

SDSS_J1728+2802_MJD55711

Rest Wavelength (\AA)

1500

2000

2500

3000

$z = 2.223$

Flux (10^{-17} ergs s^{-1} cm^{-2} \AA^{-1})

60
50
40
30
20
10
0

4000

5000

6000

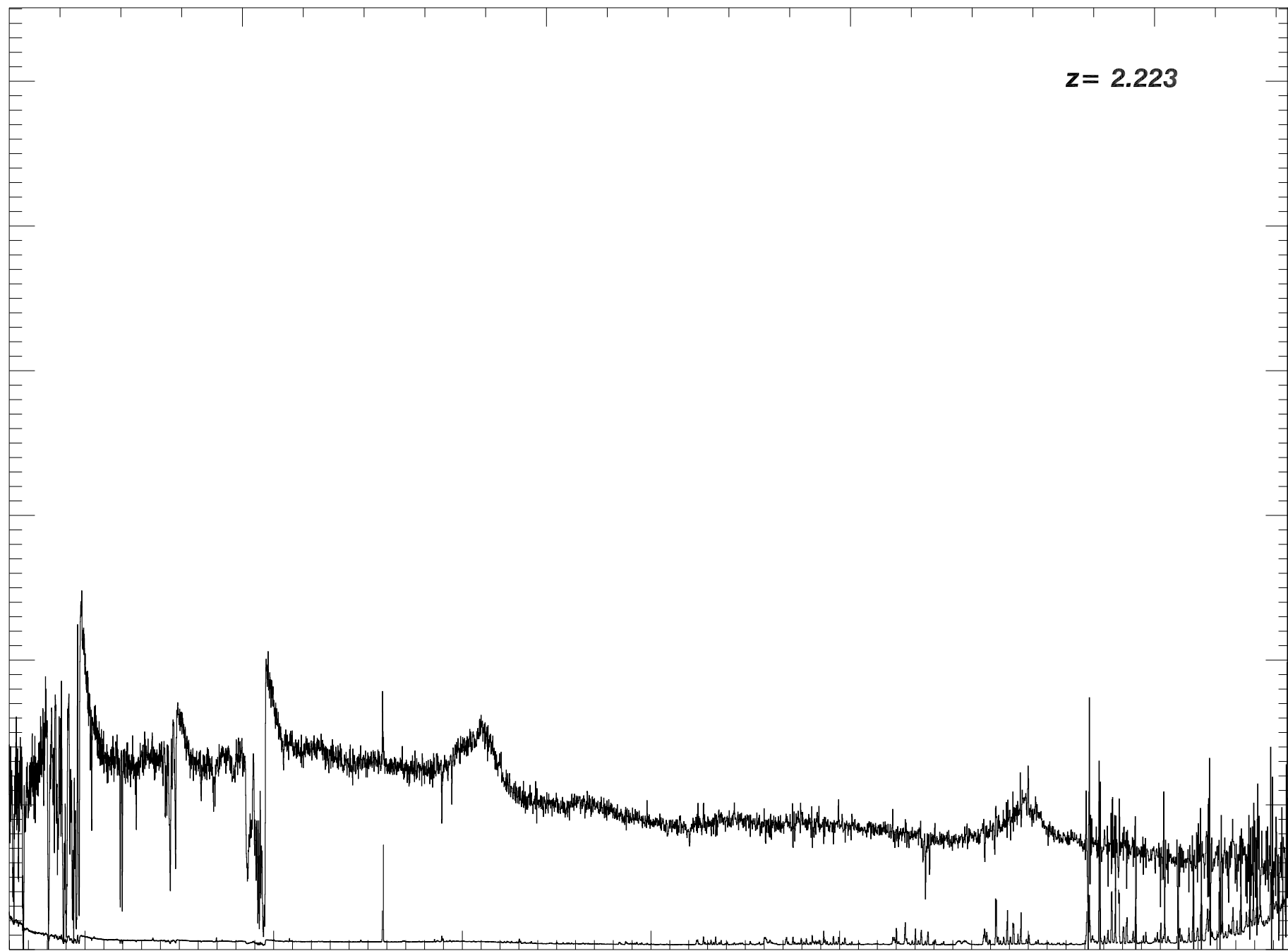
7000

8000

9000

10000

Observed Wavelength (\AA)



