

60 inch Telescope Log

Observer: P. BerlindPI: J HuchraSpectrograph: FASTGrating: 302 3" slitPage: 2948Date: 5/1/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1-10	BHAS				0	circus
11-25	FLAT				0.1s	
26	F34	10:36:41.1	+43:21:50	6	3m	
27	COMP			↑		
28	N4151	12:08:01	+39:41:02	6	5m	
29	COMP			↑		delay @ 48"
30-31	06598 p5633	06:59:48	+46:33:00	1	5m	Hd
32	COMP			↑		
33	07485 p1016	07:48:30	+10:16:00	1	5m	Hd
34	07478 p1027	07:47:48	+10:27:00	1	5m	seeing ~1" - nice Hd
35	COMP			↑		
36	07482 p0943	07:48:12	+09:43:00	1	5m	system clock dizz. Hd had to reboot sparky
37	COMP			↑		
38	12102 m0227	12:10:12	-02:27:00	5	5m	+ reset cards Hd
39	COMP			↑		
40	12115 p012	12:11:30	+10:12:00	5	5m	
41	COMP			↑		
42	12137 p0812	12:13:42	+08:12:00	5	5m	Hd
43	COMP			↑		
44	12152 p0446	12:15:12	+04:46:00	5	5m	
45	COMP			↑		
46	12156 p0210	12:15:30	+02:10:00	5	5m	Hd
47	COMP			↑		
48	12168 m0020	12:16:48	-00:20:00	5	5m	another football galaxy on s
49	12171 m0027	12:17:06	-00:27:00	5	5m	slit 30" to E of this gal
50	COMP			↑		
51	12171 m0230	12:17:06	-02:30:00	5	5m	
52	COMP			↓		thin cloud
53	12171 p0219	12:17:06	+02:19:00	5	5m	Hd
54	COMP			↑		

33 looks like 2 objects on DSS - only 1 extracted at 8/31/98

## 60 inch Telescope Log

Observer: P. BerlindPI: J. HuchraSpectrograph: FASTGrating: 300EDate: 5/1/94Page: 2949

Number	Object	R.A.	Dec.	L/R	Exp	Comments
55	12187m0034	12:18:42	-0:34:00	S	5m	
56	12190m0033	12:19:00	-0:33:00	S	5m	
57	COMP			↑		
58	12196p0514	12:19:36	+05:14:00	S	5m	H $\alpha$
59	12196p0623	12:19:36	+06:23:00	S	5m	H $\alpha$
60	COMP			↑		
61	12198p0712	12:19:48	+07:12:00	S	5m	IC 3218
62	COMP			↑		
63	12201p0555	12:20:06	+05:55:00	S	5m	H $\alpha$
64	COMP			↑		increasing clouds
65	12203m0223	12:20:18	-02:23:00	S	5m	H $\alpha$
66	COMP			↑		
67	12221p0150	12:22:06	+01:50:00	S	5m	H $\alpha$
68	12217p0141	12:21:42	+01:41:00	S	5m	
69-70	12213p0140	12:21:18	+01:40:00	S	5m	H $\alpha$
71	COMP			↑		
72	12218m0024	12:21:48	-0:24:00	S	5m	
73	COMP			↑		
74	12221p0211	12:22:06	+02:11:00	S	5m	
75	COMP			↑		
76	12236m0204	12:23:36	-02:04:00	S	5m	
77	COMP			↑		
78	12249p0815	12:24:54	+08:15:00	S	5m	H $\alpha$
79	COMP			↑		
80	12257p0706	12:25:42	+07:06:00	S	5m	H $\alpha$
81	COMP			↑		
82	12259p0225	12:25:54	+00:25:00	S	5m	needs more
83	COMP			↑		
84	12465p0731	12:46:30	+07:31:00	S	5m	
85	12456p0715	12:45:36	+07:15:00	S	5m	

60 inch Telescope Log

Observer: P. BerlindPI: J HuchraSpectrograph: FASIGrating: 3WDate: 5/1/94Page: 2950

Number	Object	R. A.	Dec.	L/R	Exp	Comments
86	COMP			↑		
87	12459 p0342	12:45:54	+03:42:00	S	5m	TV getting bad noise H:
88	12471 p0301	12:47:06	+03:01:00	S	5m	H:
89	COMP			↑		
90	H244	13:21:19.1	+36:23:38	2	3m	
91	COMP			↑		
92	COMP			↓		
93	SN1994E	13:27:47.6	+17:26:59	2	30m	1x30 as requested
94	COMP			↑		
95	14485 p0649	14:48:30	+06:49:00	1	5m	TV real bad
96	COMP			↓		
97	14489 p0700 N	14:48:54	+07:00:00	1	5m	N comp H $\alpha$
98	14489 p0700 S	14:48:54	+07:00:00	1	5m	H $\alpha$
99	COMP			↑		
100	14490 p0616 S	14:49:00	+06:16:00	1	5m	
101	14490 p0616 N	14:49:00	+06:16:00	1	5m	
102	14490 p0619	14:49:00	+06:19:00	1	5m	H $\alpha$
103	COMP			↑		
104	15230 p0716	15:23:30	+07:16:00	1	5m	H $\alpha$
105	COMP			↑		
106	15239 p0400	15:23:54	+04:00:00	1	5m	also observed 4/2/94 +1
107	COMP			↑		
108	15286 p0710 NW	15:28:36	+07:10:00	1	5m	bright moon H $\alpha$
109	15286 p0710 SE	15:28:36	+07:10:00	1	5m	
110	COMP			↑		
111	15338 p0605	15:33:48	+06:05:00	1	5m	H $\alpha$
112	COMP			↑		
113	15388 p0414	15:38:48	+04:14:00	1	5m	Keeper
114	COMP			↑		
115	15406 p0602	15:40:24	+06:02:00	1	5m	HB, H $\alpha$ , OIII, N, S, and Na (all in emission)

60 inch Telescope Log

Observer: P. Berlind

PI: J Huchra

Spectrograph: FAST

Grating: 300

Date: 5/1/94

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Number	Object	R. A.	Dec.	L/R	Exp	Comments
116	COMP			↑		
117	1606Sp0110	16:06:30	+01:10:40	1	Sm	
118	16077p0110	16:07:42	+01:10:40	1	Sm	
119	COMP			↑		
120	16082p0214	16:08:12	+02:14:00	1	SM	
121	COMP			↑		
122-23	16112p0039	16:11:12	+00:39:00	1	SM	x2 H $\alpha$
124	COMP			↑		
125	U10306	16:14:12	+00:21:00	1	Sm	
126	COMP			↑		
127	16168p0150	16:16:48	+01:50:00	1	SM	H $\alpha$
128	COMP			↑		
129	16178p0120	16:17:48	+01:20:00	1	SM	H $\alpha$ - comes through w/ strong H $\delta$ !
130	COMP			↑		
131	16178p0152	16:17:48	+01:52:00	1	Sm	H $\alpha$
132	COMP			↑		
133	16182p0038N	16:18:12	+00:38:00	1	Sm	North Comp
134	16182p0038S	16:18:12	+00:38:00	1	Sm	South H $\alpha$
135	16182p0038N	"	"	1	Sm	N again needs more still
136	COMP			↑		
137-146	BIAS				0s	

→  
→

60 inch Telescope Log

Spectrograph: FASTObserver: J. PetersGrating: 300Page: 2952PI: J. Huchra et alDate: 5/2/99

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1	Comp	Test	File		10 <sup>s</sup>	Flats + Bias Frames
2	Comp			↓	10 <sup>s</sup>	were combined.
3	AGK2P14783	07 17 48	15 01 00	0	10 <sup>s</sup>	
4	Comp			↓	10 <sup>s</sup>	
5	AGK2P43928	09 49 18	43 42 00	0	10 <sup>s</sup>	
6	Comp			↓	10 <sup>s</sup>	
7	12010P0031	12 01 00	01 31 00	5	10 <sup>m</sup>	3C273 Survey
8	Comp			↓	10 <sup>s</sup>	↓
9	12014P0710	12 01 24	07 10 00	5	15 <sup>m</sup>	↓
10	12014P0710	↓	↓	5	15 <sup>m</sup>	↓
11	Comp			↓	10 <sup>s</sup>	
12	12028P0222	12 02 48	02 22 00	5	10 <sup>m</sup>	3C273
13	Comp			↓	10 <sup>s</sup>	
14	12044N0058	12 04 24	-00 58 00	5	15 <sup>m</sup>	TV Piece of Sh--
15	Comp			↓	10 <sup>s</sup>	TV Full of Lines
16	12048P0637	12 04 48	06 37 00	5	10 <sup>m</sup>	3C273
17	Comp			↓	10 <sup>s</sup>	
18	Feige 56	12 04 13	11 56 55	0	3 <sup>m</sup>	Lamp Failure?
19	Comp			↓	10 <sup>s</sup>	Going ON
20	SN1994D	12 31 31	07 58 30	2	30 <sup>m</sup>	Bob K.
21	Comp			↓	10 <sup>s</sup>	
22	HZ 44	13 21 19	36 23 38	0	10 <sup>s</sup>	Guide TV Full Lines
23	CEX			↓	10 <sup>s</sup>	Hard To guide.
24	SN 1994I	13 27 47	47 26 59	2	30 <sup>m</sup>	
25	Comp			↓	10 <sup>s</sup>	Lamp failure?
26	GD140	11 34 27	30 04 35	0	2 <sup>m</sup>	
27	Comp			↓	10 <sup>s</sup>	Lamp OK
28	N4151	12 08 01	39 41 02	6	30 <sup>s</sup>	
29	Comp			↓	10 <sup>s</sup>	
30	Feige 67	12 39 18	17 47 24	0	2 <sup>m</sup>	

