INT OBSERVING LOG (ISAAC NEWTON GROUP, LA PALMA)

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TELESCOPE:            INT
DATE:                 20001030
TAPE NR:              INTD4539
OBSERVER:             Andrew Bunker
PROGRAMME:            Cambridege-Carnegie Deep OIR Galaxy Survey + M31 override
PATT/CAT REF.:        P17+M31
TELESCOPE OPERATOR:   Neil O Mahony
SUPPORT ASTRONOMER:

TELESCOPE FOCUS:      46.10 mm
CALIBRATE RESULTS:    HI 57.8 +/- , DI -36.0 +/- , HC 37.7 +/- , Sky sigma single star

INSTRUMENT:           WFC

WFC FILTER WHEEL:     g,r,i,U,Z,KPB

WEATHER:              (1st half) GOOD
                      (2nd half) GOOD
CLOUD COVER (%):      (1st half) 0
                      (2nd half) 0
DUST (0-2):           (1st half) 0
                      (2nd half) 0
SEEING (arcsec):      (1st half) 1.1
                      (2nd half) 0.8

DOME OPENED (UT):     18:30
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METEOROLOGICAL PARAMETERS

LT	AirT	Hum%	Wspd	Gust	Wdir	Press	LocT	IntT	Mirr	LocRH	IntRH
19:00	7.8	25	5.5	5.8	15	771.9	8.2	10.7	11.5	20	34
20:00	8.5	12	14.1	15.0	356	772.2	9.1	10.4	11.1	10	13
21:00	8.4	11	20.0	22.5	2	772.7	9.0	10.1	11.0	9	11
22:00	8.4	17	22.4	23.5	5	772.7	8.6	9.7	11.0	17	17
23:00	9.2	18	16.6	19.6	45	772.7	9.7	10.1	10.9	16	16
00:00	9.7	19	12.5	13.2	21	772.4	10.3	10.5	10.6	17	18
01:00	8.9	23	17.6	19.5	3	772.1	9.4	10.3	10.7	21	19
02:00	8.7	22	17.5	18.8	21	771.8	9.1	10.0	10.6	21	19
03:00	9.0	19	14.8	17.9	15	771.6	9.6	10.3	10.4	17	17
04:00	9.1	20	10.4	11.7	43	771.3	9.5	10.3	10.3	19	18
05:00	8.5	20	18.4	20.5	8	771.0	9.0	9.8	10.2	19	18
06:00	8.7	19	15.2	15.9	2	771.1	9.1	9.7	10.2	17	18
07:00	9.2	16	15.0	15.2	10	771.3	9.6	9.6	10.2	15	16

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SUNSET(UT)            18:36
EVENING TWILIGHT(UT)  19:48
MORNING TWILIGHT(UT)  06:03
SUNRISE(UT)           07:16
MOON'S QUARTER (1-4)  1
DISK % OF ILLUM.      11
DARK TIME             10:15
TWILIGHT TIME         02:25
MOONRISE(UT)          No moonrise within sunset-sunrise
MOONSET(UT)           21:08

TIME LOST(WEATHER):   00:00
TIME LOST(TECHNICAL): 00:30
TIME LOST(OTHER):     00:00

COMMENTS:
  Clear skies and good seeing (1.1" in B, 0.8" in Z)
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Some problems with software control of guider.

