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Part I (Prompt Reports)

NO. 502 JUNE 1986

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MAY 1986
APRIL 1986

Michael A. Chinnery, Director
NATIONAL GEOPHYSICAL DATA CENTER
BOULDER, COLORADO

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INTERNATIONAL URSIGRAM AND WORLD DAYS SERVICE

Summary of the Geoalert Messages — MAY 1986

Julian Day	Date of Issue	Date of Obser-vation	Wolf No.	10-cm Solar Flux	A-index	Location °Lat °Long	Flares Total	M	X	Date of Forecast	Location °Lat °Long	Region Forecast[1]	Geoalerts
121	01	30	029	074	005	N04 W86 N08 W52	1 1	0 0	0 0	01	N04 W86 N08 W52	Q Q	Solquiet, Magquiet.
122	02	01	015	071	005	N07 W64	2	0	0	02	N07 W64	Q	Solquiet, Magquiet.
123	03	02	028	073	015	N07 W76 N06 W55	3 0	0 0	0 0	03	N07 W76 N06 W55	E Q	Solquiet, Magalert Minor 03/04.
124	04	03	013	073	040	N07 W70	3	0	0	04	N07 W70	Q	Solquiet, Magnil.
		Presto:[2] Boulder Strong Magstorm in progress 03/0300 UT.											
		Presto: Kakioka Magstorm begins 02/02XX UT.											
125	05	04	011	070	015	N08 W84	0	0	0	05	N08 W84	Q	Solquiet, Magquiet.
		Presto: Boulder Proton event began at 04/1255 UT.											
		Maximum at 04/1320 UT of 16 p/cm2/sec/ster>10 MeV.											
		Ended at 04/1705 UT.											
126	06	05	000	070	010	Spotnil				06	Spotnil		Solquiet, Magalert Minor 06/06.
127	07	06	000	069	035	Spotnil				07	Spotnil		Solquiet, Magalert Minor 07/07, Flare.
		Presto: Boulder Strong Magstorm in progress 05/2100 UT.											
128	08	07	000	069	017	Spotnil				08	Spotnil		Solquiet, Magnil.
129	09	08	000	068	011	Spotnil				09	Spotnil		Solquiet, Magquiet.
130	10	09	000	069	007	Spotnil				10	Spotnil		Solquiet, Magquiet.
131	11	10	000	070	007	Spotnil				11	Spotnil		Solquiet, Magquiet.
132	12	11	000	070	006	Spotnil				12	Spotnil		Solquiet, Magquiet.
133	13	12	000	069	009	Spotnil				13	Spotnil		Solquiet, Magquiet.
134	14	13	000	070	005	Spotnil				14	Spotnil		Solquiet, Magquiet.
135	15	14	000	070	006	Spotnil				15	Spotnil		Solquiet, Magquiet.
136	16	15	013	071	006	N04 E66	0	0	0	16	N04 E66	Q	Solquiet, Magquiet.
137	17	16	013	073	010	N04 E53	1	0	0	17	N04 E53	Q	Solquiet, Magquiet.
138	18	17	028	074	012	N04 E41 N05 E65	0 0	0 0	0 0	18	N04 E41 N05 E65	Q Q	Solquiet, Magquiet.
139	19	18	028	077	014	N04 E27 N04 E53	0 0	0 0	0 0	19	N04 E27 N04 E53	Q Q	Solquiet, Magquiet.
140	20	19	040	077	013	N04 E13 N04 E39 N06 E67	0 0 2	0 0 0	0 0 0	20	N04 E13 N04 E39 N06 E67	Q Q Q	Solquiet, Magquiet.

ALERT PERIODS
INTERNATIONAL URSIGRAM AND WORLD DAYS SERVICE

Summary of the Geoalert Messages MAY 1986

Julian Day	Date of Issue	Date of Obser-vation	Wolf No.	10-cm Solar Flux	A-index	Location °Lat °Long	Flares Total	M	X	Date of Forecast	Location °Lat °Long	Region Forecast*	Geoalerts
141	21	20	028	078	008	N04 W00 N06 E55	0 4	0 0	0 0	21	N04 W00 N06 E55	Q Q	Solquiet, Magquiet.
142	22	21	033	077	010	N04 W15 N07 E40	0 1	0 0	0 0	22	N04 W15 N07 E40	Q Q	Solquiet, Magquiet.
143	23	22	028	077	005	N04 W29 N07 E23	0 1	0 0	0 0	23	N04 W29 N07 E23	Q Q	Solquiet, Magquiet.
144	24	23	031	077	009	N04 W42 N07 E13	0 0	0 0	0 0	24	N04 W42 N07 E13	Q Q	Solquiet, Magquiet.
145	25	24	025	078	008	N07 W01	0	0	0	25	N07 W01	Q	Solquiet, Magquiet.
146	26	25	024	079	011	N08 W15	6	0	0	26	N08 W15	E	Solquiet, Magquiet.
147	27	26	029	075	009	N08 W29	6	0	0	27	N08 W29	E	Solquiet, Magquiet.
148	28	27	016	073	008	N08 W43	0	0	0	28	N08 W43	Q	Solquiet, Magquiet.
149	29	28	025	072	005	N08 W58 S00 W30	0 0	0 0	0 0	29	N08 W58 S00 W30	Q Q	Solquiet, Magquiet.
150	30	29	022	072	005	N06 W73 S00 W45	0 0	0 0	0 0	30	N06 W73 S00 W45	Q Q	Solquiet, Magquiet.
151	31	30	023	071	010	N08 W88 S01 W60	0 0	0 0	0 0	31	N08 W88 S01 W60	Q Q	Solquiet, Magquiet.
152	01	31	012	071	018	S01 W71	0	0	0	01	S01 W71	Q	Solquiet, Magalert Minor 01/02, Recurrence.

[1]Q = quiet, E = eruptive, A = active, P = proton.
[2]Presto message is a rapid report of a major event.

INTERNATIONAL (R_I) RELATIVE SUNSPOT NUMBERS

Day	1985 Final Jun	Jul	Aug	Sep	Oct	Nov	Dec	1986 Prov Jan	Feb	Mar	Apr	May
01	10	21	35	7	0	0	0	0	18	16	9	15
02	0	27	25	0	0	0	16	0	31	33	10	23
03	11	30	27	0	0	0	13	0	57	34	12	12
04	26	32	27	0	0	0	0	0	58	32	0	9
05	35	38	20	0	0	16	18	0	53	37	0	10
06	37	43	14	0	0	19	26	0	47	33	0	0
07	38	71	12	0	0	19	15	0	52	38	9	0
08	42	67	12	0	0	18	12	0	54	32	11	0
09	42	82	17	0	0	25	16	0	47	23	0	0
10	58	82	12	0	0	15	15	0	37	20	9	0
11	66	61	12	7	0	17	18	0	37	18	13	0
12	54	45	12	0	0	19	19	0	25	13	15	0
13	45	25	0	9	11	30	18	13	22	8	14	0
14	36	9	0	9	13	44	30	14	16	0	26	0
15	37	8	0	9	15	48	47	12	11	10	25	9
16	27	9	14	9	25	39	66	8	0	0	26	11
17	23	11	12	8	19	43	63	0	0	0	14	13
18	18	11	11	10	20	37	52	0	0	0	15	22
19	10	11	12	10	31	30	40	0	0	0	13	27
20	9	11	10	9	44	28	24	0	10	12	18	23
21	9	10	9	8	50	18	17	0	10	13	25	30
22	9	10	0	7	72	12	11	0	10	10	20	27
23	12	18	0	0	67	10	0	0	11	19	54	20
24	13	12	0	0	63	0	0	0	8	18	64	24
25	12	10	0	0	55	0	0	0	11	10	48	22
26	10	13	8	0	40	0	0	7	11	10	43	25
27	8	12	8	0	27	0	0	0	15	11	33	18
28	8	36	10	0	14	0	0	0	10	13	23	18
29	9	51	9	7	11	0	0	0		11	31	17
30	11	46	8	7	0	0	0	8		12	33	13
31		40	9		0		0	8		0		10
Mean	24	31	11	4	19	16	17	2	24	16	20	13

The yearly mean sunspot number equaled 17.9 in 1985.

DAILY SOLAR FLUX AT 2800 MHz (10.7 CM) ADJUSTED TO 1 AU

ALGONQUIN RADIO OBSERVATORY, OTTAWA

Day	Jun 85	Jul	Aug	Sep	Oct	Nov	Dec	Jan 86	Feb	Mar	Apr	May
01	69.5	76.9	80.5	73.0	68.3	69.0	67.8	67.0	81.8	84.1	71.8	72.5
02	72.4	79.1*	80.4	72.8	67.5	68.8	68.4	67.6	86.4*	89.2	70.6	74.3
03	74.6	81.3	79.2	73.1	68.7	68.0	68.5	68.4	96.0	91.1*	70.9	73.8
04	77.5	80.4	79.3	73.5	68.3	67.6	68.3	69.5	97.8*	91.4	71.7	71.6
05	84.3	83.3	78.5	72.2	67.0	68.5	69.7	70.7	99.8	90.5	71.9	70.8
06	87.4	87.5	77.9	72.5	66.0	70.0	71.1	72.2	99.0	89.7*	71.9	69.8
07	88.4	97.7	79.5	70.8	65.9	71.8	71.9	71.6	96.7	87.6	71.9	69.9
08	88.9	96.7*	78.5	70.3	65.8	73.7	73.0	71.2	94.3*	85.1	71.8	69.5
09	89.8	100.9*	74.9	70.6	66.0	72.9	75.2	72.7	92.5	84.3	72.0	69.8
10	91.7	104.6*	72.8	70.3	66.7	72.5	75.6	72.2	93.4*	81.6	72.5	70.9
11	91.2	97.3	68.4	69.2	67.7	74.7	76.6	71.9	95.1	79.3	72.4	71.4
12	89.8	92.9	69.7	68.5	66.9	74.7	77.3	71.2	88.4	76.9	73.1	70.9
13	89.2	85.5	68.9	70.7	66.7	74.3	75.6	74.3	86.4	74.3	74.2	71.7
14	85.3	76.4	69.3	70.4	69.8	76.9	76.4	76.4	86.2*	71.9	76.0	71.6
15	83.8	73.0	69.0	71.1	71.7	82.2*	80.2	75.1	79.6	69.7	76.0	72.7
16	80.9	71.9	68.2	70.3	73.2	78.8	83.7	75.5*	71.2	68.9	75.8	74.3
17	77.3	71.9	67.9	70.0	75.5	77.4	80.2	74.4	68.3	68.9	75.3	75.3
18	73.8	71.8	68.6	70.4	75.5	77.3	78.4	73.1	68.7	68.9	74.4	78.7
19	72.2	71.7	69.1	70.7	77.7	75.6	77.5	70.2	68.1	68.8	74.9	78.7
20	71.9	71.7	70.6	69.8	79.4	75.7	75.4*	69.2	68.1	68.4	75.0	79.6
21	71.5	71.2	70.4	69.6	84.7	73.7	75.1	67.9	66.0	68.5	74.2	79.2
22	71.6	71.0	72.7	69.8	94.3	73.1	73.5	67.3	67.7	69.1	75.1	79.2
23	71.8	71.1	72.9	69.2	93.2*	72.8	71.2	67.0	67.7	69.8	82.1	78.8
24	70.8	71.0	72.1	69.0	92.5	71.9	69.9	66.9	68.6	69.5	87.4	79.5
25	71.0	75.6	72.5	68.7	88.5*	70.3	67.3	68.0	70.1	69.6	85.7	81.1
26	70.0	77.4	72.3	68.4	83.0	69.5	66.3	67.7	72.0	70.8	84.2*	77.1
27	70.2	79.2	73.1	67.7	78.5*	69.8	66.2	67.2	75.2	70.2	83.4	74.7
28	71.0	81.2	73.1	67.8	76.7	69.0	66.2	70.0	77.0	70.4	80.1	74.3
29	72.3	83.5	73.1	68.3	73.6	69.1	66.0	71.2		71.5	77.0	74.3
30	74.8	83.8	73.9	68.3	70.5	68.8	66.3	73.7		71.5	74.7	72.5
31		82.4	74.1		69.5		66.6	76.6		71.5		73.2
Mean	78.5	81.3	73.3	70.2	74.2	72.6	72.4	70.9	81.5	76.2	75.6	74.2

A = interpolated value; --- = no observation.
*Adjusted for burst in progress at time of measurement; †corrected for antenna drift.
The yearly mean 2800 MHz flux adjusted to 1 astronomical unit equaled 74.7 in 1985.

DAILY SOLAR INDICES

May 1986

Day	Julian Day	Bartels Cycle Day	Sunspot Numbers Int	Amer	Obs Flux Ottawa (2800)	Solar Flux Adjusted to 1 Astronomical Unit SGMR (15400)	SGMR (8800)	SGMR (4995)	Ottawa (2800)	SGMR (2695)	SGMR (1415)	SGMR (610)	SGMR (410)	SGMR (245)
01	121	9	15	13	71.4	556	296	108	72.5	72	59	51	25	18
02	122	10	23	23	73.1	---	---	---	74.3	--	--	--	--	--
03	123	11	12	13	72.6	532	293	101	73.8	70	56	48	19	10
04	124	12	9	8	70.4	562	303	108	71.6	70	56	50	20	11
05	125	13	10	0	69.5	540	285	103	70.8	69	56	46	20	10
06	126	14	0	0	68.6	515	301	105	69.8	68	54	51	19	11
07	127	15	0	0	68.6	545	292	104	69.9	69	55	46	20	12
08	128	16	0	0	68.2	540	269	102	69.5	68	55	50	20	9
09	129	17	0	0	68.5	562	303	104	69.8	68	56	51	20	9
10	130	18	0	0	69.5	561	289	108	70.9	72	58	60	20	11
11	131	19	0	0	70.0	563	303	106	71.4	69	57	48	20	9
12	132	20	0	0	69.4	514	273	89	70.9	66	56	47	20	10
13	133	21	0	0	70.2	559	298	106	71.7	70	58	50	19	11
14	134	22	0	9	70.1	561	289	106	71.6	71	59	53	20	10
15	135	23	9	8	71.1	---	---	---	72.7	--	--	--	--	--
16	136	24	11	10	72.6	---	---	---	74.3	--	--	--	--	--
17	137	25	13	14	73.6	---	---	---	75.3	--	--	--	--	--
18	138	26	22	19	76.9	567	296	---	78.7	78	60	--	21	11
19	139	27	27	22	76.9	552	277	---	78.7	80	65	--	21	10
20	140	1	23	23	77.7	563	292	---	79.6	82	65	49	21	11
21	141	2	30	19	77.3	541	291	---	79.2	77	64	50	21	12
22	142	3	27	21	77.3	494	240	---	79.2	81	65	52	22	10
23	143	4	20	24	76.8	571	288	---	78.8	79	65	54	21	15
24	144	5	24	24	77.5	565	272	---	79.5	76	64	50	19	11
25	145	6	22	22	79.0	555	293	---	81.1	78	65	50	21	10
26	146	7	25	21	75.1	575	288	---	77.1	75	62	51	22	10
27	147	8	18	14	72.7	568	283	---	74.7	72	62	50	42	13
28	148	9	18	18	72.3	568	---	---	74.3	72	62	47	20	10
29	149	10	17	15	72.3	559	279	---	74.3	71	60	47	22	11
30	150	11	13	9	70.5	555	264	---	72.5	71	58	46	20	12
31	151	12	10	11	71.2	566	294	---	73.2	73	58	46	21	11
Mean			13	12	72.6	552	287	103	74.2	73	60	50	21	11

*Adjusted for burst in progress at time of measurement.

The observed and the adjusted Ottawa fluxes tabulated above are the "Series C" daily values reported by the Algonquin Radio Observatory, Ottawa, Ontario, Canada. The letter "A" following an entry designates an interpolated flux. Numbers in parentheses in the column headings denote frequencies in MHz.

Equipment problems produced the gaps shown here in the Air Weather Service's Sagamore Hill (SGMR) observations.

The International and American sunspot numbers shown above are preliminary values.

OBSERVED AND PREDICTED SOLAR ACTIVITY INDICES

MAY 1986

Date	RELATIVE SUNSPOT NUMBERS: International (Ri) Monthly Mean	International (Ri) Smoothed	American (Ra) Monthly Mean	American (Ra) Smoothed	Derived (Rs) Monthly Mean	Derived (Rs) Smoothed	2800 MHz RADIO FLUX Adjusted to 1 AU (Sa) Monthly Mean	2800 MHz RADIO FLUX Adjusted to 1 AU (Sa) Smoothed
Jul 82	106.1	115	113.3	117	116.0	125	164.8	174
Aug	107.6	109	110.5	111	123.9	120	172.1	168
Sep	118.8	101	117.8	103	118.5	112	167.1	161
Oct	94.7	96	90.1	97	111.8	106	160.9	155
Nov	98.1	95	93.2	95	114.8	103	163.7	153
Dec	127.0	95	145.0	95	146.7	101	193.2	151
Jan 83	84.3	93	82.8	93	86.7	98	137.7	148
Feb	51.0	90	53.4	90	67.2	94	119.6	145
Mar	66.5	86	60.5	85	64.7	90	117.3	141
Apr	80.7	82	74.5	81	67.5	85	119.9	136
May	99.2	77	97.7	77	86.1	80	137.1	131
Jun	91.1	70	93.1	69	92.4	72	143.0	124
Jul	82.2	66	82.2	63	77.4	66	129.1	118
Aug	71.8	66	69.2	63	75.7	66	127.5	118
Sep	50.3	68	47.4	66	57.0	67	110.2	119
Oct	55.8	68	52.3	66	58.6	67	111.7	120
Nov	33.3	59	30.2	65	35.6	67	90.4	120
Dec	33.4	64	32.3	62	35.7	65	90.5	118
Jan 84	57.0	60	54.4	58	59.4	61	112.4	115
Feb	85.4	56	81.5	54	86.2	58	137.2	101
Mar	83.5	53	83.0	51	68.5	55	120.8	108
Apr	69.7	50	66.5	48	78.1	52	129.7	105
May	76.4	48	72.1	45	79.6	49	131.1	103
Jun	46.1	46	45.2	44	49.8	48	103.5	102
Jul	37.4	44	36.2	42	37.6	39	92.2	99
Aug	25.5	40	24.5	38	30.7	41	85.8	95
Sep	15.7	34	13.6	32*	23.2	35	78.9	90
Oct	12.0	29	9.8	27*	16.9	31	73.1	86
Nov	22.8	25	19.4	23*	18.6	26	74.6	72
Dec	18.7	22	17.0	20*	17.4	23	73.5	79
Jan 85	16.5	20	14.5	19*	15.9	21	72.1	77
Feb	15.9	20	16.3	18*	15.7	20	71.9	76
Mar	17.2	19	11.8*	16*	16.3	19	72.5	75
Apr	16.2	18	17.1*	17*	19.8	19	75.7	75
May	27.5	18	24.0*	17*	26.6	19	82.0	75
Jun	24.2	18	22.2*	16*	22.8	19	78.5	75
Jul	30.7	17*	30.8*	16*	25.8	19	81.3	75
Aug	11.1	17*	10.7*	15*	17.2	19	73.3	75
Sep	3.9	17*	3.4*	16*	13.8	20	70.2	76
Oct	18.6	17*	16.5*	16*	18.1	20	74.2	76
Nov	16.2	17*	16.4*	15*	16.4	19	72.6	75
Dec	17.3	16(1)*	10.1*	14	16.2	18	72.4	--
Jan 86	2.3†	16(3)*	2.3*	14	14.6	18	70.9	--
Feb	23.6†	16(4)*	23.8*	14	26.0	18	81.5	--
Mar	15.7†	15(5)*	12.5*	13	20.3	17	76.2	--
Apr	20.4†	14(6)*	13.8*	12	19.6	16	75.6	--
May	13.1†	13(7)*	11.6*	11	18.1	15	74.2	--
Jun	----	12(8)*	----	11	----	14	----	--
Jul	----	11(8)*	----	10	----	13	----	--
Aug	----	11(8)*	----	9	----	12	----	--
Sep	----	10(8)*	----	9	----	12	----	--
Oct	----	10(8)*	----	9	----	11	----	--
Nov	----	10(8)*	----	9	----	11	----	--

*An asterisk marks either a value of the observed 12-month running mean or of a predicted 12-month average that is based in part on preliminary observations.

Underlined entries indicate predicted values and parentheses enclose the absolute value of the 90% confidence limits. The two columns headed "Derived" represent a sunspot number computed from a linear regression equation between the 2800 MHz solar flux (adjusted to 1 astronomical unit) and the Zurich sunspot number.

SMOOTHED OBSERVED AND PREDICTED SUNSPOT NUMBERS FOR CYCLE 21

MAY 1986

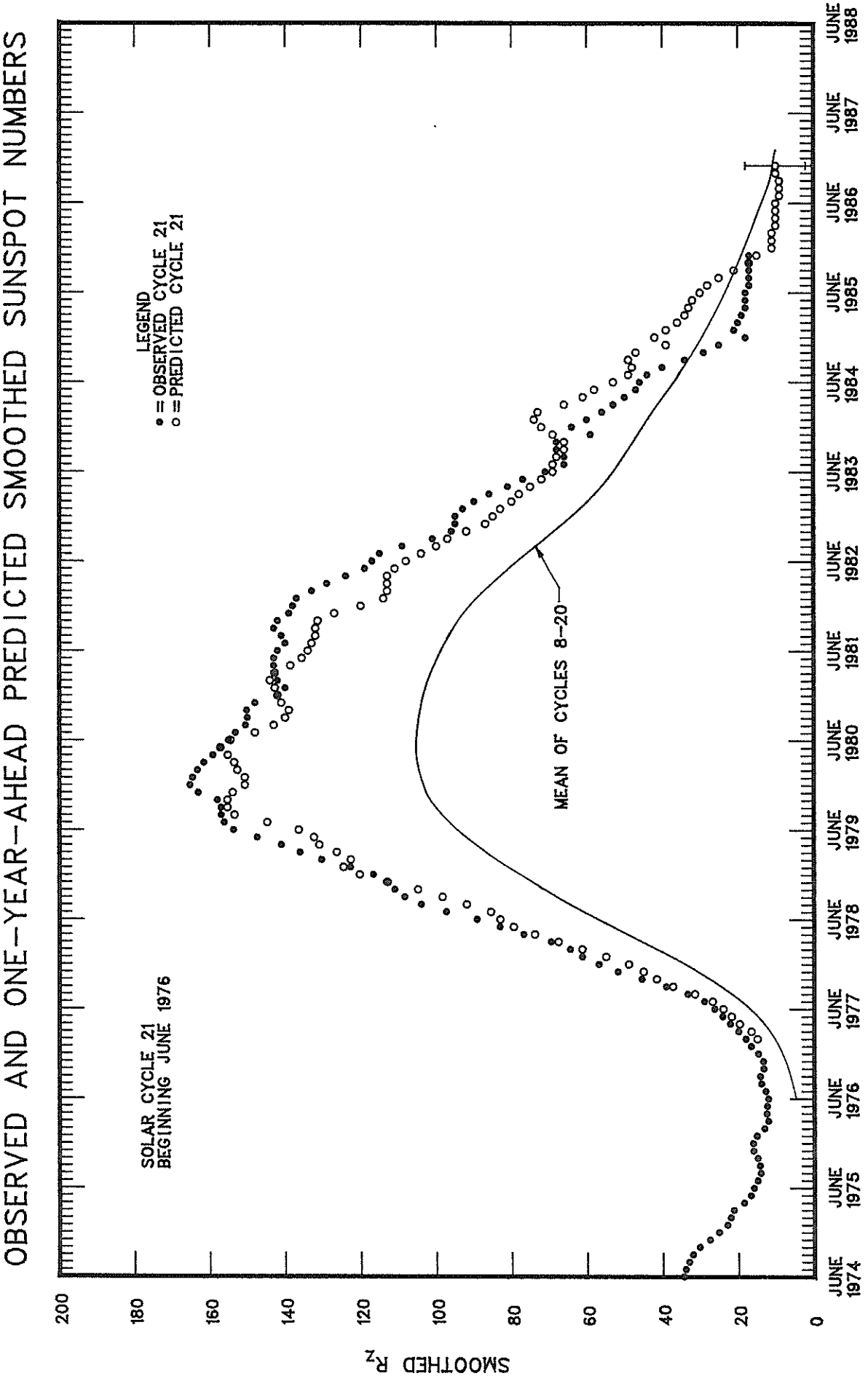
Month	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
1976	15	13	12	13	13	12*	13	14	14	13	14	15
1977	17	18	20	22	24	26	29	33	39	46	52	57
1978	61	65	70	77	83	89	97	104	108	111	113	118
1979	124	131	137	141	147	153	155	155	156	158	162	165*
1980	164	163	161	159	156	155	153	150	150	150	148	143
1981	140	142	143	143	143	142	140	141	143	142	139	138
1982	137	133	129	124	120	117	115	109	101	96	95	95
1983	93	90	86	82	71	71	66	66	68	68	67	64
1984	60	56	53	50	48	47	44	40	34	29	25	22
1985	21	20	19	18	18	18	17	17	17	17	17	16 (1)
1986	16 (3)	16 (4)	15 (5)	14 (6)	13 (7)	12 (8)	11 (8)	11 (8)	10 (8)	10 (8)	10 (8)	10 (8)

An asterisk marks the minimum and the maximum of Sunspot Cycle 21.

For the current solar cycle, this table gives observed smoothed sunspot numbers up to the one calculated from the most recently measured monthly mean. These smoothed observed values are based on final monthly mean Zurich numbers through 1980, on final international numbers through 1985, and on provisional international numbers thereafter.

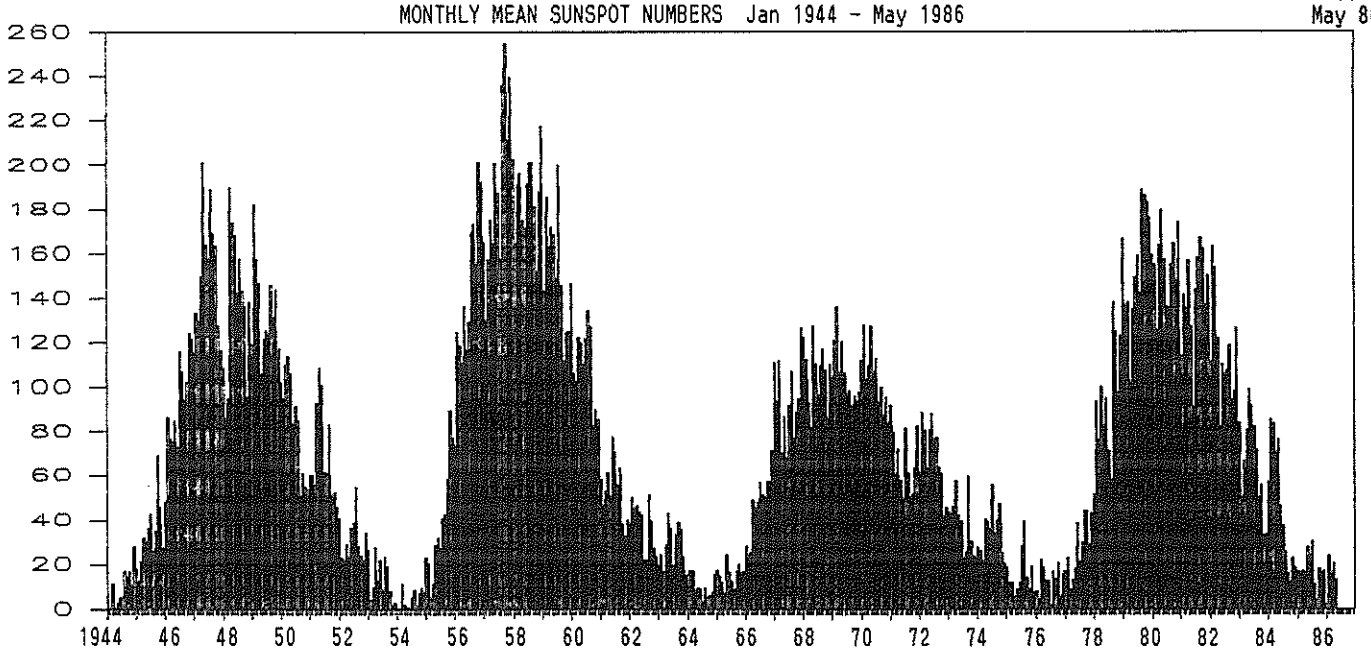
The entries with numbers in parentheses below them denote predictions by the McNish-Lincoln method. (See page 9 in the March 1986 edition of the "Solar-Geophysical Data" supplement.) Adding the number in parentheses to the predicted value generates the upper limit of the 90% confidence interval; subtracting the number in parentheses from the predicted value generates the lower limit. Consider, for example, the November 1986 prediction tabulated above. There exists a 90% chance that in November 1986 the actual smoothed sunspot number will fall somewhere between 2 and 18.

THE MCNISH-LINCOLN PREDICTION METHOD GENERATES USEFUL ESTIMATES OF SMOOTHED SUNSPOT NUMBERS FOR NO MORE THAN 12 MONTHS AHEAD. Beyond a year the predictions regress rapidly toward the mean of all 13 cycles of data used in the computation. Furthermore, the method is very sensitive to the date defined as the beginning of the current sunspot cycle, that is, to the date of the most recent sunspot minimum. In "Solar-Geophysical Data," issues 390-401, we based the current cycle predictions on March 1976 as the end of cycle 20 and the onset of the new cycle 21. Later studies, including one published by M. Waldmeier, showed that June 1976 was more appropriately the minimum epoch. We therefore generated this table using the June 1976 date.


OBSERVED AND ONE-YEAR-AHEAD PREDICTED SMOOTHED SUNSPOT NUMBERS
LEGEND
• = OBSERVED CYCLE 21
○ = PREDICTED CYCLE 21
SOLAR CYCLE 21
BEGINNING JUNE 1976
MEAN OF CYCLES 8-20
SMOOTHED R_Z
200
180
160
140
120
100
80
60
40
20
0
JUNE 1974
JUNE 1975
JUNE 1976
JUNE 1977
JUNE 1978
JUNE 1979
JUNE 1980
JUNE 1981
JUNE 1982
JUNE 1983
JUNE 1984
JUNE 1985
JUNE 1986
JUNE 1987
JUNE 1988

MONTHLY MEAN SUNSPOT NUMBERS Jan 1944 - May 1986

May 86



Year	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Mean	
1944	3.7	0.5	11.0	0.3	2.5	5.0	5.0	16.7	14.3	16.9	10.8	28.4	9.6	m
1945	18.5	12.7	21.5	32.0	30.6	36.2	42.6	25.9	34.9	68.8	46.0	27.4	33.2	
1946	47.6	86.2	76.6	75.7	84.9	73.5	116.2	107.2	94.4	102.3	123.8	121.7	92.6	
1947	115.7	133.4	129.8	149.8	201.3	163.9	157.9	188.8	169.4	163.6	128.0	116.5	151.6	M
1948	108.5	86.1	94.8	189.7	174.0	167.8	142.2	157.9	143.3	136.3	95.8	138.0	136.3	
1949	119.1	182.3	157.5	147.0	106.2	121.7	125.8	123.8	145.3	131.6	143.5	117.6	134.7	
1950	101.6	94.8	109.7	113.4	106.2	83.6	91.0	85.2	51.3	61.4	54.8	54.1	83.9	
1951	59.9	59.9	55.9	92.9	108.5	100.6	61.5	61.0	83.1	51.6	52.4	45.8	69.4	
1952	40.7	22.7	22.0	29.1	23.4	36.4	39.3	54.9	28.2	23.8	22.1	34.3	31.5	
1953	26.5	3.9	10.0	27.8	12.5	21.8	8.6	23.5	19.3	8.2	1.6	2.5	13.9	
1954	0.2	0.5	10.9	1.8	0.8	0.2	4.8	8.4	1.5	7.0	9.2	7.6	4.4	m
1955	23.1	20.8	4.9	11.3	28.9	31.7	26.7	40.7	42.7	58.5	89.2	76.9	38	
1956	73.6	124.0	118.4	110.7	136.6	116.6	129.1	169.6	173.2	155.3	201.3	192.1	141.7	
1957	165.0	130.2	157.4	175.2	164.6	200.7	187.2	158.0	235.8	253.8	210.9	239.4	190.2	M
1958	202.5	164.9	190.7	196.0	175.3	171.5	191.4	200.2	201.2	181.5	152.3	187.6	184.8	
1959	217.4	143.1	185.7	163.3	172.0	168.7	149.6	199.6	145.2	111.4	124.0	125.0	159	
1960	146.3	106.0	102.2	122.0	119.6	110.2	121.7	134.1	127.2	82.8	89.6	85.6	112.3	
1961	57.9	46.1	53.0	61.4	51.0	77.4	70.2	55.8	63.6	37.7	32.6	39.9	53.9	
1962	38.7	50.3	45.6	46.4	43.7	42.0	21.8	21.8	51.3	39.5	26.9	23.2	37.6	
1963	19.8	24.4	17.1	29.3	43.0	35.9	19.6	33.2	38.8	35.3	23.4	14.9	27.9	
1964	15.3	17.7	16.5	8.6	9.5	9.1	3.1	9.3	4.7	6.1	7.4	15.1	10.2	m
1965	17.5	14.2	11.7	6.8	24.1	15.9	11.9	8.9	16.8	20.1	15.8	17.0	15.1	
1966	28.2	24.4	25.3	48.7	45.3	47.7	56.7	51.2	50.2	57.2	57.2	70.4	47	
1967	110.9	93.6	111.8	69.5	86.5	67.3	91.5	107.2	76.8	88.2	94.3	126.4	93.8	
1968	121.8	111.9	92.2	81.2	127.2	110.3	96.1	109.3	117.2	107.7	86.0	109.8	105.9	M
1969	104.4	120.5	135.8	106.8	120.0	106.0	96.8	98.0	91.3	95.7	93.5	97.9	105.5	
1970	111.5	127.8	102.9	109.5	127.5	106.8	112.5	93.0	99.5	86.6	95.2	83.5	104.5	
1971	91.3	79.0	60.7	71.8	57.5	49.8	81.0	61.4	50.2	51.7	63.2	82.2	66.6	
1972	61.5	88.4	80.1	63.2	80.5	88.0	76.5	76.8	64.0	61.3	41.6	45.3	68.9	
1973	43.4	42.9	46.0	57.7	42.4	39.5	23.1	25.6	59.3	30.7	23.9	23.3	38	
1974	27.6	26.0	21.3	40.3	39.5	36.0	55.8	33.6	40.2	47.1	25.0	20.5	34.5	
1975	18.9	11.5	11.5	5.1	9.0	11.4	28.2	39.7	13.9	9.1	19.4	7.8	15.5	
1976	8.1	4.3	21.9	18.8	12.4	12.2	1.9	16.4	13.5	20.6	5.2	15.3	12.6	m
1977	16.4	23.1	8.7	12.9	18.6	38.5	21.4	30.1	44.0	43.8	29.1	43.2	27.5	
1978	51.9	93.6	76.5	99.7	82.7	95.1	70.4	58.1	138.2	125.1	97.9	122.7	92.5	
1979	166.6	137.5	138.0	101.5	134.4	149.5	159.4	142.2	188.4	186.2	183.3	176.3	155.4	M
1980	159.6	155.0	126.2	164.1	179.9	157.3	136.3	135.4	155.0	164.7	147.9	174.4	154.6	
1981	114.0	141.3	135.5	156.4	127.5	90.9	143.8	158.7	167.3	162.4	137.5	150.1	140.4	
1982	111.2	163.6	153.8	122.0	82.2	110.4	106.1	107.6	118.8	94.7	98.1	127.0	115.9	
1983	84.3	51.0	66.5	80.7	99.2	91.1	82.2	71.8	50.3	55.8	33.3	33.4	66.6	
1984	57.0	85.4	83.5	69.7	76.4	46.1	37.4	25.5	15.7	12.0	22.8	18.7	45.9	
1985	16.5	15.9	17.2	16.2	27.5	24.2	30.7	11.1	3.9	18.6	16.2	17.3	17.9	
1986	2.3*	23.6*	15.7	20.4*	13.1*								15.0*	

*Preliminary

Each M marks a sunspot cycle maximum and each m a minimum.