209362

## 60 inch Telescope Log

Observer: J. PetersPI: J. HuchraSpectrograph: FastGrating: 300Page: 2959Date: 5/2/94

Number	Object	R. A.	Dec.	L/R	Exp	Comments
31	Comp			↓	10 <sup>s</sup>	
32	N4486B	12 28 00	12 45 59	0	5 <sup>m</sup>	
33	Comp			↓	10 <sup>s</sup>	
34	HZ 43	13 14 00	29 21 49	0	5 <sup>m</sup>	
35	Comp			↓	10 <sup>s</sup>	Lamp hard Time coming
36	N5548	14 15 43	25 22 01	6	5 <sup>m</sup>	LOW LAMP 209362 Ho- <del>AK</del>
37	Comp			↓	10 <sup>s</sup>	
38	12565 N 0253	12 56 30	-02 53 00	5	15 <sup>m</sup>	30273
39	Comp			↓	10 <sup>s</sup>	
40	12572 P 0746	12 57 12	07 46 00	5	15 <sup>m</sup>	
41	Comp			↓	10 <sup>s</sup>	
42	12573 P 0435	12 57 18	04 35 00	5	15 <sup>m</sup>	
43	12573 P 0435	↓	↓	5	15 <sup>m</sup>	
44	Comp			↓	10 <sup>s</sup>	
45	12596 P 0342	12 59 36	03 42 00	5	15 <sup>m</sup>	
46	Comp			↓	10 <sup>s</sup>	
47	12597 P 0430	12 59 42	04 30 00	5	15 <sup>m</sup>	TV FULL of Lines
48	Comp			↓	10 <sup>s</sup>	
49	12597 P 0647	12 59 42	06 47 00	5	15 <sup>m</sup>	
50	Comp			↓	10 <sup>s</sup>	TV FULL of Lines
51	1615 P 2141 A	16 15 54	21 41 00	5	15 <sup>m</sup>	can't see obj.
52	1615 P 2141 A	↓	↓	5	15 <sup>m</sup>	
53	Comp			↓	10 <sup>s</sup>	
54	1615 P 2141 B	↓	↓	5	15 <sup>m</sup>	
55	1615 P 2141 B	↓	↓	5	15 <sup>m</sup>	
56	Comp			↓	10 <sup>s</sup>	Lamp getting hard
57	16041 P 0316	16 04 09	03 17 00	5	15 <sup>m</sup>	To Turn ON.
58						
59						
60						

60 inch Telescope Log

Spectrograph: FASTObserver: J. PetersGrating: 300Page: 2954PI: J. HuchraDate: 5/3/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1	Comp			↓	10 <sup>s</sup>	FLATS + Bias Frames
2	AGK2P14783	07 17 48	15 01 00	0	15 <sup>s</sup>	Combined.
3	Comp			↓	10 <sup>s</sup>	Clamp Problem on
4	AGK2P43928	09 49 18	43 42 00	0	10 <sup>s</sup>	2He-AR
5	Comp			↓	10 <sup>s</sup>	
6	Feige 67	12 39 18	17 47 24	0	2 <sup>m</sup>	
7	Comp			↓	10 <sup>s</sup>	Clouds around
8	SN1994M	12 2835	00 5259	2	20 <sup>m</sup>	This is Rush Job.
9	Comp			↓	10 <sup>s</sup>	
10	HZ 44	13 21 19	36 23 38	0	2 <sup>m</sup>	
11	Comp			↓	10 <sup>s</sup>	Guide TV Full Lines
12	GD 140	11 34 27	30 01 35	0	2 <sup>m</sup>	
13	Comp			↓	10 <sup>s</sup>	
14	N4151	12 08 01	39 41 02	6	30 <sup>s</sup>	
15	Comp			↓	10 <sup>s</sup>	
16	N4486B	12 28 00	12 45 59	0	5 <sup>m</sup>	
17	Comp			↓	10 <sup>s</sup>	
18	12074P0016	12 07 24	00 16 00	5	15 <sup>m</sup>	TV Full of Lines, Bad
19	Comp			↓	10 <sup>s</sup>	} This isn't } A LOT of } Few Folks
20	12076N0142	12 07 42	-01 42 00	5	10 <sup>m</sup>	
21	Comp			↓	10 <sup>s</sup>	
22	12080N0257	12 08 00	-02 57 00	5	10 <sup>m</sup>	
23	Comp			↓	10 <sup>s</sup>	
24	12088P0120	12 08 48	01 20 00	5	15 <sup>m</sup>	↓
25	Comp			↓	10 <sup>s</sup>	↓
26	12185P0721	12 18 30	07 21 00	5	10 <sup>m</sup>	↓
27	Comp			↓	10 <sup>s</sup>	↓
28	12259P0025	12 25 54	00 25 00	5	15 <sup>m</sup>	↓
29	Comp			↓	10 <sup>s</sup>	↓
30	12263P0625	12 26 18	06 25 00	5	10 <sup>m</sup>	↓

60 inch Telescope Log

Observer: J. PetersPI: J. HuchraSpectrograph: FestGrating: 300Page: 2955Date: 5/3/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
31	Comp			↓	10 <sup>s</sup>	Guided TV full of Lines
32	12332 P0327	12 33 12	03 29 00	5	15 <sup>m</sup>	
33	Comp			↓	10 <sup>s</sup>	
34	12336 P0521	12 33 36	05 21 00	5	10 <sup>m</sup>	
35	Comp			↓	10 <sup>s</sup>	
36	12346 P0542	12 34 36	05 42 00	5	15 <sup>m</sup>	
37	Comp			↓	10 <sup>s</sup>	
38	12358 N0042	12 35 48	-00 42 00	5	15 <sup>m</sup>	
39	Comp			↓	10 <sup>s</sup>	
40	12373 P0405	12 37 18	04 05 00	5	15 <sup>m</sup>	
41	Comp			↓	10 <sup>s</sup>	
42	12384 P0116	12 38 24	01 16 00	5	15 <sup>m</sup>	
43	Comp			↓	10 <sup>s</sup>	
44	12394 N 0055	12 39 24	-00 55 00	5	15 <sup>m</sup>	
45	Comp			↓	10 <sup>s</sup>	
46	12406 N 0214	12 40 36	-02 14 00	5	10 <sup>m</sup>	
47	Comp			↓	10 <sup>s</sup>	
48	HZ 43	13 14 00	29 21 49	0	3 <sup>m</sup>	
49	Comp			↓	10 <sup>s</sup>	
50	N5548	14 15 43	25 22 01	6	5 <sup>m</sup>	
51	Comp			↓	10 <sup>s</sup>	
52	1615P2141C	16 15 54	21 41 00	1	15 <sup>m</sup>	
53	1615P2141C	↓	↓	1	15 <sup>m</sup>	TV Flashing wait
54	Comp			↓	10 <sup>s</sup>	for it to settle
55	RX1718 P5640	17 17 18	56 42 58	1	55	down. 15 <sup>m</sup>
56	Comp			↓	10 <sup>s</sup>	
57	BDP404032	20 06 40	41 06 15	0	2 <sup>m</sup>	
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59						
60						



## 60 inch Telescope Log

Observer: J. PetersPI: J. HechmaSpectrograph: FASTGrating: 300Page: 1956Date: 5/4/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1	Comp			↓	10 <sup>s</sup>	FLATS & Bias Frames
2	AGK2P14783	07 17 48	15 01 00	0	15 <sup>s</sup>	combined.
3	Comp			↓	10 <sup>s</sup>	
4	AGK2P43928	07 49 18	43 42 00	0	10 <sup>s</sup>	
5	Comp			↓	10 <sup>s</sup>	TV full of lines
6	GW140	11 34 27	30 04 35	0	2 <sup>m</sup>	
7	Comp			↓	10 <sup>s</sup>	
8	N4151	12 08 01	39 41 02	6	30 <sup>s</sup>	
9	Comp			↓	10 <sup>s</sup>	
10	Fege 67	12 39 18	17 47 24	0	2 <sup>m</sup>	
11	Comp			↓	10 <sup>s</sup>	
12	N4486 B	12 28 00	12 45 59	0	5 <sup>m</sup>	
13	Comp			↓	10 <sup>s</sup>	
14	SN1994M	12 28 34	00 52 22	2	20 <sup>m</sup>	
15	Comp			↓	10 <sup>s</sup>	
16	SN1994I	13 27 47	47 26 59	2	30 <sup>m</sup>	
17	Comp			↓	10 <sup>s</sup>	
18	HZ44	13 21 19	36 23 38	0	2 <sup>m</sup>	
19	Comp			↓	10 <sup>s</sup>	
20	11590NO144	11 59 00	-01 44 00	5	15 <sup>m</sup>	
21	Comp			↓	10 <sup>s</sup>	
22	12002NO152	12 00 12	-01 52 00	5	15 <sup>m</sup>	
23	Comp			↓	10 <sup>s</sup>	
24	12060P0211	12 06 00	02 11 00	5	15 <sup>m</sup>	This TV. could drive
25	Comp			↓	10 <sup>s</sup>	you out of your mind.
26	12271P0354	12 27 06	03 54 00	5	15 <sup>m</sup>	
27	Comp			↓	30 <sup>s</sup>	I Turned The TV
28	15382P0736	15 38 12	07 36 00	1	15 <sup>m</sup>	off For 2 hrs.
29	Comp			↓	10 <sup>s</sup>	
30	HZ 43	13 14 00	29 21 49	0	5 <sup>m</sup>	

