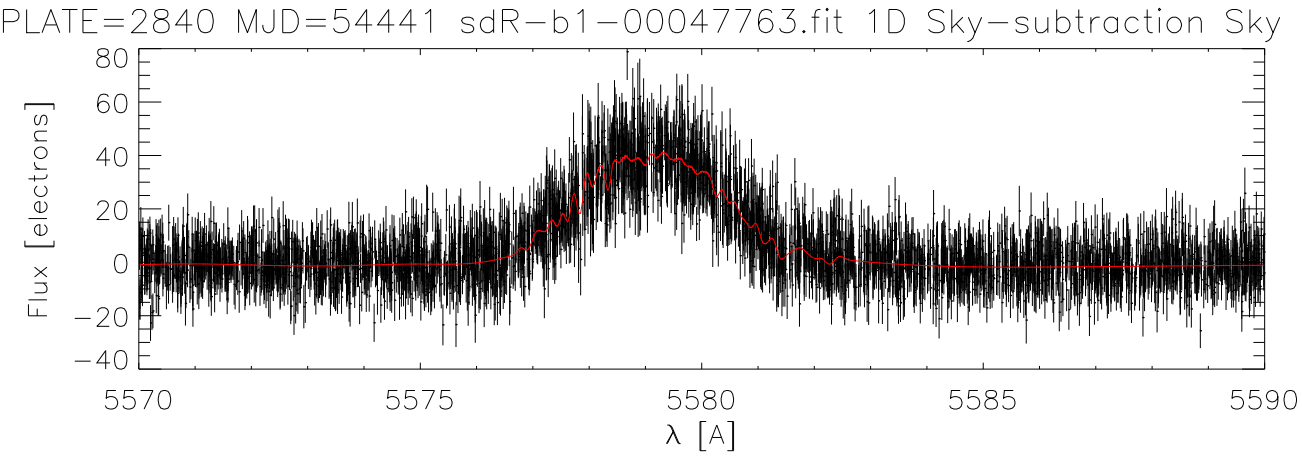

4046.5600
nfib2 160
extra 1.153
4358.3300
nfib2 148
extra 0.921
5460.9400
nfib2 131
extra 0.535
5577.3390
nfib2 205
extra 0.244
5889.9500
nfib2 138
extra 0.201
5895.9240
nfib2 155
extra 0.245
meas − pred, pix
0 100 200 300 400
5 4 3 2 1 0 −1

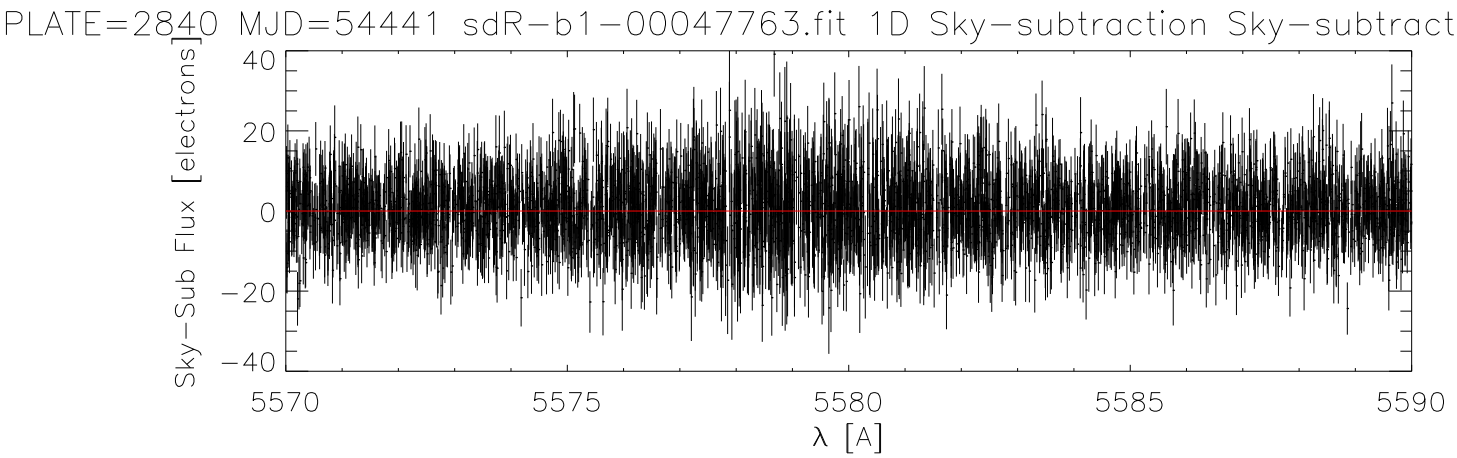

sky shift, pixels
0.3
0.2
0.1
0.0
−0.1
3500
4000
4500
5000
5500
6000
6500

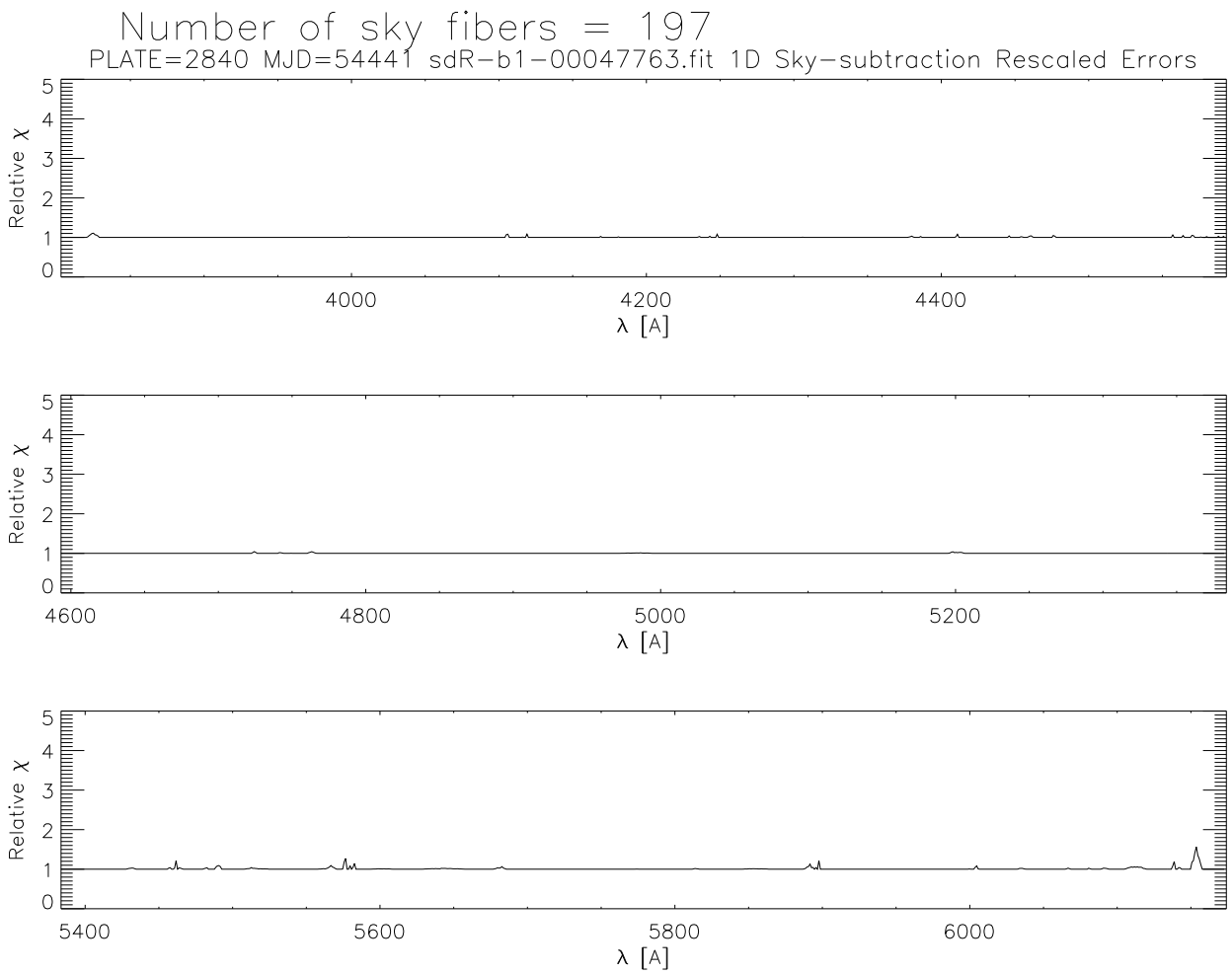

PLATE=2840 MJD=54441 Smooth superflat for sdR-b1-00047763.fit
1.5
1.0
0.5
0.0
1.03
1.02
1.01
1.00
0.99
0.98
4000
4500
5000
5500
6000
Wavelength (Å)

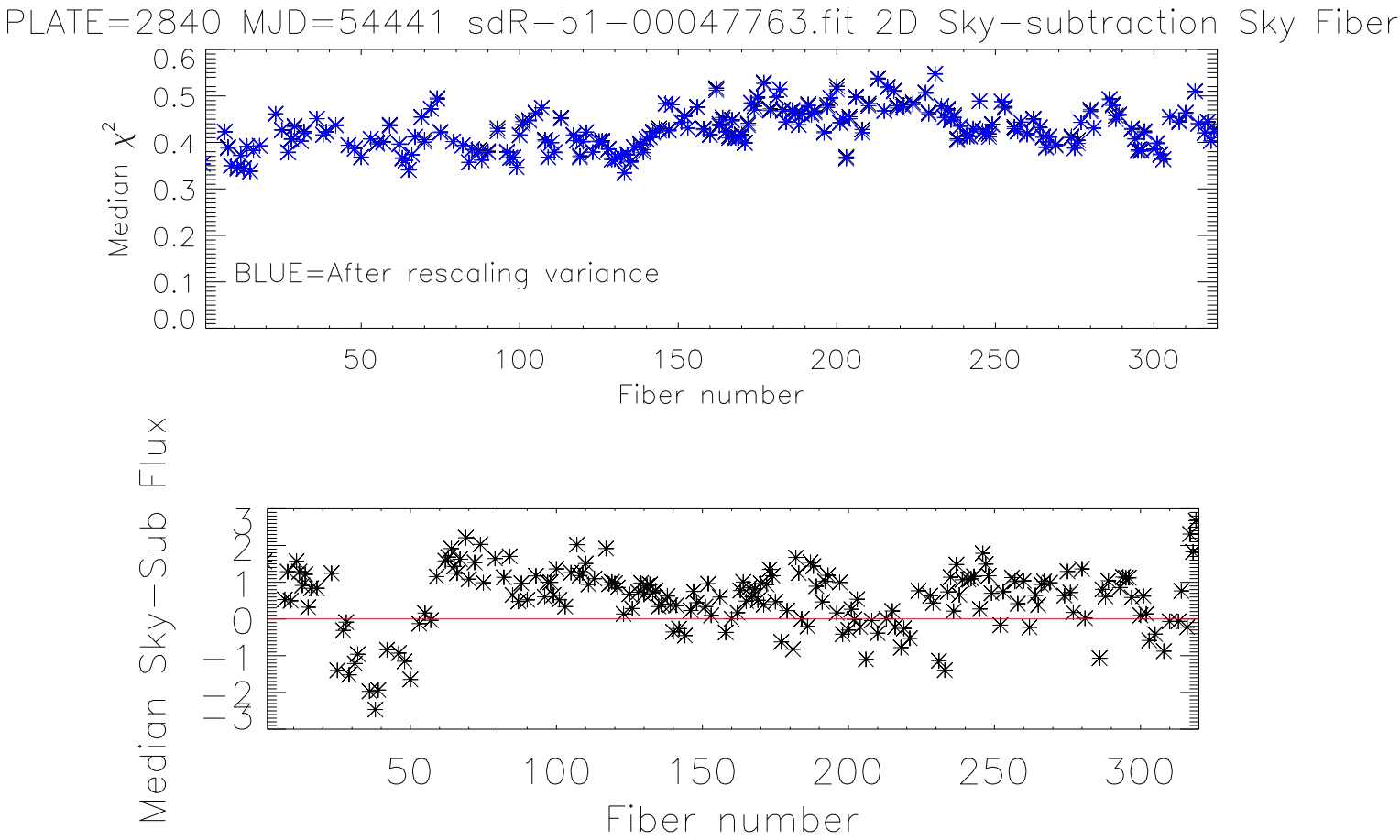
es= −0.0001

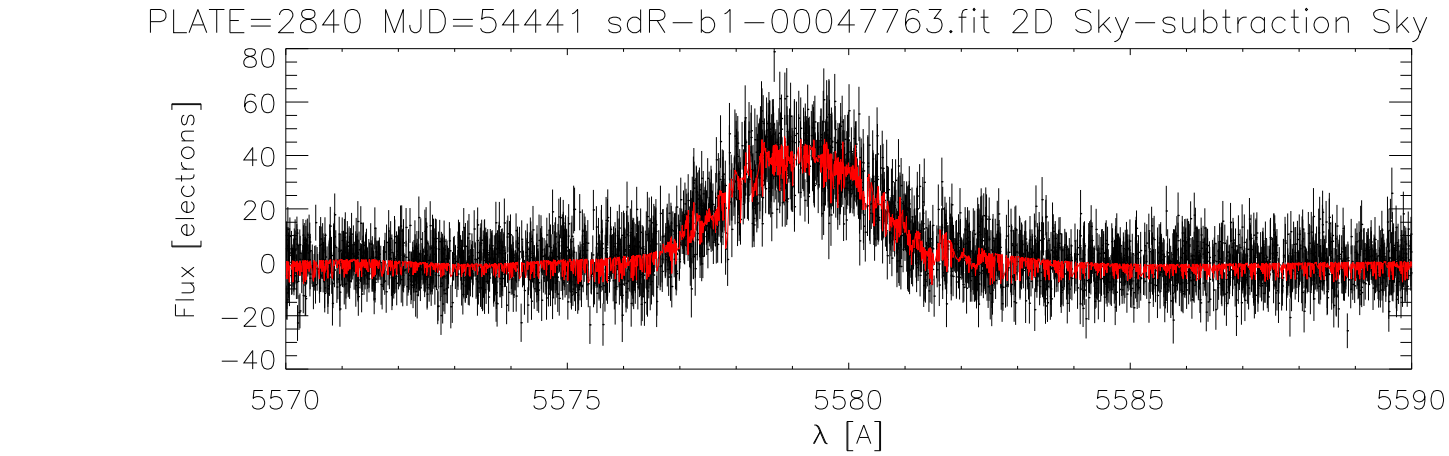

PLATE=2840 MJD=54441 sdR-b1-00047763.fit 1D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.2
0.4
0.6
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-6
-4
-2
0
2
4
50
100
150
200
250
300
Fiber number

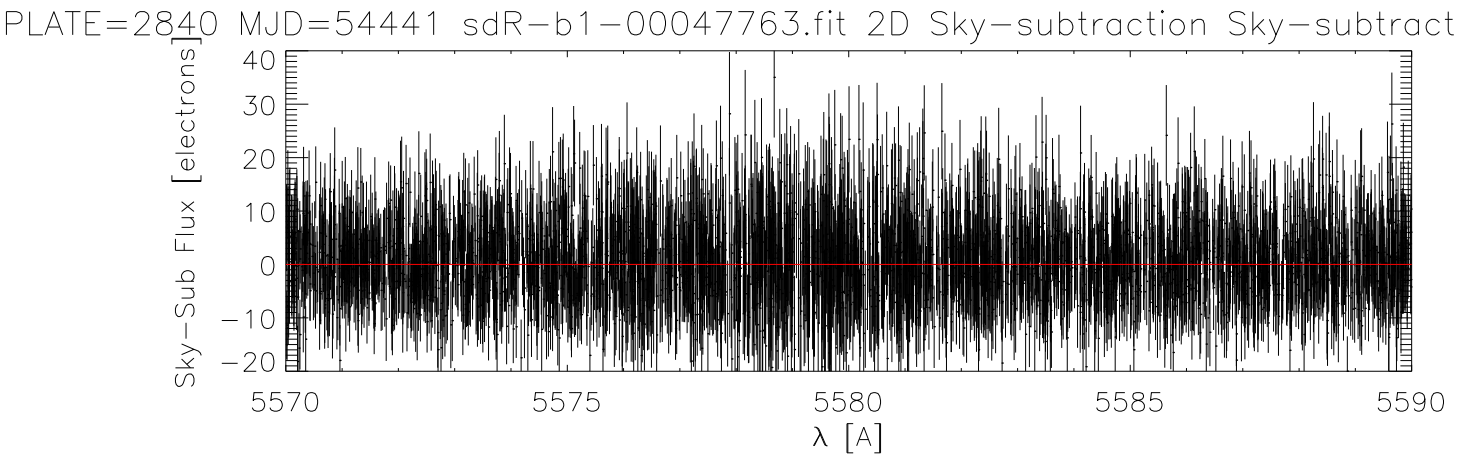

PLATE=2840 MJD=54441 sdR-b1-00047763.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

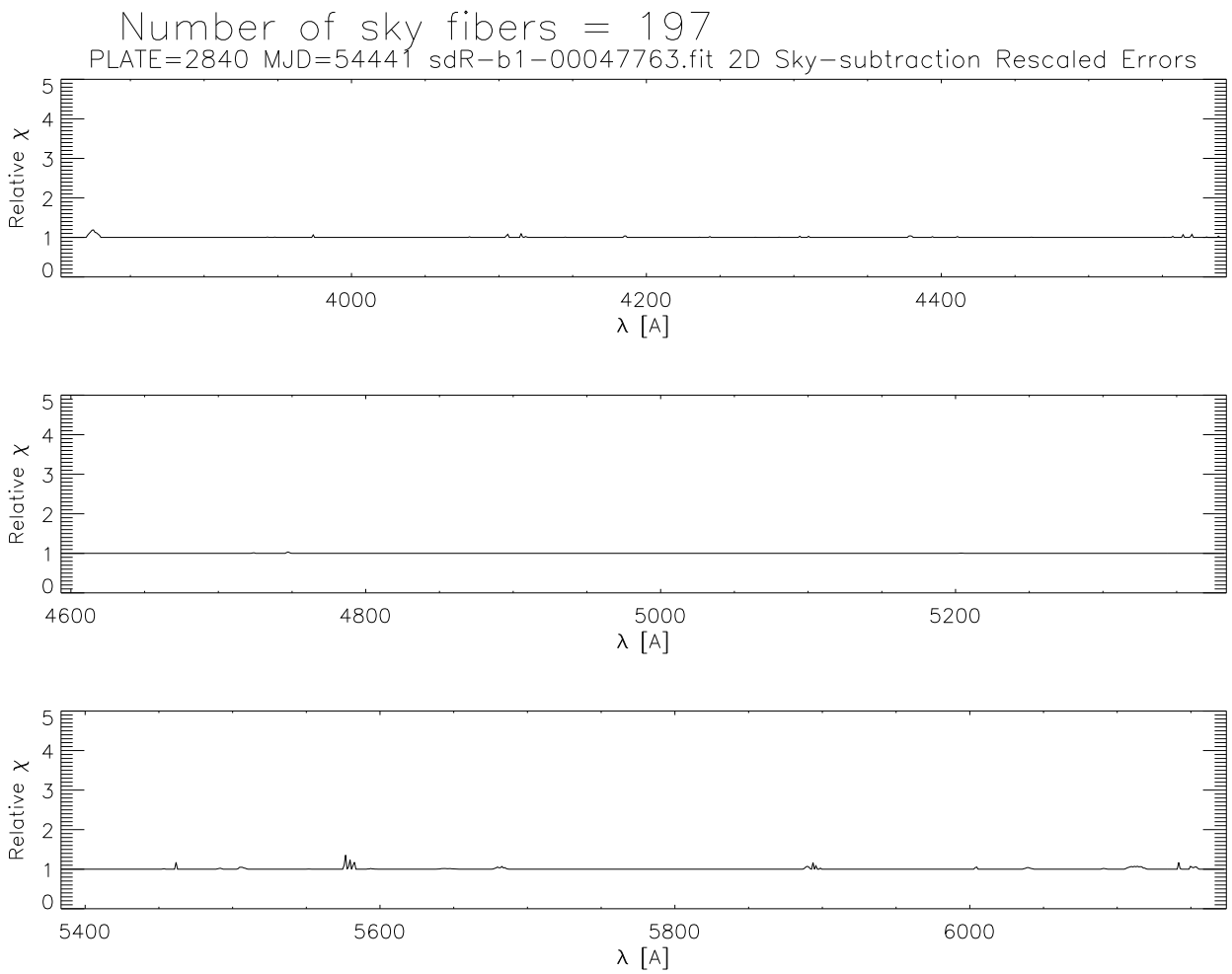

PLATE=2840 MJD=54441 sdR-b1-00047763.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

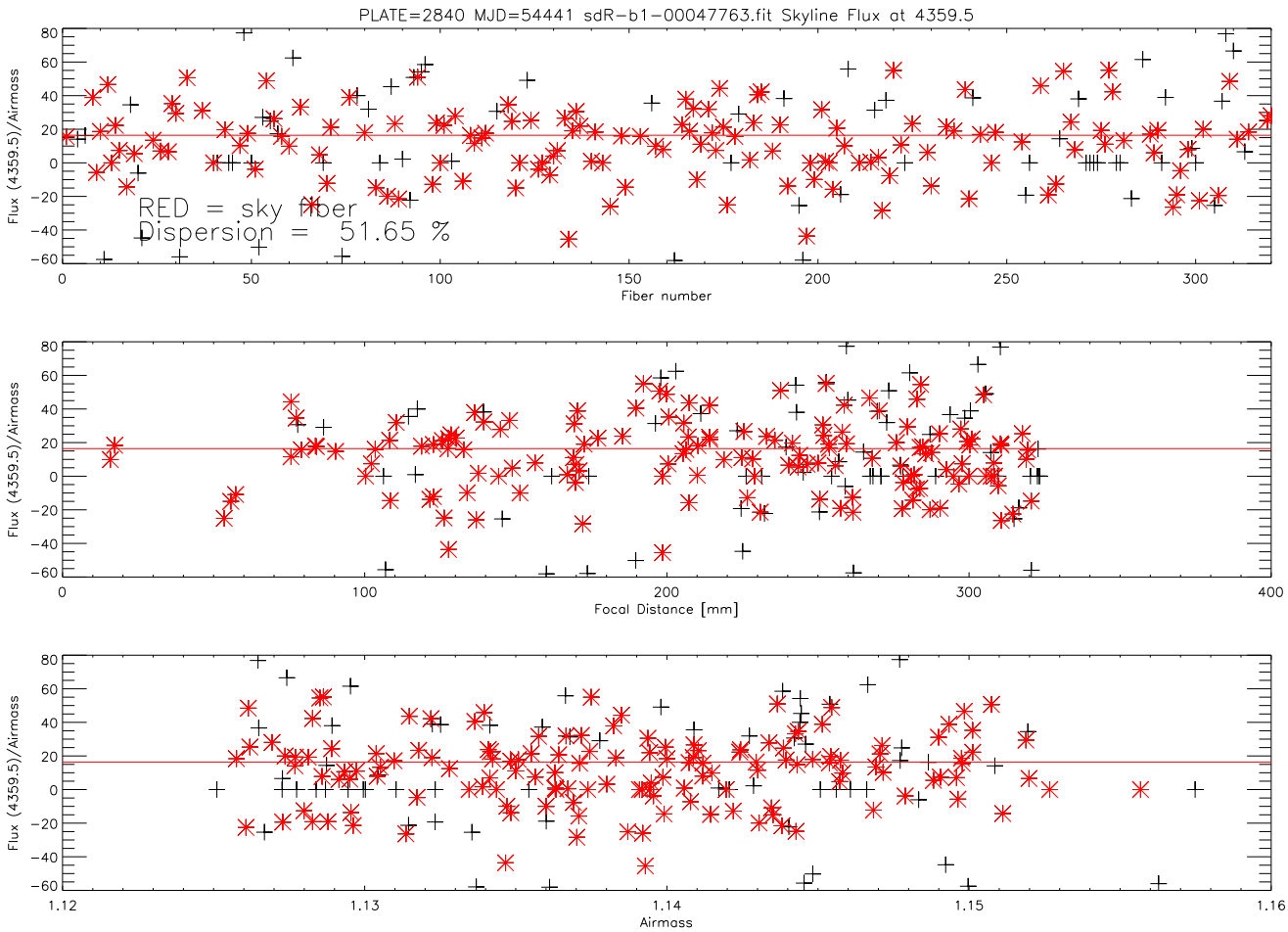

Number of sky fibers = 197
PLATE=2840 MJD=54441 sdR-b1-00047763.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

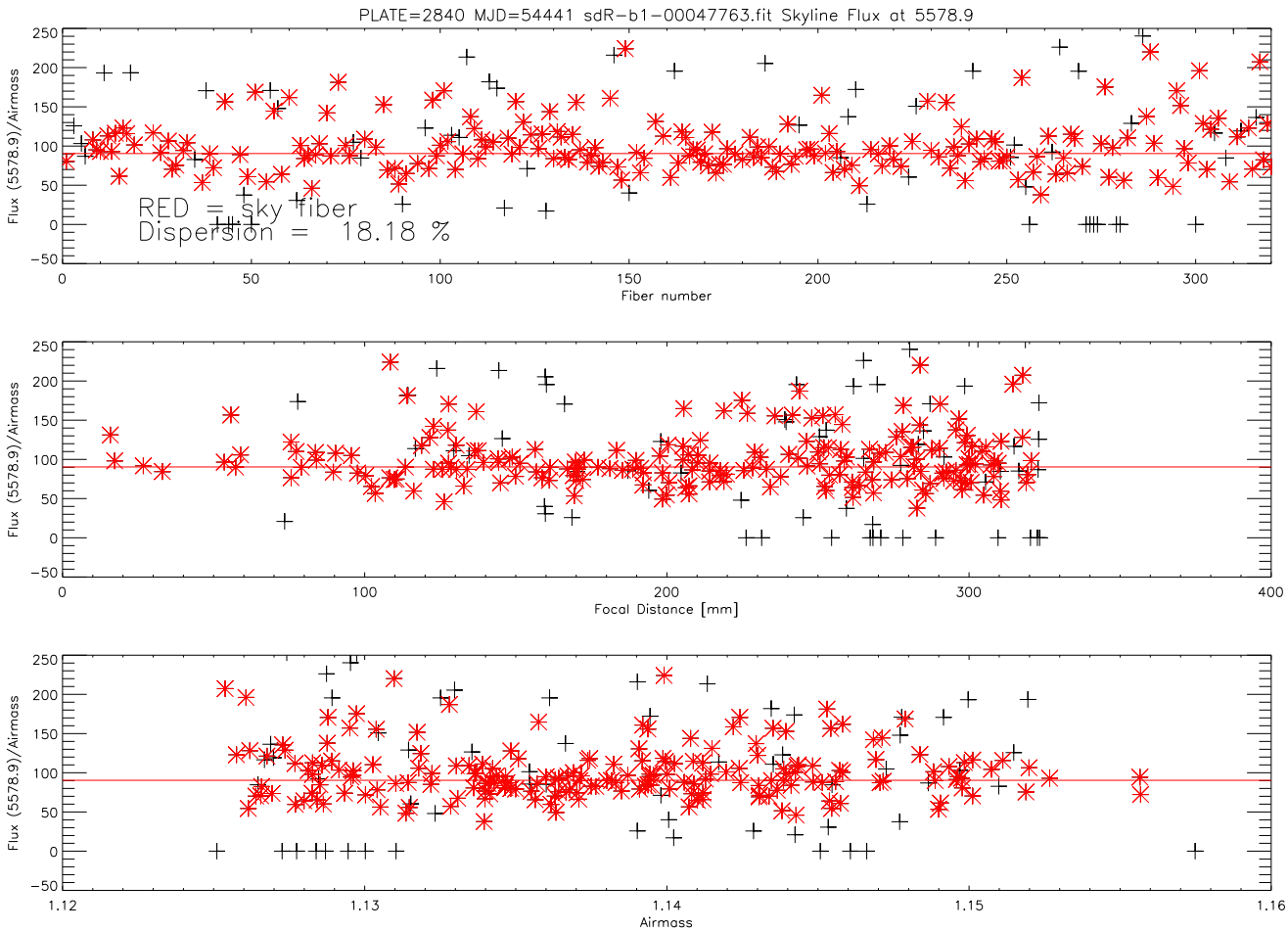

PLATE=2840 MJD=54441 sdR-b1-00047763.fit 2D Sky-subtraction Sky Fiber
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

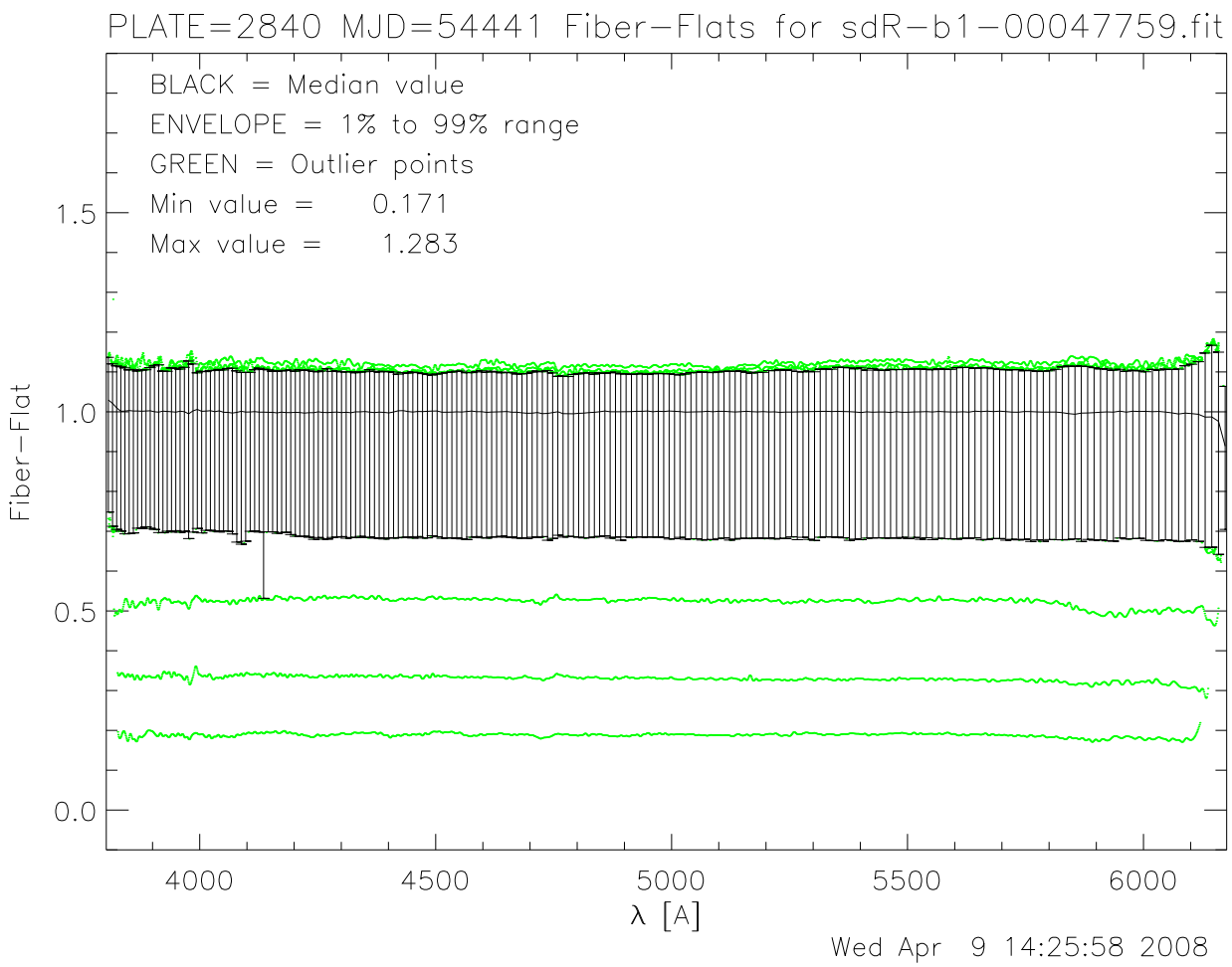

PLATE=2840 MJD=54441 sdR-b1-00047763.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

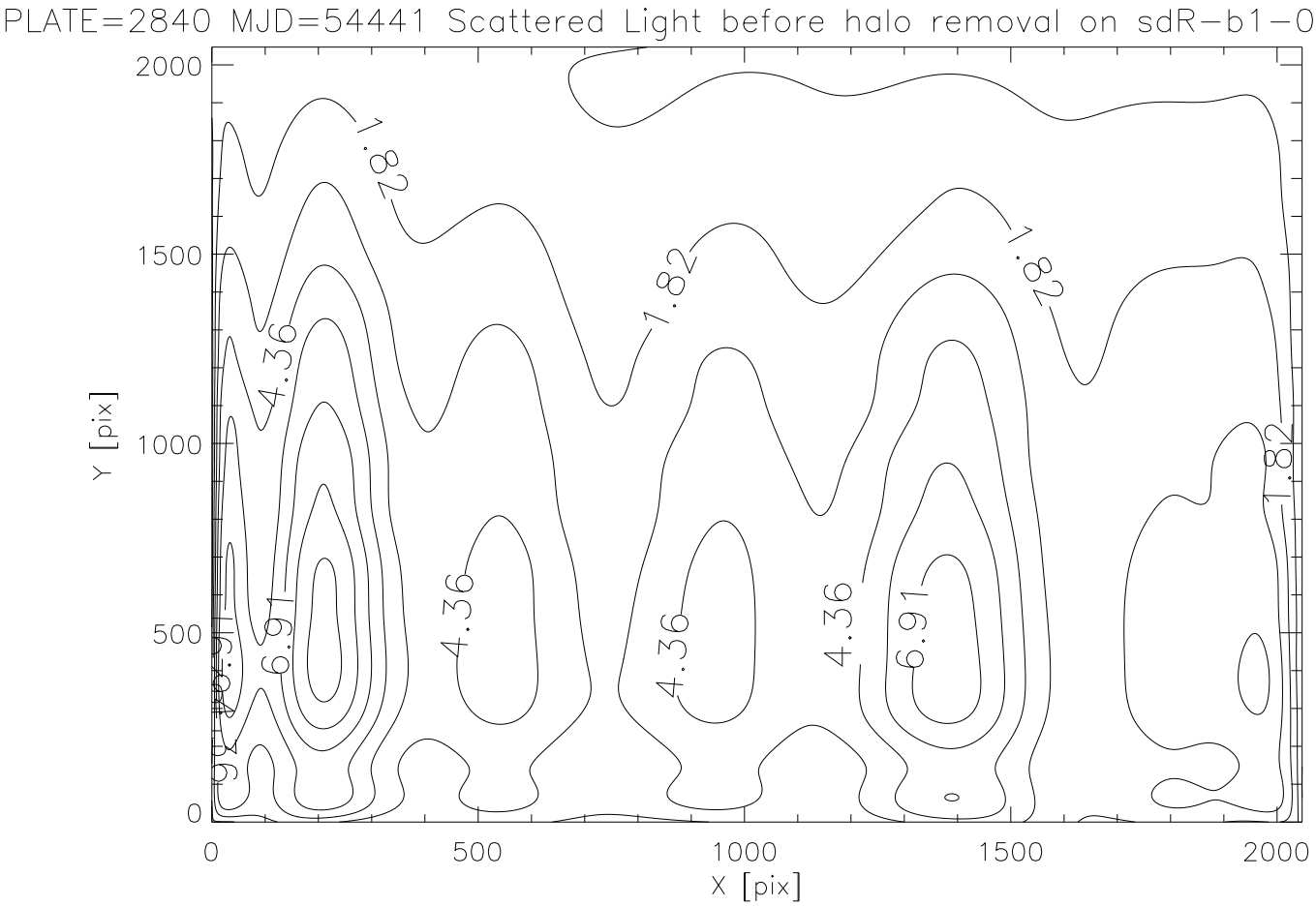

PLATE=2840 MJD=54441 sdR-b1-00047763.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
40
30
20
10
0
-10
-20
5570
5575
5580
5585
5590
λ [A]

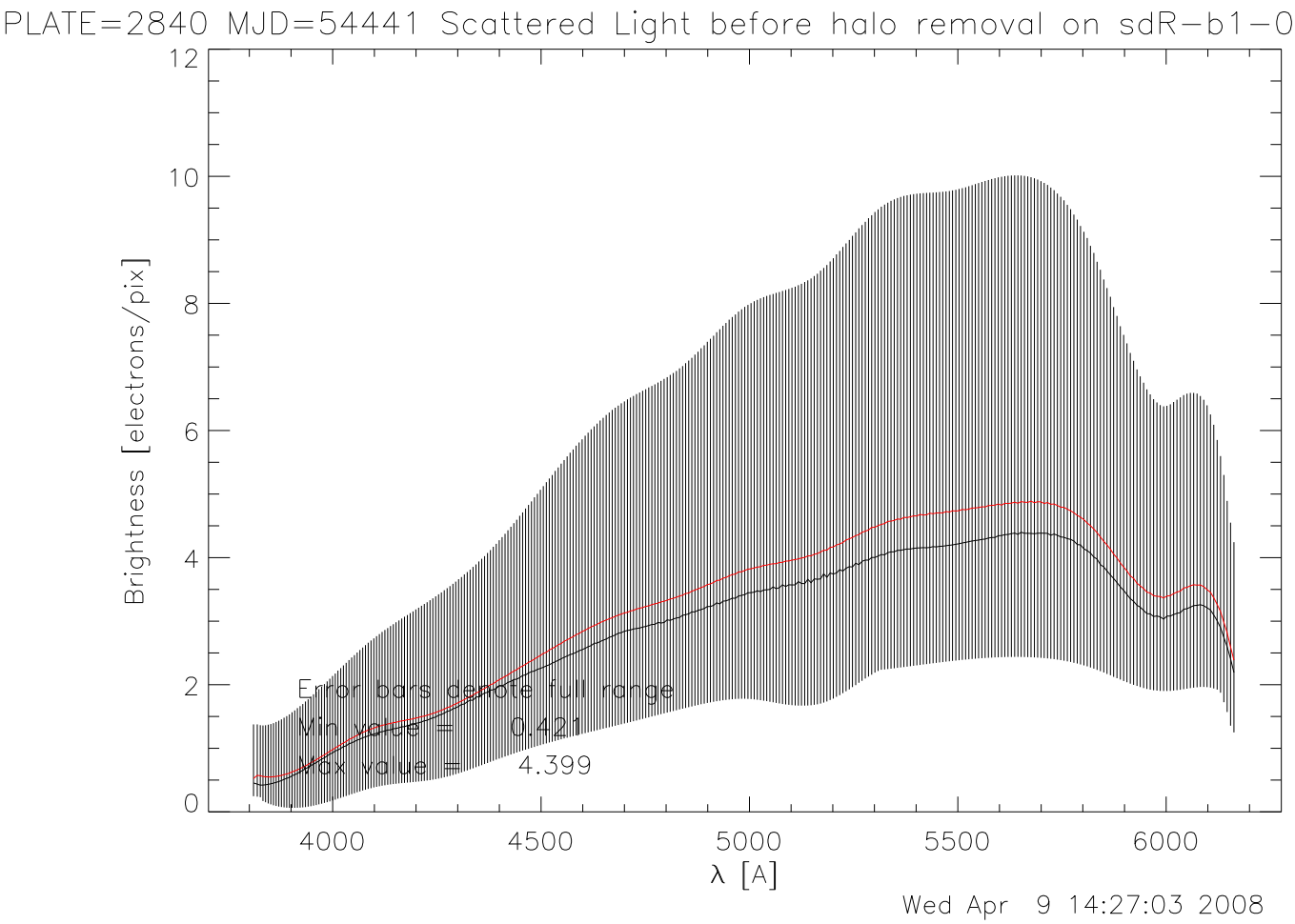

Number of sky fibers = 197
PLATE=2840 MJD=54441 sdR-b1-00047763.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

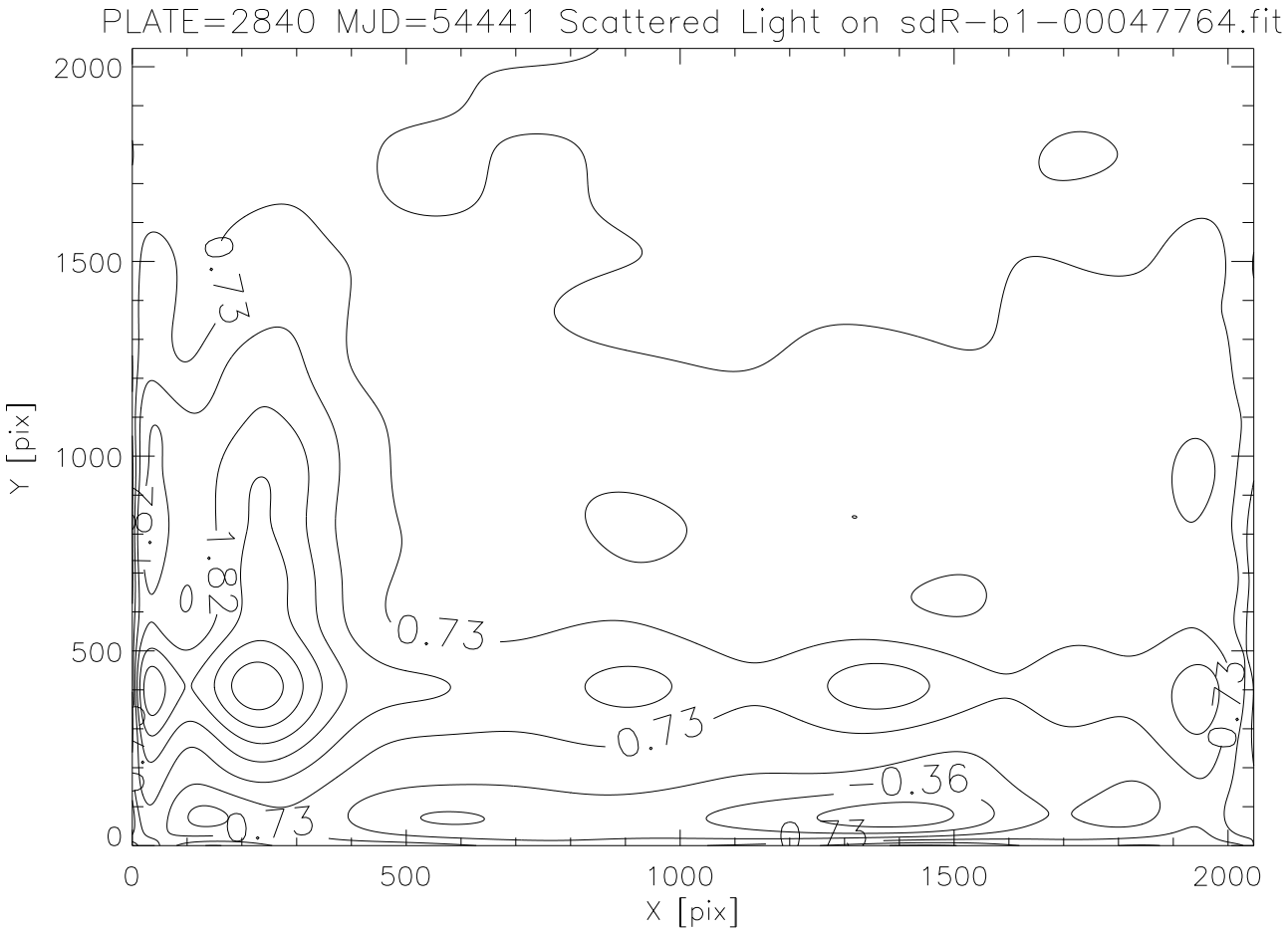

PLATE=2840 MJD=54441 sdR-b1-00047763.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
RED = sky fiber
Dispersion = 51.65 %
Fiber number
Flux (4359.5)/Airmass
Focal Distance [mm]
Flux (4359.5)/Airmass
Airmass

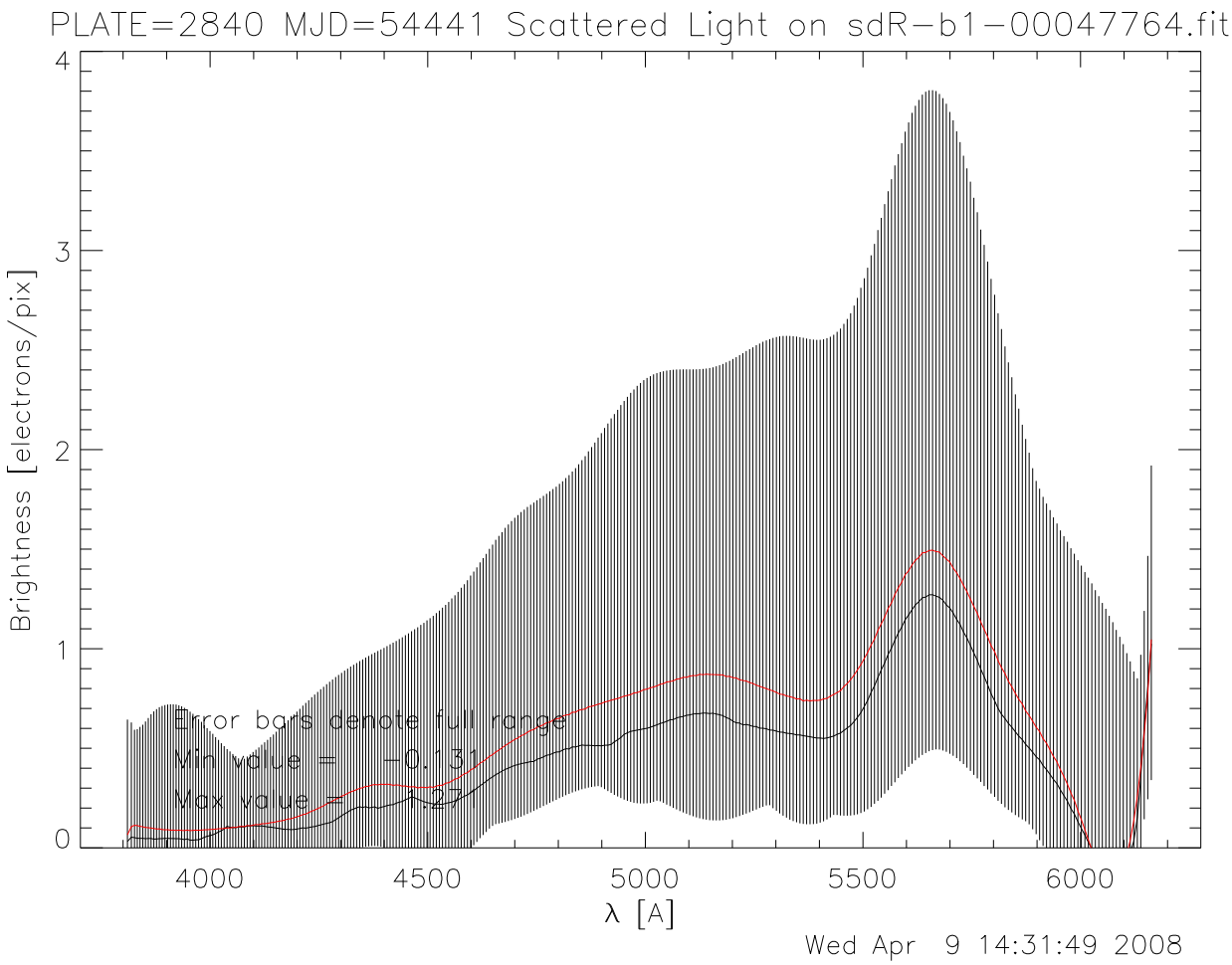

PLATE=2840 MJD=54441 sdR-b1-00047763.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
RED = sky fiber
Dispersion = 18.18 %
Fiber number
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

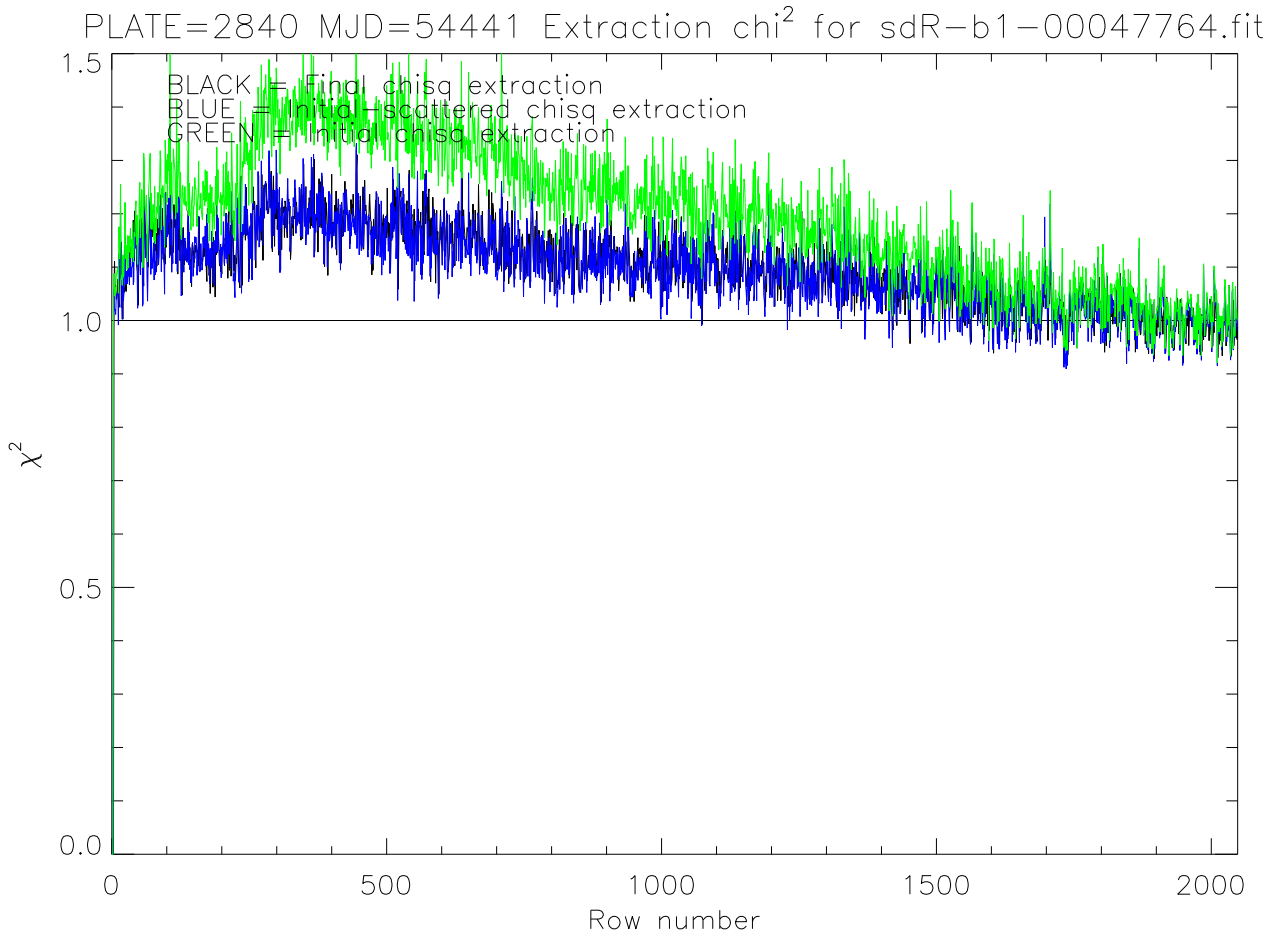

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b1-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.171
Max value = 1.283
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 14:25:58 2008

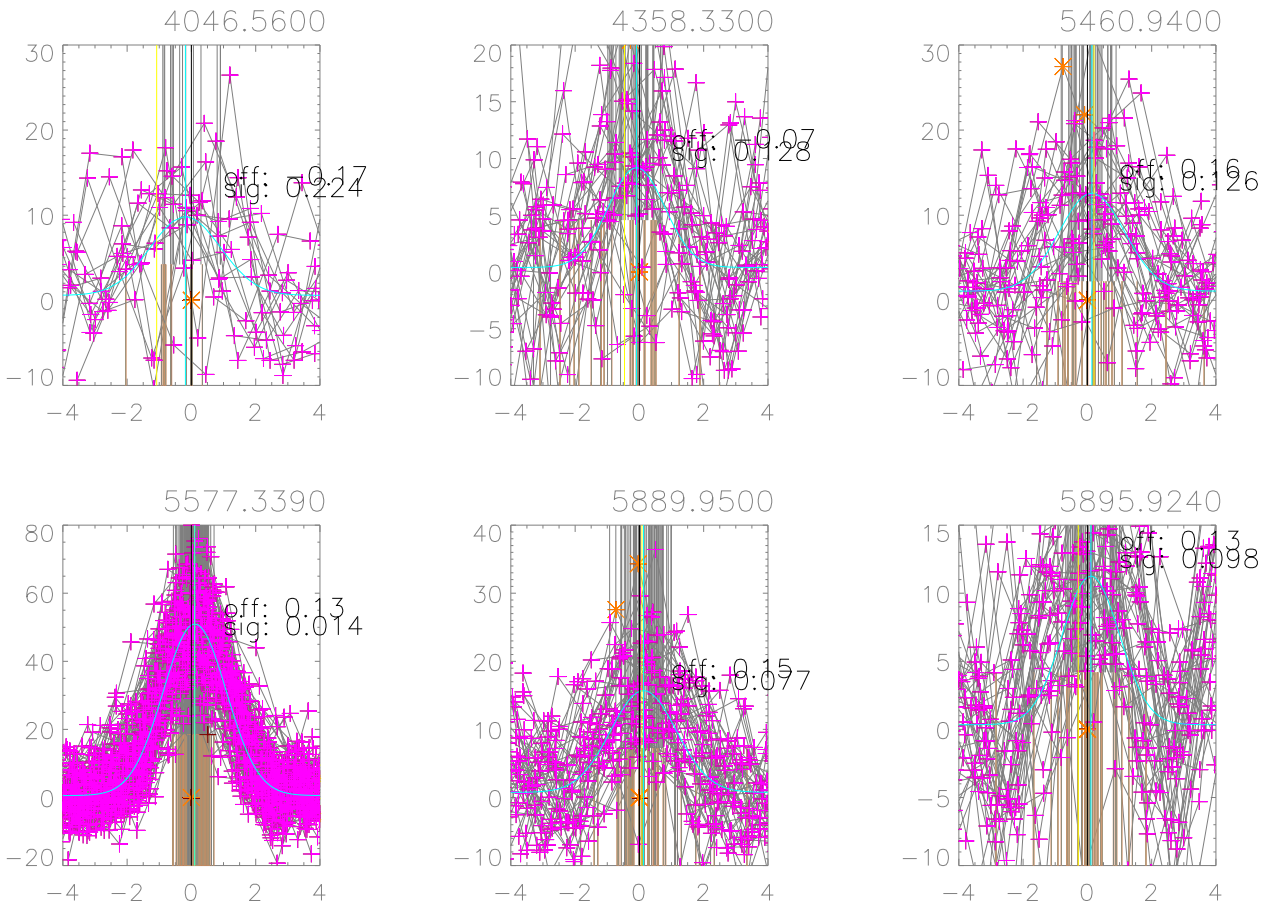

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR−b1−00047764.f
Y [pix]
X [pix]
0
500
1000
1500
2000
1.82
4.36
6.91

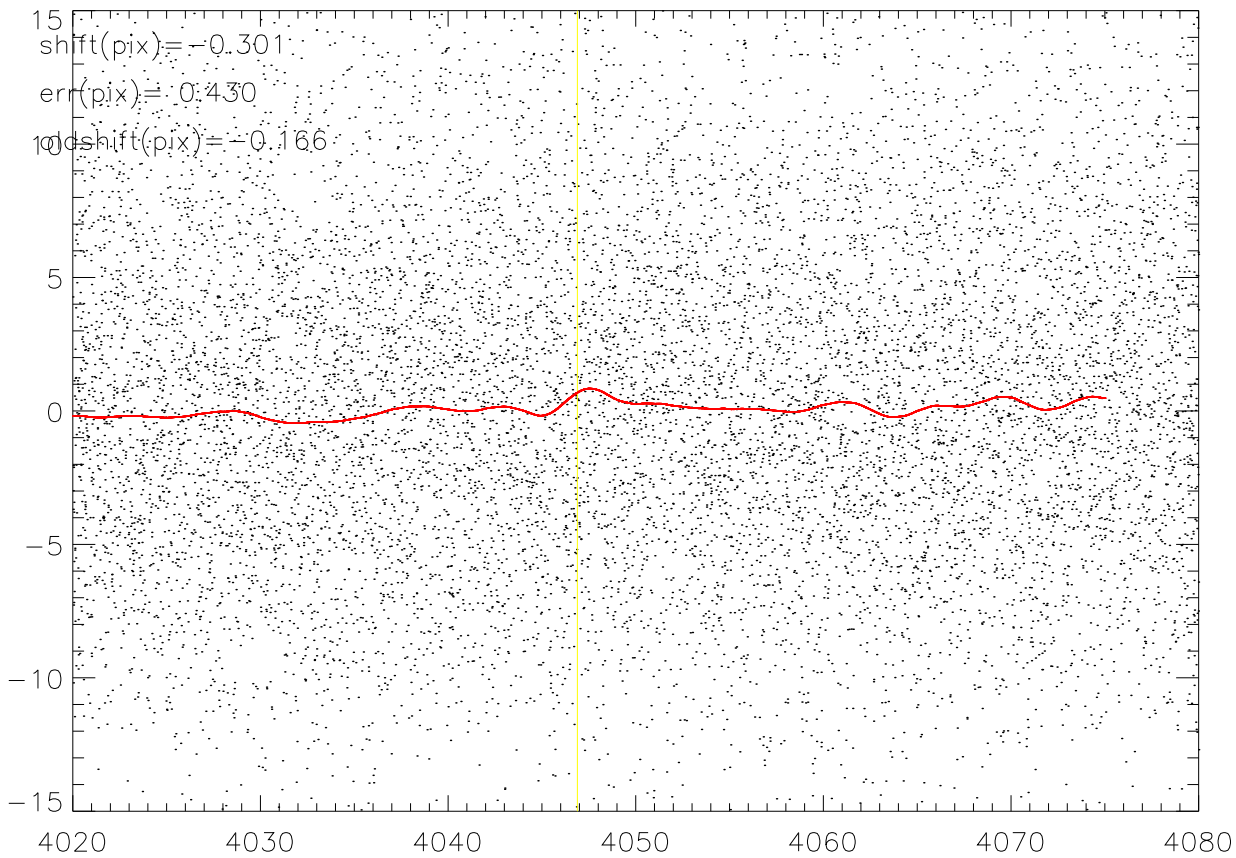

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b1-00047764.f
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.421
Max value = 4.399
Wed Apr 9 14:27:03 2008

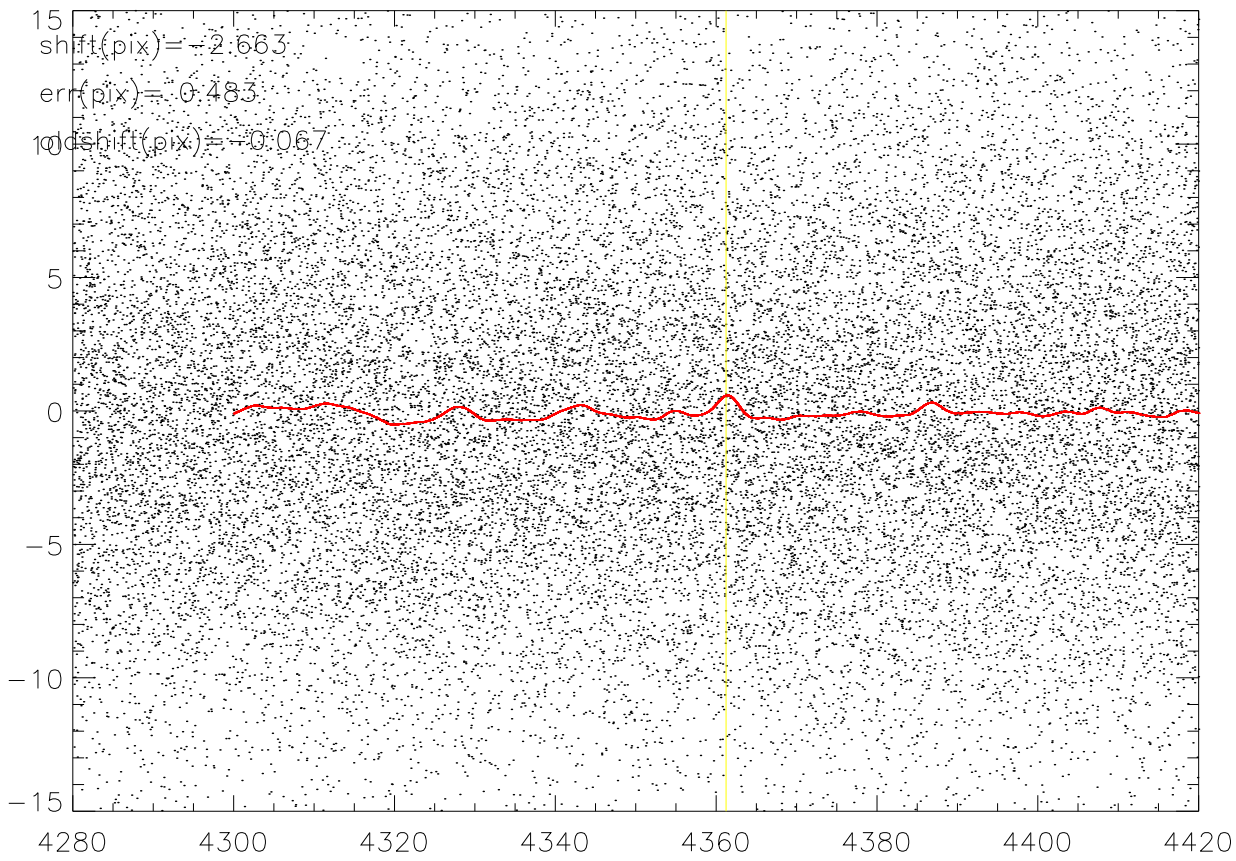

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047764.fit
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
0.73
1.82
0
0.73
0.73
-0.36
0.73
0.73

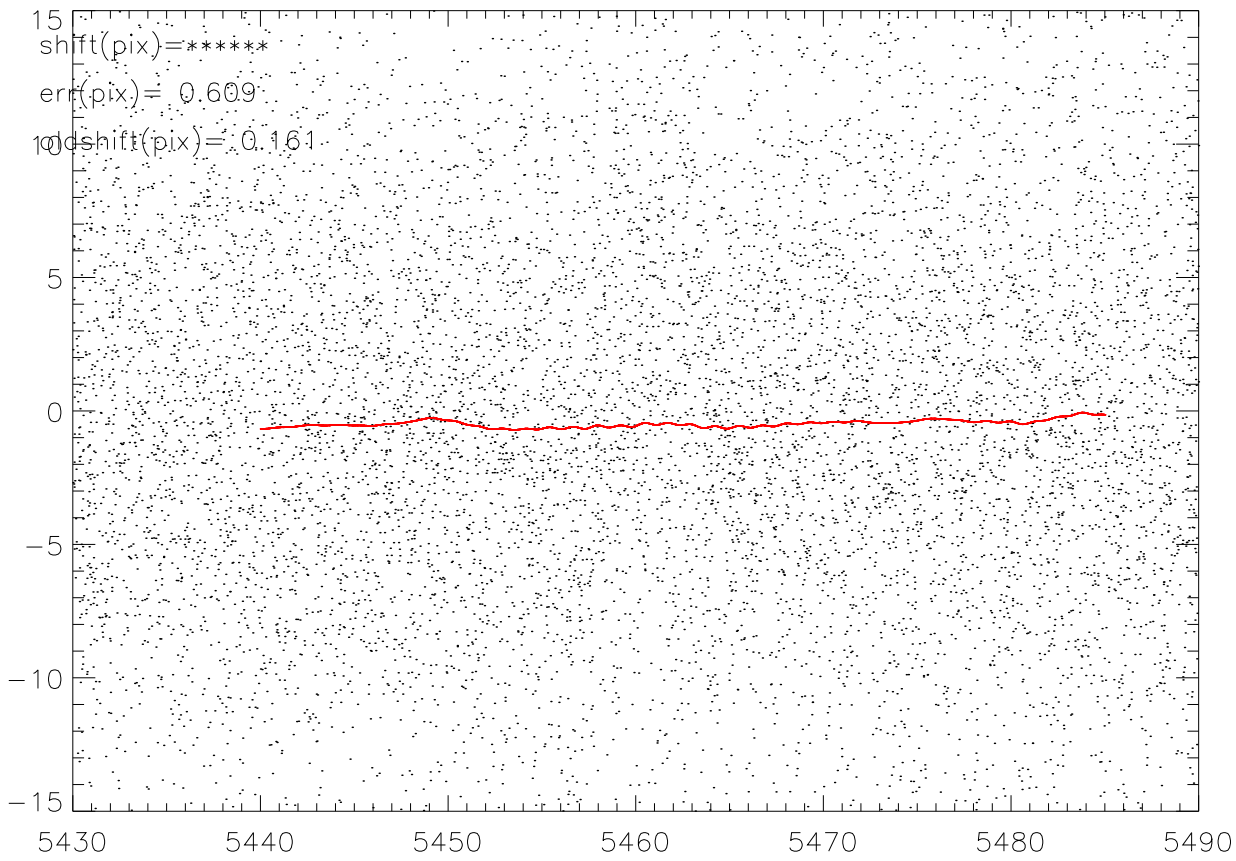

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047764.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = -0.131
Max value = 4.23
Wed Apr 9 14:31:49 2008

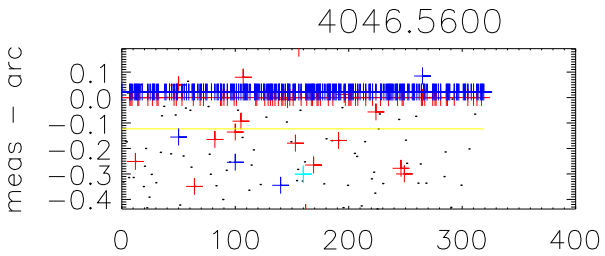

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b1-00047764.fit
BLACK = Final chisq extraction
BLUE = Initial scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

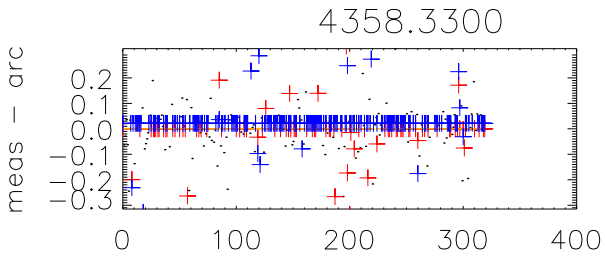

4046.5600
off: -0.17
sig: 0.224
4358.3300
off: -0.07
sig: 0.128
5460.9400
off: 0.16
sig: 0.126
5577.3390
off: 0.13
sig: 0.014
5889.9500
off: 0.15
sig: 0.077
5895.9240
off: 0.13
sig: 0.098

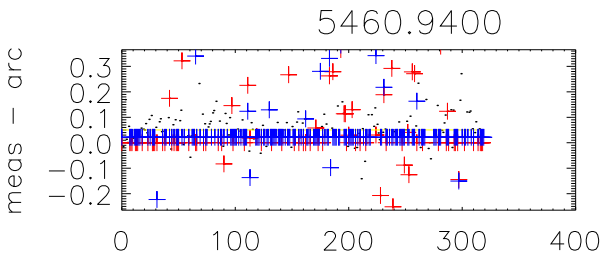

shift(pix)=−0.301
err(pix)= 0.430
oldshift(pix)=−0.166
15
10
5
0
−5
−10
−15
4020
4030
4040
4050
4060
4070
4080

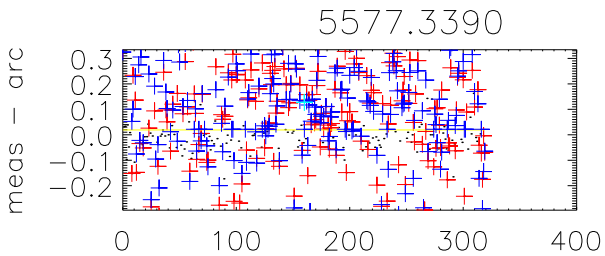

shift(pix)=−2.663
err(pix)= 0.483
oldshift(pix)=−0.067
15
10
5
0
−5
−10
−15
4280
4300
4320
4340
4360
4380
4400
4420

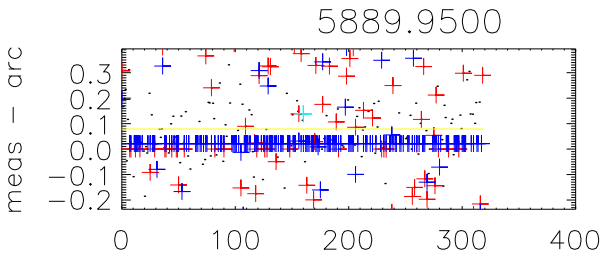

shift(pix)=******
err(pix)= 0.609
oldshift(pix)= 0.161
15
10
5
0
−5
−10
−15
5430
5440
5450
5460
5470
5480
5490

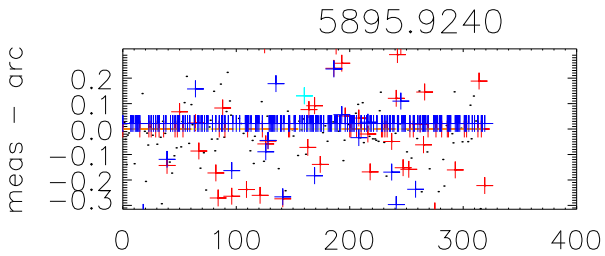

4046.5600
meas − arc
0.1
0.0
−0.1
−0.2
−0.3
−0.4
0
100
200
300
400

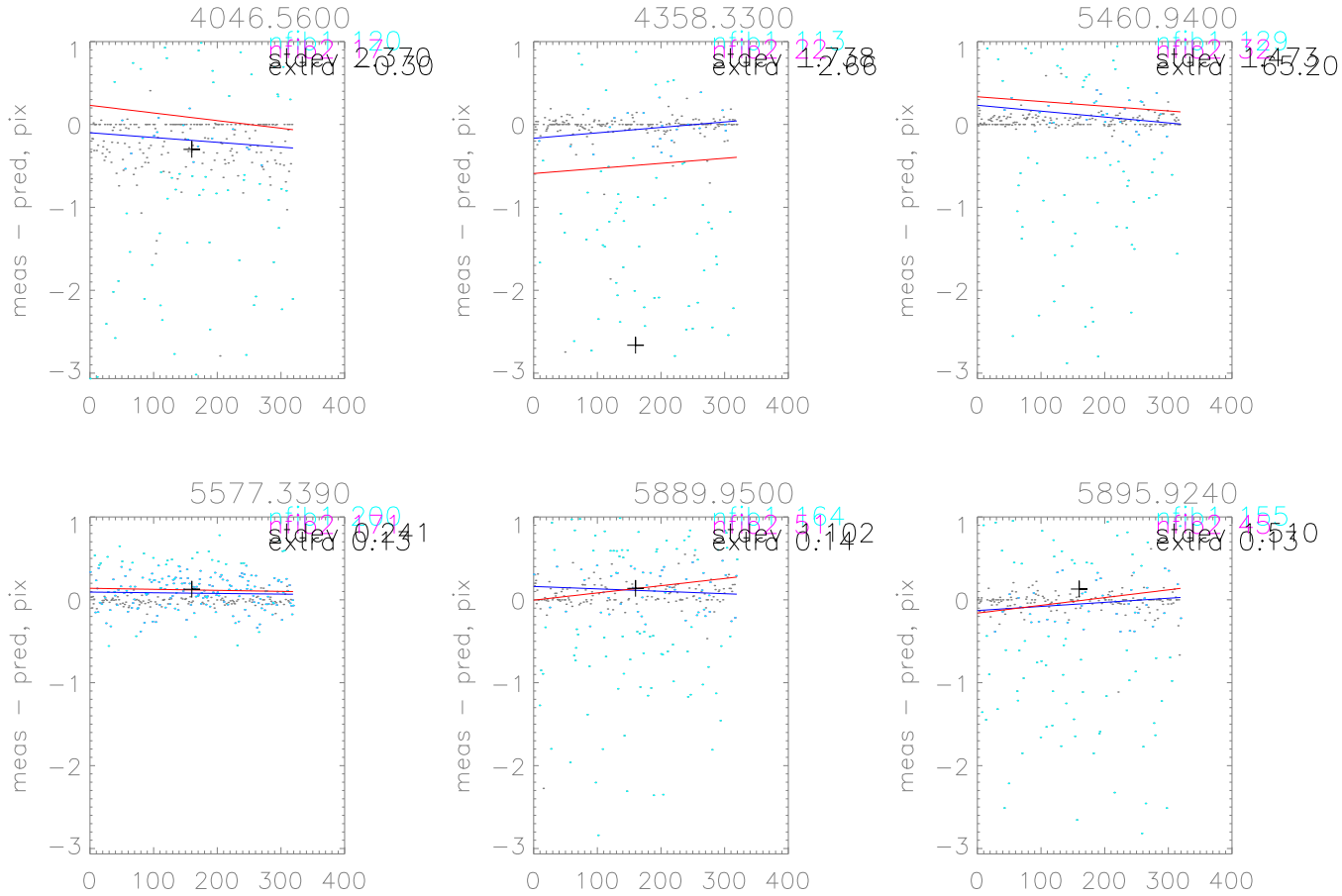

4358.3300
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

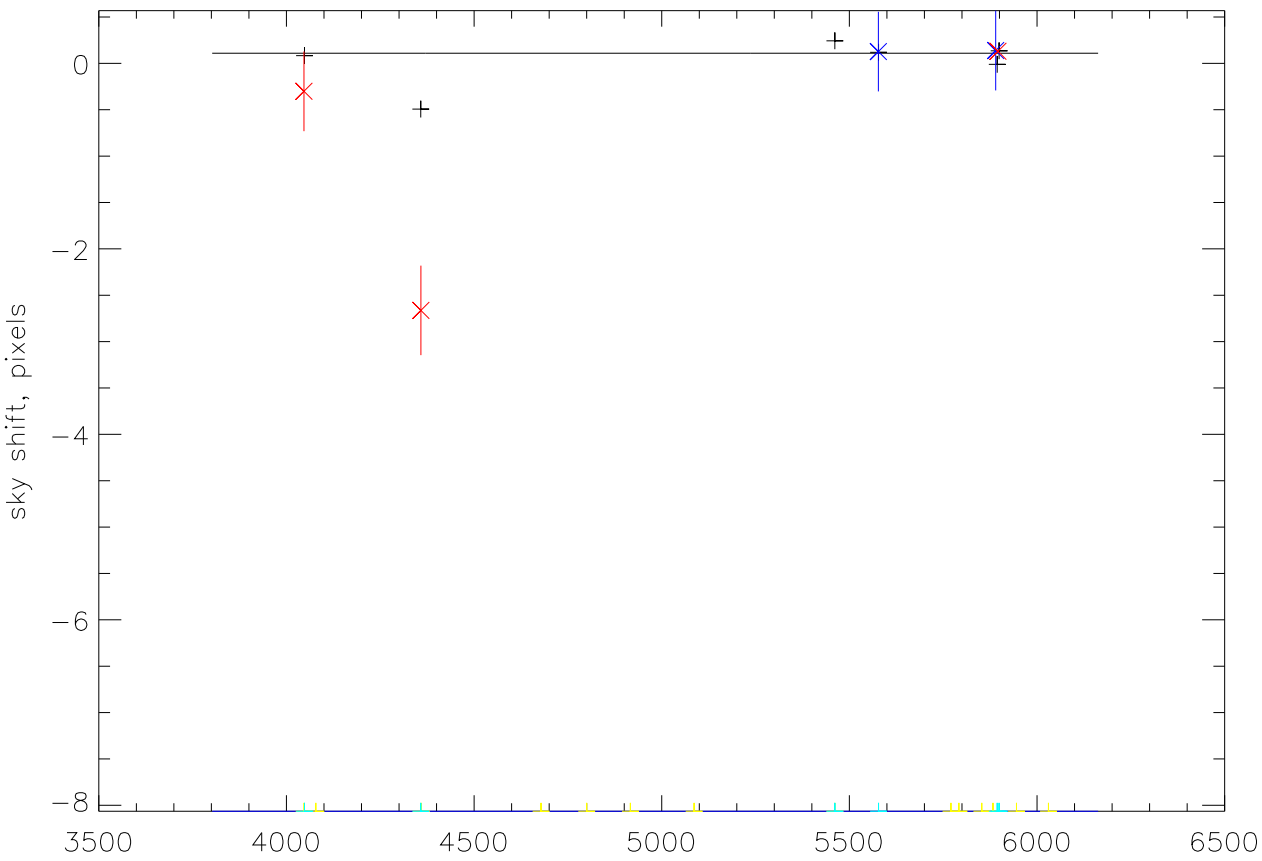

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

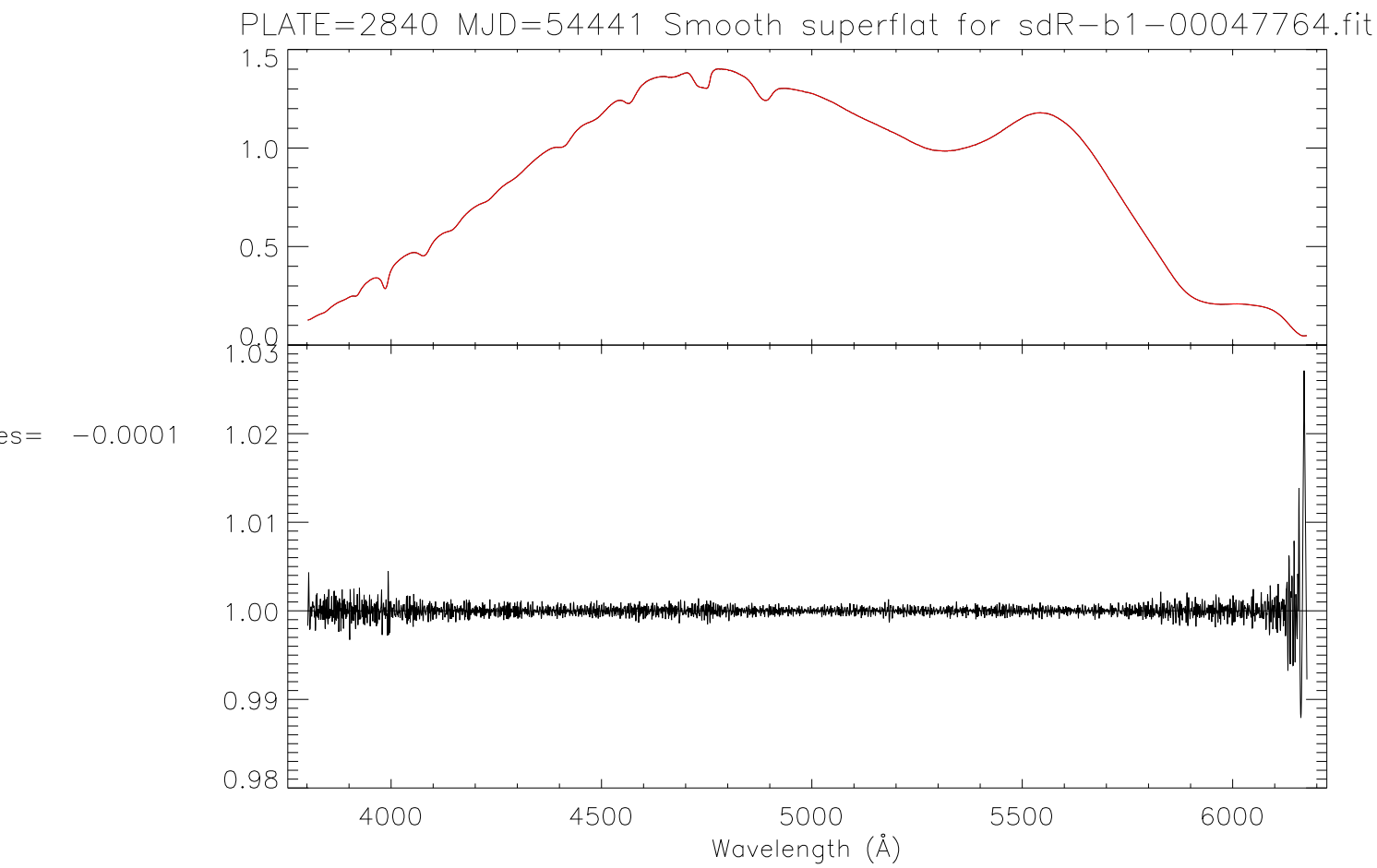

5577.3390
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400


5889.9500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

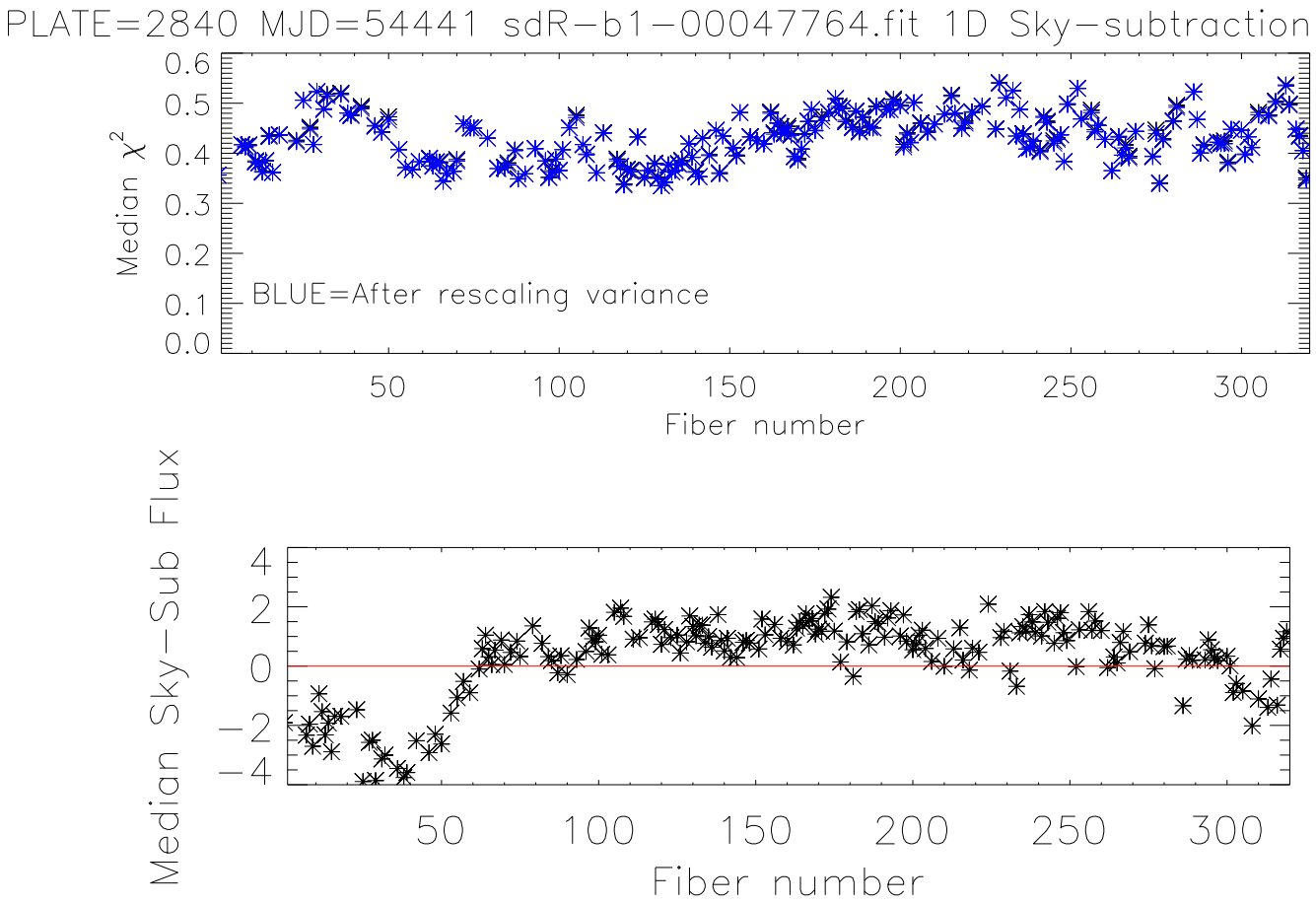

5895.9240
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

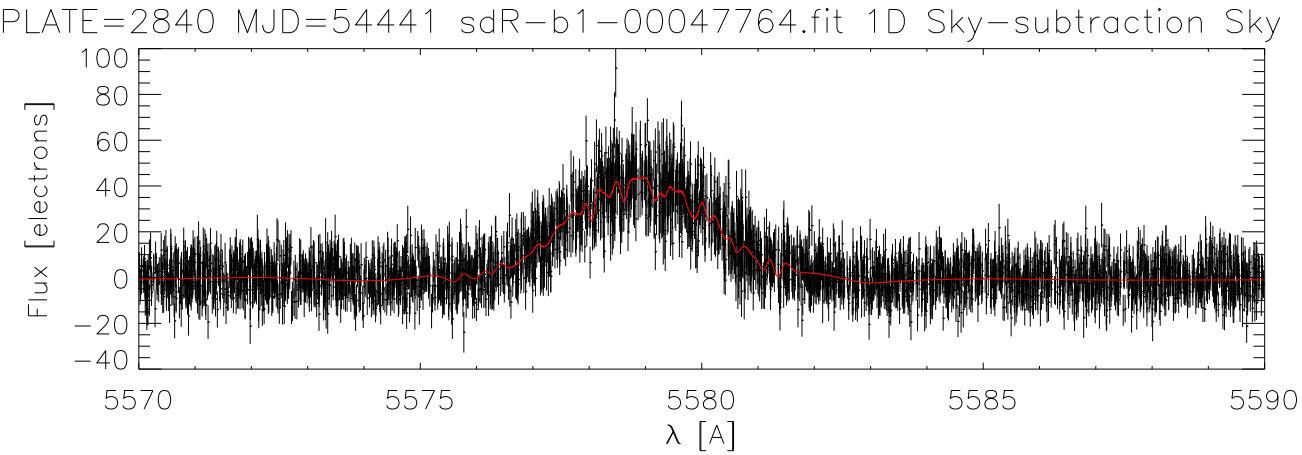

4046.5600
nfib1 120
nfib2 2370
stdev 0.30
extra
4358.3300
nfib1 113
nfib2 2273
stdev 1.38
extra -2.66
5460.9400
nfib1 129
nfib2 3273
stdev 1.73
extra -65.20
5577.3390
nfib1 200
nfib2 4774
stdev 0.24
extra 0.13
5889.9500
nfib1 464
nfib2 5114
stdev 1.02
extra 0.14
5895.9240
nfib1 455
nfib2 4510
stdev 0.10
extra 0.13
meas − pred, pix
1
0
−1
−2
−3
0
100
200
300
400

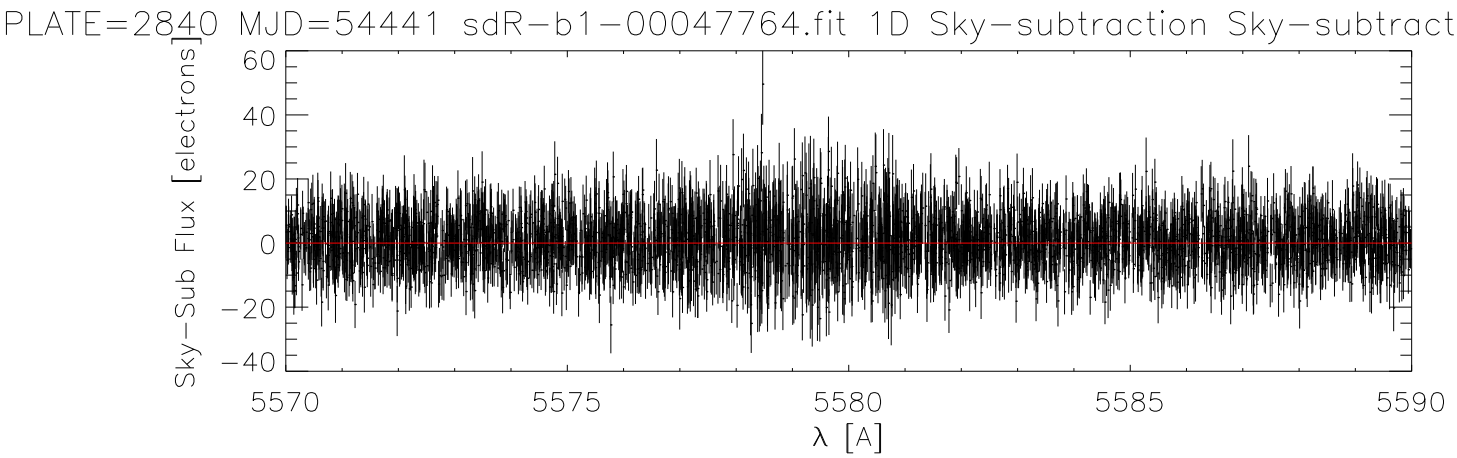

sky shift, pixels
0
−2
−4
−6
−8
3500
4000
4500
5000
5500
6000
6500

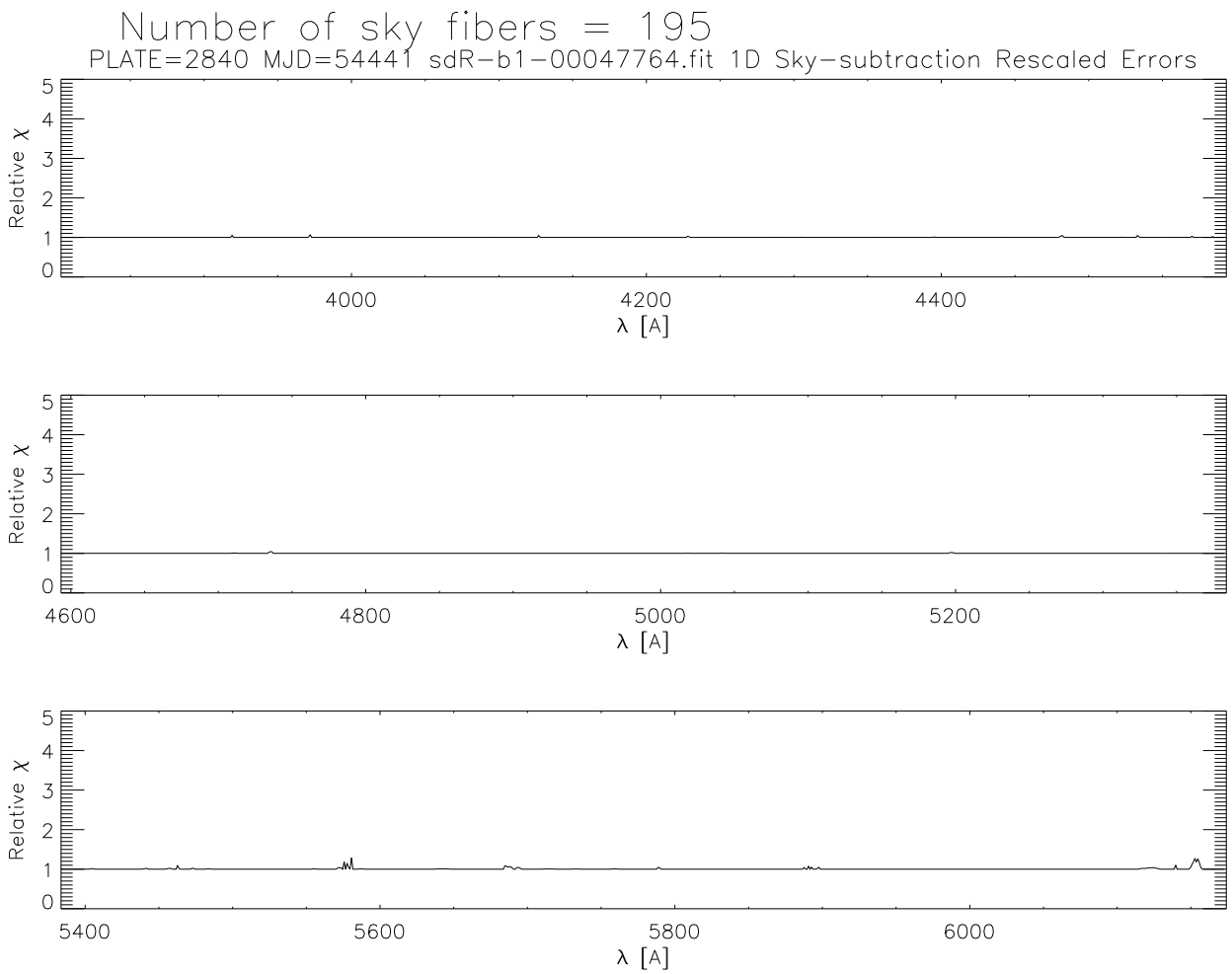

PLATE=2840 MJD=54441 Smooth superflat for sdR-b1-00047764.fit
1.5
1.0
0.5
0.0
1.03
1.02
1.01
1.00
0.99
0.98
4000
4500
5000
5500
6000
Wavelength (Å)

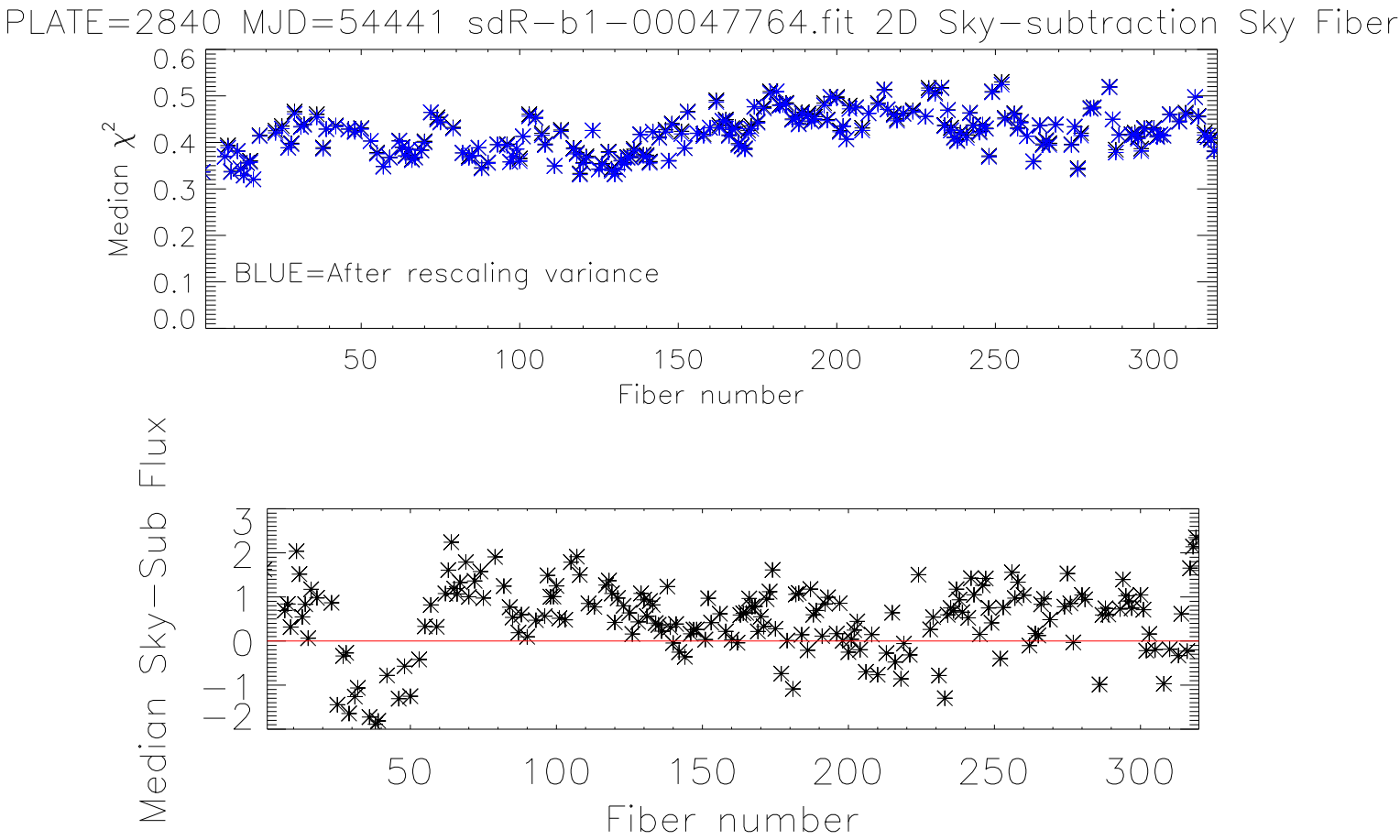
es= −0.0001

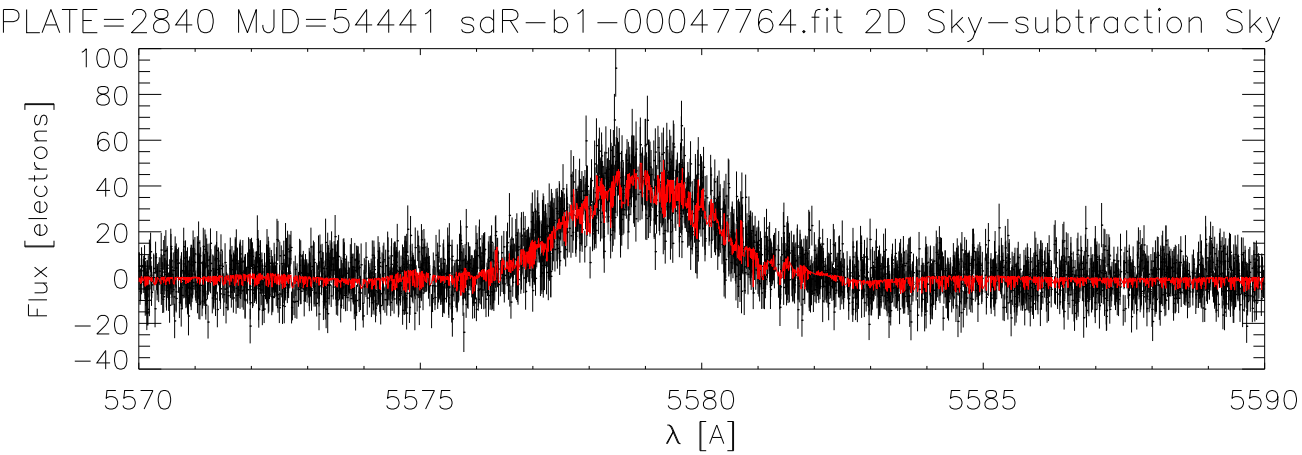

PLATE=2840 MJD=54441 sdR-b1-00047764.fit 1D Sky-subtraction Sky Fiber
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

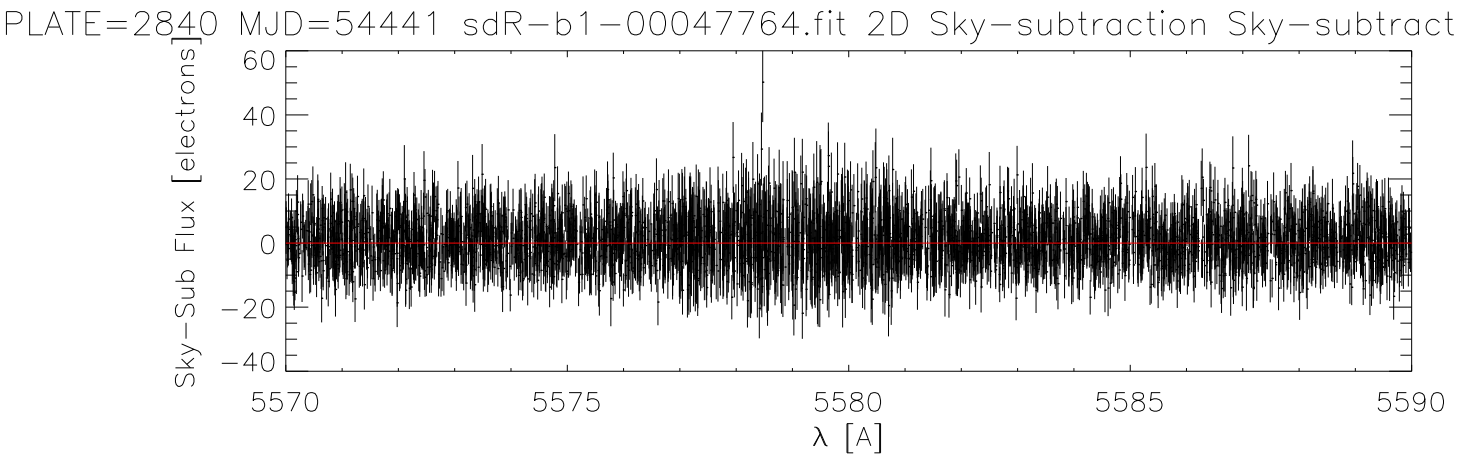

PLATE=2840 MJD=54441 sdR-b1-00047764.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
100
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

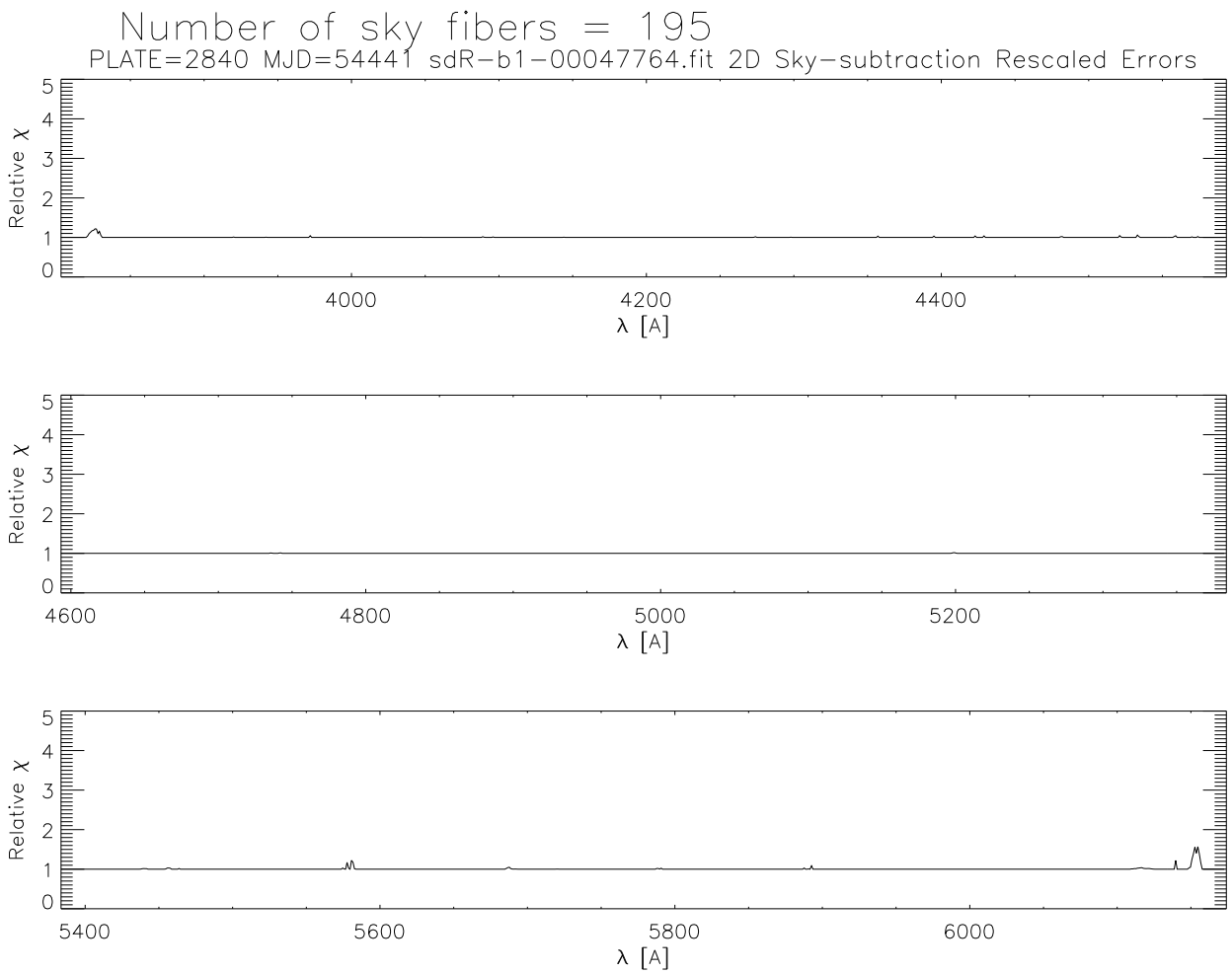

PLATE=2840 MJD=54441 sdR-b1-00047764.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

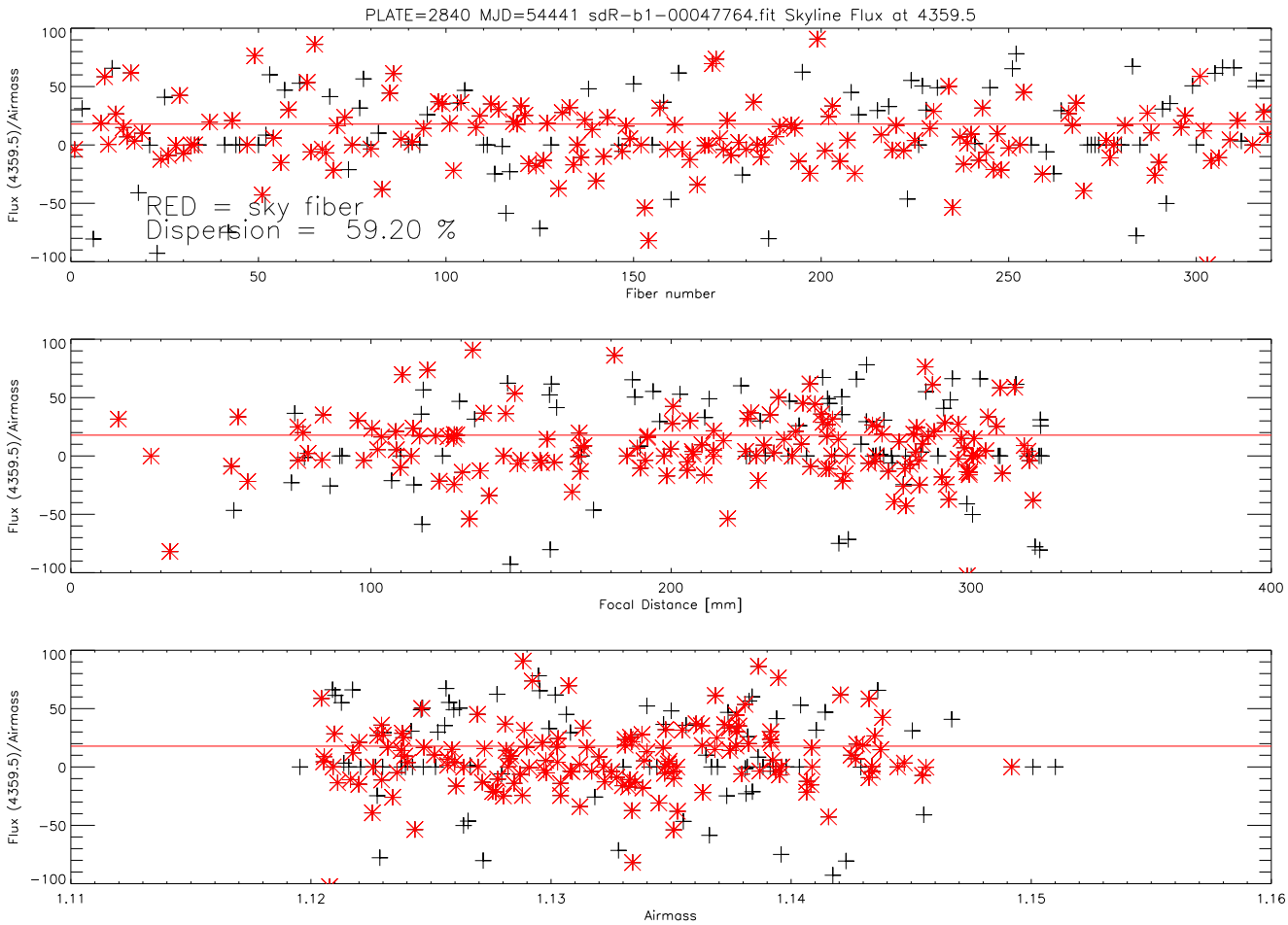

Number of sky fibers = 195
PLATE=2840 MJD=54441 sdR-b1-00047764.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

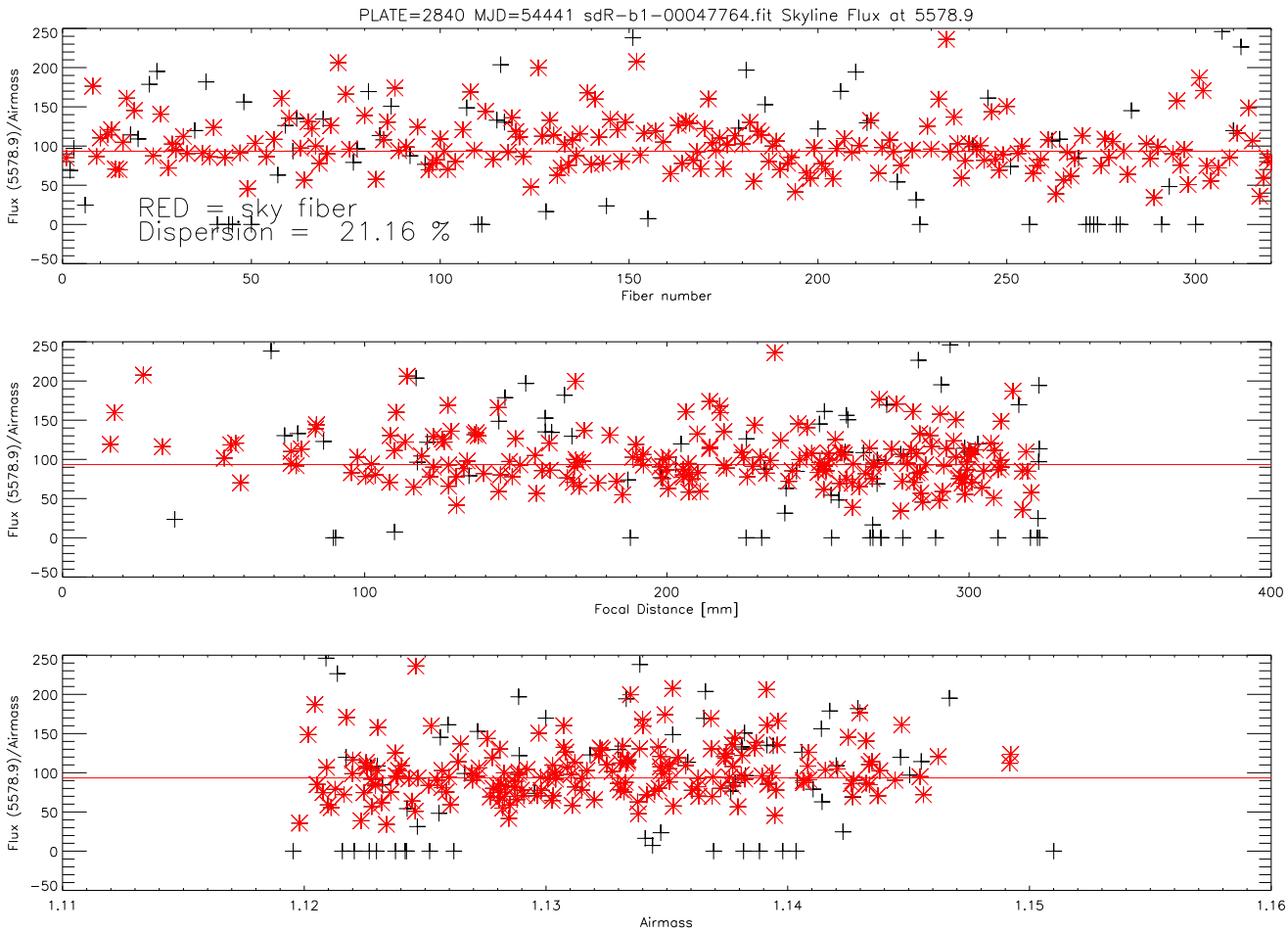

PLATE=2840 MJD=54441 sdR-b1-00047764.fit 2D Sky-subtraction Sky Fiber
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

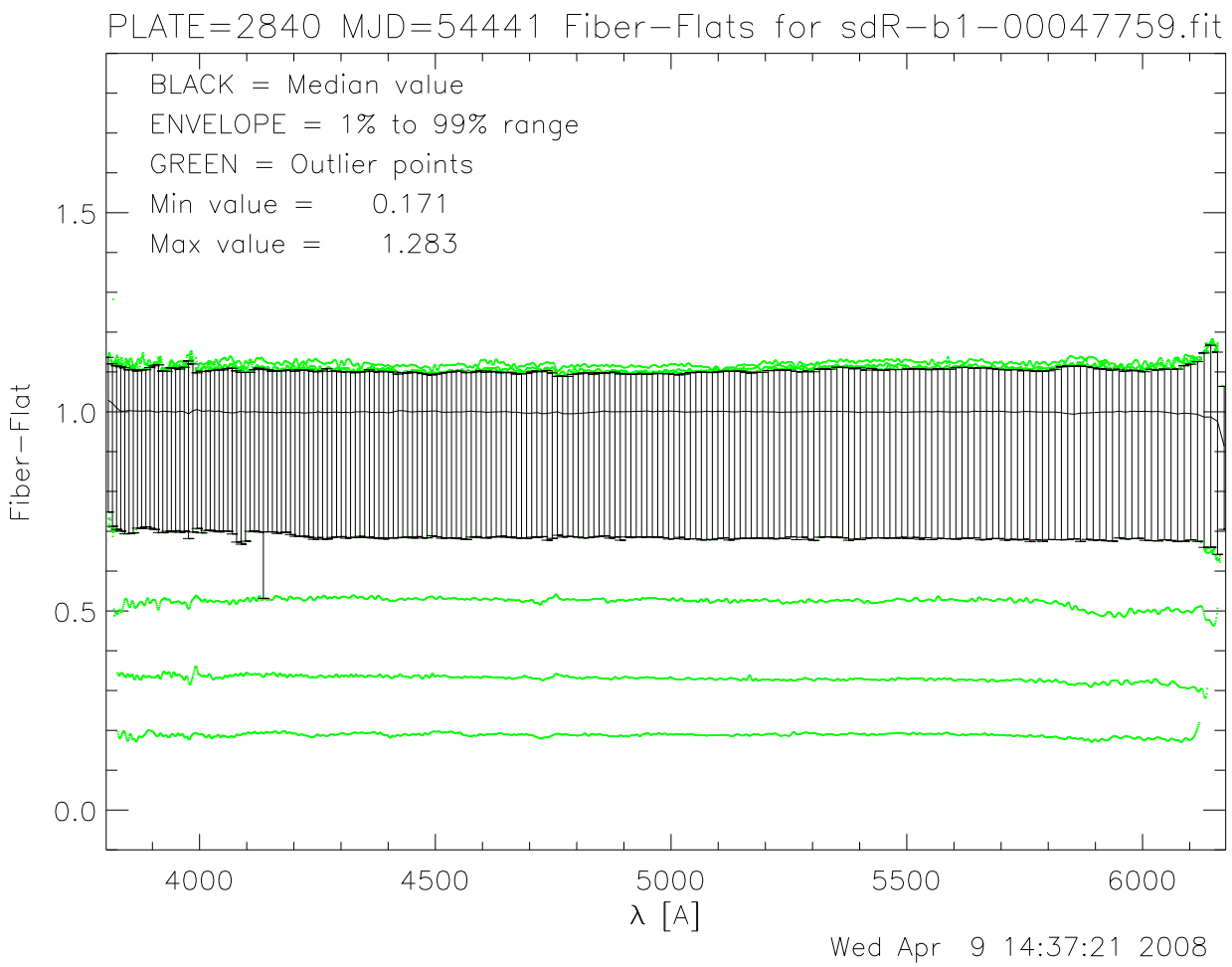

PLATE=2840 MJD=54441 sdR-b1-00047764.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
100
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

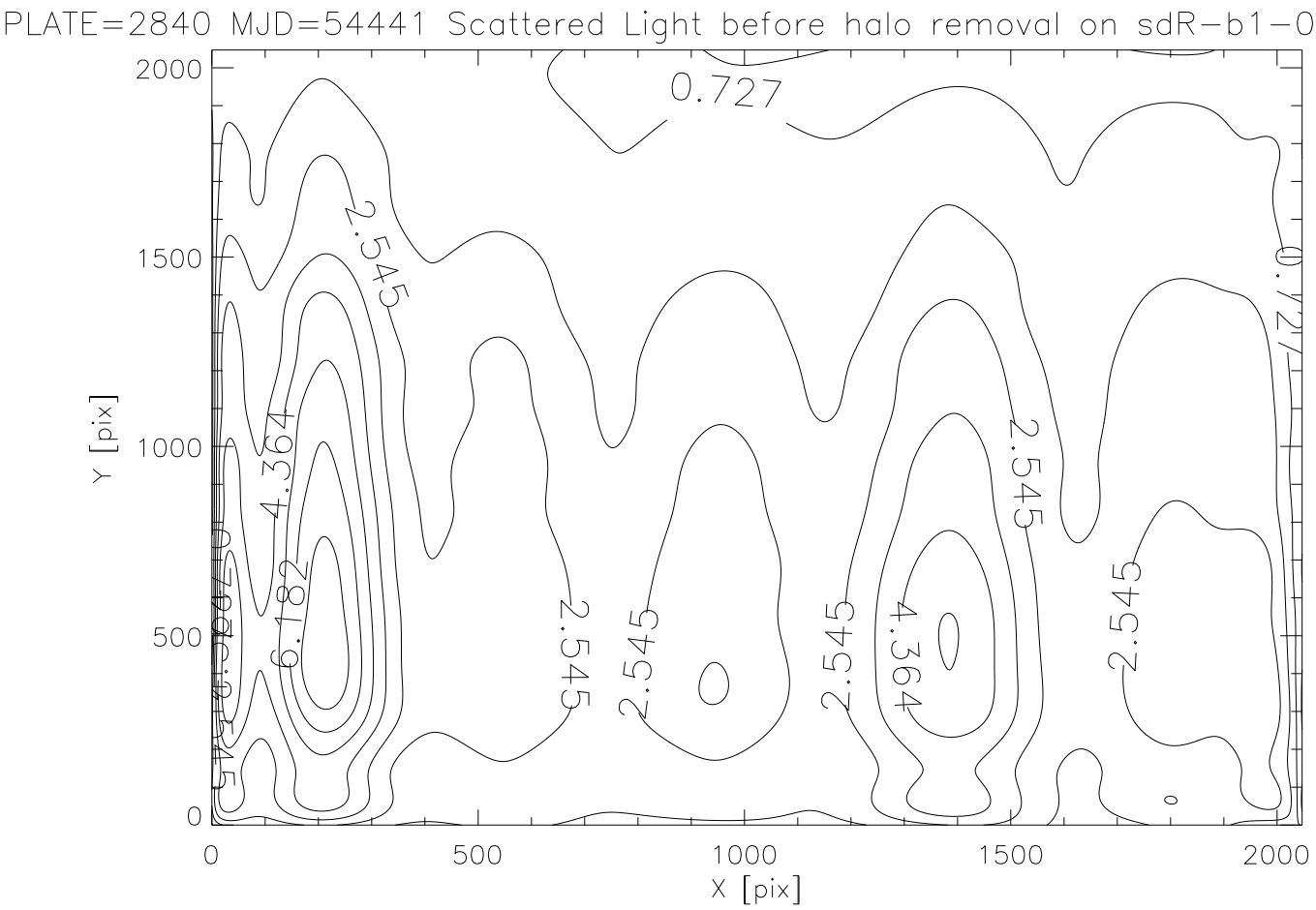

PLATE=2840 MJD=54441 sdR-b1-00047764.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

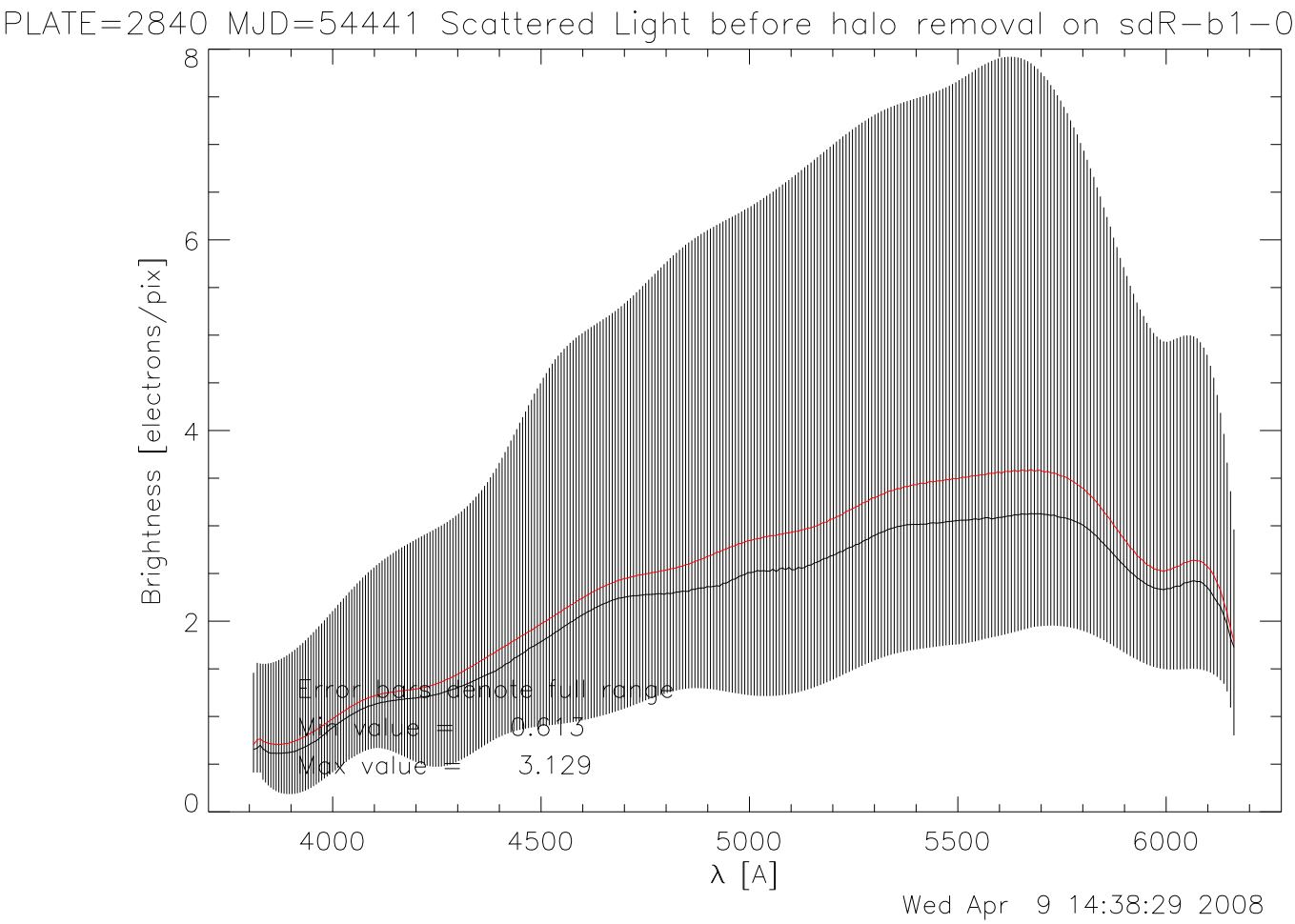

Number of sky fibers = 195
PLATE=2840 MJD=54441 sdR-b1-00047764.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

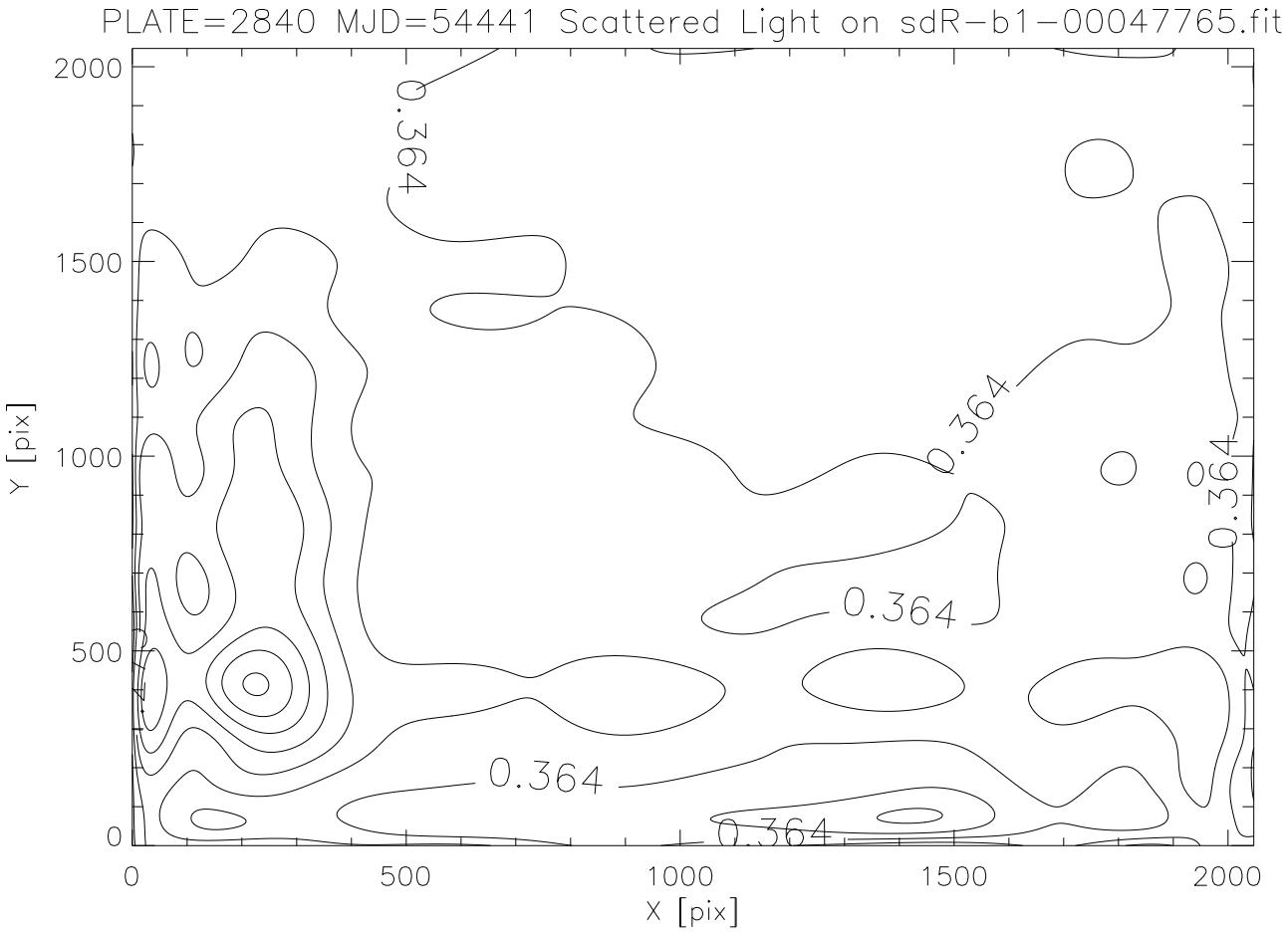

PLATE=2840 MJD=54441 sdR-b1-00047764.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
Fiber number
RED = sky fiber
Dispersion = 59.20 %
Flux (4359.5)/Airmass
Focal Distance [mm]
Flux (4359.5)/Airmass
Airmass

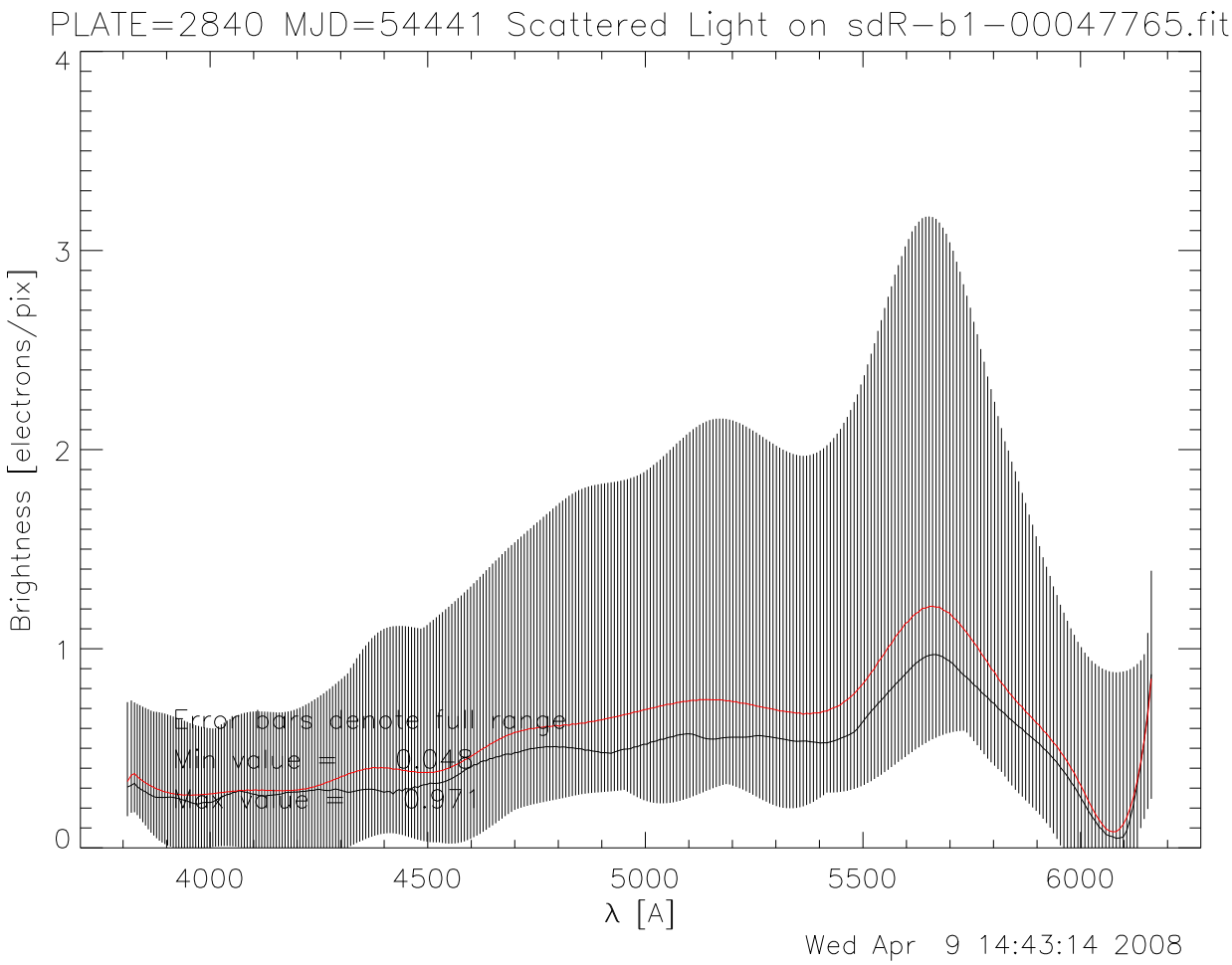

PLATE=2840 MJD=54441 sdR-b1-00047764.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
RED = sky fiber
Dispersion = 21.16 %
Fiber number
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

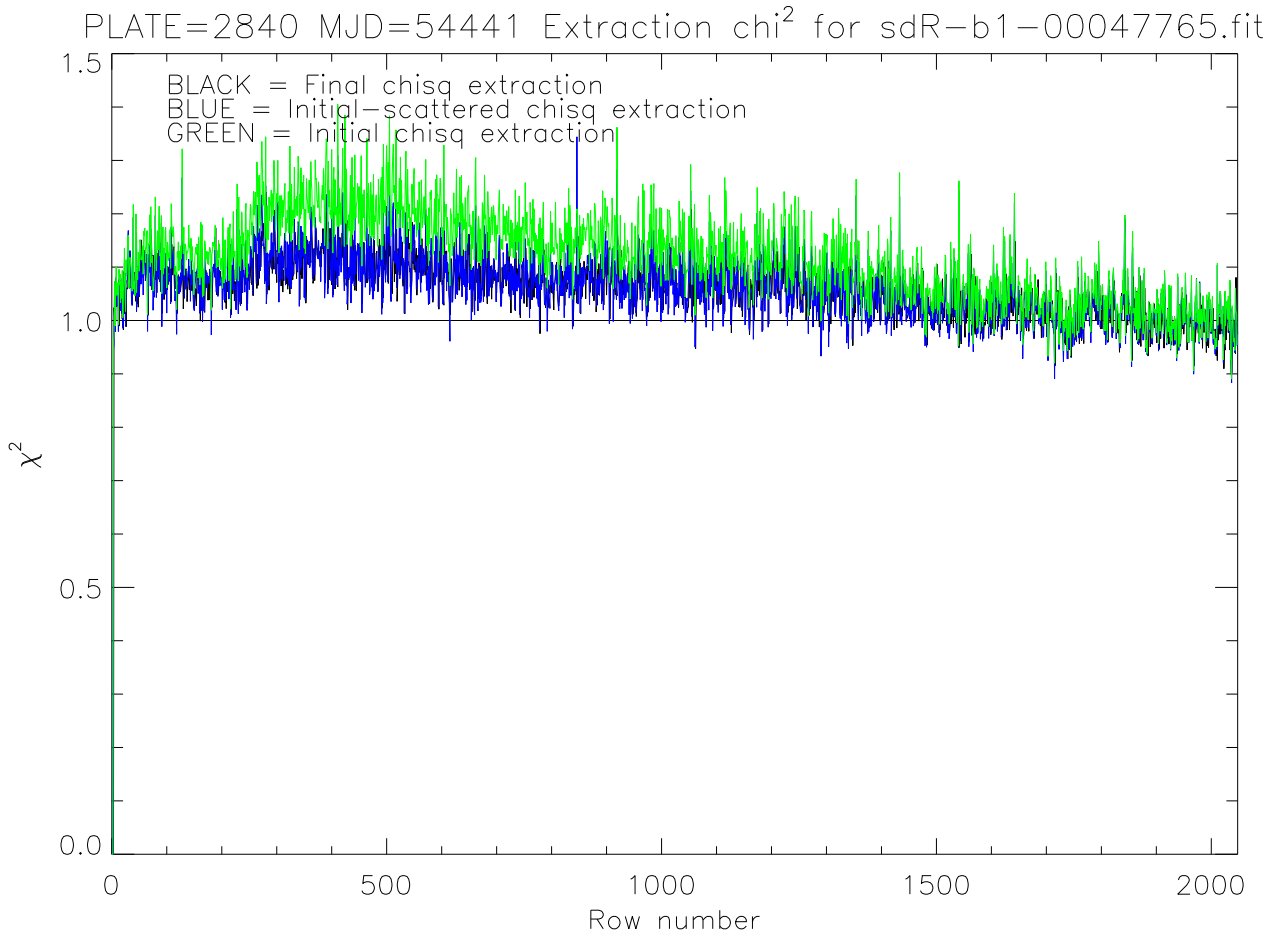

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b1-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.171
Max value = 1.283
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 14:37:21 2008

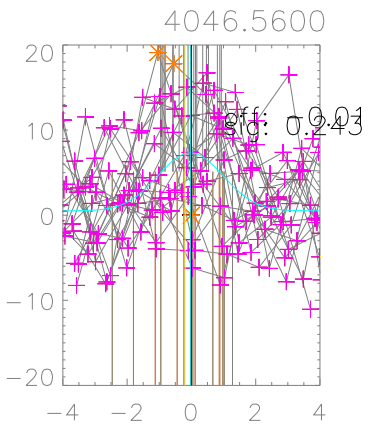

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b1-00047765.f
0.727
2.545
4.364
6.182
0
Y [pix]
X [pix]
2000
1500
1000
500
0

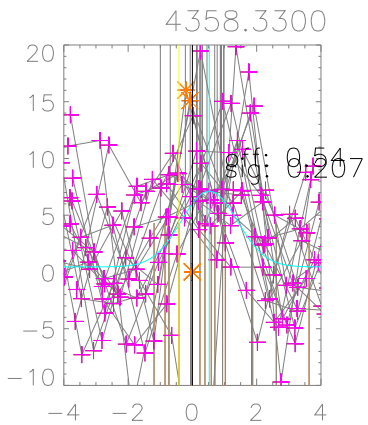

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b1-00047765.f
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.613
Max value = 3.129
Wed Apr 9 14:38:29 2008

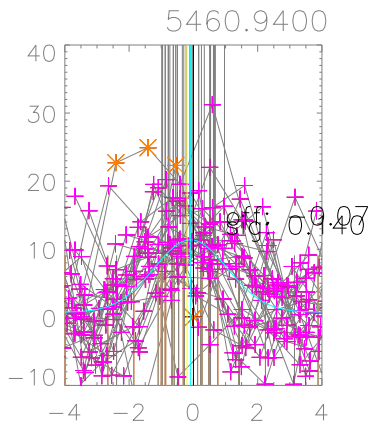

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047765.fit
Y [pix]
X [pix]
0
500
1000
1500
2000
0.364
0

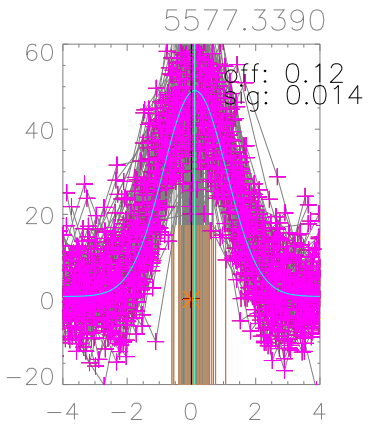

PLATE=2840 MJD=54441 Scattered Light on sdR-b1-00047765.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.048
Max value = 0.971
Wed Apr 9 14:43:14 2008

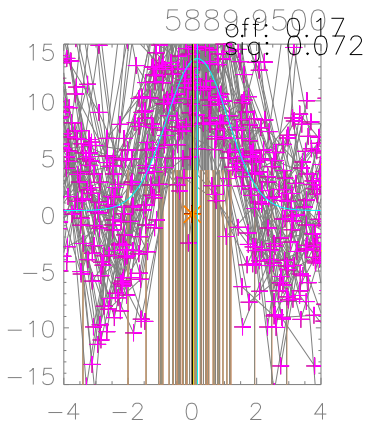

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b1-00047765.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
1.5
1.0
0.5
0.0
χ^2
0
500
1000
1500
2000
Row number

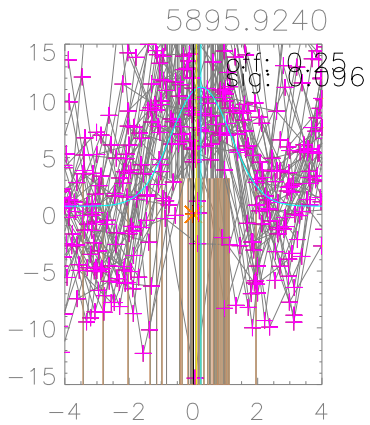

4046.5600
off: -0.01
sig: 0.243

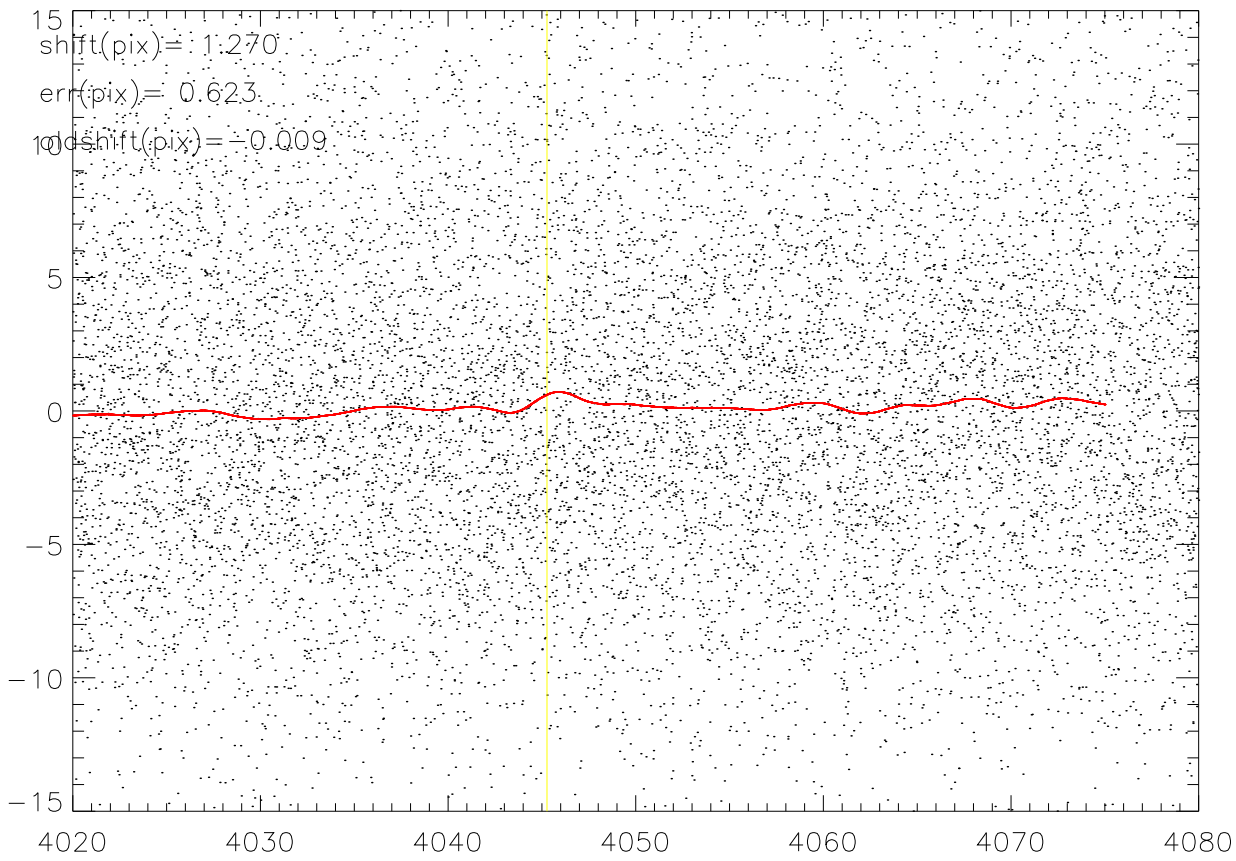

4358.3300
off: 0.54
sig: 0.207

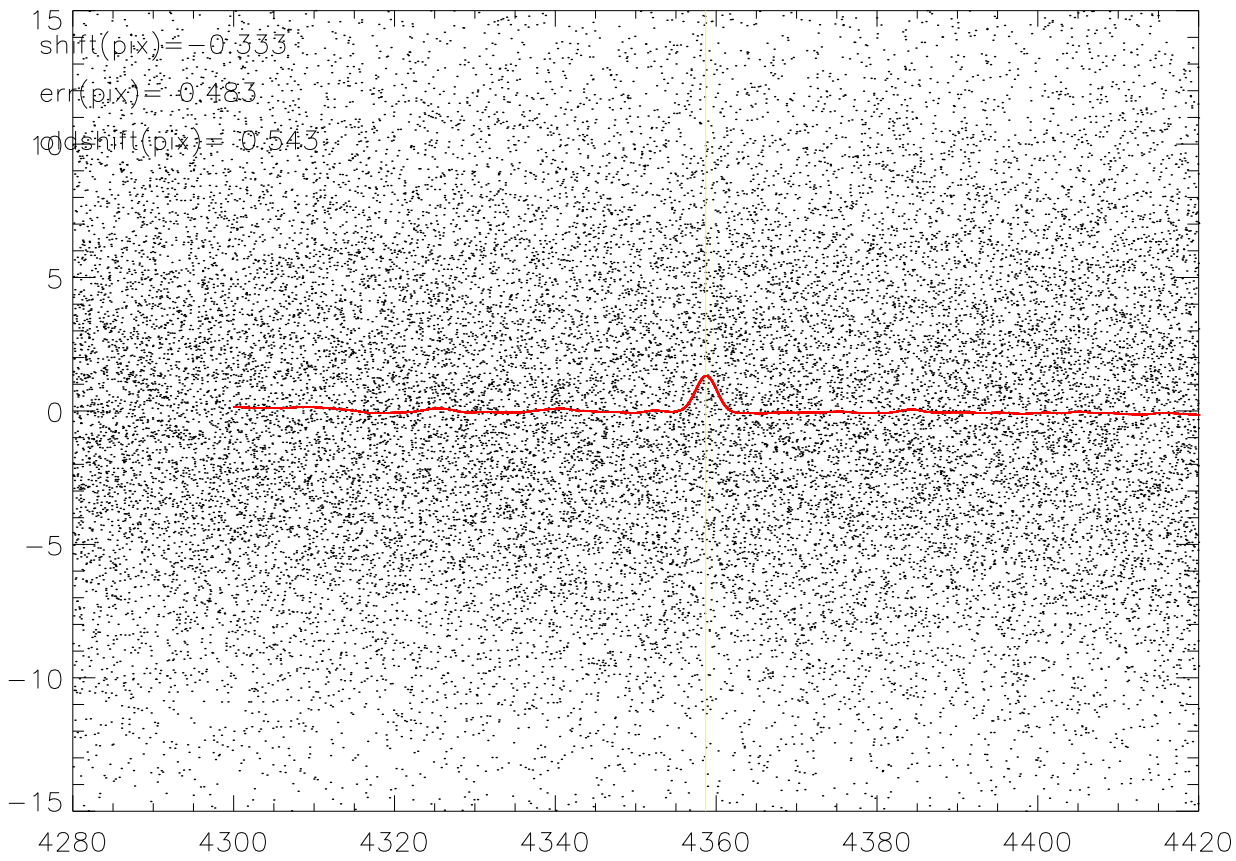

5460.9400
off: 0.07
sig: 0.40

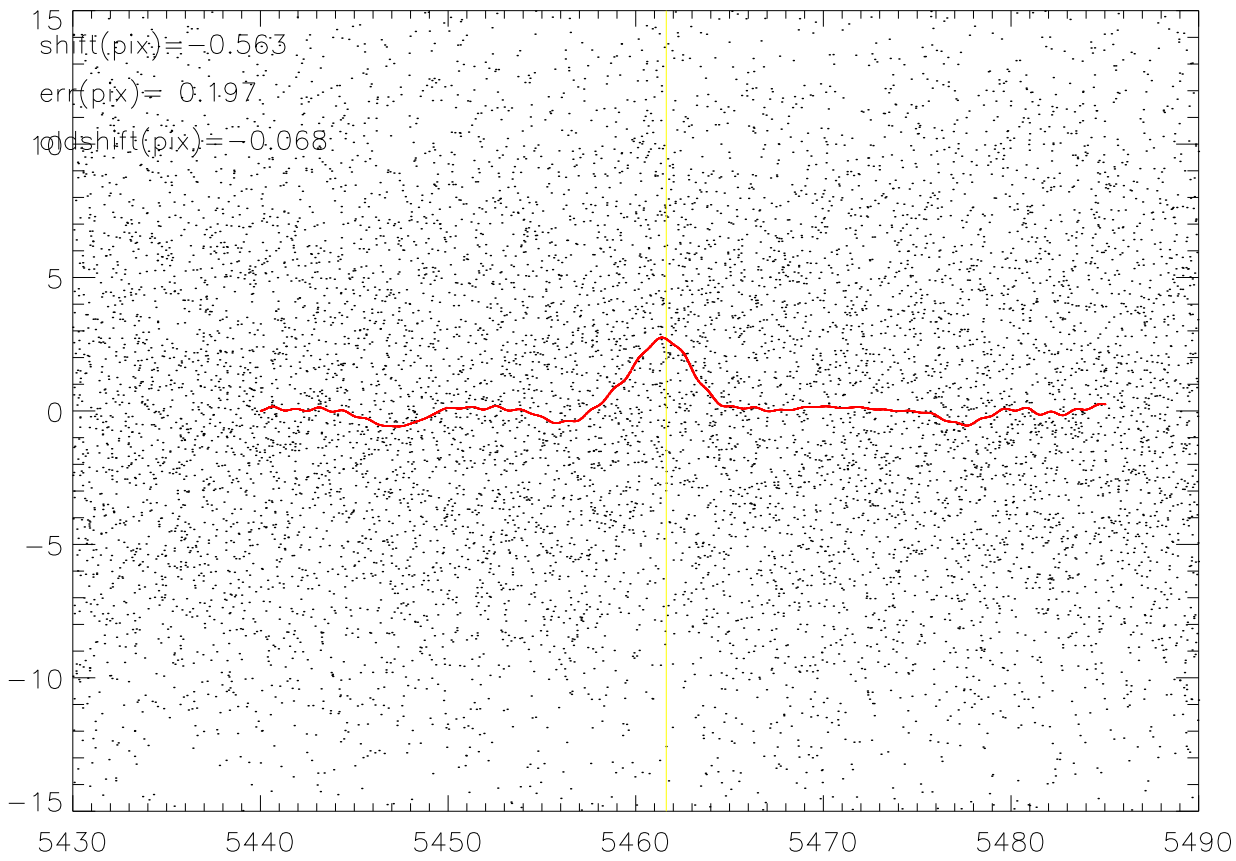

5577.3390
off: 0.12
sig: 0.014

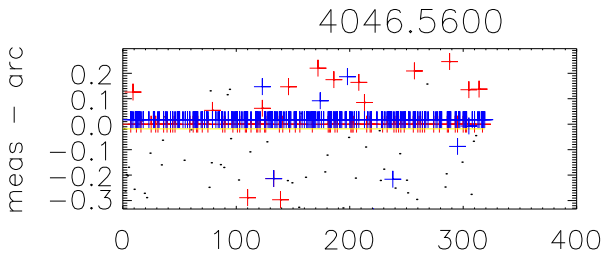

5889.9500
off: 0.17
sig: 0.072

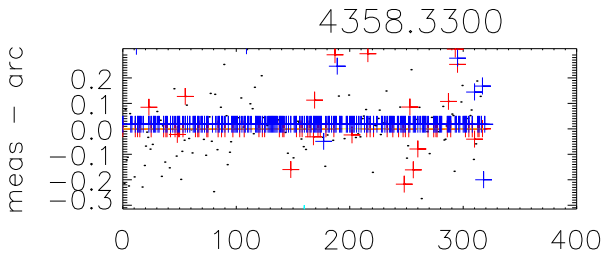

5895.9240
off: 0.25
sig: 0.096

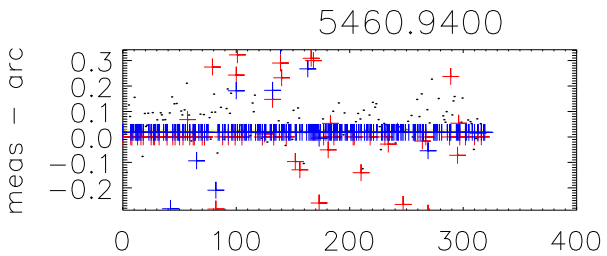

shift(pix)= 1.270
err(pix)= 0.623
oldshift(pix)= -0.009
15
10
5
0
−5
−10
−15
4020
4030
4040
4050
4060
4070
4080

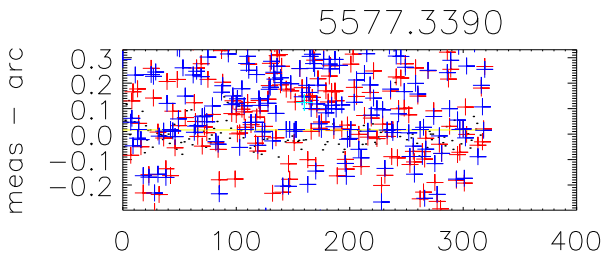

shift(pix)= −0.333
err(pix)= 0.483
oldshift(pix)= 0.543
15
10
5
0
−5
−10
−15
4280
4300
4320
4340
4360
4380
4400
4420

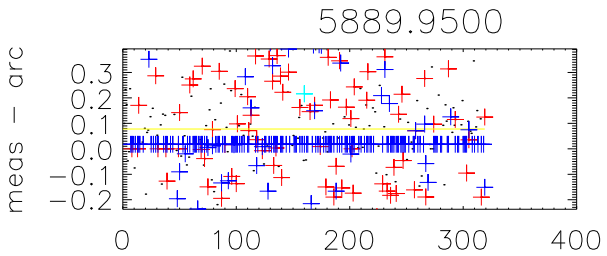

shift(pix)=−0.563
err(pix)= 0.197
oldshift(pix)=−0.068
15
10
5
0
−5
−10
−15
5430
5440
5450
5460
5470
5480
5490

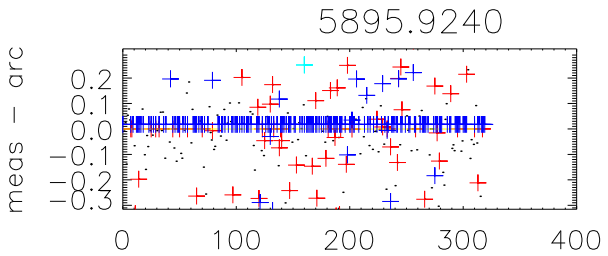

4046.5600
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

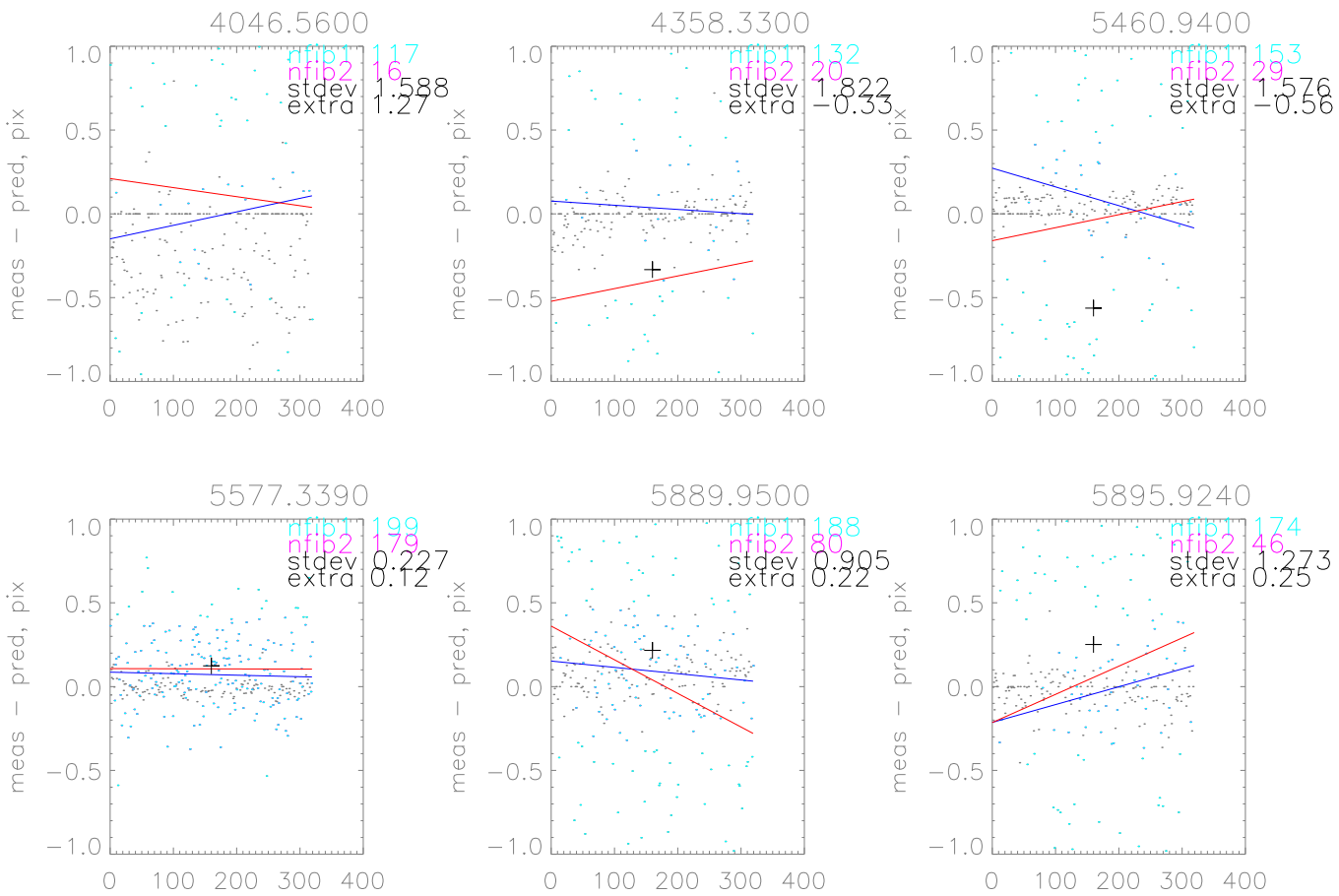

4358.3300
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

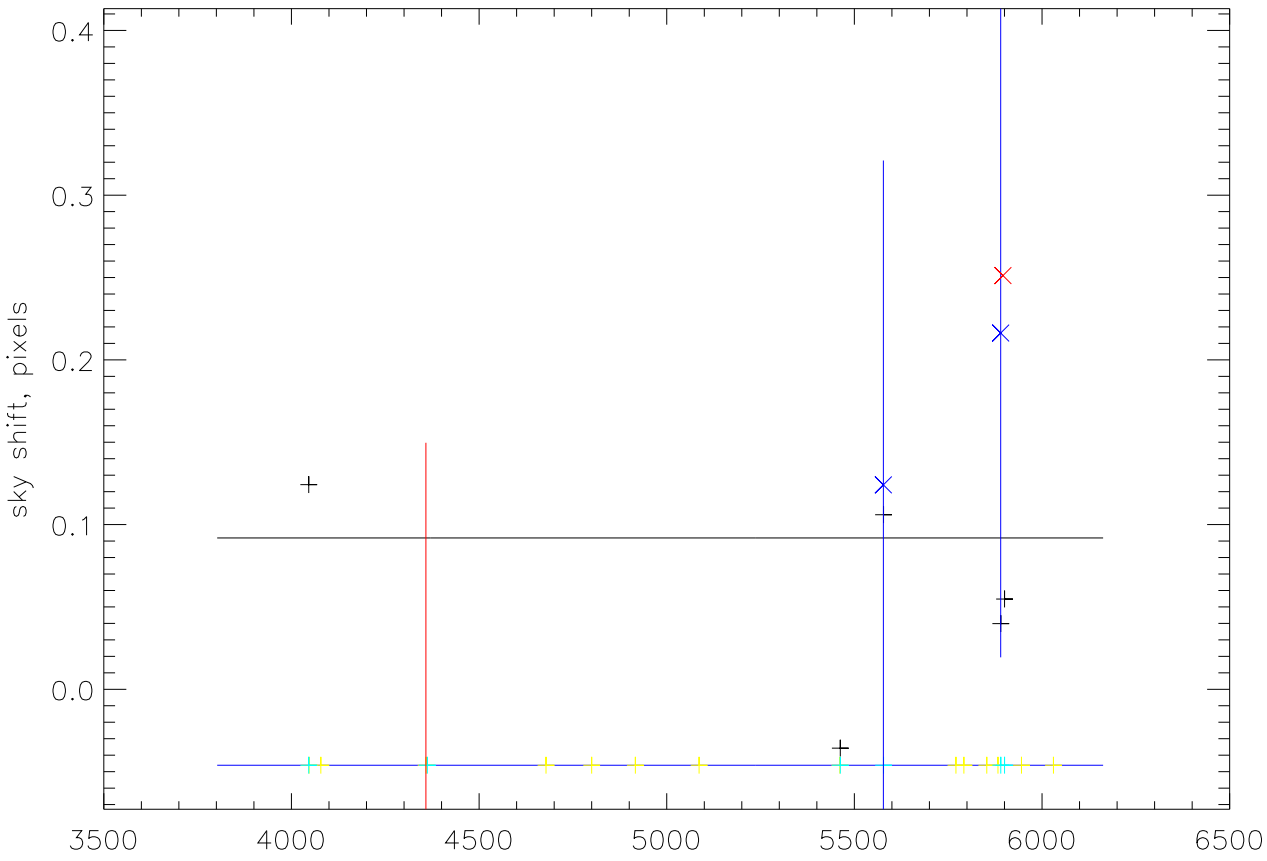

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

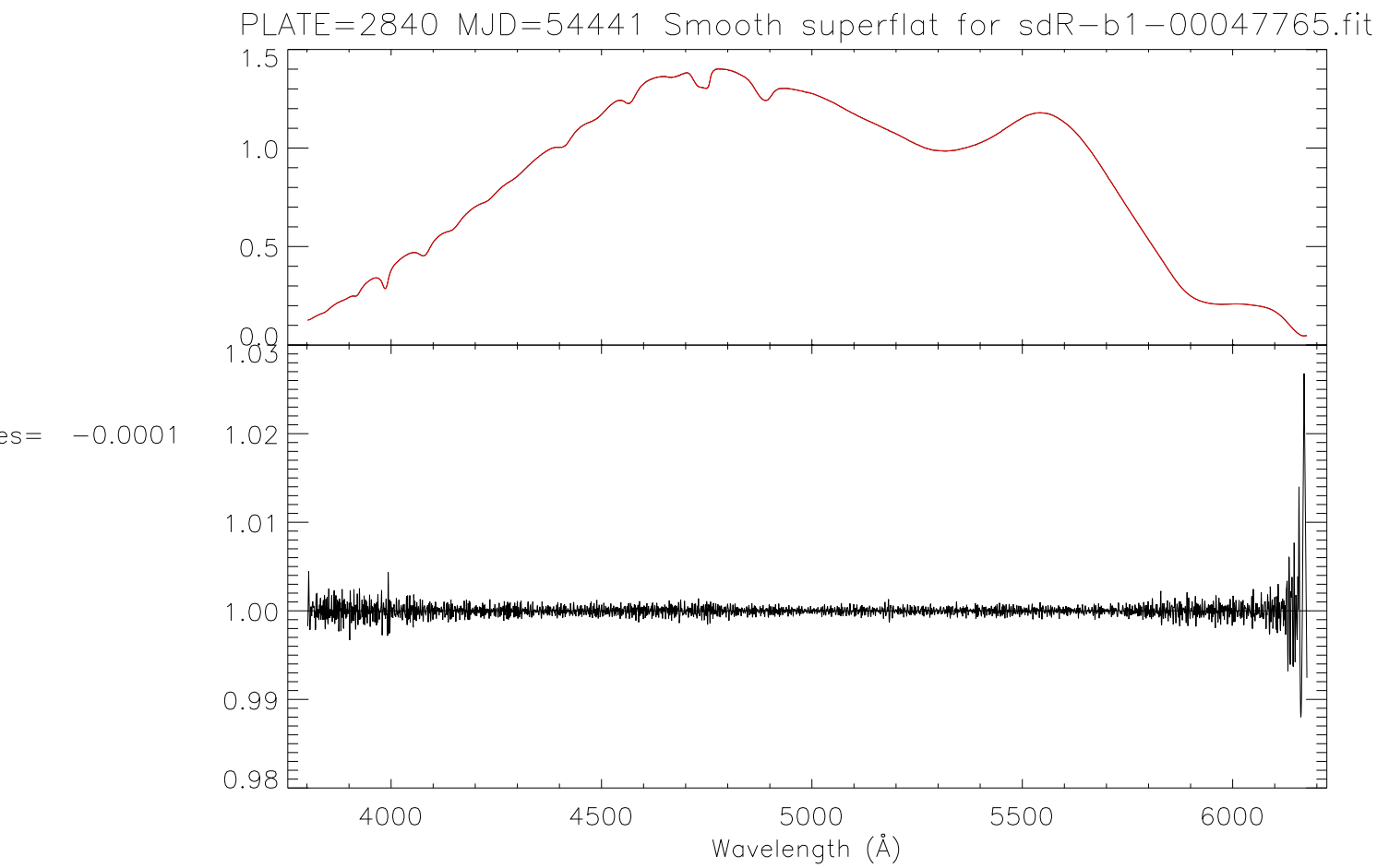

5577.3390
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400


5889.9500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

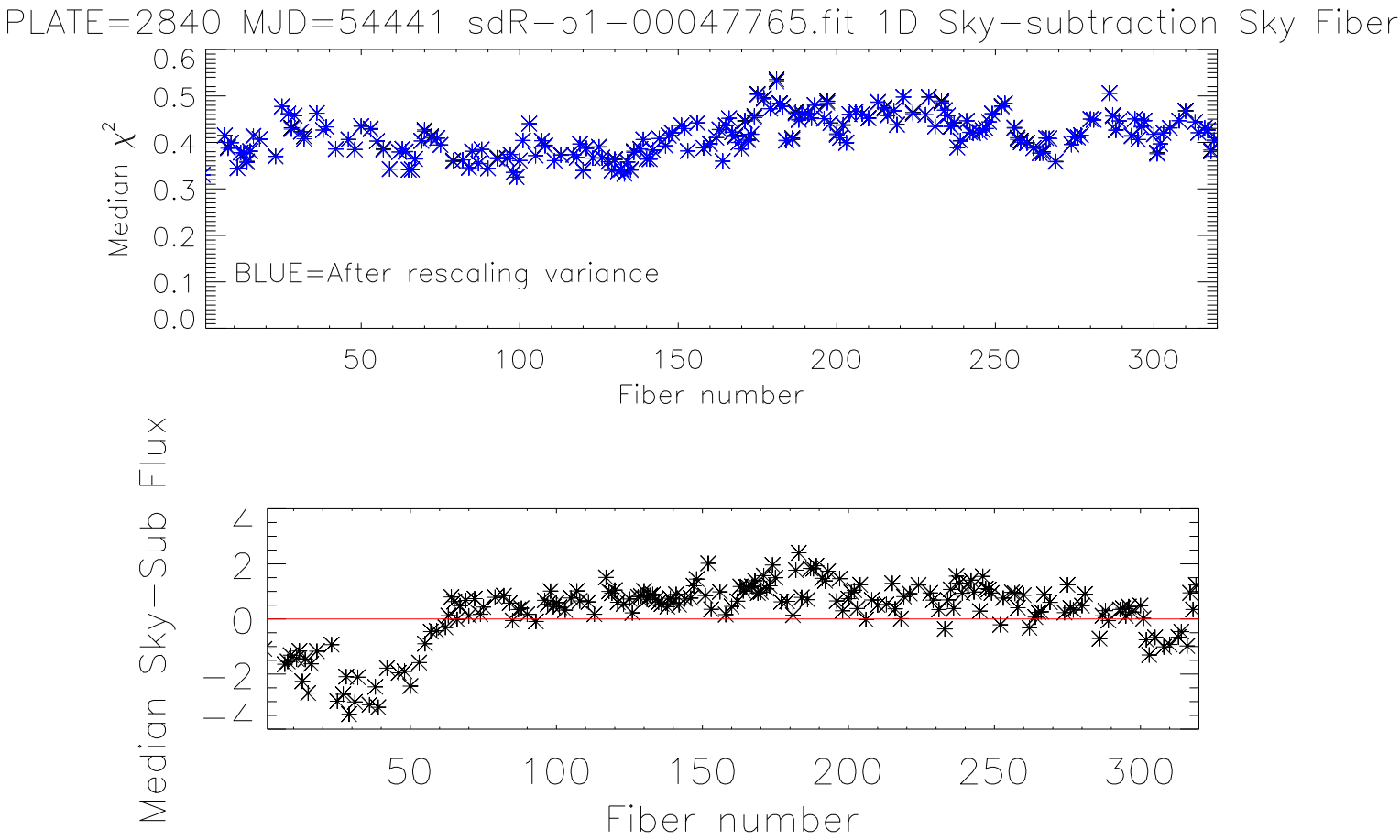

5895.9240
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

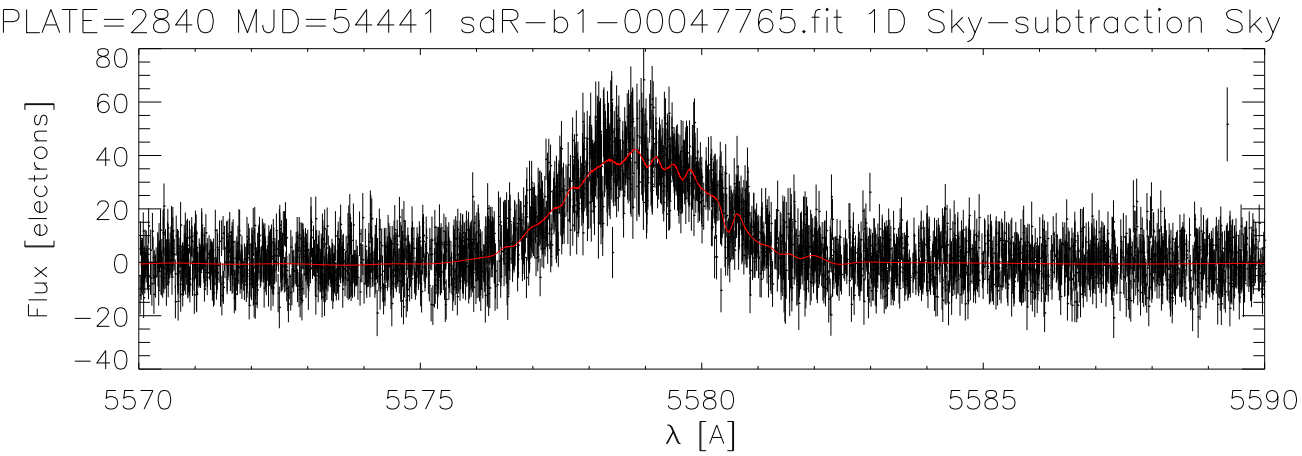

4046.5600
nfib1 117
nfib2 16
stdev 1.588
extra 1.27
4358.3300
nfib1 132
nfib2 20
stdev 1.822
extra −0.33
5460.9400
nfib1 153
nfib2 29
stdev 1.576
extra −0.56
5577.3390
nfib1 199
nfib2 179
stdev 0.227
extra 0.12
5889.9500
nfib1 188
nfib2 80
stdev 0.905
extra 0.22
5895.9240
nfib1 174
nfib2 46
stdev 1.273
extra 0.25
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0
100
200
300
400