H - ALPHA S O L A R F L A R E S

MAY 1986

Sta	Day	Start (UT)	Max (UT)	End (UT)	Lat	CMD	NOAA/ USAF Region	CMP Mo	CMP Day	Dur (Min)	Imp	Opt	Xray	See	Obs Type	Time (UT)	Area Measurement Apparent (10⁻⁶ Disk)	Corr (Sq Deg)	Remarks
LEAR	01	0527	0530	0542	N07	W54	4727	04	27.3	15	SF			3	C		42		
LEAR	01	0552	0556	0600	N06	W56	4727	04	27.1	8	SF			3	C		16		F
RAMY	02	1058	1121	1144	N04	W65	4727	04	27.7	46	SF			3	C		25		K
RAMY	02	1058	1131	1144	N04	W65	4727	04	27.7	46	SN			3	C		31		K
HOLL	02	1350	1400	1417	N06	W66	4727	04	27.7	27	SF			3	C		68		
RAMY	02	1524	1528	1538	N07	W72	4727	04	27.3	14	SN			3	C		32		
HOLL	02	1525	1528	1535	N06	W67	4727	04	27.7	10	SN			3	C		30		
RAMY	03	1546	1555	1602	N09	W79	4727	04	27.8	16	SF			3	C		55		
RAMY	03	1630	1632	1642	N07	W61	4728	04	29.2	12	SF			3	C		22		
RAMY	03	1711	1713	1715D	N07	W61	4728	04	29.2	4D	SF			3	C		30		
PALE	03	1954	1955	2009	N05	W68	4728	04	28.8	15	SN			3	C		27		
HOLL	03	2133	2134	2138	N08	W76	4728	04	28.3	5	SF			4	C		29		F
HOLL	19	1854	1900	1902	N05	E72	4731	05	25.2	8	SF			3	C		11		
HOLL	19	1914	1919	1932	N05	E72	4731	05	25.2	18	SF			3	C		14		H
RAMY	20	1714	1723	1728	N06	E55	4731	05	24.8	14	SF			3	C		25		
HOLL	20	1722	1723	1728	N07	E62	4731	05	25.4	6	SF			3	C		17		
PALE	20	1912	1916	1921	N06	E53	4731	05	24.8	9	SN			3	C		27		
HOLL	20	1913	1915	1919	N05	E53	4731	05	24.8	6	SN			3	C		28		
RAMY	20	1913	1915	1920	N05	E53	4731	05	24.8	7	SN			3	C		63		
PALE	20	1952	1953	2006	N07	E59	4731	05	25.2	14	SF			3	C		19		
HOLL	20	2059	2059	2104	N05	E52	4731	05	24.8	5	SF			3	C		17		
PALE	21	0144	0145	0149	N06	E49	4731	05	24.7	5	SF			2	C		30		
PALE	22	0208	0210	0215	N09	E41	4731	05	25.2	7	SF			3	C		41		F
LEAR	22	0210	0210	0214	N08	E41	4731	05	25.2	4	SF			3	C		38		F
PEKG	24	0205	0240	0310	N08	E16		05	25.3	65	SN				C	0240	21	.2	D
LEAR	25	0820	0821	0828	N08	W06	4731	05	24.9	8	SN			3	C		24		
RAMY	25	1517	1517	1531	N07	W08	4731	05	25.0	14	SN			3	C		49		F
HOLL	25	2155	2159	2211	N06	W11	4731	05	25.1	16	SF			3	C		77		
HOLL	25	2214	2216	2235	N06	W11	4731	05	25.1	21	SF			3	C		23		F
HOLL	25	2303	2317	2327D	N06	W11	4731	05	25.1	24D	SF			3	C		47		
LEAR	25	2359E	2359	0002	N09	W13	4731	05	25.0	3D	SF			2	C		25		F
PEKG	26	0016	0025	0053	N07	W16		05	24.8	37	SN				P	0027	63	.7	E
LEAR	26	0025	0028	0034	N09	W18	4731	05	24.7	9	SF			3	C		24		F
LEAR	26	0255	0256	0313	N08	W17	4731	05	24.8	18	SN			3	C		68		F
LEAR	26	0746	0749	0805	N08	W18	4731	05	25.0	19	SF			3	C		50		F
RAMY	26	1636	1641	1646D	N06	W23	4731	05	25.0	10D	SF			3	C		40		F
HOLL	26	1823	1831	1847	N08	W26	4731	05	24.8	24	SF			3	C		85		F
PALE	26	1824E	1830	1840	N07	W27	4731	05	24.7	16D	SF			3	C		60		
PEKG	27	0313E	0313	0329	S01	W03		05	26.9	16D	SN				P	0313	8	.1	D

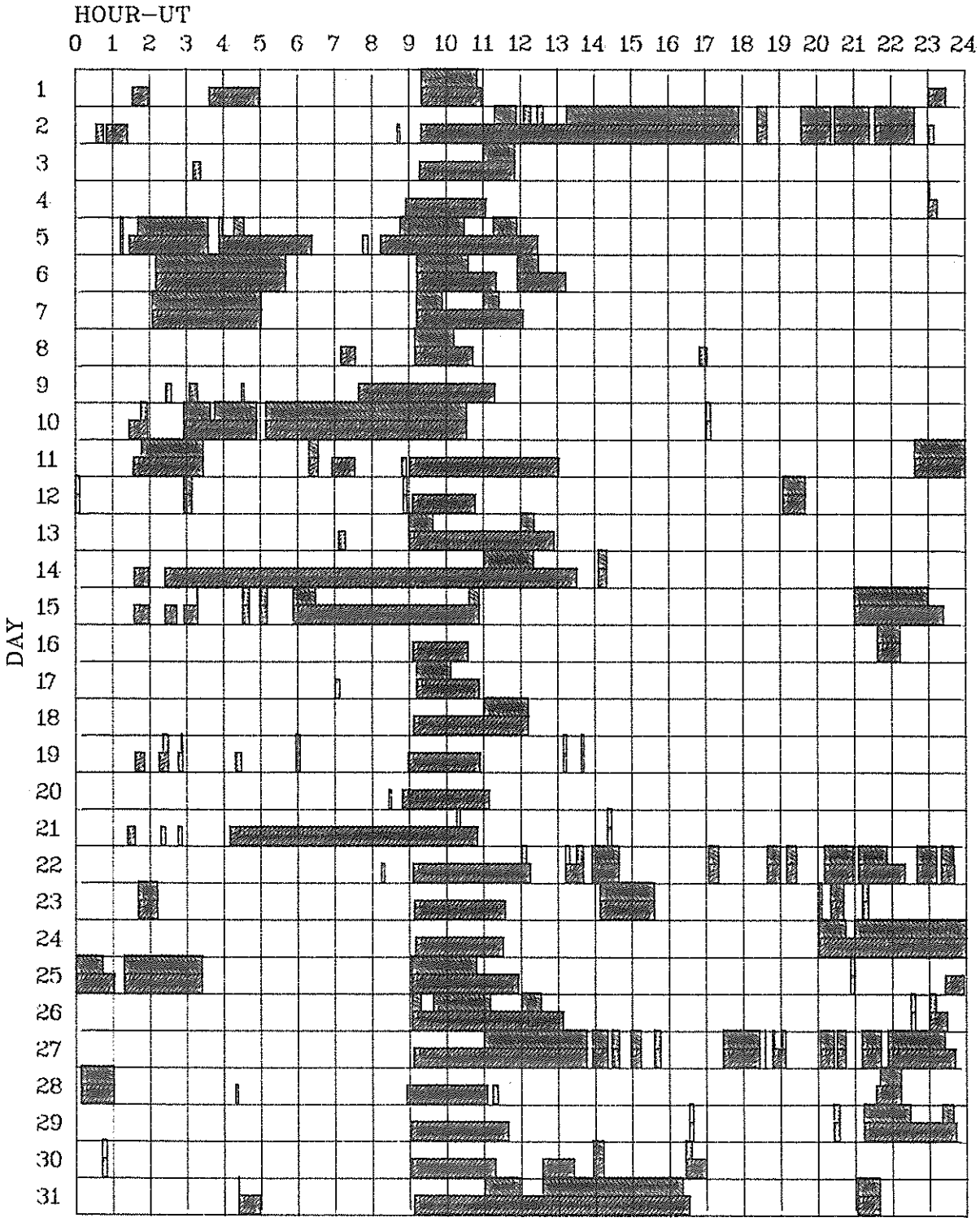
"Remarks":

A = Eruptive prominence whose base is less than 90° from central meridian.
B = Probably the end of a more important flare.
C = Invisible 10 minutes before.
D = Brilliant point.
E = Two or more brilliant points.
F = Several eruptive centers.
G = No visible spots in the neighborhood.
H = Flare accompanied by high-speed dark filament.
I = Active region very extended.
J = Distinct variations of plage intensity before or after the flare.
K = Several intensity maxima.
L = Existing filaments show signs of sudden activity.
M = White-light flare.
N = Continuous spectrum shows effects of polarization.
O = Observations have been made in the H and K lines of Ca II.
P = Flare shows helium D3 in emission.
Q = Flare shows Balmer continuum in emission.
R = Marked asymmetry in H-alpha line suggests ejection of high-velocity material.
S = Brightness follows disappearance of filament in same position.
T = Region active all day.
U = Two bright branches, parallel or converging.
V = Occurrence of an explosive phase: important, expansion within roughly 1 minute that often includes a significant intensity increase.
W = Great increase in area after time of maximum intensity.
X = Unusually wide H-alpha line.
Y = System of loop-type prominences.
Z = Major sunspot umbra covered by flare.

INTERVALS OF NO FLARE PATROL OBSERVATION

FOR PRECEDING SOLAR FLARE TABLE

MAY 1986



Times of no flare patrol, shown here as shaded areas, combine reports from the observatories listed below. Portions of a panel completely shaded mark dates and times of no patrol of any kind, that is, of neither visual nor cinematographic; portions of a panel with only the bottom half shaded mark times of strictly visual patrol.

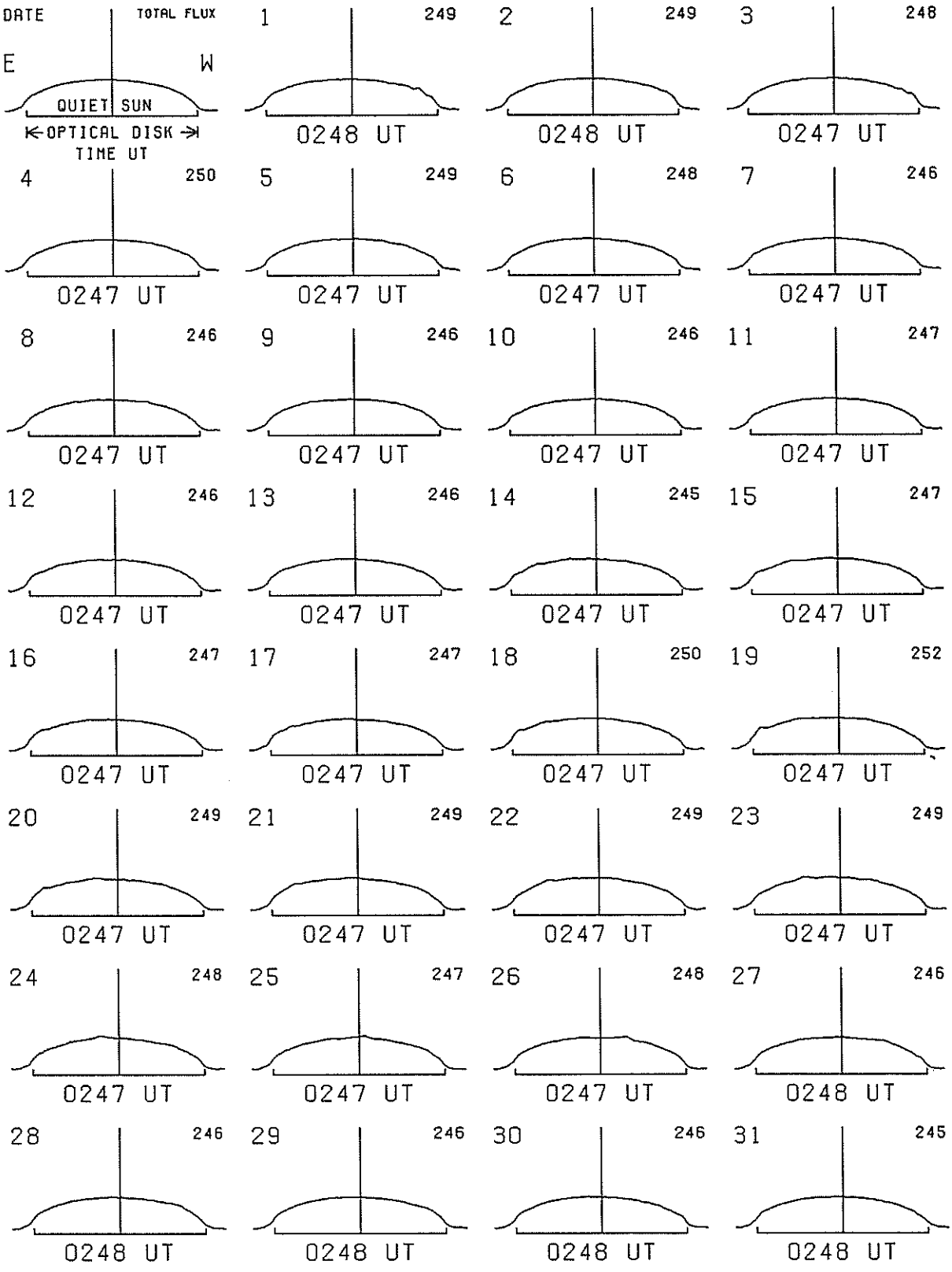
Athens	Bucharest	Istanbul	Manila	Peking
	Holloman	Learmonth	Palehua	Ramey

EAST-WEST SOLAR SCANS

MAY 1986

TOYOKAWA, JAPAN

3 CM
FAN BEAM WITH 1.1 MINUTES OF ARC

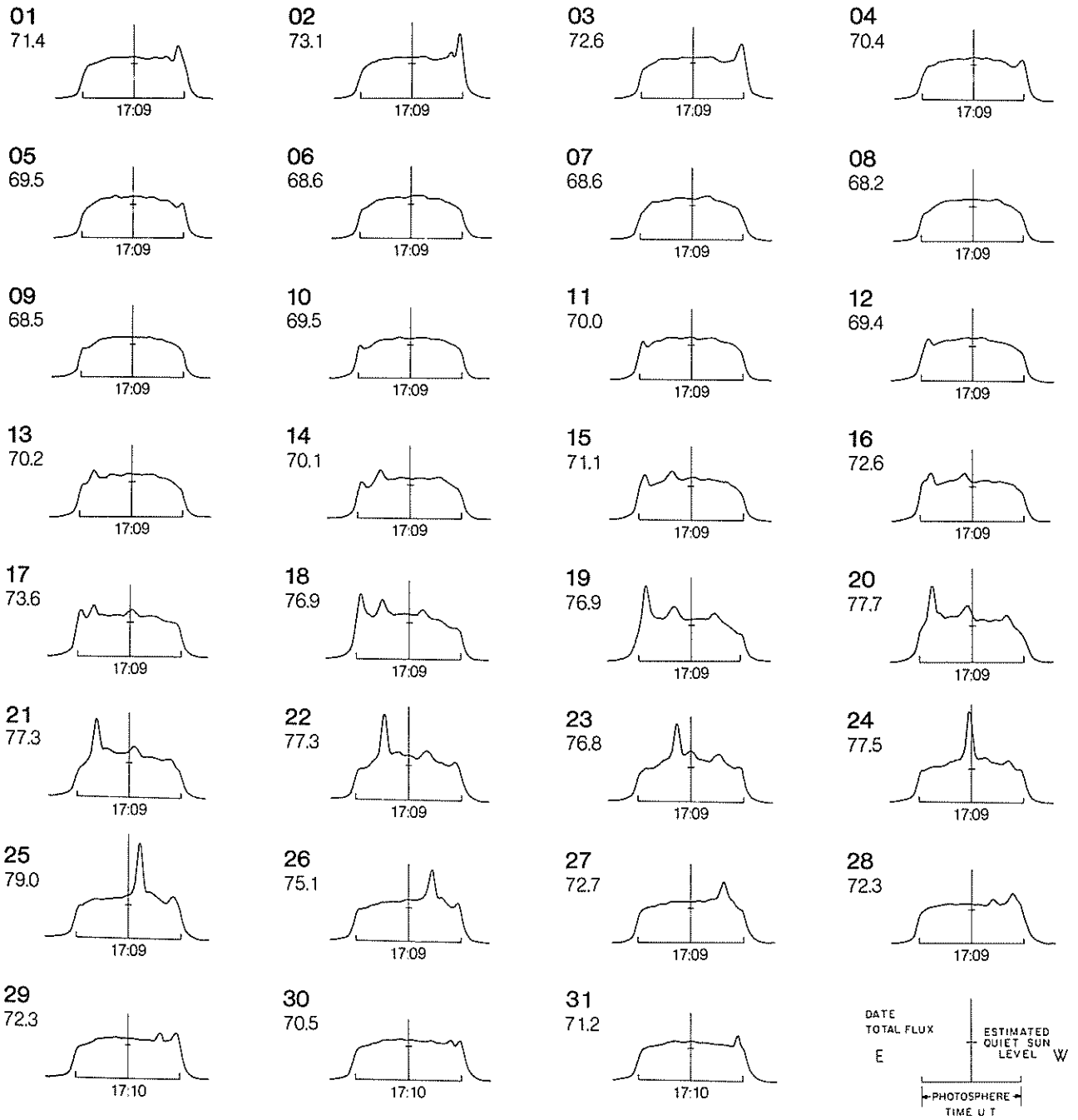


EAST-WEST SOLAR SCANS

MAY 1986

ALGONQUIN RADIO OBSERVATORY
CANADA

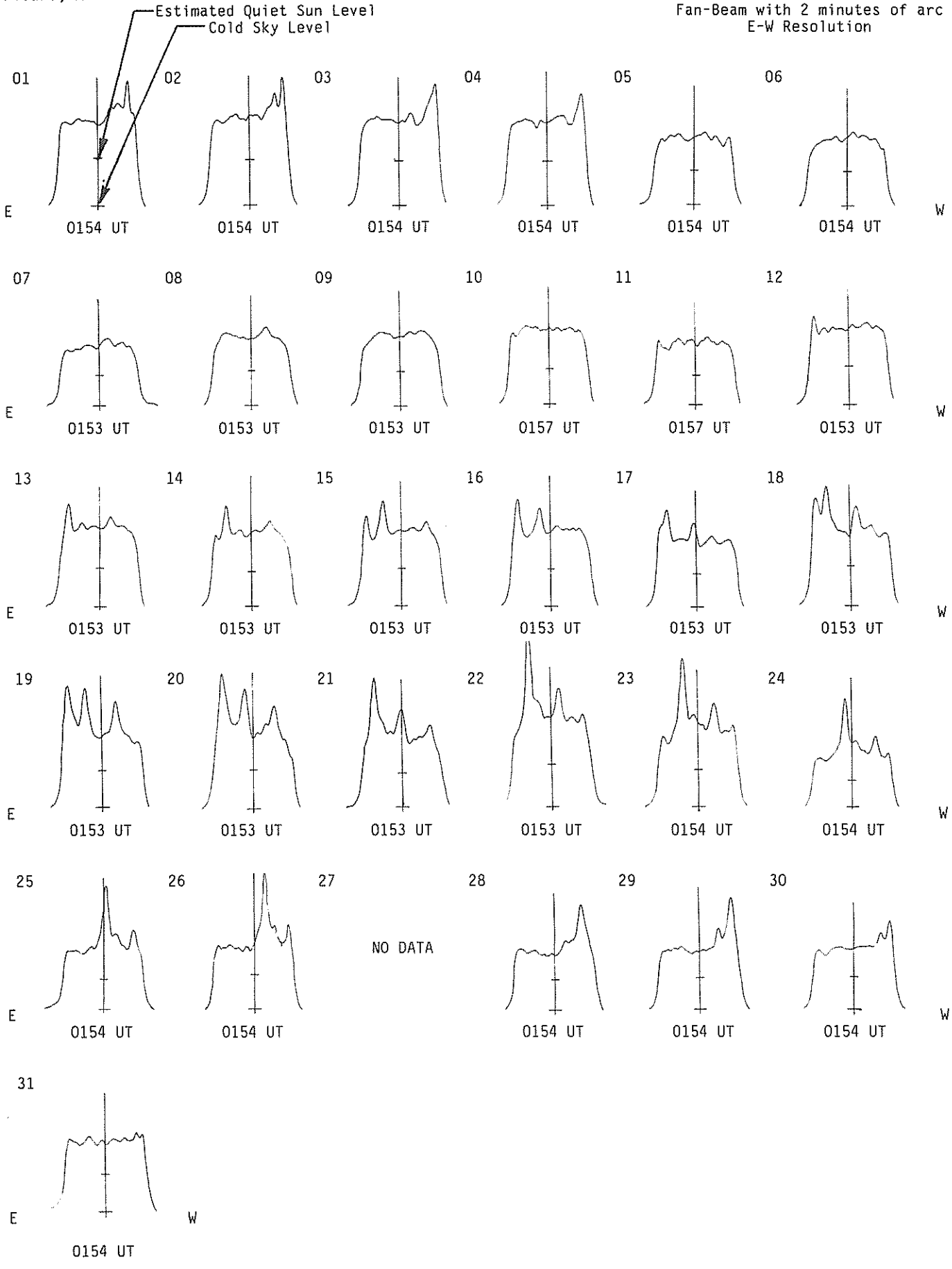
10·7 cm
Fan Beam with 1·5 minutes of arc
E-W Resolution



16
May 86

E A S T - W E S T S O L A R S C A N S

Fleurs, Australia — MAY 1986 — 21 cm
Fan-Beam with 2 minutes of arc
E-W Resolution

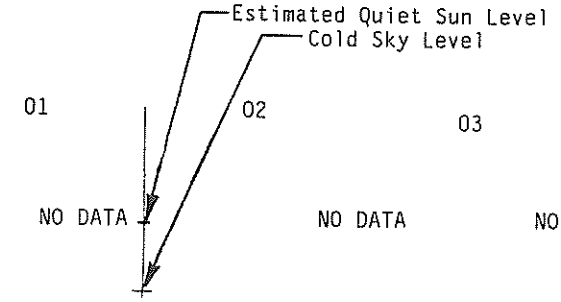


EAST-WEST SOLAR SCANS

Fleurs, Australia

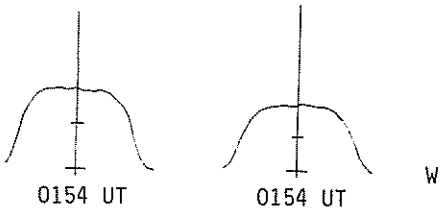
MAY 1986

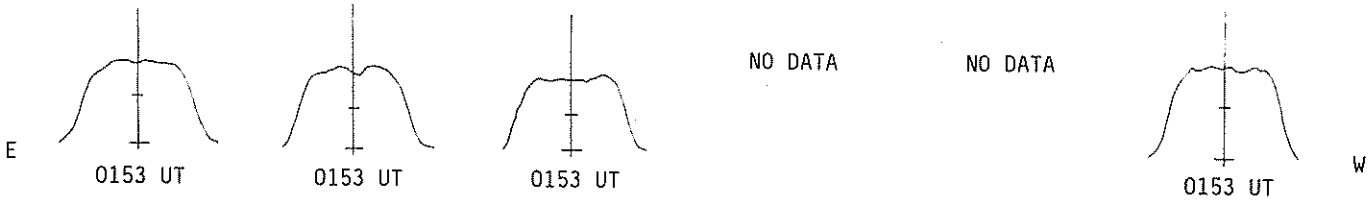
43 cm
Fan-Beam with 2 minutes of arc
E-W Resolution

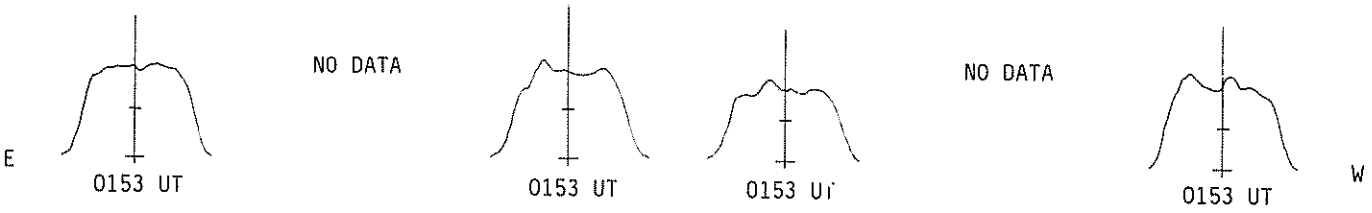


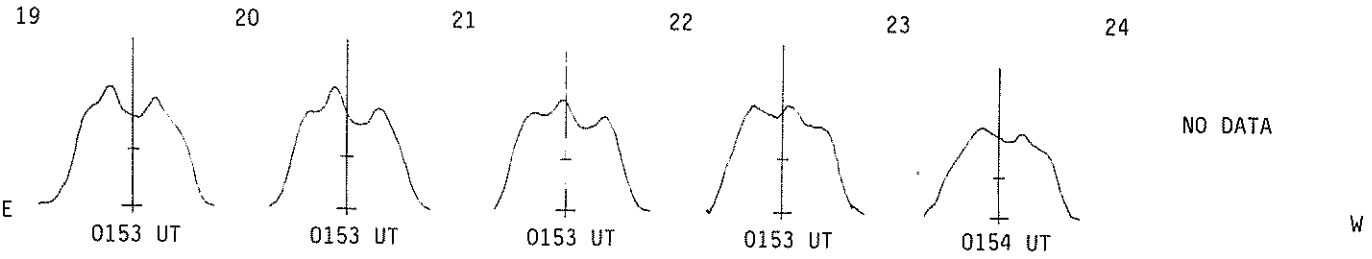
03 NO DATA

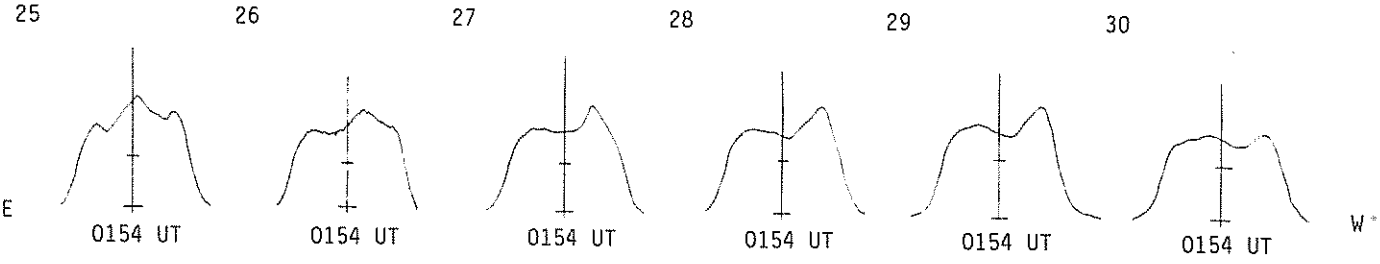
04 NO DATA

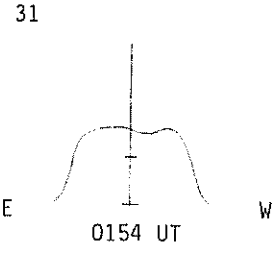












SOLAR RADIO EMISSION
SELECTED FIXED FREQUENCY EVENTS

MAY 1986

Day	Freq	Sta	Type		Start (UT)	Time of Maximum (UT)	Duration (Min)	Flux Density Peak (10^{-22} W/m^2 Hz)	Flux Density Mean (10^{-22} W/m^2 Hz)	Int	Remarks
01	245	PALE	43	NS	1619.0	1719.0	738.0D	19.0			QL=6 ST=3 TYP=1
02	245	LEAR	43	NS	0432.5	0510.1	111.5	36.0			QL=6 ST=2 TYP=1
	2800	OTTA	20	GRF	1540.0	1600.0	70.0	1.0	.6		
03	2800	OTTA	20	GRF	1100.0	1110.0	130.0D	3.8			
	2800	OTTA	20	GRF	2015.0	2020.0	30.0	1.6	.6		
04	2800	OTTA	1	S	1630.0	1632.0	8.0	2.0	.7		
17	8800	ATHN	4	S/F	0720.0	0724.0	10.0	42.0			QL=6 ST=2 TYP=3
20	2800	OTTA	32	ABS	2100.0	2112.0	30.0	-1.0	-0.5		
21	245	LEAR	4	S/F	0143.0	0143.1	2.1	13.0			QL=2 ST=2 TYP=3
23	2800	OTTA	20	GRF	1430.0	1434.0	15.0	0.8	.3		
24	2800	OTTA	20	GRF	2000.0	2030.0	60.0	1.2	.6		
25	245	LEAR	8	S	0800.8	0801.0	.3	24.0			QL=6 ST=2 TYP=3
	410	LEAR	8	S	0800.8	0801.0	.3	13.0			QL=6 ST=2 TYP=3
	2800	OTTA	20	GRF	1510.0	1514.0	45.0	2.0	1.0		
	2800	OTTA	21	GRF	2156.0	2220.0	50.0	1.6	.8		
	2800	OTTA	2	S/F	2157.9	2158.5	2.0	6.0	3.0		
26	2800	OTTA	1	S	1124.0	1125.0	3.0	2.2	.8		
	2800	OTTA	20	GRF	1820.0	1825.0	30.0	1.2	.6		
	245	SGMR	47	GB	1948.0	1951.3	10.6	490.0			QL=1 ST=3 TYP=5
28	2800	OTTA	20	GRF	1805.0	1810.0	30.0	0.6	.3		

Reports are received routinely from the following observatories:

ATHN = Athens
BERN = Berne
BORD = Bordeaux
CRIM = Crimea
DWIN = Dwingeloo
GORK = Gorky
HIRA = Hiraiso
HUAN = Huancayo
IRKU = Irkutsk
IZMI = IZMIRAN
KISV = Kislovodsk
KRAK = Krakow
LEAR = Learmonth
MANI = Manila
NAGO = Nagoya
NOBE = Nobeyama
ONDR = Ondrejov
OTTA = Ottawa
PALE = Palehua
PEKG = Peking
PENT = Penticton
POTS = Potsdam
SAOP = Sao Paulo
SGMR = Sagamore Hill
TORN = Torun
TYKW = Toyokawa
TRST = Trieste
UPIC = Upice

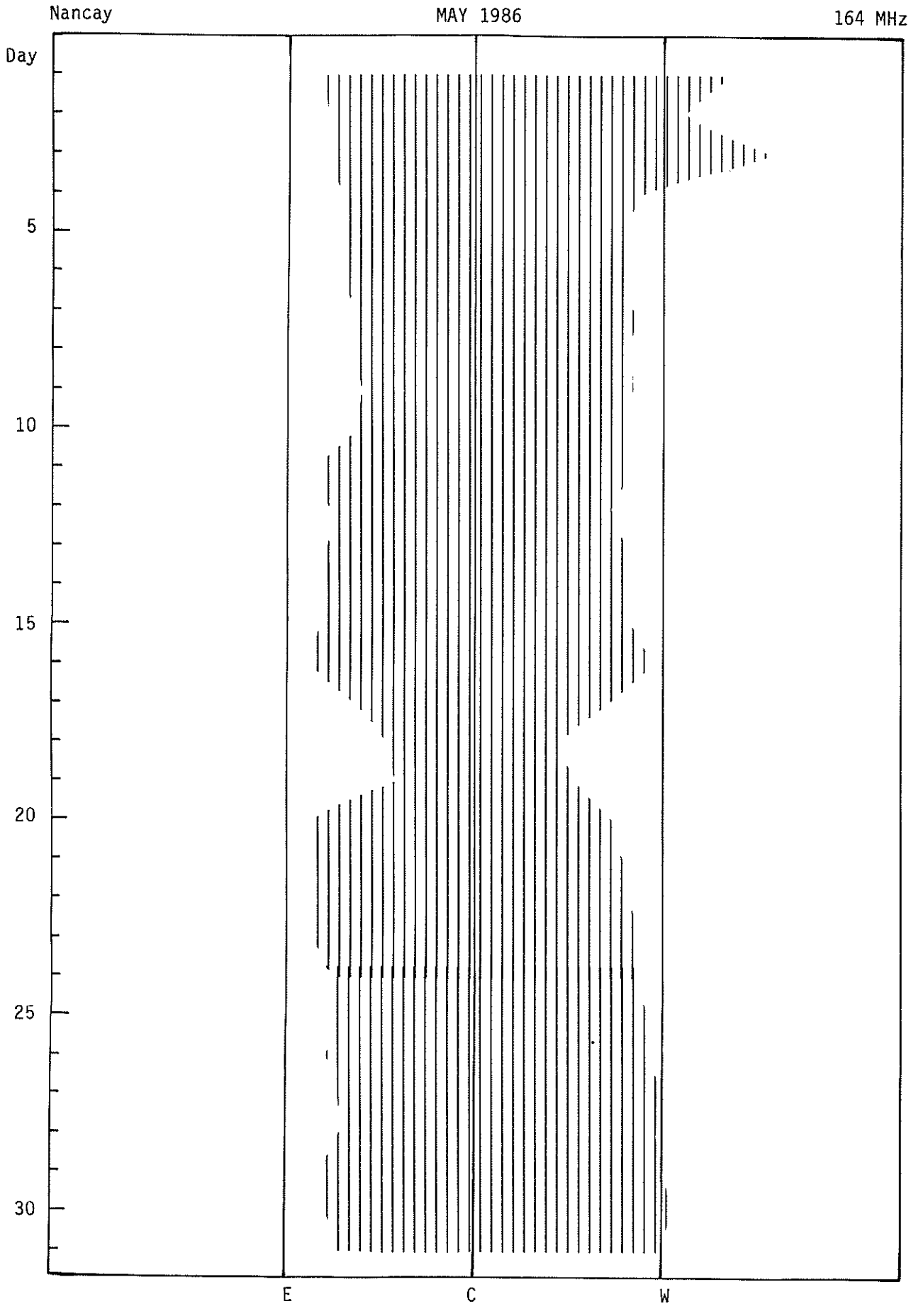
Explanation of Type Code:

1 Simple 1
2 Simple 1F
3 Simple 2
4 Simple 2F
5 Simple
6 Minor
7 Minor +
8 Spike
20 Simple 3
21 Simple 3A
22 Simple 3F
23 Simple 3AF
24 Rise
25 Rise A
26 Fall
27 Rise and Fall
28 Precursor
29 Post Burst Increase
30 Post Burst Increase A
31 Post Burst Decrease
33 Absorption
40 Fluctuation
41 Group of Bursts
42 Series of Bursts
43 Onset of Noise Storm
44 Noise Storm in Progress
45 Complex
46 Complex F
47 Great Burst
48 Major

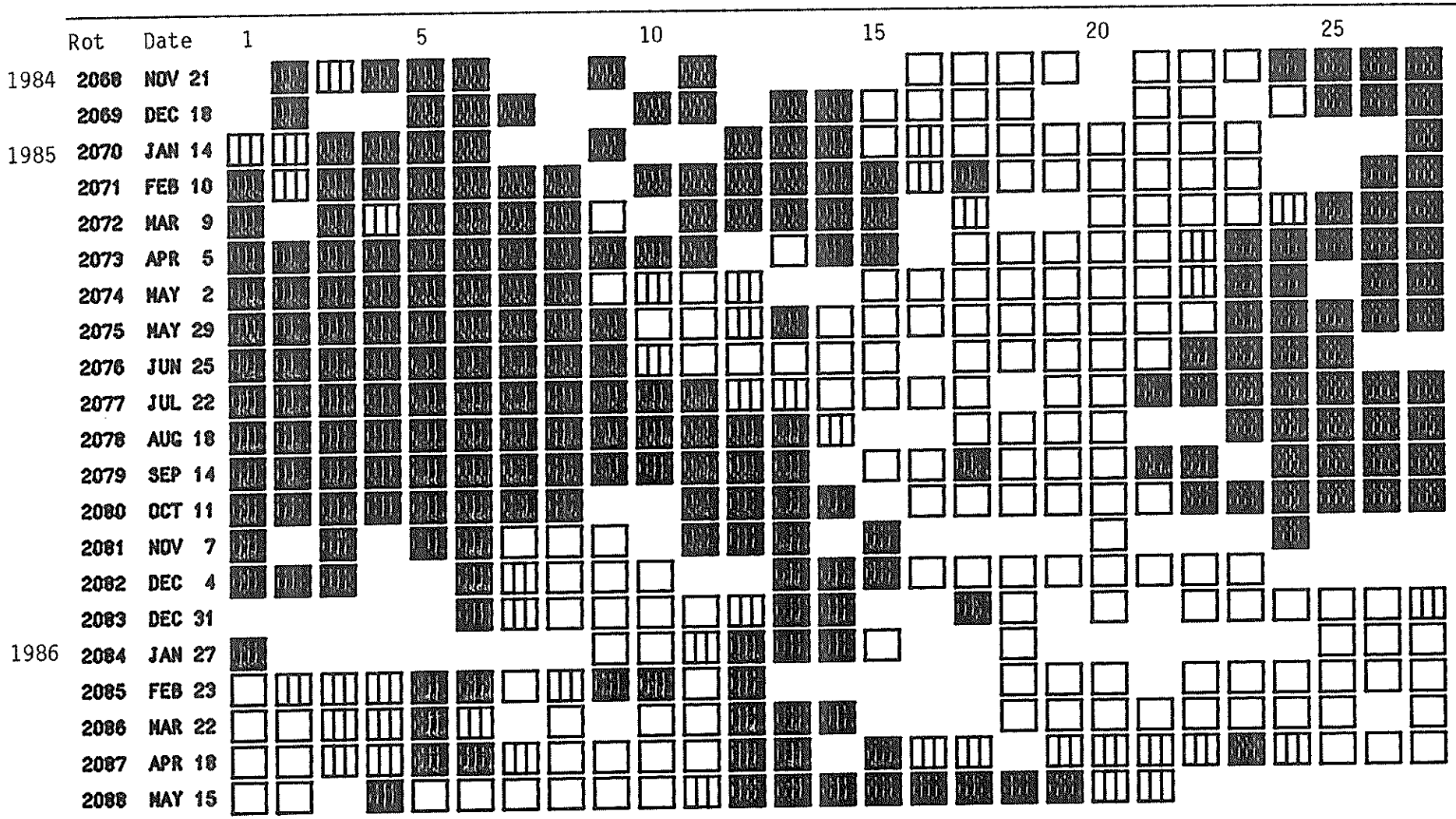
1A Simple 1A
3A Simple 2A
21A Simple 3A GRF
2A Simple 1AF
4A Simple 2AF
240 Rise only
240F Rise only F
24P Post Rise
24PF Post Rise F
16A Fall A
260 Fall Only
26F Fall F
27F Rise and Fall F
27AF Rise and Fall AF
31A Post Burst Decrease A
32A Absorption A

Remarks:
QL = Quality (1=poor to 6=excellent)
ST = Status (1=real time; 2=final; 3=correction; 4=deletion)
TYP= Type (1=noise storm;2=rise in base level;3=minor;4=group;5=major;6=major plus;7=Castelli U-type burst)

SOLAR INTERFEROMETRIC OBSERVATIONS



STANFORD MEAN SOLAR MAGNETIC FIELD



Mean Solar Magnetic Field Polarity: ☐ = field > 2 microT; ▥ = -2 microT ≤ field ≤ 2 microT

■ = field <-2 microT; No box = no data available

Observations are taken at 2000 UT. Rotation numbers given are the Bartels series, but the dates are not; these dates mark times of occurrence of phenomena on the Sun that affect the Earth during the given Bartels Rotation.