SDSS_J1728+2802_MJD55711

Rest Wavelength (\AA)

1350

1400

1450

1500

1550

25

20

15

10

5

0

$z=2.1950$

$z=2.223$

-2

-1

0

1

Flux ($10^{-17} \text{ ergs s}^{-1} \text{ cm}^{-2} \text{ \AA}^{-1}$)

4400

4600

4800

5000

Observed Wavelength (\AA)

Si IV 1394 2.1396

Si IV 1403 2.1396

Si IV 1394 2.1752

Si IV 1394 2.1804

Si IV 1394 0.0

Si IV 1403 2.1752

Si IV 1403 2.1804

Si IV 1403 0.0

C IV 1548 1.9818

C IV 1551 1.9818

C IV 1548 2.0233

C IV 1551 2.0233

Fe II 1608 1.9818

C IV 1548 2.1396

C IV 1551 2.1396

Si II 1527 0.0

Si II m* 1533 0.3

C IV 1548 2.1752

C IV 1548 2.1804

C IV 1551 2.1804

C IV 1548 0.0

C IV 1551 0.0

Al II 1671 1.9818

C I 1560 0.0

C I m* 1561 0.04

Fe II 1608 2.1396

Al II 1671 2.0233

Fe II 1608 2.1752

SDSS_J1728+2802_MJD55711

Rest Wavelength (\AA)

1600

1650

1700

1750

1800

$z=2.1950$

$z=2.223$

Flux ($10^{-17} \text{ ergs s}^{-1} \text{ cm}^{-2} \text{ \AA}^{-1}$)

20

15

10

5

0

-2

-1

0

1

5200

5400

5600

5800

Observed Wavelength (\AA)

Fe II 1608 2.1396

Al III 1671 2.0233

Fe II 1608 2.1752

Fe II 1608 2.1804

Fe II 1608 0.0

Al II 1671 2.1396

C I 1657 0.04

Al II 1671 2.1752

Al III 1671 2.1804

Al II 1671 0.0

C I 1657 0.0

Al III 1855 1.9818

Al III 1863 1.9818

Al III 1855 2.0233

Al III 1863 2.0233

Al III 1766 0.1

Al I 1766 0.0

SDSS_J1728+2802_MJD55711

Rest Wavelength (\AA)