60 inch Telescope Log

Spectrograph: FastObserver: J. PetersGrating: 300Page: 2957PI: J. HuchraDate: 5/4/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
31	Comp P			↓	10 <sup>s</sup>	
32	N5548	14 15 43	25 22 01	6	5 <sup>m</sup>	
33	Comp P			↓	10 <sup>s</sup>	
34	15042 P0111	15 04 12	01 11 00	1	5 <sup>m</sup>	
35	Comp P			↓	10 <sup>s</sup>	
36	15044 P0022	15 04 24	00 22 00	1	5 <sup>m</sup>	
37	Comp P			↓	10 <sup>s</sup>	
38	15049 P0050	15 04 54	00 50 00	1	6 <sup>m</sup>	
39	Comp P			↓	10 <sup>s</sup>	
40	15063 P0022	15 06 18	00 22 00	1	10 <sup>m</sup>	
41	Comp P			↓	10 <sup>s</sup>	
42	15065 P0001	15 06 30	00 01 00	1	10 <sup>m</sup>	
43	Comp P			↓	10 <sup>s</sup>	
44	15071 P0134	15 07 06	01 34 00	1	10 <sup>m</sup>	Clouds Coming In
45	15074 P0135	15 07 24	01 35 00	1	15 <sup>m</sup>	
46	15074 P0135	↓	↓	1	15 <sup>m</sup>	STR IN SLIT ALSO
47	Comp P			↓	10 <sup>s</sup>	
48	16383 P0209	16 58 18	02 09 00	1	10 <sup>m</sup>	THRU Clouds
49	Comp P			↓	10 <sup>s</sup>	
50	B0 P253941	19 42 21	26 06 00	0	2 <sup>m</sup>	Thin Clouds
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60						

60 inch Telescope Log

Observer: P. Berlind

PI: J. Huchra

Spectrograph: FAST

Grating: 3002

Date: 5/5/94

Page: 2958

Number	Object	R. A.	Dec.	L/R	Exp	Comments
1-10	BIAS				0s	heavy cirrostratus
11-25	FLAT				0.1s	
26	10459p0504	10:45:54	+05:04:00	1	5m	through clouds
27	COMP			↑		delay for clouds
28-29	10452p0621	10:48:12	+06:21:00	1	5m	29: small cloud fix 6850
30	COMP			↑		
31	F31	10:36:41.1	+13:21:50	6	5m	through clouds
32	COMP			↑		
33	N4151	12:08:01	+39:41:02	6	5m	
34	COMP			↑		
35	H243	13:14:00.7	+29:21:49	6	5m	
36	COMP			↑		
37	N5548	14:15:43	+25:22:01	6	5m	heavy cloud
38	COMP			↑		
39	H244	13:21:19.1	+36:23:38	2	5m	
40	COMP			↑		
41	SN1994M	12:28:35	+10:52:54	2	vis	exposure stored before finish
42	SN1994M	"	"	2	20m	stop/199 for clouds
43	COMP			↑		
44	SN1994D	12:31:31	+09:57:30	2	20m	
45	COMP			↑		
46	12449p0502	12:44:54	+05:02:00	5	5m	
47	COMP			↑		
48-49	12455p0458	12:45:30	+04:58:00	5	5m	
50	COMP			↑		
51	12472p0502	12:47:12	+05:02:00	5	5m	
52	COMP			↑		stop+go w/ clouds
53	13369p0445	13:36:54	+04:45:00	1	5m	H $\alpha$
54	U8635	13:36:42	+04:52:00	1	5m	H $\alpha$
55	13362p0442	13:36:12	+04:42:00	1	5m	H $\alpha$

791-11836  
 29 - NOTHING  
 ON SLIT  
 Scattered  
 cloud here  
 were  
 missed



60 inch Telescope Log

Observer: P. Berlind

PI: JHuchra

Spectrograph: FAST

Grating: 300

Date: 5/6/94

Page: 2960

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1-10	BIAS				0s	clouds after sunset
11-20	FLAT				0.1	
21-22	11280p0401	11:28:40	+04:01W	1	5m	H <sub>α</sub>
23	COMP			↑		
24	11285p0325	11:28:30	+03:25W	1	5m	H <sub>α</sub>
25	COMP			↑		still some clouds - thin
26	11287p0456NE	11:28:42	+04:56W	1	5m	H <sub>α</sub>
27	11287p0456SW	11:28:42	+04:56W	1	5m	H <sub>α</sub>
28	COMP			↑		seems ~2"
29	11289p0621	11:28:54	+06:21W	1	5m	star to W H <sub>α</sub>
30	COMP			↑		
31	11298p0527	11:29:48	+05:27W	1	5m	H <sub>α</sub>
32	COMP			↑		
33	11304p0206	11:30:24	+02:06W	1	5m	H <sub>α</sub>
34	COMP			↑		
35-6	12217p0130	12:21:42	+01:30W	1	5m	6751 - H <sub>α</sub>
37	COMP			↑		
38	12216p0129SE	12:21:36	+01:29W	1	5m	SE comp H <sub>α</sub>
39-40	12216p0129NW	12:21:36	+01:29W	1	5m	NW star?
41	COMP			↑		
42,43	12267m0104	12:26:42	-01:04W	5	5m	H <sub>α</sub> → 6625
44	COMP			↑		
45	13113p0224	13:11:18	+02:24W	1	5m	
46	COMP			↑		
47	13128p0135	13:12:48	+01:35W	1	5m	H <sub>α</sub>
48	COMP			↑		
49	13130p0445	13:13:40	+04:45W	1	5m	was clouds - try again
50	COMP			↑		
51	SN1994M	12:28:35	+05:52:54	2	30m	clouds - a little extra time
52	COMP			↑		

38, 39, 40, 3940      Southern object in W + Northern obj is E  
 Changed 38 to 12216 p 0129 SW  
 + 39, 40, 3940 to 12216 p 0129 NE      9/1/98 vt  
 couldn't find original finding chart



60 inch Telescope Log

Observer: P. BerthelPI: J. HuchraSpectrograph: FASTGrating: 300Date: 5/7/94Page: 2962

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1-10	BIAS				0s	
11-25	FLAT				0.1s	thin cirrostrat
26	N4151	12:08:01	+39:41:02	6	5m	through alot of cloud; twilight
27	COMP			↑		
28	F34	10:36:41	+43:21:50	6	3m	
29	COMP			↑		
30	U05106	09:32:24	+54:49:00	1	5m	
31	COMP			↑		
32	09332p5320	09:33:12	+53:20:00	1	5m	
33	COMP			↑		
34	09352p5204	09:35:18	+52:04:00	1	5m	
35	COMP			↑		
36	09413p5155	09:41:18	+51:55:00	1	5m	H <sub>α</sub>
37	COMP			↑		
38	U05207	09:41:48	+57:55:00	1	5m	TV acting up: v. noisy!
39	COMP			↑		
40	09427p5450	09:42:42	+54:50:00	1	5m	
41	09433p5440	09:43:18	+54:40:00	1	5m	
42	09434p5441	09:43:24	+54:41:00	1	5m	clearing????!!!
43	COMP			↑		
44	09436p5452	09:43:36	+54:32:00	1	5m	
45	09439p5443	09:43:54	+54:43:00	1	5m	
46	COMP			↑		
47	J09438p3032	09:43:49.3	+30:32:44	3	5m	
48	COMP			↑		
49	J09449p3105	09:44:56.7	+31:05:51	3	5m	
50	COMP			↑		
51	J09478p3116	09:47:48.3	+31:16:38	3	5m	
52	COMP			↑		
53	J09496p3213	09:49:41.4	+32:13:11	3	5m	H <sub>α</sub>

60 inch Telescope Log

Observer: P. BertiniPI: J. HuchraSpectrograph: FASTGrating: 300Page: 2963Date: 5/7/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
54	COMP			↑		
55	J09533p3104	09:53:18.4	+31:04:10	3	5m	H $\alpha$
56	COMP			↑		
57	12368p0013	12:36:48	+0:43:00	5	5m	star just east of galaxy
58	12362p0035	12:36:12	+0:35:00	5	5m	
59	COMP			↑		
60-61	12368p0141	12:36:48	+0:41:00	5	5m	
62	COMP			↑		
63	17383p0448	12:38:18	+0:48:00	5	5m	H $\alpha$
64	COMP			↑		
65	12387m0030	12:38:42	-0:30:00	5	5m	H $\alpha$
66	COMP			↑		
67	SN1994M	12:28:35	+052:54	2	20m	M, not $\pm$
68	COMP			↑		
69	H244	13:21:19.1	+36:23:38	2	3m	
70	COMP			↑		delay on clouds
71	I939	13:45:12	+03:39:00	1	5m	
72-73	I940	13:45:24	+03:42:00	1	5m	H $\alpha$ 6752
74	COMP			↑		stopped by clouds
75-76	I1054	14:44:00	+01:29:00	1	5m	U 09514
77	COMP			↑		stopped by clouds
78	I1054	"	"	1	5m	got it!
79	COMP			↑		
80,81	17032p3028N	17:03:12	+30:28:00	1	5m	H $\alpha$ $z=0.377$ 11288 $\pm$ 69
82	17032p3028S	17:03:12	+30:28:00	1	5m	H $\alpha$ $z=0.363$ 10852 $\pm$ 15
83	17032p3028E	"	"	1	5m	too faint
84	COMP			↑		
85	18191p3806EW	18:19:06	+38:06:00	1	5m	2 galaxies on slit E+W
86	18191p3806NW	18:19:06	+38:06:00	1	5m	9289 $\pm$ 27
87	COMP			↑		

W have file B4  
E file B5



60 inch Telescope Log

Observer:

P. Berlind

PI:

J. Huchra

Spectrograph:

FAST

Grating:

300

Date:

5/7/94

Page:

2964

Number	Object	R.A.	Dec.	L/R	Exp	Comments
88-89	18389p2302	18:38:54	+23:02:00	1	5m	U11323 H $\alpha$
90	COMP			↑		galaxy
91	RX1750p3504A	17:48:28.2	+38:06:37.3	1	5m	Note: to avoid <sup>FO</sup> confusion,
92	RX1750p3504B	"	"	1	3m	star I observed all of these
93	RX1750p3504C	"	"	1	3m	star objects separately and
94	RX1750p3504D	"	"	1	3m	star put the object at
95	COMP			↑		~ row 80 on the chip.
96,97	RX1852p5711A	18:51:17.8	+57:07:54.8	1	5m	galaxy
98,99	RX1852p5711B	18:51:17.8	+57:07:54.8	1	5m	
100	COMP			↑		
101	18159p1805	18:15:54	+18:05:00	1	5m	H $\alpha$
102	COMP			↑		
103	18567p6950	18:56:42	+69:50:00	1	5m	
104	18567p6950	"	"	1	10m	
105	COMP			↑		more clouds
106-7	19268p7710	19:26:48	+77:10:00	1	5m	H $\alpha$
108	COMP			↑		
109-118	FEAS				05	

60 inch Telescope Log

Observer: J. PetersPI: Huchra et alSpectrograph: FASTGrating: 300Page: 2965Date: 5/8/94

Number	Object	R. A.	Dec.	L/R	Exp	Comments
1	Com P			↓	10 <sup>s</sup>	
2	AGK2P14793	07 17 48	15 01 00	0	10 <sup>s</sup>	
3	Com P			↓	10 <sup>s</sup>	
4	AGK2P43928	09 49 18	43 42 00	0	10 <sup>s</sup>	
5	Com P			↓	10 <sup>s</sup>	
6	11576 P1930	11 57 36	19 30 00	1	15 <sup>m</sup>	I hope I see This Thing.
7	11576 P1930	↓	↓	1	15 <sup>m</sup>	TV filling Up with Lines
8	Com P			↓	10 <sup>s</sup>	
9	11568 P2118	11 56 48	21 18 00	1	15 <sup>m</sup>	
10	11568 P2118	↓	↓	1	15 <sup>m</sup>	
11	Com P			↓	10 <sup>s</sup>	
12	60 140	11 34 27	30 04 35	0	2 <sup>m</sup>	
13	Com P			↓	10 <sup>s</sup>	
14	N4151	12 08 01	39 41 02	6	30 <sup>s</sup>	
15	Com P			↓	10 <sup>s</sup>	
16	N4486B	12 28 00	12 45 59	0	5 <sup>m</sup>	
17	Com P			↓	10 <sup>s</sup>	
18	Feige 67	12 39 18	17 47 24	0	2 <sup>m</sup>	
19	Com P			↓	10 <sup>s</sup>	
20	Feige 56	12 04 13	11 56 55	0	2 <sup>m</sup>	
21	Com P			↓	10 <sup>s</sup>	ITS Tough To See
22	SN 1994M	12 28 35	00 52 54	2	20 <sup>m</sup>	SN Thru Lines on TV
23	Com P			↓	10 <sup>s</sup>	This is best You Get.
24	HZ 44	13 21 19	36 23 38	0	2 <sup>m</sup>	
25	Com P	1 <sup>o</sup>		↓	10 <sup>s</sup>	
26	SN 1994I	13 27 47	47 26 59	2	30 <sup>m</sup>	Looks Like were
27	Com P			↓	10 <sup>s</sup>	getting mostly Galaxy
28	HZ 43	13 14 00	29 21 49	0	5 <sup>m</sup>	
29	Com P			↓	10 <sup>s</sup>	
30	N5548	14 15 43	25 22 01	6	5 <sup>m</sup>	

60 inch Telescope Log

Observer: J. PetersPI: J. Huchra et alSpectrograph: FastGrating: 300Page: 2966Date: 5/8/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
31	Comp			↓	10 <sup>s</sup>	Clouds over Tucson
32	12571 P0330	12 37 36	03 30 00	5	10 <sup>m</sup>	Small Cloud Near Mt
33	Comp			↓	10 <sup>s</sup>	
34	13022 P0410	13 02 12	04 10 00	5	10 <sup>m</sup>	
35	13028 P0455	13 02 48	04 55 00	5	10 <sup>m</sup>	Comp out End.
36	Comp			↓	10 <sup>s</sup>	
37	Comp			↓	10 <sup>s</sup>	
38	13042 P0247	13 04 12	02 47 00	5	15 <sup>m</sup>	
39	Comp			↓	10 <sup>s</sup>	
40	13053 P0328	13 05 18	03 28 00	5	15 <sup>m</sup>	
41	Comp			↓	10 <sup>s</sup>	
42	13055 P0114	13 05 30	01 14 00	5	15 <sup>m</sup>	
43	Comp			↓	10 <sup>s</sup>	
44	13055 P0352	13 05 30	03 52 00	5	10 <sup>m</sup>	
45	Comp			↓	10 <sup>s</sup>	
46	1426 P2603	14 25 58	26 03 12	1	15 <sup>m</sup>	
47	1426 P2556	14 26 24	25 56 00	1	15 <sup>m</sup>	
48	1426 P2556	↓	↓	1	15 <sup>m</sup>	
49	Comp			↓	10 <sup>s</sup>	
50	1448 P1212	14 48 42	12 12 00	1	15 <sup>m</sup>	
51	1448 P1212	↓	↓	1	15 <sup>m</sup>	
52	1448 P1212	↓	↓	1	15 <sup>m</sup>	
53	Comp			↓	10 <sup>s</sup>	
54	J16397 P3231	16 39 41	32 31 09	3	5 <sup>m</sup>	Geller *
55	Comp			↓	10 <sup>s</sup>	
56	A2198A	16 27 55	43 56 53	9	15 <sup>m</sup>	
57	Comp			↓	10 <sup>s</sup>	
58	15541 P0214	15 54 06	02 14 00	1	15 <sup>m</sup>	
59	Comp			↓	10 <sup>s</sup>	
60	BD P2539 41	19 42 21	26 06 00	0	1 <sup>m</sup>	

60 inch Telescope Log

Spectrograph: FASTObserver: J. PetersGrating: 300Page: 2967PI: J. Huxford et al.Date: 5/9/94

Number	Object	R. A.	Dec.	L/R	Exp	Comments
1	Comp			↓	10 <sup>s</sup>	lots of clouds
2	AGK2P14783	07 17 48	15 01 00	0	10 <sup>s</sup>	Around.
3	Comp			↓	10 <sup>s</sup>	
4	AGK2P43928	09 49 18	43 42 00	0	10 <sup>s</sup>	
5	Comp			↓	10 <sup>s</sup>	
6	SN1994D	12 31 31	07 58 30	2	30 <sup>m</sup>	
7	Comp			↓	10 <sup>s</sup>	
8	Feige 56	12 04 13	11 56 55	0	3 <sup>m</sup>	
9	Comp			↓	10 <sup>s</sup>	
10	11592P2122	11 59 13	21 21 56	1	15 <sup>m</sup>	
11	Comp			↓	10 <sup>s</sup>	
12	N4060	12 01 27	20 36 56	1	10 <sup>m</sup>	
13	Comp			↓	10 <sup>s</sup>	
14	N4072	12 01 40	20 29 17	1	10 <sup>m</sup>	
15	Comp			↓	10 <sup>s</sup>	Clear out
16	1159P2042	11 59 23	20 40 58	1	10 <sup>m</sup>	
17	Comp			↓	10 <sup>s</sup>	
18	12095N0019	12 09 30	-00 19 00	5	15 <sup>m</sup>	TV full of lines
19	Comp			↓	10 <sup>s</sup>	Hard To guide
20	12209P0605	12 20 54	06 05 00	5	15 <sup>m</sup>	
21	Comp			↓	10 <sup>s</sup>	
22	12234P0434	12 25 24	04 34 00	5	15 <sup>m</sup>	
23	12234P0434	↓	↓	5	15 <sup>m</sup>	
24	Comp			↓	10 <sup>s</sup>	
25	GD 140	11 34 27	30 04 35	0	2 <sup>m</sup>	
26	Comp			↓	10 <sup>s</sup>	
27	N4151	12 08 01	39 41 02	6	30 <sup>s</sup>	
28	Comp			↓	10 <sup>s</sup>	
29	N4486B	12 28 00	12 45 59	0	5 <sup>m</sup>	
30	Comp			↓	10 <sup>s</sup>	

60 inch Telescope Log

Observer: J. PetersPI: J. HuchraSpectrograph: FASTGrating: 300Page: 2968Date: 5/9/94

Number	Object	R. A.	Dec.	L/R	Exp	Comments
31	Feige 67	12 39 18	17 47 24	0	2M	
32	Com P			↓	10 <sup>s</sup>	
33	HZ 43	13 14 00	29 21 49	0	3M	
34	Com P			↓	10 <sup>s</sup>	
35	N5548	14 15 43	25 22 01	6	5M	
36	Com P			↓	10 <sup>s</sup>	
37	12286 P0044	12 28 36	00 44 00	5	15M	TV Filling with Lines
38	12286 P0044	↓	↓	5	15M	Can't move to another
39	Com P			↓	10 <sup>s</sup>	obj T.V Too Bad.
40	12294 N0236	12 29 24	-02 36 00	5	15M	BURN THIS 1 IN.
41	12294 N0236	↓	↓	5	15M	
42	Com P			↓	10 <sup>s</sup>	
43	J13115 P3151	13 11 30	31 51 58	3	15M	Callor
44	Com P			↓	10 <sup>s</sup>	
45	J13116 P3149	13 11 40	31 49 14	3	10M	
46	Com P			↓	10 <sup>s</sup>	
47	J13133 P2628	13 13 19	26 28 53	3	10M	
48	Com P			↓	10 <sup>s</sup>	
49	J13136 P3001	13 13 34	30 01 56	3	8M	
50	Com P			↓	10 <sup>s</sup>	
51	15550 P0116	15 55 00	07 16 00	1	15M	
52	Com P			↓	10 <sup>s</sup>	
53	16182 P0038 N	16 18 12	00 38 00	1	15M	TV Full Lines
54	Com P			↓	10 <sup>s</sup>	
55	B0 P25 39 41	19 42 21	26 06 00	0	1M	
56	Com P			↓	10 <sup>s</sup>	
57	16394 P0148	16 39 24	01 48 00	1	15M	
58	Com P			↓	10 <sup>s</sup>	Lots of clouds coming.
59	19488-0223	19 48 48	-02 23 00	1	10M	Just Made IT!!
60						