STANFORD MEAN SOLAR MAGNETIC FIELD (MICROTESLA)

Day	Jun 85	Jul	Aug	Sep	Oct	Nov	Dec	Jan 86	Feb	Mar	Apr	May
1	-10	-16	-5	.	13	-7	.	.	.	3	10	.
2	-7	-14	1	.	15	-10	.	.	.	0	-3	-7
3	-11	-5	2	7	6	-8	.	.	.	-7	-14	0
4	-12	2	8	3	-6	-15	-16	.	15	-7	-16	2
5	-11	5	11	5	-13	-16	-20	-3	15	3	.	.
6	-3	17	6	3	.	-25	-25	1	2	-11	.	2
7	4	31	10	.	-20	-26	.	14	-8	.	.	2
8	6	24	.	.	-23	.	.	3	-27	.	6	0
9	-1	22	8	-26	-26	-17	-14	11	-14	.	5	1
10	-4	.	8	-24	-27	.	1	12	4	.	5	-5
11	3	12	-9	-24	-21	-6	13	0	.	.	3	2
12	12	7	-16	-22	-23	-5	8	-19	.	5	5	8
13	22	5	-24	-25	-16	5	3	-14	9	11	3	13
14	21	8	-28	-24	-26	11	.	.	.	8	8	13
15	19	6	-22	-21	-20	6	.	.	.	.	7	8
16	17	-10	-23	-21	-27	.	-18	-12	.	14	.	10
17	13	-27	-22	-25	-21	-3	-20	21	.	11	8	.
18	15	-27	-20	-29	-25	-2	-21	.	.	12	5	-2
19	7	-24	-20	-28	.	-11	3	24	.	12	6	3
20	-10	.	-17	-22	.	.	11	.	9	12	2	9
21	-21	.	-19	-21	-17	-5	15	16	18	10	-1	7
22	-16	-19	-22	-23	-17	.	22	11	10	8	-5	6
23	-13	-19	-18	-16	-12	.	28	12	9	5	-4	9
24	-13	-10	-22	-10	-8	.	15	15	1	2	1	10
25	-16	-14	-28	-6	.	.	21	10	1	-1	7	0
26	-12	-19	-25	-5	4	15	8	2	0	-3	13	-22
27	-12	-27	-15	.	19	.	.	-3	-4	0	13	-31
28	-9	-26	-9	11	17	.	.	.	-4	.	10	-25
29	-13	-27	-4	12	14	.	.	.		14	-3	-14
30	-9	-25	-2	-6	16	-8	.	.		.	-14	-8
31		-22	1		5		.	.		15		-4

Dot symbol indicates no data available for the day.

C O N T E N T S

Prompt Reports DATA FOR APRIL 1986 Number 502 Part I

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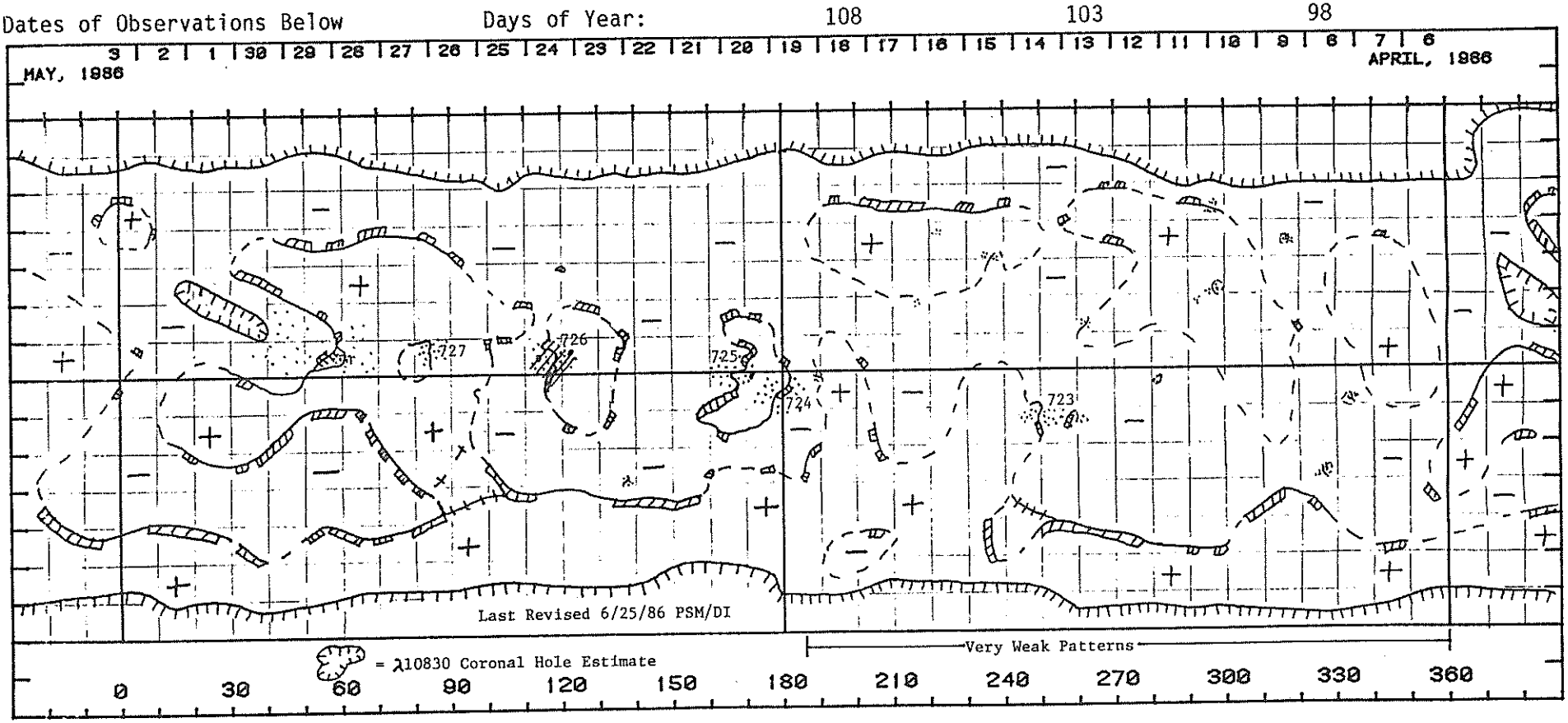
P R E L I M I N A R Y H - ALPHA S O L A R S Y N O P T I C C H A R T

CARRINGTON ROTATION NUMBER 1774

(April 6 to May 3, 1986)

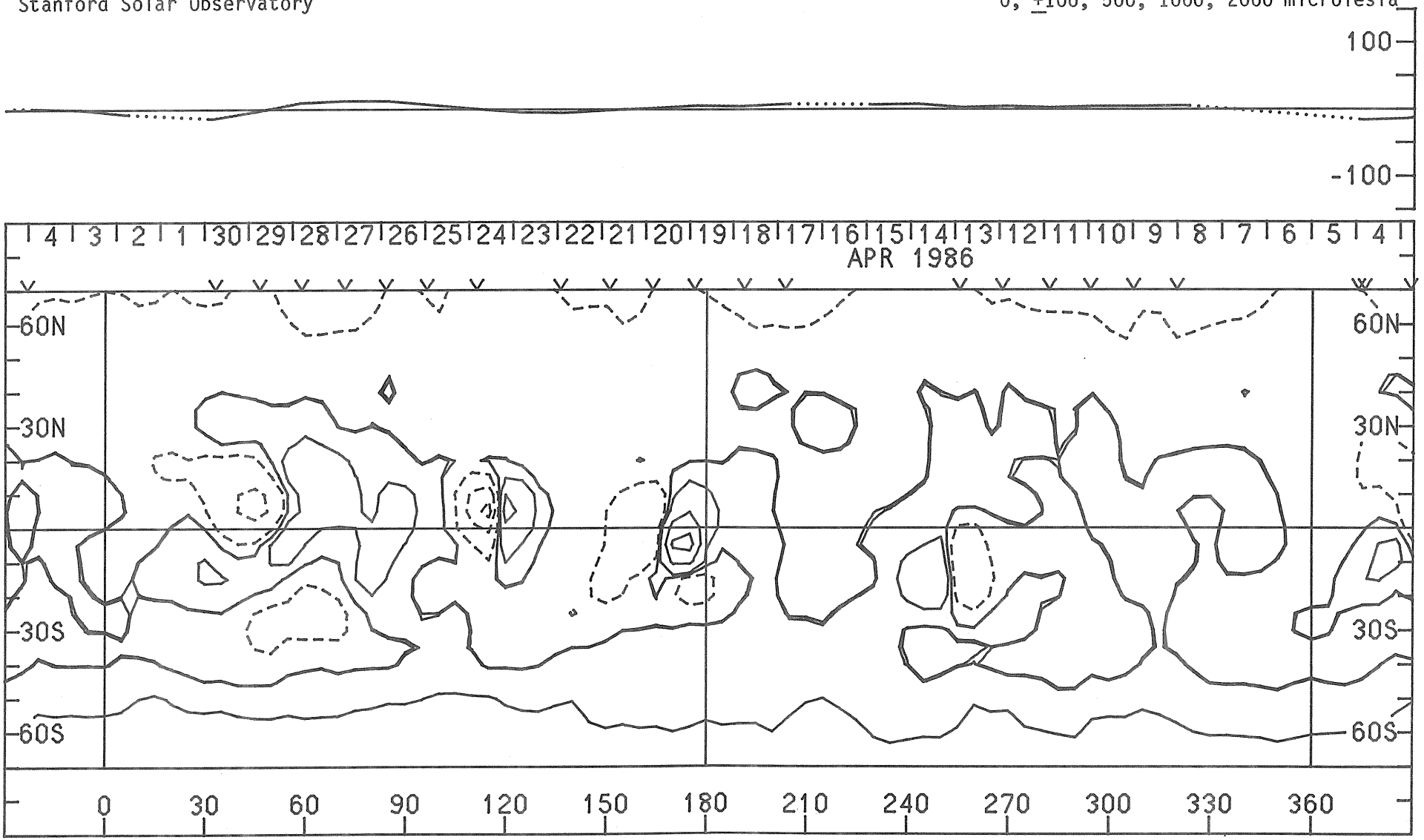


SOLAR MAGNETIC FIELD SYNOPTIC CHART

CARRINGTON ROTATION NUMBER 1774
(April 6 to May 3, 1986)

Stanford Solar Observatory

0, ±100, 500, 1000, 2000 microTesla



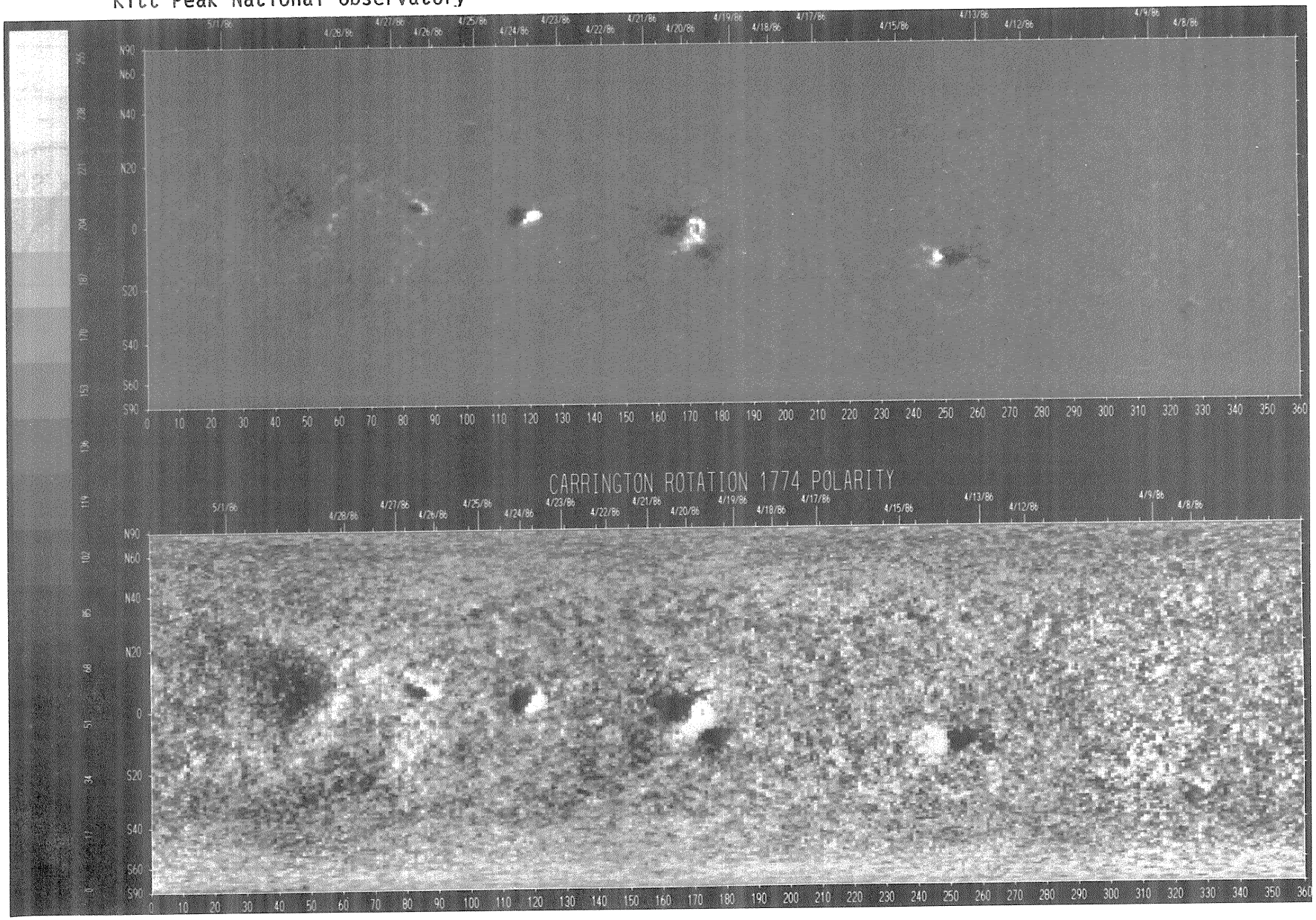
25 Apr 86

SOLAR MAGNETIC FIELD SYNOPTIC CHART

CARRINGTON ROTATION NUMBER 1774
(April 6 to May 3, 1986)

Kitt Peak National Observatory

Dates of Observations

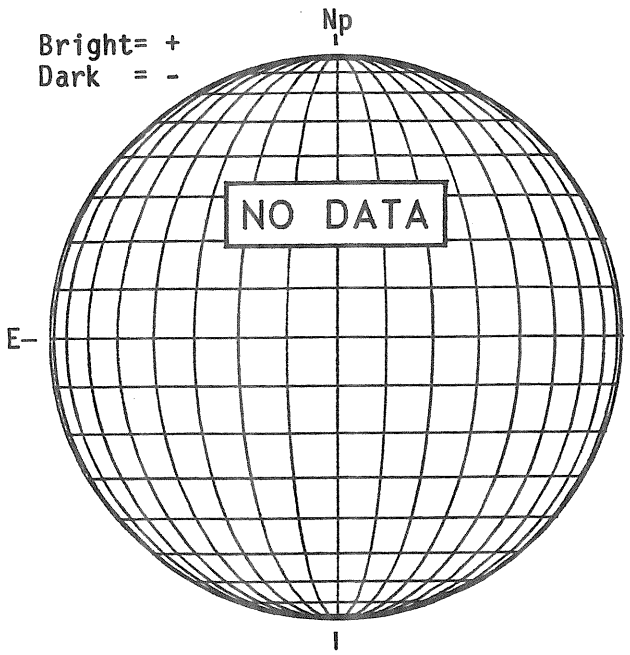


26 Apr 86

A P R I L 01, 1 9 8 6 (P=-26.10, B_0=-6.47, L_0= 68.04)

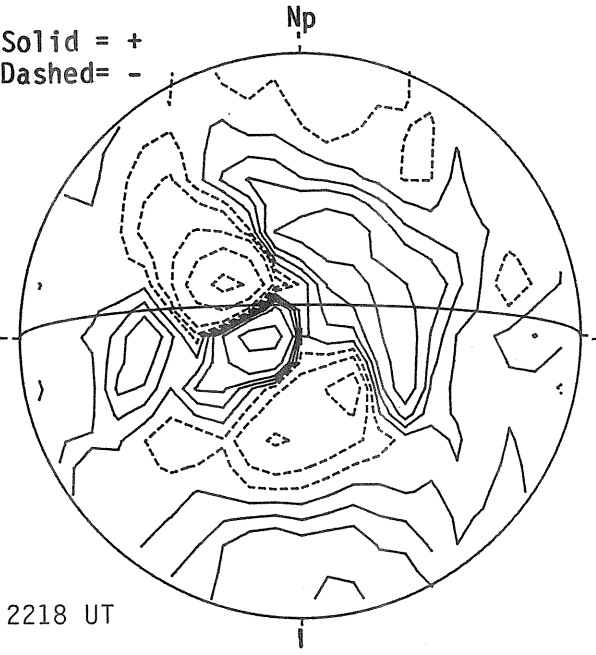
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



STANFORD MAGNETOGRAM

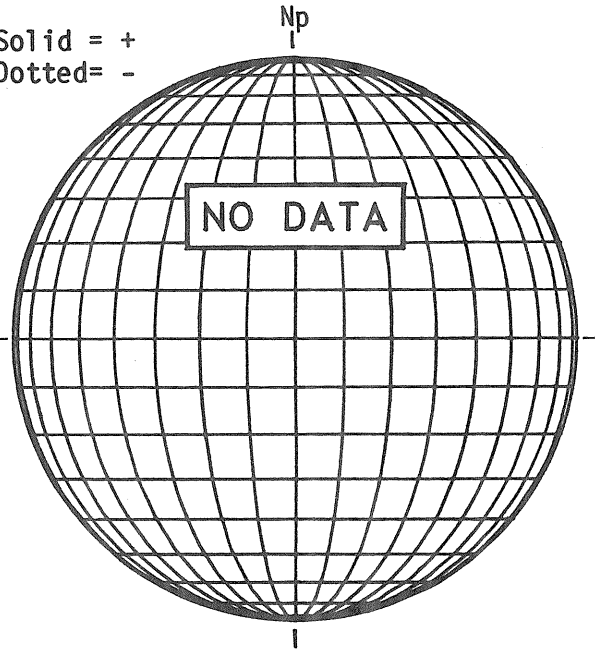
Solid = +
Dashed= -



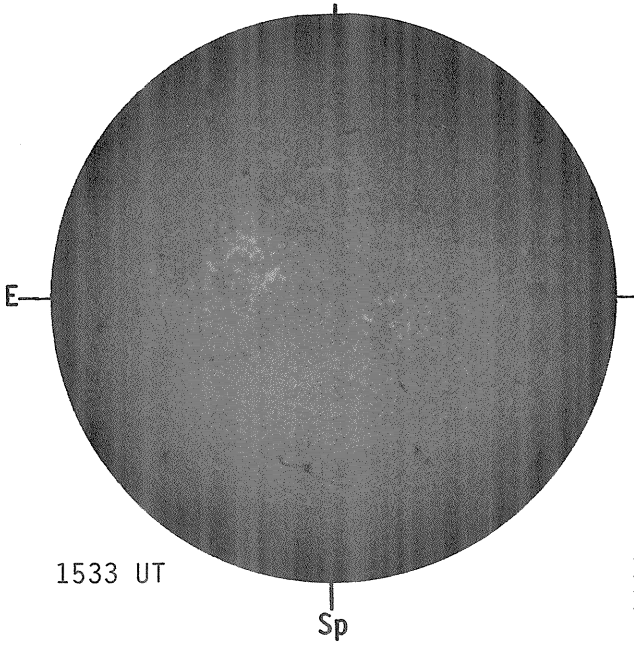
2218 UT

MT. WILSON MAGNETOGRAM

Solid = +
Dotted= -

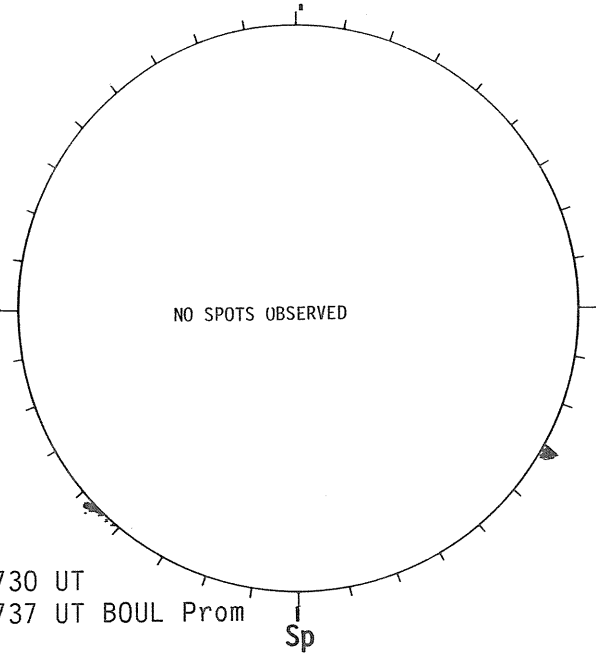


SACRAMENTO PEAK H-ALPHA



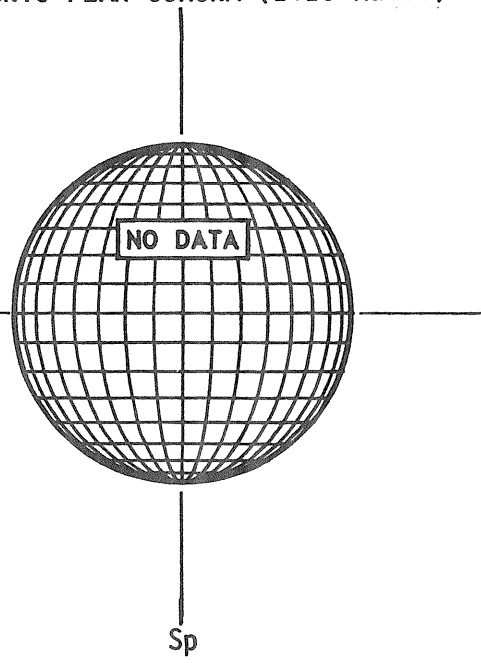
1533 UT

BOULDER SUNSPOTS



1730 UT
1737 UT BOUL Prom

SACRAMENTO PEAK CORONA (1.15 Radii)



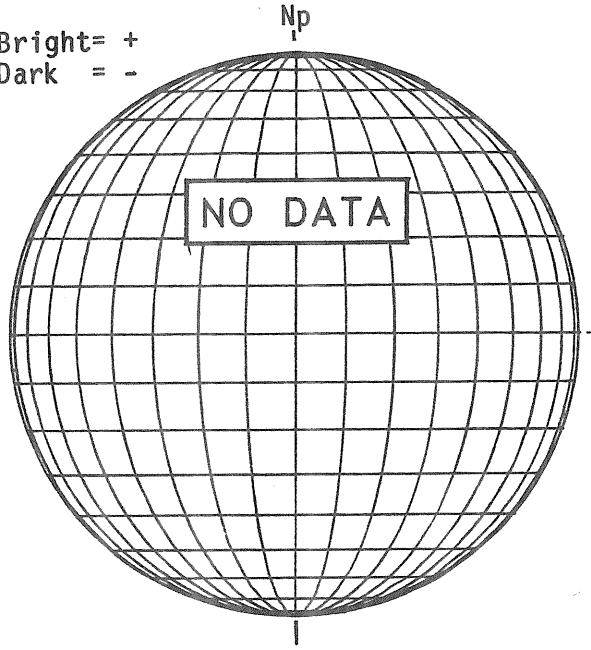
27 Apr 86

A P R I L 02, 1 9 8 6 (P=-26.14, B_o=-6.42, L_o= 54.85)

28 Apr 86

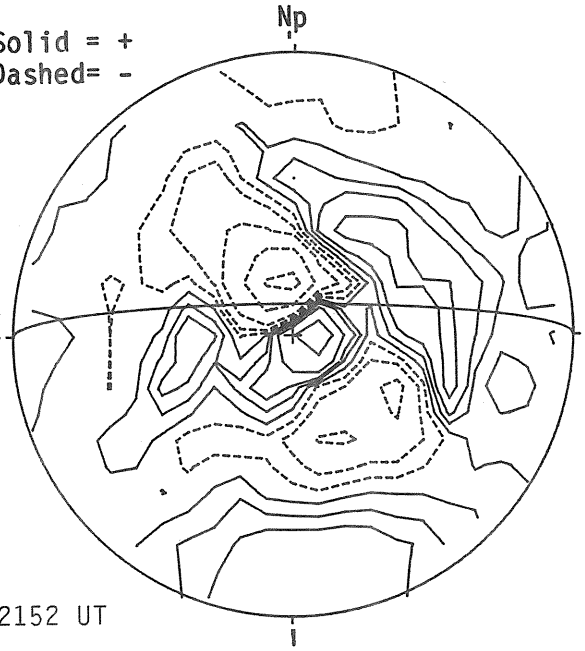
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



STANFORD MAGNETOGRAM

Solid = +
Dashed= -

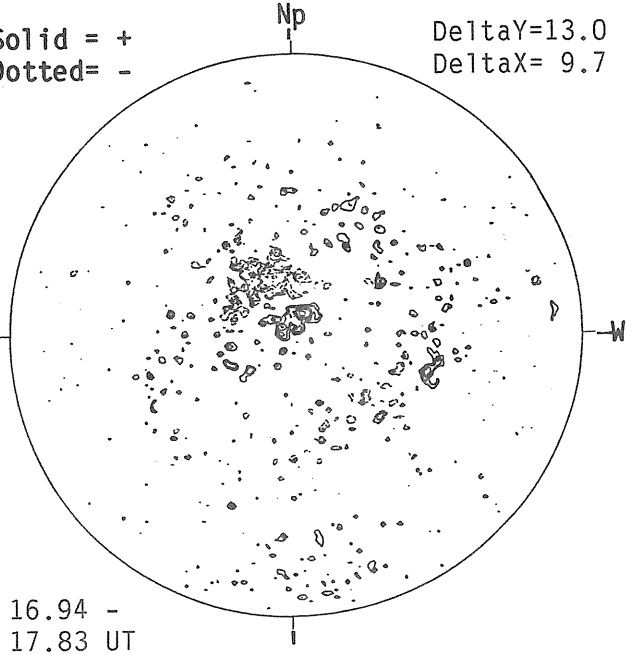


2152 UT

MT. WILSON MAGNETOGRAM

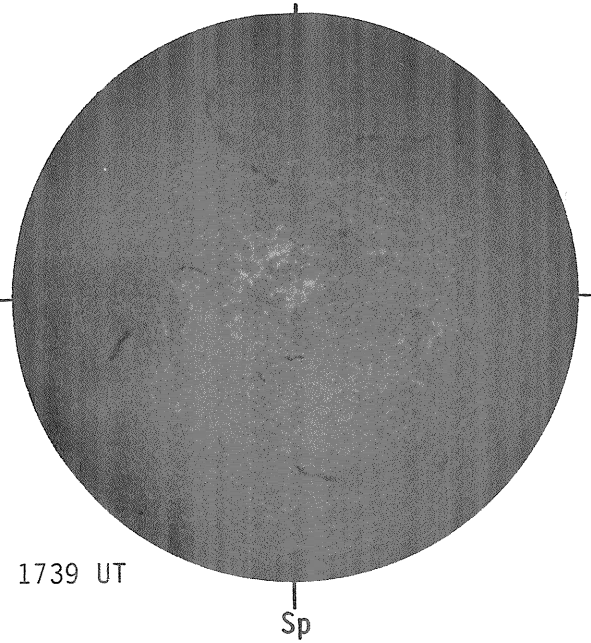
Solid = +
Dotted= -

DeltaY=13.0
DeltaX= 9.7



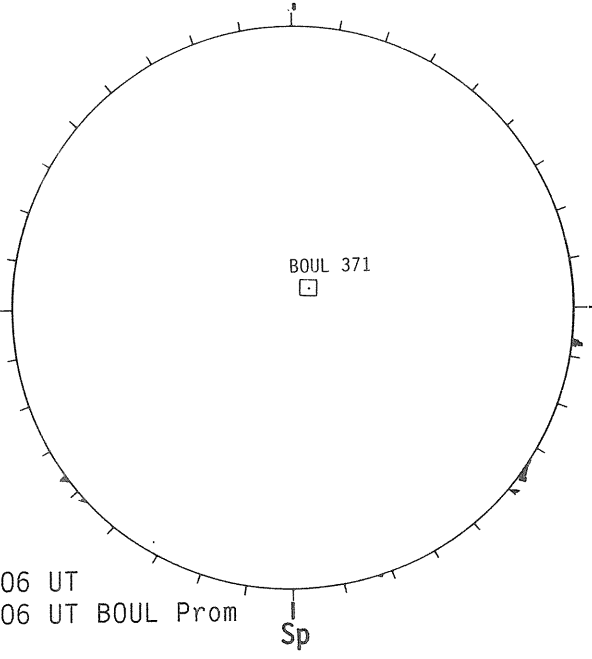
16.94 -
17.83 UT

SACRAMENTO PEAK H-ALPHA



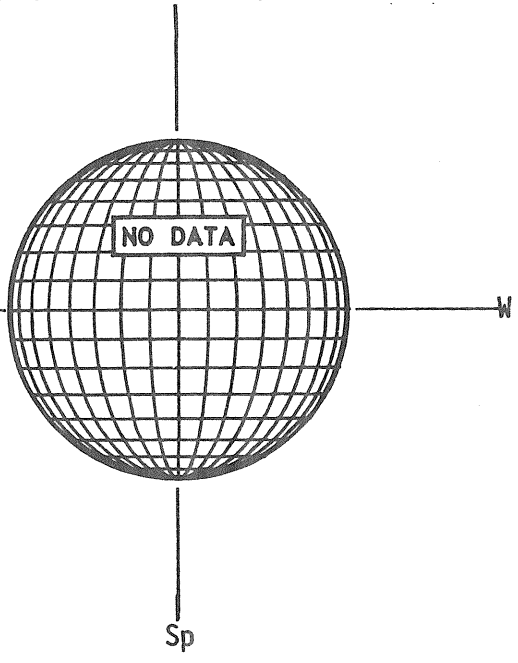
1739 UT

BOULDER SUNSPOTS



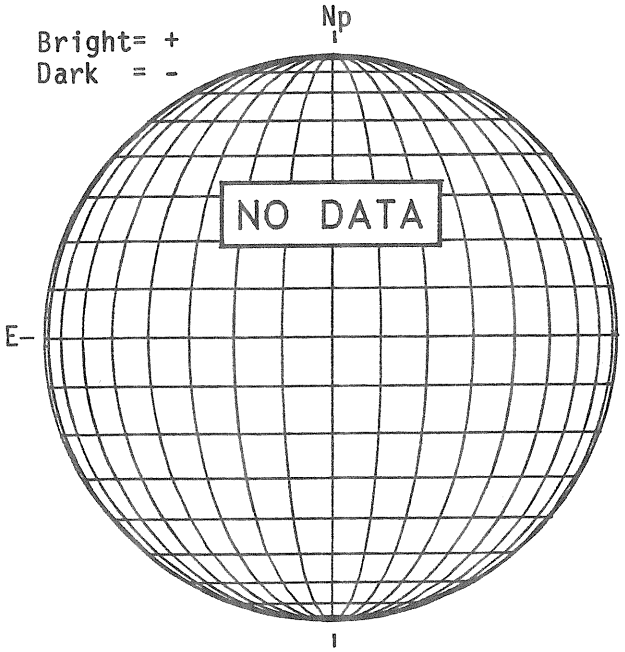
1706 UT
1806 UT BOUL Prom

SACRAMENTO PEAK CORONA (1.15 Radii)

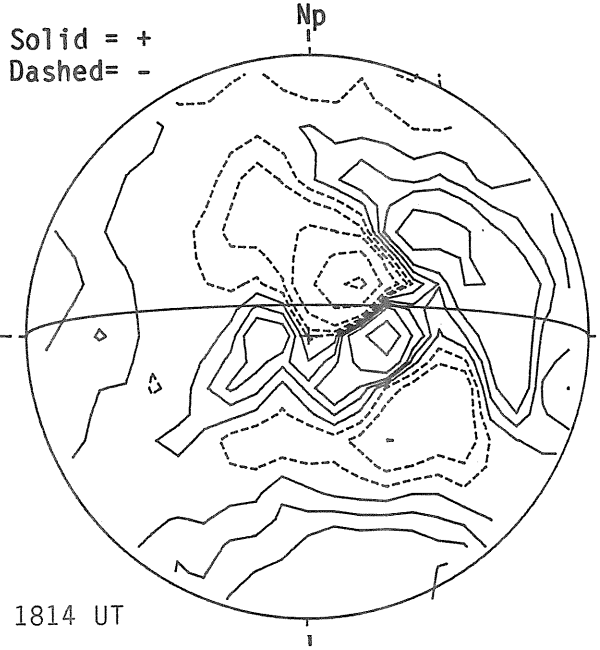


A P R I L 03, 1 9 8 6 (P=-26.17, B_o=-6.36, L_o= 41.66)

