

UT Date 2004-04-20 Observers W. BrownColl. Focus 1020 Grating/Grism 600

File	Exp Time	UT Start	RA	Dec	Gr.	P.A.	Slit	Program	Bin	Comments
0001.BIAS	0	1:07	07:36:42.0	+31:30:15	600	90	2.0	#0 Calibration	2	binby2 x10
0002-0004.BIAS	0	1:07	07:37:21.1	+31:30:15	600	90	2.0	#0 Calibration	2	
0005-0010.BIAS	0	1:09	07:38:37.8	+31:30:16	600	90	2.0	#0 Calibration	2	
0011.BIAS	0	1:09	07:39:16.6	+31:30:16	600	90	2.0	#0 Calibration	4	binby4 x10
0012-0020.BIAS	0	1:10	07:40:20.5	+31:30:16	600	90	2.0	#0 Calibration	4	
0021.FLAT	24	1:27	07:57:58.5	+31:30:22	600	90	2.0	#0 Calibration	4	x15
0022.FLAT	24	1:28	07:58:49.8	+31:30:22	600	90	2.0	#0 Calibration	4	
0023-0028.FLAT	24	1:31	08:01:56.3	+31:30:23	600	90	2.0	#0 Calibration	4	
0029-0034.FLAT	24	1:35	08:04:59.7	+31:30:24	600	90	2.0	#0 Calibration	4	
0035.FLAT	24	1:35	08:05:33.1	+31:30:25	600	90	2.0	#0 Calibration	4	
0036.SKY	2	2:05	6:30:0	31:30:0	600	90	2.0	#57 Velocity S	4	photometric
0037-0038.SKY	2	2:05	6:30:0	31:30:0	600	90	2.0	#57 Velocity S	4	
0039.FineFoc	60	2:27	09:00:05.4	31:28:18	600	90	2.0	#56 Spectropho	1	
0040.Fiege34	160	2:48	10:36:41.2	43:21:50	600	90	2.0	#56 Spectropho	4	
0041.Fiege34	160	2:52	10:36:41.2	43:21:50	600	90	2.0	#56 Spectropho	4	
0042.COMP	10	2:55	10:36:41.2	43:21:50	600	90	2.0	#56 Spectropho	4	
0043.hs1922	240	2:57	11:29:17.1	44:48:21	600	90	2.0	#122 Halo Star	4	
0044.COMP	10	3:01	11:29:17.1	44:48:21	600	90	2.0	#122 Halo Star	4	
0045.hs1933	240	3:02	11:31:27.0	44:42:04	600	90	2.0	#122 Halo Star	4	
0046.COMP	10	3:06	11:31:27.0	44:42:04	600	90	2.0	#122 Halo Star	4	



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0047.hs1941	160	3:07	11:32:04.9	48:24:19	600	90	2.0	#122 Halo Star	4	
0048.COMP	10	3:10	11:32:04.9	48:24:19	600	90	2.0	#122 Halo Star	4	
0049.hs1942	396	3:11	11:32:06.1	44:30:28	600	90	2.0	#122 Halo Star	4	
0050.COMP	10	3:18	11:32:06.1	44:30:28	600	90	2.0	#122 Halo Star	4	
0051.hs1731	480	3:19	10:47:44.7	42:04:38	600	90	2.0	#122 Halo Star	4	
0052.COMP	10	3:27	10:47:44.7	42:04:38	600	90	2.0	#122 Halo Star	4	
0053.hs1919	530	3:29	11:29:03.7	32:16:43	600	90	2.0	#122 Halo Star	4	
0054.COMP	10	3:38	11:29:03.7	32:16:43	600	90	2.0	#122 Halo Star	4	
0055.hs1920	280	3:39	11:29:04.5	22:55:13	600	90	2.0	#122 Halo Star	4	
0056.COMP	10	3:44	11:29:04.5	22:55:13	600	90	2.0	#122 Halo Star	4	
0057.hs1930	160	3:45	11:30:46.7	22:30:07	600	90	2.0	#122 Halo Star	4	
0058.COMP	10	3:48	11:30:46.7	22:30:07	600	90	2.0	#122 Halo Star	4	
0059.hs1932	440	3:49	11:31:10.6	25:37:14	600	90	2.0	#122 Halo Star	4	
0060.COMP	10	3:57	11:31:10.6	25:37:14	600	90	2.0	#122 Halo Star	4	
0061.hs1935	240	3:58	11:31:28.8	28:37:40	600	90	2.0	#122 Halo Star	4	
0062.COMP	10	4:02	11:31:28.8	28:37:40	600	90	2.0	#122 Halo Star	4	
0063.hs1936	240	4:03	11:31:37.3	24:03:47	600	90	2.0	#122 Halo Star	4	
0064.COMP	10	4:07	11:31:37.3	24:03:47	600	90	2.0	#122 Halo Star	4	
0065.hs1928	440	4:08	11:30:07.5	22:59:40	600	90	2.0	#122 Halo Star	4	
0066.COMP	10	4:16	11:30:07.5	22:59:40	600	90	2.0	#122 Halo Star	4	