Run no.	Object name	RA	Dec.	Equinox	AM	PA	UT	Exp. T.	Filter	Psys Channel	Binning	Comments
234157	Bias frame	0:00:00.00	+00:00:00.0	A	1.540	180.0	14:18:12.7	0.0	g	Sloan	1 x 1	
234158	Bias frame	0:00:00.00	+00:00:00.0	A	1.540	180.0	14:35:58.2	0.0	g	Sloan	1 x 1	
234159	Bias frame	0:00:00.00	+00:00:00.0	A	1.000	180.0	14:45:11.8	0.0	g	Sloan	1 x 1	
234162	Bias	0:00:00.00	+00:00:00.0	A	4.756	180.0	15:08:47.1	0.0	g	Sloan	1 x 1	
234163	test flat	0:00:00.00	+00:00:00.0	A	4.756	180.0	15:14:50.2	2.0	U	RGO	1 x 1	
234164	Bias	0:00:00.00	+00:00:00.0	A	1.000	180.0	15:26:57.0	0.0	B	Kitt Peak	1 x 1	
234165	Bias	0:00:00.00	+00:00:00.0	A	1.000	180.0	15:27:55.8	0.0	B	Kitt Peak	1 x 1	
234167	Flat field	22:58:00.00	+00:05:00.0	J2000.00	1.478	180.0	18:53:10.4	21.0	z	Gunn	1 x 1	
234168	Z twi	22:58:01.33	+00:05:20.1	J2000.00	1.467	180.0	18:55:13.0	35.1	z	Gunn	1 x 1	
234169	Z twi	22:58:02.66	+00:05:40.0	J2000.00	1.455	180.0	18:57:15.4	70.0	z	Gunn	1 x 1	
234170	i twi	22:58:00.00	+00:04:59.9	J2000.00	1.444	180.0	18:59:55.2	30.1	i	Sloan	1 x 1	
234171	i twi	22:58:01.33	+00:05:20.0	J2000.00	1.433	180.0	19:01:58.9	45.1	i	Sloan	1 x 1	
234172	i twi	22:58:02.66	+00:05:40.0	J2000.00	1.423	180.0	19:04:00.6	65.1	i	Sloan	1 x 1	
234173	KPNO-B twi	22:57:59.99	+00:05:00.0	J2000.00	1.405	180.0	19:07:17.9	149.9	B	Kitt Peak	1 x 1	
234174	KPNO-B twi	22:58:01.33	+00:05:20.0	J2000.00	1.383	180.0	19:10:58.1	299.8	B	Kitt Peak	1 x 1	
234175	Focus run	21:42:04.80	+00:21:42.1	J2000.00	1.157	180.0	19:34:55.4	20.1	B	Kitt Peak	1 x 1	
234176	Focus run	21:42:04.80	+00:21:12.0	J2000.00	1.151	180.0	19:40:04.5	10.1	B	Kitt Peak	1 x 1	
234177	KPNO-B SA113 5s	21:42:04.80	+00:19:11.9	J2000.00	1.148	180.0	19:43:37.6	5.1	B	Kitt Peak	1 x 1	
234178	KPNO-B SA113 5s	21:42:06.12	+00:19:31.9	J2000.00	1.147	180.0	19:44:45.6	5.1	B	Kitt Peak	1 x 1	
234179	i SA113 3s	21:42:04.80	+00:19:12.0	J2000.00	1.146	180.0	19:46:28.1	3.2	i	Sloan	1 x 1	
234180	i SA113 3s	21:42:06.15	+00:19:31.9	J2000.00	1.146	180.0	19:47:32.5	3.1	i	Sloan	1 x 1	
234181	z SA113 5s	21:42:04.80	+00:19:11.9	J2000.00	1.145	180.0	19:49:02.3	5.1	z	Gunn	1 x 1	
234182	z SA113 10s	21:42:06.13	+00:19:31.8	J2000.00	1.144	180.0	19:50:10.4	10.1	z	Gunn	1 x 1	
234183	r SA113 3s	21:42:04.80	+00:19:11.9	J2000.00	1.143	180.0	19:51:55.2	3.1	r	Sloan	1 x 1	
234184	r SA113 5s	21:42:06.13	+00:19:31.9	J2000.00	1.142	180.0	19:53:03.7	5.1	r	Sloan	1 x 1	
234185	u SA113 20s	21:42:04.80	+00:19:12.0	J2000.00	1.142	180.0	19:54:25.2	20.1	U	RGO	1 x 1	
234186	u SA113 60s	21:42:06.13	+00:19:31.9	J2000.00	1.141	180.0	19:56:07.3	60.1	U	RGO	1 x 1	
234187	SA22 KPB	22:17:49.32	+00:26:49.1	J2000.00	1.157	180.0	20:00:02.0	899.1	B	Kitt Peak	1 x 1	
234188	SA22 KPB	22:17:49.32	+00:26:49.0	J2000.00	1.144	180.0	20:17:01.9	899.0	B	Kitt Peak	1 x 1	