60 inch Telescope Log

Observer: J. PetersPI: J. Huckra et alSpectrograph: FastGrating: 300Date: 5/10/94Page: 2969

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1	Comp			↓	10 <sup>s</sup>	FLATS + Bias combined
2	N4486B	12 28 00	12 45 59	0	5 <sup>m</sup>	Clouds 1 <sup>st</sup> of evening.
3	Comp			↓	10 <sup>s</sup>	9:30 PM open.
4	GD140	11 34 27	30 04 35	0	2 <sup>m</sup>	TV FULL LINES
5	Comp			↓	10 <sup>s</sup>	
6	N4151	12 08 01	39 41 02	6	30 <sup>s</sup>	Cloud coming
7	Comp			↓	10 <sup>s</sup>	from West.
8	H243	13 14 00	29 21 49	0	3 <sup>m</sup>	
9	Comp			↓	10 <sup>s</sup>	
10	N5548	14 15 43	25 22 01	6	5 <sup>m</sup>	
11	Comp			↓	10 <sup>s</sup>	
12	Feige 67	12 39 18	17 47 24	0	2 <sup>m</sup>	Thru cloud
13	Comp			↓	10 <sup>s</sup>	
14	12546N0023	12 54 36	-00 23 00	5	10 <sup>m</sup>	
15	12548N0021	12 54 48	-00 21 00	5	10	
16	Comp			↓	10 <sup>s</sup>	TV Full Lines + Thin
17	12554P0237	12 55 24	02 37 00	5	10 <sup>m</sup>	Clouds. Really Fun!
18	Comp			↓	10 <sup>s</sup>	
19	1132P4716	11 32 00	47 16 00	1	5 <sup>m</sup>	Looking for BRT obj
20	Comp			↓	10 <sup>s</sup>	getting away fm cloud
21	1202P4928	12 02 12	49 28 00	1	5 <sup>m</sup>	
22	Comp			↓	10 <sup>s</sup>	
23	1215P4650	12 15 00	46 50 00	1	5 <sup>m</sup>	Obj A
24	1215P4705	12 15 00	47 05 00	1	10 <sup>m</sup>	Obj B
25	Comp			↓	10 <sup>s</sup>	
26	A2025 A	15 06 44	34 28 23	9	5 <sup>m</sup>	BRT STR IN SLIT ALSO
27	A2025 D	"	"	9	15 <sup>m</sup>	
28	A2025 B	"	"	9	15 <sup>m</sup>	
29	A2025 C	"	"	9	15 <sup>m</sup>	
30	Comp			↓	10 <sup>s</sup>	

60 inch Telescope Log

Observer: J. PetersPI: J. HuckraSpectrograph: FastGrating: 300Page: 2970Date: 5/10/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
31	15394P0802	15 39 24	08 02 00	1	15 <sup>m</sup>	Between The T.V and
32	Comp			↓	10 <sup>s</sup>	Some Thin clouds.
33	15304P0036	15 30 24	00 36 00	2	10 <sup>m</sup>	All I need is a
34	15306P0044	15 30 36	00 44 00	1	10 <sup>m</sup>	BRT Moon.
35	Comp			↓	10 <sup>s</sup>	
36	15534P0045	15 53 24	00 45 00	1	10 <sup>m</sup>	
37	Comp			↓	10 <sup>s</sup>	
38	BDP253941	19 42 21	26 06 00	0	1 <sup>m</sup>	
39						
40						
41						
42						
43						
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60 inch Telescope Log

Observer: P. BerlindPI: J. HuchraSpectrograph: FASTGrating: 300Date: 5/11/94Page: 2971

Number	Object	R.A.	Dec.	L/R	Exp	Comments
10	BIAS			0s		Rain + clouds after sunset
10-20	FLAT			0.1s		
21	Hemear			15s		test
22	COMP			↓		
23	NS548	14:15:43	+25:22:0	6	5m	
24	COMP			↓		
25	HZ43	13:14:00	+29:21:49	6	3m	sucker hole: close again
26	COMP			↓		
27	13164 p5420	13:16:24	+54:20:00	1	5m	
28	COMP			↓		
29	13205 p5505	13:20:30	+55:05:00	1	5m	H <sub>2</sub>
30	COMP			↓		
31	13226 p5314	13:22:24	+53:14:00	1	5m	H <sub>2</sub>
32	COMP			↓		
33	NS163	13:24:54	+53:01:00	1	3m	U 08453
34	COMP			↓		
35	13260 p5616	13:26:00	+56:16:00	1	5m	
36	13261 p5617	13:26:00	+56:17:00	1	5m	
37	COMP			↓		
38	13278 p5552	13:27:48	+55:52:00	1	5m	H <sub>2</sub>
39	COMP			↓		
40	13314 p5513	13:31:24	+55:13:00	1	5m	
41	COMP			↓		
42	A1899AB	14:21:41.8	+17:45:07	9	10m	J2000 B W o FA
43	COMP			↑		
44	A1899AB	"	"	9	10m	
45-54	BIAS				0s	

DID NOT ADD 42 + 44 A BECAUSE FILE 42 IS A MUCH BETTER OBSERVATION + SUMMING THEM DEGRADES VEL. HOWEVER DID ADD 42 + 44 B - BOTH WERE BAD



60 inch Telescope Log

Observer: P. BerlindPI: J HuchraSpectrograph: FASTGrating: 300Date: 5/12/94Page: 2972

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1-10	BIAS				0s	cloudy after sunset open ~ midnight
11-20	FLAT				0.1s	
21	COMP			↓		
22	12500p0331	12:50:00	+03:31:00	S	5m	
23	COMP			↓		
24	12513p0343	12:51:18	+03:43:00	S	5m	
25	COMP			↓		
26	SN1994F	13:27:47	+47:26:59	2	15m	
27	COMP			↓		stopped by clouds
28-30	A1783A	13:42:47	+55:31:16	9	5m	2" slit ↓ clouds needs more
31	COMP			↑		
32	COMP			↓		
33	H244	13:21:19.1	+36:23:38	0	3m	2" slit ↓
34	A1783A	13:42:47	+55:31:16	9	5m	use 29 and 34
35	COMP			↑		
36	A2020A	15:04:25.72	+07:49:29	9	10m	seeing 2-3"
37	COMP			↓		
38	A2020A	"	"	9	10m	
39	A2055A	15:19:13.18	+06:07:50	9	10m	
40	COMP			↓		
41	A2055A	"	"	9	10m	
42	A2143A	15:57:34.95	+37:20:36	9	15m	
43	COMP			↓		
44	A2143A	"	"	9	15m	
45	COMP			↑		
46	A2169	16:13:58.2	+49:11:22	9	10m	
47	COMP			↓		
48	A2169	"	"	9	10m	
49	COMP			↑		
50	A2296	17:54:31.97	+77:42:24	9	10m	

60 inch Telescope Log

Observer: P. Berlind

PI: J. Huchra

Spectrograph: FAST

Grating: 300

Date: 5/12/94

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↓

②

②

Number	Object	R.A.	Dec.	L/R	Exp	Comments
51	COMP			↓		
52	A2296	"	"	9	10m	
53	COMP			↑		2" slit ↑
54	16567 p0127A	16:56:42	+01:27:00	1	5m	3" slit ↓ H $\alpha$
55	COMP			↑		B component not marked
56	18478 p404	18:47:48	+10:04:00	1	5m	all candidates v. faint
57	COMP			9		2 stars? no
58	19377 p7221	19:33:12	+77:21:00	1	5m	also observed 5/6/94 H $\alpha$
59	COMP			↑		2961/64, 65
60	19337 p7716	19:33:12	+77:16:00	1	5m	H $\alpha$
61	COMP			↑		
62	N6825 N	19:41:18	+63:57:00	1	5m	superposed star N comp 601
63	N6825 S	19:41:18	+63:57:00	1	5m	southern comp M $\alpha$
64	COMP			↑		
65	19414 p7815W	19:41:24	+78:15:00	1	5m	H $\alpha$
66	19414 p7815W	19:41:24	+78:15:00	1	5m	star on slit W of galaxy H $\alpha$
67	COMP			9		
68	19557 p1220	19:55:42	+12:20:00	1	5m	can't see object plate H $\alpha$ ?
69	COMP			↑		star on slit to E
70	19551 m0103	19:55:06	-01:03:00	1	5m	
71	COMP			↑		6065
72-73	19568 m031	19:56:48	-00:31:00	1	5m	into twilight
74	COMP			↑		
75-84	BIAS				0s	
85-94	FLAT					2" slit flats

60 inch Telescope Log

Observer: P. BerlindPI: J. HuchraSpectrograph: FASTGrating: 300Date: 5/13/94Page: 2974