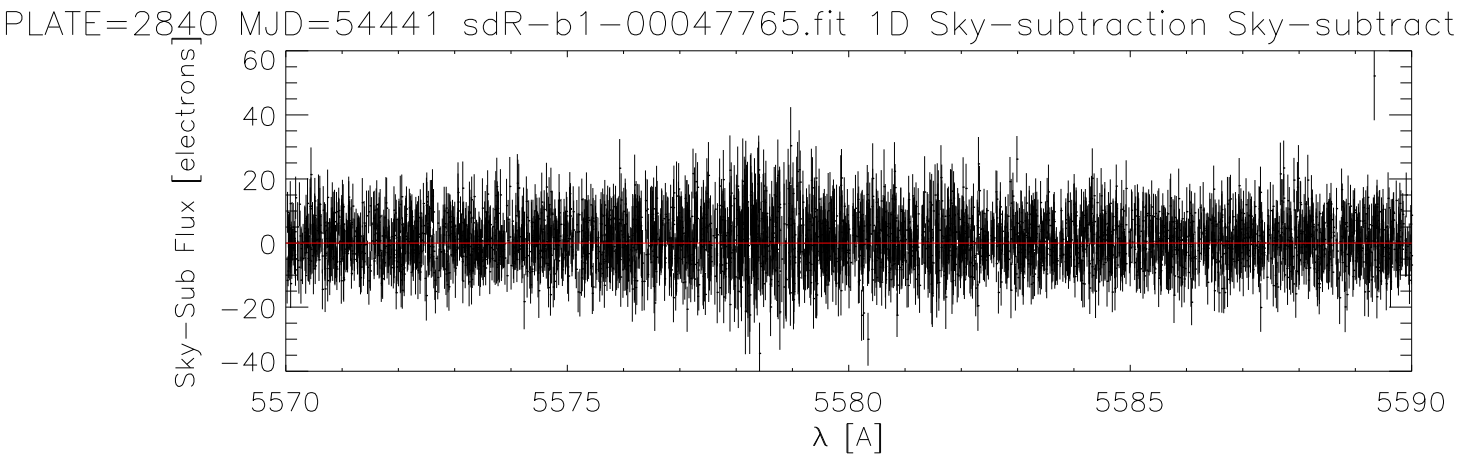

sky shift, pixels
0.4
0.3
0.2
0.1
0.0
3500
4000
4500
5000
5500
6000
6500

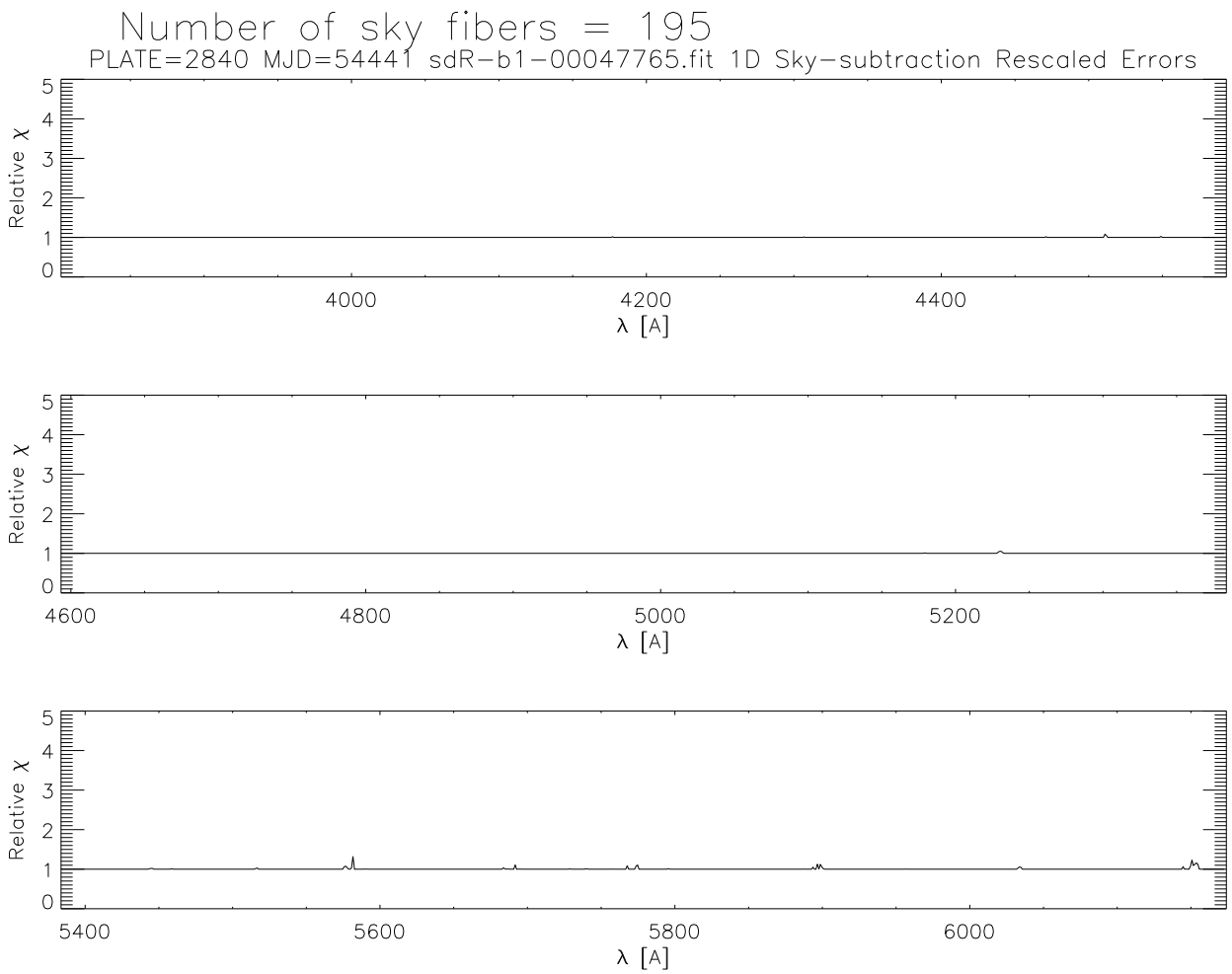

PLATE=2840 MJD=54441 Smooth superflat for sdR-b1-00047765.fit
1.5
1.0
0.5
0.0
1.03
1.02
1.01
1.00
0.99
0.98
4000
4500
5000
5500
6000
Wavelength (Å)

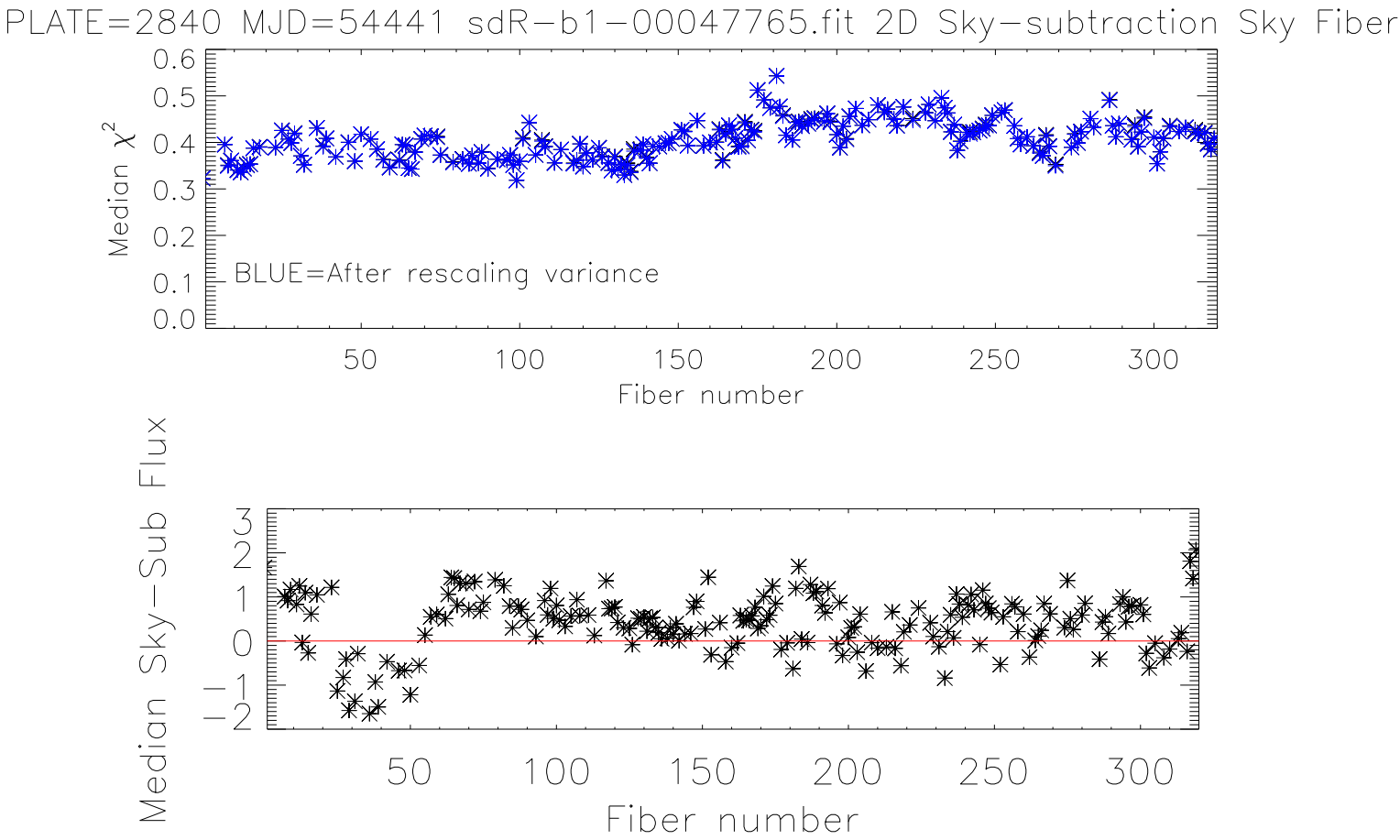
es= −0.0001

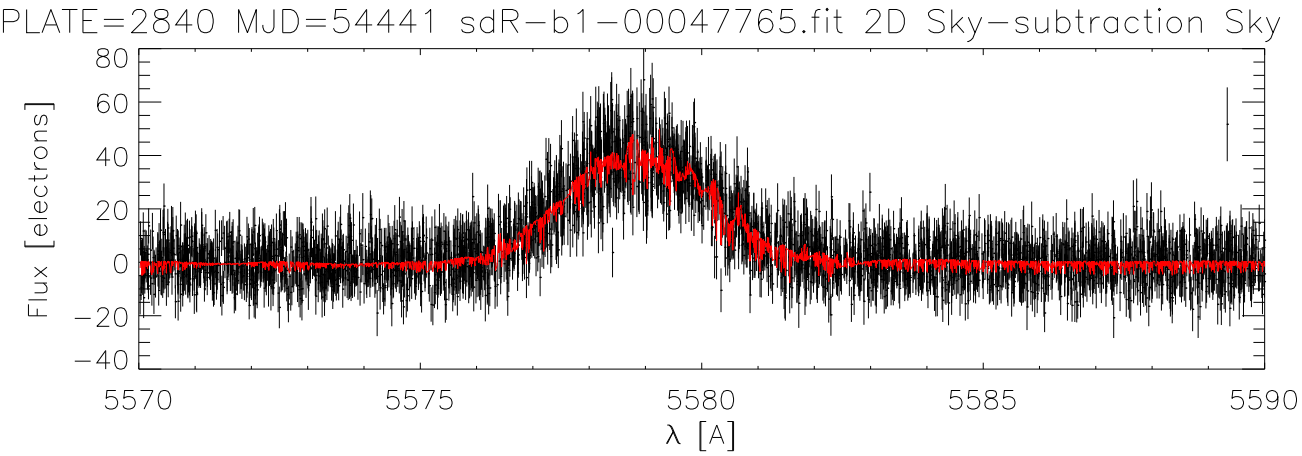

PLATE=2840 MJD=54441 sdR-b1-00047765.fit 1D Sky-subtraction Sky Fiber
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

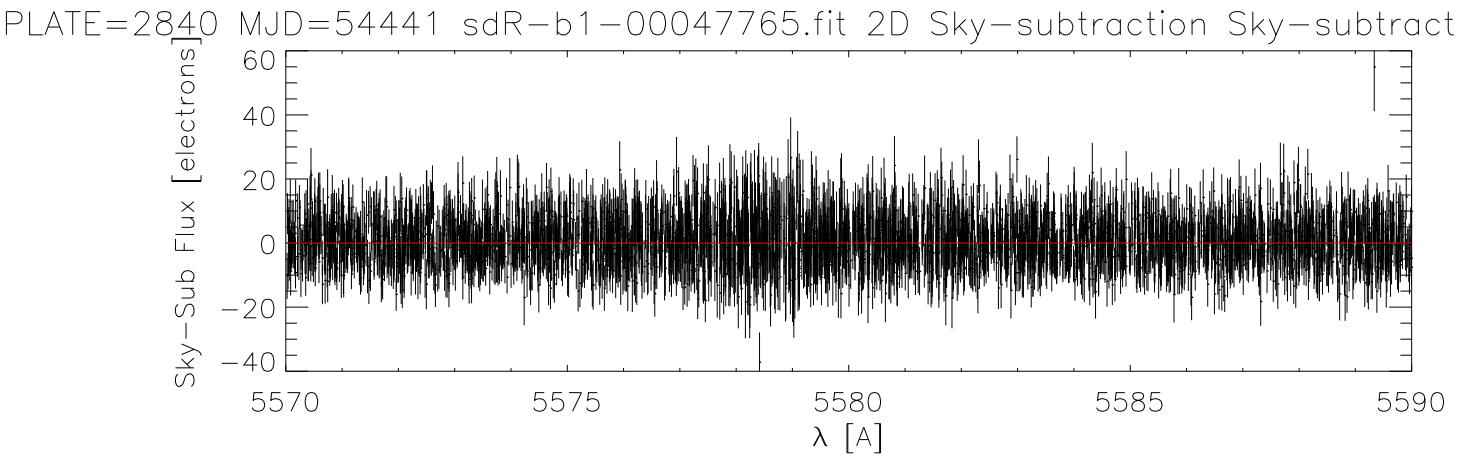

PLATE=2840 MJD=54441 sdR-b1-00047765.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

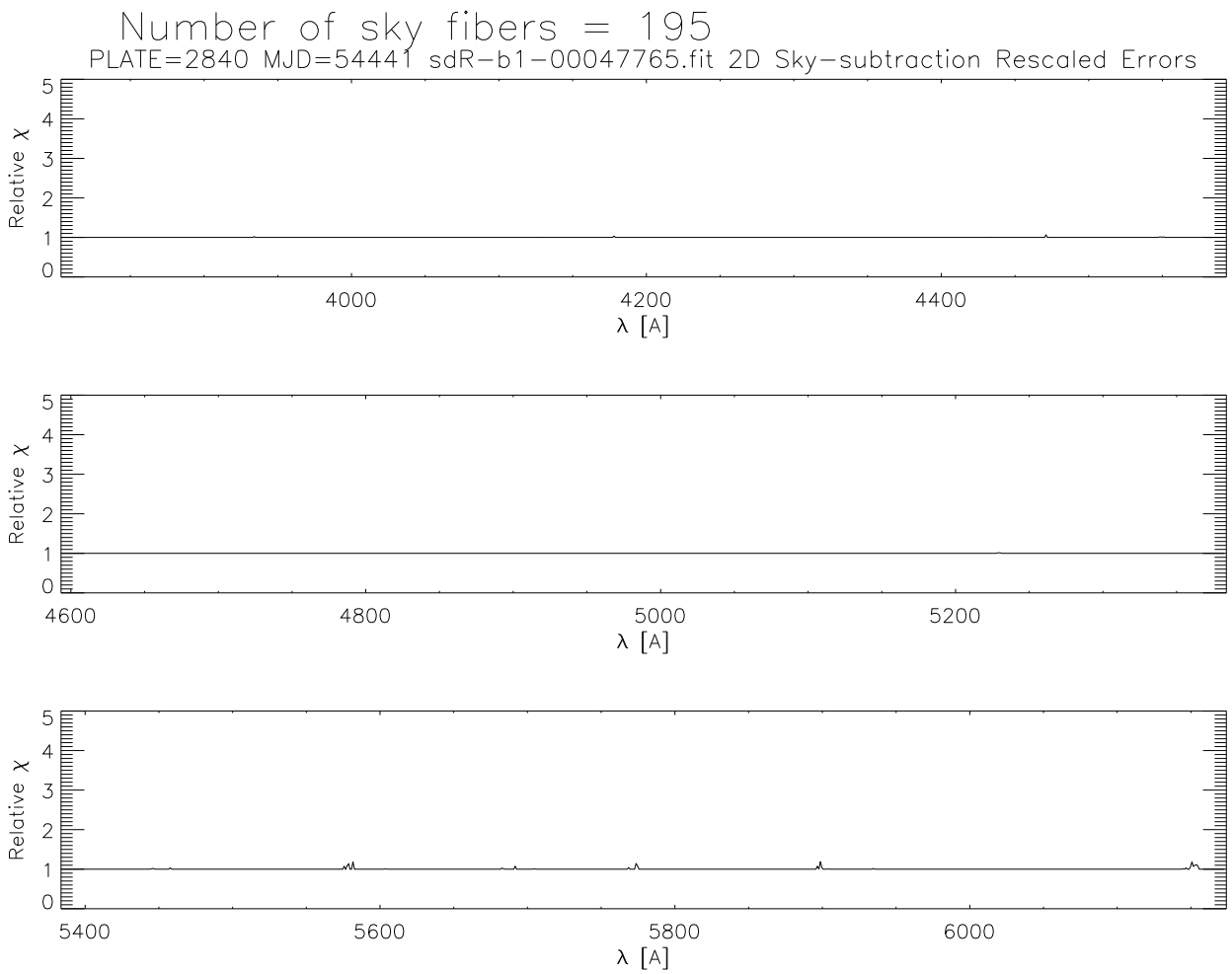

PLATE=2840 MJD=54441 sdR-b1-00047765.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

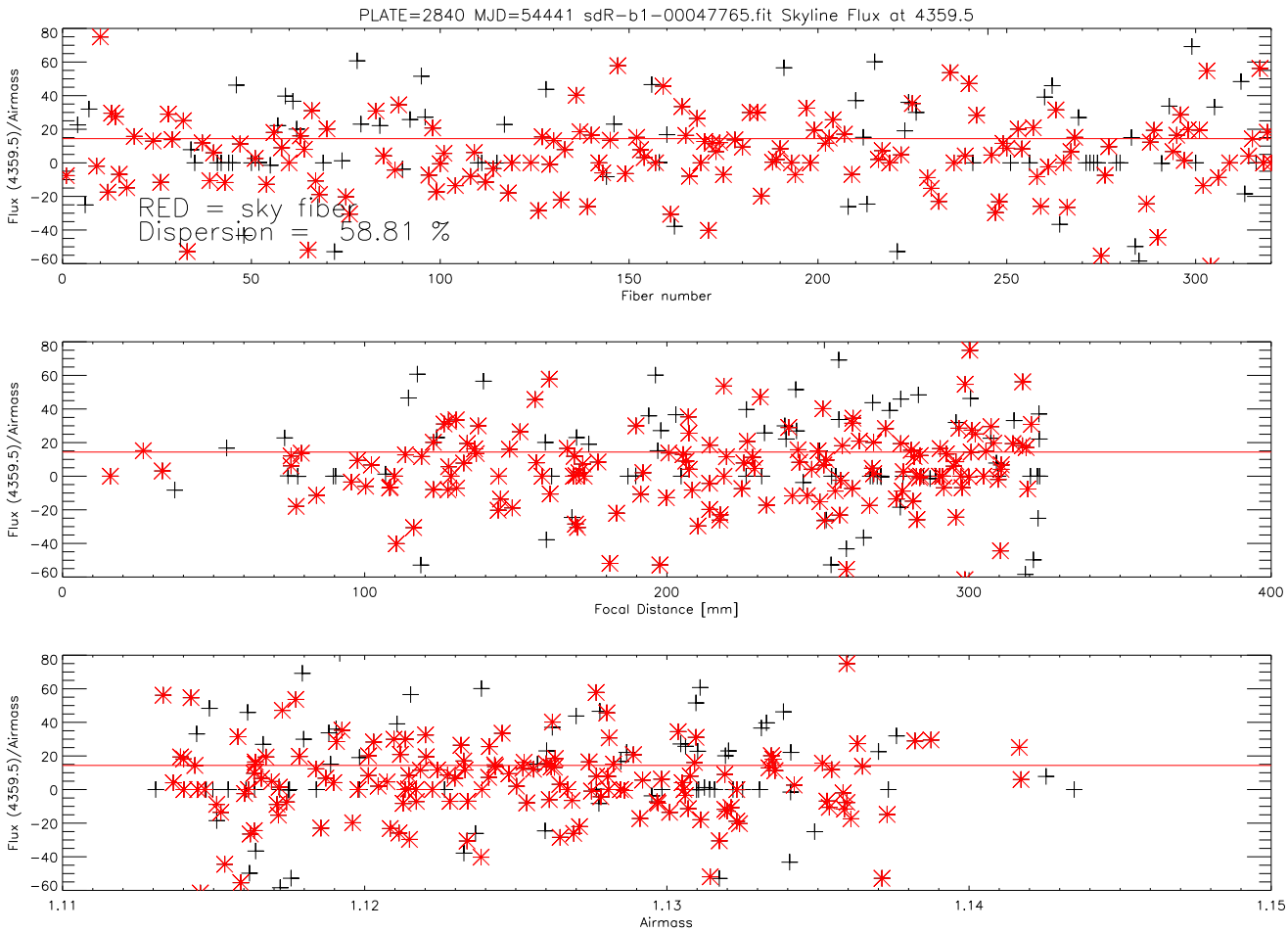

Number of sky fibers = 195
PLATE=2840 MJD=54441 sdR-b1-00047765.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

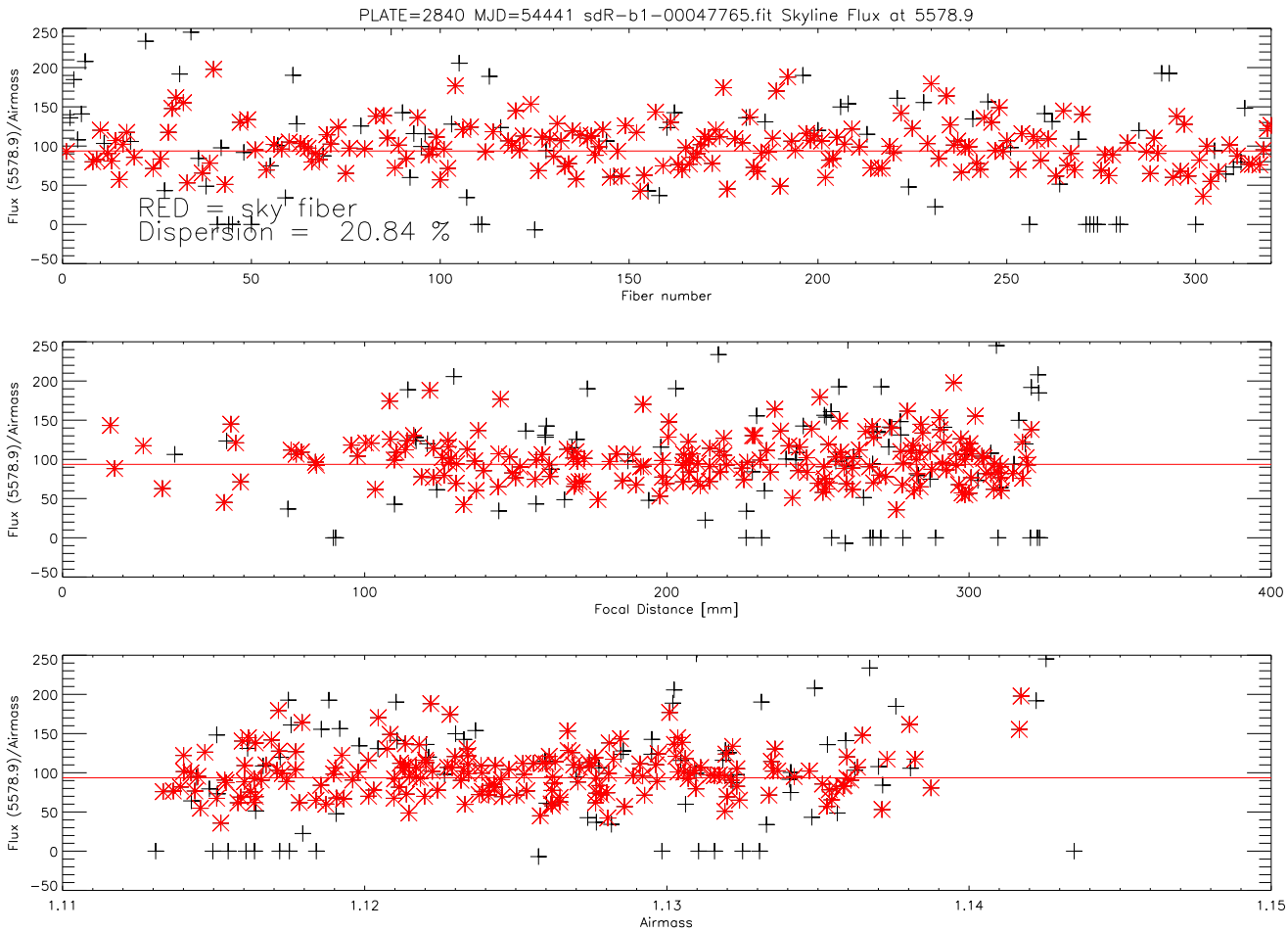

PLATE=2840 MJD=54441 sdR-b1-00047765.fit 2D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.1
0.2
0.3
0.4
0.5
0.6
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-2
-1
0
1
2
3
50
100
150
200
250
300
Fiber number

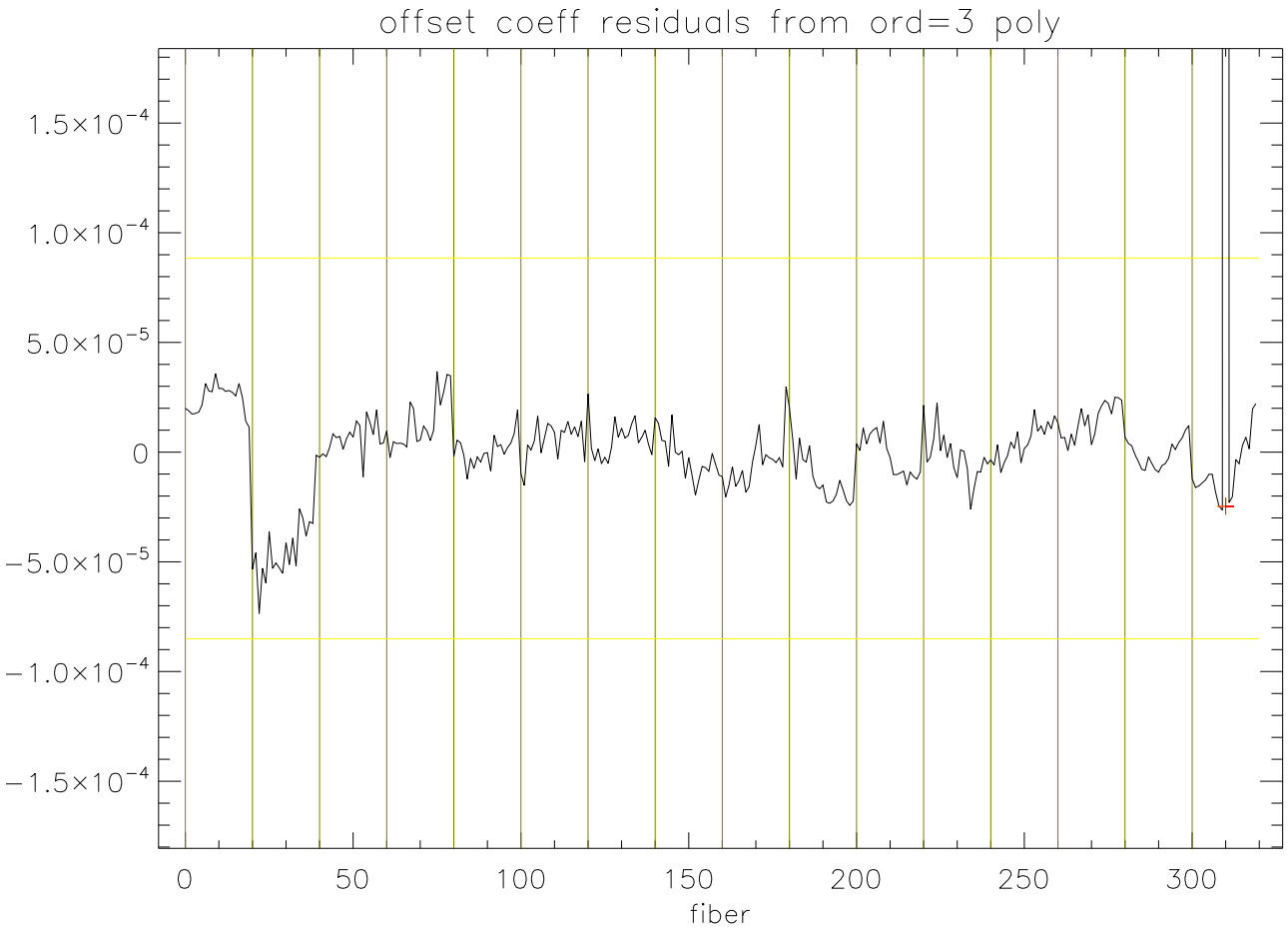

PLATE=2840 MJD=54441 sdR-b1-00047765.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

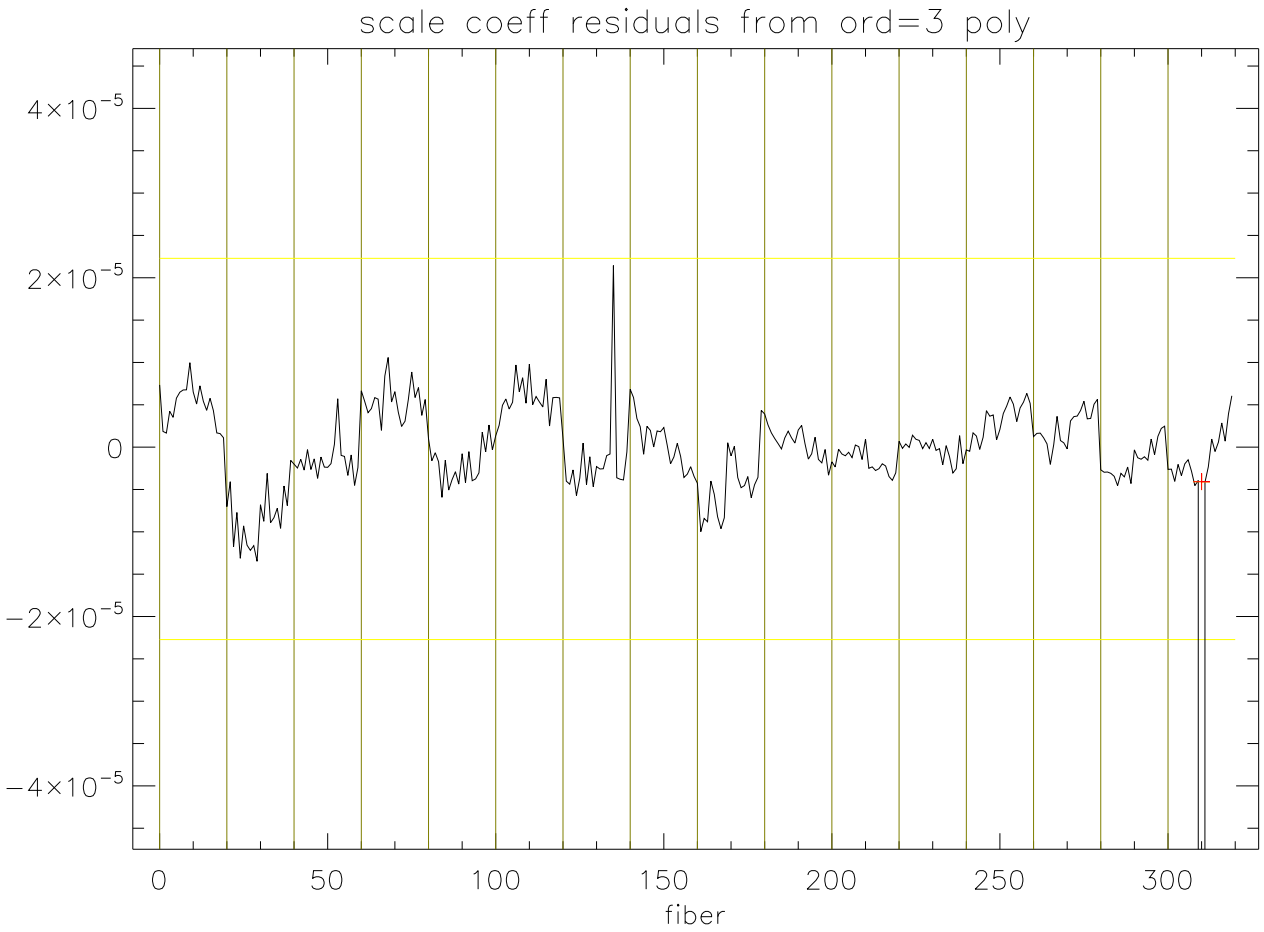

PLATE=2840 MJD=54441 sdR-b1-00047765.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

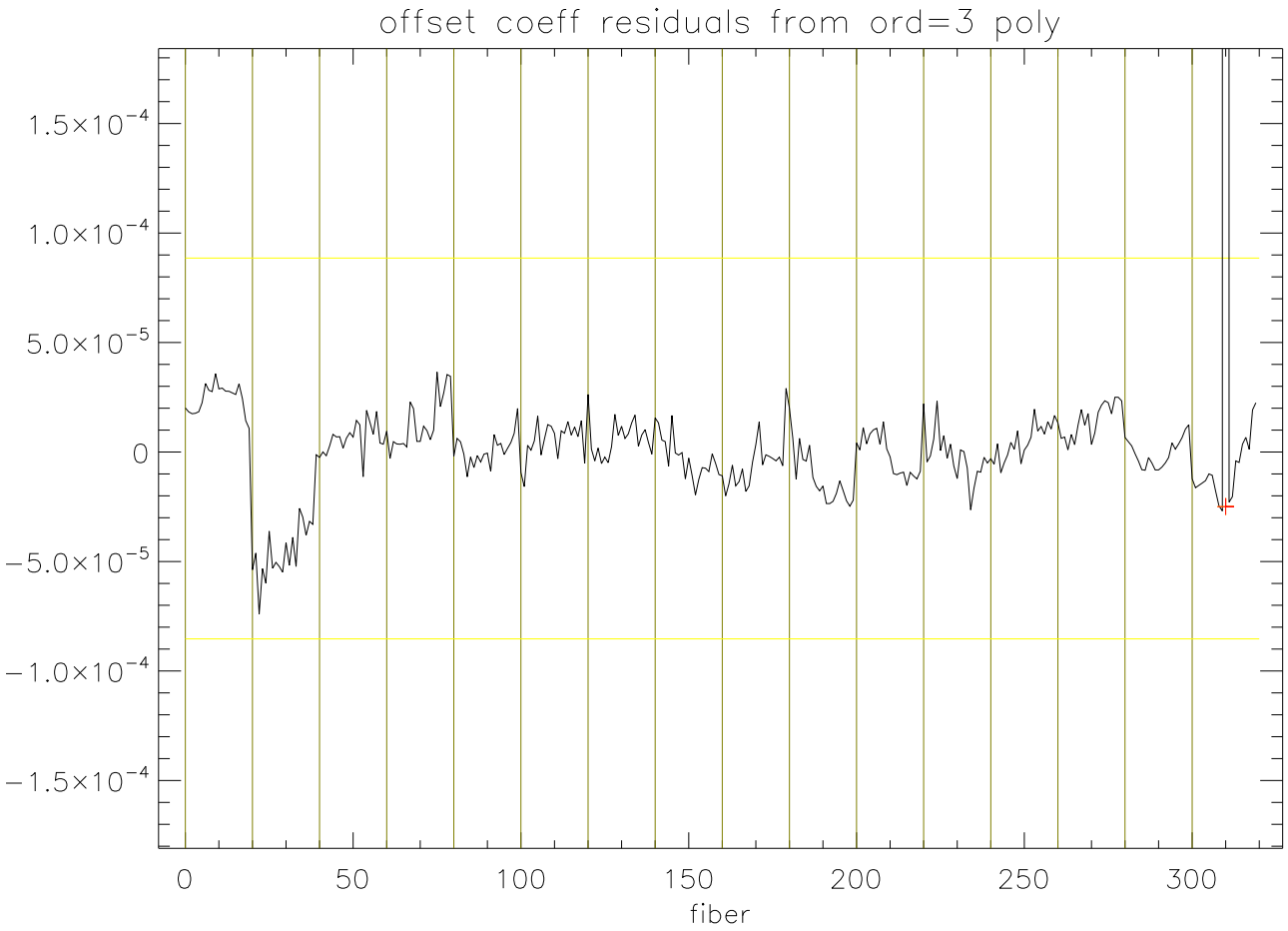

Number of sky fibers = 195
PLATE=2840 MJD=54441 sdR-b1-00047765.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

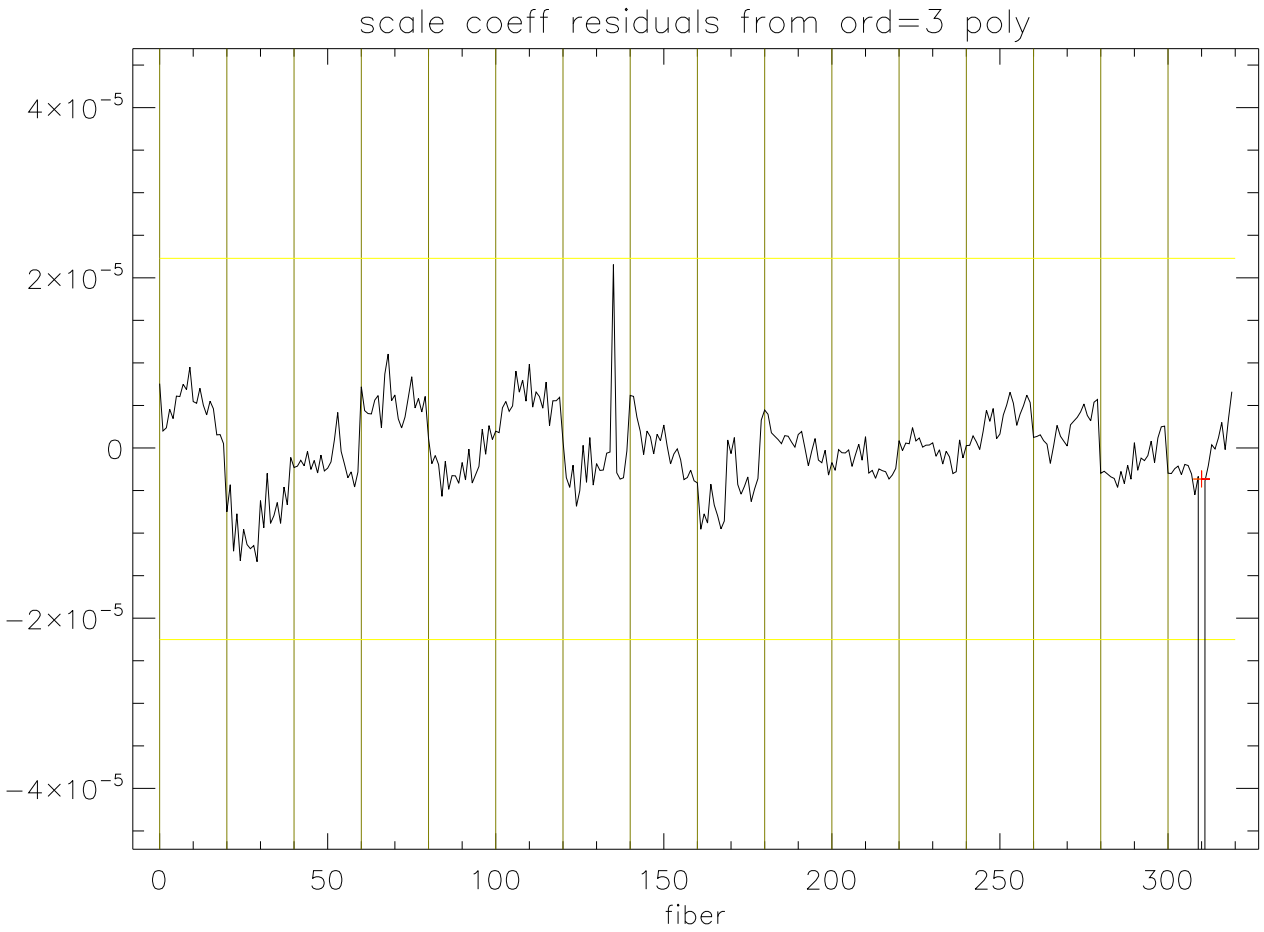

PLATE=2840 MJD=54441 sdR-b1-00047765.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
RED = sky fiber
Dispersion = 58.81 %
Fiber number
Flux (4359.5)/Airmass
Focal Distance [mm]
Flux (4359.5)/Airmass
Airmass

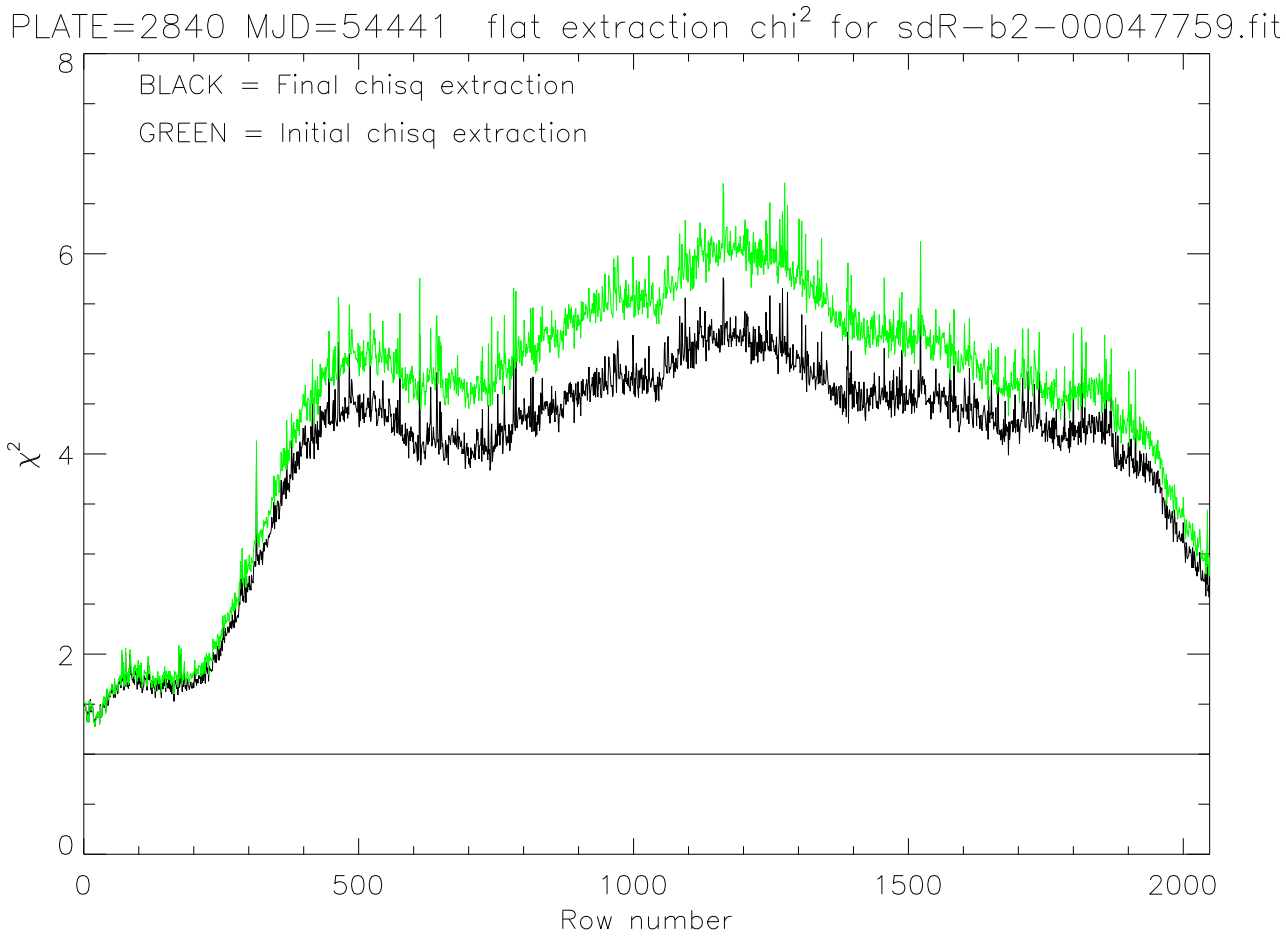

PLATE=2840 MJD=54441 sdR-b1-00047765.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
Fiber number
RED = sky fiber
Dispersion = 20.84 %
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

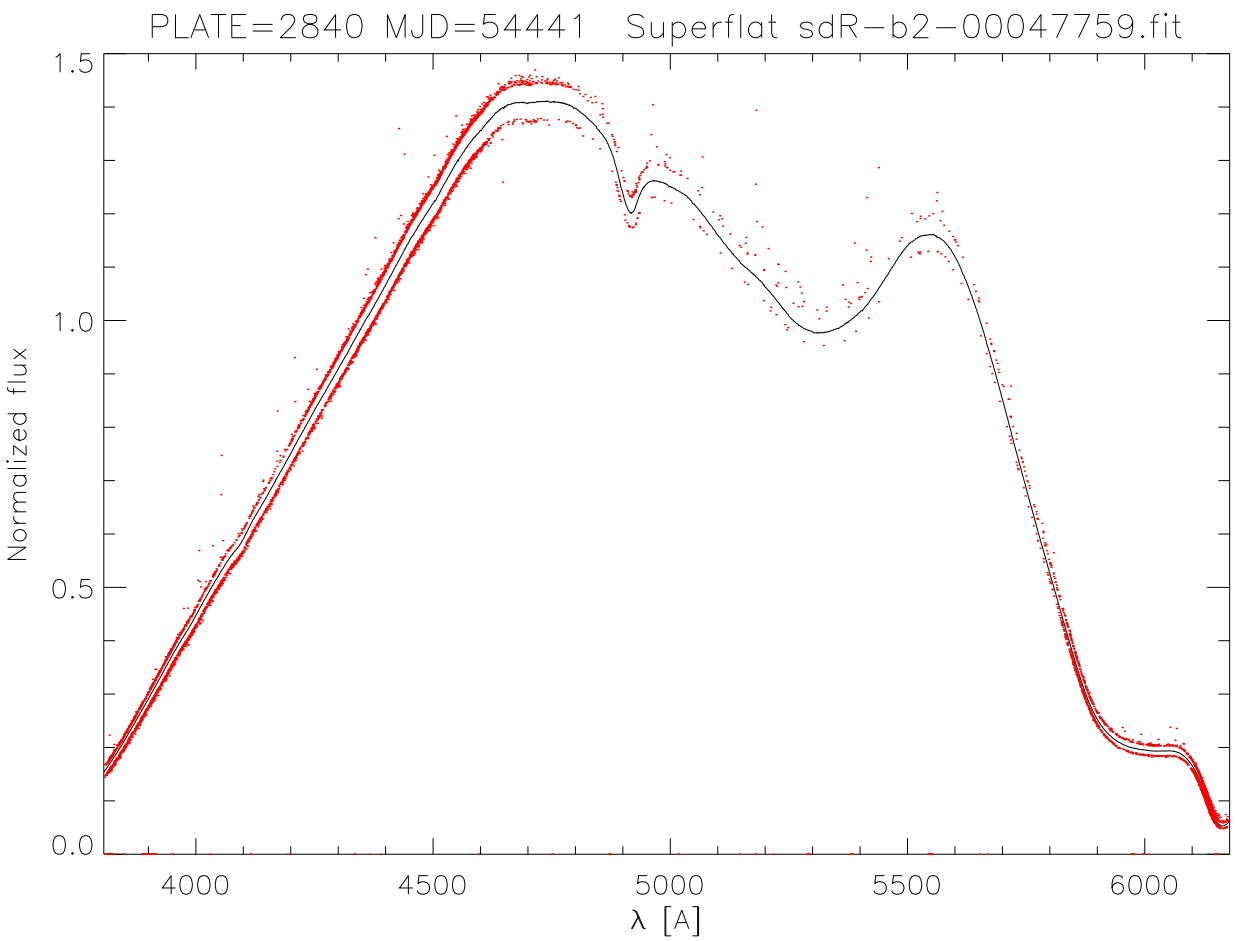

offset coeff residuals from ord=3 poly
1.5×10⁻⁴
1.0×10⁻⁴
5.0×10⁻⁵
0
−5.0×10⁻⁵
−1.0×10⁻⁴
−1.5×10⁻⁴
0
50
100
150
200
250
300
fiber

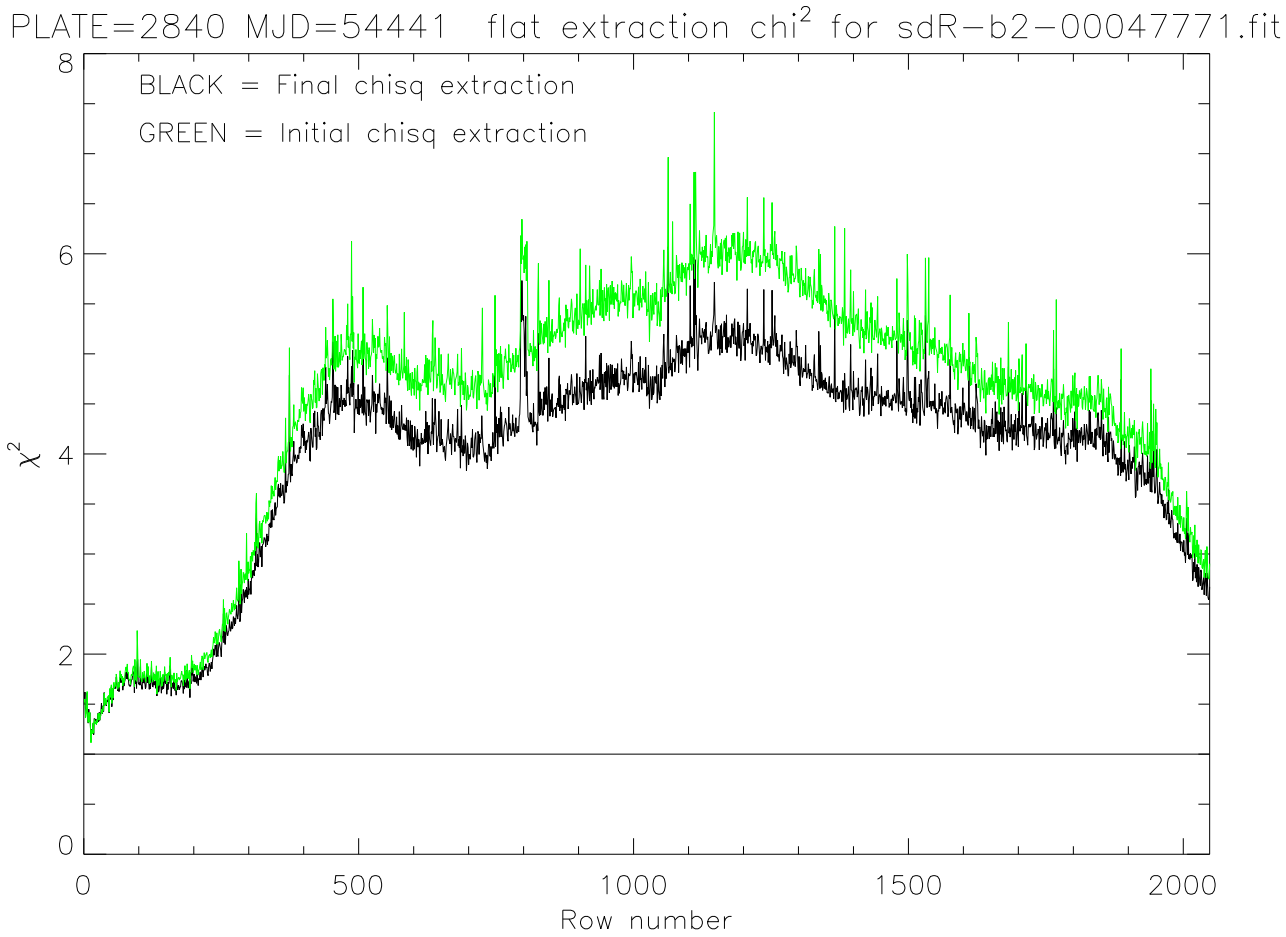

scale coeff residuals from ord=3 poly
4×10⁻⁵
2×10⁻⁵
0
−2×10⁻⁵
−4×10⁻⁵
0
50
100
150
200
250
300
fiber

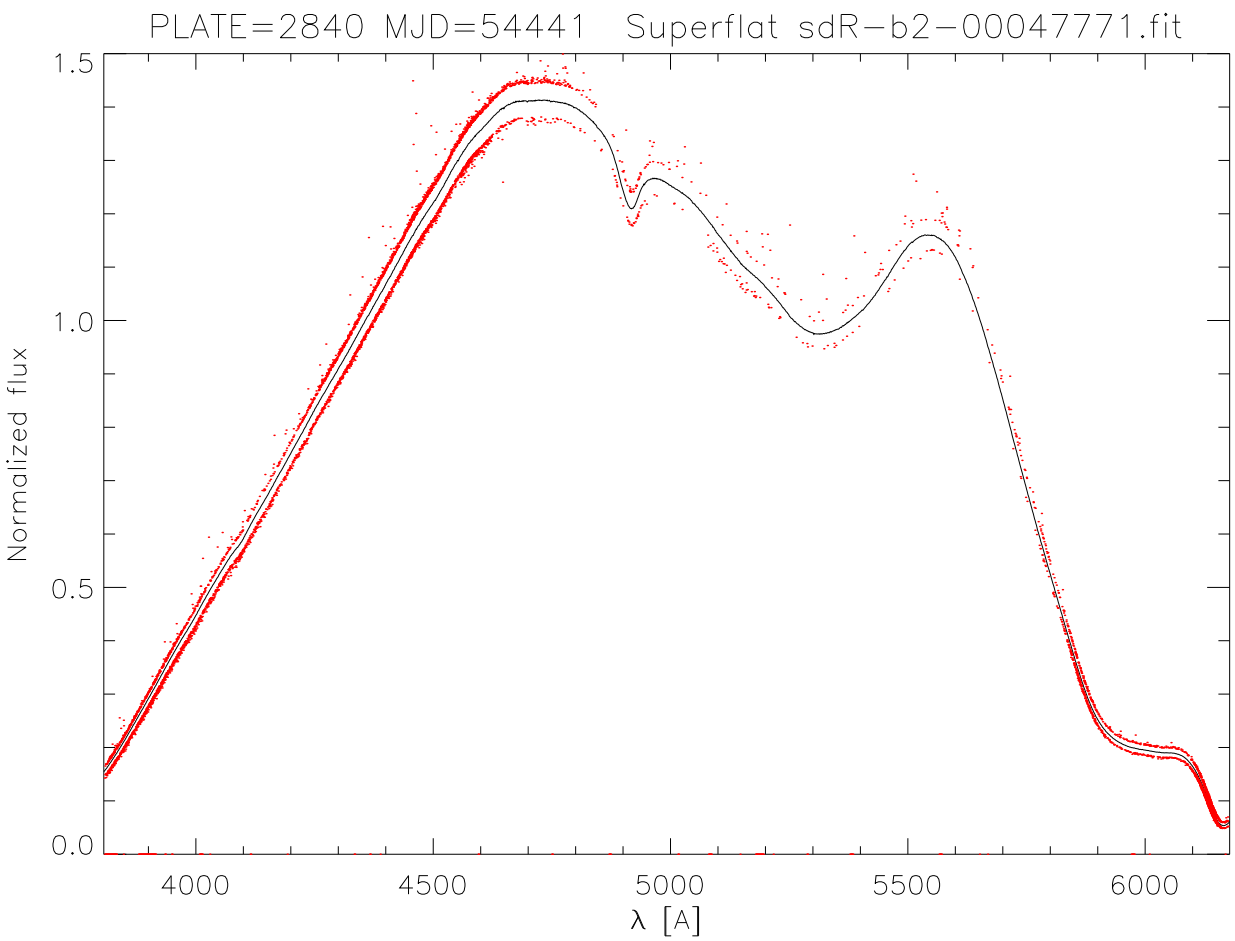

offset coeff residuals from ord=3 poly
1.5×10⁻⁴
1.0×10⁻⁴
5.0×10⁻⁵
0
−5.0×10⁻⁵
−1.0×10⁻⁴
−1.5×10⁻⁴
0
50
100
150
200
250
300
fiber

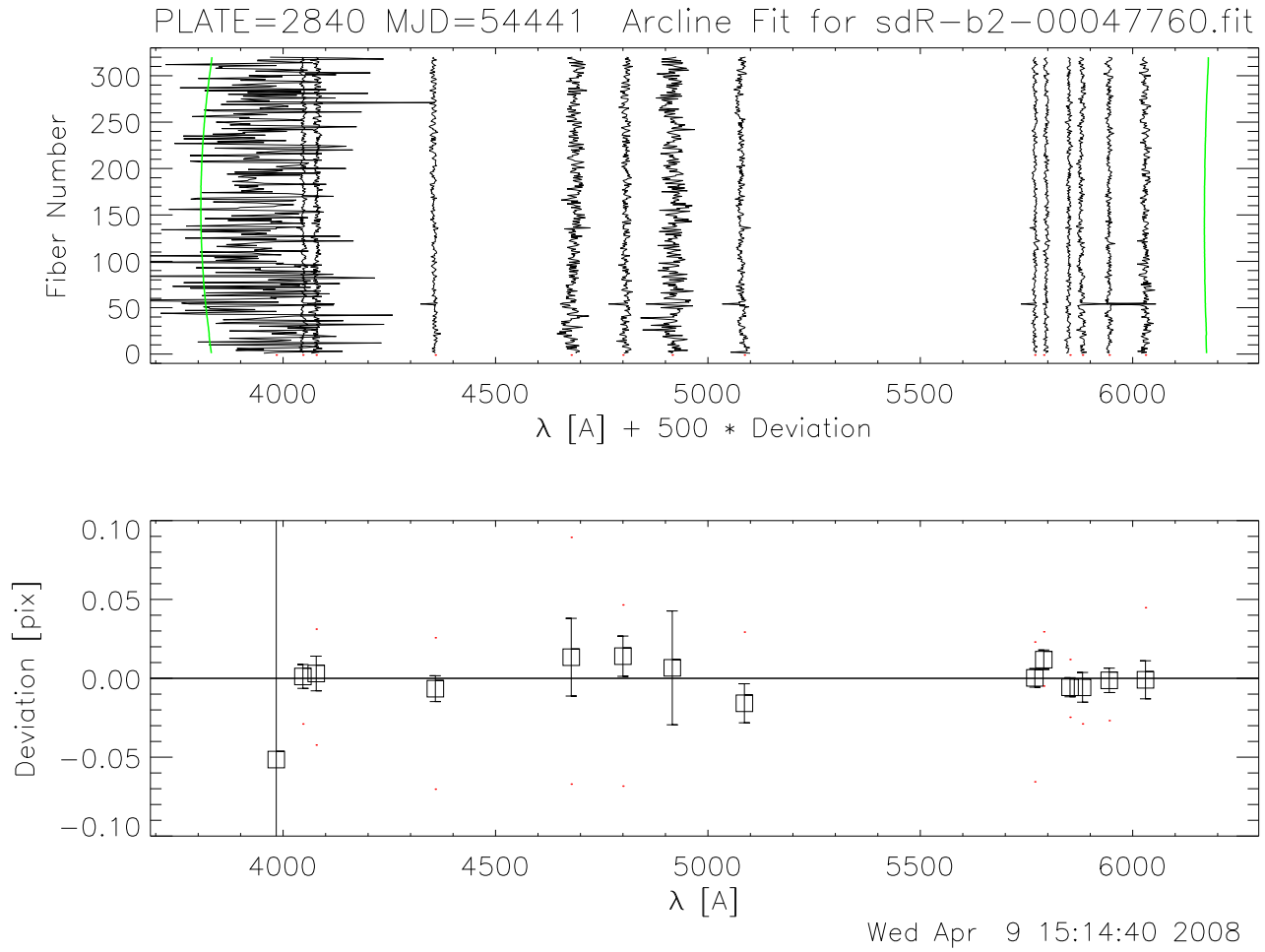

scale coeff residuals from ord=3 poly
4×10⁻⁵
2×10⁻⁵
0
−2×10⁻⁵
−4×10⁻⁵
0
50
100
150
200
250
300
fiber

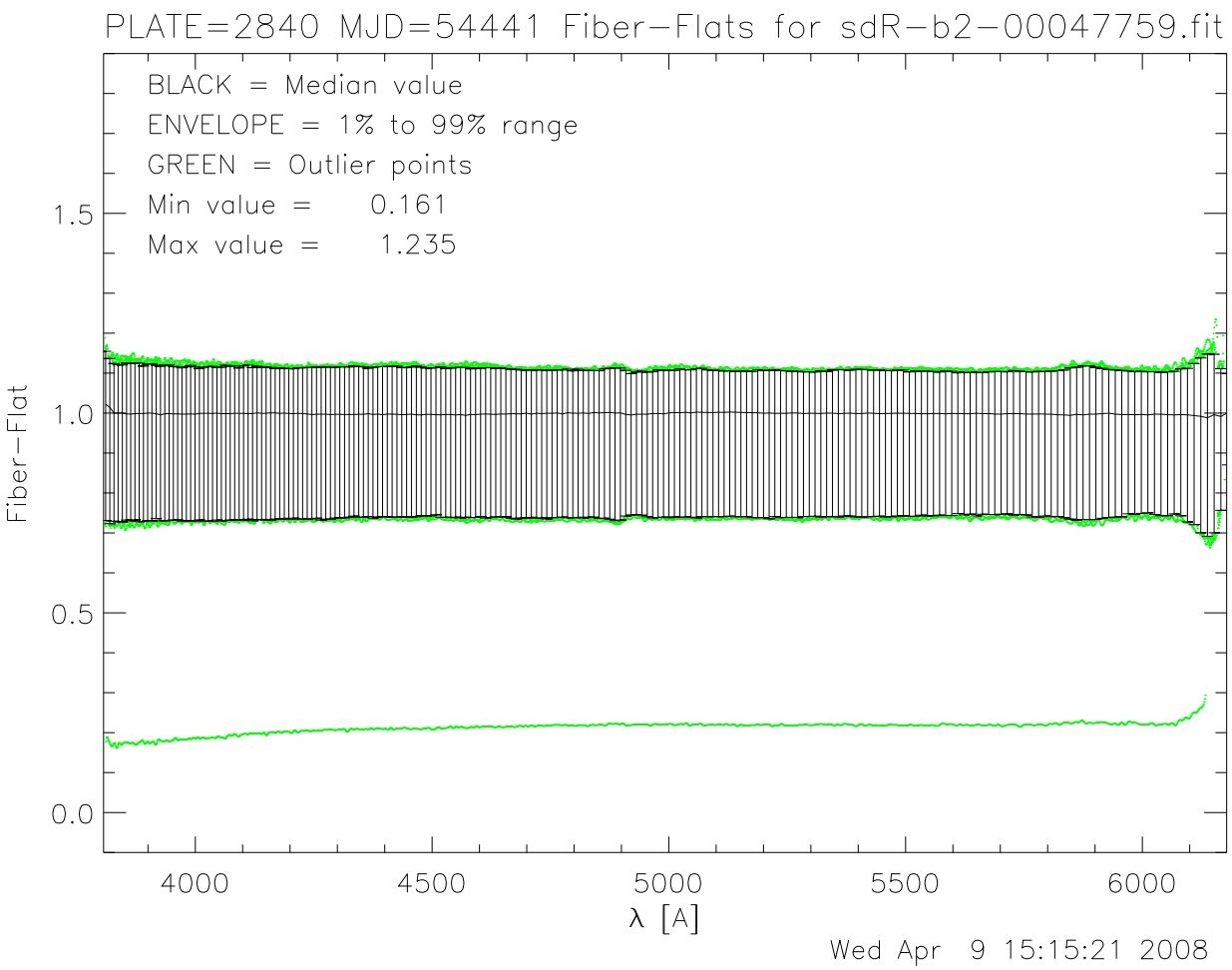

PLATE=2840 MJD=54441 flat extraction chi^2 for sdR−b2−00047759.fit
BLACK = Final chisq extraction
GREEN = Initial chisq extraction
χ^2
0
2
4
6
8
0
500
1000
1500
2000
Row number

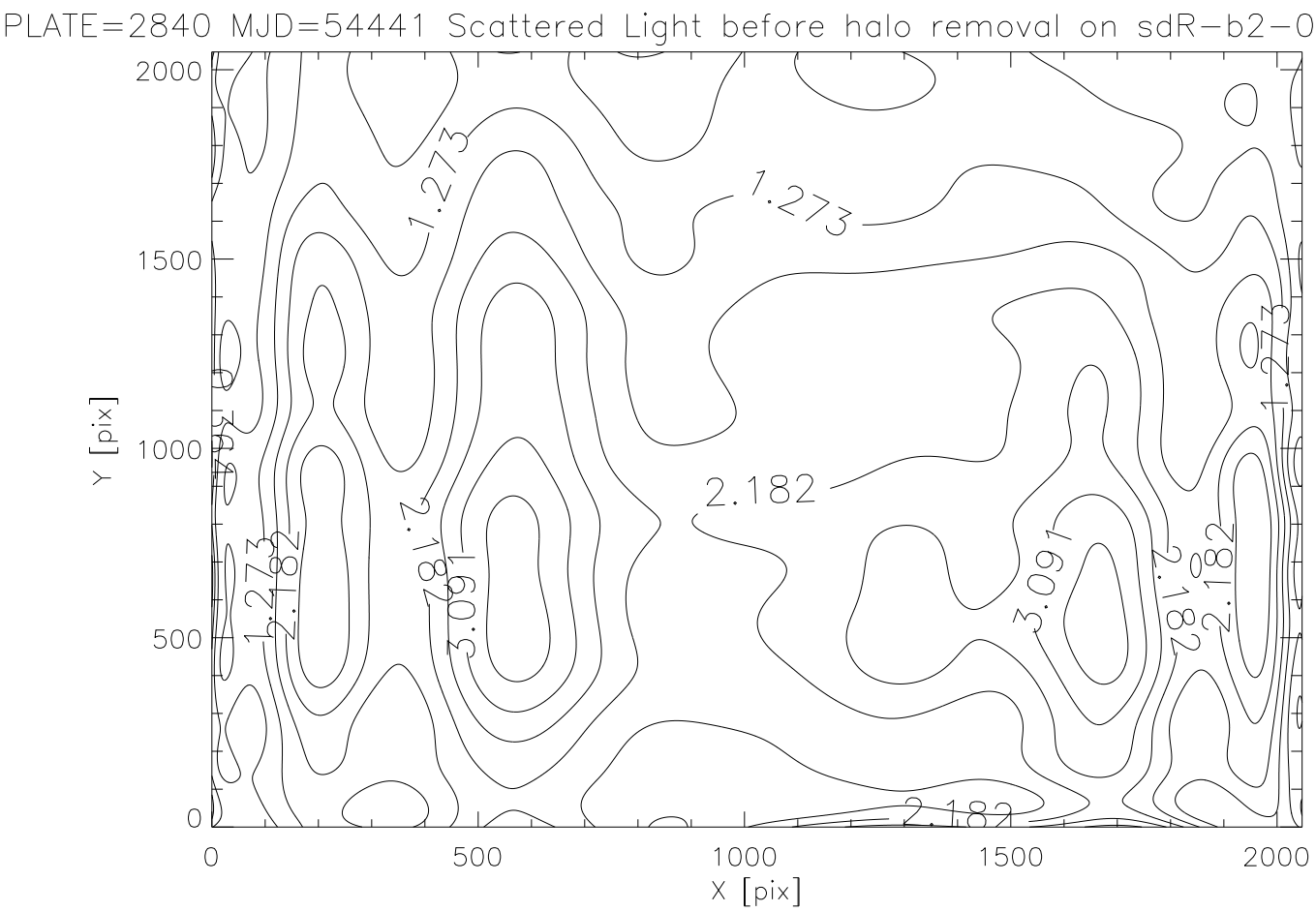

PLATE=2840 MJD=54441 Superflat sdR-b2-00047759.fit
Normalized flux
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]

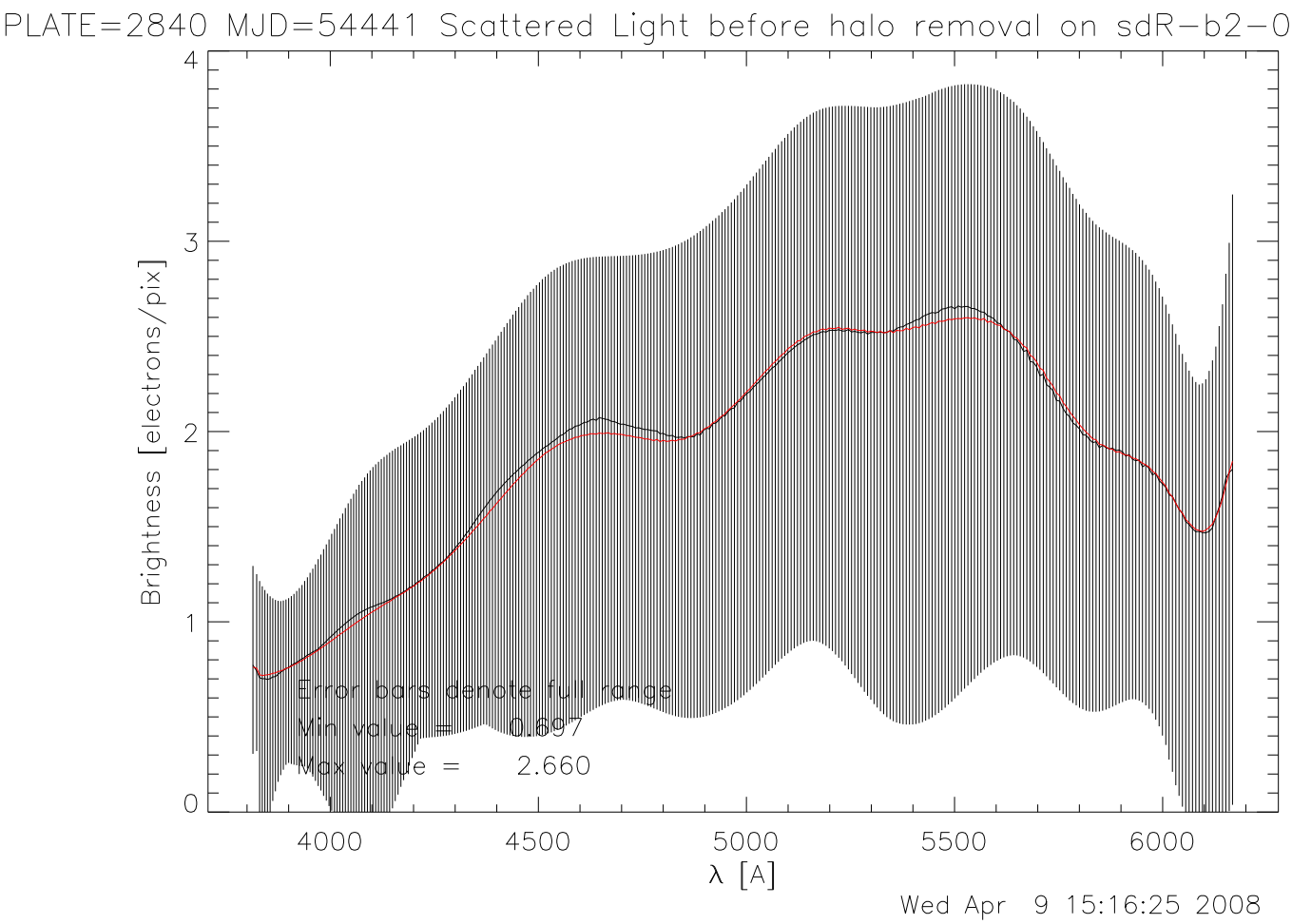

PLATE=2840 MJD=54441 flat extraction chi^2 for sdR-b2-00047771.fit
BLACK = Final chisq extraction
GREEN = Initial chisq extraction
χ^2
0
2
4
6
8
0
500
1000
1500
2000
Row number

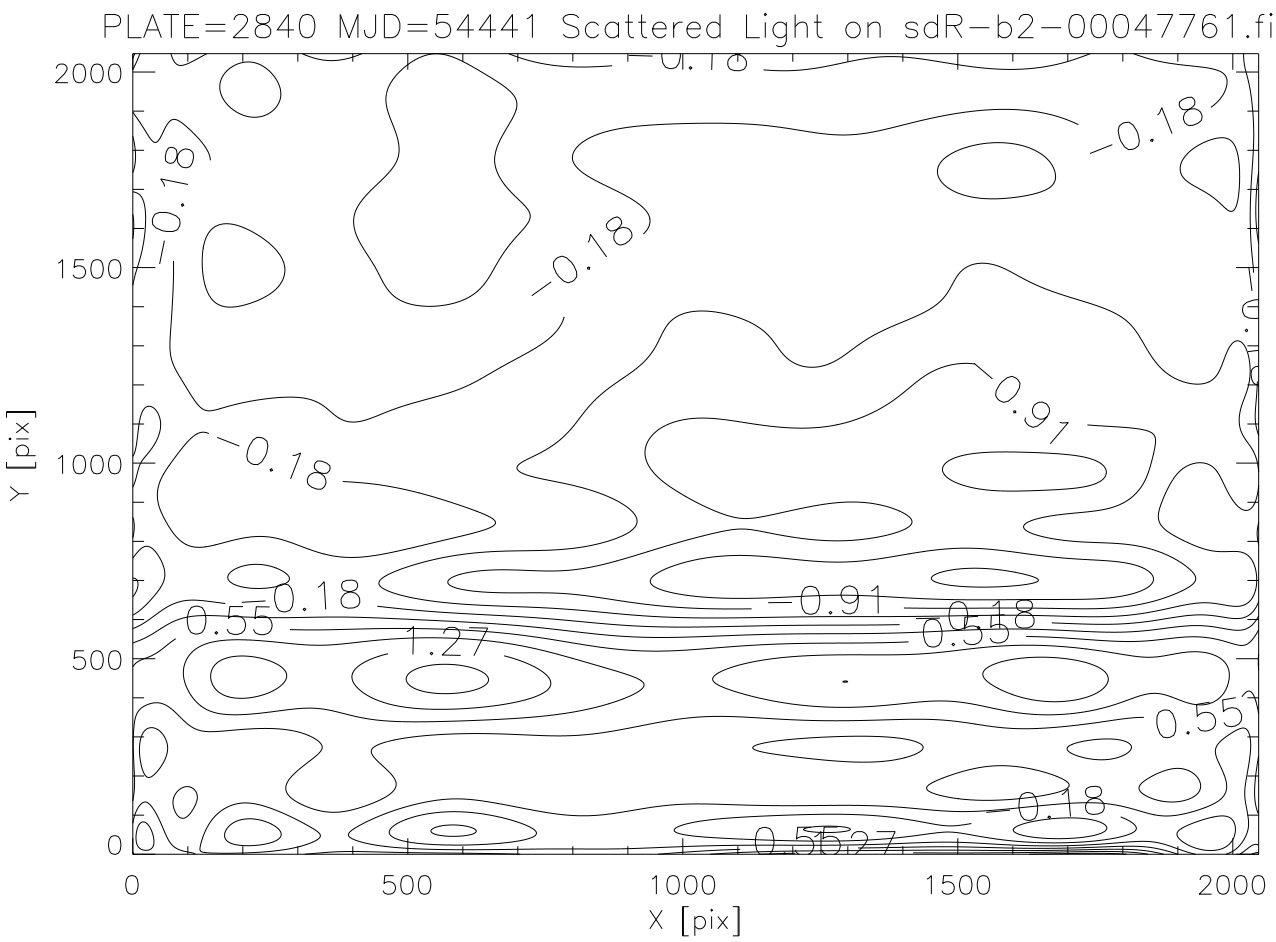

PLATE=2840 MJD=54441 Superflat sdR-b2-00047771.fit
Normalized flux
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]

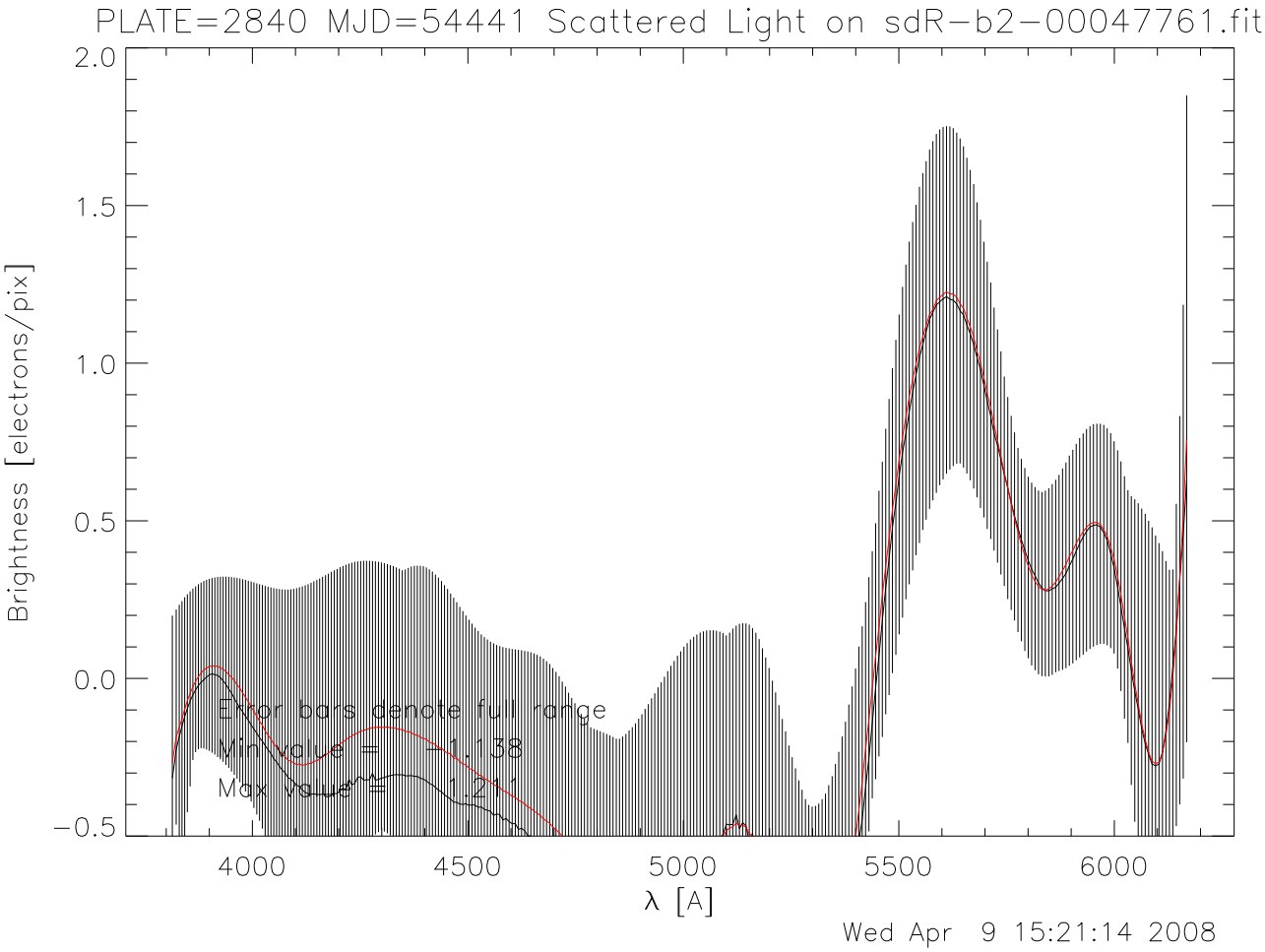

PLATE=2840 MJD=54441 Arcline Fit for sdR-b2-00047760.fit
Fiber Number
300
250
200
150
100
50
0
4000
4500
5000
5500
6000
λ [A] + 500 * Deviation
Deviation [pix]
0.10
0.05
0.00
−0.05
−0.10
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 15:14:40 2008

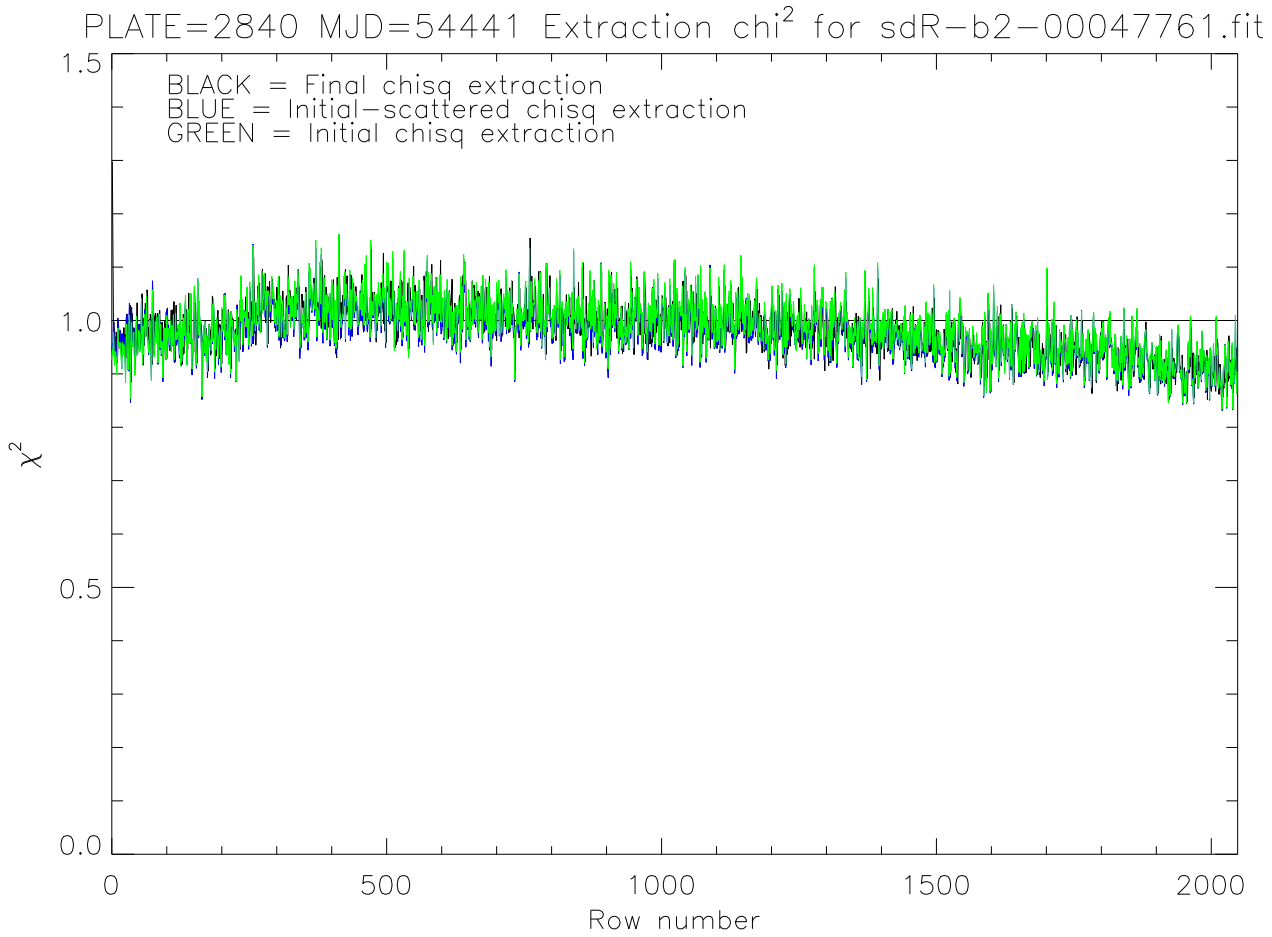

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b2-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.161
Max value = 1.235
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 15:15:21 2008

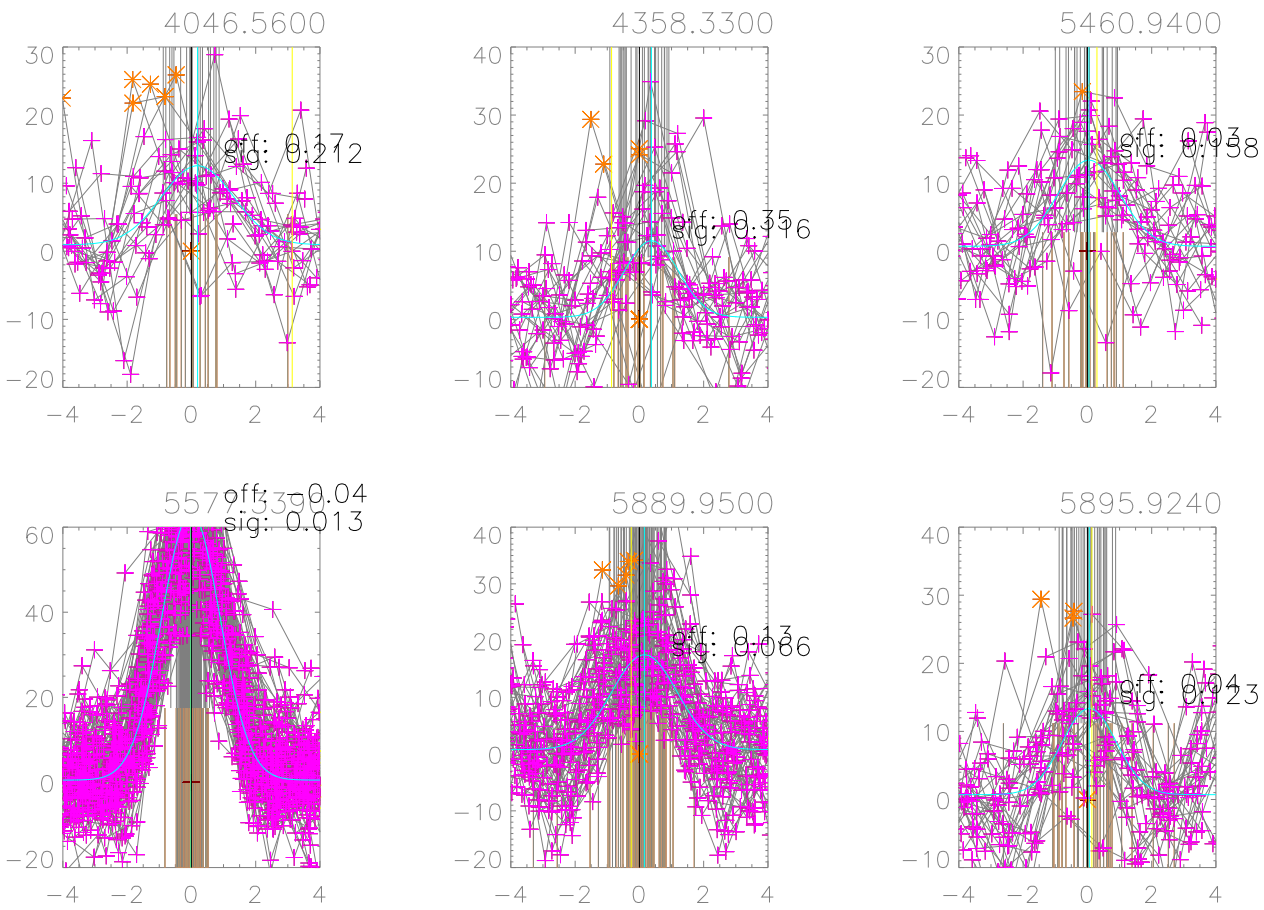

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047761.f
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
1.273
2.182
3.091

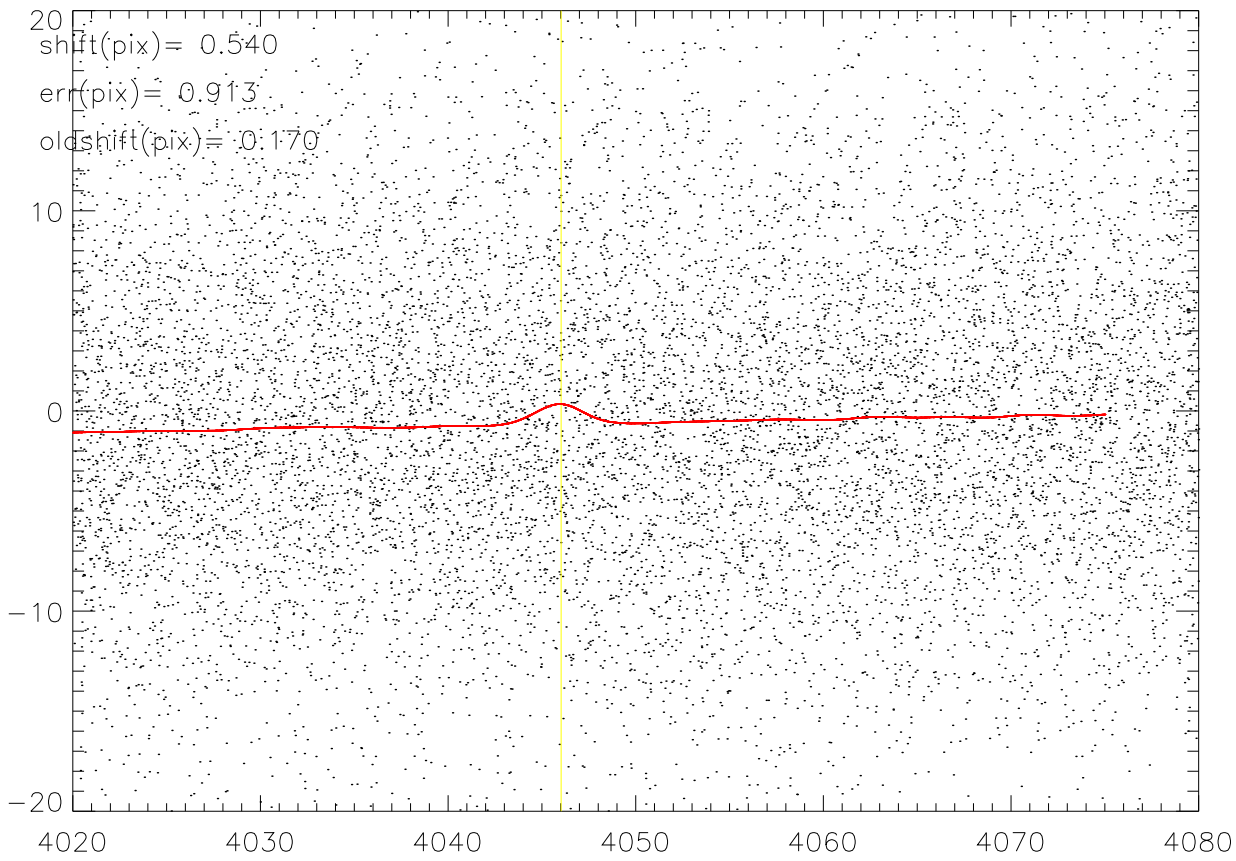

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047761.f
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.697
Max value = 2.660
Wed Apr 9 15:16:25 2008

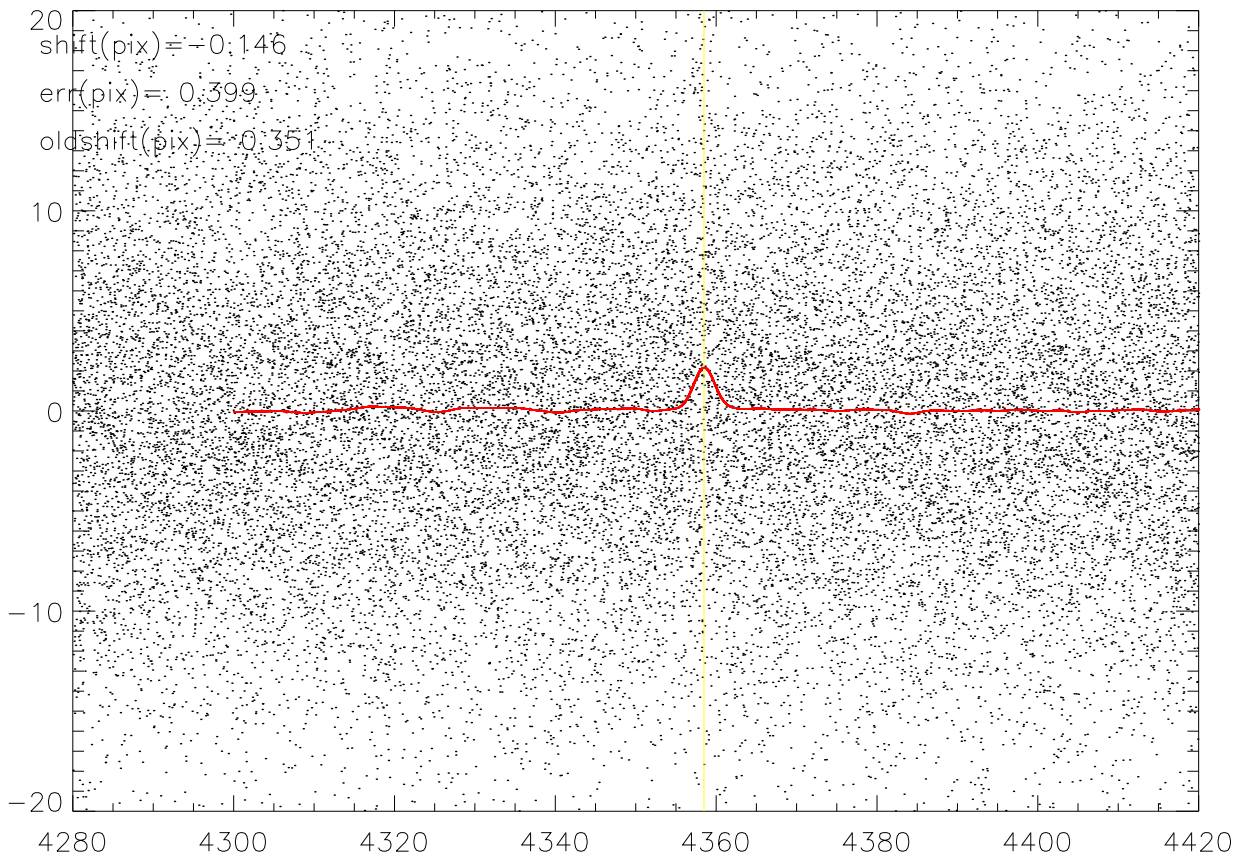

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047761.fit
Y [pix]
X [pix]
0
500
1000
1500
2000
-0.18
0.91
0.55
1.27

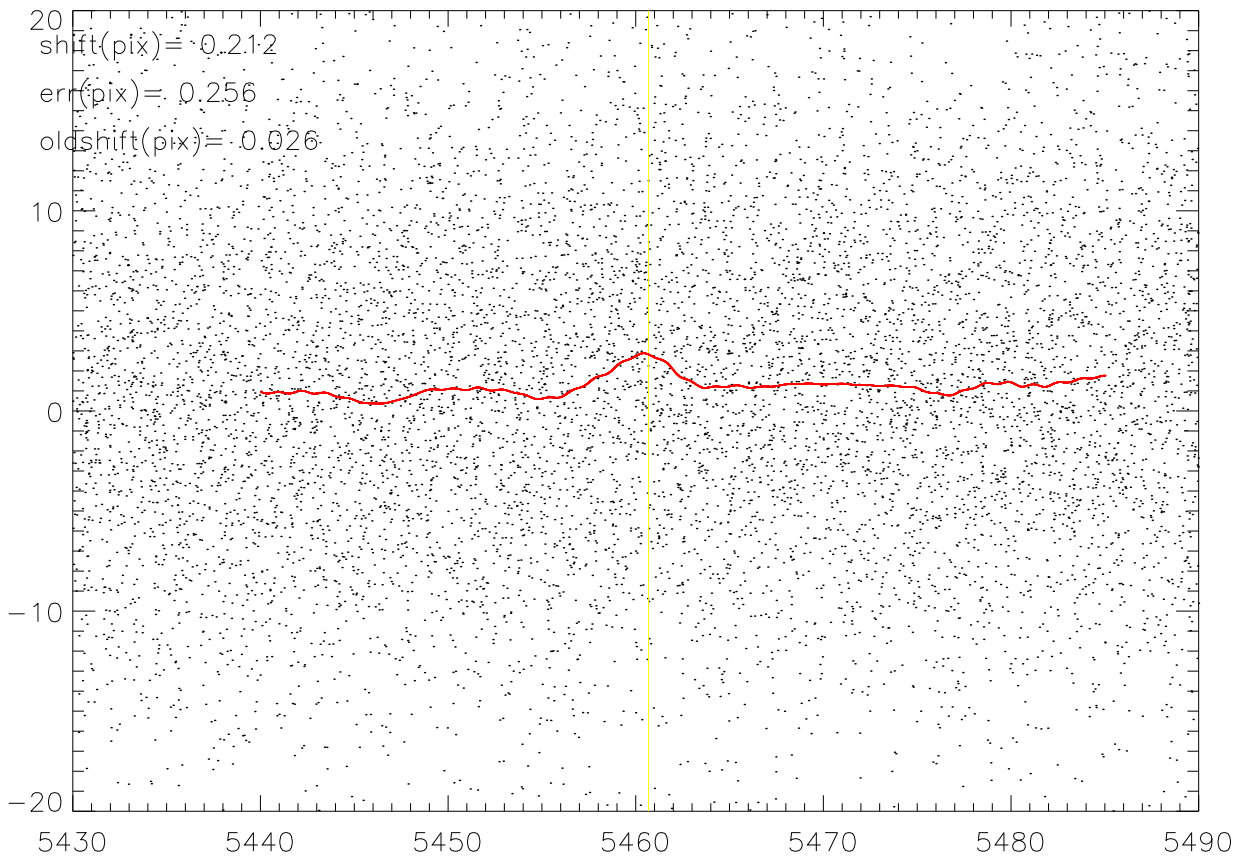

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047761.fit
Brightness [electrons/pix]
2.0
1.5
1.0
0.5
0.0
-0.5
Error bars denote full range
Min Value = -1.38
Max Value = 1.21
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 15:21:14 2008

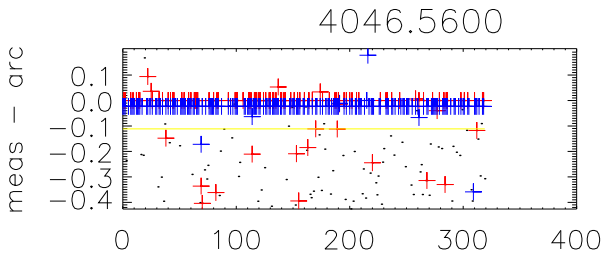

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b2-00047761.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

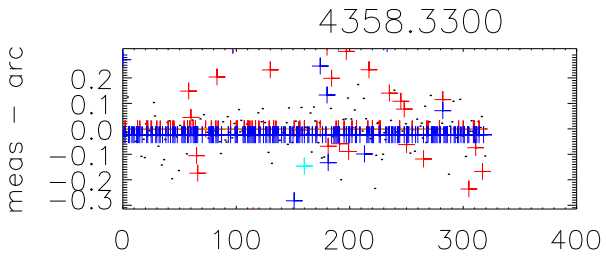

4046.5600
off: 0.17
sig: 0.212
4358.3300
off: 0.35
sig: 0.176
5460.9400
off: 0.03
sig: 0.158
5577.3390
off: −0.04
sig: 0.013
5889.9500
off: 0.13
sig: 0.086
5895.9240
off: 0.04
sig: 0.123

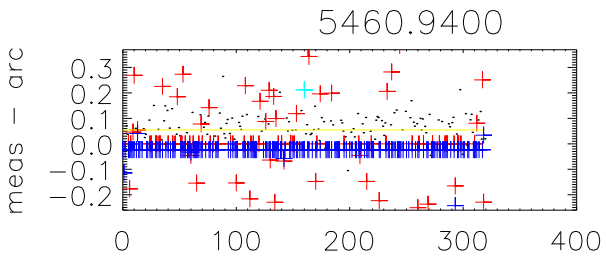

shift(pix)= 0.540
err(pix)= 0.913
oldshift(pix)= 0.170
20
10
0
−10
−20
4020
4030
4040
4050
4060
4070
4080

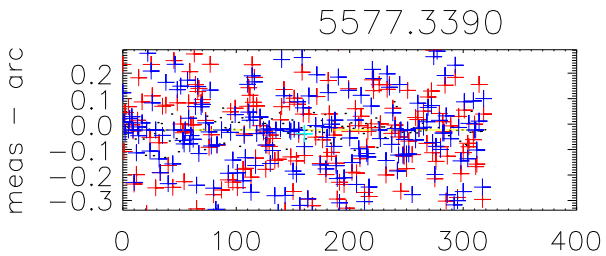

shift(pix)=-0.146
err(pix)= 0.399
oldshift(pix)=-0.351
20
10
0
−10
−20
4280
4300
4320
4340
4360
4380
4400
4420

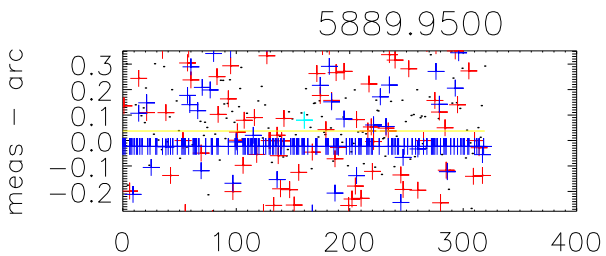

shift(pix)= 0.212
err(pix)= 0.256
oldshift(pix)= 0.026
20
10
0
−10
−20
5430
5440
5450
5460
5470
5480
5490

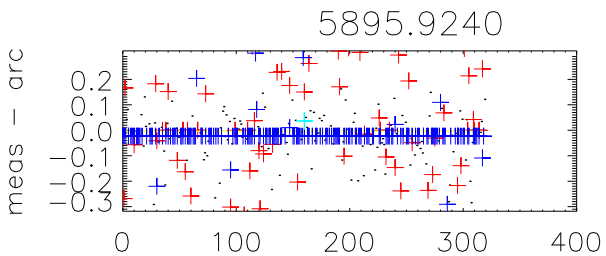

4046.5600
meas − arc
0.1
0.0
−0.1
−0.2
−0.3
−0.4
0
100
200
300
400

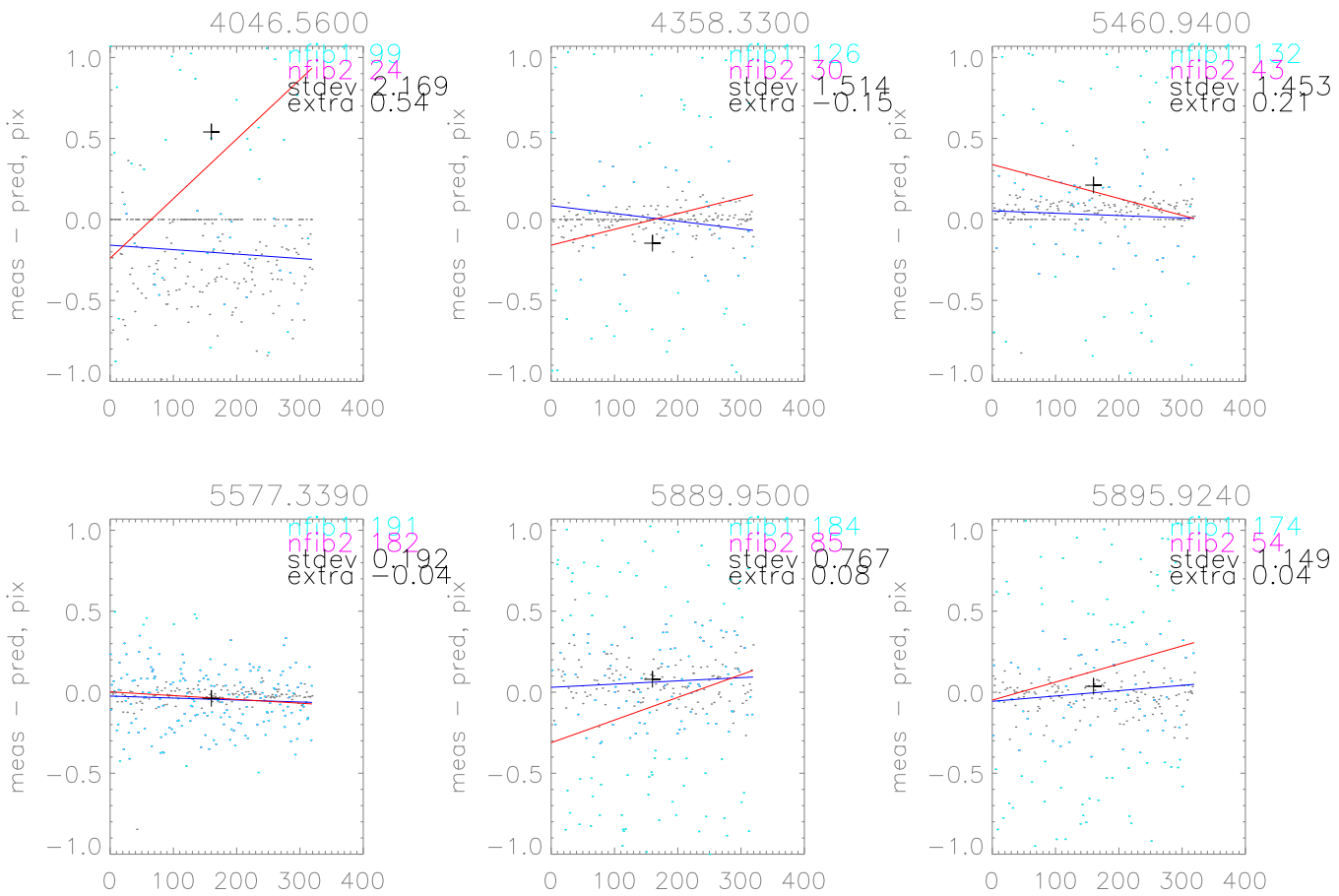

4358.3300
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

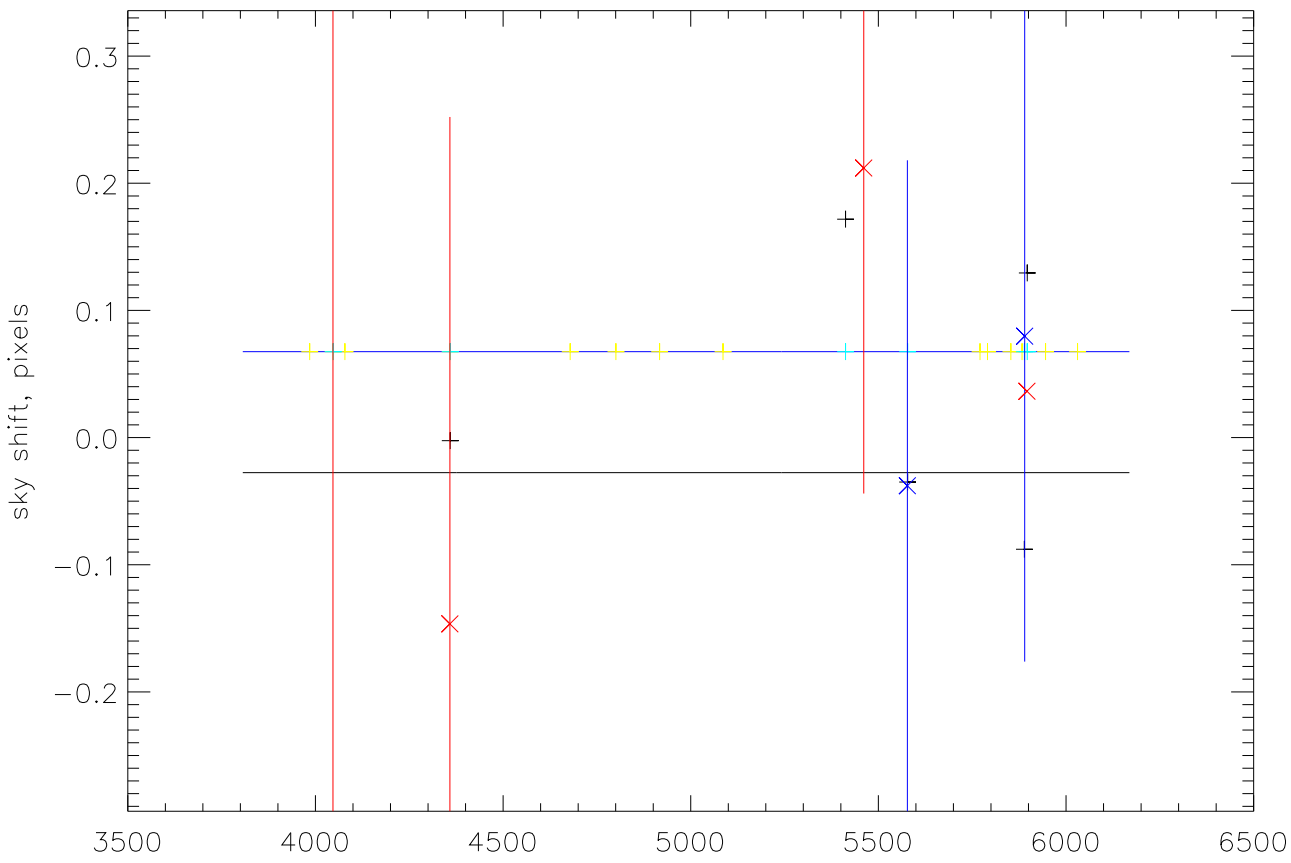

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

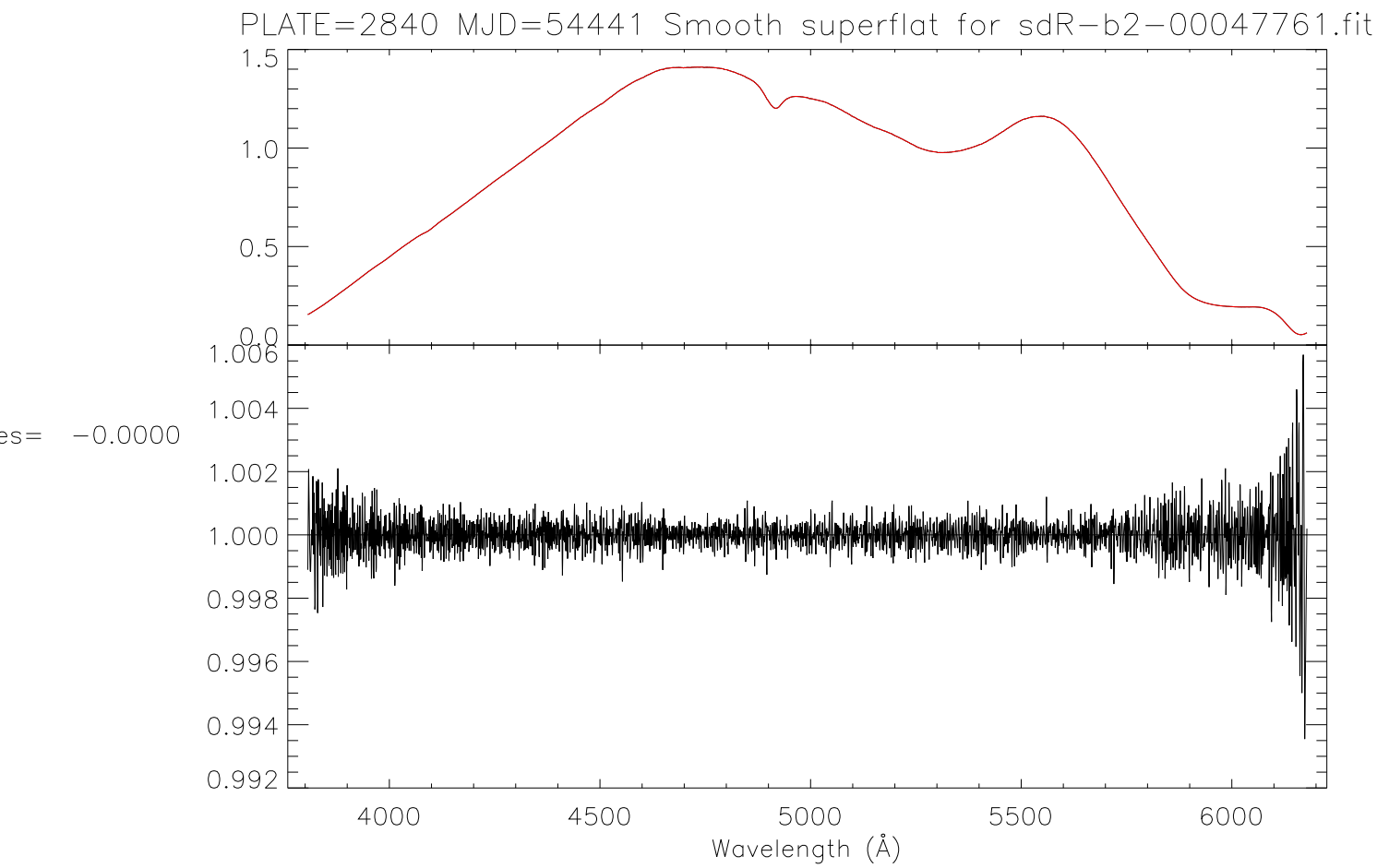

5577.3390
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400


5889.9500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

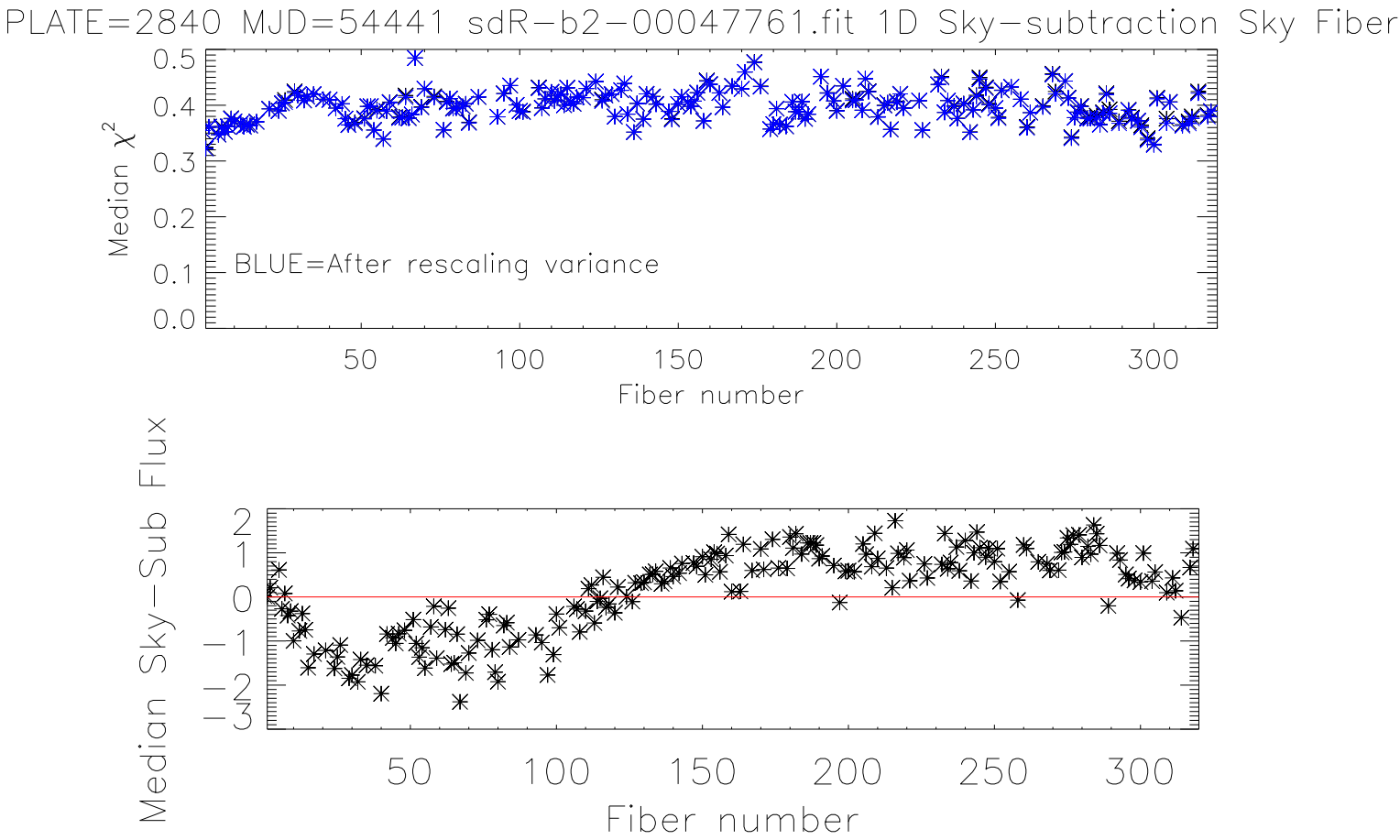

5895.9240
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

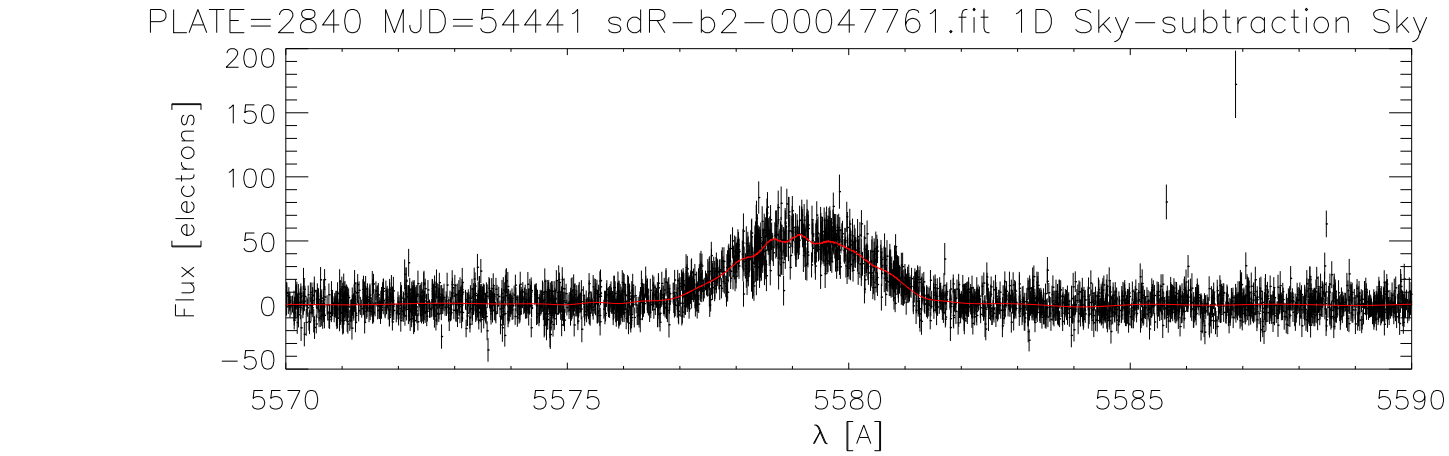

4046.5600
nfib1 99
nfib2 24
stdev 2.169
extra 0.54
4358.3300
nfib1 126
nfib2 30
stdev 1.514
extra −0.15
5460.9400
nfib1 132
nfib2 43
stdev 1.453
extra 0.21
5577.3390
nfib1 191
nfib2 182
stdev 0.192
extra −0.04
5889.9500
nfib1 184
nfib2 185
stdev 0.767
extra 0.08
5895.9240
nfib1 174
nfib2 154
stdev 1.149
extra 0.04
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0
100
200
300
400

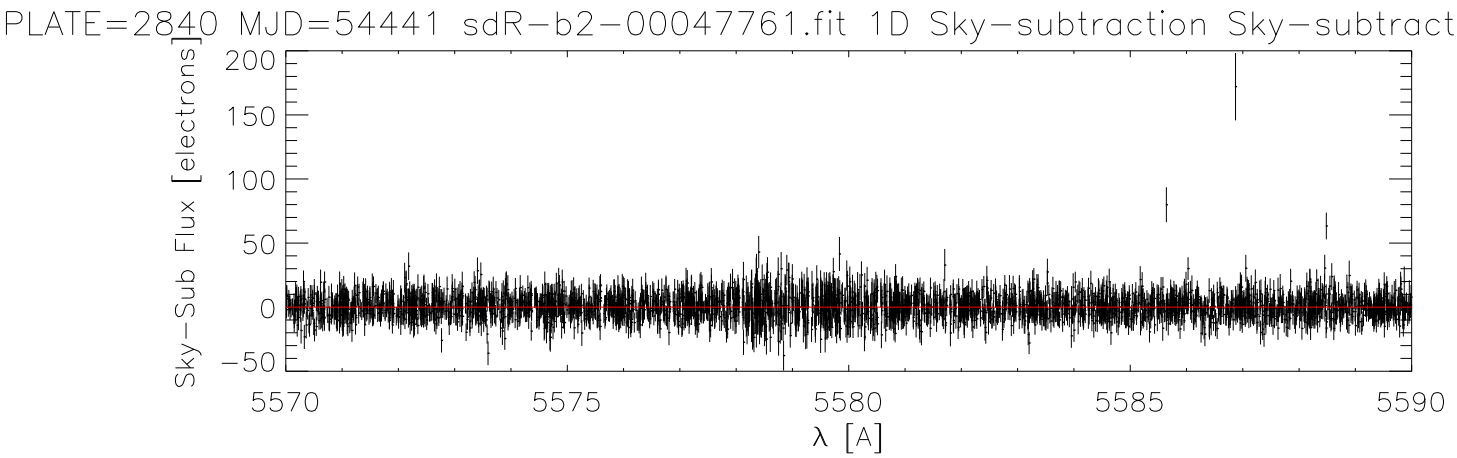

sky shift, pixels
0.3
0.2
0.1
0.0
−0.1
−0.2
3500
4000
4500
5000
5500
6000
6500

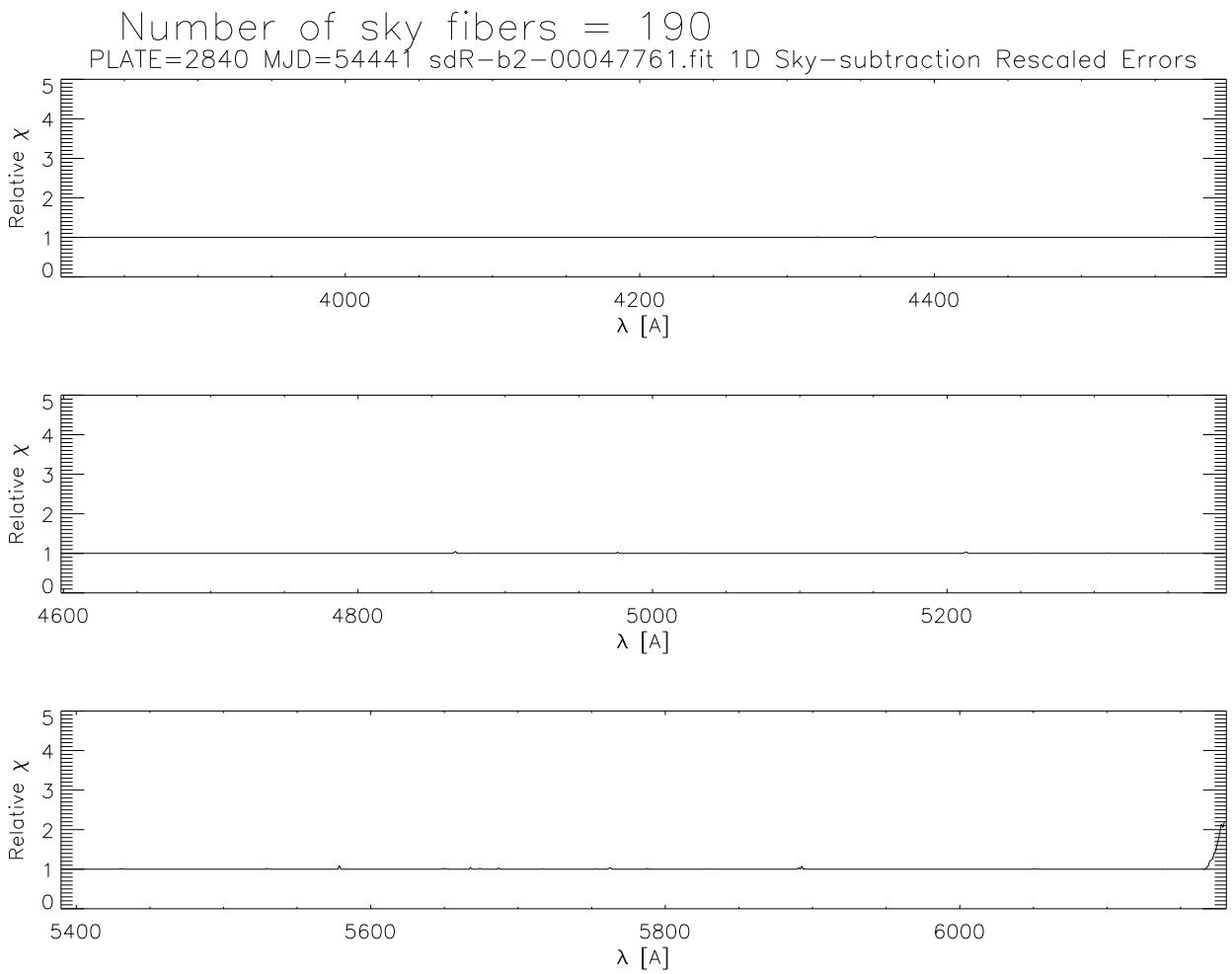

PLATE=2840 MJD=54441 Smooth superflat for sdR-b2-00047761.fit
1.5
1.0
0.5
0.0
1.006
1.004
1.002
1.000
0.998
0.996
0.994
0.992
4000
4500
5000
5500
6000
Wavelength (Å)

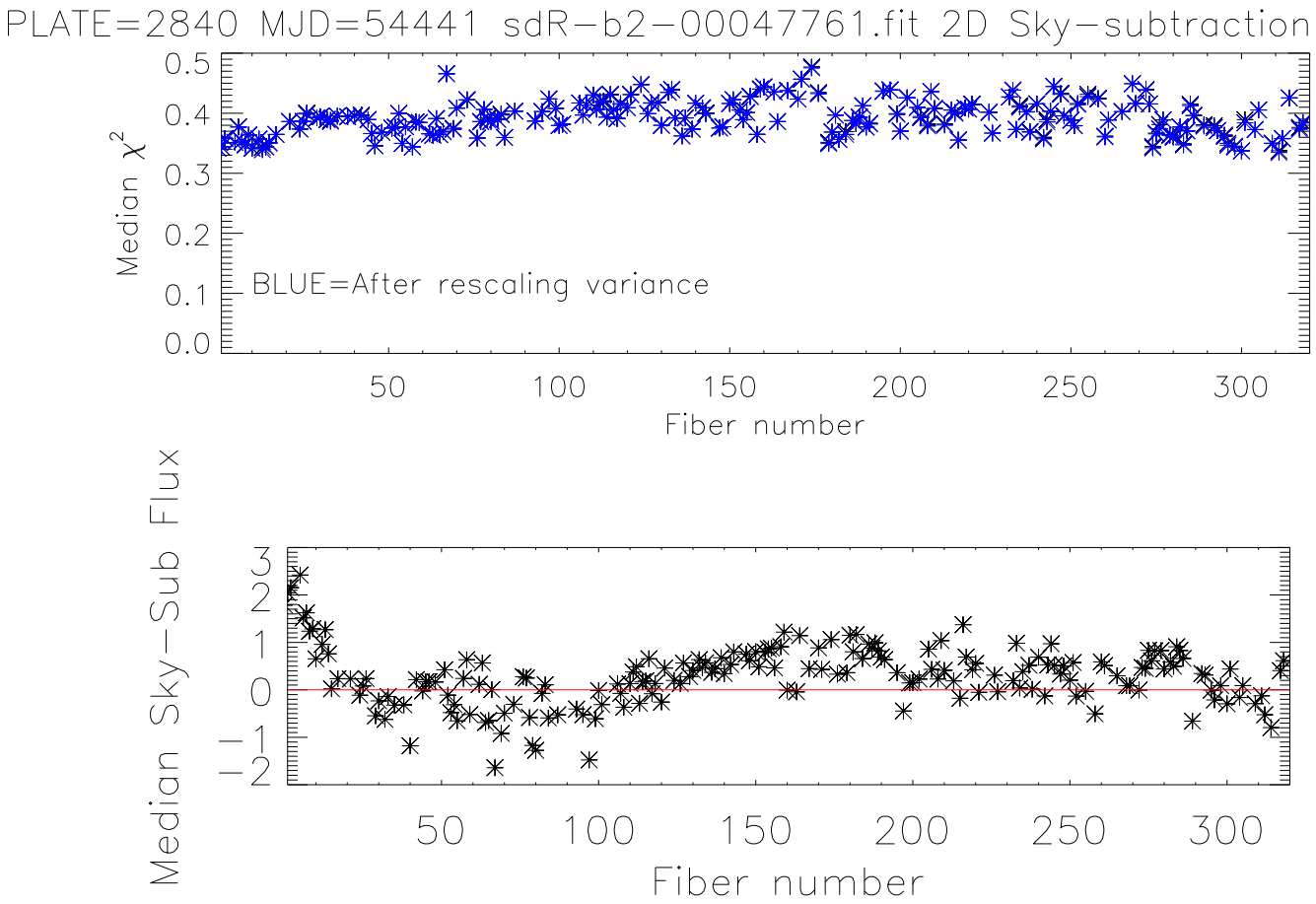
es= −0.0000

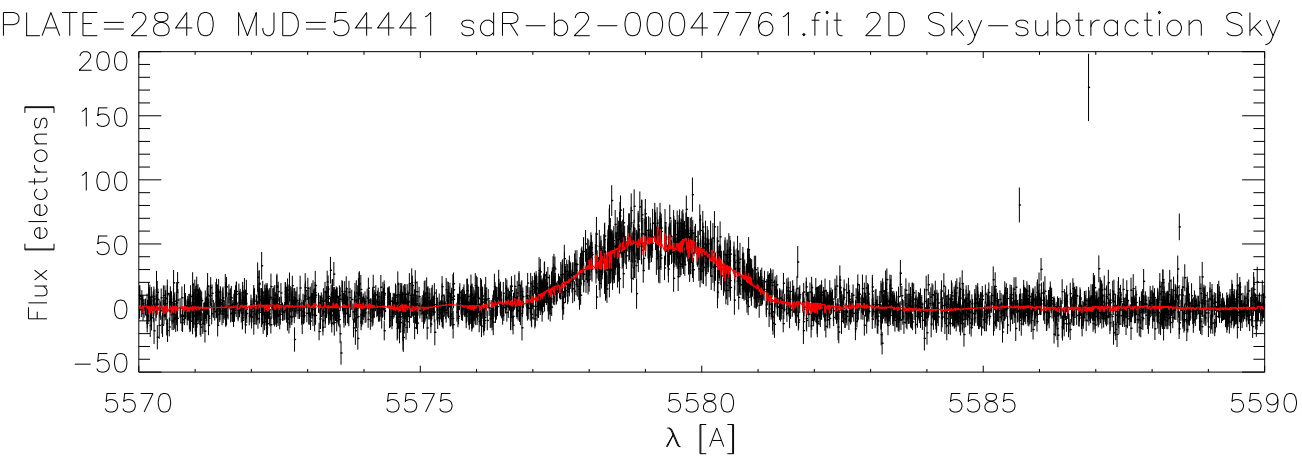

PLATE=2840 MJD=54441 sdR-b2-00047761.fit 1D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.1
0.2
0.3
0.4
0.5
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-3
-2
-1
0
1
2
50
100
150
200
250
300
Fiber number

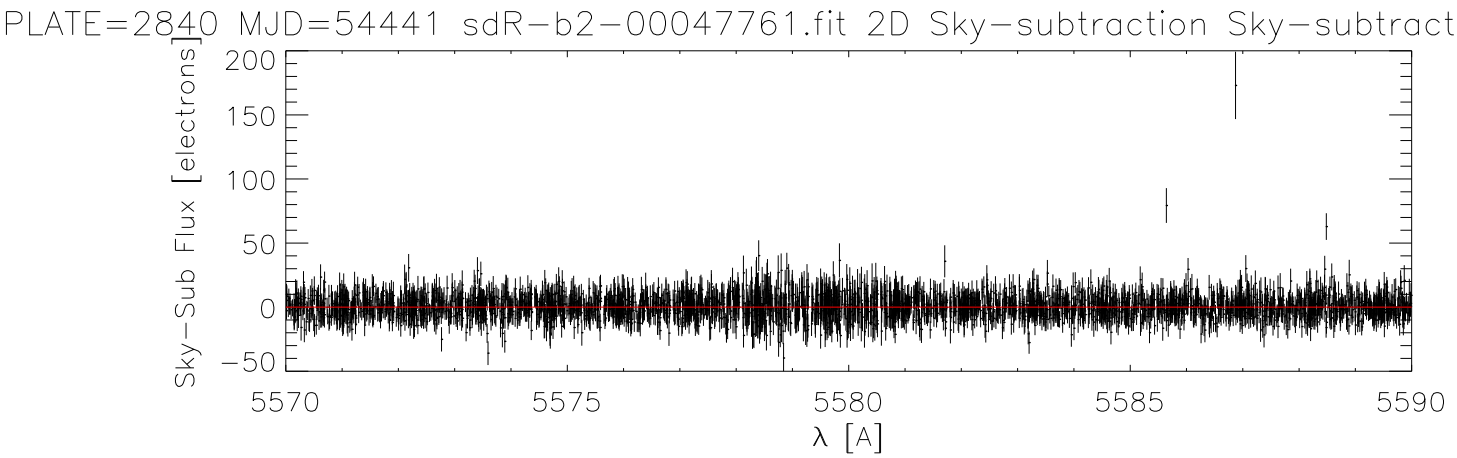

PLATE=2840 MJD=54441 sdR-b2-00047761.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
200
150
100
50
0
−50
5570
5575
5580
5585
5590
λ [A]

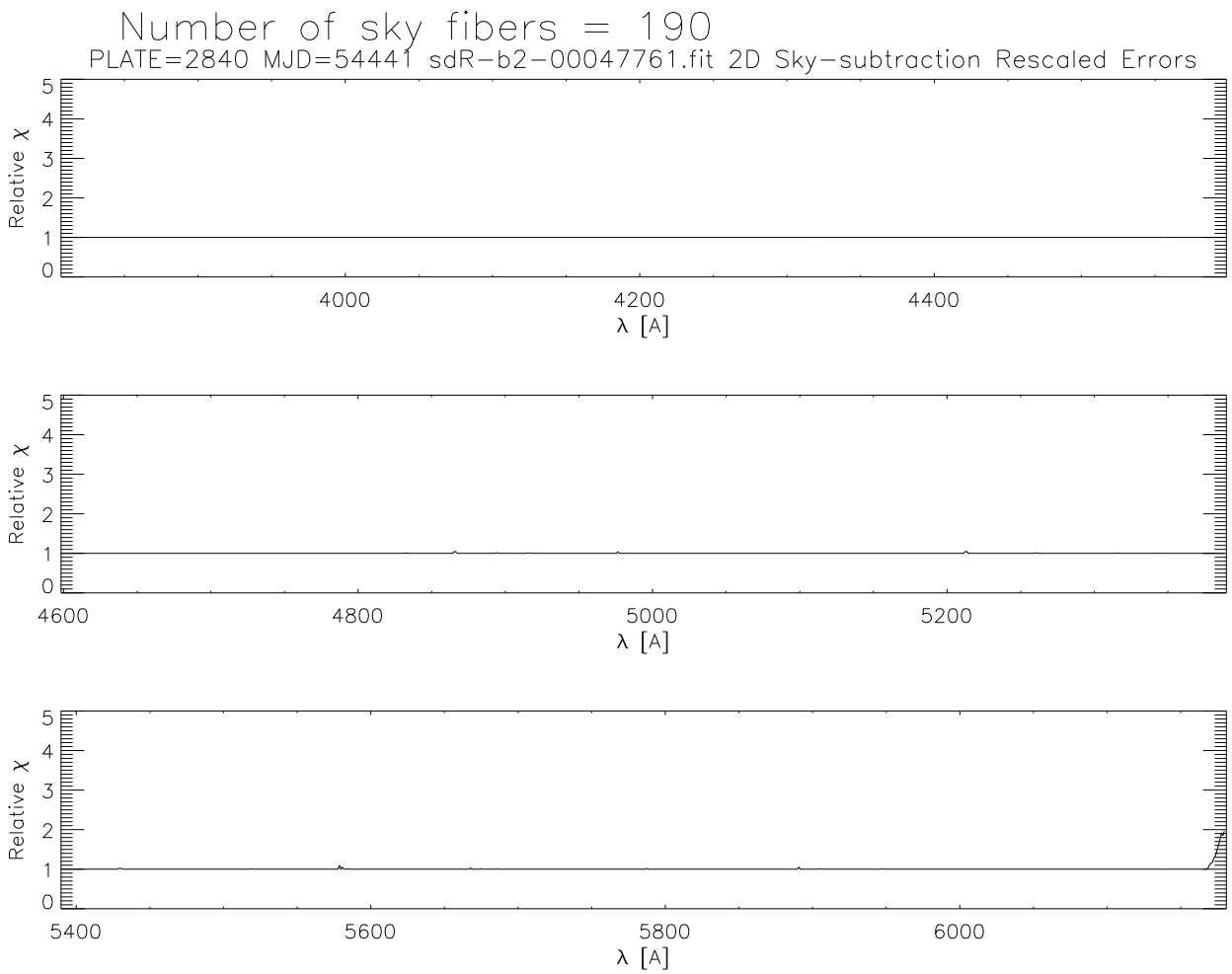

PLATE=2840 MJD=54441 sdR-b2-00047761.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
200
150
100
50
0
−50
5570
5575
5580
5585
5590
λ [A]

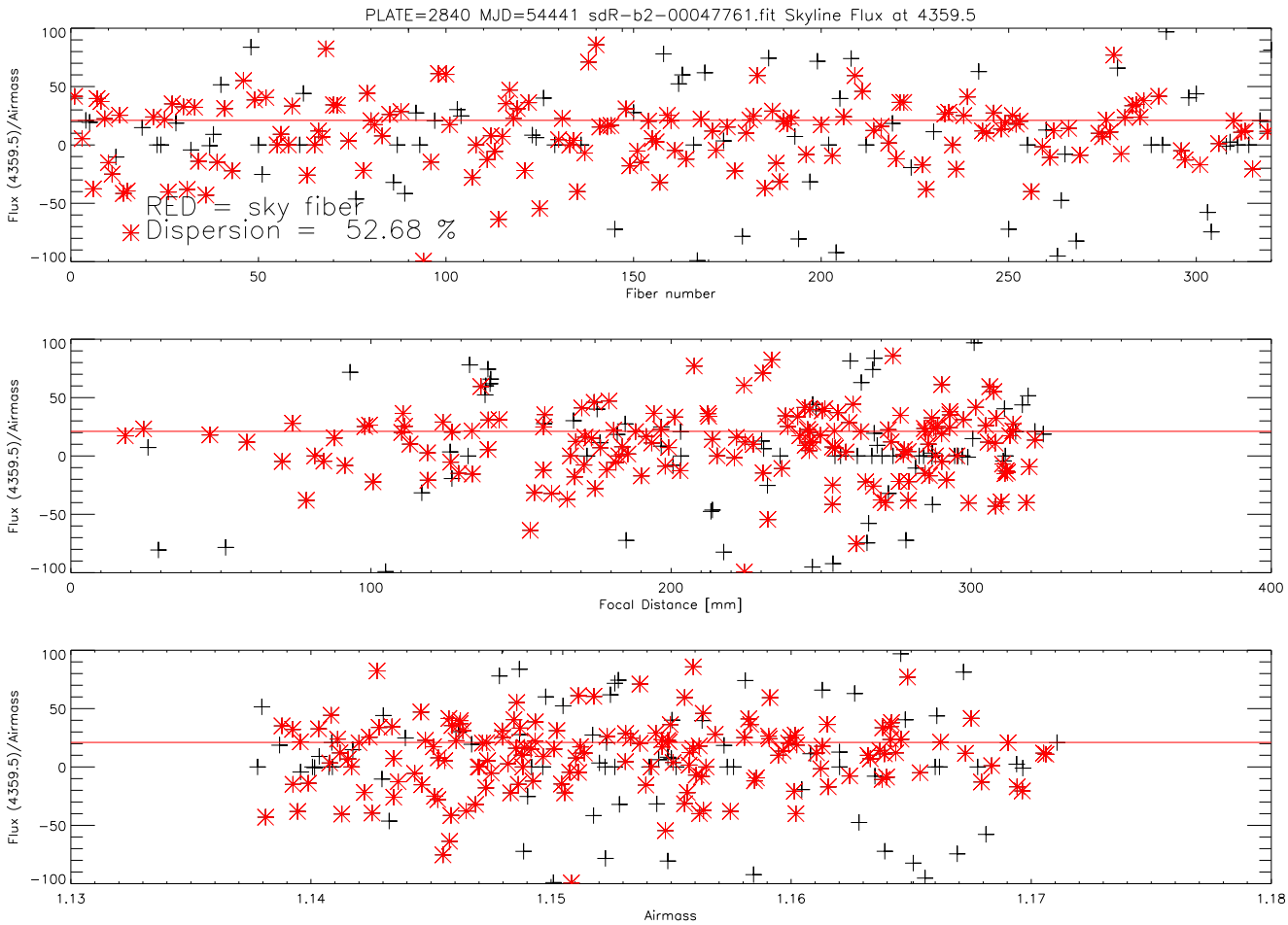

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047761.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000

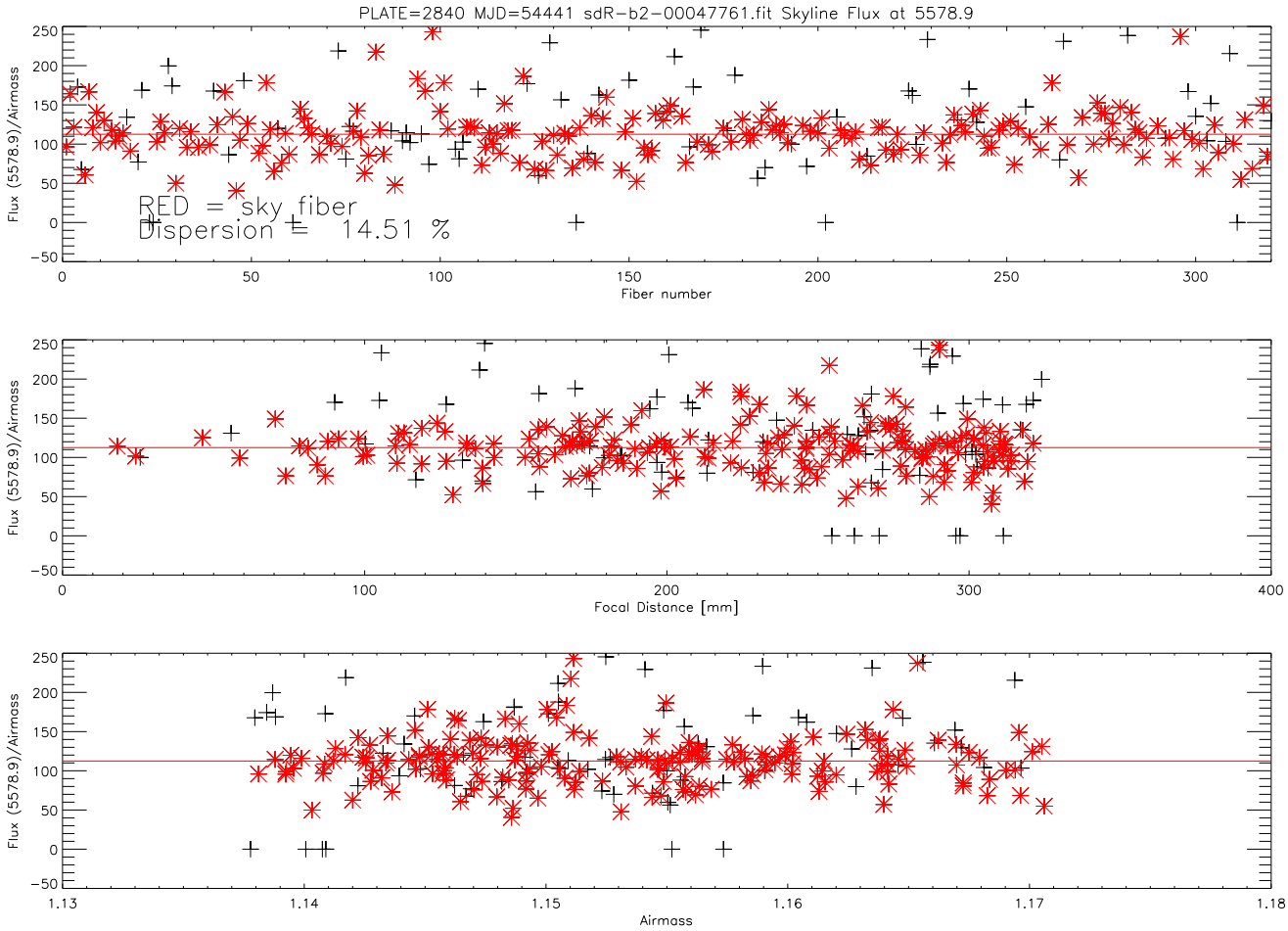

PLATE=2840 MJD=54441 sdR-b2-00047761.fit 2D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.1
0.2
0.3
0.4
0.5
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-2
-1
0
1
2
3
50
100
150
200
250
300
Fiber number

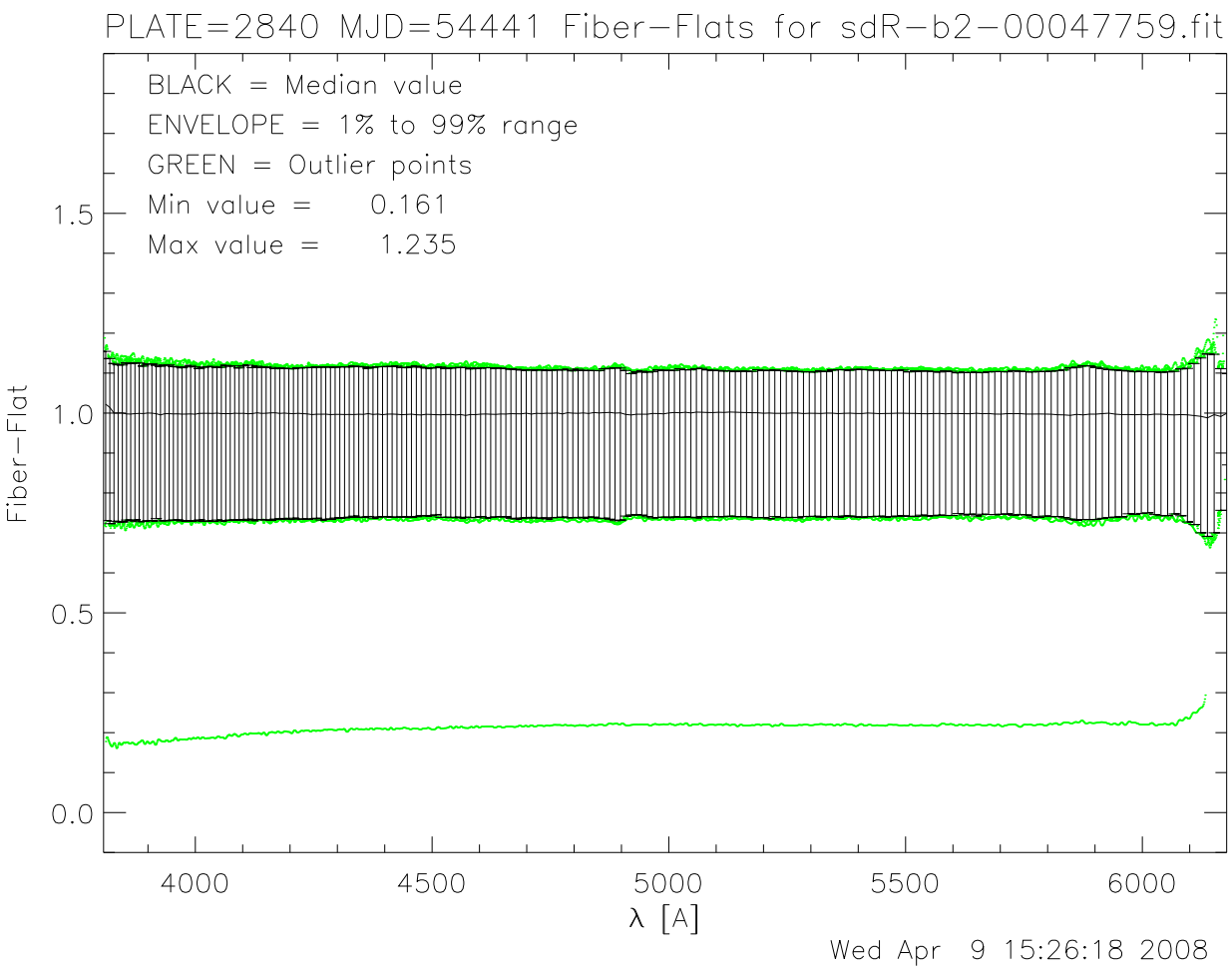

PLATE=2840 MJD=54441 sdR-b2-00047761.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
200
150
100
50
0
−50
5570
5575
5580
5585
5590
λ [A]

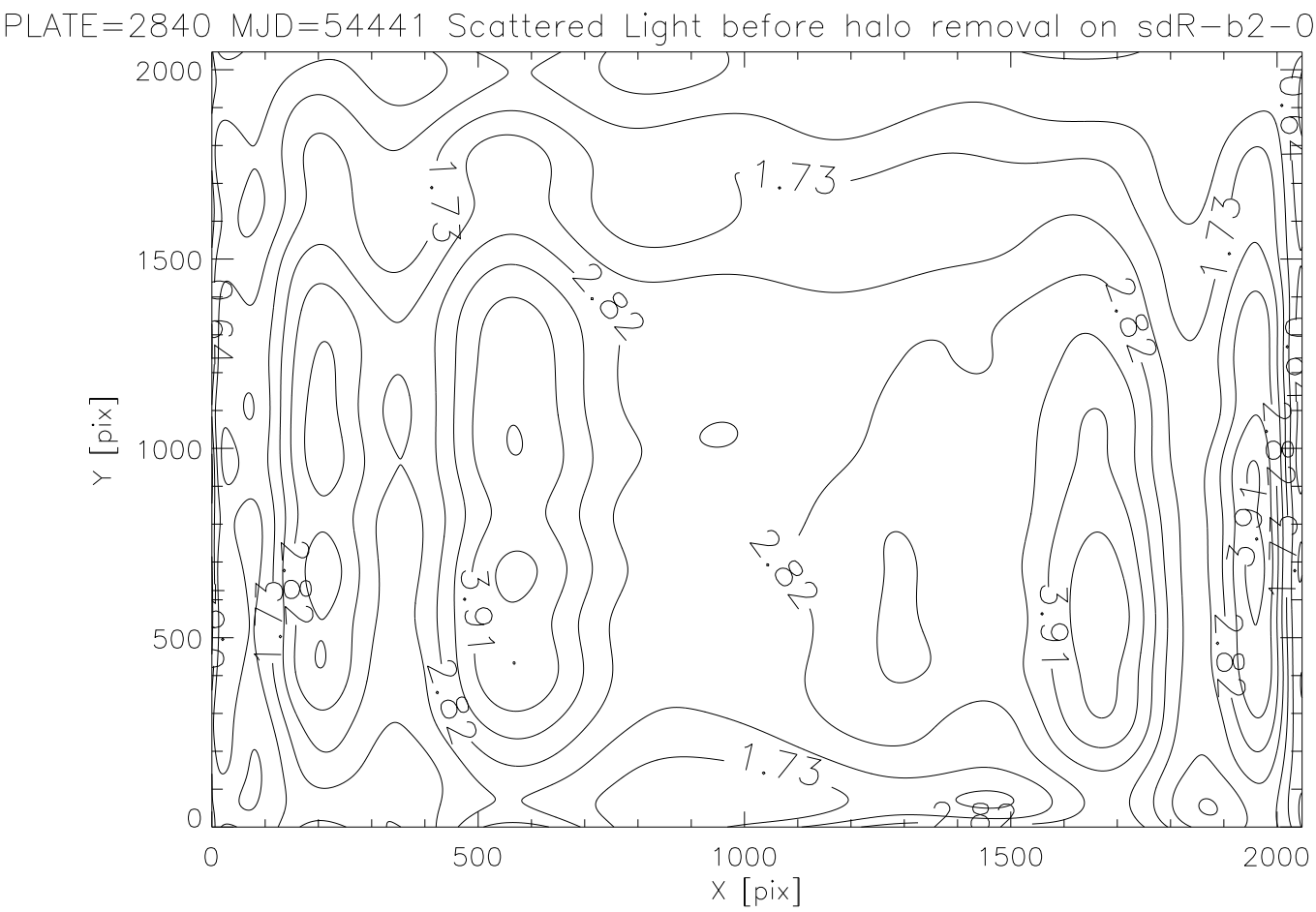

PLATE=2840 MJD=54441 sdR-b2-00047761.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
200
150
100
50
0
−50
5570
5575
5580
5585
5590
λ [A]

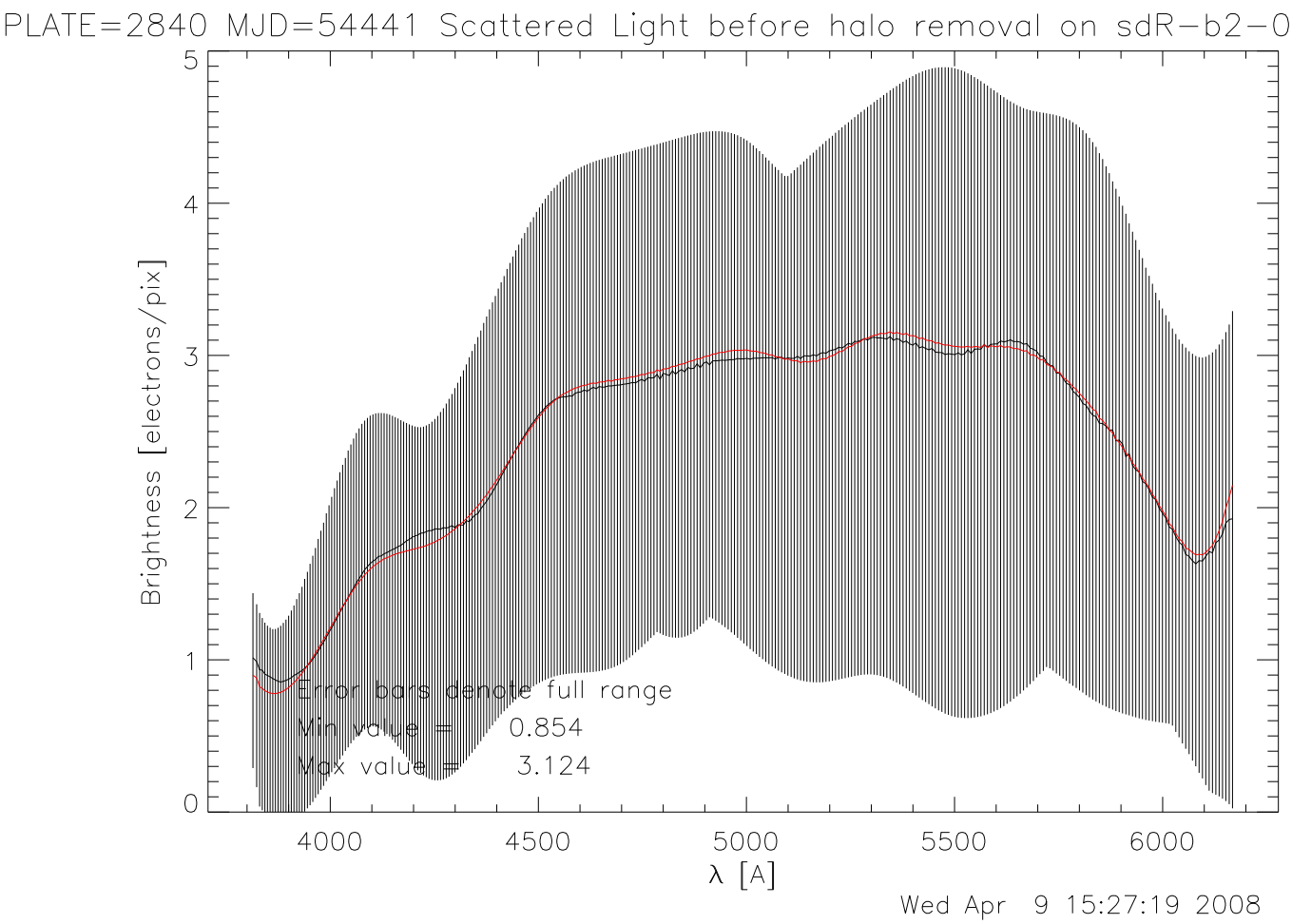

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047761.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000

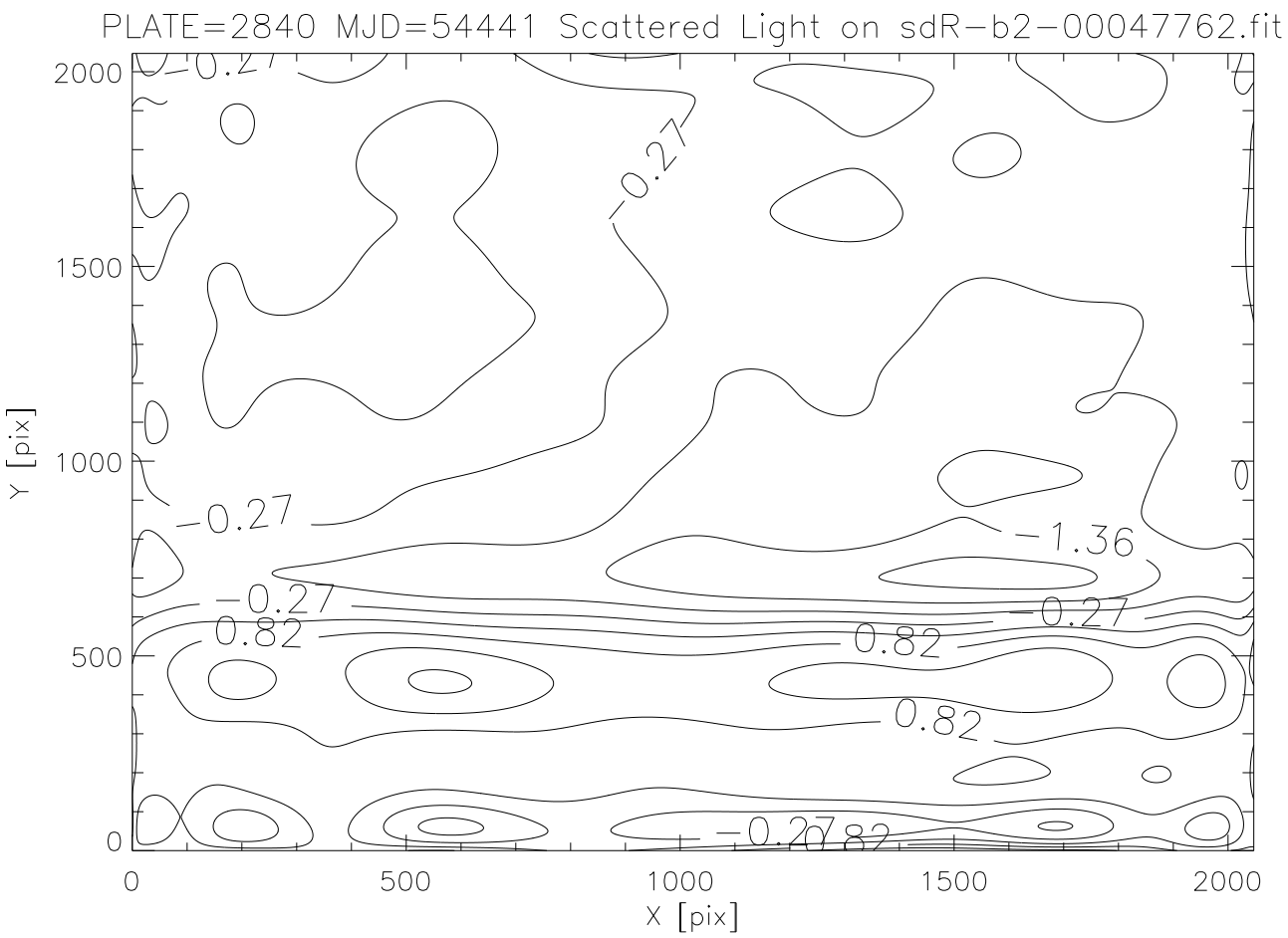

PLATE=2840 MJD=54441 sdR-b2-00047761.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
RED = sky fiber
Dispersion = 52.68 %
Fiber number
Focal Distance [mm]
Airmass

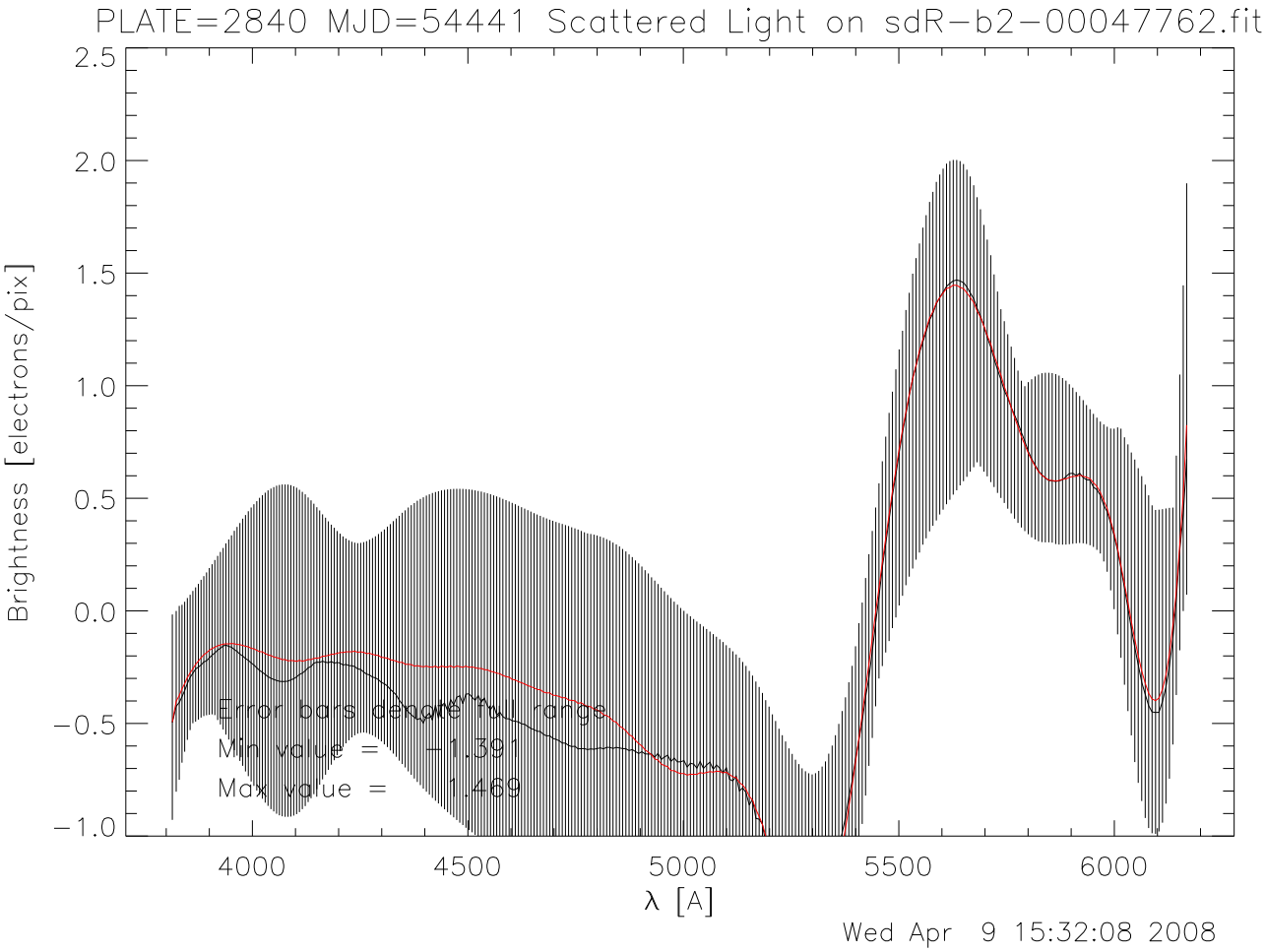

PLATE=2840 MJD=54441 sdR-b2-00047761.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
RED = sky fiber
Dispersion = 14.51 %
Fiber number
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

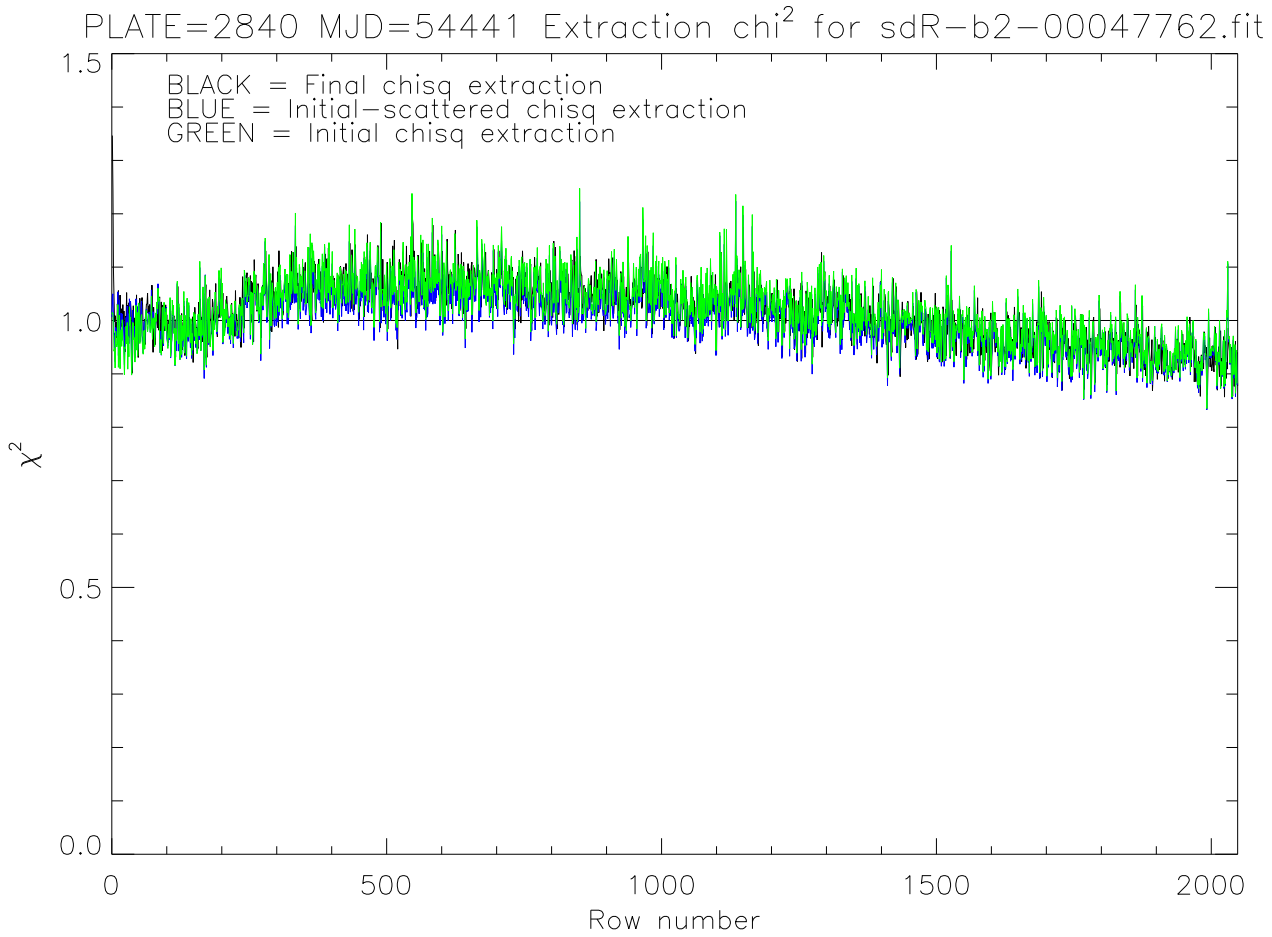

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b2-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.161
Max value = 1.235
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 15:26:18 2008

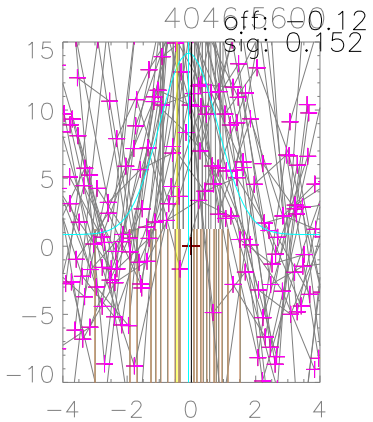

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047762.f
Y [pix]
X [pix]
0
500
1000
1500
2000
1.73
2.82
3.91

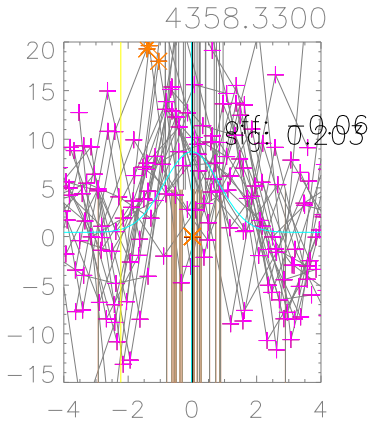

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047762.f
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.854
Max value = 3.124
Wed Apr 9 15:27:19 2008

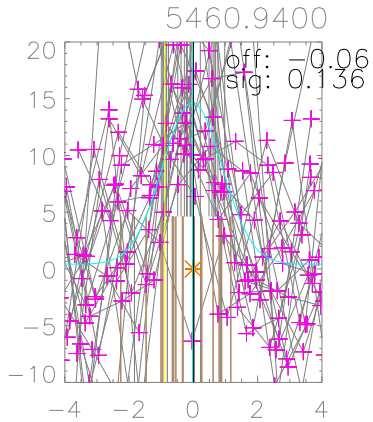

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047762.fit
-0.27
-0.27
-0.27
-1.36
-0.27
-0.27
0.82
0.82
0.82
-0.27
0.82
0
0
0
0
0
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]

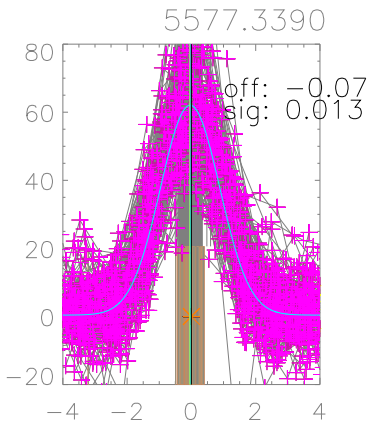

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047762.fit
Brightness [electrons/pix]
2.5
2.0
1.5
1.0
0.5
0.0
−0.5
−1.0
4000
4500
5000
5500
6000
λ [A]
Error bars denote full range
Min value = −1.381
Max value = 1.469
Wed Apr 9 15:32:08 2008

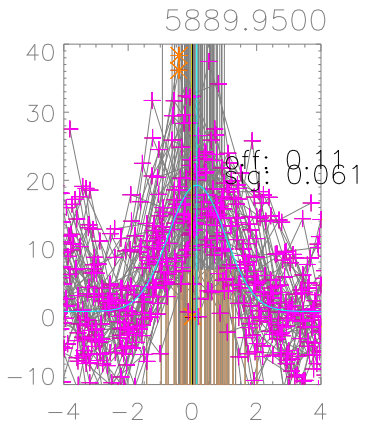

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b2-00047762.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