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0067.hs1924	330	4:16	11:29:50.8	16:58:46	600	90	2.0	#122 Halo Star	4	
0068.COMP	10	4:22	11:29:50.8	16:58:46	600	90	2.0	#122 Halo Star	4	
0069.hs1921	160	4:23	11:29:13.0	13:51:44	600	90	2.0	#122 Halo Star	4	
0070.COMP	10	4:26	11:29:13.0	13:51:44	600	90	2.0	#122 Halo Star	4	
0071.hs1926	380	4:27	11:29:58.5	16:53:12	600	90	2.0	#122 Halo Star	4	
0072.COMP	10	4:35	11:29:58.6	+16:53:08	600	90	2.0	#122 Halo Star	4	TCS died; restart Realtime
0073.hs1931	600	4:38	11:31:07.5	11:52:49	600	90	2.0	#122 Halo Star	4	
0074.COMP	10	4:48	11:31:07.5	11:52:49	600	90	2.0	#122 Halo Star	4	
0075.hs1934	190	4:49	11:31:28.6	10:38:47	600	90	2.0	#122 Halo Star	4	
0076.COMP	10	4:52	11:31:28.6	10:38:47	600	90	2.0	#122 Halo Star	4	
0077.hs1925	600	4:53	11:29:56.6	8:18:57	600	90	2.0	#122 Halo Star	4	
0078.COMP	10	5:04	11:29:56.6	8:18:57	600	90	2.0	#122 Halo Star	4	
0079.hs1939	480	5:04	11:32:03.4	6:55:09	600	90	2.0	#122 Halo Star	4	
0080.COMP	10	5:13	11:32:03.4	6:55:09	600	90	2.0	#122 Halo Star	4	
0081.hs1940	342	5:14	11:32:03.6	4:56:05	600	90	2.0	#122 Halo Star	4	
0082.COMP	10	5:20	11:32:03.6	4:56:05	600	90	2.0	#122 Halo Star	4	
0083.hs1949	222	5:20	11:33:42.2	5:58:14	600	90	2.0	#122 Halo Star	4	
0084.COMP	10	5:24	11:33:42.2	5:58:14	600	90	2.0	#122 Halo Star	4	
0085.hs1950	420	5:25	11:34:10.2	8:44:51	600	90	2.0	#122 Halo Star	4	
0086.COMP	10	5:32	11:34:10.2	8:44:51	600	90	2.0	#122 Halo Star	4	