Number	Object	R. A.	Dec.	L/R	Exp	Comments
1	HENEAR 600					
2-11	BIAS				0s	
12-21	FLAT				0.1s	
22	COMP			-	10s	test
23	10168 p 5475	10:16:48	+54:13:W	1	5m	
24	COMP			↑		
25	10514 p 0700	10:51:24	+07:10:W	1	5m	
26	COMP			↑		
27	10539 p 0551	10:53:54	+05:51:W	1	5m	Hx
28	10541 p 0555	10:54:06	+05:55:W	1	5m	
29	U 06049	10:54:54	+05:58:W	1	5m	
30	COMP			↑		
31	10541 p 0707	10:54:06	+07:07:W	1	5m	
32	U 06046	10:54:12	+07:10:W	1	5m	
33	COMP			↑		
34-35	10552 p 0818	10:55:12	+08:18:W	1	5m	
36	COMP			↑		
37	10556 p 0750	10:55:36	+07:50:W	1	5m	TU noise really bad
38	COMP			↑		
39	10557 p 0451	10:55:42	+04:51:W	1	5m	
40	10559 p 0454	10:55:54	+04:54:W	1	5m	Hx
41	COMP			↑		
42	12032 m 0247	12:03:12	-02:47:W	5	5m	Hx
43	12033 m 0242	12:03:18	-02:42:W	5	5m	
44	COMP			↑		
45-46	12319 m 0300	12:31:54	-03:00:W	5	5m	Hx
47	COMP			↑		
48-49	12333 m 0135	12:33:18	-01:35:W	5	5m	
50	COMP			↑		
51	12376 p 0539	12:37:36	+05:39:W	5	5m	

60 inch Telescope Log

Observer: P. BerlindPI: J. HuchraSpectrograph: FASTGrating: 300Date: 5/13/94Page: 2975

Number	Object	R.A.	Dec.	L/R	Exp	Comments
52	COMP			↑		
53	12379pos19	12:37:54	+05:19:00	S	5m	
54	COMP			↑		
55	12396pos48	12:39:36	+05:48:00	S	5m	H $\alpha$
56	COMP			↑		
57	12397p0009	12:39:42	+05:00:09	S	5m	
58	COMP			↑		
59	12399p0219	12:39:54	+07:19:00	S	5m	
60	COMP			↑		
61	12407p0421	12:40:42	+04:21:00	S	5m	
62	COMP			↑		
63	12408p0657	12:40:48	+06:57:00	S	5m	
64	12422p0658	12:42:12	+06:58:00	S	5m	star to E of gal
65	COMP			↑		
66	12420p0307	12:42:36	+03:07:00	S	5m	
67	12424p0258	12:42:24	+02:58:00	S	5m	
68	COMP			↑		
69	12422p0420	12:42:12	+04:20:00	S	5m	H $\alpha$
70	COMP			↑		
71	12424p0014	12:42:24	+0:14:00	S	5m	
72	COMP			↑		
73	12448p0041	12:44:48	+00:41:00	S	5m	
74	COMP			↑		
75	test			-		600 $\text{\AA}$ grating, 1.5" slit
76	COMP			-	14s	
77	KUN 33m10	15:40:20	-06:44:18	19	5m	std
78	33m10A	15:40:37.1	-06:46:45.1	19	5m	
79	COMP					
80	40m14A	16:04:40	+21:03:26	19	5m	
81-82	40m14B	16:04:40	+21:03:26	19	10m	

80-82

6708 - Li split  
m m = s/n

60 inch Telescope Log

Observer: P. Berlind

PI: J. Huchra

Spectrograph: FAST

Grating: 300

Date: 5/13/94

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Number	Object	R.A.	Dec.	L/R	Exp	Comments
83	COMP			↑		
84	AS205	16:11:31.4	-18:38:25.1	19	5m	
85	COMP			↑		
86-87	40m14B	16:04:40	+21:03:26	19	10m	
88	COMP			↑		
89	40m8	16:05:15.35	+22:10:53	19	2m	H $\alpha$ absorption
90	40m25	16:05:40.1	+21:53:71.4	19	2m	
91-92	40m22	16:07:16.9	+71:57:70.3	19	10m	
93	COMP			↑		
94	40m17A	16:09:21.4	+19:57:31	19	10m	
95	COMP			↓		
96	40m17B	16:09:21.4	+19:57:31	19	10m	
97	40m21	16:09:36.8	+22:07:06.7	19	10m	
98	40m5	16:16:40.7	+22:41:34.7	19	10m	
99	COMP			↑		
100	40m6B	16:21:57.3	+22:32:36.7	19	10m	
101	40m6C	16:21:57.3	+22:32:36.7	19	10m	
102	40m3A	16:22:08.3	+22:50:20.6	19	5m	
103	COMP			↓		
104	40m3B	16:22:01.3	+22:50:20.6	19	10m	
105	40m4A	16:22:55.4	+22:46:04.2	19	5m	
106	40m4B	16:22:55.4	+22:46:04.2	19	10m	
107	COMP			↑		
108-9	paper 2	23:03:47	+15:18:58	19	10m	
110	COMP			↑		
111	40m6A	16:21:57.3	+22:32:36.7	19	2m	
112	40m16	16:21:18.9	+20:04:35.7	19	2m	
113	COMP			↑		
114-123	FLAT				0.3s	600L, 1.5" slit
124-133	BIAS				0s	

3873.7  
3968.5

3/6/74

H $\alpha$  = 6562 = 1333

MMT

87. Camp

60 inch Telescope Log

Observer: MuscarellaPI: J. HuchraSpectrograph: FastGrating: 300Page: 2777Date: 5/14/94

Number	Object	R. A.	Dec.	L/R	Exp	Comments
1-10	BIAS				0 <sup>s</sup>	Partly Cloudy/Light Rain
11-20	FLAT				0.1 <sup>s</sup>	
21	COMP				10 <sup>s</sup>	
22	COMP			↓	1	
23	AGK2p 43928	09 49 18	43 42 00		60 <sup>s</sup>	Clouds in + out
24	AGK2p 43928	09 49 18	43 42 00		60 <sup>s</sup>	" " "
25	COMP			↓	10 <sup>s</sup>	
26	NGC 4151	12 08 01	39 41 02			
27	COMP			↓	10 <sup>s</sup>	
28	Feige 34	10:36:41.1	43:21:50		120 <sup>s</sup>	Guide TV very bad (noisy)
29	COMP			↓	10 <sup>s</sup>	
30	FEIGE 67	12:39:18.9	17:47:24		120 <sup>s</sup>	
31	COMP			↓	10 <sup>s</sup>	
32	N 4486B	12:28:00	12:45:59		120 <sup>s</sup>	
33	COMP			↓	10 <sup>s</sup>	
34	SN 1994 D	12:31:31	07:58:30		600 <sup>s</sup>	
35	COMP			↓	10 <sup>s</sup>	
36	Feige 56	12:04:13.8	11:56:55		180 <sup>s</sup>	
37	COMP			↓	10 <sup>s</sup>	
38	SN 1994 I	13:27:47.6	17:26:59.1		900 <sup>s</sup>	
39	COMP			↓	10 <sup>s</sup>	IMPOSSIBLE TO FIND FAINT OBJECTS WITH TV NOISE SO BAD
40	12432 p 0636	12:43:12	06:36:00		600 <sup>s</sup>	
41	12432 p 0636	↓	↓		600 <sup>s</sup>	
42	COMP			↓	10 <sup>s</sup>	
43	12434 p 0737	12:43:24	07:37:00		900 <sup>s</sup>	TV Noise - Com's - Gals
44	COMP			↓	10 <sup>s</sup>	
45	12545 p 0452	12:54:30	04:52:00		600 <sup>s</sup>	Extreme Noise on TV This is a hopeful
46	COMP			↓	10 <sup>s</sup>	
47	40m3A	16:22:01.3	22:50:20.6		300 <sup>s</sup>	
48	COMP			↓	10 <sup>s</sup>	Lamp failed to scan on

60 inch Telescope Log

Observer: Muscarella/J.PPI: StanfferSpectrograph: FastGrating: 300/600Page: 2978Date: 05/14/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
49	COMP			↓	10 <sup>s</sup>	
50	40m14B	16:04:40.2	21:09:11.4		600 <sup>s</sup>	TV very noisy. Object bright enough to discern
51	COMP			↓	10 <sup>s</sup>	change to 600 grating/1.5
52	40m3A	16:22:01.3	12:50:20.6		300 <sup>s</sup>	
53	40m3A	↓	↓		900 <sup>s</sup>	↓
54	40m3A				900 <sup>s</sup>	
55	COMP			↑	10 <sup>s</sup>	
56	COMP			↓	10 <sup>s</sup>	
57	40m14B	16:04:40.2	21:03:11.4		900 <sup>s</sup>	TV NOISE CONTINUOUSLY VERY BAD.
58	40m14B	↓	↓		900 <sup>s</sup>	
59	COMP			↕	10 <sup>s</sup>	
60	40m14B	↓	↓		900 <sup>s</sup>	
61	40m14B	↓	↓		900 <sup>s</sup>	TV noise finally cleared some
62	COMP			↑	10 <sup>s</sup>	
63	COMP			↓	10 <sup>s</sup>	
64	36m1	12:55:00	-04:54:00		120 <sup>s</sup>	
65	COMP			↓	10 <sup>s</sup>	
66	33m2A	15:39:43	-07:25:11		120 <sup>s</sup>	
67	COMP			↓	10 <sup>s</sup>	
68	33m11A	15:41:48	-06:49:05		300 <sup>s</sup>	
69	33m11B	15:41:48	-06:49:05		300 <sup>s</sup>	
70	COMP			↕	10 <sup>s</sup>	
71	33m11B	15:41:48	-06:49:05		900 <sup>s</sup>	
72	COMP			↓	10 <sup>s</sup>	
73	33m7	15:39:09	-06:58:21		300 <sup>s</sup>	Airmass > 2
74-83	BIAS				0 <sup>s</sup>	
84-93	FLAT				.1 <sup>s</sup>	
94	COMP				10 <sup>s</sup>	
95	FLAT				.1 <sup>s</sup>	

## 60 inch Telescope Log

Observer: MuscarellaPI: J. KachraSpectrograph: FastGrating: 300Page: 2979Date: 5/15/94