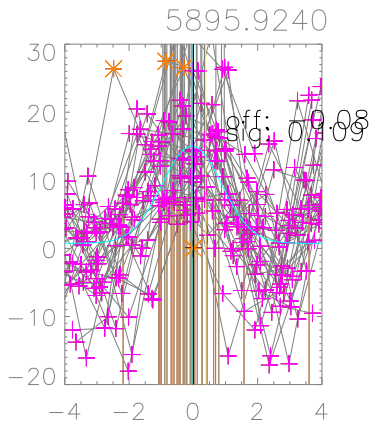

4046.5600
off: −0.12
sig: 0.152

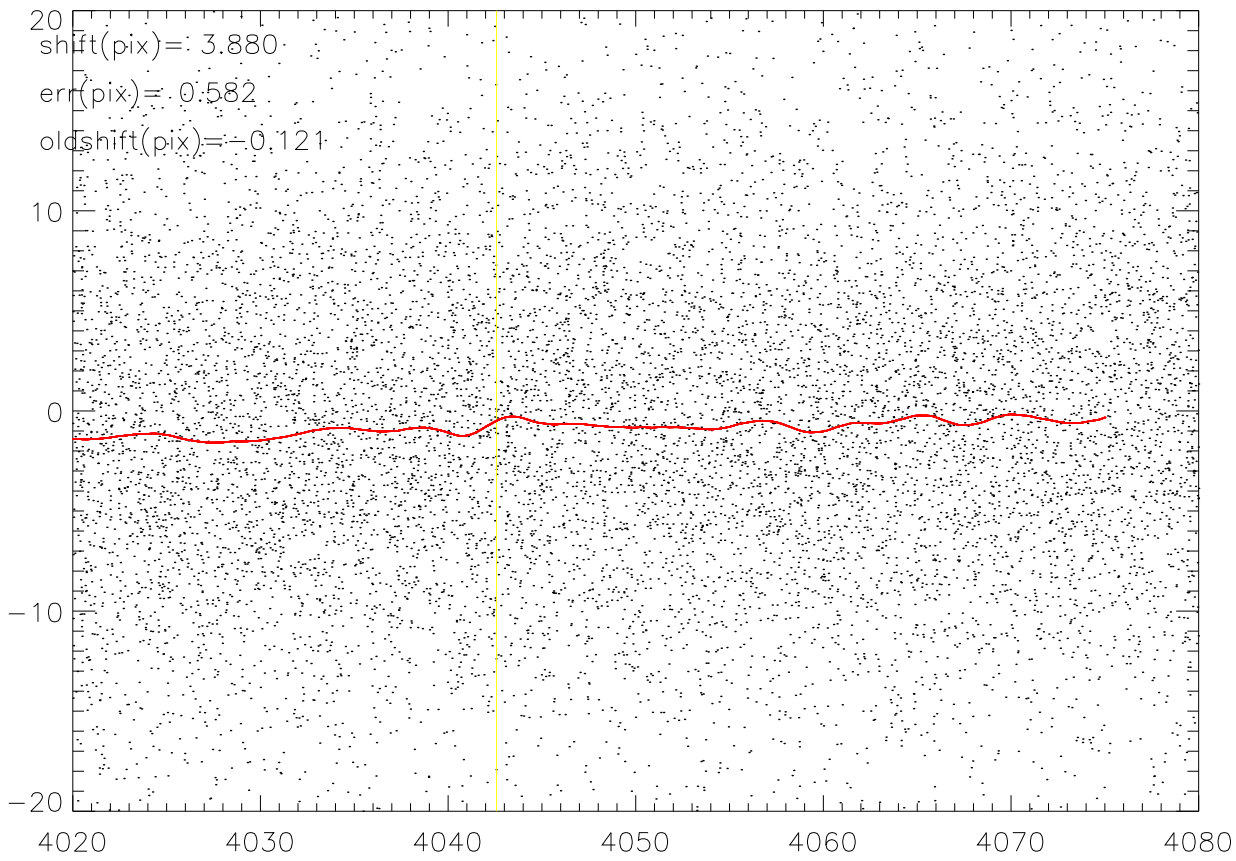

4358.3300
off: −0.06
sig: 0.203

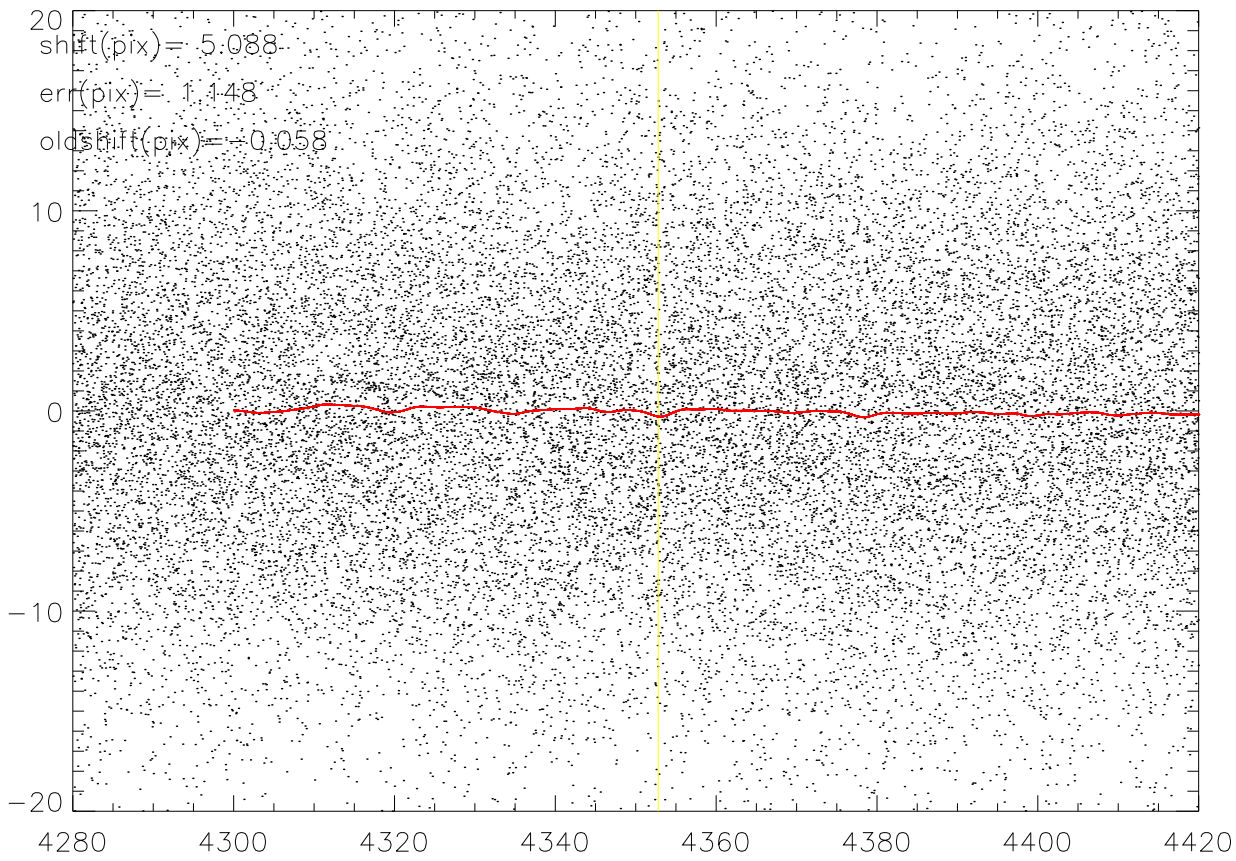

5460.9400
off: −0.06
sig: 0.136

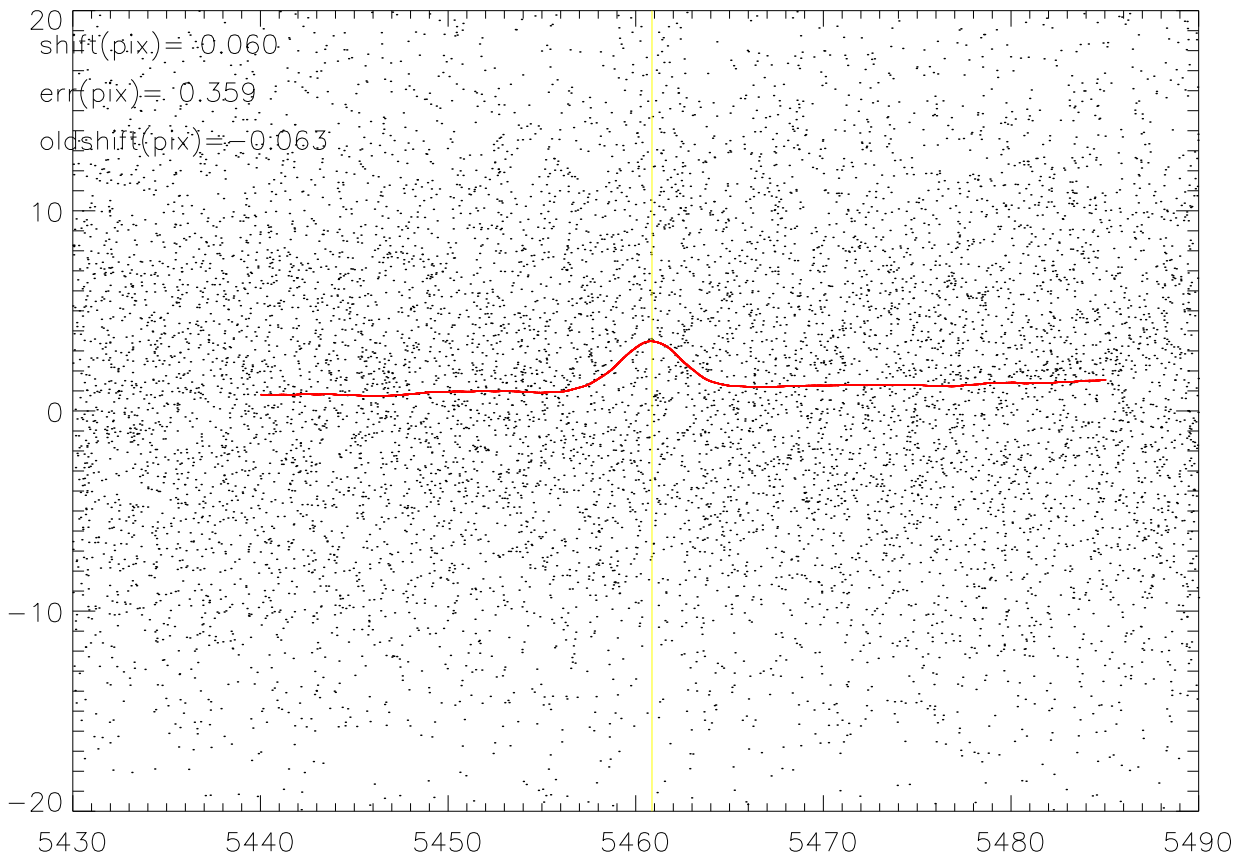

5577.3390
off: −0.07
sig: 0.013

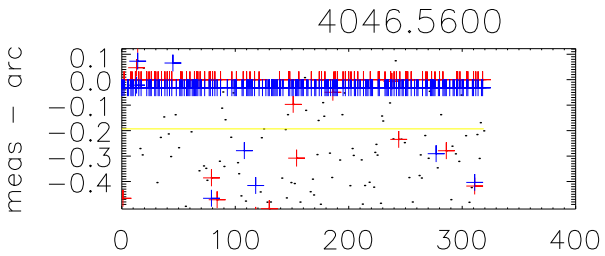

5889.9500
off: 0.11
sig: 0.061

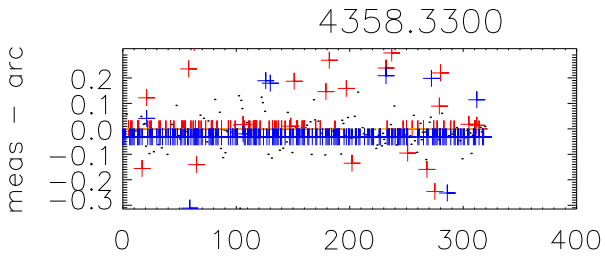

5895.9240
off: −0.08
sig: 0.109

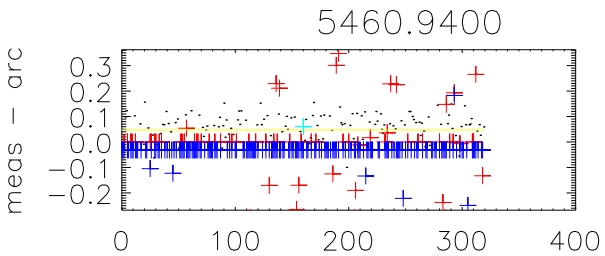

shift(pix)= 3.880
err(pix)= 0.582
oldshift(pix)= -0.121
20
10
0
−10
−20
4020
4030
4040
4050
4060
4070
4080

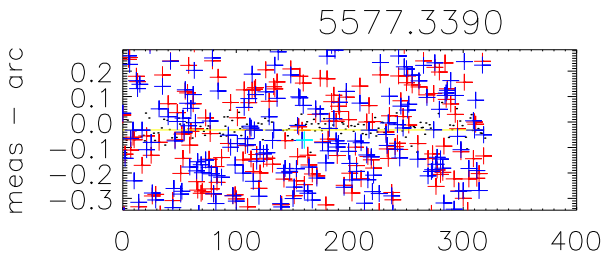

shift(pix)= 5.088
err(pix)= 1.148
oldshift(pix)= -0.058
20
10
0
−10
−20
4280
4300
4320
4340
4360
4380
4400
4420

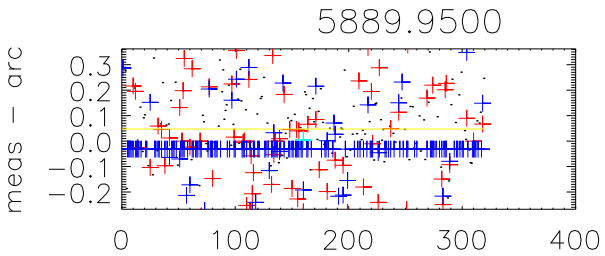

shift(pix)= 0.060
err(pix)= 0.359
oldshift(pix)=−0.063
20
10
0
−10
−20
5430
5440
5450
5460
5470
5480
5490

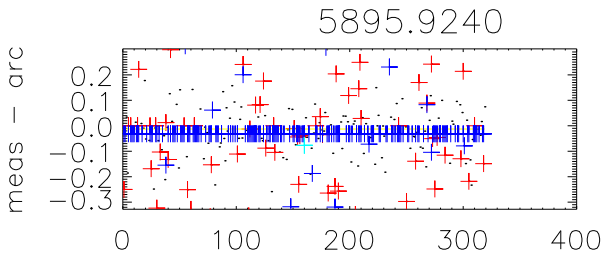

4046.5600
meas − arc
0.1
0.0
−0.1
−0.2
−0.3
−0.4
0
100
200
300
400

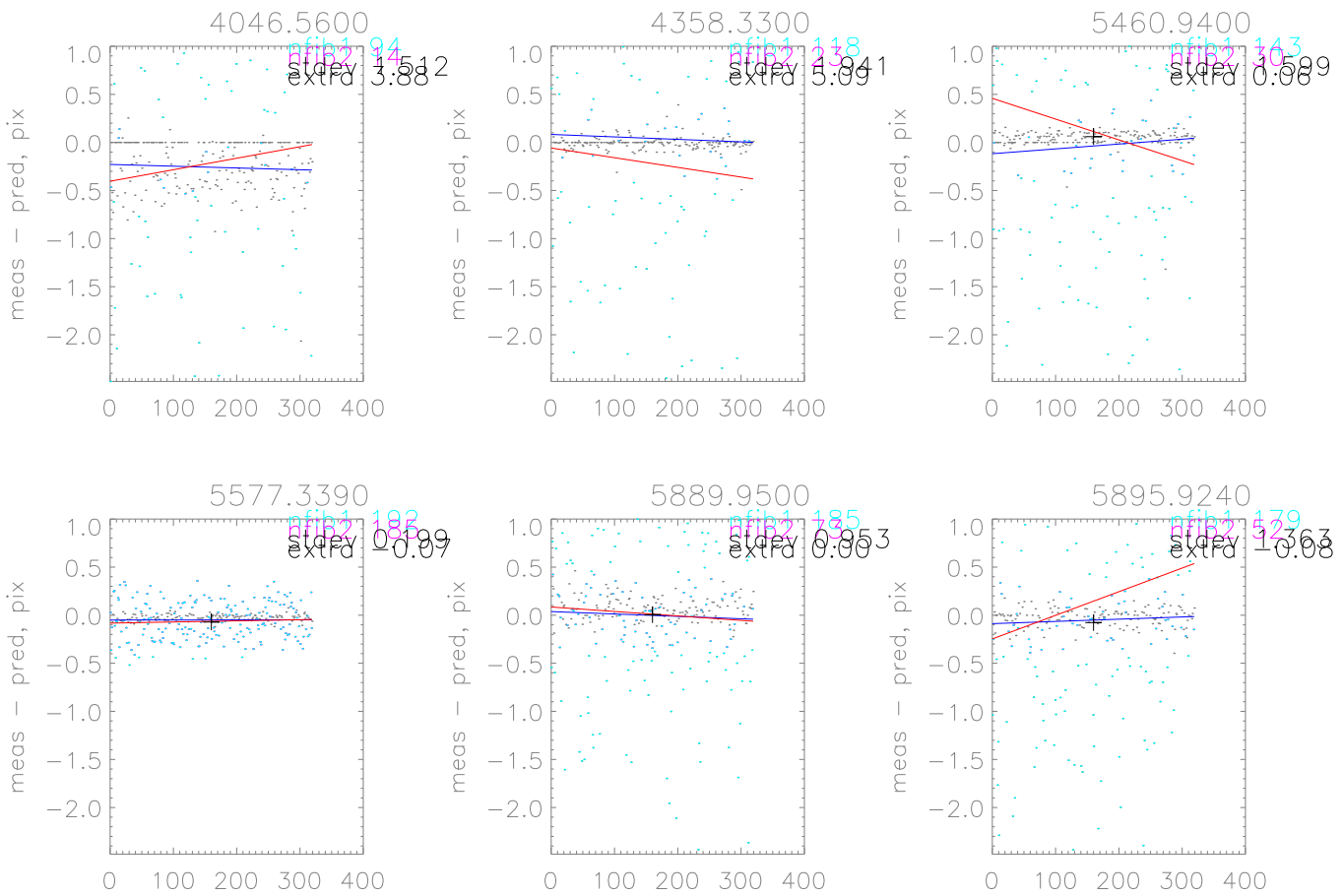

4358.3300
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

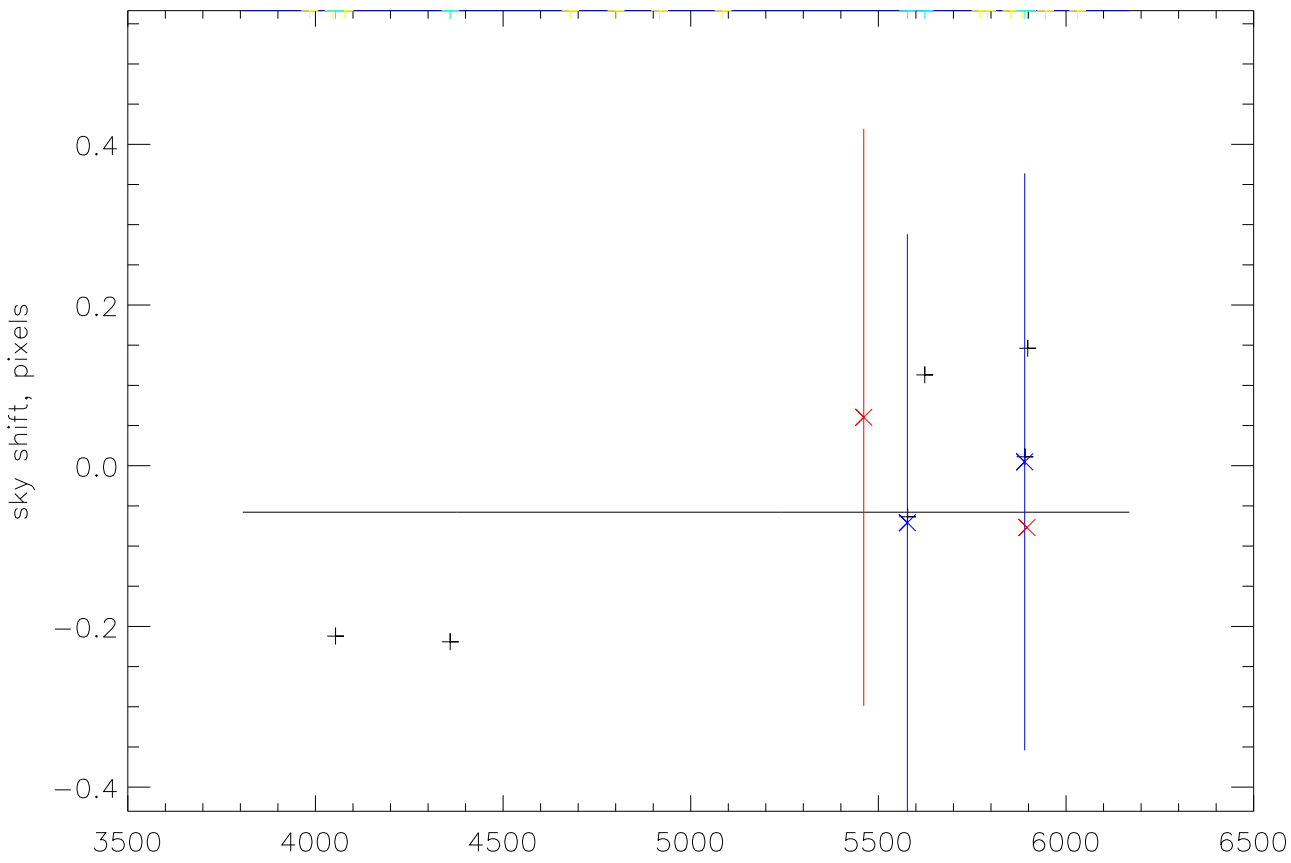

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

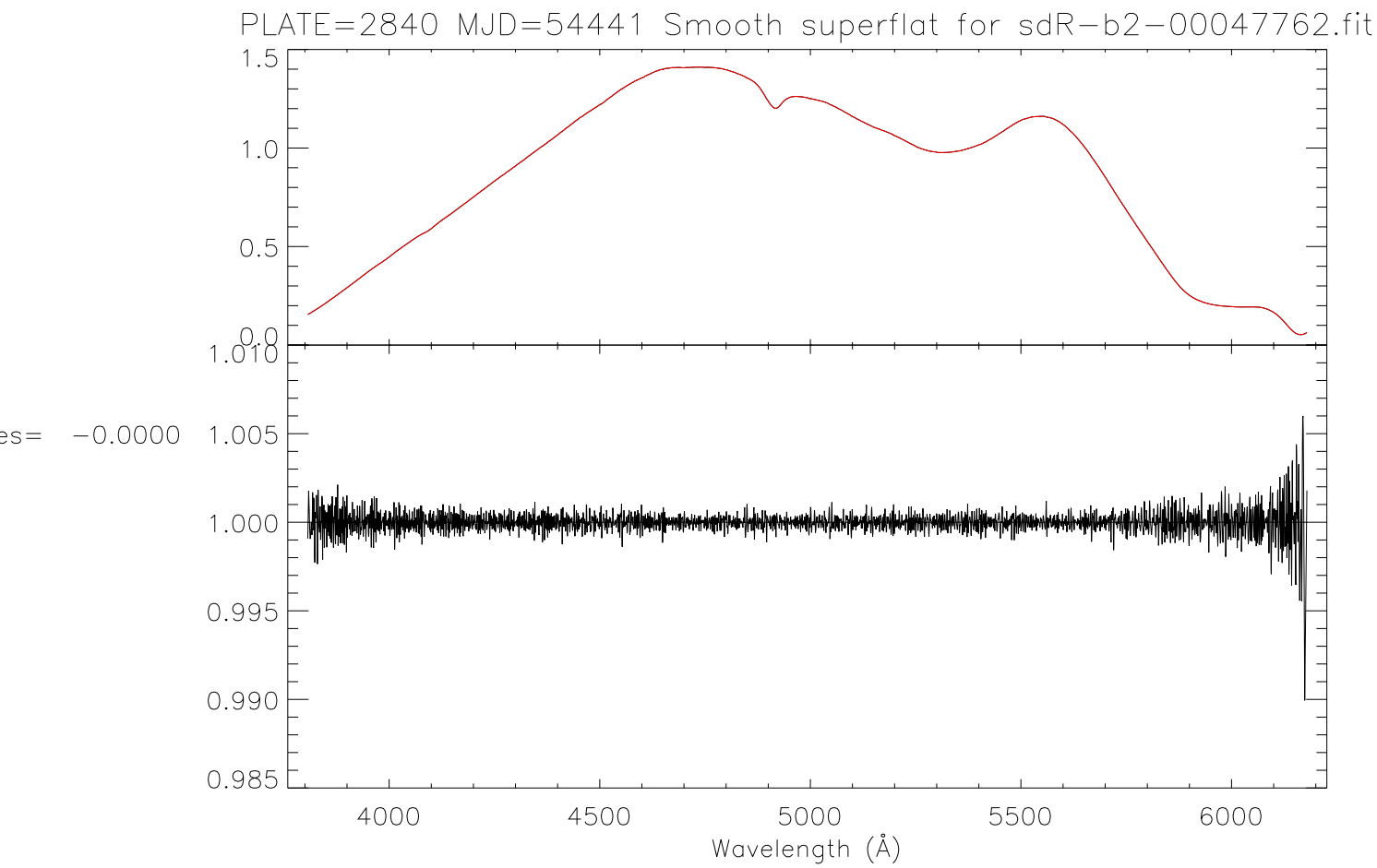

5577.3390
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

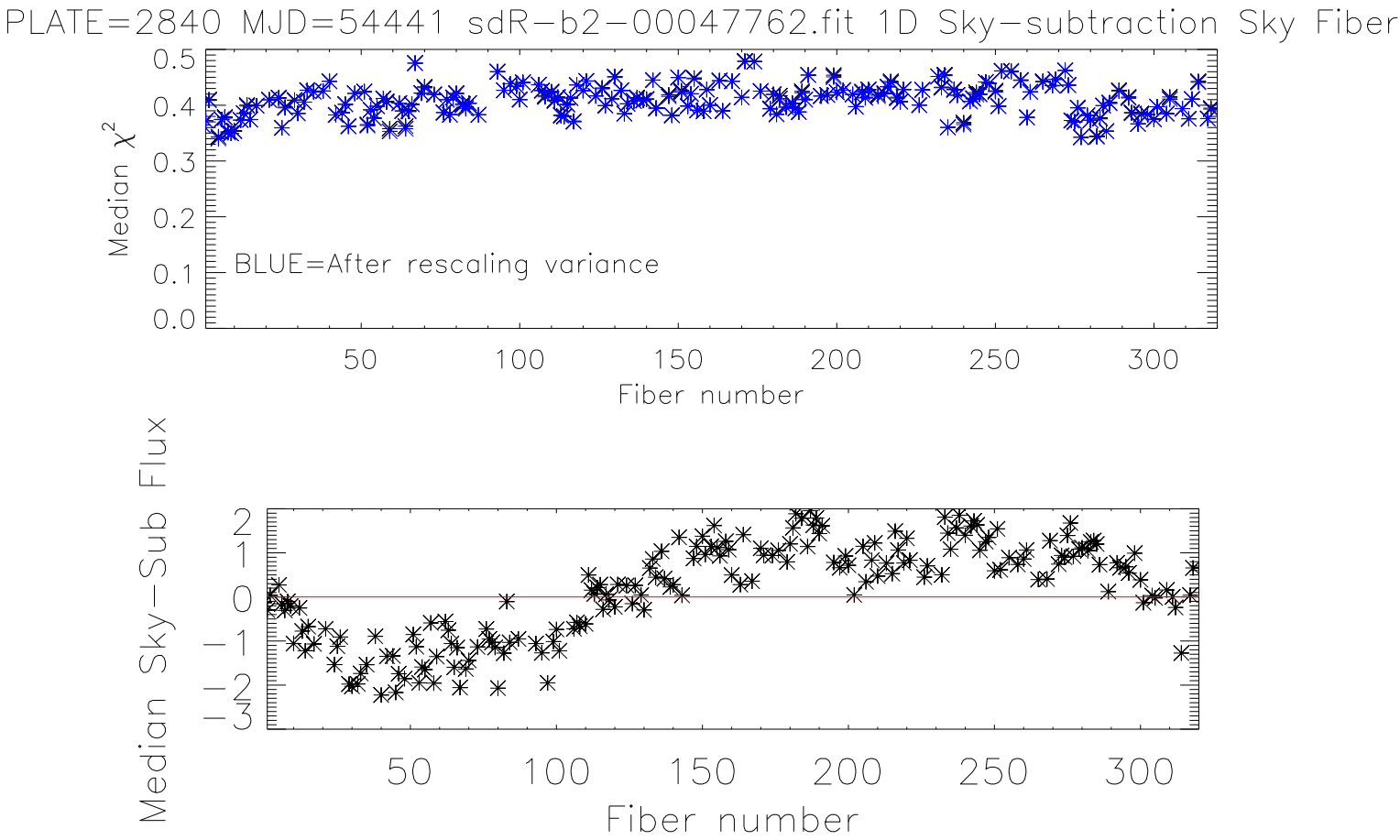

5889.9500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

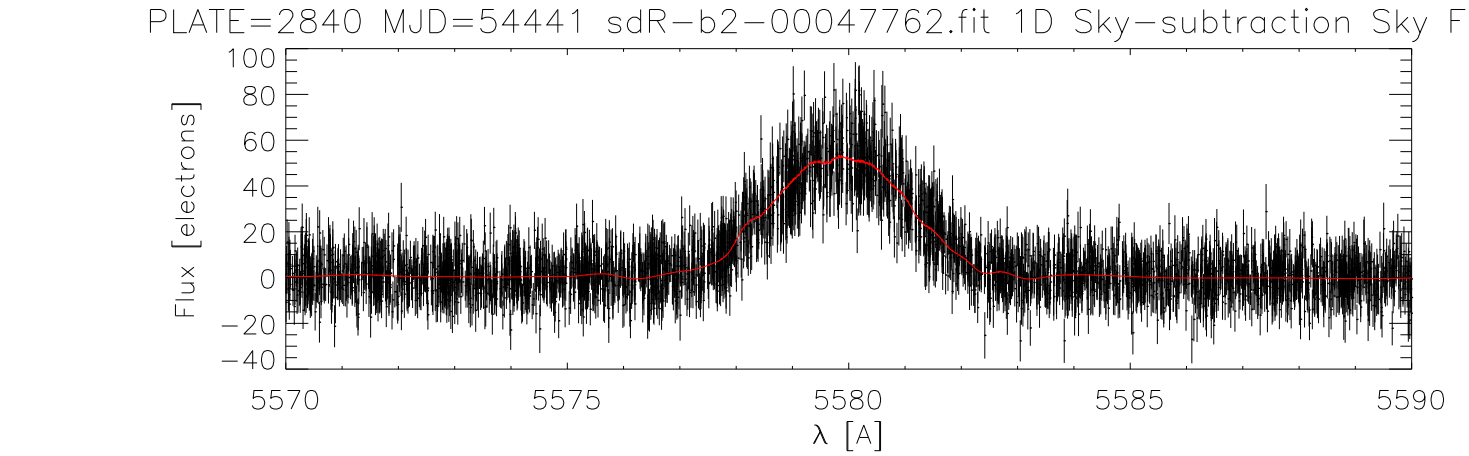

5895.9240
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

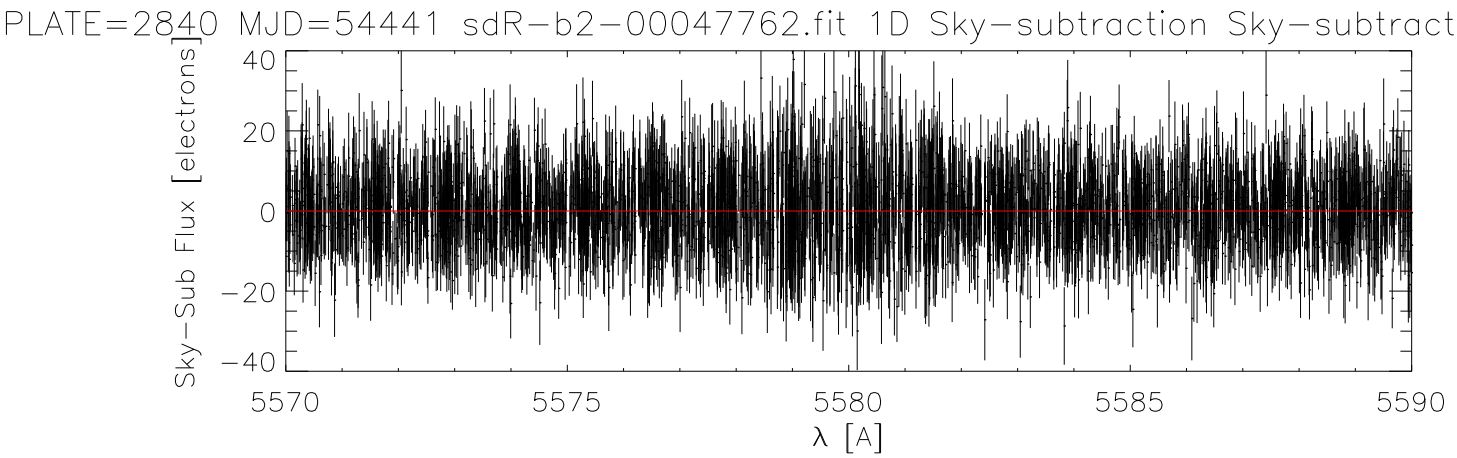

4046.5600
4358.3300
5460.9400
5577.3390
5889.9500
5895.9240
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
−1.5
−2.0
0
100
200
300
400

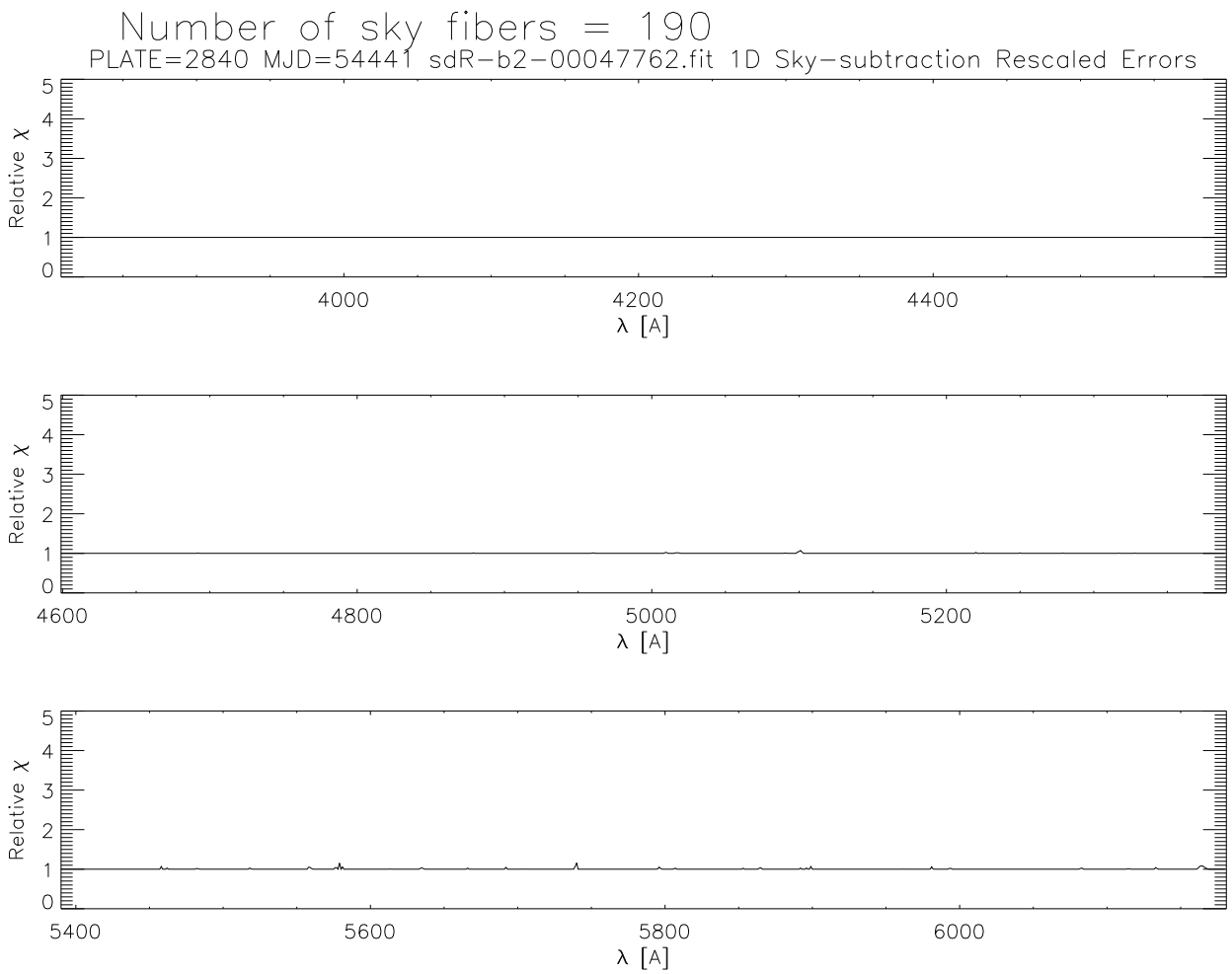

sky shift, pixels
0.4
0.2
0.0
−0.2
−0.4
3500
4000
4500
5000
5500
6000
6500

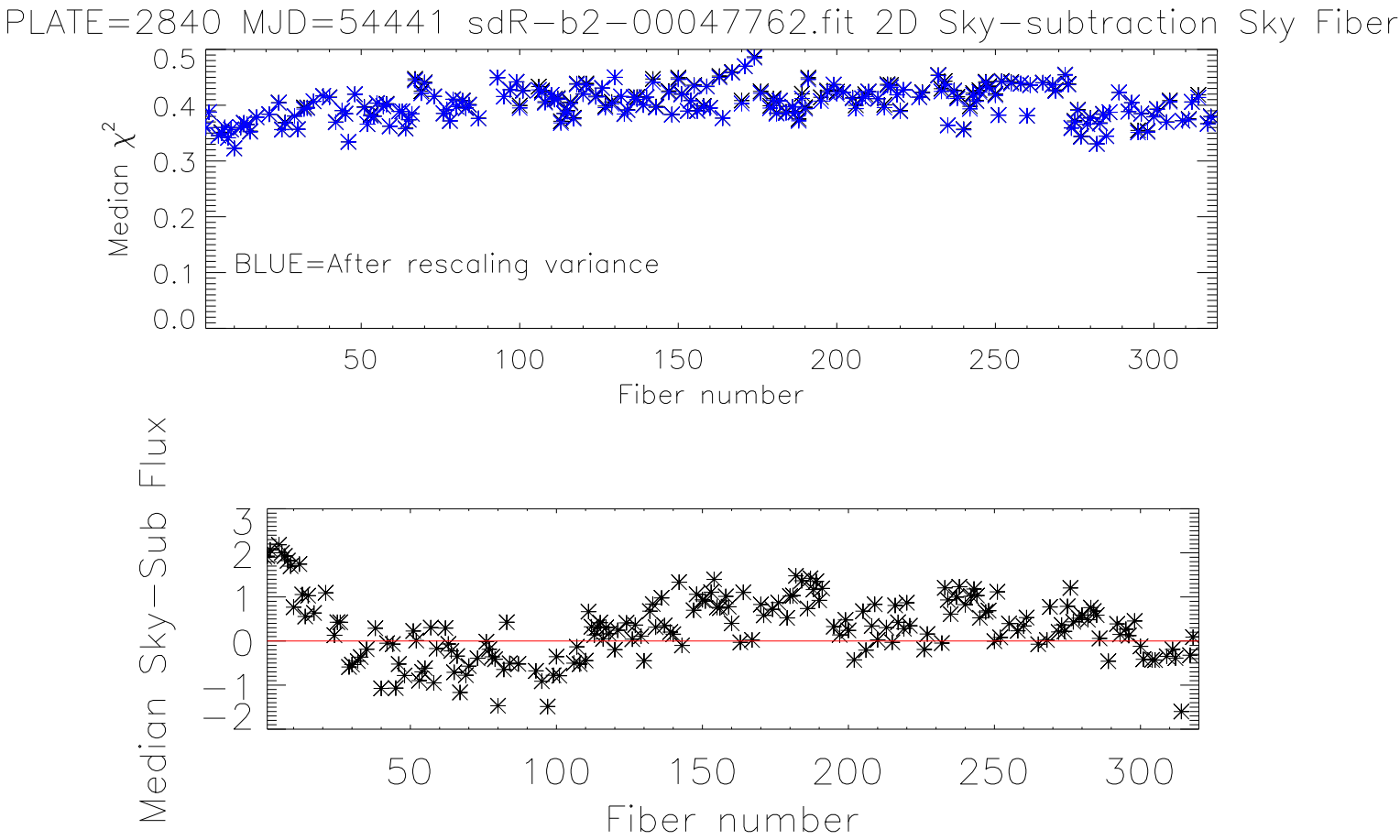

PLATE=2840 MJD=54441 Smooth superflat for sdR-b2-00047762.fit
1.5
1.0
0.5
0.0
1.010
es= −0.0000
1.005
1.000
0.995
0.990
0.985
4000
4500
5000
5500
6000
Wavelength (Å)

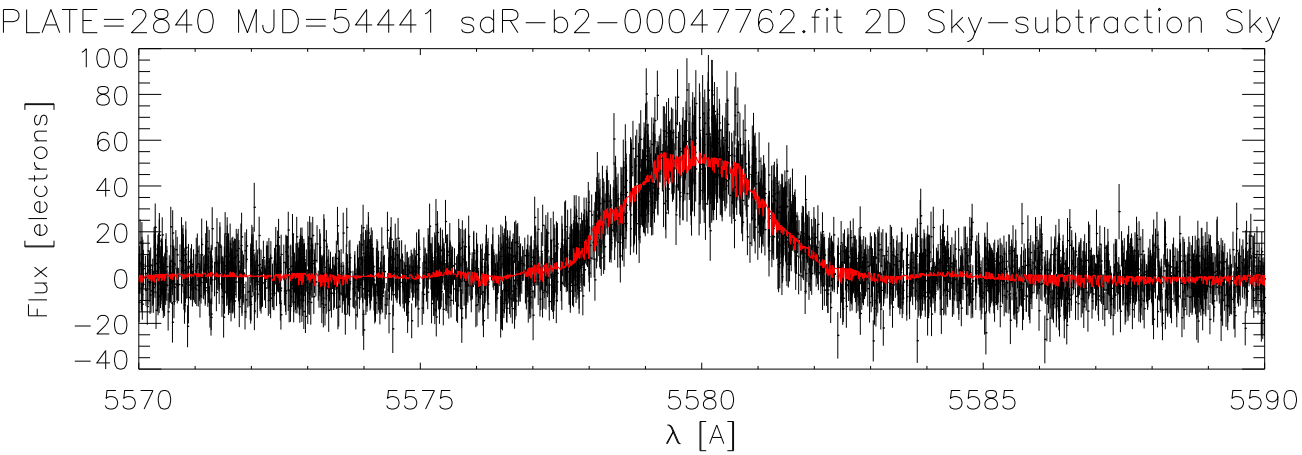

PLATE=2840 MJD=54441 sdR-b2-00047762.fit 1D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.1
0.2
0.3
0.4
0.5
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-3
-2
-1
0
1
2
50
100
150
200
250
300
Fiber number

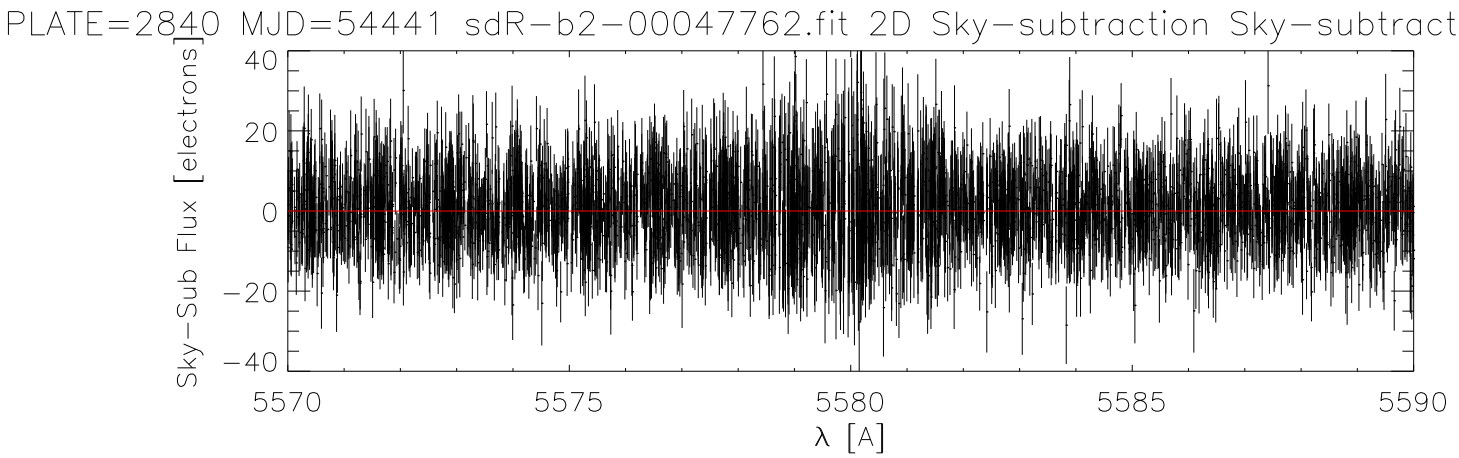

PLATE=2840 MJD=54441 sdR-b2-00047762.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
100
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

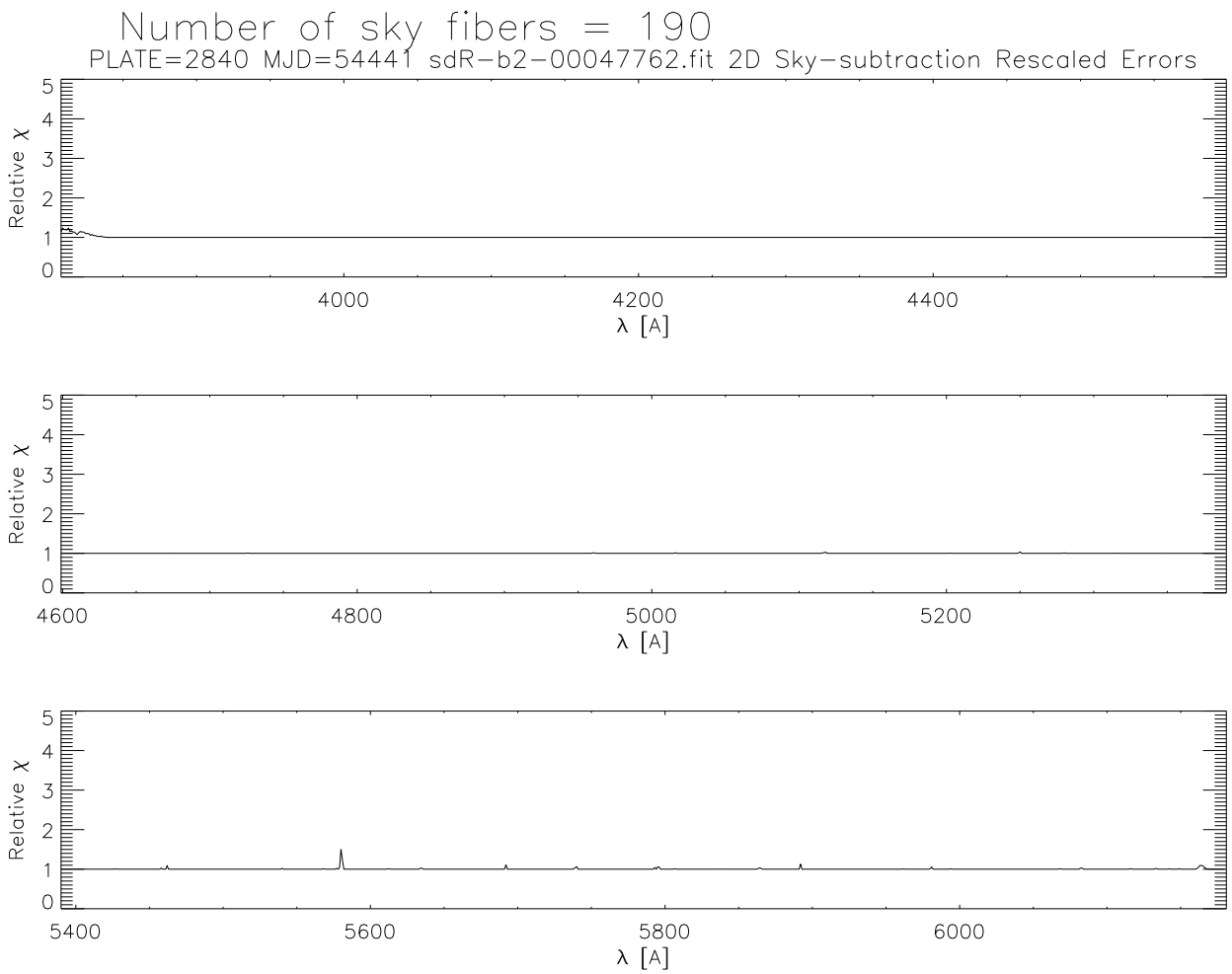

PLATE=2840 MJD=54441 sdR-b2-00047762.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

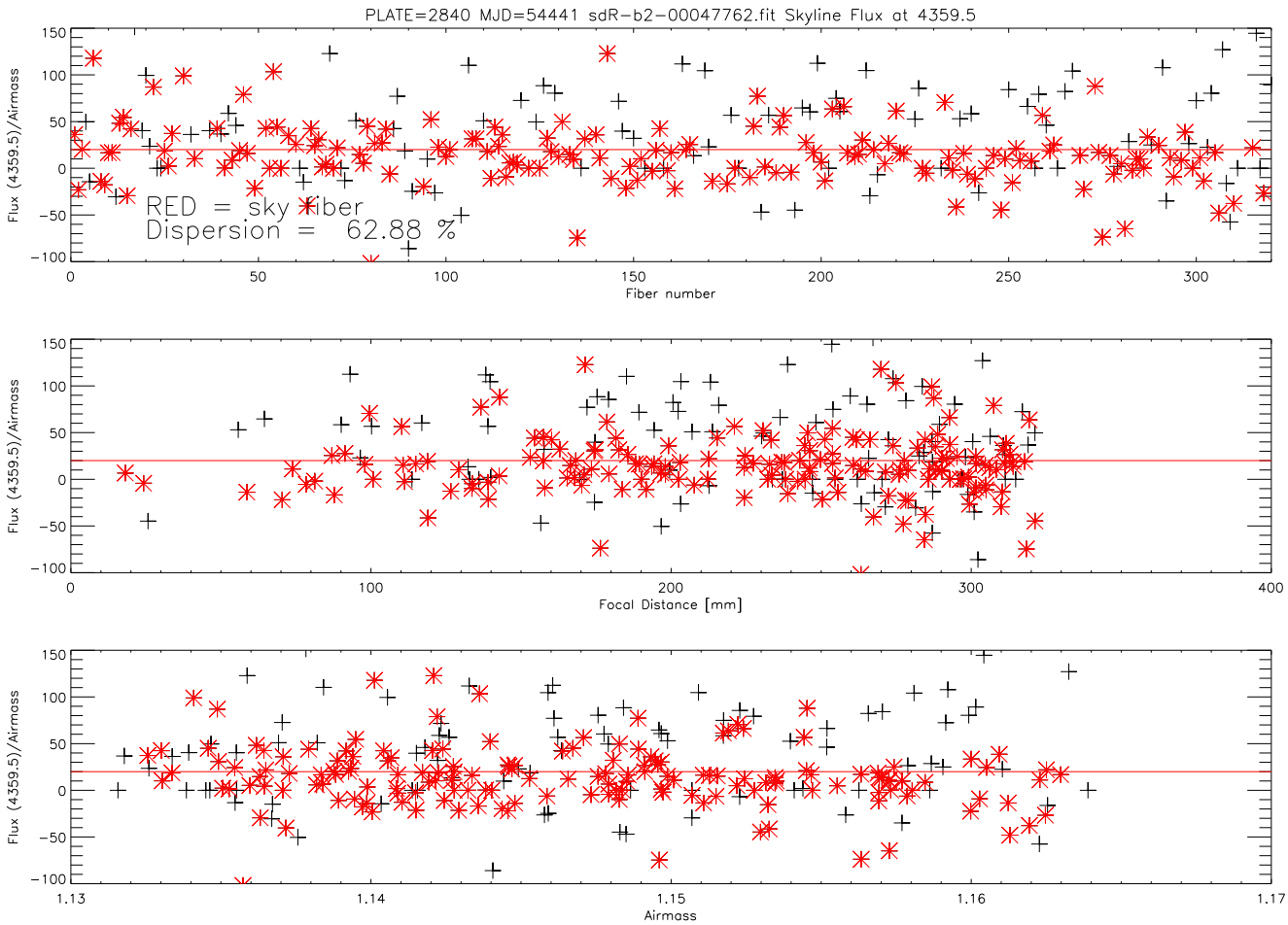

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047762.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000

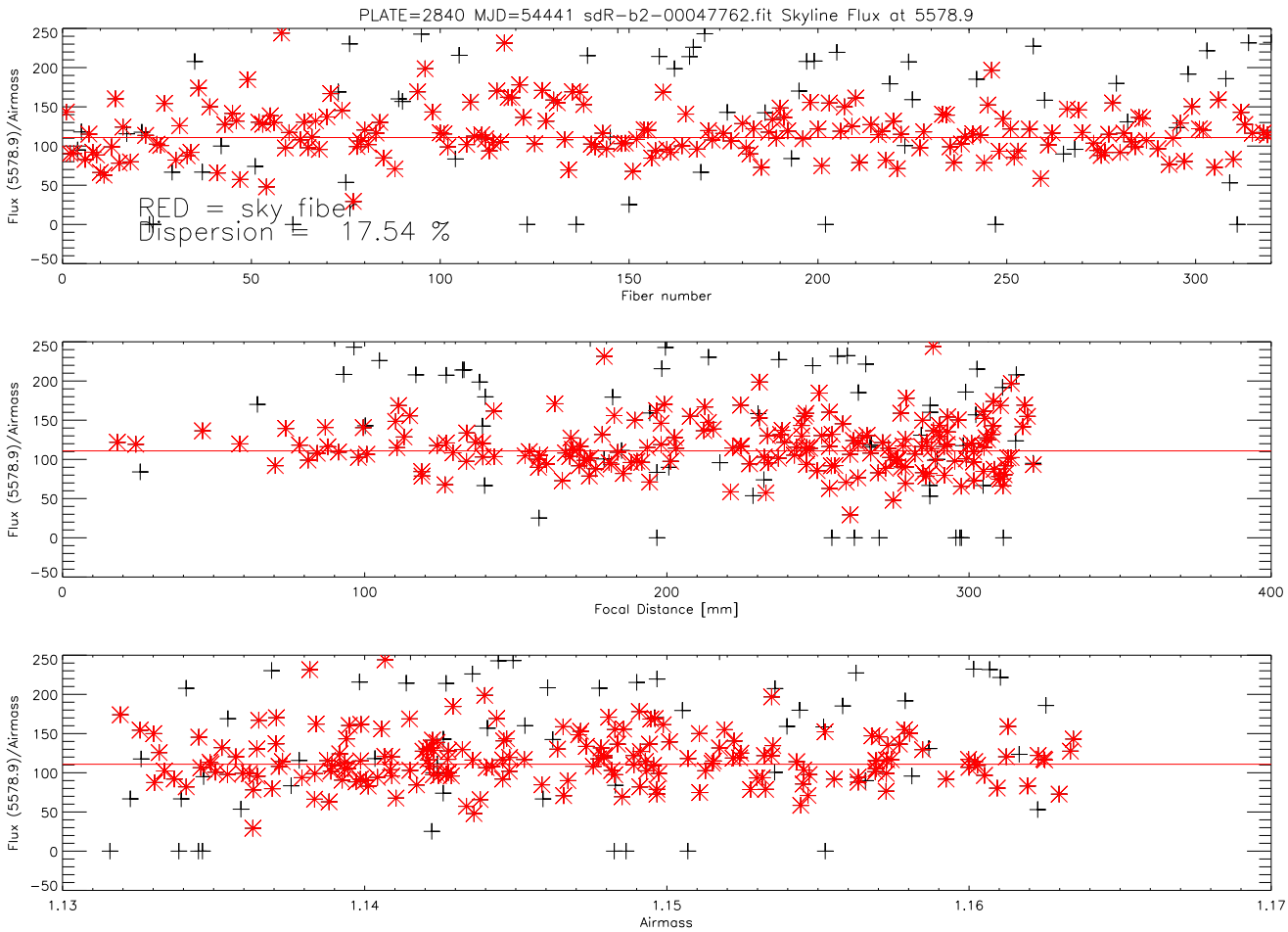

PLATE=2840 MJD=54441 sdR-b2-00047762.fit 2D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.1
0.2
0.3
0.4
0.5
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-2
-1
0
1
2
3
50
100
150
200
250
300
Fiber number

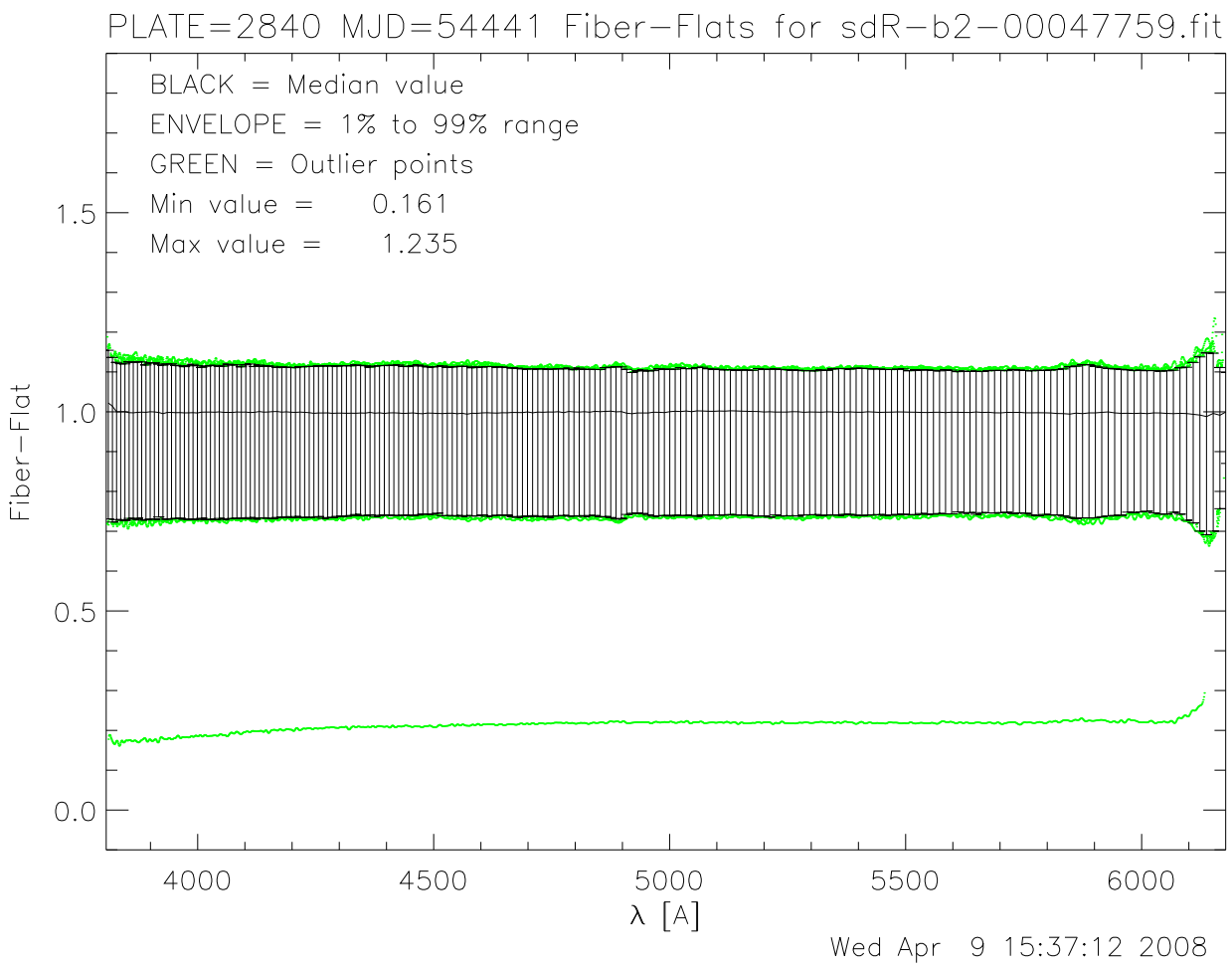

PLATE=2840 MJD=54441 sdR-b2-00047762.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
100
80
60
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

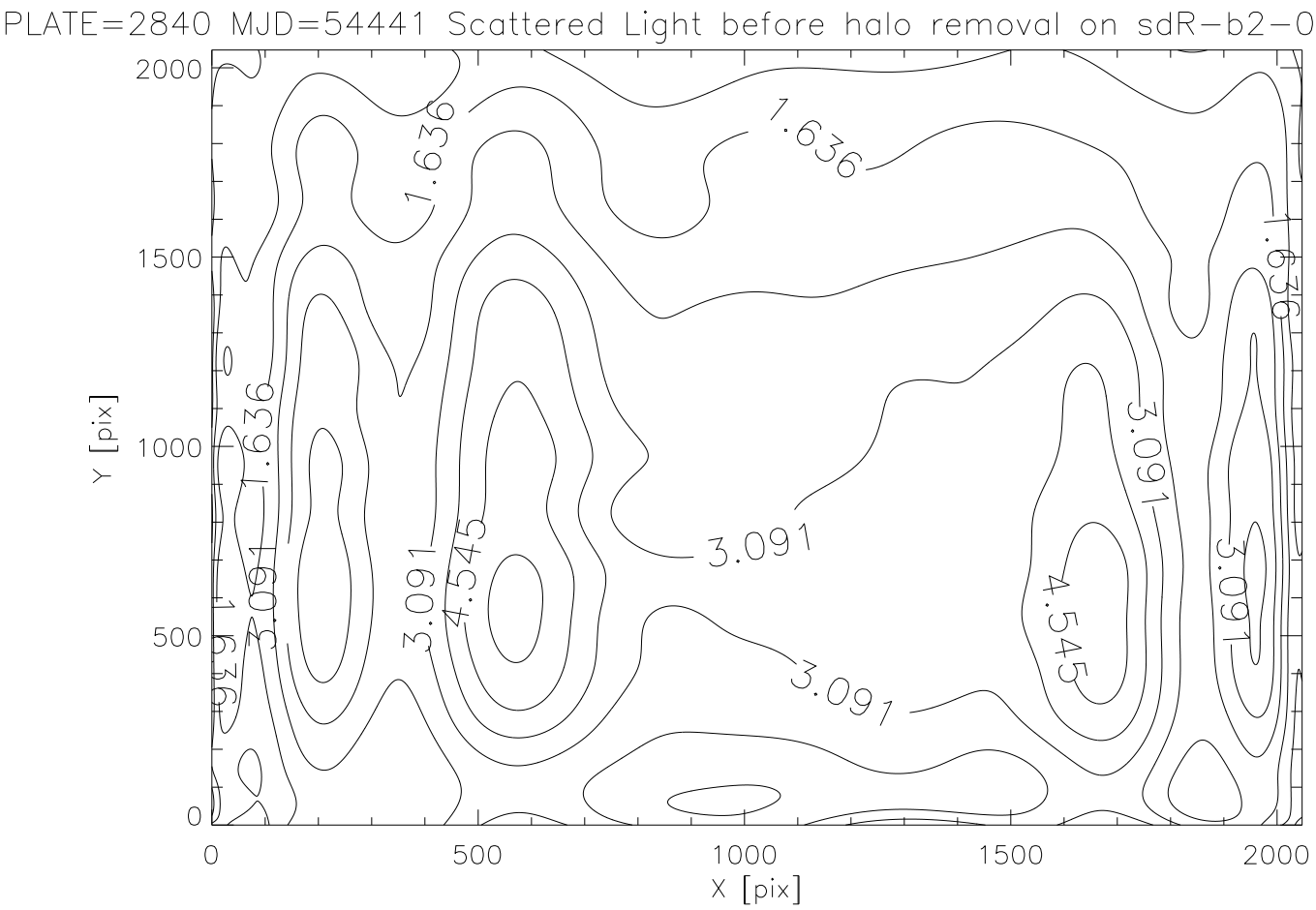

PLATE=2840 MJD=54441 sdR-b2-00047762.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
40
20
0
-20
-40
5570
5575
5580
5585
5590
λ [A]

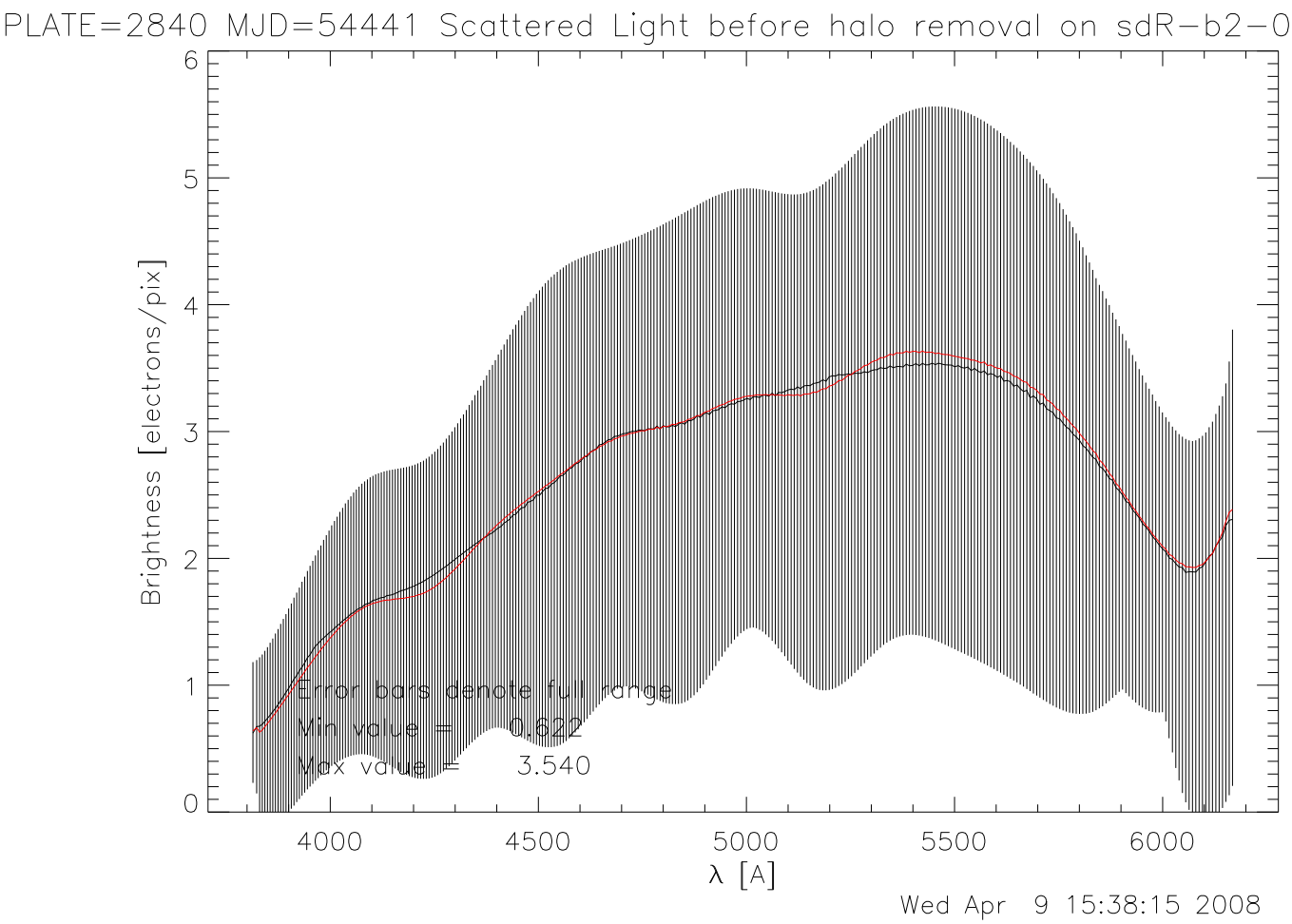

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047762.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000

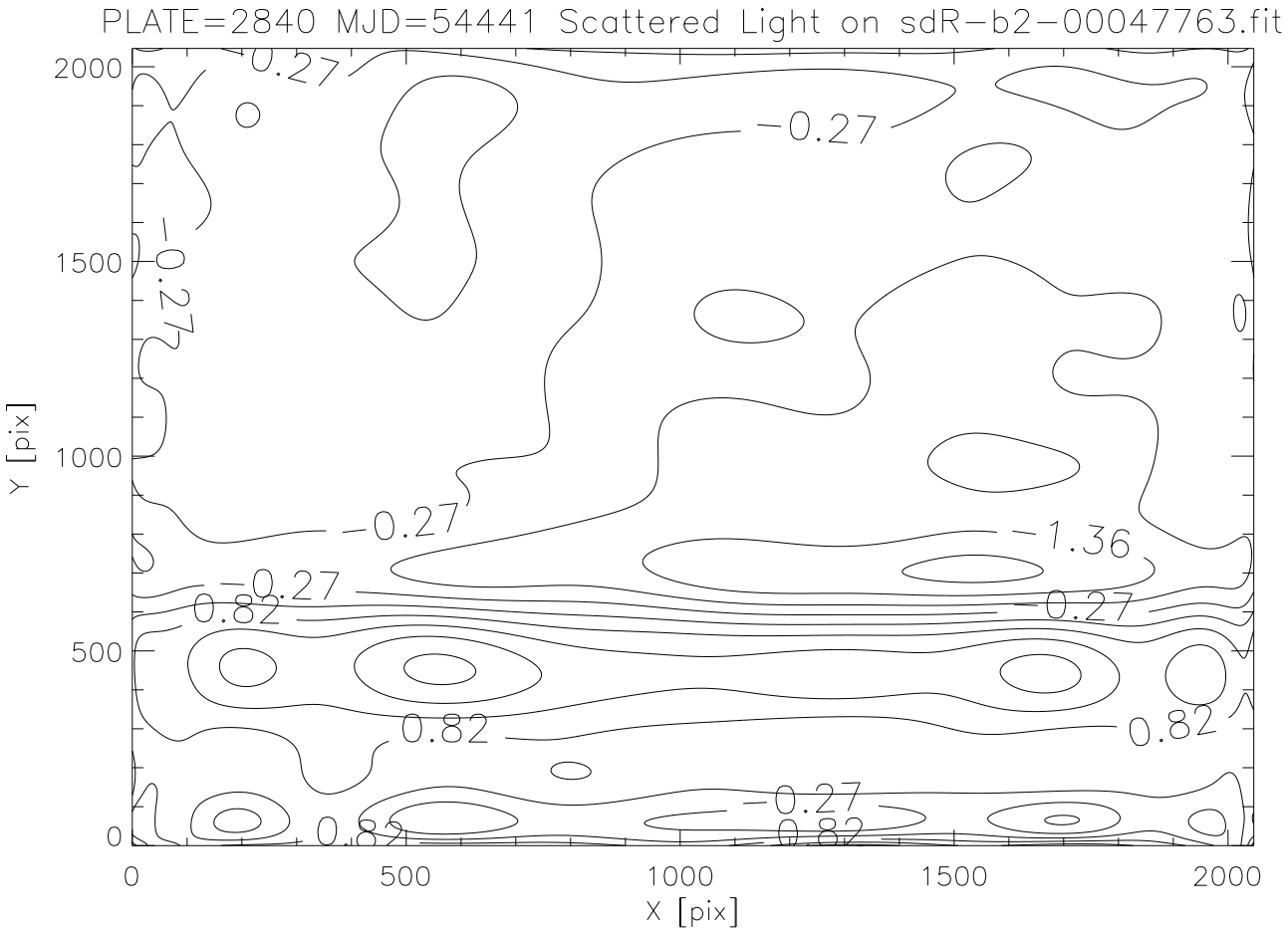

PLATE=2840 MJD=54441 sdR-b2-00047762.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
RED = sky fiber
Dispersion = 62.88 %
Fiber number
Flux (4359.5)/Airmass
Focal Distance [mm]
Flux (4359.5)/Airmass
Airmass

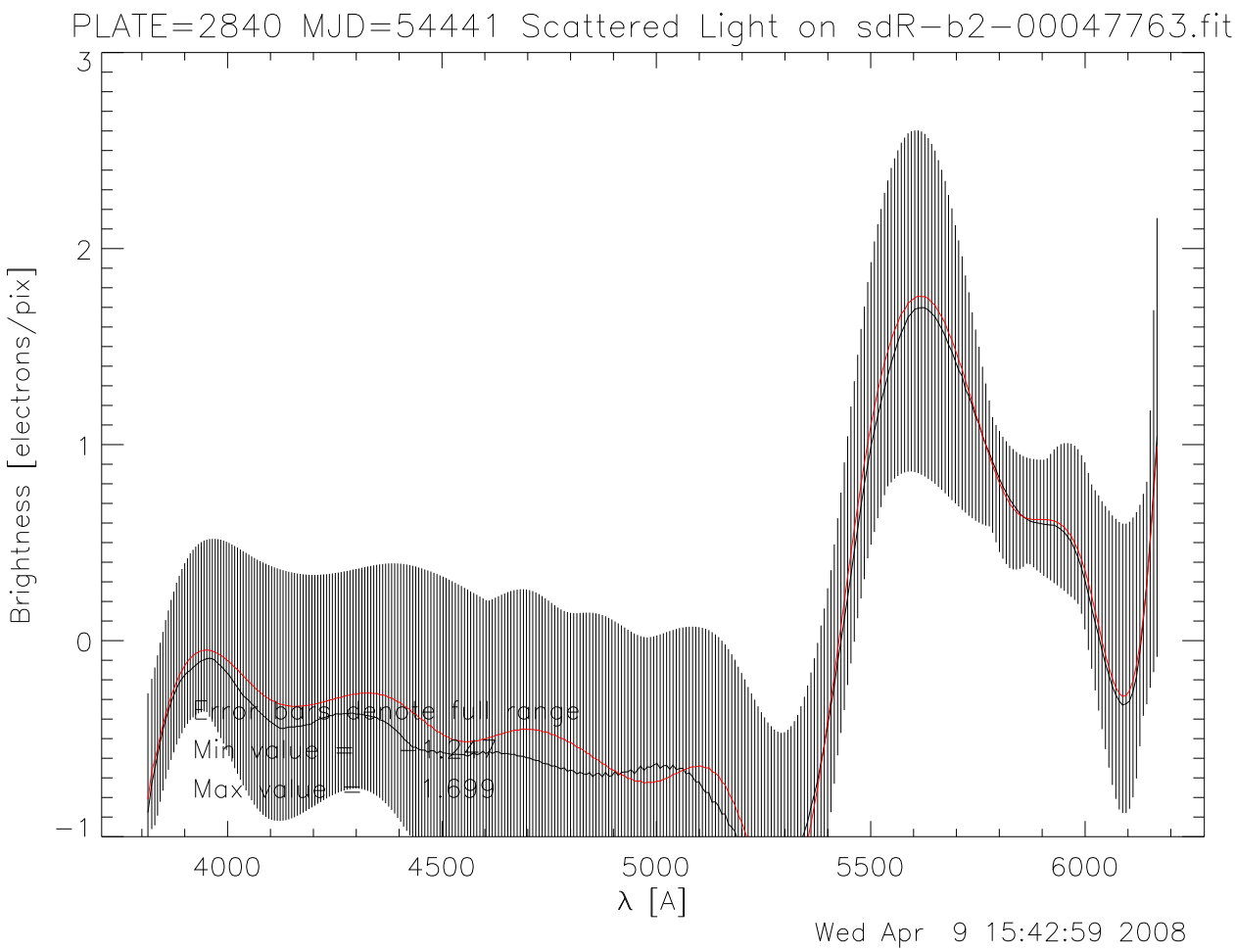

PLATE=2840 MJD=54441 sdR-b2-00047762.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
RED = sky fiber
Dispersion = 17.54 %
Fiber number
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

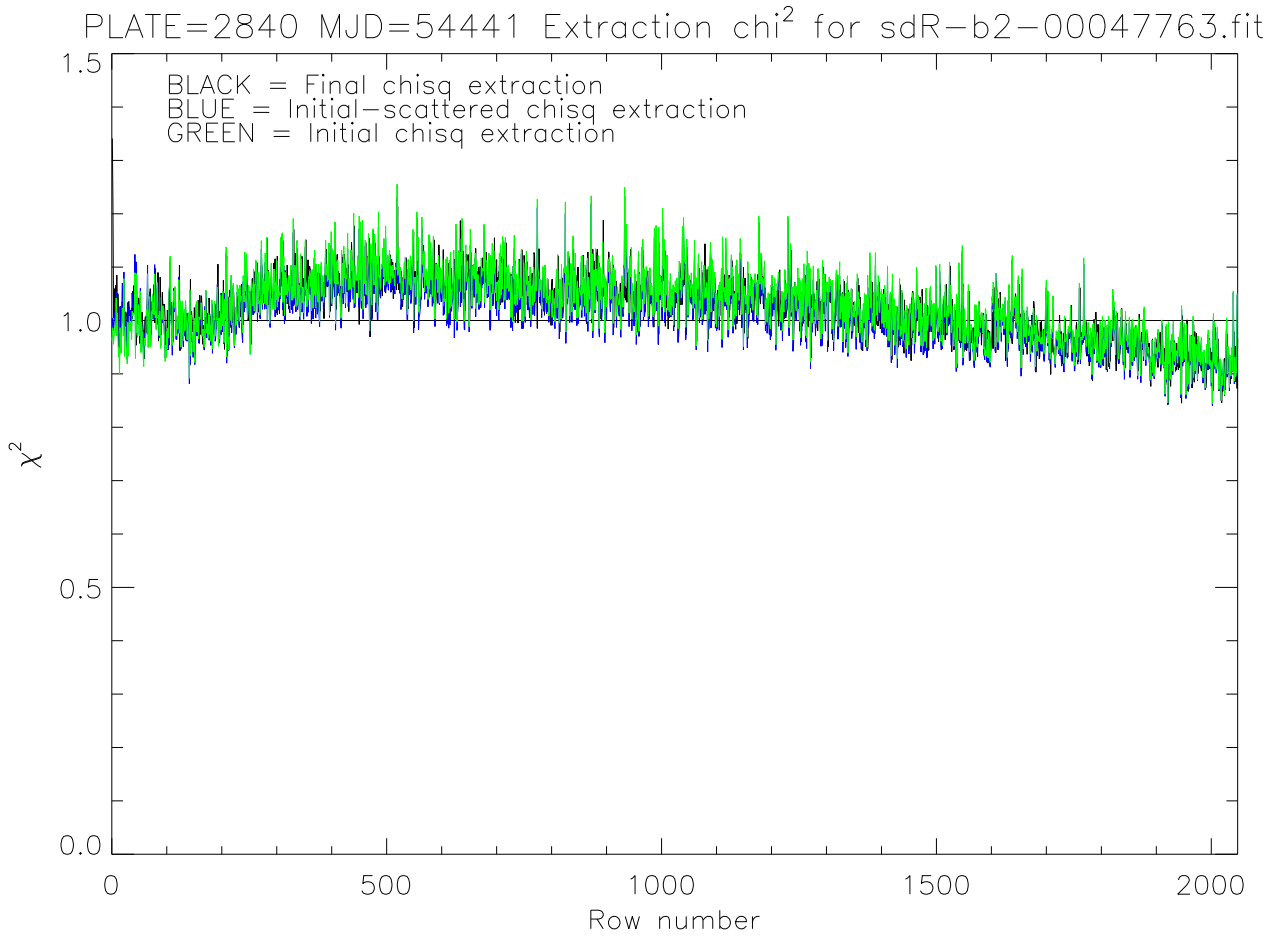

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b2-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.161
Max value = 1.235
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 15:37:12 2008

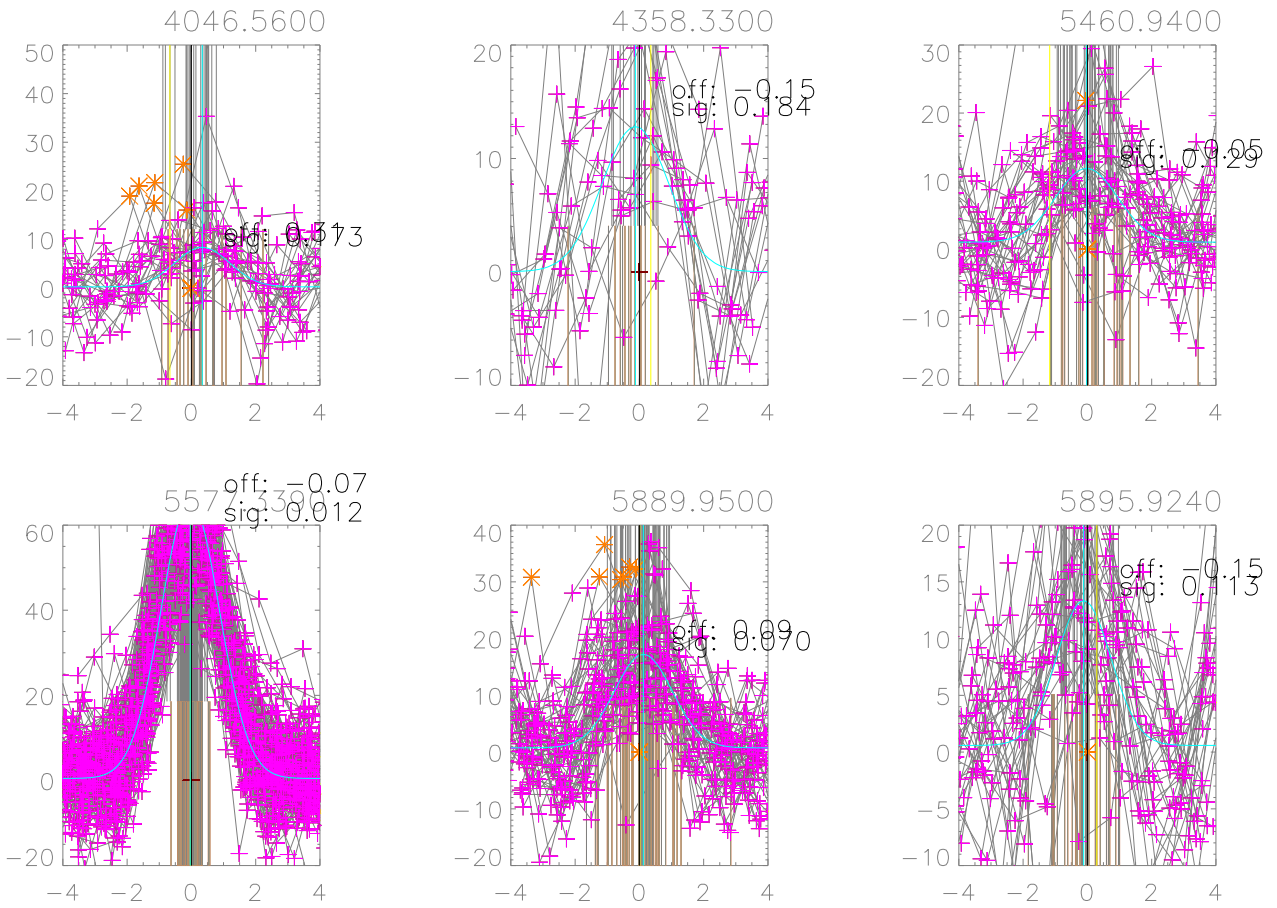

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047763.f
Y [pix]
X [pix]
0
500
1000
1500
2000
1.636
3.091
4.545

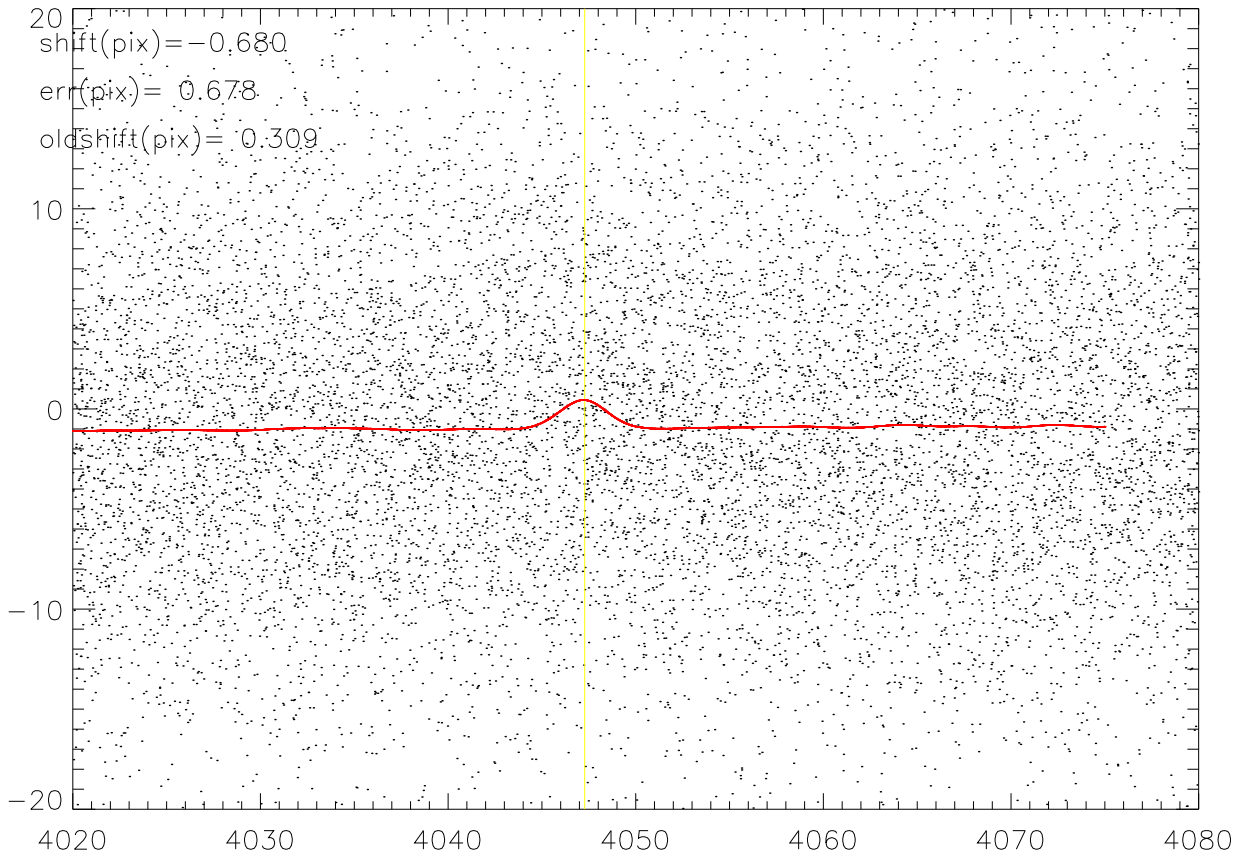

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047763.f
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.622
Max value = 3.540
Wed Apr 9 15:38:15 2008

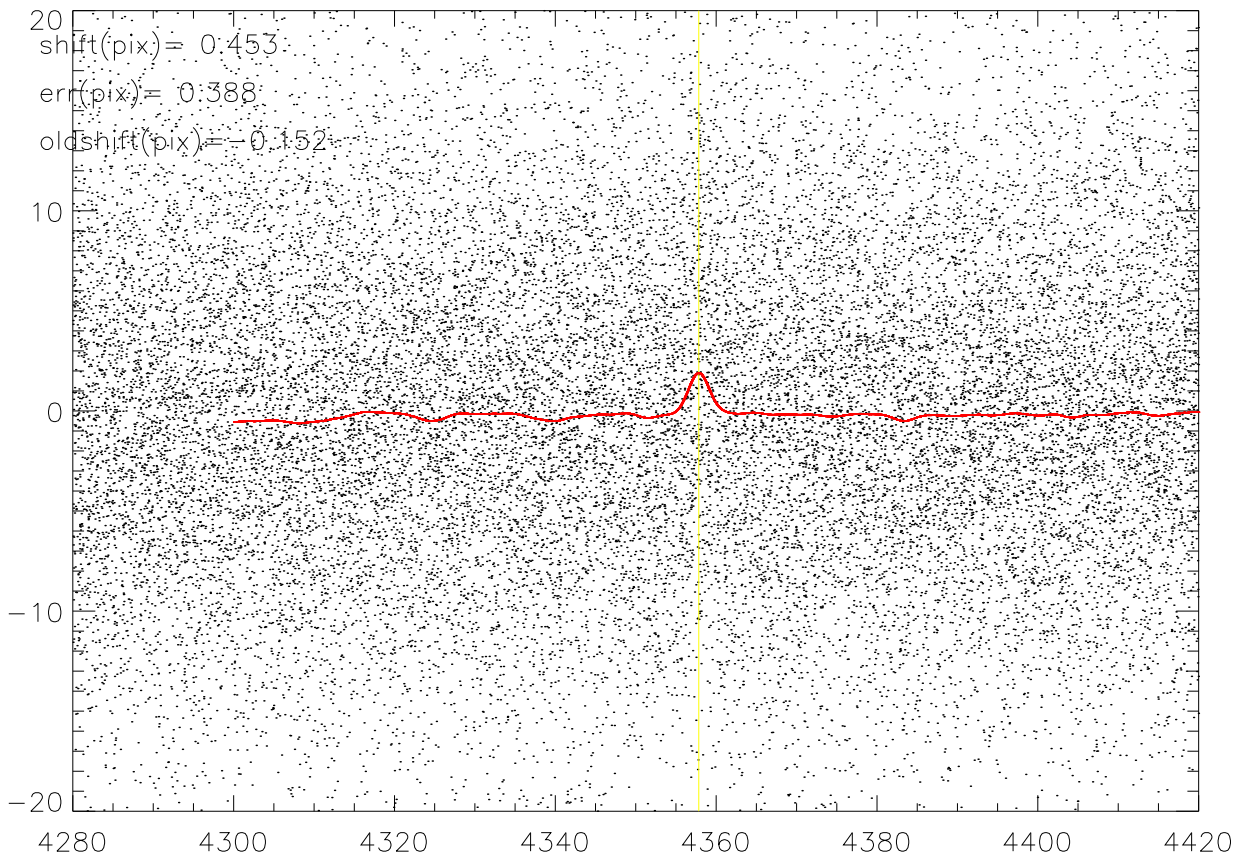

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047763.fit
-0.27
-0.27
-0.27
-0.27
-0.27
-0.27
-1.36
0.82
0.82
0.82
0.82
0.82
Y [pix]
X [pix]
0
500
1000
1500
2000

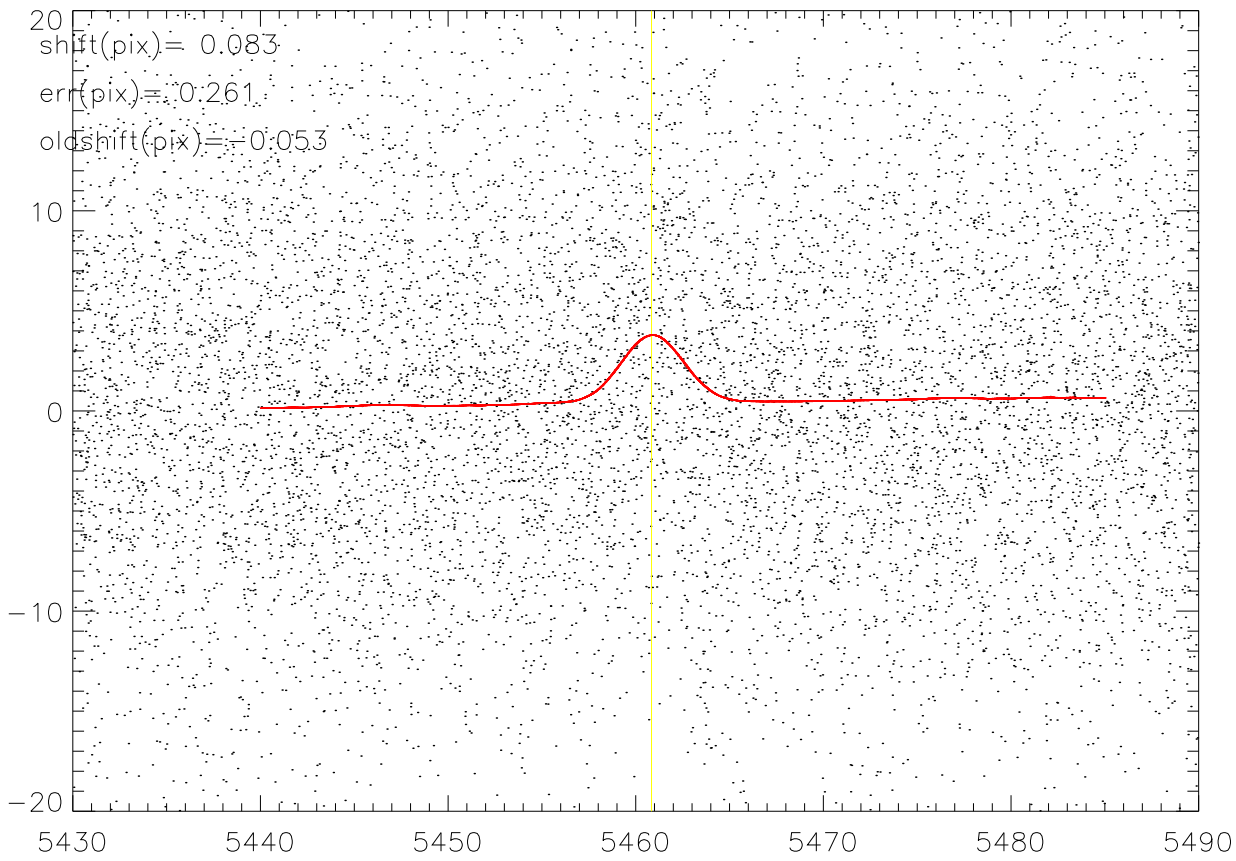

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047763.fit
Brightness [electrons/pix]
3
2
1
0
−1
4000
4500
5000
5500
6000
λ [A]
Error bars denote full range
Min value = -1.223
Max value = 1.699
Wed Apr 9 15:42:59 2008

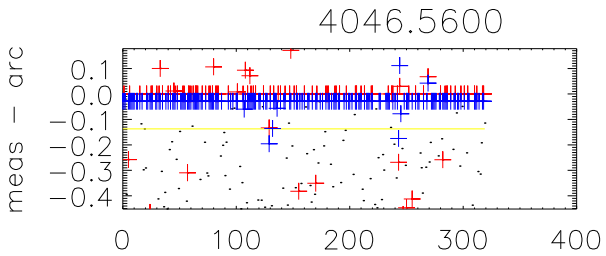

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b2-00047763.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

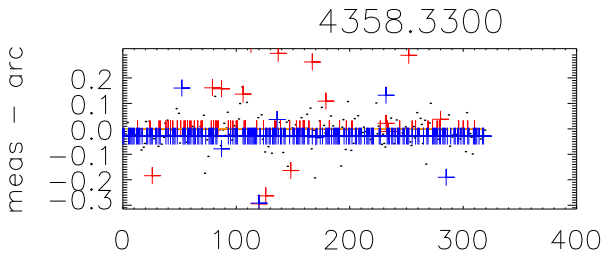

4046.5600
off: 0.31
sig: 0.373
4358.3300
off: −0.15
sig: 0.184
5460.9400
off: −0.05
sig: 0.129
5577.3390
off: −0.07
sig: 0.012
5889.9500
off: 0.09
sig: 0.070
5895.9240
off: −0.15
sig: 0.113

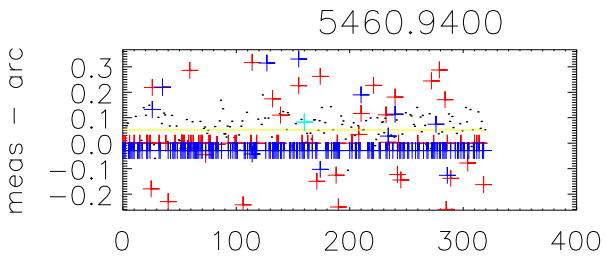

shift(pix)=−0.680
err(pix)= 0.678
oldshift(pix)= 0.309
20
10
0
−10
−20
4020
4030
4040
4050
4060
4070
4080

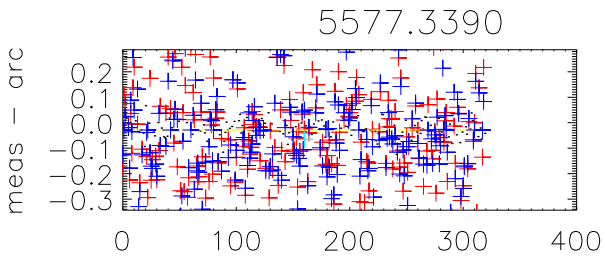

shift(pix)= 0.453
err(pix)= 0.388
oldshift(pix)=-0.152
20
10
0
−10
−20
4280
4300
4320
4340
4360
4380
4400
4420

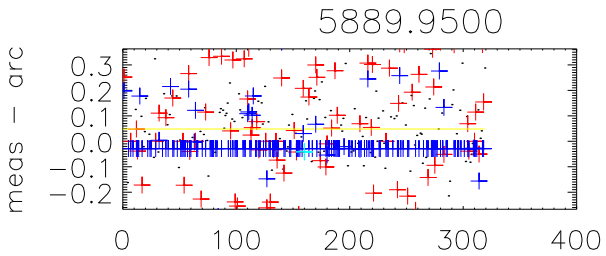

shift(pix)= 0.083
err(pix)= 0.261
oldshift(pix)=-0.053
20
10
0
−10
−20
5430
5440
5450
5460
5470
5480
5490

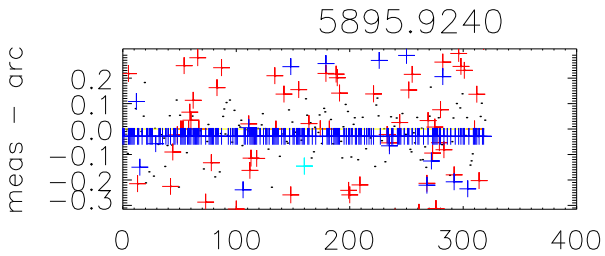

4046.5600
meas − arc
0.1
0.0
−0.1
−0.2
−0.3
−0.4
0
100
200
300
400

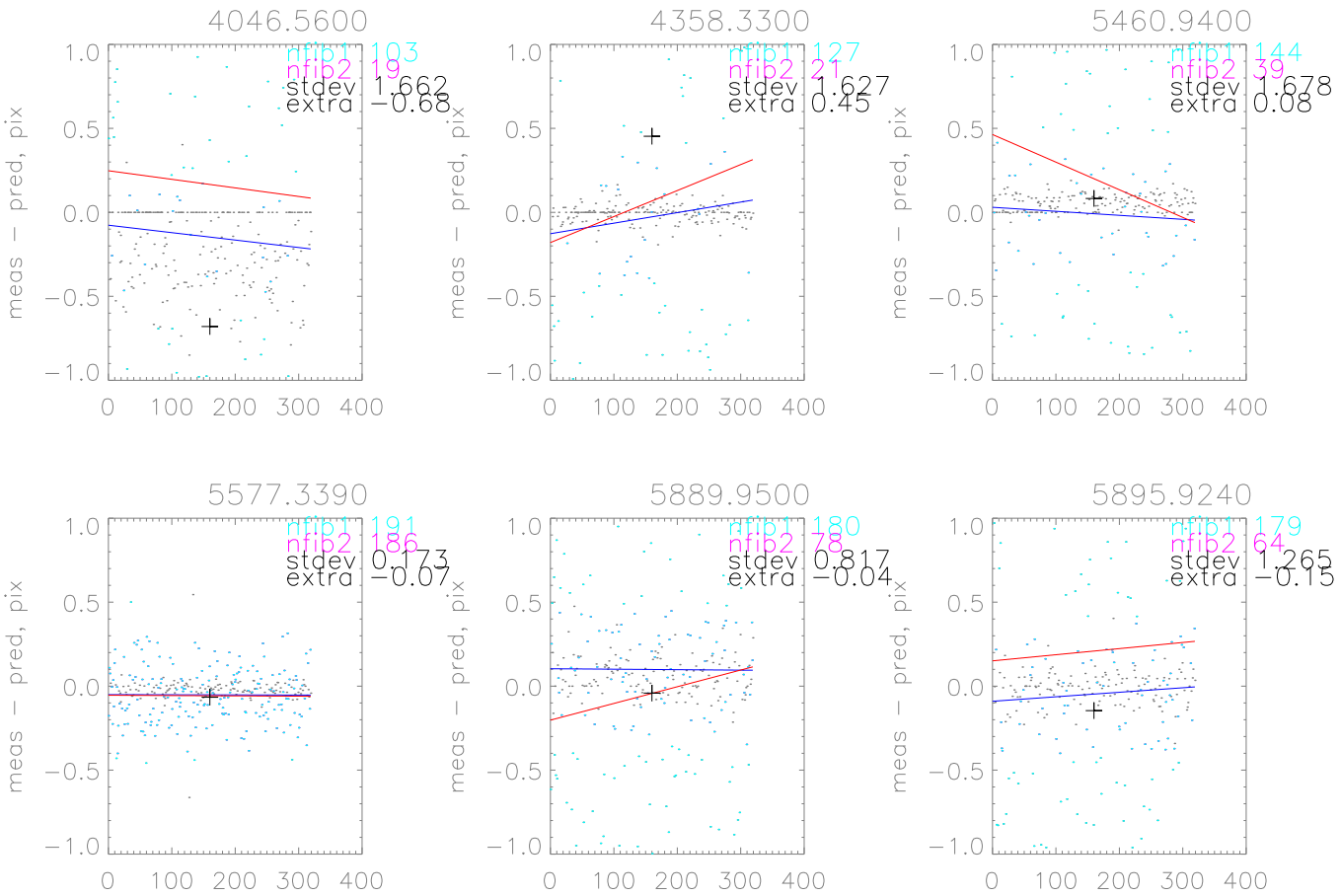

4358.3300
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

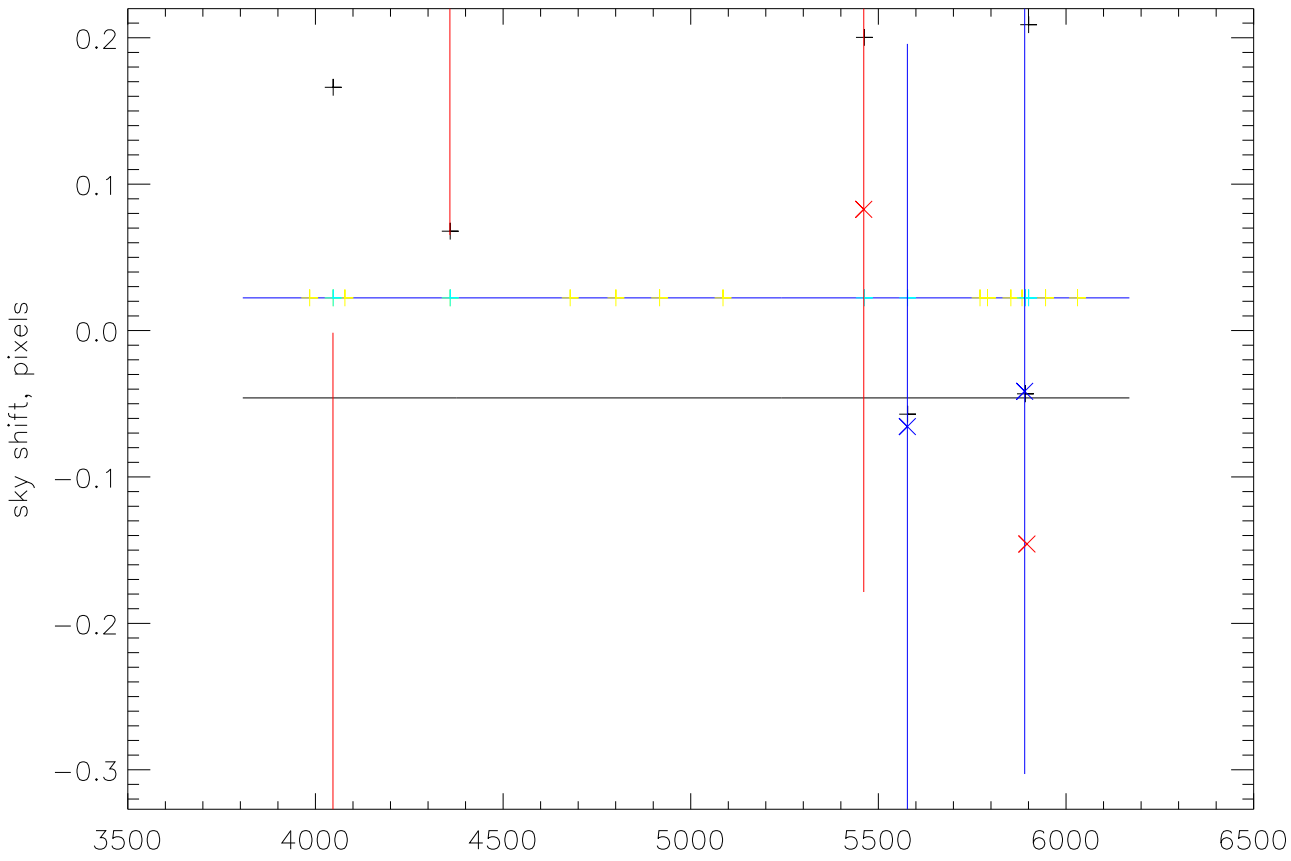

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

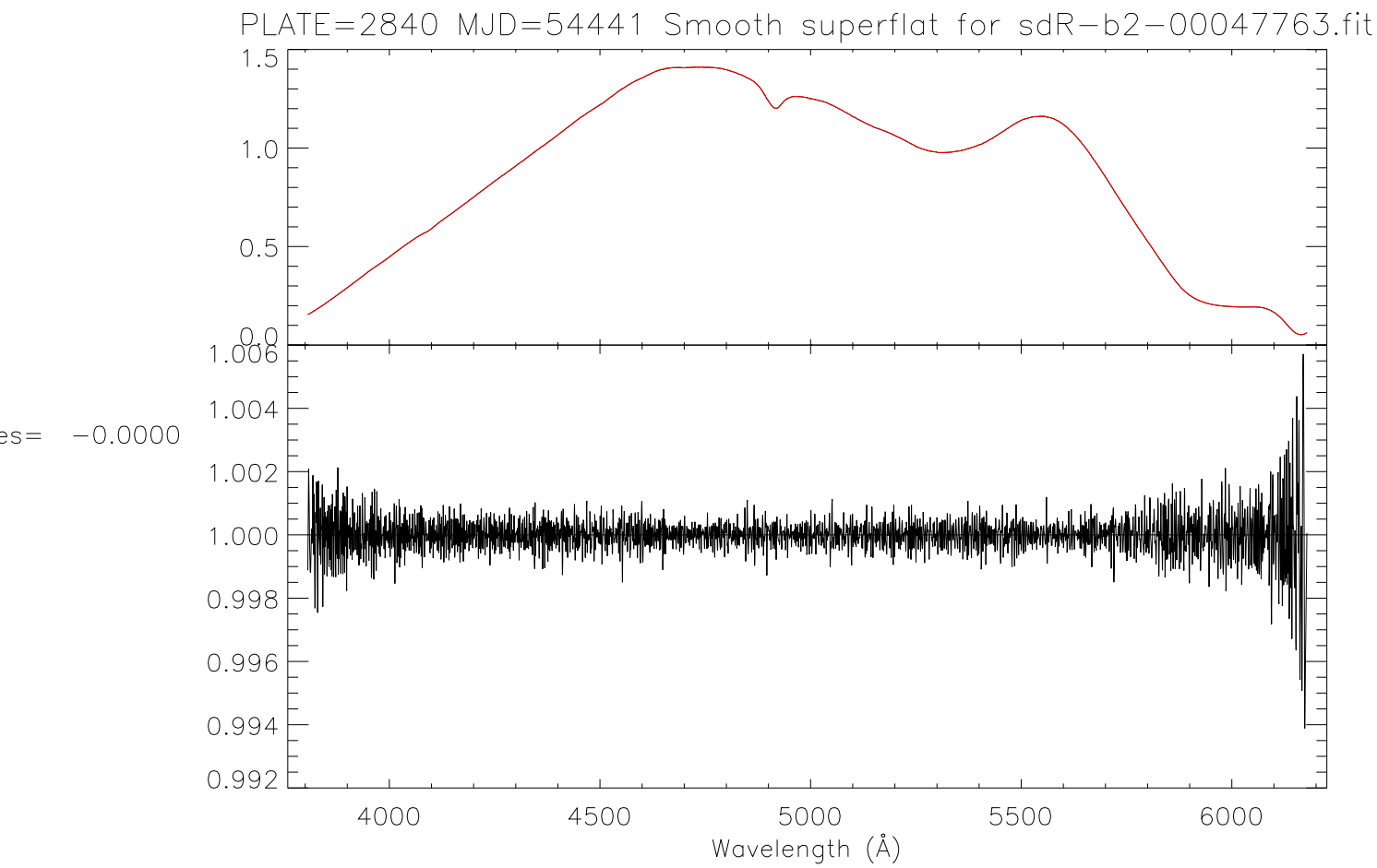

5577.3390
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400


5889.9500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

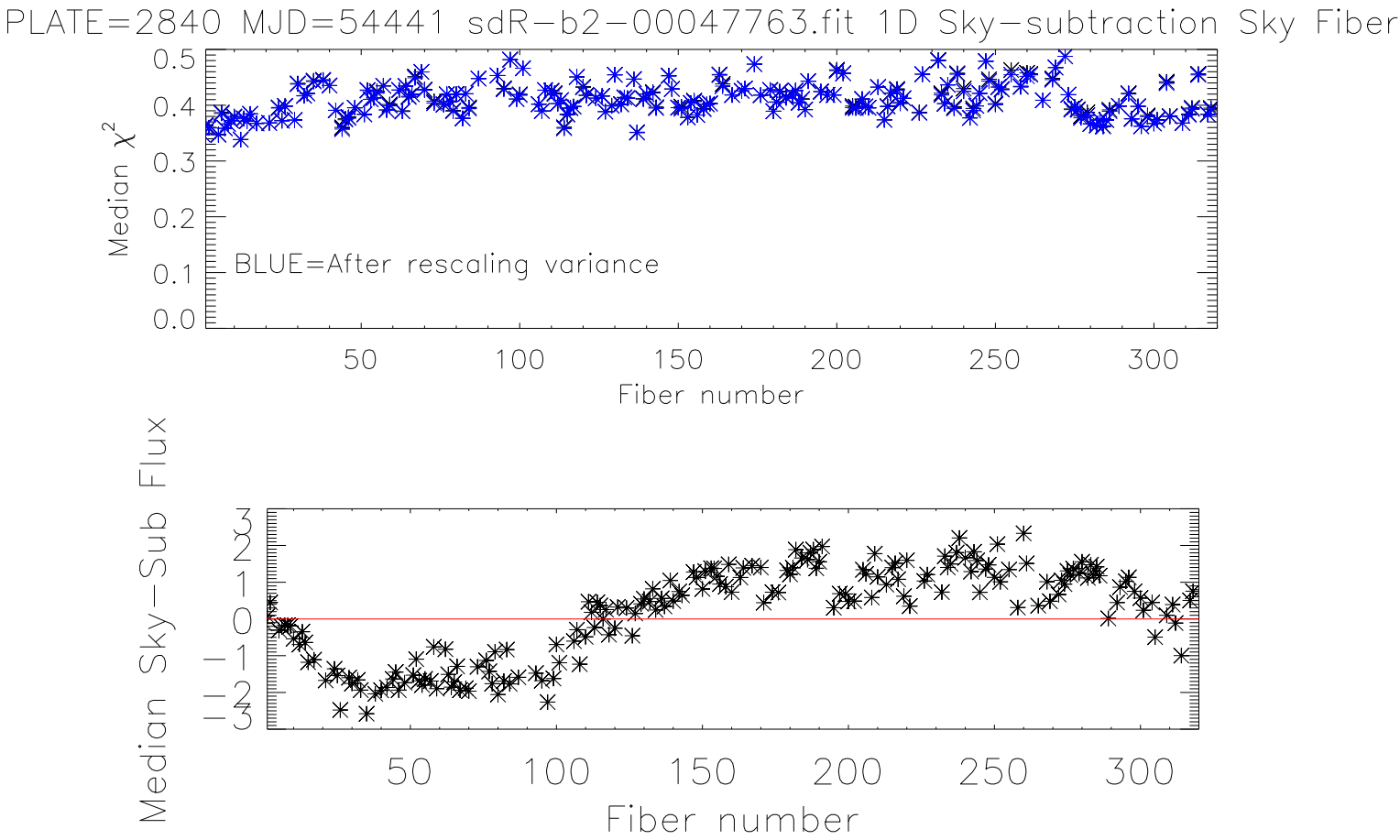

5895.9240
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

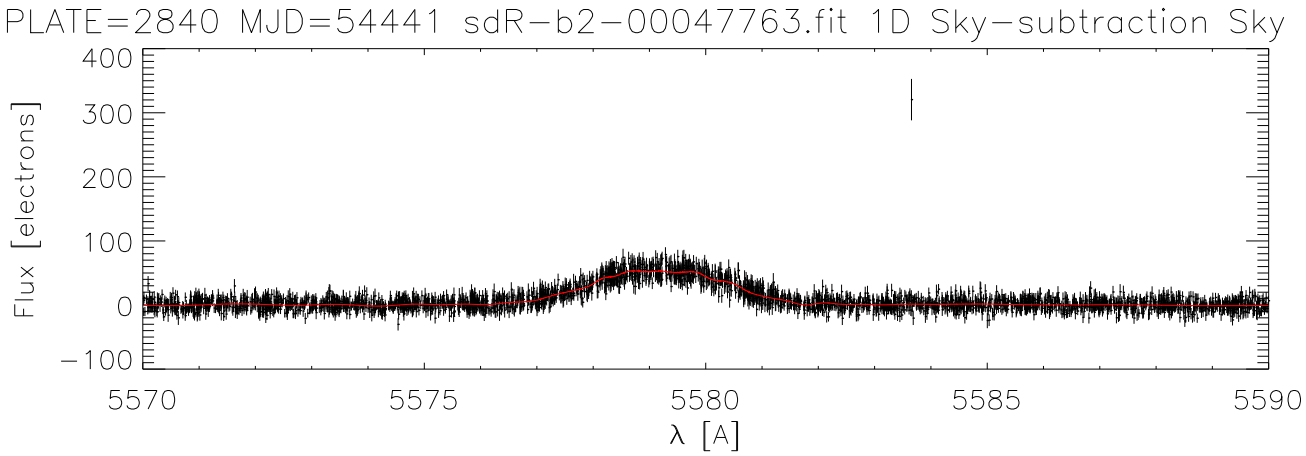

4046.5600
nfib1 103
nfib2 19
stdev 1.662
extra −0.68
4358.3300
nfib1 127
nfib2 21
stdev 1.627
extra 0.45
5460.9400
nfib1 144
nfib2 39
stdev 1.678
extra 0.08
5577.3390
nfib1 191
nfib2 186
stdev 0.173
extra −0.07
5889.9500
nfib1 180
nfib2 78
stdev 0.817
extra −0.04
5895.9240
nfib1 179
nfib2 164
stdev 1.265
extra −0.15
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0
100
200
300
400

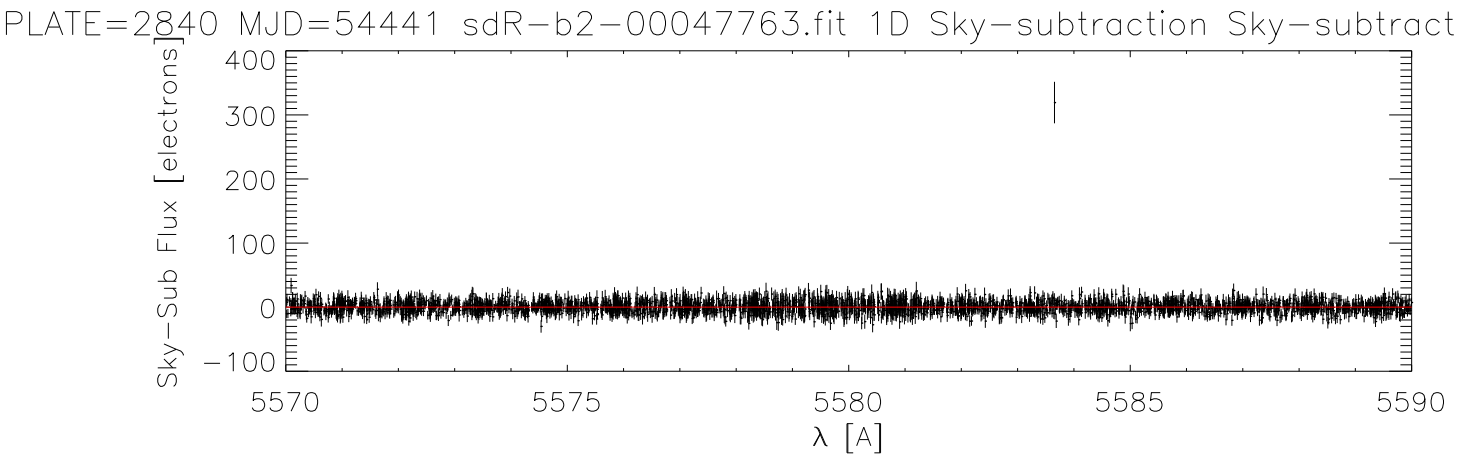

sky shift, pixels
0.2
0.1
0.0
−0.1
−0.2
−0.3
3500
4000
4500
5000
5500
6000
6500

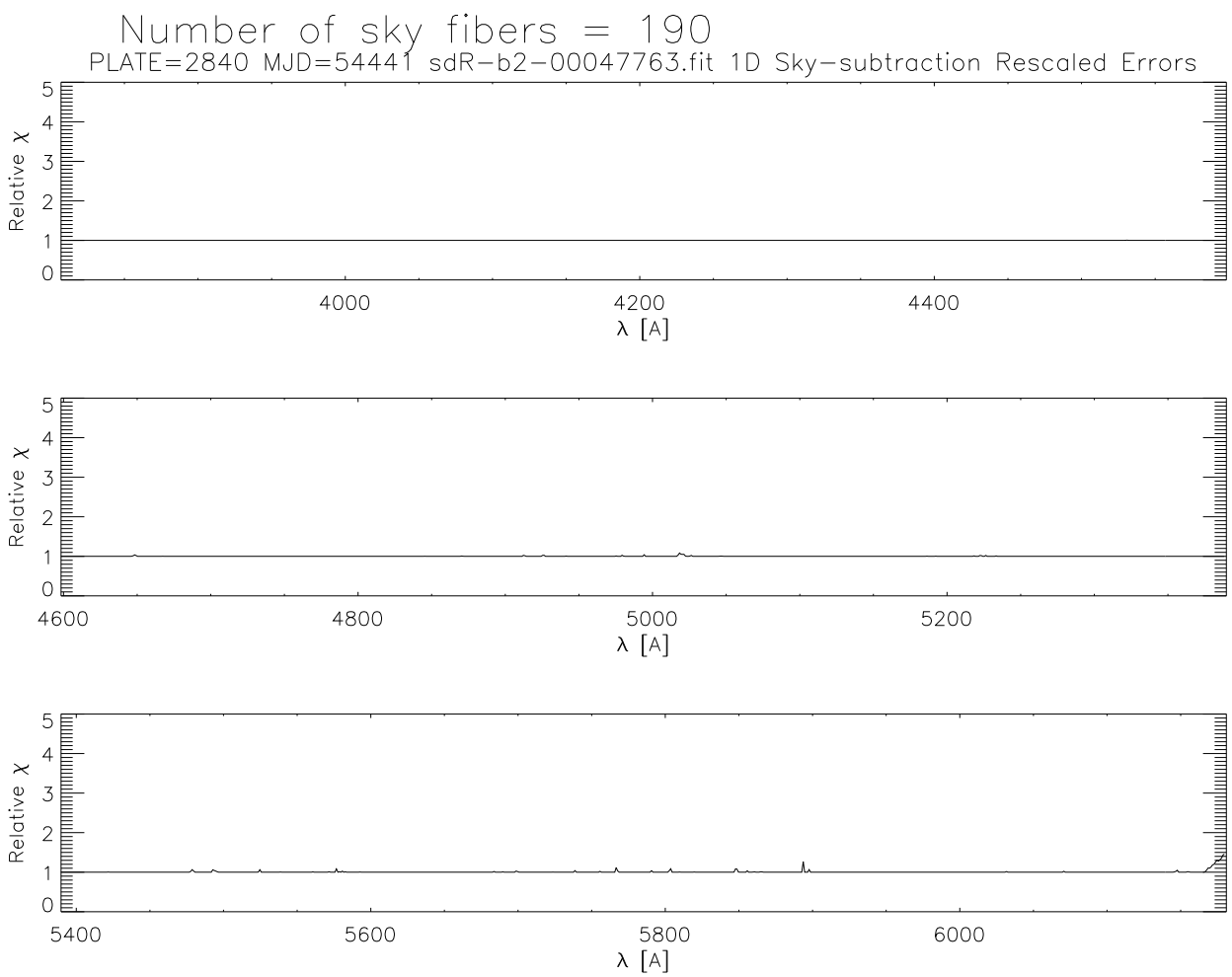

PLATE=2840 MJD=54441 Smooth superflat for sdR-b2-00047763.fit
1.5
1.0
0.5
0.0
1.006
1.004
1.002
1.000
0.998
0.996
0.994
0.992
4000
4500
5000
5500
6000
Wavelength (Å)

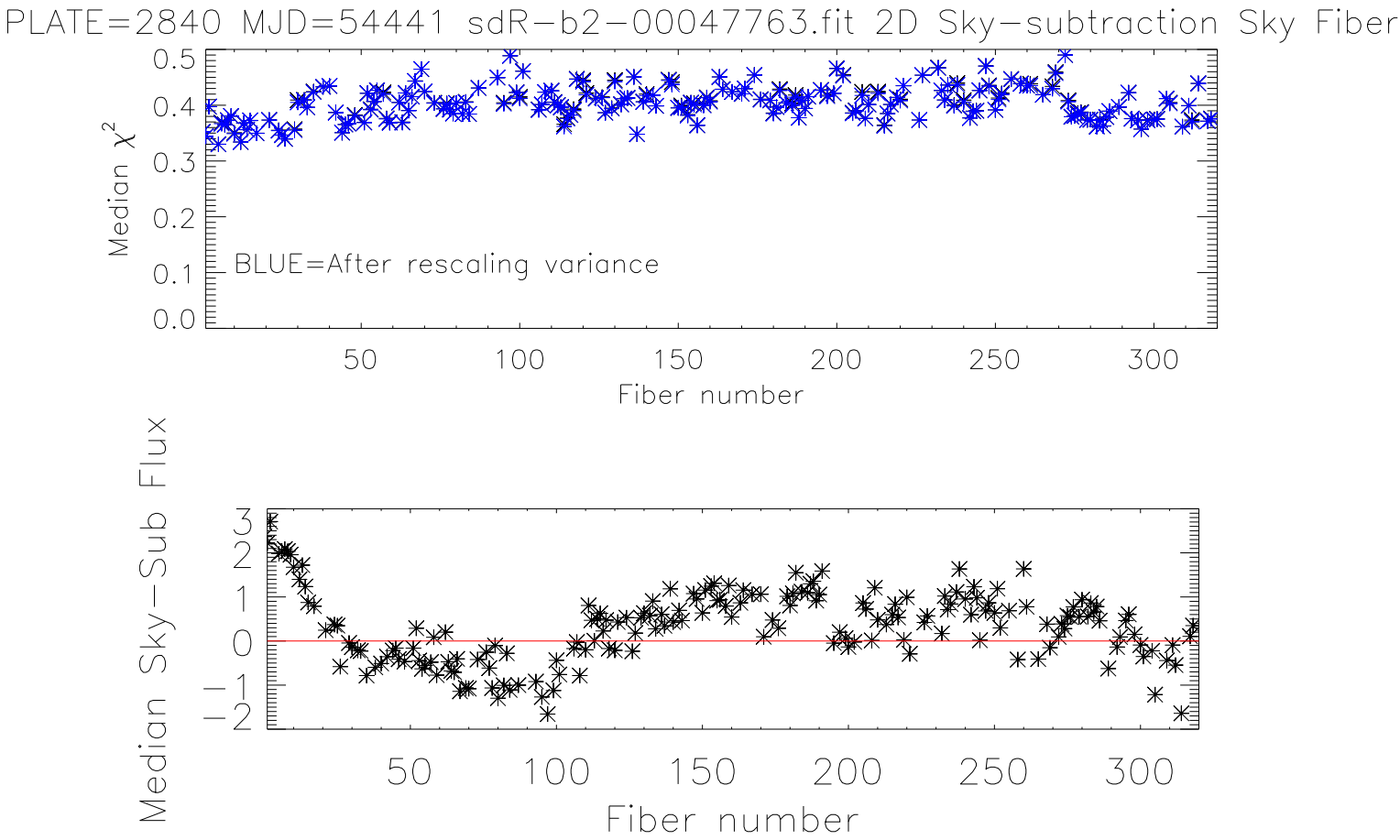
es= −0.0000

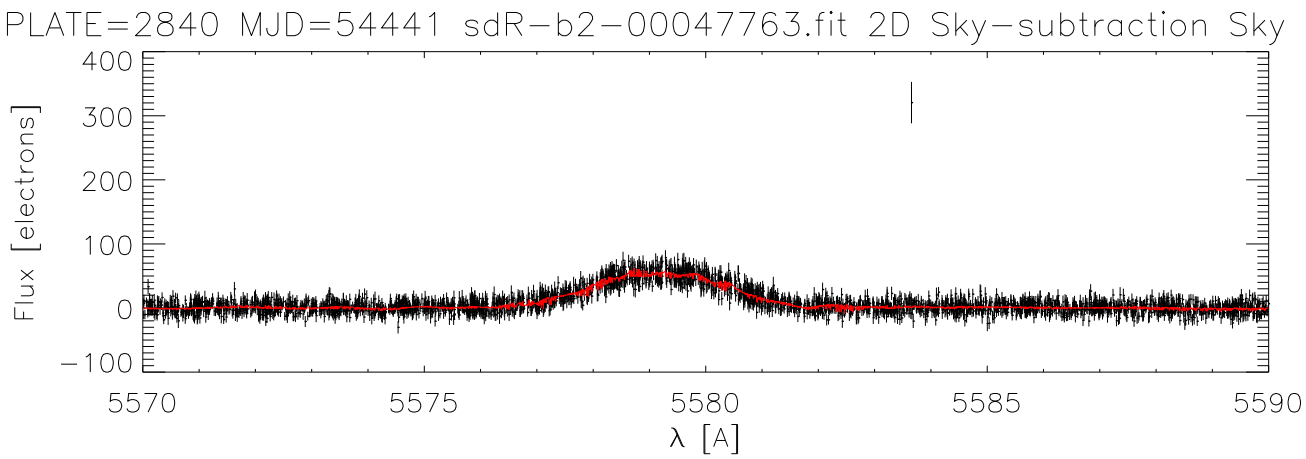

PLATE=2840 MJD=54441 sdR-b2-00047763.fit 1D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.1
0.2
0.3
0.4
0.5
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-3
-2
-1
0
1
2
3
50
100
150
200
250
300
Fiber number

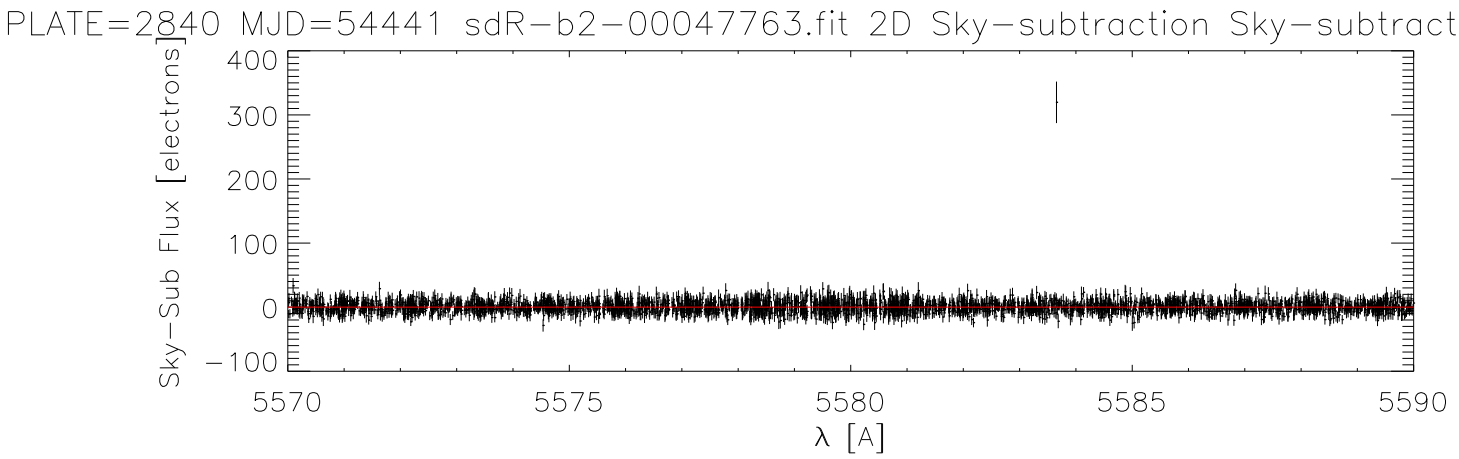

PLATE=2840 MJD=54441 sdR-b2-00047763.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
400
300
200
100
0
−100
5570
5575
5580
5585
5590
λ [A]

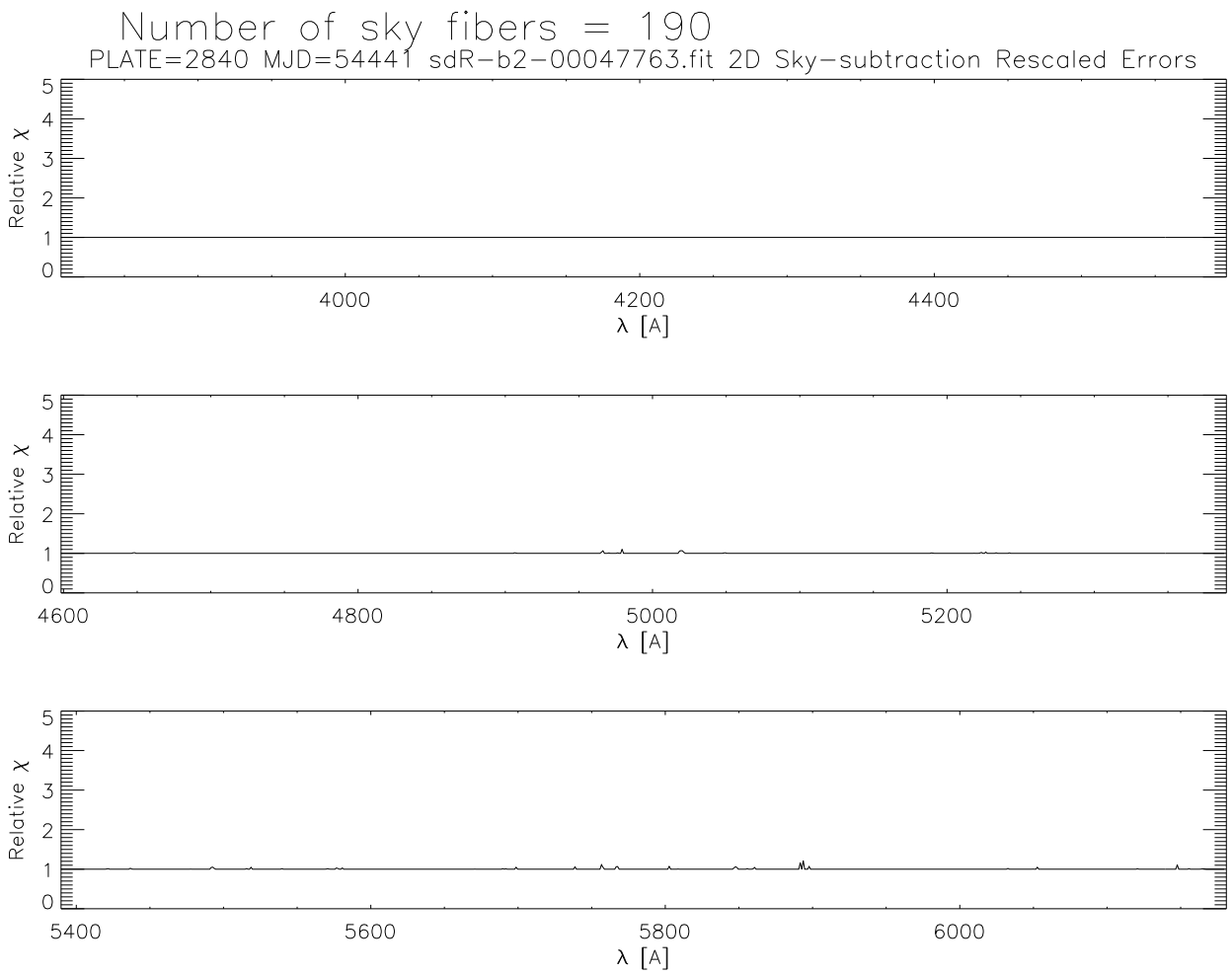

PLATE=2840 MJD=54441 sdR-b2-00047763.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
400
300
200
100
0
−100
5570
5575
5580
5585
5590
λ [A]

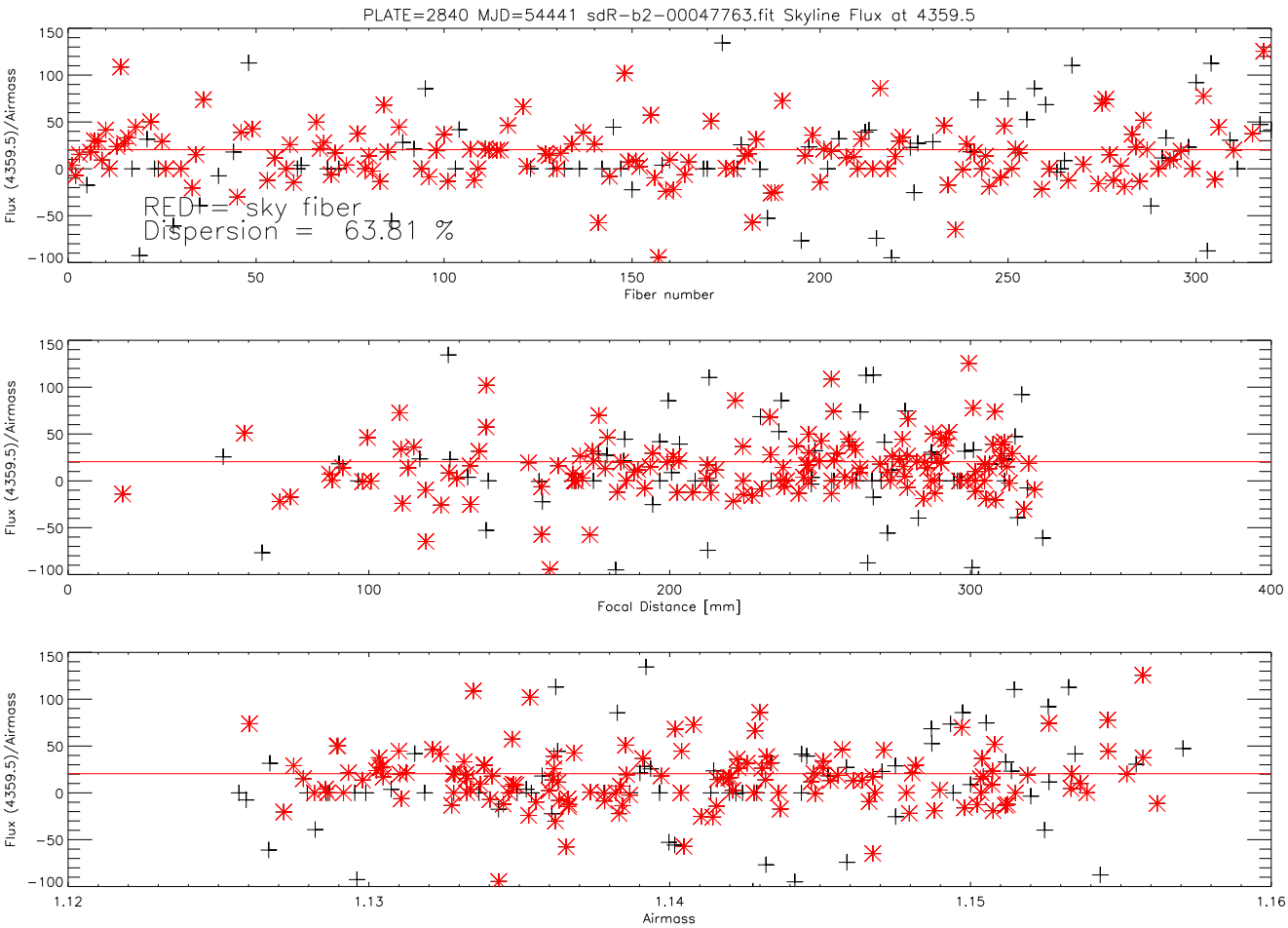

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047763.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

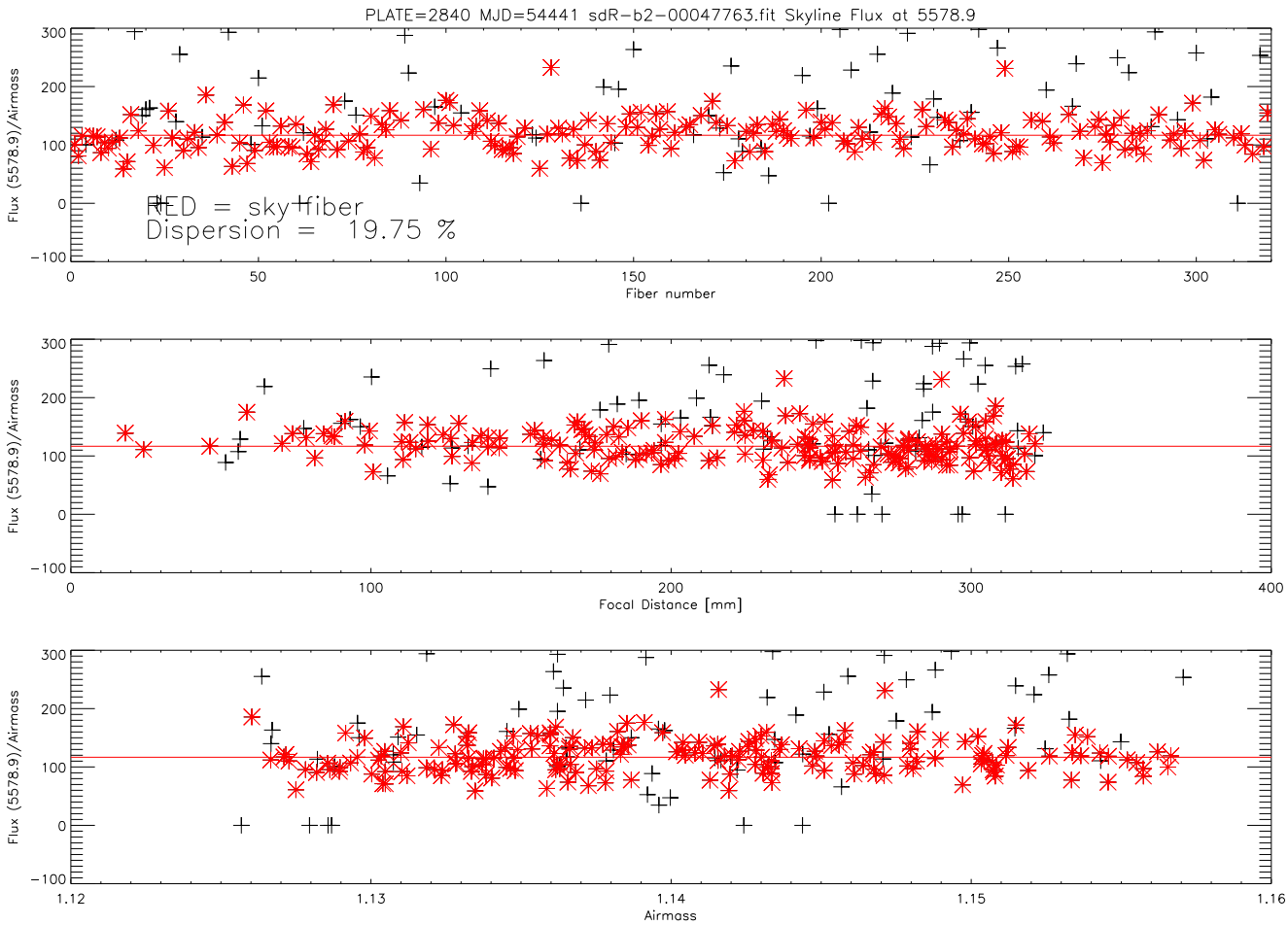

PLATE=2840 MJD=54441 sdR-b2-00047763.fit 2D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.1
0.2
0.3
0.4
0.5
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-2
-1
0
1
2
3
50
100
150
200
250
300
Fiber number

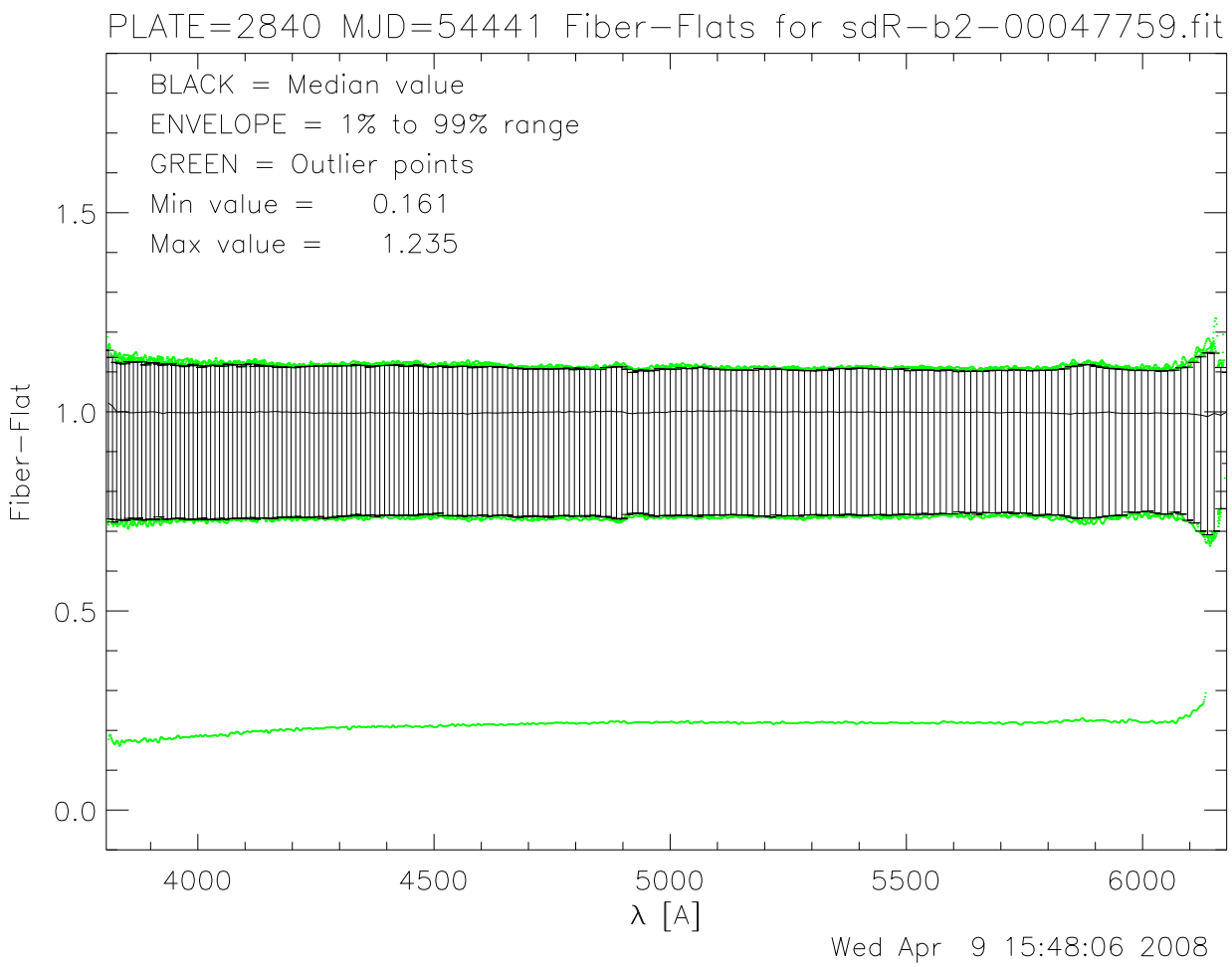

PLATE=2840 MJD=54441 sdR-b2-00047763.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
400
300
200
100
0
−100
5570
5575
5580
5585
5590
λ [A]

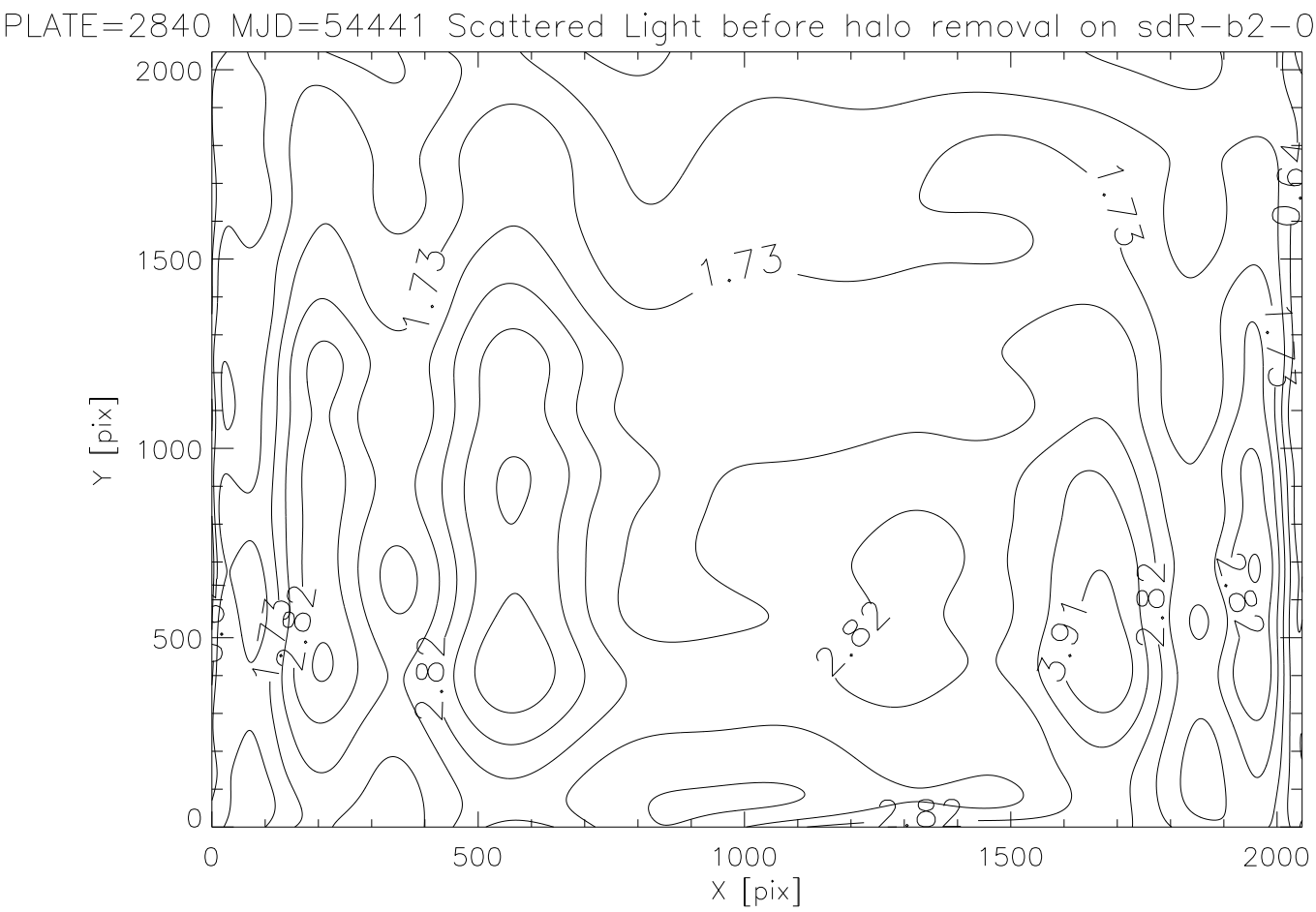

PLATE=2840 MJD=54441 sdR-b2-00047763.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
400
300
200
100
0
−100
5570
5575
5580
5585
5590
λ [A]

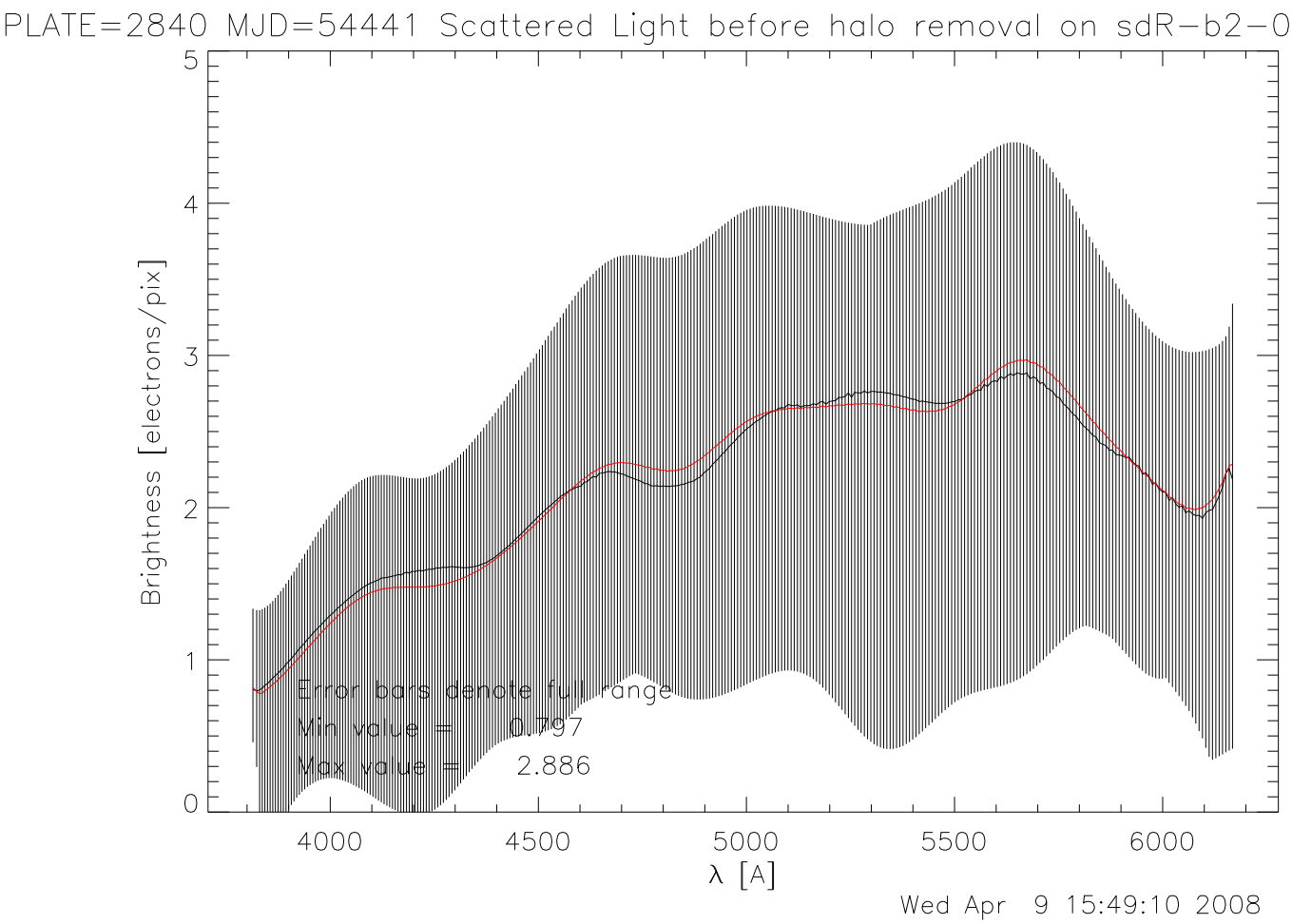

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047763.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000
0
1
2
3
4
5

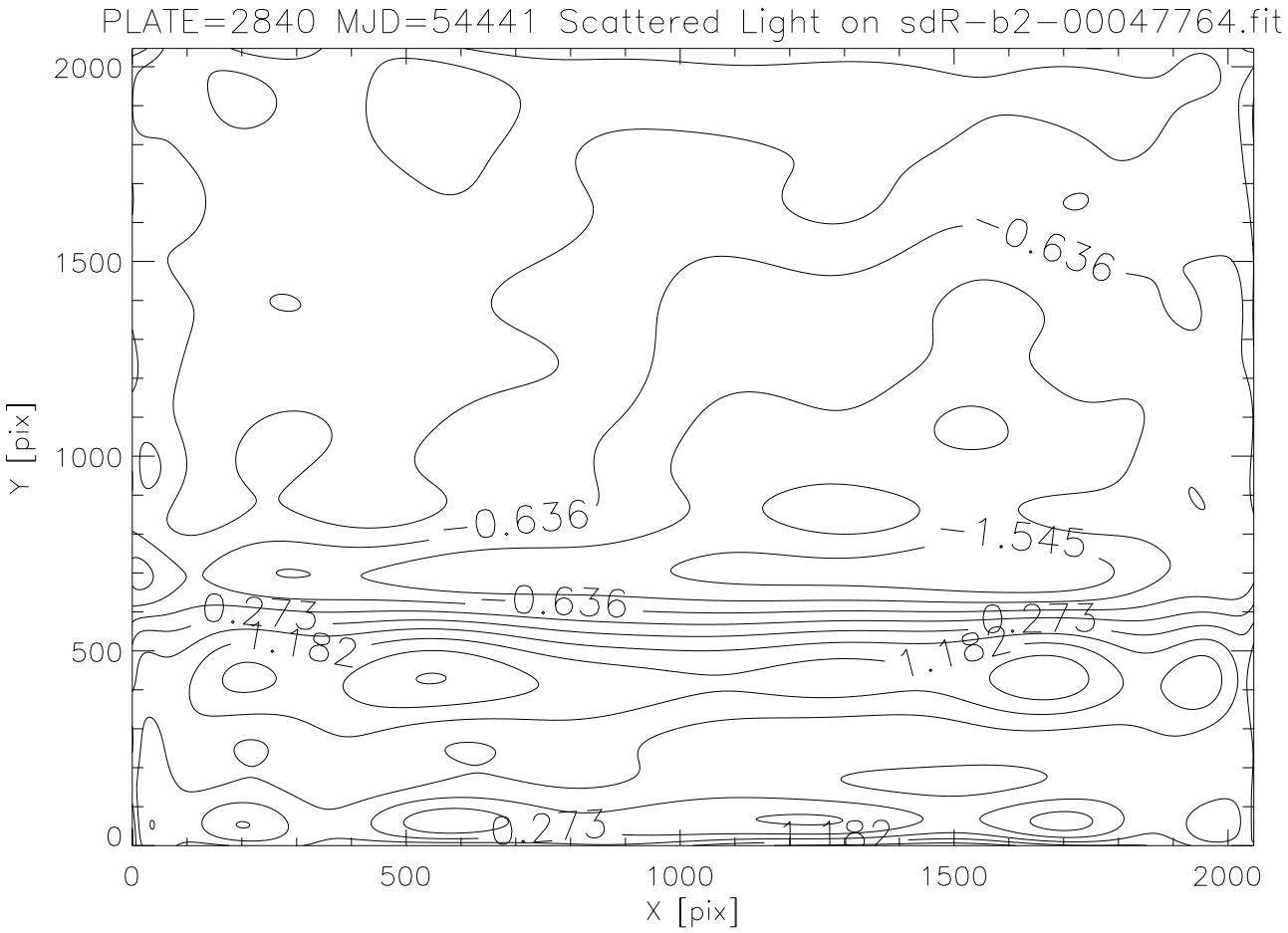

PLATE=2840 MJD=54441 sdR-b2-00047763.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
Fiber number
RED= sky fiber
Dispersion = 63.81 %
Flux (4359.5)/Airmass
Focal Distance [mm]
Flux (4359.5)/Airmass
Airmass

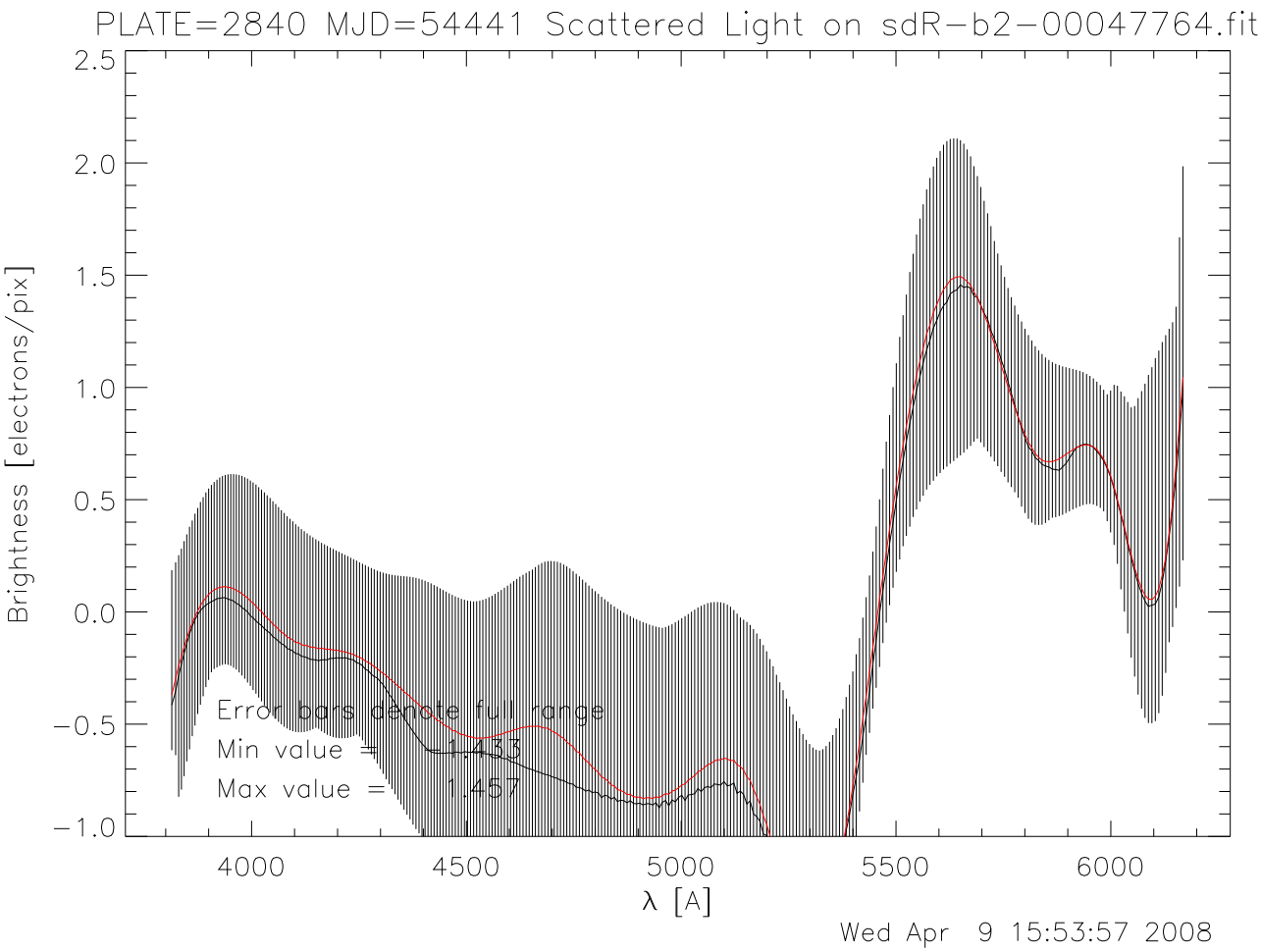

PLATE=2840 MJD=54441 sdR-b2-00047763.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
RED = sky fiber
Dispersion = 19.75 %
Fiber number
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

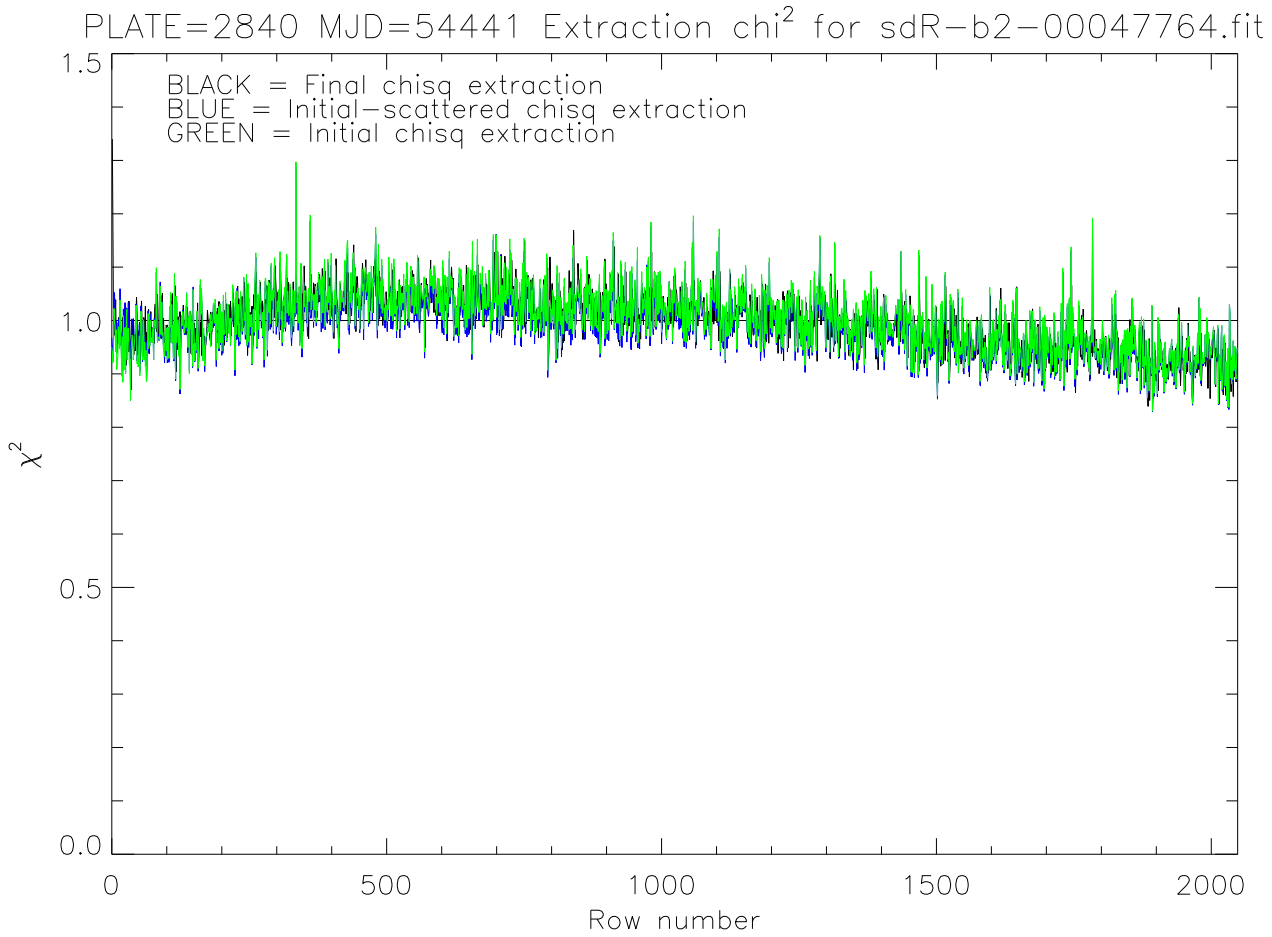

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b2-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.161
Max value = 1.235
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 15:48:06 2008

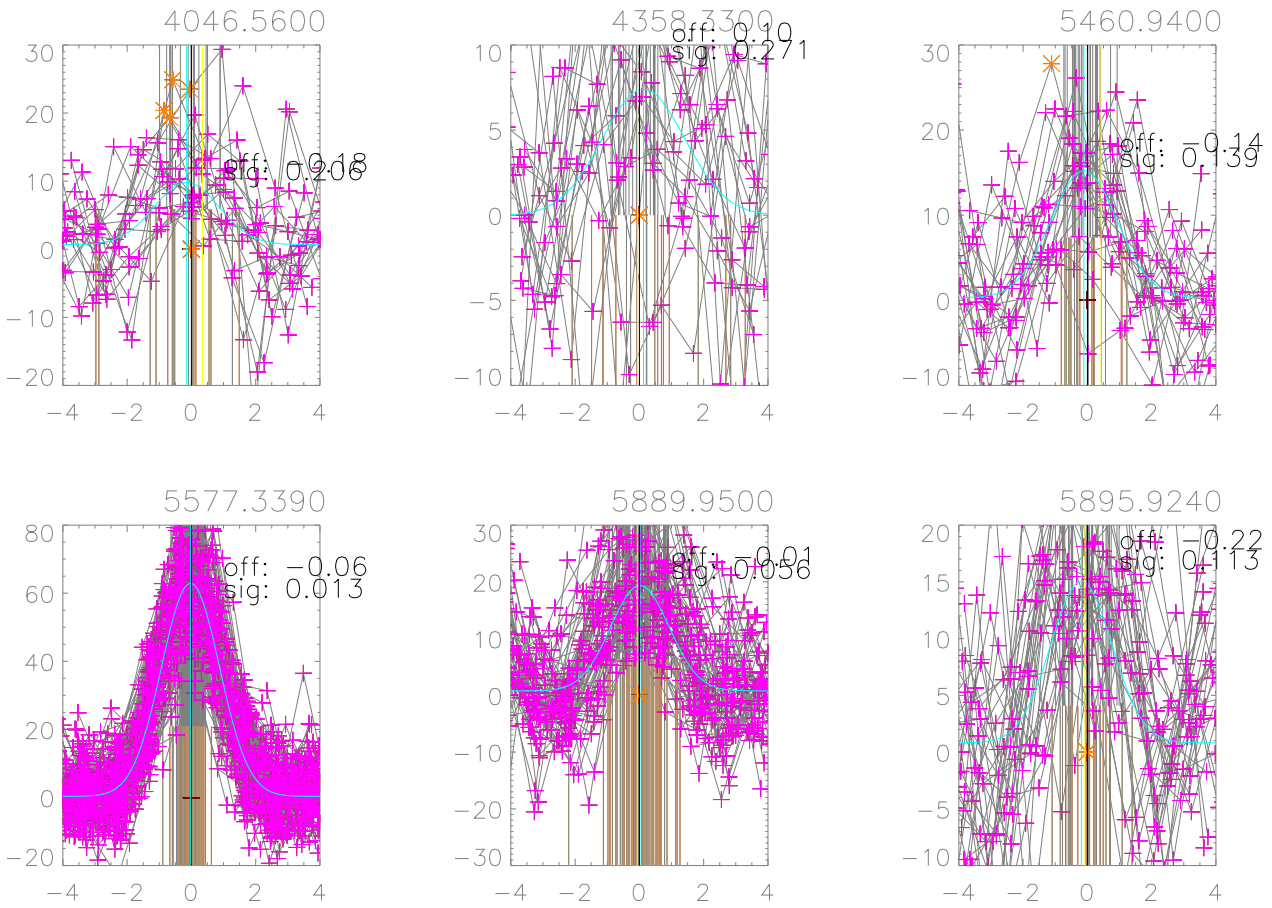

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047764.f
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
1.73
1.73
1.73
1.73
2.82
2.82
2.82
2.82
2.82
3.91
3.91

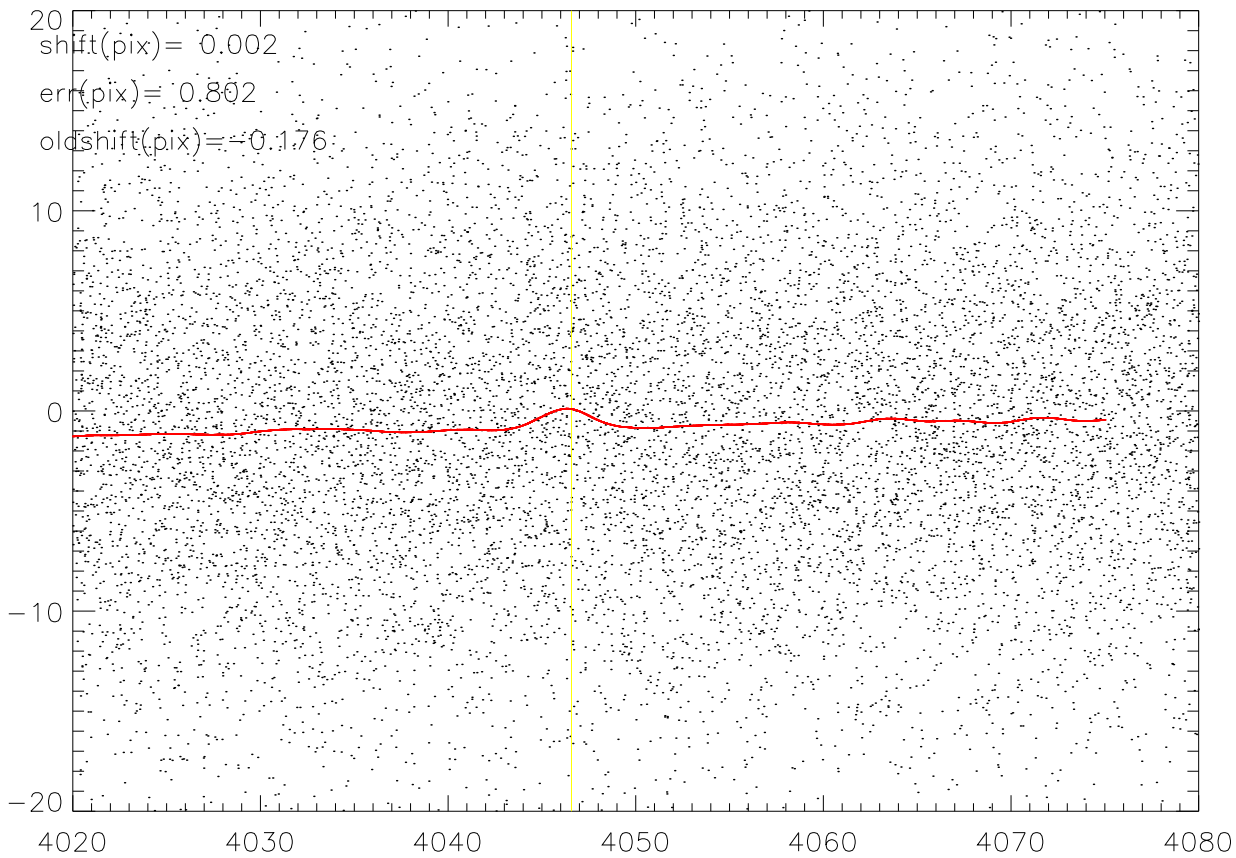

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047764.f
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.797
Max value = 2.886
Wed Apr 9 15:49:10 2008

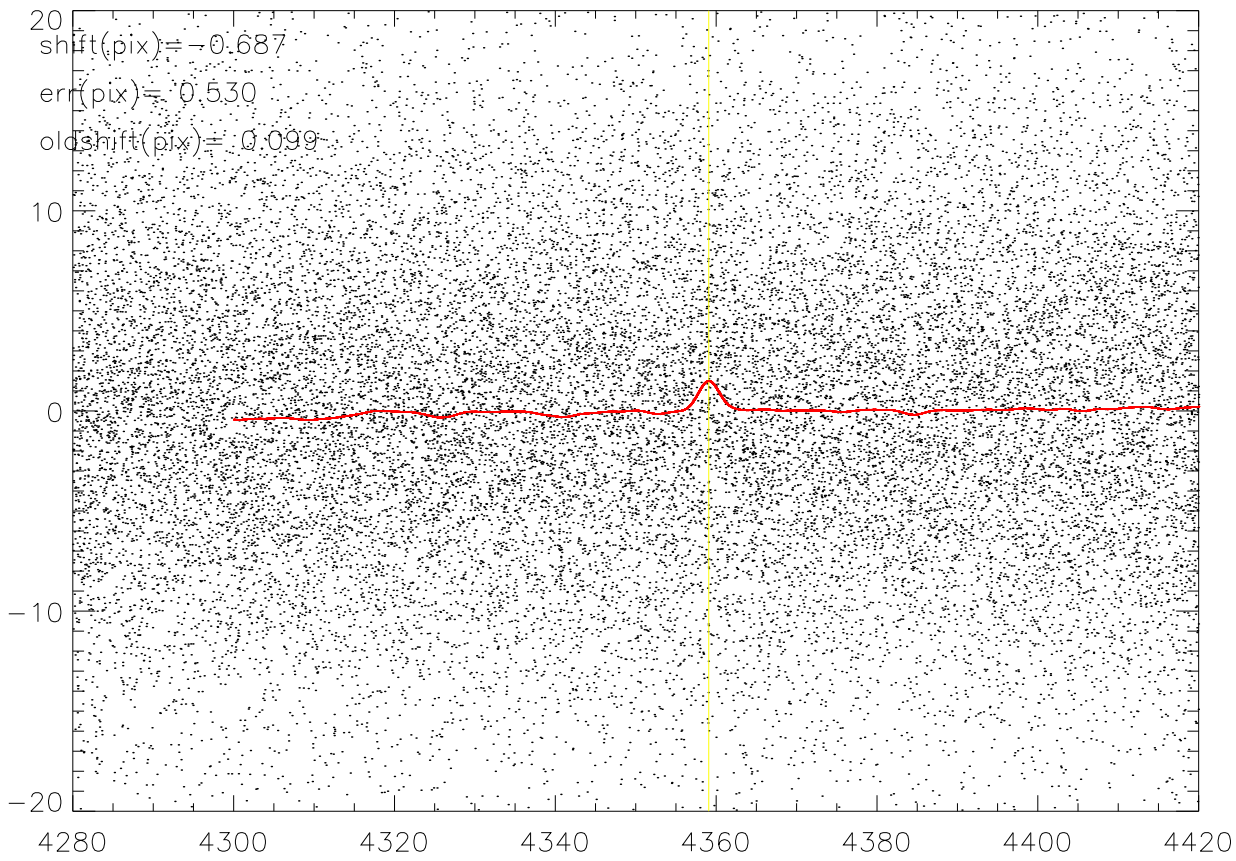

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047764.fit
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
-0.636
-0.636
-1.545
-0.636
0.273
1.182
0.273
1.182
0.273
1.182