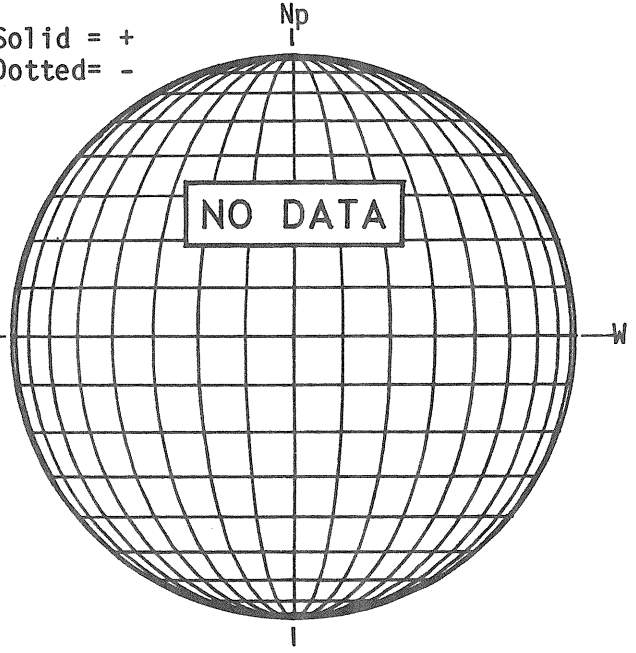
KITT PEAK MAGNETOGRAM



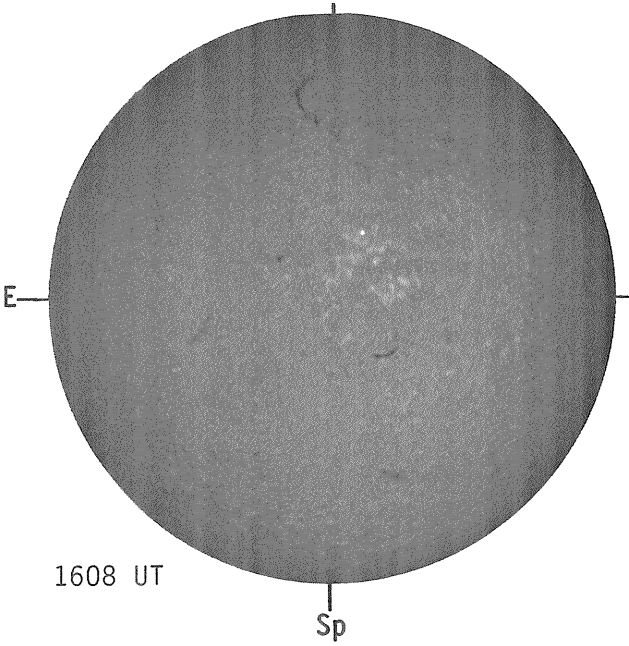
STANFORD MAGNETOGRAM



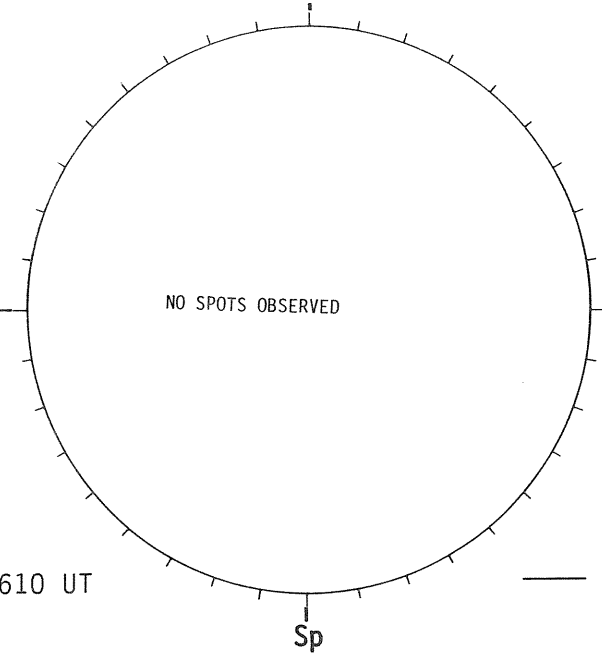
MT. WILSON MAGNETOGRAM



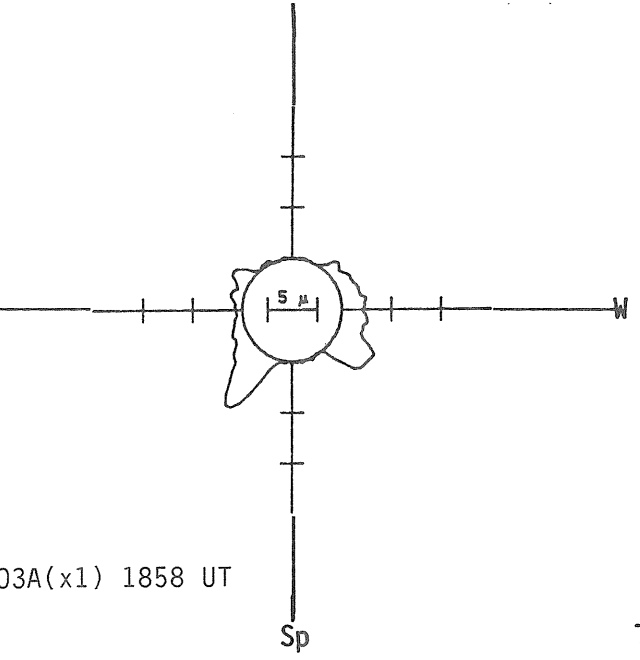
SACRAMENTO PEAK H-ALPHA



RAMEY SUNSPOTS



SACRAMENTO PEAK CORONA (1.15 Radii)



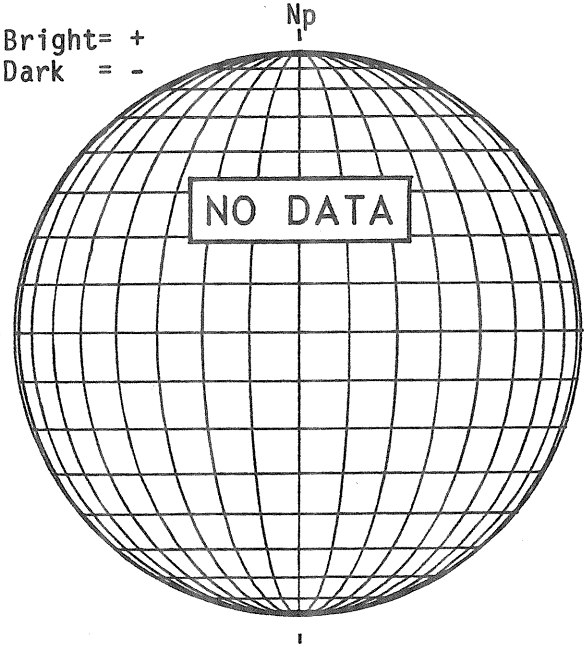
29 Apr 86

A P R I L 04, 1 9 8 6 (P=-26.20, B_0=-6.30, L_0= 28.46)

30 Apr 86

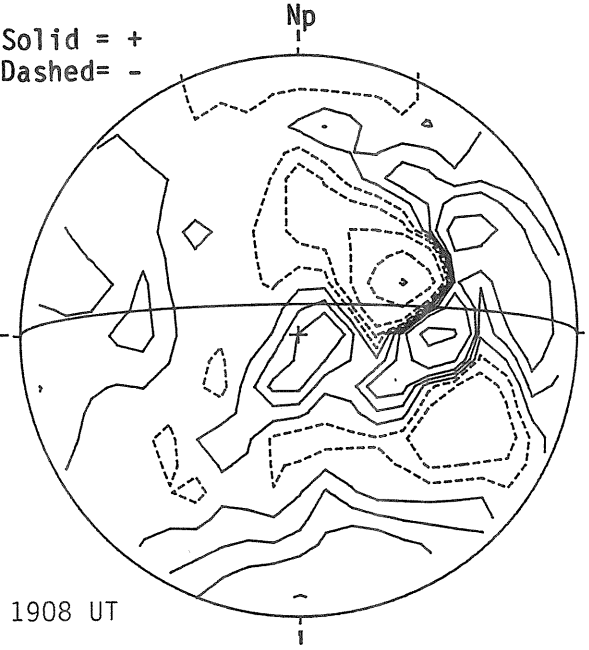
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



STANFORD MAGNETOGRAM

Solid = +
Dashed= -

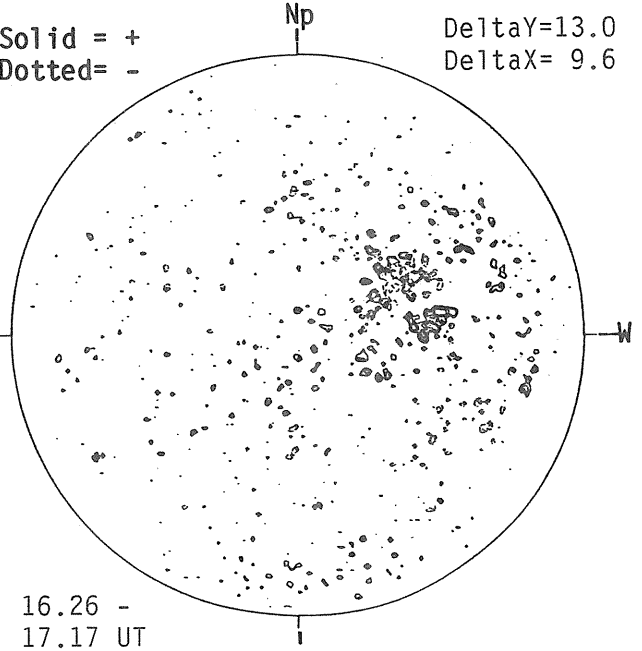


1908 UT

MT. WILSON MAGNETOGRAM

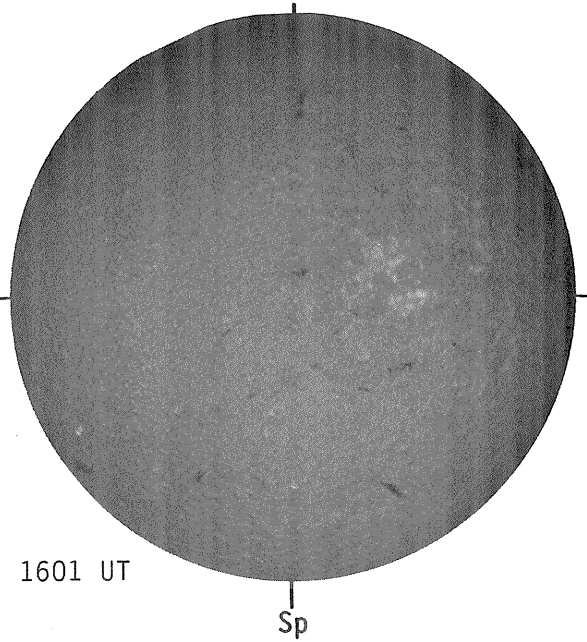
Solid = +
Dotted= -

DeltaY=13.0
DeltaX= 9.6



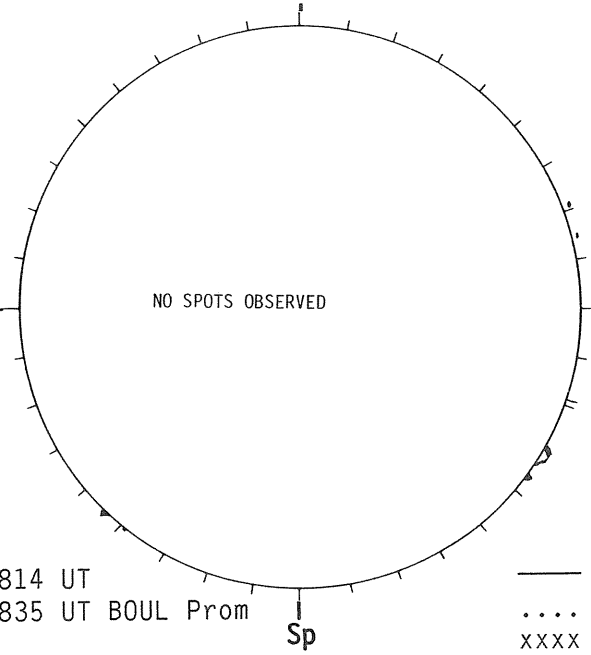
16.26 -
17.17 UT

SACRAMENTO PEAK H-ALPHA



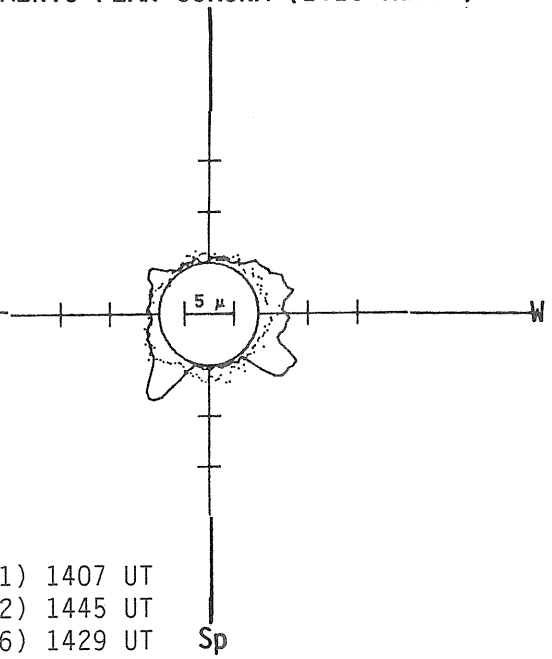
1601 UT

BOULDER SUNSPOTS



1814 UT
1835 UT BOUL Prom

SACRAMENTO PEAK CORONA (1.15 Radii)

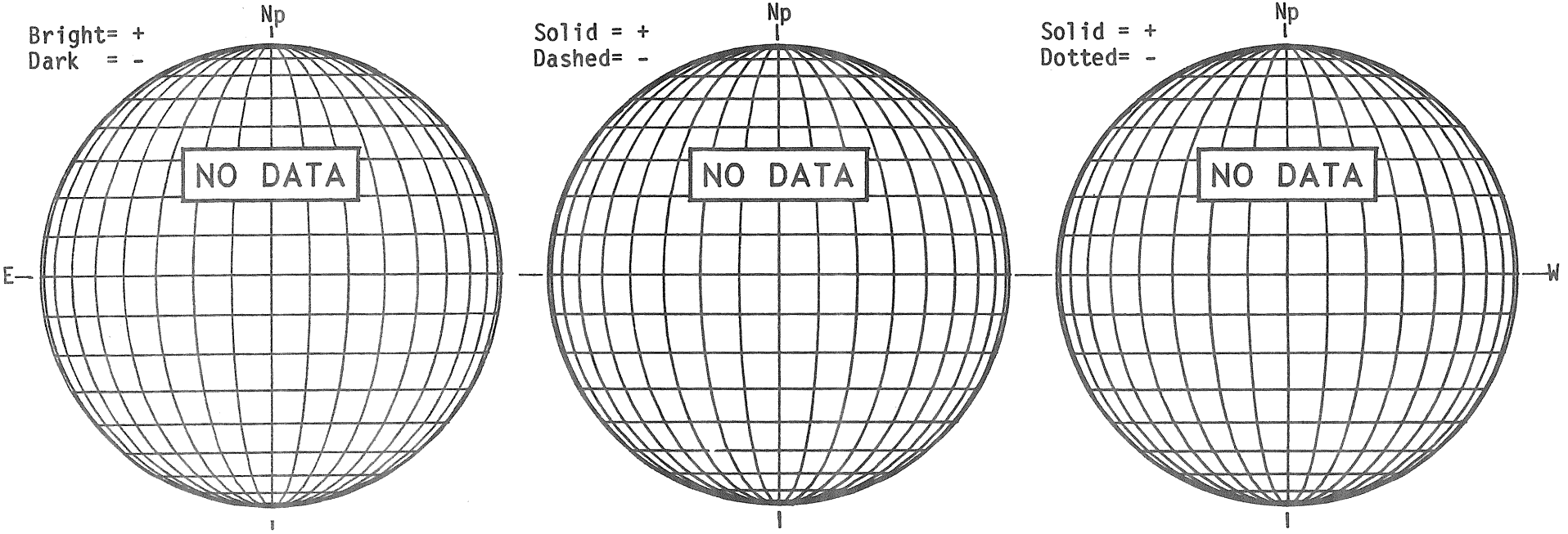


—— 5303A(x1) 1407 UT
.... 6374A(x2) 1445 UT
xxxx 5694A(x6) 1429 UT
NO 5694A ACTIVITY TODAY

A P R I L 05, 1 9 8 6 (P=-26.21, B_o=-6.25, L_o= 15.27)

KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



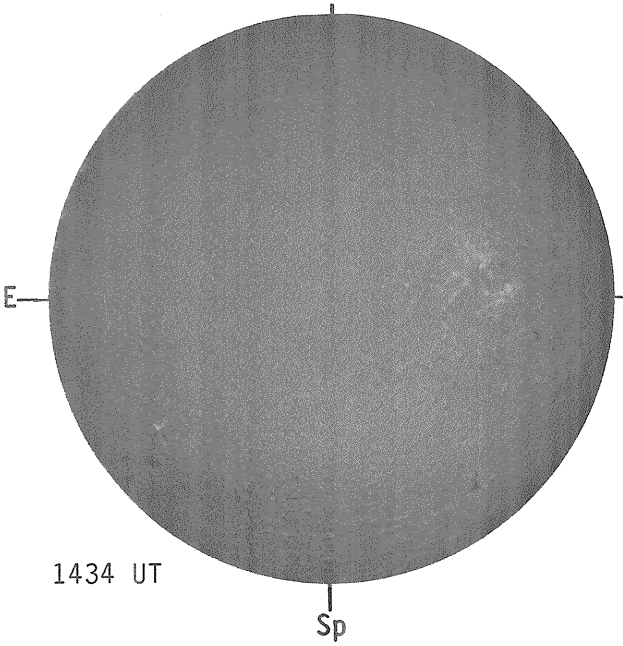
STANFORD MAGNETOGRAM

Solid = +
Dashed= -

MT. WILSON MAGNETOGRAM

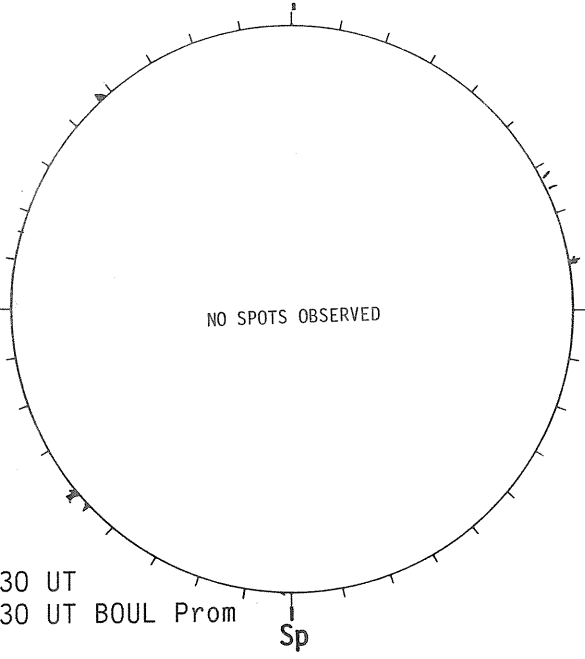
Solid = +
Dotted= -

SACRAMENTO PEAK H-ALPHA



1434 UT

BOULDER SUNSPOTS



1530 UT
1630 UT BOUL Prom

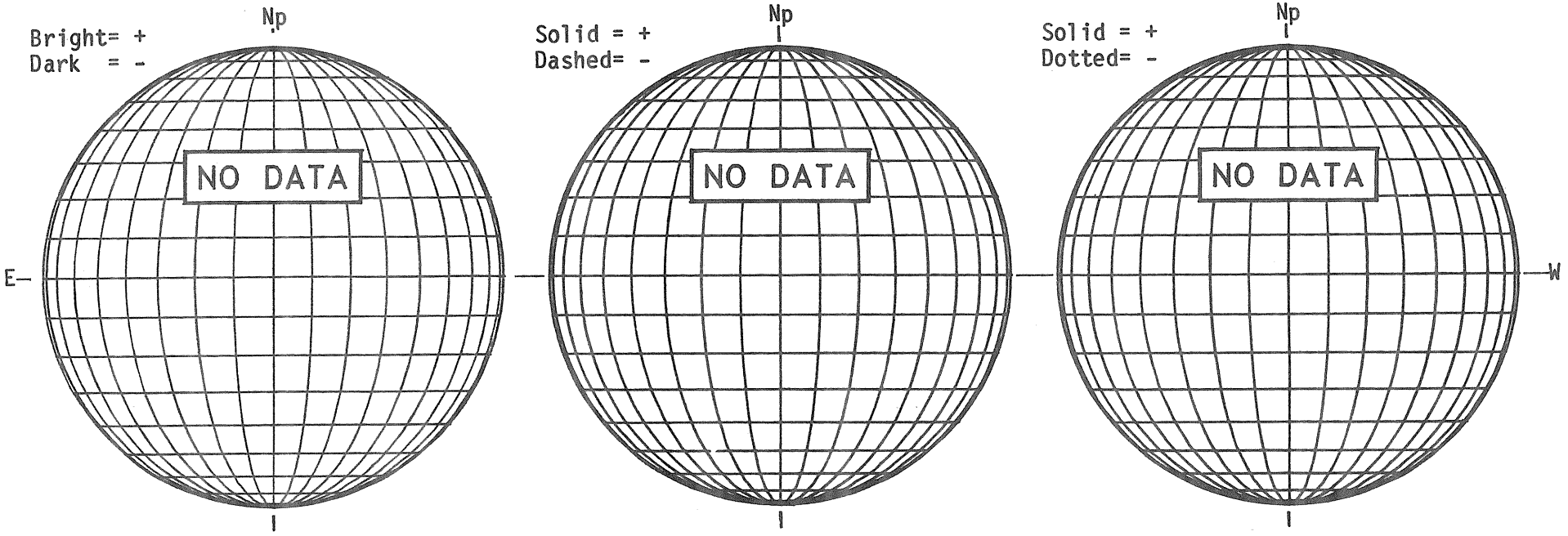
SACRAMENTO PEAK CORONA (1.15 Radii)

31
Apr 86

A P R I L 06, 1 9 8 6 (P=-26.22, B_0=-6.18, L_0= 2.07)

KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



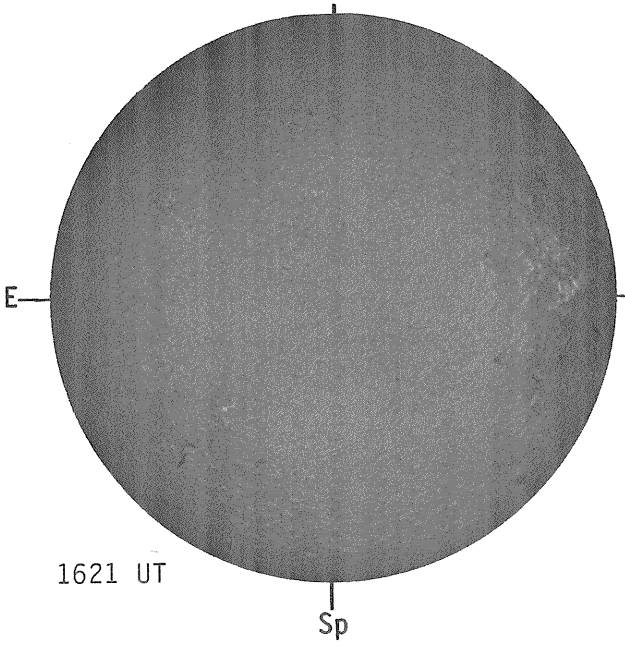
STANFORD MAGNETOGRAM

Solid = +
Dashed= -

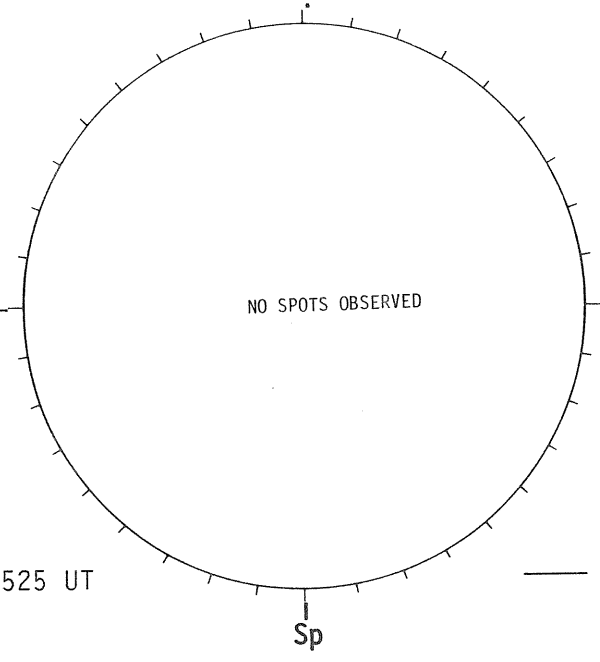
MT. WILSON MAGNETOGRAM

Solid = +
Dotted= -

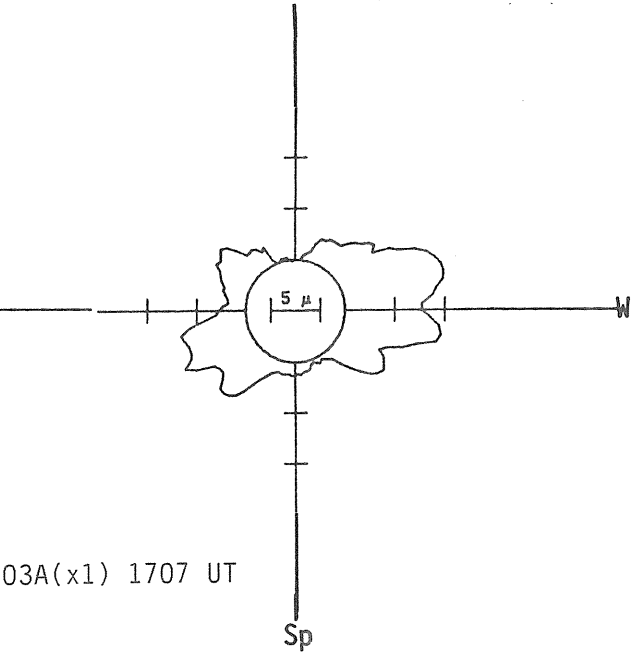
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



SACRAMENTO PEAK CORONA (1.15 Radii)

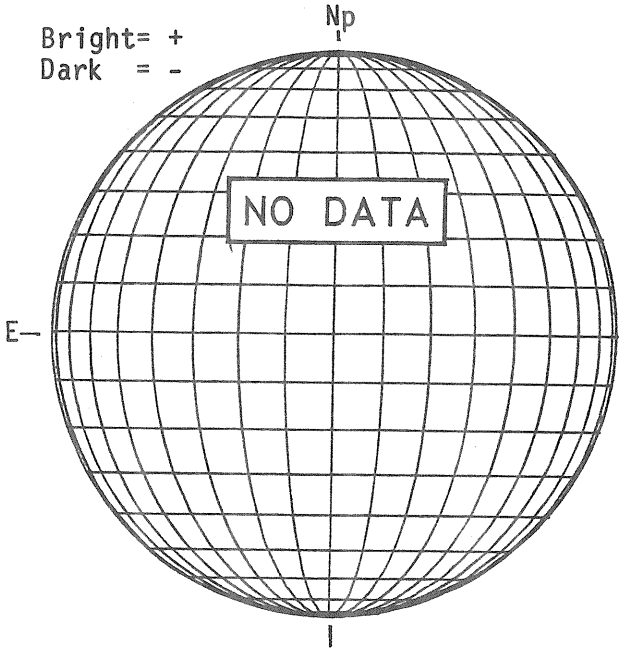


5303A(x1) 1707 UT

A P R I L 07, 1 9 8 6 (P=-26.23, B_o=-6.12, L_o= 348.87)

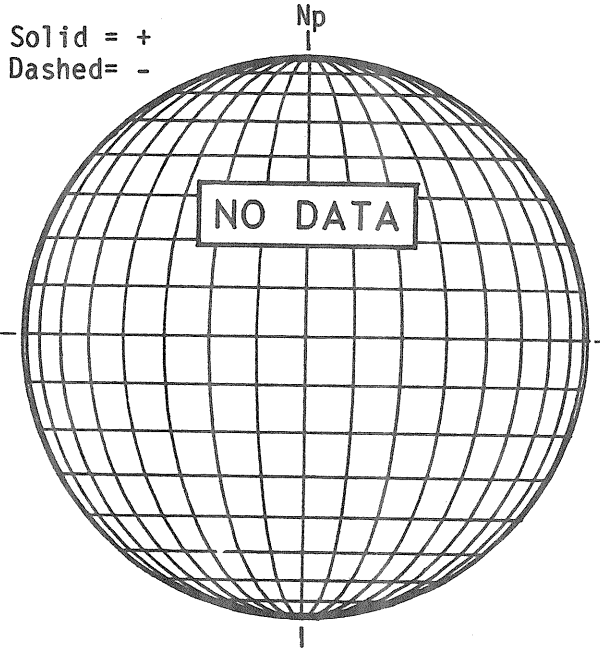
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



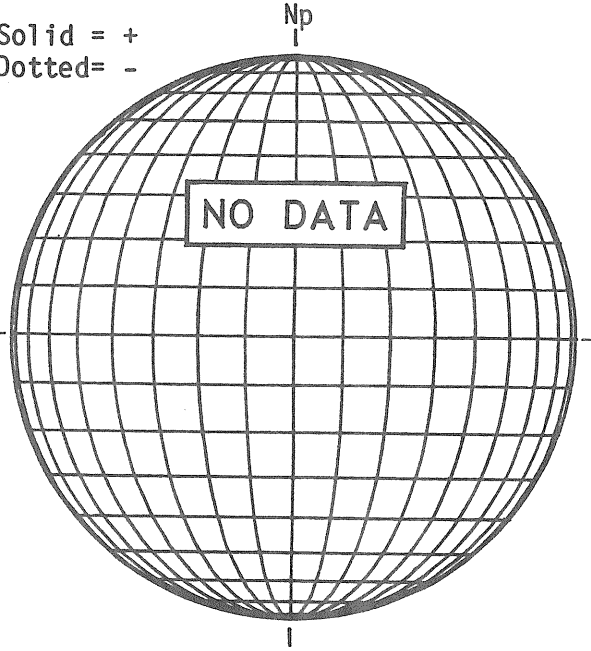
STANFORD MAGNETOGRAM

Solid = +
Dashed= -

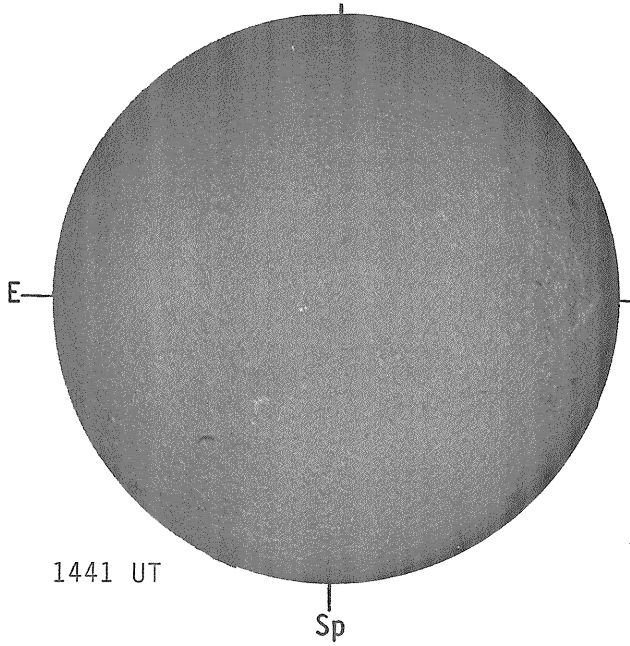


MT. WILSON MAGNETOGRAM

Solid = +
Dotted= -

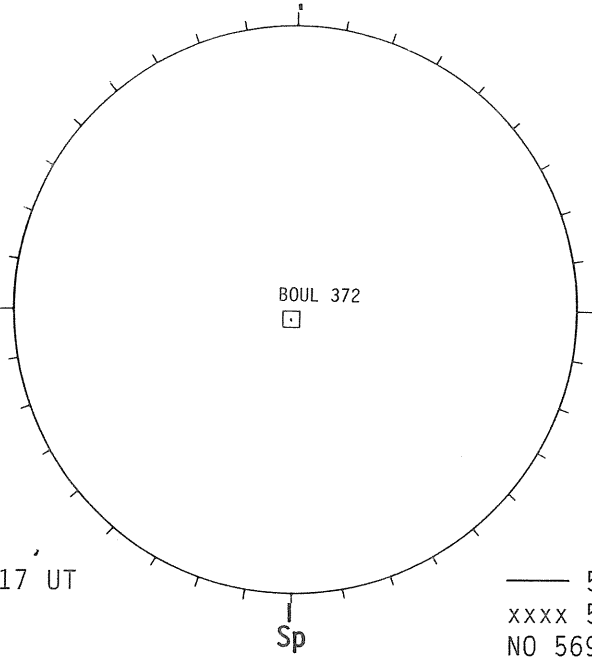


SACRAMENTO PEAK H-ALPHA



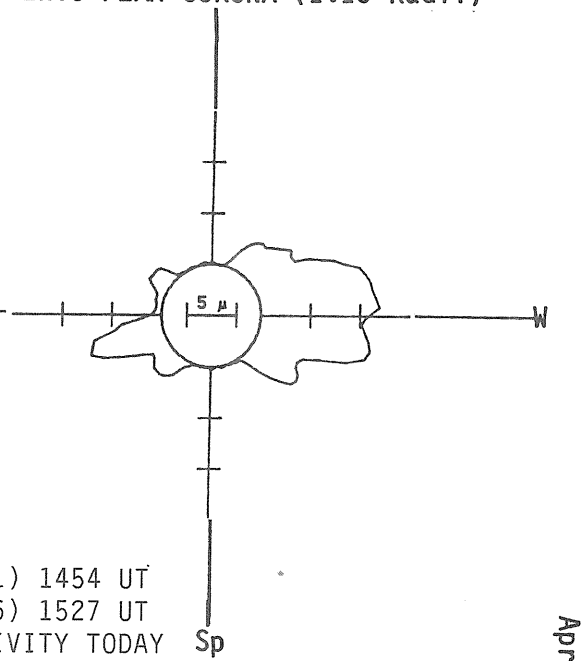
1441 UT

BOULDER SUNSPOTS



1817 UT

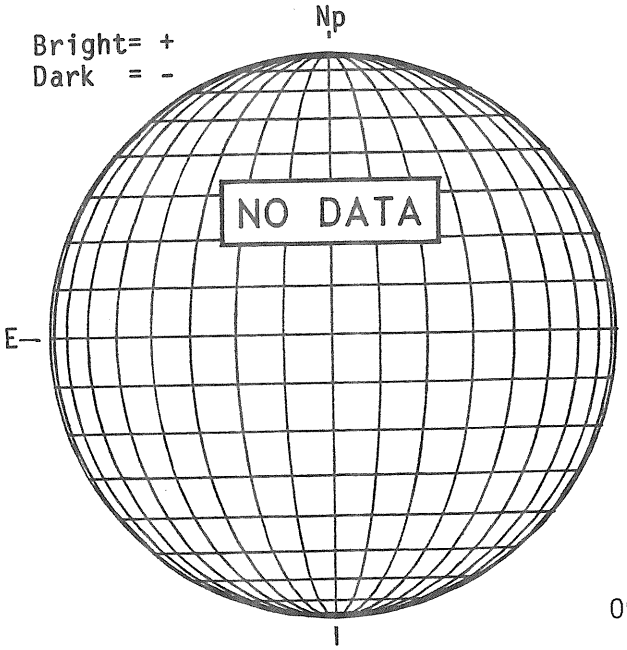
SACRAMENTO PEAK CORONA (1.15 Radii)



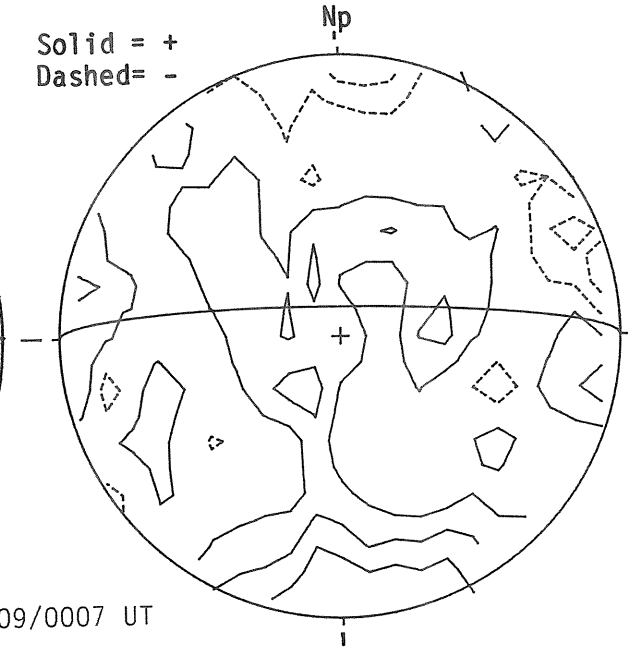
—— 5303A(x1) 1454 UT
xxxx 5694A(x6) 1527 UT
NO 5694A ACTIVITY TODAY