Number	Object	R. A.	Dec.	L/R	Exp	Comments
1	COMP				10 <sup>s</sup>	Wavelength Solution
2-11	BIAS				0 <sup>s</sup>	
12-21	FLAT				.1 <sup>s</sup>	
22	COMP				10 <sup>s</sup>	Wavelength Solution
23	COMP			↓	10 <sup>s</sup>	
24	ASK 2p 43928	09:49:18	43:42:00		1 <sup>M</sup>	Clear Sky
25	COMP			↓	10 <sup>s</sup>	
26	Feige 34	12:04:13.8	11:56:55		2 <sup>M</sup>	
27	COMP			↓	10 <sup>s</sup>	
28	NGC 4151	12:08:01	39:41:02		2 <sup>M</sup>	
29	COMP			↓	10 <sup>s</sup>	
30	N 4486B	12:28:00	12:45:59		2 <sup>M</sup>	
31	COMP			↓	10 <sup>s</sup>	
32	Feige 67	12:39:18.9	17:47:24		2 <sup>M</sup>	
33	COMP			↓	10 <sup>s</sup>	
34	HZ 44	13:21:19.1	36:23:38		3 <sup>M</sup>	
35	COMP			↓	10 <sup>s</sup>	
36	SN 1994D	12:31:31	07:58:30		10 <sup>M</sup>	Look like the star/motion
37	SN 1994D	12:31:31	07:58:30		10 <sup>M</sup>	TV Noise makes obs very difficult. Retry w/ SN just barely on slit. Will try again later
38	Feige 56	12:04:13.8	11:56:55		3 <sup>M</sup>	
39	COMP			↑	10 <sup>s</sup>	
40	COMP			↓	10 <sup>s</sup>	
41	SN 1994I	13:27:47.6	47:26:59.1		15 <sup>M</sup>	
42	SN 1994I	13:27:47.6	47:26:59.1		15 <sup>M</sup>	
43	COMP			↓	10 <sup>s</sup>	
44	12285p 0157	12:28:30	01:57:00		10 <sup>M</sup>	Missed it or needed more time
45	COMP			↓	10 <sup>s</sup>	
46	N 5548	14:15:43.5	25:22:01.1		3 <sup>M</sup>	
47	N 5548	14:15:43.5	25:22:01.1		3 <sup>M</sup>	



## 60 inch Telescope Log

Observer: MuscarellaPI: J. HuchraSpectrograph: FastGrating: 300Page: 2980Date: 5/15/94

Number	Object	R. A.	Dec.	L/R	Exp	Comments
48	COMP			↓	10 <sup>s</sup>	
49	HZ 43	13:14:00.7	29:21:49		2 <sup>m</sup>	
50	COMP			↓	10 <sup>s</sup>	
51	13557p 0123	13:55:42	01:23:00		3 <sup>m</sup>	Nothing
52	COMP			↓	10 <sup>s</sup>	
53	13572p <sup>0119</sup> 0123	13:57:12	01:23:00		10 <sup>m</sup>	
54	COMP			↓	10 <sup>s</sup>	
55	13557p 0123	13:55:42	01:23:00		15 <sup>m</sup>	AE+AW both on slit
56	COMP			↓	10 <sup>s</sup>	
57	13596p 0000	13:59:36	00:00:00		15 <sup>m</sup>	Nothing
58	COMP			↓	10 <sup>s</sup>	
59	14322p 0105	14:32:12	01:05:00		15 <sup>m</sup>	
60	COMP			↓	10 <sup>s</sup>	
61	N5680	14:33:12	00:11:00		15 <sup>m</sup>	
62	COMP			↓	10 <sup>s</sup>	
63	N5848	15:04:06	02:12:00		15 <sup>m</sup>	
64	COMP			↓	10 <sup>s</sup>	
65	15468p 0019	15:46:48	00:19:00		15 <sup>m</sup>	
66	COMP			↓	10 <sup>s</sup>	
67	15469p 0022S	15:46:54	00:22:00		15 <sup>m</sup>	} Air mass reached } 1.95 by end of 2 <sup>nd</sup> obs.
68	15469p 0022N	15:46:54	00:22:00		15 <sup>m</sup>	
69	COMP				10 <sup>s</sup>	Too light to go for object
70-79	BIAS				0 <sup>s</sup>	
80-89	FLAT				.1 <sup>s</sup>	

60 inch Telescope Log

Spectrograph: FASTObserver: MUSCARELLAGrating: 300Page: 2981PI: J. HuchraDate: 05/16/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1	COMP				10 <sup>s</sup>	WAVELENGTH SOL.
2	FLAT				10 <sup>s</sup>	Test slit for QFAST
3-12	BIAS				0 <sup>s</sup>	
13-22	FLAT				.1 <sup>s</sup>	
23	COMP			↓	10 <sup>s</sup>	
24	AGK2p43928	09:49:18	43:42:00		2M	
25	AGK2p43928	09:49:18	43:42:00		1M	
26	COMP			↓	10 <sup>s</sup>	
27	Feige 34	10:36:41.1	43:21:50		1M	
28	COMP			↓	10 <sup>s</sup>	
29	NGC 4151	12:08:01	39:41:02		2M	
30	COMP			↓	10 <sup>s</sup>	
31	N4486B	12:28:00	12:45:59		2M	
32	N4486B	12:28:00	12:45:59		4M	
33	COMP			↓	10 <sup>s</sup>	
34	Feige 67	12:39:18.9	17:47:24		2M	
35	COMP			↓	10 <sup>s</sup>	
36	H244	13:21:19.1	36:23:38		2M	
37	COMP			↓	10 <sup>s</sup>	
38	SN 1994D	12:31:31	07:58:30		10M	Star to w also on slit. Tried to get SN w/o star
39	COMP			↓	10 <sup>s</sup>	by putting N half of SN on slit which may elim. star
40	Feige 56	12:04:13.8	11:56:55		3M	Almost impossible to get out w/o the other
41	COMP			↓	10 <sup>s</sup>	
42	12193p5846	12:19:18	58:46:00		6M	
43	COMP			↓	10 <sup>s</sup>	
44	N4481	12:27:36	64:19:00		10M	
45	COMP			↓	10 <sup>s</sup>	Slim chance
46	12285p0157	12:28:30	01:59:00		10M	Nothing to guide on. Noise prohibits ability to view & keep on slit.
47	COMP			↓	10 <sup>s</sup>	
48	12292m0044	12:29:12	-00:44:00		15M	Nothing

60 inch Telescope Log

Spectrograph: FASTObserver: MuscarellaGrating: 300Page: 2982PI: J. HuchraDate: 05/16/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
49	COMP			↓	10 <sup>s</sup>	
50	SN1994I	13:27:49.6	47:20:34		15 <sup>M</sup>	
51	COMP			↓	10 <sup>s</sup>	
52	HZ 43	13:14:00.7	29:21:19		2 <sup>M</sup>	
53	COMP			↓	10 <sup>s</sup>	
54	N5548	14:15:49.5	25:23:01.1		3 <sup>M</sup>	
55	COMP			↓	10 <sup>s</sup>	
56	16128p5232	16:12:48	52:32:00		10 <sup>M</sup>	
57	COMP			↓	10 <sup>s</sup>	
58	I 2225	16:36:54	67:44:00		8 <sup>M</sup>	
59	COMP			↓	10 <sup>s</sup>	
60	N6238	16:46:36	62:14:00		10 <sup>M</sup>	
61	COMP			↓	10 <sup>s</sup>	
62	16486p5900	16:48:48	59:00:00		10 <sup>M</sup>	
63	COMP			↓	10 <sup>s</sup>	
64	16493p6850	16:49:18	68:50:00		10 <sup>M</sup>	
65	COMP			↓	10 <sup>s</sup>	
66	N6303	17:05:18	68:53:00		10 <sup>M</sup>	
67	COMP			↓	10 <sup>s</sup>	
68	17163p6158	17:16:18	61:58:00		10 <sup>M</sup>	Star to W on slit
69	COMP			↓	10 <sup>s</sup>	
70	17193p6012	17:19:18	60:12:00		10 <sup>M</sup>	
71	COMP			↓	10 <sup>s</sup>	
72	17214p4815	17:21:24	48:15:00		10 <sup>M</sup>	
73	COMP			↓	10 <sup>s</sup>	
74	17257p2653A	17:25:42	26:53:00		10 <sup>M</sup>	
75	17257p2655C	17:25:42	26:55:00		10 <sup>M</sup>	
76	17257p2655BE	17:25:42	26:55:00		10 <sup>M</sup>	
77	17257p2655BW	17:25:42	26:55:00		10 <sup>M</sup>	
78	COMP			↑	10 <sup>s</sup>	

Labeled on chart as "What's This". Looked like a Galaxy - bright but elongated E-Star to East partly on slit.