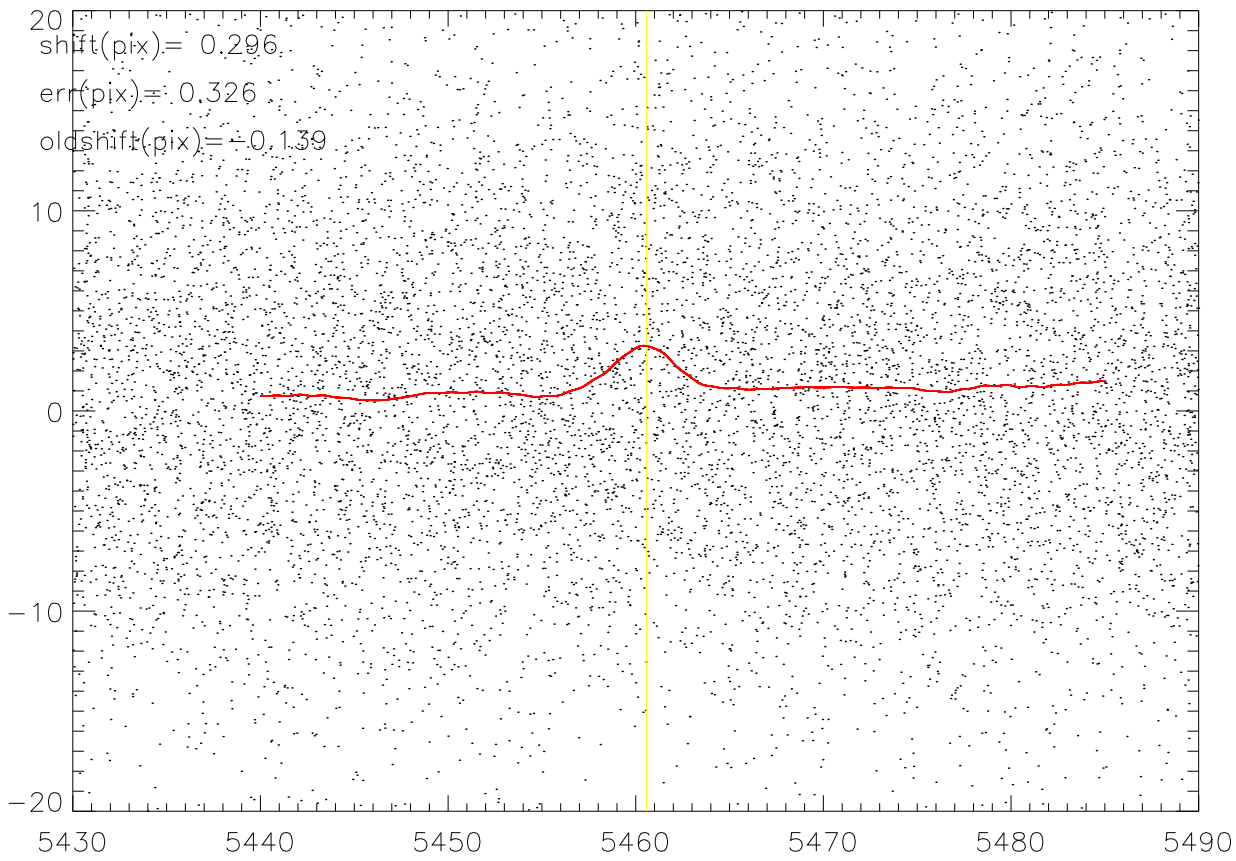

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047764.fit
Brightness [electrons/pix]
2.5
2.0
1.5
1.0
0.5
0.0
−0.5
−1.0
4000
4500
5000
5500
6000
λ [A]
Error bars denote full range
Min value = -1.433
Max value = 1.457
Wed Apr 9 15:53:57 2008

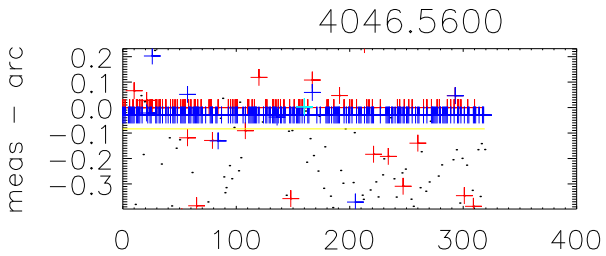

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b2-00047764.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

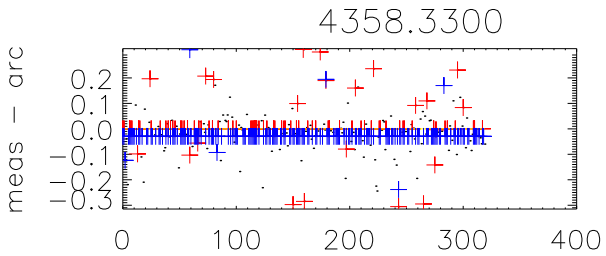

4046.5600
off: −0.18
sig: 0.206
4358.3300
off: 0.10
sig: 0.271
5460.9400
off: −0.14
sig: 0.139
5577.3390
off: −0.06
sig: 0.013
5889.9500
off: −0.01
sig: 0.056
5895.9240
off: −0.22
sig: 0.113

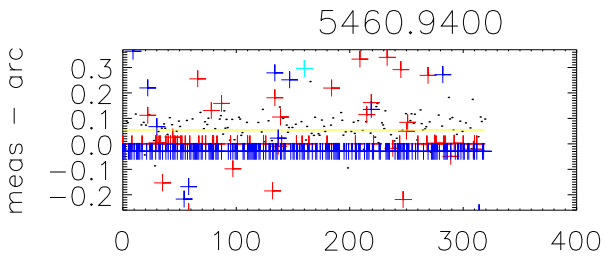

shift(pix)= 0.002
err(pix)= 0.802
oldshift(pix)= -0.176
20
10
0
−10
−20
4020
4030
4040
4050
4060
4070
4080

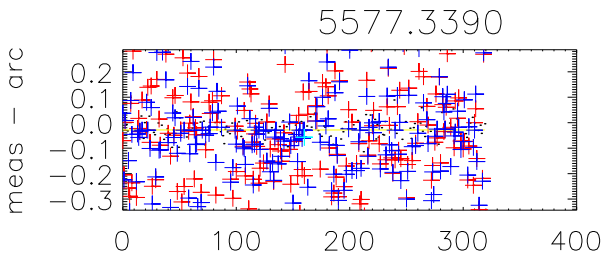

shift(pix)=−0.687
err(pix)= 0.530
oldshift(pix)= 0.099
20
10
0
−10
−20
4280
4300
4320
4340
4360
4380
4400
4420

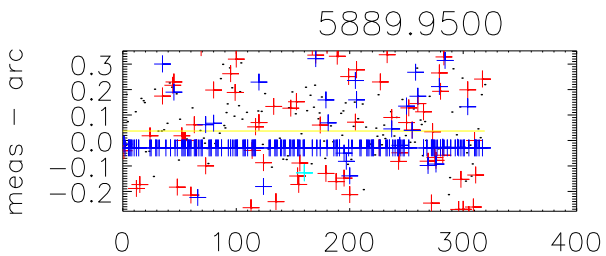

shift(pix)= 0.296
err(pix)= 0.326
oldshift(pix)= -0.139
20
10
0
−10
−20
5430
5440
5450
5460
5470
5480
5490

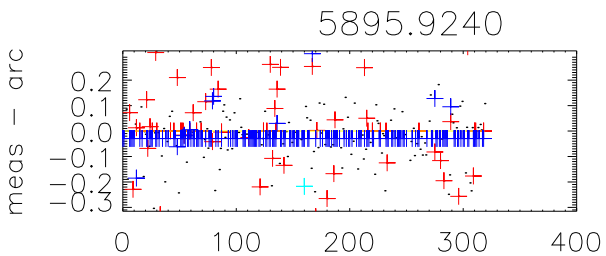

4046.5600
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

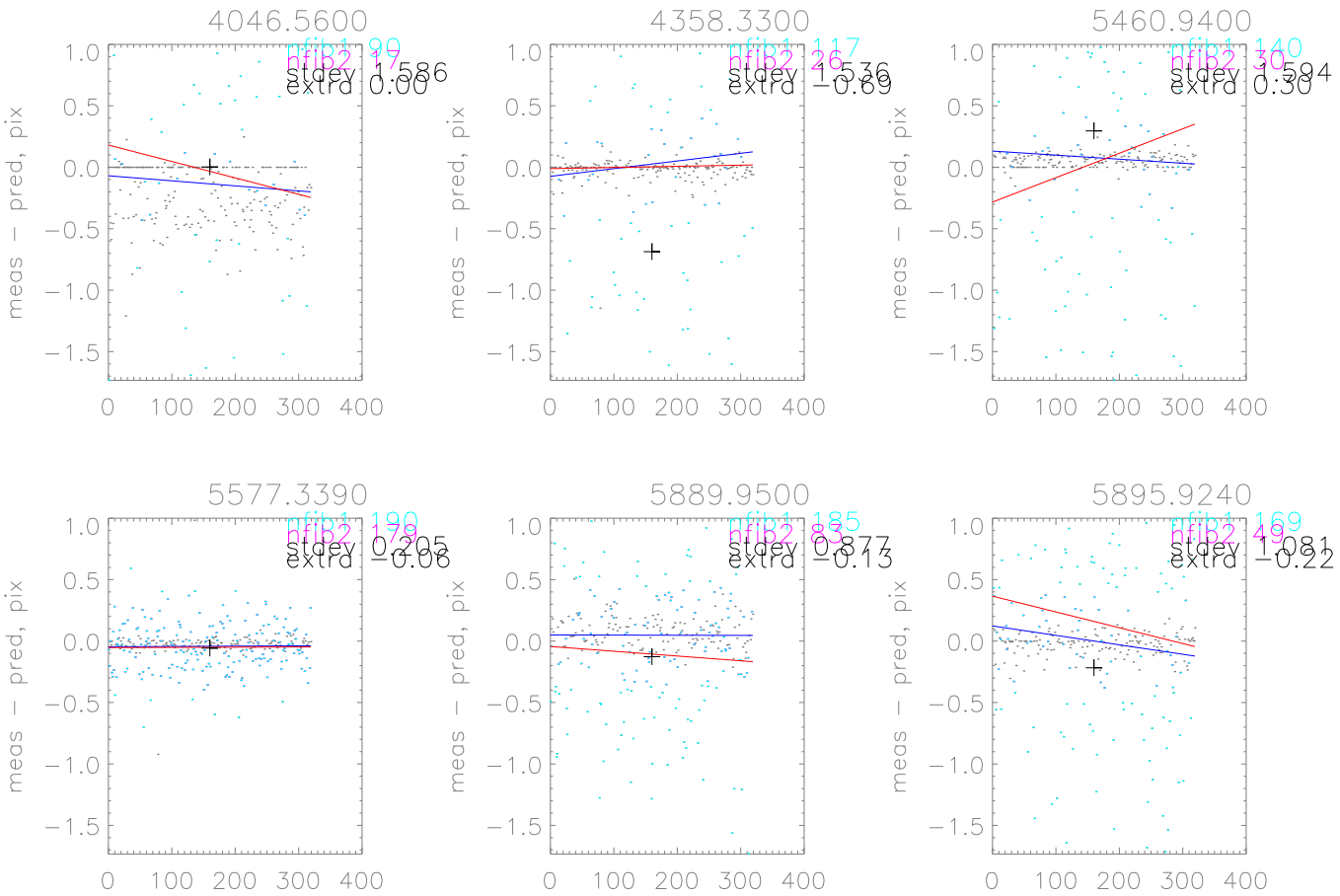

4358.3300
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

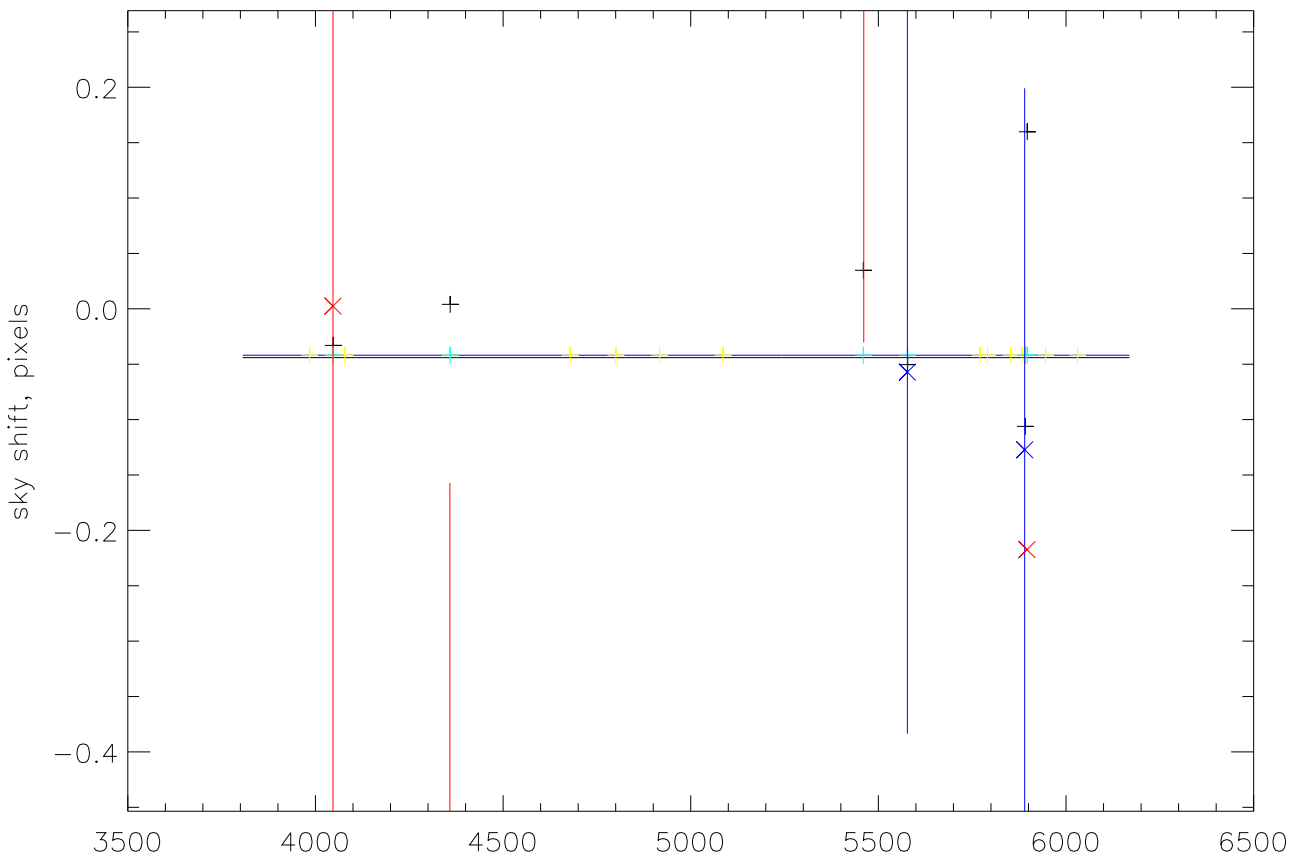

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

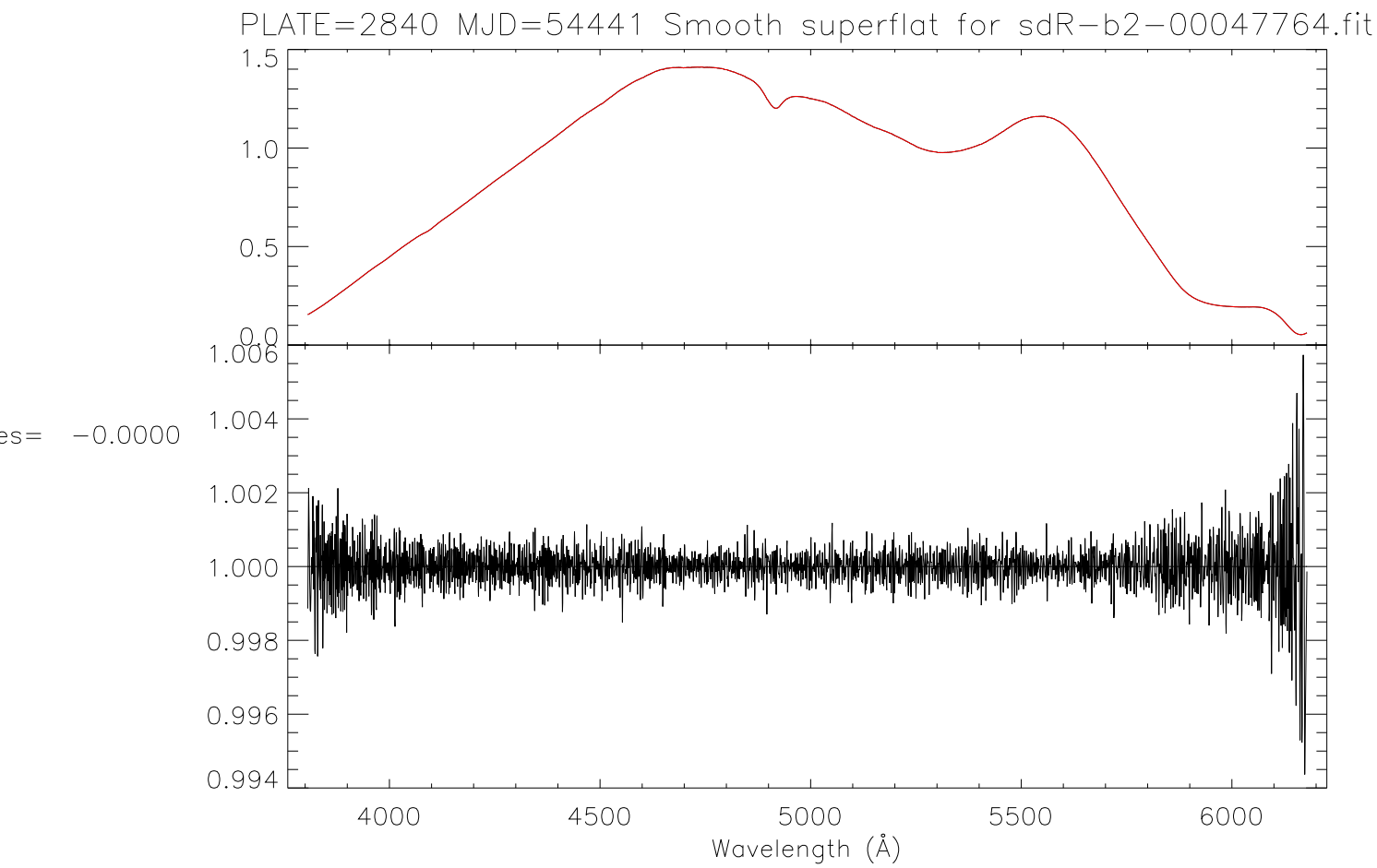

5577.3390
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400


5889.9500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

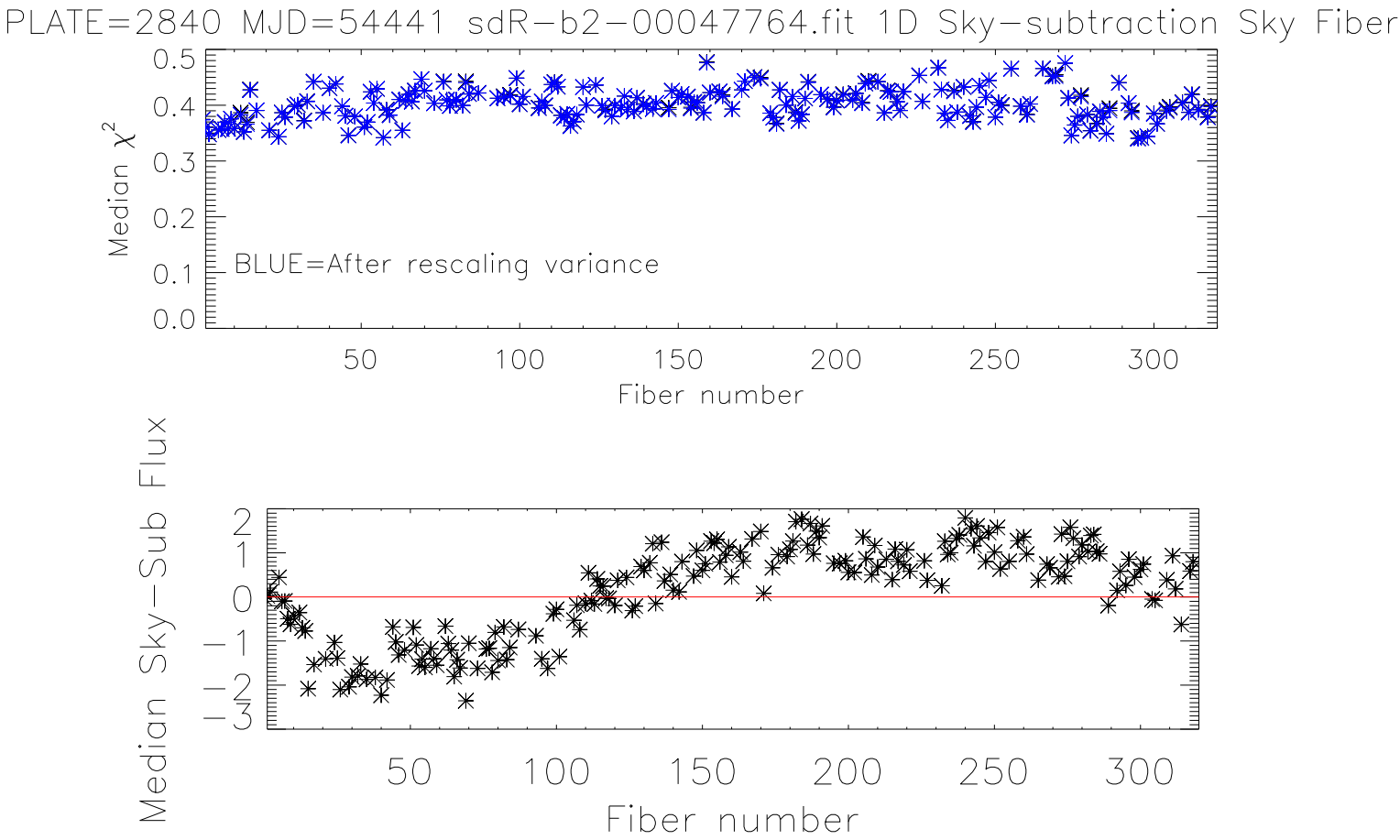

5895.9240
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

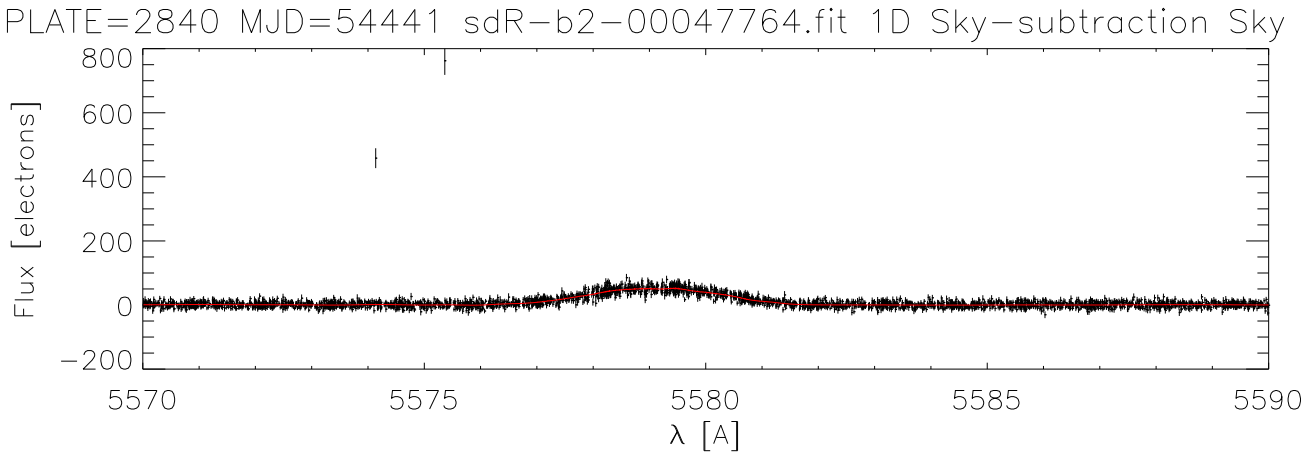

4046.5600
nfib1 90
nfib2 17
stdev 1.586
extrd 0.00
4358.3300
nfib1 117
nfib2 26
stdev 1.536
extrd −0.69
5460.9400
nfib1 140
nfib2 30
stdev 1.594
extrd 0.30
5577.3390
nfib1 190
nfib2 179
stdev 0.205
extrd −0.06
5889.9500
nfib1 185
nfib2 83
stdev 0.877
extrd −0.13
5895.9240
nfib1 169
nfib2 49
stdev 1.081
extrd −0.22
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
−1.5
0
100
200
300
400

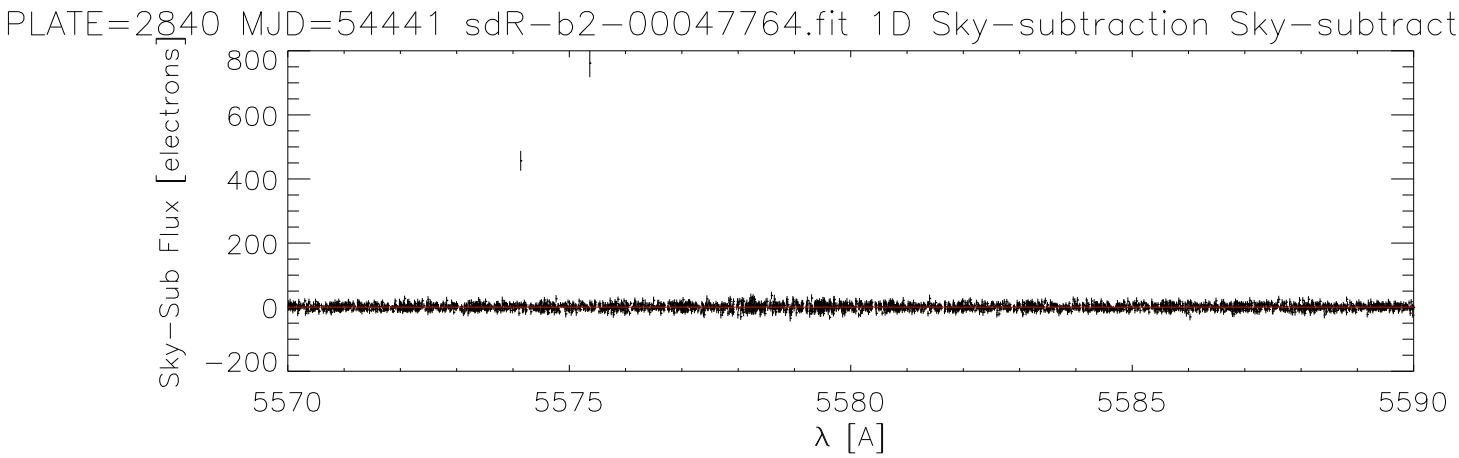

sky shift, pixels
0.2
0.0
−0.2
−0.4
3500
4000
4500
5000
5500
6000
6500

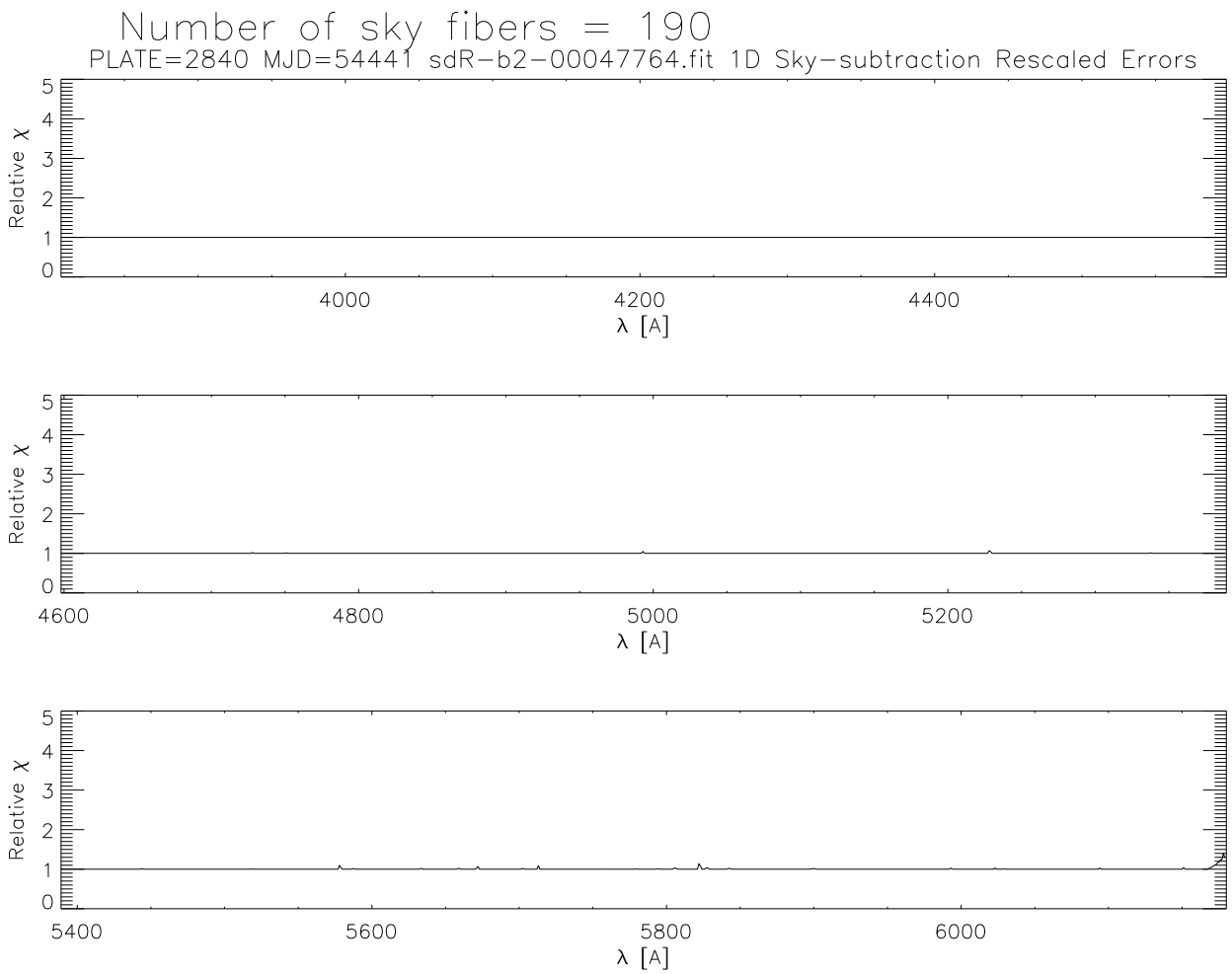

PLATE=2840 MJD=54441 Smooth superflat for sdR-b2-00047764.fit
1.5
1.0
0.5
0.0
1.006
1.004
1.002
1.000
0.998
0.996
0.994
4000
4500
5000
5500
6000
Wavelength (Å)

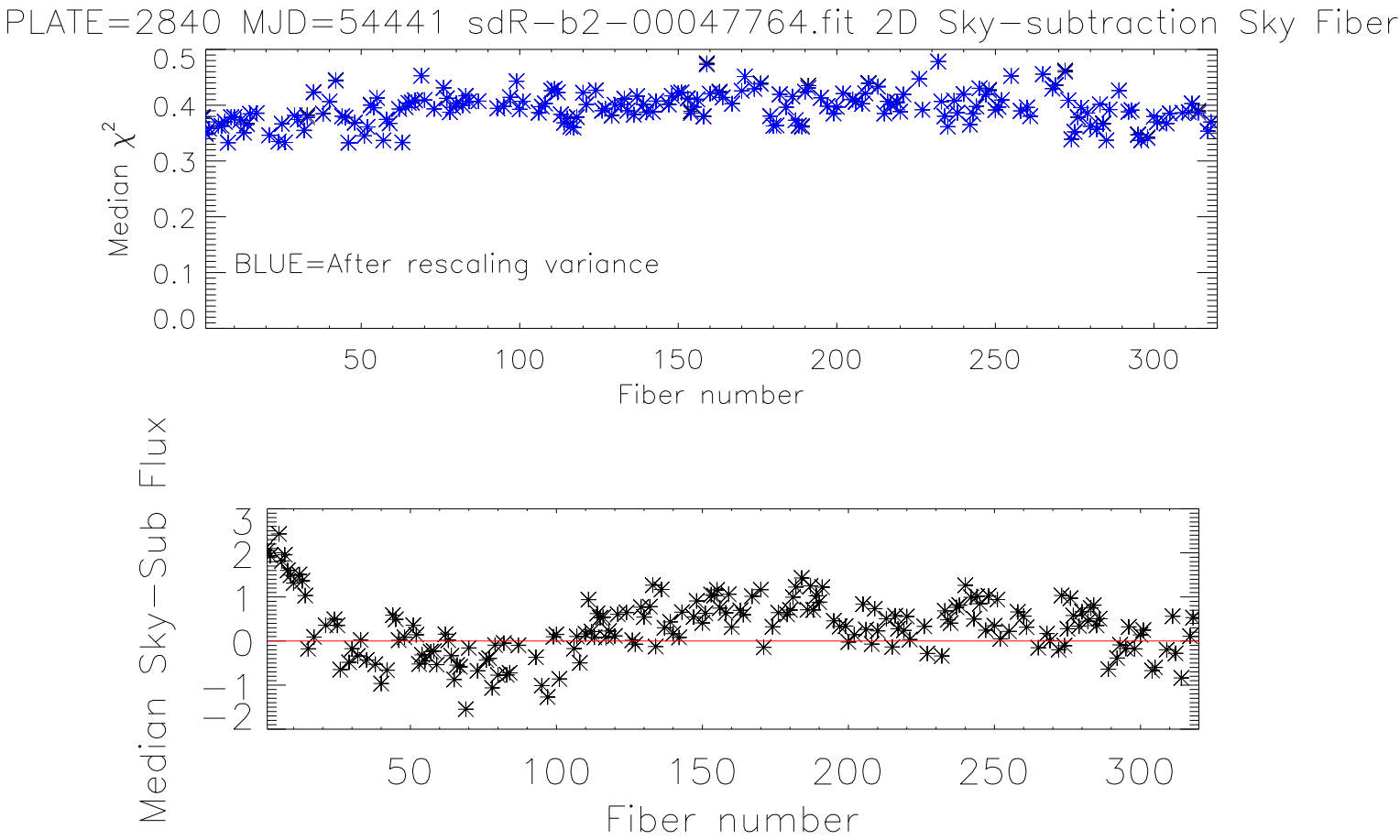
es= −0.0000

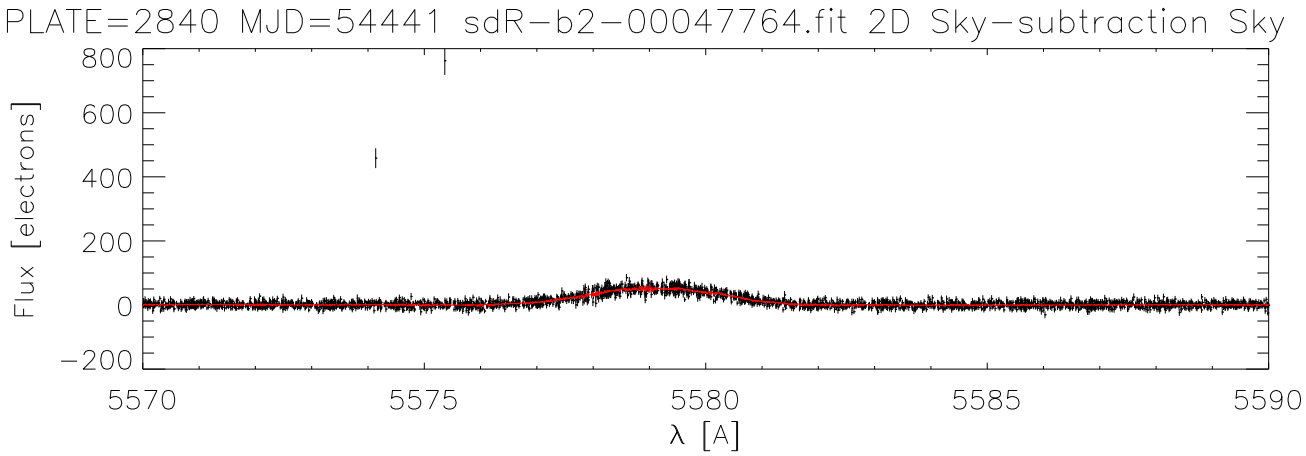

PLATE=2840 MJD=54441 sdR-b2-00047764.fit 1D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.1
0.2
0.3
0.4
0.5
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-3
-2
-1
0
1
2
50
100
150
200
250
300
Fiber number

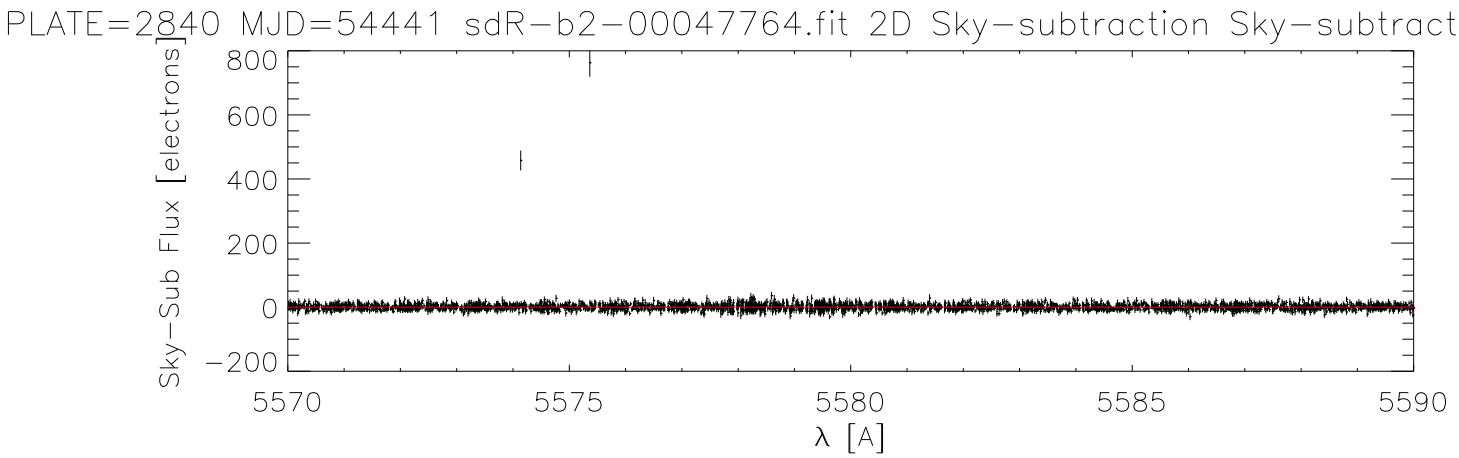

PLATE=2840 MJD=54441 sdR-b2-00047764.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
800
600
400
200
0
-200
5570
5575
5580
5585
5590
λ [A]

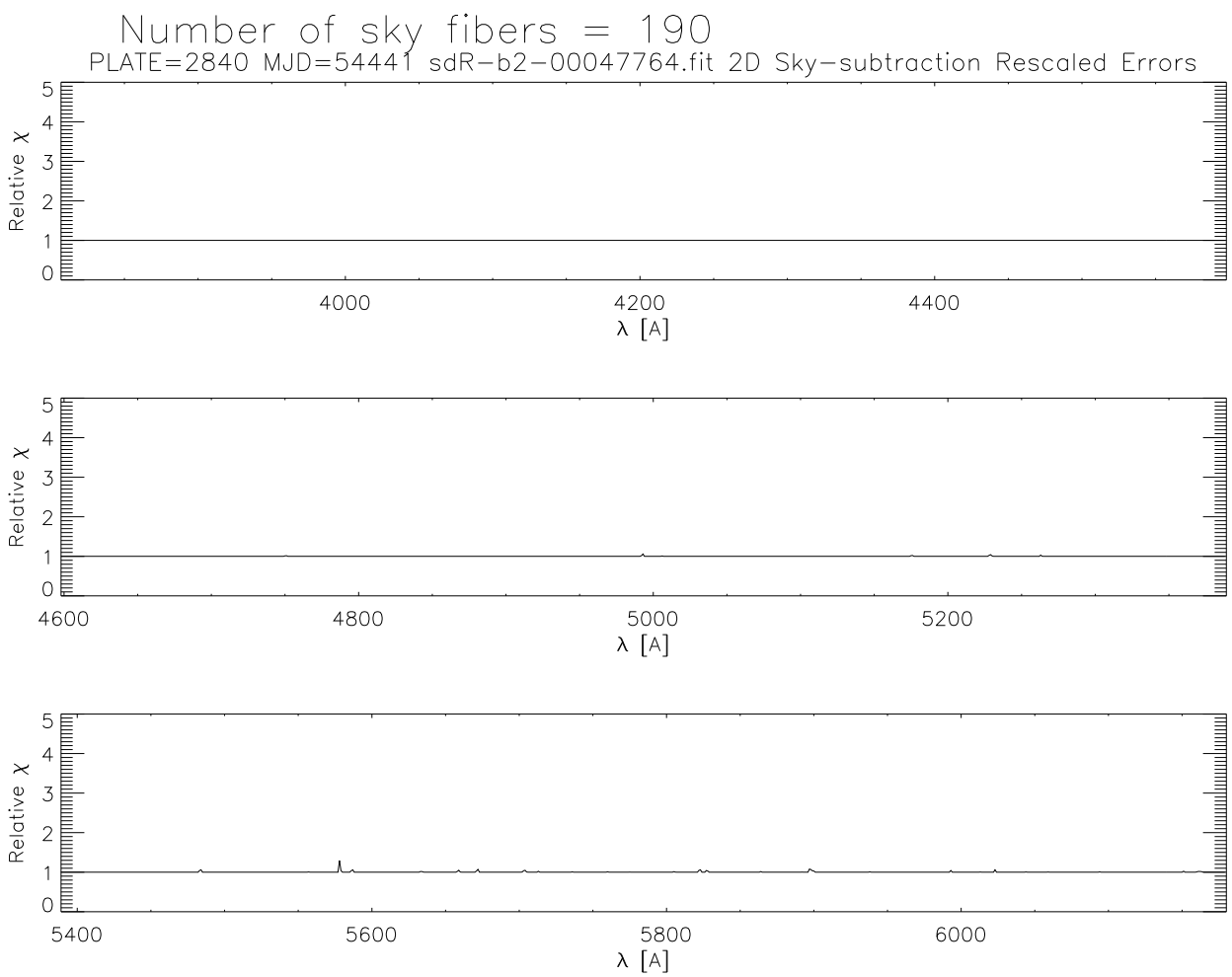

PLATE=2840 MJD=54441 sdR-b2-00047764.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
800
600
400
200
0
-200
5570
5575
5580
5585
5590
λ [A]

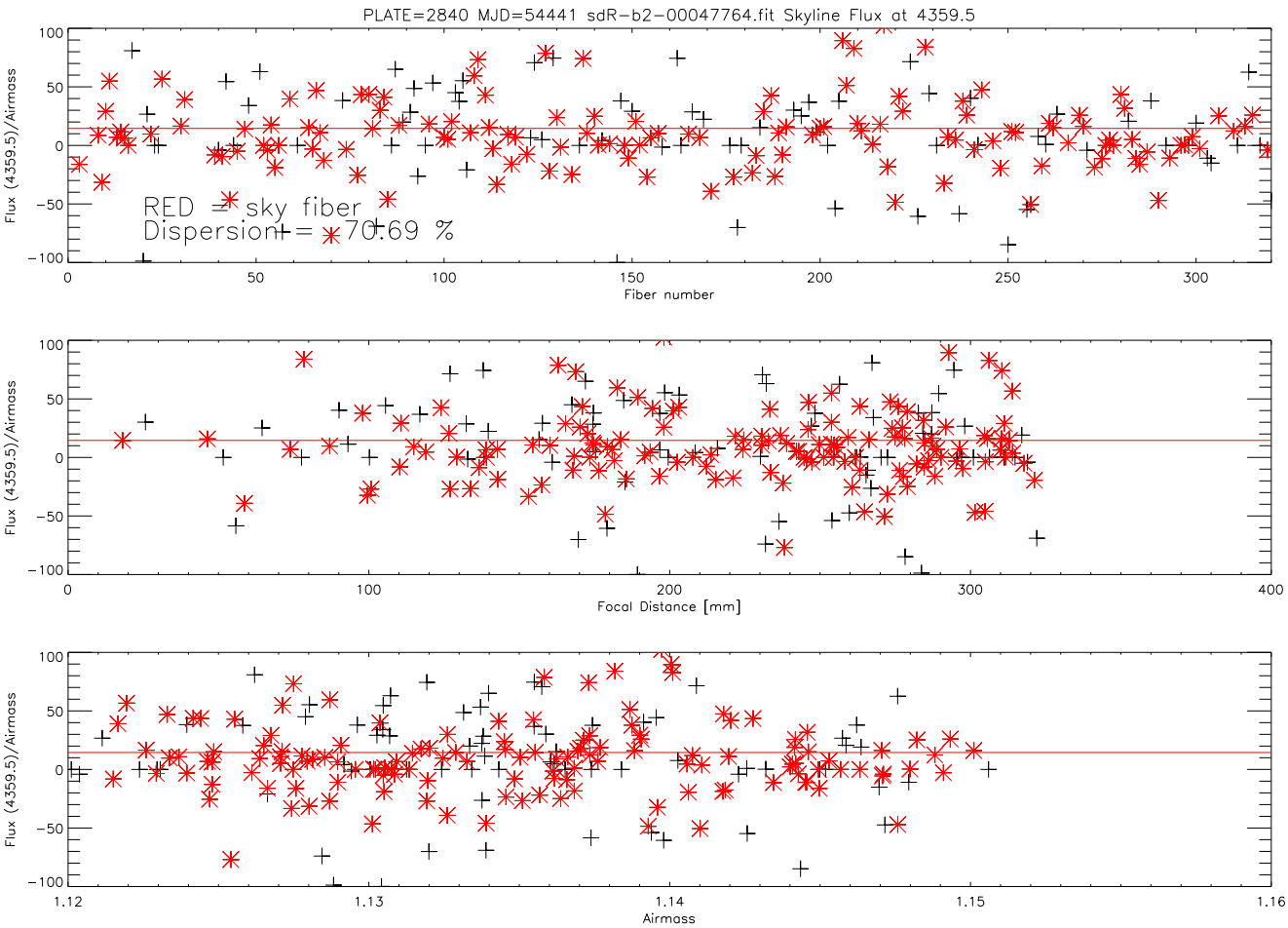

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047764.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000

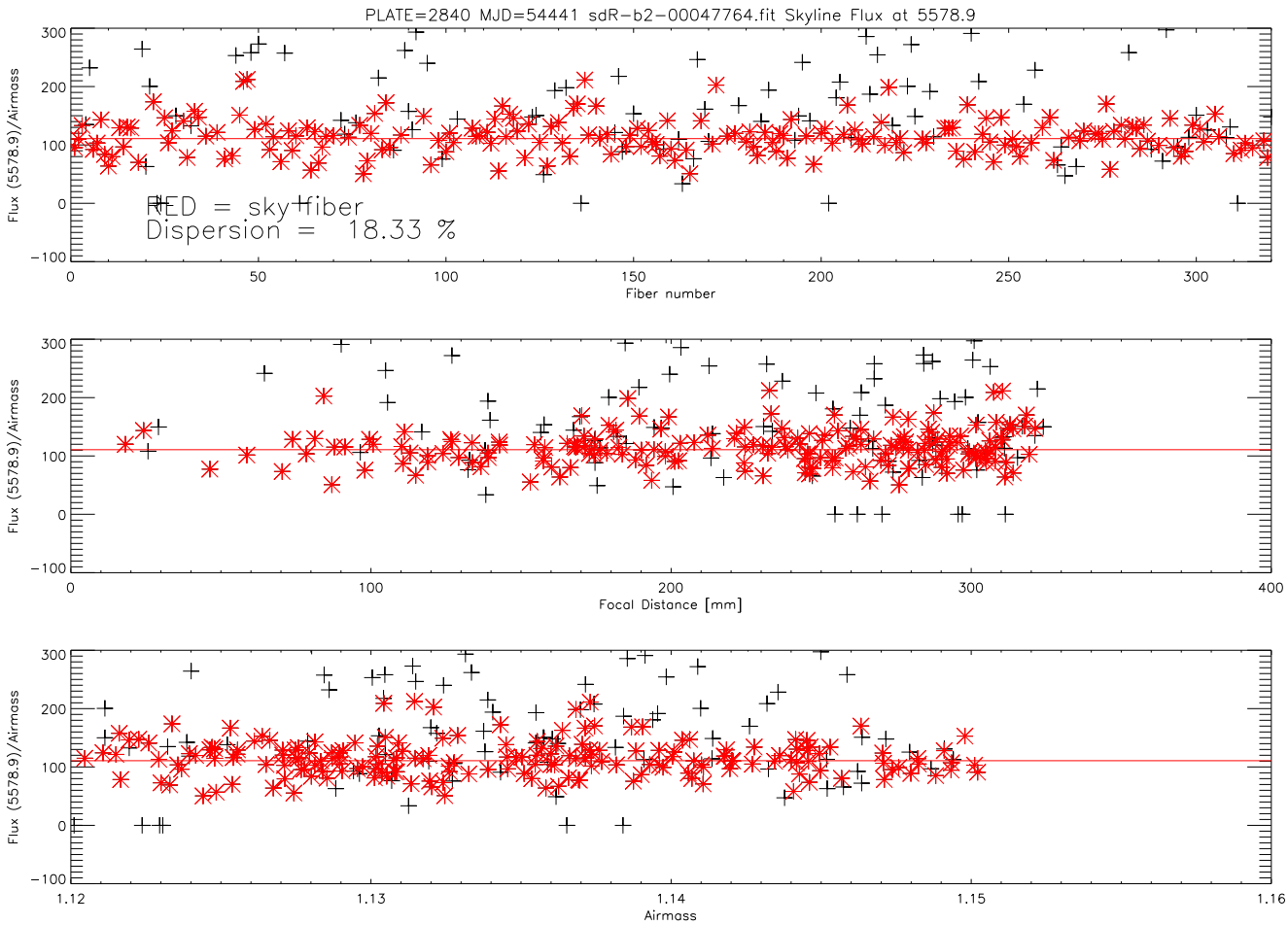

PLATE=2840 MJD=54441 sdR-b2-00047764.fit 2D Sky-subtraction Sky Fiber
Median χ^2
0.0
0.1
0.2
0.3
0.4
0.5
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-2
-1
0
1
2
3
50
100
150
200
250
300
Fiber number

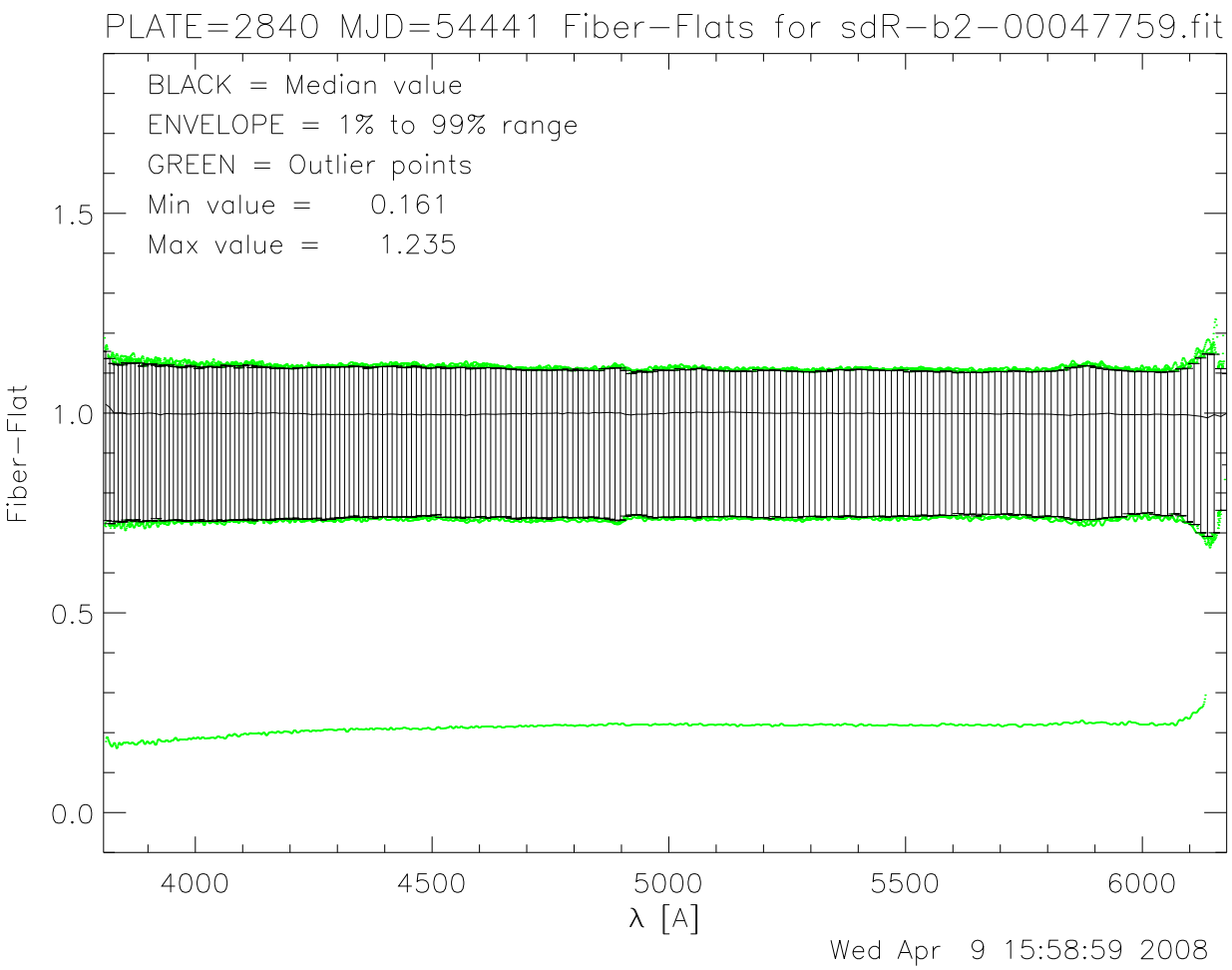

PLATE=2840 MJD=54441 sdR-b2-00047764.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
800
600
400
200
0
-200
5570
5575
5580
5585
5590
λ [A]

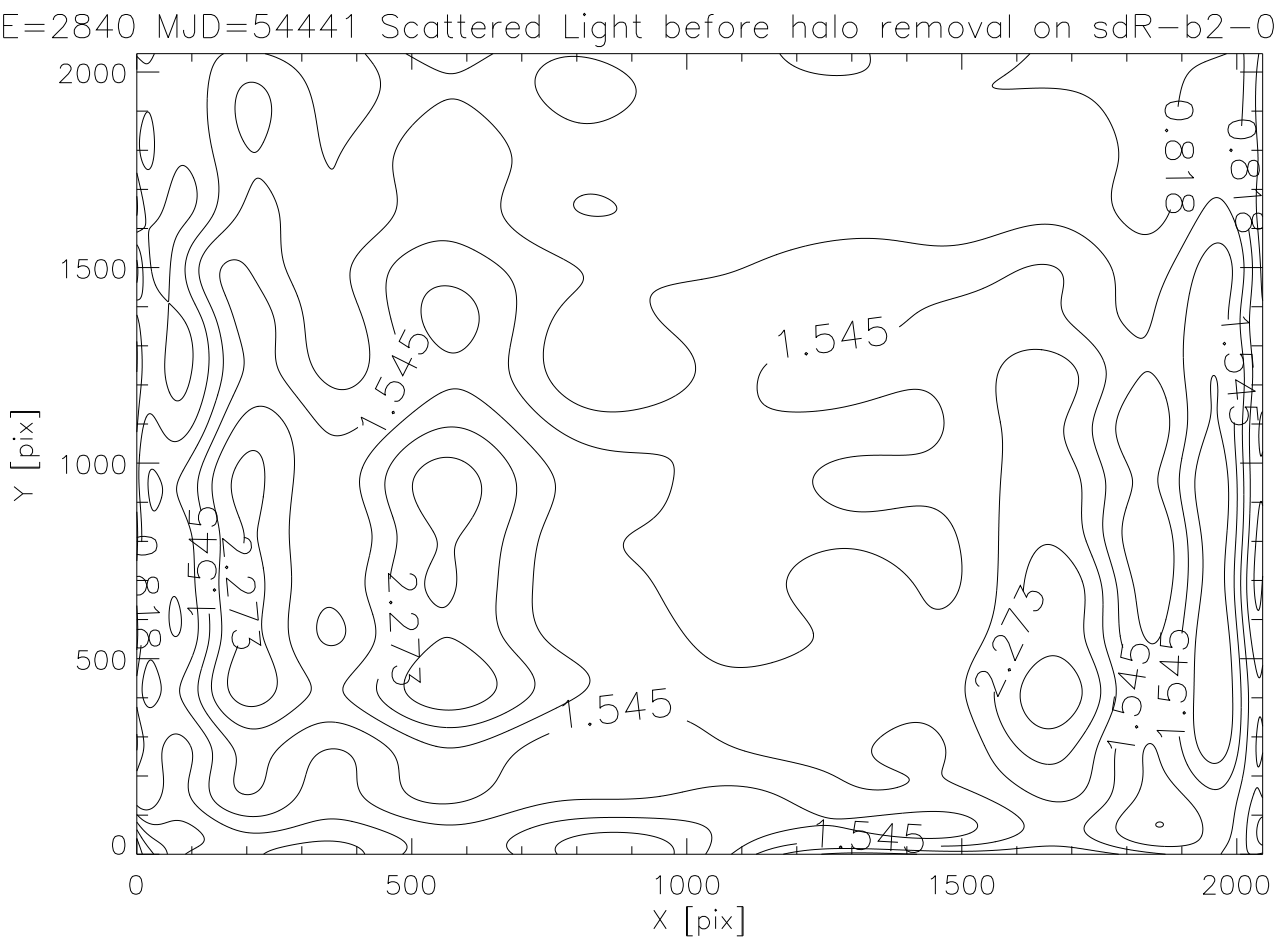

PLATE=2840 MJD=54441 sdR-b2-00047764.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
800
600
400
200
0
-200
5570
5575
5580
5585
5590
λ [A]

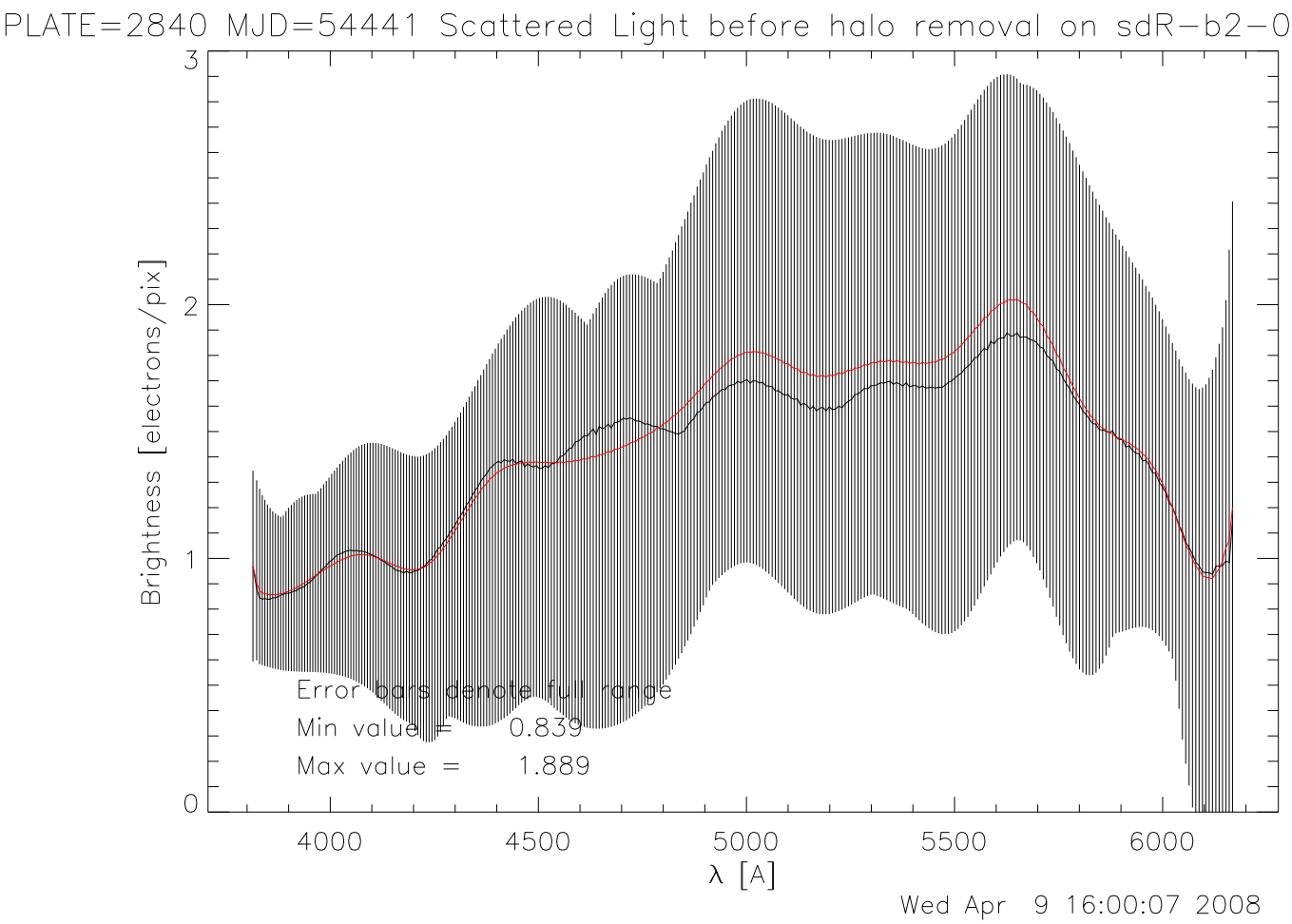

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047764.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000

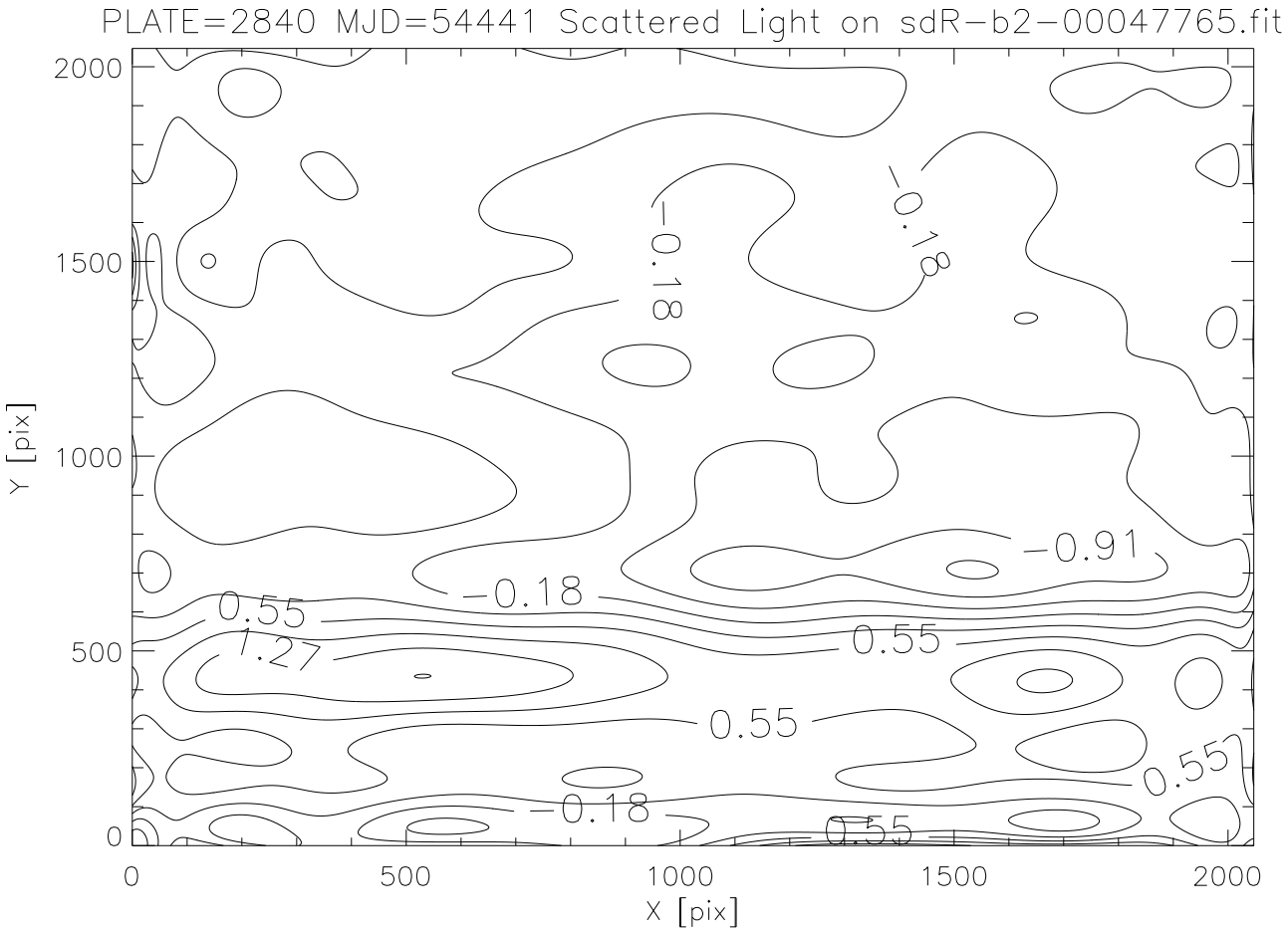

PLATE=2840 MJD=54441 sdR-b2-00047764.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
Fiber number
RED = sky fiber
Dispersion = 70.69 %
Flux (4359.5)/Airmass
Focal Distance [mm]
Flux (4359.5)/Airmass
Airmass

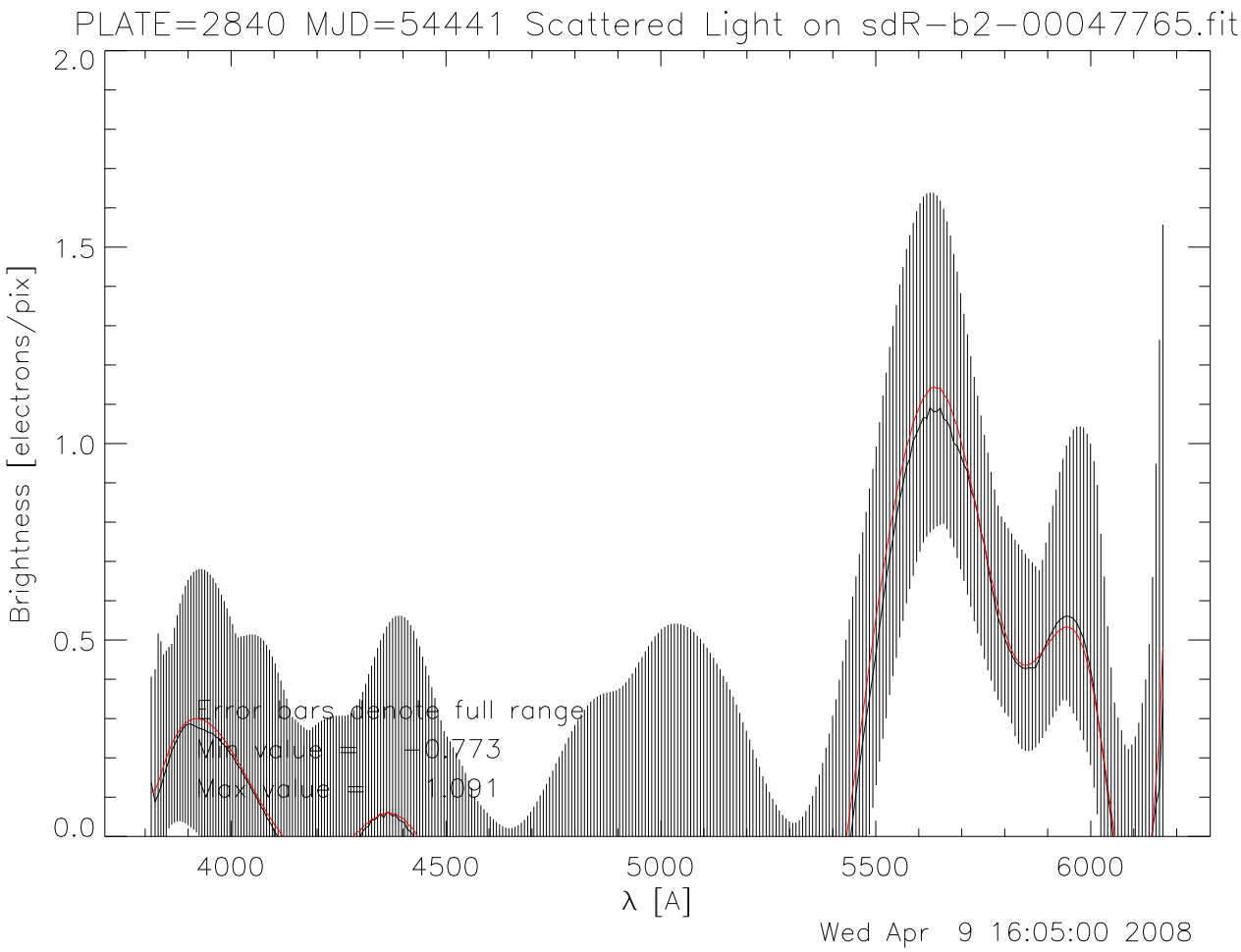

PLATE=2840 MJD=54441 sdR-b2-00047764.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
RED = sky fiber
Dispersion = 18.33 %
Fiber number
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

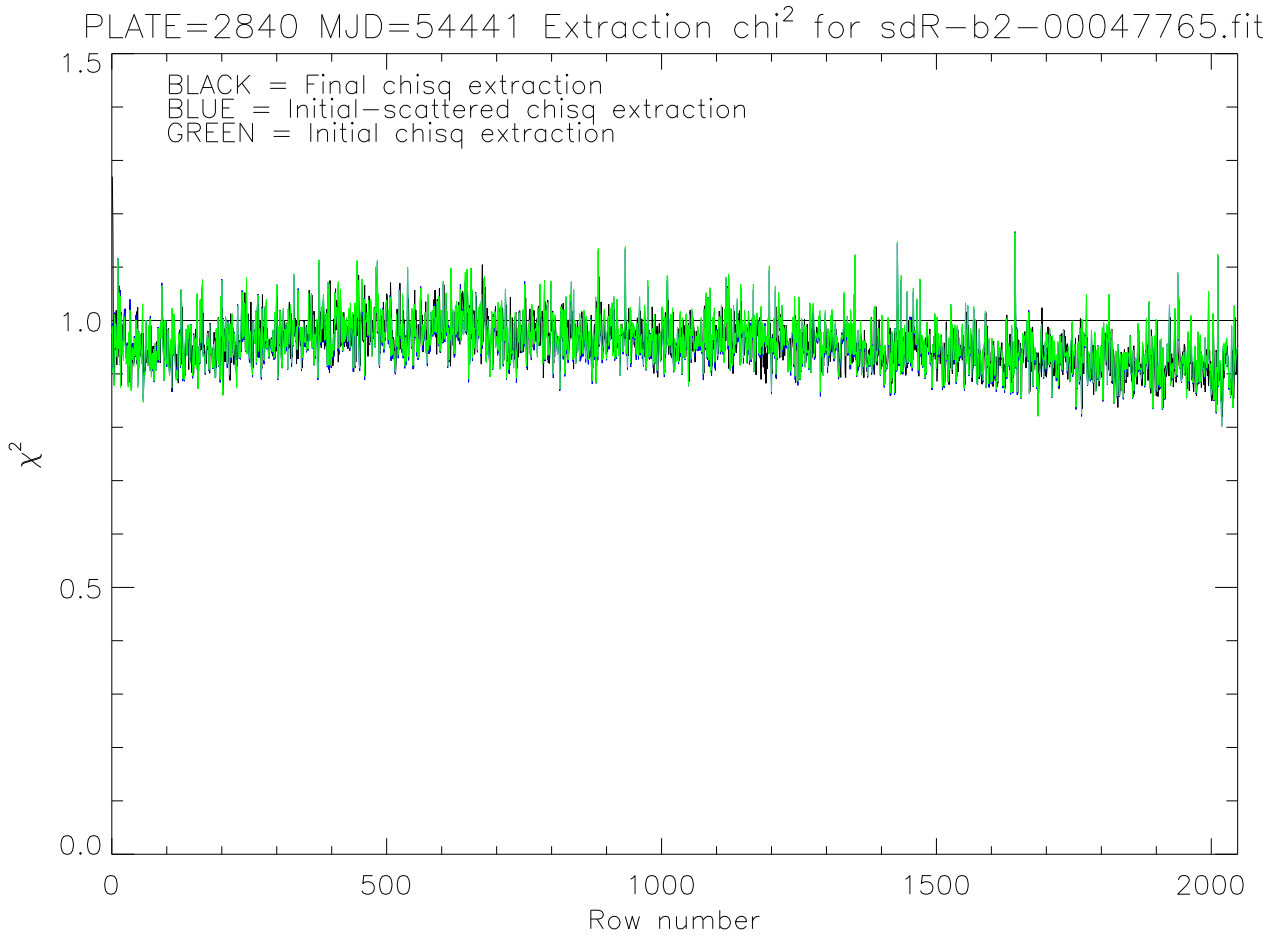

PLATE=2840 MJD=54441 Fiber-Flats for sdR-b2-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.161
Max value = 1.235
Fiber-Flat
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Wed Apr 9 15:58:59 2008

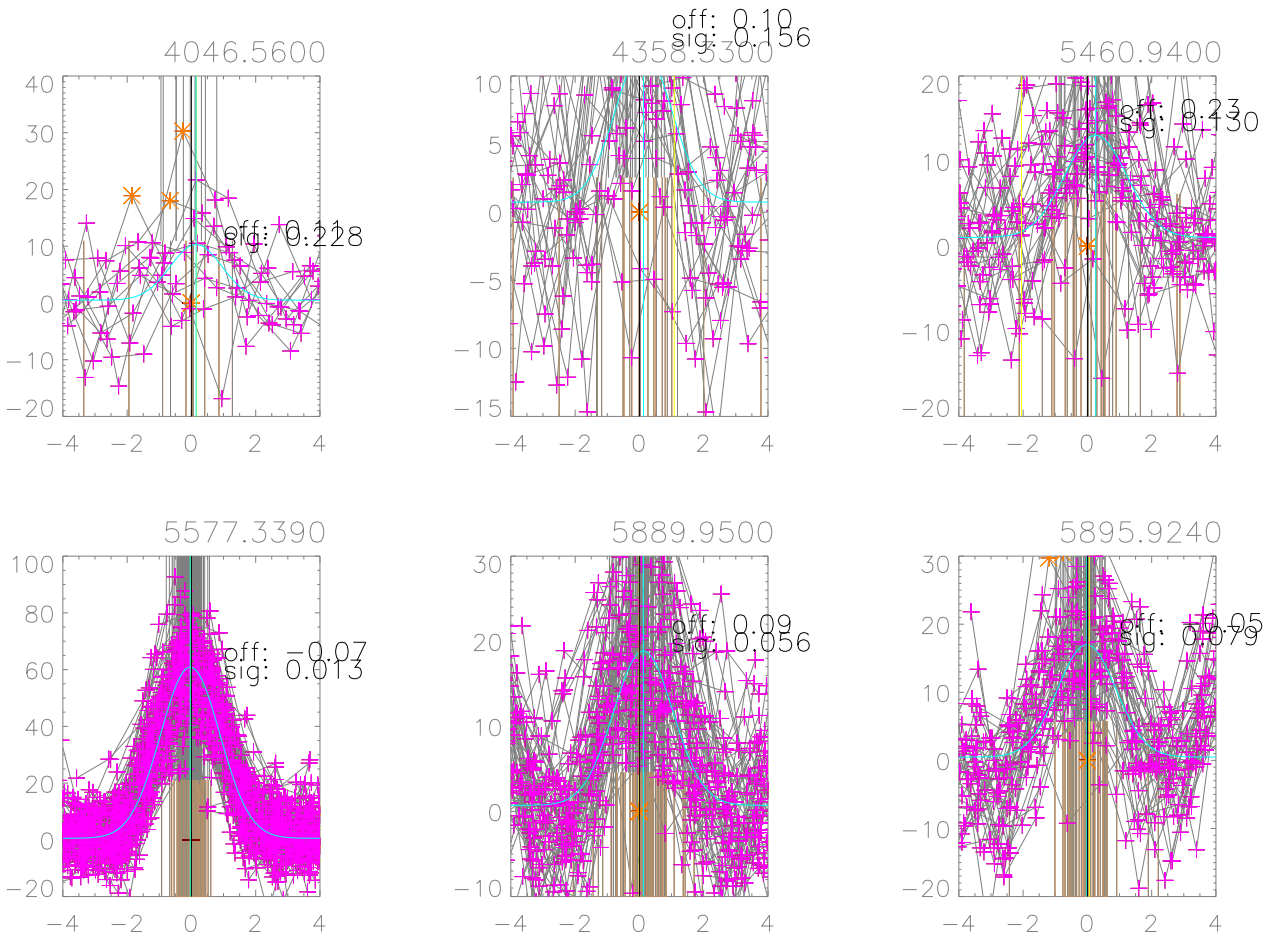

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047765.f
Y [pix]
X [pix]
0
500
1000
1500
2000
1.545
2.273
0.818

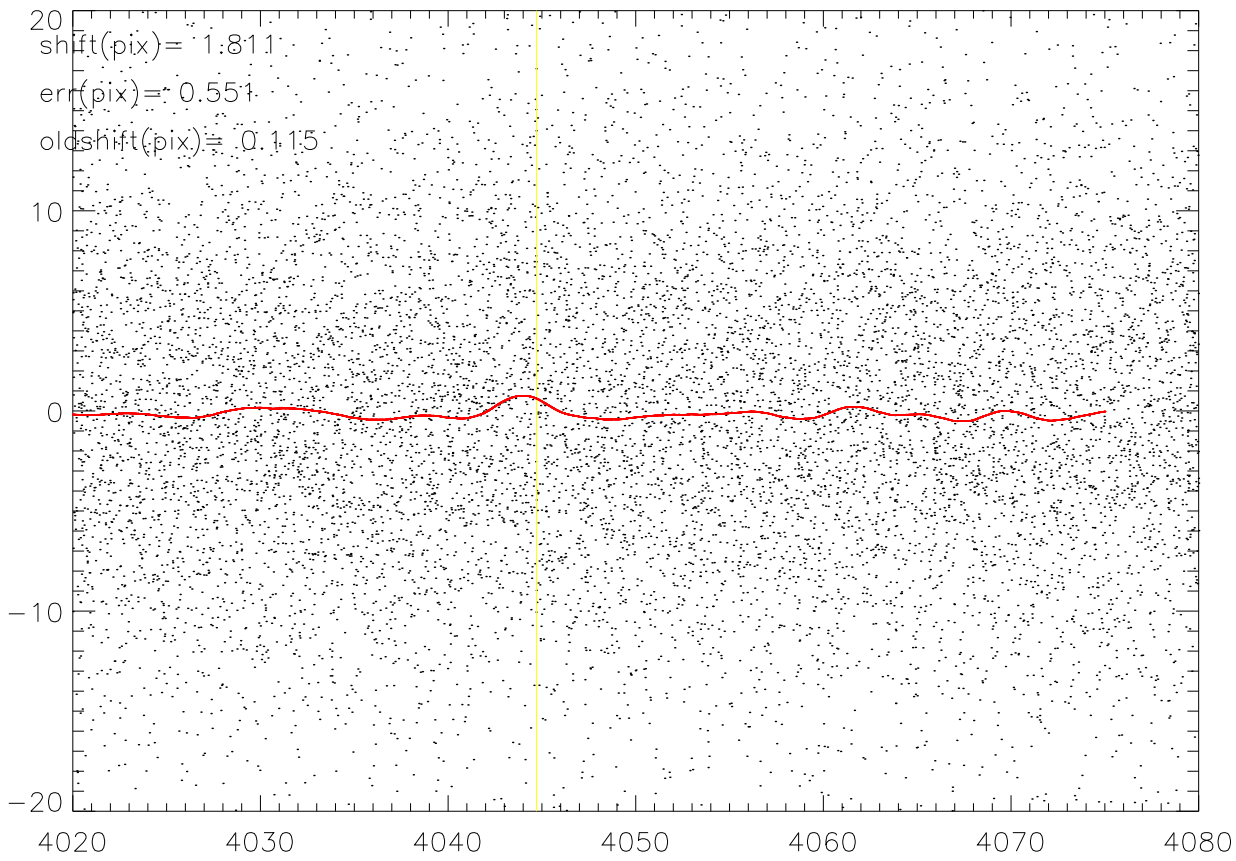

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-b2-00047765.f
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.839
Max value = 1.889
Wed Apr 9 16:00:07 2008

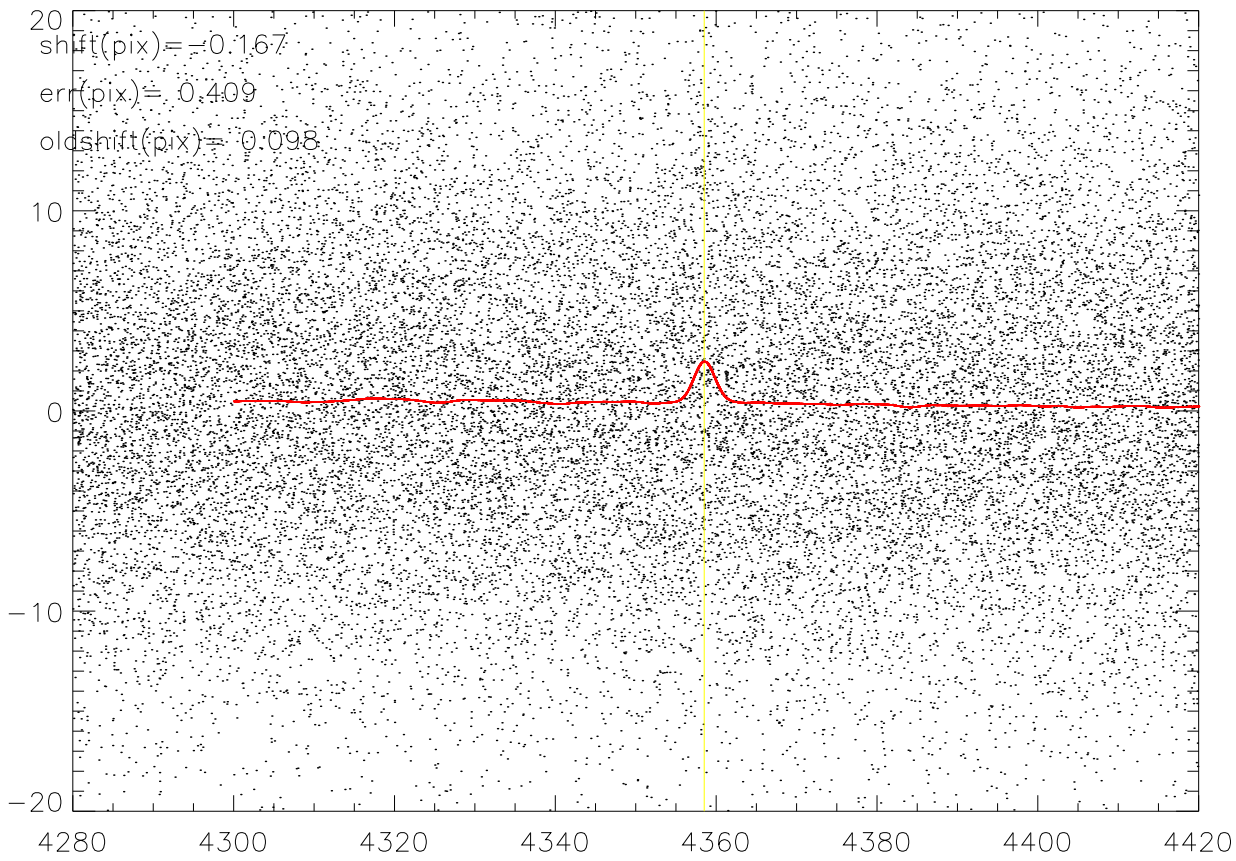

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047765.fit
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
-0.18
-0.18
-0.91
-0.18
0.55
1.27
0.55
0.55
0.55
-0.18
0.55

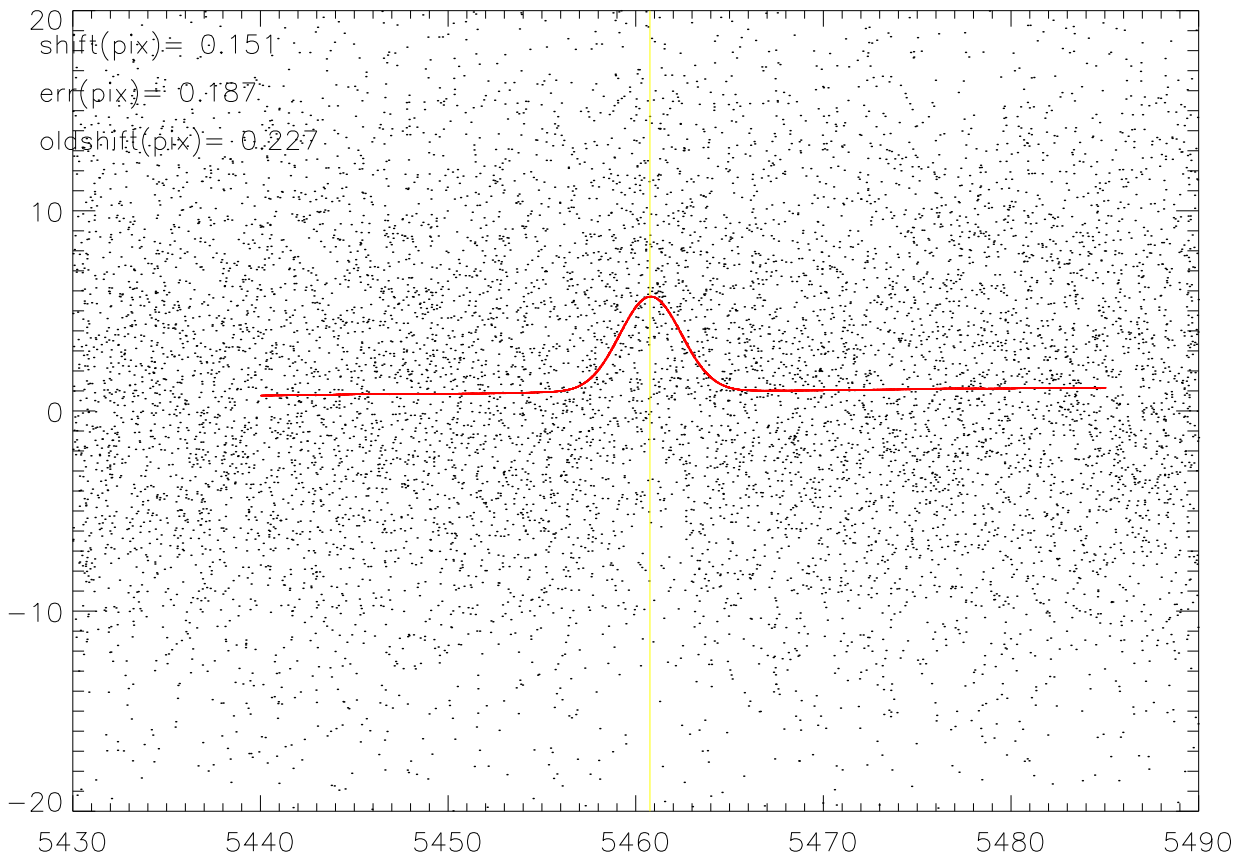

PLATE=2840 MJD=54441 Scattered Light on sdR-b2-00047765.fit
Brightness [electrons/pix]
2.0
1.5
1.0
0.5
0.0
4000
4500
5000
5500
6000
λ [A]
Error bars denote full range
Min value = -0.773
Max value = 1.091
Wed Apr 9 16:05:00 2008

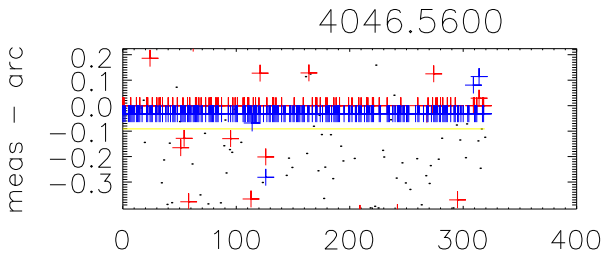

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-b2-00047765.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

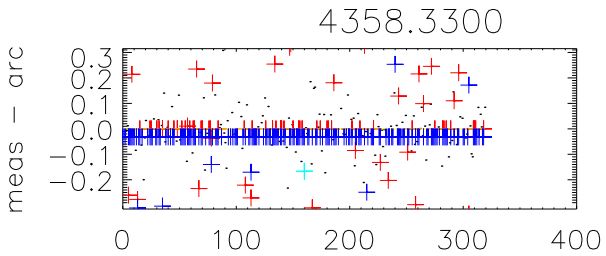

4046.5600
off: 0.11
sig: 0.228
4358.3300
off: 0.10
sig: 0.156
5460.9400
off: 0.23
sig: 0.130
5577.3390
off: −0.07
sig: 0.013
5889.9500
off: 0.09
sig: 0.056
5895.9240
off: 0.05
sig: 0.079

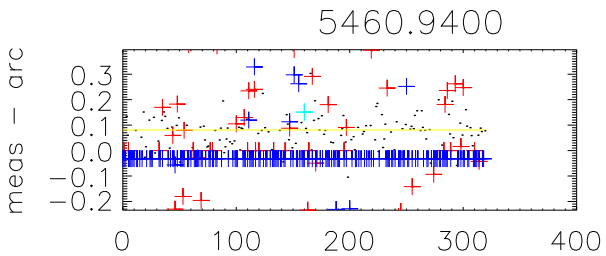

shift(pix)= 1.811
err(pix)= 0.551
oldshift(pix)= 0.115
20
10
0
−10
−20
4020
4030
4040
4050
4060
4070
4080

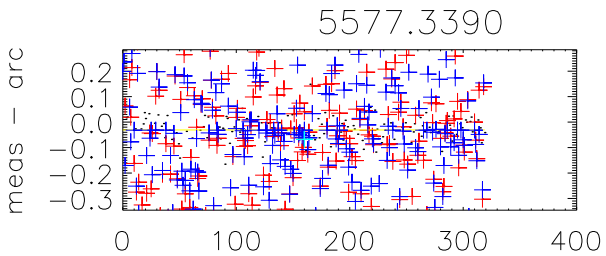

shift(pix)= -0.167
err(pix)= 0.409
oldshift(pix)= 0.098
20
10
0
−10
−20
4280
4300
4320
4340
4360
4380
4400
4420

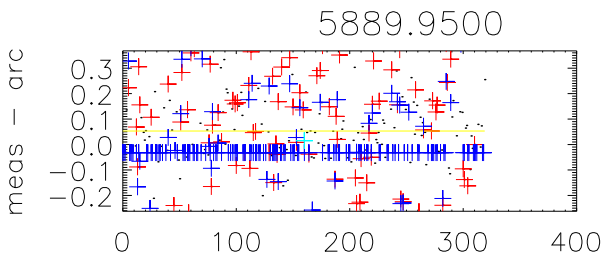

shift(pix)= 0.151
err(pix)= 0.187
oldshift(pix)= 0.227
20
10
0
−10
−20
5430
5440
5450
5460
5470
5480
5490

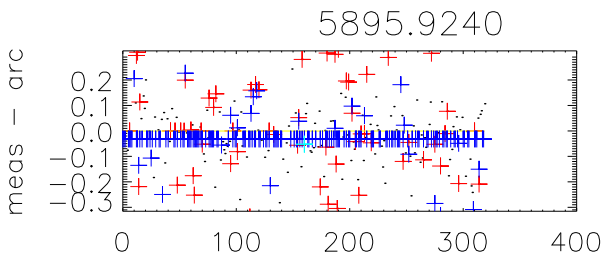

4046.5600
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

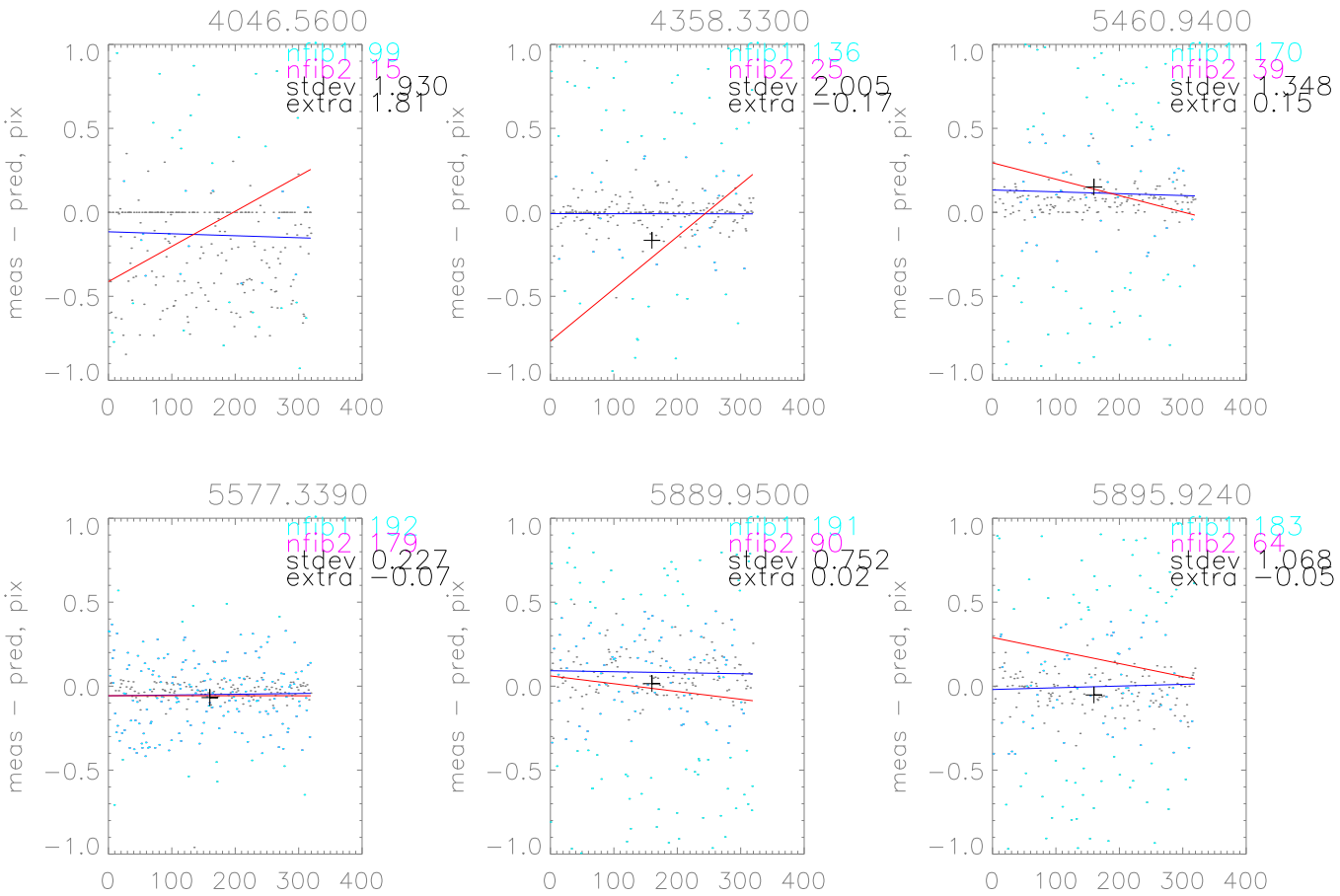

4358.3300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

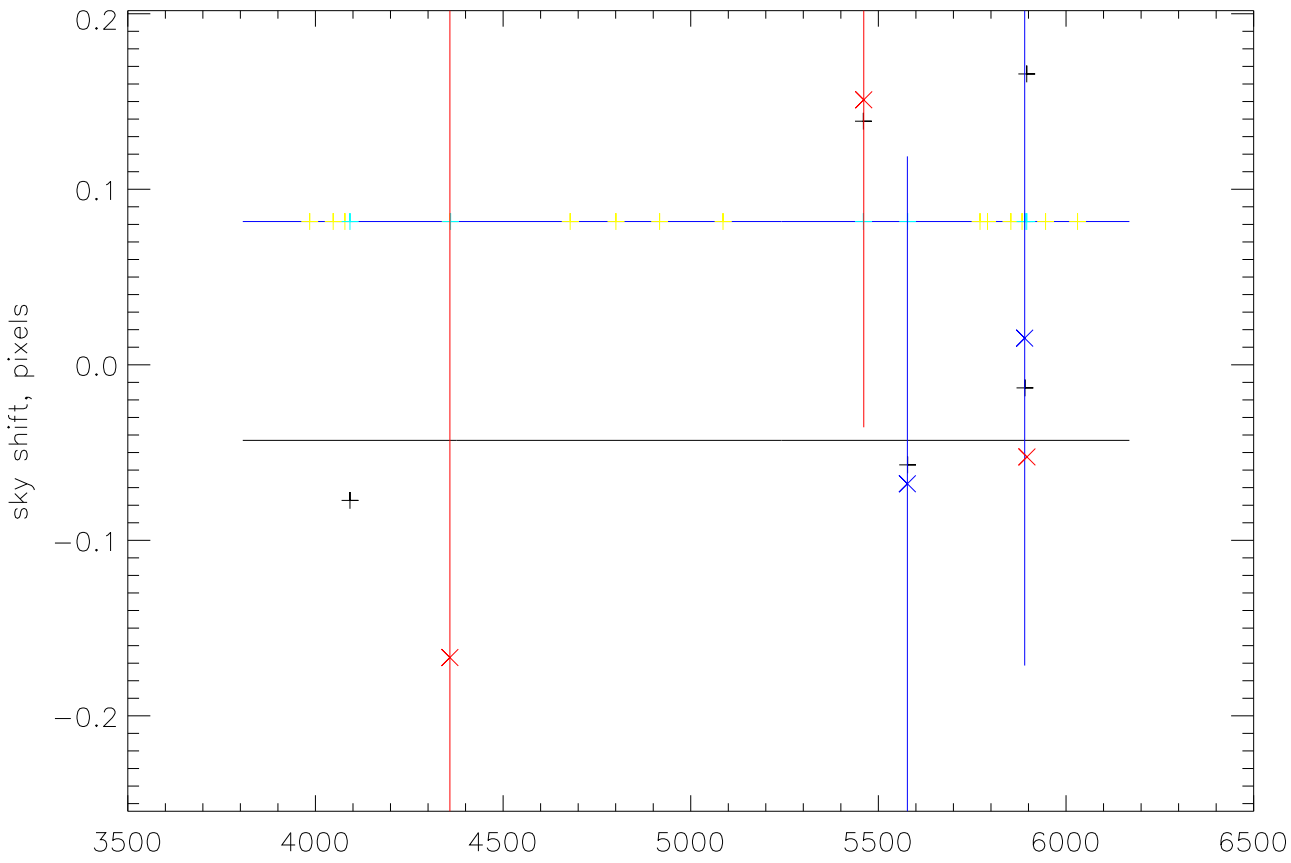

5460.9400
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

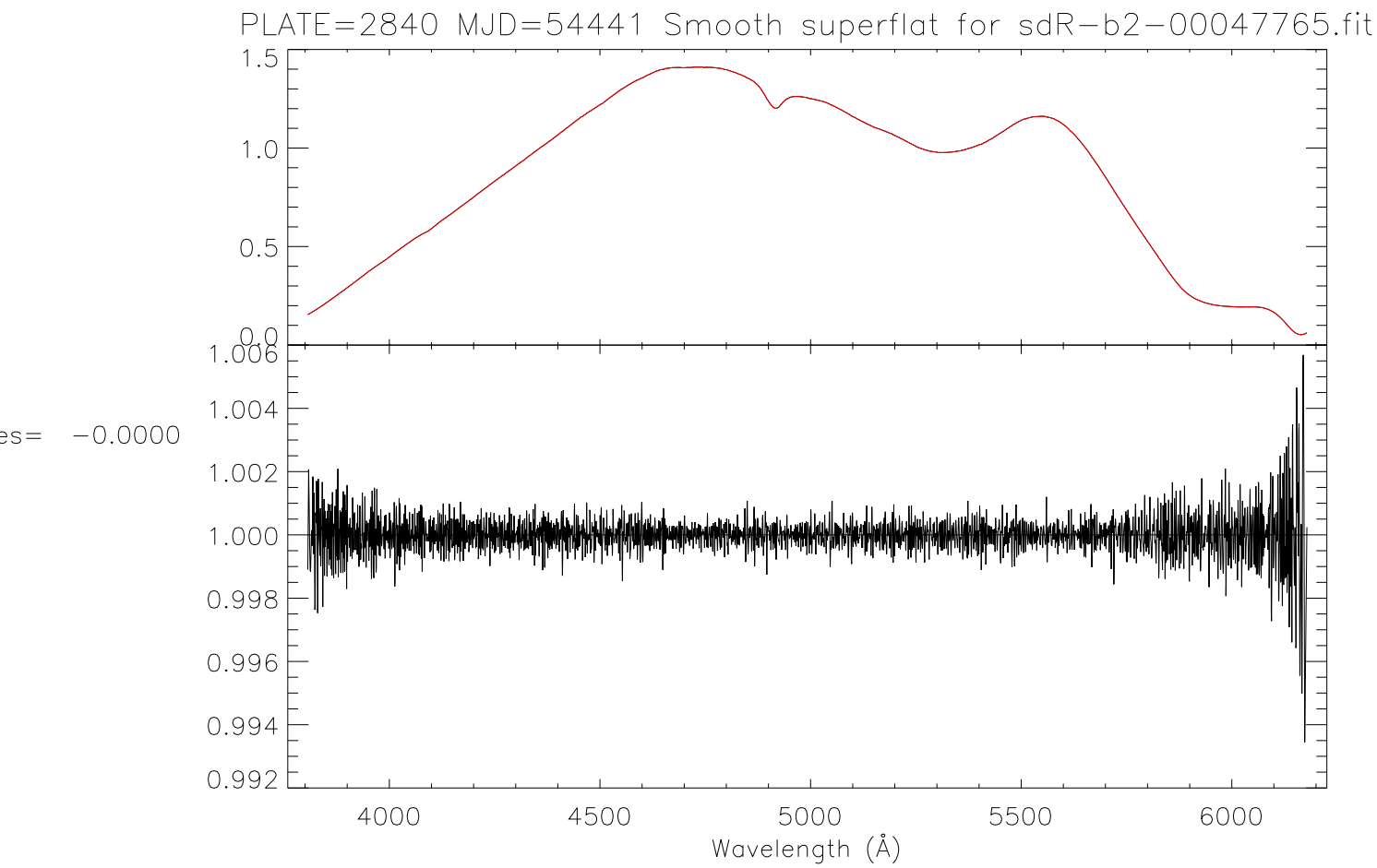

5577.3390
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400


5889.9500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

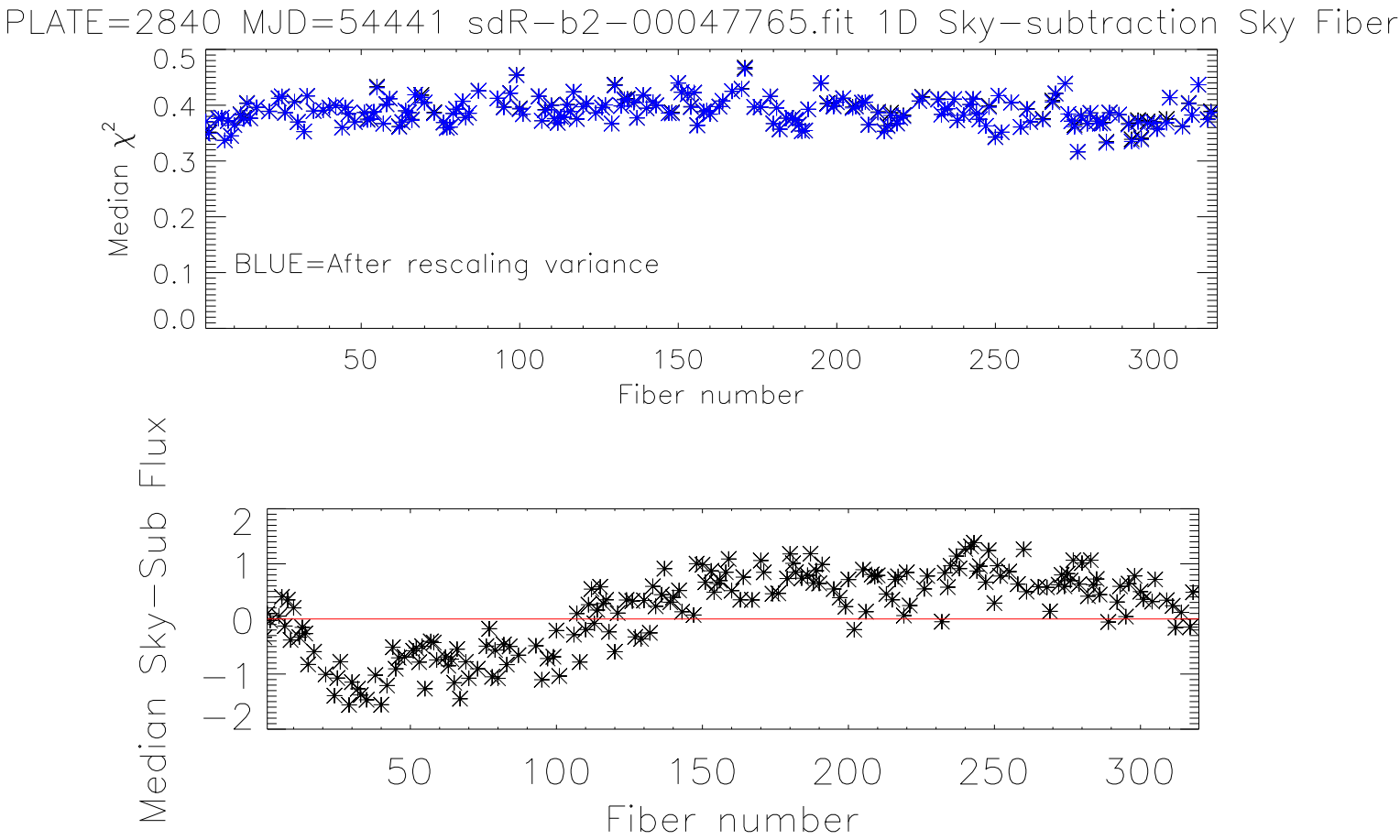

5895.9240
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

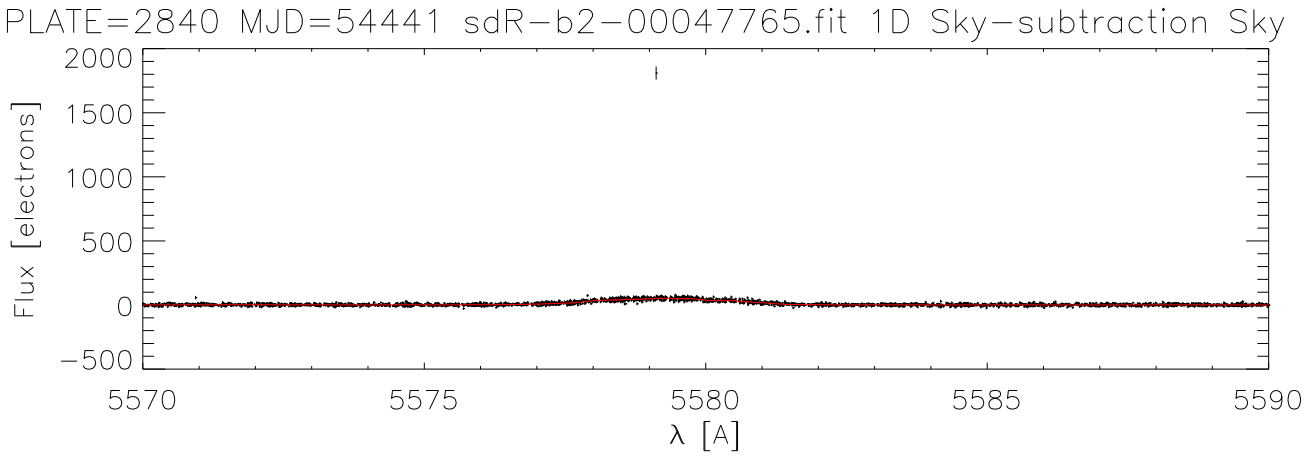

4046.5600
nfib1 99
nfib2 15
stdev 1.930
extra 1.81
4358.3300
nfib1 136
nfib2 25
stdev 2.005
extra −0.17
5460.9400
nfib1 170
nfib2 39
stdev 1.348
extra 0.15
5577.3390
nfib1 192
nfib2 179
stdev 0.227
extra −0.07
5889.9500
nfib1 191
nfib2 90
stdev 0.752
extra 0.02
5895.9240
nfib1 183
nfib2 64
stdev 1.068
extra −0.05
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0
100
200
300
400

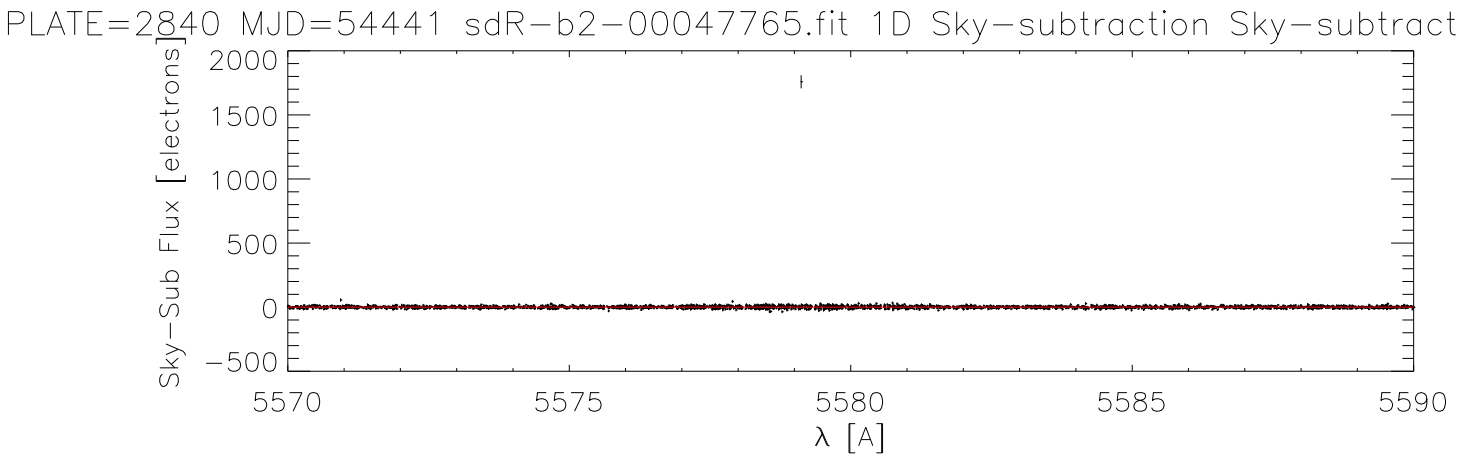

0.2
0.1
0.0
−0.1
−0.2
sky shift, pixels
3500
4000
4500
5000
5500
6000
6500

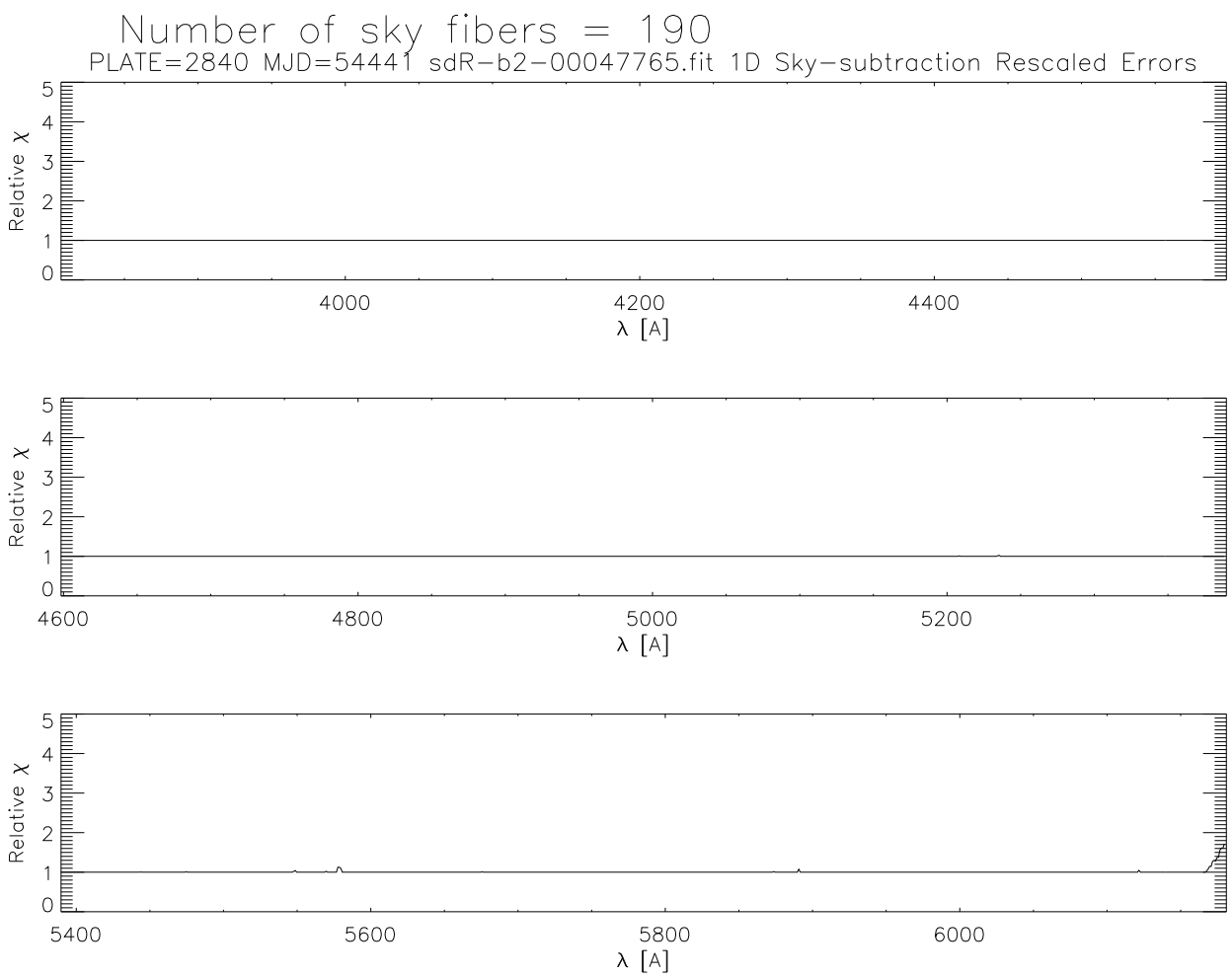

PLATE=2840 MJD=54441 Smooth superflat for sdR-b2-00047765.fit
1.5
1.0
0.5
0.0
1.006
1.004
1.002
1.000
0.998
0.996
0.994
0.992
4000
4500
5000
5500
6000
Wavelength (Å)

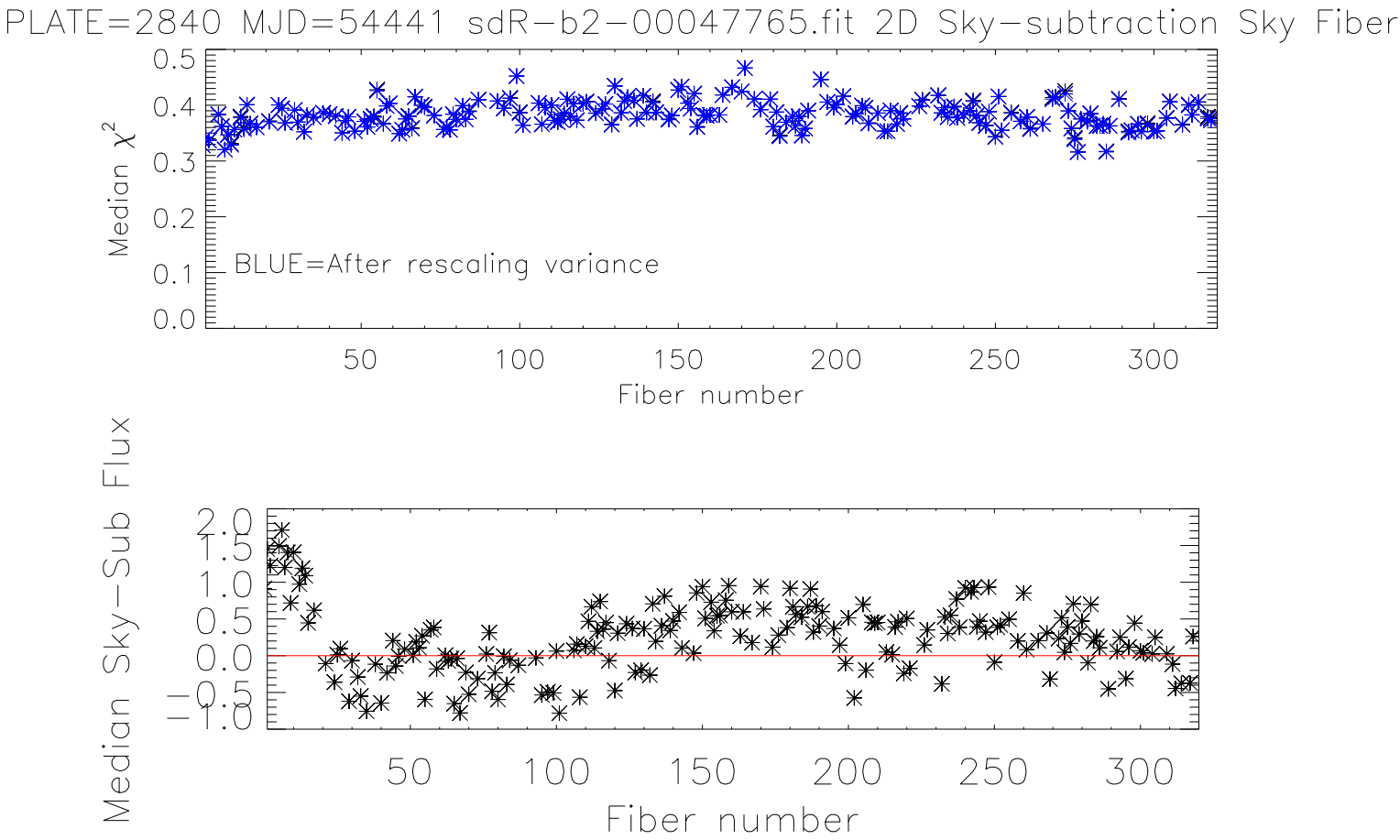
es= −0.0000

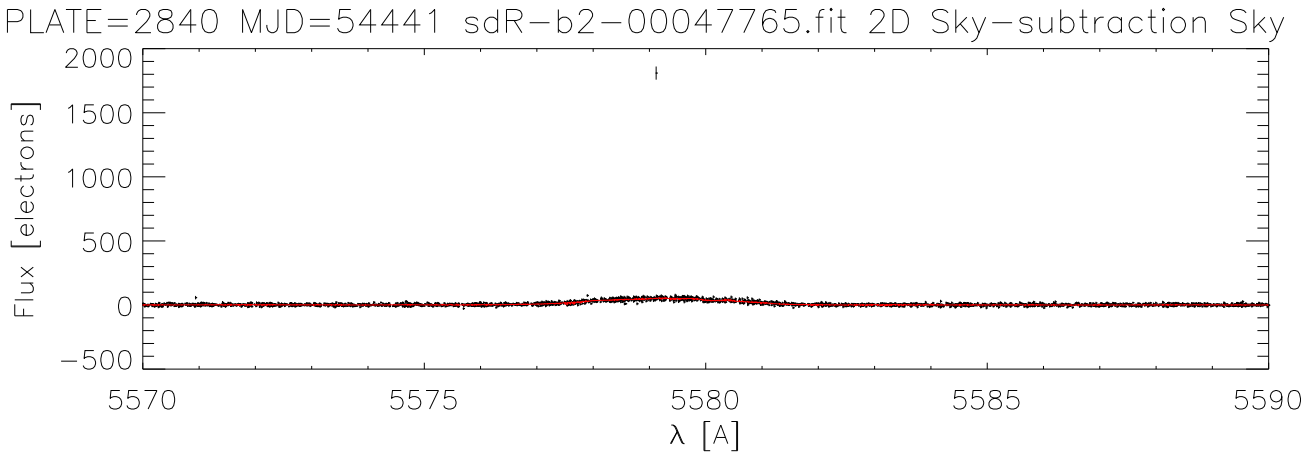

PLATE=2840 MJD=54441 sdR-b2-00047765.fit 1D Sky-subtraction Sky Fiber
Median χ^2
0.5
0.4
0.3
0.2
0.1
0.0
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
2
1
0
-1
-2
50
100
150
200
250
300
Fiber number

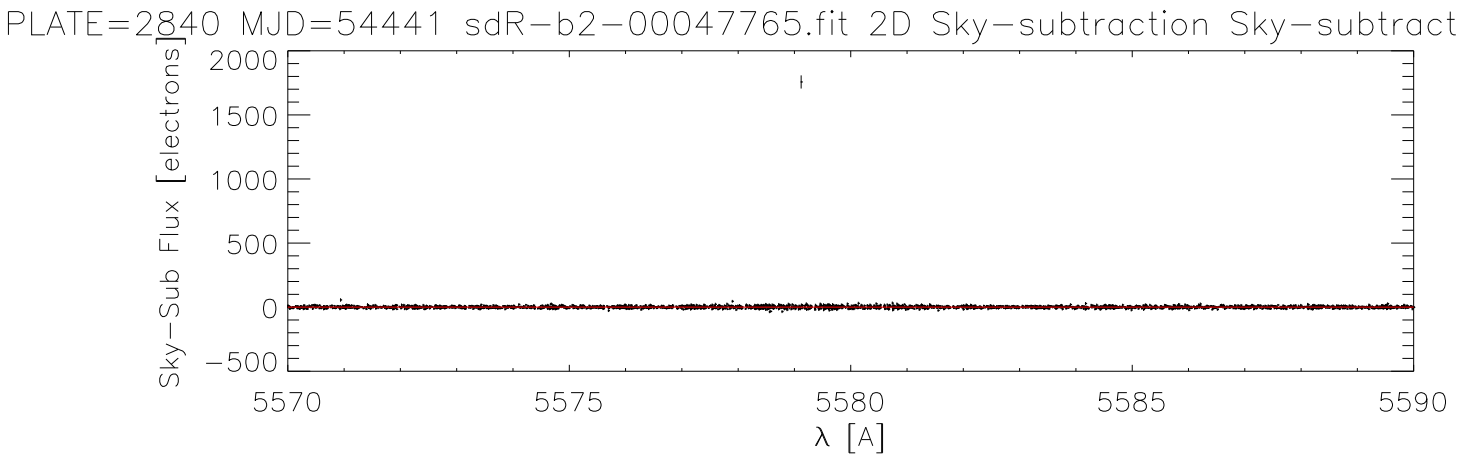

PLATE=2840 MJD=54441 sdR-b2-00047765.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
2000
1500
1000
500
0
−500
5570
5575
5580
5585
5590
λ [A]

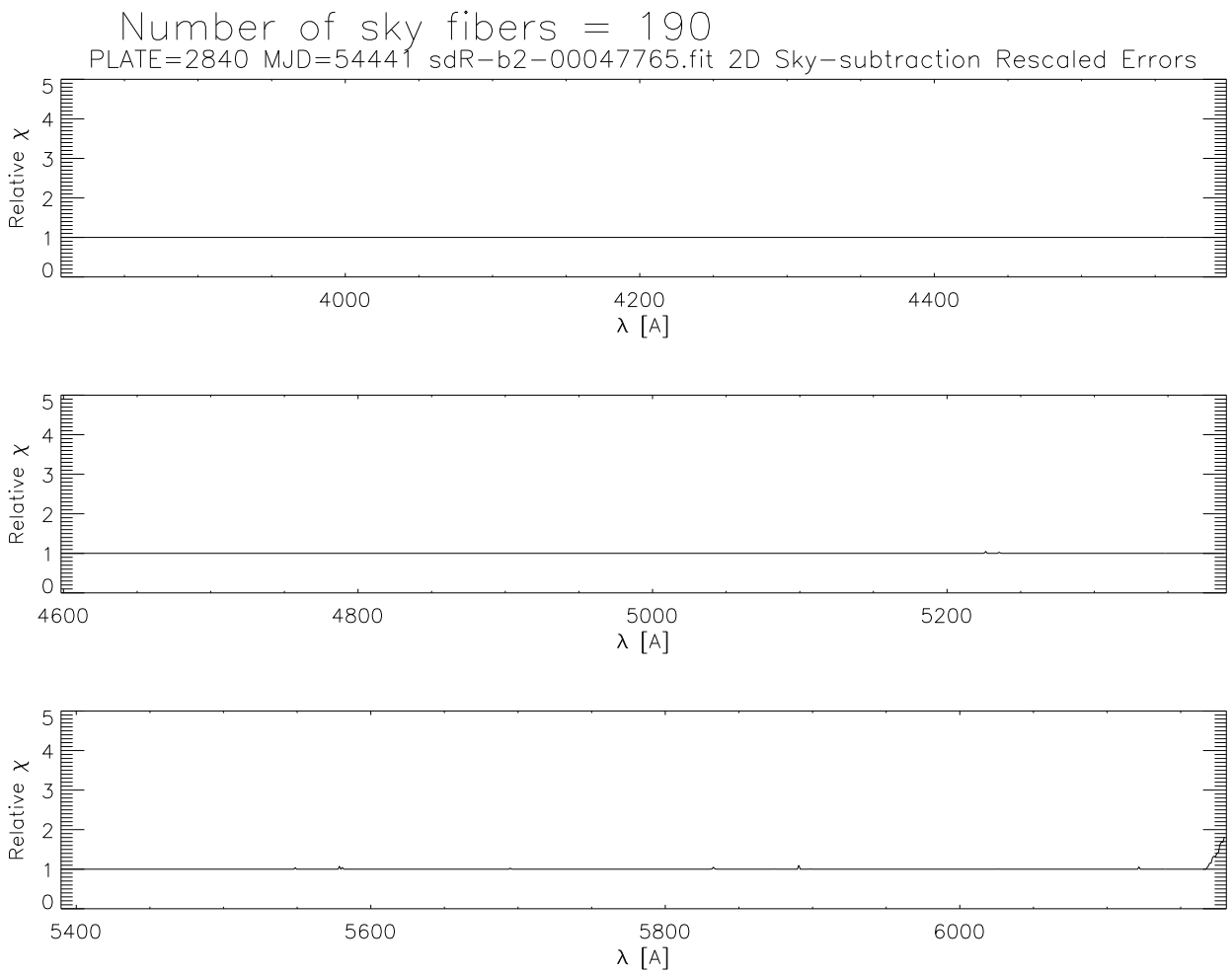

PLATE=2840 MJD=54441 sdR-b2-00047765.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
2000
1500
1000
500
0
−500
5570
5575
5580
5585
5590
λ [A]

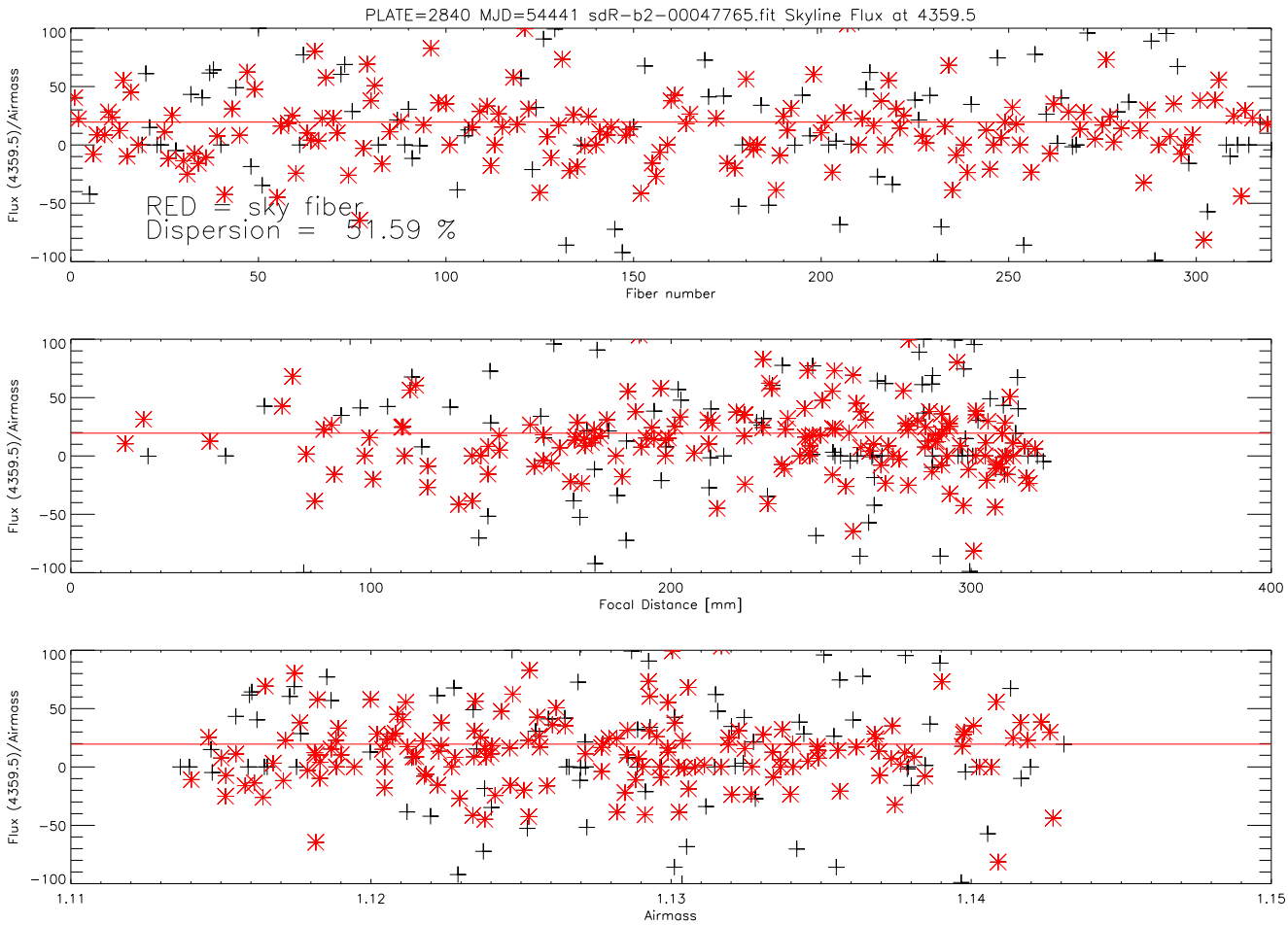

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047765.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000

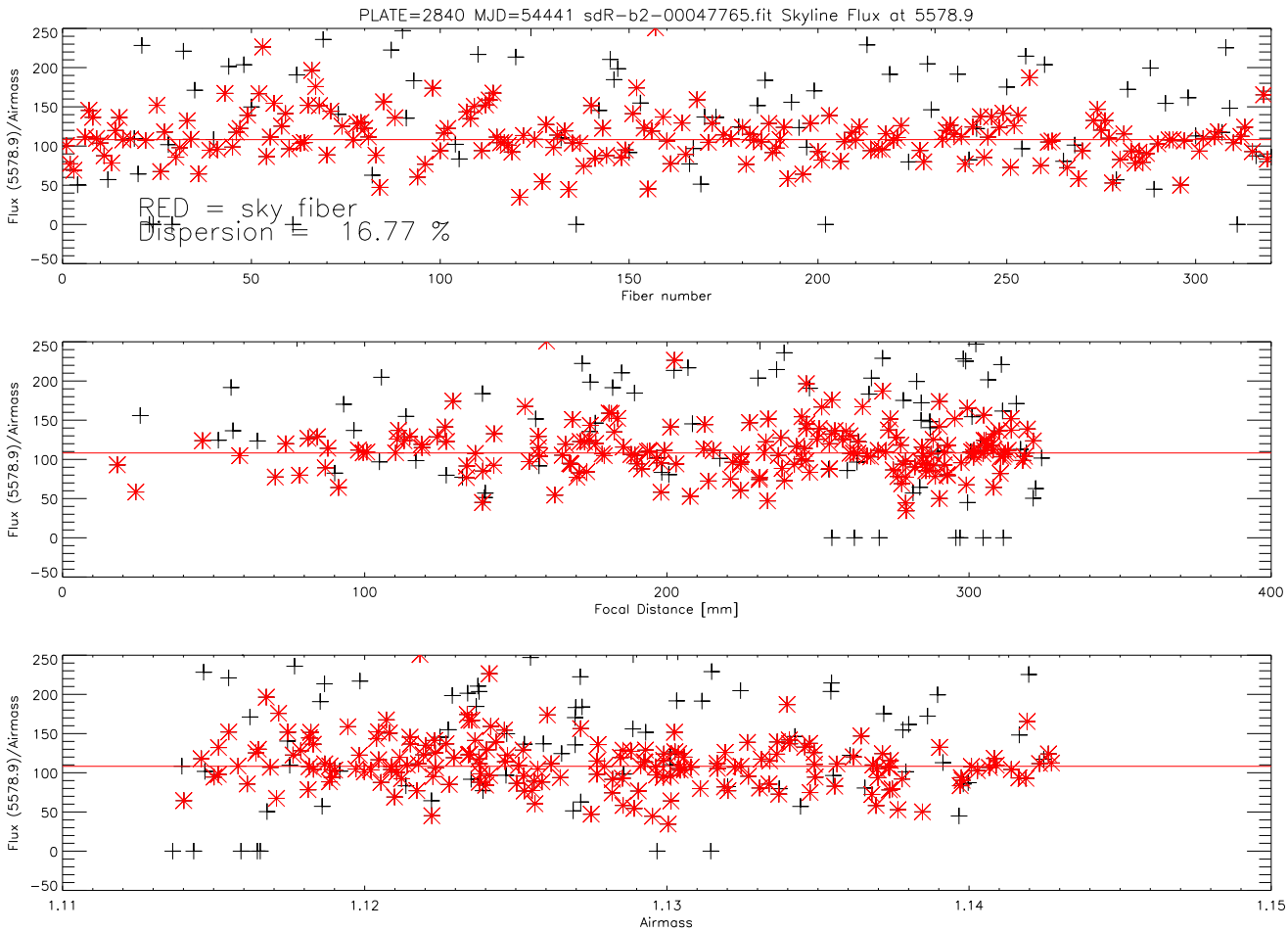

PLATE=2840 MJD=54441 sdR-b2-00047765.fit 2D Sky-subtraction Sky Fiber
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

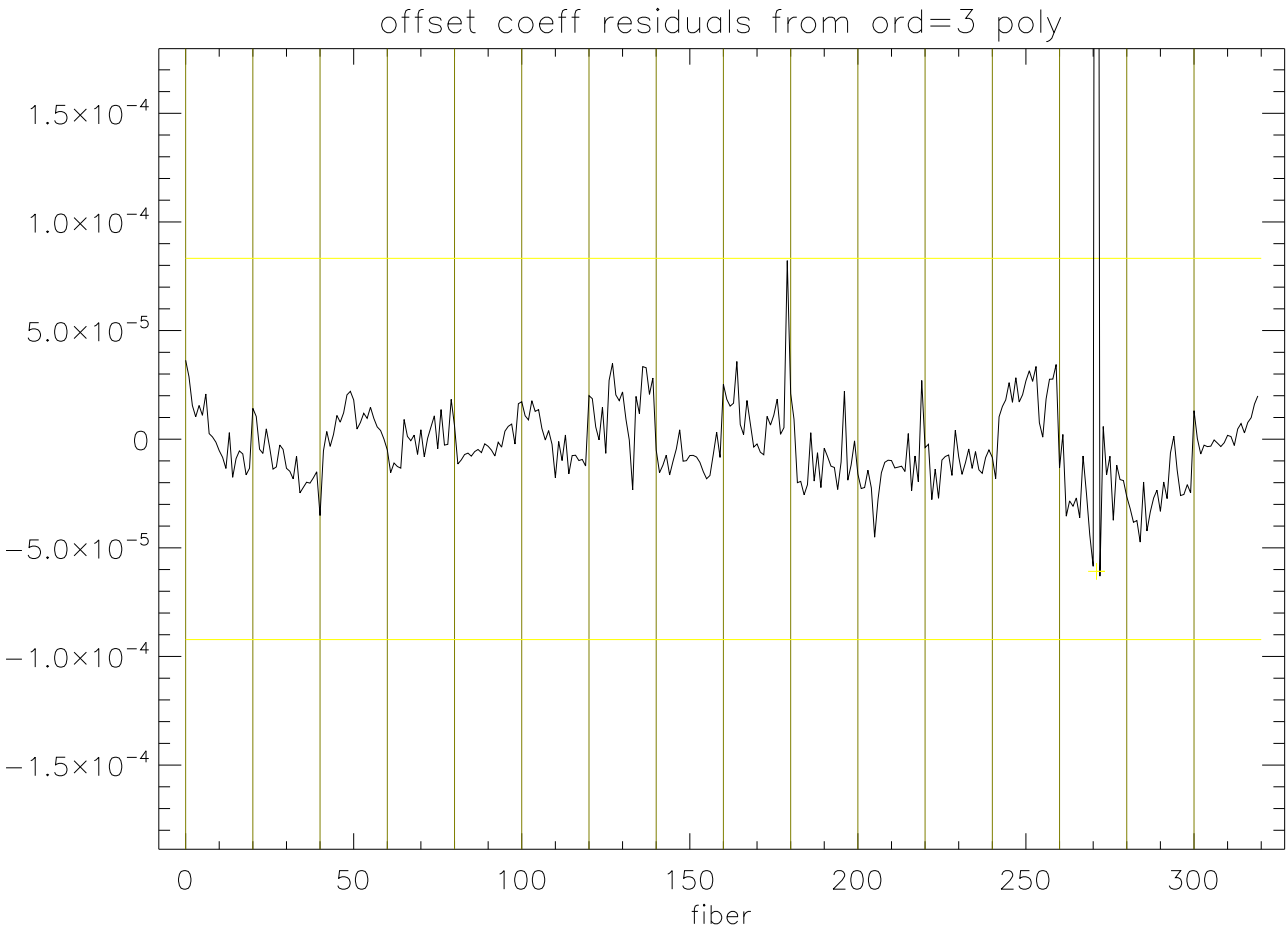

PLATE=2840 MJD=54441 sdR-b2-00047765.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
2000
1500
1000
500
0
-500
5570
5575
5580
5585
5590
λ [A]

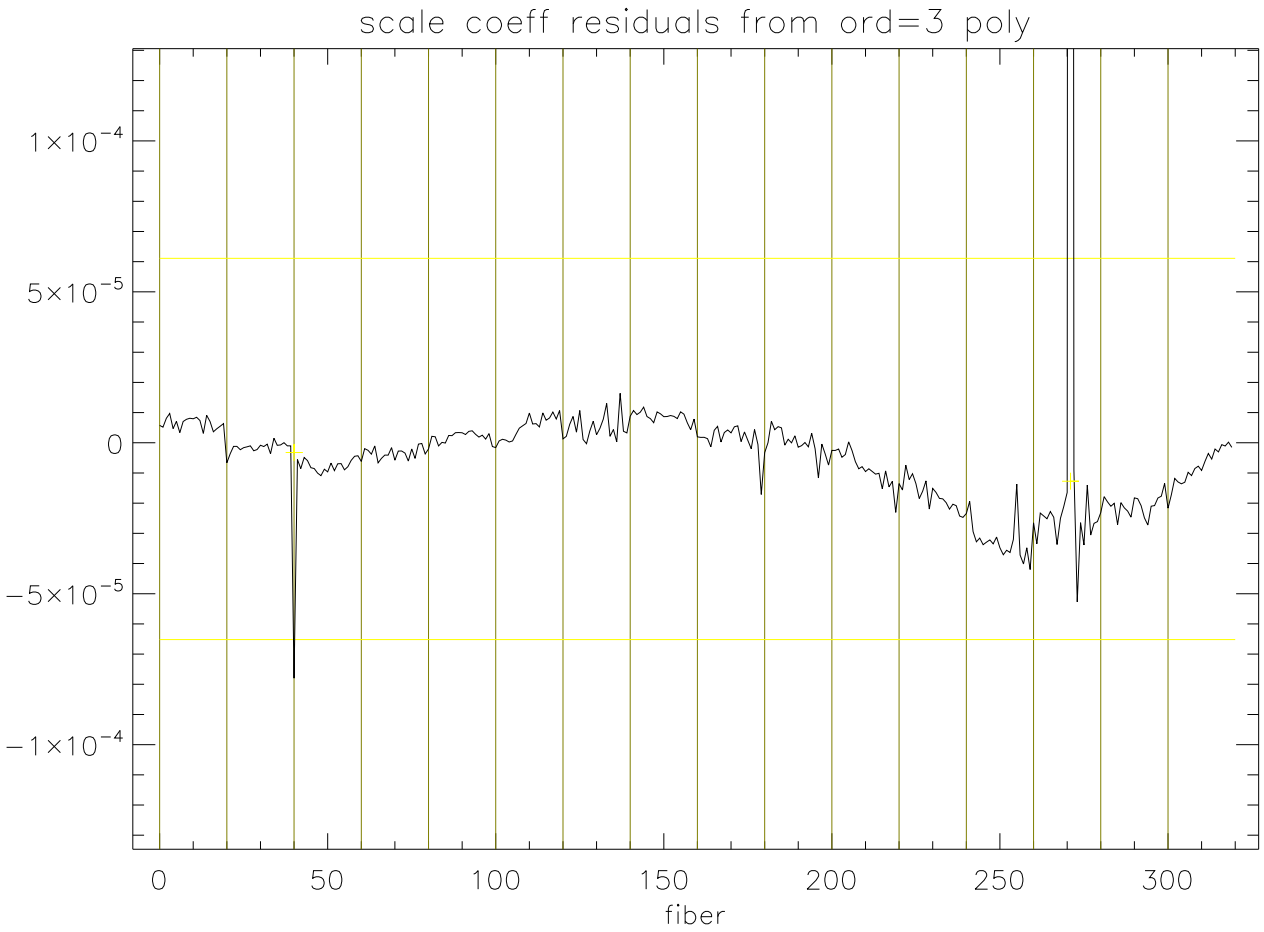

PLATE=2840 MJD=54441 sdR-b2-00047765.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
2000
1500
1000
500
0
-500
5570
5575
5580
5585
5590
λ [A]

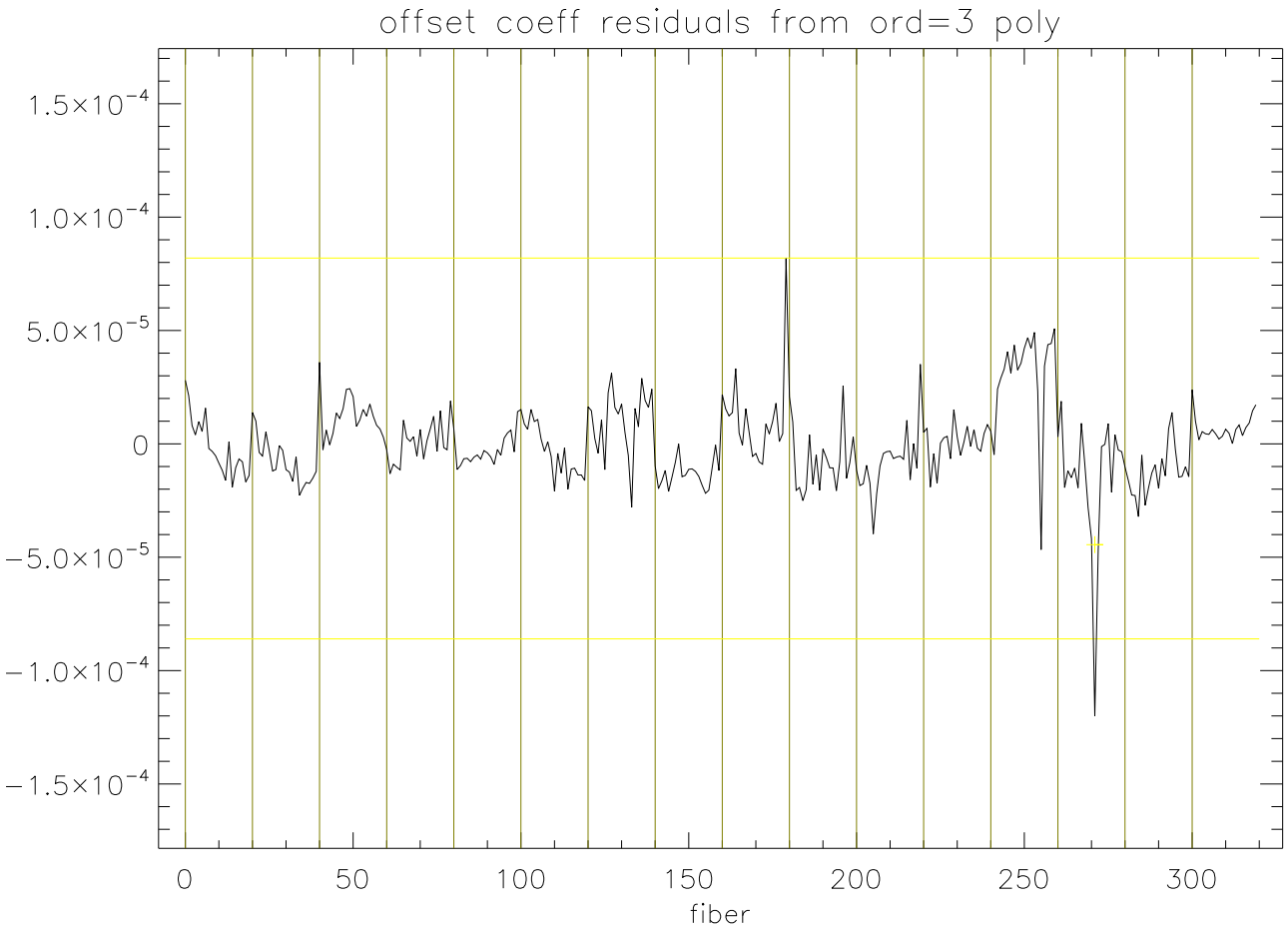

Number of sky fibers = 190
PLATE=2840 MJD=54441 sdR-b2-00047765.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
4000
4200
4400
4600
4800
5000
5200
5400
5600
5800
6000

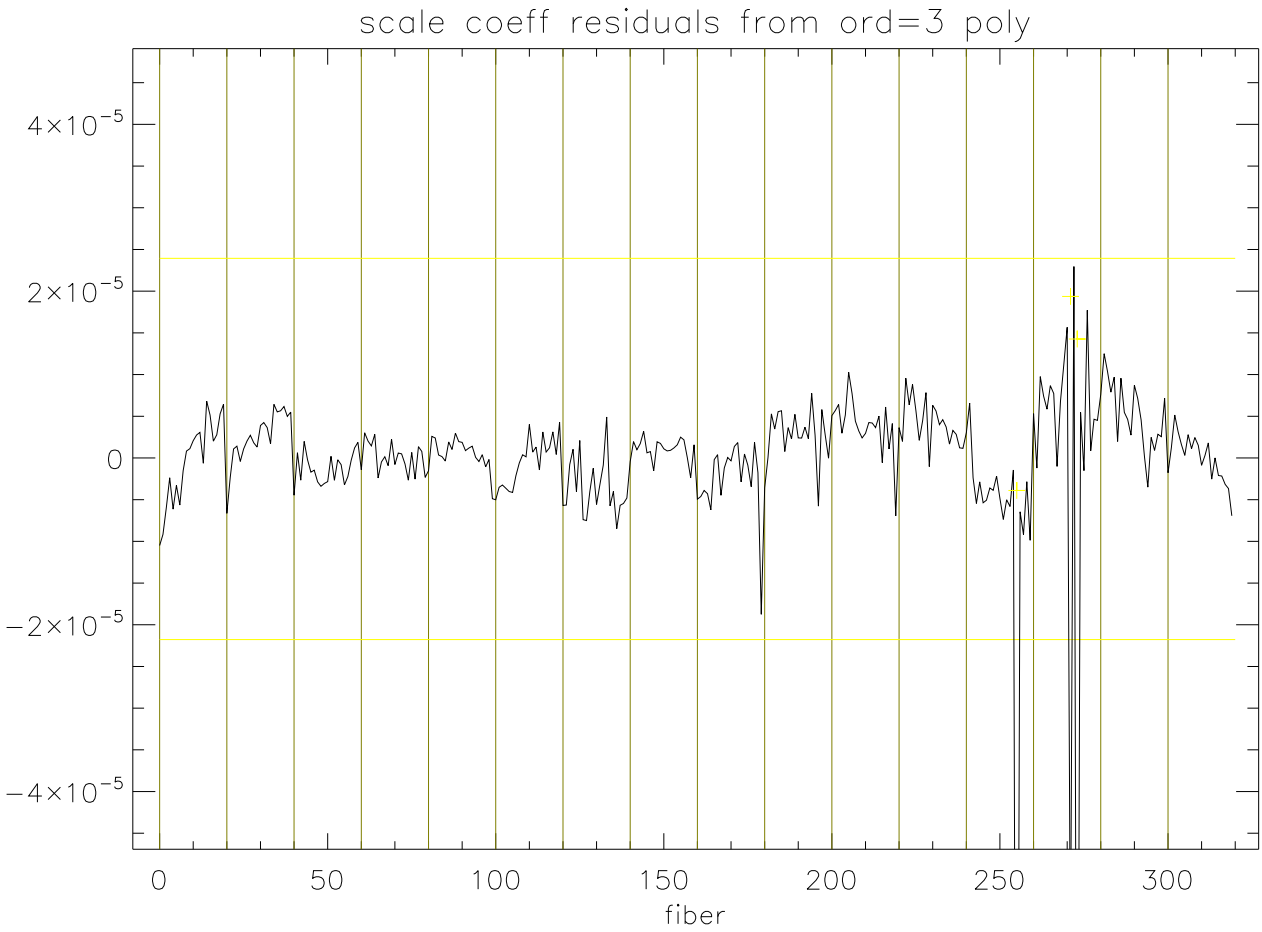

PLATE=2840 MJD=54441 sdR-b2-00047765.fit Skyline Flux at 4359.5
Flux (4359.5)/Airmass
RED = sky fiber
Dispersion = 51.59 %
Fiber number
Flux (4359.5)/Airmass
Focal Distance [mm]
Flux (4359.5)/Airmass
Airmass

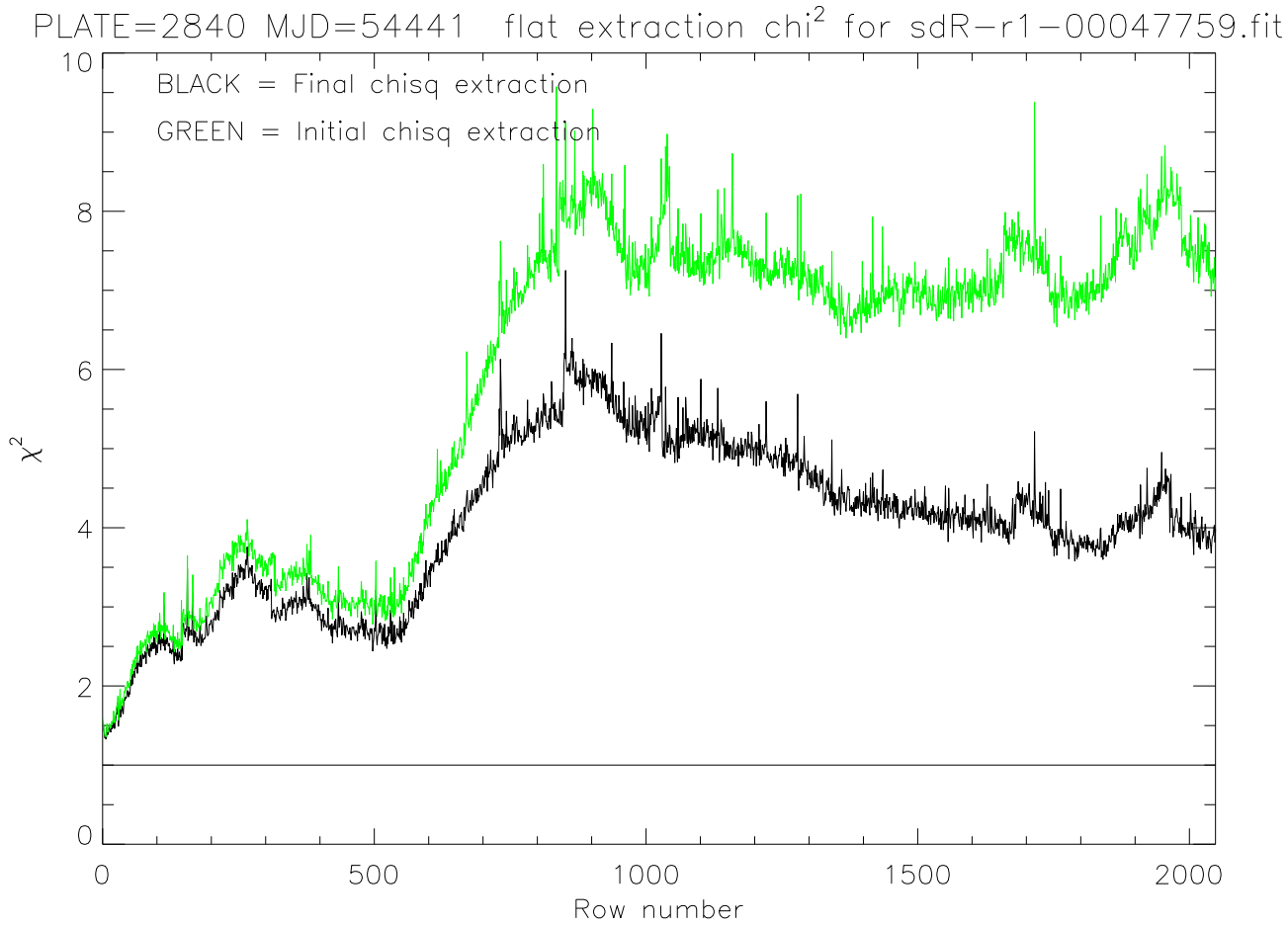

PLATE=2840 MJD=54441 sdR-b2-00047765.fit Skyline Flux at 5578.9
Flux (5578.9)/Airmass
RED = sky fiber
Dispersion = 16.77 %
Fiber number
Flux (5578.9)/Airmass
Focal Distance [mm]
Flux (5578.9)/Airmass
Airmass

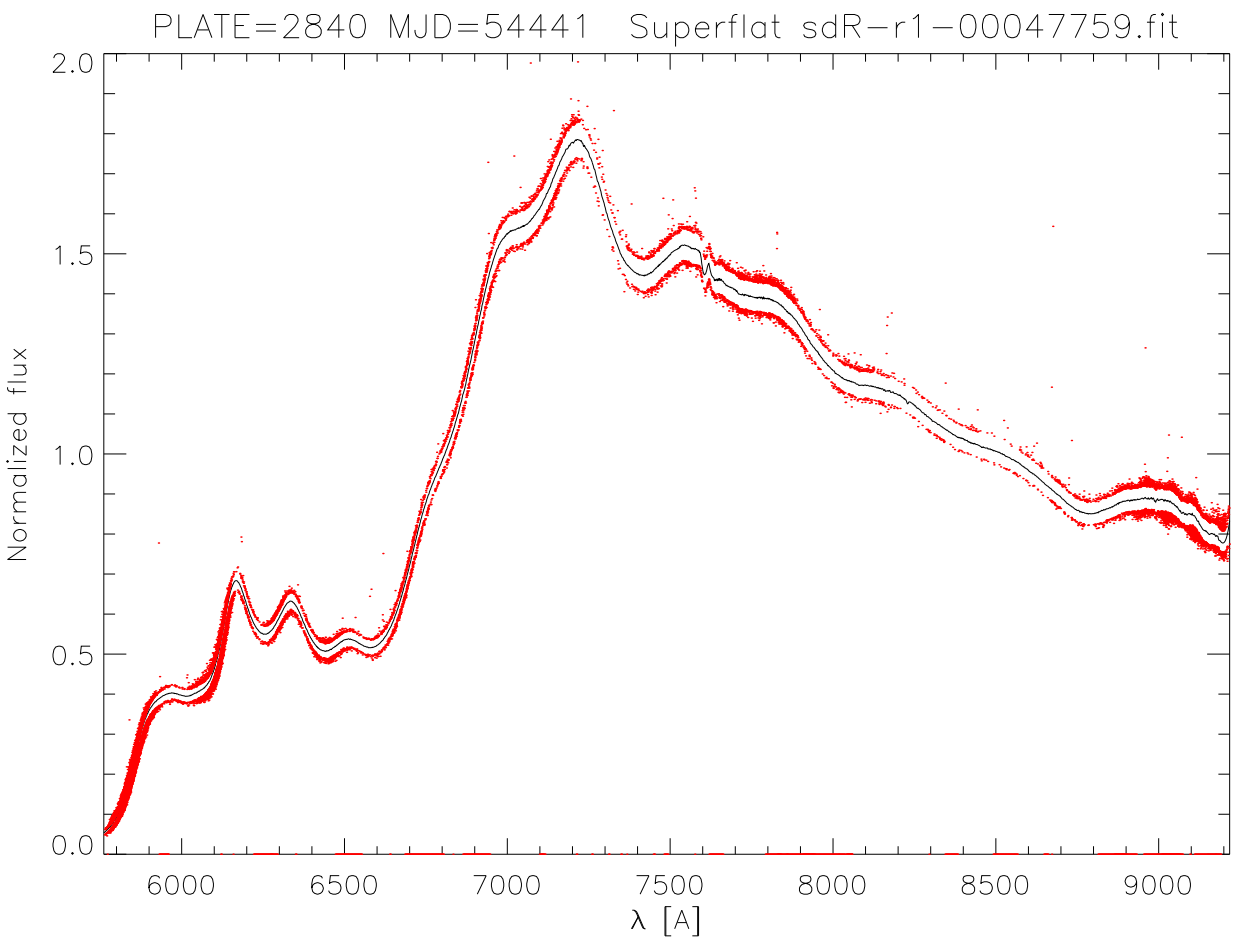

offset coeff residuals from ord=3 poly
1.5×10⁻⁴
1.0×10⁻⁴
5.0×10⁻⁵
0
−5.0×10⁻⁵
−1.0×10⁻⁴
−1.5×10⁻⁴
0
50
100
150
200
250
300
fiber

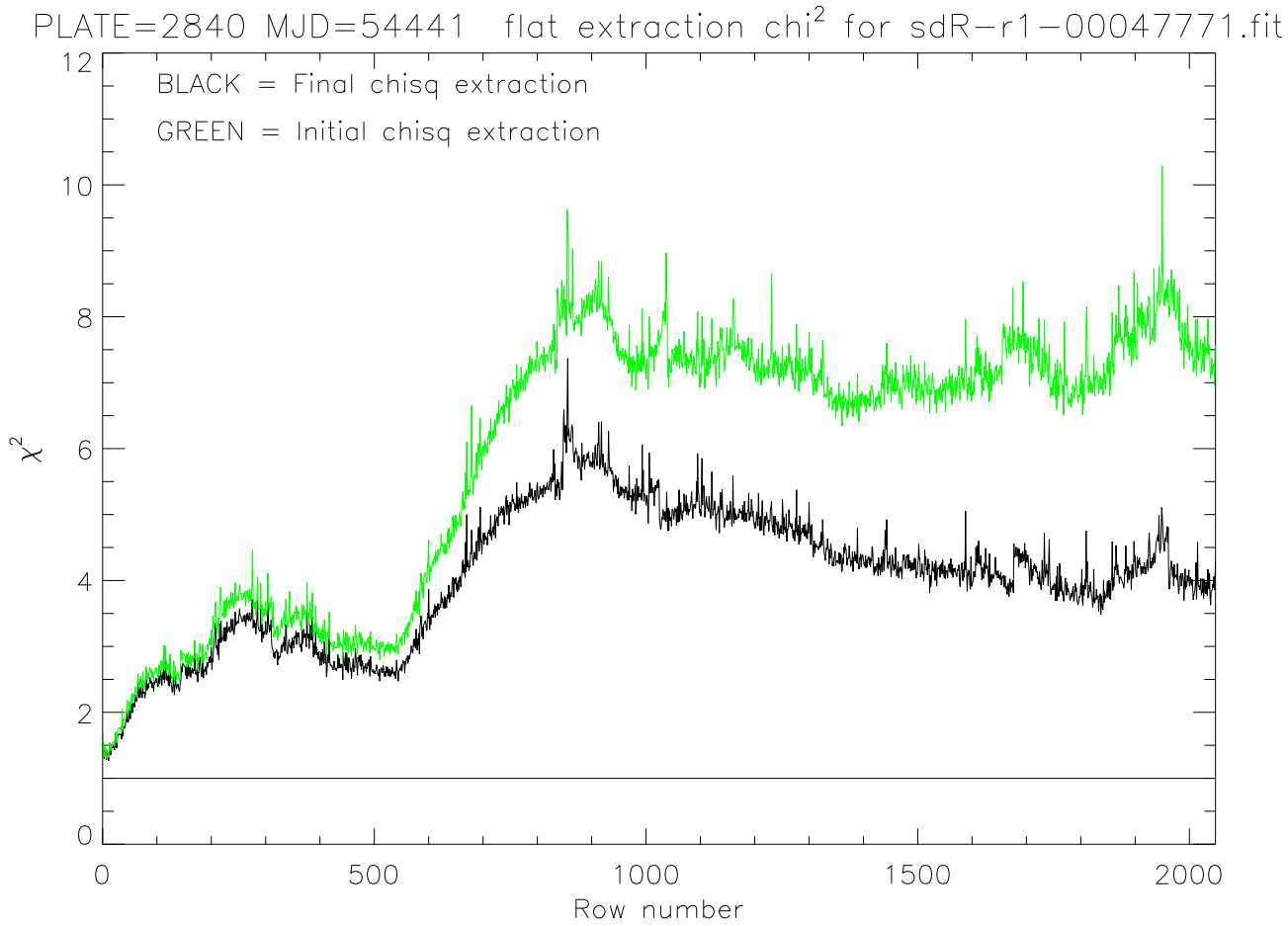

scale coeff residuals from ord=3 poly
1×10^-4
5×10^-5
0
−5×10^-5
−1×10^-4
0
50
100
150
200
250
300
fiber

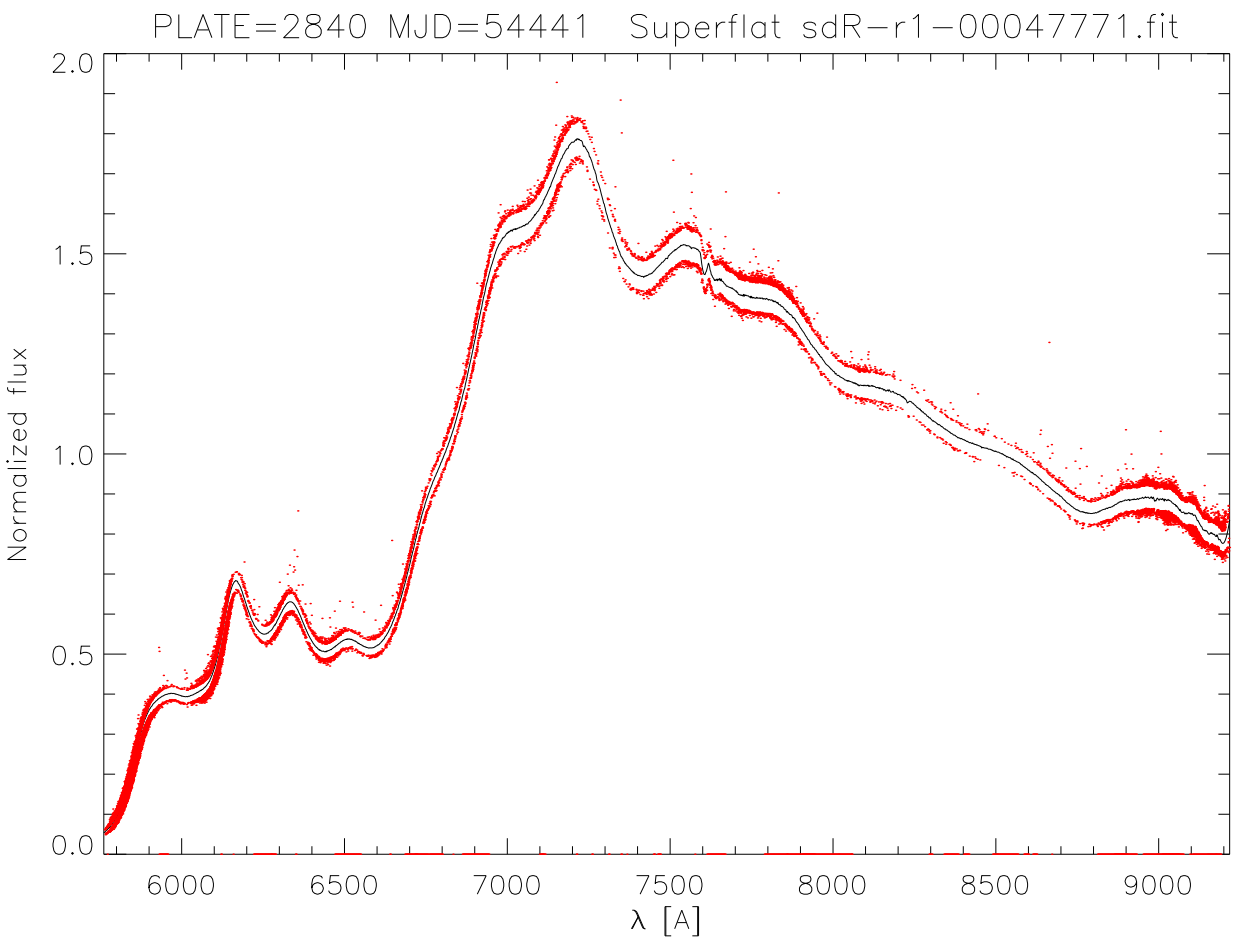

offset coeff residuals from ord=3 poly
1.5×10⁻⁴
1.0×10⁻⁴
5.0×10⁻⁵
0
−5.0×10⁻⁵
−1.0×10⁻⁴
−1.5×10⁻⁴
0
50
100
150
200
250
300
fiber

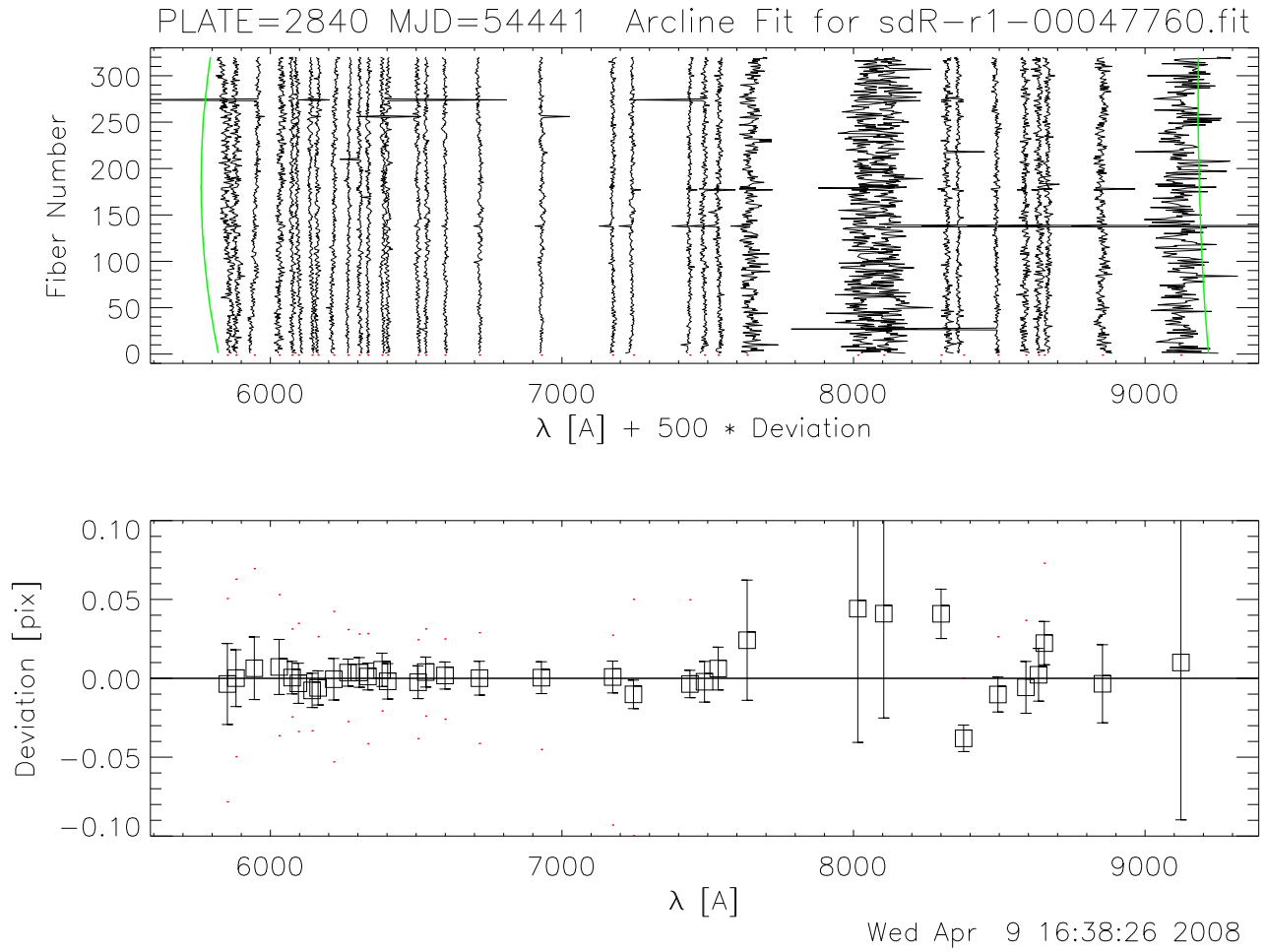

scale coeff residuals from ord=3 poly
4×10⁻⁵
2×10⁻⁵
0
−2×10⁻⁵
−4×10⁻⁵
0
50
100
150
200
250
300
fiber

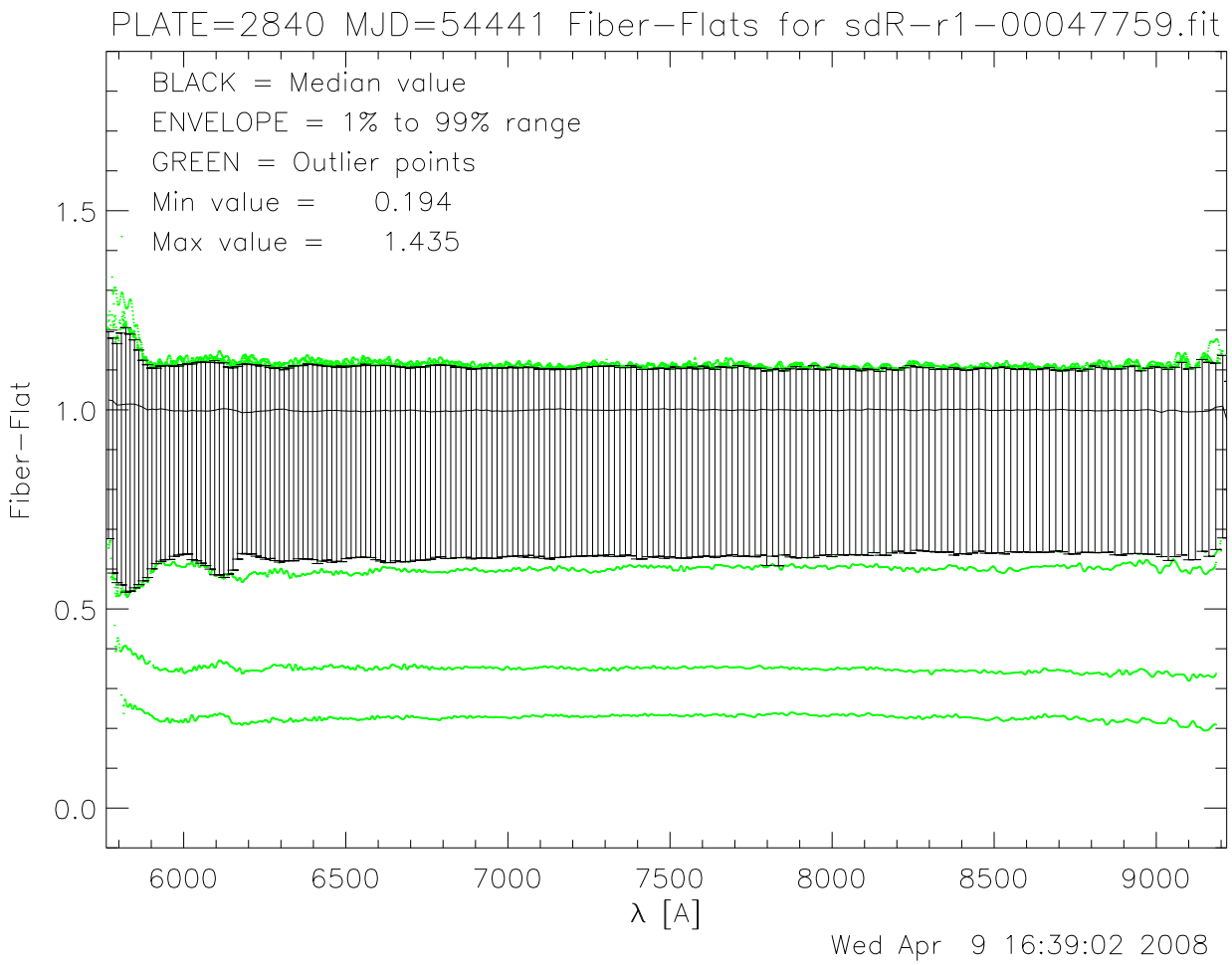

PLATE=2840 MJD=54441 flat extraction chi^2 for sdR−r1−00047759.fit
BLACK = Final chisq extraction
GREEN = Initial chisq extraction
χ^2
Row number
0
2
4
6
8
10
0
500
1000
1500
2000