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0087.hs1959	550	5:33	11:35:55.7	11:14:21	600	90	2.0	#122 Halo Star	4	
0088.COMP	10	5:43	11:35:55.7	11:14:21	600	90	2.0	#122 Halo Star	4	
0089.hs1944	340	5:44	11:32:27.3	15:17:31	600	90	2.0	#122 Halo Star	4	
0090.COMP	10	5:50	11:32:27.3	15:17:31	600	90	2.0	#122 Halo Star	4	
0091.hs1945	270	5:50	11:32:47.5	13:27:40	600	90	2.0	#122 Halo Star	4	
0092.COMP	10	5:55	11:32:47.5	13:27:40	600	90	2.0	#122 Halo Star	4	
0093.hs1947	192	6:00	11:33:02.6	11:56:53	600	90	2.0	#122 Halo Star	4	
0094.COMP	10	6:03	11:33:02.6	11:56:53	600	90	2.0	#122 Halo Star	4	
0095.hs1946	280	6:04	11:32:49.1	17:48:18	600	90	2.0	#122 Halo Star	4	
0096.COMP	10	6:09	11:32:49.1	17:48:18	600	90	2.0	#122 Halo Star	4	
0097.hs1963	252	6:10	11:36:25.6	18:07:54	600	90	2.0	#122 Halo Star	4	
0098.COMP	10	6:14	11:36:25.6	18:07:54	600	90	2.0	#122 Halo Star	4	
0099.hs1953	180	6:15	11:34:36.7	18:19:22	600	90	2.0	#122 Halo Star	4	
0100.COMP	10	6:18	11:34:36.7	18:19:22	600	90	2.0	#122 Halo Star	4	
0101.hs1946	300	6:19	11:32:49.1	17:48:18	600	90	2.0	#122 Halo Star	4	
0102.COMP	10	6:24	11:32:49.1	17:48:18	600	90	2.0	#122 Halo Star	4	
0103.hs1948	228	6:25	11:33:17.9	26:03:58	600	90	2.0	#122 Halo Star	4	
0104.COMP	10	6:29	11:33:17.9	26:03:58	600	90	2.0	#122 Halo Star	4	
0105.hs1958	390	6:30	11:35:40.7	26:34:13	600	90	2.0	#122 Halo Star	4	
0106.COMP	10	6:37	11:35:40.7	26:34:13	600	90	2.0	#122 Halo Star	4	

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0107.hs1957	342	6:38	11:35:26.7	27:22:11	600	90	2.0	#122 Halo Star	4	
0108.COMP	10	6:44	11:35:26.7	27:22:11	600	90	2.0	#122 Halo Star	4	
0109.hs1943	444	6:45	11:32:23.4	38:32:01	600	90	2.0	#122 Halo Star	4	
0110.COMP	10	6:53	11:32:23.4	38:32:01	600	90	2.0	#122 Halo Star	4	
0111.hs1937	510	6:54	11:31:39.1	31:12:48	600	90	2.0	#122 Halo Star	4	
0112.COMP	10	7:02	11:31:39.1	31:12:48	600	90	2.0	#122 Halo Star	4	
0113.hs1938	360	7:03	11:31:55.0	31:58:11	600	90	2.0	#122 Halo Star	4	
0114.COMP	10	7:10	11:31:55.0	31:58:11	600	90	2.0	#122 Halo Star	4	
0115.sn2004bi	1200	7:20	10:47:37.4	+26:18:12	300	70	3.0	#2 SN Observat	2	binby2, 3001, 3 slit, 619
0116.COMP	10	7:40	10:47:37.4	+26:18:12	300	70	3.0	#2 SN Observat	2	
0117.sn2004bg	1200	7:43	11:21:01.5	+21:20:23	300	66	3.0	#2 SN Observat	2	
0118.COMP	10	8:03	11:21:01.5	+21:20:23	300	66	3.0	#2 SN Observat	2	
0119.BDp332642	45	8:05	15:50:03.0	33:05:49	300	66	3.0	#56 Spectropho	2	
0120.BDp332642	45	8:06	15:50:03.0	33:05:49	300	66	3.0	#56 Spectropho	2	
0121.COMP	10	8:07	15:50:03.0	33:05:49	300	66	3.0	#56 Spectropho	2	
0122.sn2004ao	1200	8:13	17:28:09.3	+07:24:55	300	-51	3.0	#2 SN Observat	2	
0123.COMP	10	8:34	17:28:09.3	+07:24:55	300	-51	3.0	#2 SN Observat	2	
0124.BDp262606	40	8:36	14:49:02.3	+25:42:09	300	-51	3.0	#56 Spectropho	2	
0125.BDp262606	40	8:37	14:49:02.3	+25:42:09	300	-51	3.0	#56 Spectropho	2	
0126.COMP	10	8:38	14:49:02.3	+25:42:09	300	-51	3.0	#56 Spectropho	2	