A P R I L 08, 1 9 8 6 (P=-26.22, B_o=-6.06, L_o= 335.68)

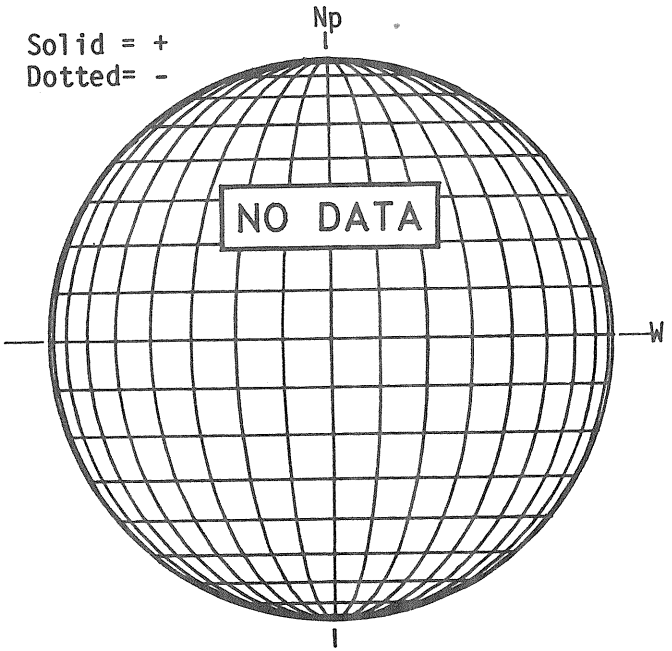
KITT PEAK MAGNETOGRAM



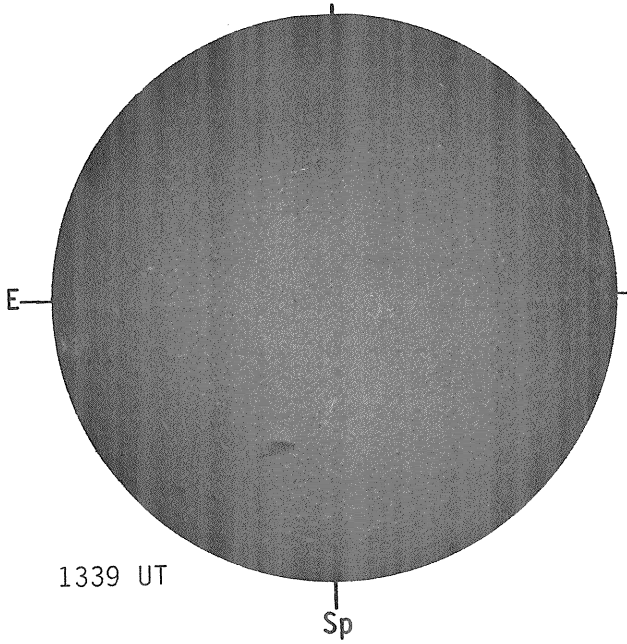
STANFORD MAGNETOGRAM



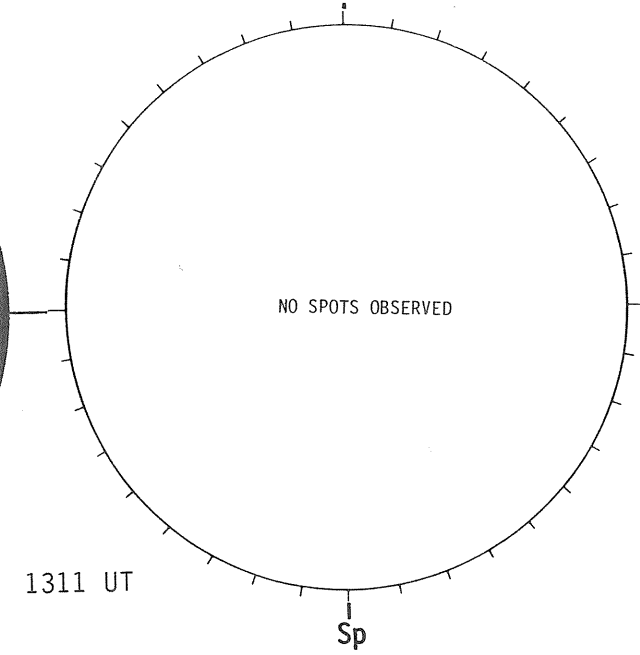
MT. WILSON MAGNETOGRAM



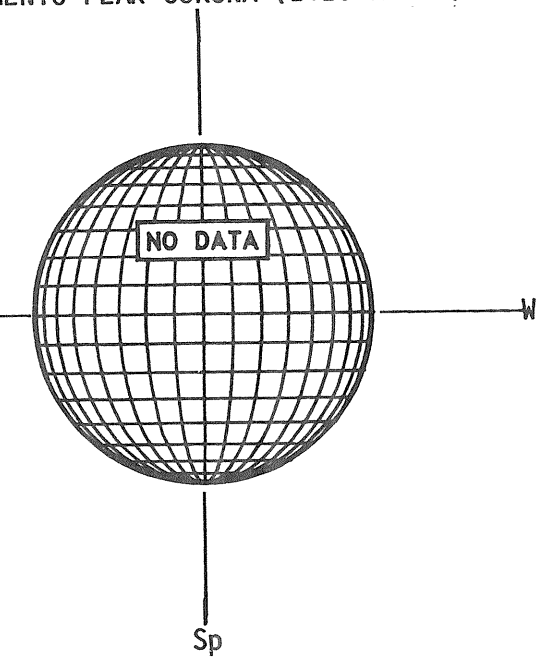
SACRAMENTO PEAK H-ALPHA



RAMEY SUNSPOTS



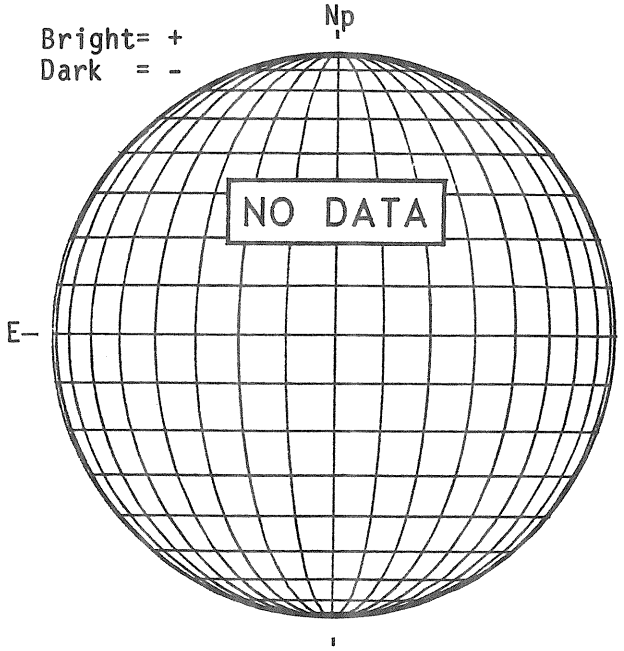
SACRAMENTO PEAK CORONA (1.15 Radii)



A P R I L 09, 1 9 8 6 (P=-26.21, B_0=-5.99, L_0= 322.48)

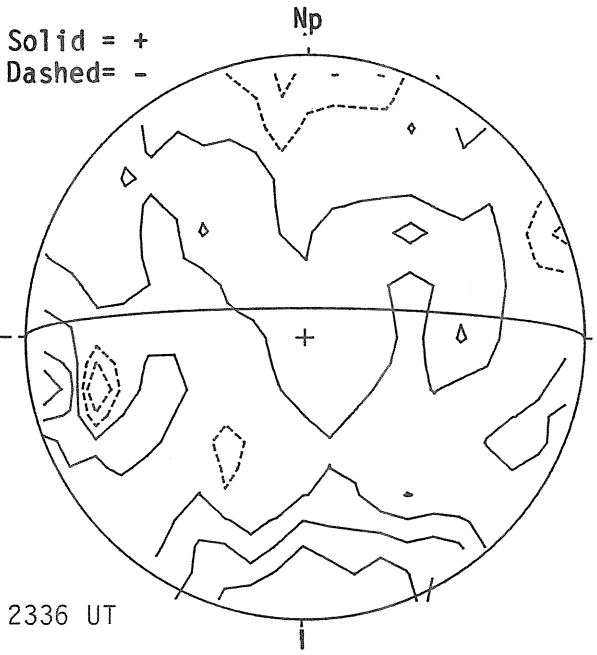
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



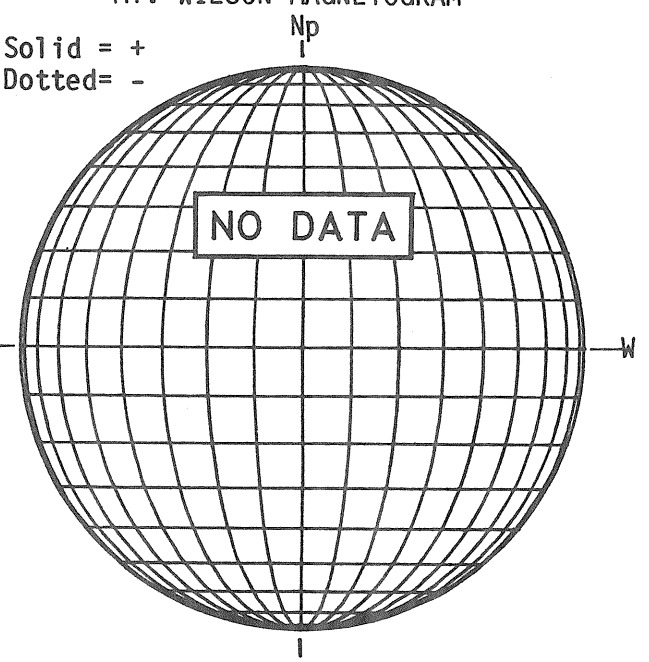
STANFORD MAGNETOGRAM

Solid = +
Dashed= -

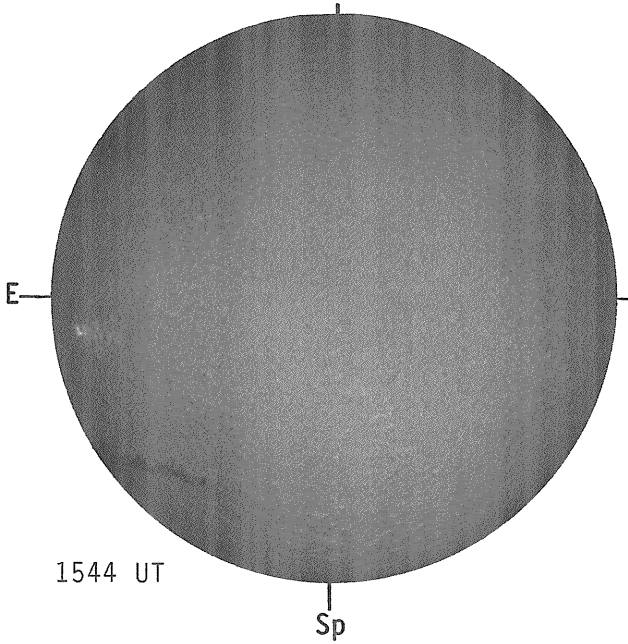


MT. WILSON MAGNETOGRAM

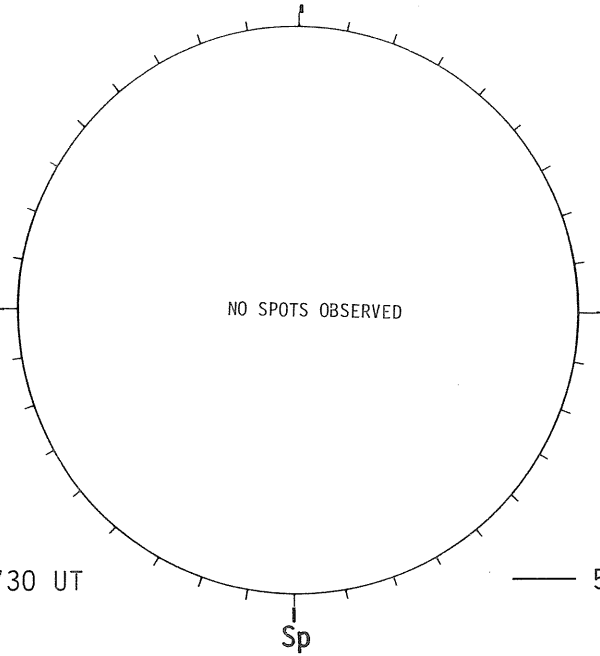
Solid = +
Dotted= -



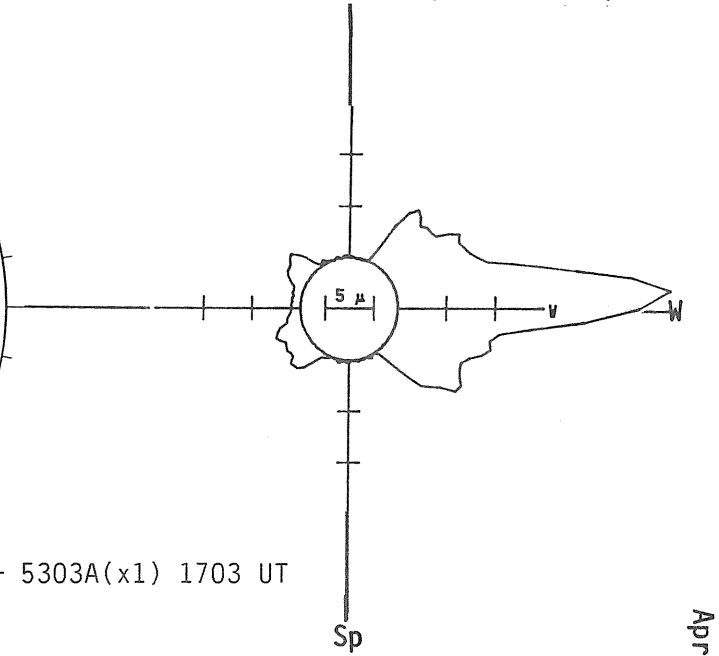
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



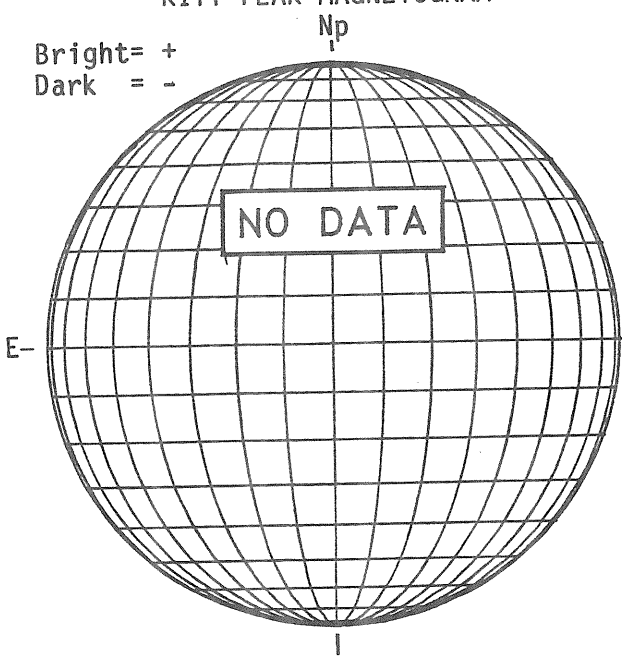
SACRAMENTO PEAK CORONA (1.15 Radii)



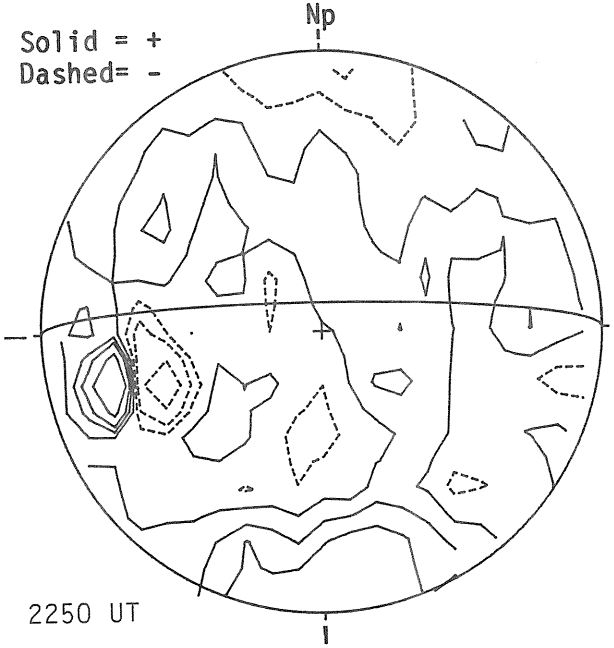
5303A(x1) 1703 UT

A P R I L 10, 1 9 8 6 (P=-26.19, B_o=-5.92, L_o= 309.28)

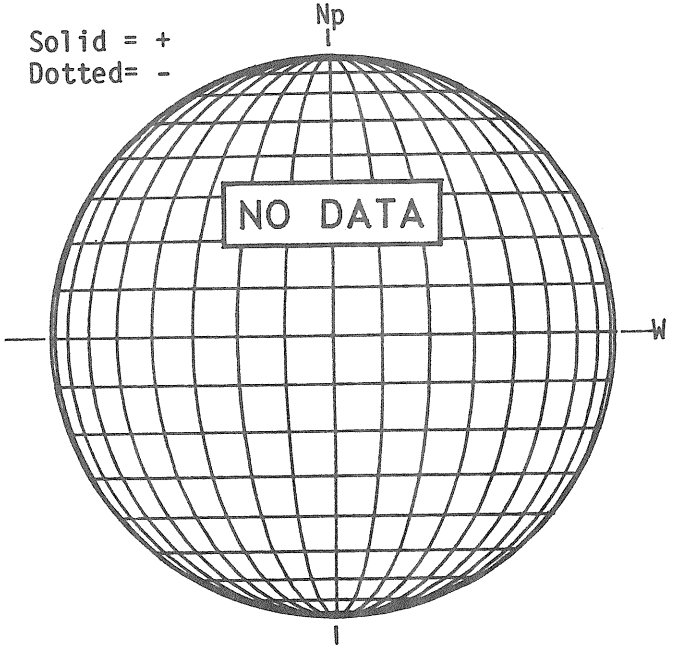
KITT PEAK MAGNETOGRAM



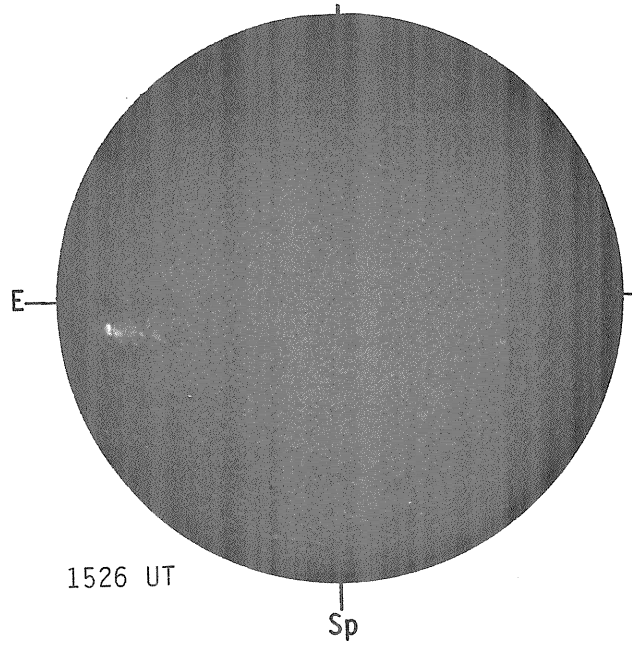
STANFORD MAGNETOGRAM



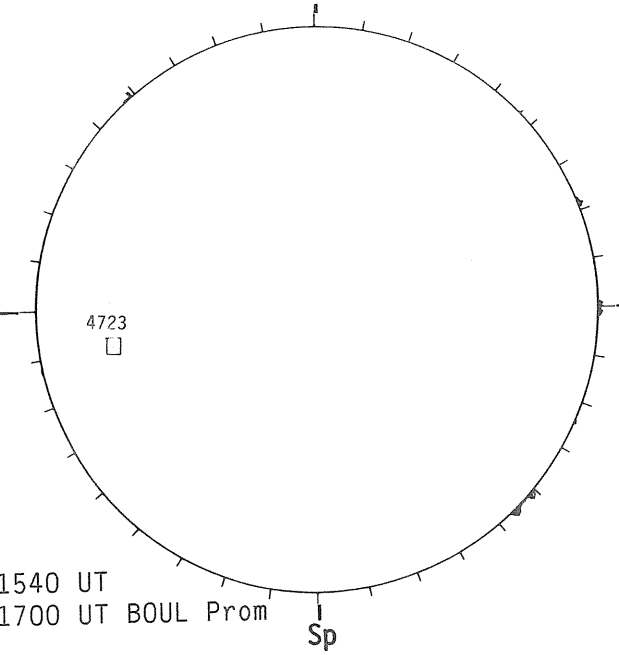
MT. WILSON MAGNETOGRAM



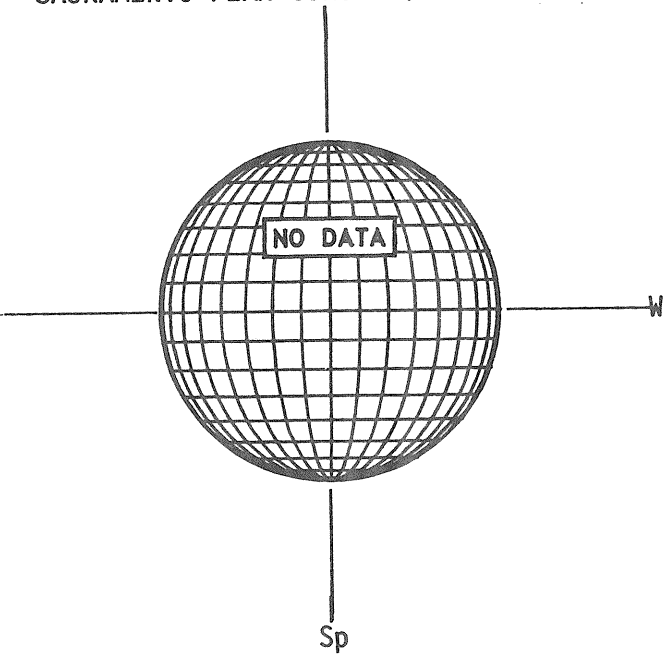
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



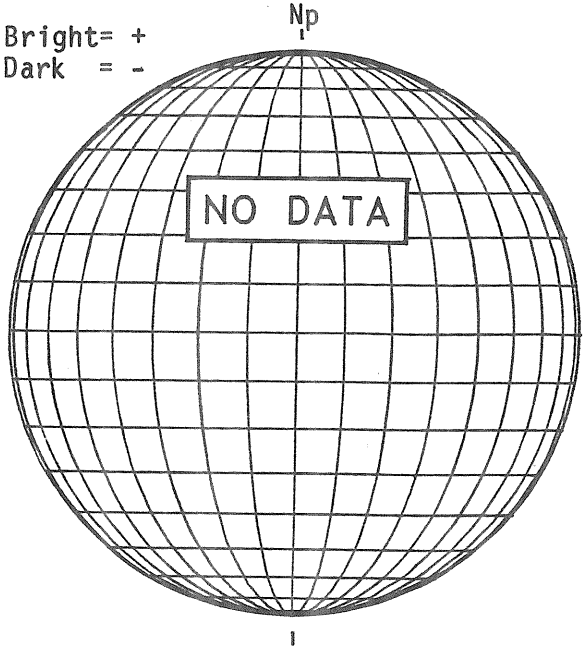
SACRAMENTO PEAK CORONA (1.15 Radii)



A P R I L 11, 1 9 8 6 (P=-26.17, B_o=-5.86, L_o= 296.08)

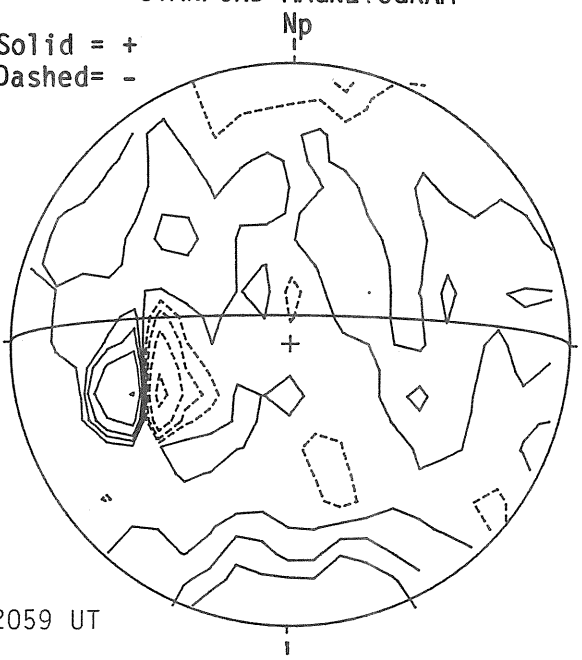
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



STANFORD MAGNETOGRAM

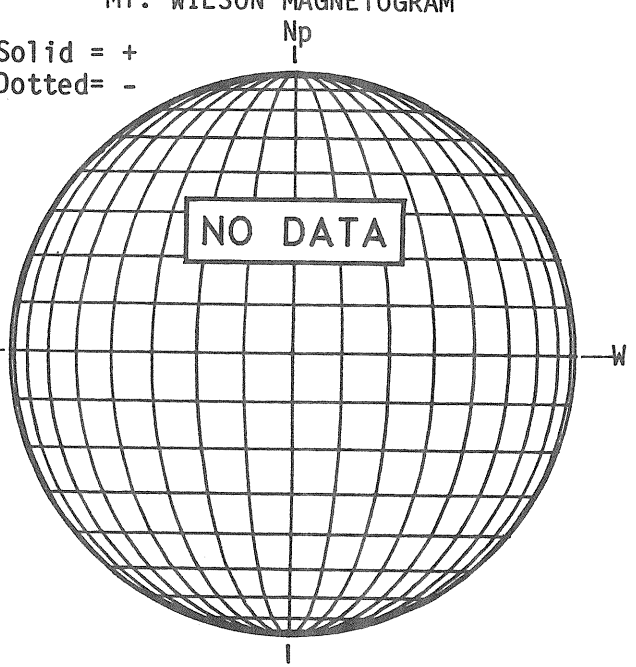
Solid = +
Dashed= -



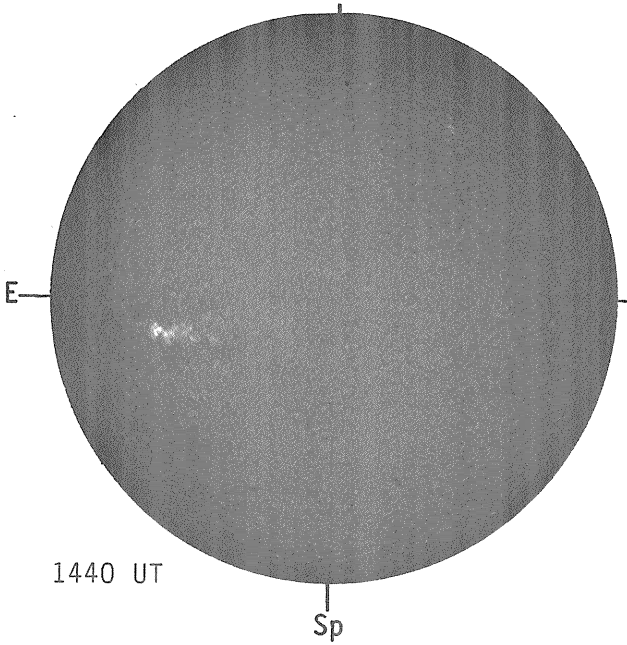
2059 UT

MT. WILSON MAGNETOGRAM

Solid = +
Dotted= -



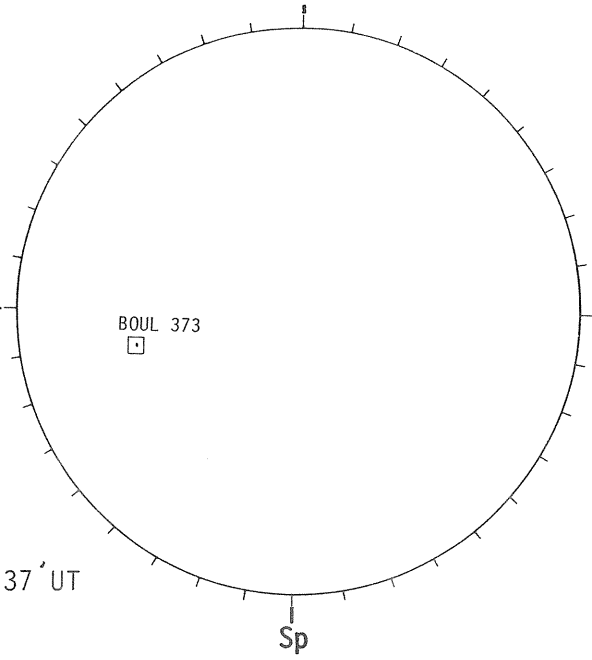
SACRAMENTO PEAK H-ALPHA



1440 UT

Sp

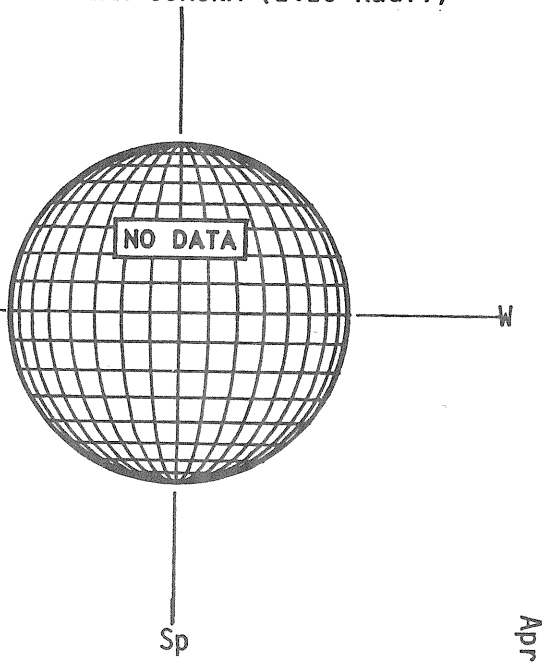
BOULDER SUNSPOTS



1537 UT

Sp

SACRAMENTO PEAK CORONA (1.15 Radii)

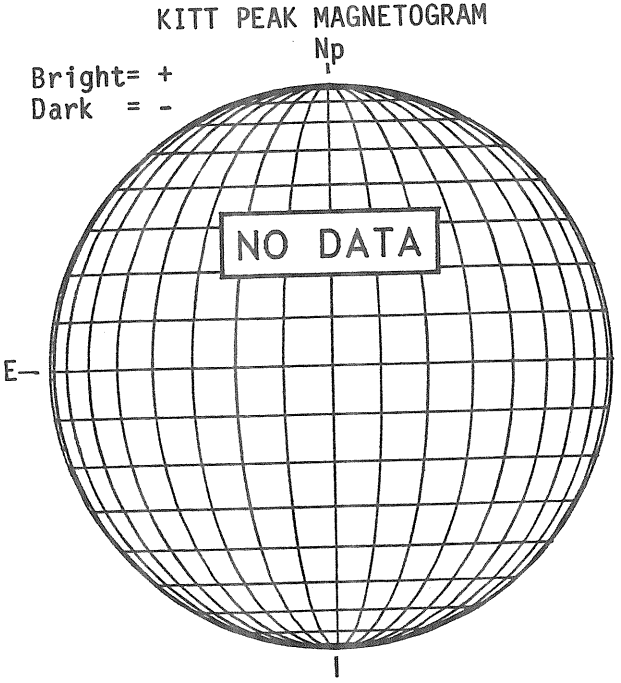


Sp

A P R I L 12, 1 9 8 6 (P=-26.13, B_0=-5.78, L_0= 282.88)

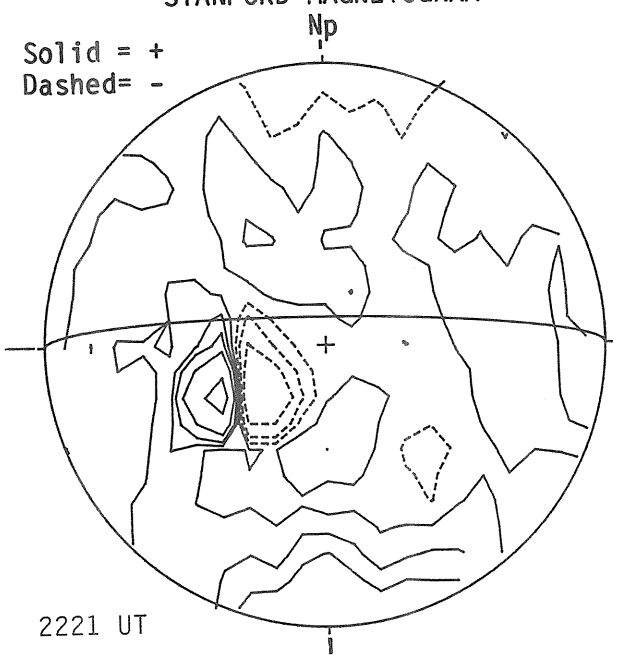
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



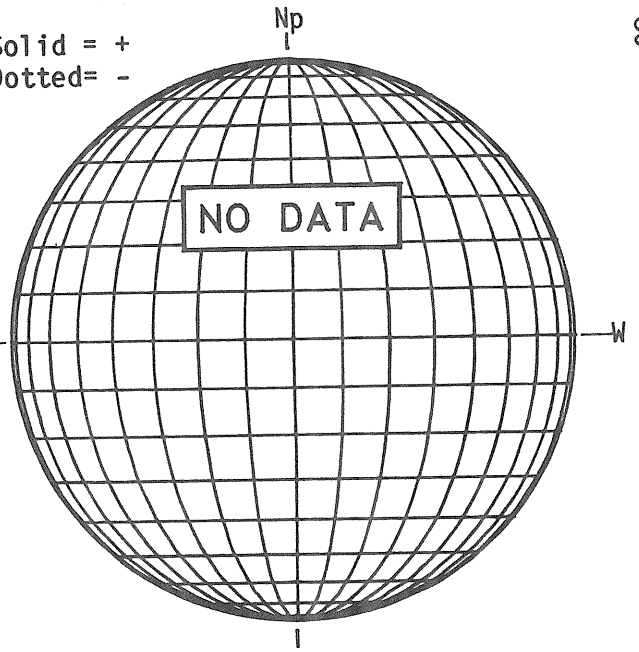
STANFORD MAGNETOGRAM

Solid = +
Dashed= -

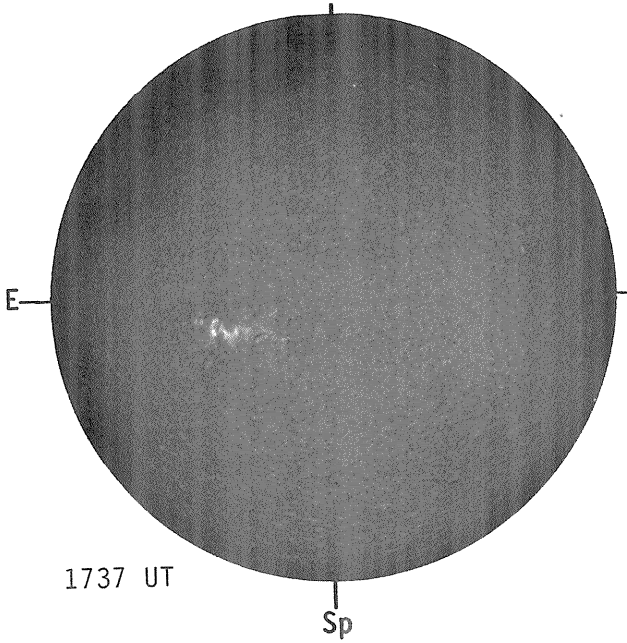


MT. WILSON MAGNETOGRAM

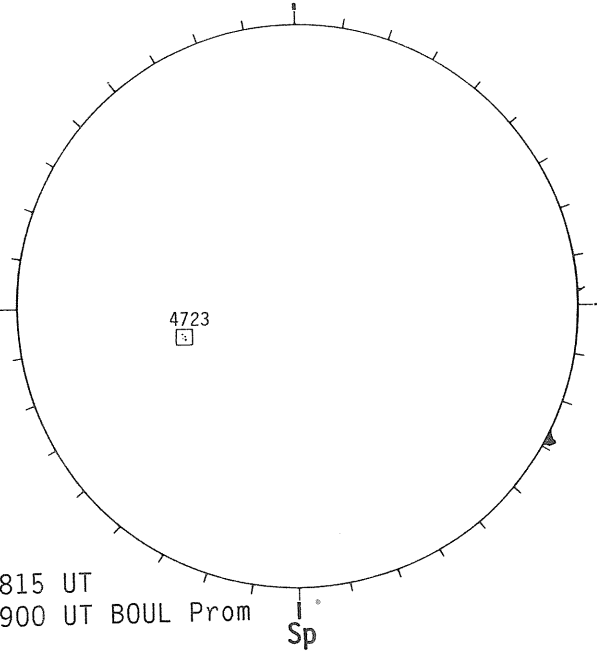
Solid = +
Dotted= -



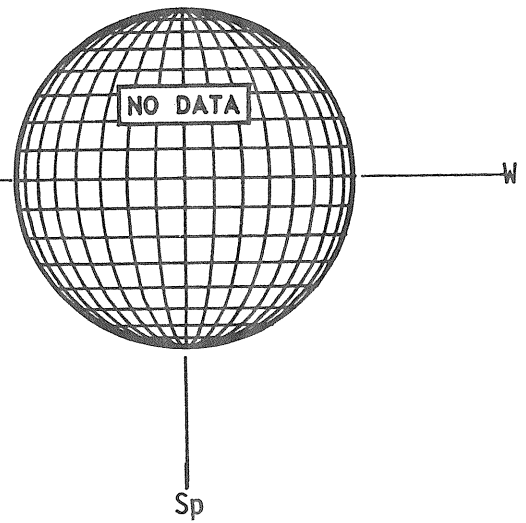
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS