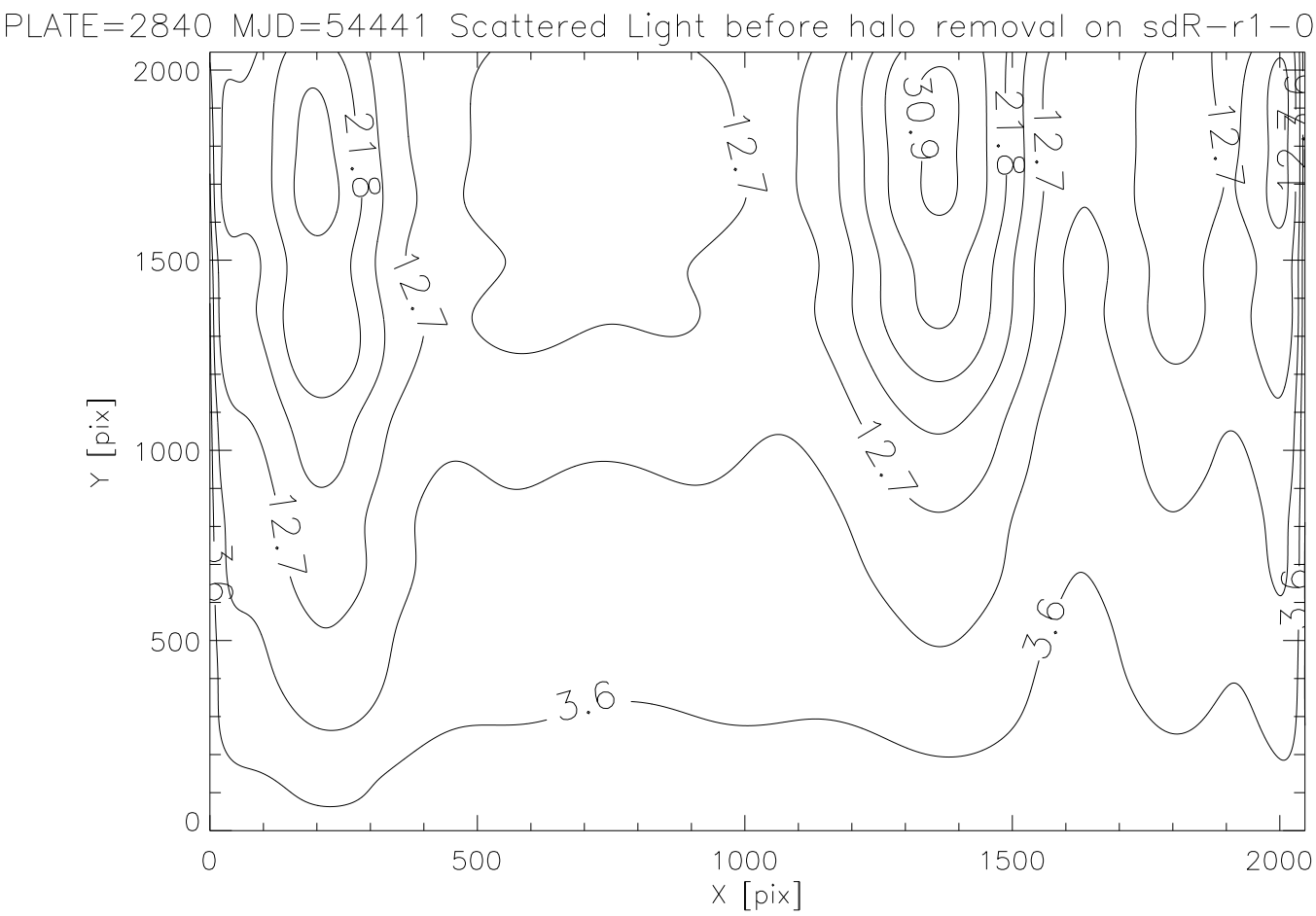

PLATE=2840 MJD=54441 Superflat sdR-r1-00047759.fit
Normalized flux
2.0
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]

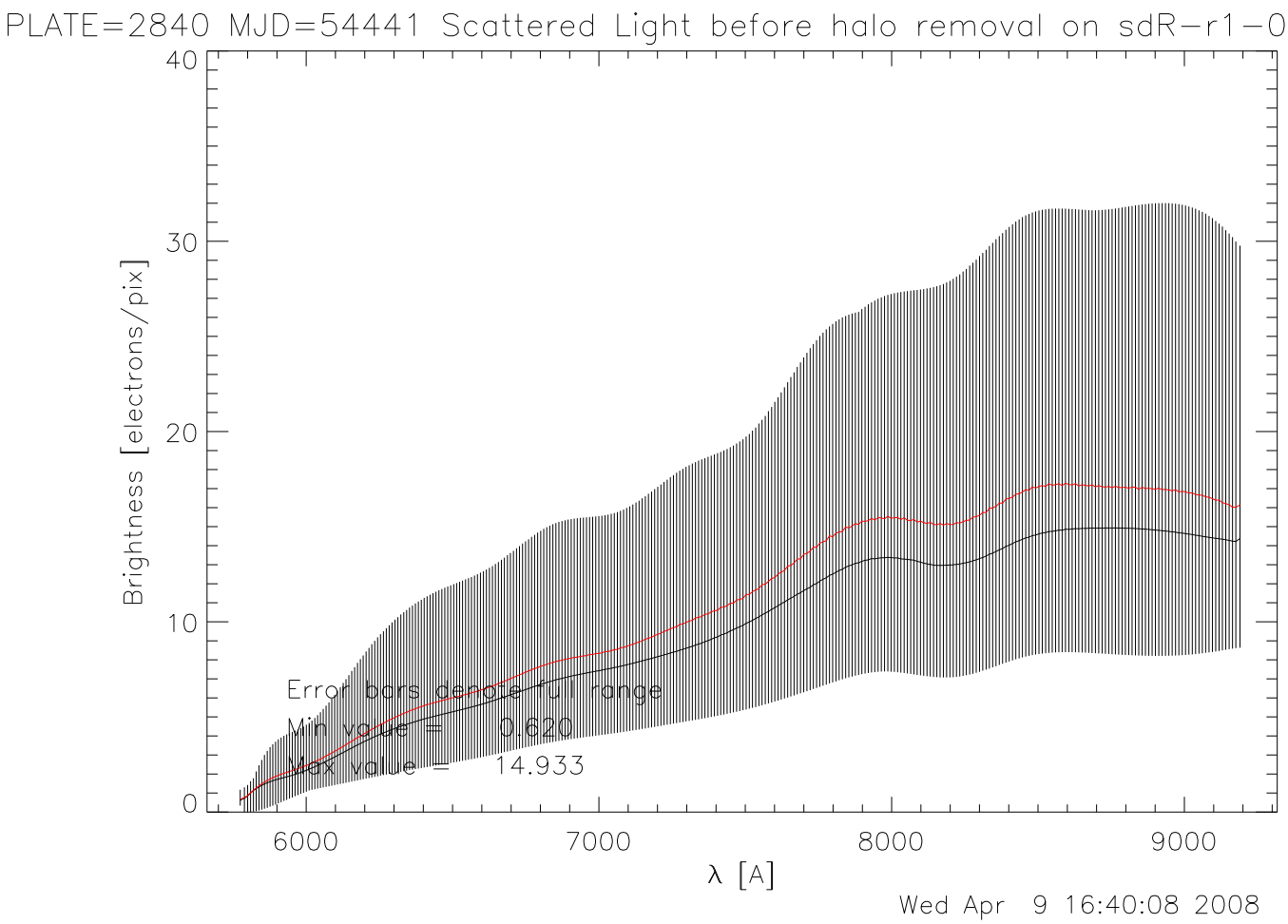

PLATE=2840 MJD=54441 flat extraction chi^2 for sdR−r1−00047771.fit
BLACK = Final chisq extraction
GREEN = Initial chisq extraction
χ^2
Row number
0
2
4
6
8
10
12
0
500
1000
1500
2000

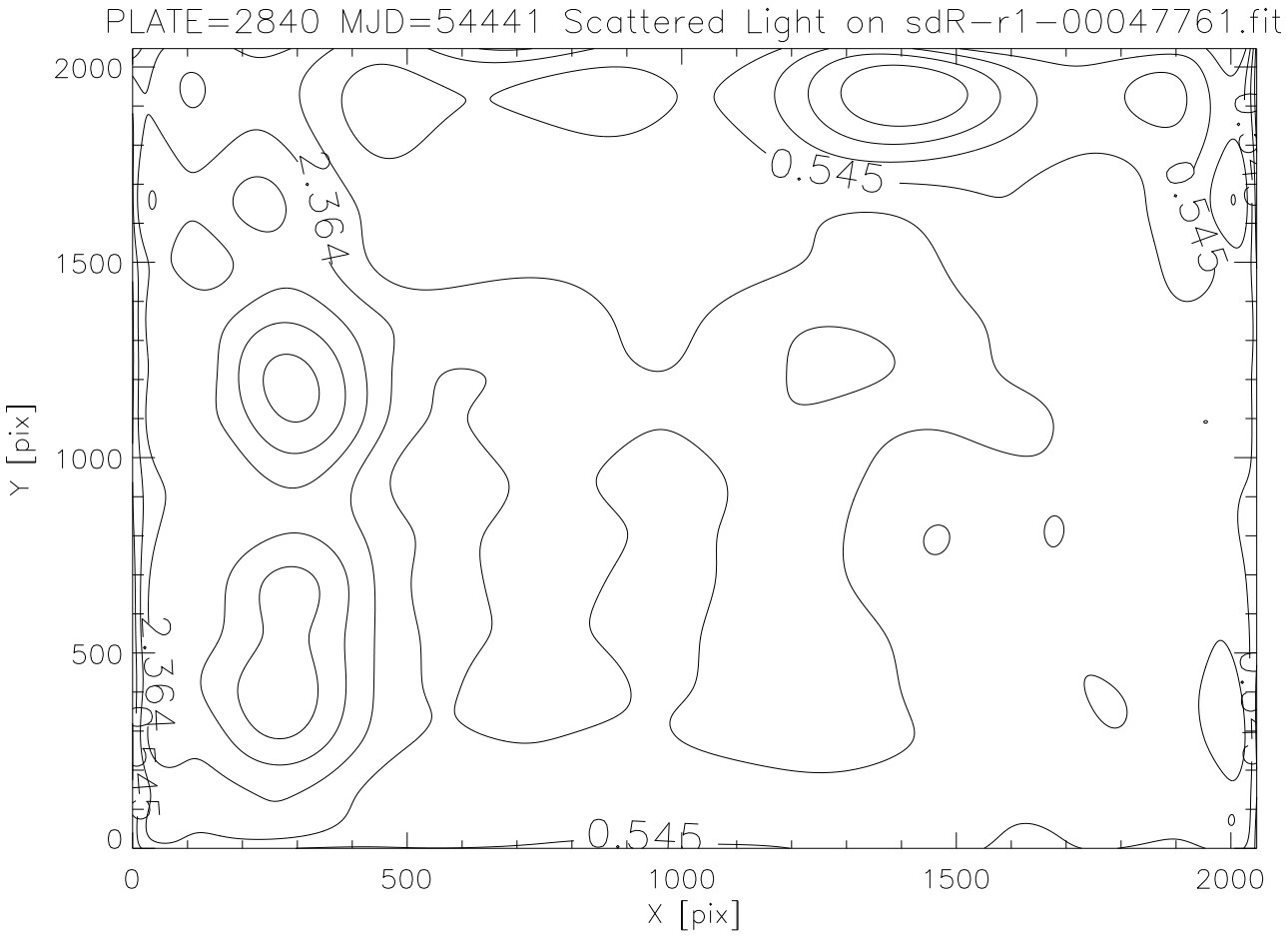

PLATE=2840 MJD=54441 Superflat sdR-r1-00047771.fit
Normalized flux
2.0
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]

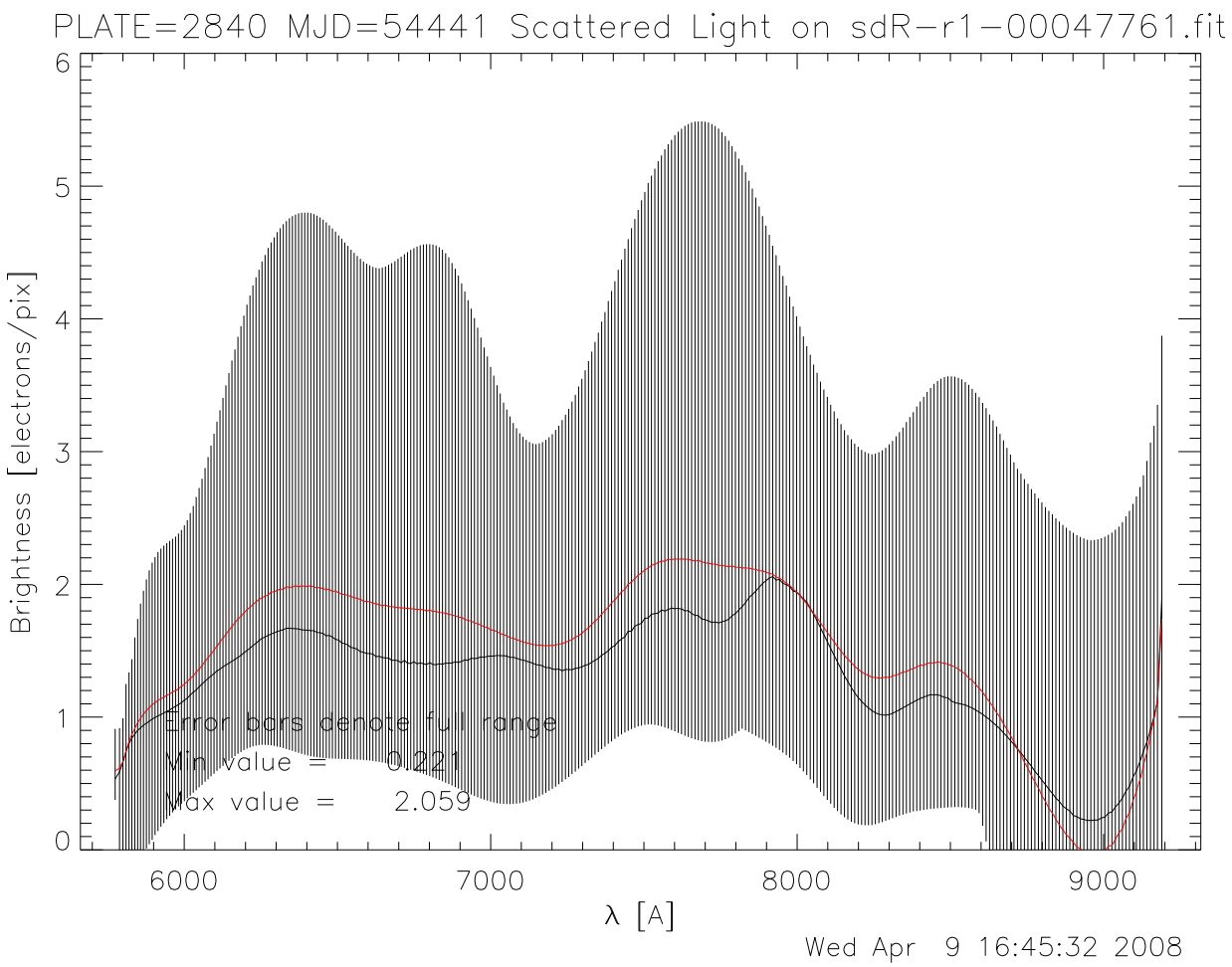

PLATE=2840 MJD=54441 Arcline Fit for sdR-r1-00047760.fit
Fiber Number
300
250
200
150
100
50
0
6000
7000
8000
9000
λ [A] + 500 * Deviation
Deviation [pix]
0.10
0.05
0.00
−0.05
−0.10
6000
7000
8000
9000
λ [A]
Wed Apr 9 16:38:26 2008

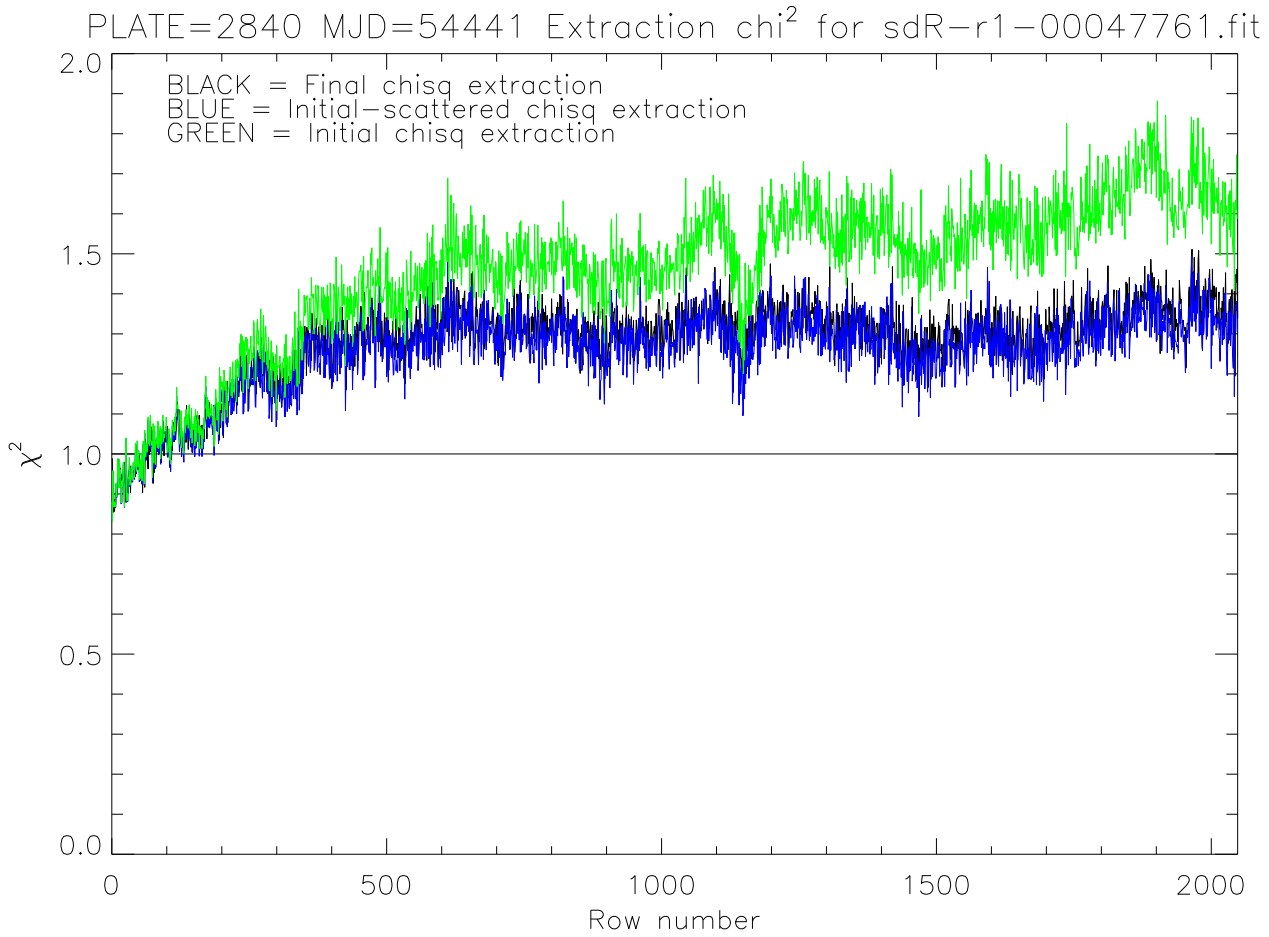

PLATE=2840 MJD=54441 Fiber−Flats for sdR−r1−00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.194
Max value = 1.435
Fiber−Flat
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]
Wed Apr 9 16:39:02 2008

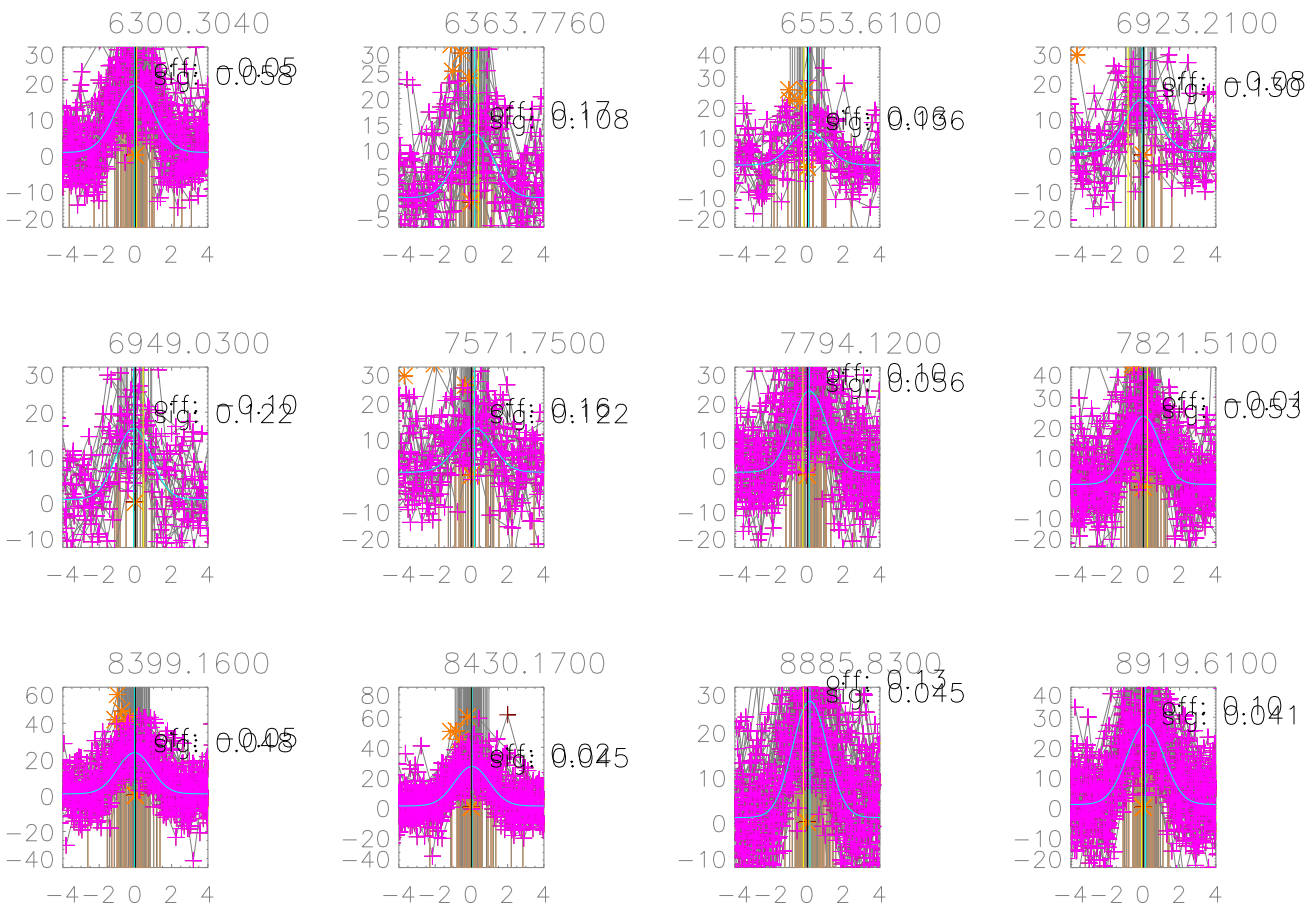

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR−r1−00047761.fi
Y [pix]
X [pix]
0
500
1000
1500
2000
30.9
21.8
12.7
3.6

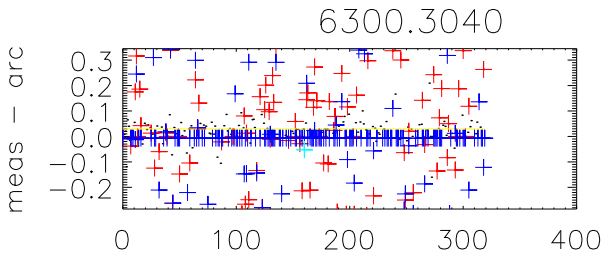

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r1-00047761.fi
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.620
Max value = 14.933
Wed Apr 9 16:40:08 2008

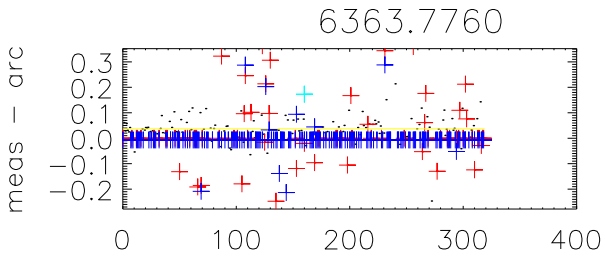

PLATE=2840 MJD=54441 Scattered Light on sdR-r1-00047761.fit
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
2.364
0.545
0.545
2.364
0.545
0.545

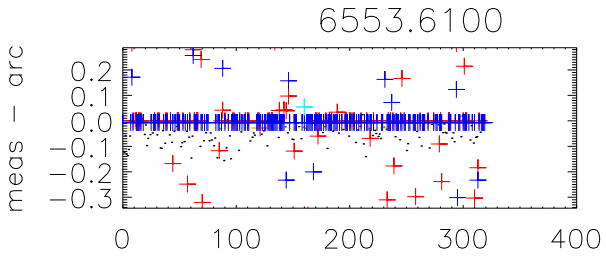

PLATE=2840 MJD=54441 Scattered Light on sdR-r1-00047761.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.221
Max value = 2.059
Wed Apr 9 16:45:32 2008

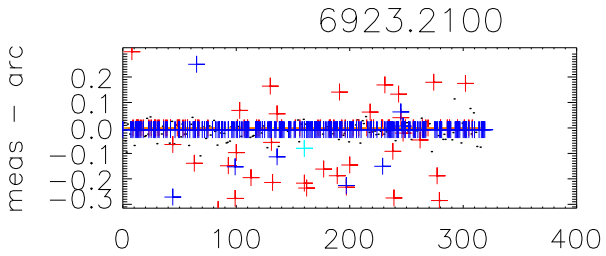

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-r1-00047761.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
2.0
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

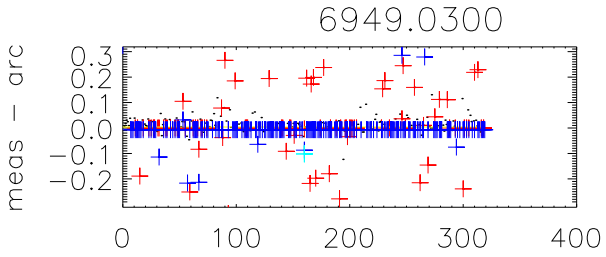

6300.3040
eff: 0.05
sig: 0.058
6363.7760
eff: 0.17
sig: 0.108
6553.6100
eff: 0.08
sig: 0.056
6923.2100
eff: 0.08
sig: 0.130
6949.0300
eff: 0.10
sig: 0.122
7571.7500
eff: 0.16
sig: 0.122
7794.1200
eff: 0.10
sig: 0.056
7821.5100
eff: 0.01
sig: 0.053
8399.1600
eff: 0.05
sig: 0.048
8430.1700
eff: 0.02
sig: 0.045
8885.8300
eff: 0.13
sig: 0.045
8919.6100
eff: 0.10
sig: 0.041

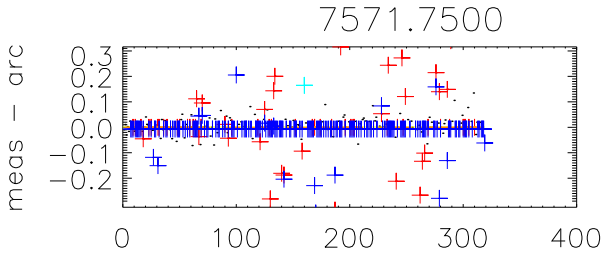

6300.3040
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

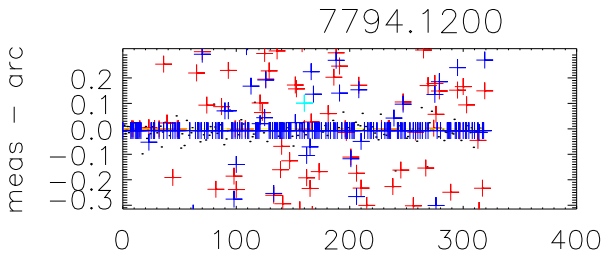

6363.7760
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

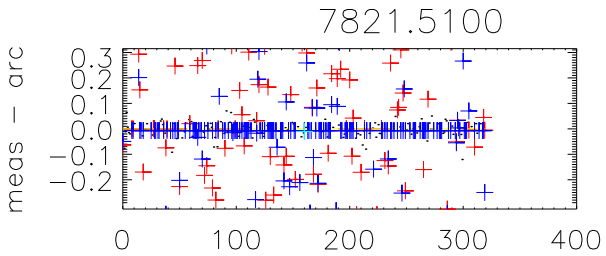

6553.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

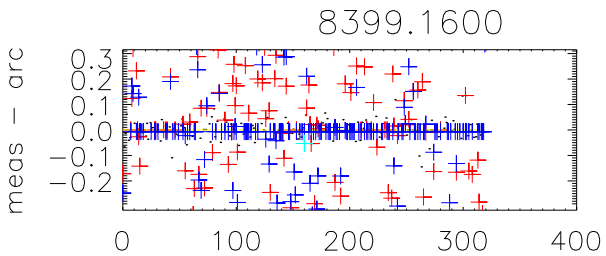

6923.2100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

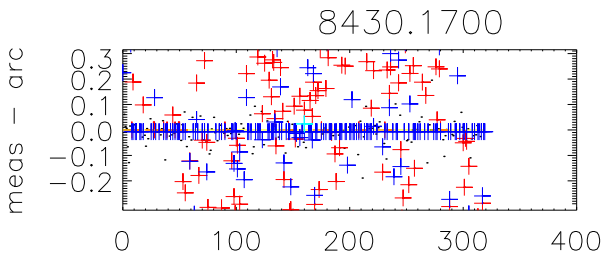

6949.0300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

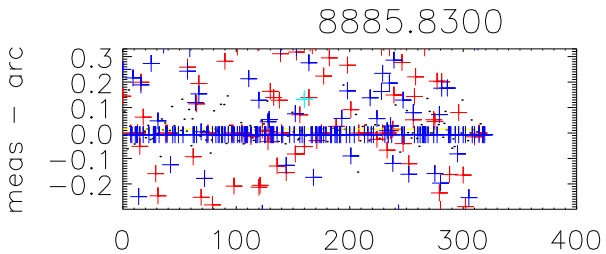

7571.7500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

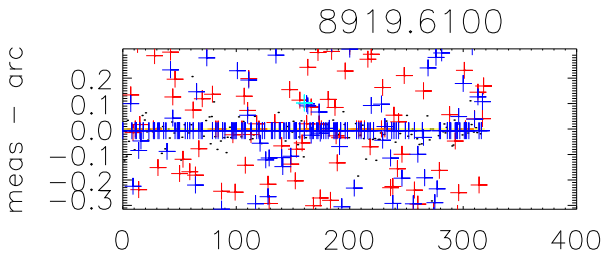

7794.1200
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

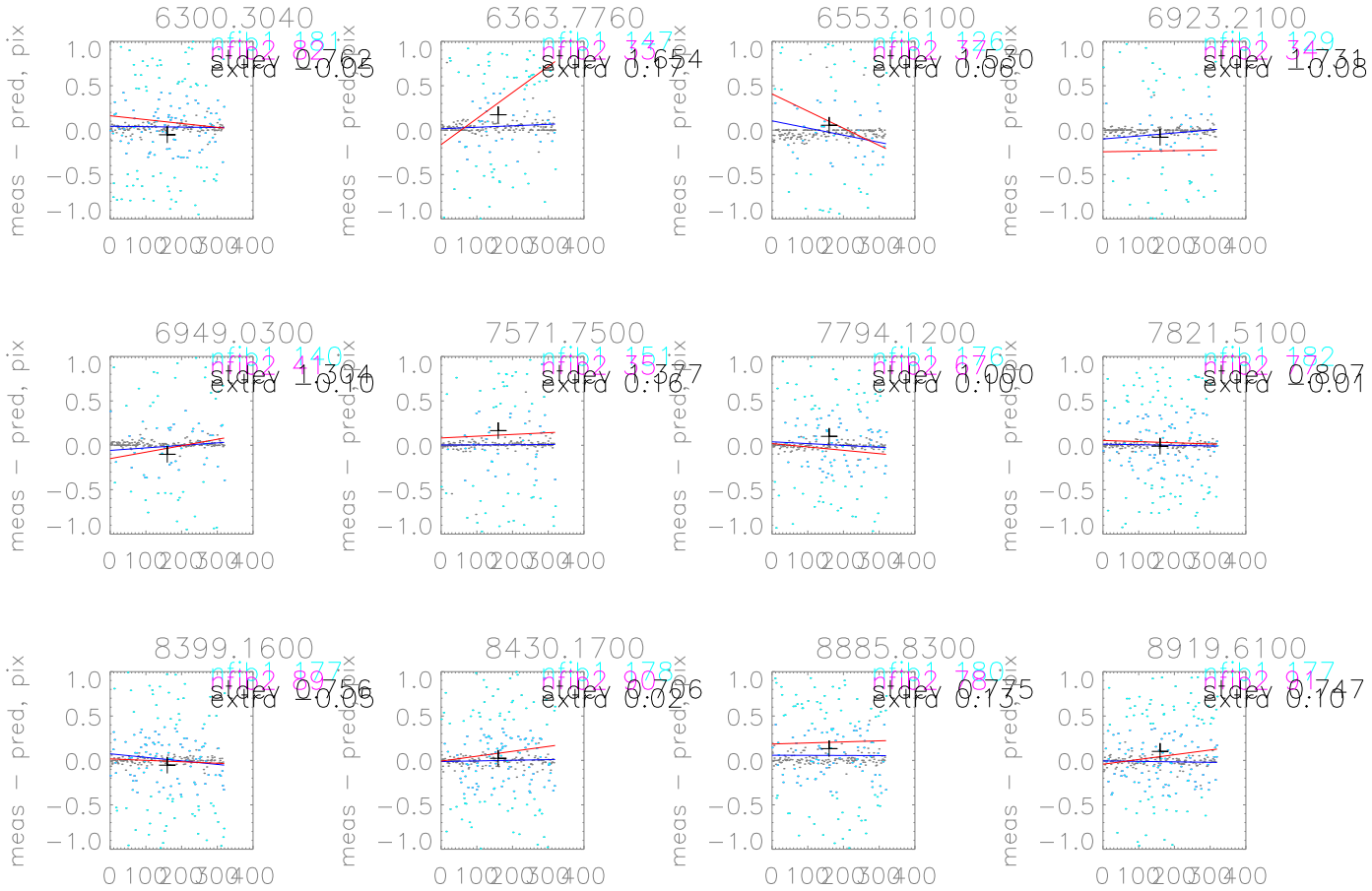

7821.5100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

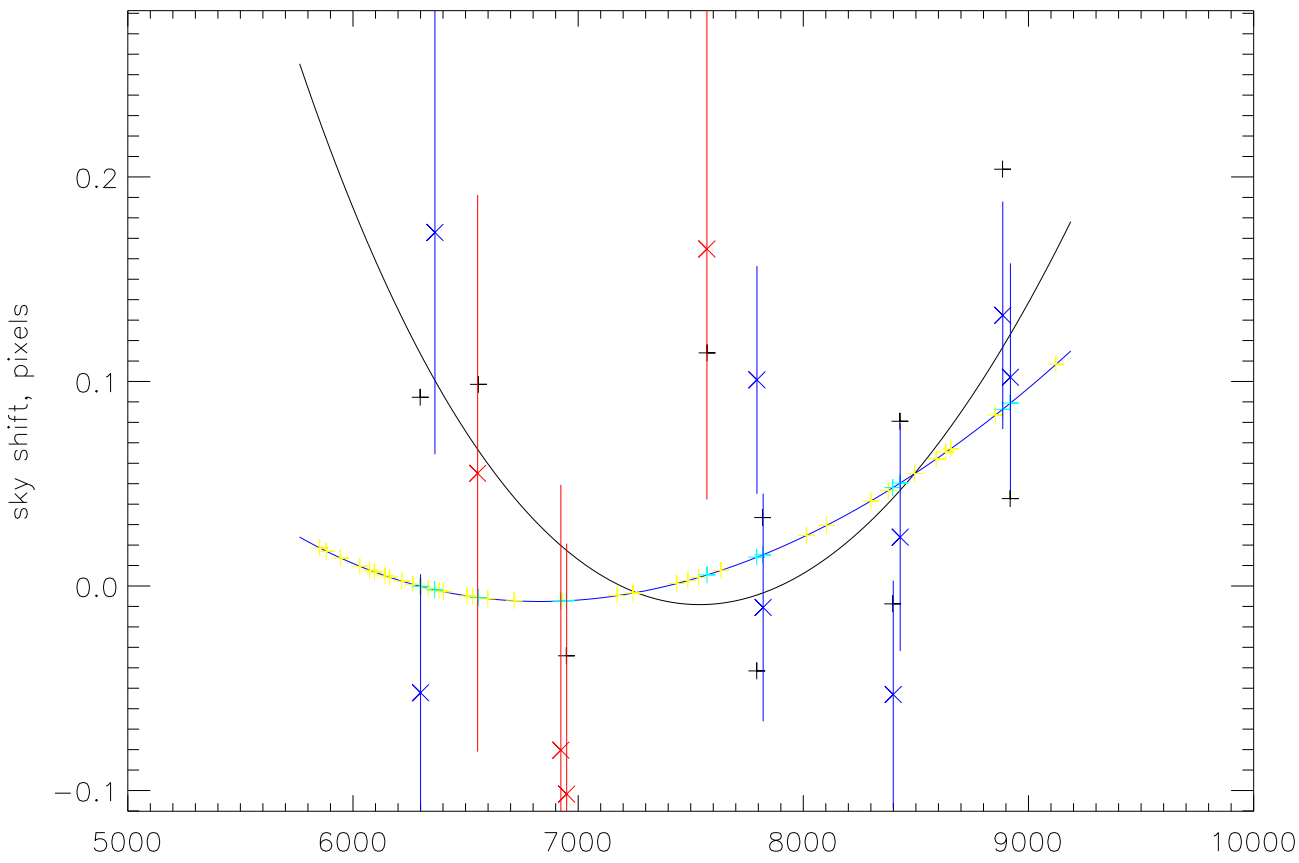

8399.1600
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

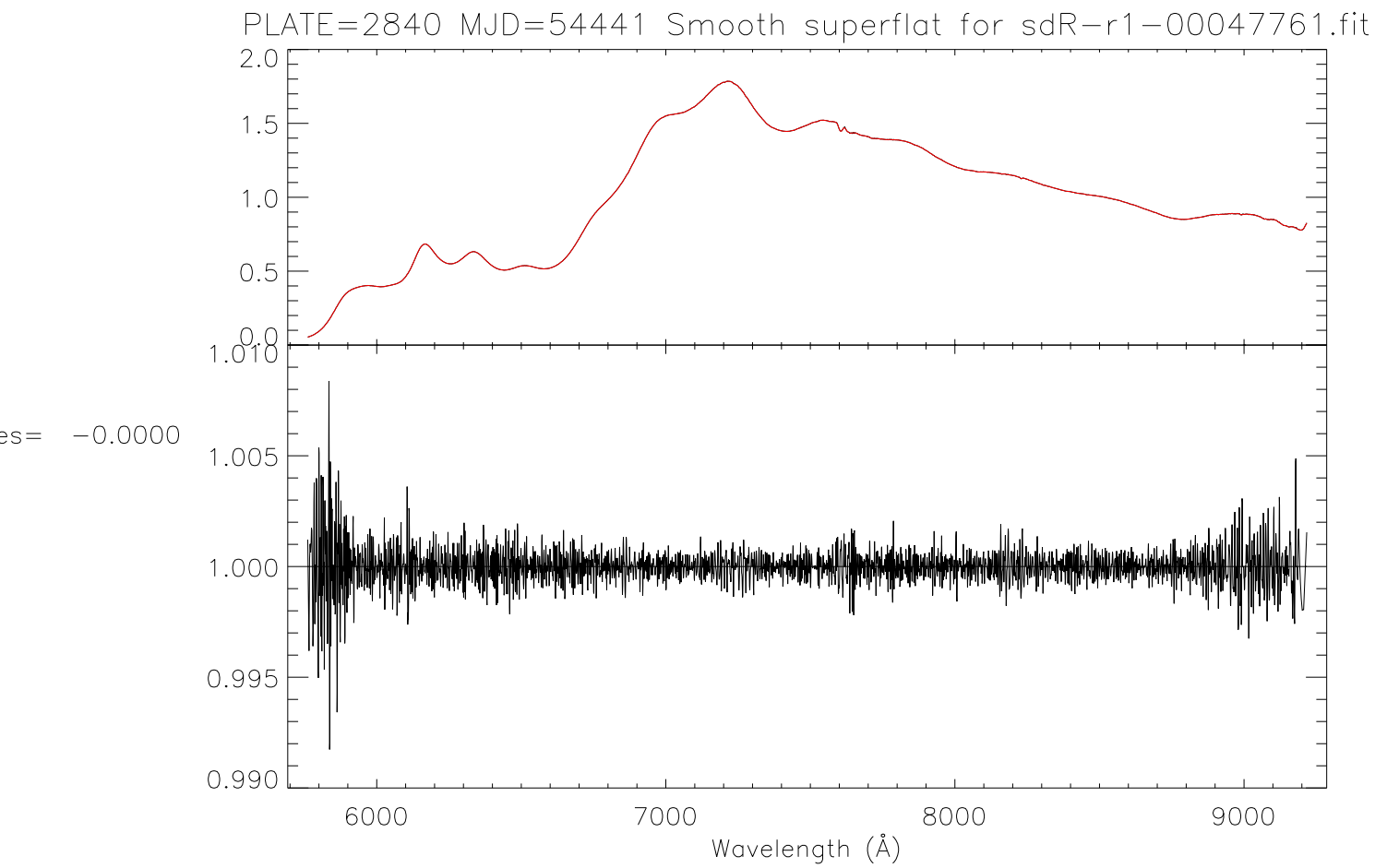

8430.1700
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

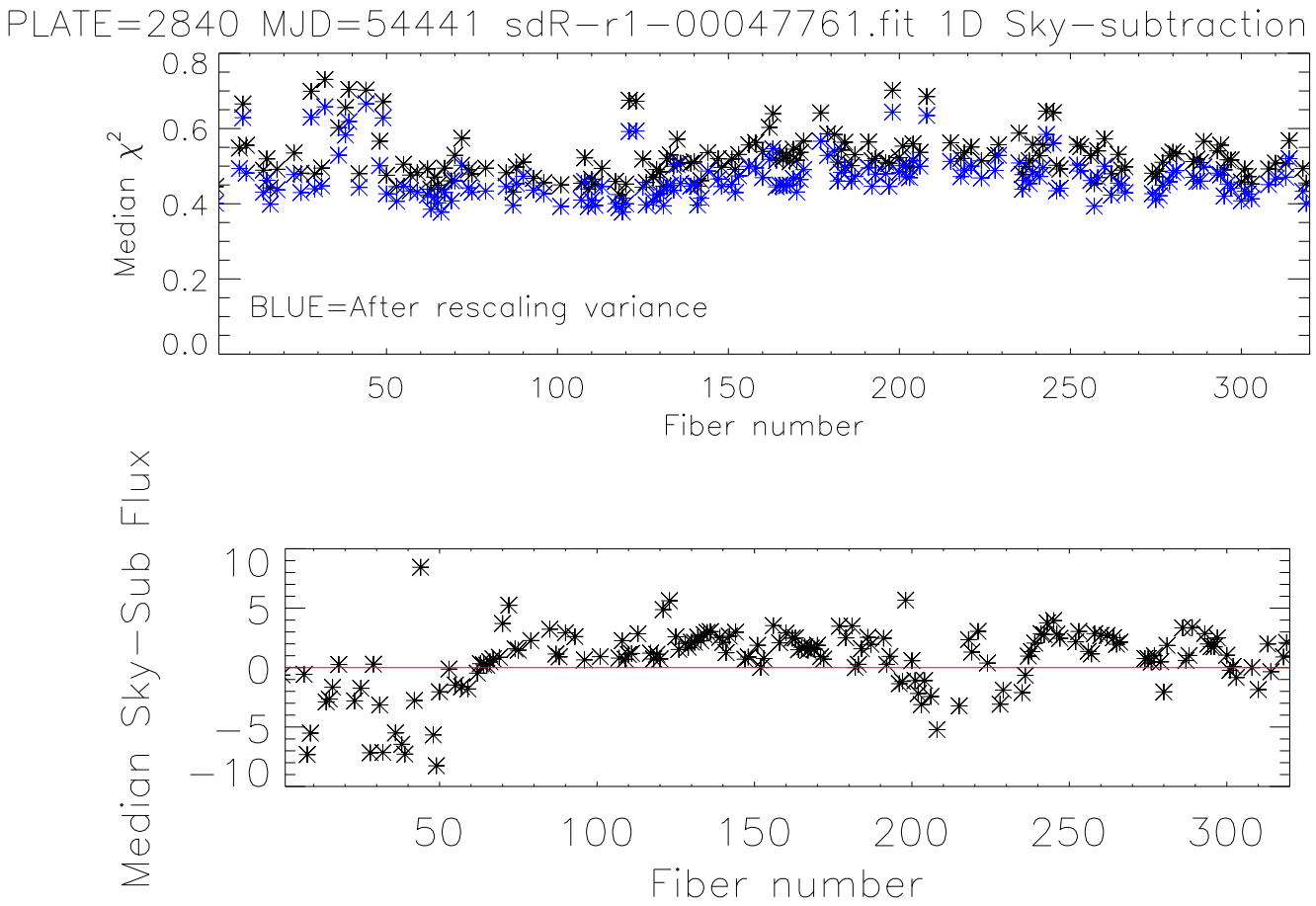

8885.8300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

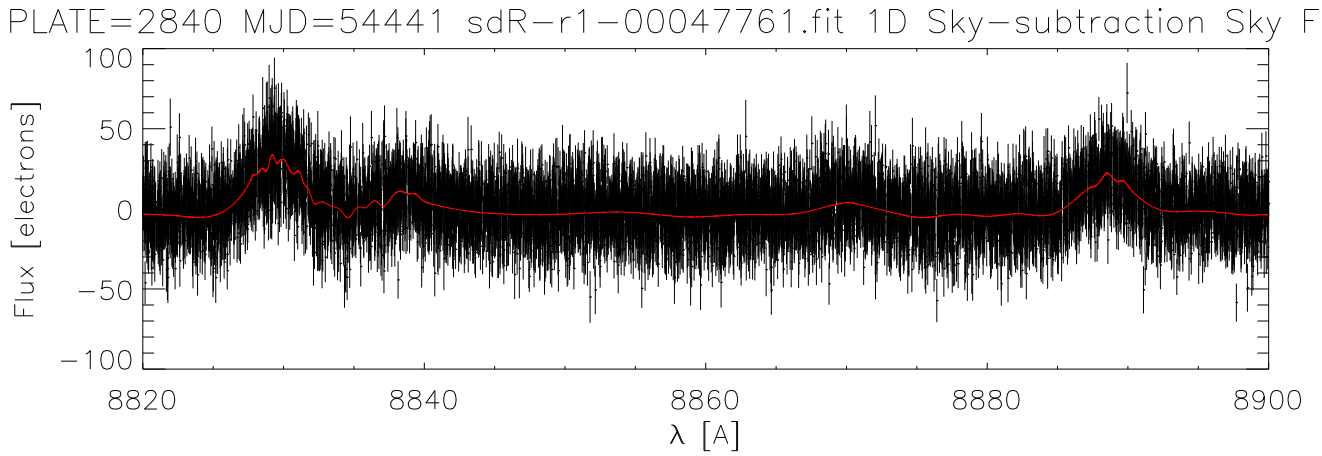

8919.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

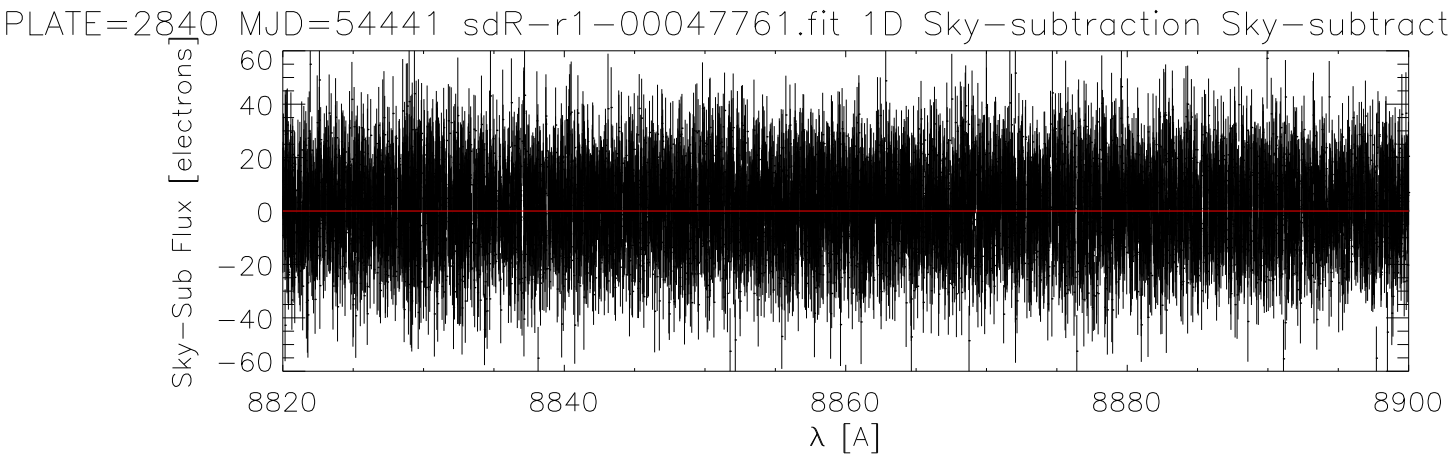

6300.3040
mfb1 181
mfb2 82
stdev 0.762
extra −0.05
6363.7760
mfb1 147
mfb2 134
stdev 1.654
extra 0.17
6553.6100
mfb1 126
mfb2 176
stdev 1.530
extra 0.06
6923.2100
mfb1 129
mfb2 147
stdev 1.731
extra −0.08
6949.0300
mfb1 140
mfb2 41
stdev 1.304
extra −0.10
7571.7500
mfb1 151
mfb2 135
stdev 1.377
extra 0.16
7794.1200
mfb1 176
mfb2 67
stdev 1.000
extra 0.10
7821.5100
mfb1 182
mfb2 72
stdev 0.807
extra −0.01
8399.1600
mfb1 177
mfb2 89
stdev 0.756
extra −0.05
8430.1700
mfb1 178
mfb2 107
stdev 0.706
extra 0.02
8885.8300
mfb1 180
mfb2 78
stdev 0.775
extra 0.13
8919.6100
mfb1 177
mfb2 91
stdev 0.747
extra 0.10
meas − pred, pix
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0 100 200 300 400

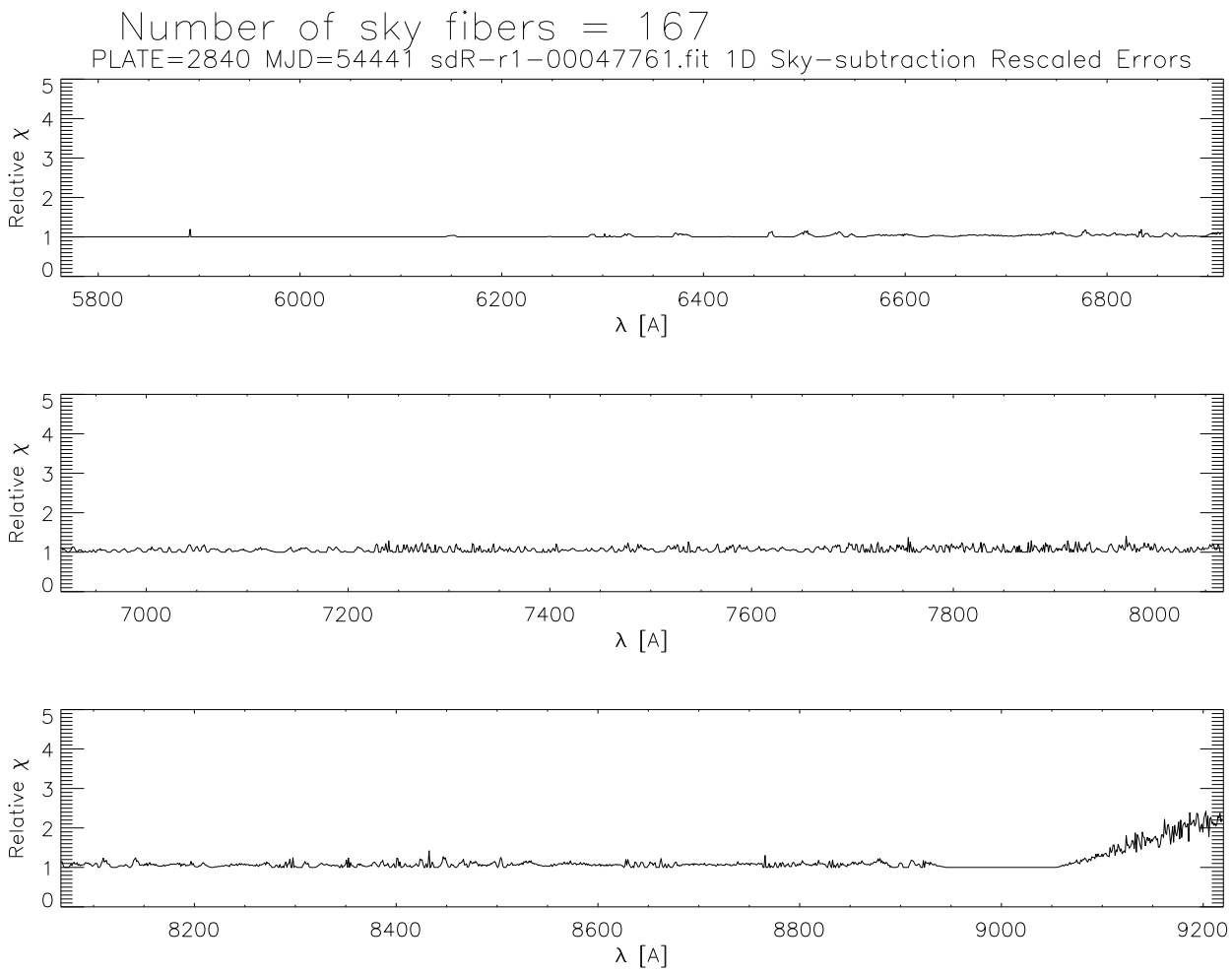

sky shift, pixels
0.2
0.1
0.0
−0.1
5000
6000
7000
8000
9000
10000

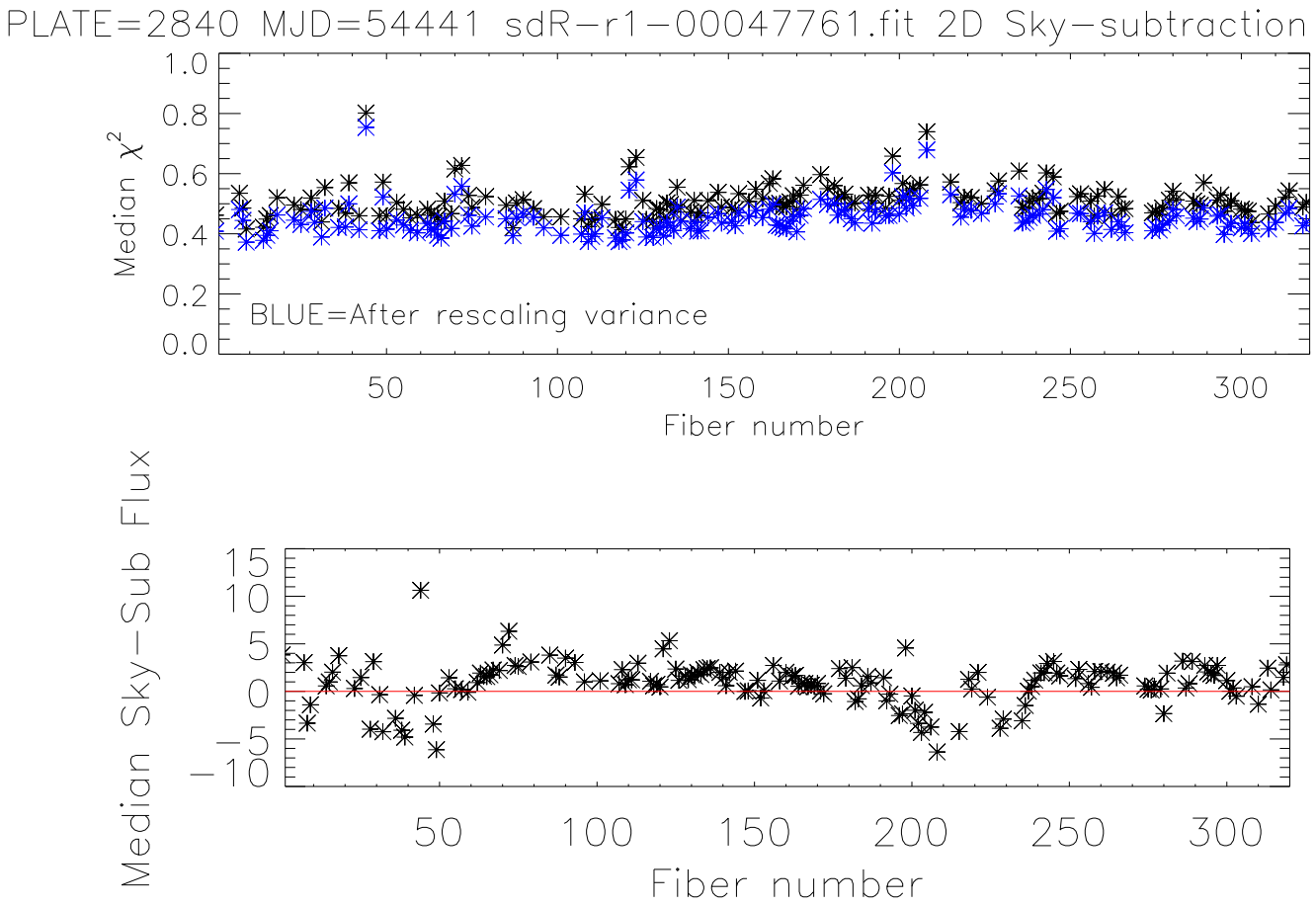

PLATE=2840 MJD=54441 Smooth superflat for sdR-r1-00047761.fit
2.0
1.5
1.0
0.5
0.0
1.010
1.005
1.000
0.995
0.990
es= −0.0000
6000
7000
8000
9000
Wavelength (Å)

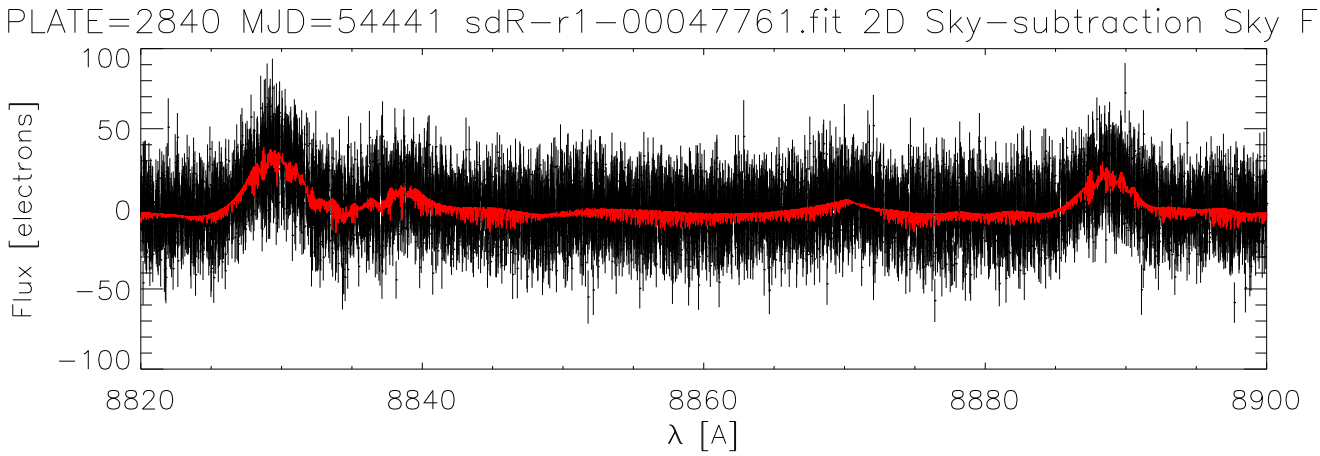

PLATE=2840 MJD=54441 sdR-r1-00047761.fit 1D Sky-subtraction Sky Fibers
Median χ^2
0.0
0.2
0.4
0.6
0.8
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
10
5
0
−5
−10
50
100
150
200
250
300
Fiber number

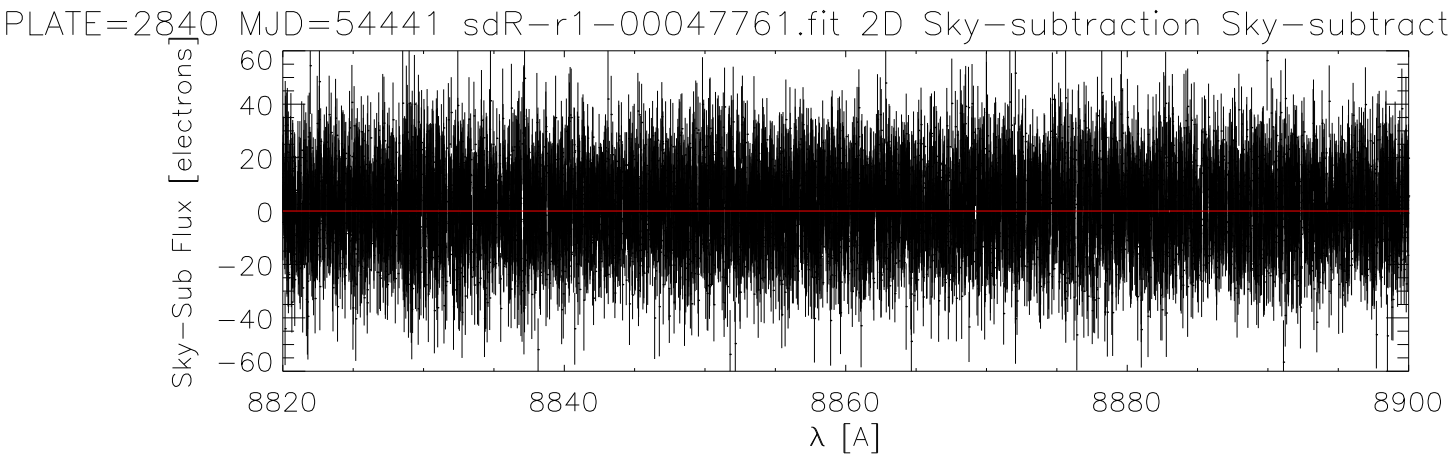

PLATE=2840 MJD=54441 sdR-r1-00047761.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
100
50
0
−50
−100
8820
8840
8860
8880
8900
λ [A]

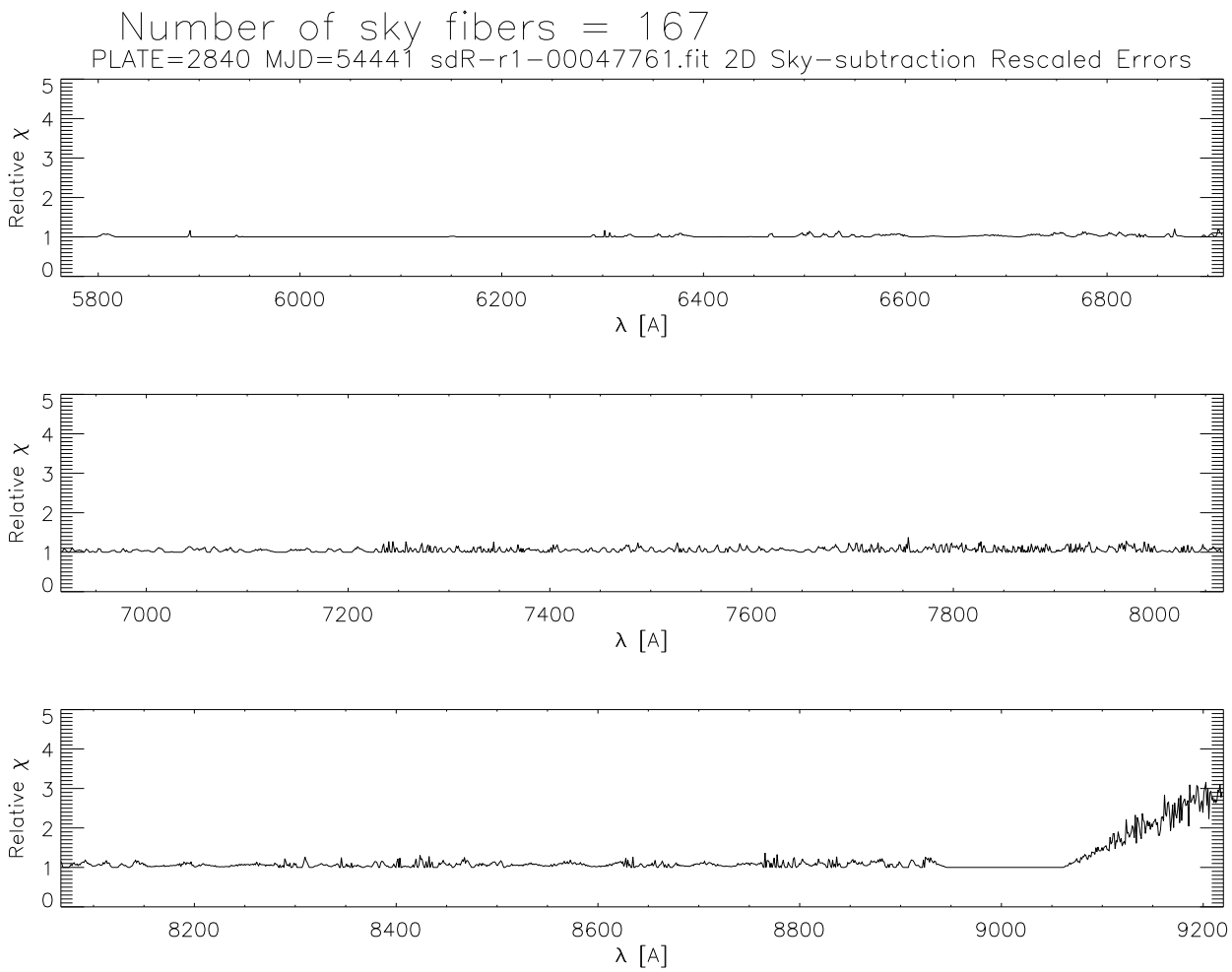

PLATE=2840 MJD=54441 sdR-r1-00047761.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
60
40
20
0
−20
−40
−60
8820
8840
8860
8880
8900
λ [A]

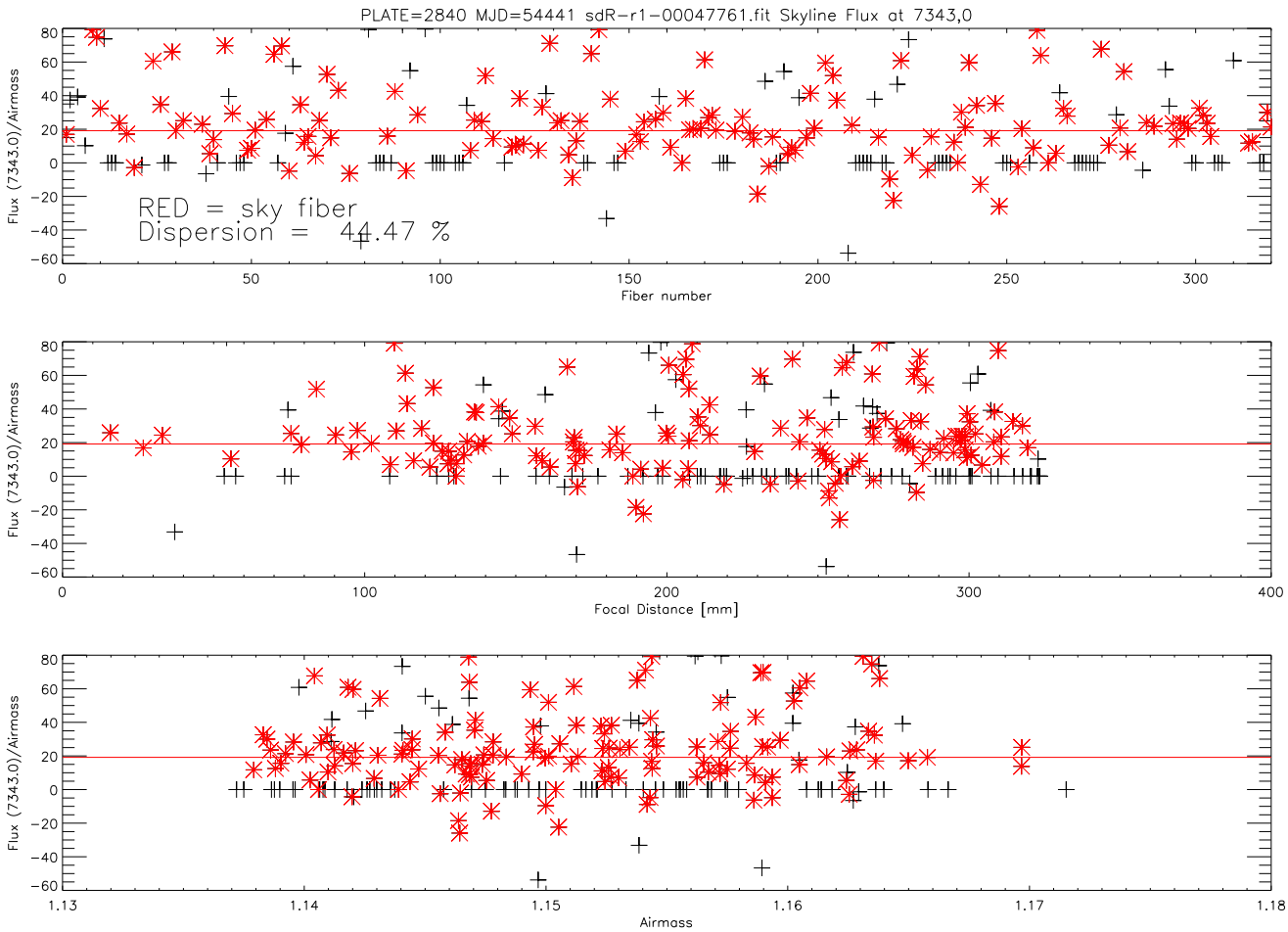

Number of sky fibers = 167
PLATE=2840 MJD=54441 sdR-r1-00047761.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

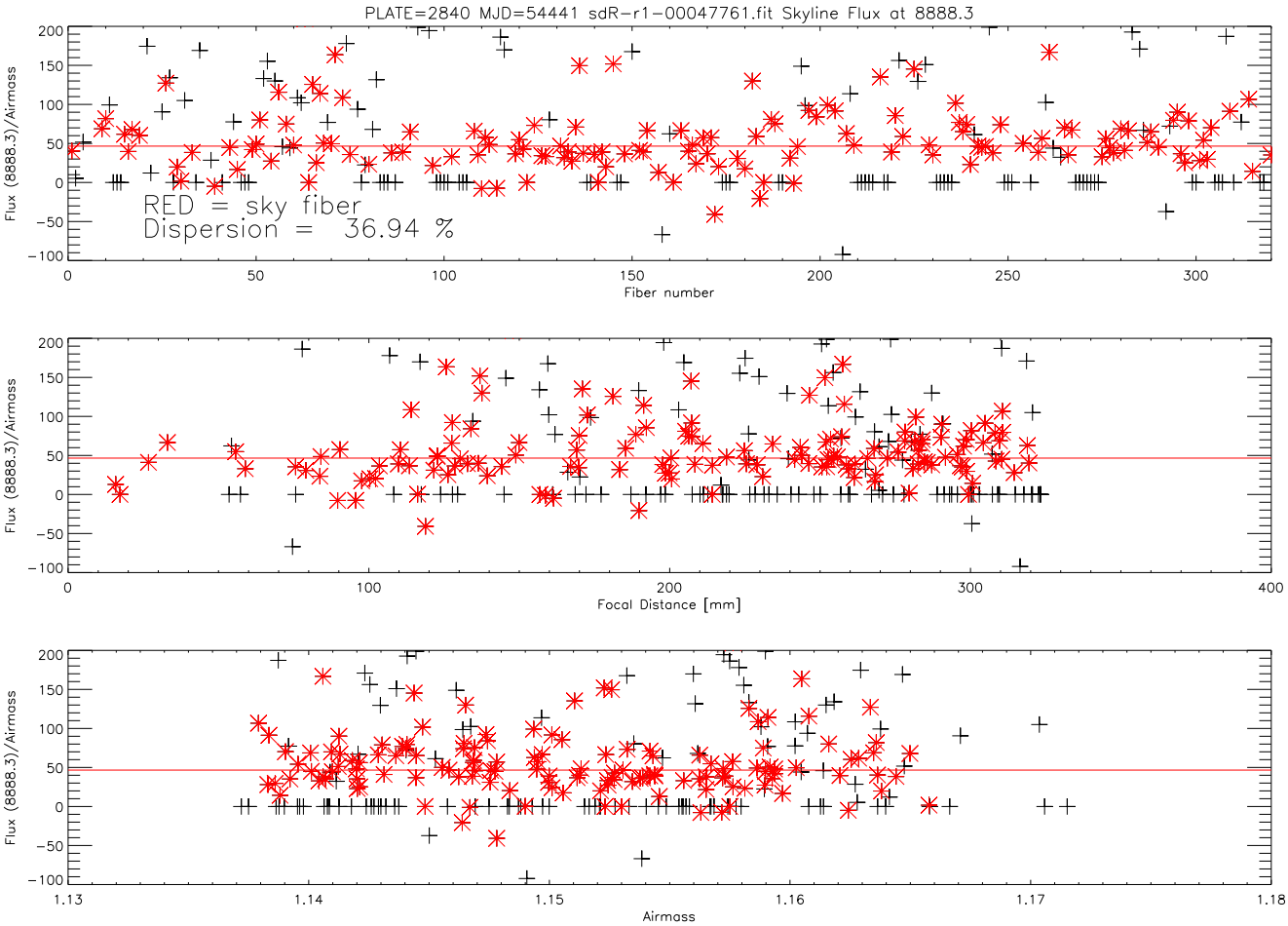

PLATE=2840 MJD=54441 sdR-r1-00047761.fit 2D Sky-subtraction Sky Fibers
Median χ^2
1.0
0.8
0.6
0.4
0.2
0.0
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
15
10
5
0
-5
-10
50
100
150
200
250
300
Fiber number

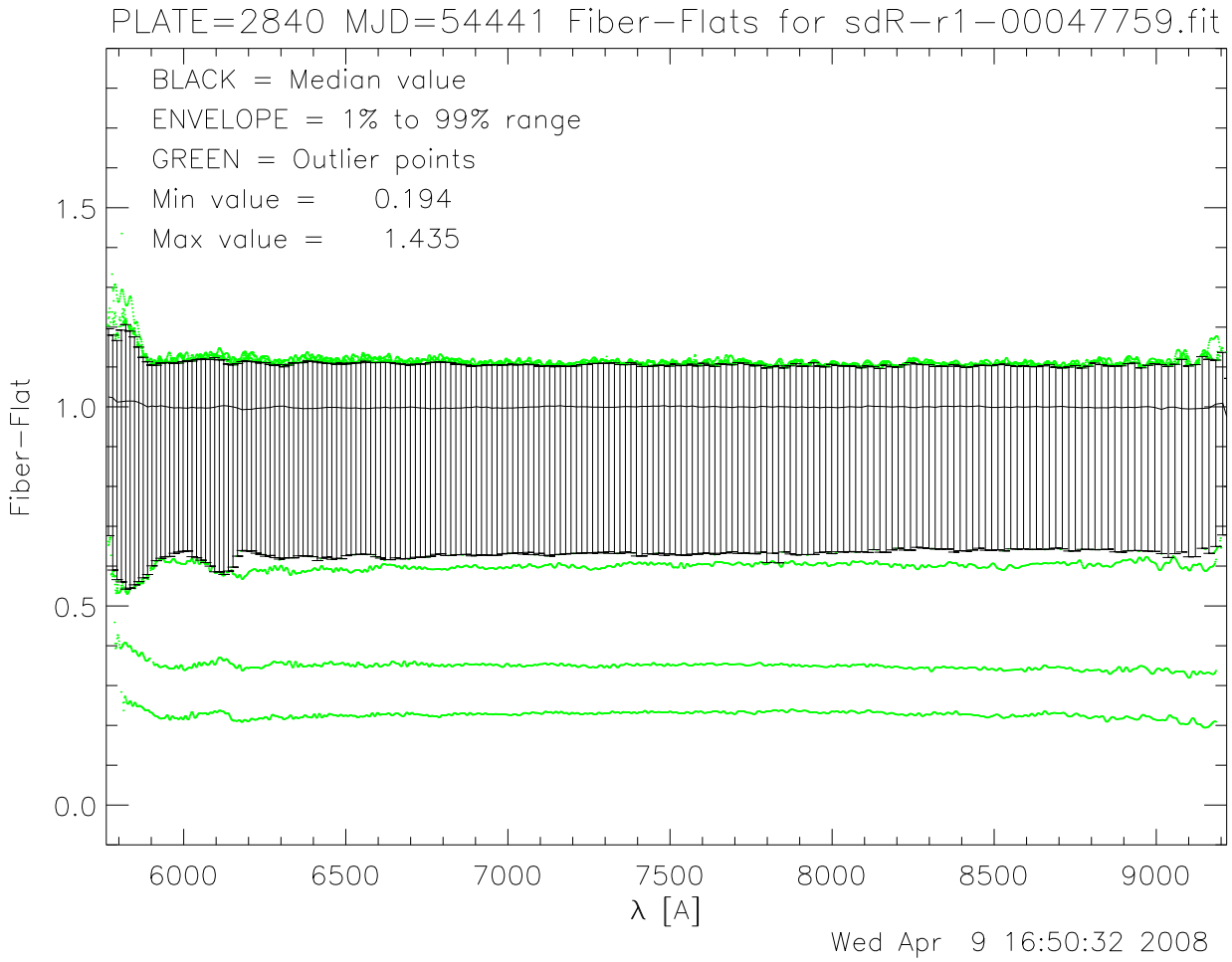

PLATE=2840 MJD=54441 sdR-r1-00047761.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
100
50
0
−50
−100
8820
8840
8860
8880
8900
λ [A]

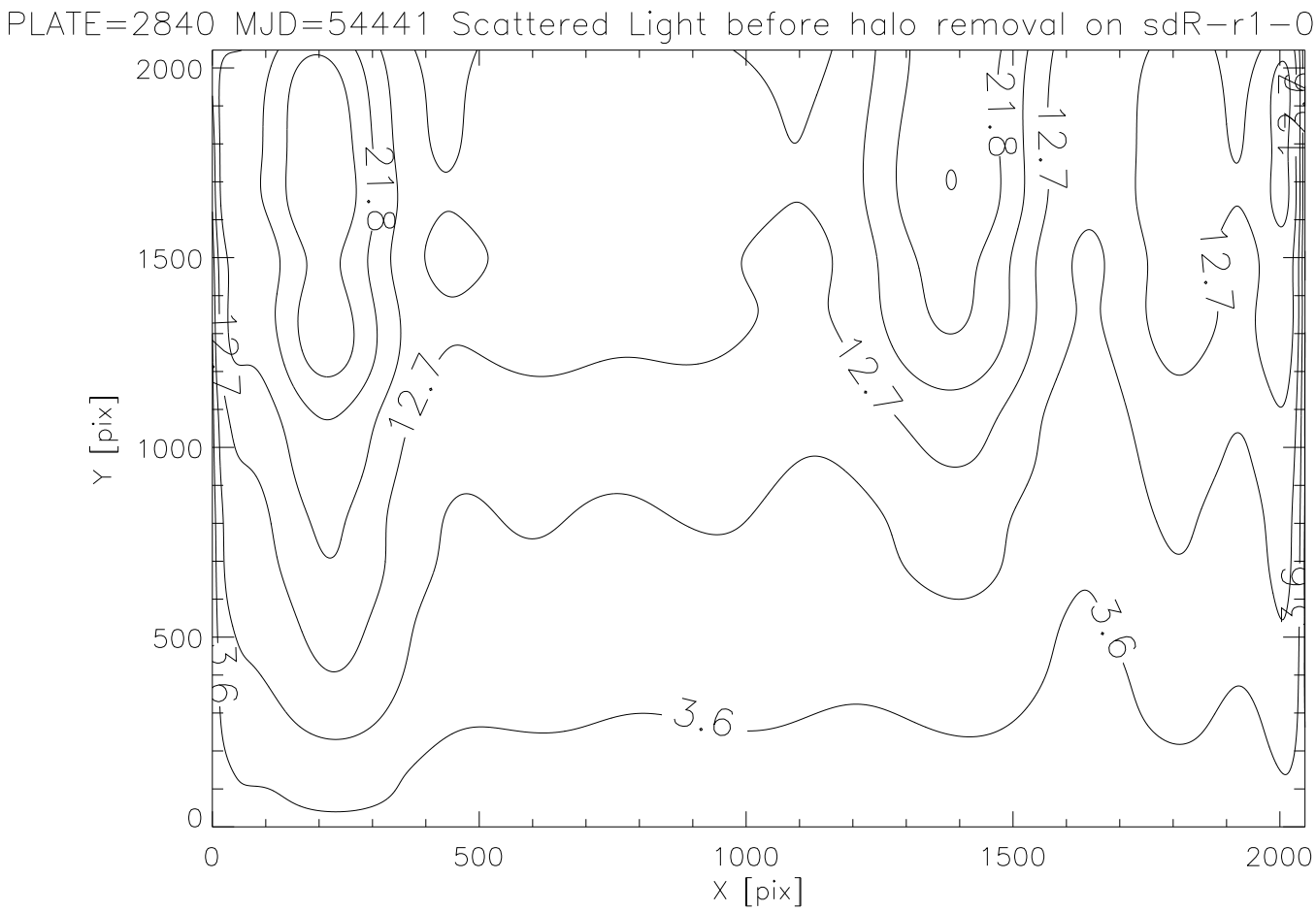

PLATE=2840 MJD=54441 sdR-r1-00047761.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
60
40
20
0
−20
−40
−60
8820
8840
8860
8880
8900
λ [A]

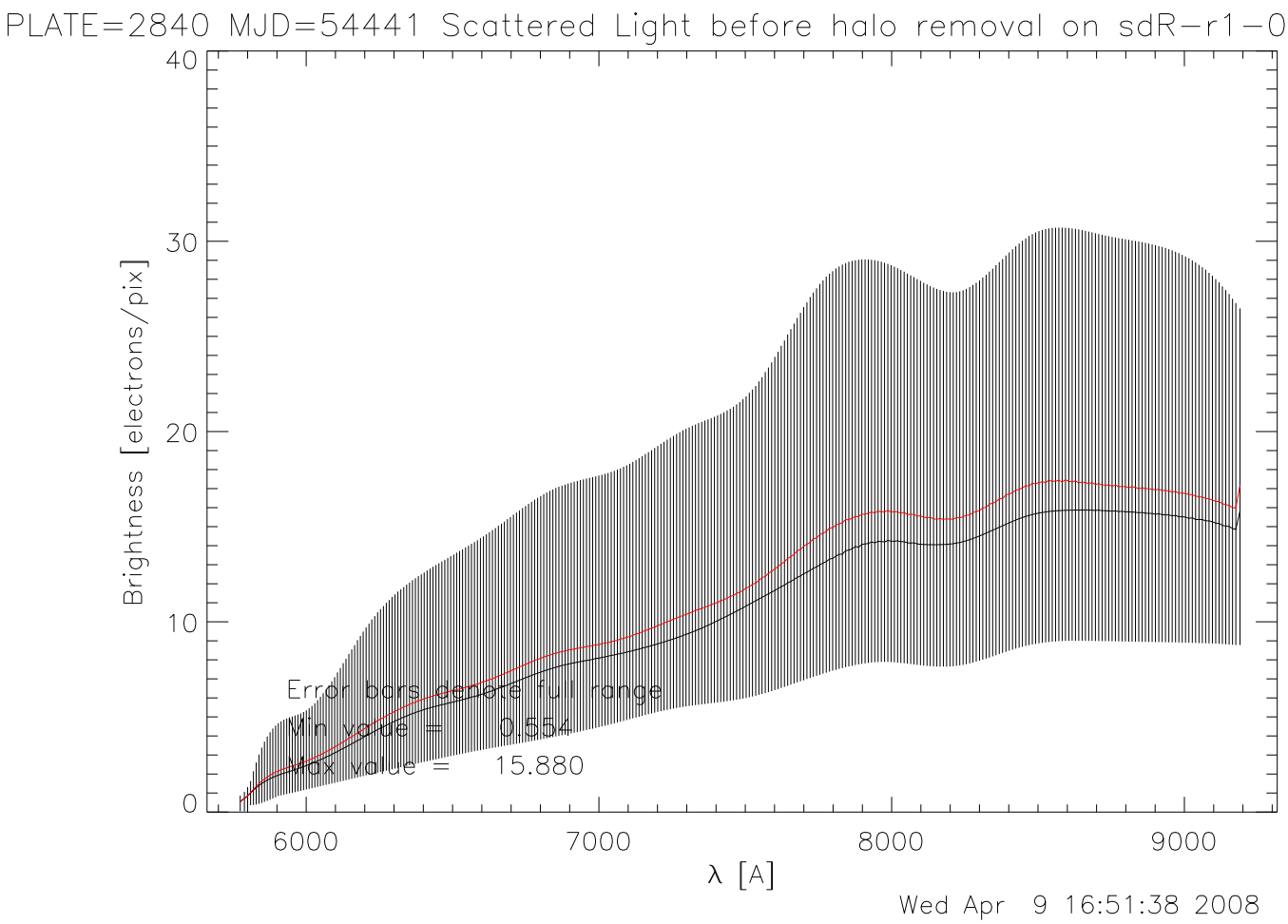

Number of sky fibers = 167
PLATE=2840 MJD=54441 sdR-r1-00047761.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200
0
1
2
3
4
5

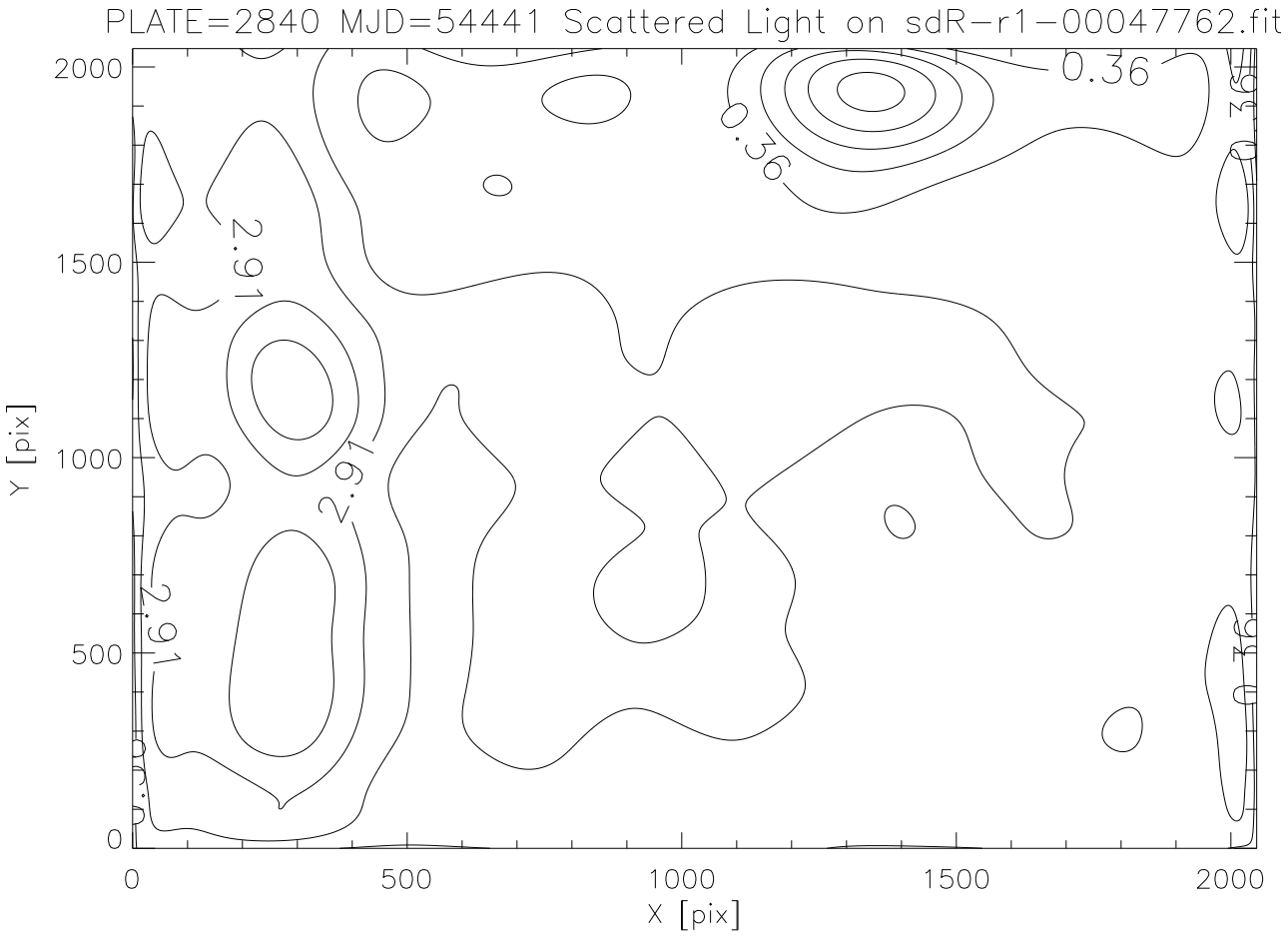

PLATE=2840 MJD=54441 sdR-r1-00047761.fit Skyline Flux at 7343,0
Flux (7343.0)/Airmass
RED = sky fiber
Dispersion = 44.47 %
Fiber number
Flux (7343.0)/Airmass
Focal Distance [mm]
Flux (7343.0)/Airmass
Airmass

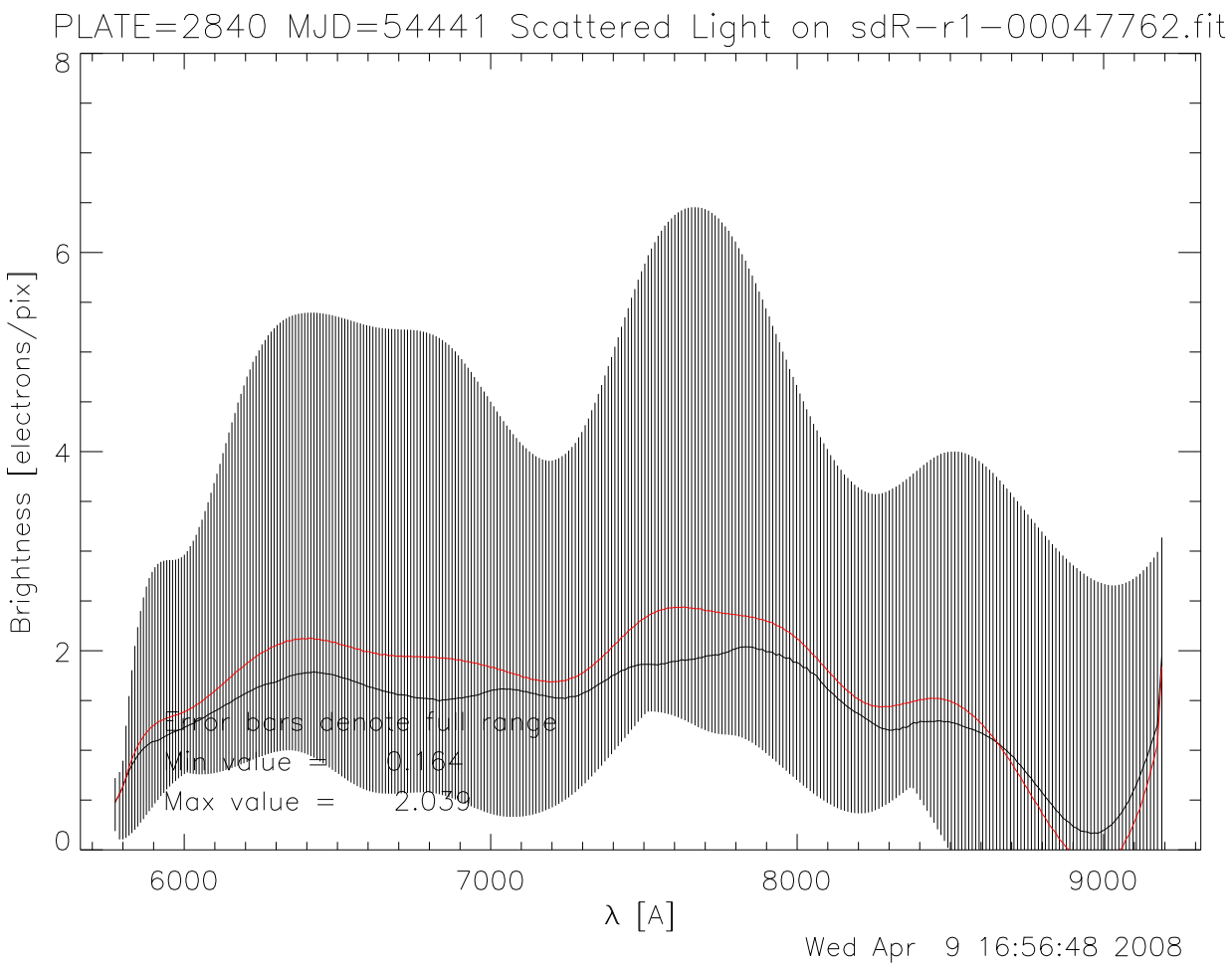

PLATE=2840 MJD=54441 sdR-r1-00047761.fit Skyline Flux at 8888.3
Flux (8888.3)/Airmass
RED = sky fiber
Dispersion = 36.94 %
Fiber number
Flux (8888.3)/Airmass
Focal Distance [mm]
Flux (8888.3)/Airmass
Airmass

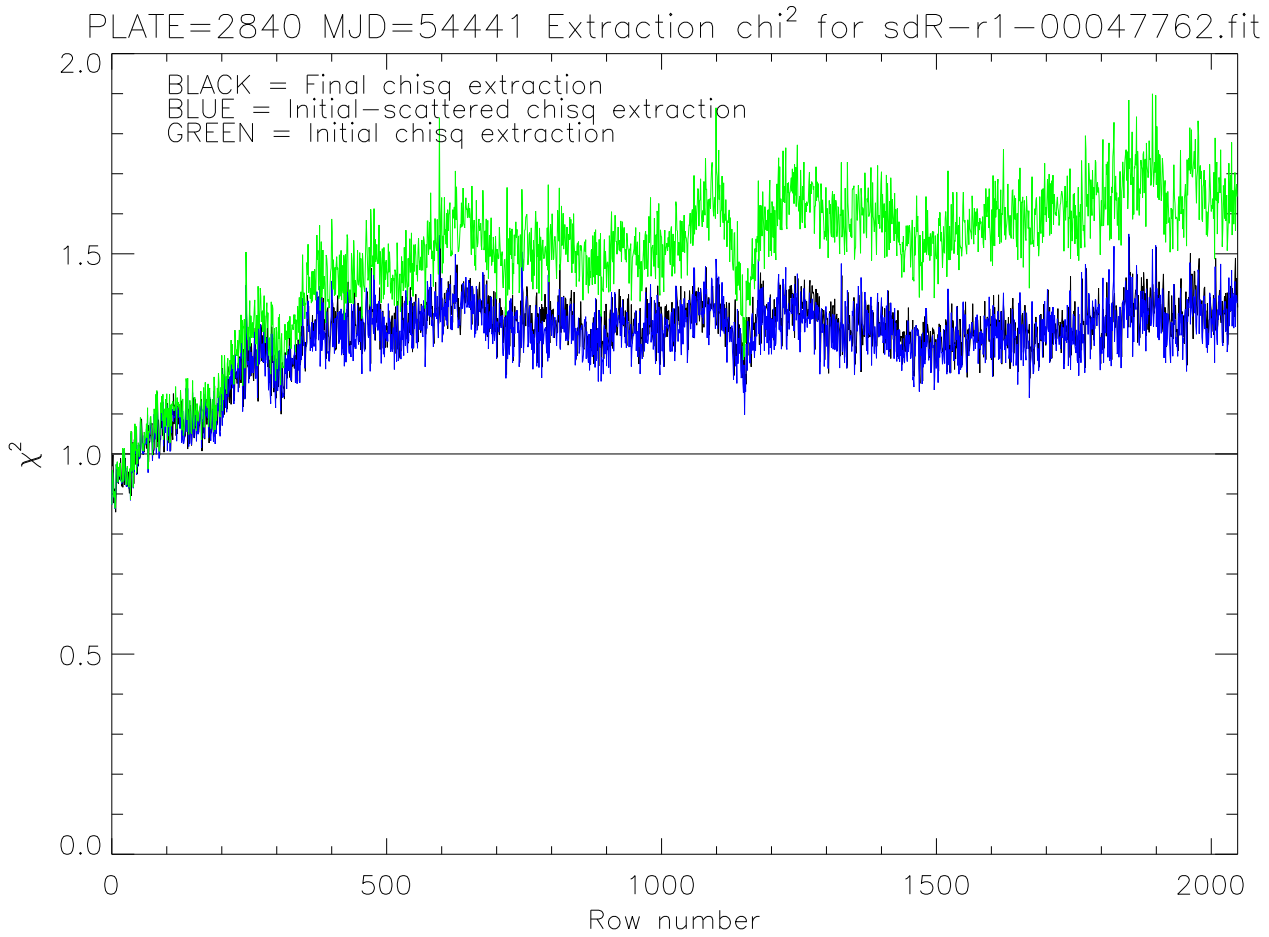

PLATE=2840 MJD=54441 Fiber−Flats for sdR−r1−00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.194
Max value = 1.435
Fiber−Flat
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]
Wed Apr 9 16:50:32 2008

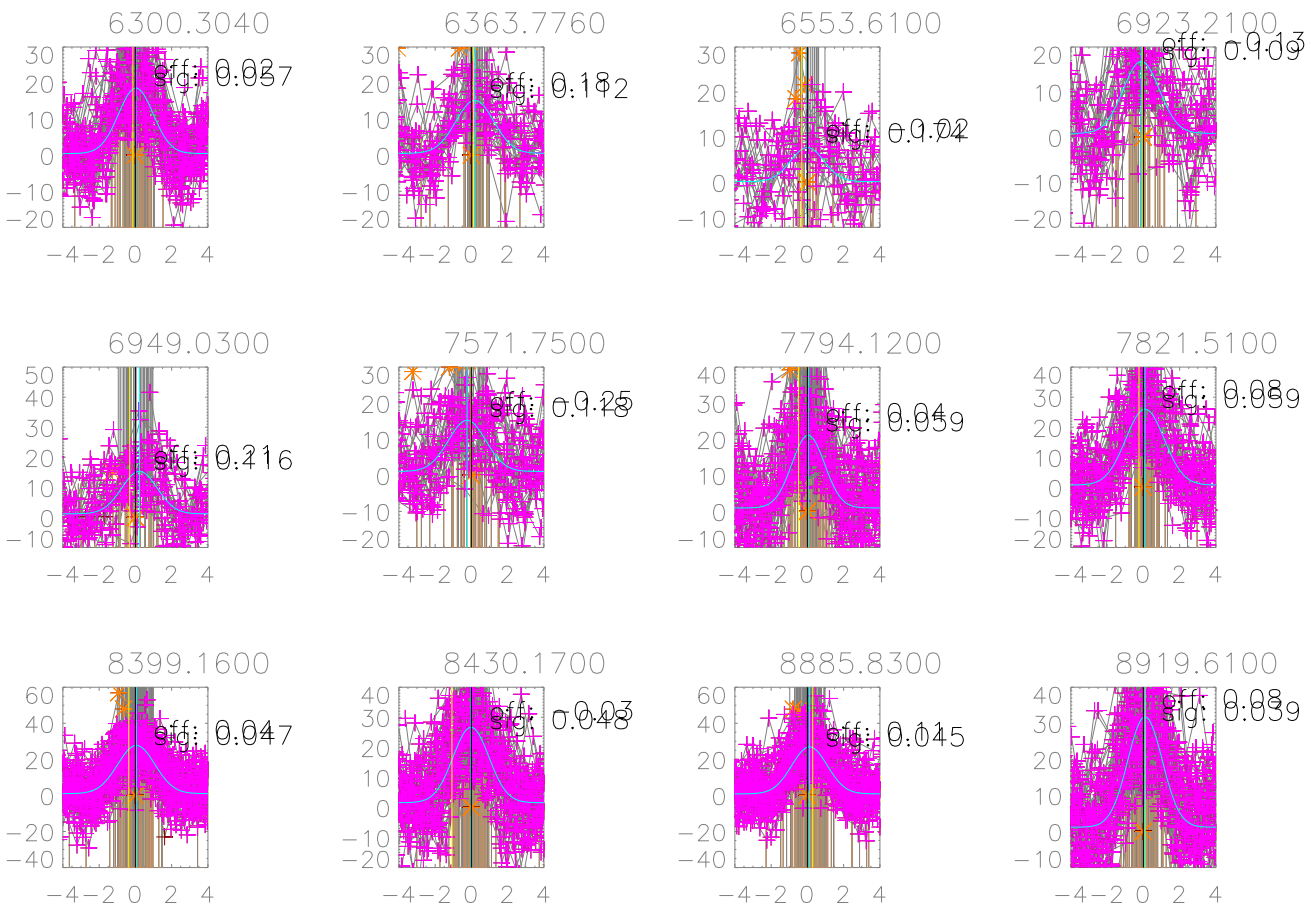

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r1-00047762.fi
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
21.8
12.7
3.6
0

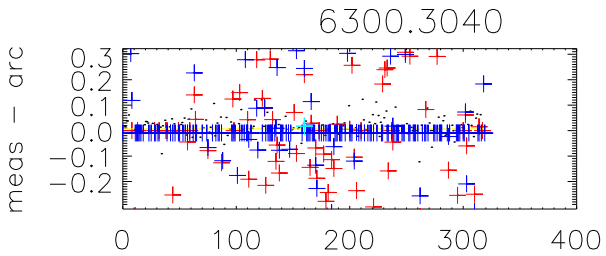

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r1-00047762.fi
Brightness [electrons/pix]
λ [A]
Error bars depote full range
Min value = 0.554
Max value = 15.880
Wed Apr 9 16:51:38 2008

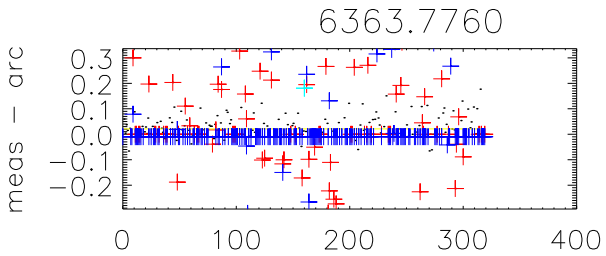

PLATE=2840 MJD=54441 Scattered Light on sdR-r1-00047762.fit
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
0.36
0.36
0.36
0.36
2.91
2.91
2.91
2.91
0
0
0
0

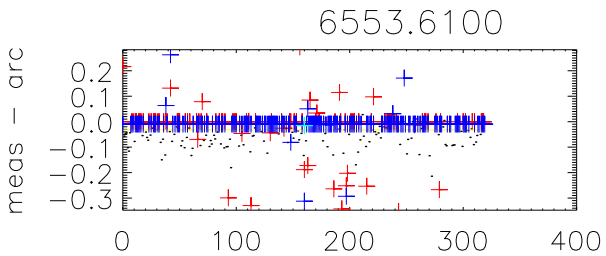

PLATE=2840 MJD=54441 Scattered Light on sdR-r1-00047762.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.164
Max value = 2.039
Wed Apr 9 16:56:48 2008

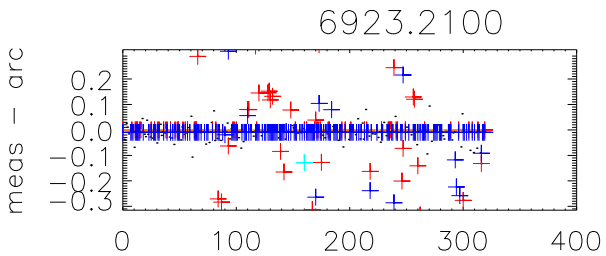

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-r1-00047762.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
2.0
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

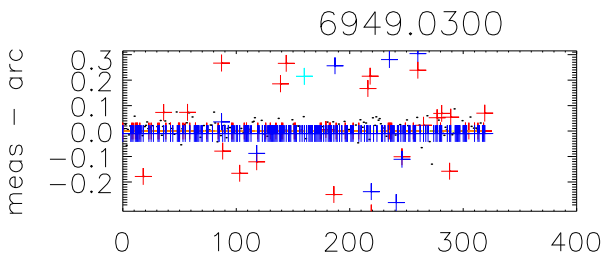

6300.3040
eff: 0.02
sig: 0.057
6363.7760
eff: 0.18
sig: 0.142
6553.6100
eff: 0.02
sig: 0.074
6923.2100
eff: 0.13
sig: 0.109
6949.0300
eff: 0.21
sig: 0.116
7571.7500
eff: 0.25
sig: 0.128
7794.1200
eff: 0.04
sig: 0.059
7821.5100
eff: 0.08
sig: 0.059
8399.1600
eff: 0.04
sig: 0.047
8430.1700
eff: 0.03
sig: 0.048
8885.8300
eff: 0.11
sig: 0.045
8919.6100
eff: 0.08
sig: 0.039

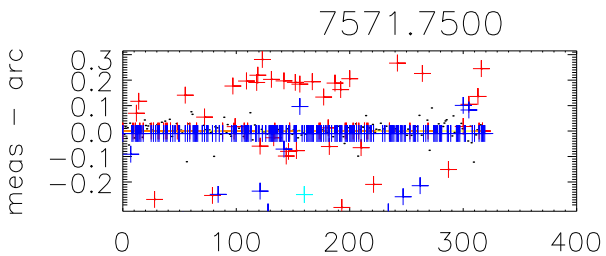

6300.3040
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

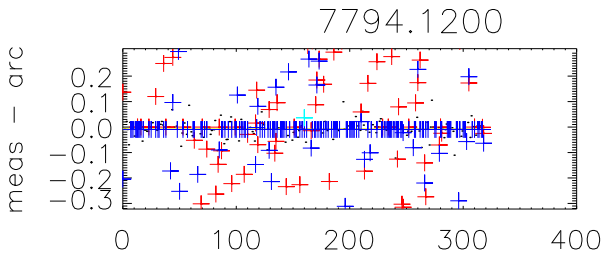

6363.7760
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

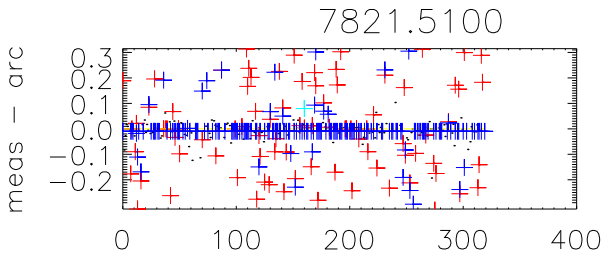

6553.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

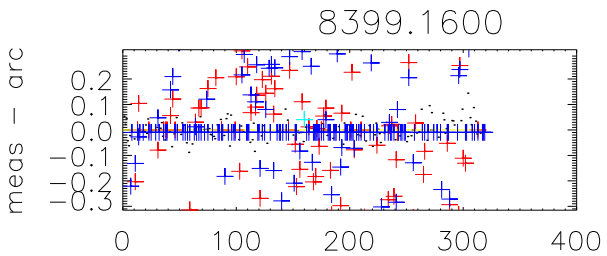

6923.2100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

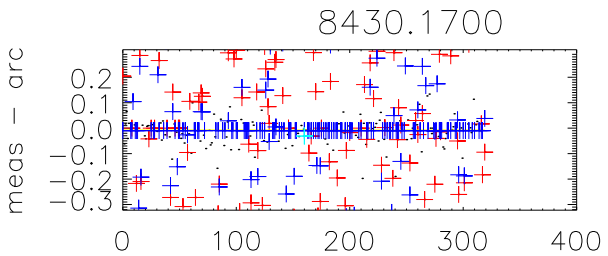

6949.0300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

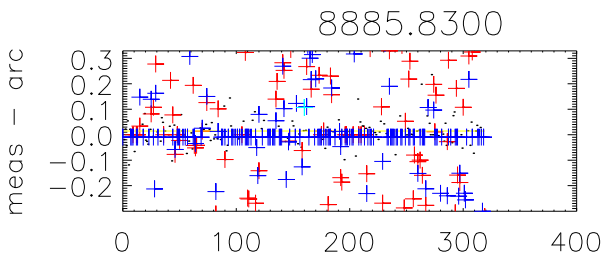

7571.7500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

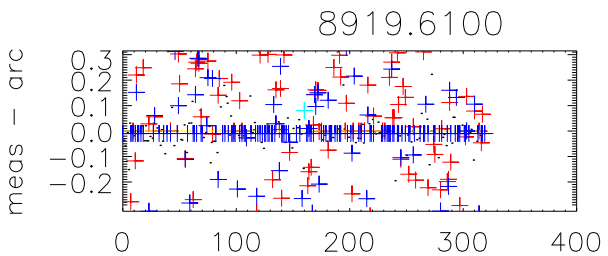

7794.1200
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

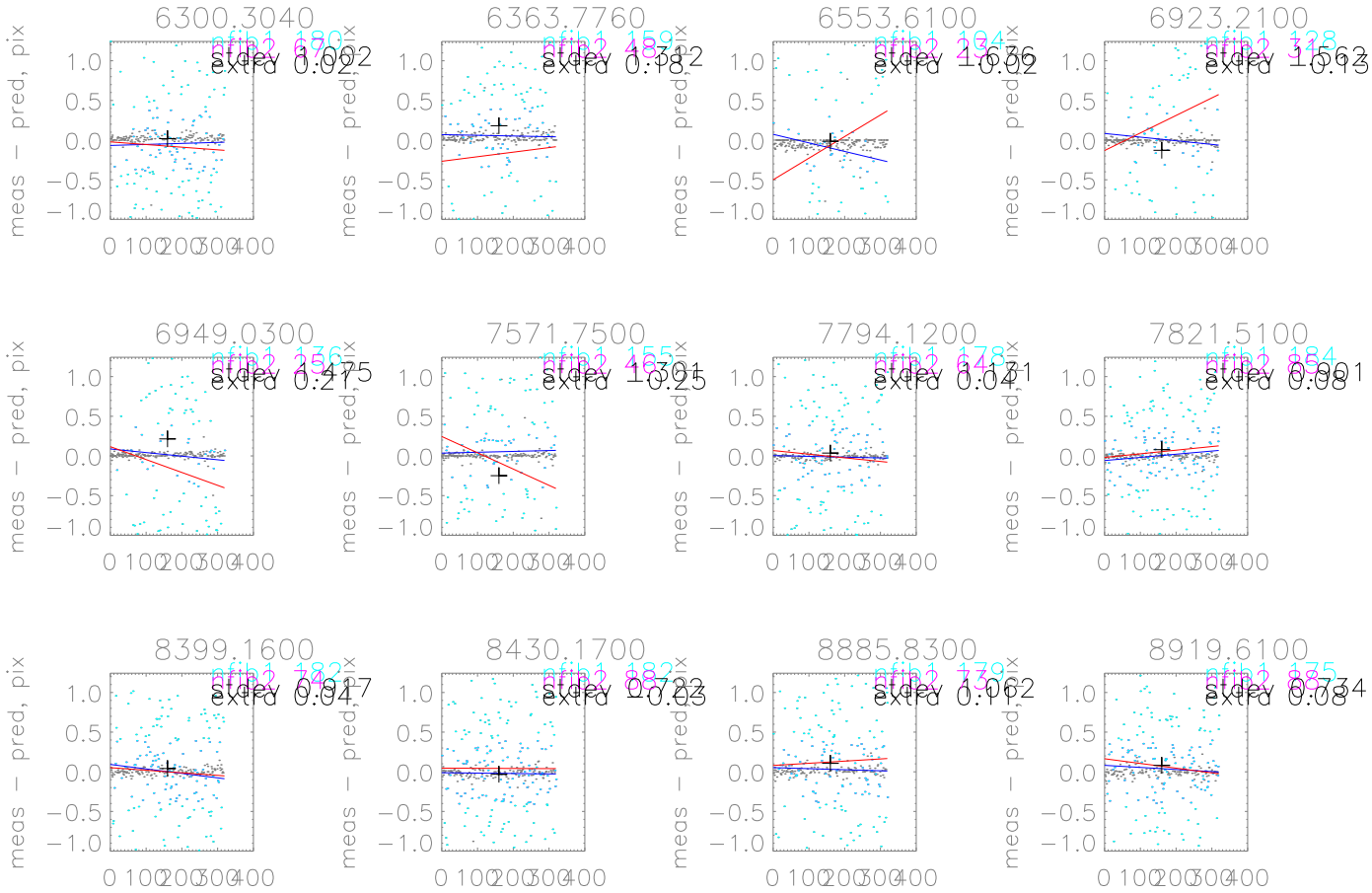

7821.5100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

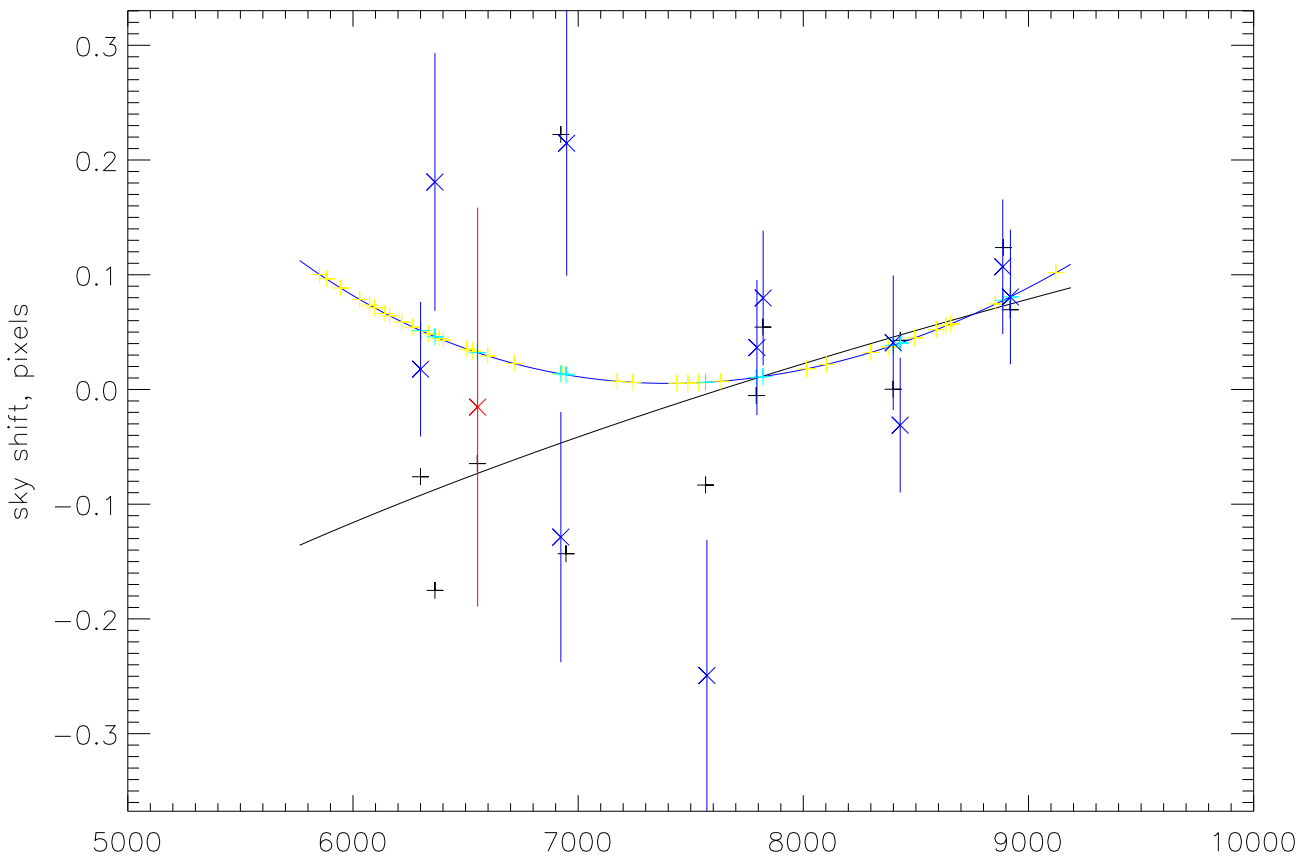

8399.1600
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

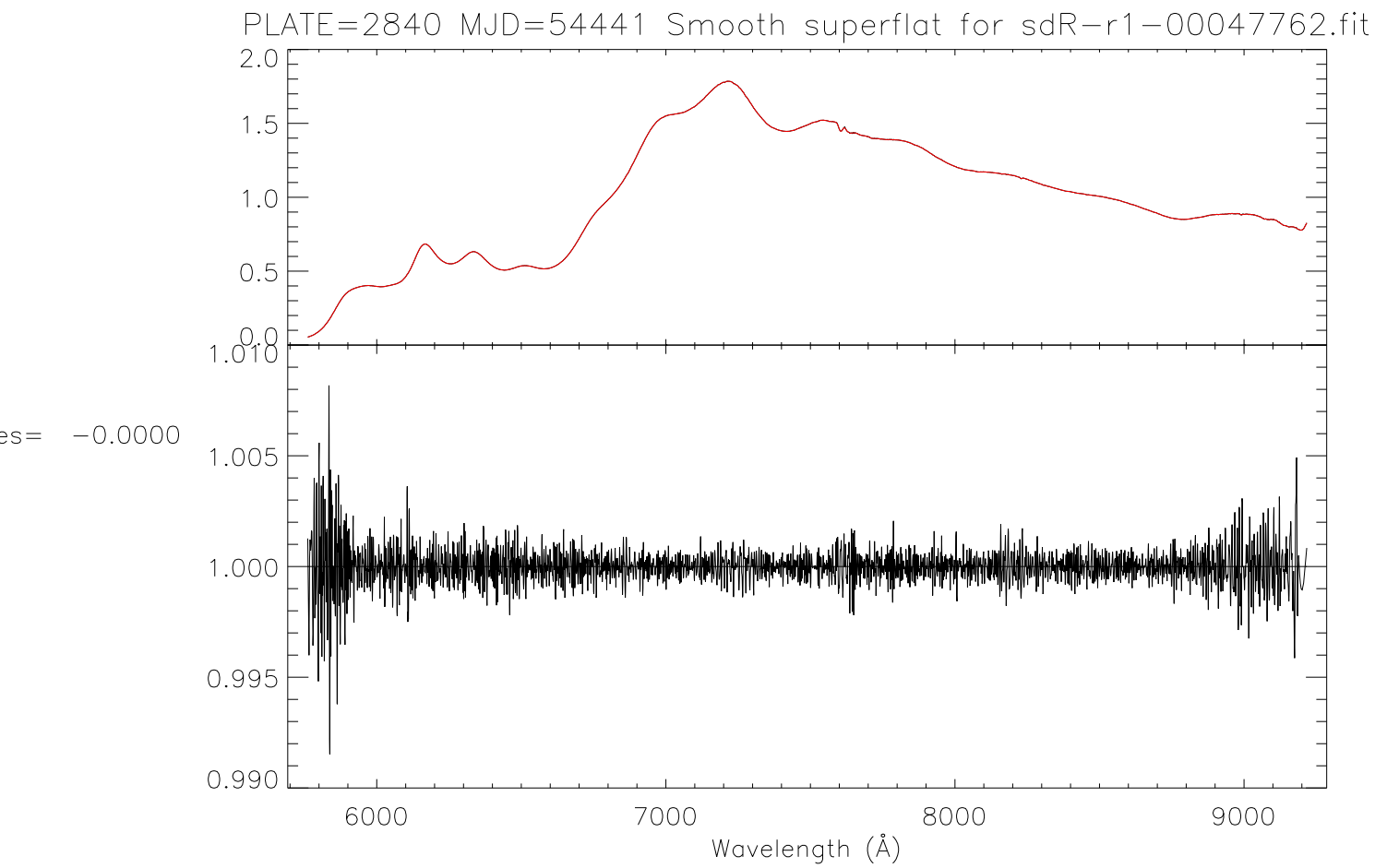

8430.1700
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

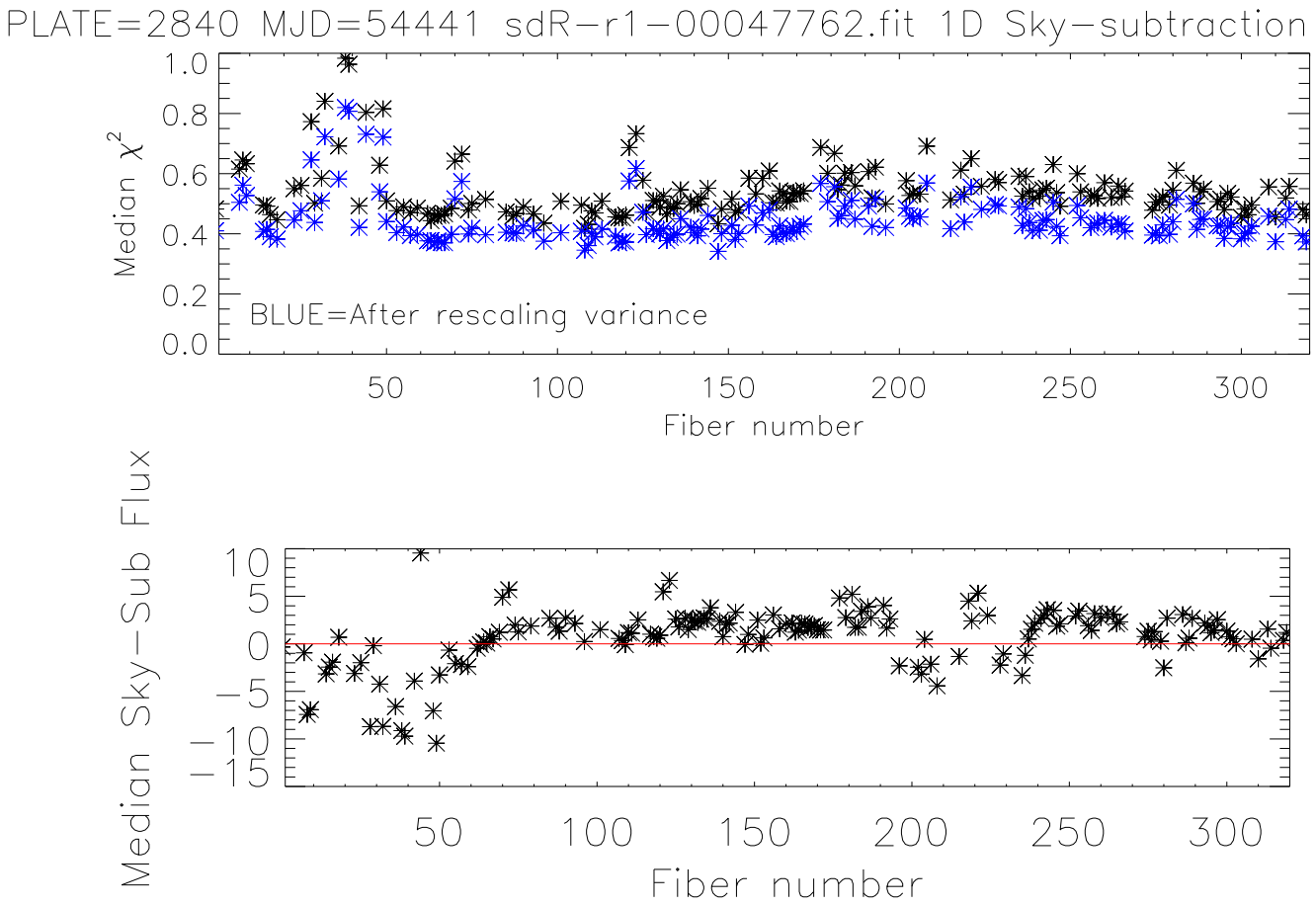

8885.8300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

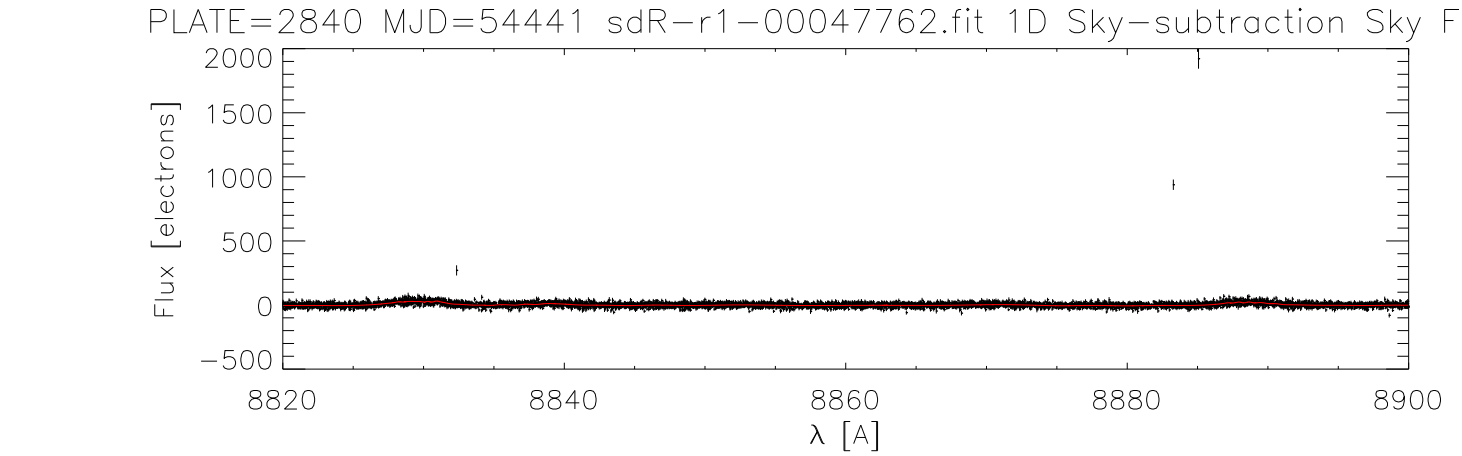

8919.6100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

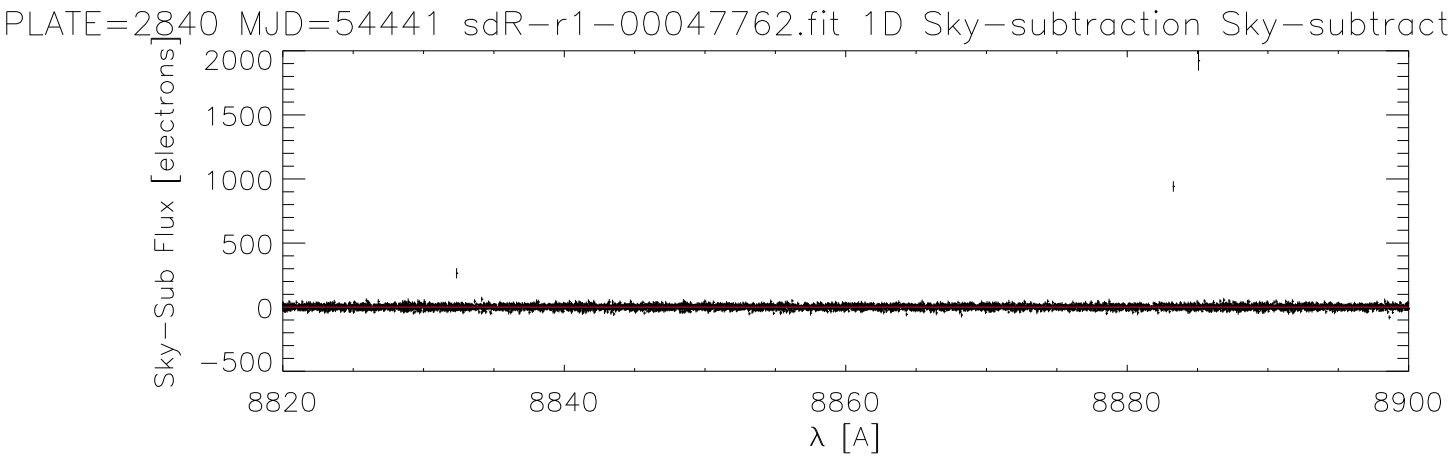

6300.3040
6363.7760
6553.6100
6923.2100
6949.0300
7571.7500
7794.1200
7821.5100
8399.1600
8430.1700
8885.8300
8919.6100
meas − pred, pix
0 100 200 300 400
1.0
0.5
0.0
−0.5
−1.0

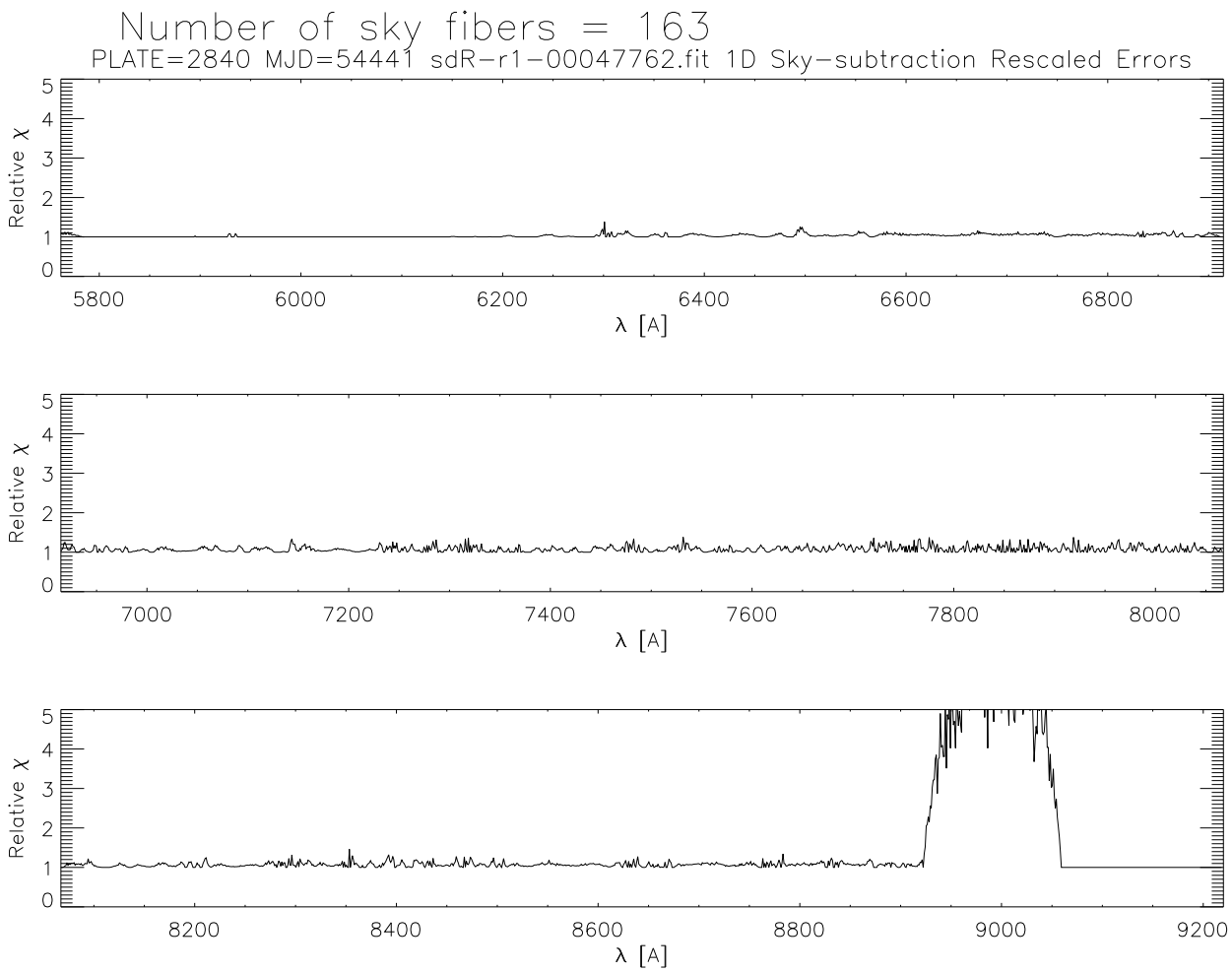

sky shift, pixels
0.3
0.2
0.1
0.0
−0.1
−0.2
−0.3
5000
6000
7000
8000
9000
10000

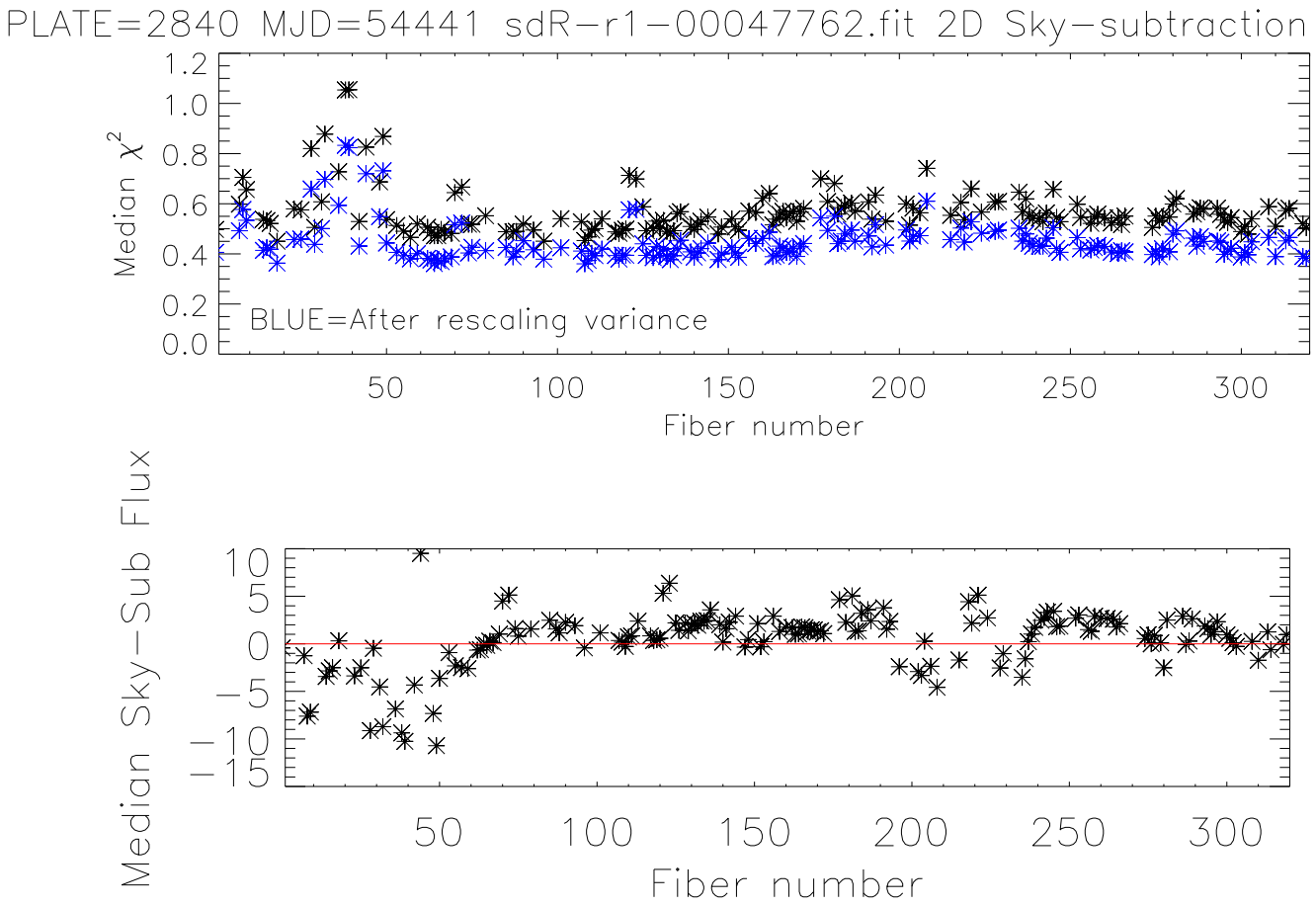

PLATE=2840 MJD=54441 Smooth superflat for sdR-r1-00047762.fit
2.0
1.5
1.0
0.5
0.0
1.010
1.005
1.000
0.995
0.990
es= −0.0000
6000
7000
8000
9000
Wavelength (Å)

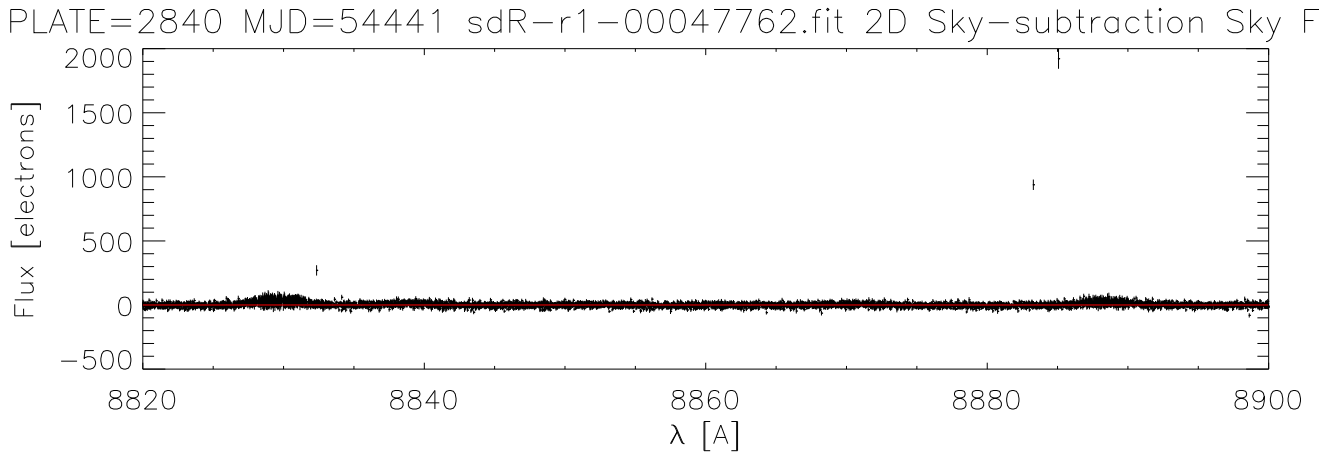

PLATE=2840 MJD=54441 sdR-r1-00047762.fit 1D Sky-subtraction Sky Fibers
Median χ^2
1.0
0.8
0.6
0.4
0.2
0.0
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
10
5
0
-5
-10
-15
50
100
150
200
250
300
Fiber number

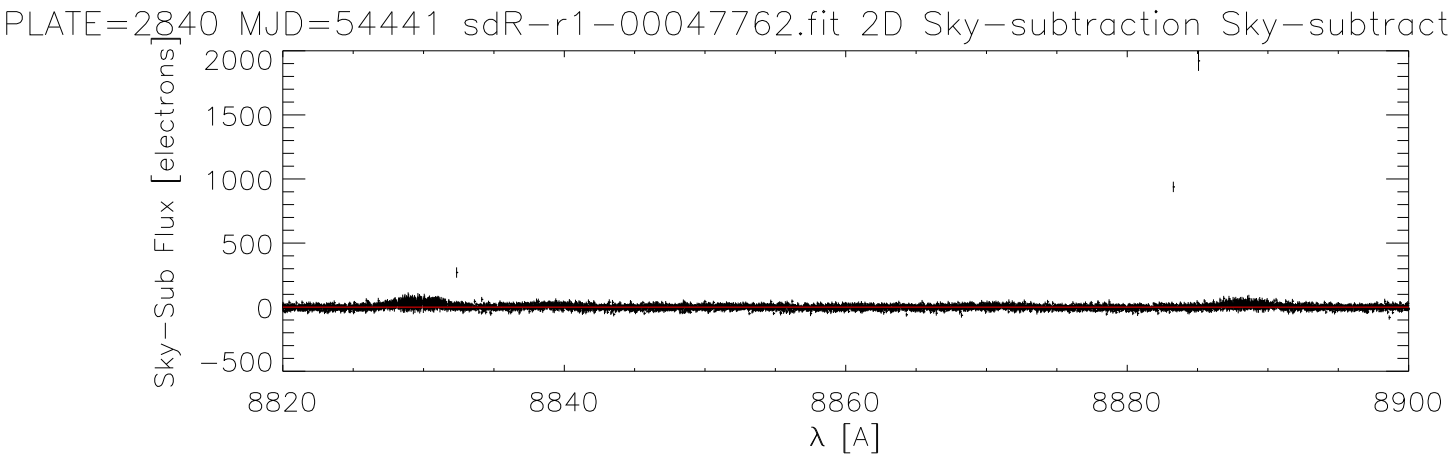

PLATE=2840 MJD=54441 sdR-r1-00047762.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
2000
1500
1000
500
0
-500
8820
8840
8860
8880
8900
λ [A]

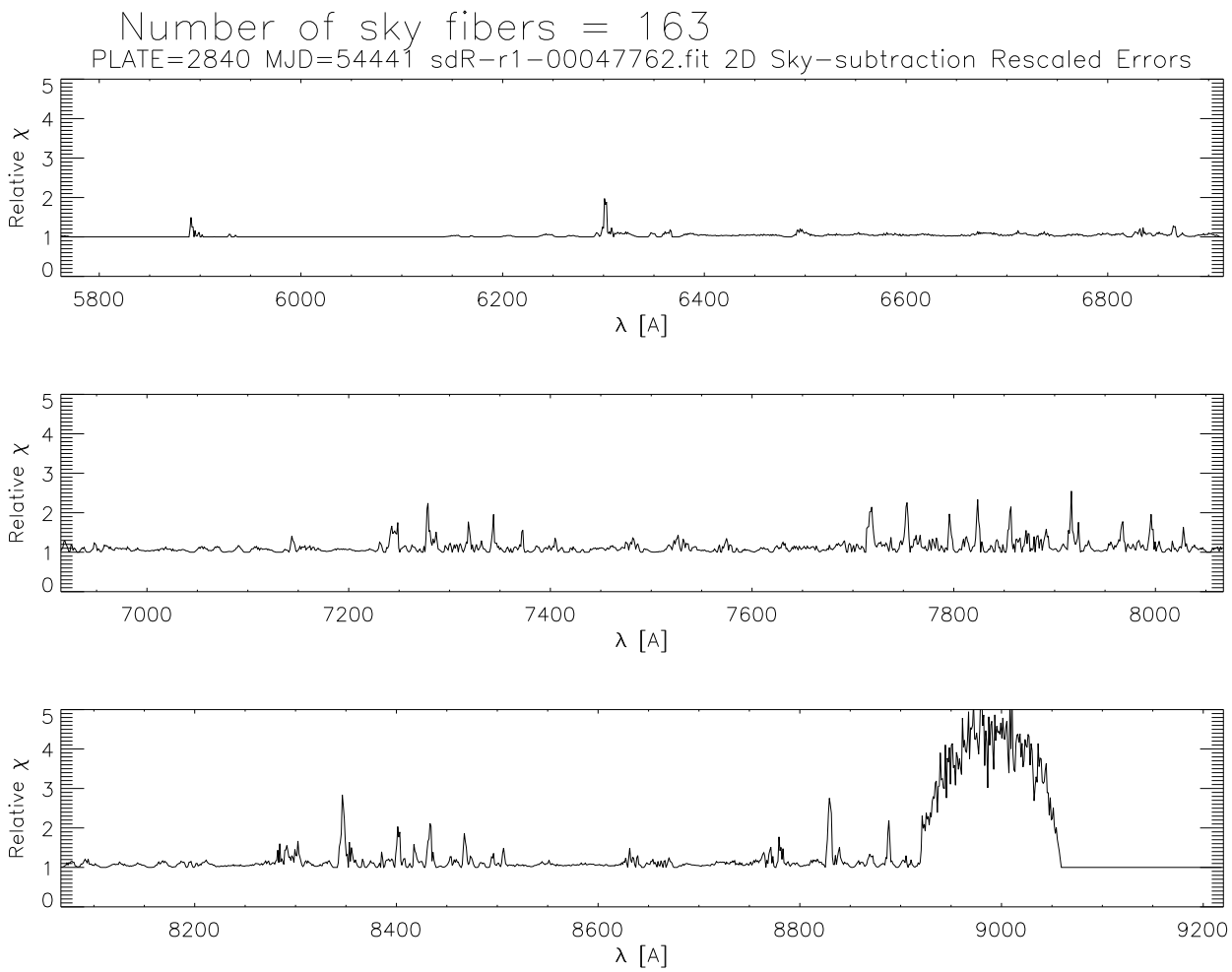

PLATE=2840 MJD=54441 sdR-r1-00047762.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
2000
1500
1000
500
0
-500
8820
8840
8860
8880
8900
λ [A]

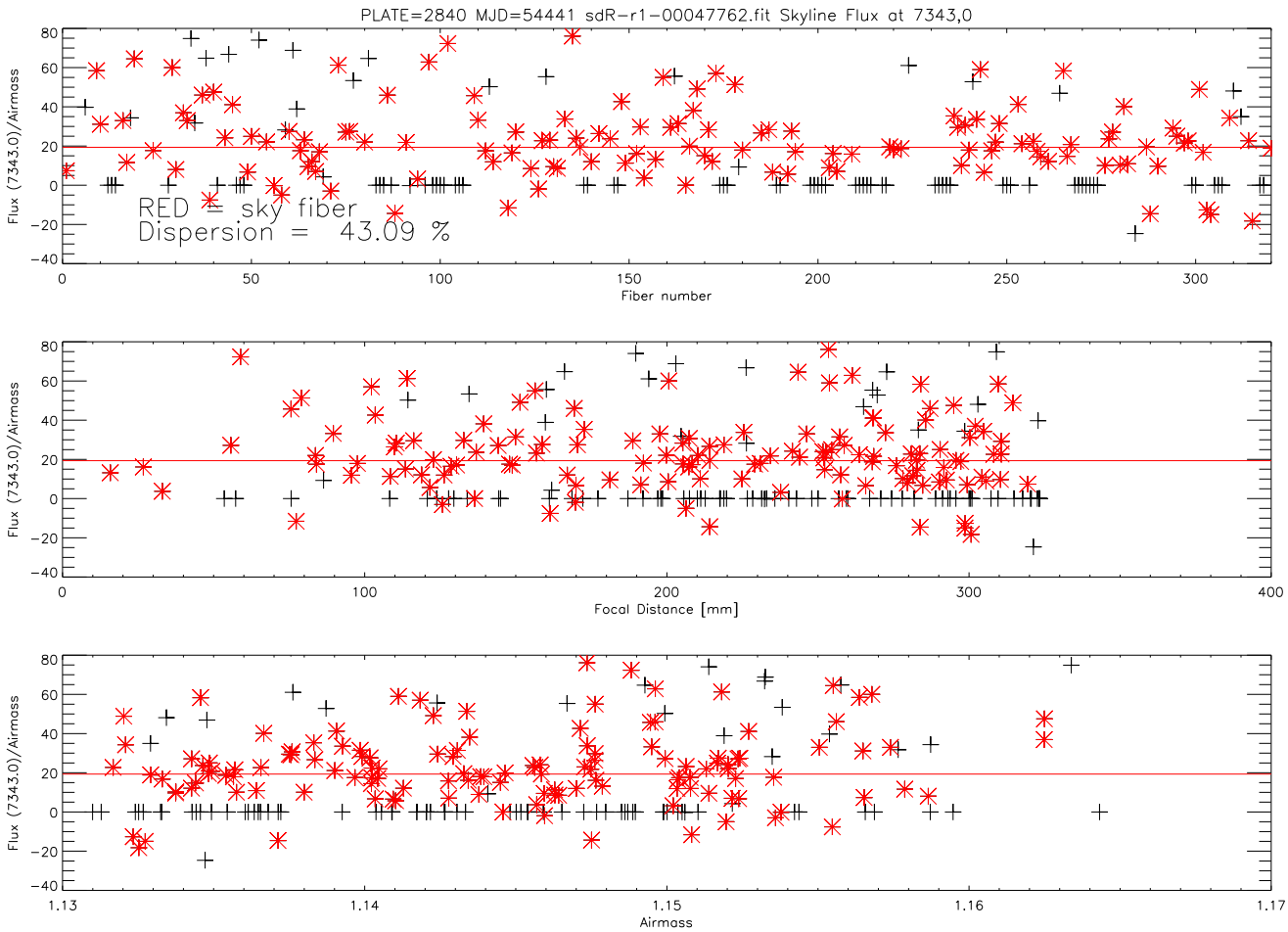

Number of sky fibers = 163
PLATE=2840 MJD=54441 sdR-r1-00047762.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

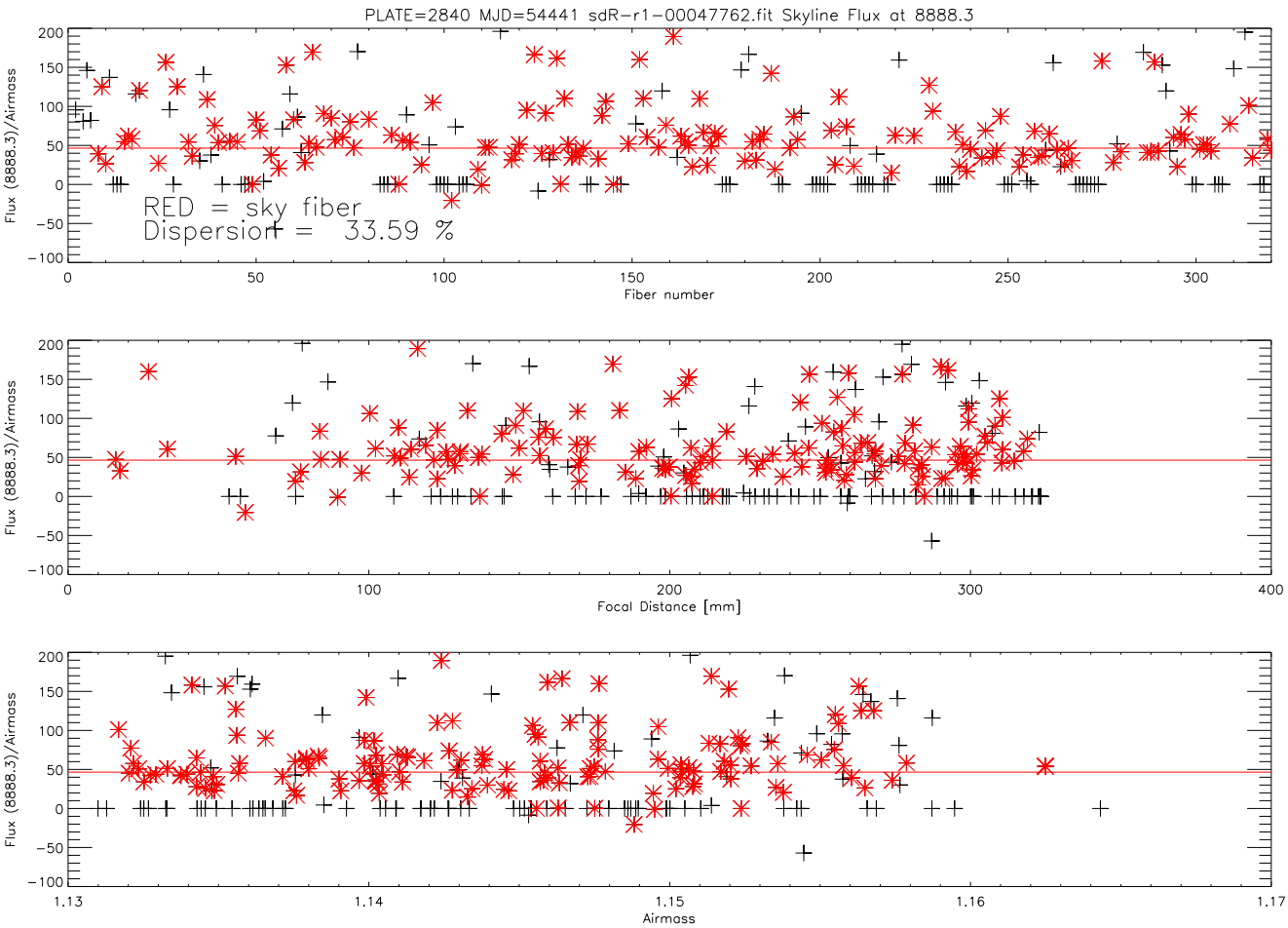

PLATE=2840 MJD=54441 sdR-r1-00047762.fit 2D Sky-subtraction Sky Fibers
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

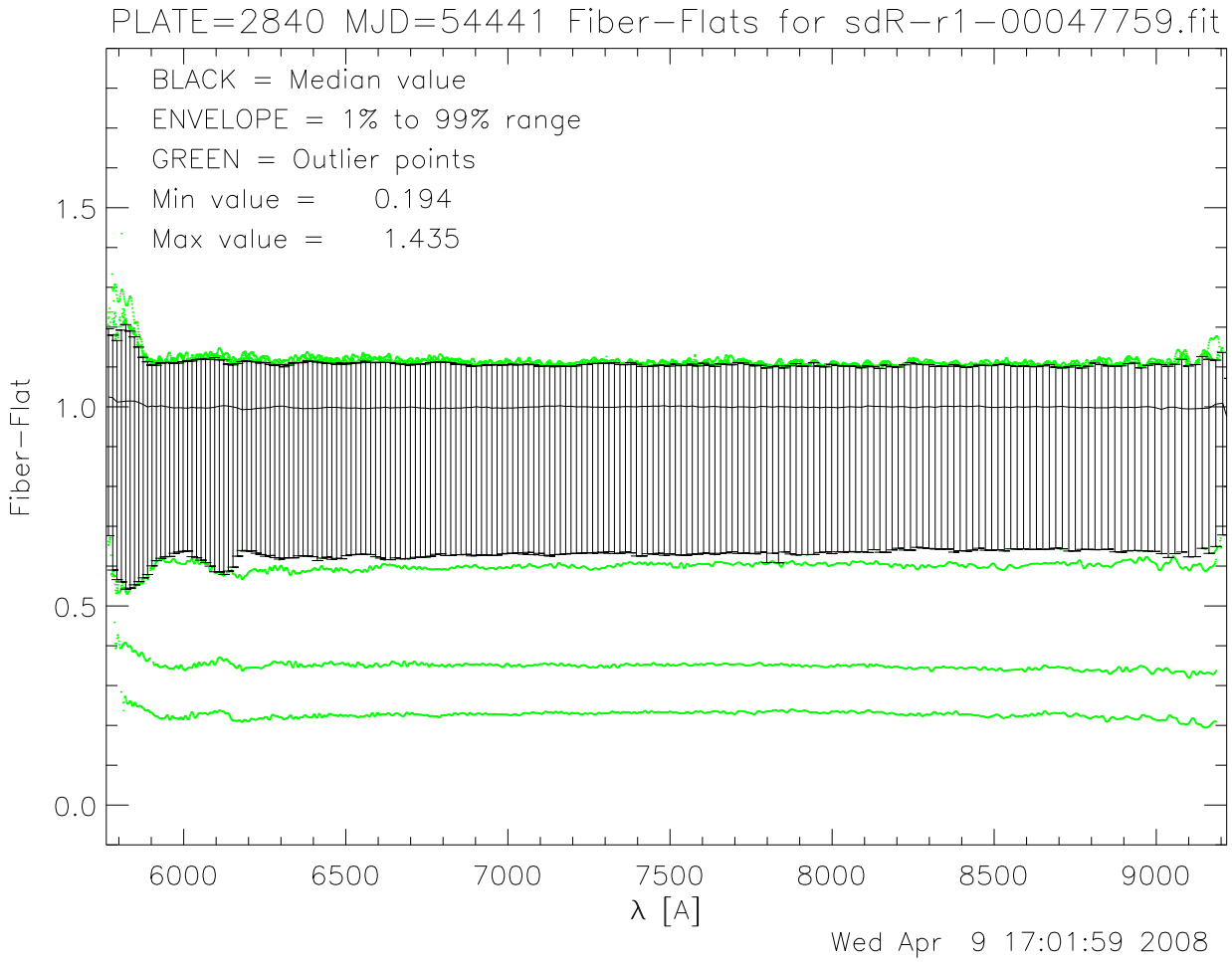

PLATE=2840 MJD=54441 sdR-r1-00047762.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
2000
1500
1000
500
0
-500
8820
8840
8860
8880
8900
λ [A]

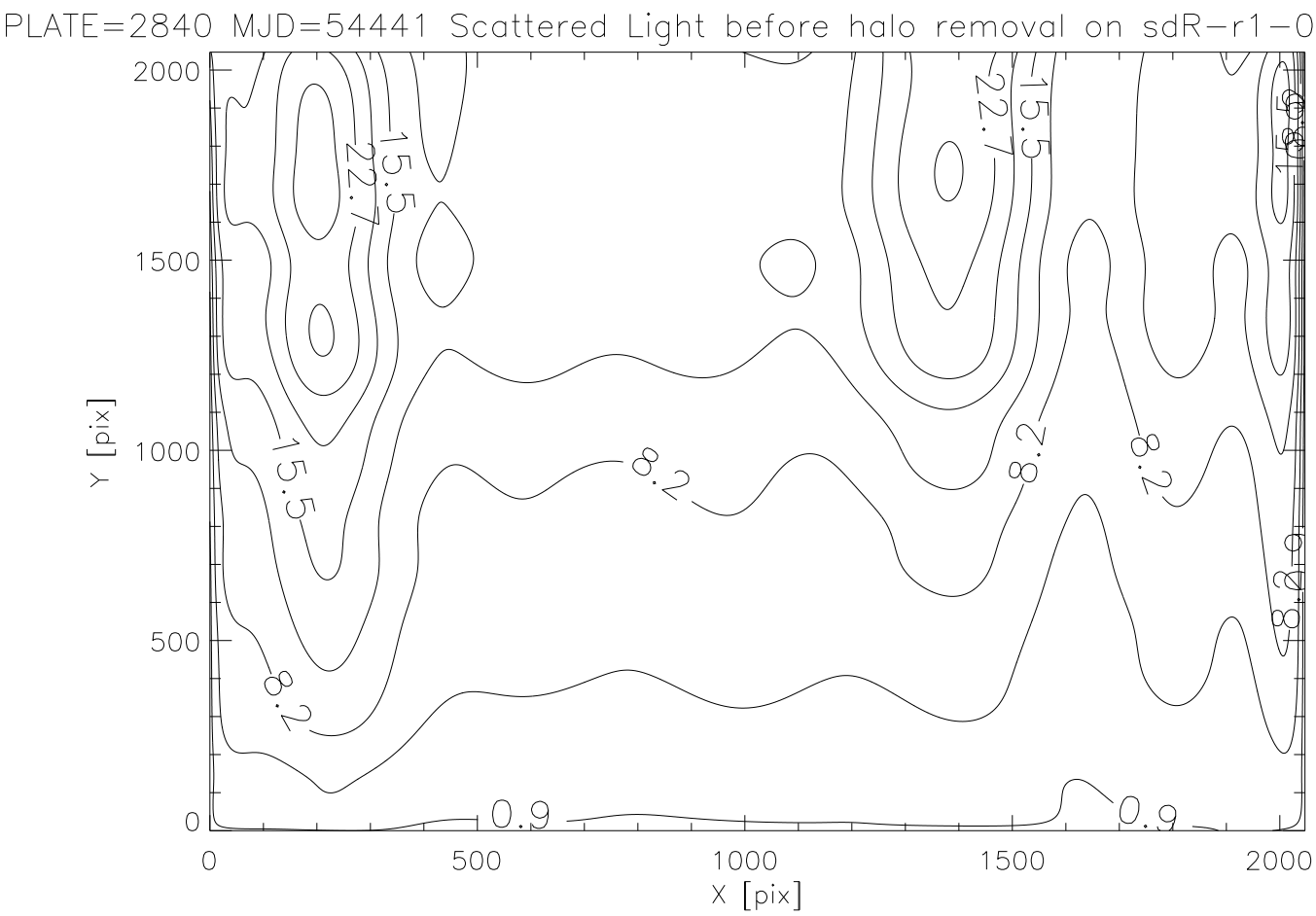

PLATE=2840 MJD=54441 sdR-r1-00047762.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
2000
1500
1000
500
0
-500
8820
8840
8860
8880
8900
λ [A]

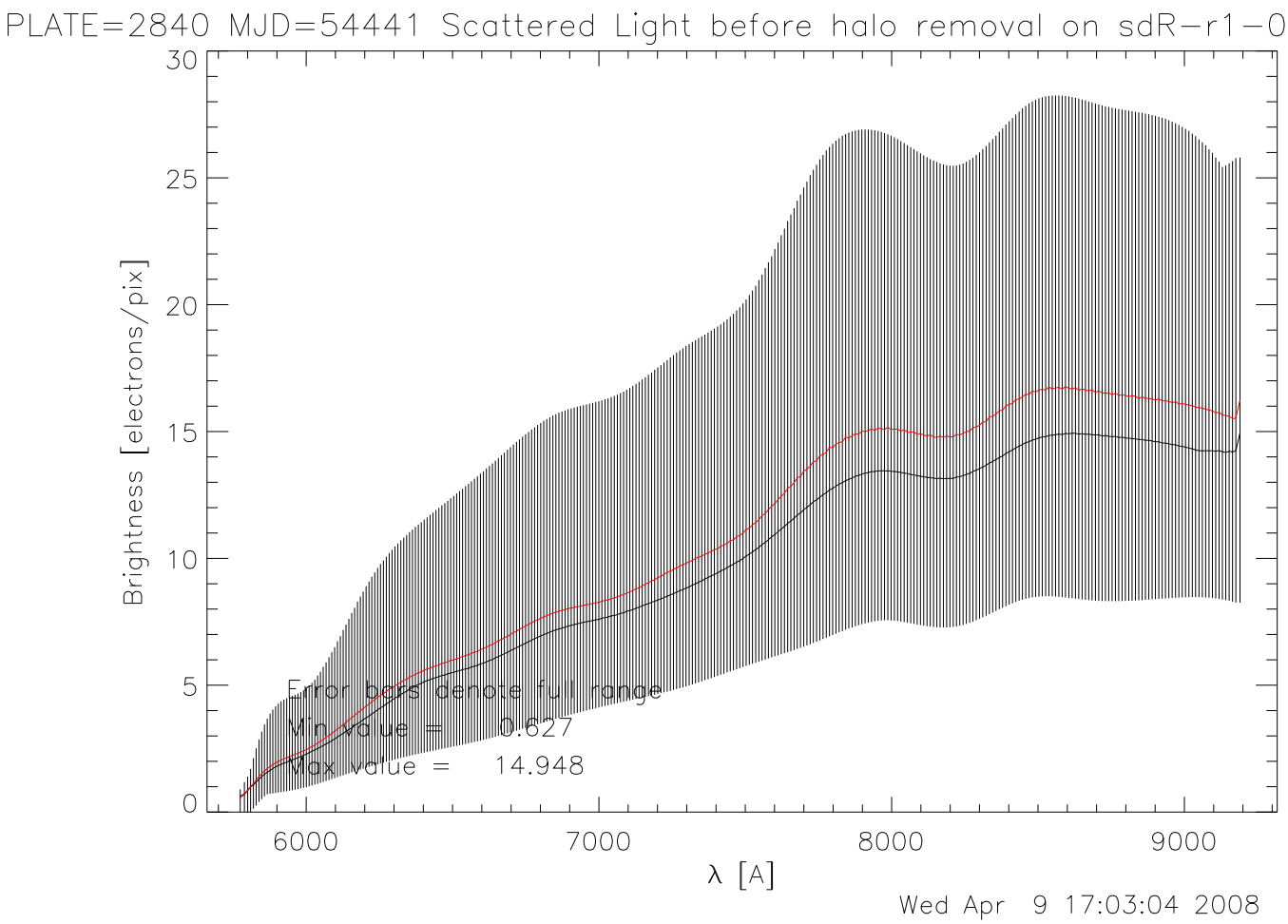

Number of sky fibers = 163
PLATE=2840 MJD=54441 sdR-r1-00047762.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

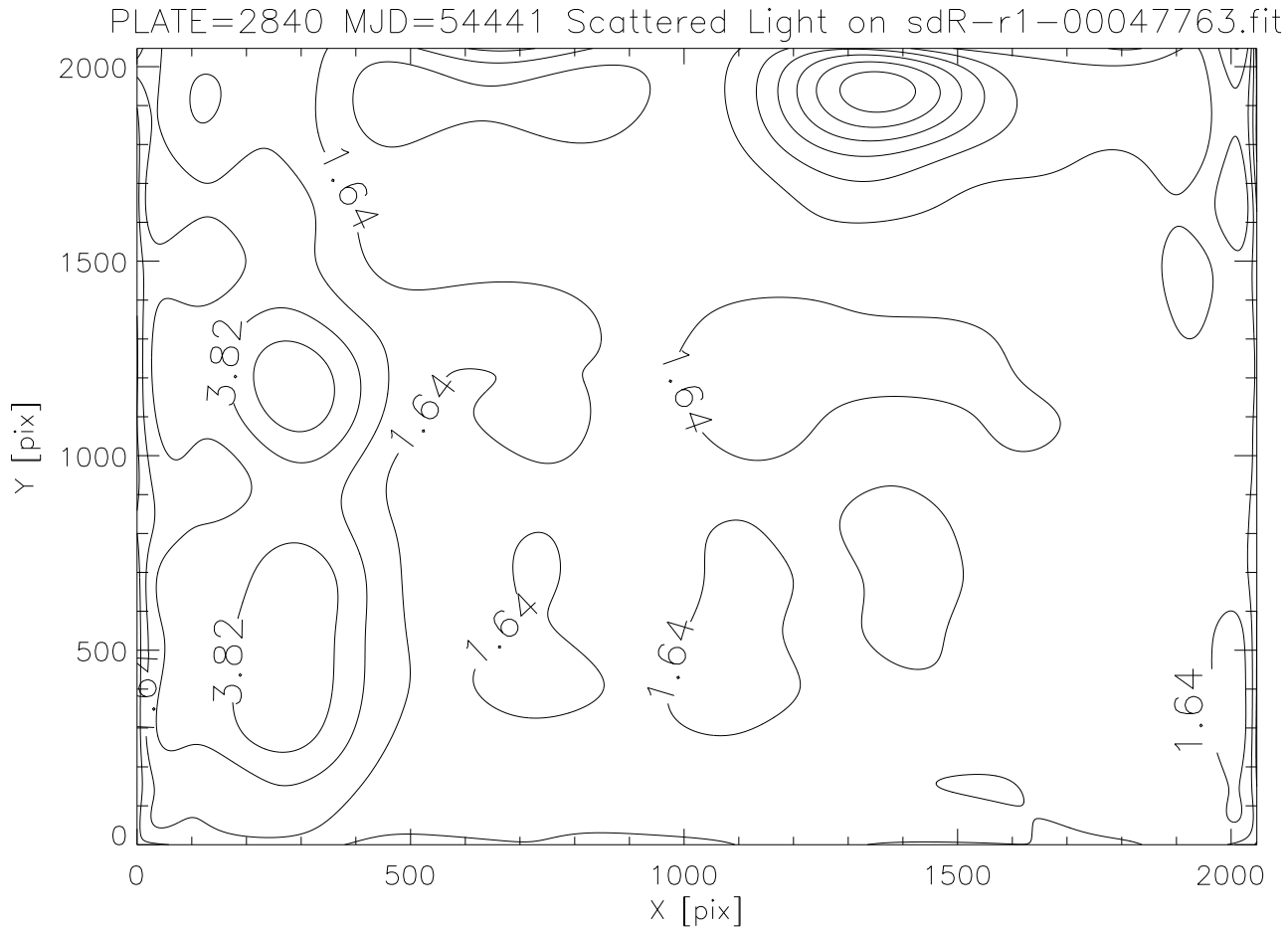

PLATE=2840 MJD=54441 sdR-r1-00047762.fit Skyline Flux at 7343,0
Flux (7343.0)/Airmass
RED = sky fiber
Dispersion = 43.09 %
Fiber number
Flux (7343.0)/Airmass
Focal Distance [mm]
Flux (7343.0)/Airmass
Airmass

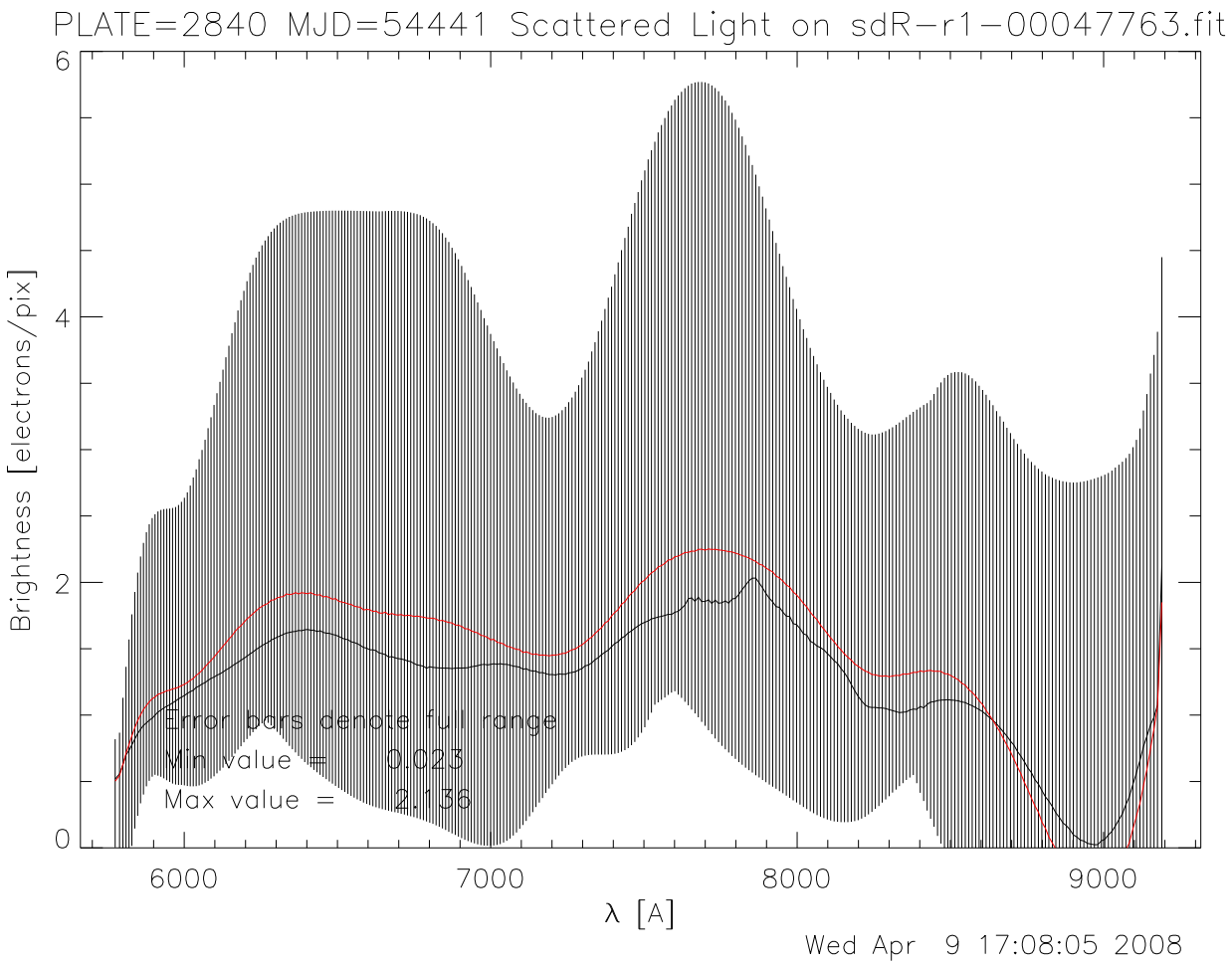

PLATE=2840 MJD=54441 sdR-r1-00047762.fit Skyline Flux at 8888.3
Flux (8888.3)/Airmass
RED = sky fiber
Dispersion = 33.59 %
Fiber number
Flux (8888.3)/Airmass
Focal Distance [mm]
Flux (8888.3)/Airmass
Airmass