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0127.FLAT	16	8:39	14:49:02.3	+25:42:09	300	-51	3.0	#56 Spectropho	2	x10
0128-0136.FLAT	16	8:43	14:49:02.3	+25:42:09	300	-51	3.0	#56 Spectropho	2	
0137.BDp262606	25	8:48	14:49:02.3	+25:42:09	300	-51	3.0	#56 Spectropho	4	binby4, 300l, 3 slit, 695
0138.COMP	5	8:49	14:49:02.3	+25:42:09	300	-51	3.0	#56 Spectropho	4	
0139.3C334	1500	8:53	16:20:21.9	+17:36:23	300	-30	3.0	#151 AGN Emiss	4	
0140.COMP	5	9:18	16:20:21.9	+17:36:23	300	-30	3.0	#151 AGN Emiss	4	
0141.4C28.45	1800	9:23	18:32:50.2	+28:33:35	300	103	3.0	#151 AGN Emiss	4	
0142.COMP	5	9:54	18:32:50.2	+28:33:35	300	103	3.0	#151 AGN Emiss	4	
0143.3C395	1800	9:58	19:02:55.9	+31:59:41	300	103	3.0	#151 AGN Emiss	4	
0144.COMP	5	10:28	19:02:55.9	+31:59:41	300	103	3.0	#151 AGN Emiss	4	
0145.FLAT	7	10:30	19:02:55.9	+31:59:41	300	103	3.0	#151 AGN Emiss	4	x10
0146-0154.FLAT	7	10:32	19:02:55.9	+31:59:41	300	103	3.0	#151 AGN Emiss	4	
0155.BDp262606	30	10:41	14:49:02.3	+25:42:09	300	70	3.0	#56 Spectropho	4	now tiltpos=740, using GG-495
0156.COMP	5	10:42	14:49:02.3	+25:42:09	300	70	3.0	#56 Spectropho	4	
0157.OU401	1500	10:46	18:01:32.4	+44:04:20	300	110	3.0	#151 AGN Emiss	4	
0158.COMP	5	11:11	18:01:32.4	+44:04:20	300	110	3.0	#151 AGN Emiss	4	
0159.OU401	1500	11:12	18:01:32.4	+44:04:20	300	110	3.0	#151 AGN Emiss	4	
0160.COMP	10	11:37	18:01:32.4	+44:04:20	300	110	3.0	#151 AGN Emiss	4	
0161.FLAT	7	11:38	18:01:32.4	+44:04:20	300	110	3.0	#56 Spectropho	4	x10
0162-0170.FLAT	7	11:40	18:01:32.4	+44:04:20	300	110	3.0	#56 Spectropho	4	

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0171.BIAS	0	11:45	18:01:32.4	+44:04:20	300	90	3.0	#0 Calibration	4	x10 (binby4 still)
0172-0180.BIAS	0	11:46	18:01:32.4	+44:04:20	300	90	3.0	#0 Calibration	4	
0181.BIAS	0	11:46	18:01:32.4	+44:04:20	300	90	3.0	#0 Calibration	2	x10 (binby2)
0182-0190.BIAS	0	11:48	18:01:32.4	+44:04:20	300	90	3.0	#0 Calibration	2	
0191-0200.DARK	900	14:09	18:01:32.4	+44:04:20	300	90	3.0	#0 Calibration	4	
0201-0210.DARK	900	16:41	18:01:32.4	+44:04:20	300	90	3.0	#0 Calibration	2	