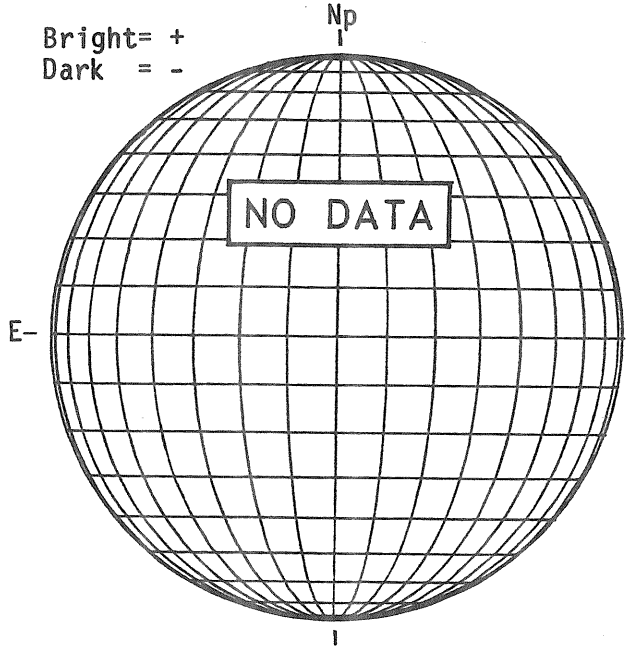


SACRAMENTO PEAK CORONA (1.15 Radii)

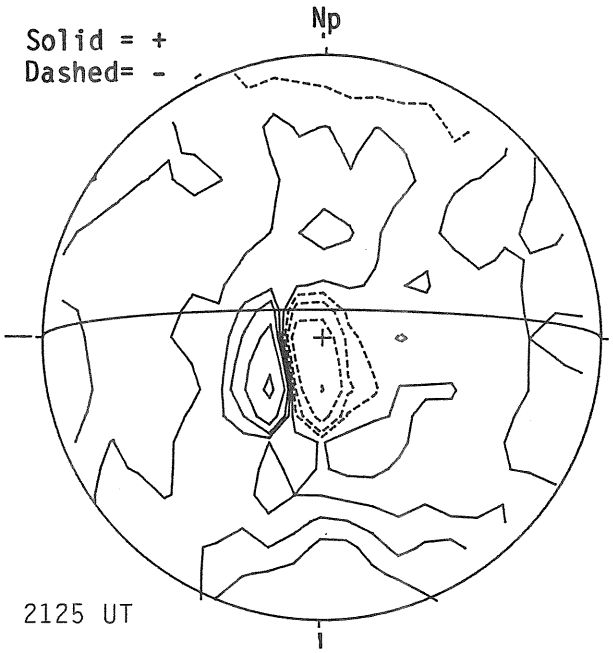


A P R I L 13, 1 9 8 6 (P=-26.09, B_o=-5.71, L_o= 269.68)

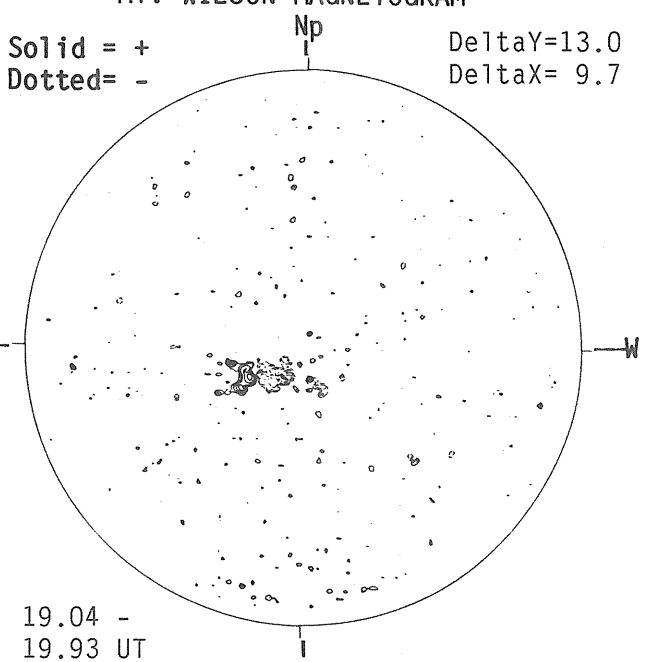
KITT PEAK MAGNETOGRAM



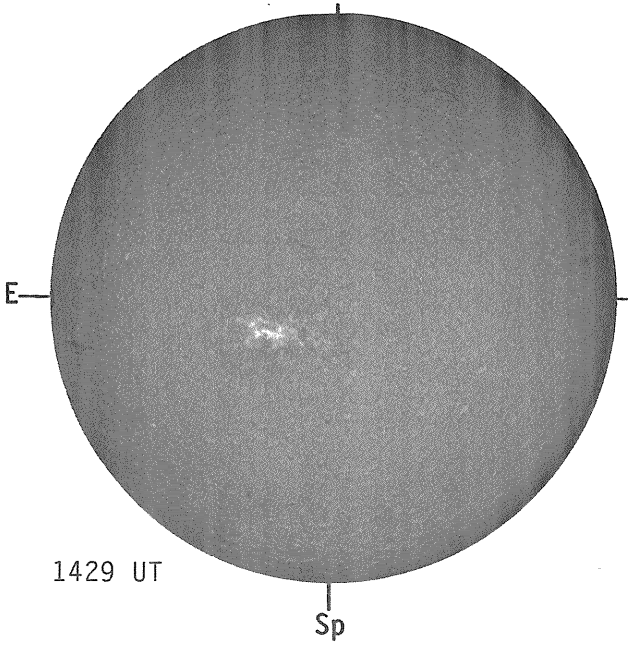
STANFORD MAGNETOGRAM



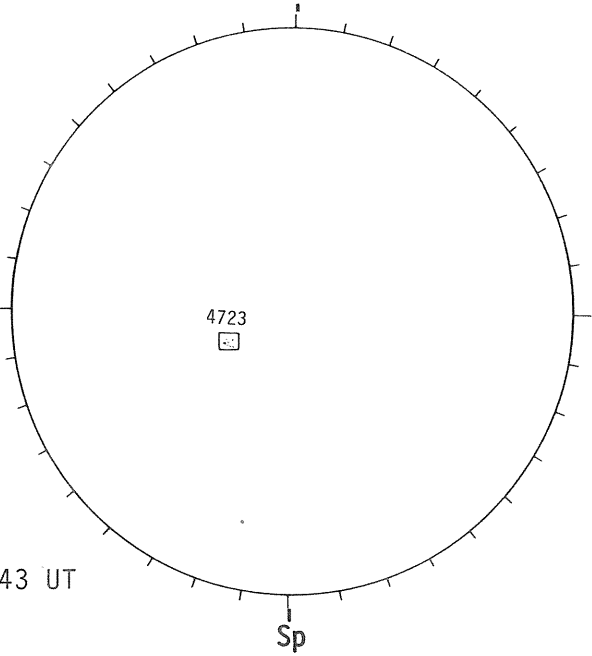
MT. WILSON MAGNETOGRAM



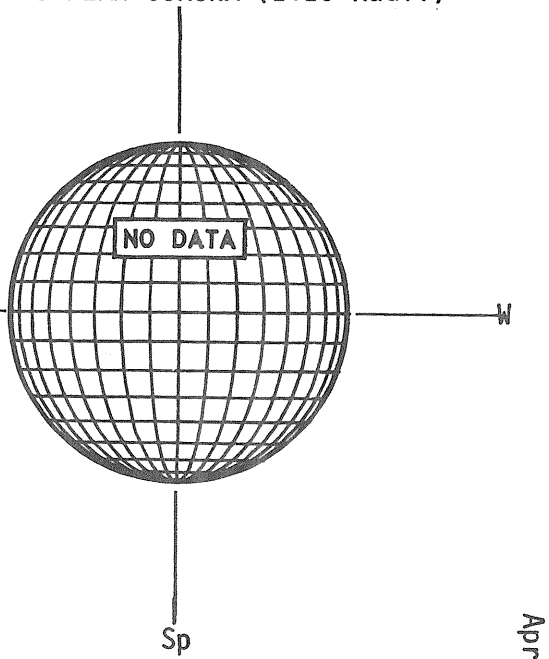
SACRAMENTO PEAK H-ALPHA



RAMEY SUNSPOTS



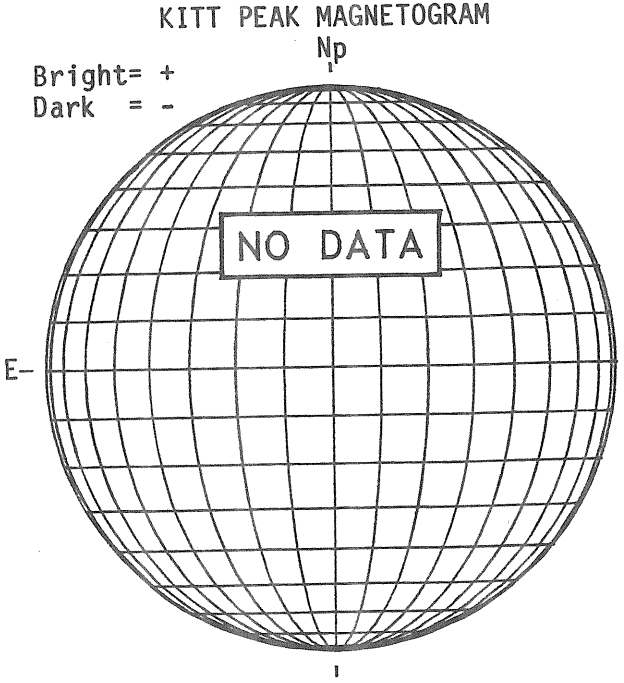
SACRAMENTO PEAK CORONA (1.15 Radii)



A P R I L 14, 1 9 8 6 (P=-26.05, B_0=-5.64, L_0= 256.48)

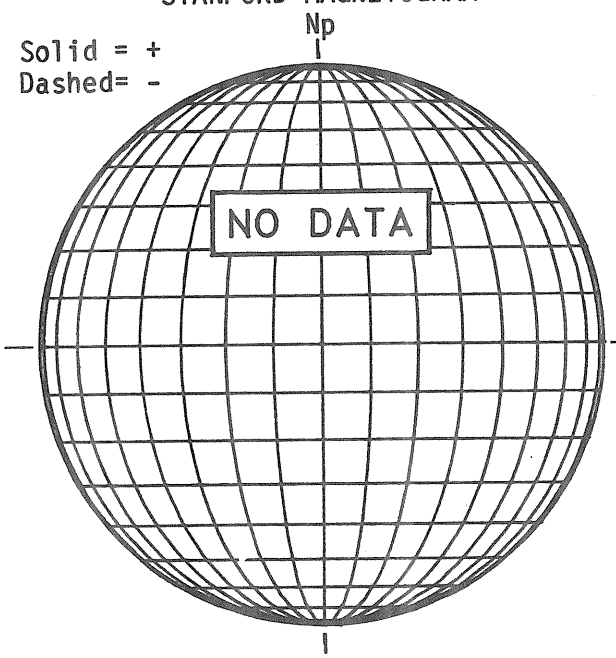
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



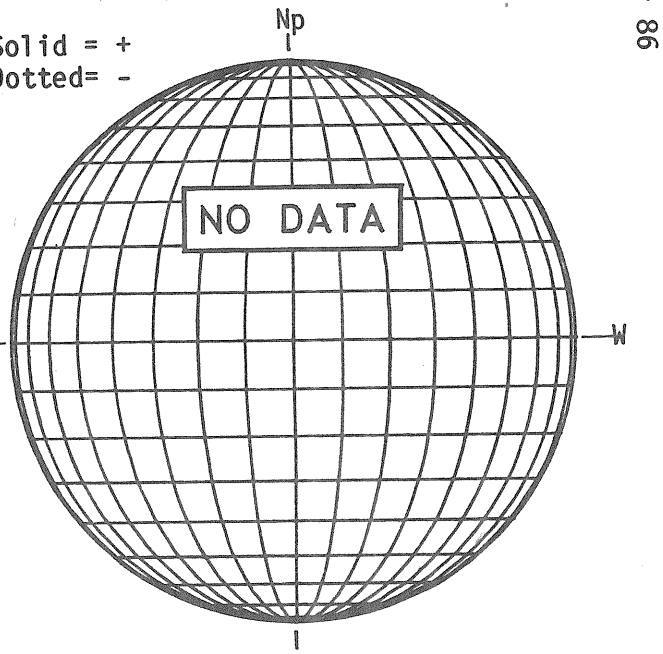
STANFORD MAGNETOGRAM

Solid = +
Dashed= -

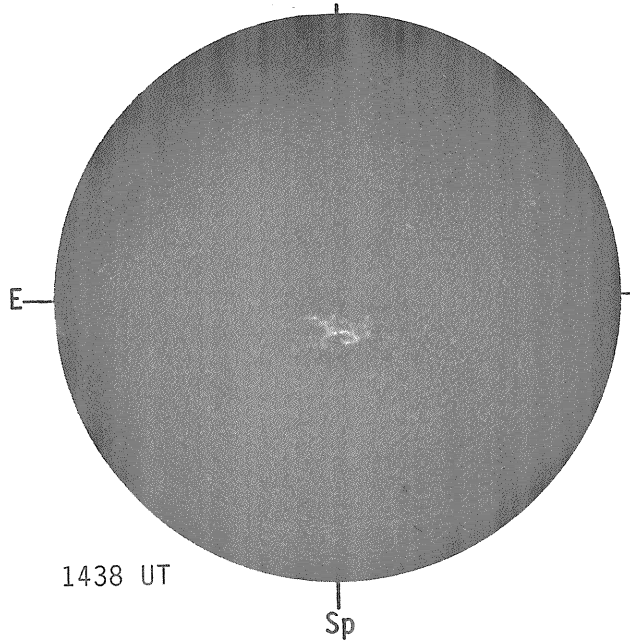


MT. WILSON MAGNETOGRAM

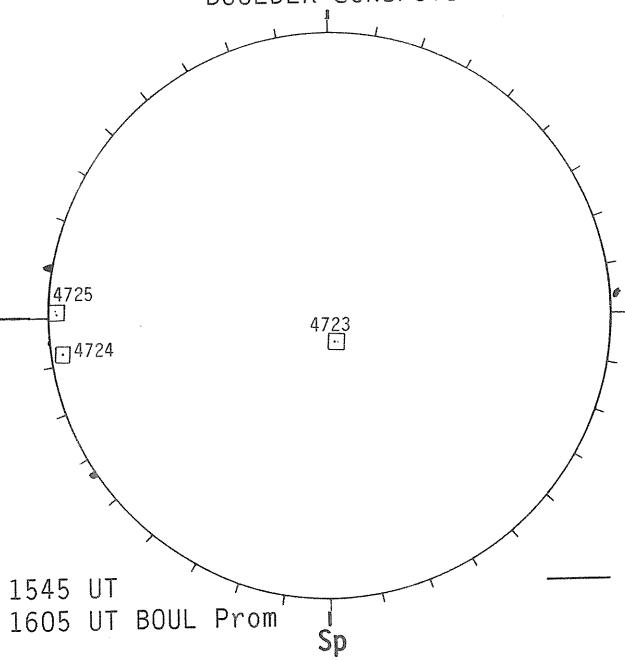
Solid = +
Dotted= -



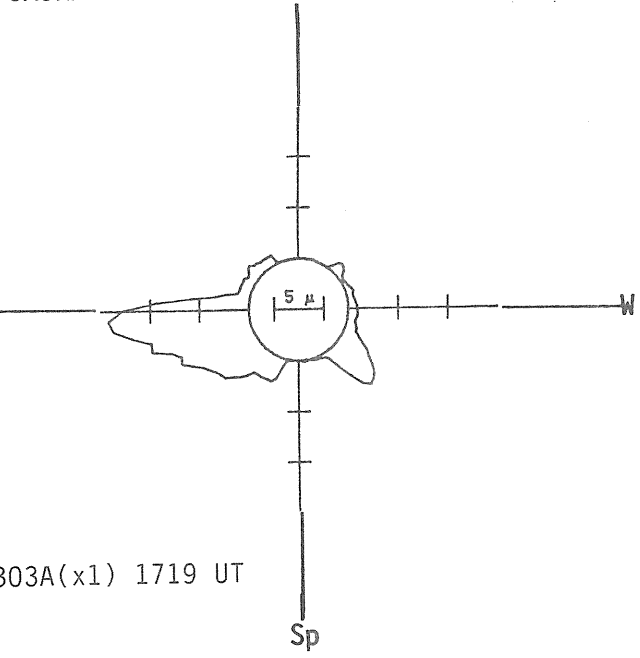
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



SACRAMENTO PEAK CORONA (1.15 Radii)

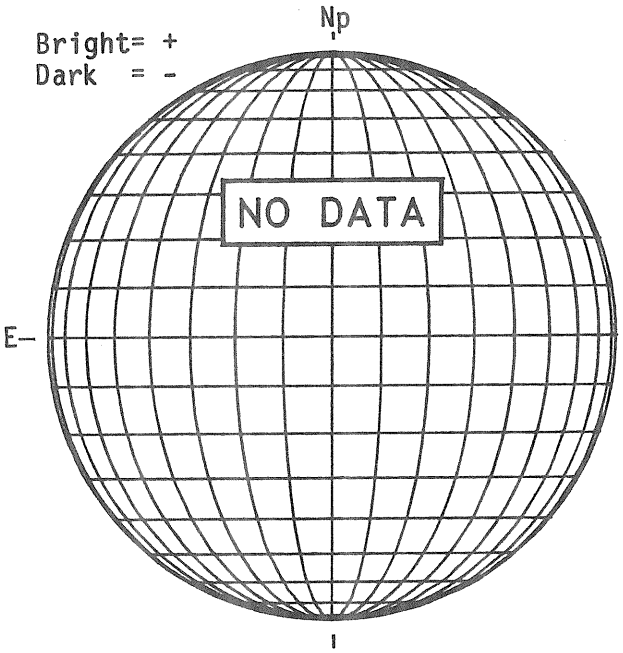


—— 5303A(x1) 1719 UT

A P R I L 15, 1 9 8 6 (P=-25.99, B_0=-5.56, L_0= 243.27)

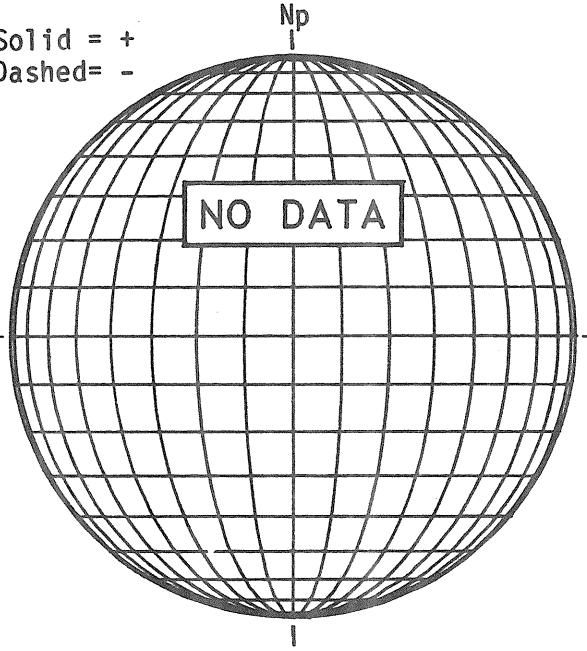
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



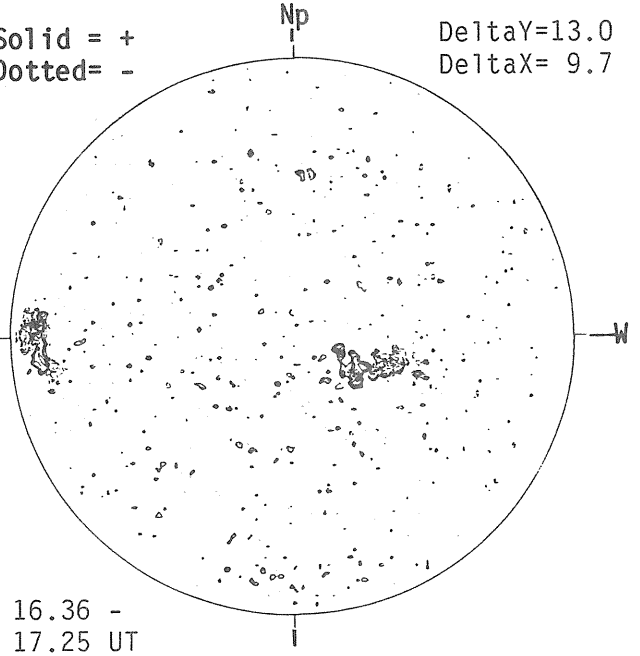
STANFORD MAGNETOGRAM

Solid = +
Dashed= -



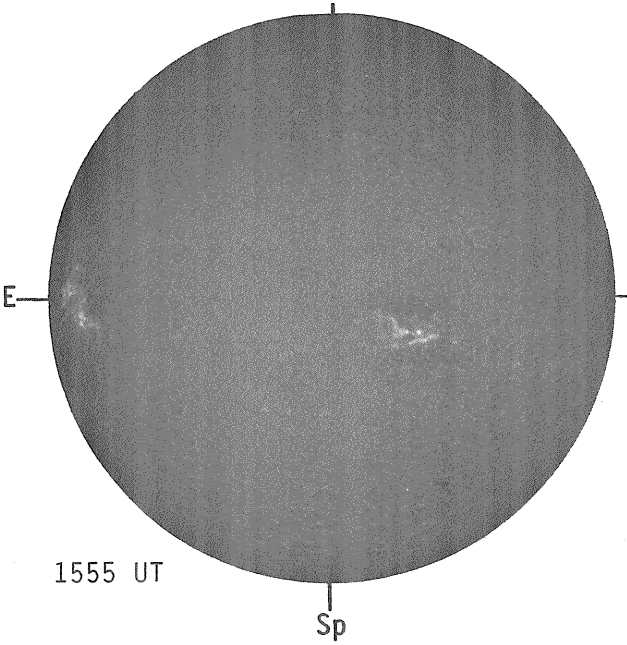
MT. WILSON MAGNETOGRAM

Solid = +
Dotted= -



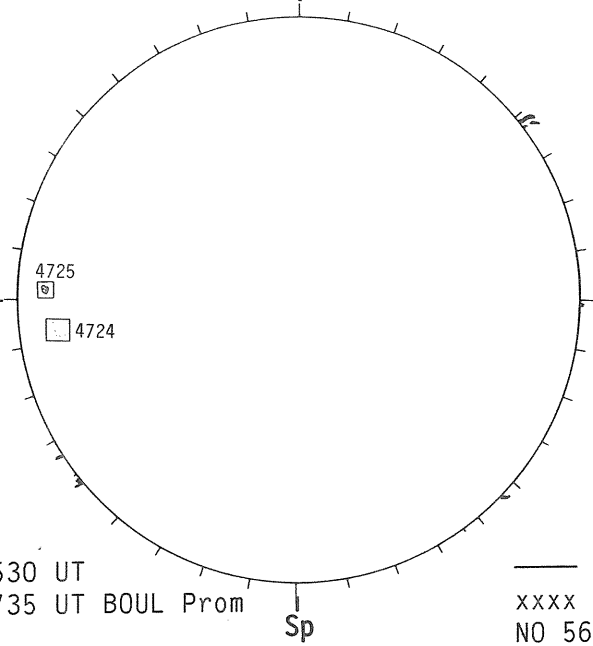
16.36 -
17.25 UT

SACRAMENTO PEAK H-ALPHA



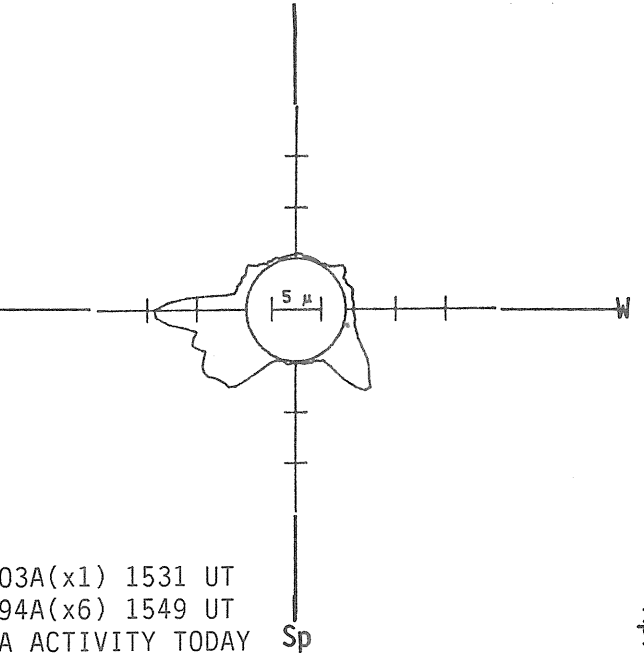
1555 UT

BOULDER SUNSPOTS



1530 UT
1735 UT BOUL Prom

SACRAMENTO PEAK CORONA (1.15 Radii)

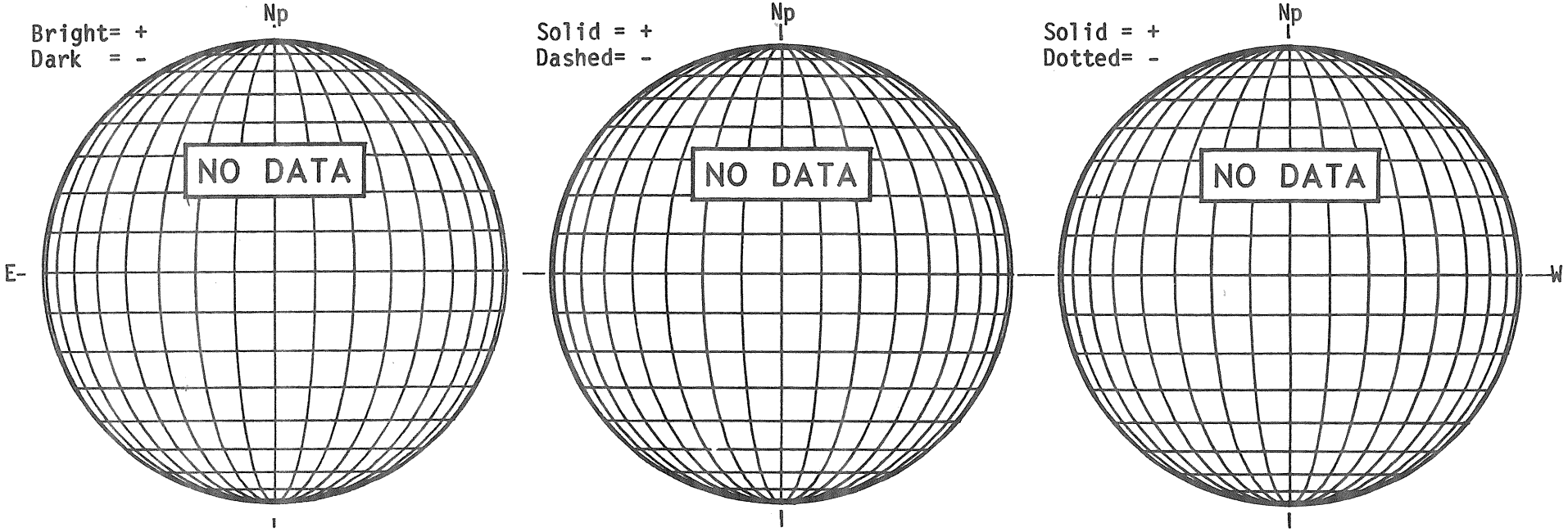


—— 5303A(x1) 1531 UT
xxxx 5694A(x6) 1549 UT
NO 5694A ACTIVITY TODAY

A P R I L 16, 1 9 8 6 (P=-25.93, B_0=-5.48, L_0= 230.07)

KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



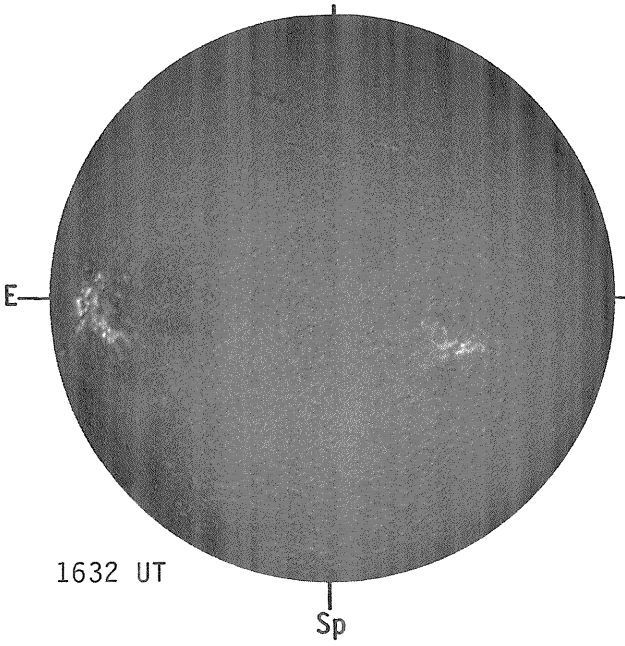
STANFORD MAGNETOGRAM

Solid = +
Dashed= -

MT. WILSON MAGNETOGRAM

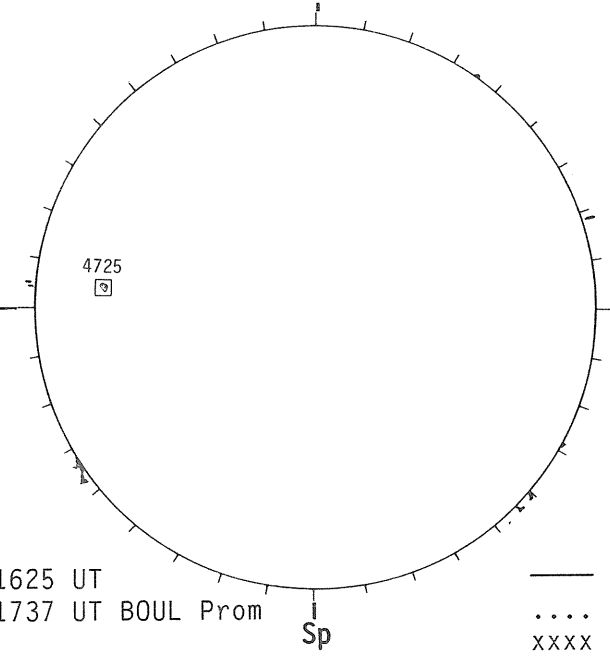
Solid = +
Dotted= -

SACRAMENTO PEAK H-ALPHA



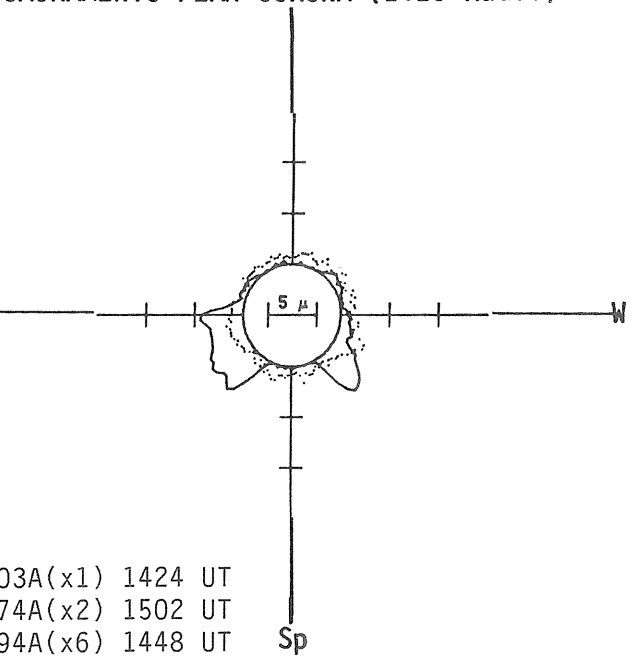
1632 UT

BOULDER SUNSPOTS



1625 UT
1737 UT BOUL Prom

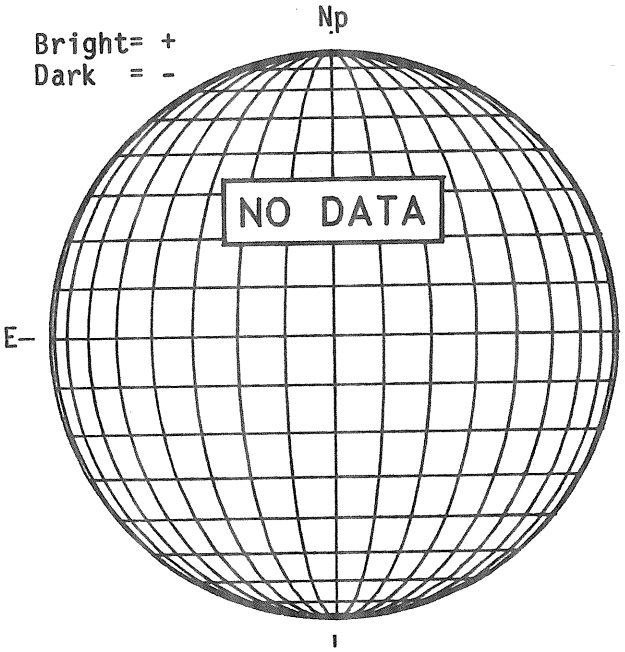
SACRAMENTO PEAK CORONA (1.15 Radii)



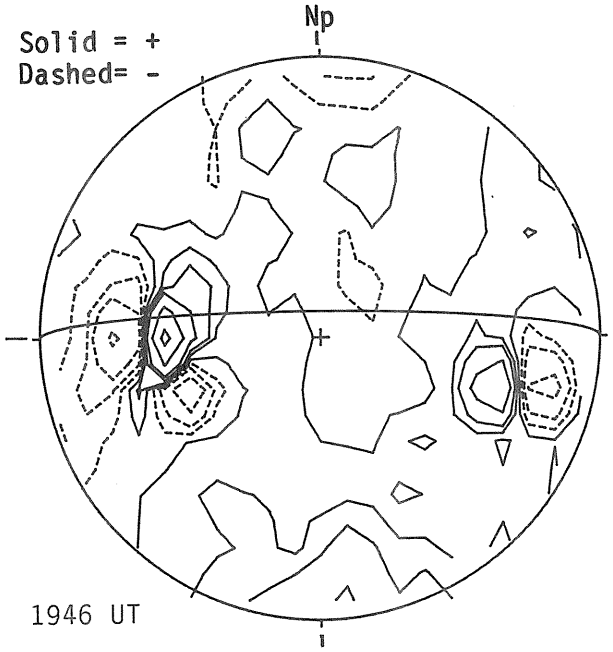
—— 5303A(x1) 1424 UT
.... 6374A(x2) 1502 UT
xxxx 5694A(x6) 1448 UT
NO 5694A ACTIVITY TODAY