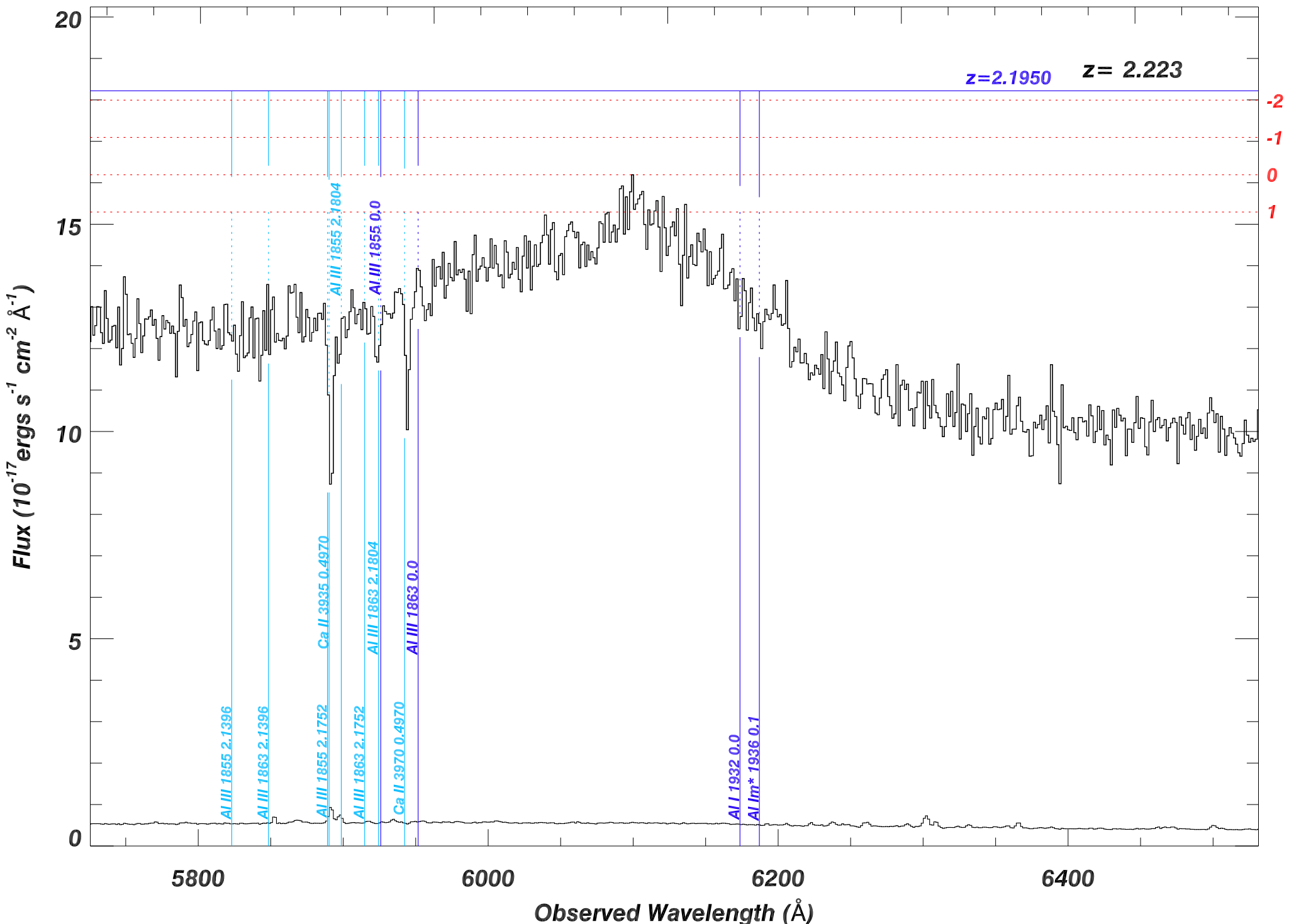
1800

1850

1900

1950

2000



Flux ($10^{-17} \text{ ergs s}^{-1} \text{ cm}^{-2} \text{ \AA}^{-1}$)