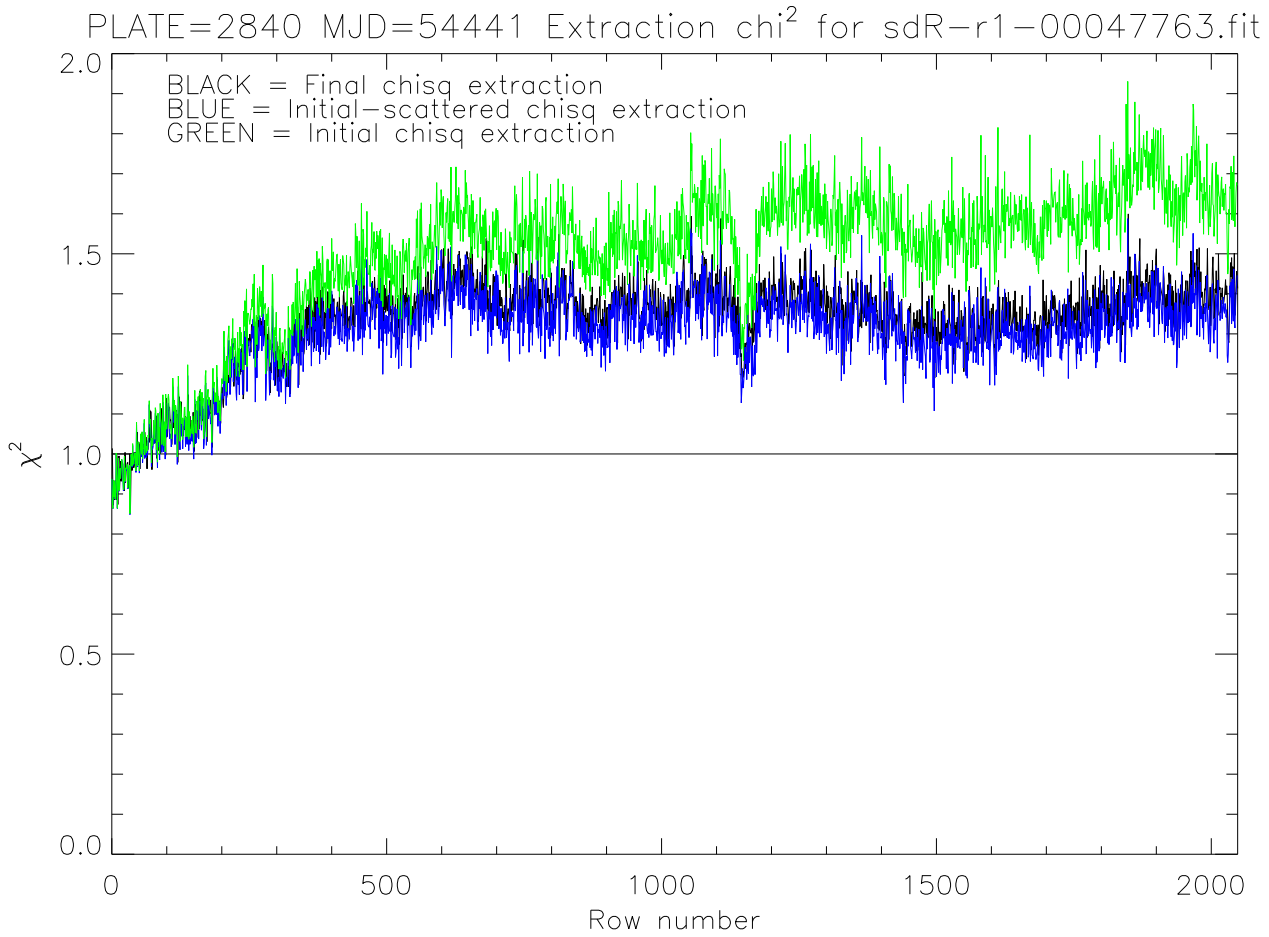

PLATE=2840 MJD=54441 Fiber−Flats for sdR−r1−00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.194
Max value = 1.435
Fiber−Flat
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]
Wed Apr 9 17:01:59 2008

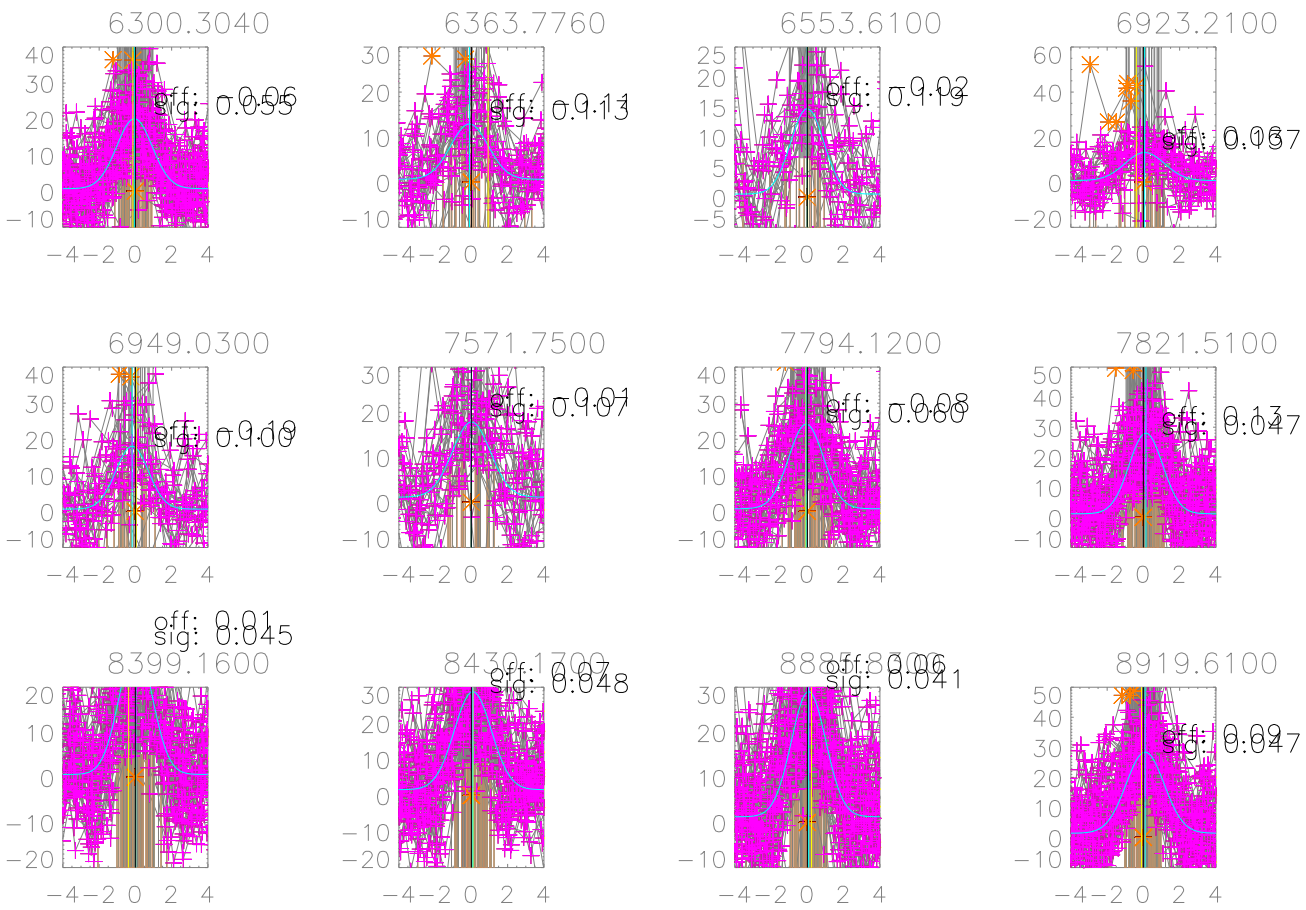

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r1-00047763.fi
Y [pix]
X [pix]
0
500
1000
1500
2000
22.7
15.5
8.2
0.9

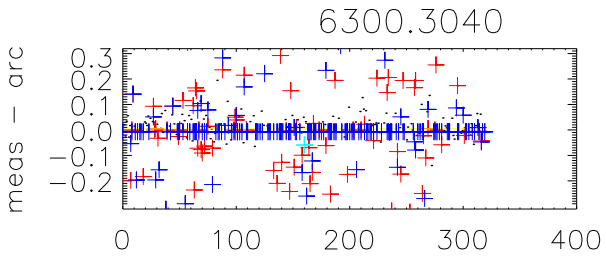

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r1-00047763.fi
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.627
Max value = 14.948
Wed Apr 9 17:03:04 2008

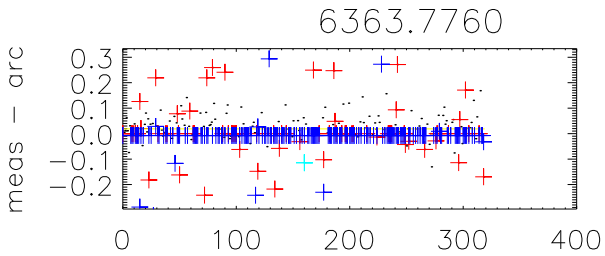

PLATE=2840 MJD=54441 Scattered Light on sdR-r1-00047763.fit
Y [pix]
X [pix]
0
500
1000
1500
2000
1.64
3.82

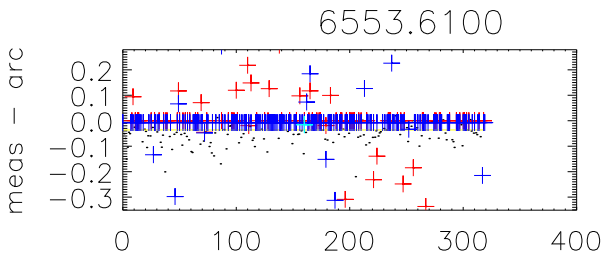

PLATE=2840 MJD=54441 Scattered Light on sdR-r1-00047763.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.023
Max value = 2.136
Wed Apr 9 17:08:05 2008

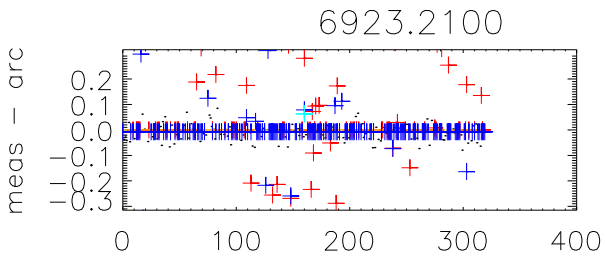

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-r1-00047763.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
2.0
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

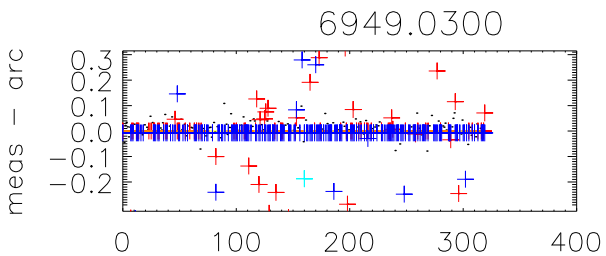

6300.3040
off: 0.06
sig: 0.055
6363.7760
off: 0.11
sig: 0.113
6553.6100
off: 0.02
sig: 0.119
6923.2100
sig: 0.137
6949.0300
off: 0.10
sig: 0.109
7571.7500
off: 0.01
sig: 0.107
7794.1200
off: 0.08
sig: 0.060
7821.5100
off: 0.13
sig: 0.047
off: 0.01
sig: 0.045
8399.1600
off: 0.07
sig: 0.048
8885.8906
sig: 0.041
8919.6100
off: 0.09
sig: 0.047

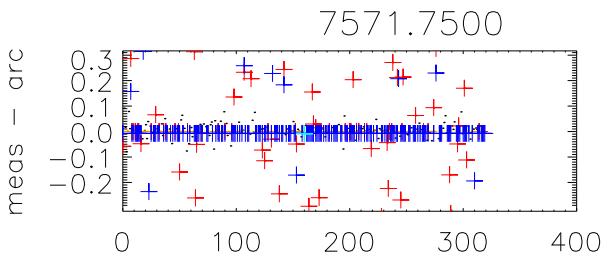

6300.3040
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

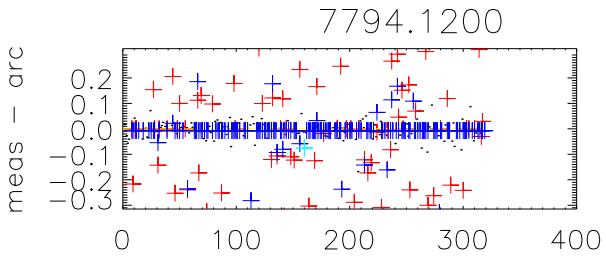

6363.7760
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

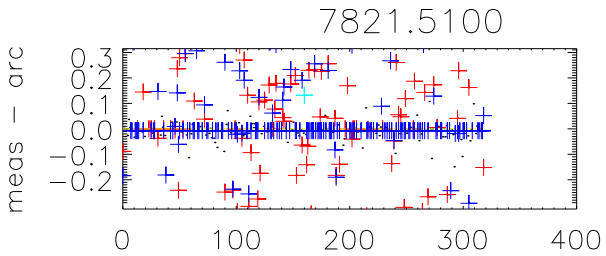

6553.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

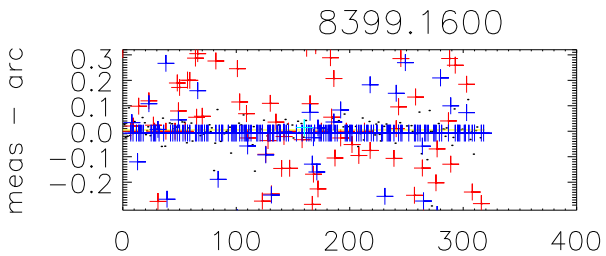

6923.2100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

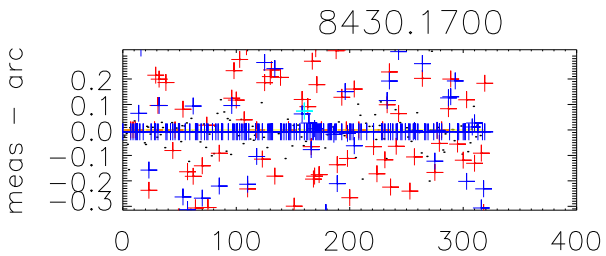

6949.0300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

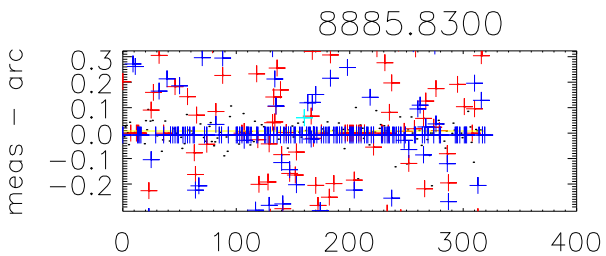

7571.7500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

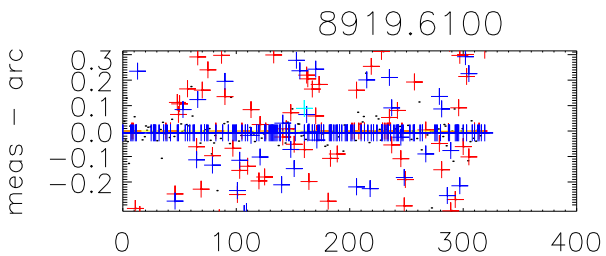

7794.1200
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

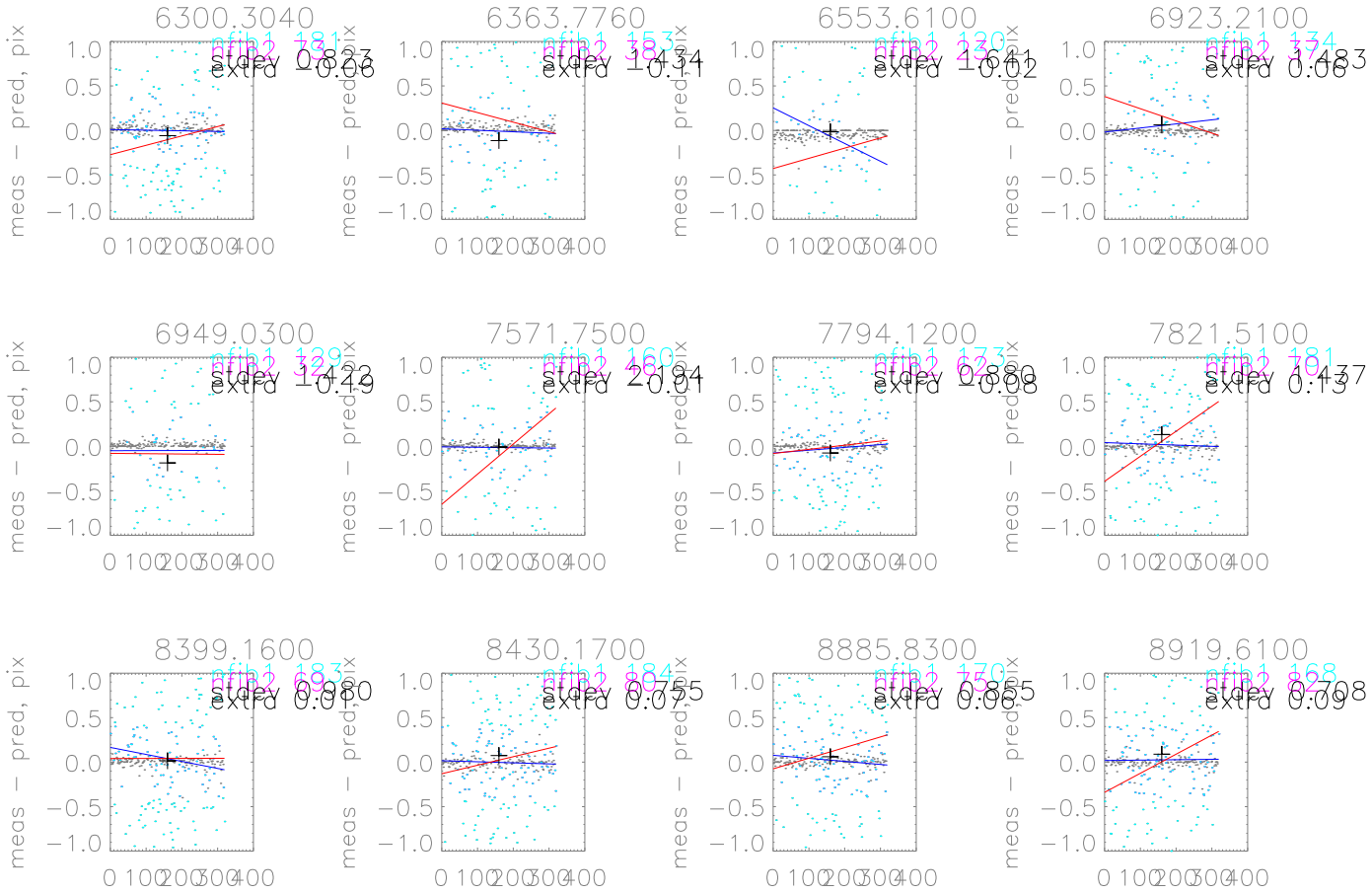

7821.5100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

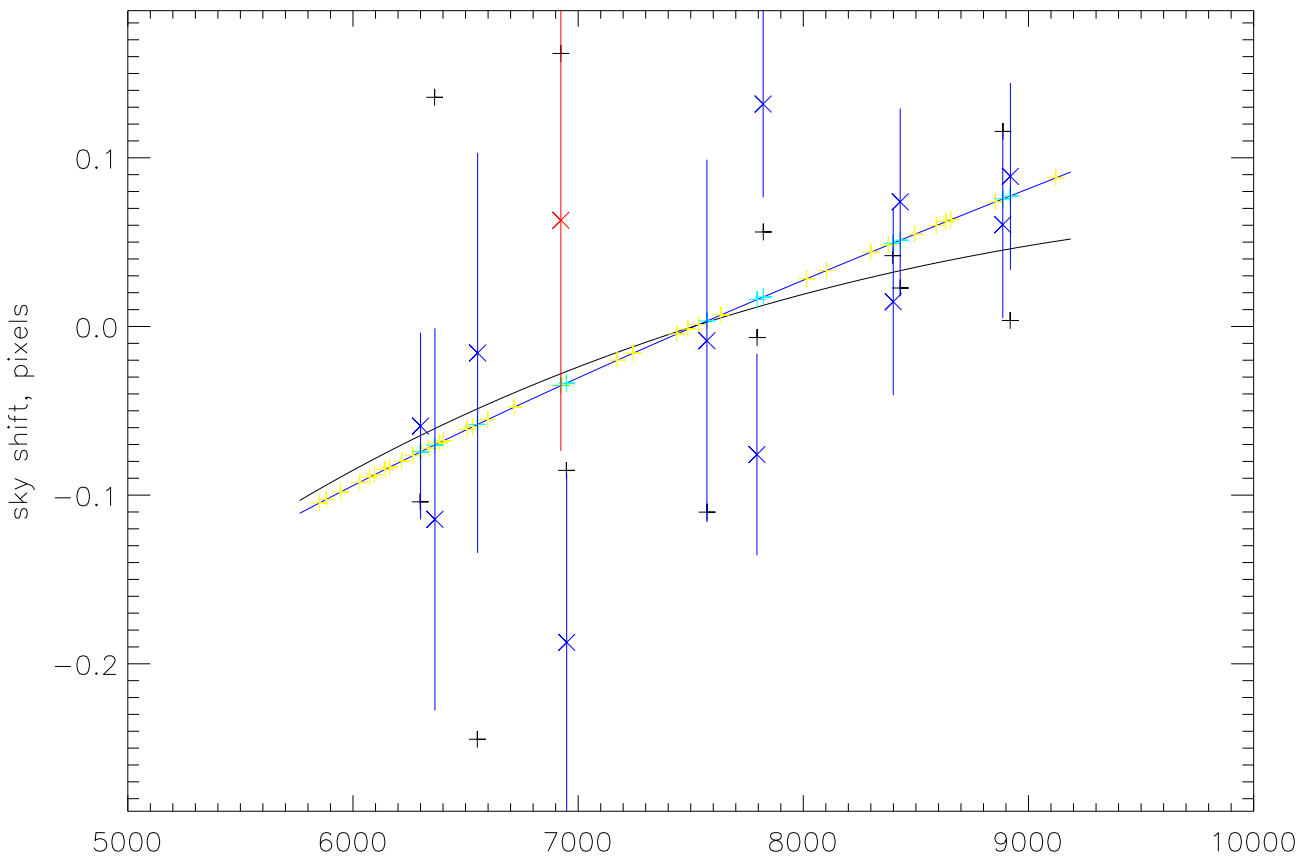

8399.1600
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

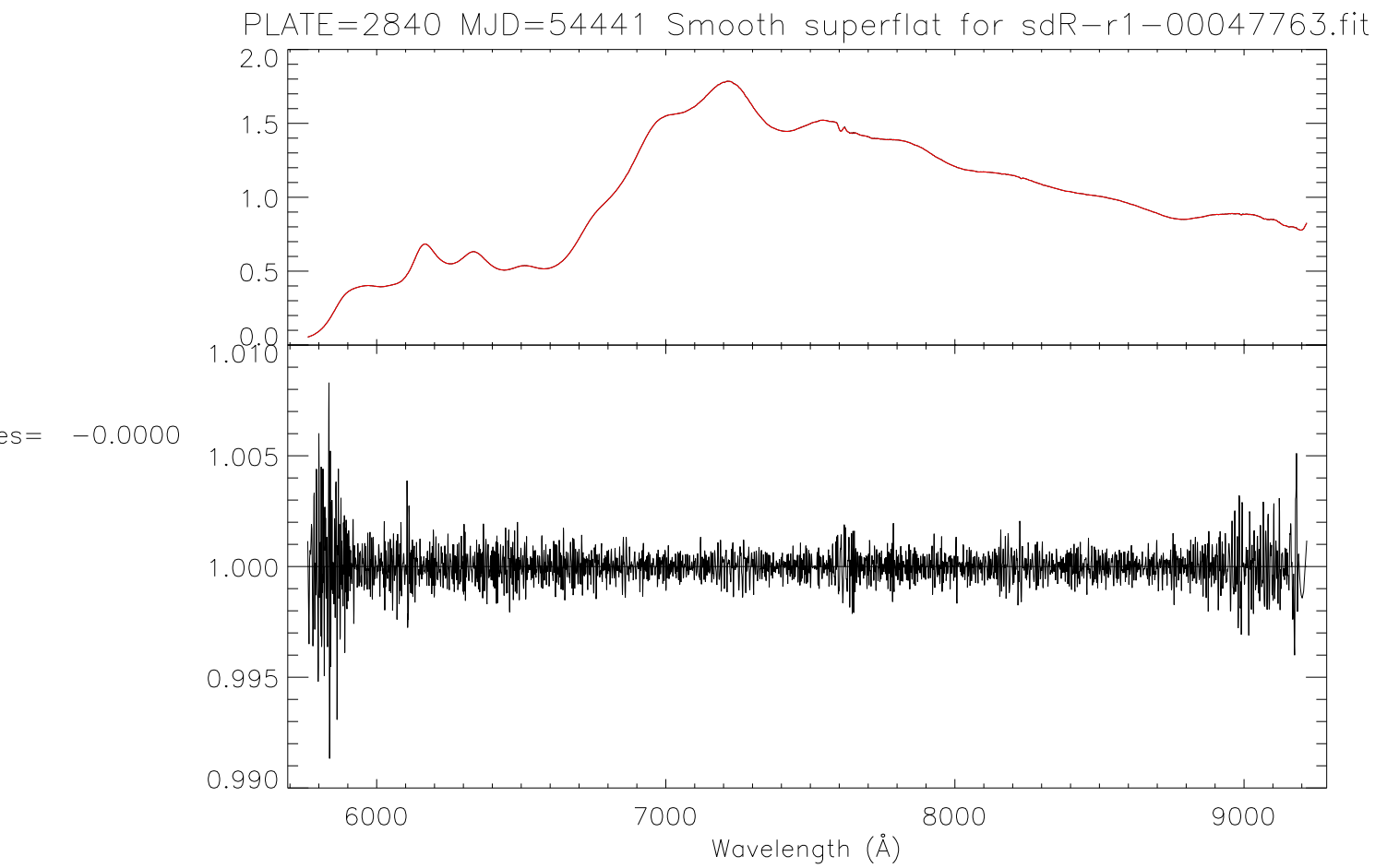

8430.1700
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

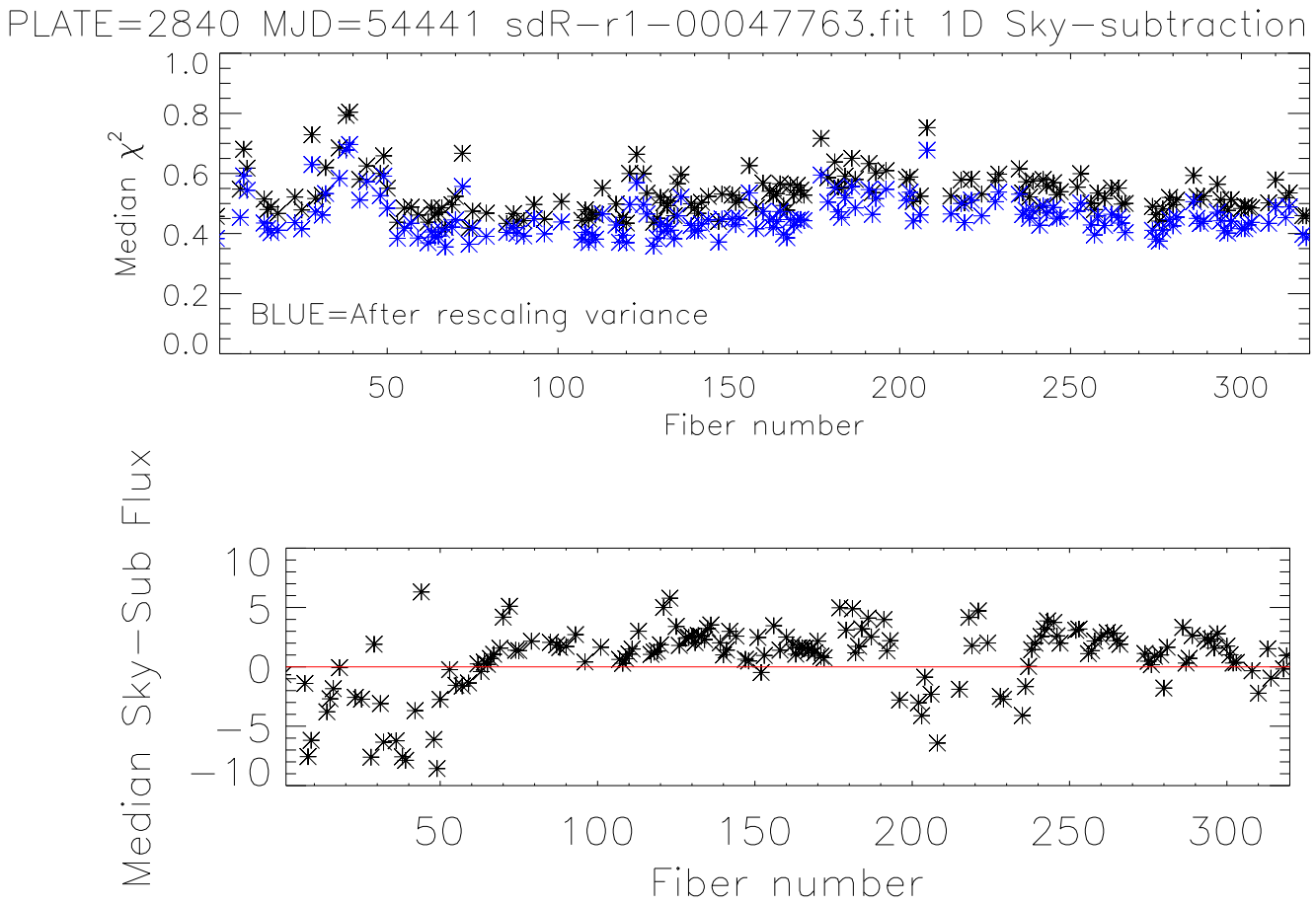

8885.8300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

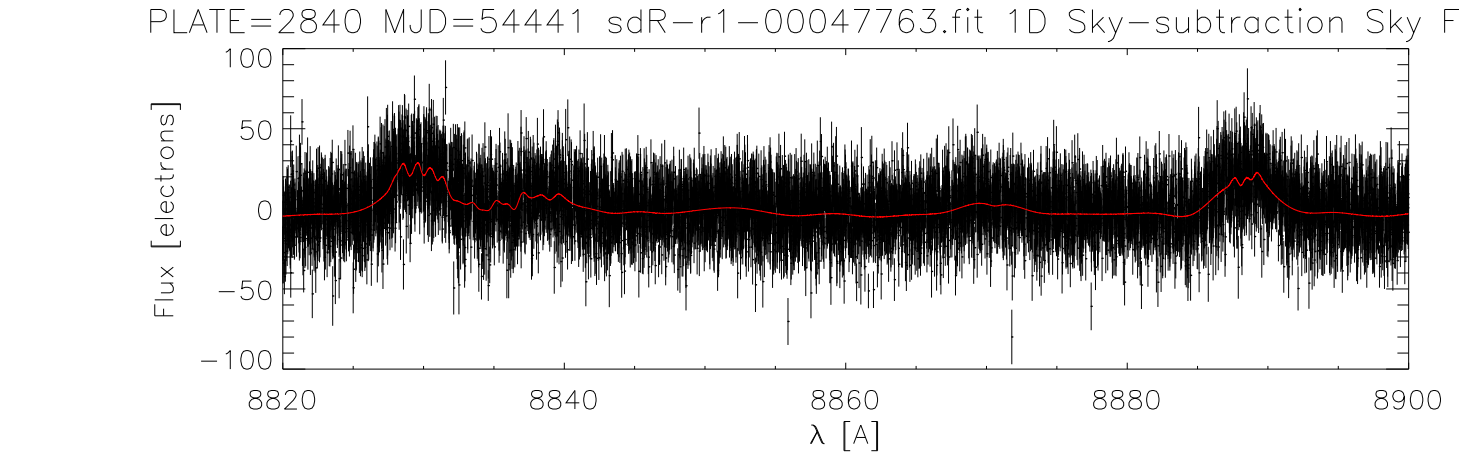

8919.6100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

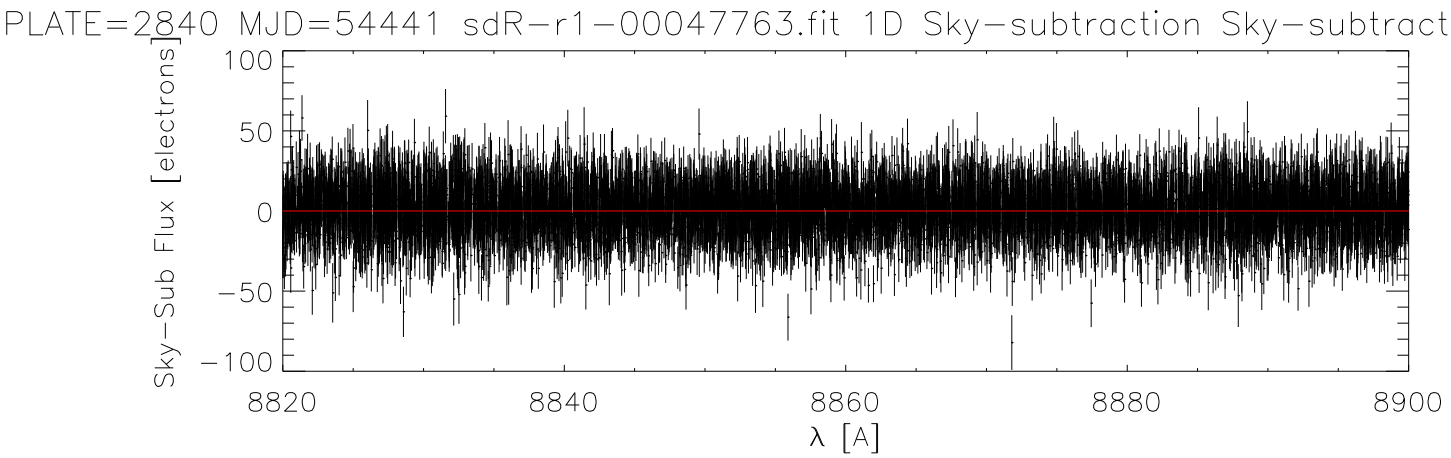

6300.3040
mfb1 181
mfb2 181
stdev 0.823
extra 0.06
6363.7760
mfb1 183
mfb2 183
stdev 1.434
extra 0.11
6553.6100
mfb1 120
mfb2 120
stdev 1.641
extra 0.02
6923.2100
mfb1 174
mfb2 174
stdev 1.483
extra 0.08
6949.0300
mfb1 129
mfb2 129
stdev 1.442
extra 0.49
7571.7500
mfb1 160
mfb2 160
stdev 2.184
extra 2.01
7794.1200
mfb1 173
mfb2 173
stdev 0.880
extra 0.08
7821.5100
mfb1 181
mfb2 181
stdev 1.437
extra 0.13
8399.1600
mfb1 183
mfb2 183
stdev 0.880
extra 0.01
8430.1700
mfb1 184
mfb2 184
stdev 0.755
extra 0.07
8885.8300
mfb1 170
mfb2 170
stdev 0.855
extra 0.06
8919.6100
mfb1 168
mfb2 168
stdev 0.708
extra 0.09
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0 100 200 300 400

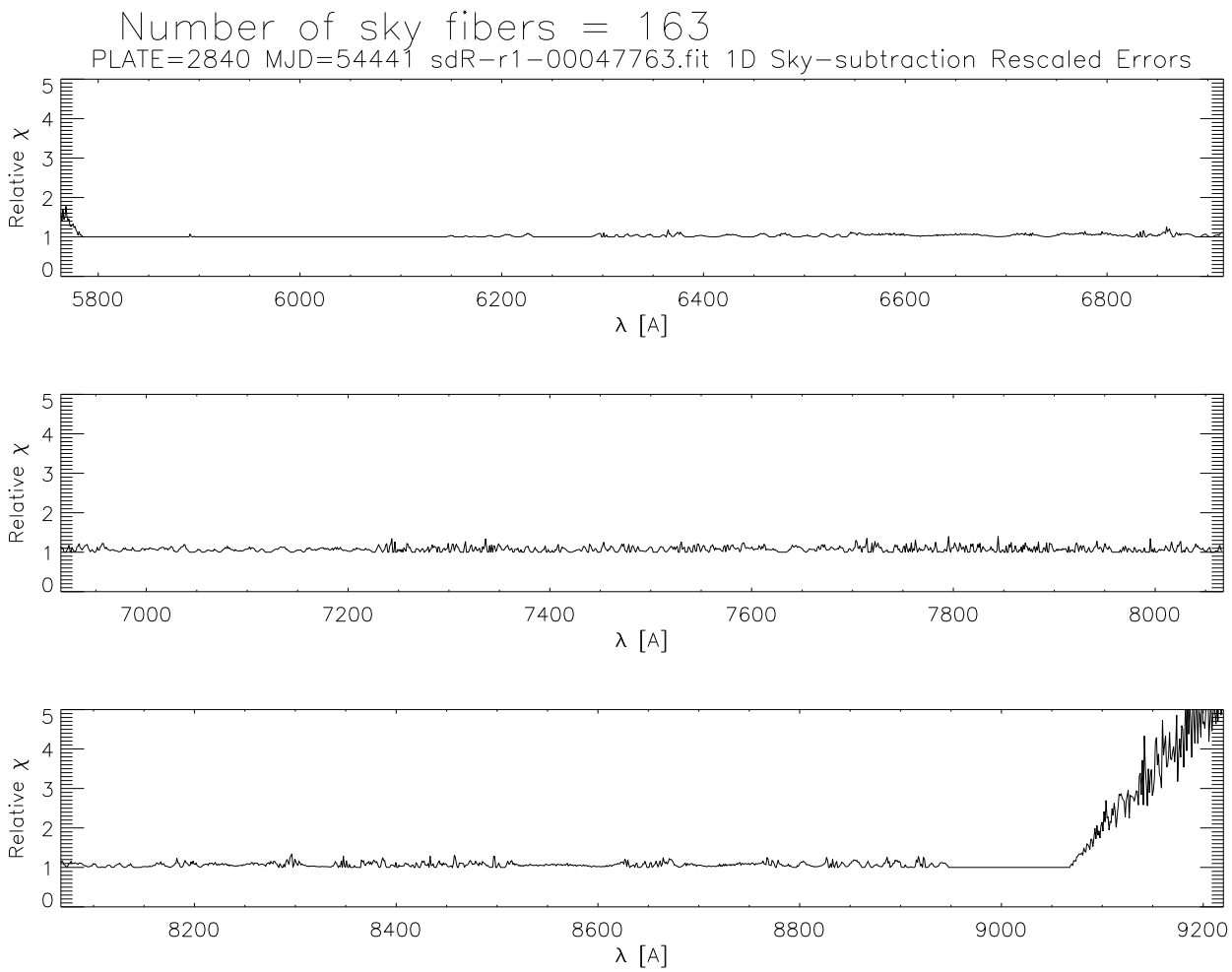

sky shift, pixels
0.1
0.0
−0.1
−0.2
5000
6000
7000
8000
9000
10000

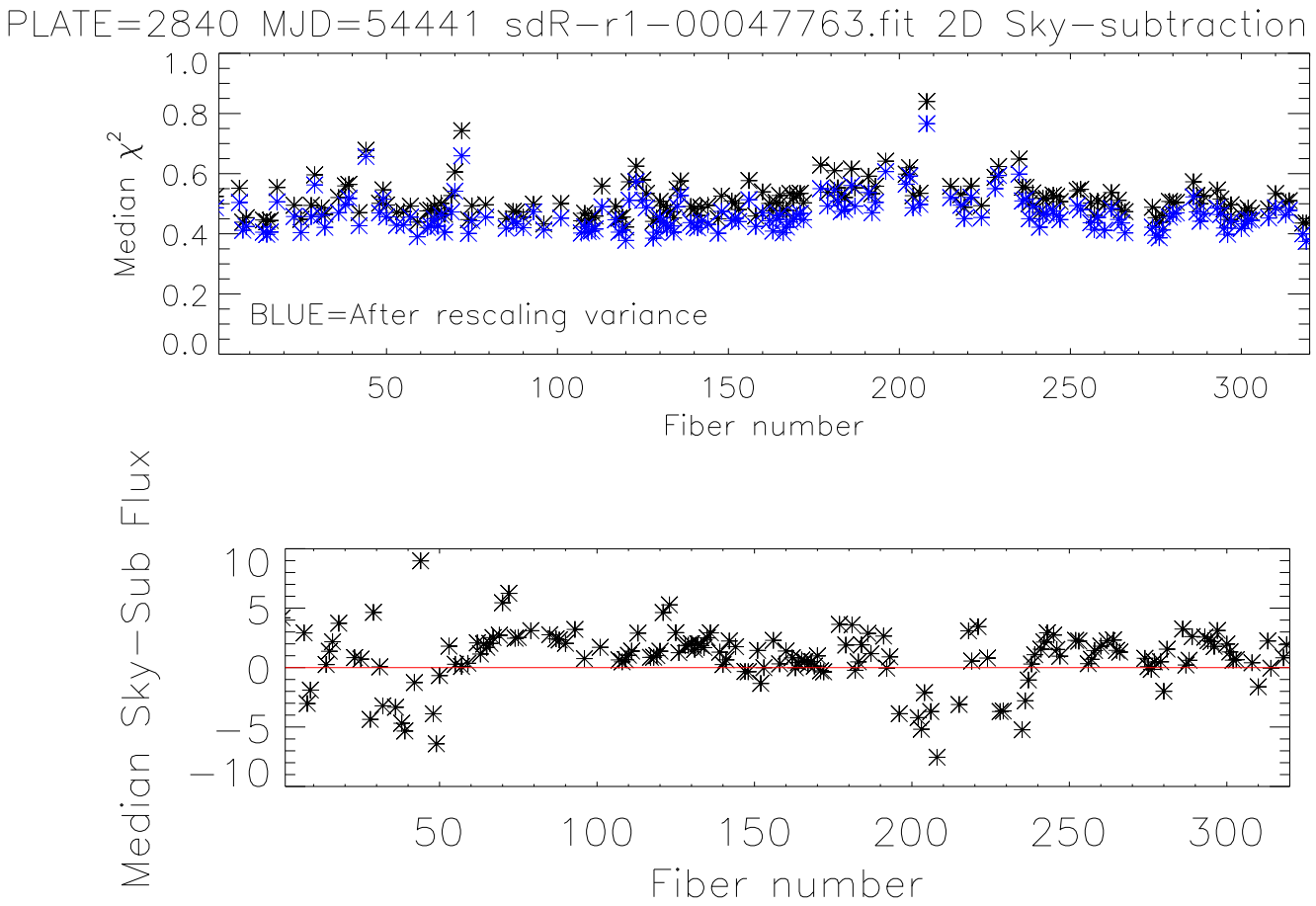

PLATE=2840 MJD=54441 Smooth superflat for sdR-r1-00047763.fit
2.0
1.5
1.0
0.5
0.0
1.010
1.005
1.000
0.995
0.990
es= −0.0000
6000
7000
8000
9000
Wavelength (Å)

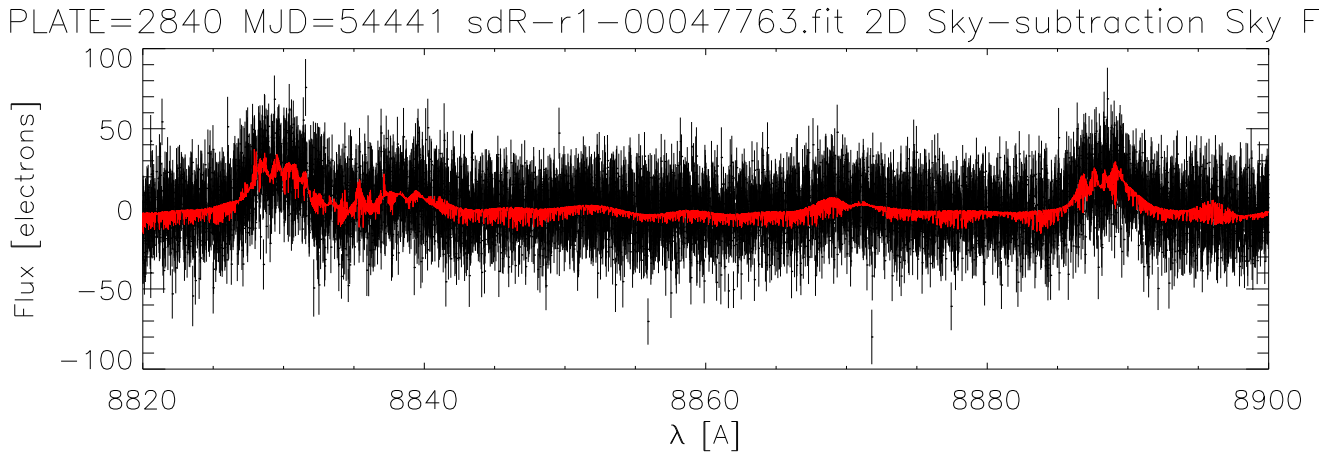

PLATE=2840 MJD=54441 sdR-r1-00047763.fit 1D Sky-subtraction Sky Fibers
Median χ^2
1.0
0.8
0.6
0.4
0.2
0.0
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
10
5
0
−5
−10
50
100
150
200
250
300
Fiber number

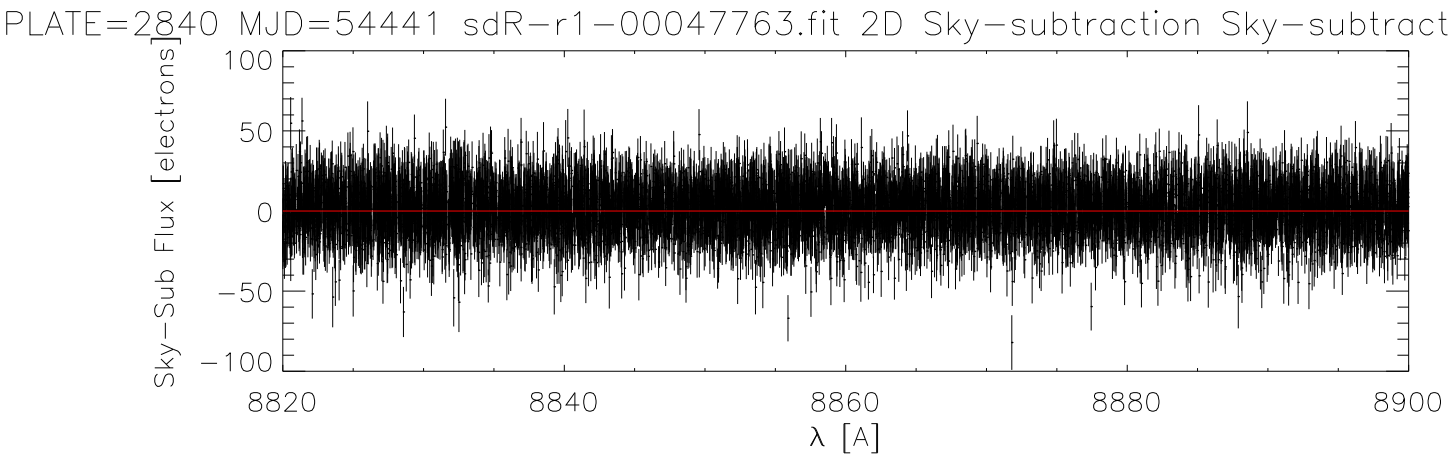

PLATE=2840 MJD=54441 sdR-r1-00047763.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
100
50
0
−50
−100
8820
8840
8860
8880
8900
λ [A]

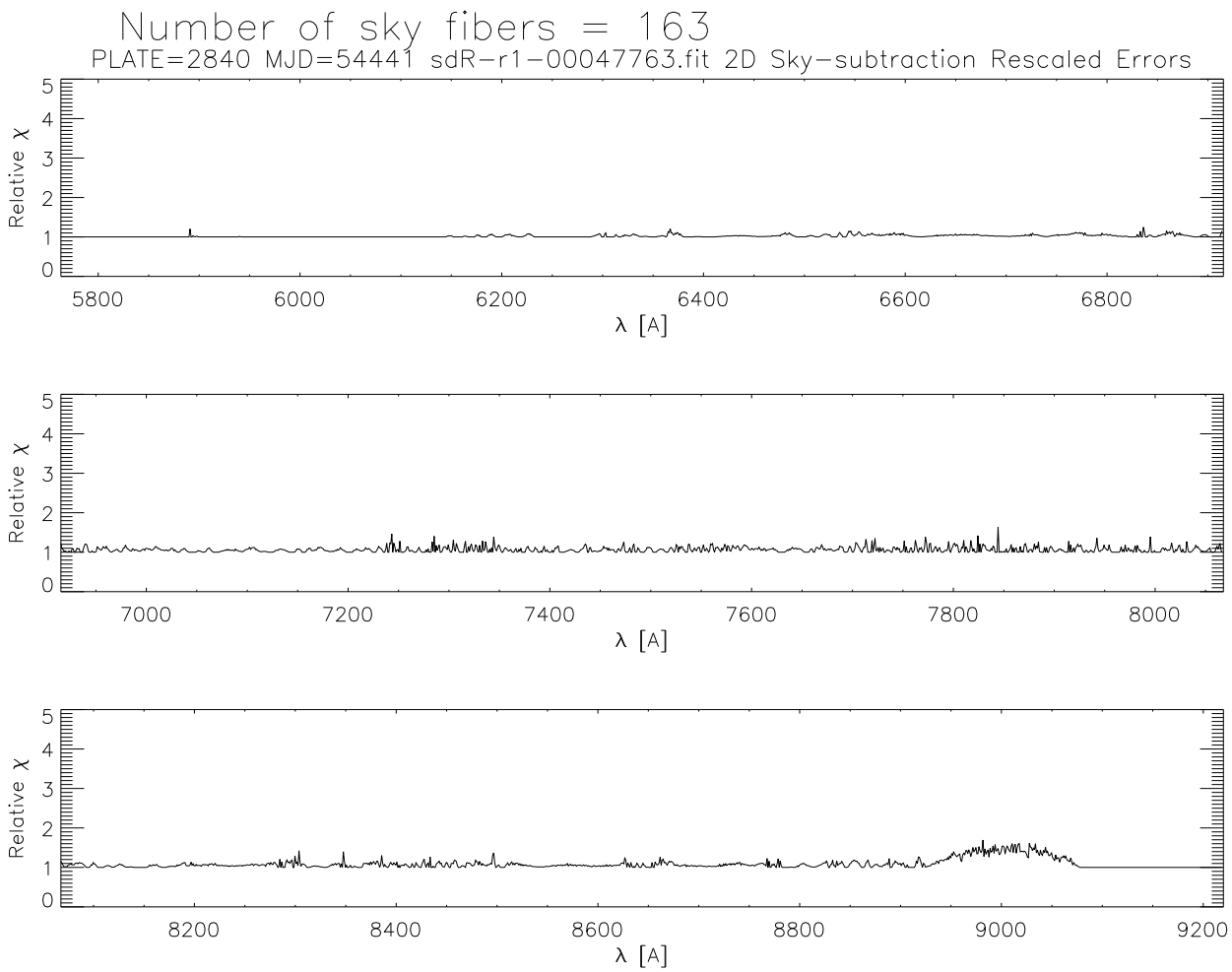

PLATE=2840 MJD=54441 sdR-r1-00047763.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
100
50
0
−50
−100
8820
8840
8860
8880
8900
λ [A]

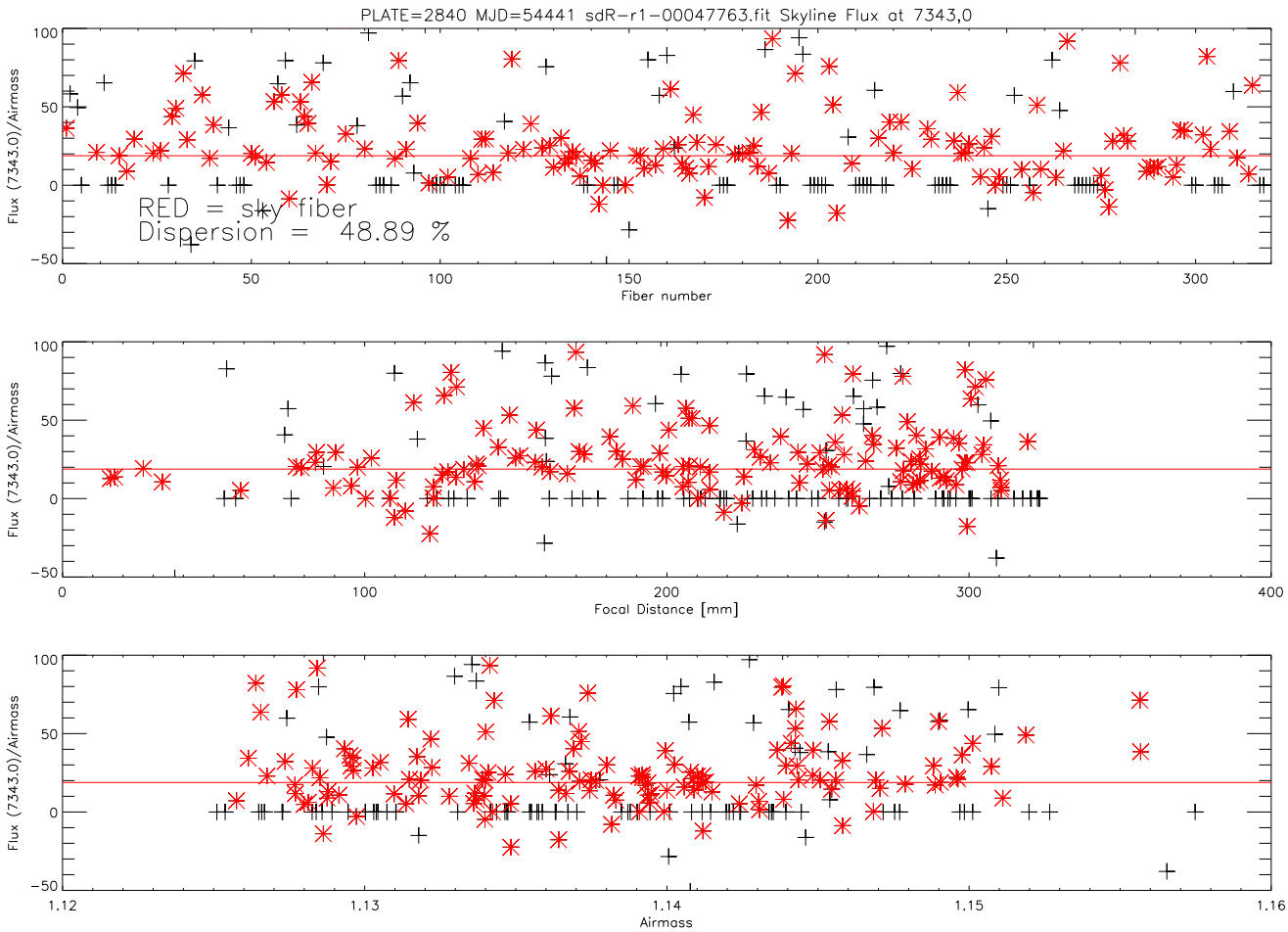

Number of sky fibers = 163
PLATE=2840 MJD=54441 sdR-r1-00047763.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

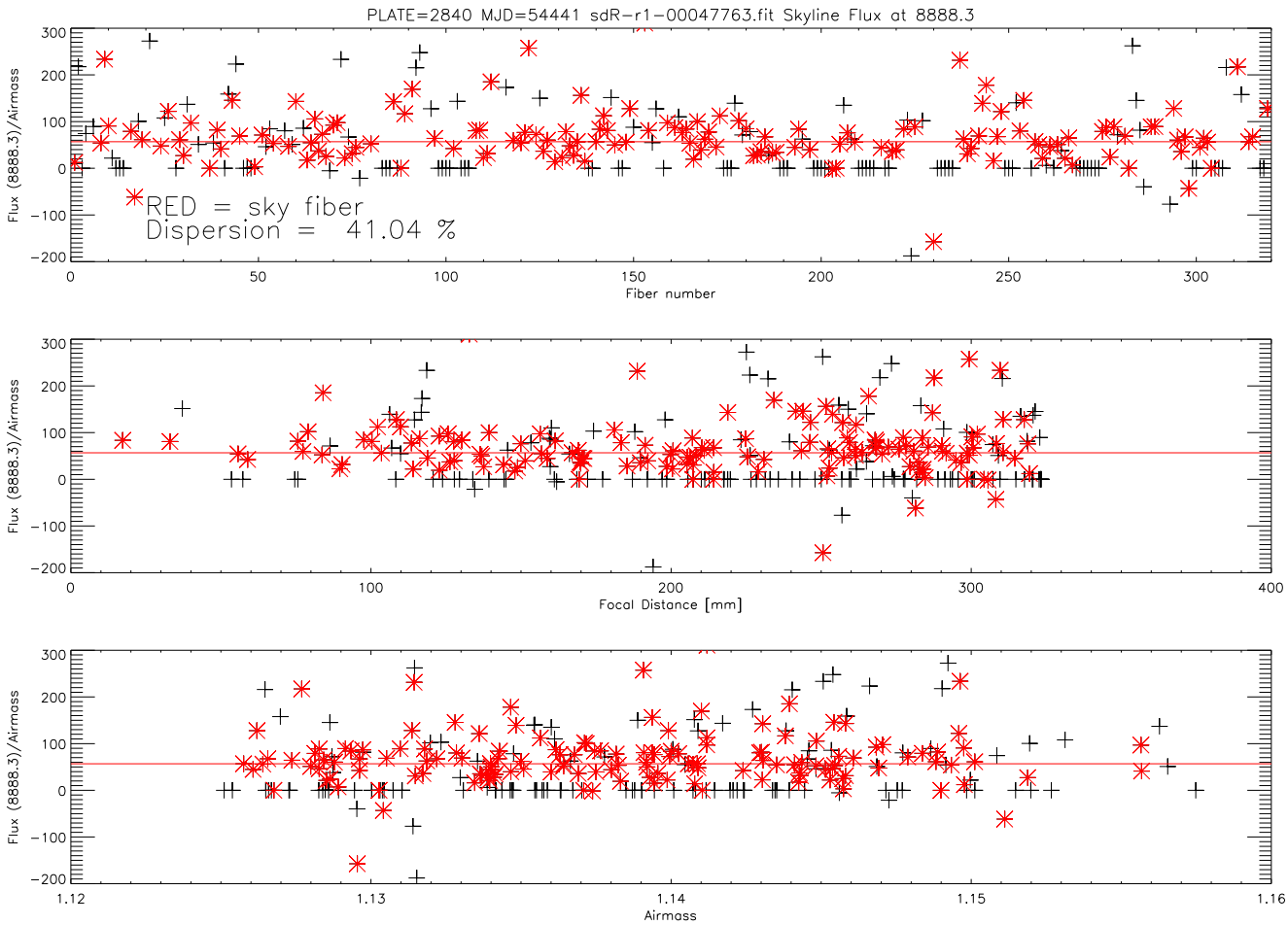

PLATE=2840 MJD=54441 sdR-r1-00047763.fit 2D Sky-subtraction Sky Fibers
Median χ^2
1.0
0.8
0.6
0.4
0.2
0.0
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
10
5
0
−5
−10
50
100
150
200
250
300
Fiber number

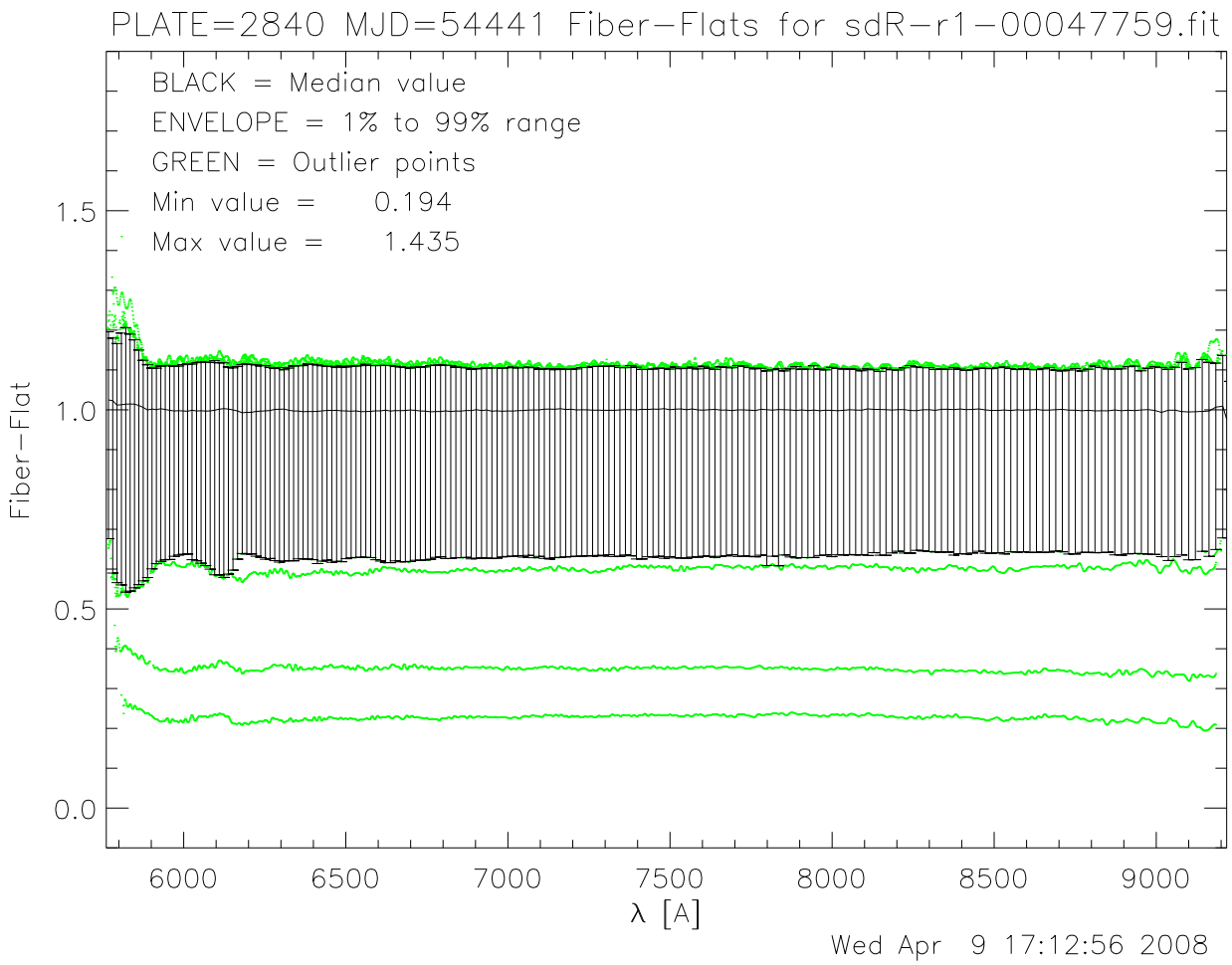

PLATE=2840 MJD=54441 sdR-r1-00047763.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
100
50
0
−50
−100
8820
8840
8860
8880
8900
λ [A]

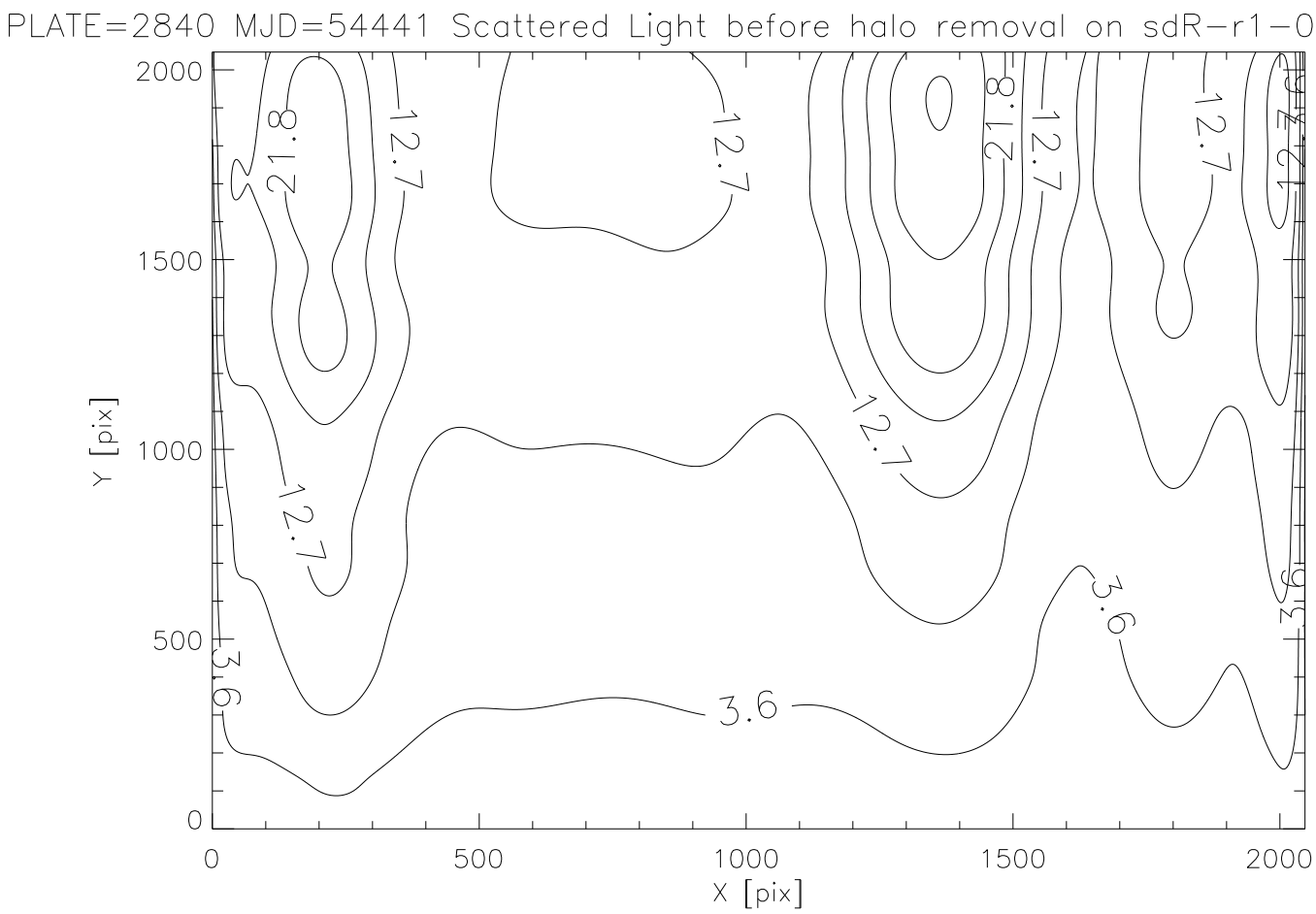

PLATE=2840 MJD=54441 sdR-r1-00047763.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
100
50
0
−50
−100
8820
8840
8860
8880
8900
λ [A]

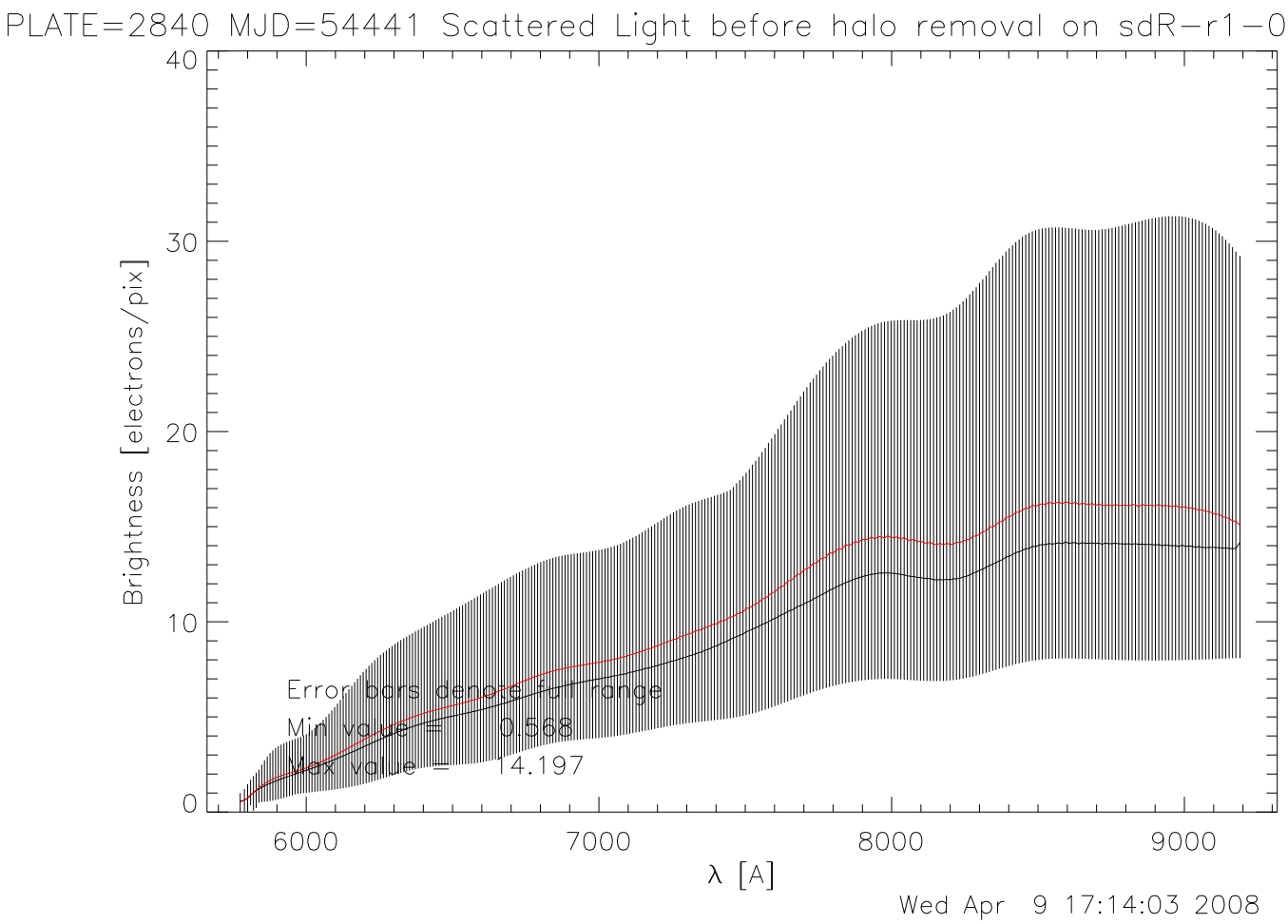

Number of sky fibers = 163
PLATE=2840 MJD=54441 sdR-r1-00047763.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200
0
1
2
3
4
5

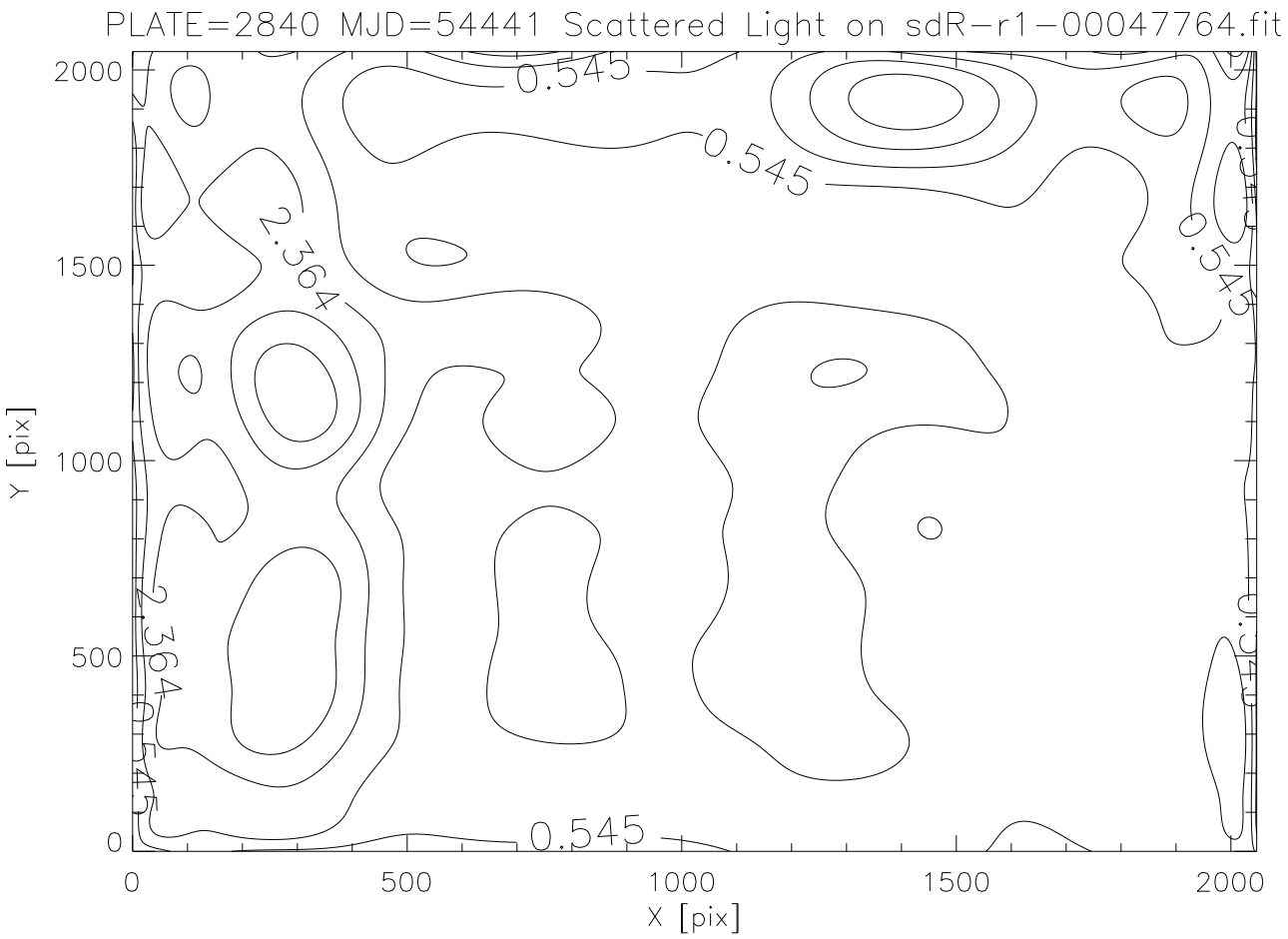

PLATE=2840 MJD=54441 sdR-r1-00047763.fit Skyline Flux at 7343,0
Flux (7343.0)/Airmass
RED = sky fiber
Dispersion = 48.89 %
Fiber number
Flux (7343.0)/Airmass
Focal Distance [mm]
Flux (7343.0)/Airmass
Airmass

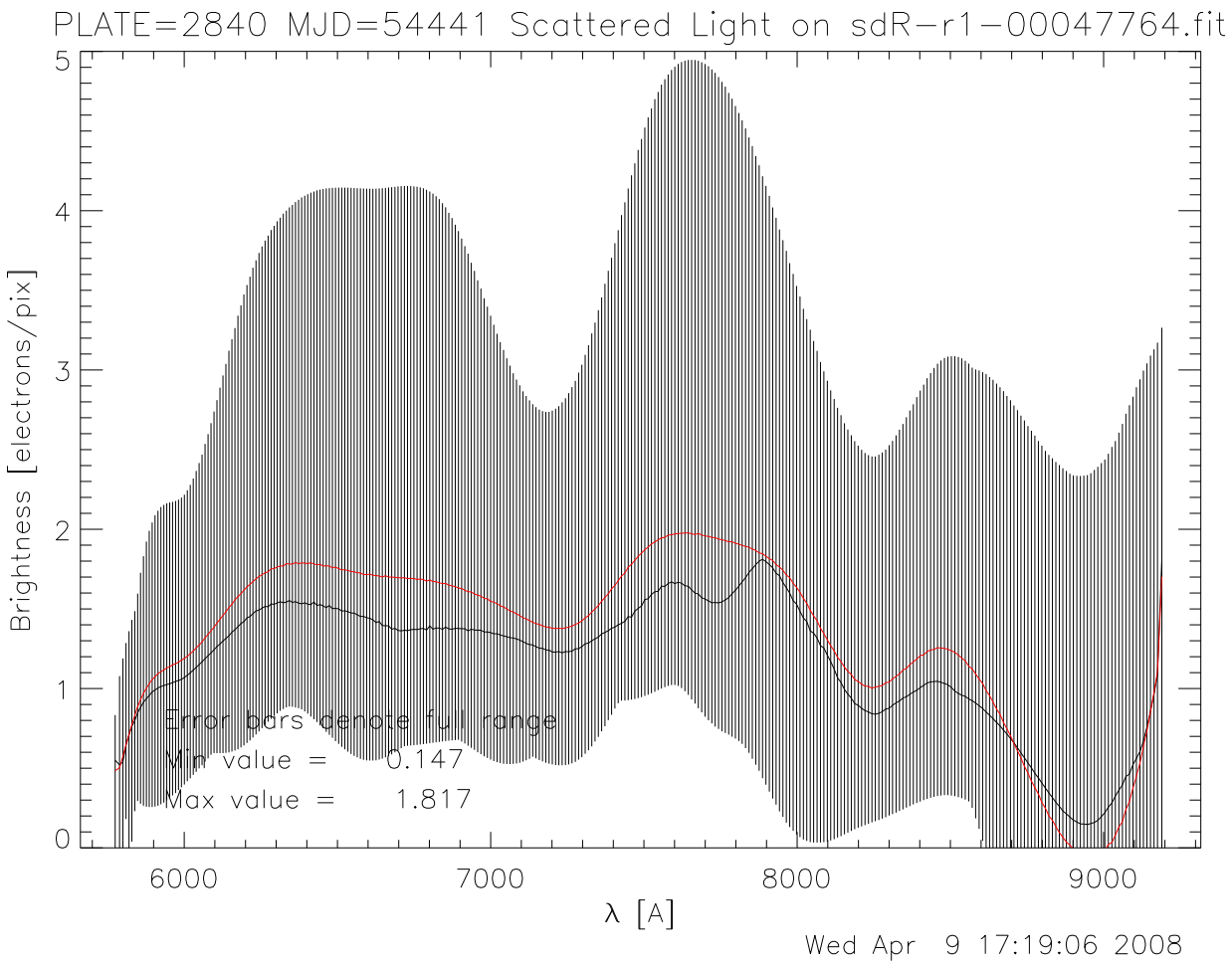

PLATE=2840 MJD=54441 sdR-r1-00047763.fit Skyline Flux at 8888.3
Flux (8888.3)/Airmass
RED = sky fiber
Dispersion = 41.04 %
Fiber number
Flux (8888.3)/Airmass
Focal Distance [mm]
Flux (8888.3)/Airmass
Airmass

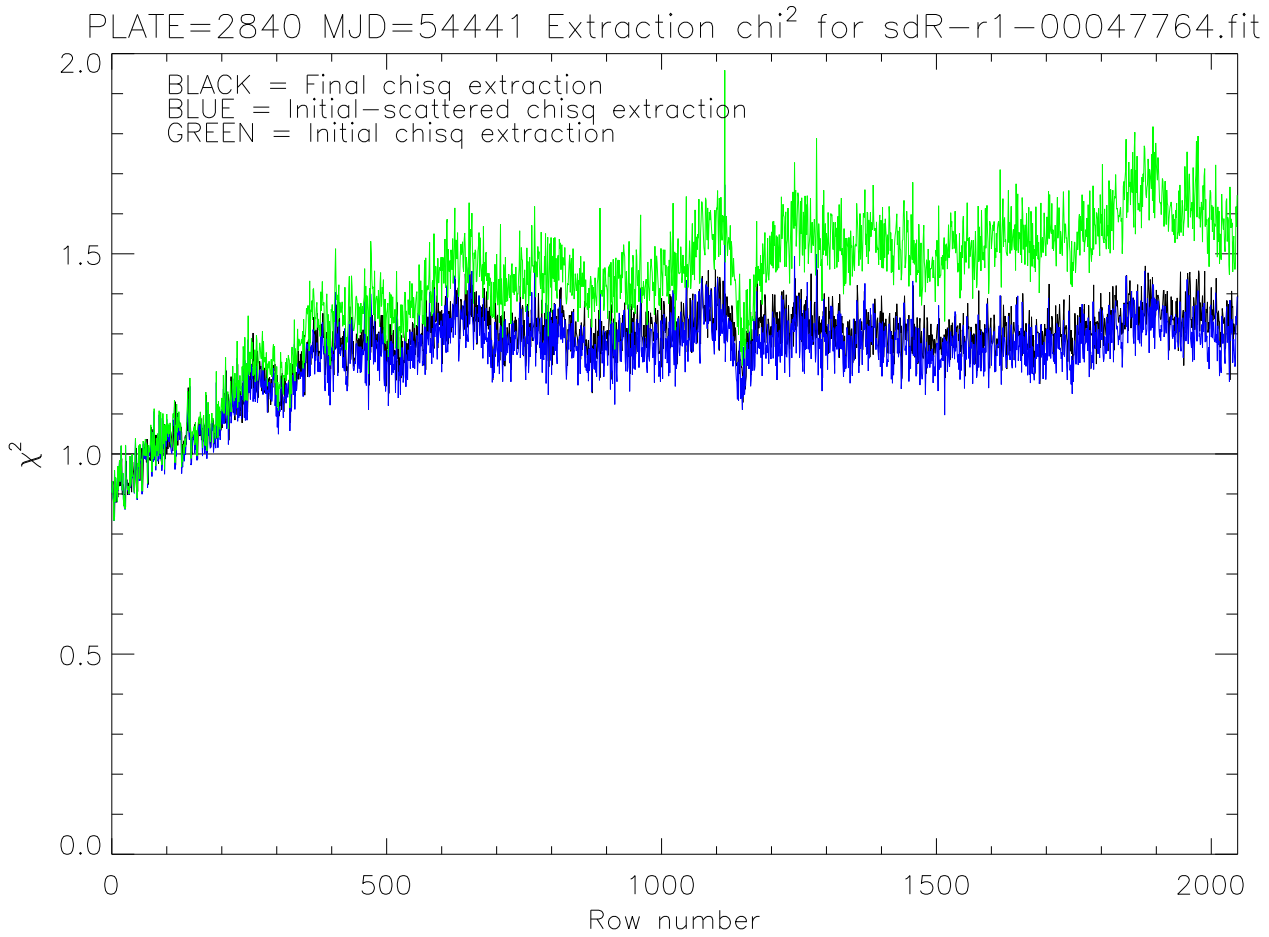

PLATE=2840 MJD=54441 Fiber−Flats for sdR−r1−00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.194
Max value = 1.435
Fiber−Flat
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]
Wed Apr 9 17:12:56 2008

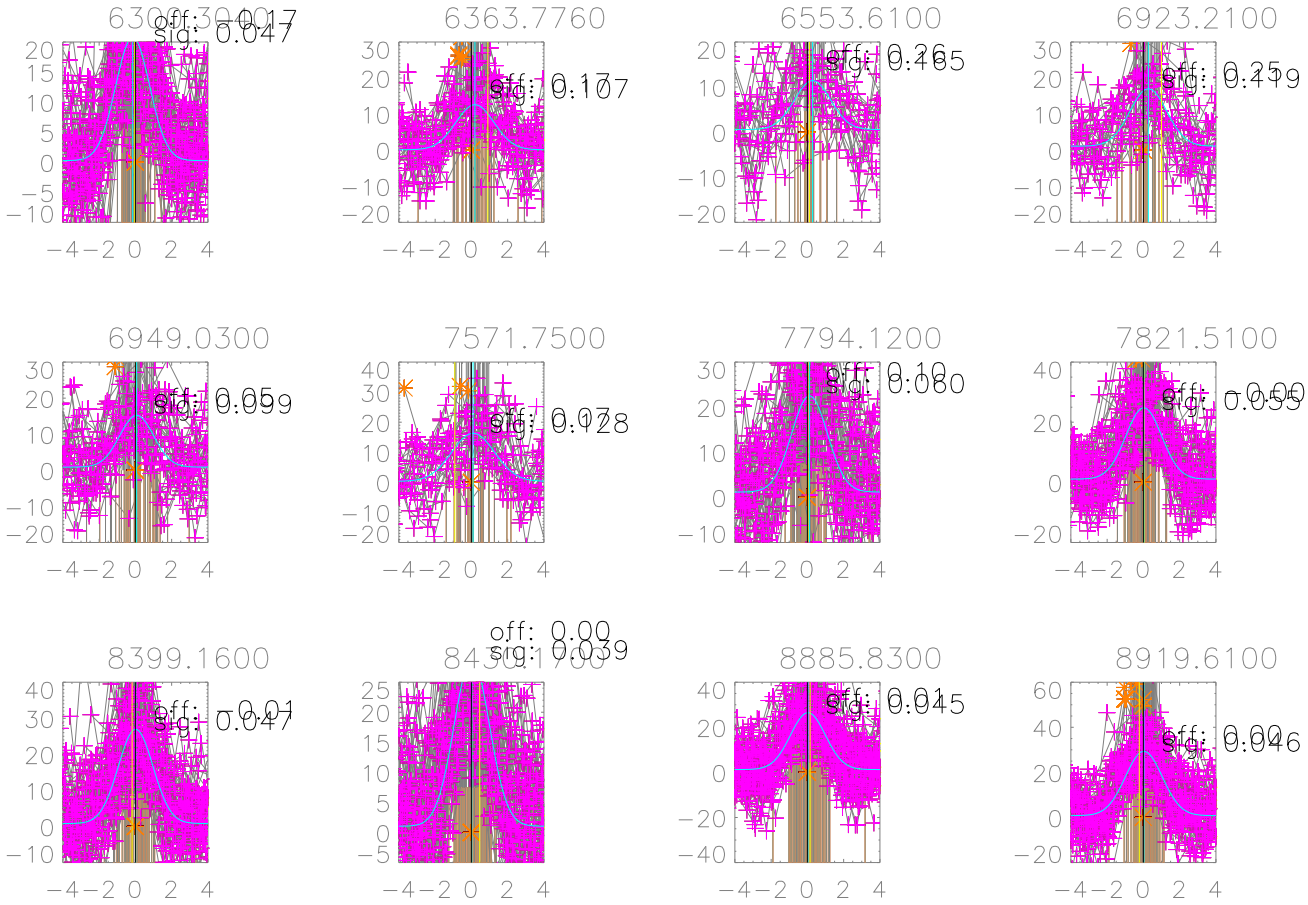

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r1-00047764.fi
Y [pix]
X [pix]
0
500
1000
1500
2000
8.12
12.7
3.6

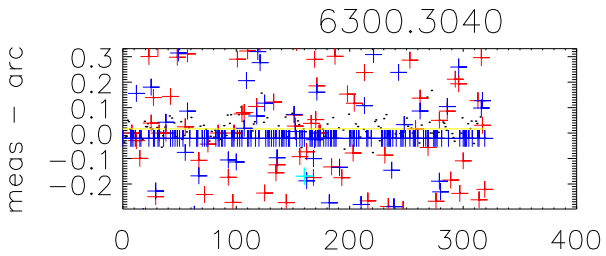

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r1-00047764.fi
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.568
Max value = 14.197
Wed Apr 9 17:14:03 2008

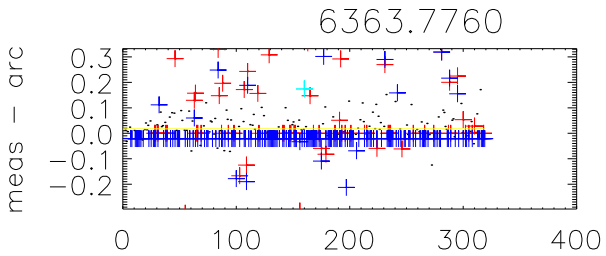

PLATE=2840 MJD=54441 Scattered Light on sdR−r1−00047764.fit
0.545
0.545
2.364
0.543
2.364
0.545
0.545
2000
1500
1000
500
0
0
500
1000
1500
2000
Y [pix]
X [pix]

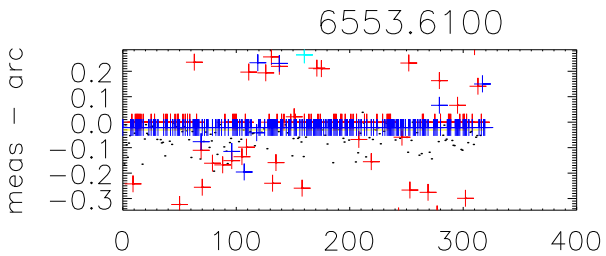

PLATE=2840 MJD=54441 Scattered Light on sdR-r1-00047764.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.147
Max value = 1.817
Wed Apr 9 17:19:06 2008

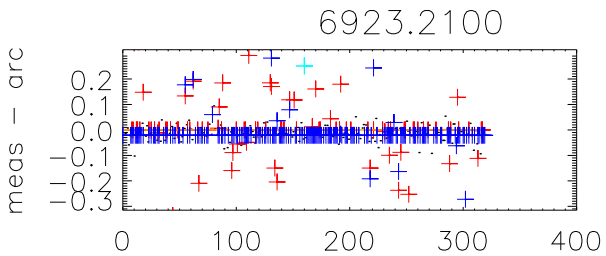

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-r1-00047764.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
2.0
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

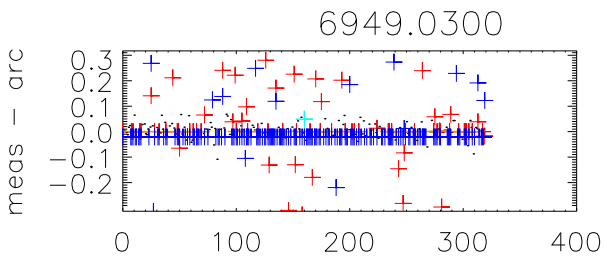

6300.3000
off: 0.017
sig: 0.047
6363.7760
off: 0.17
sig: 0.107
6553.6100
off: 0.26
sig: 0.465
6923.2100
off: 0.25
sig: 0.419
6949.0300
off: 0.05
sig: 0.099
7571.7500
off: 0.07
sig: 0.128
7794.1200
off: 0.10
sig: 0.080
7821.5100
off: -0.00
sig: 0.055
8399.1600
off: -0.01
sig: 0.047
8430.1700
off: 0.00
sig: 0.039
8885.8300
off: 0.01
sig: 0.045
8919.6100
off: 0.00
sig: 0.046

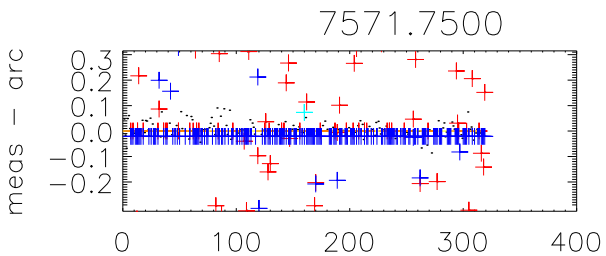

6300.3040
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

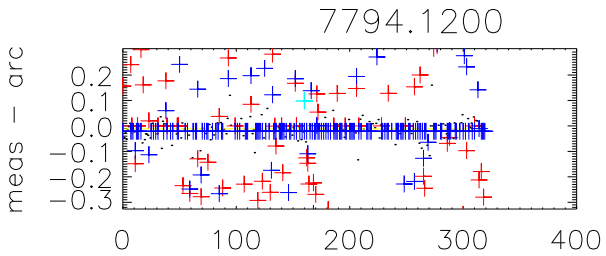

6363.7760
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

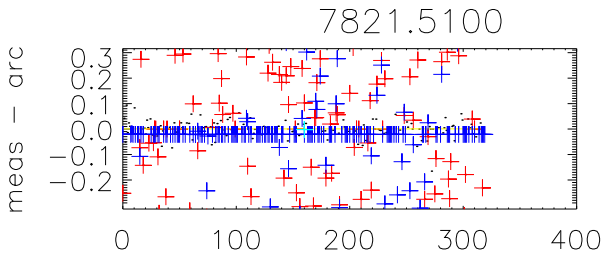

6553.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

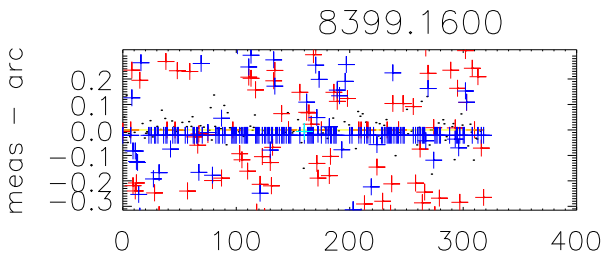

6923.2100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

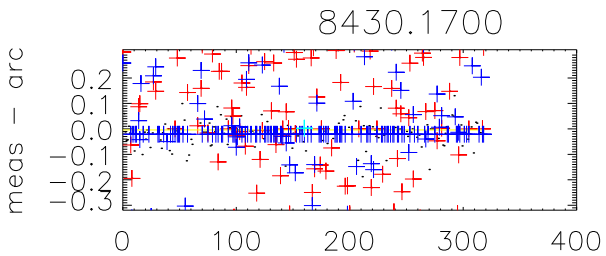

6949.0300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

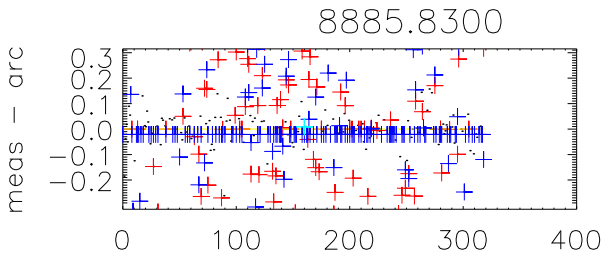

7571.7500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

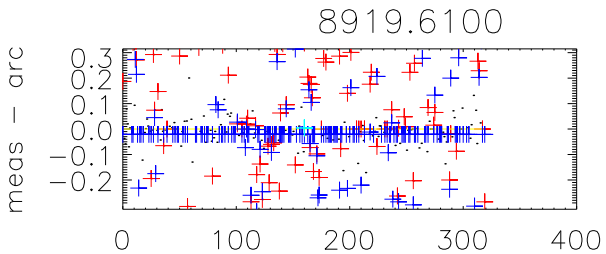

7794.1200
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

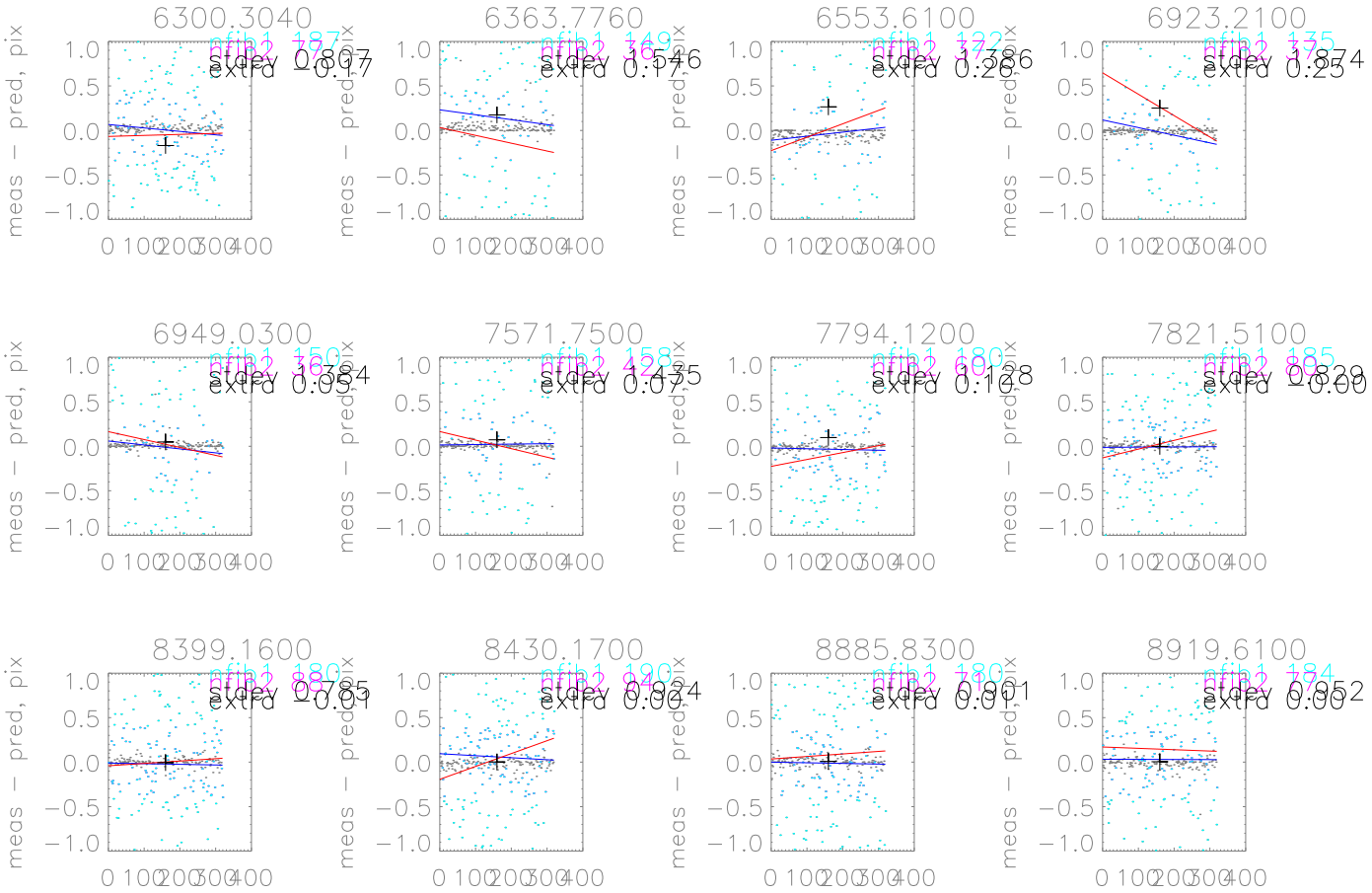

7821.5100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

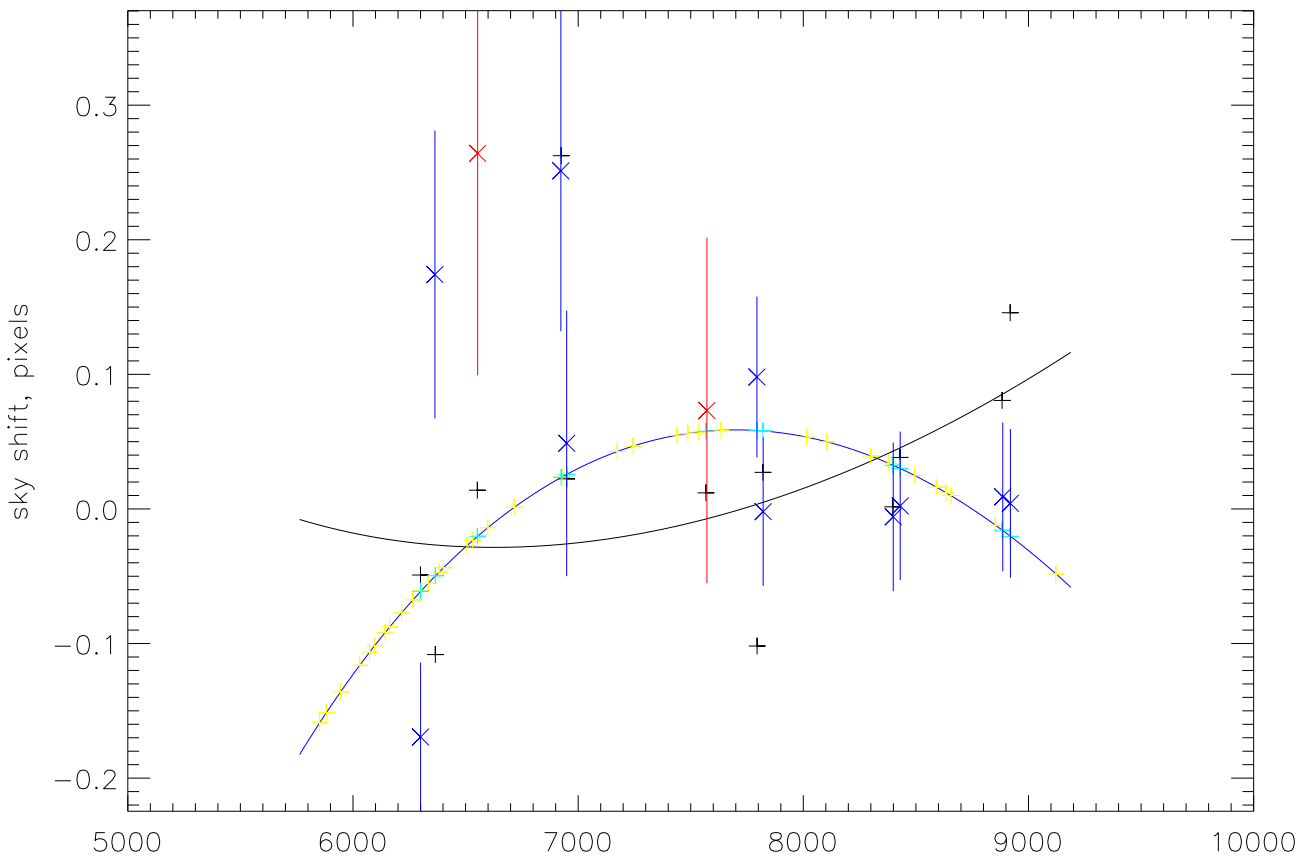

8399.1600
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

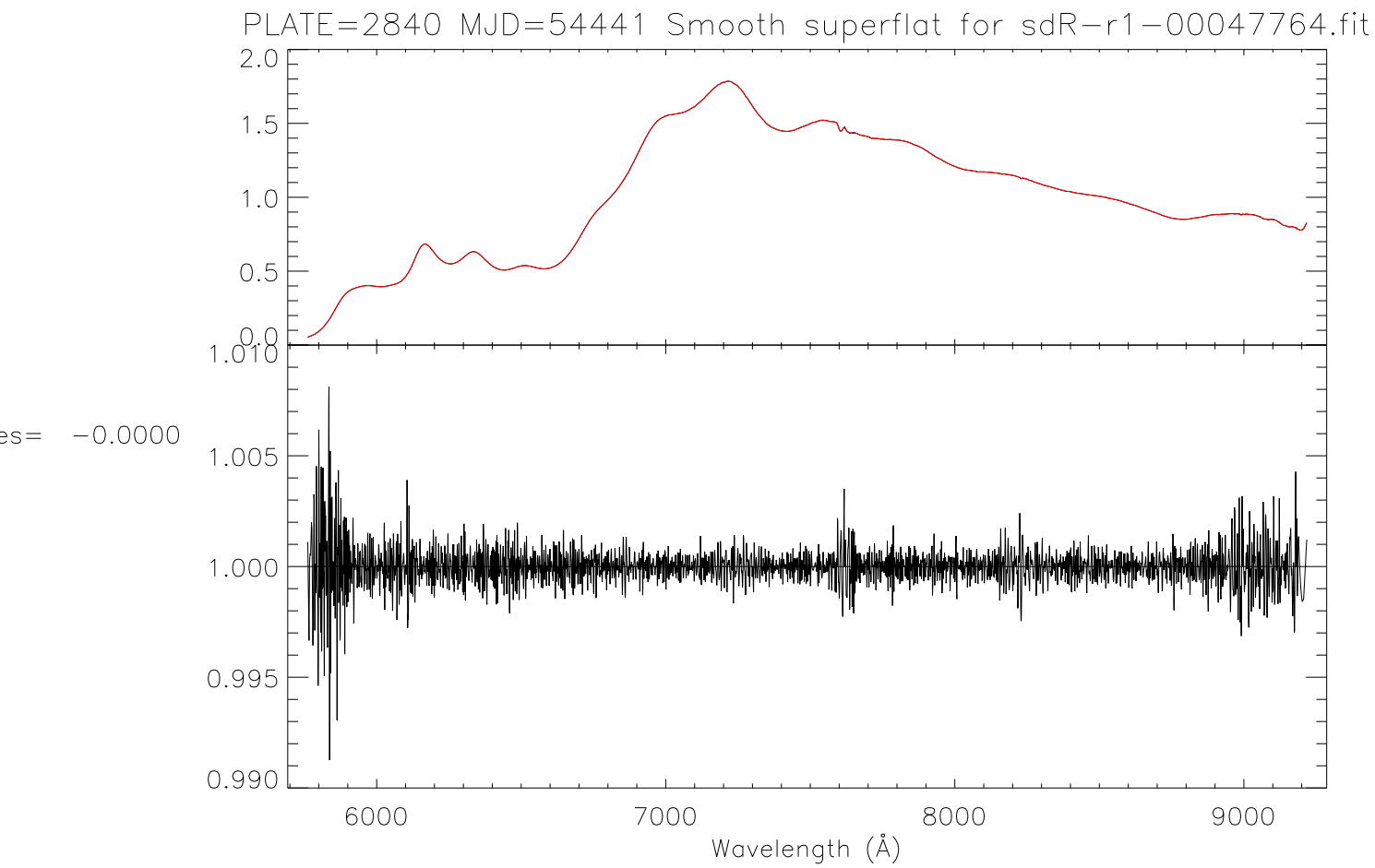

8430.1700
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

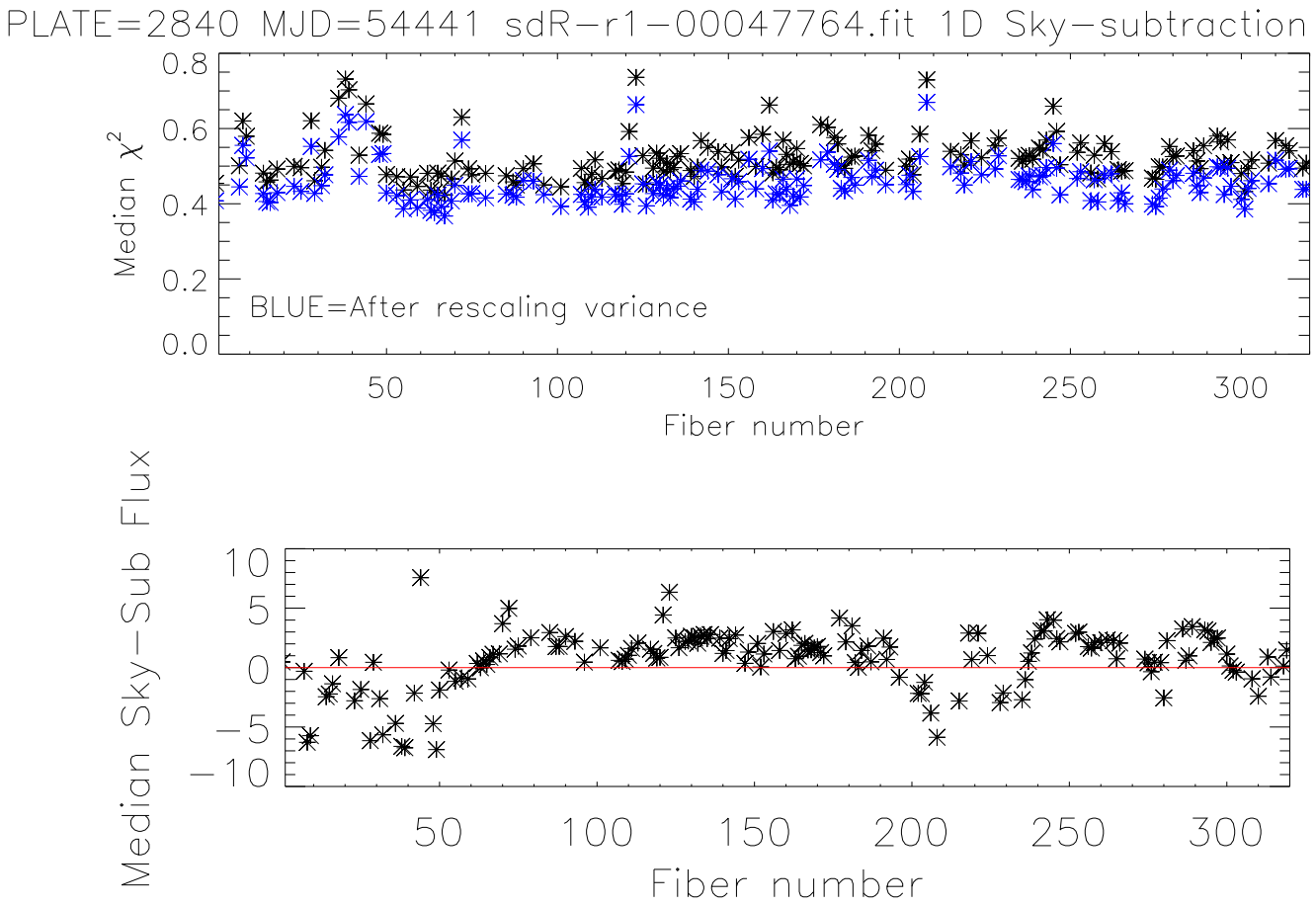

8885.8300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

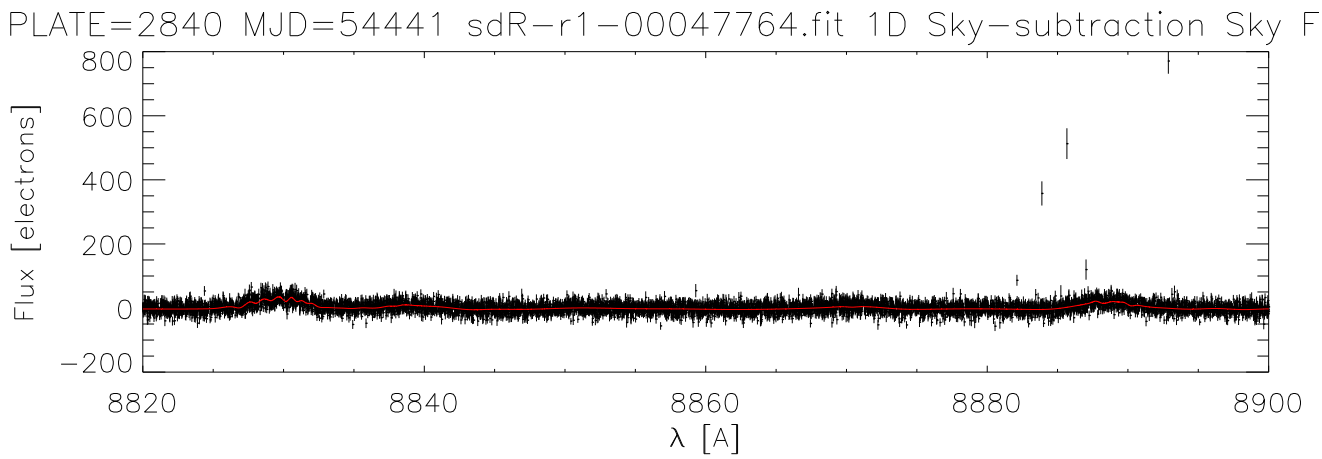

8919.6100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

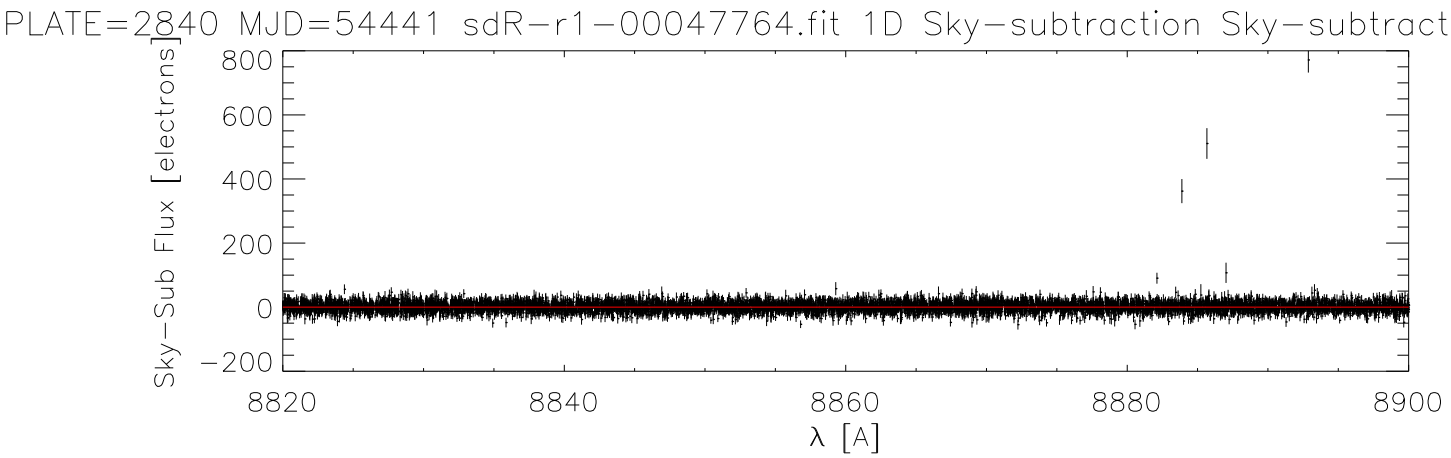

6300.3040
mfb1 187
mfb2 187
stdev 0.807
extra −0.17
6363.7760
mfb1 149
mfb2 169
stdev 1.546
extra 0.17
6553.6100
mfb1 122
mfb2 172
stdev 1.386
extra 0.26
6923.2100
mfb1 135
mfb2 175
stdev 1.874
extra 0.25
6949.0300
mfb1 150
mfb2 169
stdev 1.384
extra 0.05
7571.7500
mfb1 158
mfb2 172
stdev 1.435
extra 0.07
7794.1200
mfb1 180
mfb2 180
stdev 0.128
extra 0.14
7821.5100
mfb1 185
mfb2 185
stdev 0.829
extra −0.00
8399.1600
mfb1 180
mfb2 187
stdev 0.785
extra −0.01
8430.1700
mfb1 190
mfb2 184
stdev 0.824
extra 0.00
8885.8300
mfb1 180
mfb2 180
stdev 0.801
extra 0.01
8919.6100
mfb1 184
mfb2 174
stdev 0.852
extra 0.00
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0 100 200 300 400

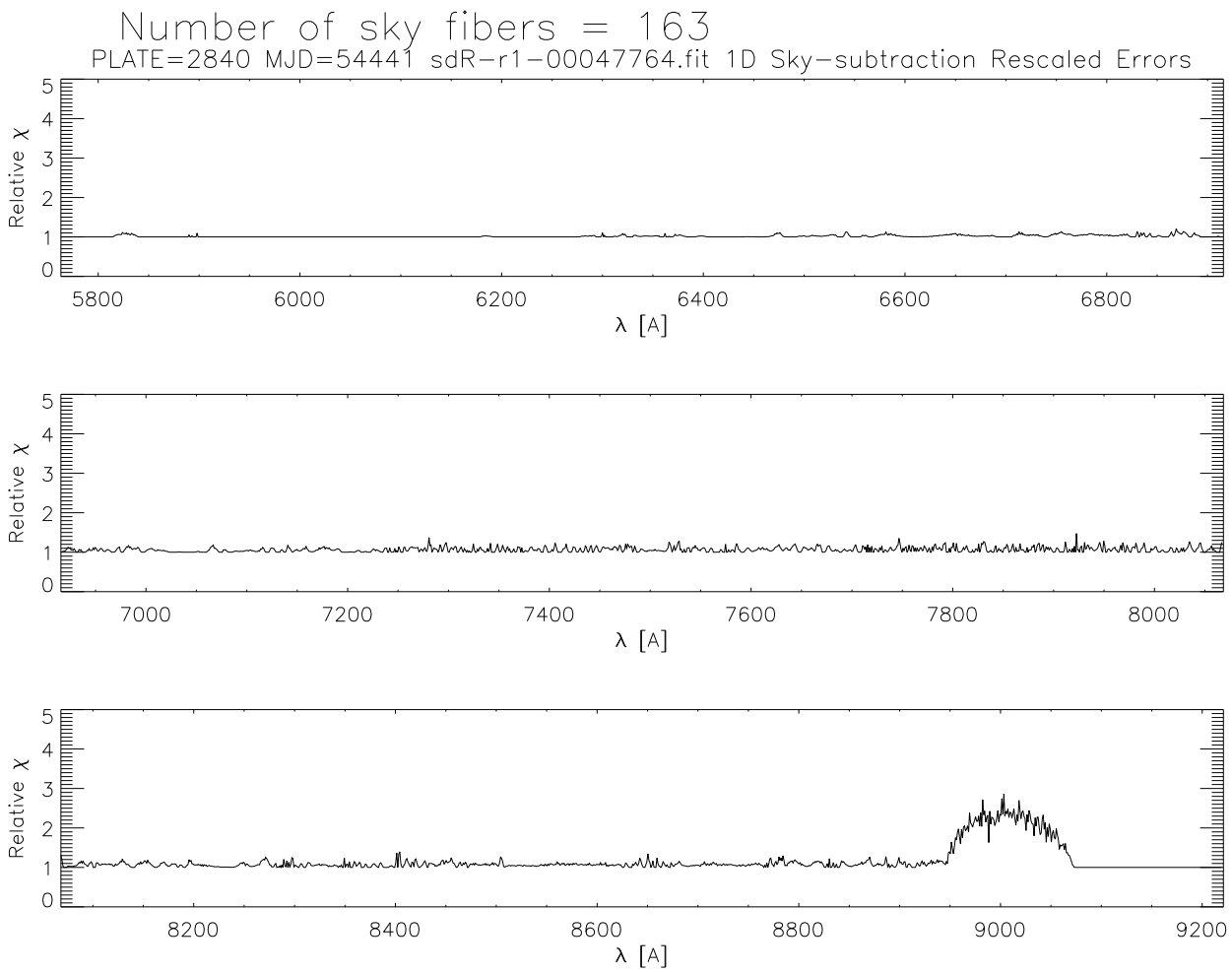

sky shift, pixels
0.3
0.2
0.1
0.0
−0.1
−0.2
5000
6000
7000
8000
9000
10000

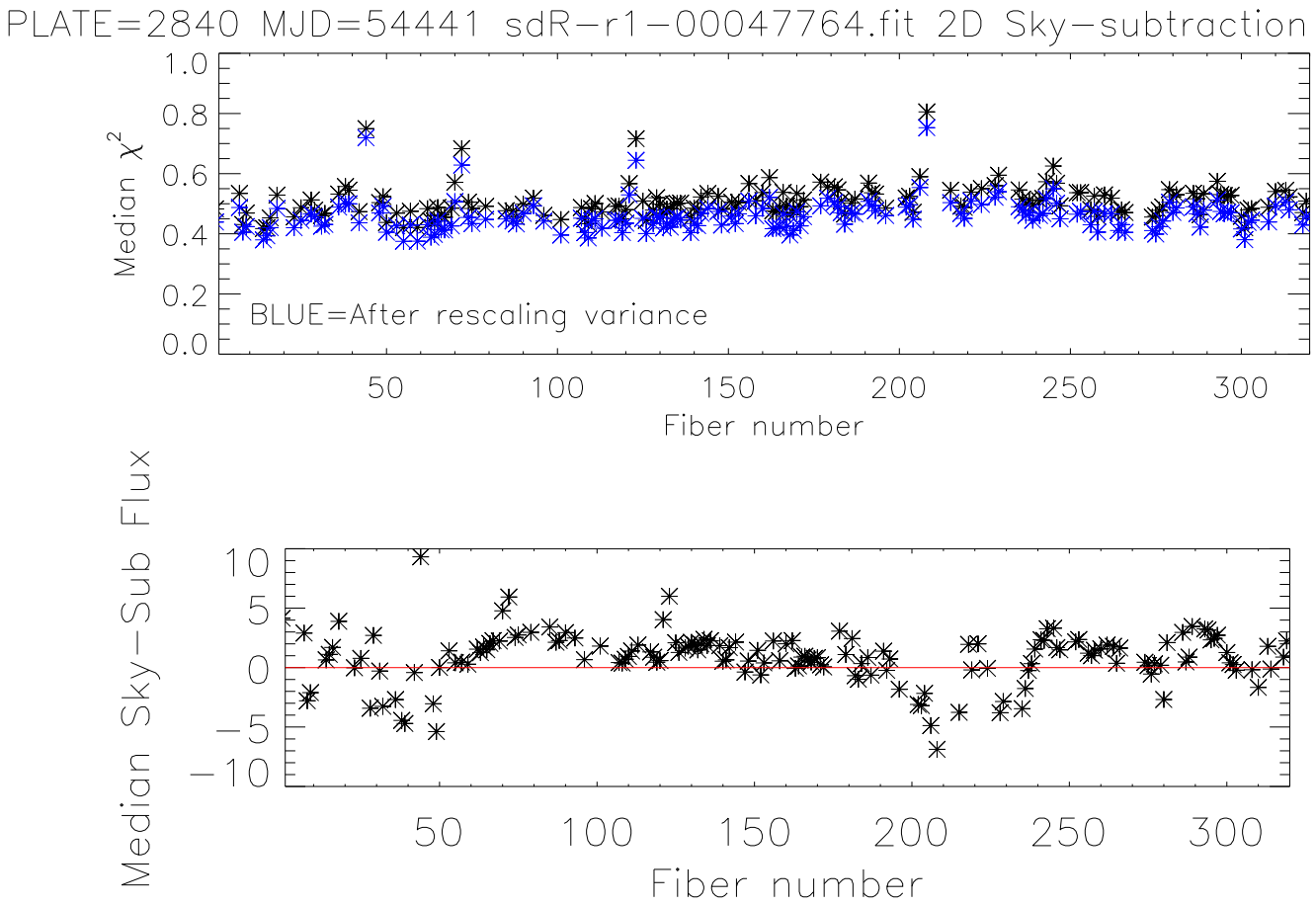

PLATE=2840 MJD=54441 Smooth superflat for sdR-r1-00047764.fit
2.0
1.5
1.0
0.5
0.0
1.010
1.005
1.000
0.995
0.990
es= −0.0000
6000
7000
8000
9000
Wavelength (Å)

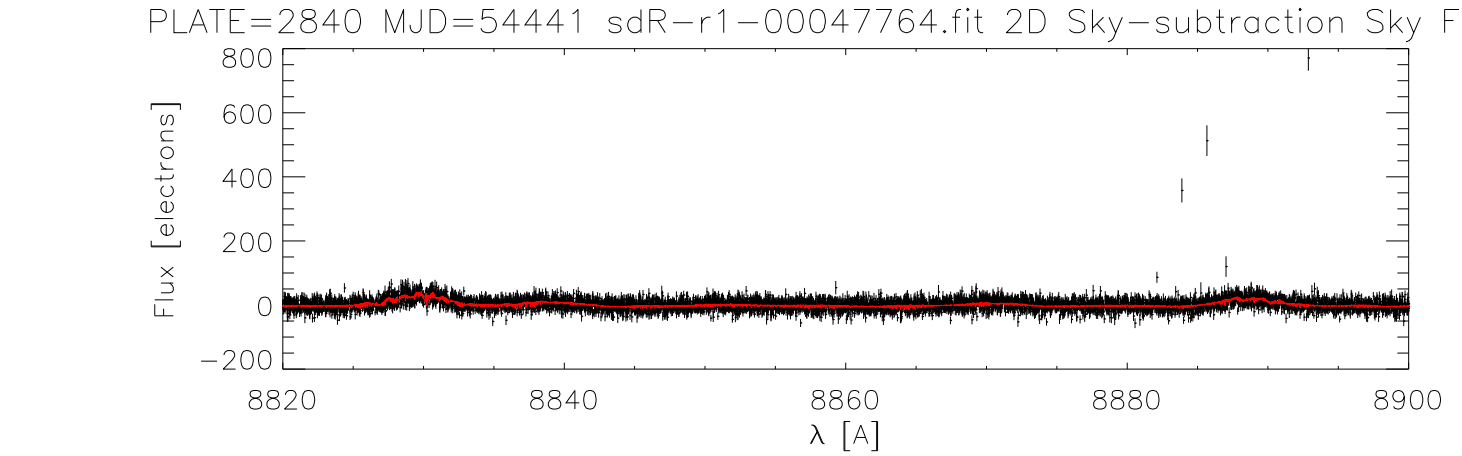

PLATE=2840 MJD=54441 sdR-r1-00047764.fit 1D Sky-subtraction Sky Fibers
Median χ^2
0.0
0.2
0.4
0.6
0.8
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
10
5
0
−5
−10
50
100
150
200
250
300
Fiber number

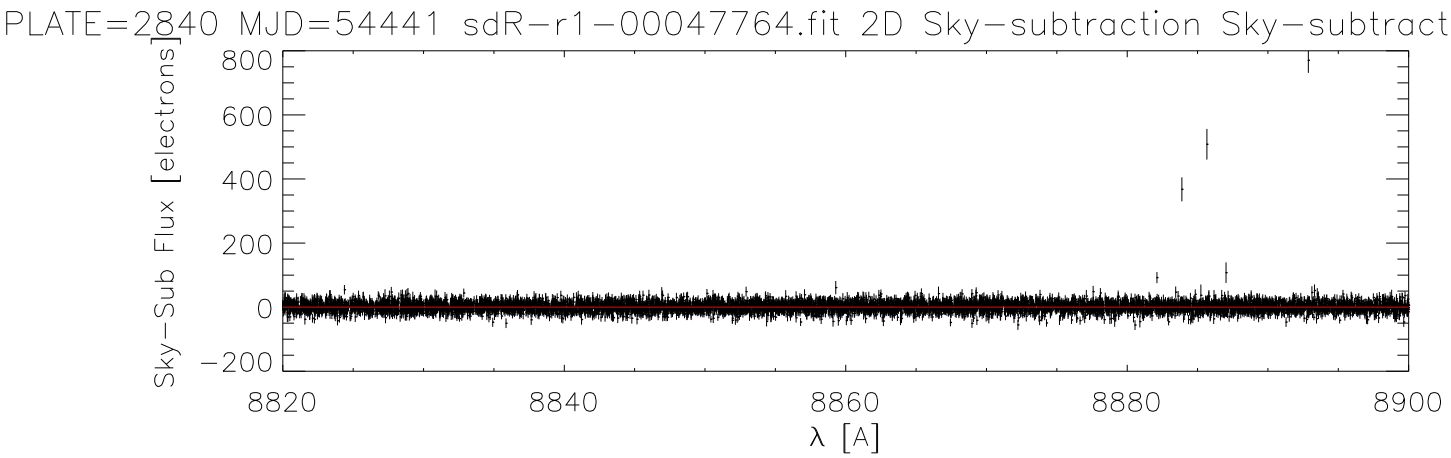

PLATE=2840 MJD=54441 sdR-r1-00047764.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
800
600
400
200
0
-200
8820
8840
8860
8880
8900
λ [A]

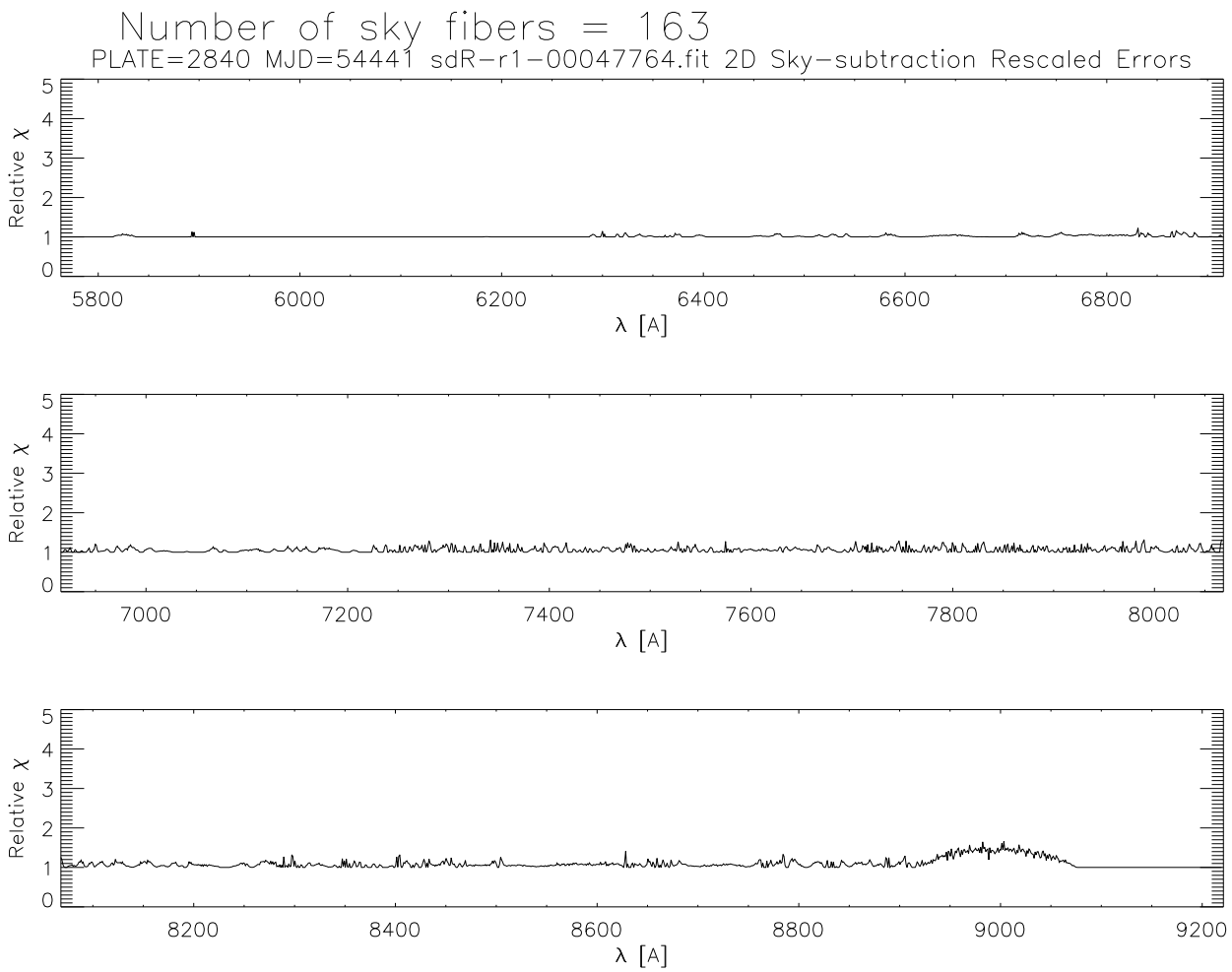

PLATE=2840 MJD=54441 sdR-r1-00047764.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
800
600
400
200
0
-200
8820
8840
8860
8880
8900
λ [A]

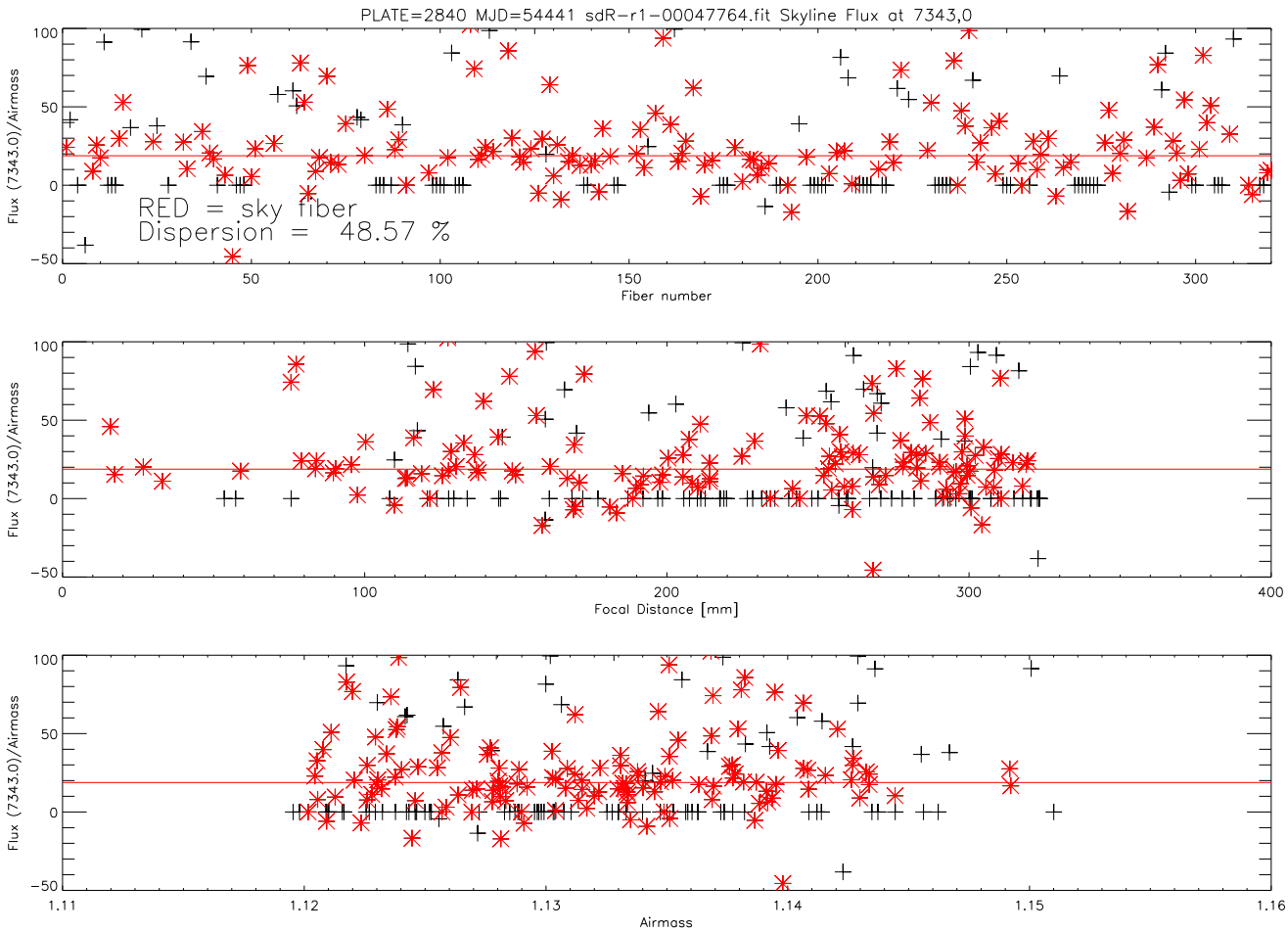

Number of sky fibers = 163
PLATE=2840 MJD=54441 sdR-r1-00047764.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

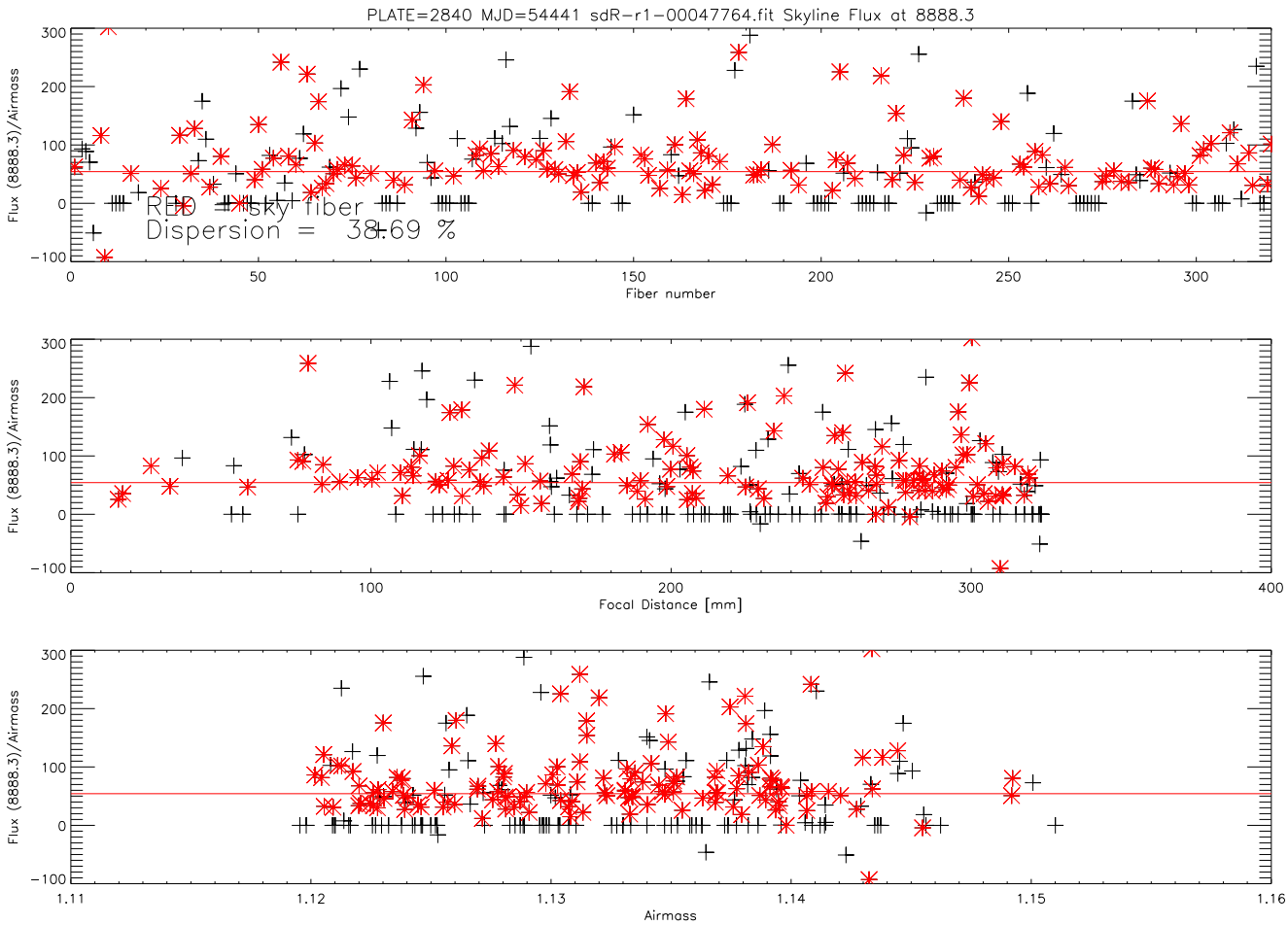

PLATE=2840 MJD=54441 sdR-r1-00047764.fit 2D Sky-subtraction Sky Fibers
Median χ^2
1.0
0.8
0.6
0.4
0.2
0.0
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
10
5
0
−5
−10
50
100
150
200
250
300
Fiber number

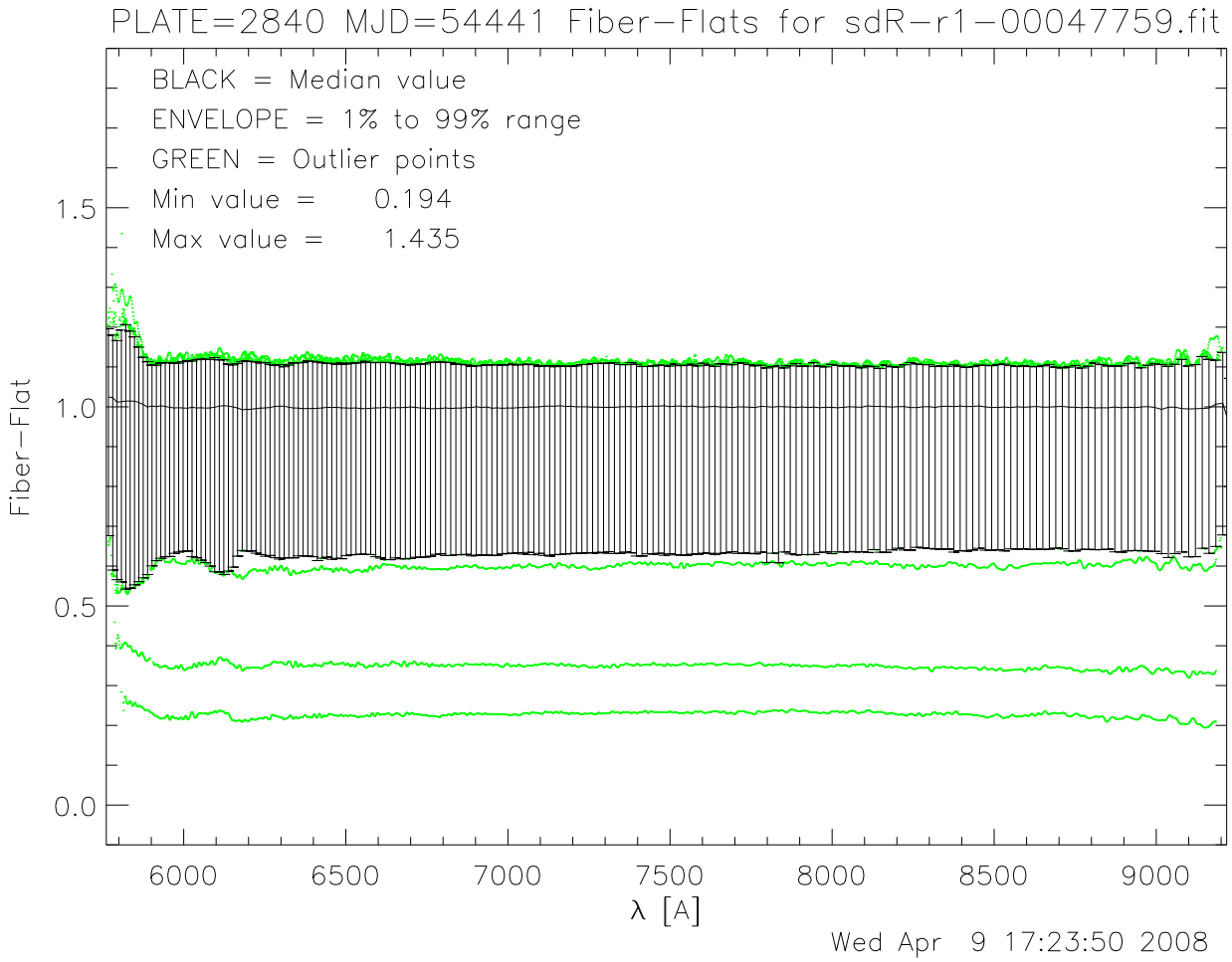

PLATE=2840 MJD=54441 sdR-r1-00047764.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
800
600
400
200
0
-200
8820
8840
8860
8880
8900
λ [A]

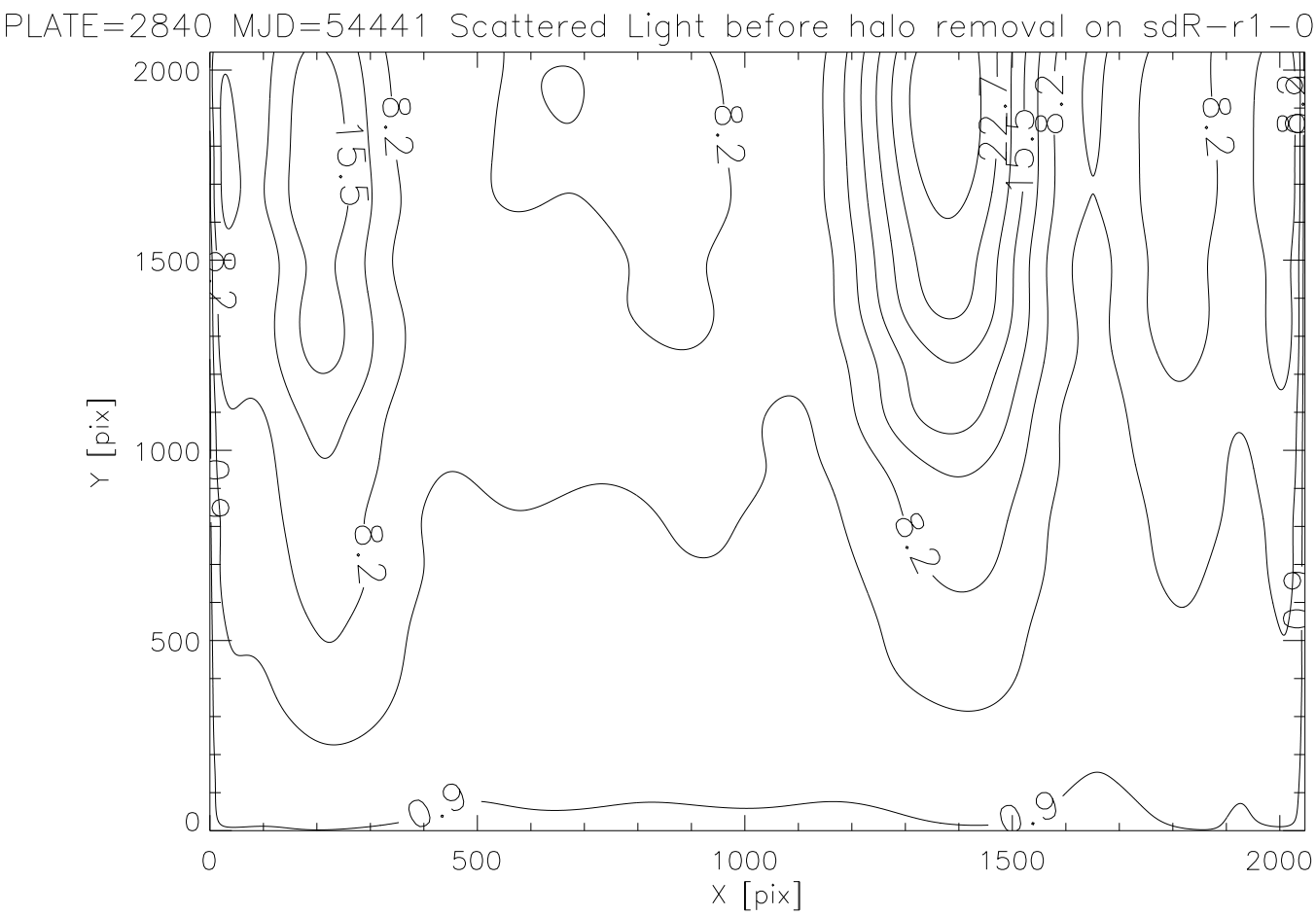

PLATE=2840 MJD=54441 sdR-r1-00047764.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
800
600
400
200
0
-200
8820
8840
8860
8880
8900
λ [A]

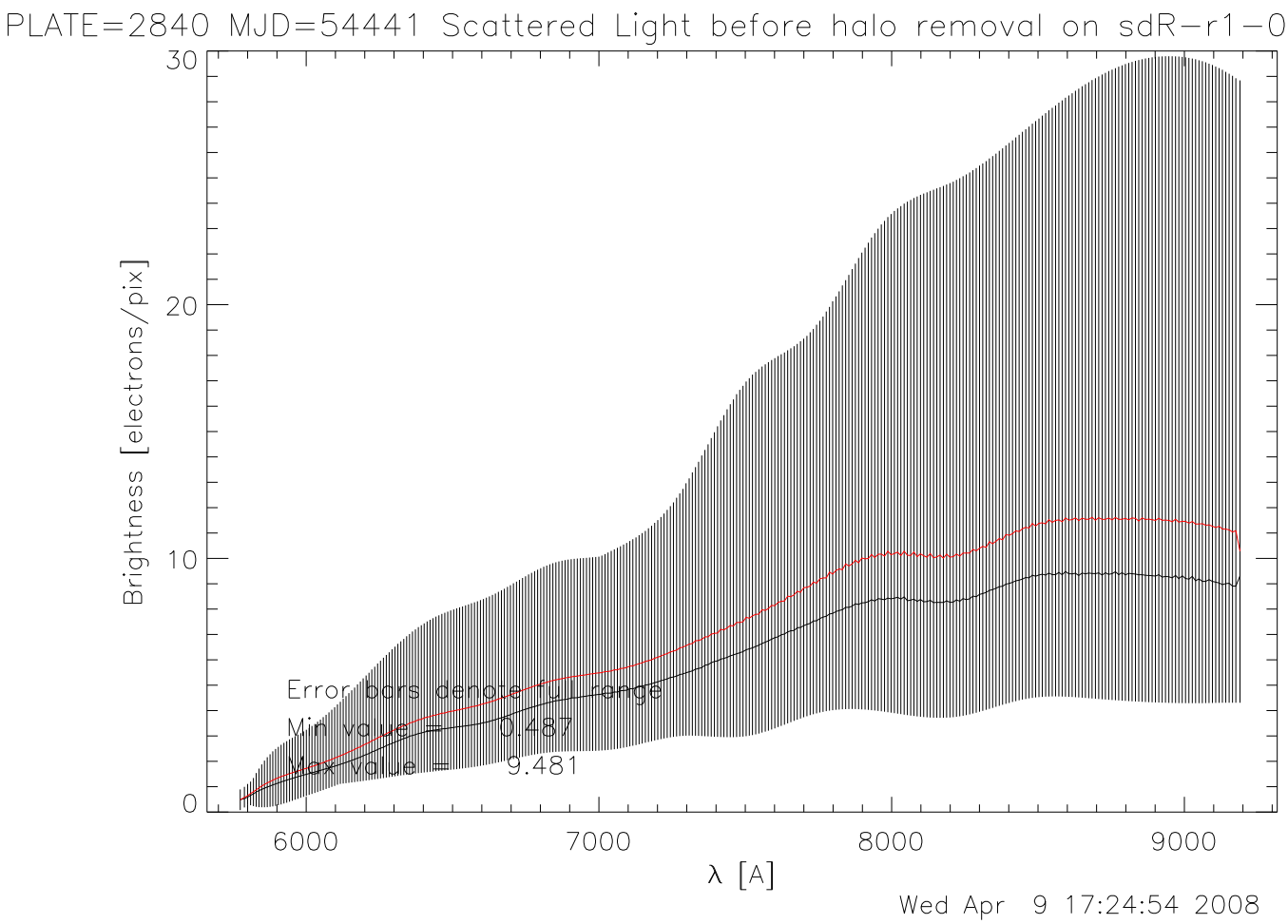

Number of sky fibers = 163
PLATE=2840 MJD=54441 sdR-r1-00047764.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200
0
1
2
3
4
5

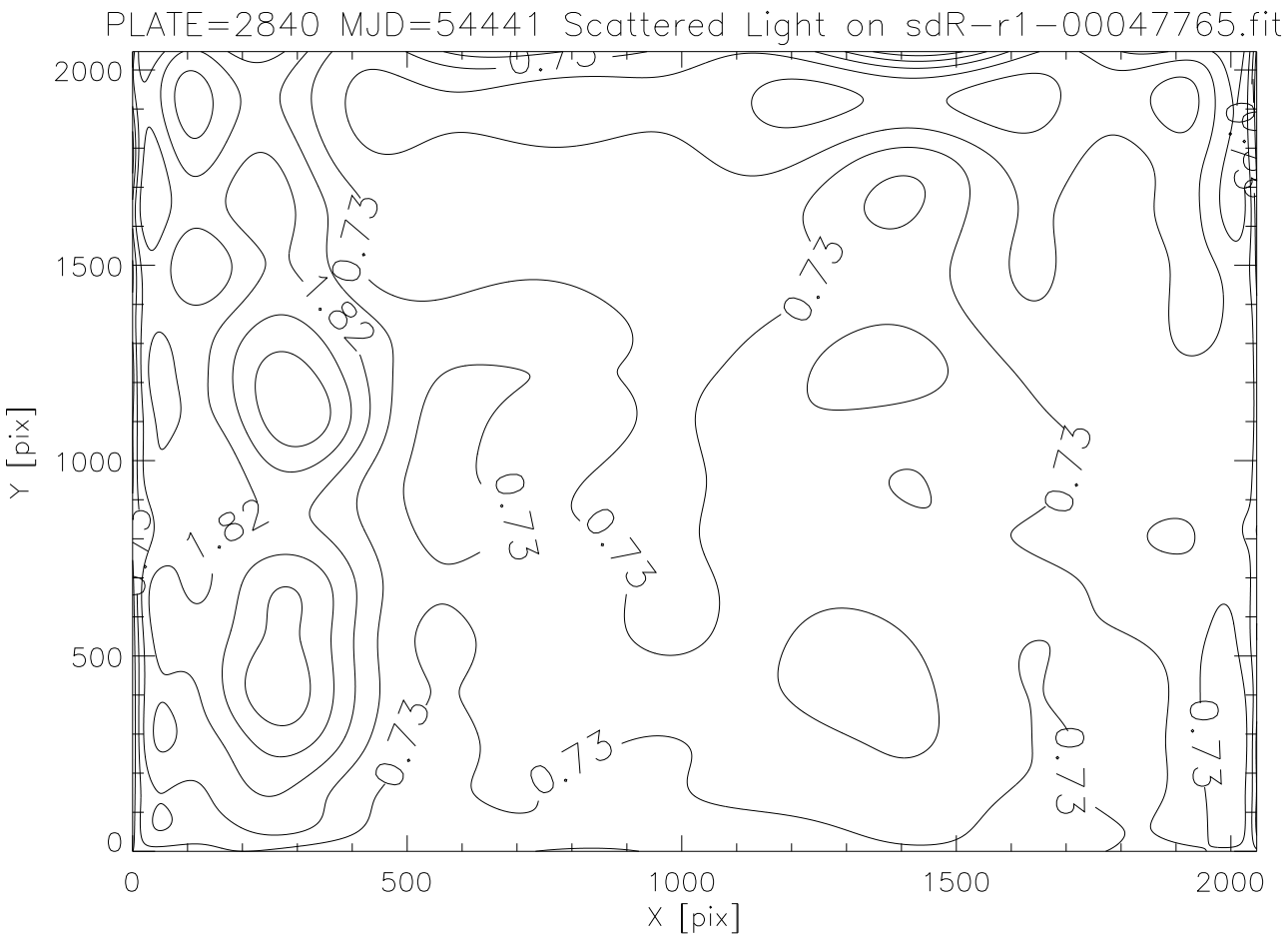

PLATE=2840 MJD=54441 sdR-r1-00047764.fit Skyline Flux at 7343,0
Flux (7343.0)/Airmass
Fiber number
RED = sky fiber
Dispersion = 48.57 %
Flux (7343.0)/Airmass
Focal Distance [mm]
Flux (7343.0)/Airmass
Airmass

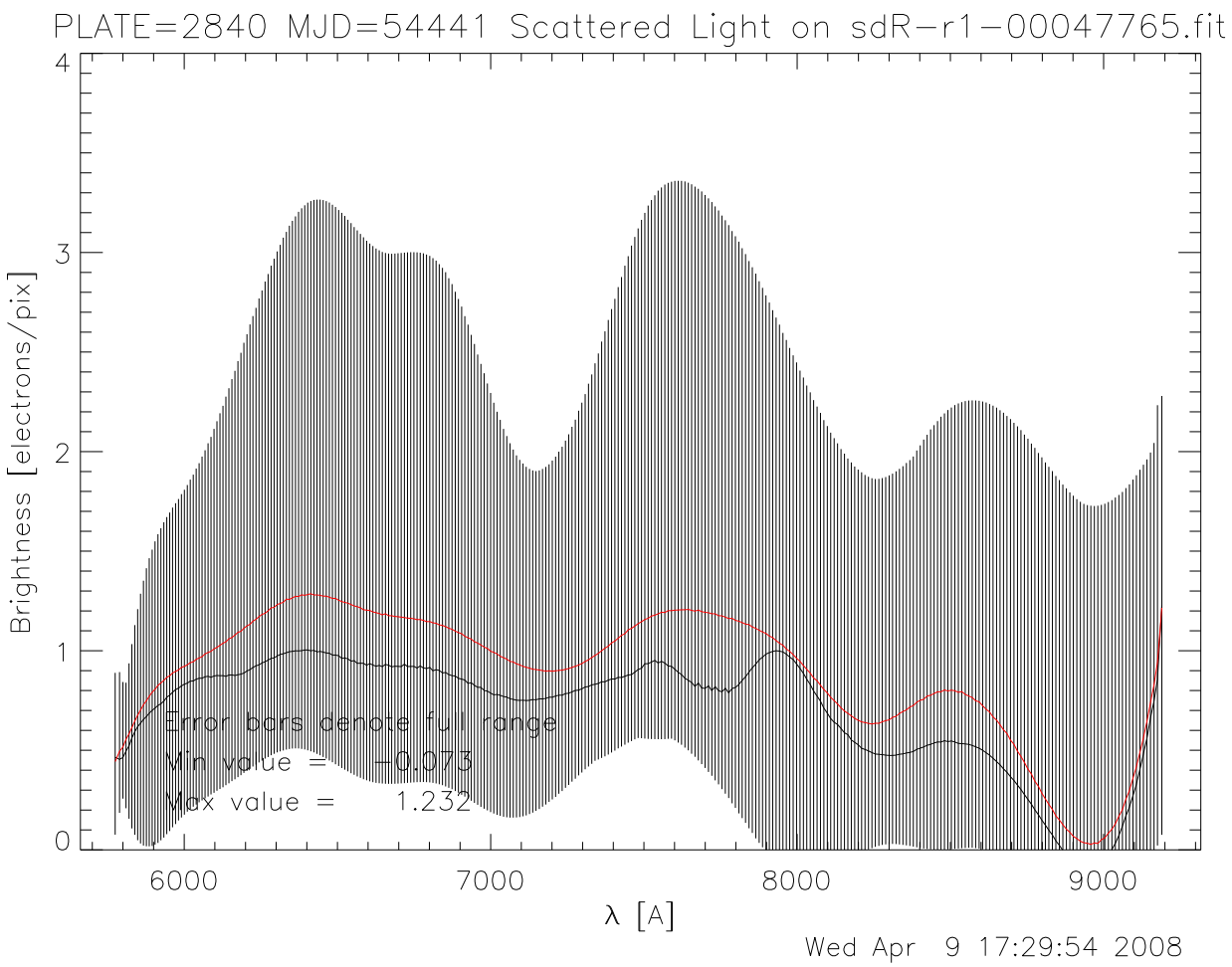

PLATE=2840 MJD=54441 sdR-r1-00047764.fit Skyline Flux at 8888.3
Flux (8888.3)/Airmass
Fiber number
RED sky fiber
Dispersion = 38.69 %
Flux (8888.3)/Airmass
Focal Distance [mm]
Flux (8888.3)/Airmass
Airmass

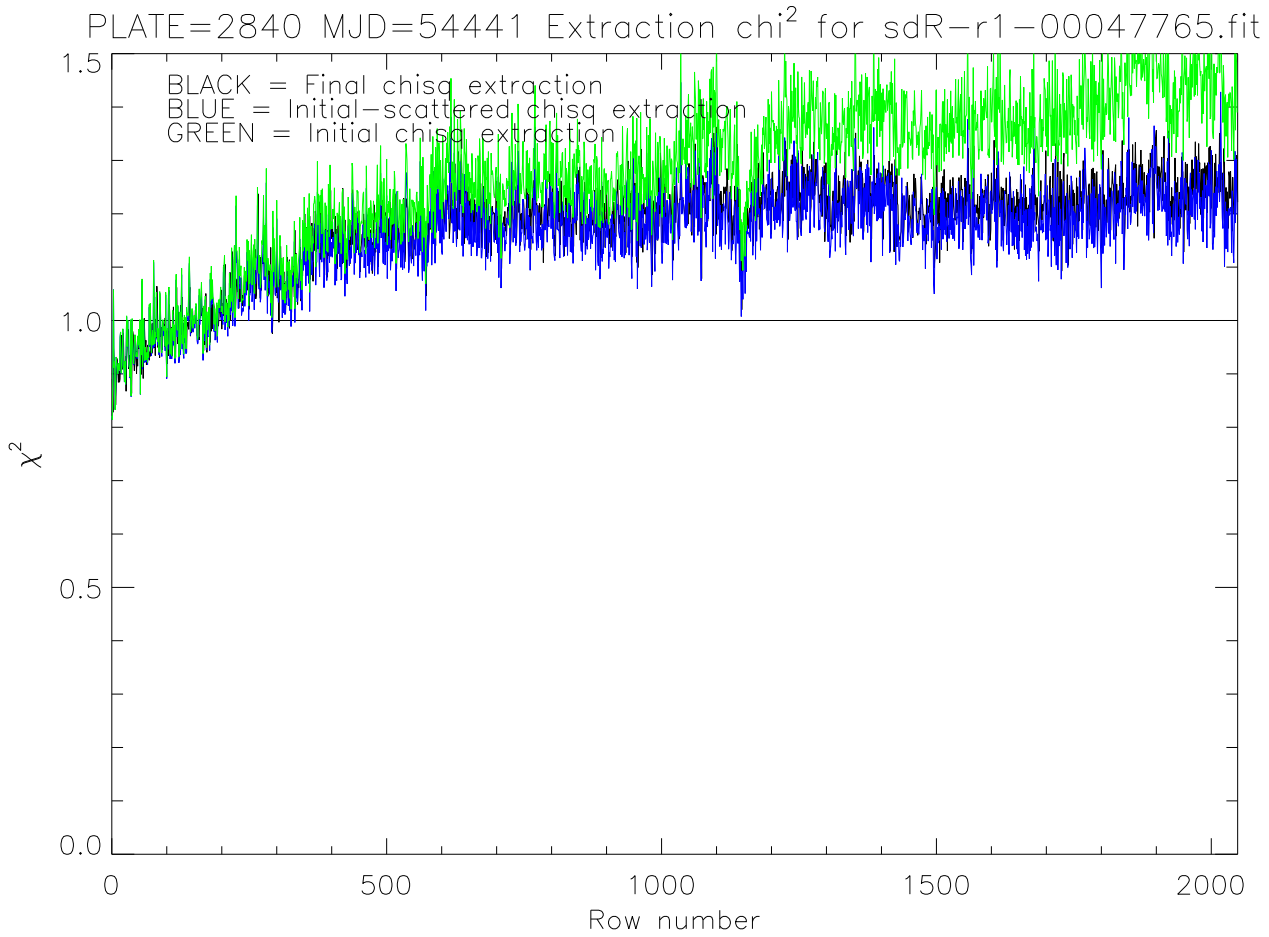

PLATE=2840 MJD=54441 Fiber−Flats for sdR−r1−00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.194
Max value = 1.435
Fiber−Flat
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]
Wed Apr 9 17:23:50 2008

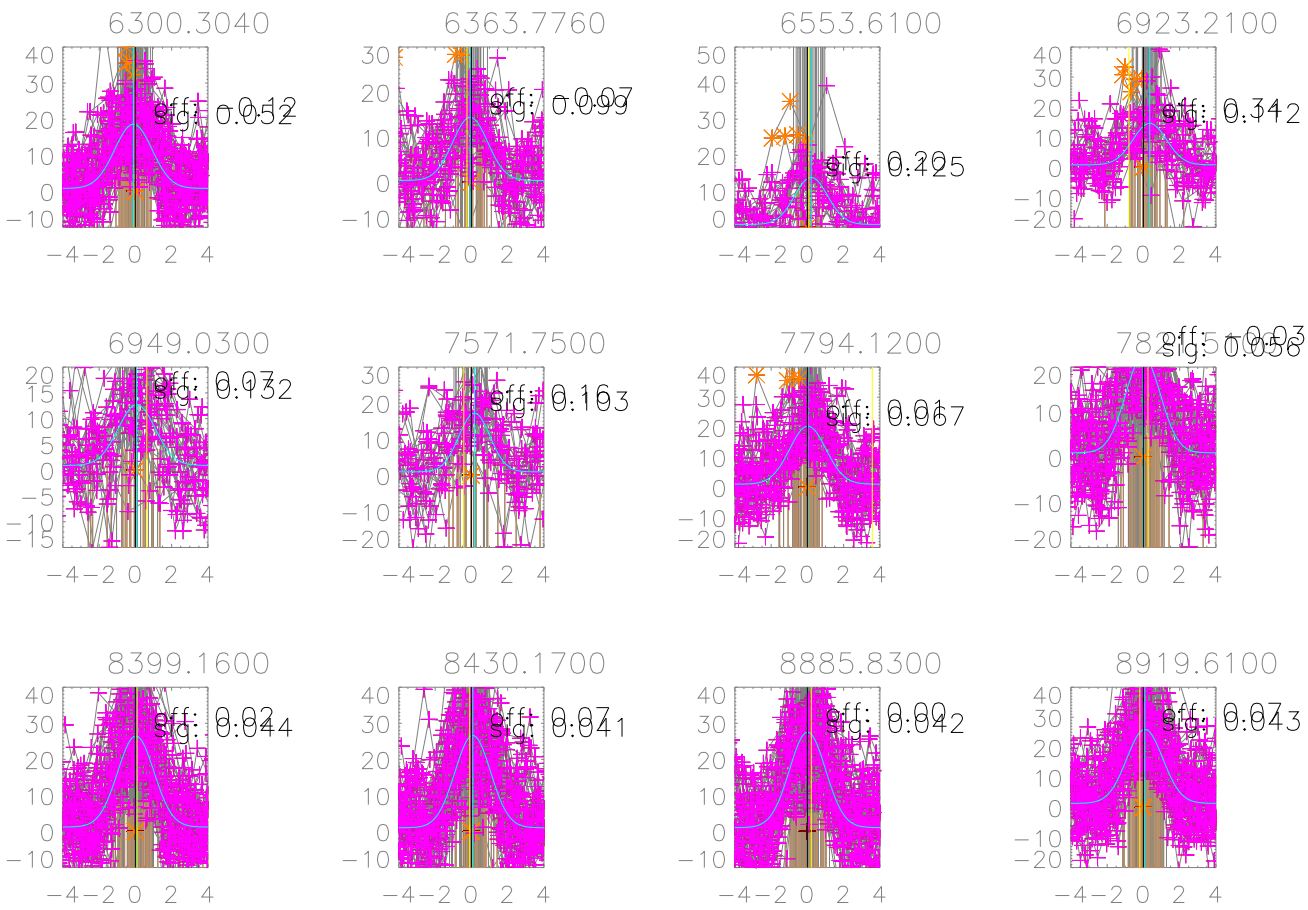

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r1-00047765.fi
Y [pix]
X [pix]
0
500
1000
1500
2000
8.2
15.5
22.7
0.9

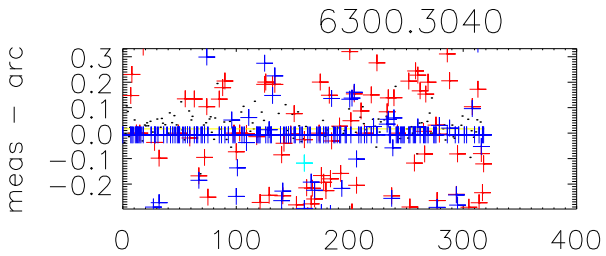

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r1-00047765.fi
Brightness [electrons/pix]
30
20
10
0
6000
7000
8000
9000
λ [A]
Error bars denote 1-σ range
Min value = 0.487
Max value = 9.481
Wed Apr 9 17:24:54 2008

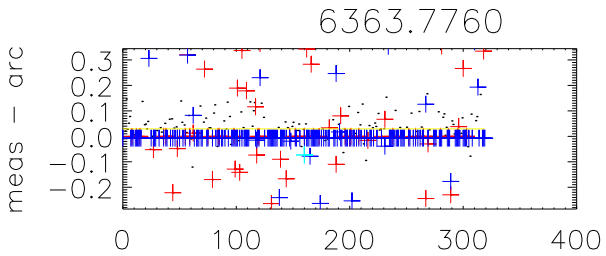

PLATE=2840 MJD=54441 Scattered Light on sdR-r1-00047765.fit
Y [pix]
X [pix]
0
500
1000
1500
2000
0.73
1.82

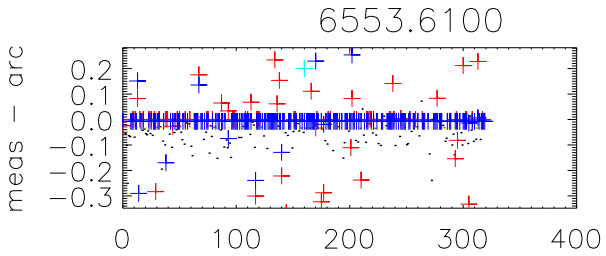

PLATE=2840 MJD=54441 Scattered Light on sdR-r1-00047765.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = -0.073
Max value = 1.232
Wed Apr 9 17:29:54 2008

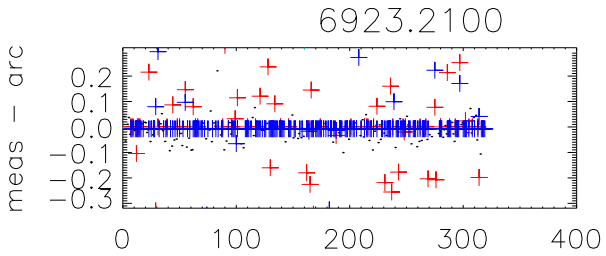

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-r1-00047765.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

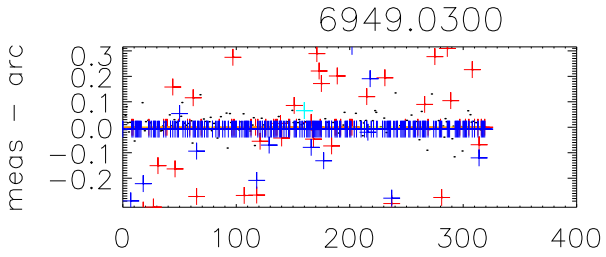

6300.3040
off: 0.12
sig: 0.052
6363.7760
off: 0.07
sig: 0.099
6553.6100
off: 0.20
sig: 0.425
6923.2100
off: 0.34
sig: 0.442
6949.0300
off: 0.07
sig: 0.432
7571.7500
off: 0.16
sig: 0.163
7794.1200
off: 0.01
sig: 0.067
off: 0.03
sig: 0.056
8399.1600
off: 0.02
sig: 0.044
8430.1700
off: 0.07
sig: 0.041
8885.8300
off: 0.00
sig: 0.042
8919.6100
off: 0.07
sig: 0.043