A P R I L 17, 1 9 8 6 (P=-25.86, B_0=-5.40, L_0= 216.87)

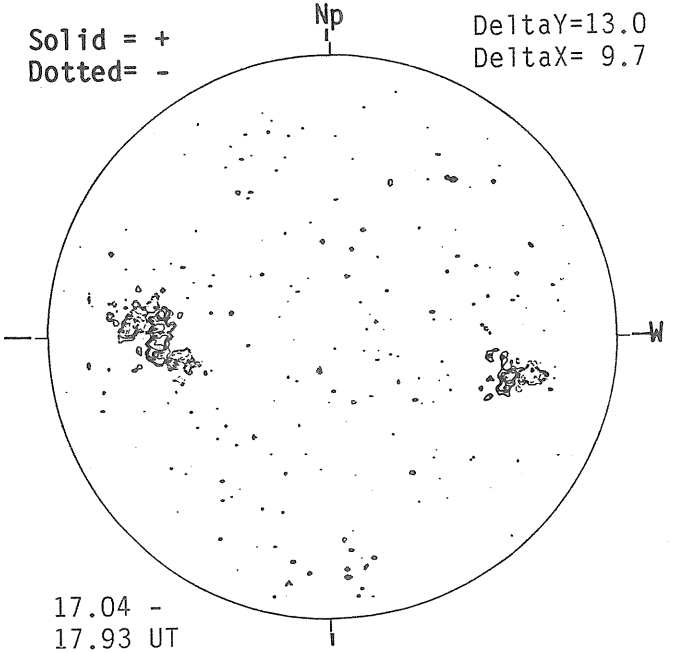
KITT PEAK MAGNETOGRAM



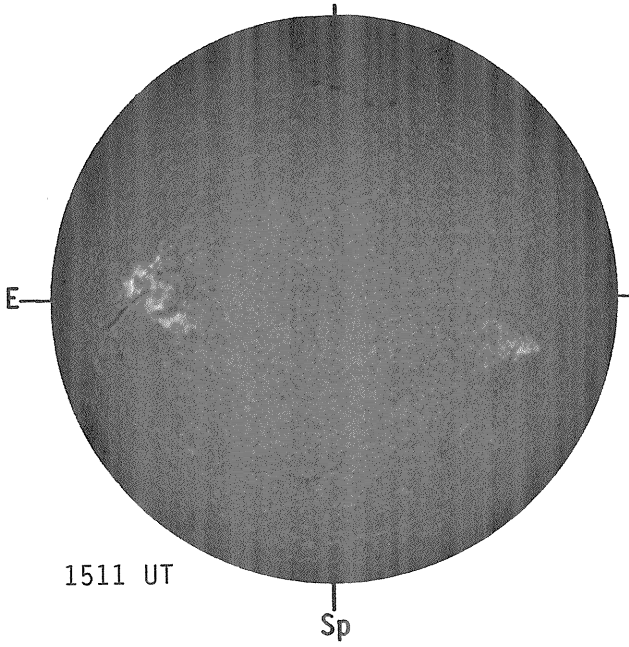
STANFORD MAGNETOGRAM



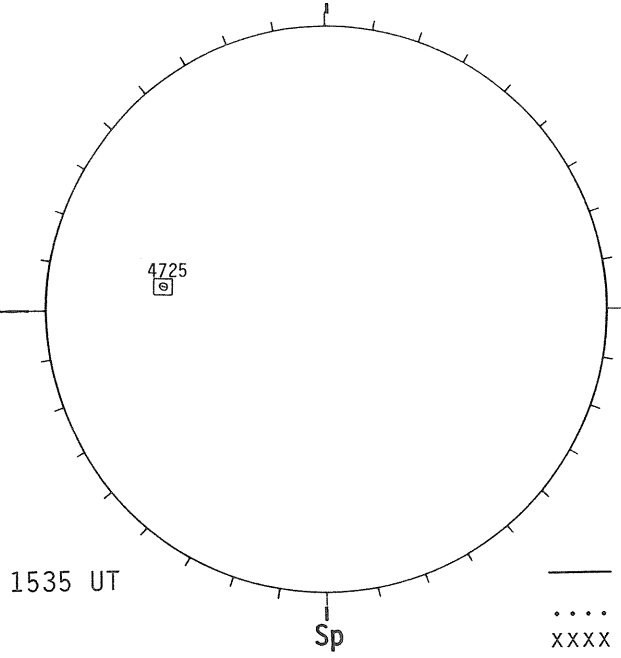
MT. WILSON MAGNETOGRAM



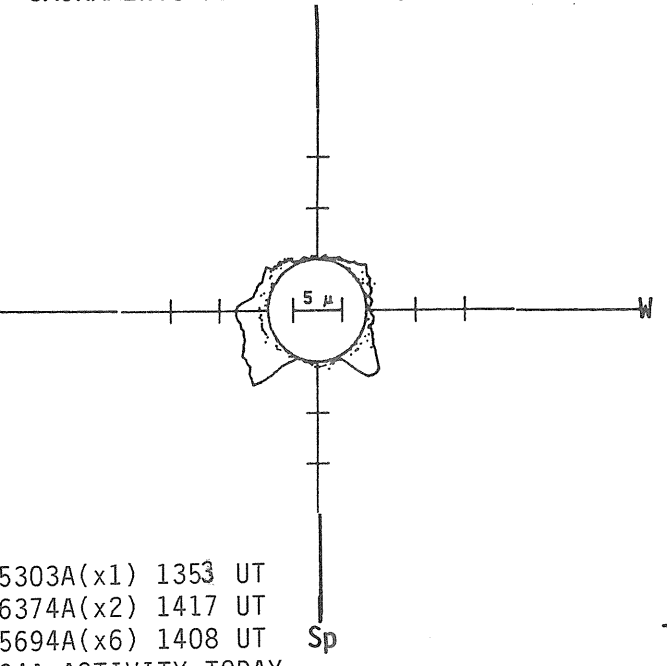
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



SACRAMENTO PEAK CORONA (1.15 Radii)



—— 5303A(x1) 1353 UT
.... 6374A(x2) 1417 UT
xxxx 5694A(x6) 1408 UT
NO 5694A ACTIVITY TODAY

A P R I L 18, 1 9 8 6 (P=-25.78, B_0=-5.32, L_0= 203.66)

KITT PEAK MAGNETOGRAM

Np

Bright= +
Dark = -

NO DATA

E

STANFORD MAGNETOGRAM

Np

Solid = +
Dashed= -

1755 UT

MT. WILSON MAGNETOGRAM

Np

Solid = +
Dotted= -

DeltaY=13.0
DeltaX= 9.6

17.59 -
18.47 UT

W

SACRAMENTO PEAK H-ALPHA

1434 UT

Sp

RAMEY SUNSPOTS

4725

1228 UT

Sp

SACRAMENTO PEAK CORONA (1.15 Radii)

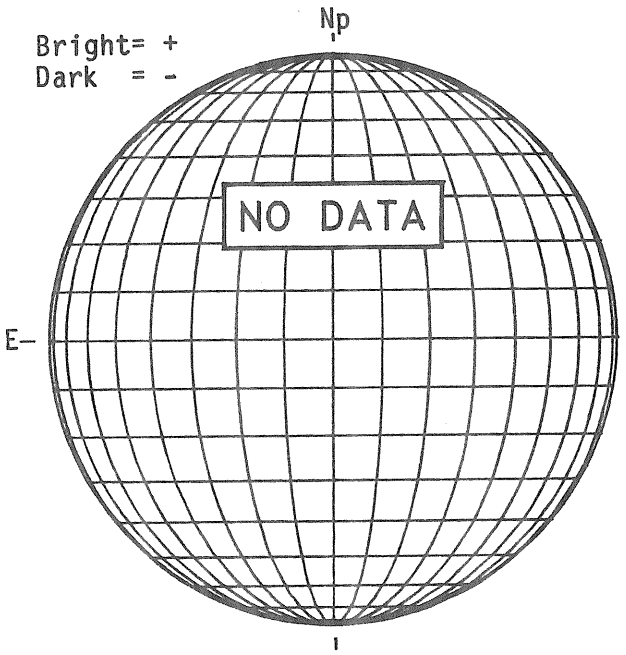
5 μ

Sp

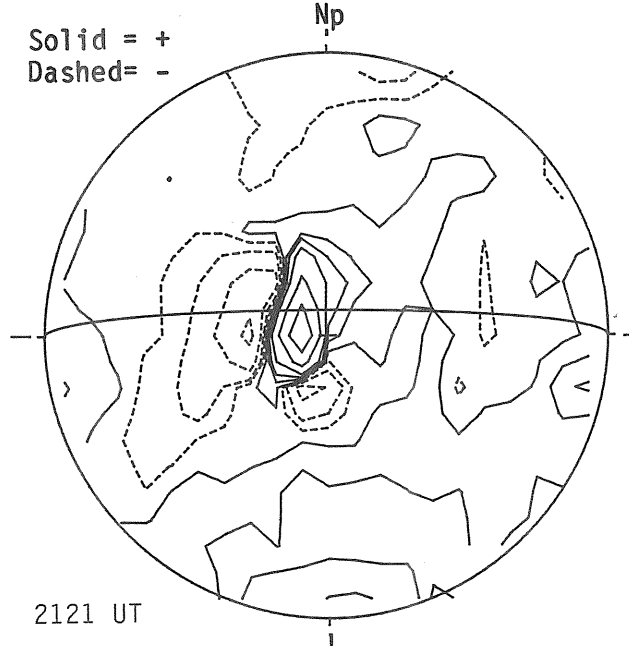
—— 5303A(x1) 1335 UT
.... 6374A(x2) 1406 UT
xxxx 5694A(x6) 1357 UT
NO 5694A ACTIVITY TODAY

A P R I L 19, 1 9 8 6 (P=-25.70, B_0=-5.24, L_0= 190.45)

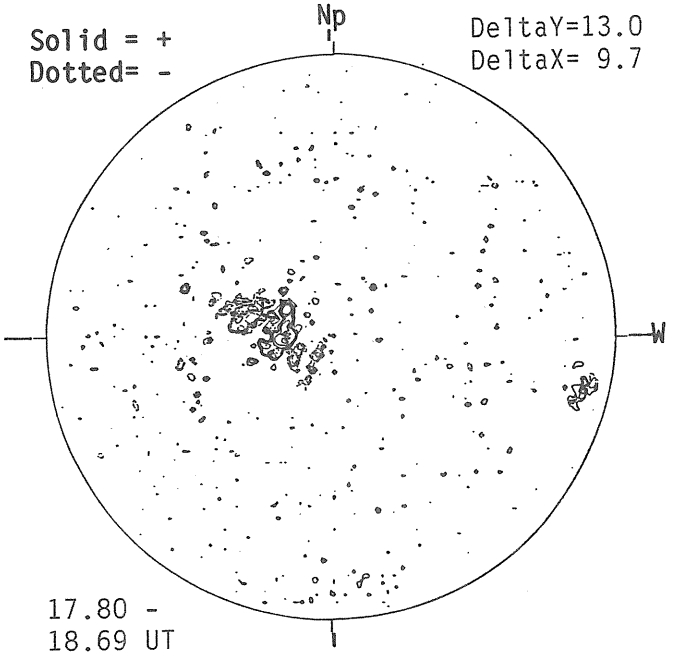
KITT PEAK MAGNETOGRAM



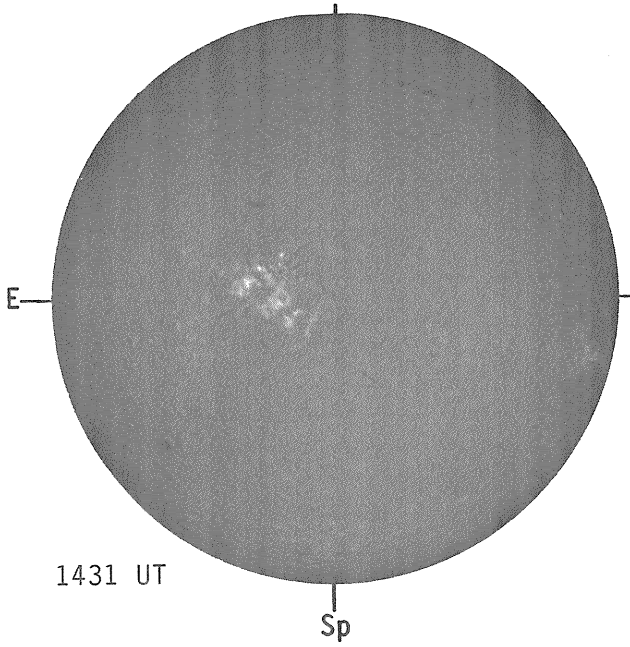
STANFORD MAGNETOGRAM



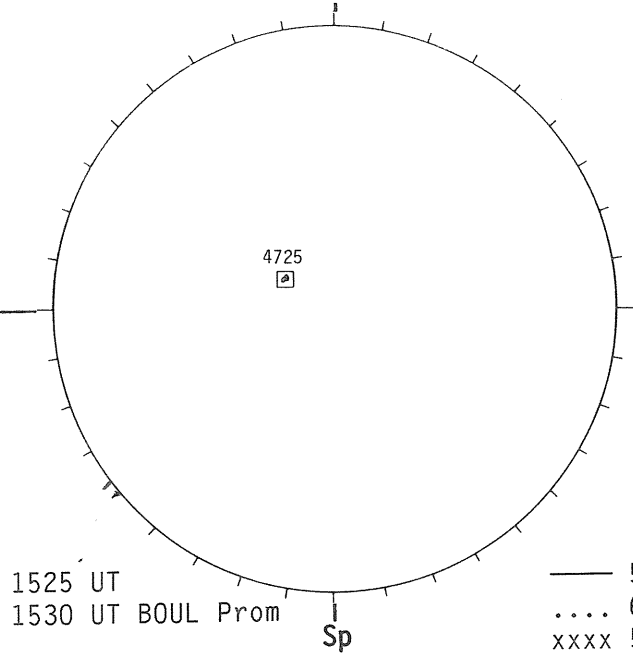
MT. WILSON MAGNETOGRAM



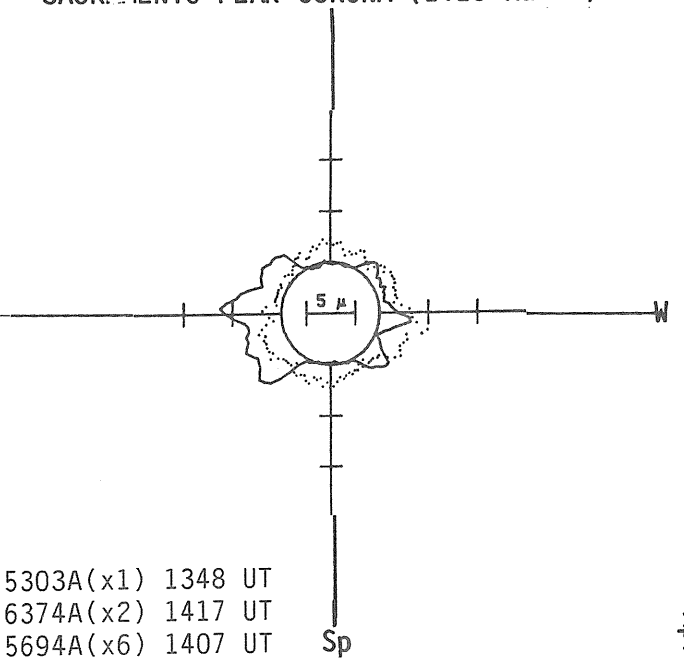
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



SACRAMENTO PEAK CORONA (1.15 Radii)



—— 5303A(x1) 1348 UT
.... 6374A(x2) 1417 UT
xxxx 5694A(x6) 1407 UT
NO 5694A ACTIVITY TODAY

A P R I L 20, 1 9 8 6 (P=-25.61, B_o=-5.16, L_o= 177.25)

Apr 86 46

KITT PEAK MAGNETOGRAM

Np

Bright= +
Dark = -

NO DATA

E-

STANFORD MAGNETOGRAM

Np

Solid = +
Dashed= -

2014 UT

MT. WILSON MAGNETOGRAM

Np

Solid = +
Dotted= -

DeltaY=12.9
DeltaX= 9.6

-W

17.59 -
18.48 UT

SACRAMENTO PEAK H-ALPHA

E-

1438 UT

Sp

BOULDER SUNSPOTS

4731

4729

1342 UT

Sp

SACRAMENTO PEAK CORONA (1.15 Radii)

5 μ

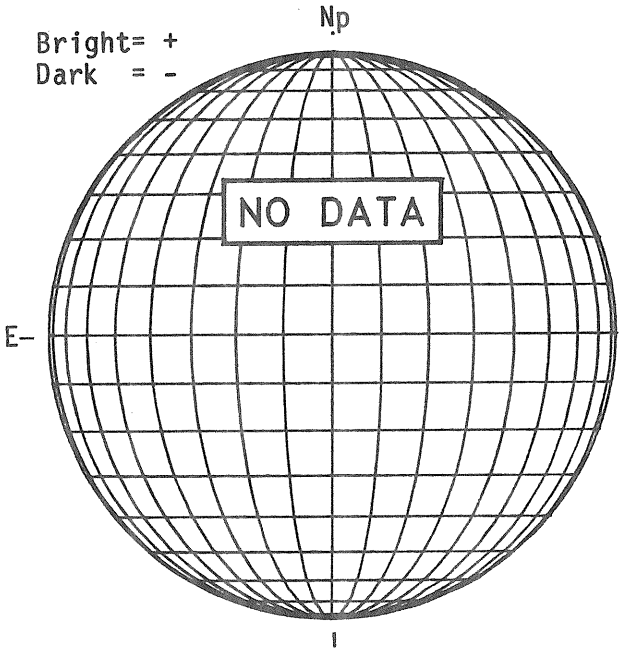
-W

Sp

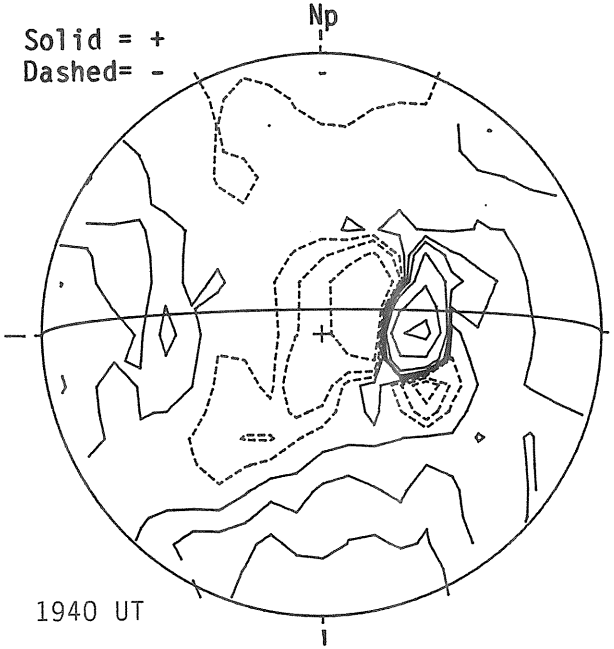
—— 5303A(x1) 1410 UT
.... 6374A(x2) 1446 UT
xxxx 5694A(x6) 1435 UT
NO 5694A ACTIVITY TODAY

A P R I L 21, 1 9 8 6 (P=-25.51, B_o=-5.07, L_o= 164.04)

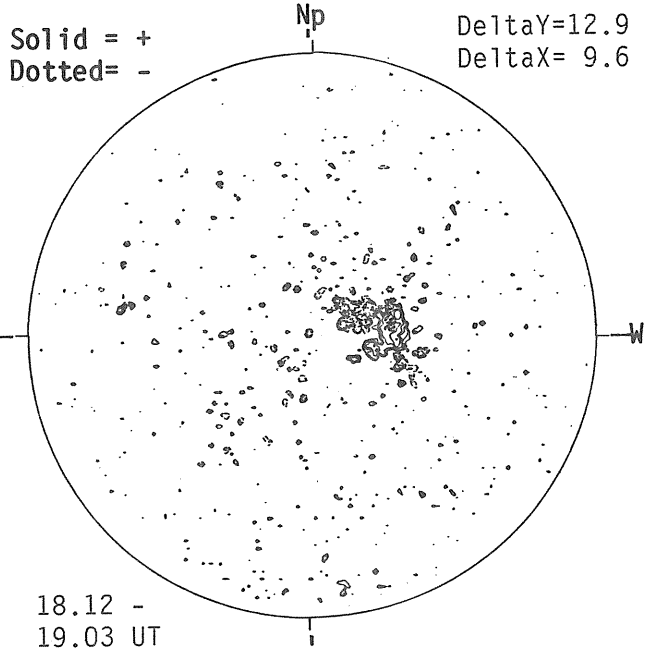
KITT PEAK MAGNETOGRAM



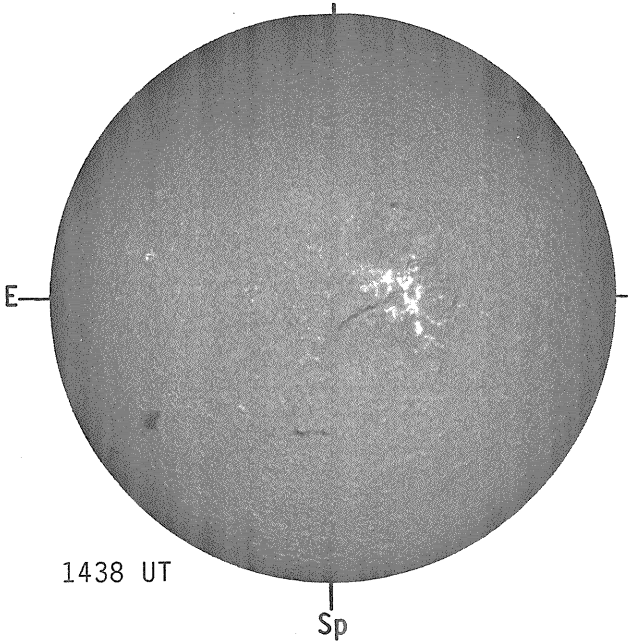
STANFORD MAGNETOGRAM



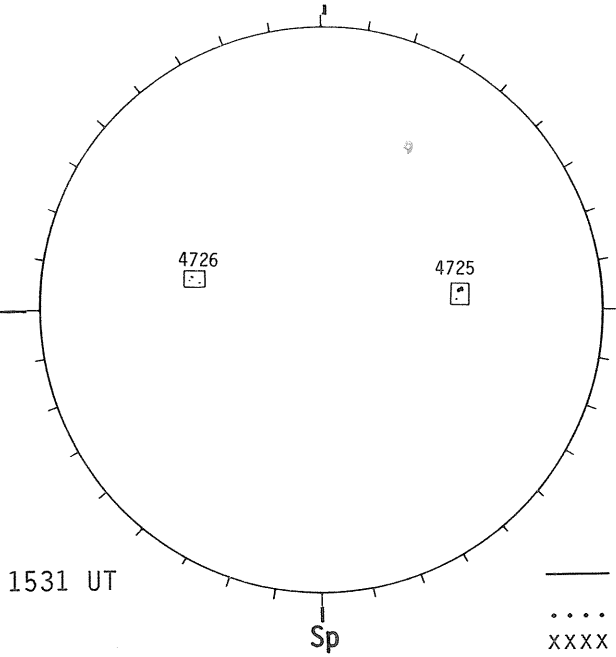
MT. WILSON MAGNETOGRAM



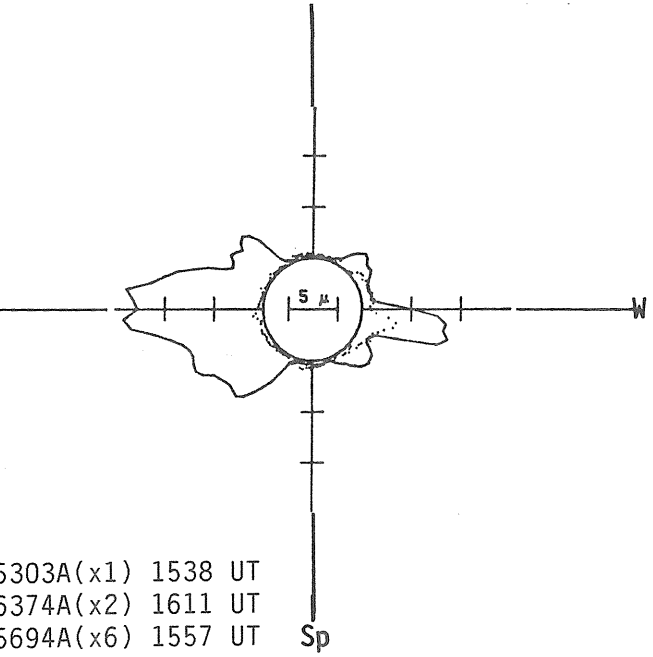
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



SACRAMENTO PEAK CORONA (1.15 Radii)



—— 5303A(x1) 1538 UT
.... 6374A(x2) 1611 UT
xxxx 5694A(x6) 1557 UT
NO 5694A ACTIVITY TODAY

47
Apr 86

A P R I L 22, 1 9 8 6 (P=-25.40, B_o=-4.99, L_o= 150.83)

Apr 86 48

KITT PEAK MAGNETOGRAM

Np

Bright= +
Dark = -

NO DATA

E-

STANFORD MAGNETOGRAM

Np

Solid = +
Dashed= -

2213 UT

MT. WILSON MAGNETOGRAM

Np

Solid = +
Dotted= -

DeltaY=12.9
DeltaX= 9.6

-W

16.87 -
17.76 UT

SACRAMENTO PEAK H-ALPHA

E-

1507 UT

Sp

RAMEY SUNSPOTS

RAMEY 014

4725

1237 UT
1538 UT BOUL Prom

Sp

SACRAMENTO PEAK CORONA (1.15 Radii)

5 μ

-W

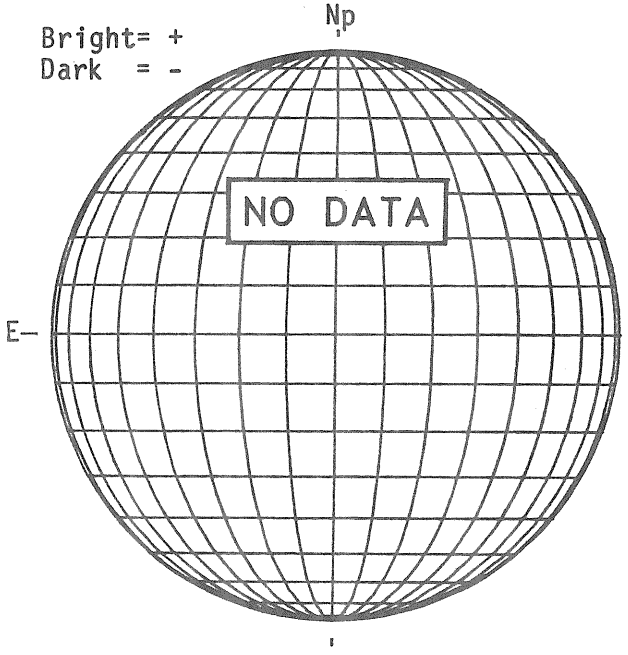
—— 5303A(x1) 1346 UT
.... 6374A(x2) 1416 UT
xxxx 5694A(x6) 1402 UT
NO 5694A ACTIVITY TODAY

Sp

A P R I L 23, 1 9 8 6 (P=-25.29, B_o=-4.90, L_o= 137.62)

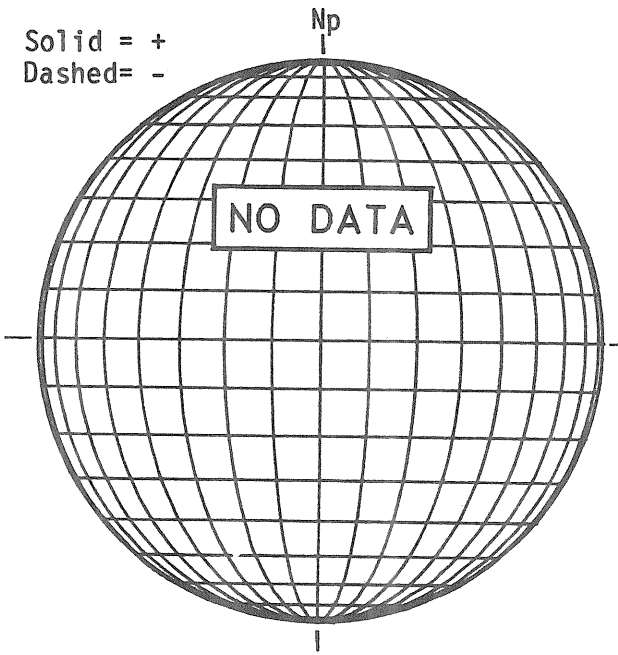
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



STANFORD MAGNETOGRAM

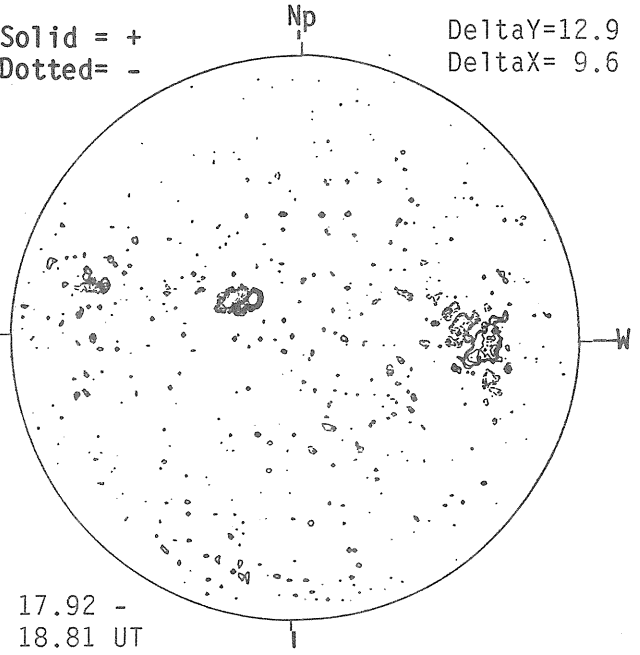
Solid = +
Dashed= -



MT. WILSON MAGNETOGRAM

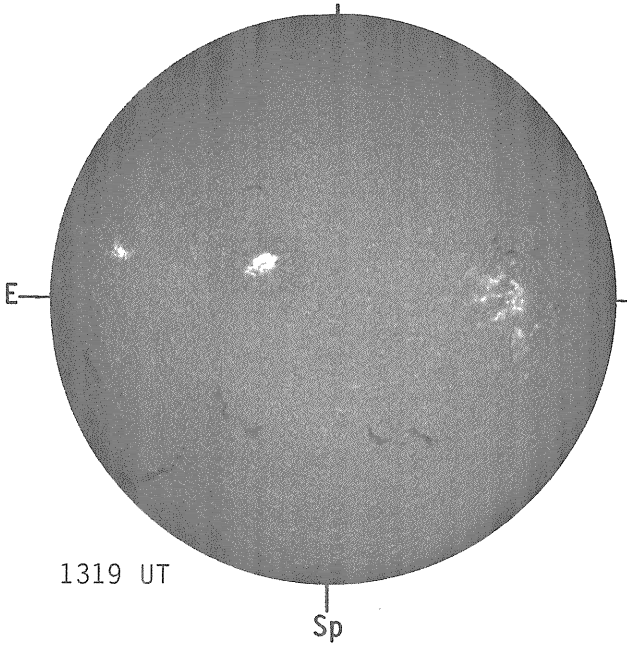
Solid = +
Dotted= -

DeltaY=12.9
DeltaX= 9.6



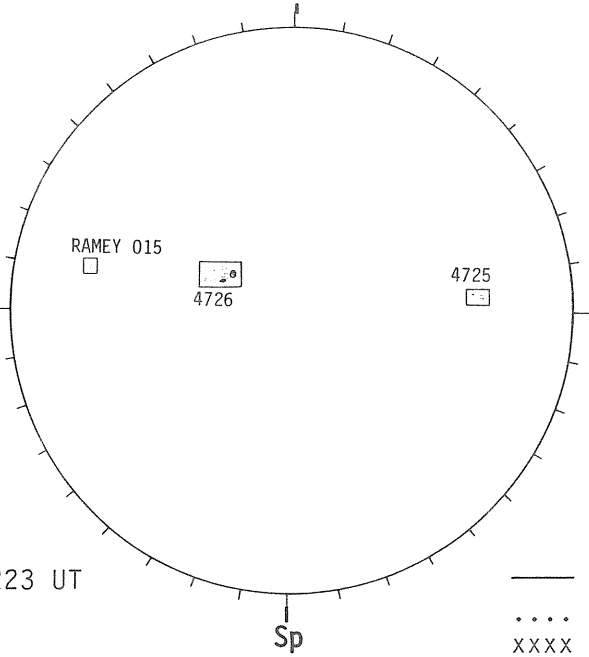
17.92 -
18.81 UT

SACRAMENTO PEAK H-ALPHA



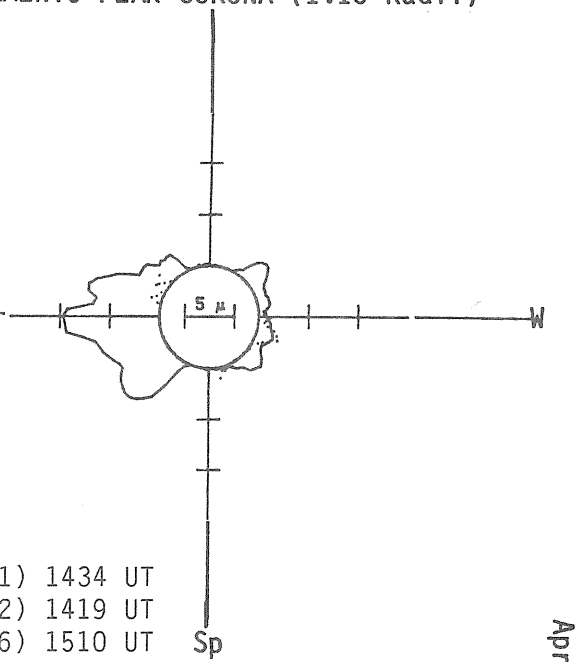
1319 UT

RAMEY SUNSPOTS



1223 UT

SACRAMENTO PEAK CORONA (1.15 Radii)



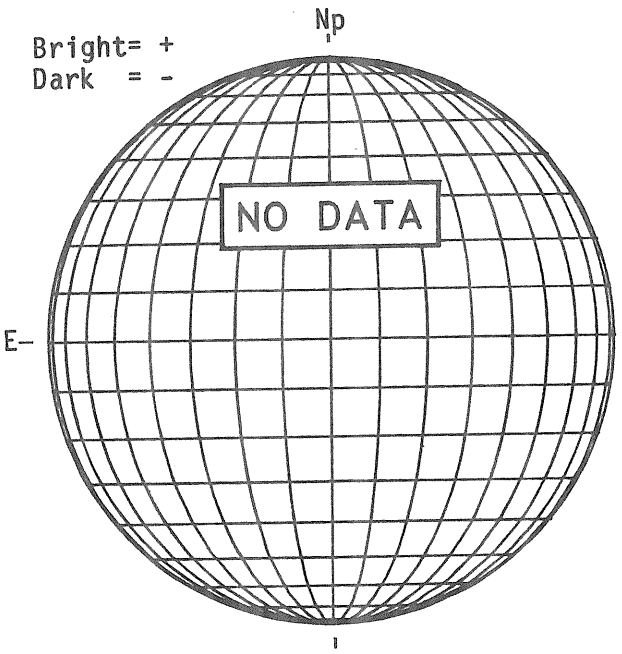
—— 5303A(x1) 1434 UT
.... 6374A(x2) 1419 UT
xxxx 5694A(x6) 1510 UT
NO 5694A ACTIVITY TODAY

A P R I L 24, 1 9 8 6 (P=-25.16, B_0=-4.81, L_0= 124.41)