5800

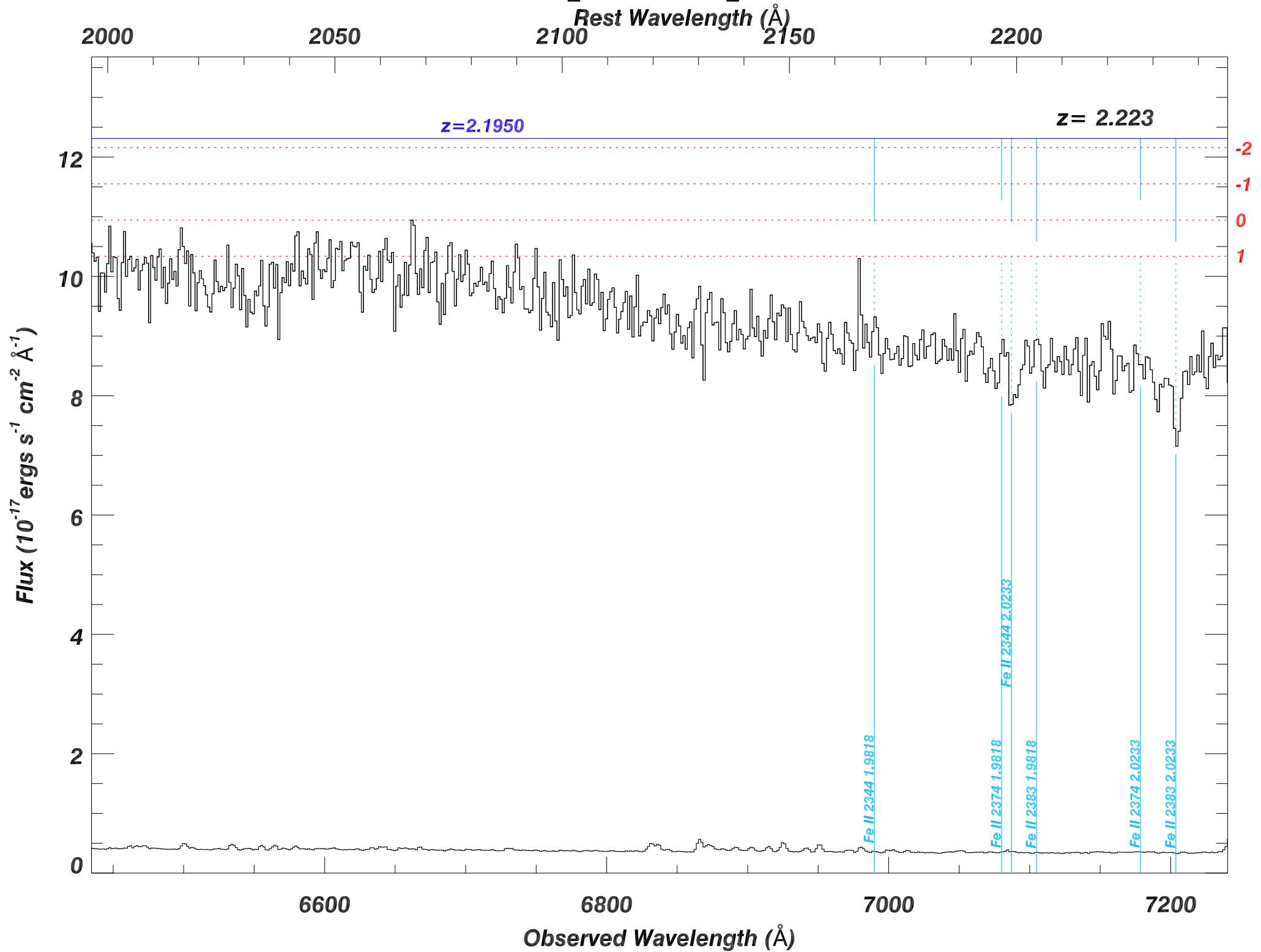
6000

6200

6400

Observed Wavelength (\AA)

SDSS_J1728+2802_MJD55711



SDSS_J1728+2802_MJD55711

Rest Wavelength (\AA)

2250

2300

2350

2400

2450

$z=2.1950$

$z=2.223$

Flux ($10^{-17} \text{ ergs s}^{-1} \text{ cm}^{-2} \text{ \AA}^{-1}$)

12

10

8

6

4

2

0

-2

-1

0

1

7200

7400

7600

7800

Observed Wavelength (\AA)

Fe II 2374 2.0233

Fe II 2383 2.0233

Fe II 2344 2.1396

Fe II 2344 2.1752

Fe II 2383 2.0233

Fe II 2383 2.1396

Fe II 2344 0.0

Fe II 2349 0.7

Fe II 2374 2.1752

Fe II 2374 2.1804

Fe II 2383 2.1752

Fe II 2383 2.1804

Fe II 2383 0.0

Fe II 2389 0.4

Fe II 2396 0.4

Fe II 2400 0.7

Fe II 2406 0.7

Fe II 2411 0.9

Fe II 2412 1.0

Fe II 2413 1.0

Fe II 2600 1.9818

Fe II 2587 2.0233

Fe II 2600 2.0233

Fe I 2484 0.0

SDSS_J1728+2802_MJD55711

Rest Wavelength (\AA)