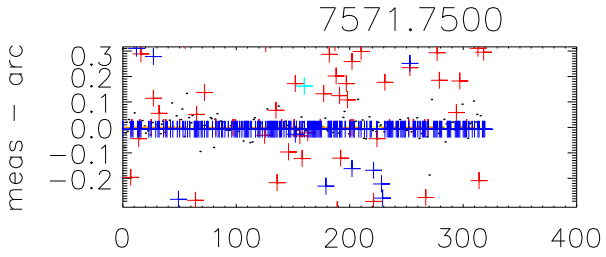

6300.3040
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

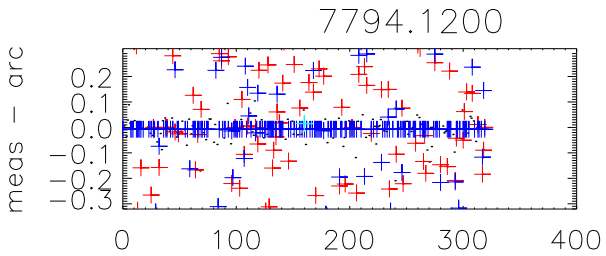

6363.7760
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

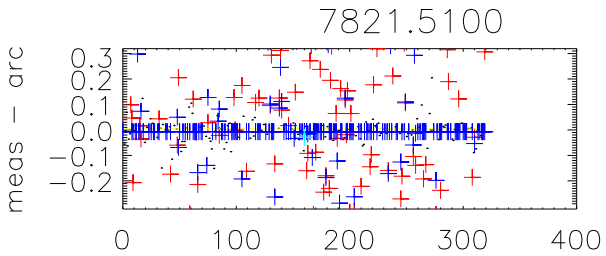

6553.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

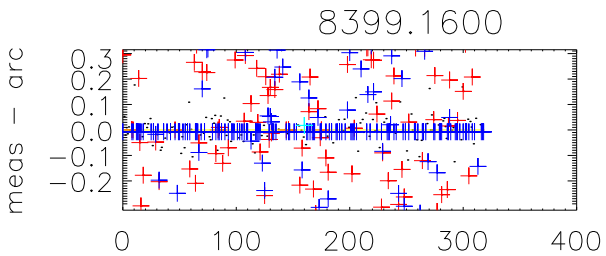

6923.2100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

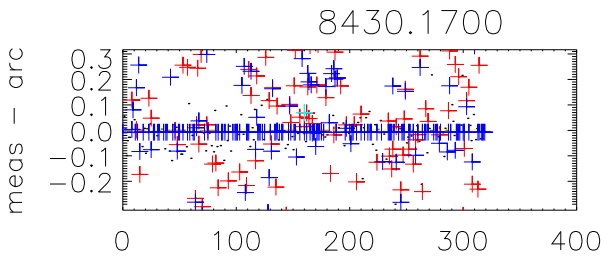

6949.0300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

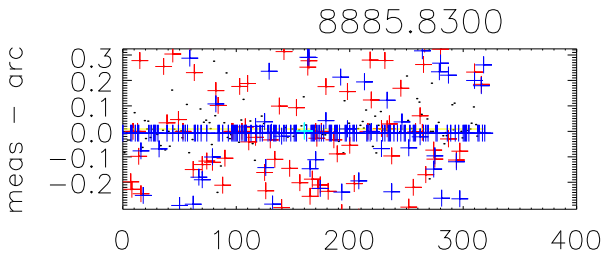

7571.7500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

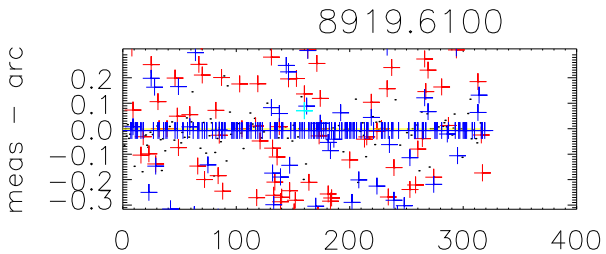

7794.1200
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

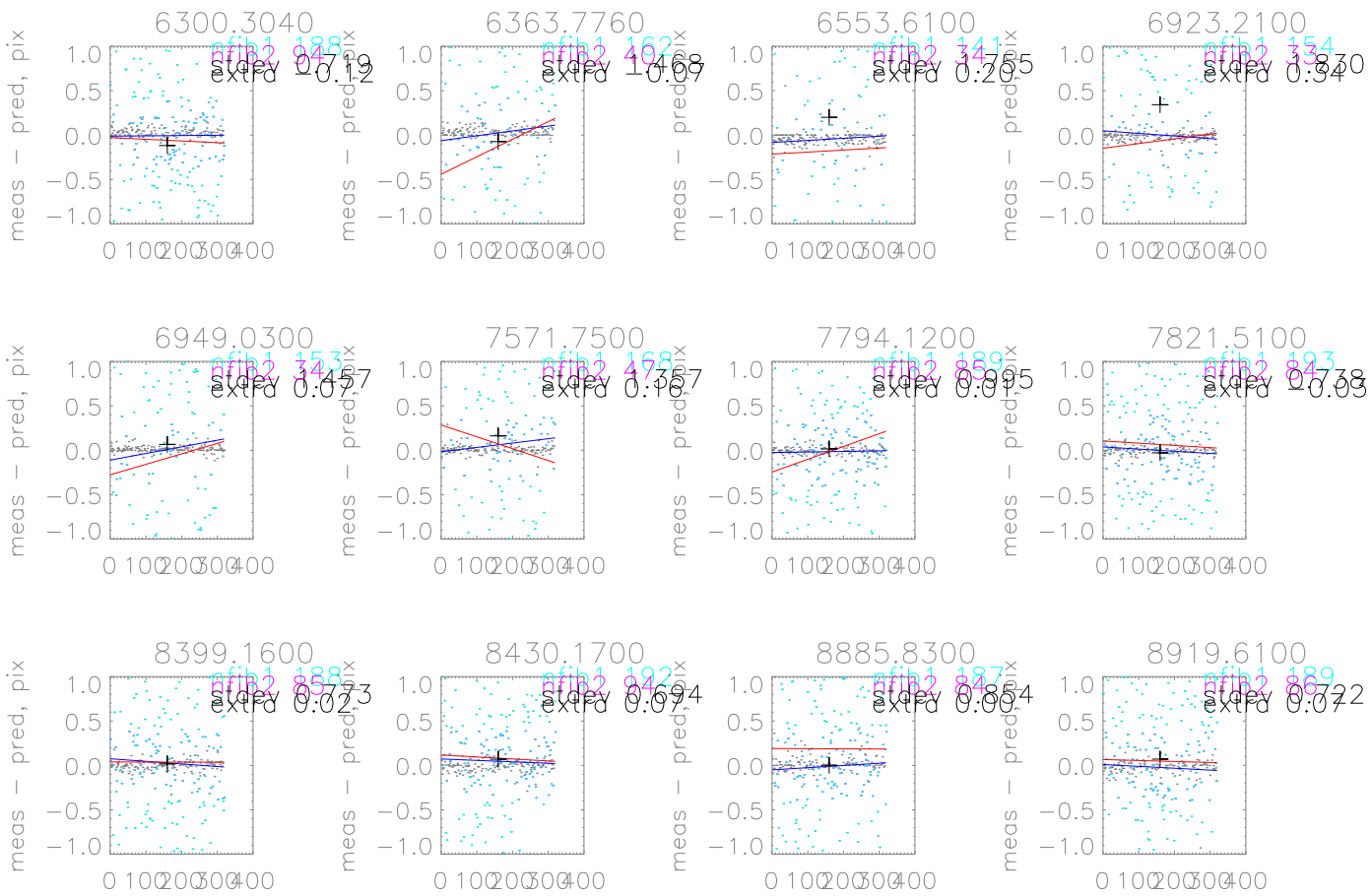

7821.5100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

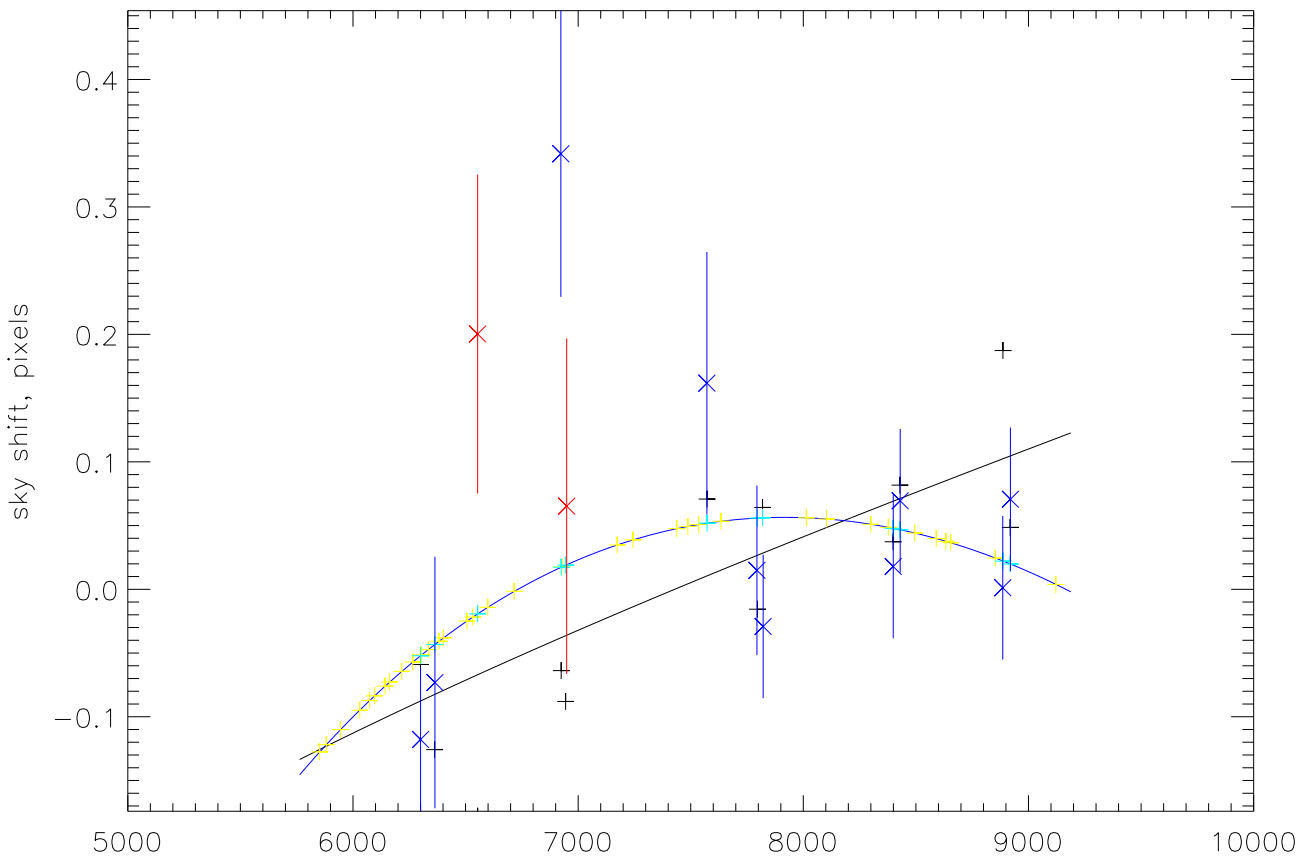

8399.1600
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

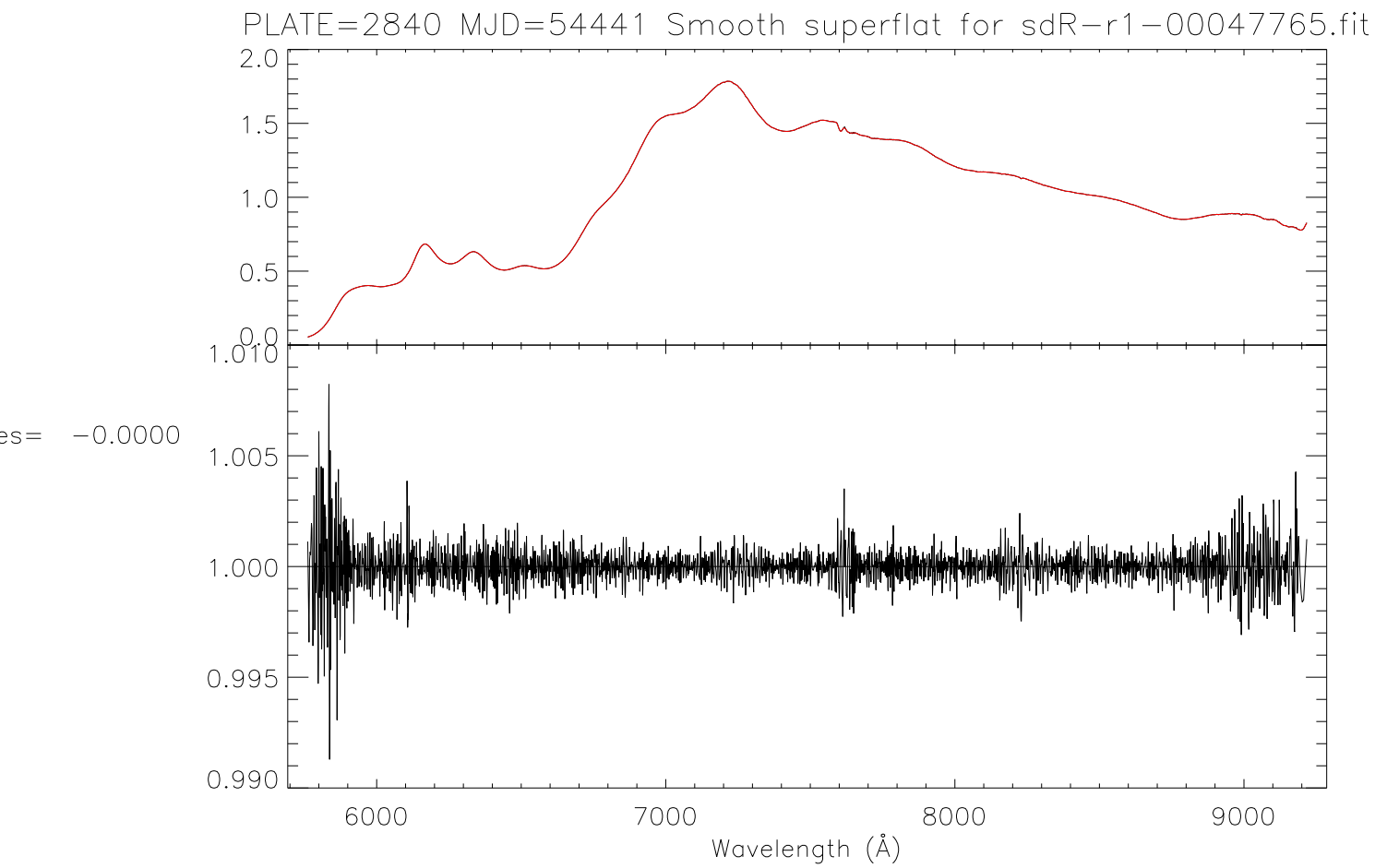

8430.1700
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

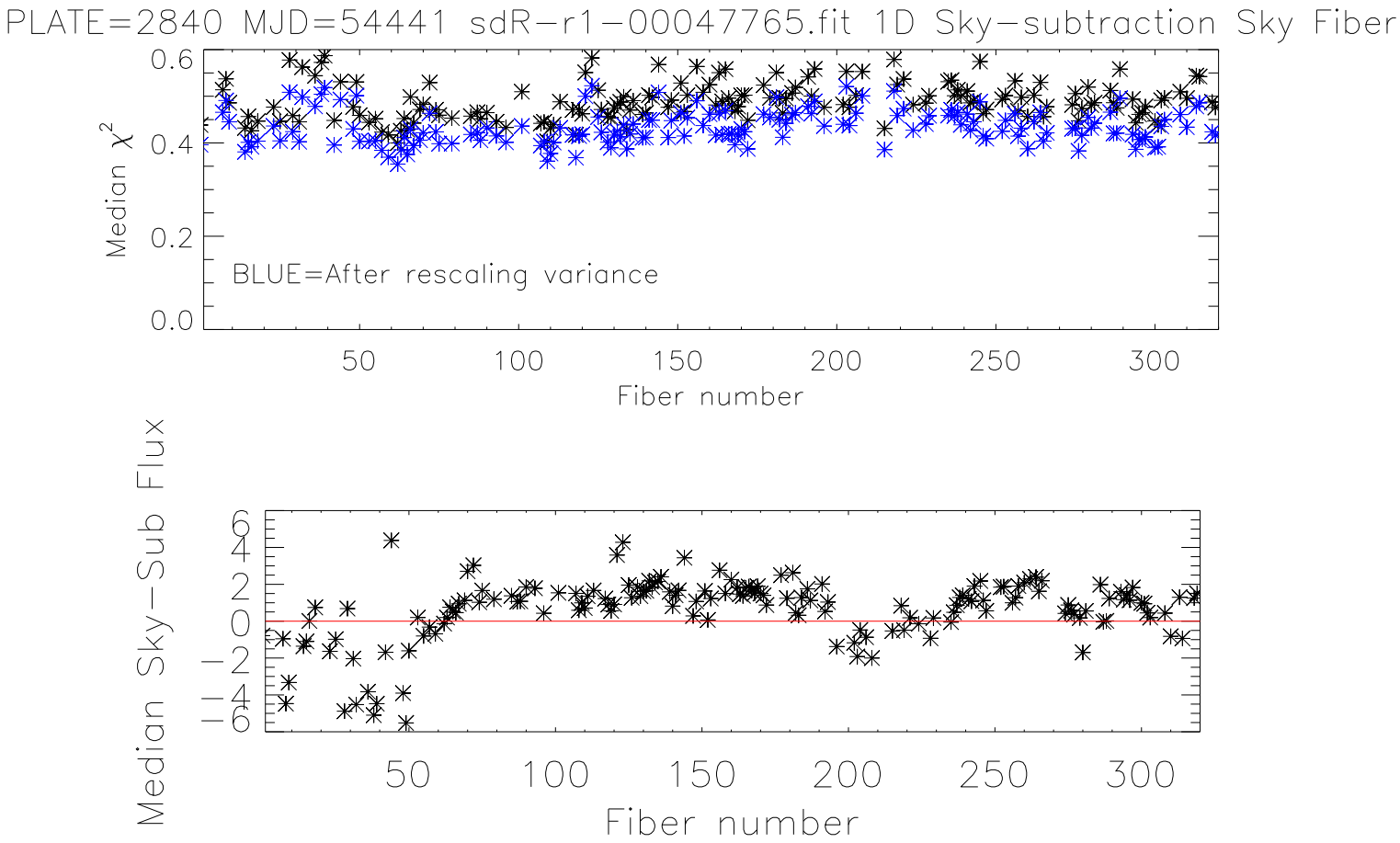

8885.8300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

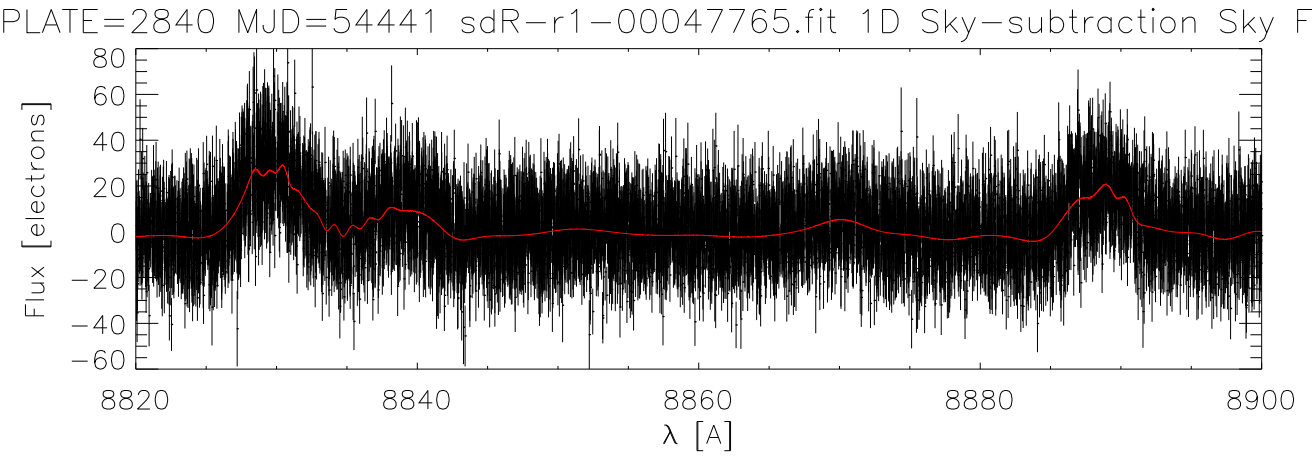

8919.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

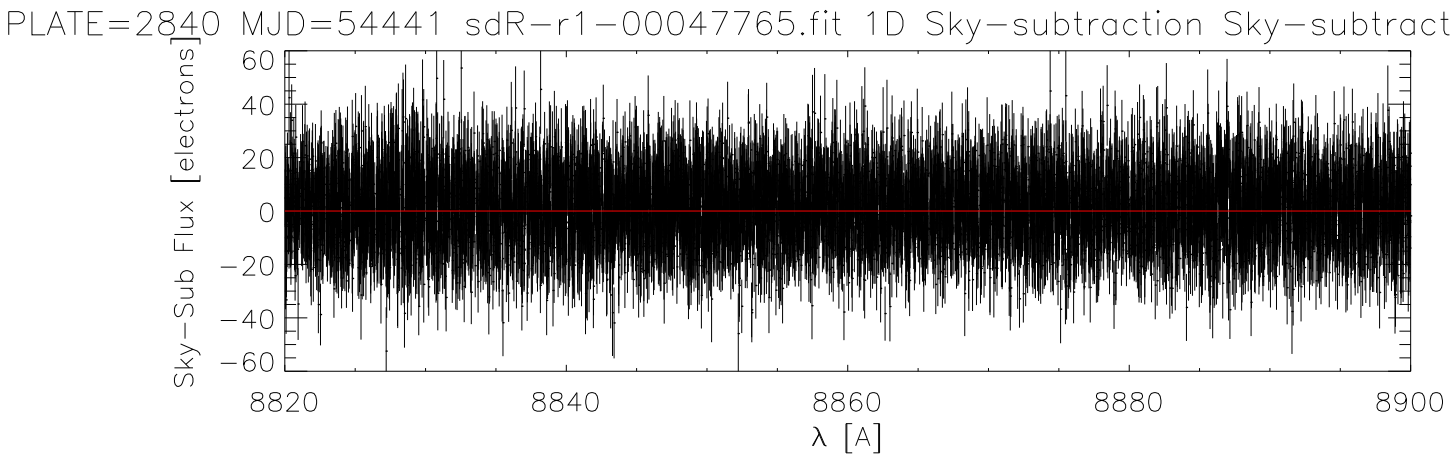

6300.3040
mfb1 188
mfb2 148
stdev 0.719
extra −0.12
6363.7760
mfb1 162
mfb2 102
stdev 1.468
extra 1.007
6553.6100
mfb1 141
mfb2 141
stdev 1.755
extra 0.205
6923.2100
mfb1 154
mfb2 134
stdev 1.830
extra 0.34
6949.0300
mfb1 153
mfb2 143
stdev 0.457
extra 0.07
7571.7500
mfb1 168
mfb2 178
stdev 0.357
extra 0.16
7794.1200
mfb1 189
mfb2 189
stdev 0.895
extra 0.01
7821.5100
mfb1 193
mfb2 84
stdev 0.738
extra −0.03
8399.1600
mfb1 188
mfb2 157
stdev 0.773
extra 0.02
8430.1700
mfb1 192
mfb2 64
stdev 0.694
extra 0.07
8885.8300
mfb1 187
mfb2 84
stdev 0.854
extra 0.00
8919.6100
mfb1 189
mfb2 86
stdev 0.722
extra 0.07
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0 100 200 300 400

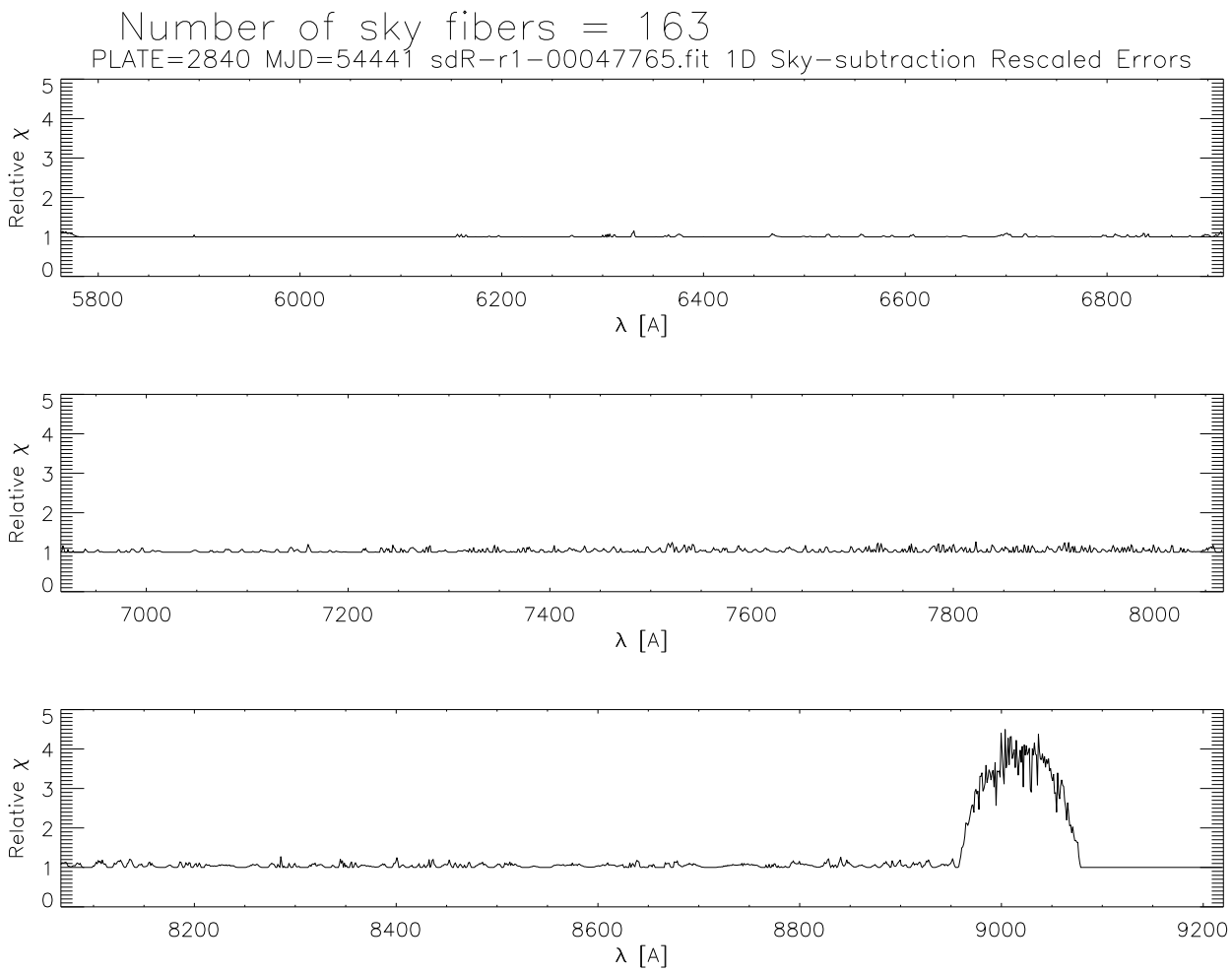

sky shift, pixels
0.4
0.3
0.2
0.1
0.0
−0.1
5000
6000
7000
8000
9000
10000

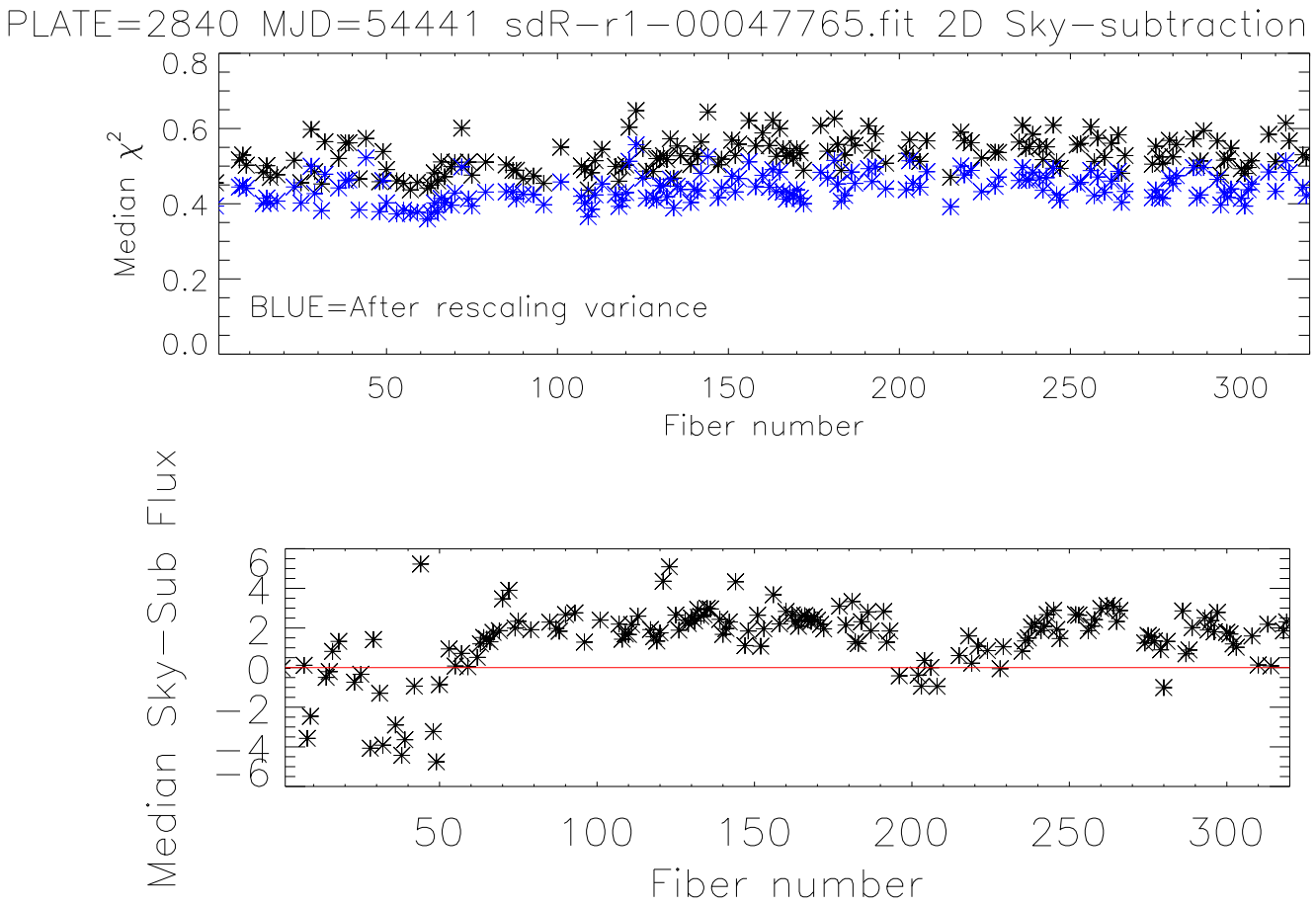

PLATE=2840 MJD=54441 Smooth superflat for sdR-r1-00047765.fit
2.0
1.5
1.0
0.5
0.0
1.010
1.005
1.000
0.995
0.990
es= -0.0000
6000
7000
8000
9000
Wavelength (Å)

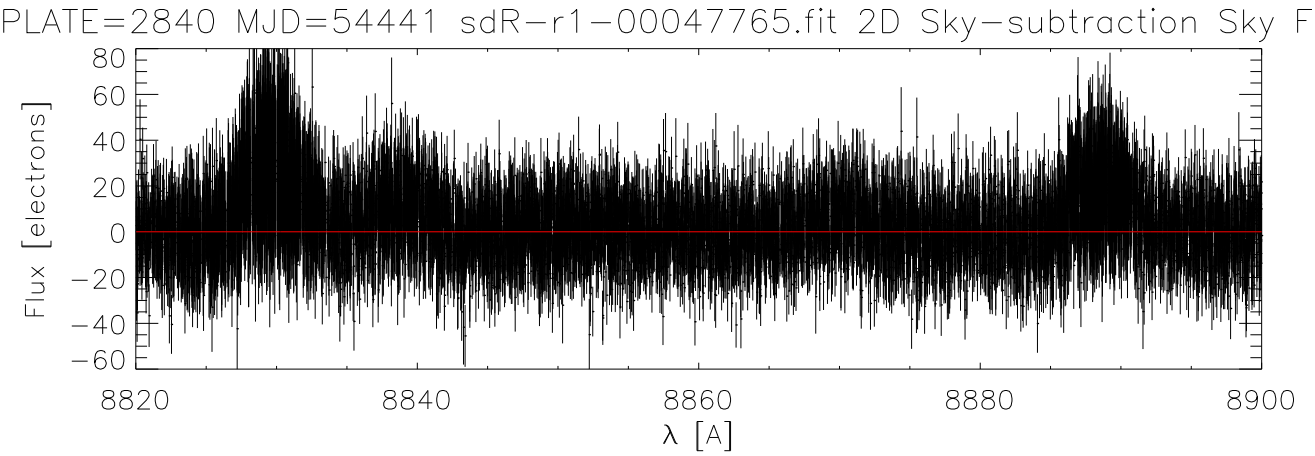

PLATE=2840 MJD=54441 sdR-r1-00047765.fit 1D Sky-subtraction Sky Fibers
Median χ^2
0.0
0.2
0.4
0.6
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-6
-4
-2
0
2
4
6
50
100
150
200
250
300
Fiber number

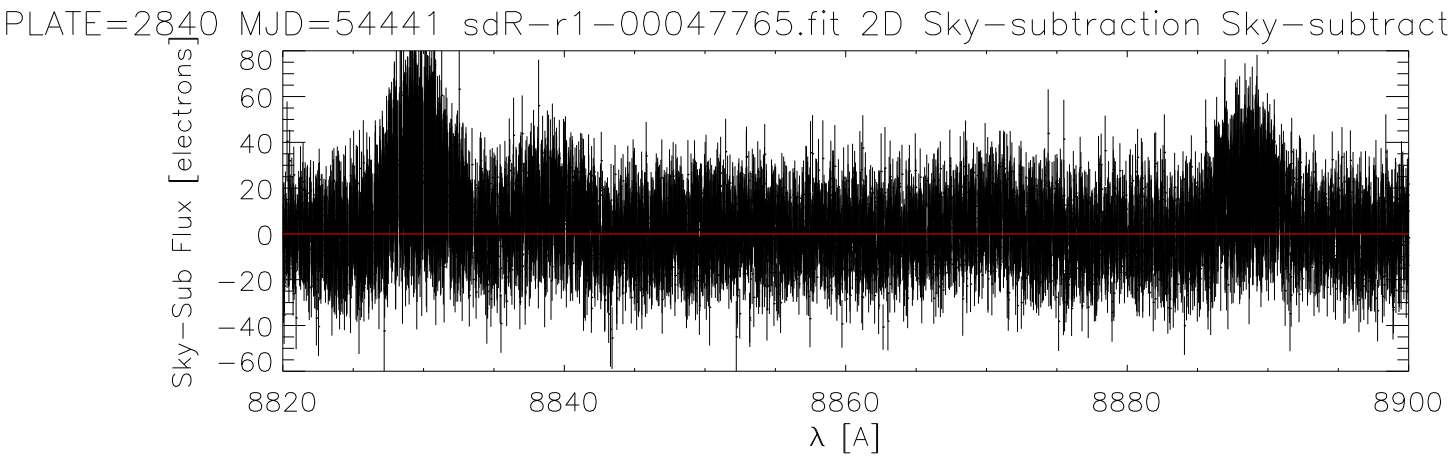

PLATE=2840 MJD=54441 sdR-r1-00047765.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
80
60
40
20
0
-20
-40
-60
8820
8840
8860
8880
8900
λ [A]

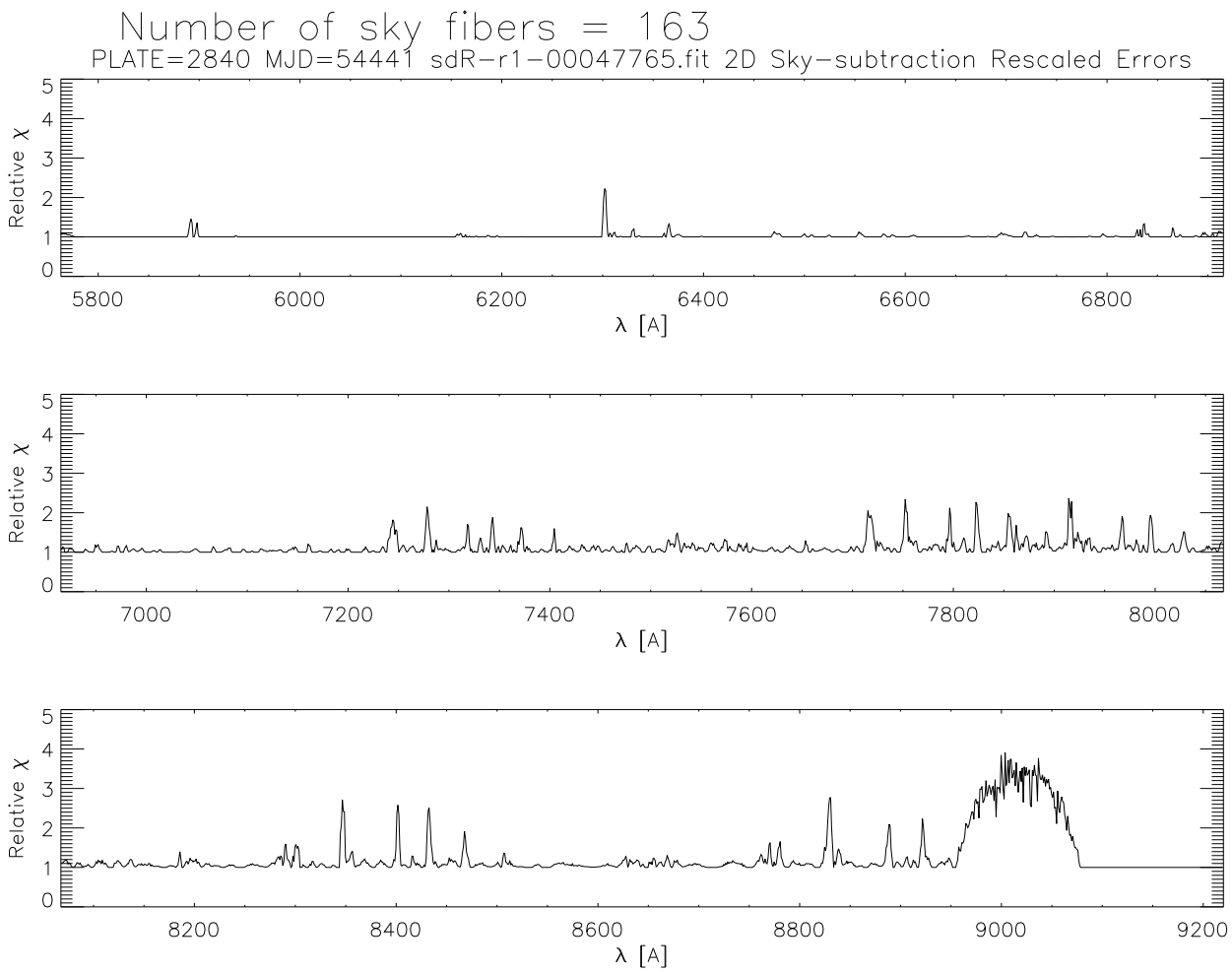

PLATE=2840 MJD=54441 sdR-r1-00047765.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
60
40
20
0
-20
-40
-60
8820
8840
8860
8880
8900
λ [A]

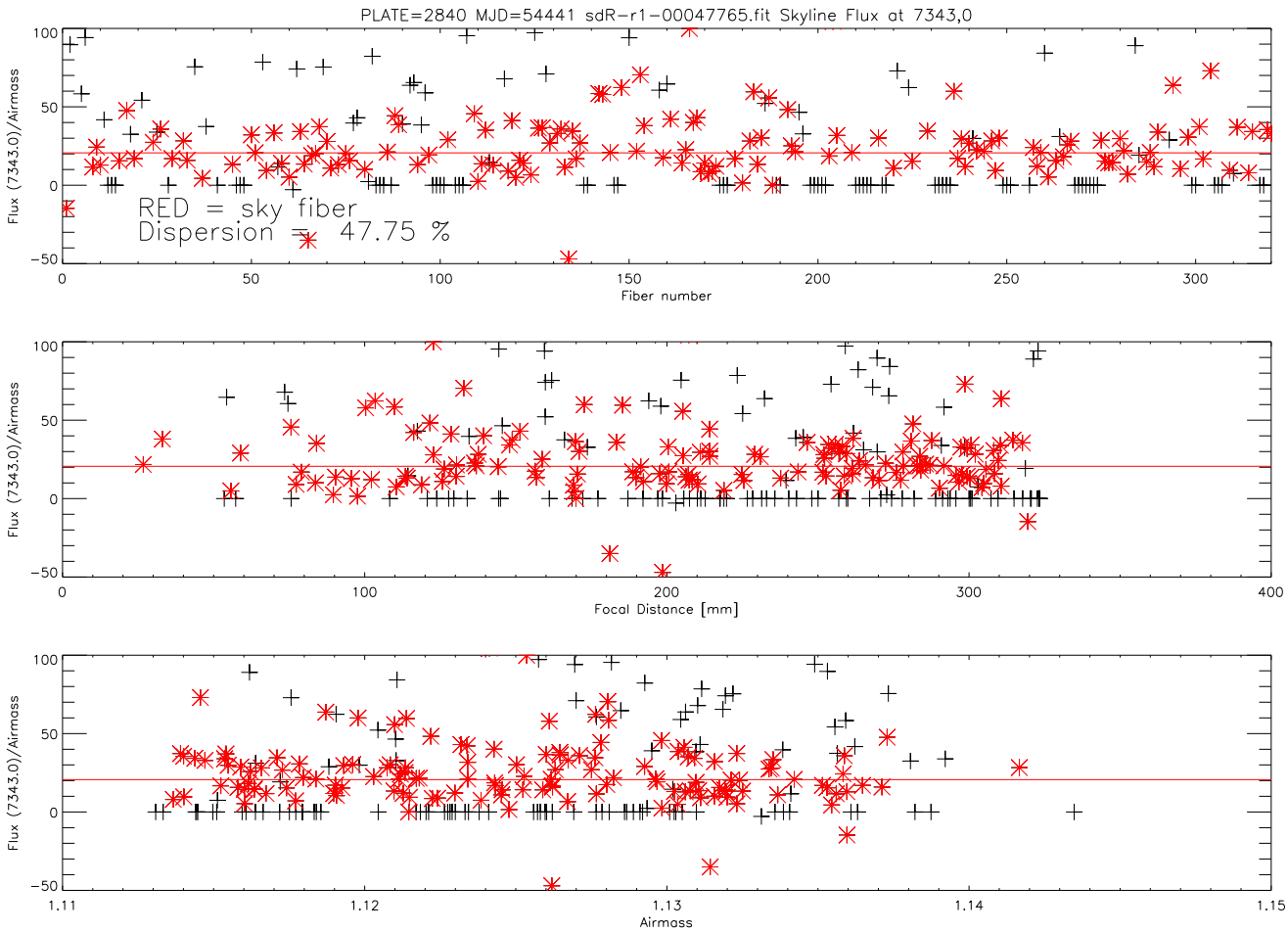

Number of sky fibers = 163
PLATE=2840 MJD=54441 sdR-r1-00047765.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

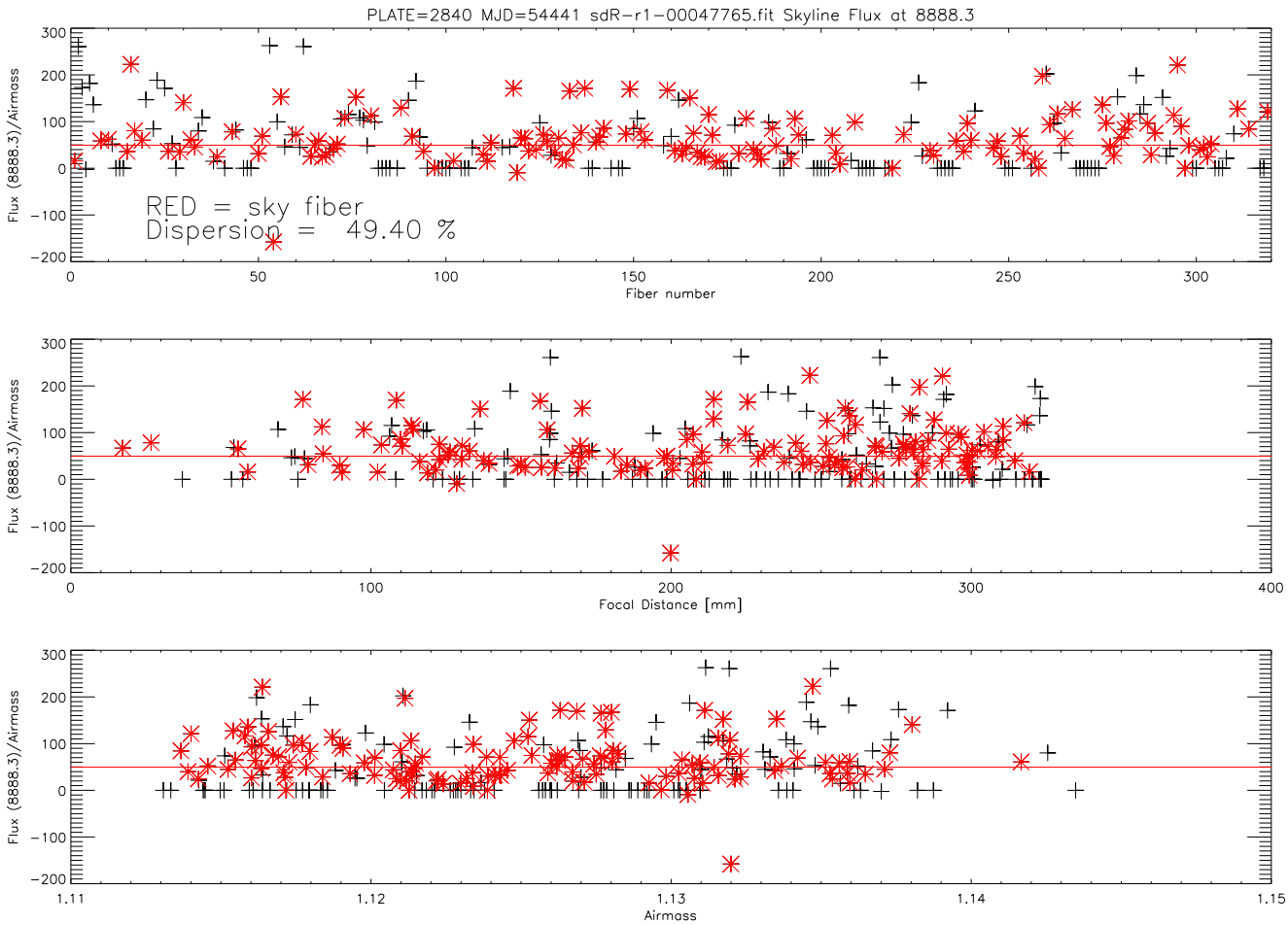

PLATE=2840 MJD=54441 sdR-r1-00047765.fit 2D Sky-subtraction Sky Fibers
Median χ^2
0.0
0.2
0.4
0.6
0.8
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
-6
-4
-2
0
2
4
6
50
100
150
200
250
300
Fiber number

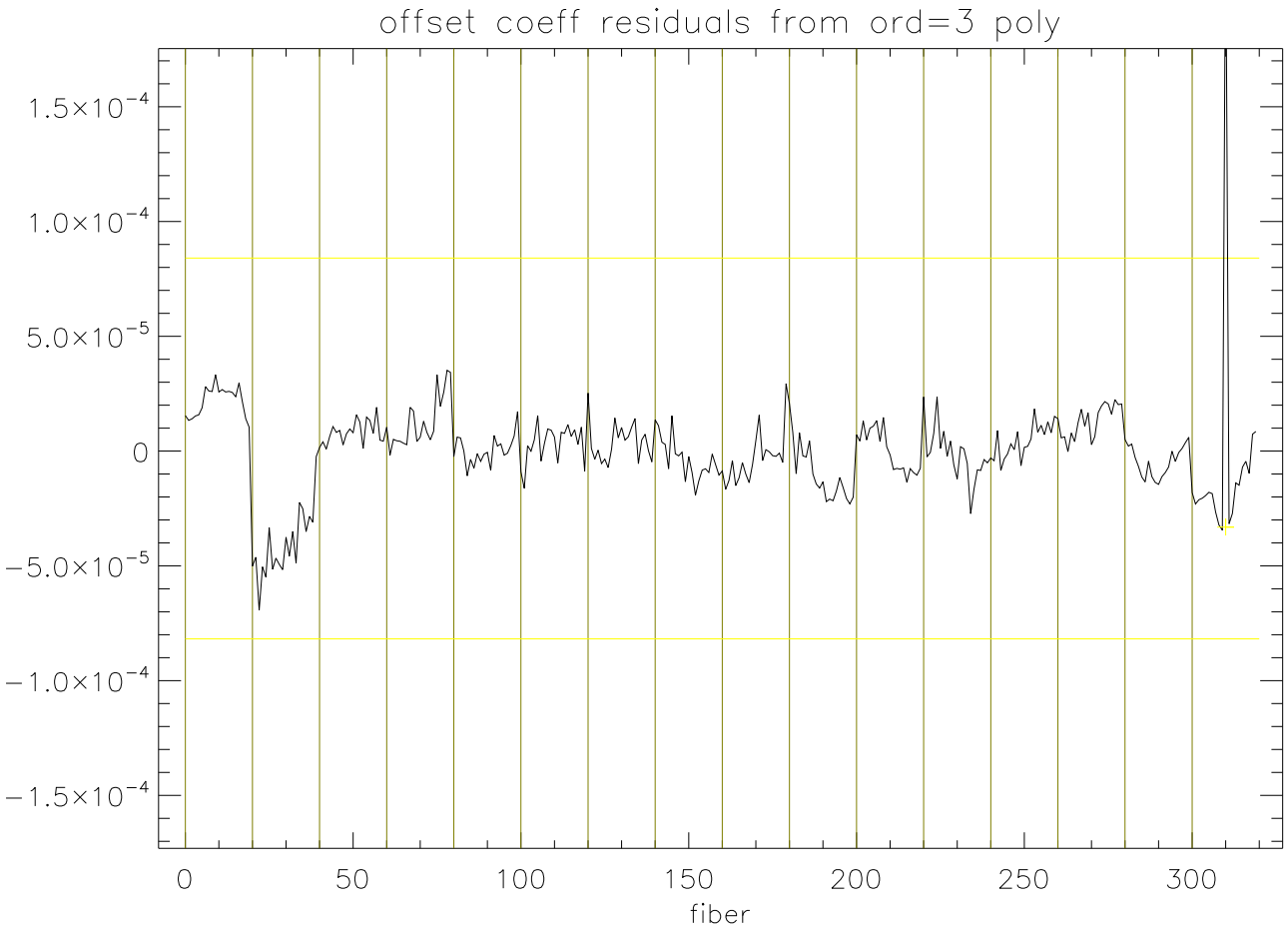

PLATE=2840 MJD=54441 sdR−r1−00047765.fit 2D Sky−subtraction Sky Fibers
Flux [electrons]
80
60
40
20
0
−20
−40
−60
8820
8840
8860
8880
8900
λ [A]

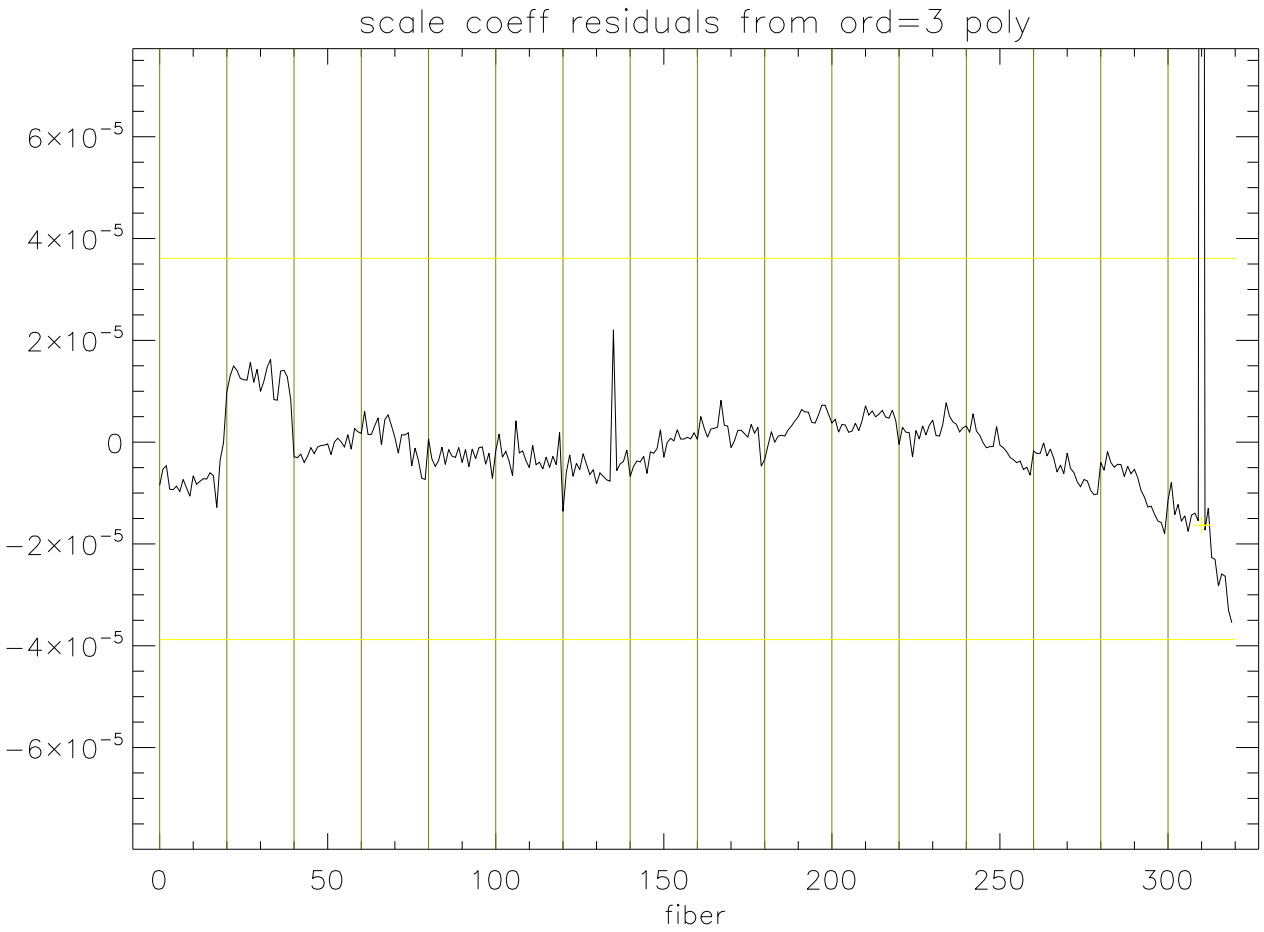

PLATE=2840 MJD=54441 sdR−r1−00047765.fit 2D Sky−subtraction Sky−subtracted Sky F
Sky−Sub Flux [electrons]
80
60
40
20
0
−20
−40
−60
8820
8840
8860
8880
8900
λ [A]

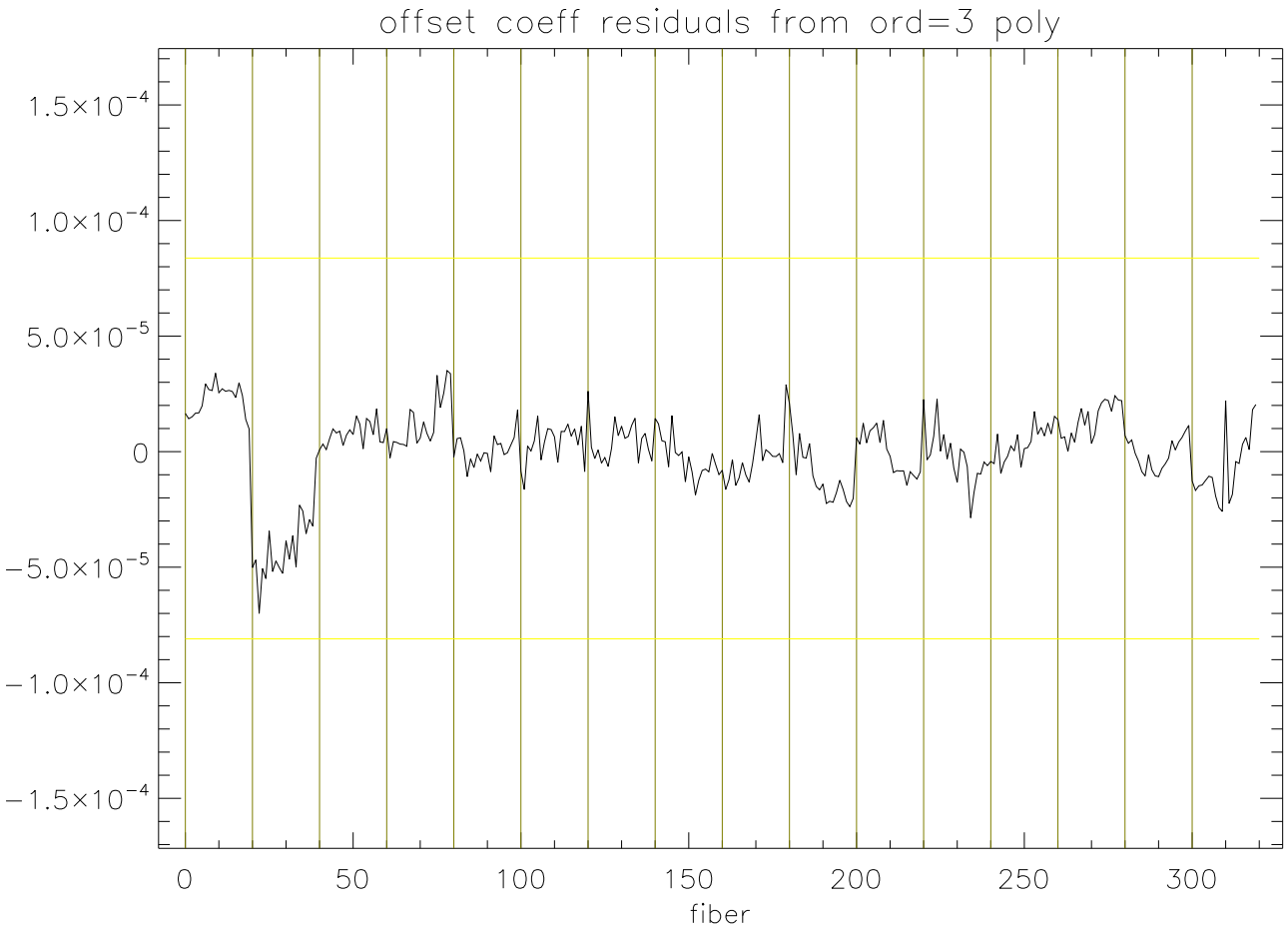

Number of sky fibers = 163
PLATE=2840 MJD=54441 sdR-r1-00047765.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
5800
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

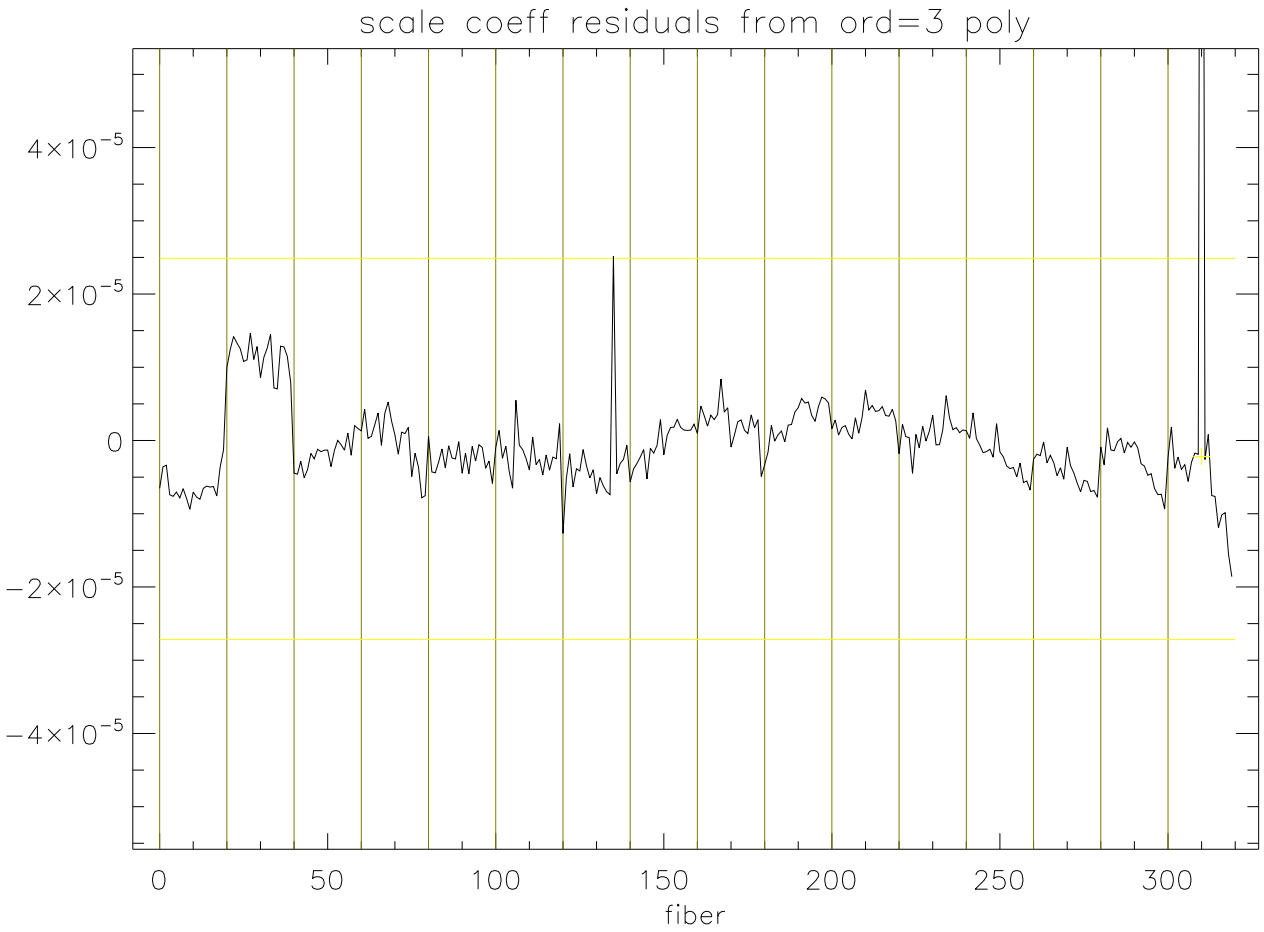

PLATE=2840 MJD=54441 sdR-r1-00047765.fit Skyline Flux at 7343,0
Flux (7343.0)/Airmass
Fiber number
RED = sky fiber
Dispersion = 47.75 %
Flux (7343.0)/Airmass
Focal Distance [mm]
Flux (7343.0)/Airmass
Airmass

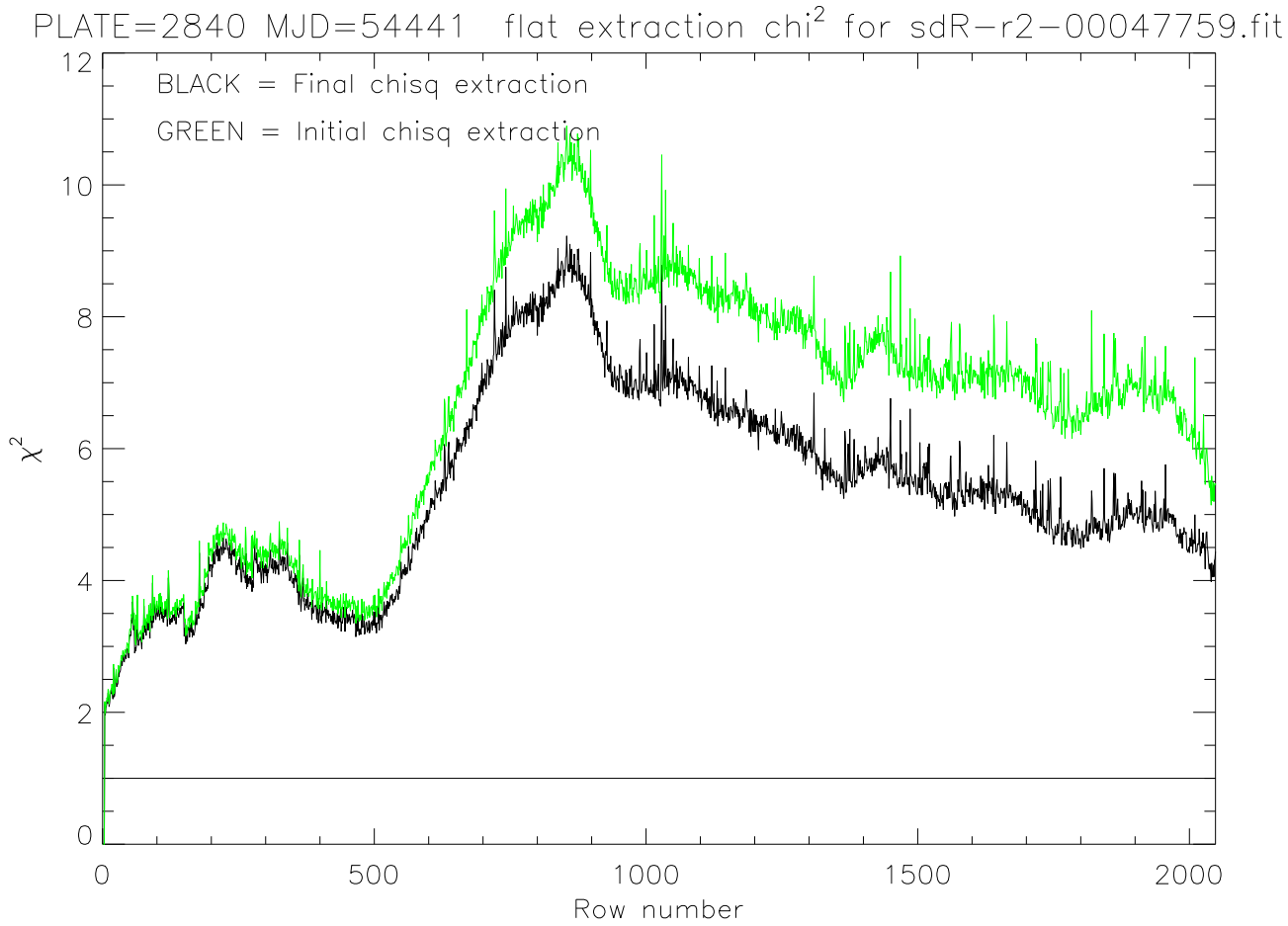

PLATE=2840 MJD=54441 sdR-r1-00047765.fit Skyline Flux at 8888.3
Flux (8888.3)/Airmass
RED = sky fiber
Dispersion = 49.40 %
Fiber number
Flux (8888.3)/Airmass
Focal Distance [mm]
Flux (8888.3)/Airmass
Airmass

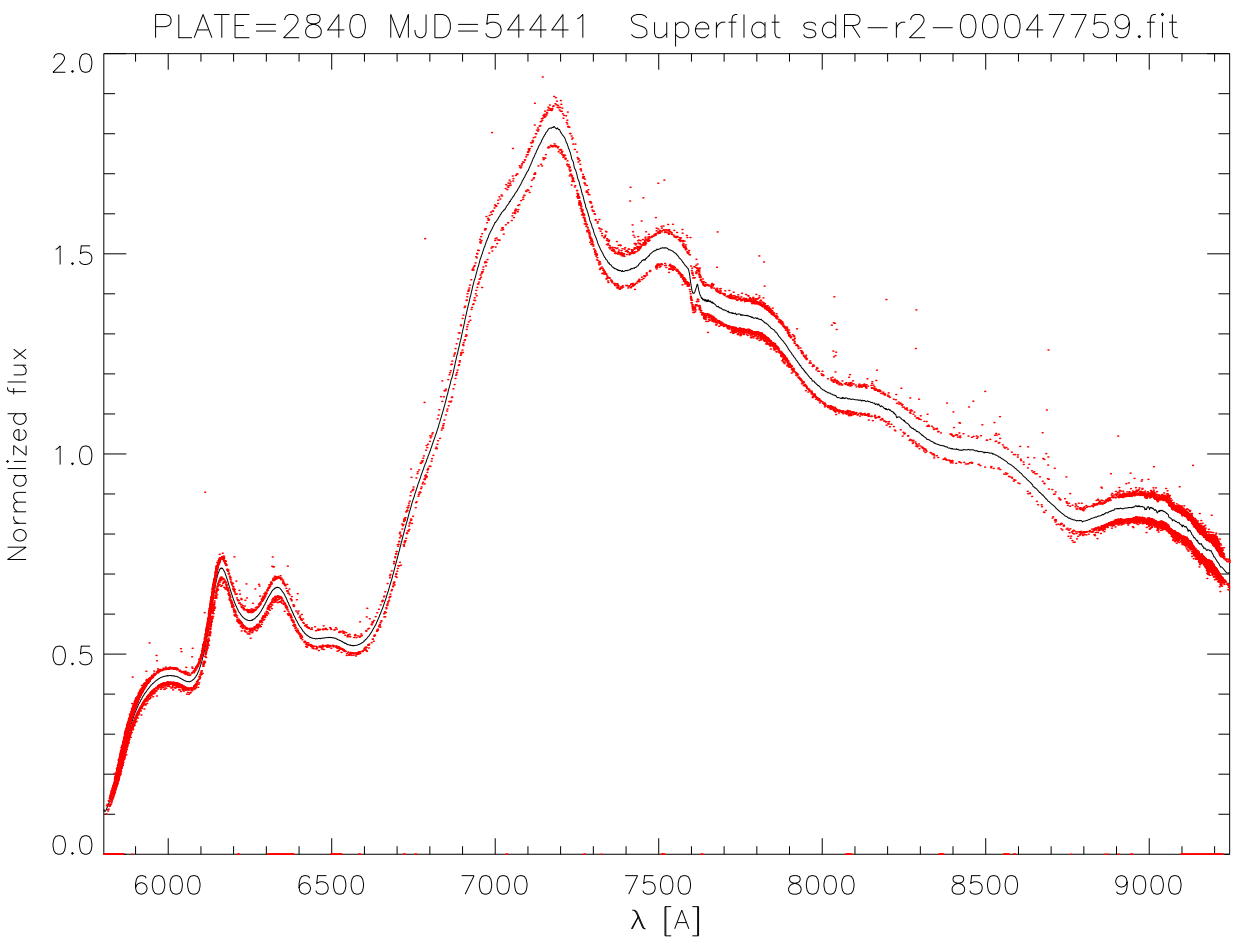

offset coeff residuals from ord=3 poly
1.5×10⁻⁴
1.0×10⁻⁴
5.0×10⁻⁵
0
−5.0×10⁻⁵
−1.0×10⁻⁴
−1.5×10⁻⁴
0
50
100
150
200
250
300
fiber

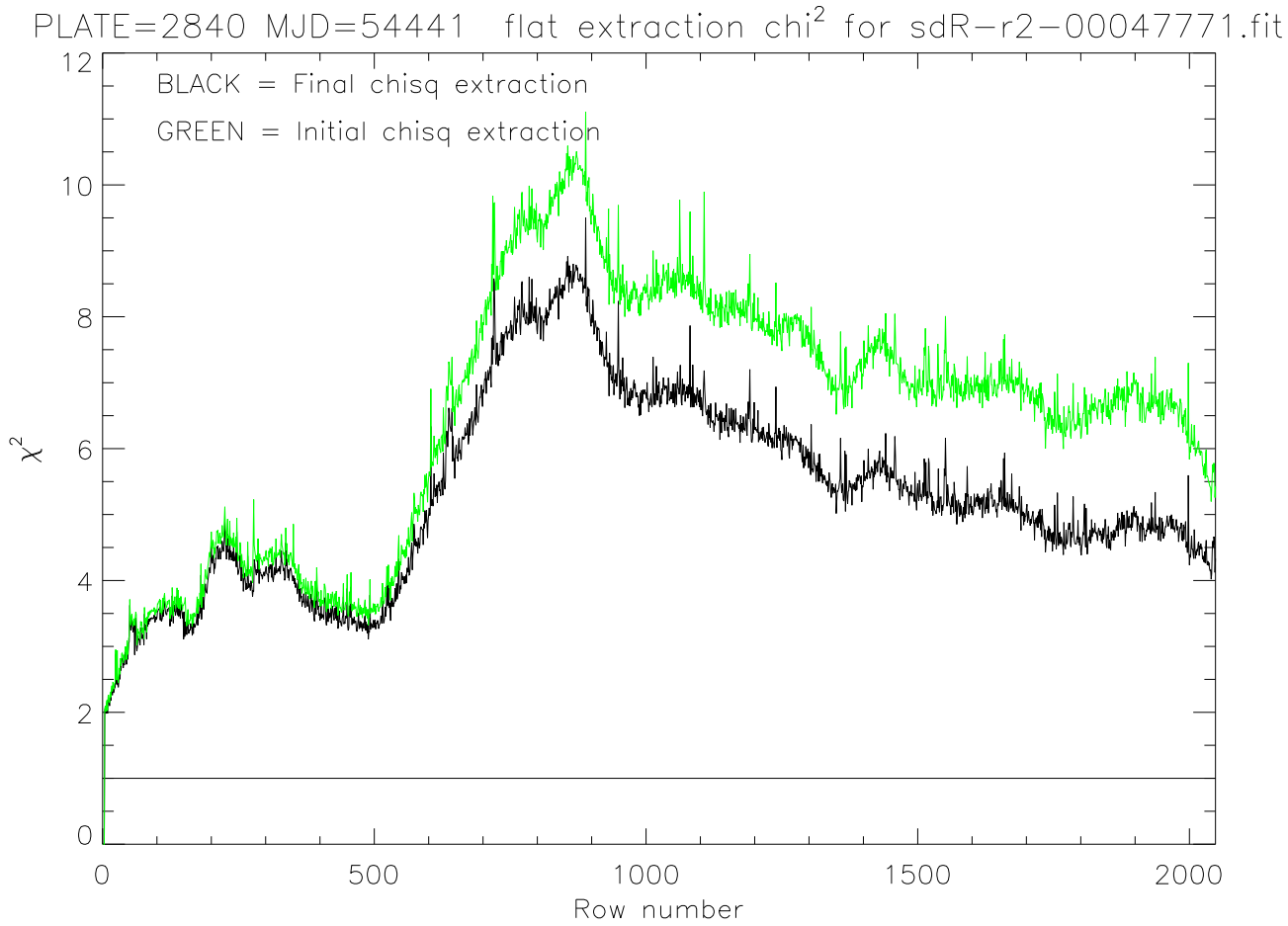

scale coeff residuals from ord=3 poly
6×10⁻⁵
4×10⁻⁵
2×10⁻⁵
0
−2×10⁻⁵
−4×10⁻⁵
−6×10⁻⁵
0
50
100
150
200
250
300
fiber

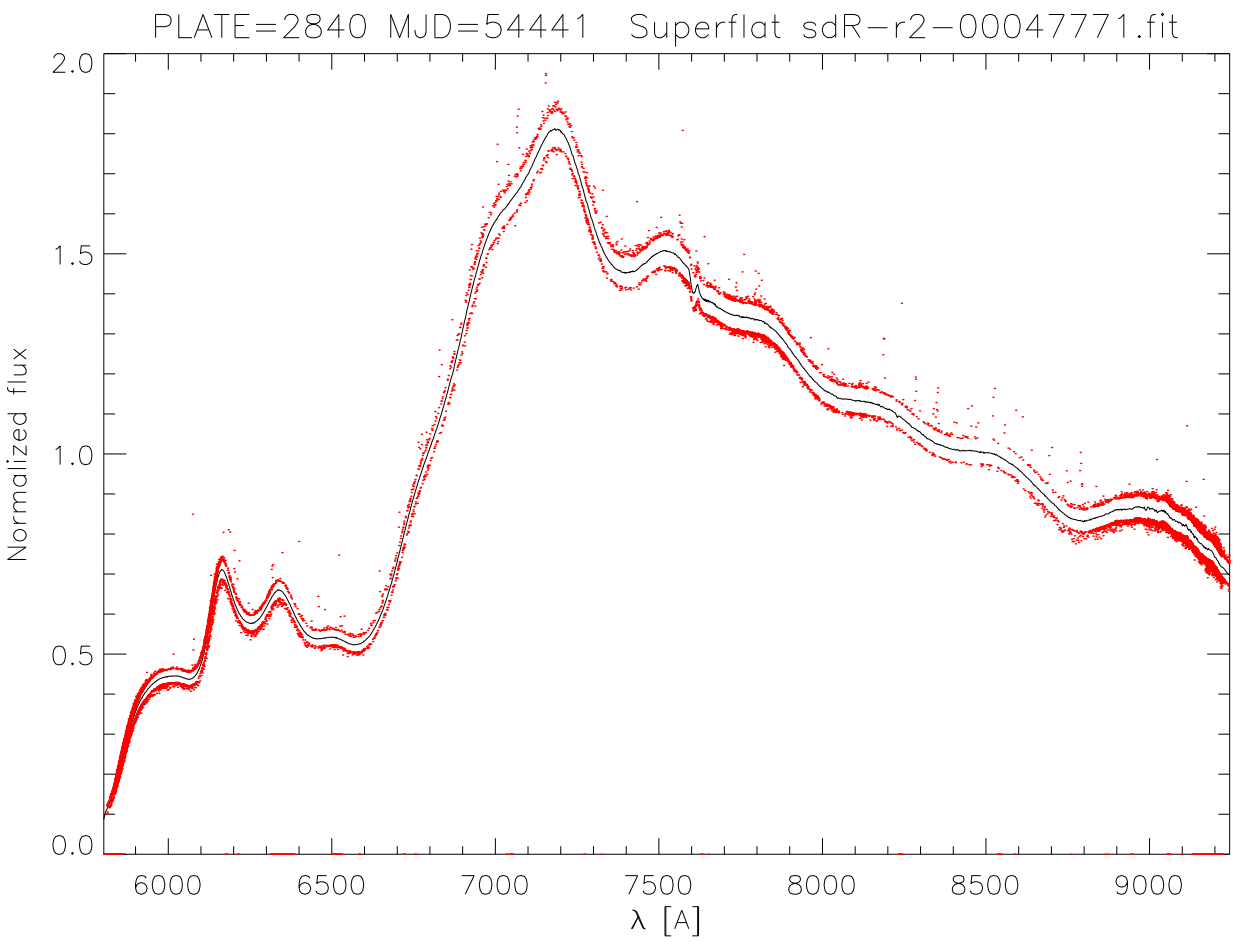

offset coeff residuals from ord=3 poly
1.5×10⁻⁴
1.0×10⁻⁴
5.0×10⁻⁵
0
−5.0×10⁻⁵
−1.0×10⁻⁴
−1.5×10⁻⁴
0
50
100
150
200
250
300
fiber

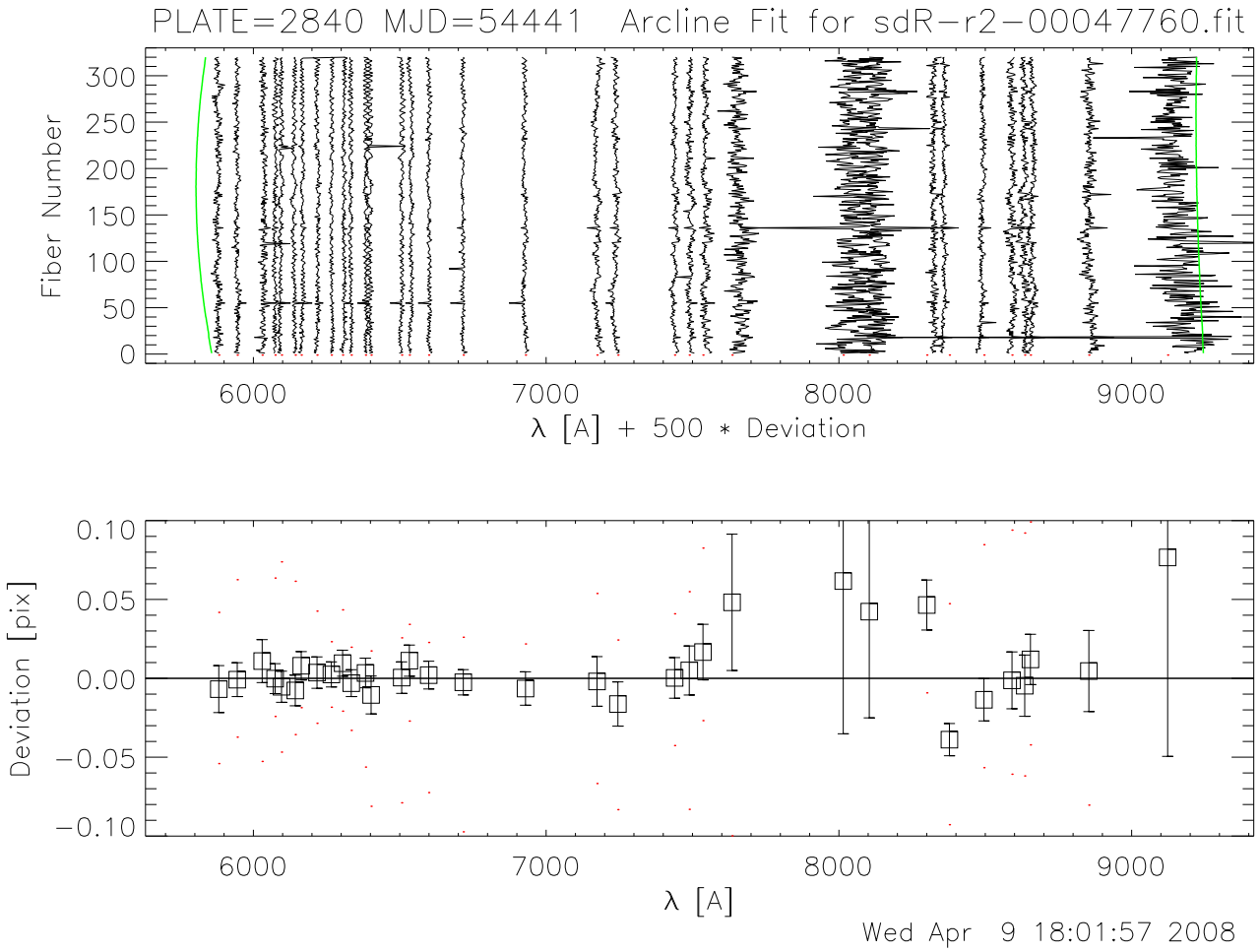

scale coeff residuals from ord=3 poly
4×10⁻⁵
2×10⁻⁵
0
−2×10⁻⁵
−4×10⁻⁵
0
50
100
150
200
250
300
fiber

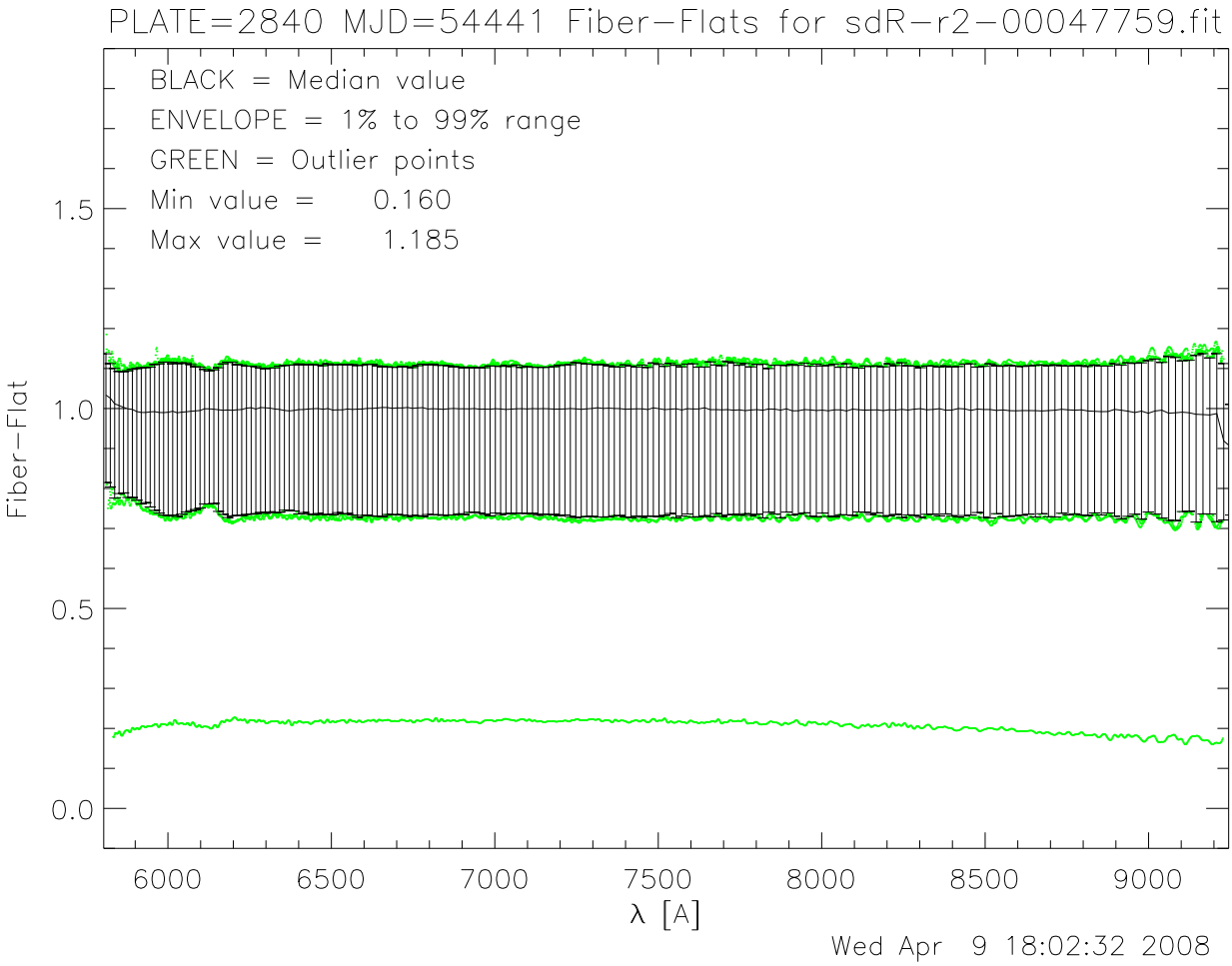

PLATE=2840 MJD=54441 flat extraction chi^2 for sdR−r2−00047759.fit
BLACK = Final chisq extraction
GREEN = Initial chisq extraction
χ^2
Row number
0
2
4
6
8
10
12
0
500
1000
1500
2000

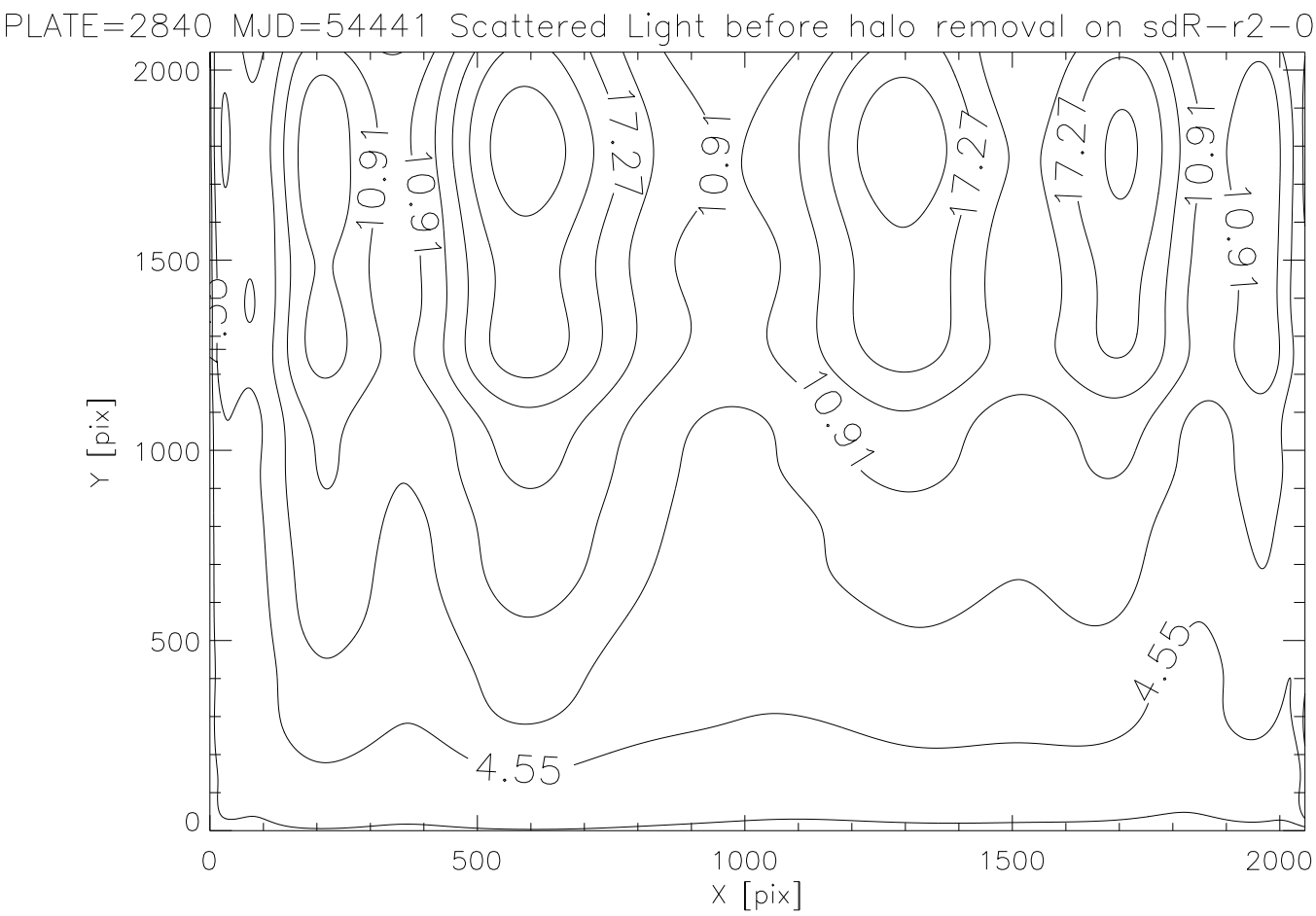

PLATE=2840 MJD=54441 Superflat sdR-r2-00047759.fit
Normalized flux
2.0
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]

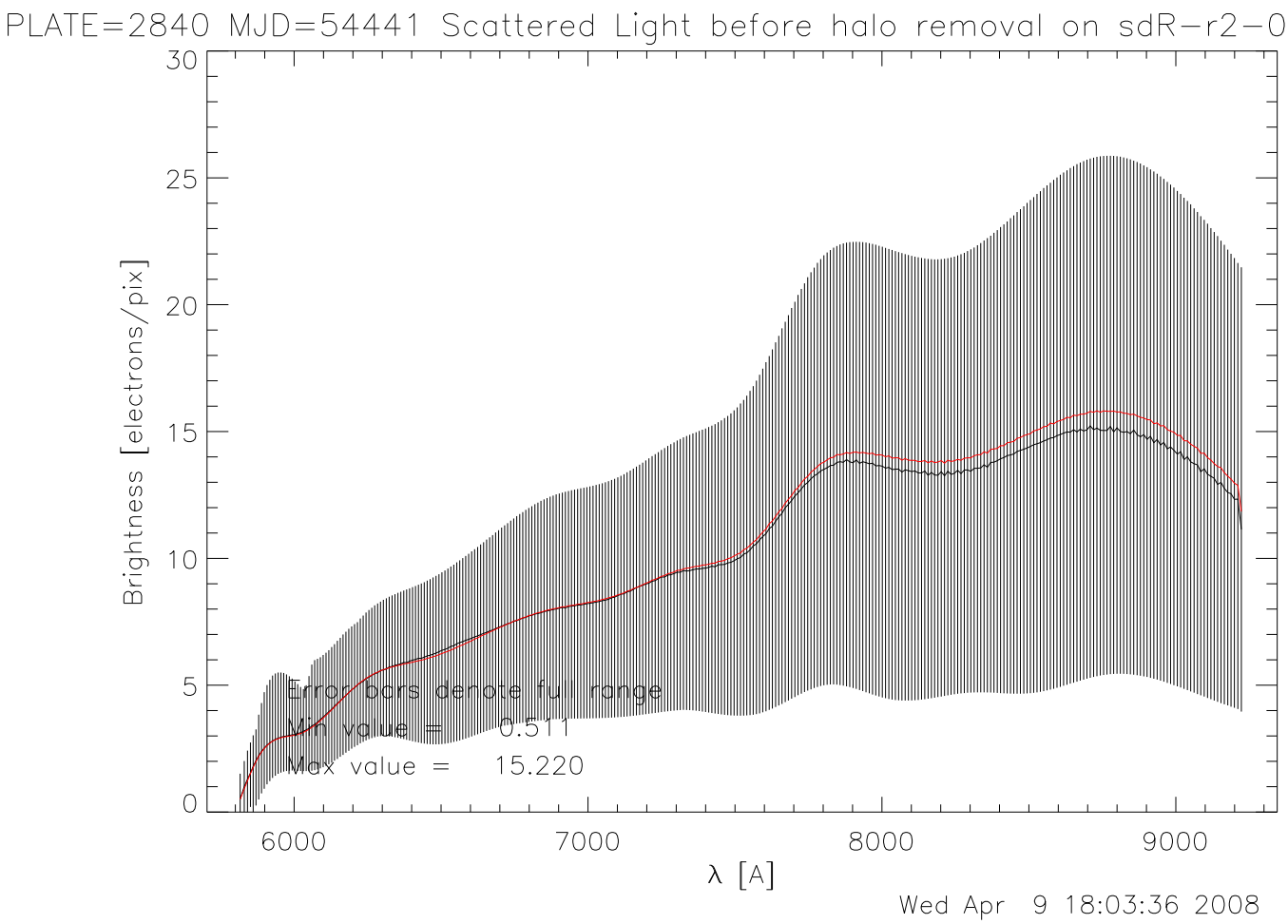

PLATE=2840 MJD=54441 flat extraction chi^2 for sdR−r2−00047771.fit
BLACK = Final chisq extraction
GREEN = Initial chisq extraction
χ^2
Row number
0
2
4
6
8
10
12
0
500
1000
1500
2000

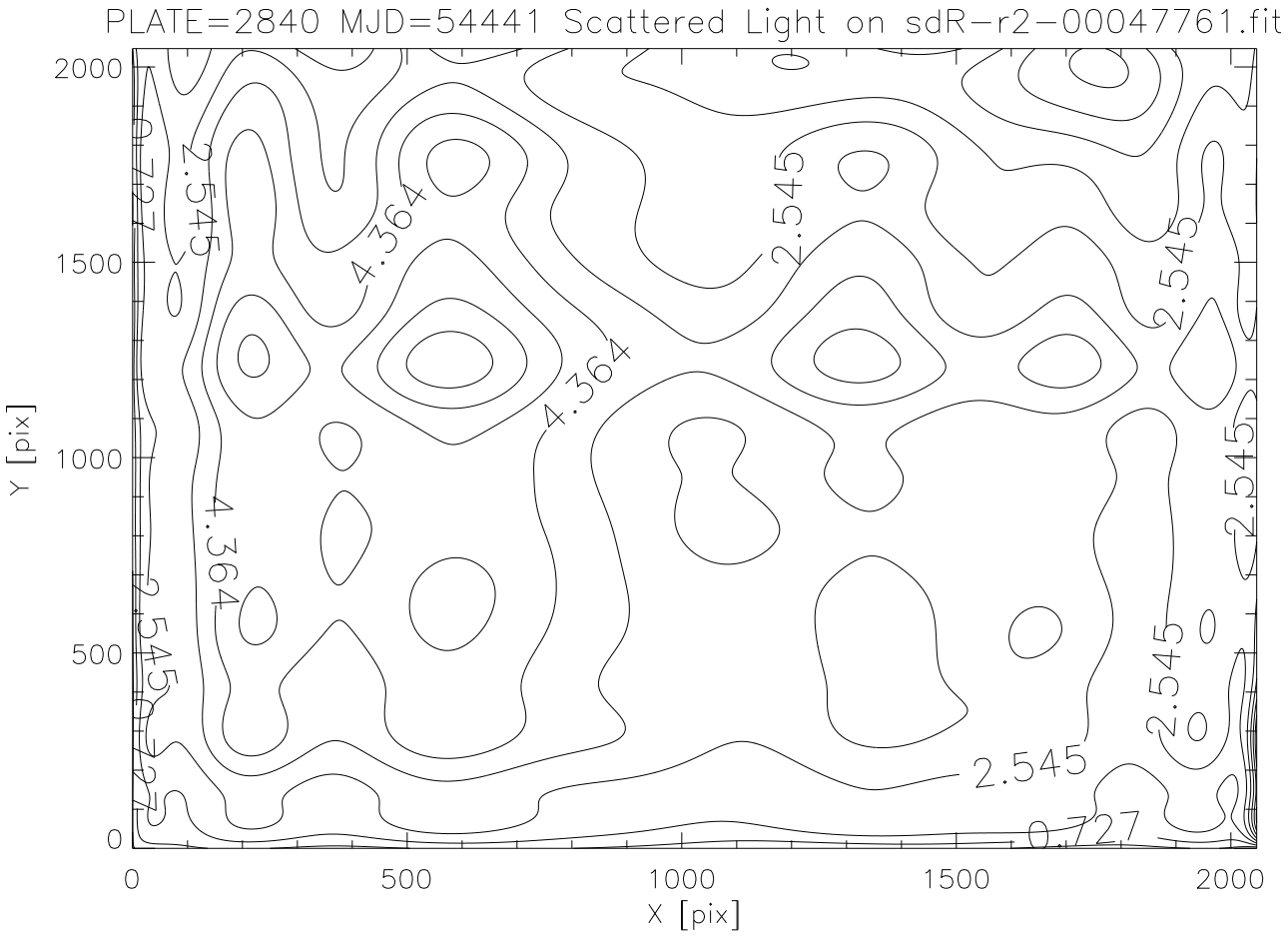

PLATE=2840 MJD=54441 Superflat sdR-r2-00047771.fit
Normalized flux
2.0
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]

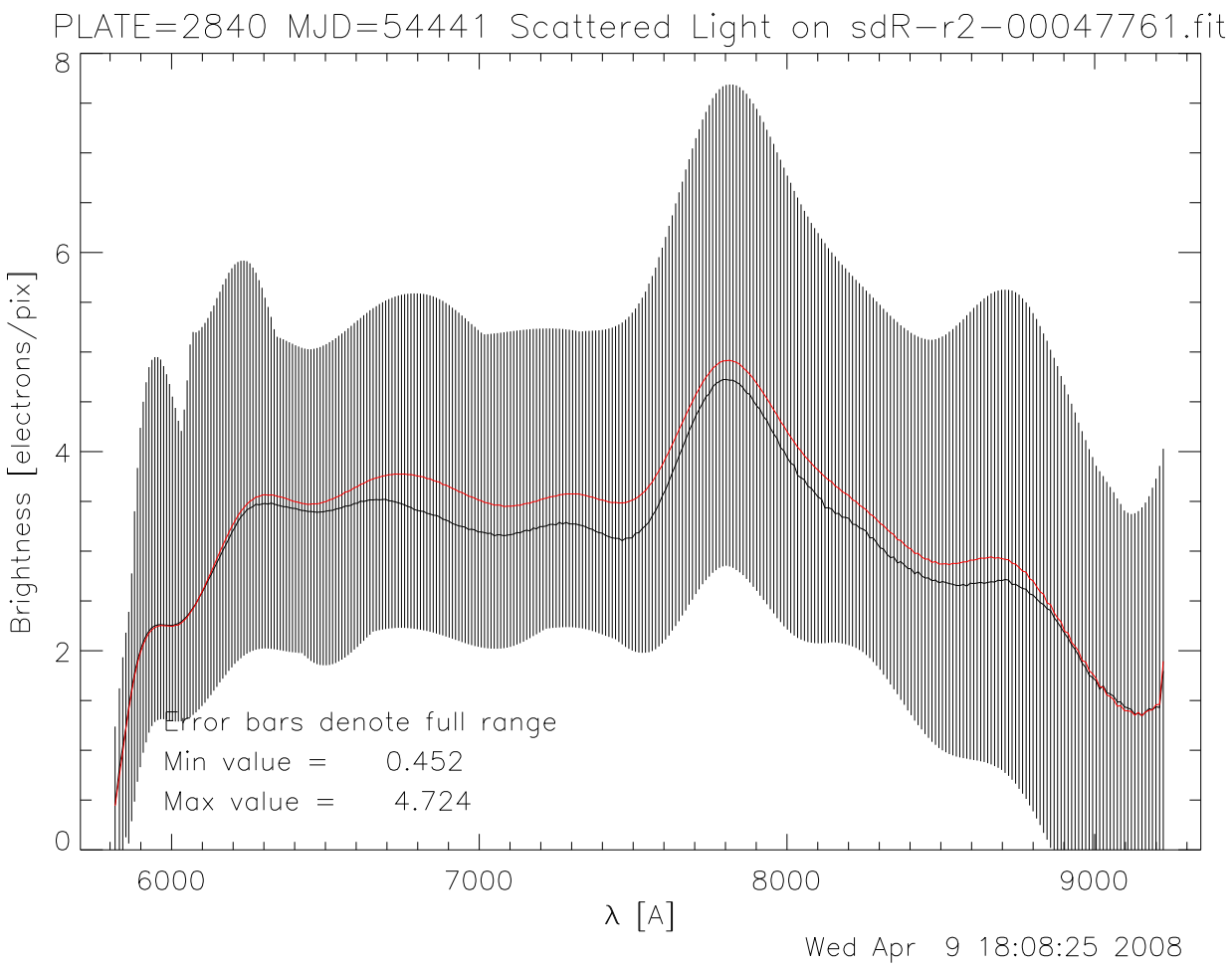

PLATE=2840 MJD=54441 Arcline Fit for sdR-r2-00047760.fit
Fiber Number
300
250
200
150
100
50
0
6000
7000
8000
9000
λ [A] + 500 * Deviation
Deviation [pix]
0.10
0.05
0.00
−0.05
−0.10
6000
7000
8000
9000
λ [A]
Wed Apr 9 18:01:57 2008

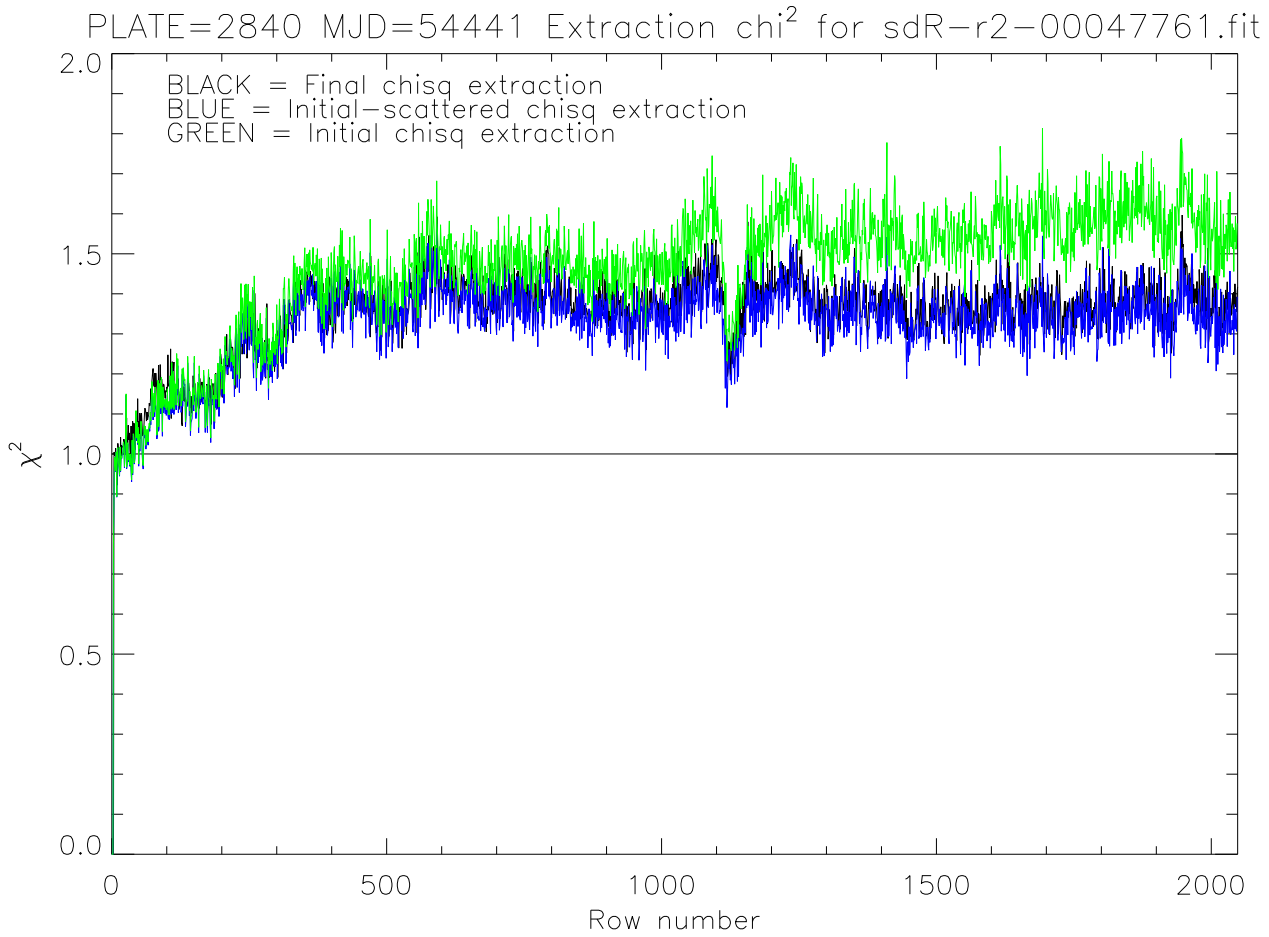

PLATE=2840 MJD=54441 Fiber−Flats for sdR−r2−00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.160
Max value = 1.185
Fiber−Flat
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]
Wed Apr 9 18:02:32 2008

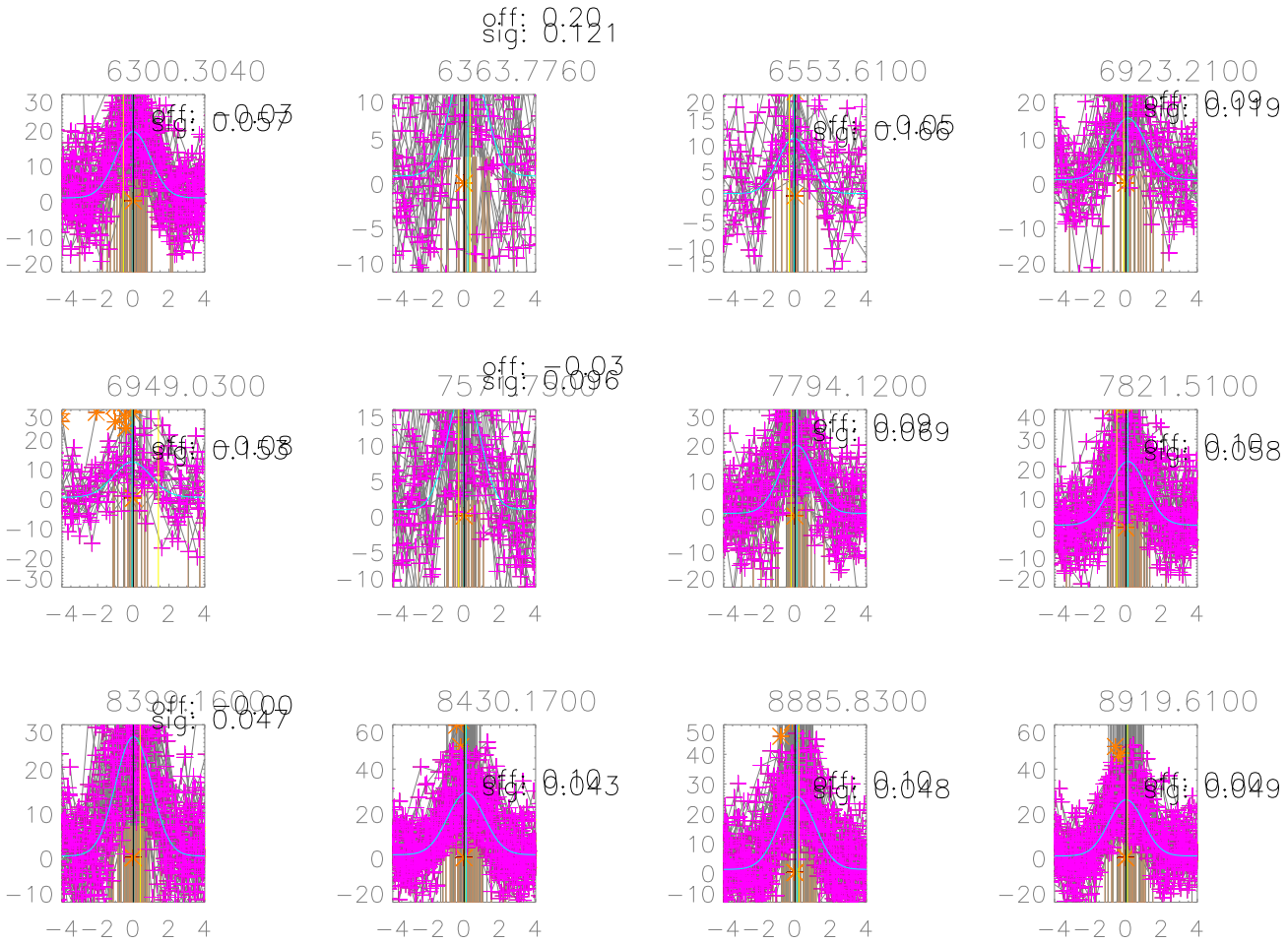

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r2-00047761.fi
Y [pix]
X [pix]
0
500
1000
1500
2000
4.55
10.91
17.27

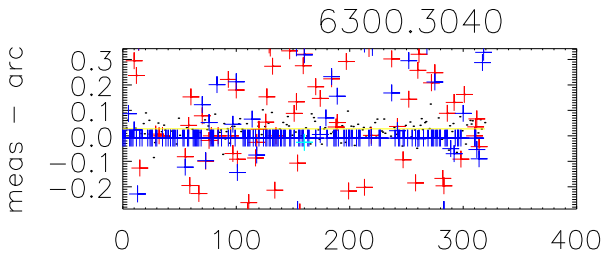

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r2-00047761.fi
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.511
Max value = 15.220
Wed Apr 9 18:03:36 2008

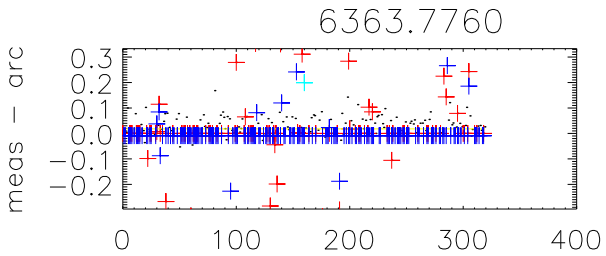

PLATE=2840 MJD=54441 Scattered Light on sdR-r2-00047761.fit
Y [pix]
X [pix]
0
500
1000
1500
2000
0.727
2.545
4.364

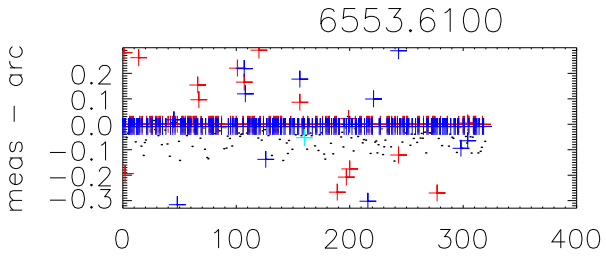

PLATE=2840 MJD=54441 Scattered Light on sdR-r2-00047761.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.452
Max value = 4.724
Wed Apr 9 18:08:25 2008

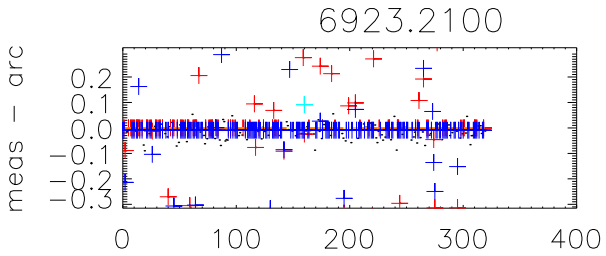

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-r2-00047761.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
2.0
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

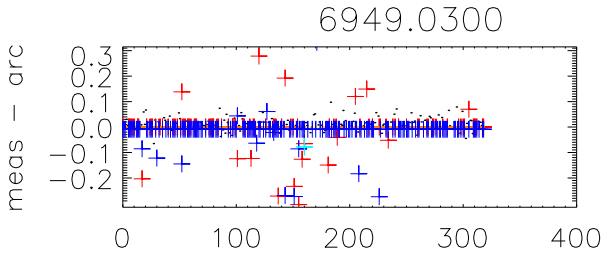

off: 0.20
sig: 0.121
6300.3040
off: 0.03
sig: 0.057
6363.7760
6553.6100
off: 0.05
sig: 0.166
6923.2100
off: 0.09
sig: 0.119
6949.0300
off: 0.08
sig: 0.153
off: −0.03
sig: 0.096
7794.1200
off: 0.09
sig: 0.089
7821.5100
off: 0.10
sig: 0.058
off: −0.00
sig: 0.047
8430.1700
off: 0.10
sig: 0.043
8885.8300
off: 0.10
sig: 0.048
8919.6100
off: 0.09
sig: 0.049

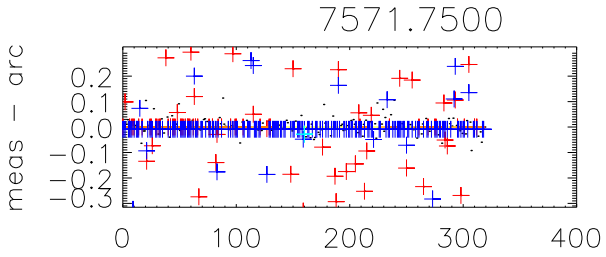

6300.3040
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

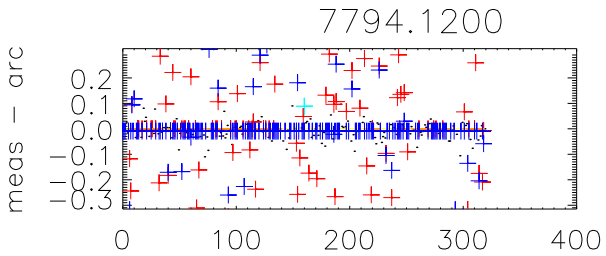

6363.7760
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

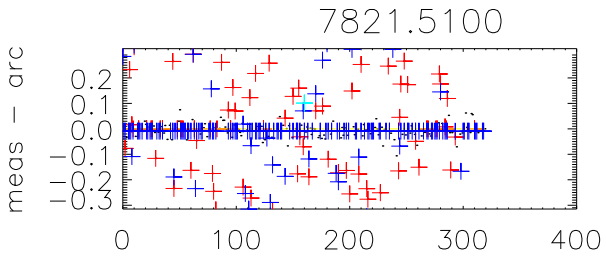

6553.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

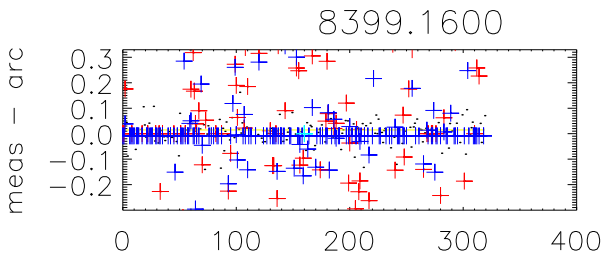

6923.2100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

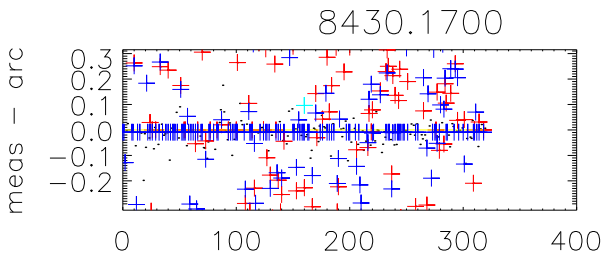

6949.0300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

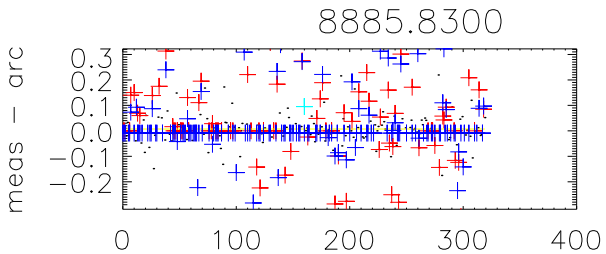

7571.7500
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

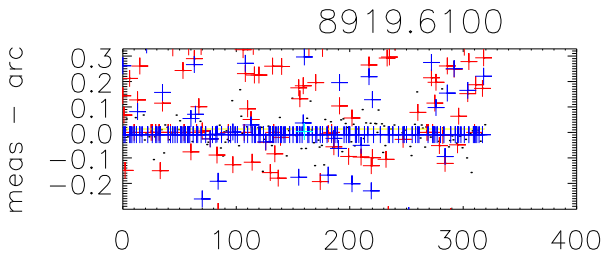

7794.1200
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

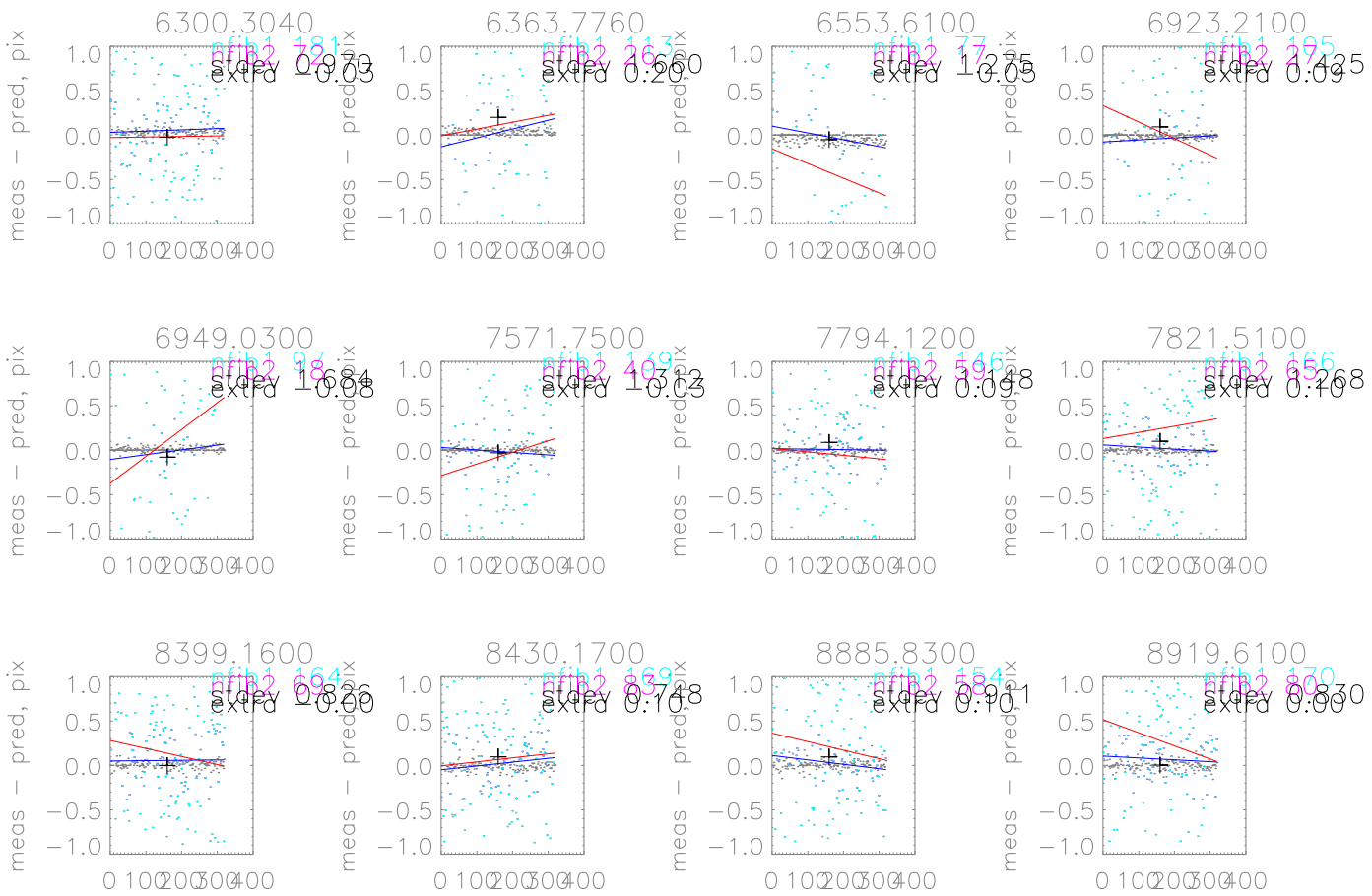

7821.5100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

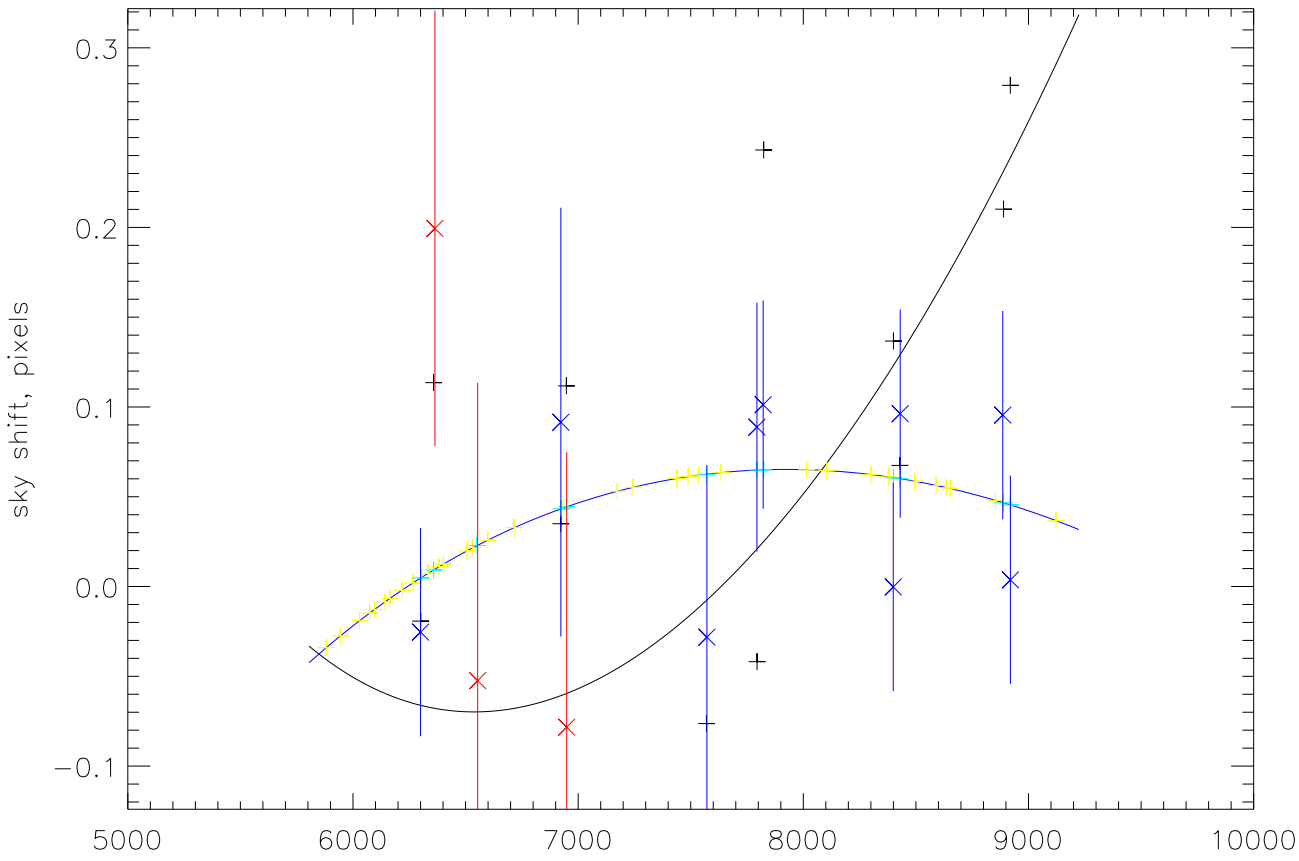

8399.1600
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

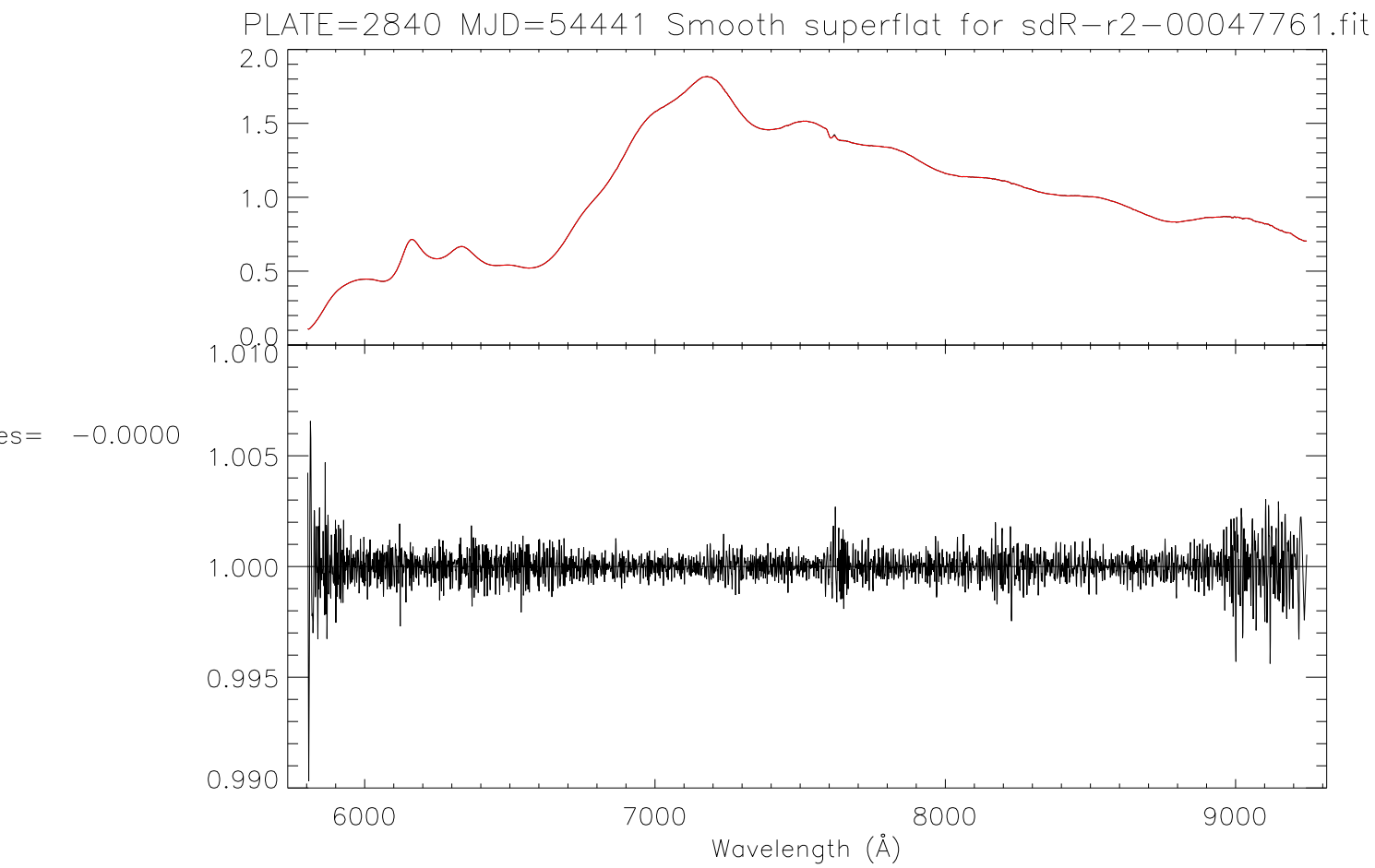

8430.1700
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

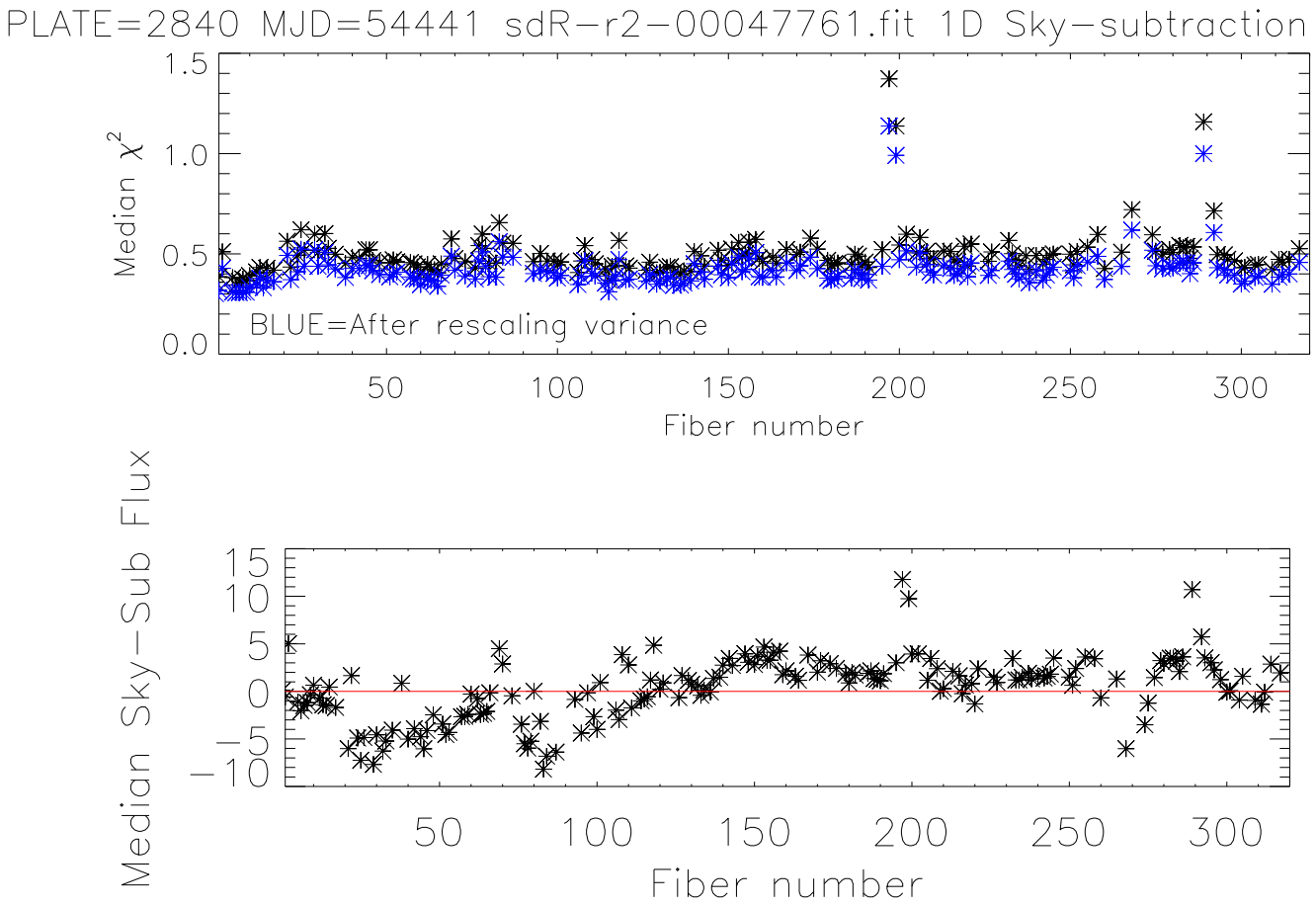

8885.8300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

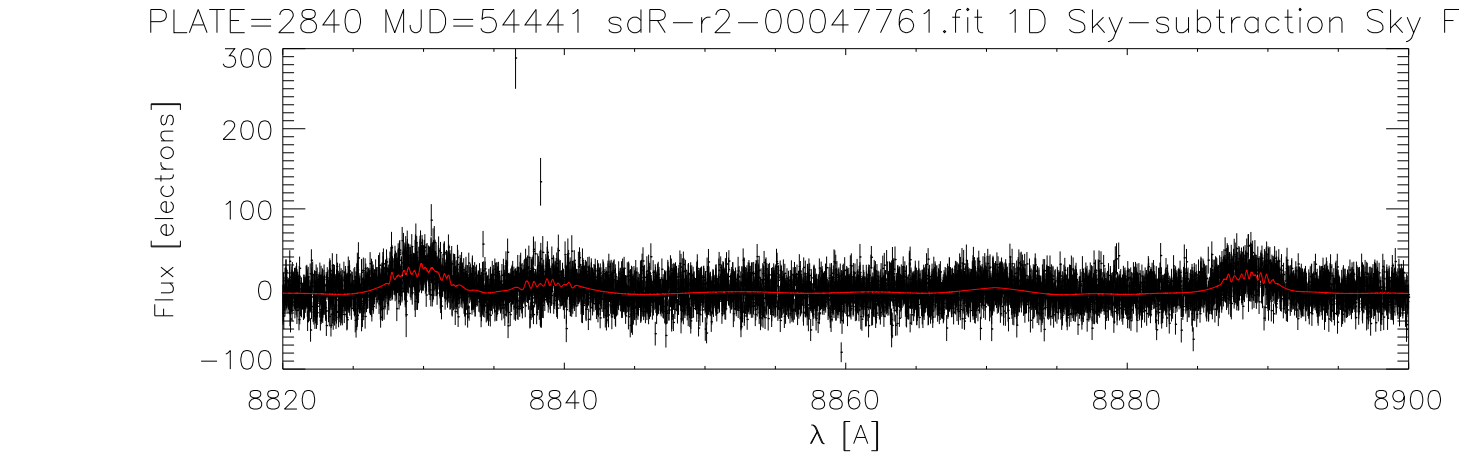

8919.6100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

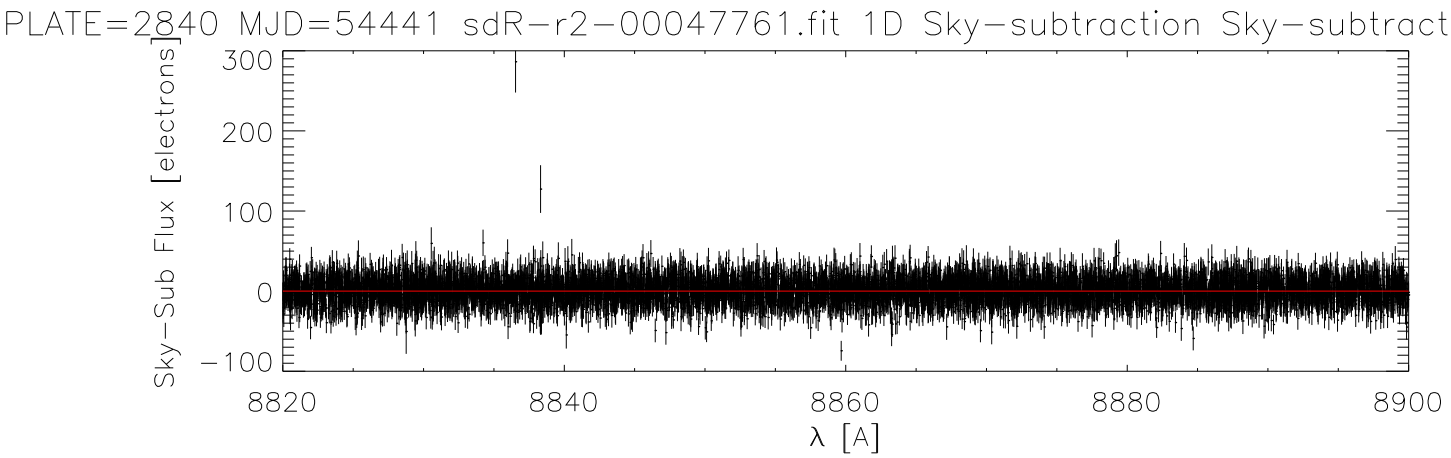

6300.3040
mfb1 181
mfb2 121
stdev 0.970
extra 0.03
6363.7760
mfb1 113
mfb2 163
stdev 1.660
extra 0.20
6553.6100
mfb1 177
mfb2 177
stdev 1.275
extra 0.05
6923.2100
mfb1 105
mfb2 144
stdev 1.425
extra 0.09
6949.0300
mfb1 97
mfb2 187
stdev 1.684
extra 0.08
7571.7500
mfb1 139
mfb2 103
stdev 1.312
extra 0.03
7794.1200
mfb1 146
mfb2 196
stdev 0.948
extra 0.09
7821.5100
mfb1 166
mfb2 159
stdev 1.268
extra 0.10
8399.1600
mfb1 164
mfb2 194
stdev 0.826
extra 0.00
8430.1700
mfb1 169
mfb2 83
stdev 0.748
extra 0.10
8885.8300
mfb1 154
mfb2 158
stdev 0.911
extra 0.10
8919.6100
mfb1 170
mfb2 80
stdev 0.830
extra 0.00
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0 100 200 300 400

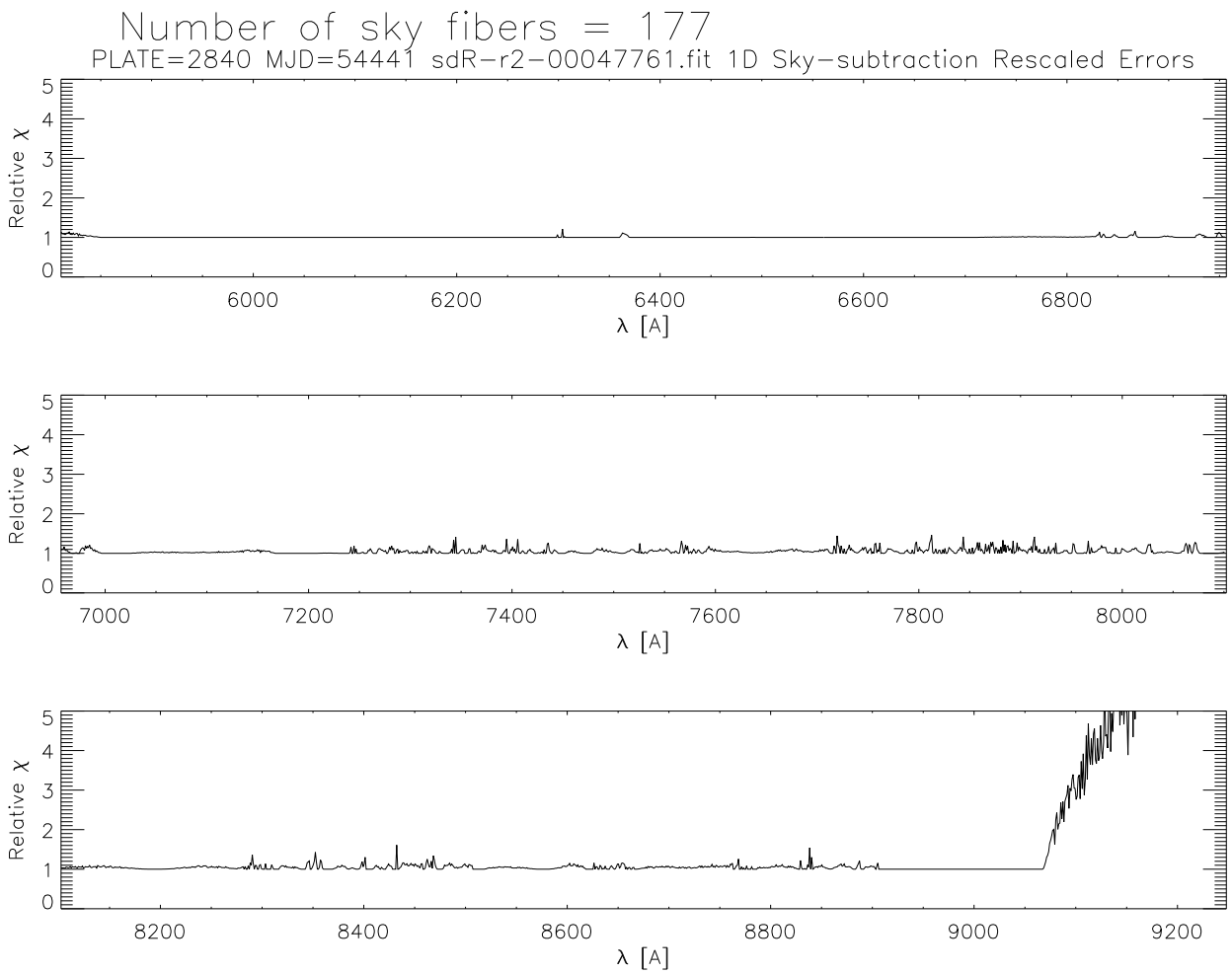

sky shift, pixels
0.3
0.2
0.1
0.0
−0.1
5000
6000
7000
8000
9000
10000

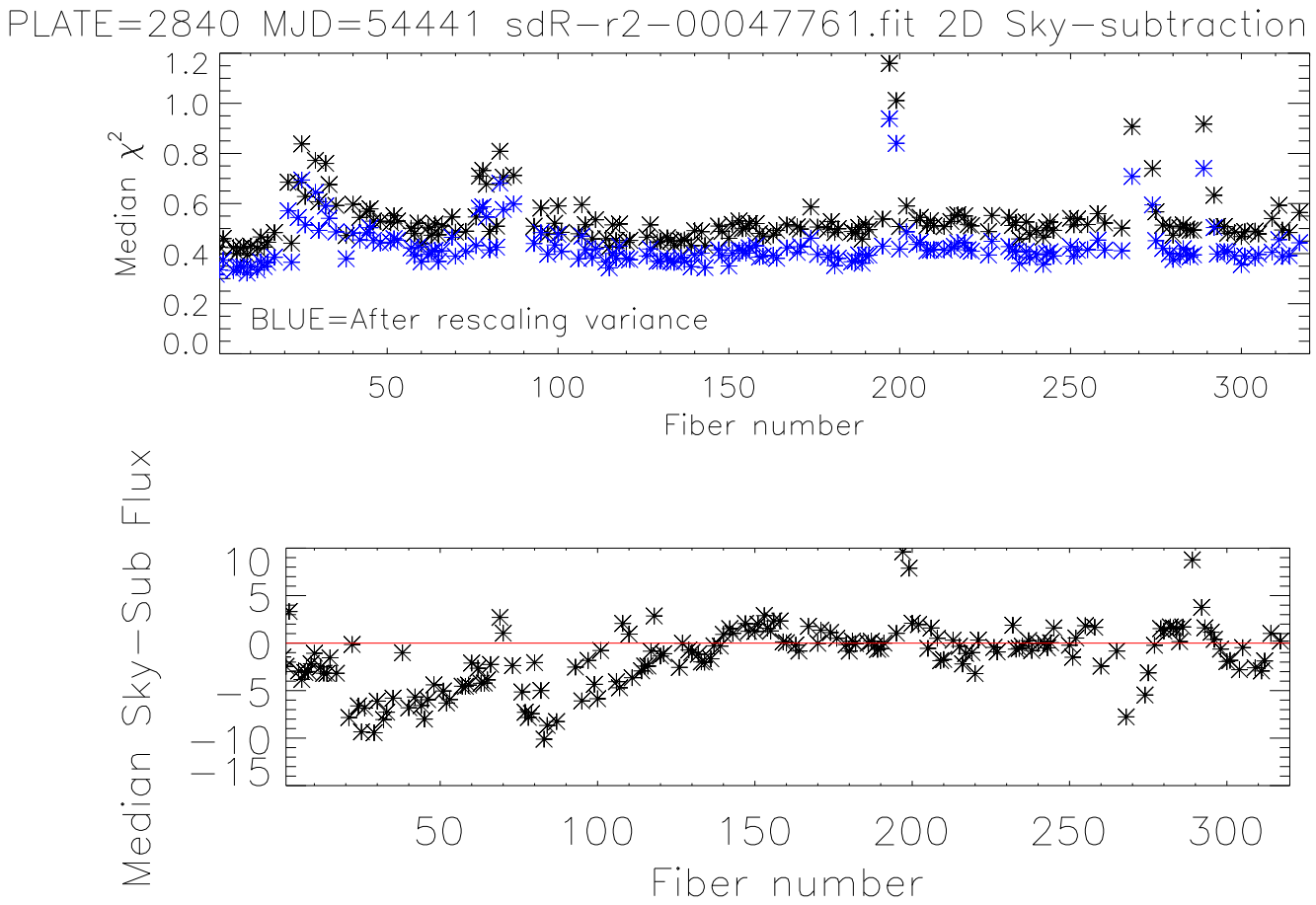

PLATE=2840 MJD=54441 Smooth superflat for sdR-r2-00047761.fit
2.0
1.5
1.0
0.5
0.0
1.010
1.005
1.000
0.995
0.990
es= −0.0000
6000
7000
8000
9000
Wavelength (Å)

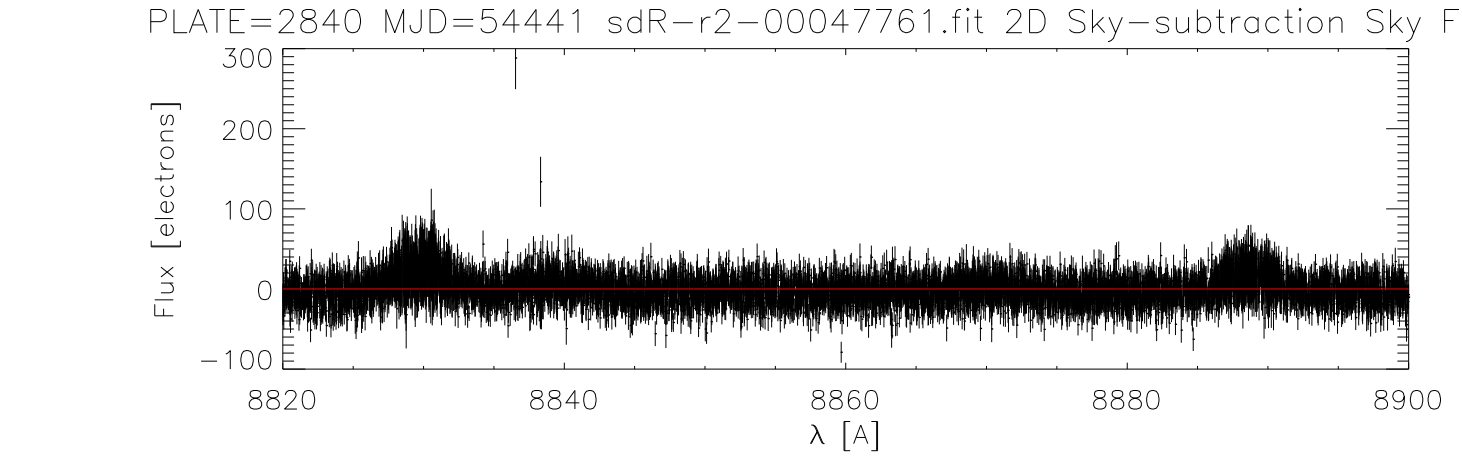

PLATE=2840 MJD=54441 sdR-r2-00047761.fit 1D Sky-subtraction Sky Fibers
Median χ^2
1.5
1.0
0.5
0.0
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
15
10
5
0
-5
-10
50
100
150
200
250
300
Fiber number

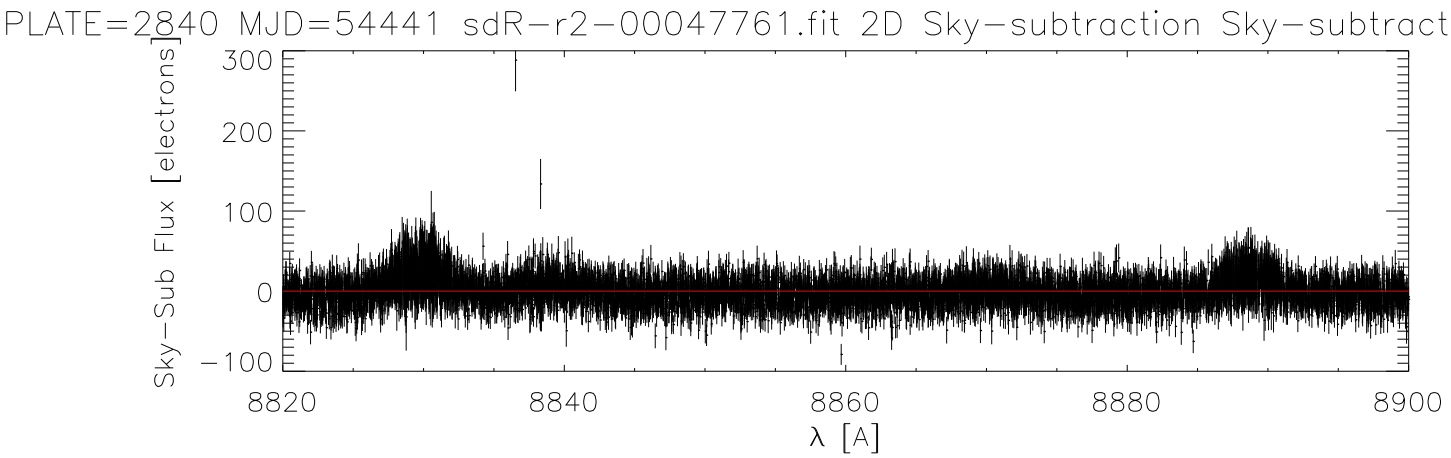

PLATE=2840 MJD=54441 sdR-r2-00047761.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

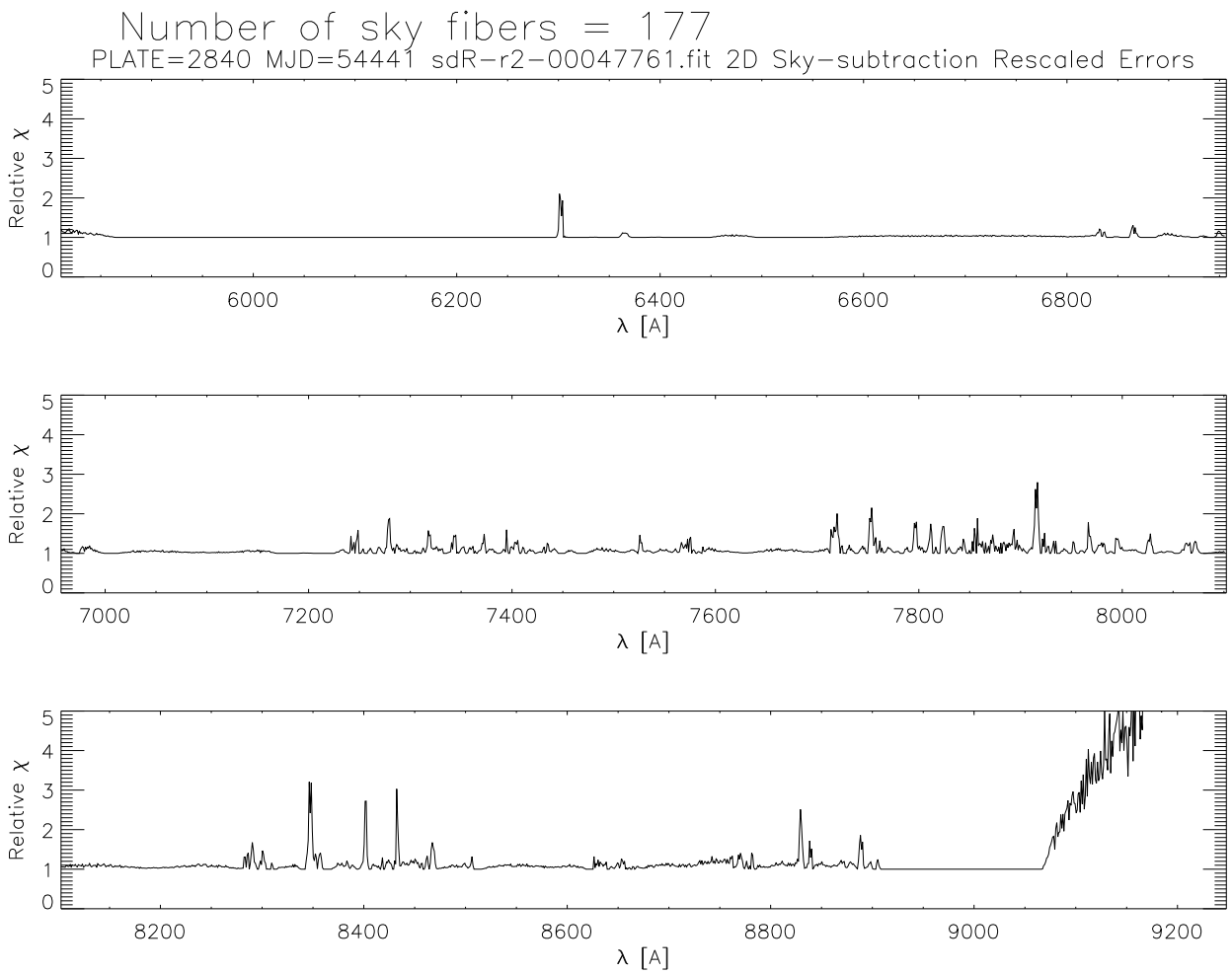

PLATE=2840 MJD=54441 sdR-r2-00047761.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

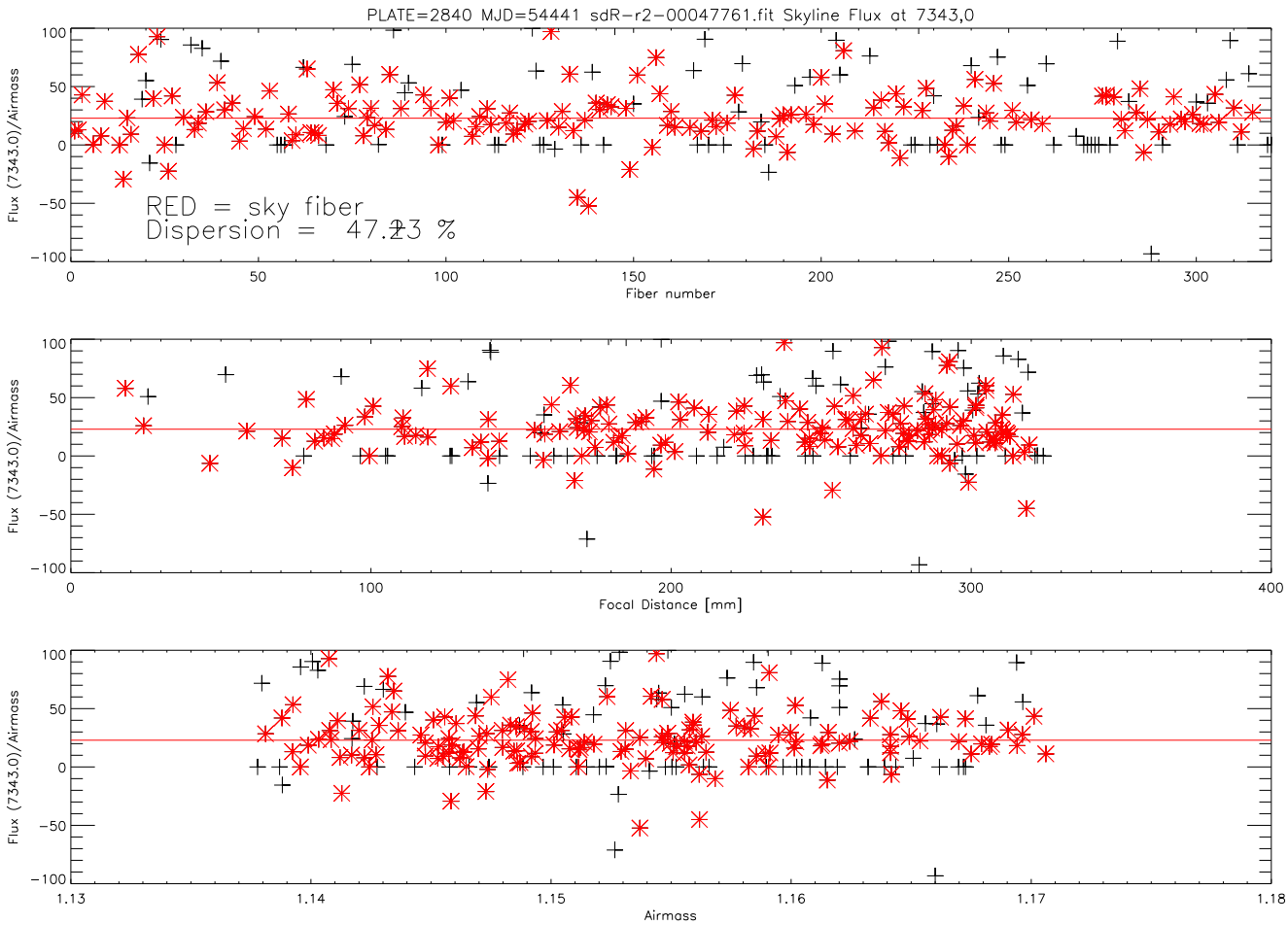

Number of sky fibers = 177
PLATE=2840 MJD=54441 sdR-r2-00047761.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200
0
1
2
3
4
5

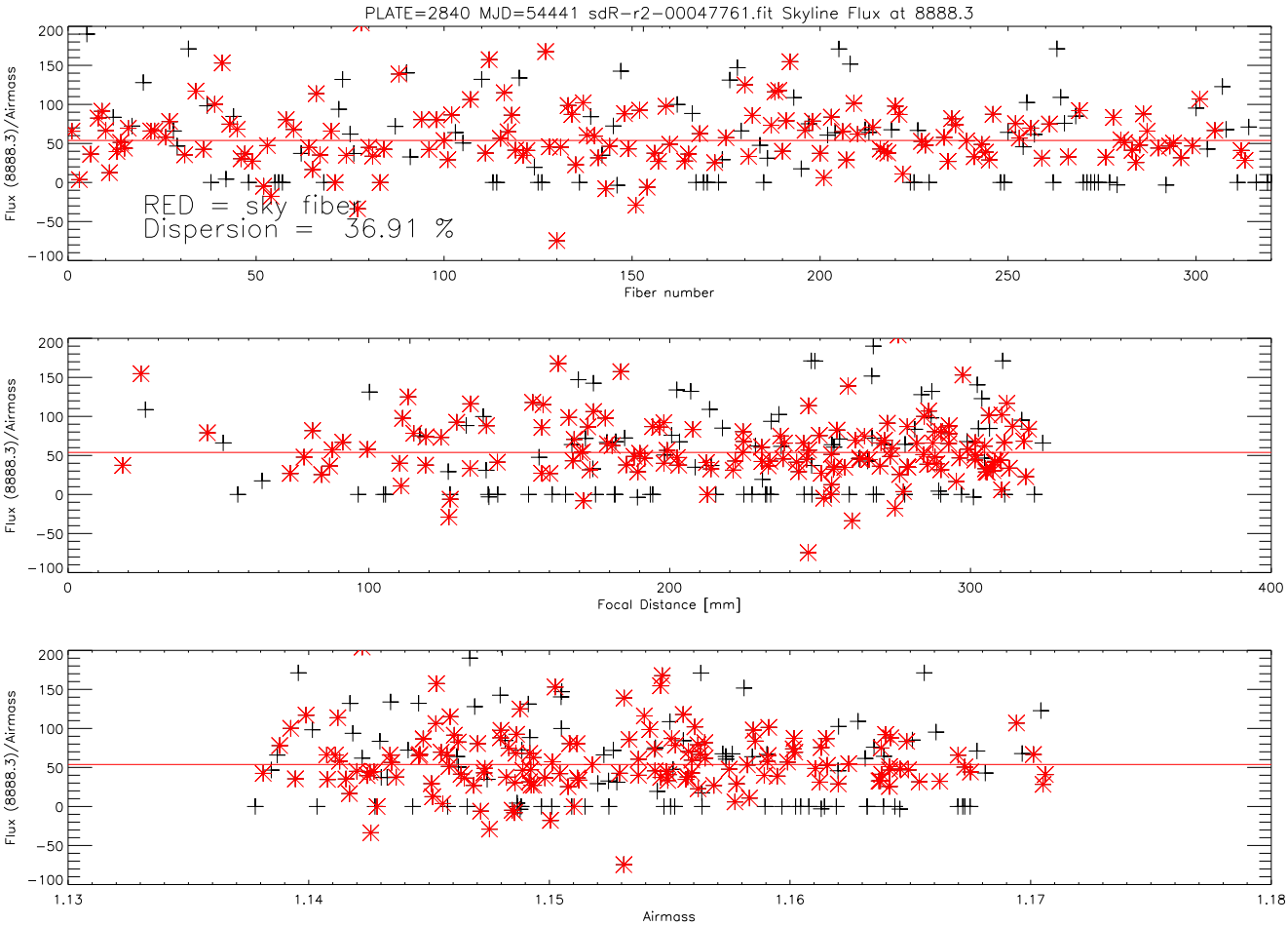

PLATE=2840 MJD=54441 sdR-r2-00047761.fit 2D Sky-subtraction Sky Fibers
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

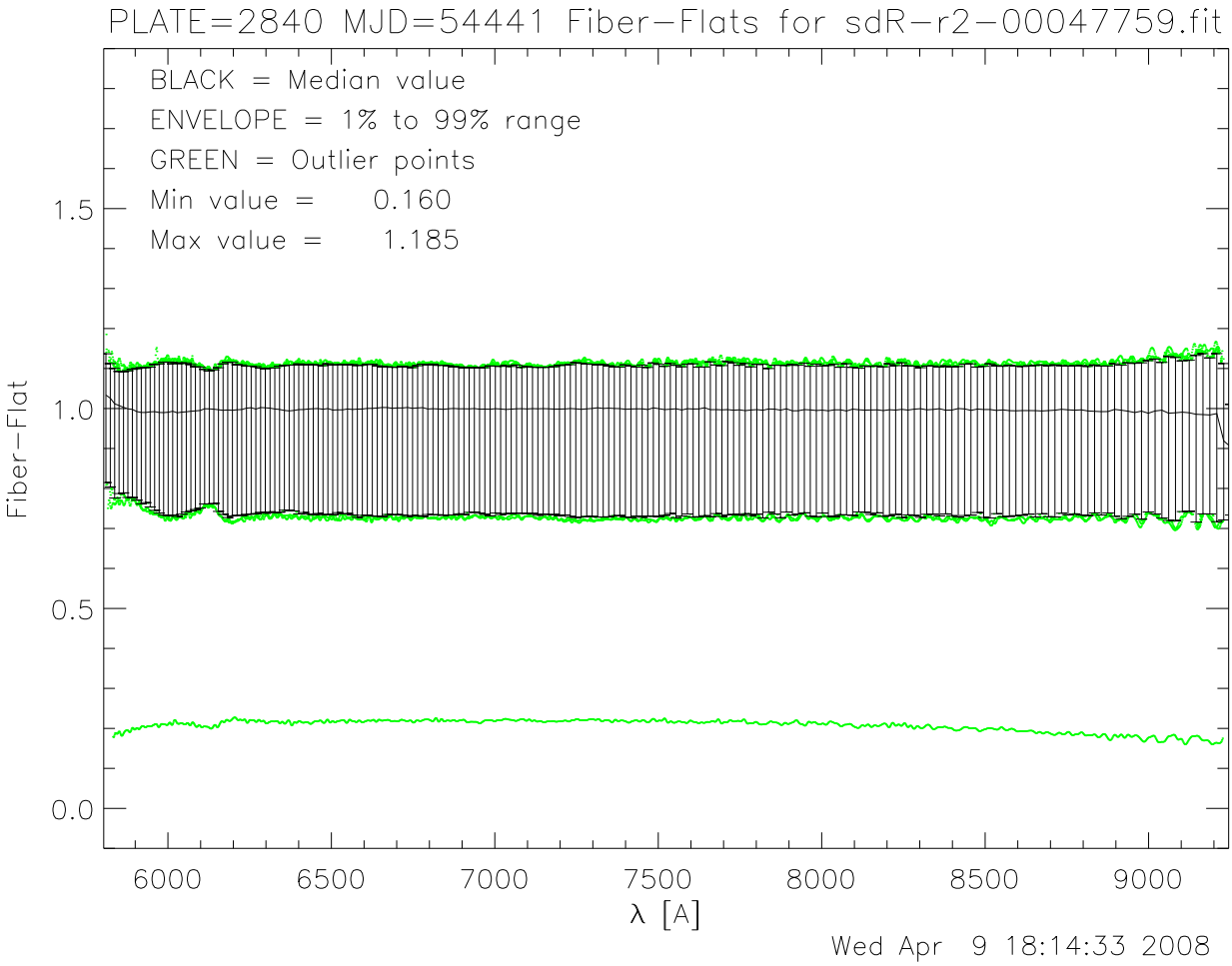

PLATE=2840 MJD=54441 sdR-r2-00047761.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

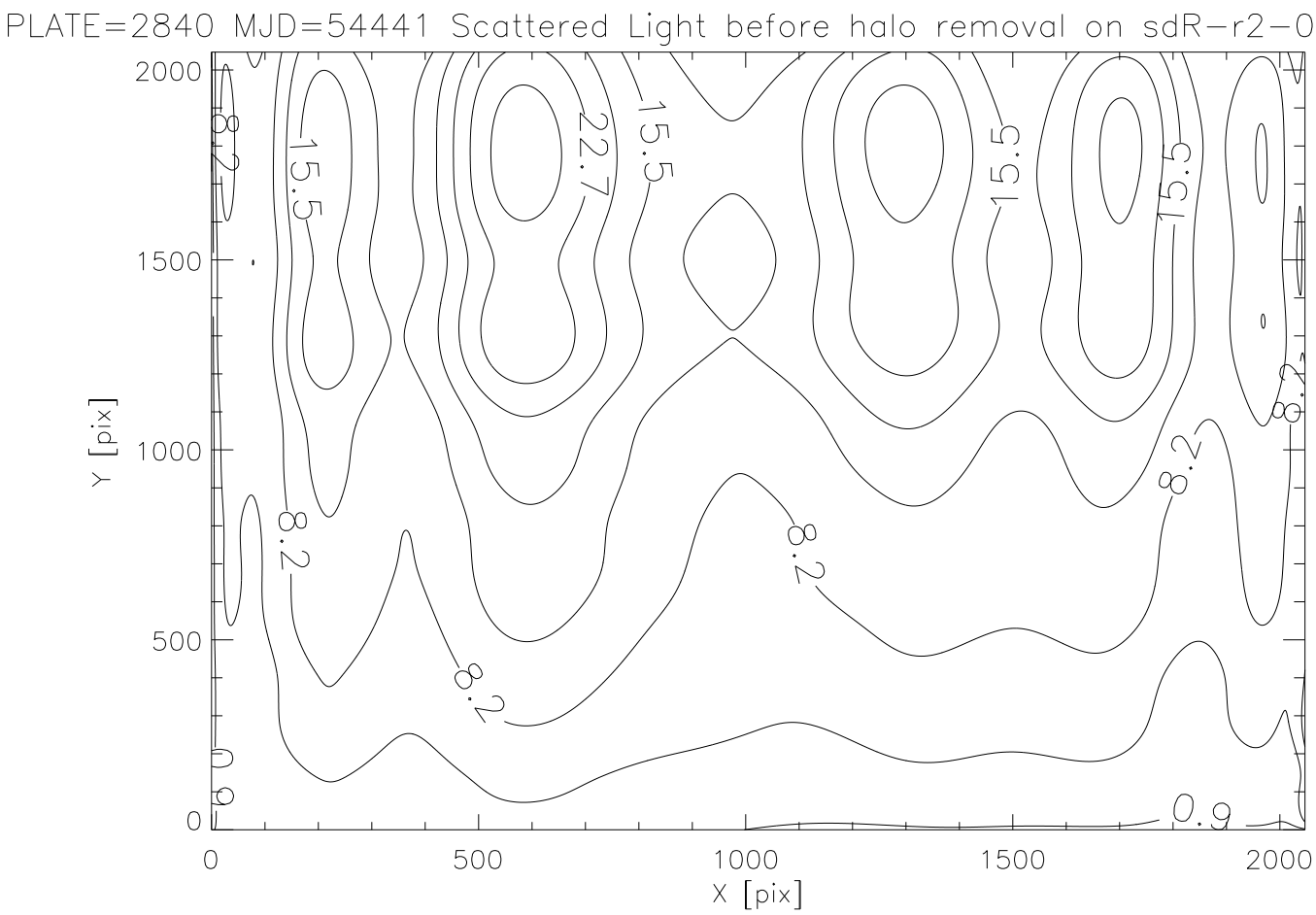

PLATE=2840 MJD=54441 sdR-r2-00047761.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

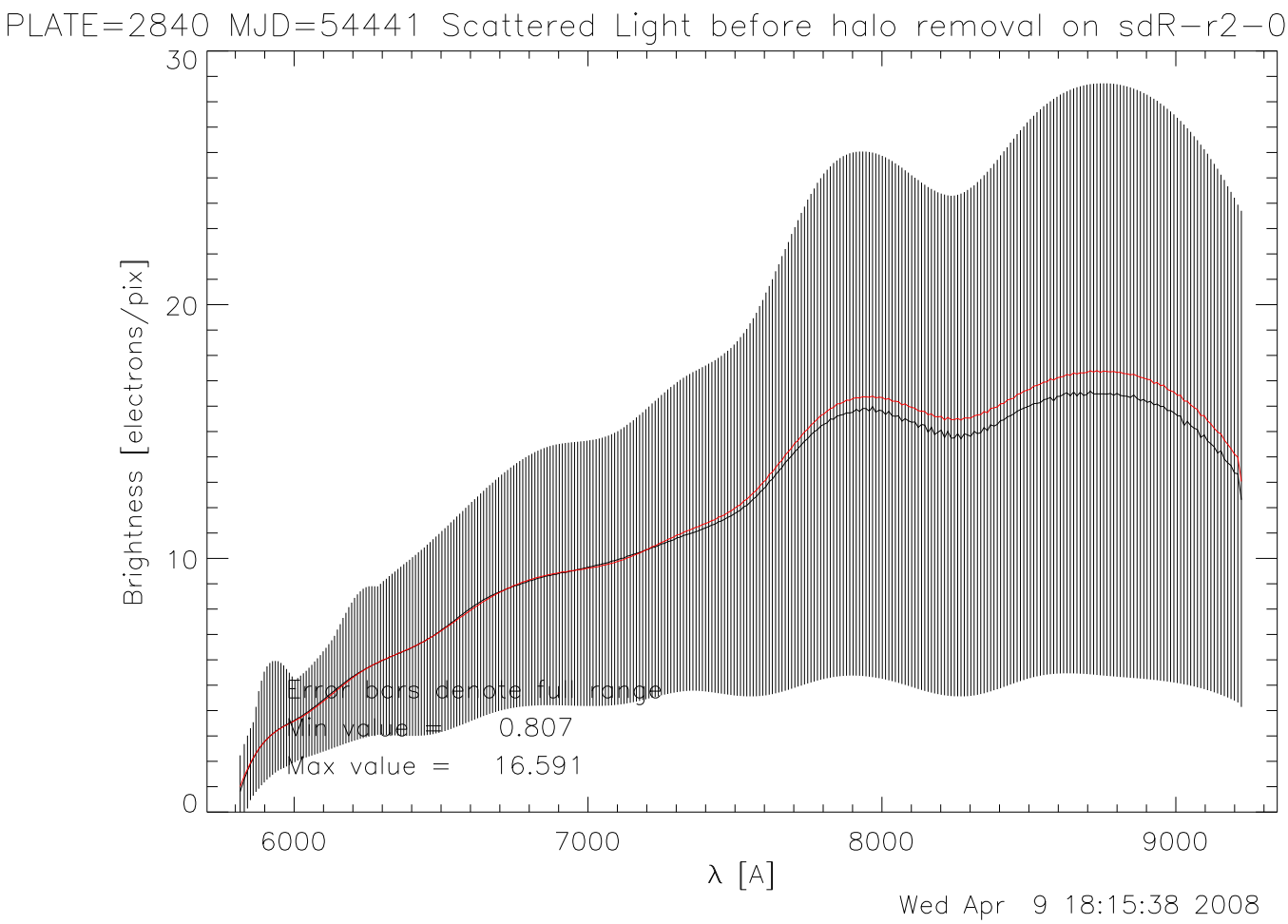

Number of sky fibers = 177
PLATE=2840 MJD=54441 sdR-r2-00047761.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