## 60 inch Telescope Log

Observer: MuscarellaPI: J. HachuraSpectrograph: FASTGrating: 300Page: 2983Date: 05/16/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
79	COMP			↓	10 <sup>s</sup>	
80	17259p6211	17:25:54	62:11:00		10 <sup>M</sup>	
81	COMP			↓	10 <sup>s</sup>	
82	17278p6059	17:27:48	60:59:00		15 <sup>M</sup>	NOT visible on screen, other stars in field to triangulate on.
83	COMP			↓	10 <sup>s</sup>	MISSED ↓
84	17378p6104	17:37:48	61:04:00		12 <sup>M</sup>	
85	COMP			↓	10 <sup>s</sup>	
86	18227p6043	18:22:42	60:43:00		15 <sup>M</sup>	
87	COMP			↓	10 <sup>s</sup>	
88	N6650	18:25:36	67:58:00		10 <sup>M</sup>	
89	COMP			↓	10 <sup>s</sup>	
90	N6609	18:12:00	61:19:00		5'15"	sky getting bright. will have another obs next night
91-100	BIAS				0 <sup>s</sup>	
101-110	FLAT				0.1 <sup>s</sup>	

60 inch Telescope Log

Observer: J. Peters  
 PI: J. Huchra

Spectrograph: FAST  
 Grating: 300  
 Date: 5/17/94

Page: 2984

Number	Object	R.A.	Dec.	L/R	Exp	Comments
1	Comp			↓	10 <sup>s</sup>	BAT MARK + THIN
2	AGK2P43928	09 49 18	43 42 00	0	10 <sup>s</sup>	CLOUDS
3	Comp			↓	10 <sup>s</sup>	
4	GR140	11 34 27	30 04 35	0	2 <sup>m</sup>	
5	Comp			↓	10 <sup>s</sup>	
6	N4151	12 08 01	39 41 02	6	30 <sup>s</sup>	
7	Comp			↓	10 <sup>s</sup>	
8	Ferje67	12 39 18	17 47 24	0	2 <sup>m</sup>	↓
9	Comp			↓	10 <sup>s</sup>	
10	N4486B	12 28 00	12 45 59	0	5 <sup>m</sup>	
11	Comp			↓	10 <sup>s</sup>	
12	HZ43	13 14 00	29 21 49	0	3 <sup>m</sup>	
13	Comp			↓	10 <sup>s</sup>	
14	N5548	14 15 43	25 22 01	6	5 <sup>m</sup>	THRU CLOUDS
15						WAITING ON CLOUDS
16						
17						
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## 60 inch Telescope Log

Observer: J. PetersPI: J. HuchraSpectrograph: FASTGrating: 300Page: 2985Date: 5/12/94

Number	Object	R. A.	Dec.	L/R	Exp	Comments
1	Comp			↓	10 <sup>s</sup>	Flats + Bias Combined
2	AGK2 P43928	09 49 18	43 42 00	0	10 <sup>s</sup>	
3	Comp			↓	10 <sup>s</sup>	
4	GD140	11 34 27	30 04 35	0	2 <sup>m</sup>	
5	Comp			↓	10 <sup>s</sup>	
6	N4151	12 08 01	39 41 02	6	30 <sup>s</sup>	
7	Comp			↓	10 <sup>s</sup>	
8	N4486B	12 28 00	12 45 59	0	5 <sup>m</sup>	
9	Comp			↓	10 <sup>s</sup>	
10	Feige 67	12 39 18	17 47 24	0	2 <sup>m</sup>	
11	Comp			↓	10 <sup>s</sup>	
12	HZ 43	13 14 00	29 21 49	0	3 <sup>m</sup>	
13	Comp			↓	10 <sup>s</sup>	
14	N5548	14 15 43	25 22 01	6	5 <sup>m</sup>	
15	Comp			↓	10 <sup>s</sup>	
16	Feige 56	12 04 13	11 56 55	2	3 <sup>m</sup>	Kirshner
17	Comp			↓	10 <sup>s</sup>	SKY CLEAR, BAT
18	SN 1994D	12 31 31	07 58 30	2	20 <sup>m</sup>	Moon.
19	Comp			↓	10 <sup>s</sup>	
20	SN 1994I	13 27 47	47 26 59	2	20 <sup>m</sup>	More Galaxy Than SN
21	Comp			↓	10 <sup>s</sup>	
22	12472 P0502	12 47 12	05 02 00	5	15 <sup>m</sup>	
23	12472 P0502	↓	↓	5	15 <sup>m</sup>	
24	Comp			↓	10 <sup>s</sup>	
25	12479 P0705	12 47 54	07 05 00	5	15 <sup>m</sup>	Can't see obj for lines.
26	Comp			↓	10 <sup>s</sup>	
27	12486 P0451	12 48 36	04 51 00	5	15 <sup>m</sup>	
28	12494 P0450	12 49 24	04 50 00	5	15 <sup>m</sup>	
29	Comp			↓	10 <sup>s</sup>	
30	12498 P0722	12 49 48	07 22 00	5	15 <sup>m</sup>	

60 inch Telescope Log

Observer: J. PetersPI: J. Huchra et. alSpectrograph: FASTGrating: 300Date: 5/18/94Page: 2986

Number	Object	R. A.	Dec.	L/R	Exp	Comments
31	12503 P0723	12 50 18	07 24 00	5	15	
32	Comp			↓	10 <sup>s</sup>	
33	12504 P0746	12 50 24	07 46 00	5	15 <sup>m</sup>	
34	Comp			↓	10 <sup>s</sup>	
35	116609	18 12 00	61 19 00	1	10 <sup>m</sup>	
36	Comp			↓	10 <sup>s</sup>	
37	1E51536 P515	15 36 48	51 34 02	1	15 <sup>m</sup>	
38	1E51536 P515	↓	↓	1	15 <sup>m</sup>	
39	Comp			↓	10 <sup>s</sup>	
40	I1644N1456	16 44 51	-24 56 34	1	15 <sup>m</sup>	STR IN SLIT also
41	Comp			↓	10 <sup>s</sup>	
42	17278 P6059	17 27 48	60 59 00	1	15 <sup>m</sup>	
43	17278 P6059	↓	↓	1	15 <sup>m</sup>	
44	Comp			↓	10 <sup>s</sup>	
45	17389 P6359	17 38 54	63 59 00	1	5 <sup>m</sup>	
46	Comp			↓	10 <sup>s</sup>	
47	17412 P6642	17 41 12	66 42 00	1	10 <sup>m</sup>	
48	Comp			↓	10 <sup>s</sup>	
49	17503 P6253	17 50 18	62 53 00	1	10 <sup>m</sup>	
50	Comp			↓	10 <sup>s</sup>	
51	18038 P6702	18 03 48	67 02 00	1	15 <sup>m</sup>	STR IN SLIT
52	Comp			↓	10 <sup>s</sup>	
53	18189 P6819	18 18 54	68 19 00	1	15 <sup>m</sup>	STR IN SLIT
54	18189 P6819	↓	↓	1	15 <sup>m</sup>	" " "
55	Comp			↓	10 <sup>s</sup>	
56	B0 P 40 40 32	20 06 40	41 06 15	0	1 <sup>m</sup>	
57						
58						
59						
60						

60 inch Telescope Log

Observer: J. PetersPI: J. HuchraSpectrograph: FASTGrating: 300Page: 3009Date: 5/31/74

Number	Object	R. A.	Dec.	L/R	Exp	Comments
1	Comp	TEST			15 <sup>s</sup>	Turned Lamp Up
2	Comp PY	TEST			25 <sup>s</sup>	To ≈ S-6000.
3	Comp PV	TEST			40 <sup>s</sup>	
4	Comp PV	TEST			40 <sup>s</sup>	Talked To Nelson
5	Comp P			↓	40 <sup>s</sup>	about The weak
6	G0140	11 34 27	30 07 35	0	2m	Lines in Comp.
7	Comp PY			↓	40 <sup>s</sup>	Nelson said To do
8	N4151	12 08 01	39 41 02	6	30 <sup>s</sup>	40 <sup>s</sup> Cexv and send
9	Comp P			↓	40 <sup>s</sup>	Email To Dan F
10	N 4486 B	12 28 00	12 45 59	0	5m	To look at Cex.
11	Comp PV			↓	40 <sup>s</sup>	Delay Working
12	Feige 67	12 39 18	17 47 24	0	2m	with Lamp.
13	Comp P			↓	40 <sup>s</sup>	
14	H243	13 14 00	29 21 49	0	3m	
15	Comp P			↓	40 <sup>s</sup>	
16	N 5548	14 15 43	25 22 01	6	5m	Could No see SN 1994M
17	Comp P			↓	40 <sup>s</sup>	either faded away or
18	SN 1994I	13 27 47	47 26 59	2	20m	in TV waise.
19	Comp PV	Sleep 3	TEST		40 <sup>s</sup>	
20	Comp PY	No Sleep	TEST		40 <sup>s</sup>	
21	Comp PY			↓	40 <sup>s</sup>	
22	Feige 92	14 09 41	50 21 07	0	2m	
23	Comp PY				40 <sup>s</sup>	
24	J13003P3059	13 00 21	30 59 55	3	15m	
25	Comp PY			↓	40 <sup>s</sup>	Can't see obj To guide on
26	J13002P2746	13 00 12	27 46 53	3	15m	TV Full Vert Lines
27	Comp PV			↓	40	Stopped Turned TV OFF
28	N6687	18 36 36	59 35 00	1	15m	12:50 AM open 1:50 AM
29	Comp PY			↓	40 <sup>s</sup>	BUT Moon
30	18102P6402	18 10 12	64 02 00	1	15m	



60 inch Telescope Log

Observer: J. Peters

PI: J. Huchra

Spectrograph: FEST

Grating: 300

Page: 3010

Date: 5/31/94

Number	Object	R.A.	Dec.	L/R	Exp	Comments
31	Comp V			↓	40 <sup>s</sup>	
32	18130 P 5949	18 13 00	59 49 00	↓	15 <sup>m</sup>	
33	Comp V			↓	40 <sup>s</sup>	
34	J 4708	18 13 12	61 08 00	↓	15 <sup>m</sup>	
35	Comp P			↓	40 <sup>s</sup>	
36	18270 P 6205	18 27 00	62 05 00	↓	15 <sup>m</sup>	
37	Comp V			↓	40 <sup>s</sup>	
38	NG 676	18 33 12	66 55 00	↓	15 <sup>m</sup>	
39	Comp V			↓	40 <sup>s</sup>	
40	22341 P 7523	22 34 06	75 23 00	↑	15 <sup>m</sup>	
41	Comp V			↓	40 <sup>s</sup>	
42	BDP 40 4032	20 06 40	41 06 15	0	2 <sup>m</sup>	
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