2450

2500

2550

2600

2650

12

$z=2.1950$

$z=2.223$

-2

-1

0

1

10

8

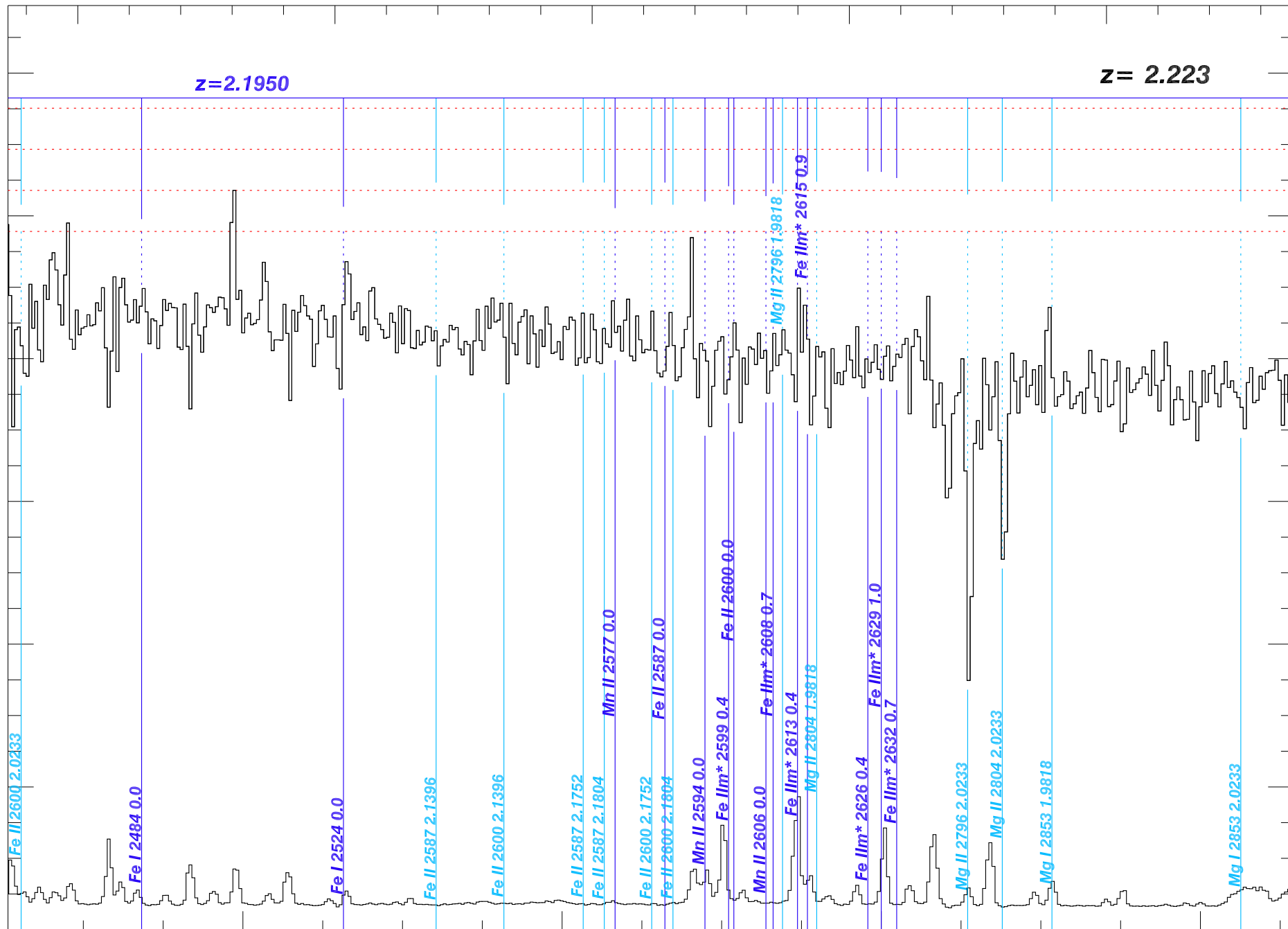
6

4

2

0

Flux ($10^{-17} \text{ ergs s}^{-1} \text{ cm}^{-2} \text{ \AA}^{-1}$)