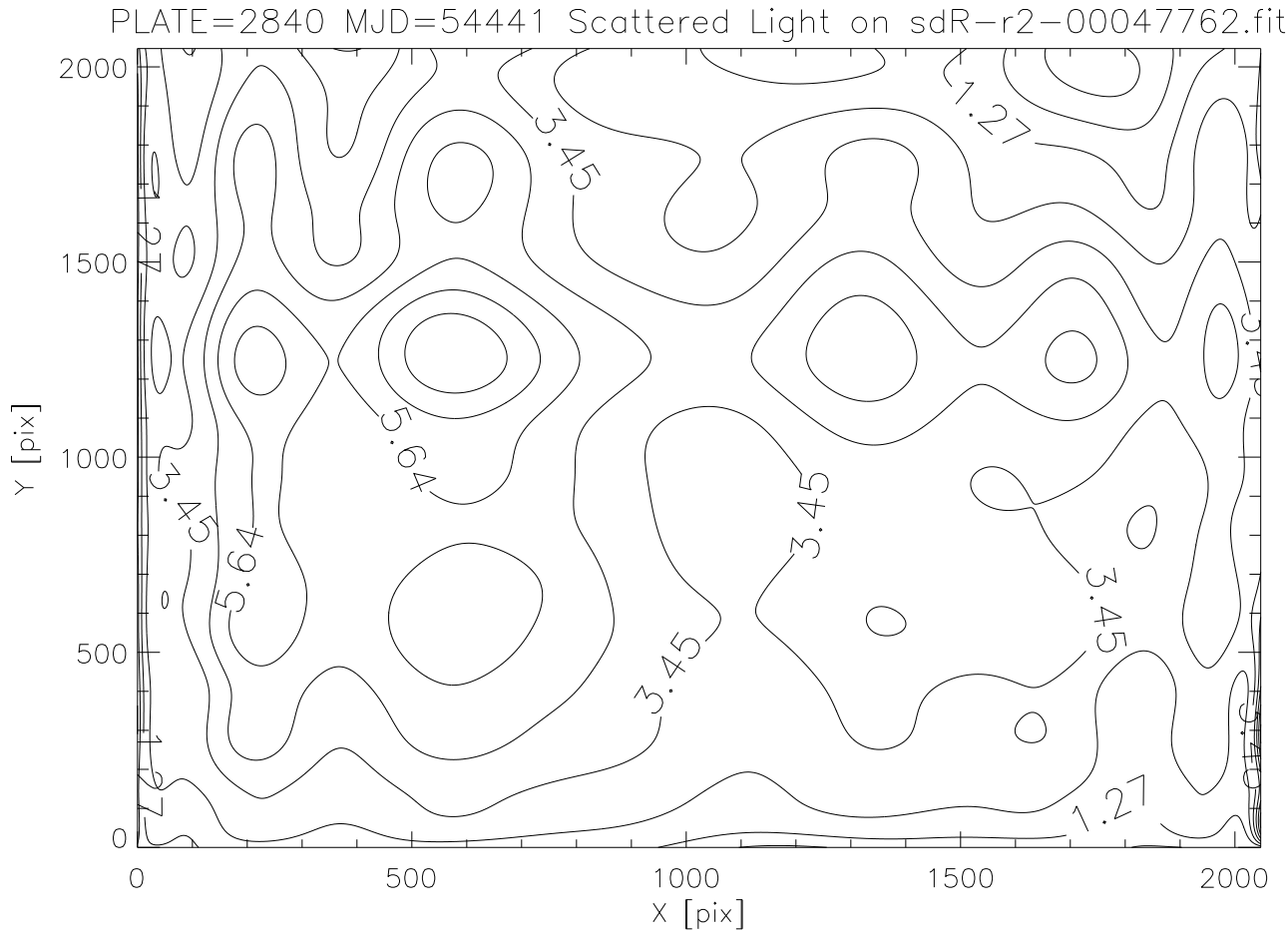

PLATE=2840 MJD=54441 sdR-r2-00047761.fit Skyline Flux at 7343,0
Flux (7343.0)/Airmass
RED = sky fiber
Dispersion = 47.23 %
Fiber number
Flux (7343.0)/Airmass
Focal Distance [mm]
Flux (7343.0)/Airmass
Airmass

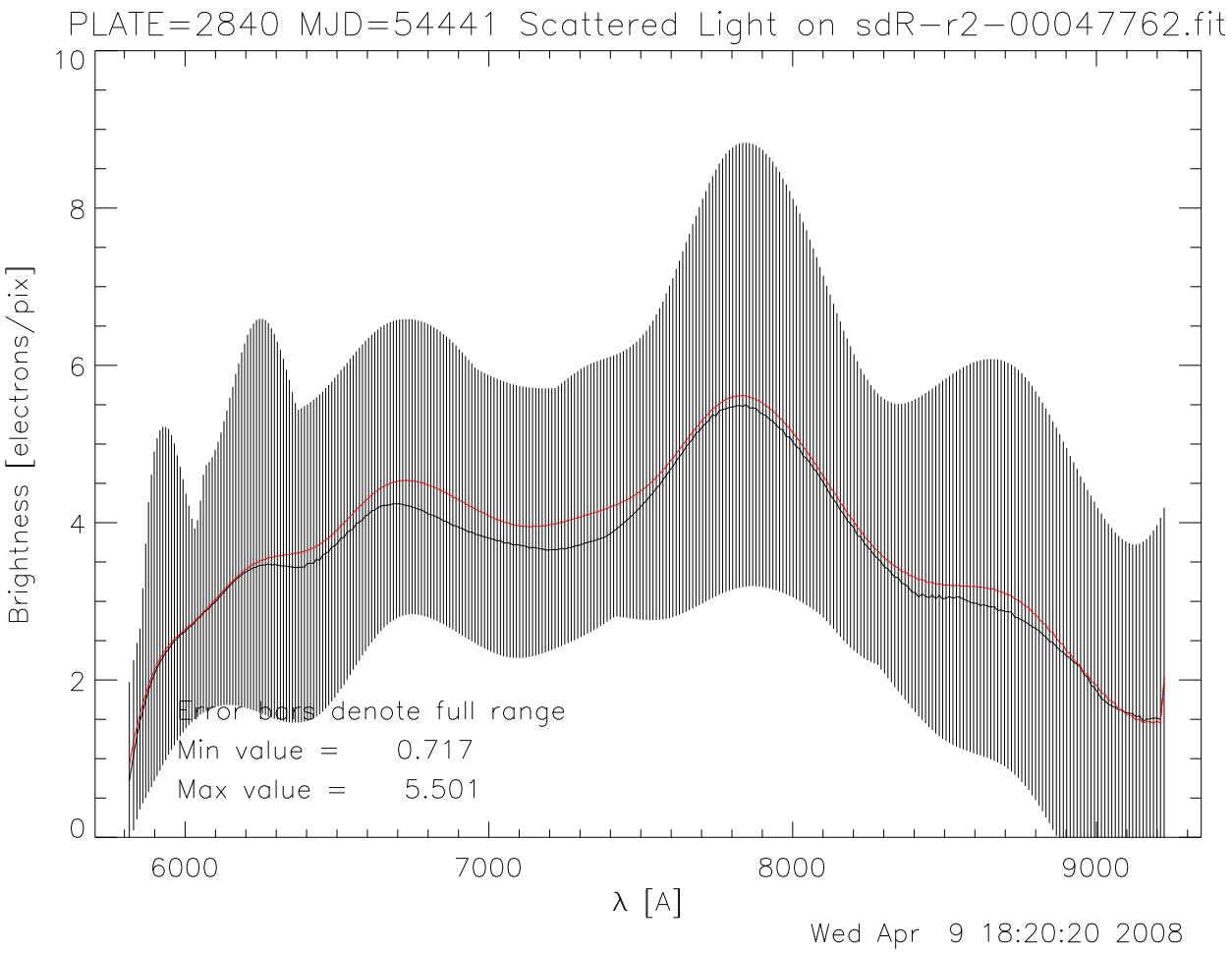

PLATE=2840 MJD=54441 sdR-r2-00047761.fit Skyline Flux at 8888.3
Flux (8888.3)/Airmass
RED = sky fiber
Dispersion = 36.91 %
Fiber number
Flux (8888.3)/Airmass
Focal Distance [mm]
Flux (8888.3)/Airmass
Airmass

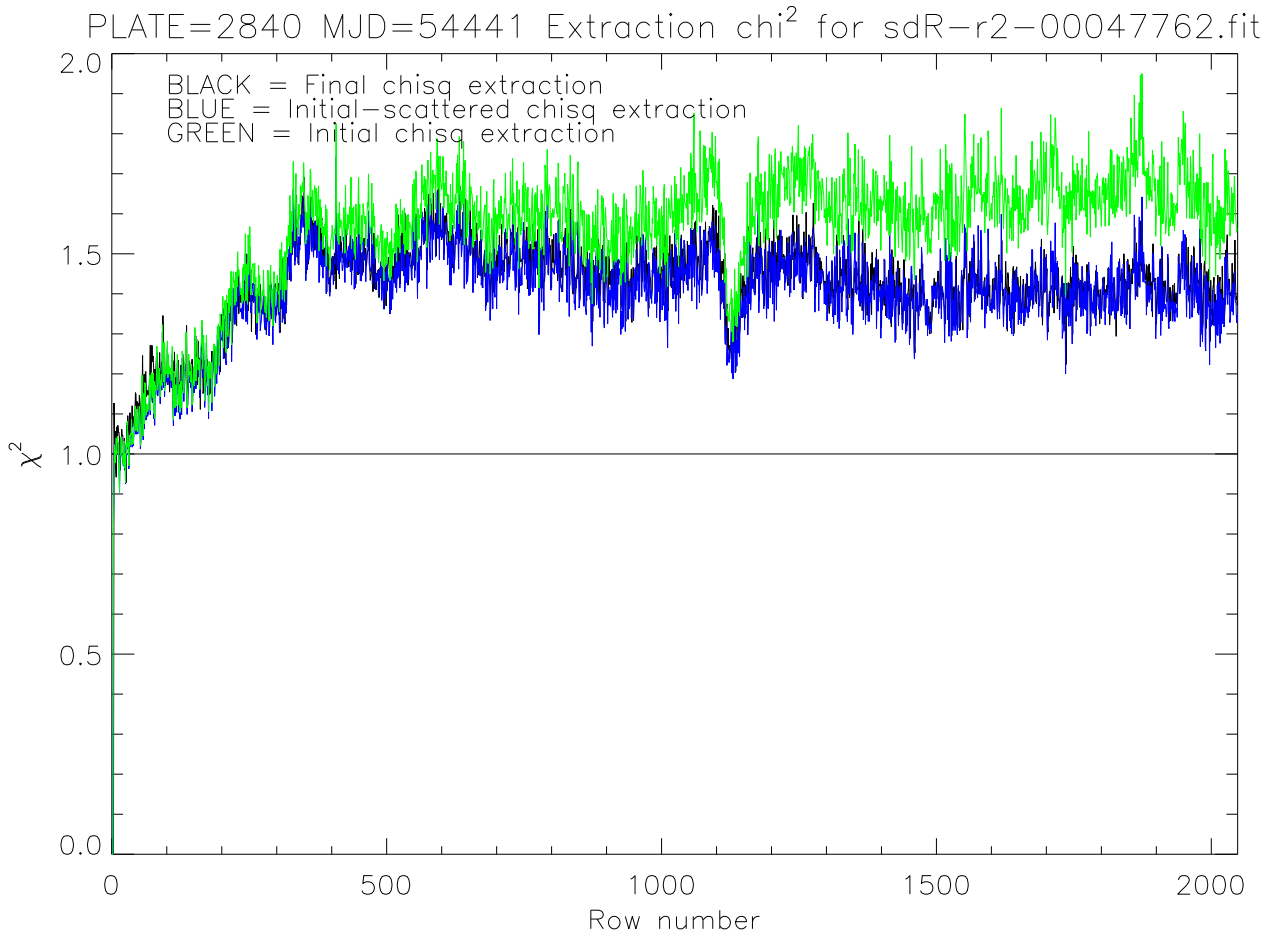

PLATE=2840 MJD=54441 Fiber-Flats for sdR-r2-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.160
Max value = 1.185
Fiber-Flat
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]
Wed Apr 9 18:14:33 2008

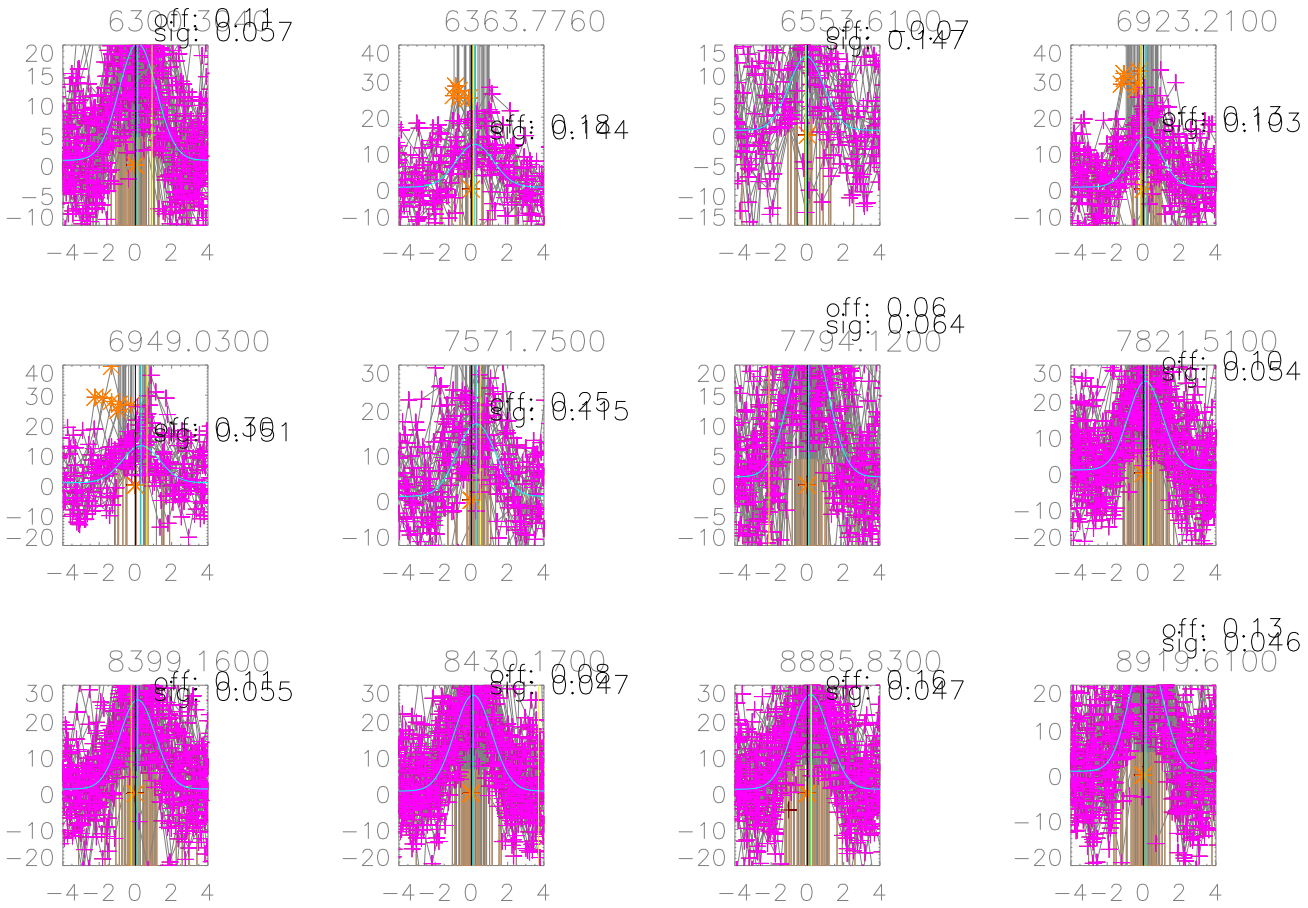

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r2-00047762.fi
Y [pix]
X [pix]
0
500
1000
1500
2000
22.7
15.5
8.2
0.9

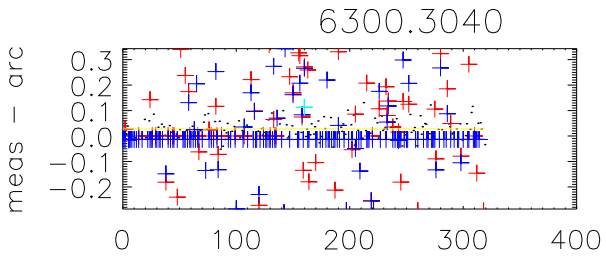

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r2-00047762.fi
Brightness [electrons/pix]
30
20
10
0
6000
7000
8000
9000
λ [A]
Error bars denote full range
Min value = 0.807
Max value = 16.591
Wed Apr 9 18:15:38 2008

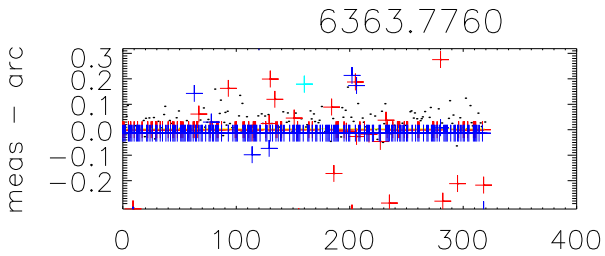

PLATE=2840 MJD=54441 Scattered Light on sdR-r2-00047762.fit
Y [pix]
X [pix]
0
500
1000
1500
2000
3.45
1.27
5.64
0

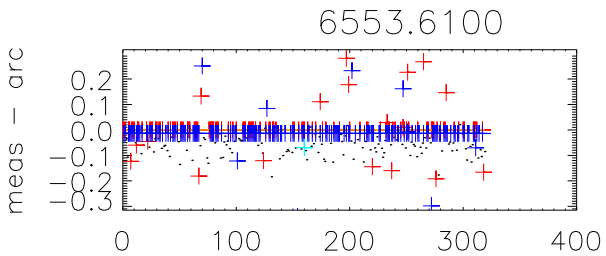

PLATE=2840 MJD=54441 Scattered Light on sdR-r2-00047762.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.717
Max value = 5.501
Wed Apr 9 18:20:20 2008

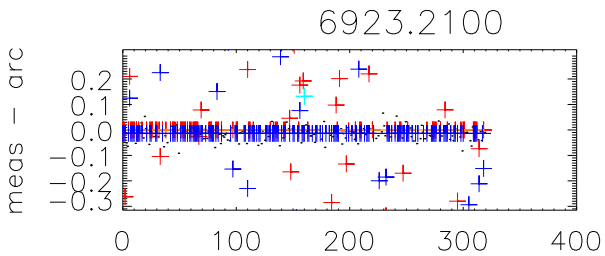

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-r2-00047762.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
2.0
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

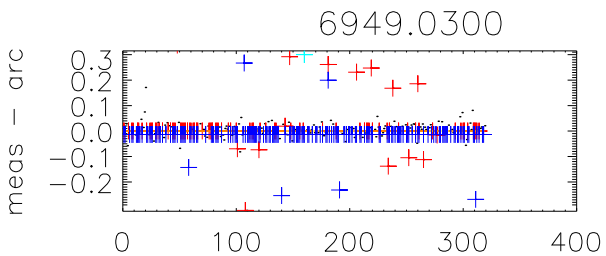

6300.3040
off: 0.41
sig: 0.057
6363.7760
off: 0.18
sig: 0.144
6553.6100
off: 0.07
sig: 0.147
6923.2100
off: 0.13
sig: 0.103
6949.0300
off: 0.36
sig: 0.151
7571.7500
off: 0.25
sig: 0.115
7794.1200
off: 0.06
sig: 0.064
7821.5100
off: 0.10
sig: 0.054
8399.1600
off: 0.11
sig: 0.055
8430.1700
off: 0.08
sig: 0.047
8885.8300
off: 0.16
sig: 0.047
8919.6100
off: 0.13
sig: 0.046

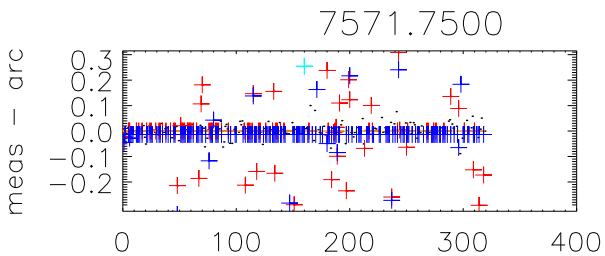

6300.3040
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

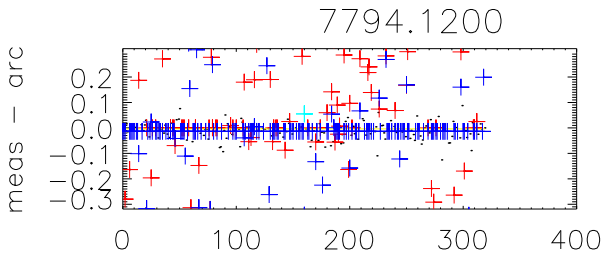

6363.7760
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

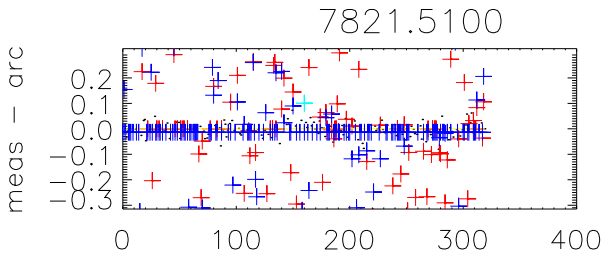

6553.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

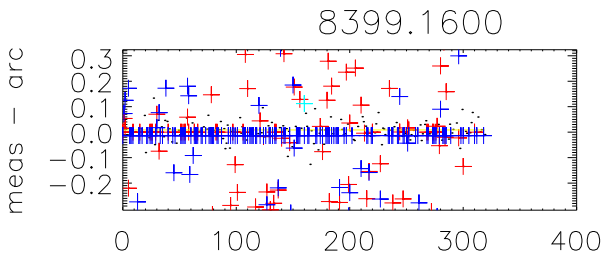

6923.2100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

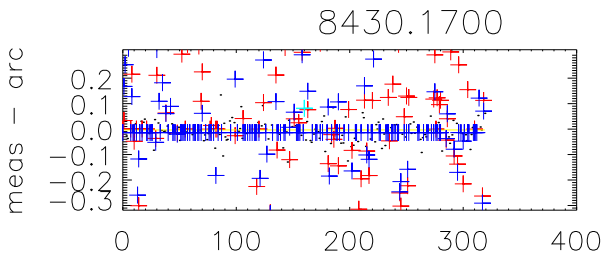

6949.0300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

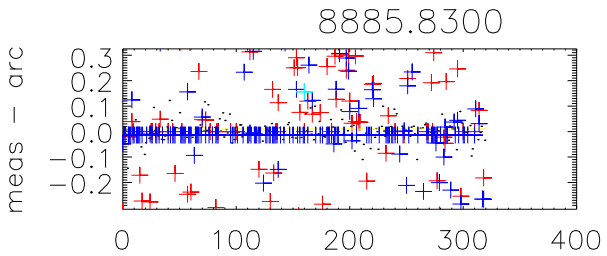

7571.7500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

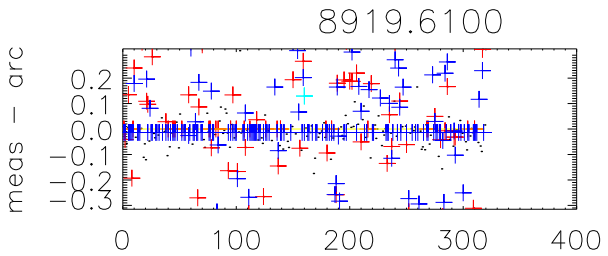

7794.1200
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

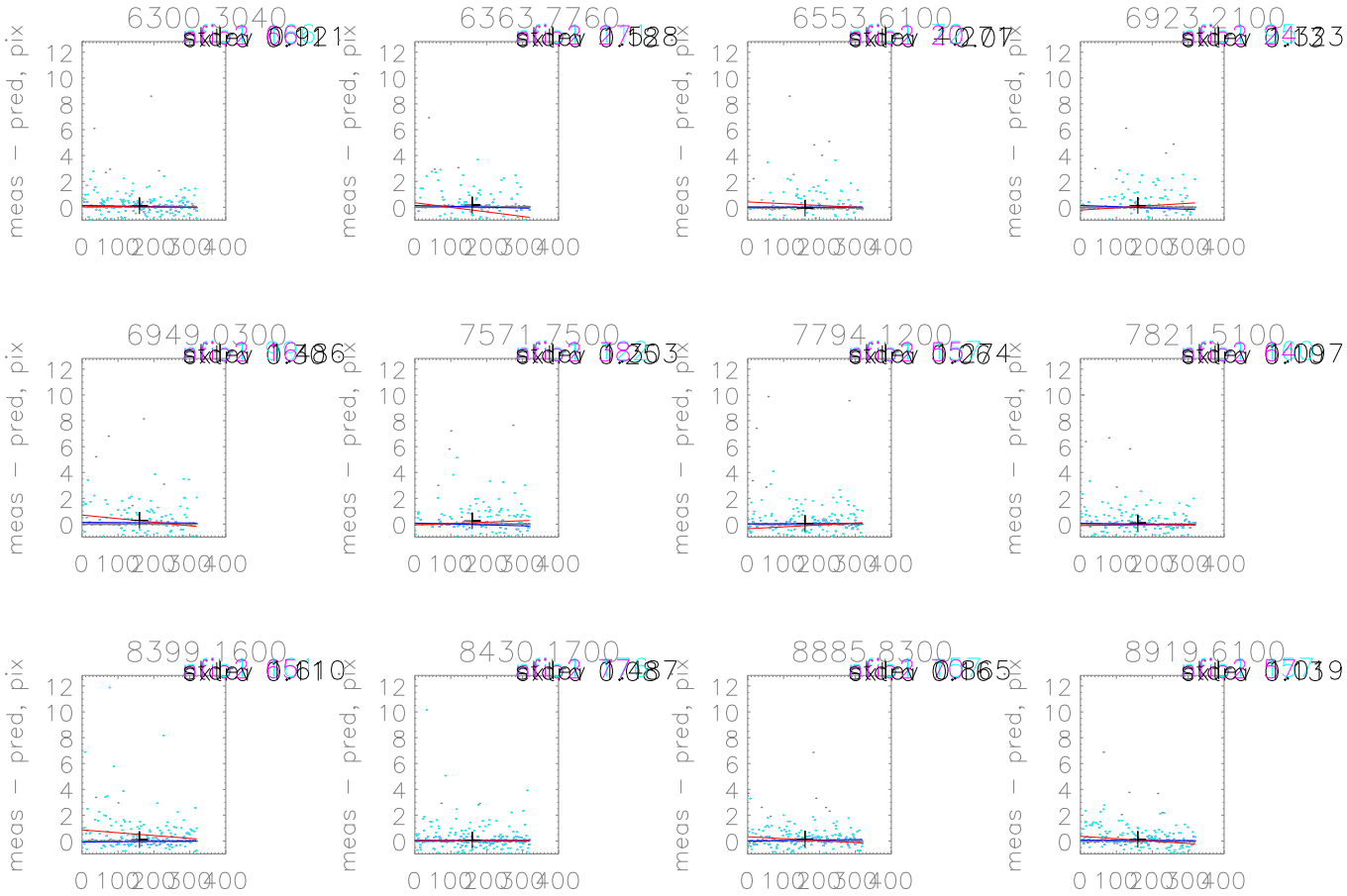

7821.5100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

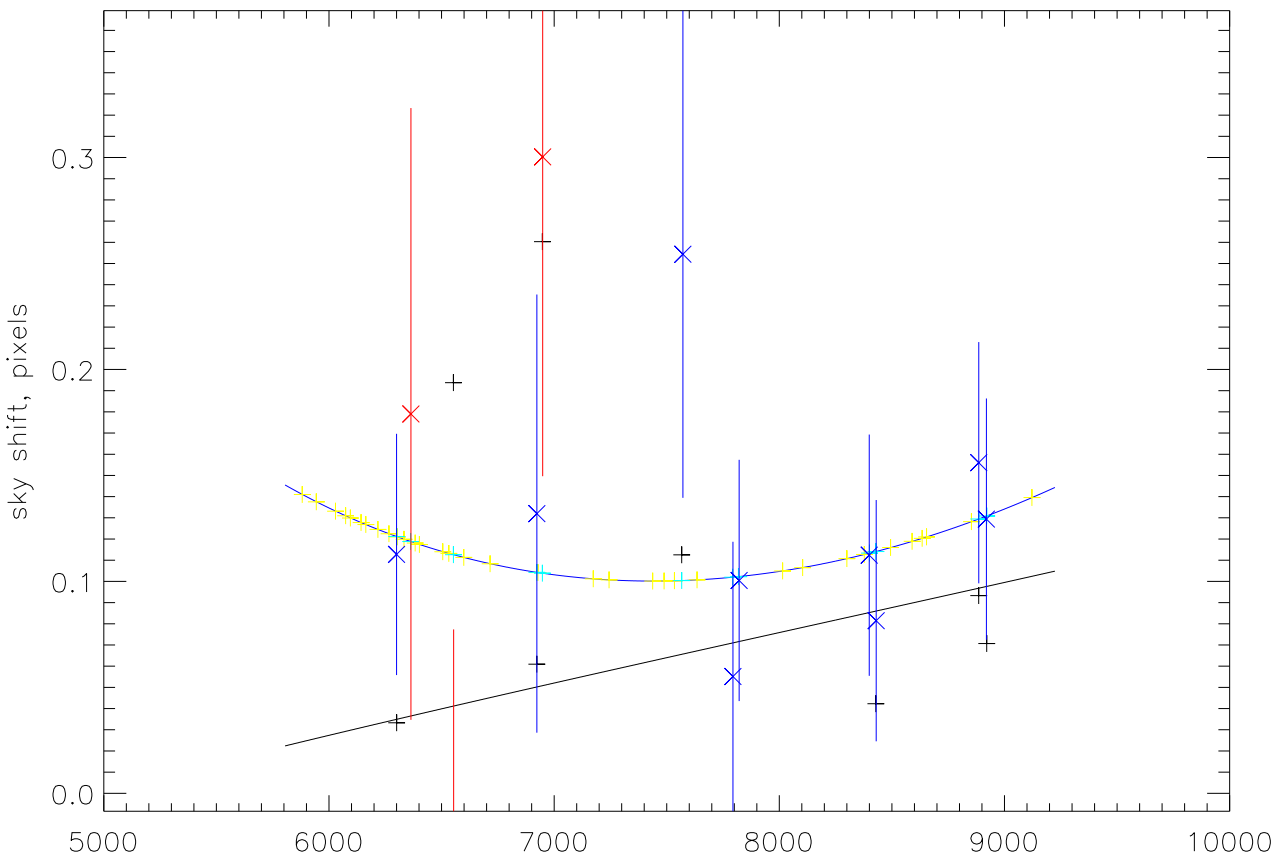

8399.1600
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

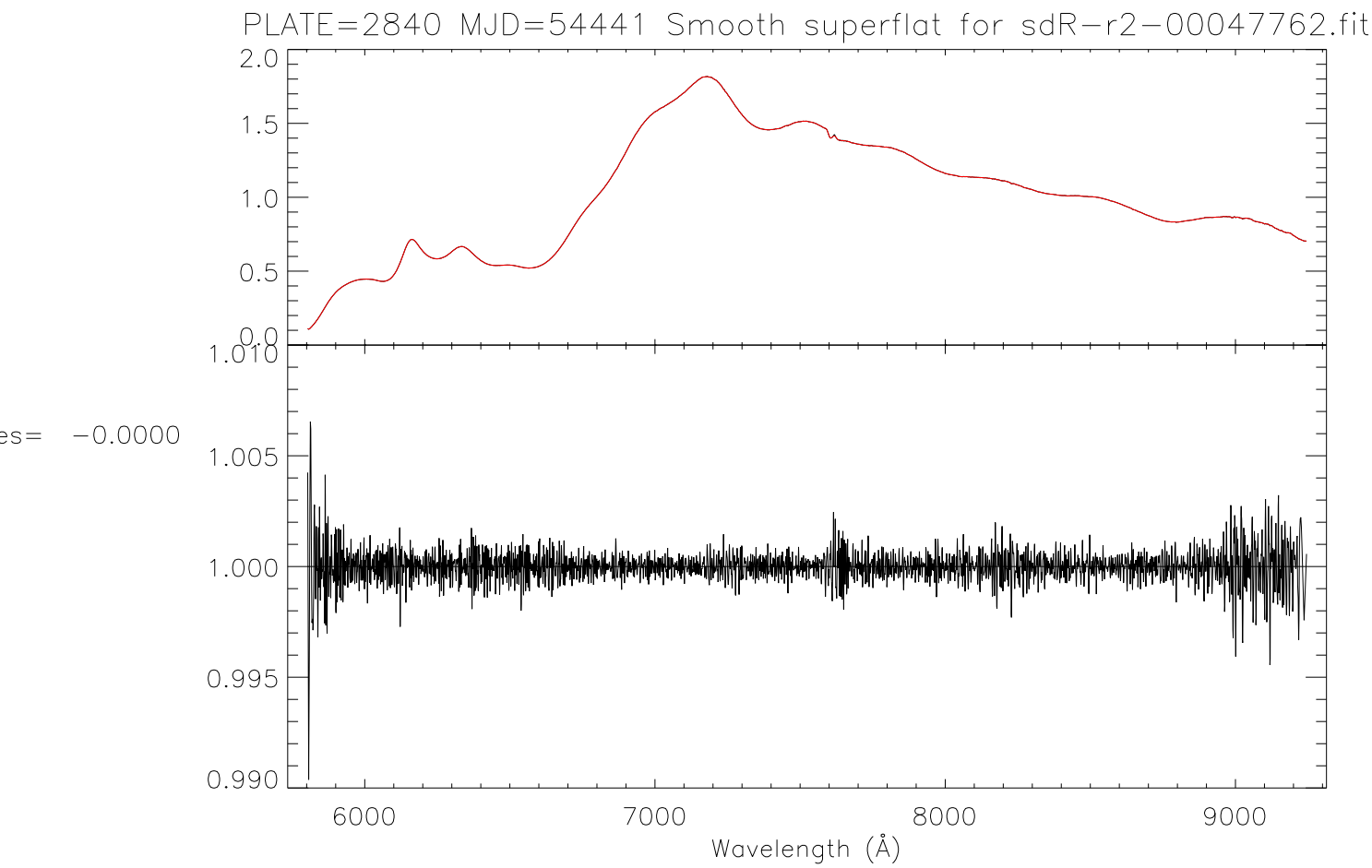

8430.1700
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400


8885.8300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

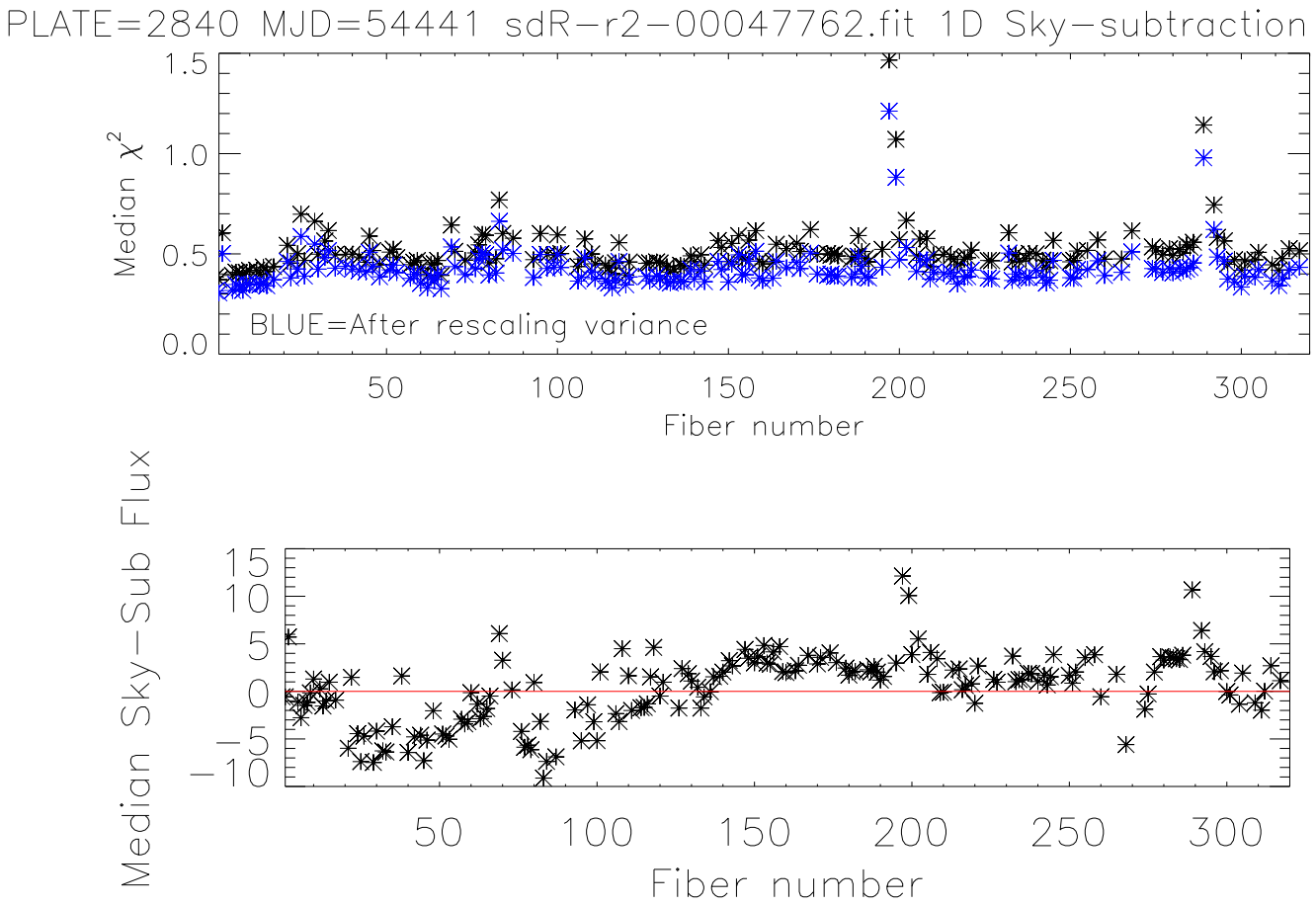

8919.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

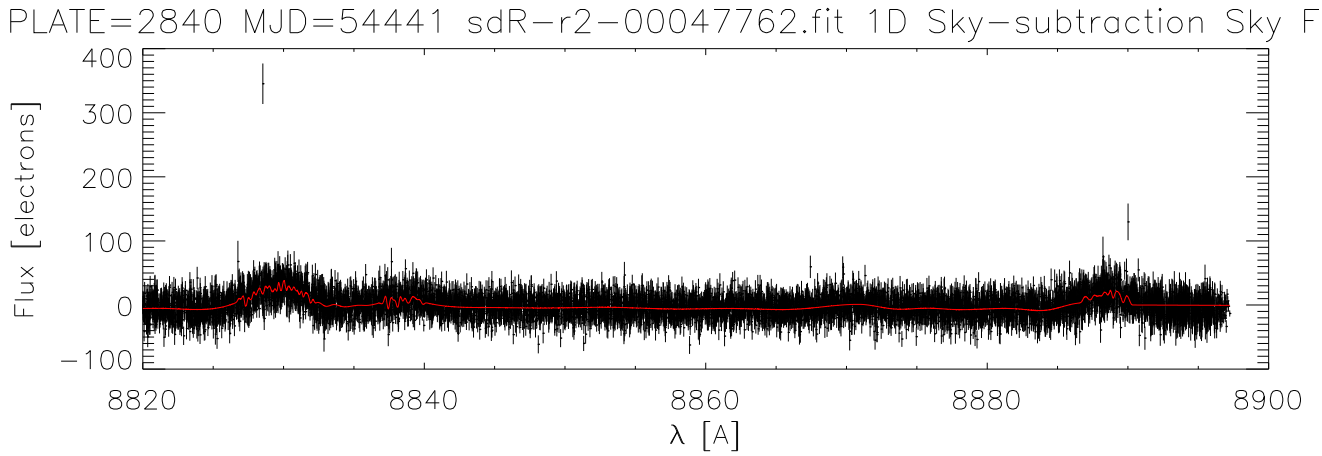

6300.3040
stddev 0.921
6363.7760
stddev 1.528
6553.6100
stddev 1.207
6923.2100
stddev 0.523
6949.0300
stddev 1.486
7571.7500
stddev 1.203
7794.1200
stddev 1.274
7821.5100
stddev 1.097
8399.1600
stddev 1.610
8430.1700
stddev 1.487
8885.8300
stddev 0.865
8919.6100
stddev 1.039
meas − pred, pix
0 100 200 300 400
0 2 4 6 8 10 12

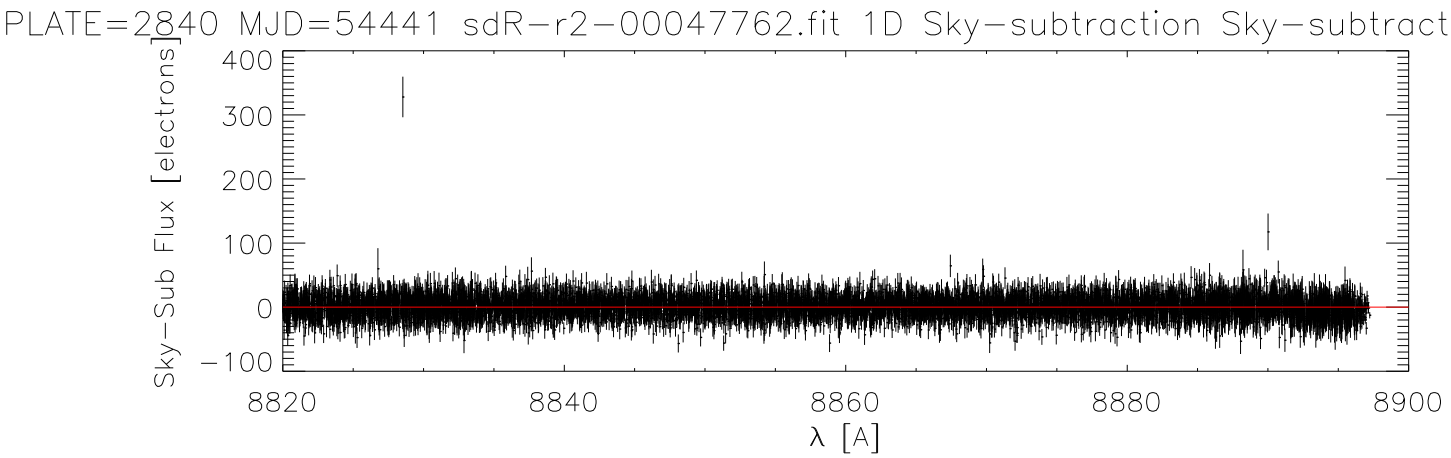

sky shift, pixels
0.0
0.1
0.2
0.3
5000
6000
7000
8000
9000
10000

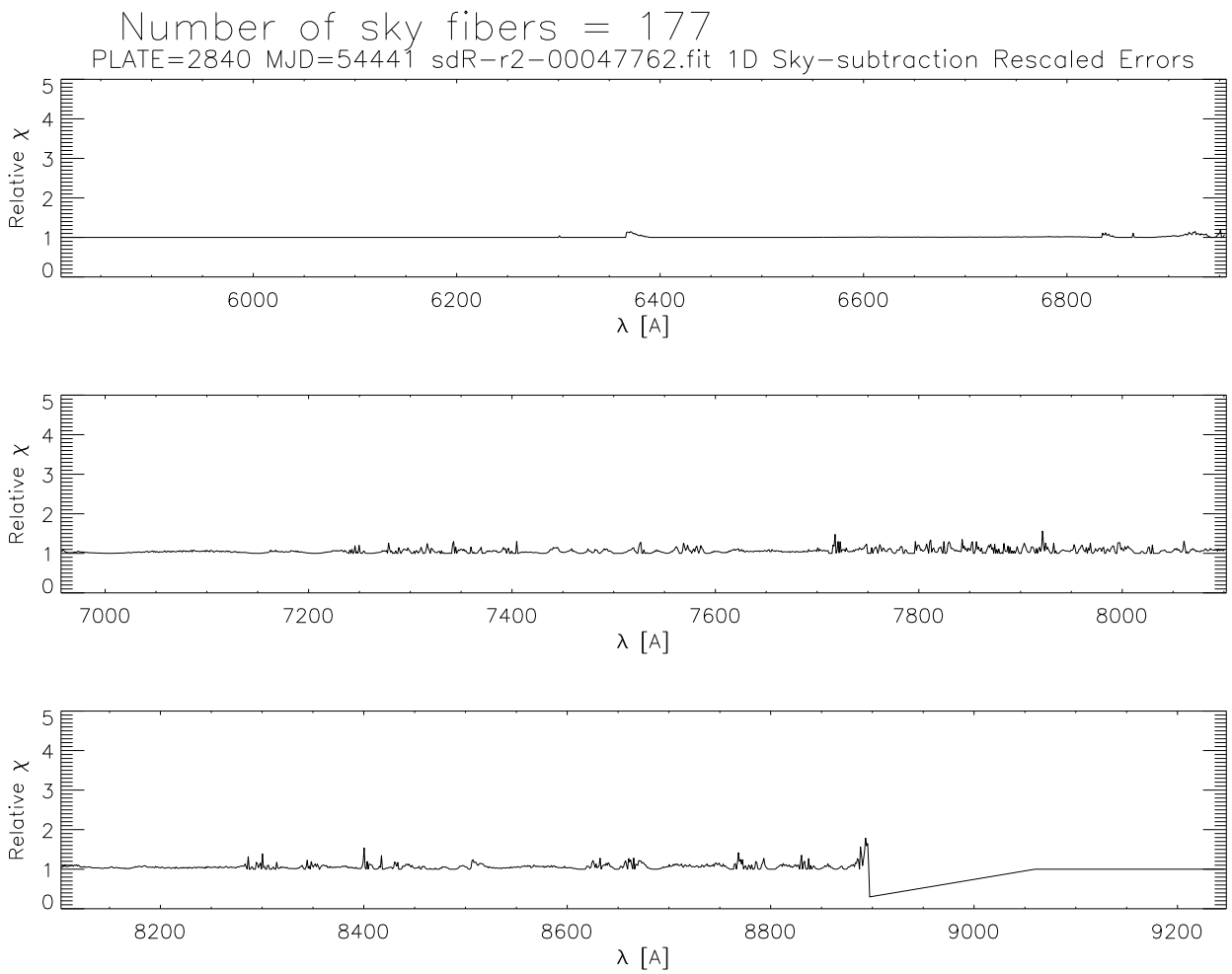

PLATE=2840 MJD=54441 Smooth superflat for sdR-r2-00047762.fit
2.0
1.5
1.0
0.5
0.0
1.010
1.005
1.000
0.995
0.990
6000
7000
8000
9000
Wavelength (Å)

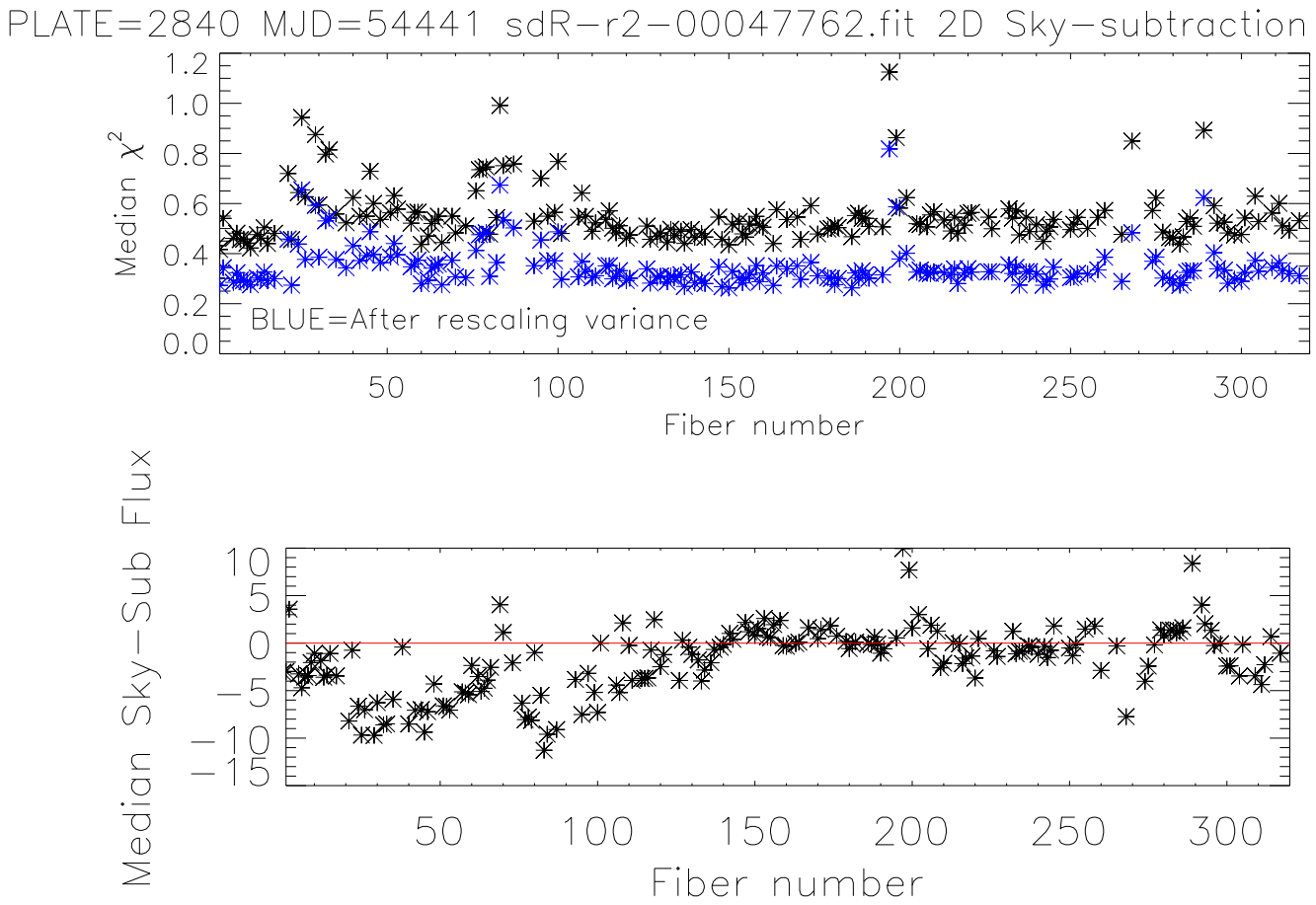
es= −0.0000

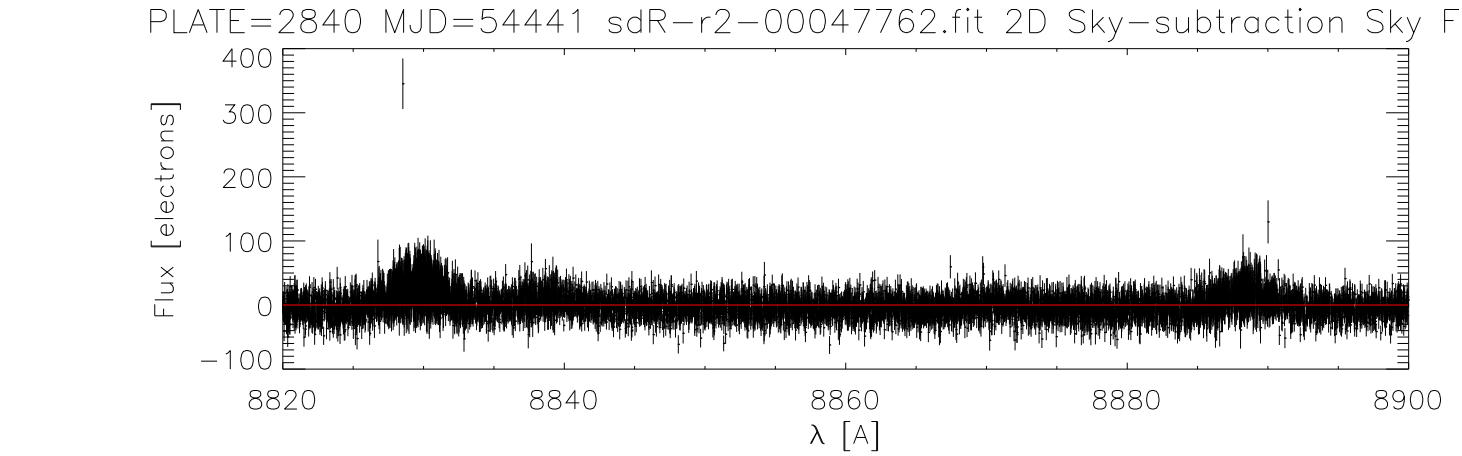

PLATE=2840 MJD=54441 sdR-r2-00047762.fit 1D Sky-subtraction Sky Fibers
Median χ^2
1.5
1.0
0.5
0.0
BLUE=After rescaling variance
50
100
150
200
250
300
Fiber number
Median Sky-Sub Flux
15
10
5
0
-5
-10
50
100
150
200
250
300
Fiber number

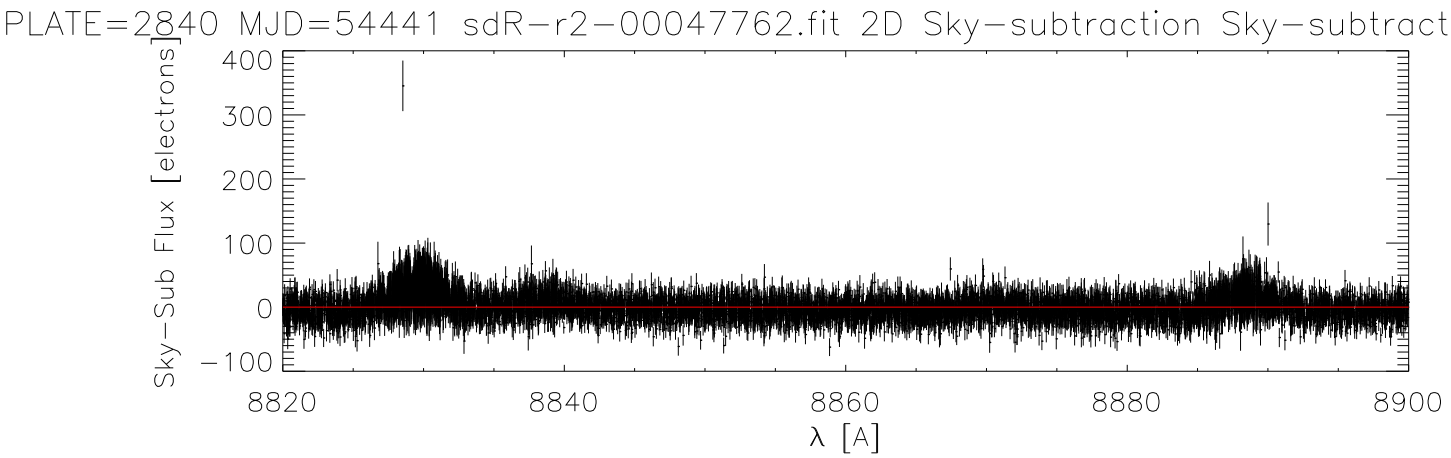

PLATE=2840 MJD=54441 sdR-r2-00047762.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
400
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

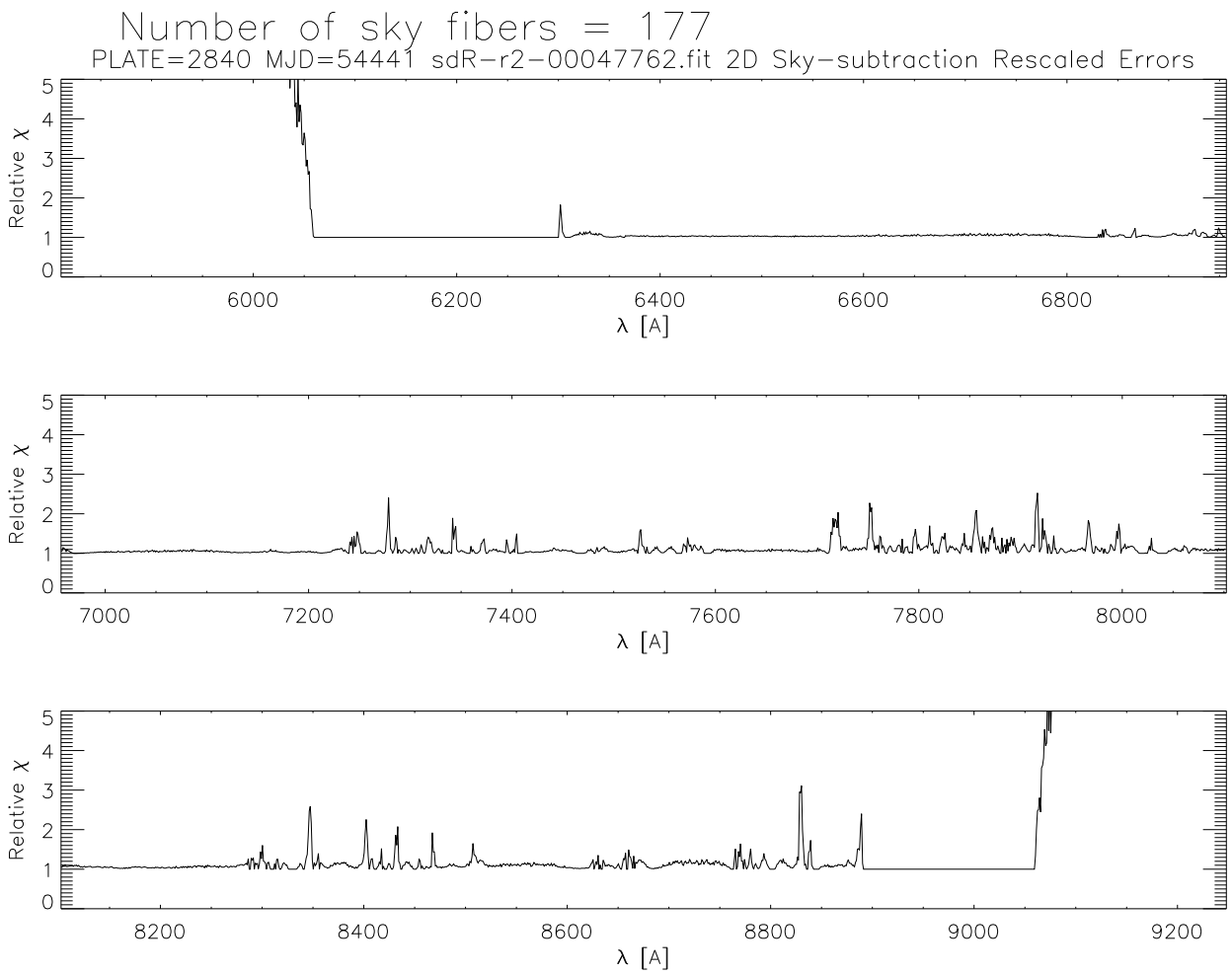

PLATE=2840 MJD=54441 sdR-r2-00047762.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
400
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

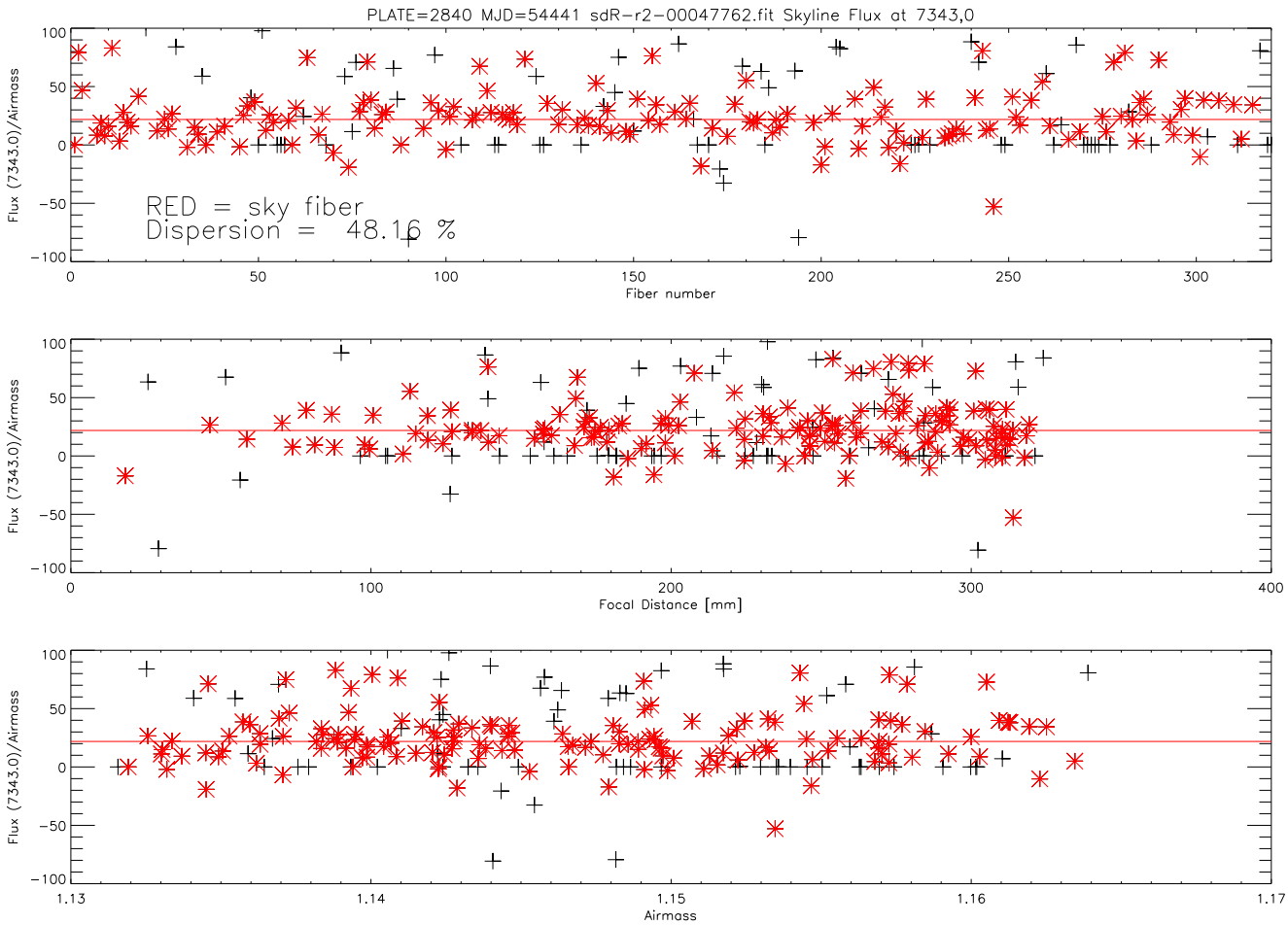

Number of sky fibers = 177
PLATE=2840 MJD=54441 sdR-r2-00047762.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

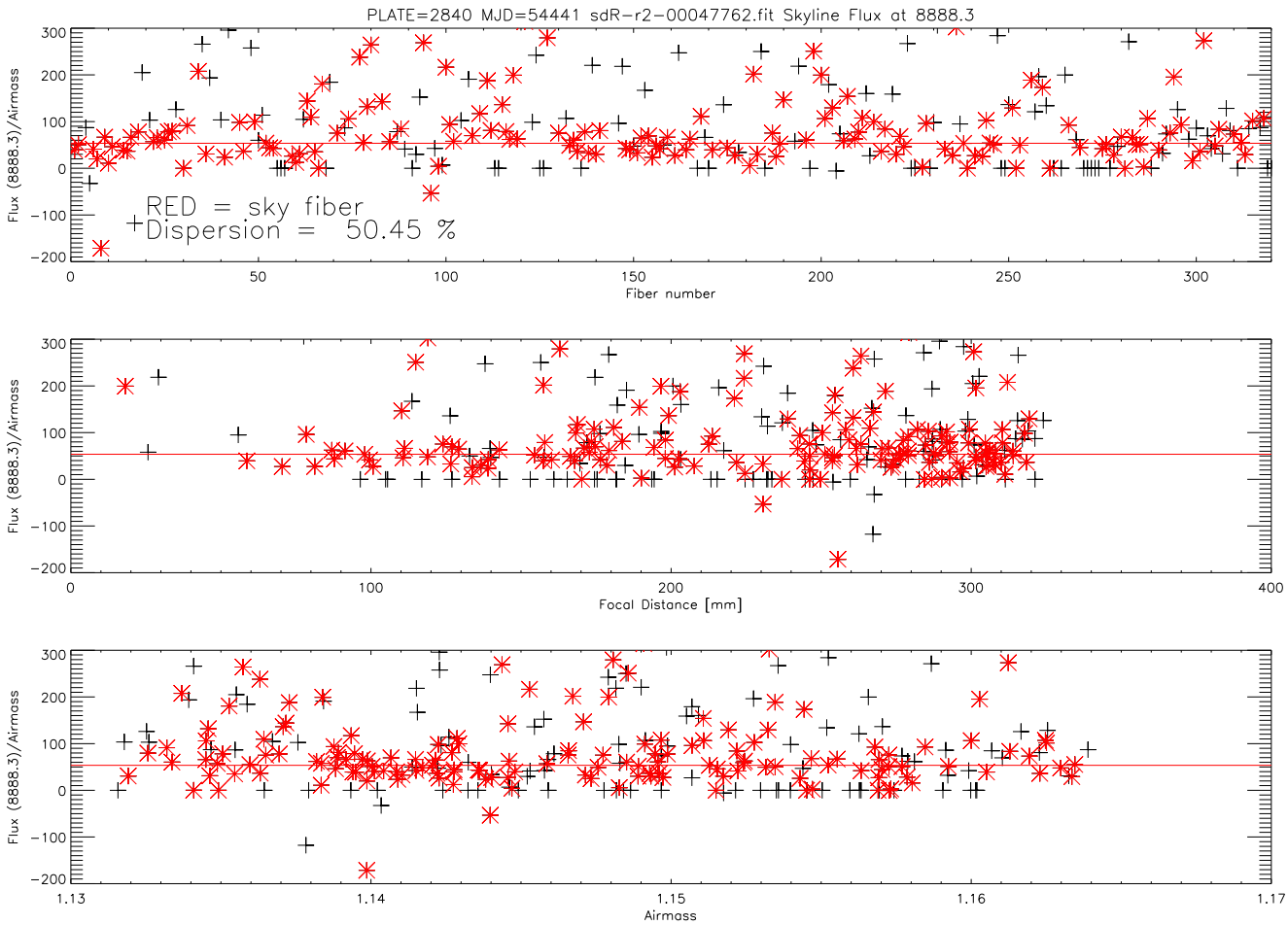

PLATE=2840 MJD=54441 sdR-r2-00047762.fit 2D Sky-subtraction Sky Fibers
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

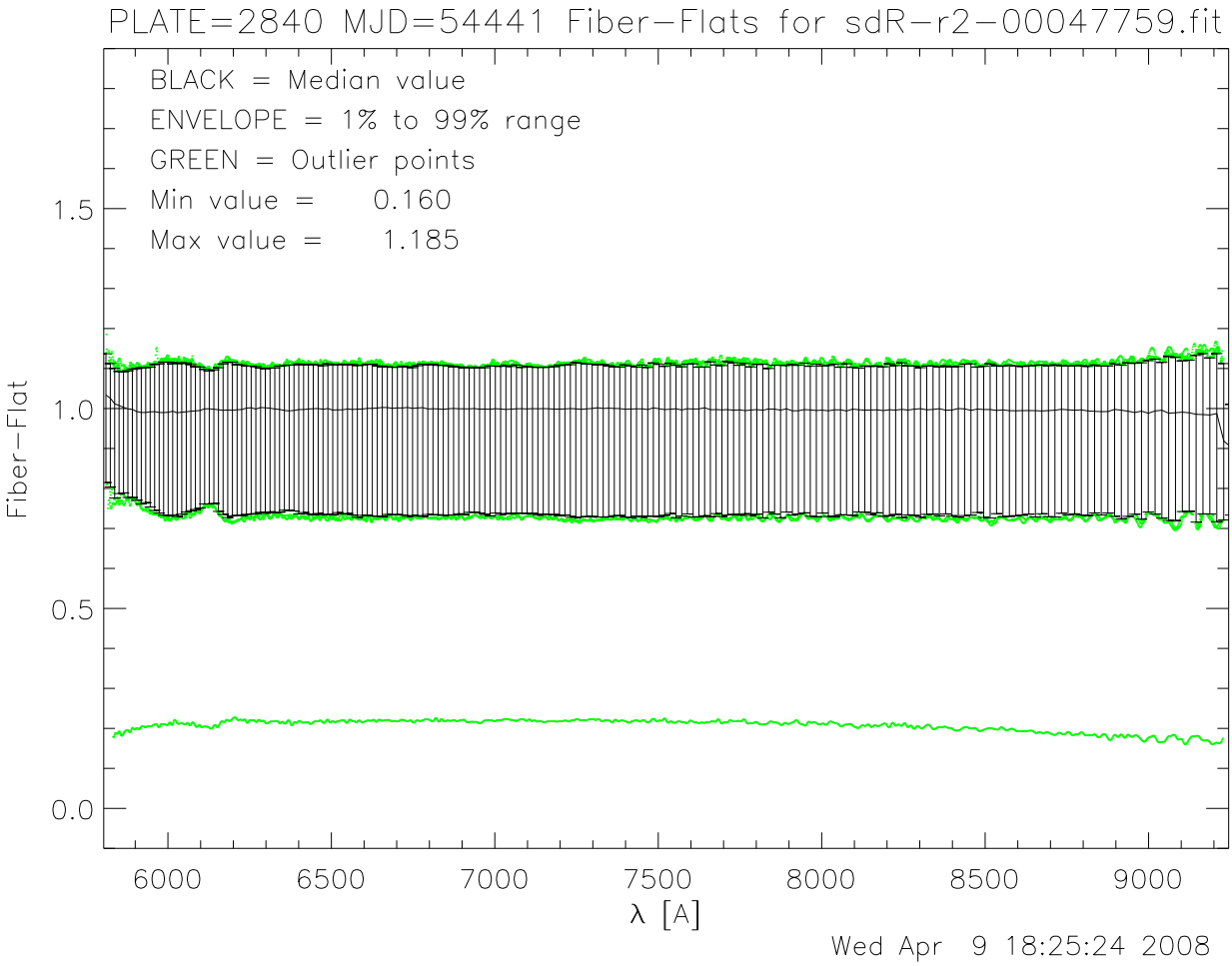

PLATE=2840 MJD=54441 sdR-r2-00047762.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
400
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

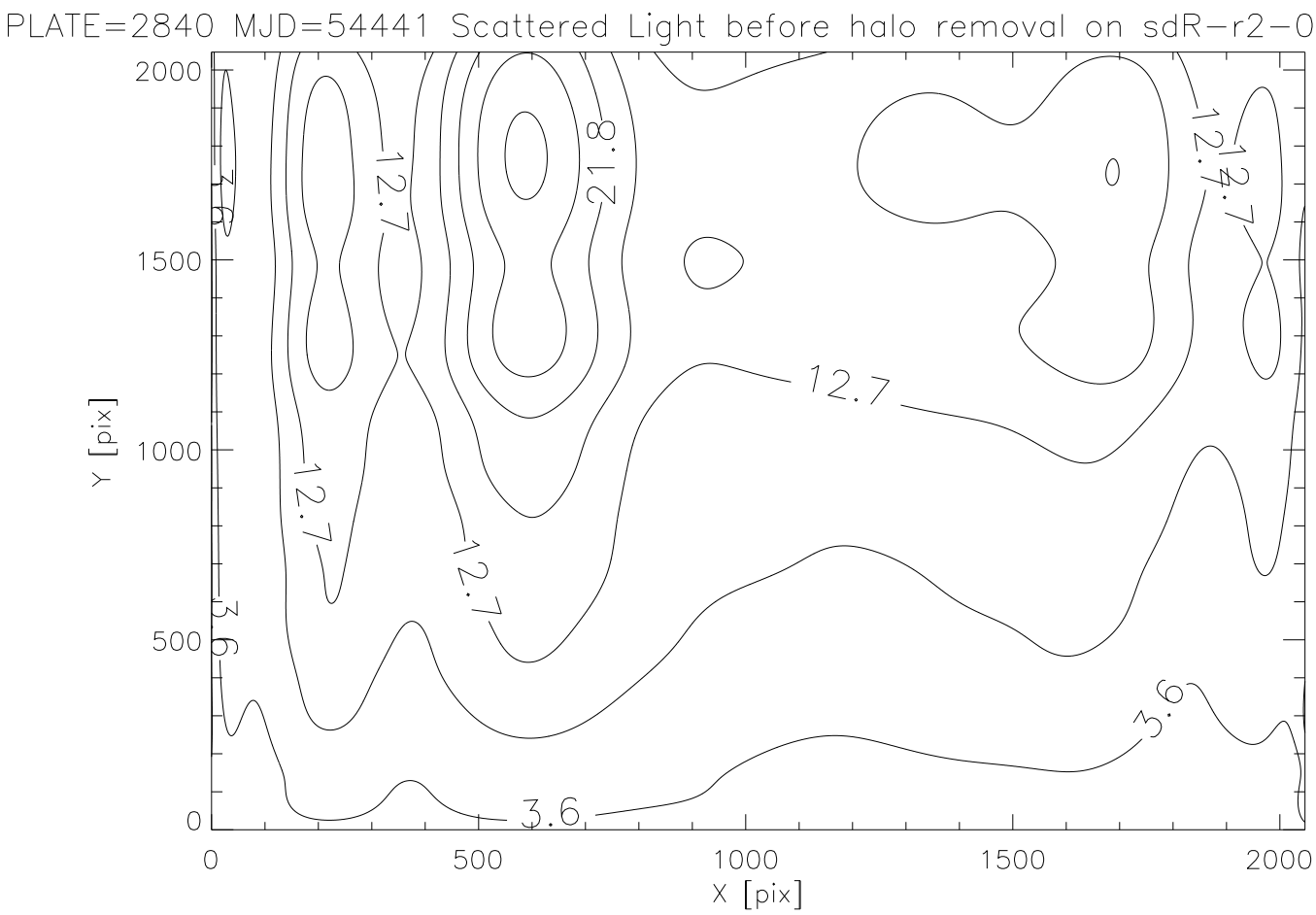

PLATE=2840 MJD=54441 sdR-r2-00047762.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
400
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

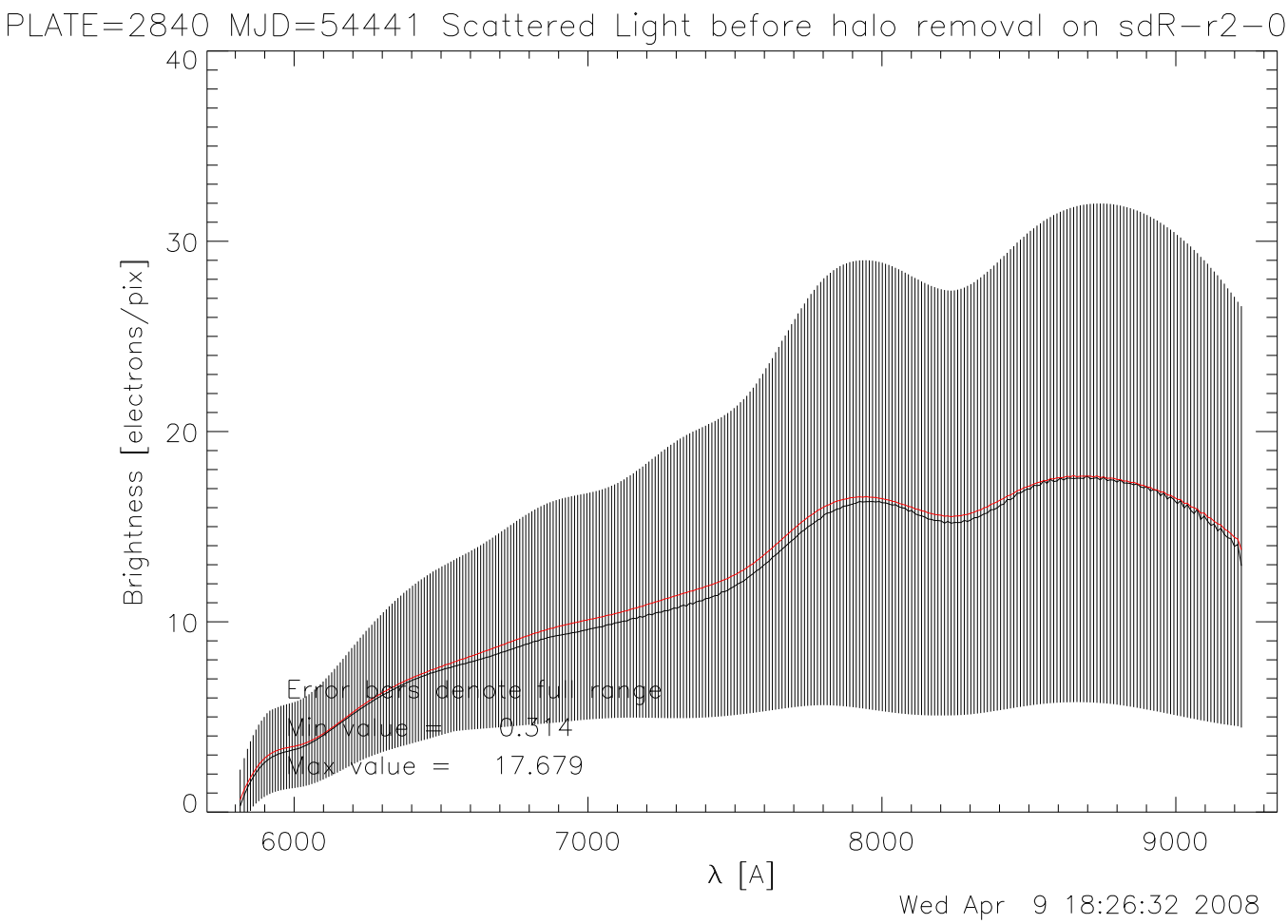

Number of sky fibers = 177
PLATE=2840 MJD=54441 sdR-r2-00047762.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

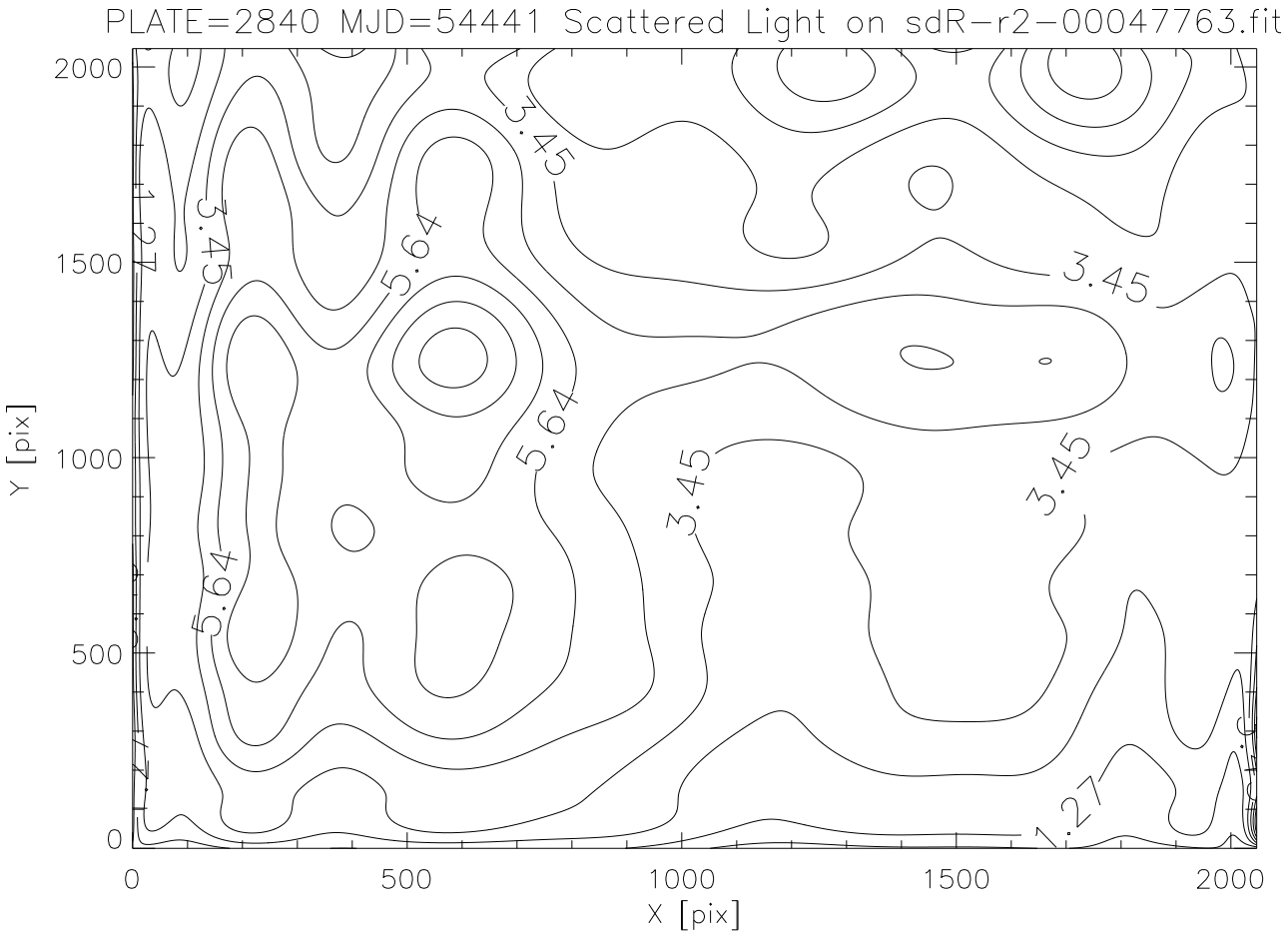

PLATE=2840 MJD=54441 sdR-r2-00047762.fit Skyline Flux at 7343,0
Flux (7343.0)/Airmass
RED = sky fiber
Dispersion = 48.16 %
Fiber number
Flux (7343.0)/Airmass
Focal Distance [mm]
Flux (7343.0)/Airmass
Airmass

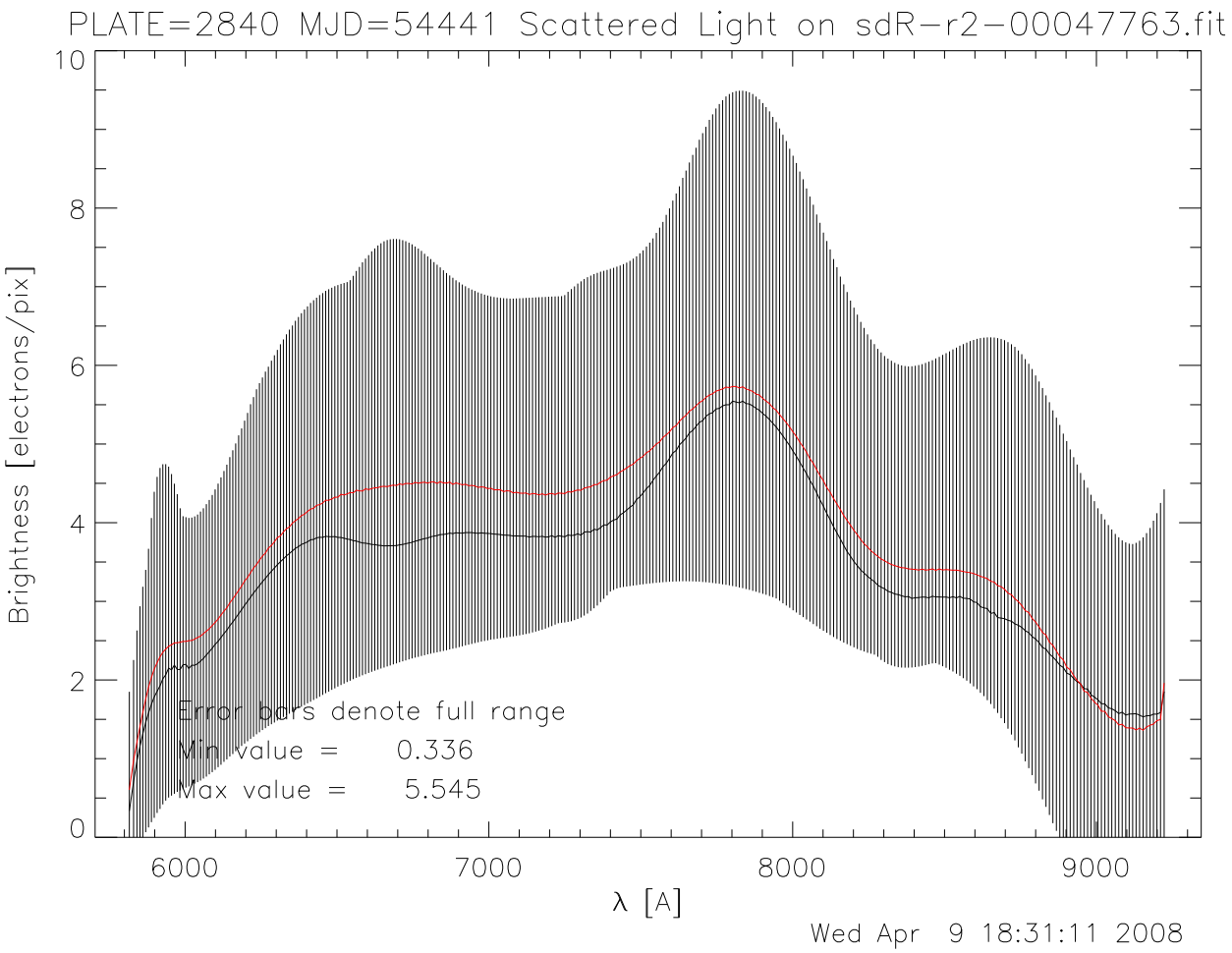

PLATE=2840 MJD=54441 sdR-r2-00047762.fit Skyline Flux at 8888.3
Flux (8888.3)/Airmass
RED = sky fiber
Dispersion = 50.45 %
Fiber number
Focal Distance [mm]
Airmass

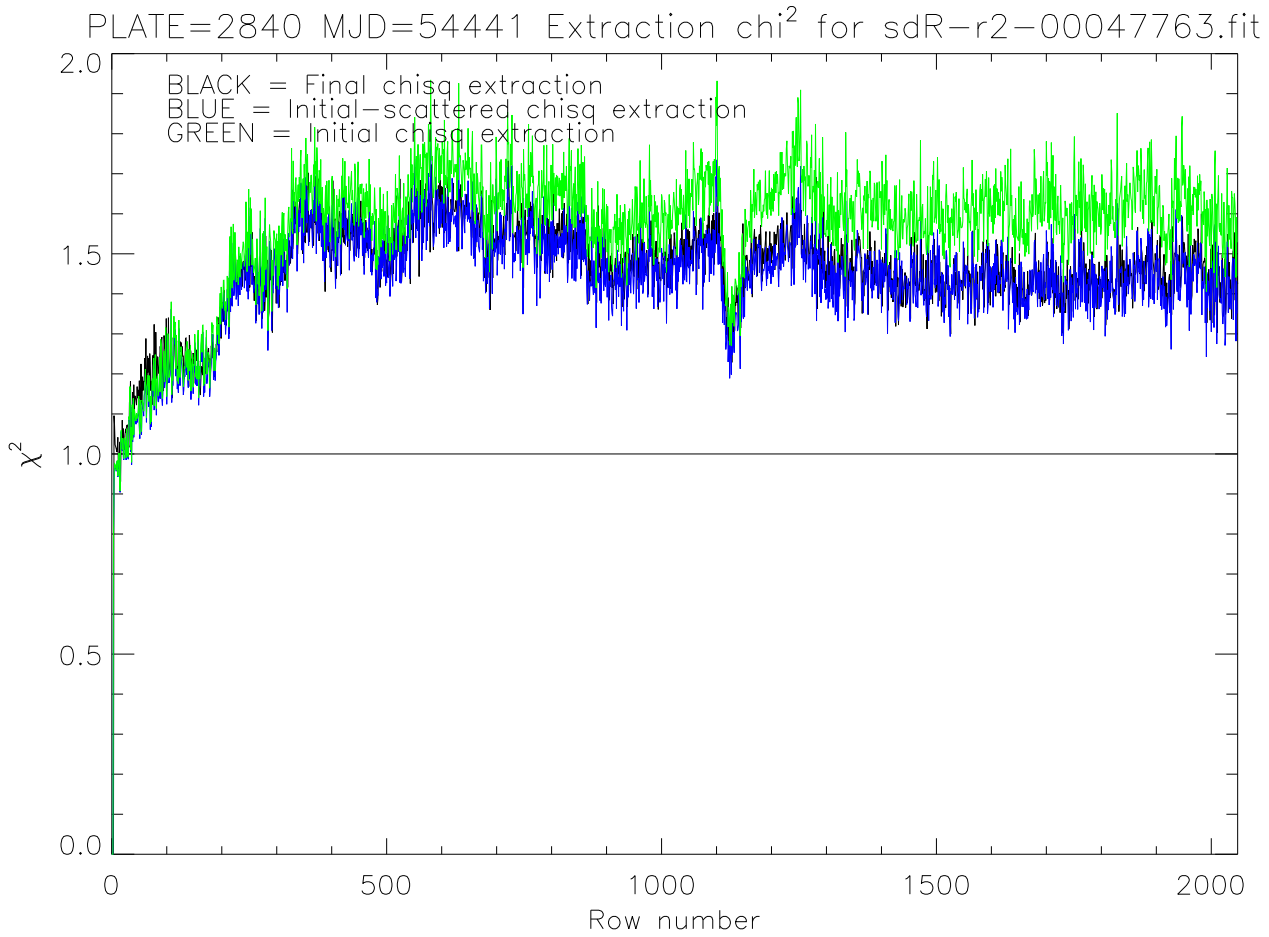

PLATE=2840 MJD=54441 Fiber-Flats for sdR-r2-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.160
Max value = 1.185
Fiber-Flat
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]
Wed Apr 9 18:25:24 2008

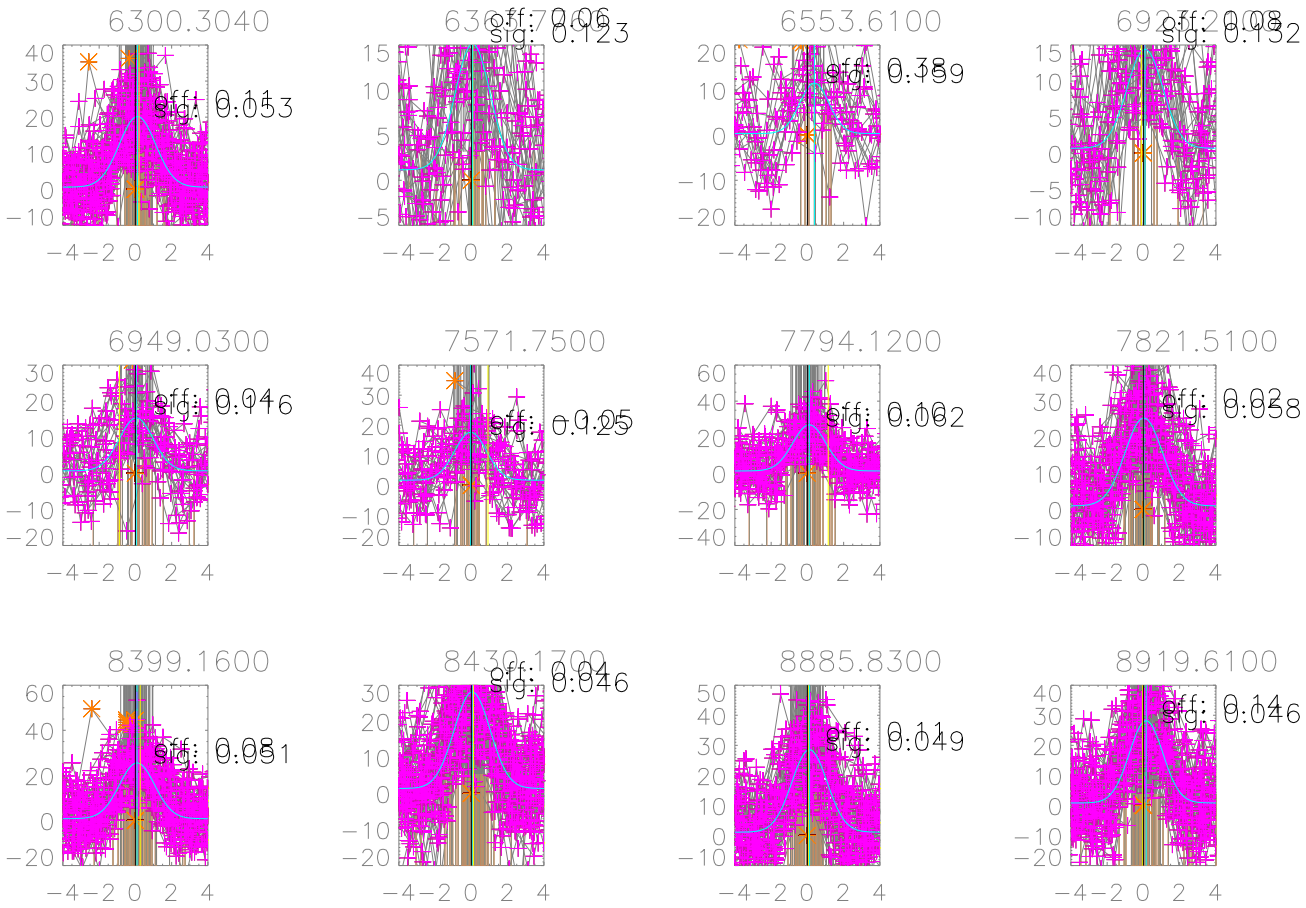

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r2-00047763.fi
2000
1500
1000
500
0
Y [pix]
0
500
1000
1500
2000
X [pix]
12.7
21.8
0
12.7
12.7
12.7
12.7
3.6
3.6
3.6
3.6

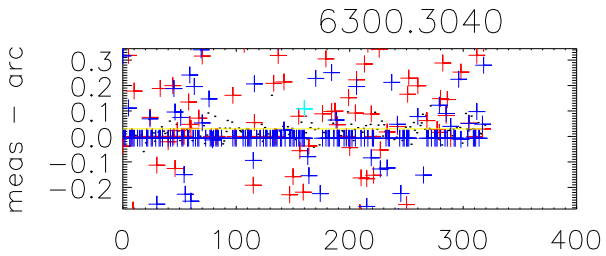

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r2-00047763.fi
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.314
Max value = 17.679
Wed Apr 9 18:26:32 2008

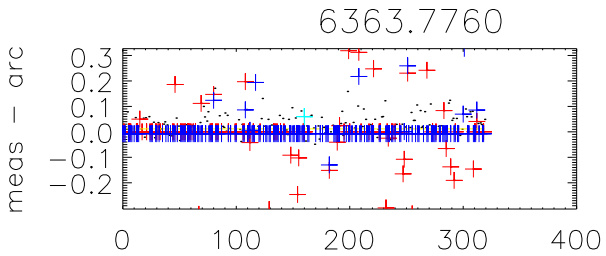

PLATE=2840 MJD=54441 Scattered Light on sdR-r2-00047763.fit
Y [pix]
X [pix]
0
500
1000
1500
2000
3.45
5.64
1.27

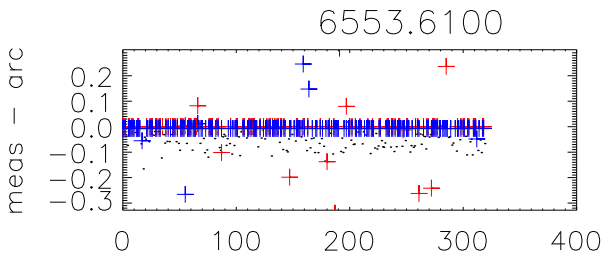

PLATE=2840 MJD=54441 Scattered Light on sdR-r2-00047763.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.336
Max value = 5.545
Wed Apr 9 18:31:11 2008

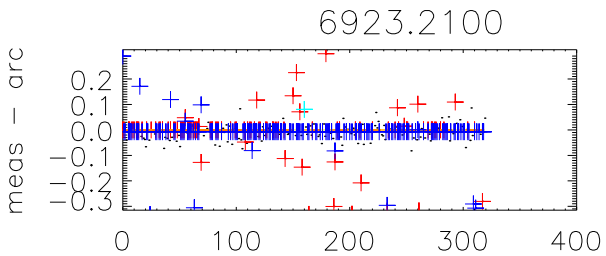

PLATE=2840 MJD=54441 Extraction chi^2 for sdR-r2-00047763.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
2.0
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number

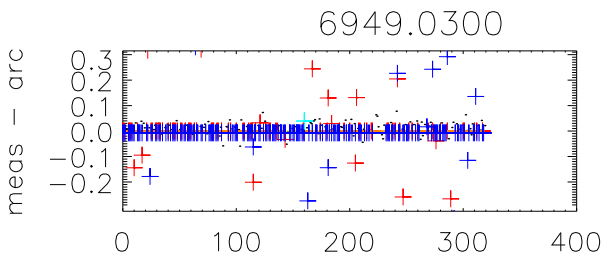

6300.3040
eff: 0.11
sig: 0.053
6301.7000
eff: 0.06
sig: 0.123
6553.6100
eff: 0.38
sig: 0.159
6927.2000
sig: 0.132
6949.0300
eff: 0.04
sig: 0.116
7571.7500
eff: 0.05
sig: 0.25
7794.1200
eff: 0.06
sig: 0.062
7821.5100
eff: 0.02
sig: 0.058
8399.1600
eff: 0.08
sig: 0.051
8430.1700
eff: 0.04
sig: 0.046
8885.8300
eff: 0.11
sig: 0.049
8919.6100
eff: 0.14
sig: 0.046

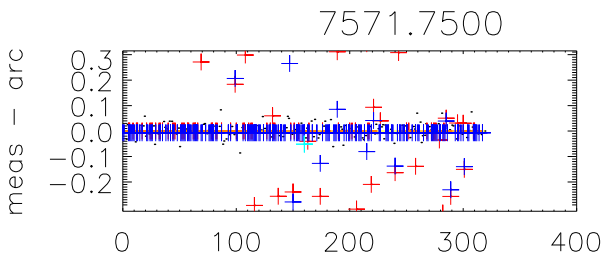

6300.3040
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

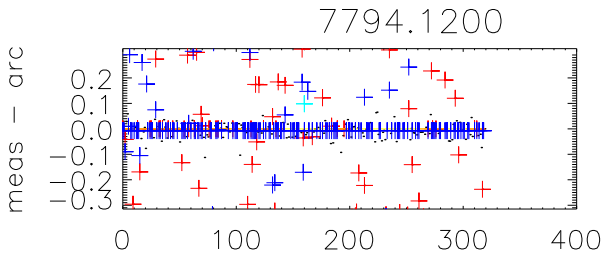

6363.7760
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

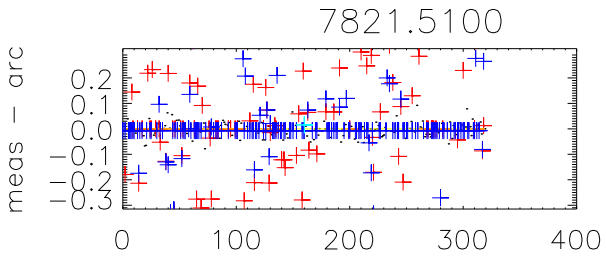

6553.6100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

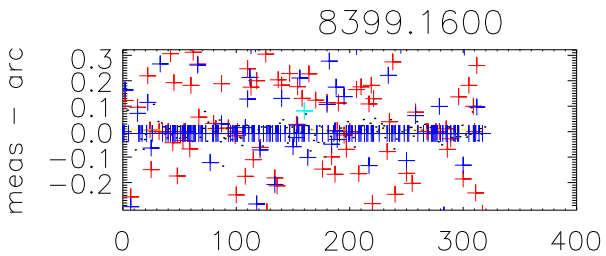

6923.2100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

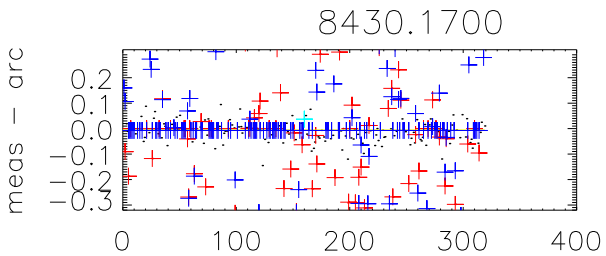

6949.0300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

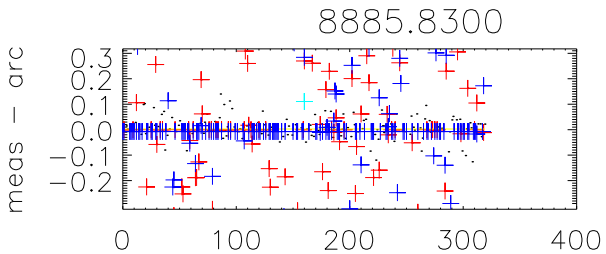

7571.7500
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

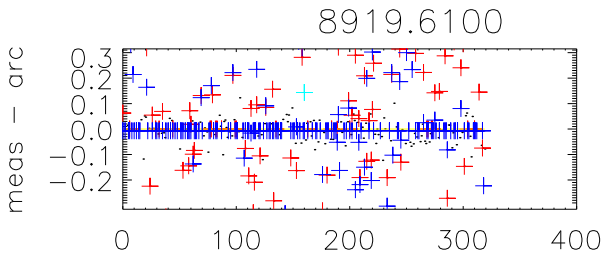

7794.1200
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

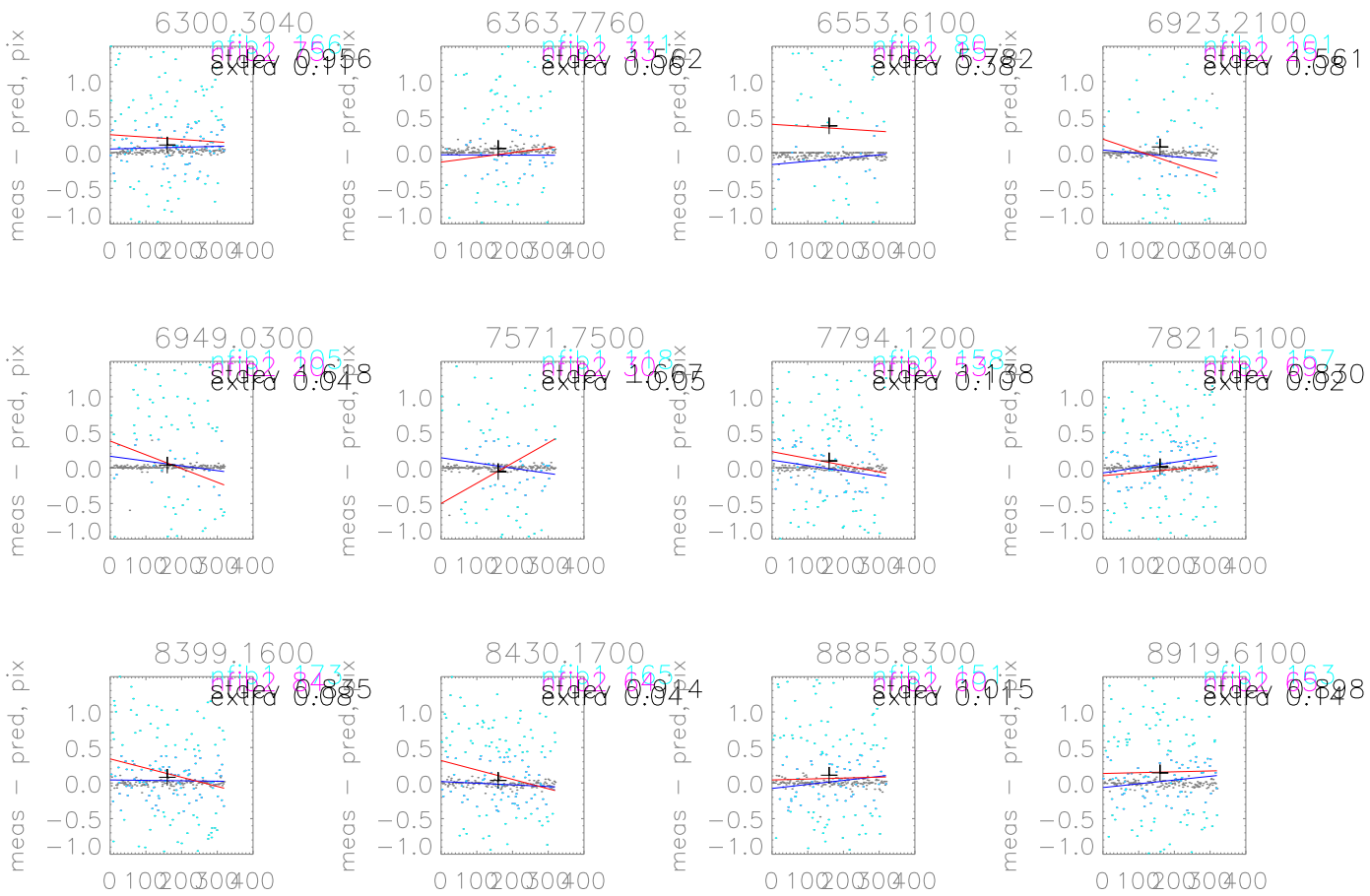

7821.5100
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400

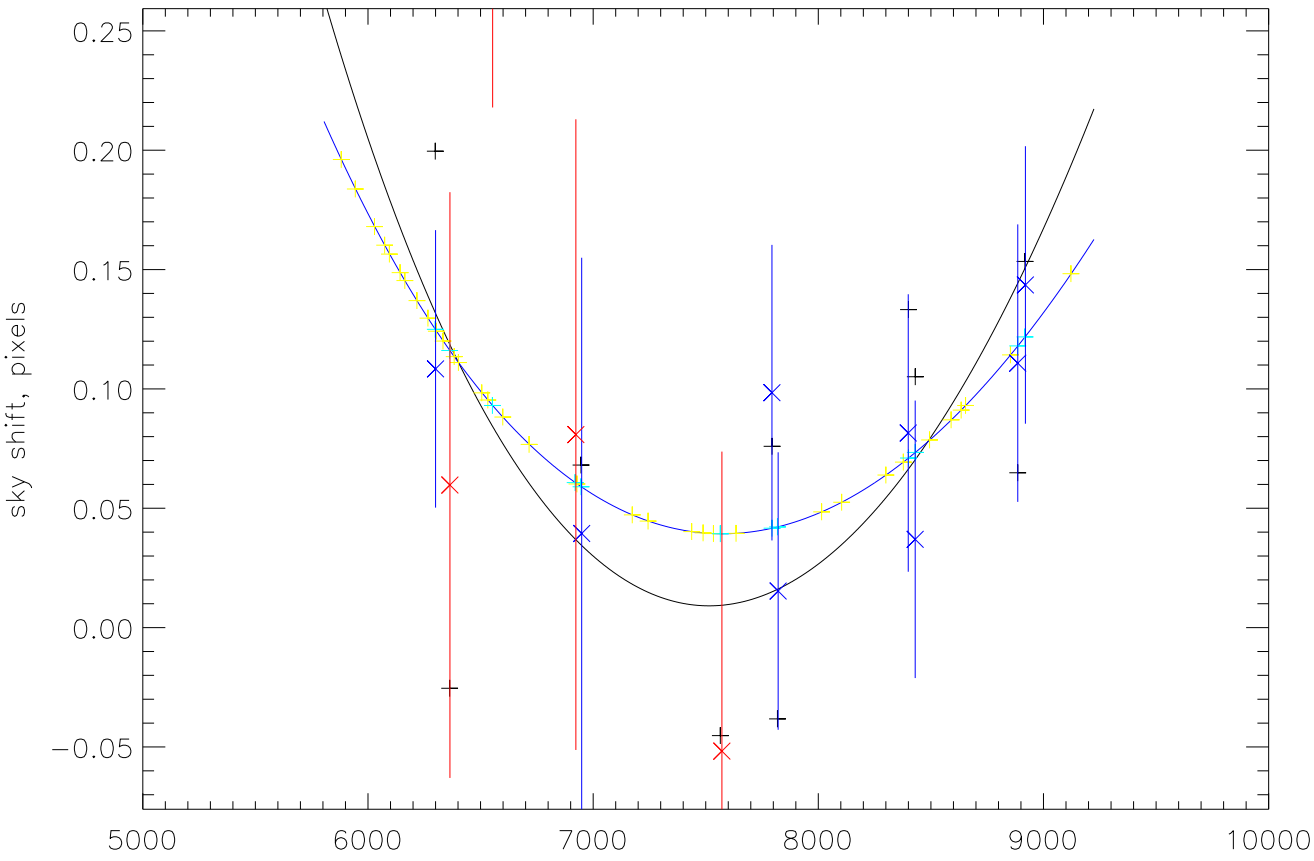

8399.1600
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

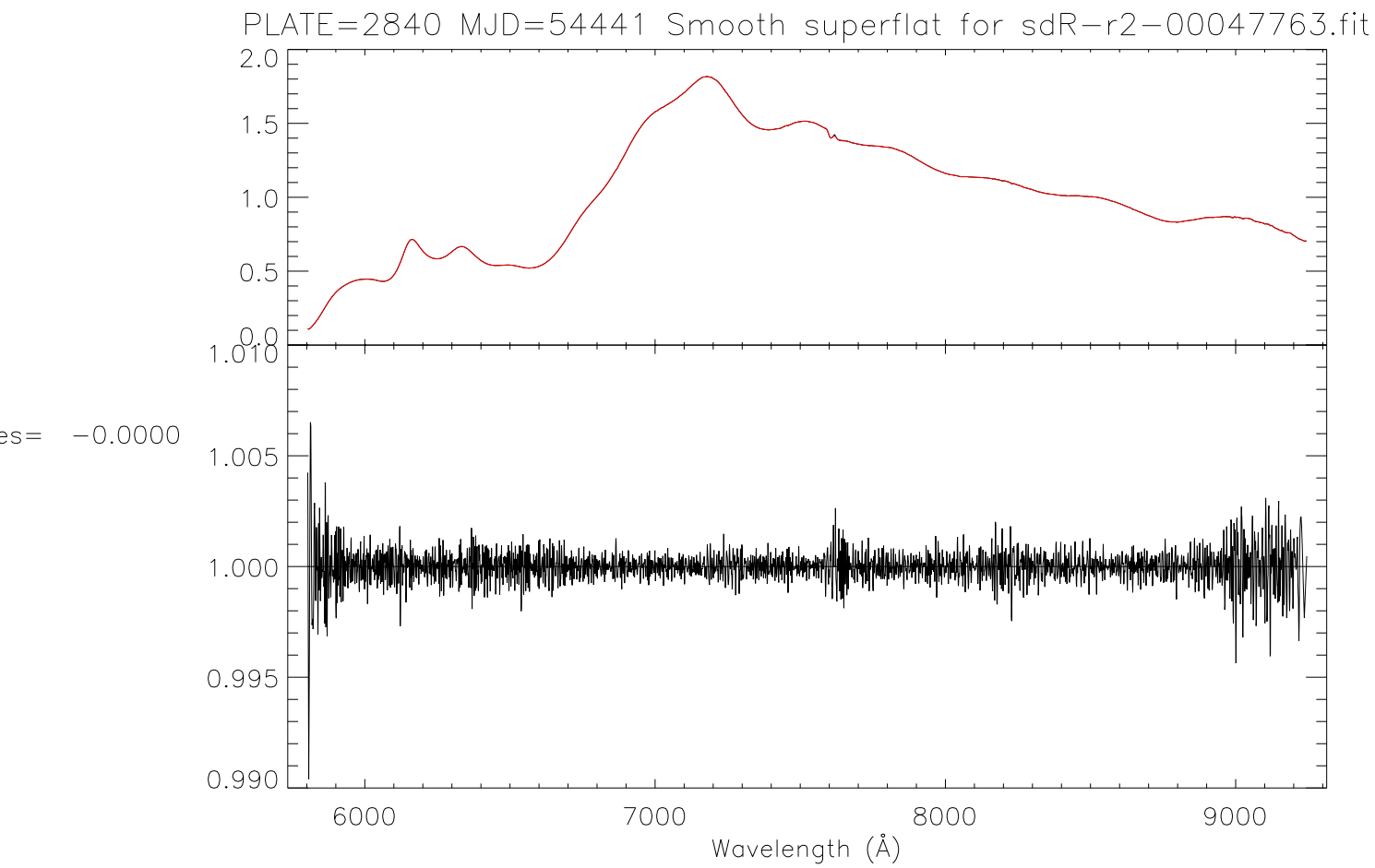

8430.1700
meas − arc
0.2
0.1
0.0
−0.1
−0.2
−0.3
0
100
200
300
400


8885.8300
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

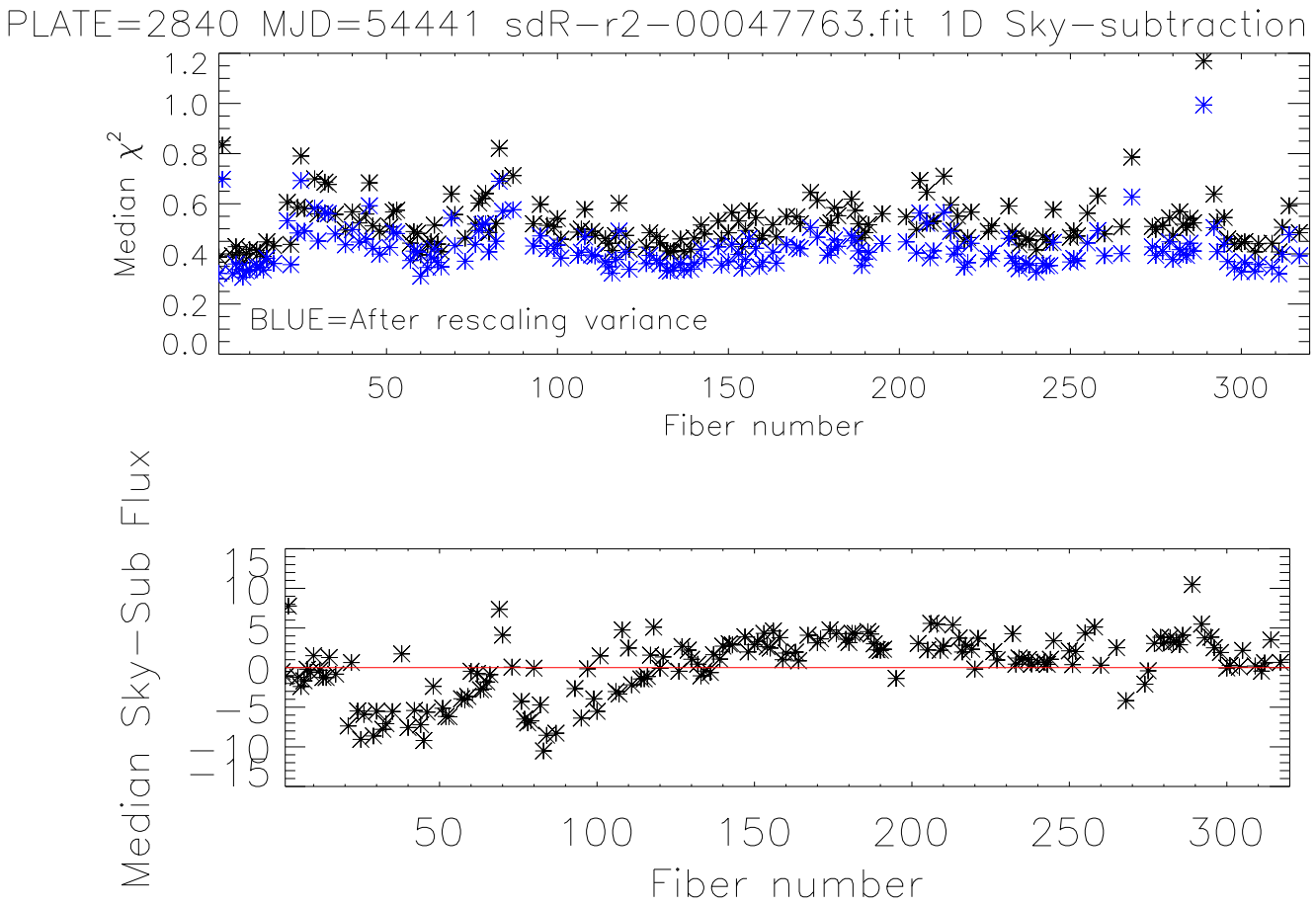

8919.6100
meas − arc
0.3
0.2
0.1
0.0
−0.1
−0.2
0
100
200
300
400

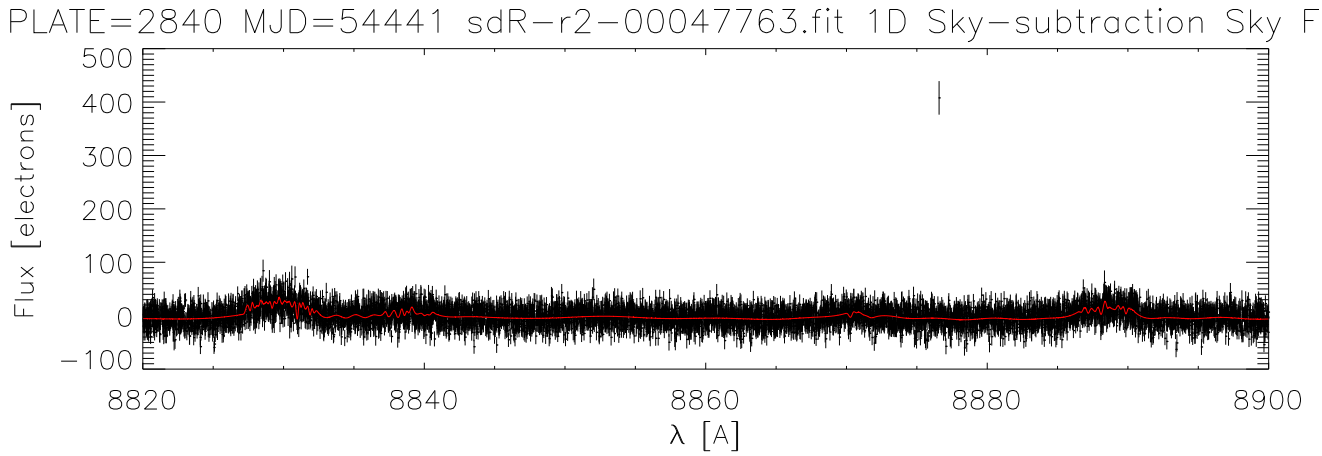

6300.3040
nfib2 166
stdev 0.956
extra 0.116
6363.7760
nfib2 111
stdev 1.562
extra 0.062
6553.6100
nfib2 89
stdev 5.382
extra 0.382
6923.2100
nfib2 191
stdev 1.561
extra 0.08
6949.0300
nfib2 105
stdev 1.648
extra 0.04
7571.7500
nfib2 108
stdev 1.667
extra −0.05
7794.1200
nfib2 153
stdev 1.138
extra 0.108
7821.5100
nfib2 157
stdev 0.830
extra 0.02
8399.1600
nfib2 173
stdev 0.835
extra 0.085
8430.1700
nfib2 165
stdev 0.944
extra 0.04
8885.8300
nfib2 151
stdev 1.015
extra 0.115
8919.6100
nfib2 163
stdev 0.898
extra 0.14
meas − pred, pix
1.0
0.5
0.0
−0.5
−1.0
0 100 200 300 400

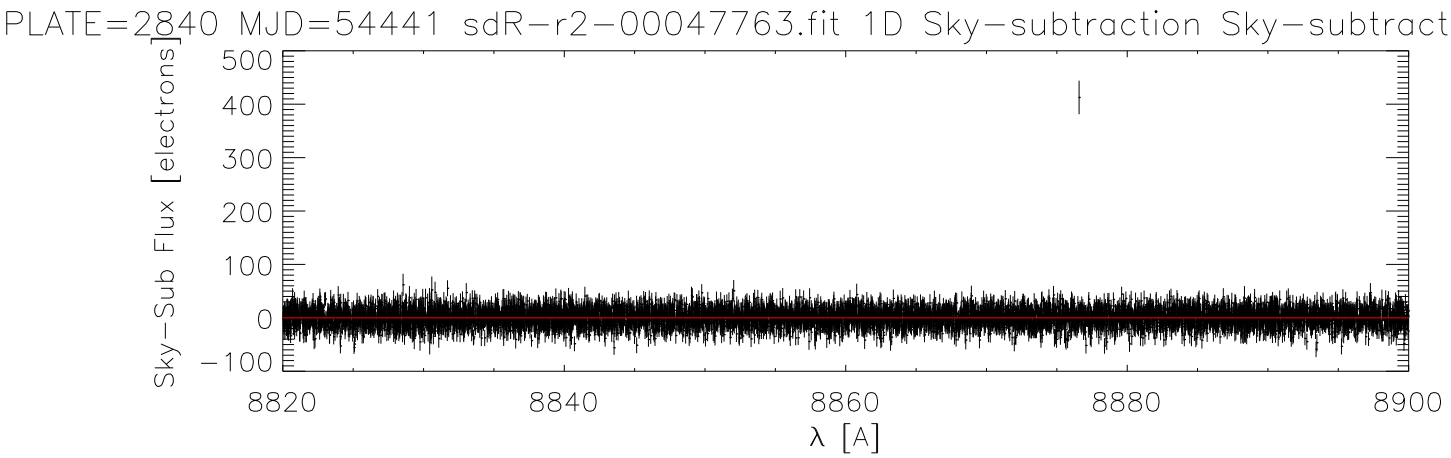

0.25
0.20
0.15
0.10
0.05
0.00
−0.05
sky shift, pixels
5000
6000
7000
8000
9000
10000

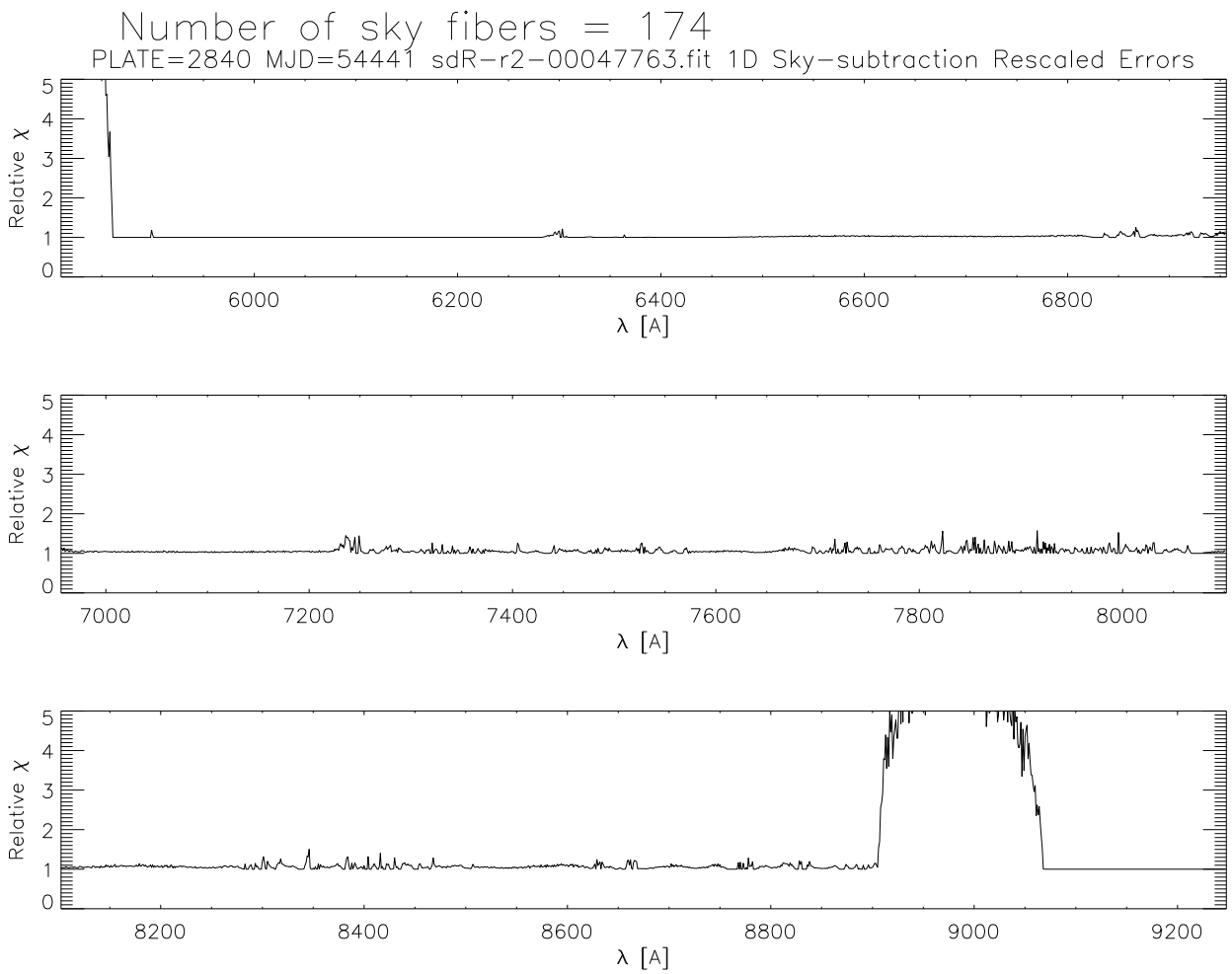

PLATE=2840 MJD=54441 Smooth superflat for sdR-r2-00047763.fit
2.0
1.5
1.0
0.5
0.0
1.010
1.005
1.000
0.995
0.990
6000
7000
8000
9000
Wavelength (Å)

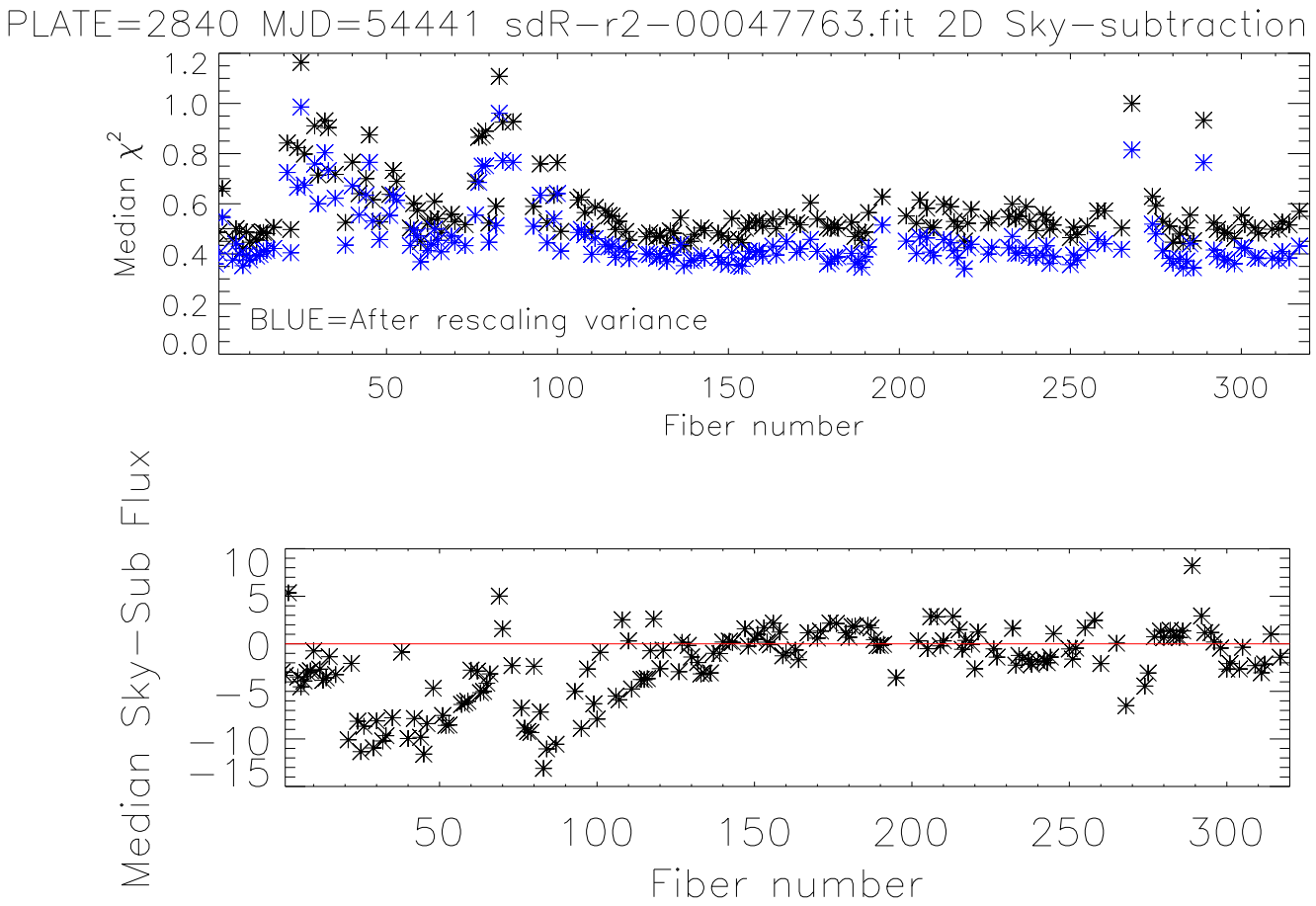
es= −0.0000

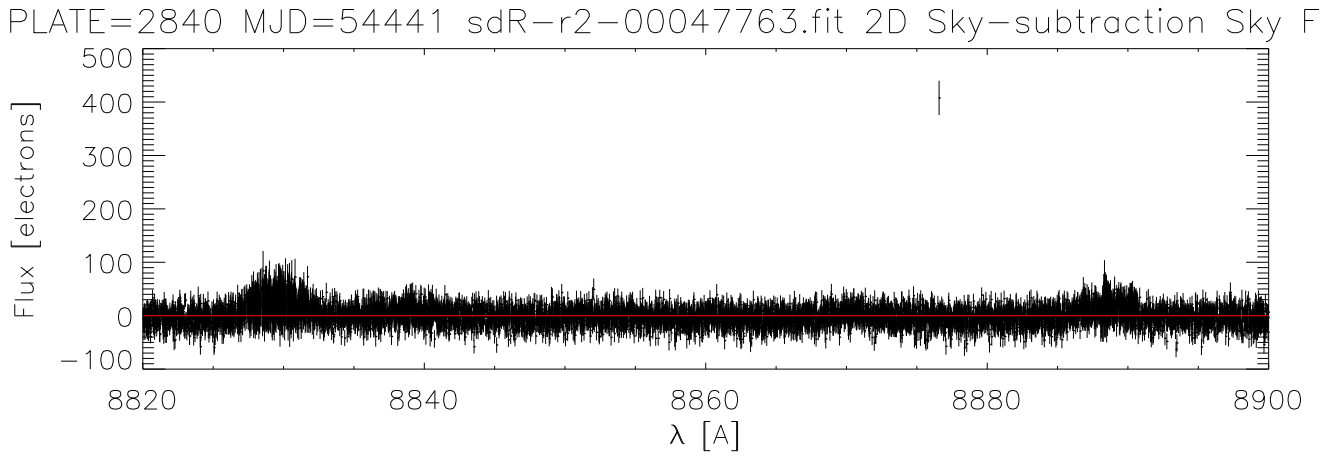

PLATE=2840 MJD=54441 sdR-r2-00047763.fit 1D Sky-subtraction Sky Fibers
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

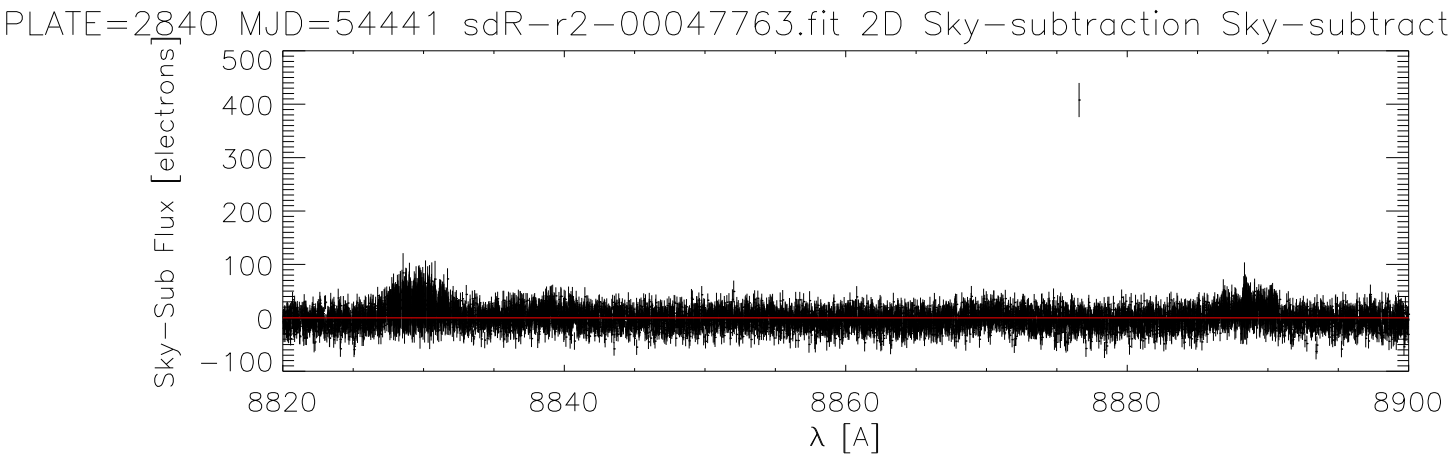

PLATE=2840 MJD=54441 sdR-r2-00047763.fit 1D Sky-subtraction Sky Fibers
Flux [electrons]
500
400
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

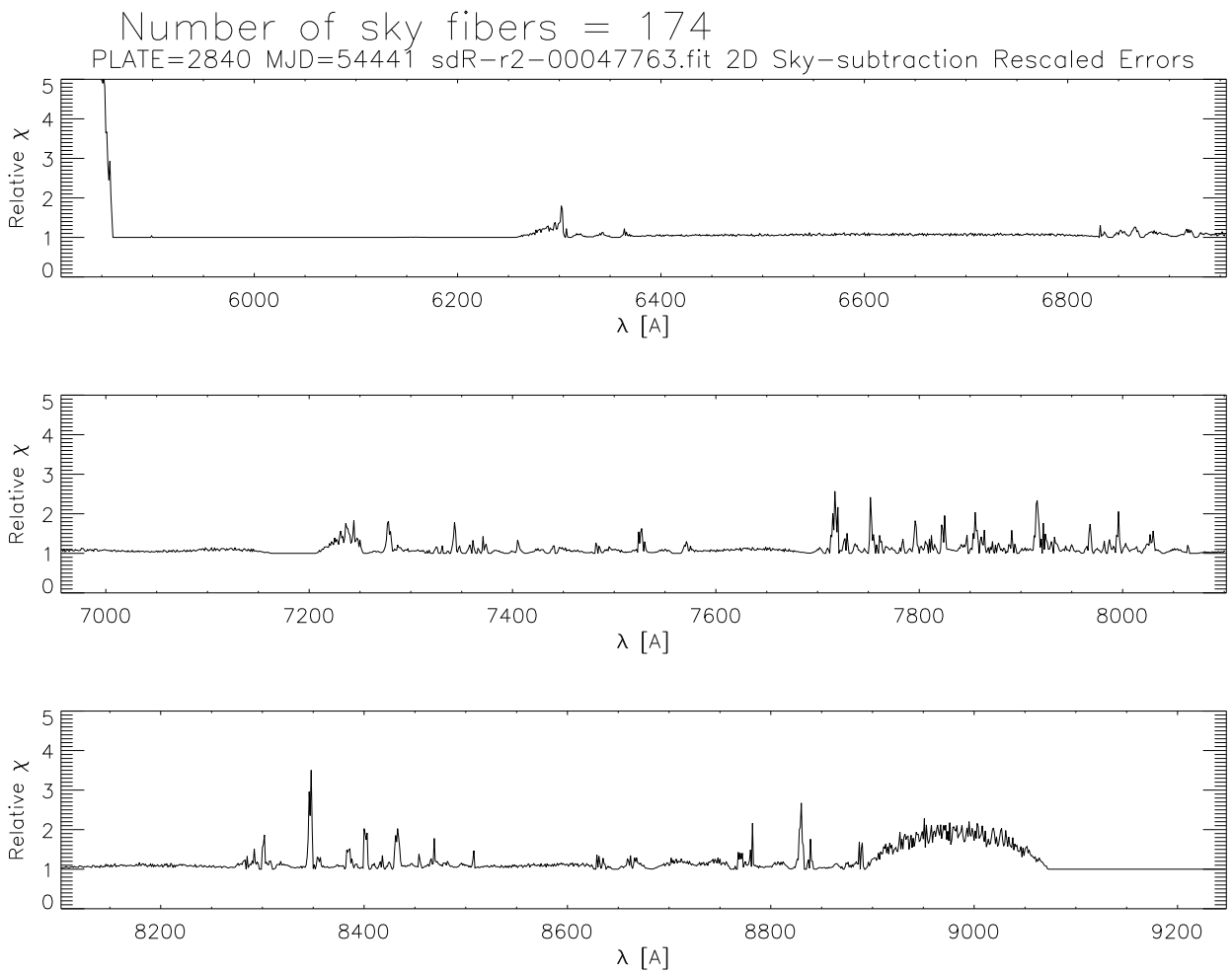

PLATE=2840 MJD=54441 sdR-r2-00047763.fit 1D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
500
400
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

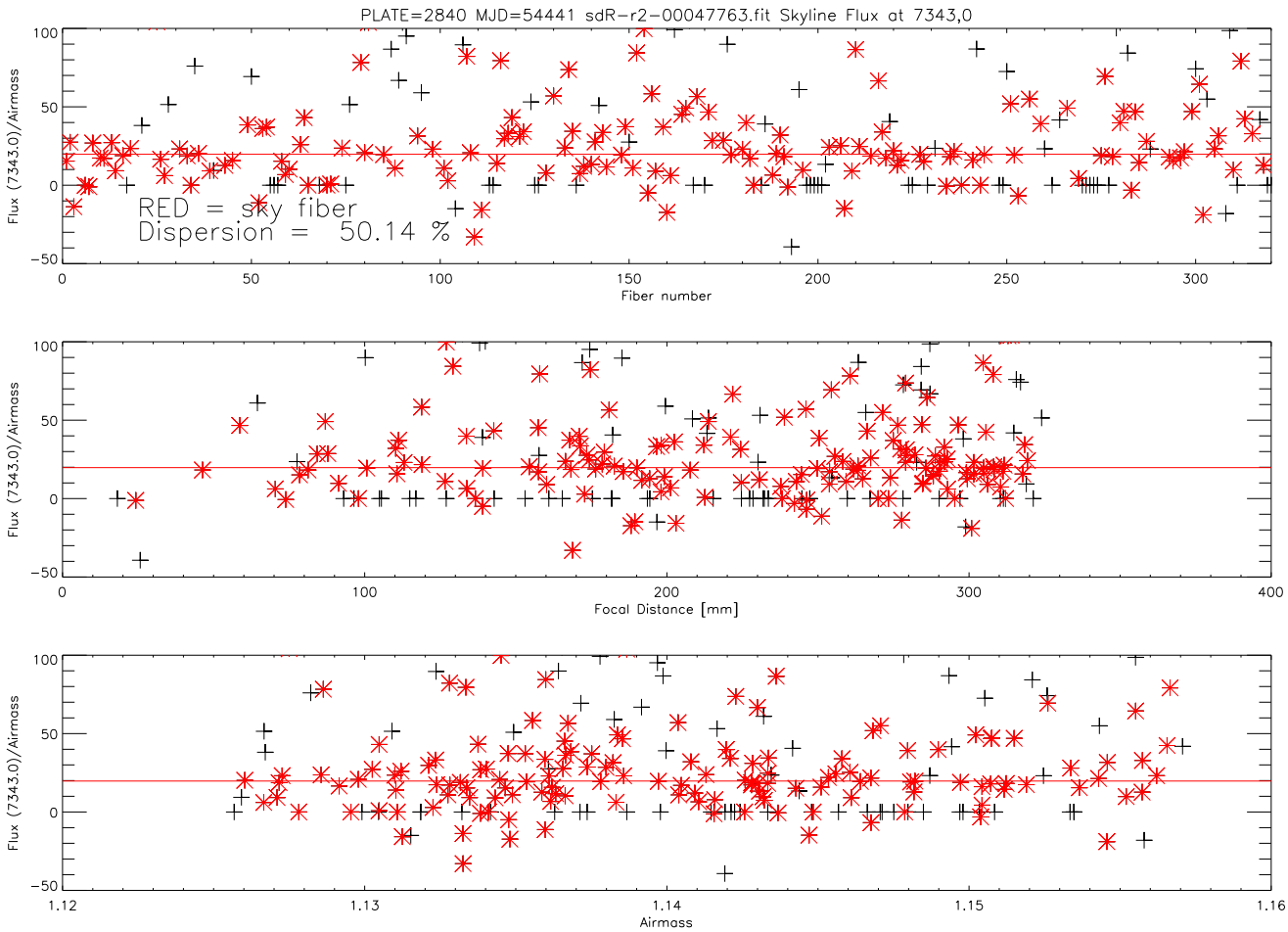

Number of sky fibers = 174
PLATE=2840 MJD=54441 sdR-r2-00047763.fit 1D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

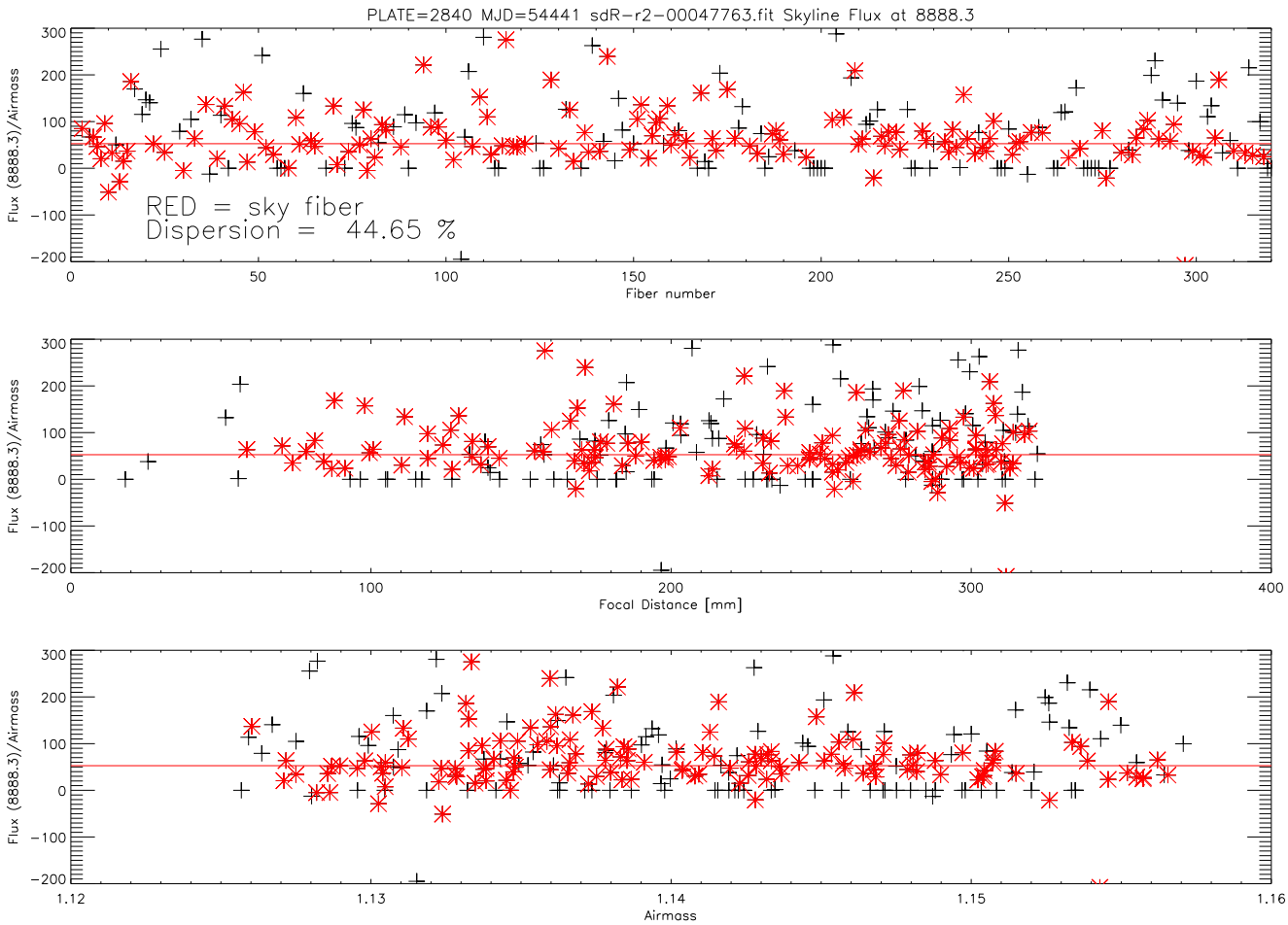

PLATE=2840 MJD=54441 sdR-r2-00047763.fit 2D Sky-subtraction Sky Fibers
Median χ^2
BLUE=After rescaling variance
Fiber number
Median Sky-Sub Flux
Fiber number

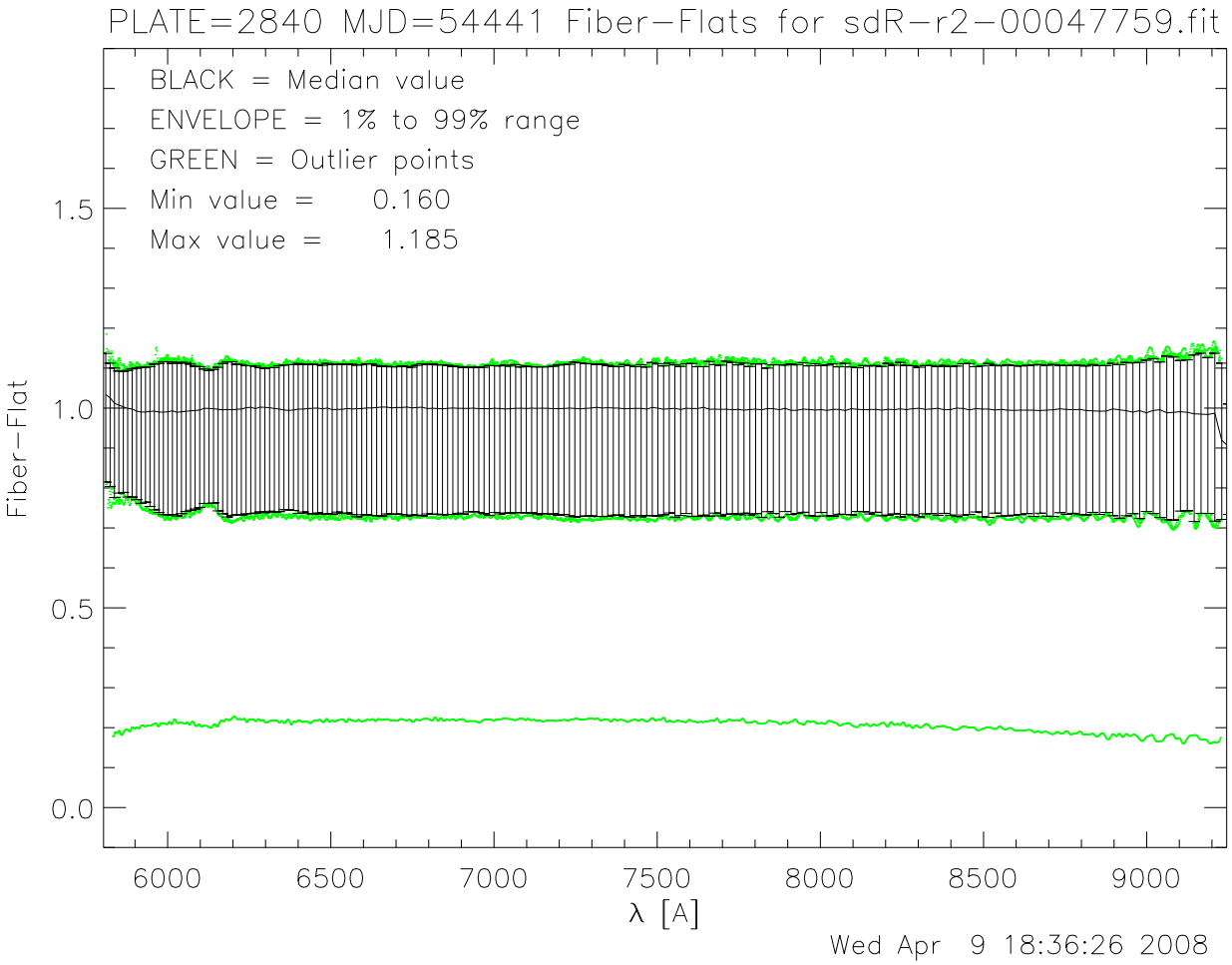

PLATE=2840 MJD=54441 sdR-r2-00047763.fit 2D Sky-subtraction Sky Fibers
Flux [electrons]
500
400
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

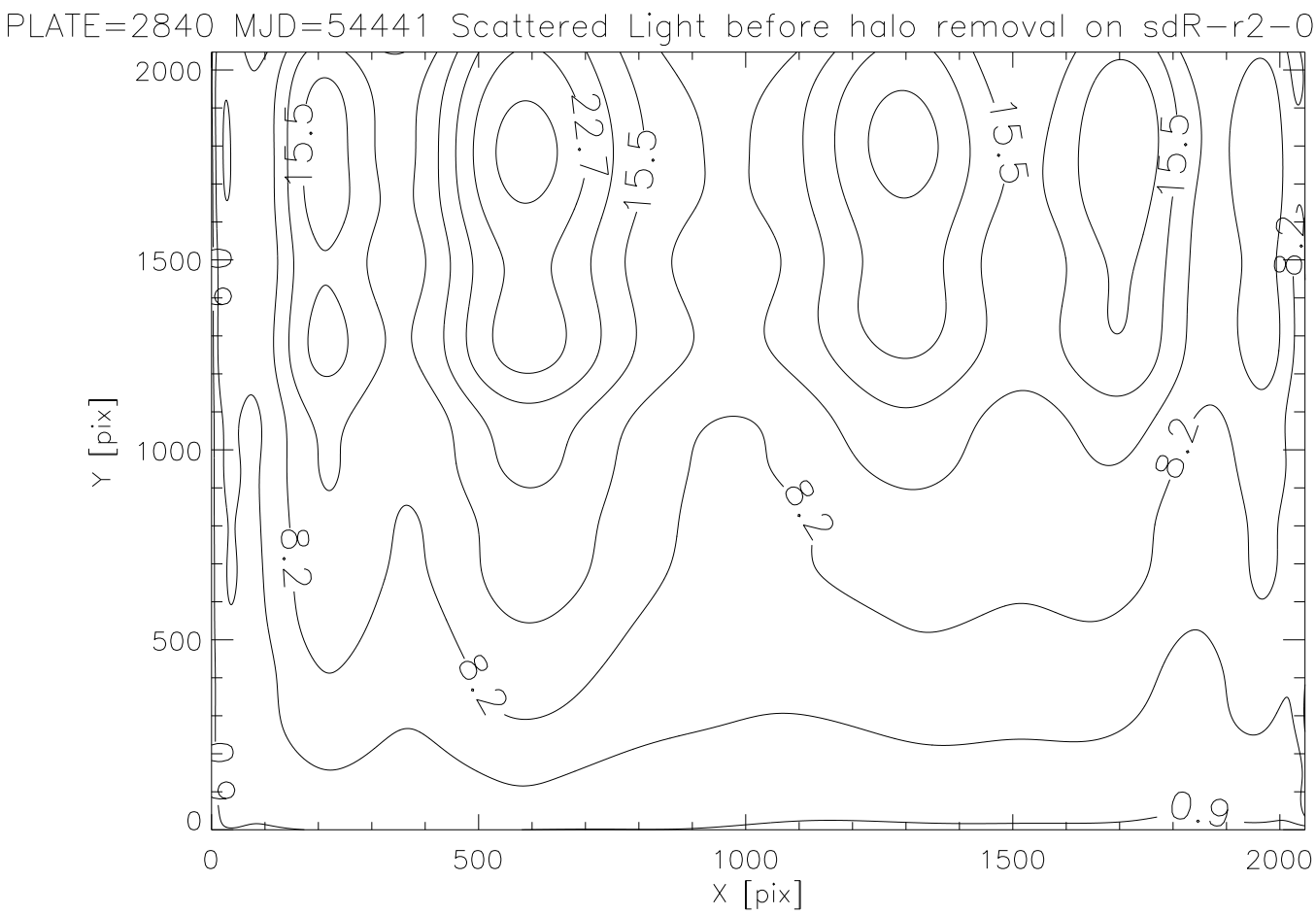

PLATE=2840 MJD=54441 sdR-r2-00047763.fit 2D Sky-subtraction Sky-subtracted Sky F
Sky-Sub Flux [electrons]
500
400
300
200
100
0
-100
8820
8840
8860
8880
8900
λ [A]

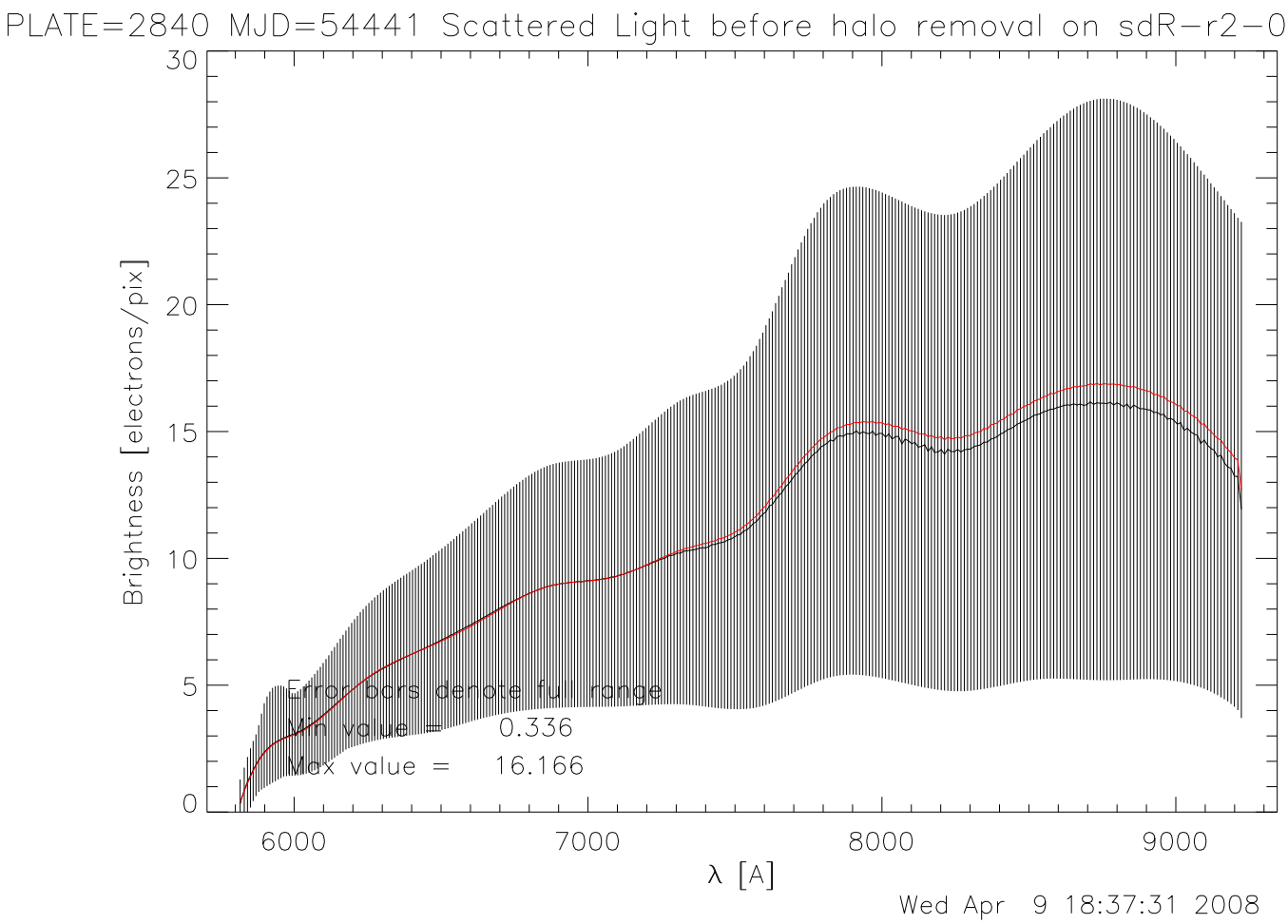

Number of sky fibers = 174
PLATE=2840 MJD=54441 sdR-r2-00047763.fit 2D Sky-subtraction Rescaled Errors
Relative χ
λ [A]
6000
6200
6400
6600
6800
7000
7200
7400
7600
7800
8000
8200
8400
8600
8800
9000
9200

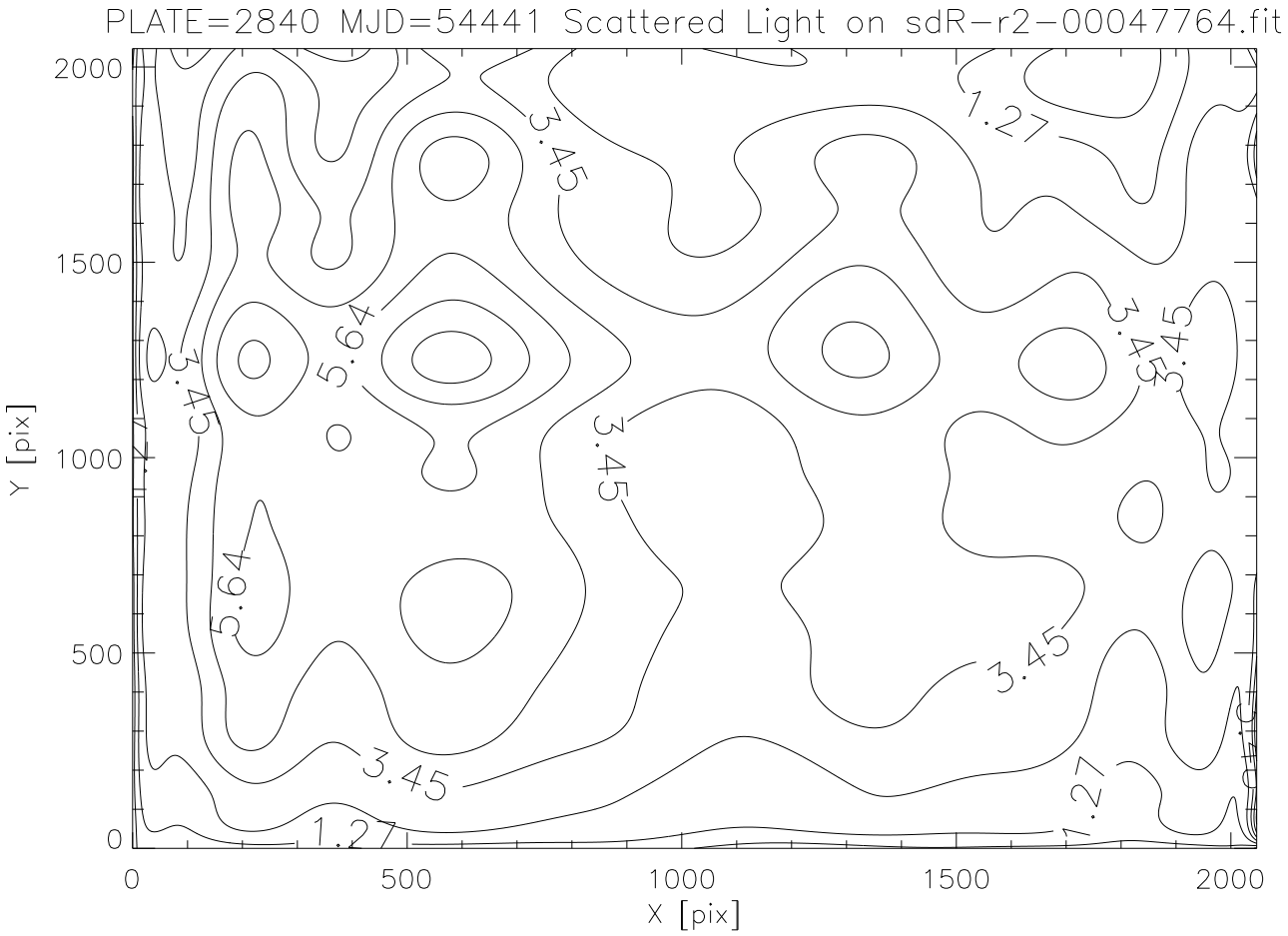

PLATE=2840 MJD=54441 sdR-r2-00047763.fit Skyline Flux at 7343,0
Flux (7343.0)/Airmass
RED = sky fiber
Dispersion = 50.14 %
Fiber number
Flux (7343.0)/Airmass
Focal Distance [mm]
Flux (7343.0)/Airmass
Airmass

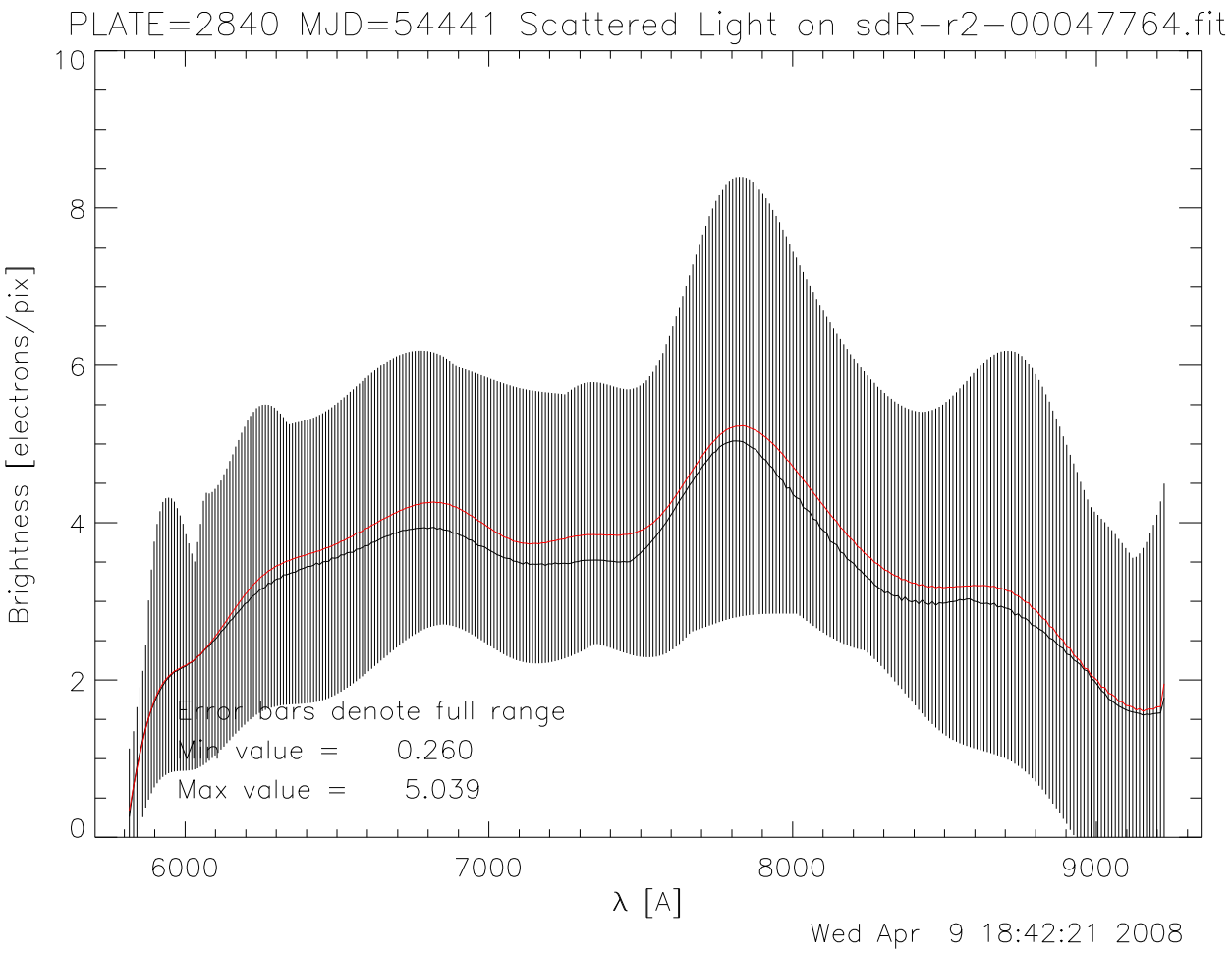

PLATE=2840 MJD=54441 sdR-r2-00047763.fit Skyline Flux at 8888.3
Flux (8888.3)/Airmass
RED = sky fiber
Dispersion = 44.65 %
Fiber number
Flux (8888.3)/Airmass
Focal Distance [mm]
Flux (8888.3)/Airmass
Airmass

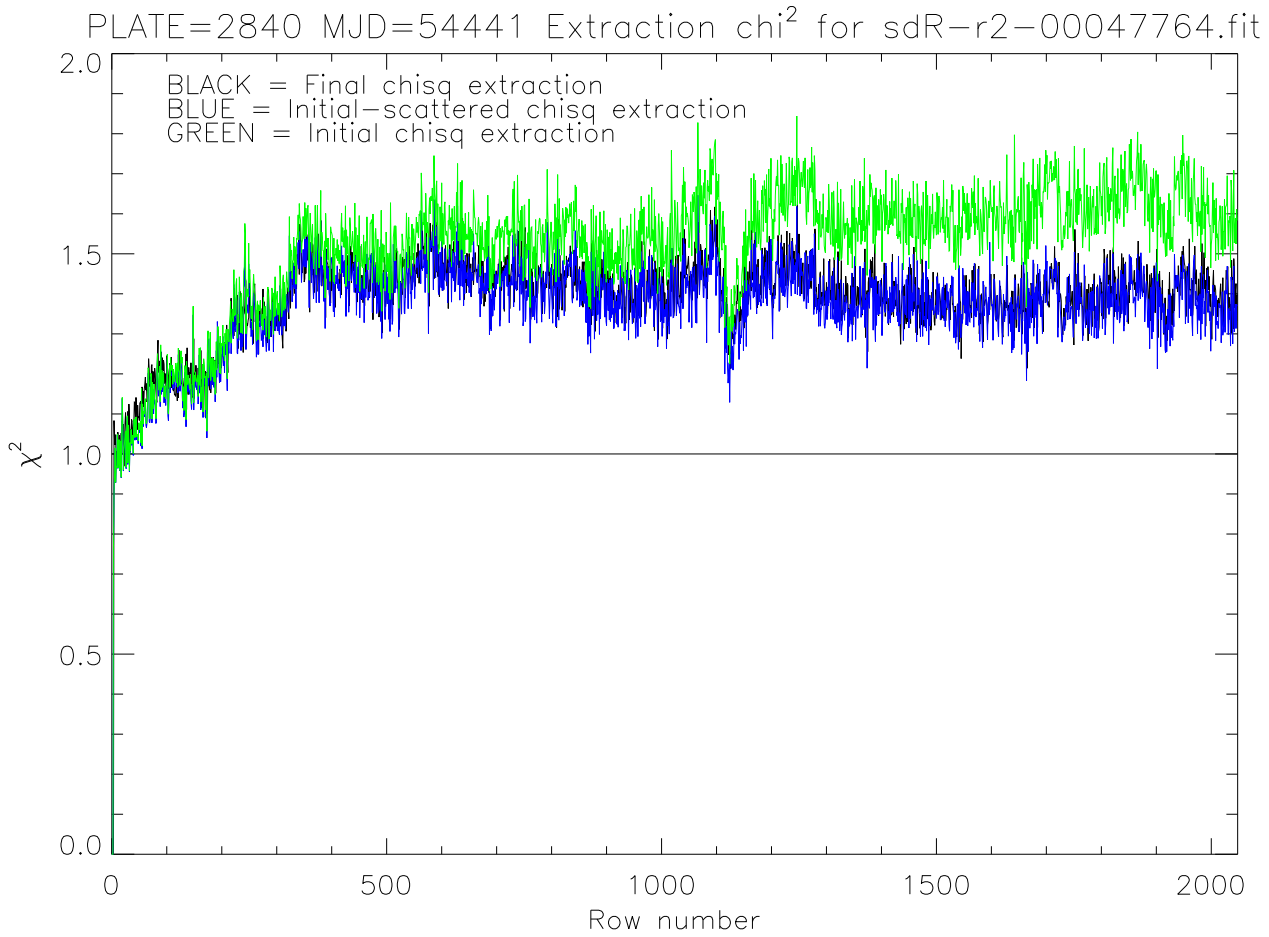

PLATE=2840 MJD=54441 Fiber-Flats for sdR-r2-00047759.fit
BLACK = Median value
ENVELOPE = 1% to 99% range
GREEN = Outlier points
Min value = 0.160
Max value = 1.185
Fiber-Flat
1.5
1.0
0.5
0.0
6000
6500
7000
7500
8000
8500
9000
λ [A]
Wed Apr 9 18:36:26 2008

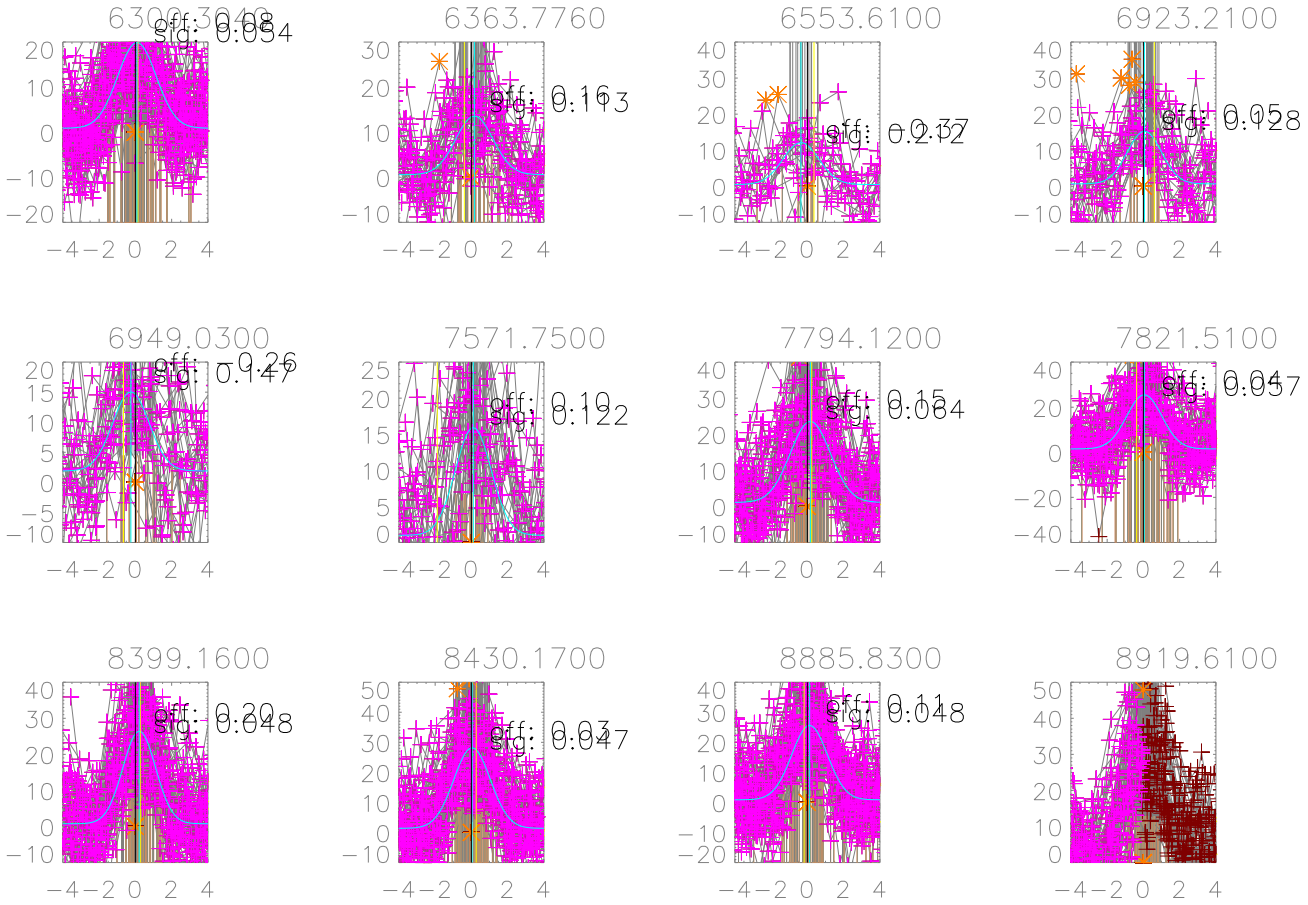

PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r2-00047764.fi
Y [pix]
X [pix]
0
500
1000
1500
2000
22.7
15.5
8.2
0.9


PLATE=2840 MJD=54441 Scattered Light before halo removal on sdR-r2-00047764.fi
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.336
Max value = 16.166
Wed Apr 9 18:37:31 2008


PLATE=2840 MJD=54441 Scattered Light on sdR-r2-00047764.fit
Y [pix]
X [pix]
0
500
1000
1500
2000
3.45
5.64
1.27


PLATE=2840 MJD=54441 Scattered Light on sdR-r2-00047764.fit
Brightness [electrons/pix]
λ [A]
Error bars denote full range
Min value = 0.260
Max value = 5.039
Wed Apr 9 18:42:21 2008


PLATE=2840 MJD=54441 Extraction chi^2 for sdR-r2-00047764.fit
BLACK = Final chisq extraction
BLUE = Initial-scattered chisq extraction
GREEN = Initial chisq extraction
χ^2
2.0
1.5
1.0
0.5
0.0
0
500
1000
1500
2000
Row number


6300.3040
eff: 0.08
sig: 0.054
6363.7760
eff: 0.16
sig: 0.193
6553.6100
eff: 0.37
sig: 0.212
6923.2100
eff: 0.05
sig: 0.128
6949.0300
eff: −0.26
sig: 0.147
7571.7500
eff: 0.10
sig: 0.122
7794.1200
eff: 0.15
sig: 0.084
7821.5100
eff: 0.04
sig: 0.057
8399.1600
eff: 0.20
sig: 0.048
8430.1700
eff: 0.03
sig: 0.047
8885.8300
eff: 0.11
sig: 0.048
8919.6100