234189	SA22 KPB	22:17:49.33	+00:26:48.9	J2000.00	1.137	180.0	20:34:01.3	898.9	B	Kitt Peak	1 x 1	
234190	SA22 KPB	22:17:49.33	+00:26:48.9	J2000.00	1.136	180.0	20:51:02.9	899.0	B	Kitt Peak	1 x 1	
234191	SA22 KPB	22:17:49.33	+00:26:48.9	J2000.00	1.142	180.0	21:08:04.3	899.2	B	Kitt Peak	1 x 1	
234192	SA22 KPB	22:17:49.33	+00:26:48.9	J2000.00	1.154	180.0	21:25:04.3	899.2	B	Kitt Peak	1 x 1	
234193	SA22 KPB	22:17:49.33	+00:26:49.0	J2000.00	1.173	180.0	21:42:03.8	899.0	B	Kitt Peak	1 x 1	
234194	SA22 KPB	22:17:49.33	+00:26:49.0	J2000.00	1.199	180.0	21:59:02.3	899.2	B	Kitt Peak	1 x 1	
234195	SA22 KPB	22:17:49.33	+00:26:49.0	J2000.00	1.234	180.0	22:16:01.4	899.1	B	Kitt Peak	1 x 1	
234197	M31-microfld1	0:44:00.00	+41:34:00.0	J2000.00	1.033	180.0	22:40:23.9	319.8	r	Sloan	1 x 1	
234198	M31-microfld1	0:44:00.00	+41:34:00.0	J2000.00	1.031	180.0	22:47:04.3	319.8	r	Sloan	1 x 1	
234199	M31-microfld1	0:44:00.00	+41:33:59.9	J2000.00	1.028	180.0	22:53:43.9	319.7	i	Sloan	1 x 1	
234200	M31-microfld1	0:44:00.00	+41:34:00.0	J2000.00	1.027	180.0	23:00:23.0	319.7	i	Sloan	1 x 1	
234201	M31-microfld2	0:43:10.00	+40:58:15.0	J2000.00	1.023	180.0	23:08:06.5	319.8	r	Sloan	1 x 1	
234202	M31-microfld2	0:43:10.00	+40:58:14.9	J2000.00	1.023	180.0	23:14:47.0	319.8	r	Sloan	1 x 1	
234203	M31-microfld2	0:43:10.00	+40:58:14.9	J2000.00	1.024	180.0	23:21:28.0	319.8	i	Sloan	1 x 1	
234204	M31-microfld2	0:43:10.00	+40:58:15.0	J2000.00	1.024	180.0	23:28:07.6	319.7	i	Sloan	1 x 1	
234205	Focus run	0:54:48.00	+00:44:30.1	J2000.00	1.133	180.0	23:38:52.5	5.1	B	Kitt Peak	1 x 1	B foc 46.2
234206	SA92 KPNO-B 10s	0:54:47.99	+00:42:00.0	J2000.00	1.136	180.0	23:44:46.6	9.6	B	Kitt Peak	1 x 1	
234207	SA92 KPNO-B 5s	0:54:49.35	+00:42:19.9	J2000.00	1.136	180.0	23:45:57.4	5.1	B	Kitt Peak	1 x 1	
234208	SA92 Z 10s	0:54:48.00	+00:42:00.0	J2000.00	1.137	180.0	23:47:20.9	10.1	z	Gunn	1 x 1	
234209	SA92 Z 5s	0:54:49.33	+00:42:19.9	J2000.00	1.137	180.0	23:48:37.7	5.1	z	Gunn	1 x 1	
234211	SA92 r 5s	0:54:48.00	+00:42:00.0	J2000.00	1.139	180.0	23:51:35.9	5.1	i	Sloan	1 x 1	i band
234212	SA92 r 3s	0:54:49.35	+00:42:19.9	J2000.00	1.139	180.0	23:52:43.5	3.1	i	Sloan	1 x 1	i band
234213	SA92 r 5s	0:54:47.99	+00:41:59.9	J2000.00	1.141	180.0	23:55:00.7	5.1	r	Sloan	1 x 1	
234214	SA92 r 3s	0:54:49.33	+00:42:19.9	J2000.00	1.141	180.0	23:56:09.5	3.1	r	Sloan	1 x 1	
234215	SA92 U 20s	0:54:47.99	+00:42:00.1	J2000.00	1.142	180.0	23:57:14.9	20.1	U	RGO	1 x 1	
234216	SA92 U 60s	0:54:49.35	+00:42:19.9	J2000.00	1.143	180.0	23:58:36.5	60.1	U	RGO	1 x 1	
234217	NOAO KPB	2:10:02.69	-04:33:36.7	J2000.00	1.209	180.0	00:02:54.7	899.1	B	Kitt Peak	1 x 1	
234220	NOAO KPB	2:10:02.69	-04:33:37.1	J2000.00	1.197	180.0	00:30:41.5	898.7	B	Kitt Peak	1 x 1	
234221	NOAO KPB	2:10:02.70	-04:33:36.9	J2000.00	1.198	180.0	00:47:47.6	898.6	B	Kitt Peak	1 x 1	