8000

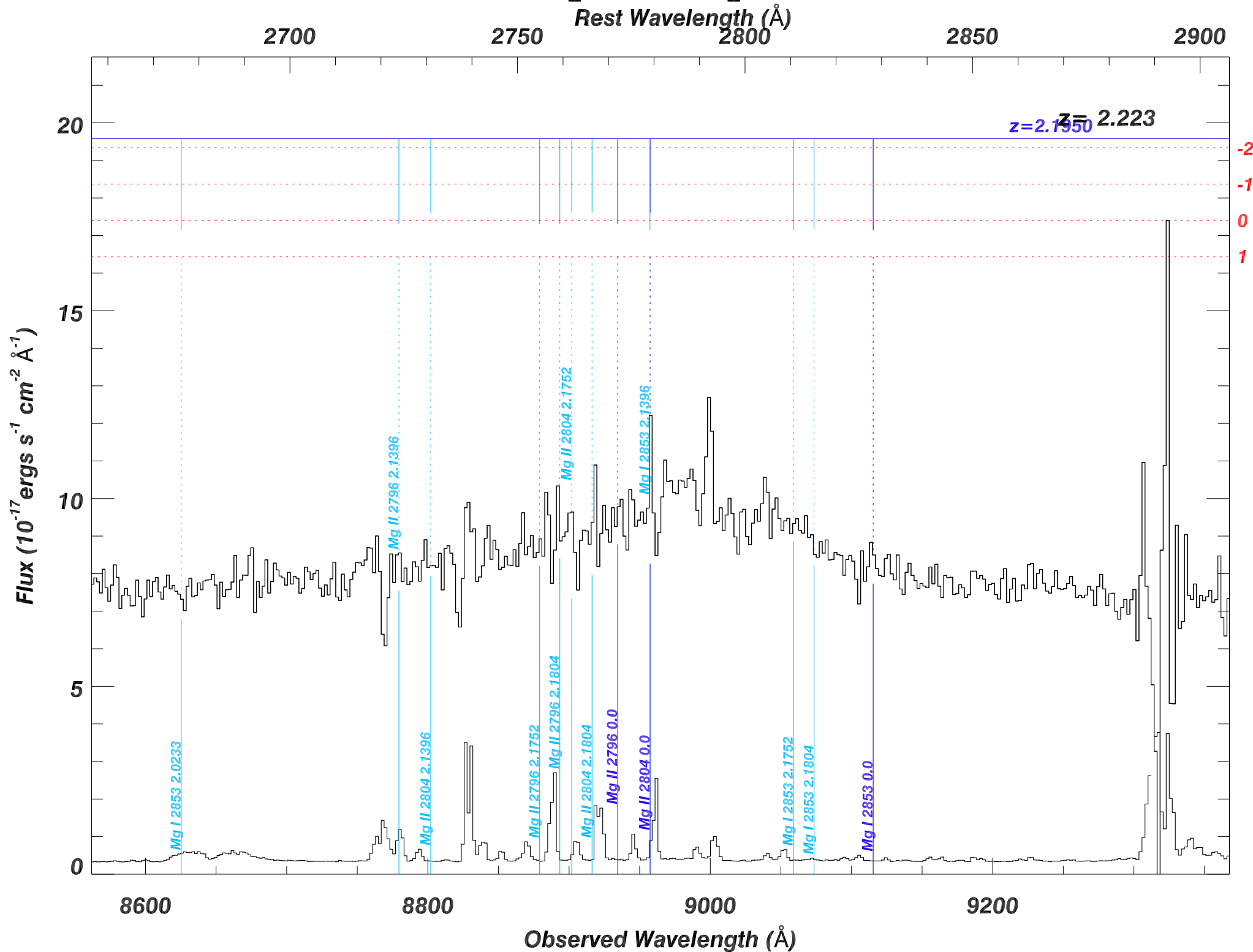
8200

8400

8600

Observed Wavelength (\AA)

SDSS_J1728+2802_MJD55711



SDSS_J1728+2802_MJD55711

Rest Wavelength (\AA)

2900

2950

3000

3050

3100

$z=2.1950$

$z=2.223$

-2

-1

0

1

Flux ($10^{-17} \text{ ergs s}^{-1} \text{ cm}^{-2} \text{ \AA}^{-1}$)

20

15

10

5

0

He I m* 2946.159.9

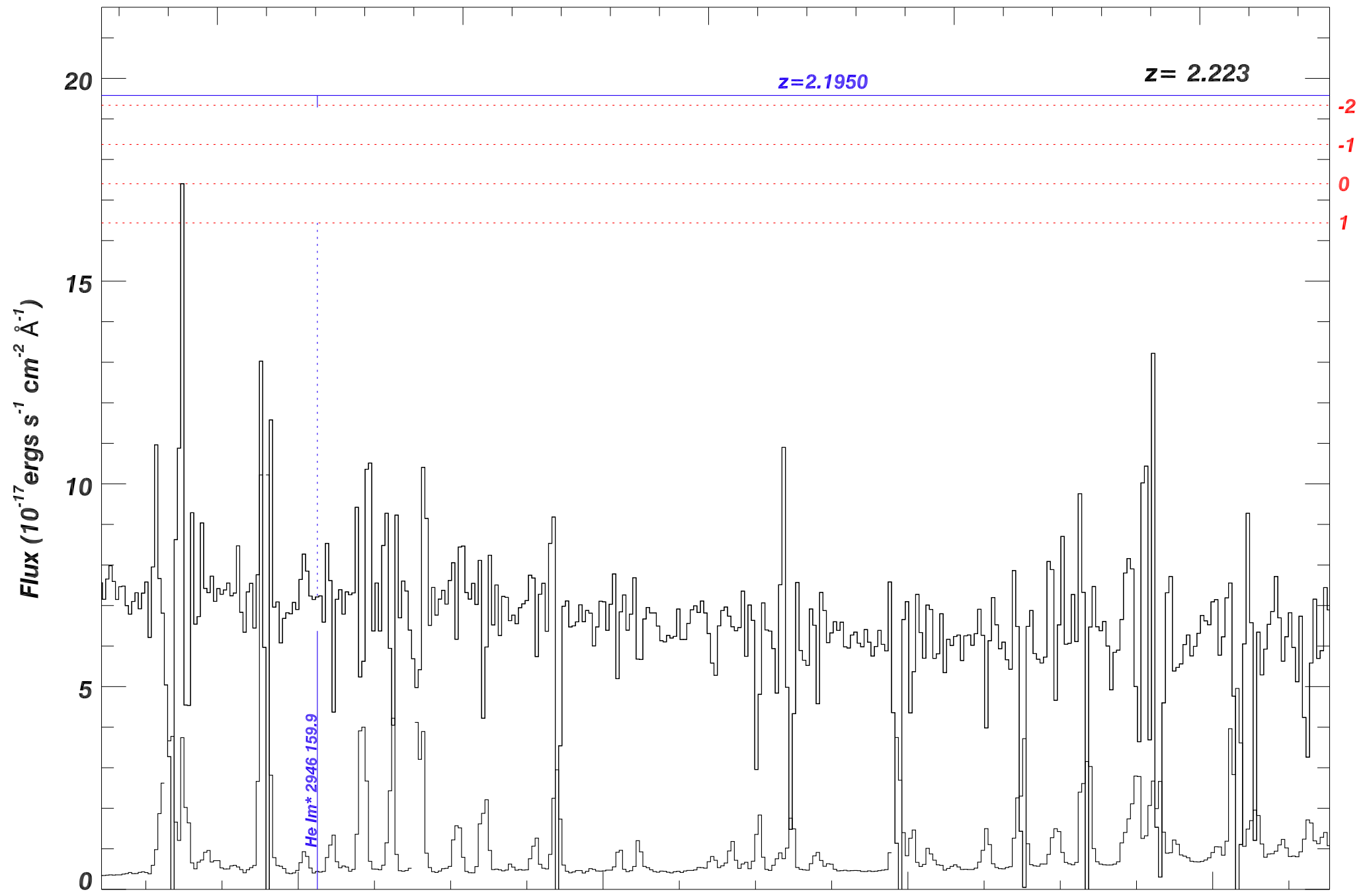
9400

9600

9800

10000

Observed Wavelength (\AA)



SDSS_J1728+2802_MJD55711

Rest Wavelength (\AA)

3100

3200

3300

3400

$z=2.1950$

$z = 2.223$

-2

-1

0

1

Flux ($10^{-17} \text{ ergs s}^{-1} \text{ cm}^{-2} \text{ \AA}^{-1}$)

60

40

20

0

He I m* 3189.159.9

1.00×10^4

1.02×10^4

1.04×10^4

1.06×10^4

1.08×10^4

1.10×10^4

1.12×10^4

Observed Wavelength (\AA)