234222	NOAO KPB	2:10:02.70	-04:33:37.1	J2000.00	1.207	180.0	01:04:51.8	899.0		B	Kitt Peak		1 x 1
234224	NOAO2 KPB	2:10:03.19	-04:33:30.1	J2000.00	1.230	180.0	01:28:20.7	899.0		B	Kitt Peak		1 x 1
234225	NOAO2 KPB	2:10:03.20	-04:33:30.0	J2000.00	1.257	180.0	01:45:21.4	899.1		B	Kitt Peak		1 x 1
234226	NOAO2 KPB	2:10:03.20	-04:33:30.1	J2000.00	1.292	180.0	02:02:21.9	899.1		B	Kitt Peak		1 x 1
234227	NOAO2 KPB	2:10:03.20	-04:33:30.1	J2000.00	1.338	180.0	02:19:22.5	899.1		B	Kitt Peak		1 x 1 same pos
234228	NOAO2 KPB	2:10:03.20	-04:33:30.1	J2000.00	1.395	180.0	02:36:22.6	899.2		B	Kitt Peak		1 x 1
234234	NOAO2 KPB	2:10:03.19	-04:33:29.9	J2000.00	1.524	180.0	03:04:55.2	899.4		B	Kitt Peak		1 x 1 satellite track
234235	Focus run	3:52:08.00	+25:43:30.1	J2000.00	1.030	180.0	03:26:40.8	5.1		i	Sloan		1 x 1
234236	wfsj0347+2400-iz37	3:52:08.00	+25:40:59.9	J2000.00	1.042	180.0	03:32:02.4	599.4		i	Sloan		1 x 1
234237	wfsj0347+2400-iz37	3:52:08.00	+25:41:00.0	J2000.00	1.056	180.0	03:43:05.9	599.3		z	Gunn		1 x 1
234238	wfsj0347+2400-iz38	3:54:12.64	+22:45:10.2	J2000.00	1.077	180.0	03:54:56.6	599.5		i	Sloan		1 x 1
234239	wfsj0347+2400-iz38	3:54:12.64	+22:45:10.4	J2000.00	1.096	180.0	04:05:59.2	599.4		z	Gunn		1 x 1
234240	wfsj0347+2400-iz39	3:54:12.64	+22:25:10.4	J2000.00	1.123	180.0	04:18:38.4	599.5		i	Sloan		1 x 1
234241	wfsj0347+2400-iz39	3:54:12.64	+22:25:10.3	J2000.00	1.148	180.0	04:29:41.5	599.5		z	Gunn		1 x 1
234242	wfsj0347+2400-iz40	3:49:13.62	+21:38:00.0	J2000.00	1.198	180.0	04:41:34.6	599.5		i	Sloan		1 x 1
234243	wfsj0347+2400-iz40	3:49:13.63	+21:37:59.9	J2000.00	1.233	180.0	04:52:37.6	599.5		z	Gunn		1 x 1
234244	wfsj0347+2400-iz41	3:41:13.62	+21:47:00.0	J2000.00	1.308	180.0	05:04:28.6	599.5		i	Sloan		1 x 1
234245	wfsj0347+2400-iz41	3:41:13.63	+21:47:00.0	J2000.00	1.357	180.0	05:15:32.4	599.4		z	Gunn		1 x 1
234246	wfsj0347+2400-iz42	3:43:13.62	+21:46:59.9	J2000.00	1.407	180.0	05:27:25.0	599.4		i	Sloan		1 x 1
234247	wfsj0347+2400-iz42	3:43:13.63	+21:46:59.9	J2000.00	1.470	180.0	05:38:32.6	598.9		z	Gunn		1 x 1
234248	wfsj0347+2400-iz43	3:45:13.63	+21:46:59.8	J2000.00	1.534	180.0	05:50:25.8	599.5		i	Sloan		1 x 1
234249	wfsj0347+2400-iz43	3:45:13.62	+21:47:00.0	J2000.00	1.615	180.0	06:01:33.5	599.4		z	Gunn		1 x 1
234250	wfsj0347+2400-iz44	3:47:13.63	+21:46:59.8	J2000.00	1.696	180.0	06:13:24.0	599.5		i	Sloan		1 x 1
234251	wfsj0347+2400-iz44	3:47:13.63	+21:47:00.0	J2000.00	1.793	180.0	06:24:29.0	499.6		z	Gunn		1 x 1 500s as ZD>57deg
234252	SA98-670 Z 5s	6:52:12.00	-00:19:17.0	J2000.00	1.201	180.0	06:34:58.4	5.1		z	Gunn		1 x 1
234253	SA98-670 Z 5s	6:52:13.33	-00:18:56.9	J2000.00	1.204	180.0	06:36:47.5	5.1		z	Gunn		1 x 1
234254	SA98-670 Z 10s	6:52:14.66	-00:18:37.0	J2000.00	1.207	180.0	06:38:26.8	10.1		z	Gunn		1 x 1
234255	SA98-670 KPNO-B 10	6:52:12.00	-00:19:17.0	J2000.00	1.210	180.0	06:40:00.4	10.1		B	Kitt Peak		1 x 1
234256	SA98-670 KPNO-B 30	6:52:13.33	-00:18:57.0	J2000.00	1.213	180.0	06:41:54.2	30.1		B	Kitt Peak		1 x 1
234257	SA98-670 r 3s	6:52:12.00	-00:19:16.9	J2000.00	1.216	180.0	06:43:43.7	3.1		r	Sloan		1 x 1
234258	SA98-670 r 5s	6:52:13.32	-00:18:57.0	J2000.00	1.218	180.0	06:44:49.8	5.1		r	Sloan	1	1 x 1
234259	SA98-670 i 3s	6:52:11.99	-00:19:17.0	J2000.00	1.221	180.0	06:45:57.5	3.1		i	Sloan		1 x 1
234260	SA98-670 i 5s	6:52:13.33	-00:18:57.0	J2000.00	1.223	180.0	06:47:03.8	5.1		i	Sloan	1	1 x 1
234261	KPNO-B twi	8:01:00.00	+50:00:00.0	J2000.00	1.075	180.0	06:50:32.6	45.1		B	Kitt Peak	1	1 x 1
234262	KPNO-B twi	8:01:02.07	+50:00:19.9	J2000.00	1.075	180.0	06:52:34.6	25.1		B	Kitt Peak	1	1 x 1
234263	KPNO-B twi	8:01:04.15	+50:00:39.8	J2000.00	1.076	180.0	06:54:17.5	14.5		B	Kitt Peak	1	1 x 1
234264	KPNO-B twi	8:01:06.22	+50:00:59.9	J2000.00	1.076	180.0	06:56:05.3	10.1		B	Kitt Peak	1	1 x 1
234265	KPNO-B twi	8:01:08.30	+50:01:19.8	J2000.00	1.076	180.0	06:57:28.8	5.1		B	Kitt Peak	1	1 x 1
234266	i twi	8:01:00.00	+49:59:59.9	J2000.00	1.077	180.0	06:58:58.4	3.1		i	Sloan	1	1 x 1
234267	i twi	8:01:02.07	+50:00:19.9	J2000.00	1.077	180.0	07:00:18.6	1.6		i	Sloan	1	1 x 1
234268	i twi	8:01:04.14	+50:00:40.0	J2000.00	1.078	180.0	07:01:34.7	1.6		i	Sloan	1	1 x 1
234269	i twi	8:01:06.22	+50:00:59.9	J2000.00	1.078	180.0	07:02:43.3	1.6		i	Sloan	1	1 x 1
234270	i twi	8:01:08.29	+50:01:20.0	J2000.00	1.079	180.0	07:03:49.6	1.1		i	Sloan	1	1 x 1
234271	Z twi	8:00:59.99	+49:59:59.9	J2000.00	1.079	180.0	07:04:55.5	3.1		z	Gunn	1	1 x 1
234272	Z twi	8:01:02.07	+50:00:20.0	J2000.00	1.080	180.0	07:06:08.5	2.1		z	Gunn	1	1 x 1
234273	Z twi	8:01:04.15	+50:00:39.9	J2000.00	1.080	180.0	07:07:45.7	1.6		z	Gunn	1	1 x 1
234274	Z twi	8:01:06.22	+50:01:00.0	J2000.00	1.081	180.0	07:09:01.3	1.0		z	Gunn	1	1 x 1
234275	Z twi	8:01:08.32	+50:01:20.0	J2000.00	1.081	180.0	07:10:07.5	1.1		z	Gunn	1	1 x 1
234276	5	0:00:00.00	+00:00:00.0	J2000.00	4.470	180.0	07:32:34.7	0.0		z	Gunn	1	1 x 1
234277	5						07:36:30.4	0.0		z	Gunn	1	1 x 1
234278	Bias						07:37:52.0	0.0		z	Gunn	1	1 x 1
234279	Bias						07:38:31.1	0.0		z	Gunn	1	1 x 1
234280	Bias						07:39:15.8	0.0		z	Gunn	1	1 x 1
234281	Bias						07:40:04.8	0.0		z	Gunn	1	1 x 1
234282	Bias						07:40:46.3	0.0		z	Gunn	1	1 x 1
234283	Bias						07:41:27.5	0.0		z	Gunn	1	1 x 1
234284	Bias						07:42:08.8	0.0		z	Gunn	1	1 x 1
234285	Bias						07:42:50.2	0.0		z	Gunn	1	1 x 1
234286	Bias						07:46:05.4	0.0		z	Gunn	1	1 x 1