50
Apr 86

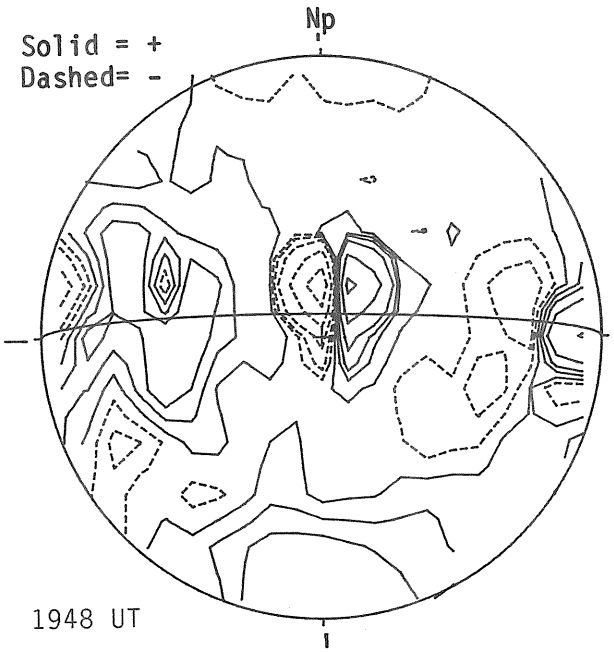
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



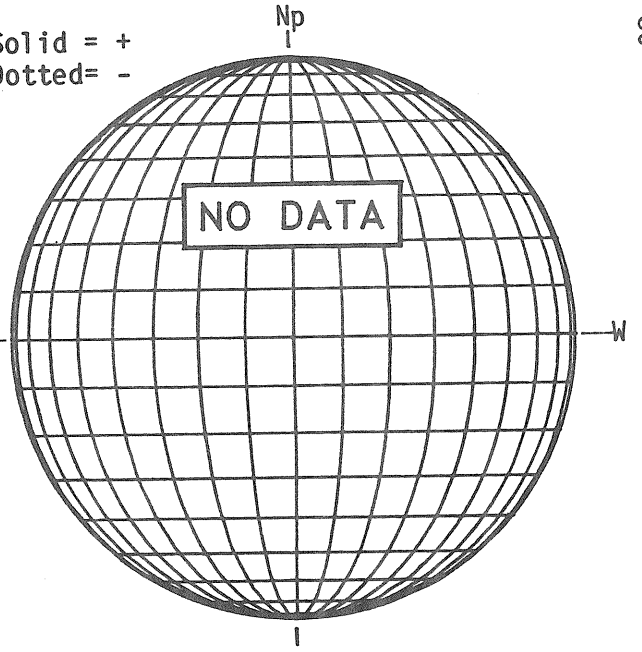
STANFORD MAGNETOGRAM

Solid = +
Dashed= -

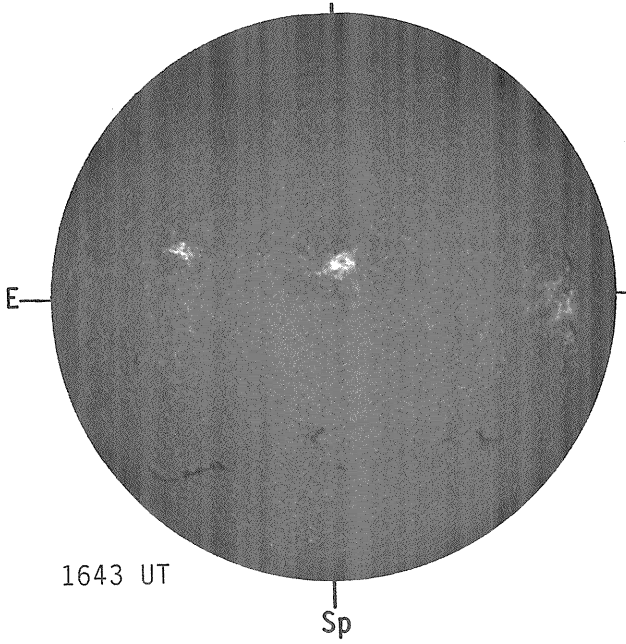


MT. WILSON MAGNETOGRAM

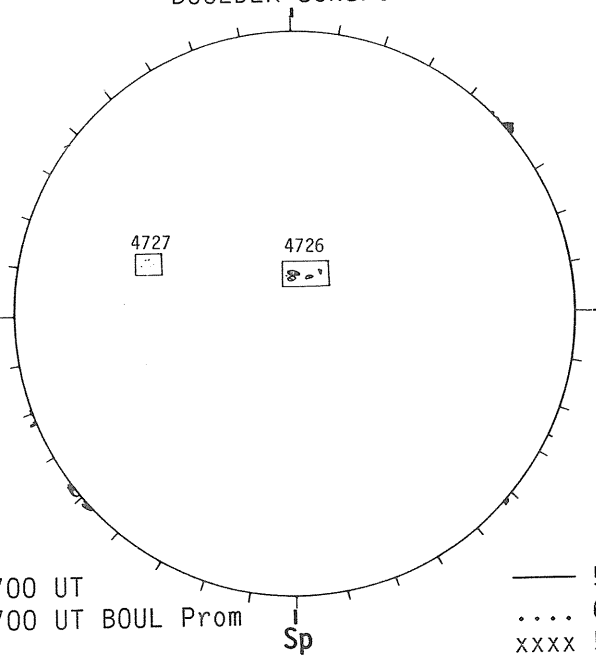
Solid = +
Dotted= -



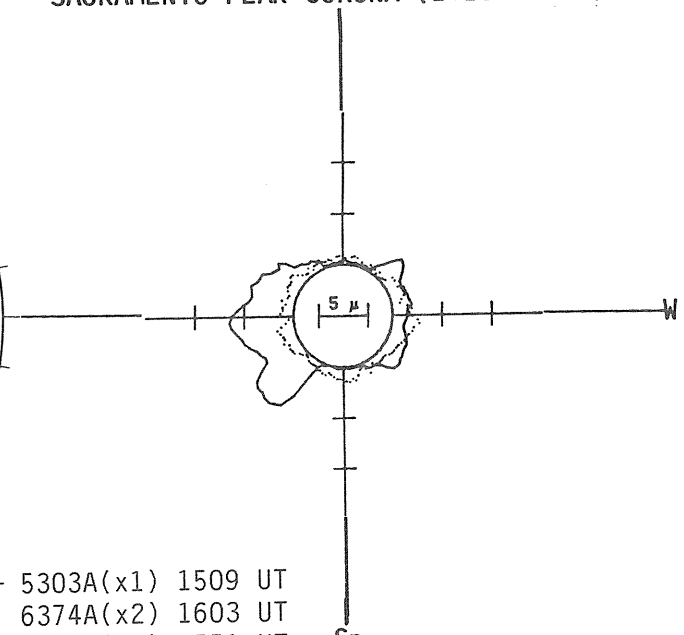
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



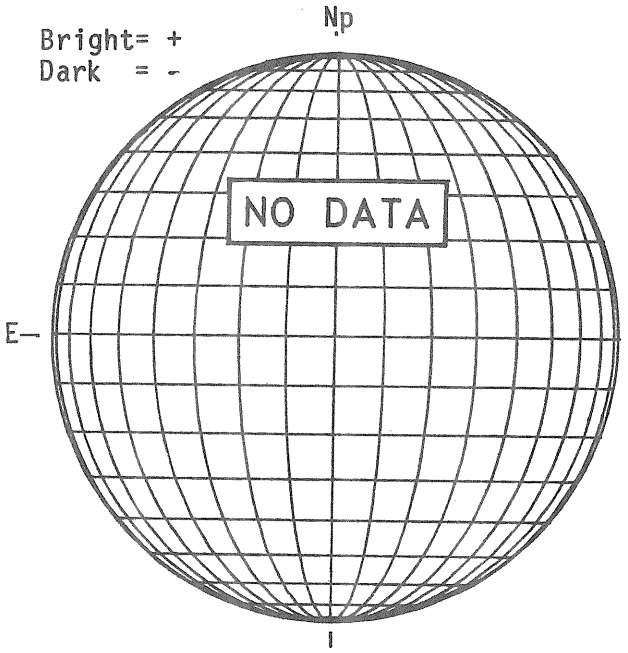
SACRAMENTO PEAK CORONA (1.15 Radii)



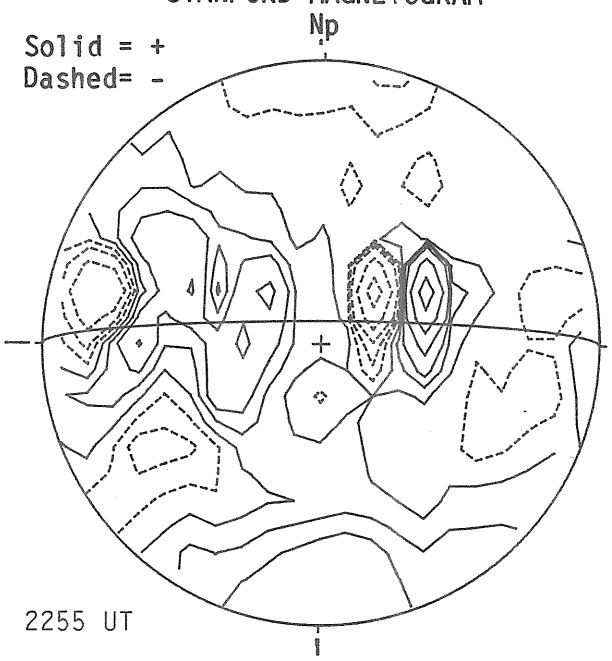
—— 5303A(x1) 1509 UT
.... 6374A(x2) 1603 UT
xxxx 5694A(x6) 1551 UT
NO 5694A ACTIVITY TODAY

A P R I L 25, 1 9 8 6 (P=-25.04, B_o=-4.72, L_o= 111.20)

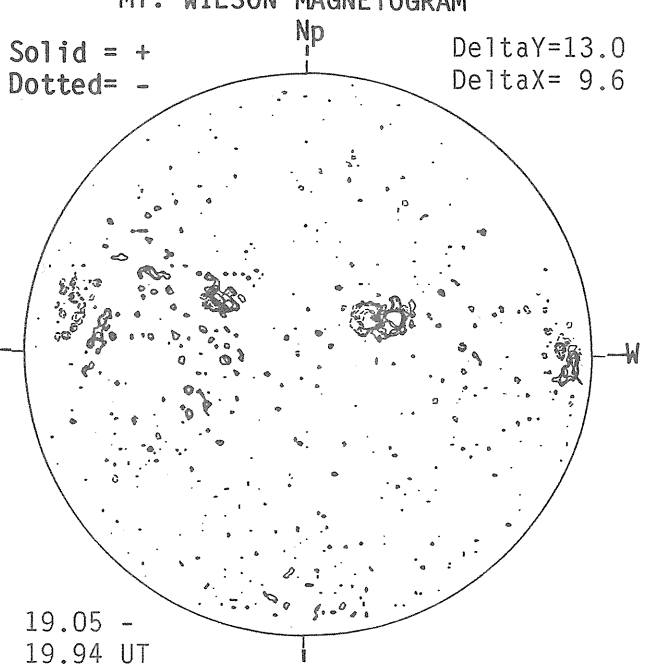
KITT PEAK MAGNETOGRAM



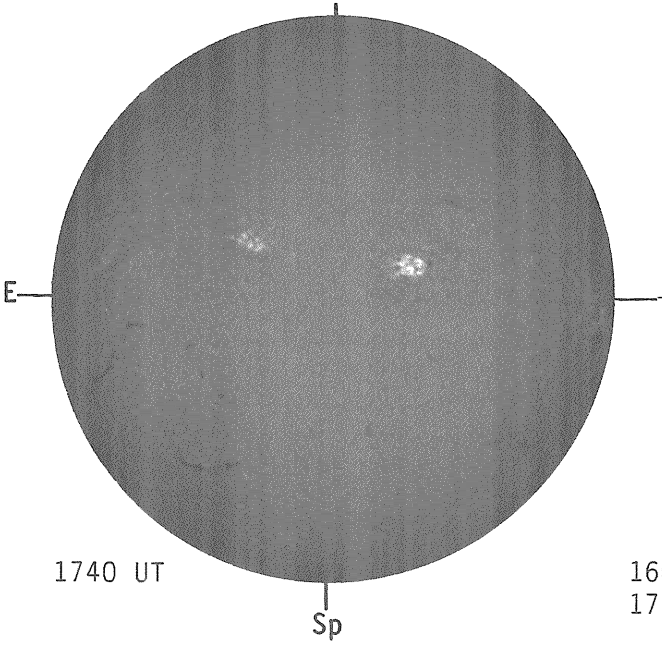
STANFORD MAGNETOGRAM



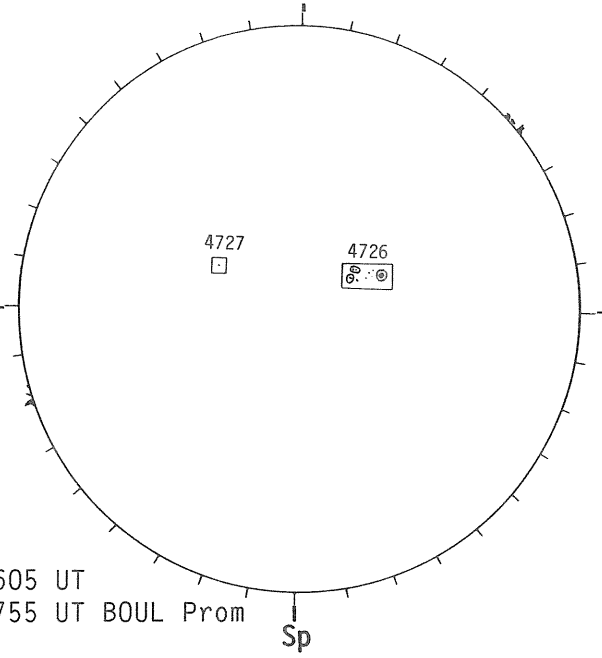
MT. WILSON MAGNETOGRAM



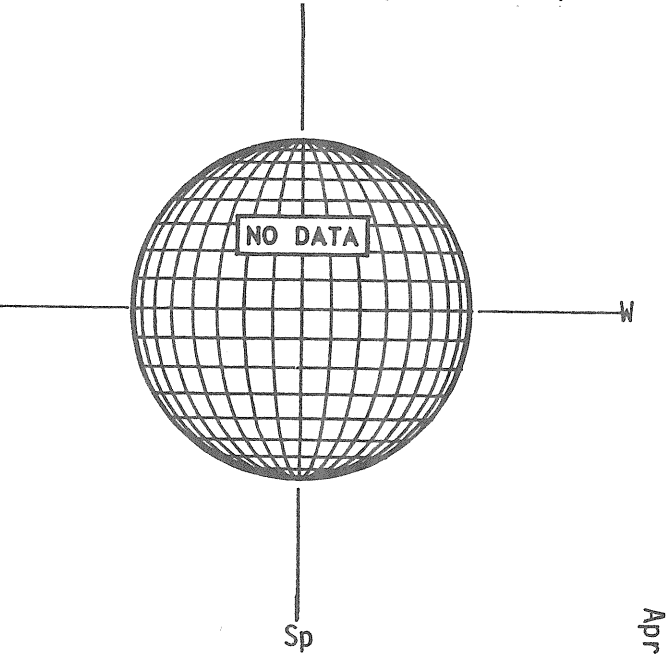
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



SACRAMENTO PEAK CORONA (1.15 Radii)



A P R I L 26, 1 9 8 6 (P=-24.90, B_o=-4.63, L_o= 97.98)

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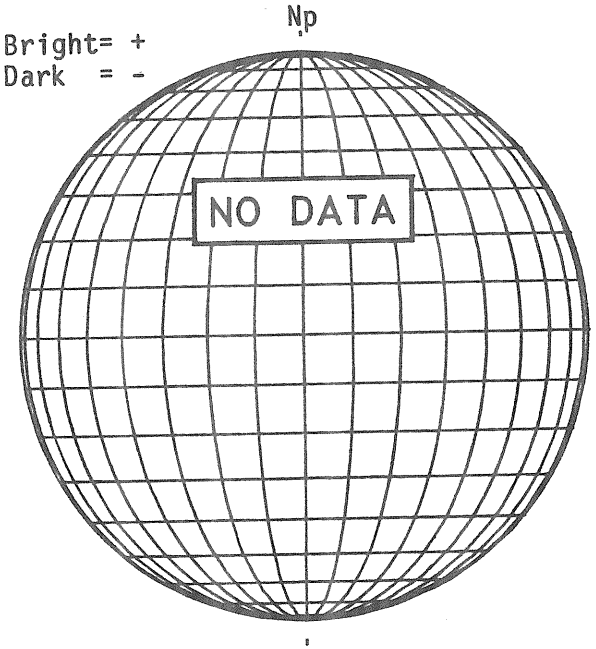
Apr 86

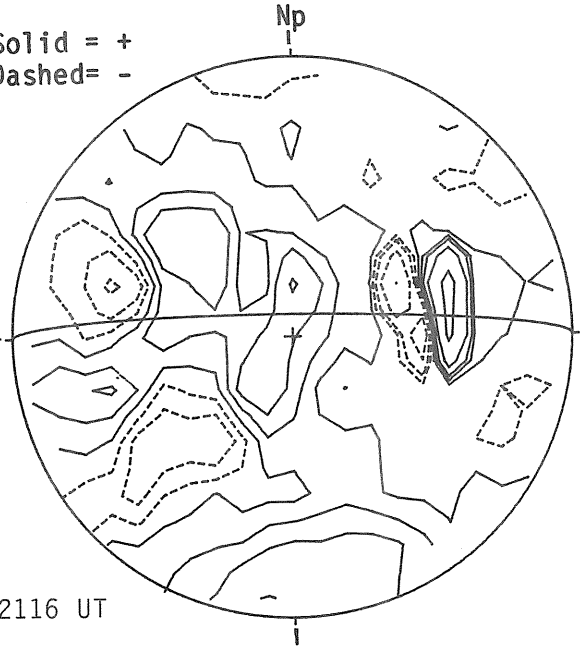
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



STANFORD MAGNETOGRAM

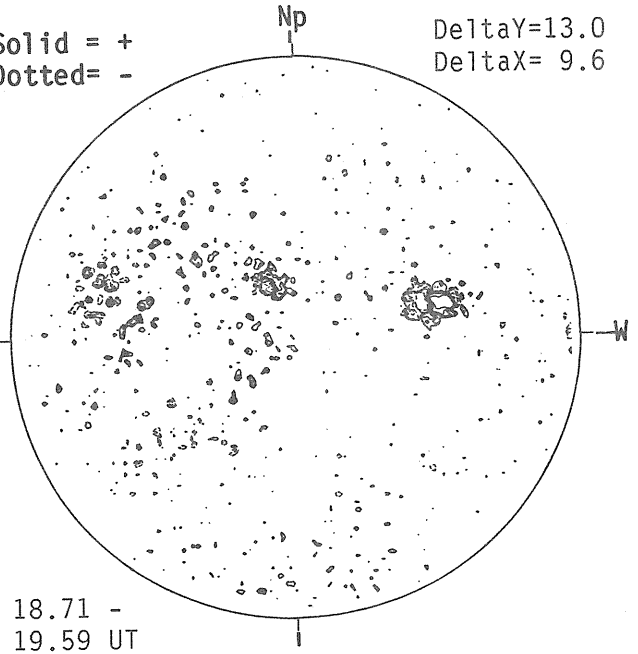
Solid = +
Dashed= -



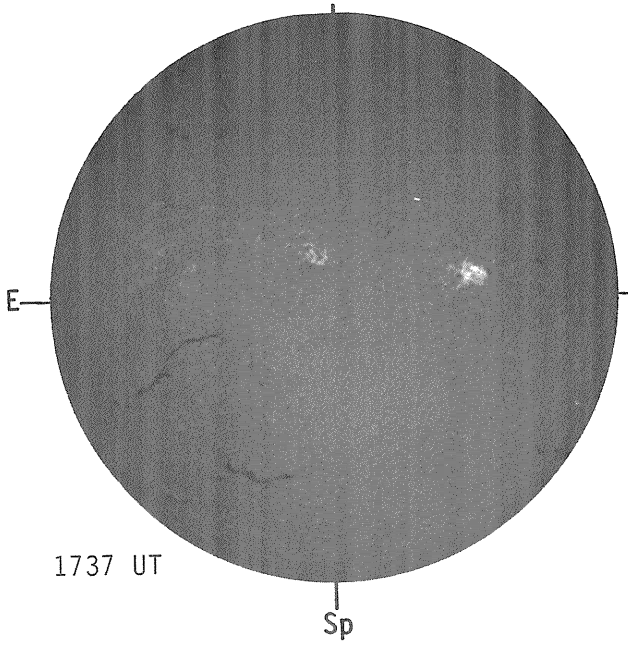
MT. WILSON MAGNETOGRAM

Solid = +
Dotted= -

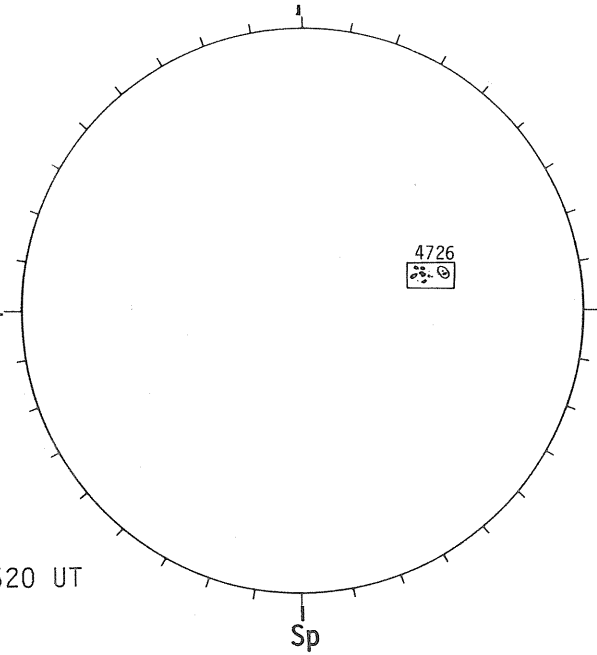
DeltaY=13.0
DeltaX= 9.6



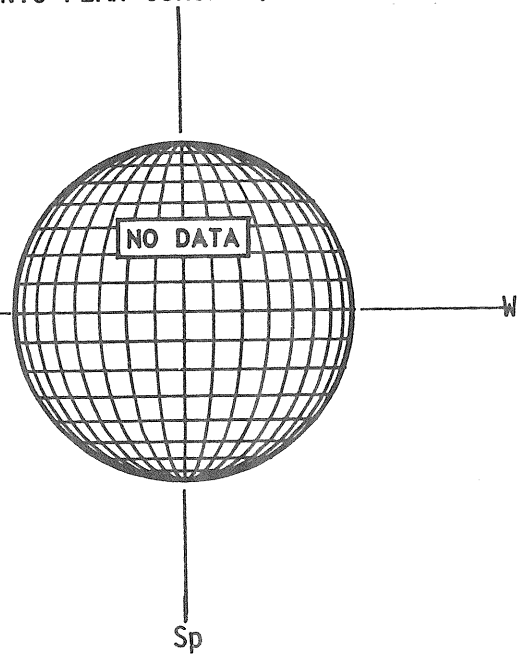
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



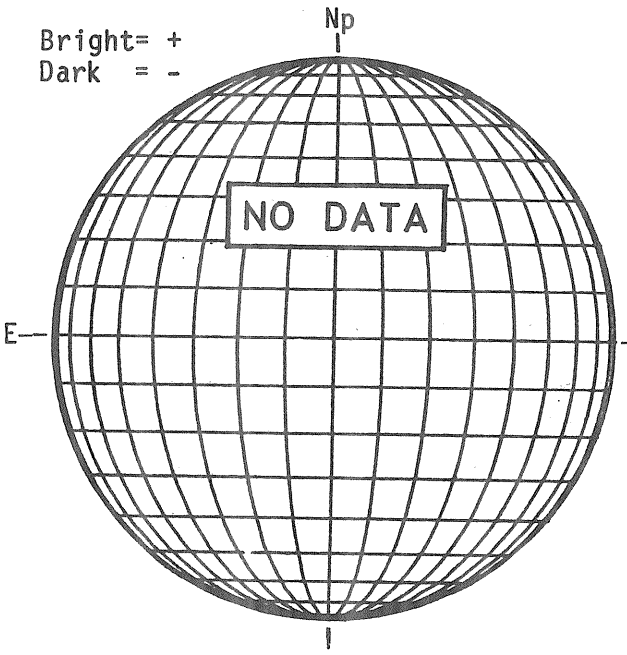
SACRAMENTO PEAK CORONA (1.15 Radii)



A P R I L 27, 1 9 8 6 (P=-24.76, B_0=-4.53, L_0= 84.77)

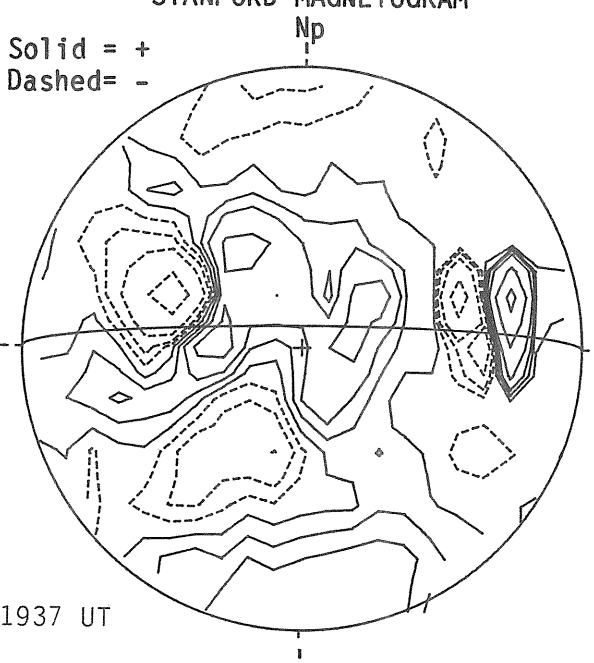
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



STANFORD MAGNETOGRAM

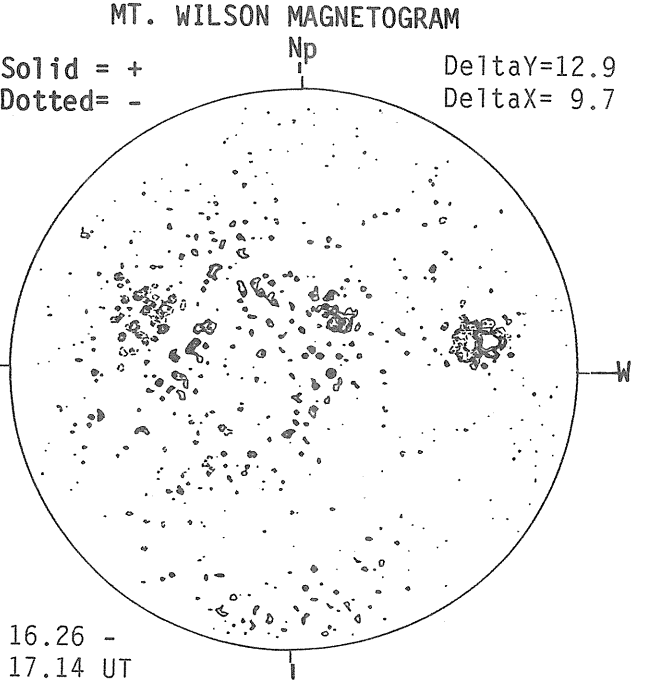
Solid = +
Dashed= -



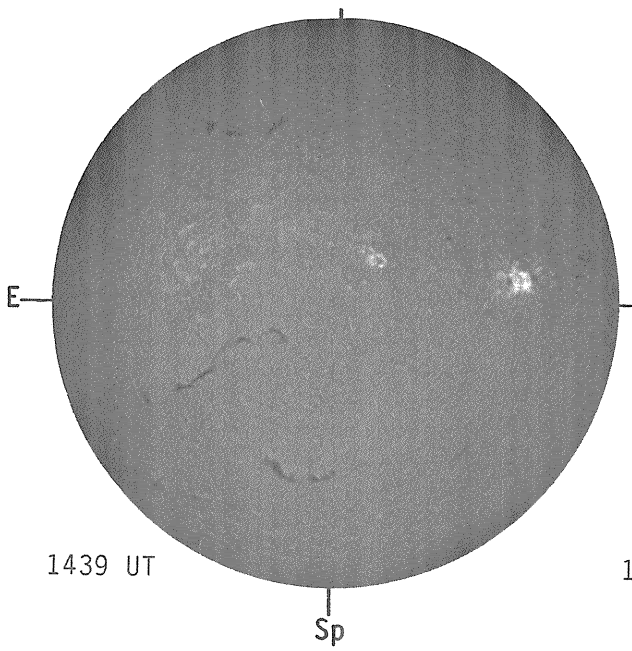
MT. WILSON MAGNETOGRAM

Solid = +
Dotted= -

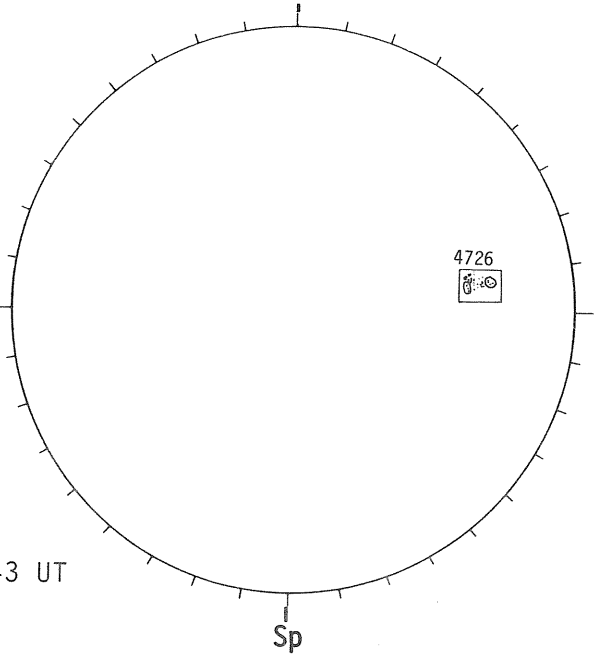
DeltaY=12.9
DeltaX= 9.7



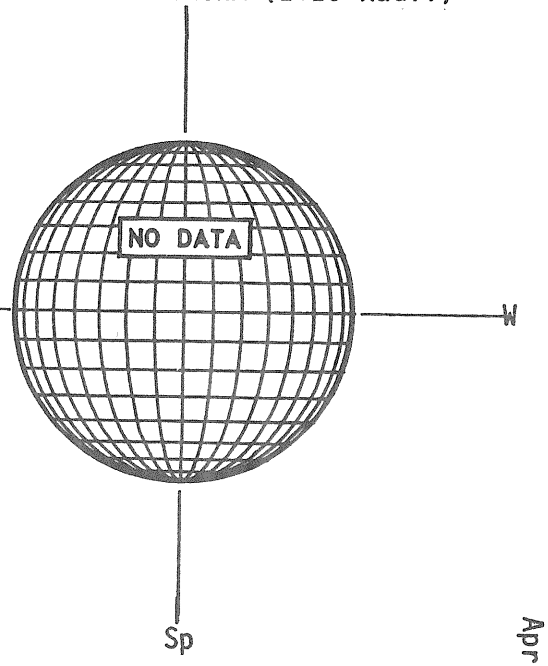
SACRAMENTO PEAK H-ALPHA



RAMEY SUNSPOTS



SACRAMENTO PEAK CORONA (1.15 Radii)



A P R I L 28, 1 9 8 6 (P=-24.61, B_o=-4.44, L_o= 71.56)

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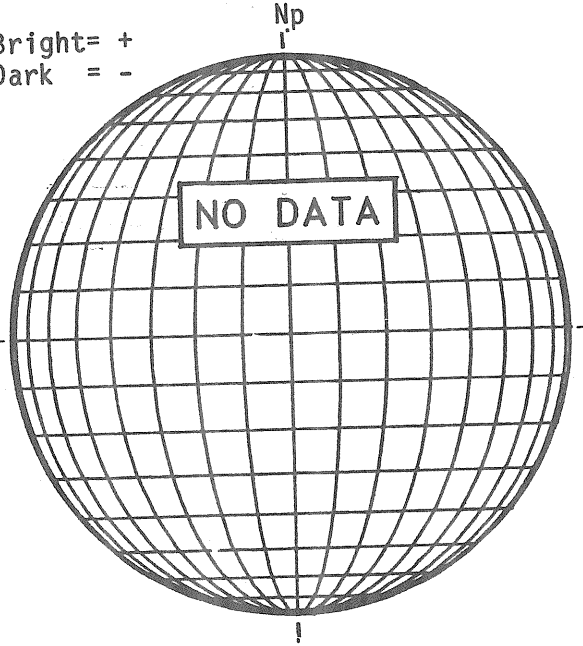
Apr 86

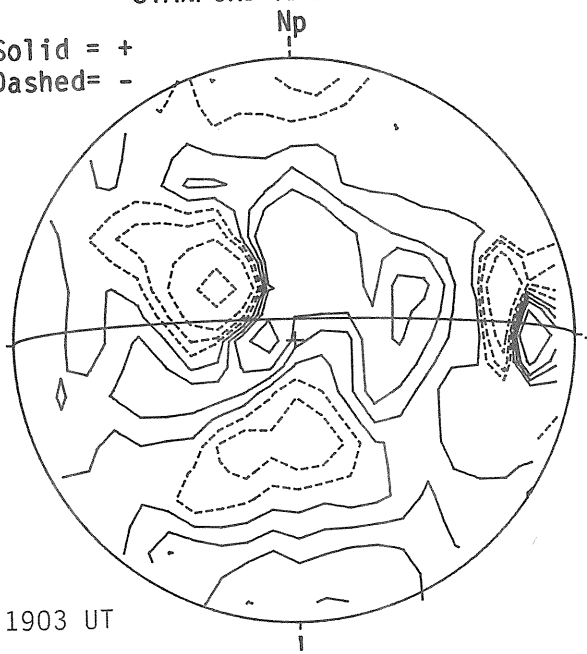
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



STANFORD MAGNETOGRAM

Solid = +
Dashed= -

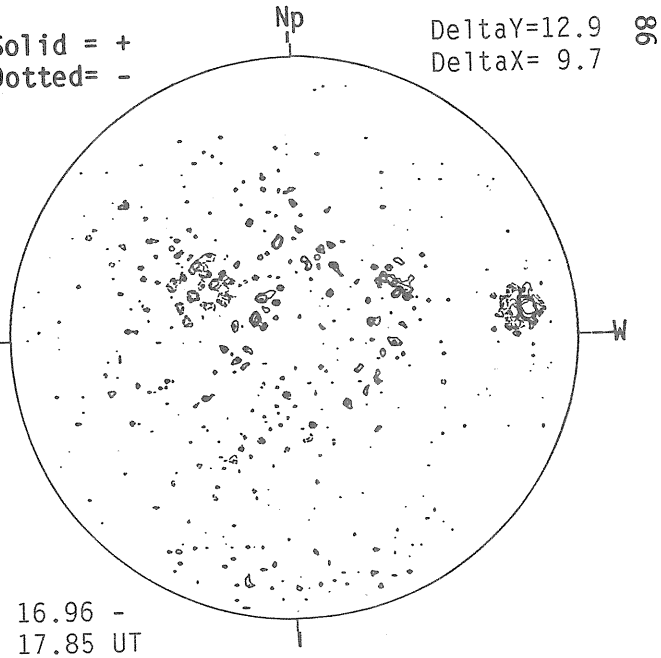


1903 UT

MT. WILSON MAGNETOGRAM

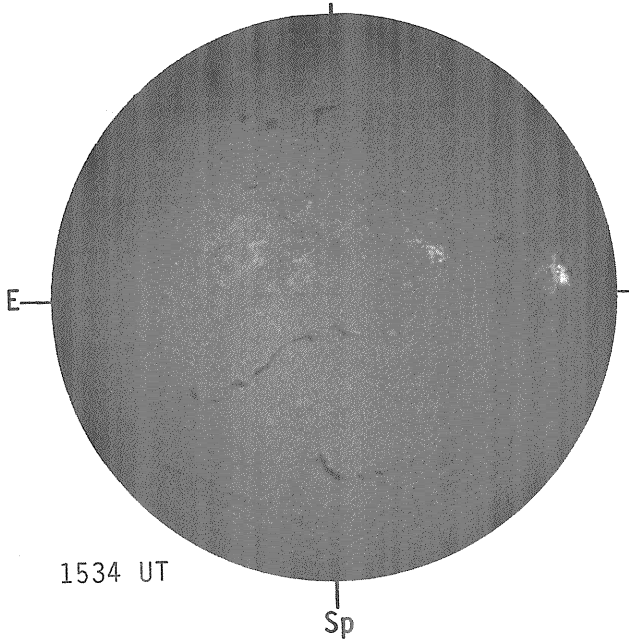
Solid = +
Dotted= -

DeltaY=12.9
DeltaX= 9.7



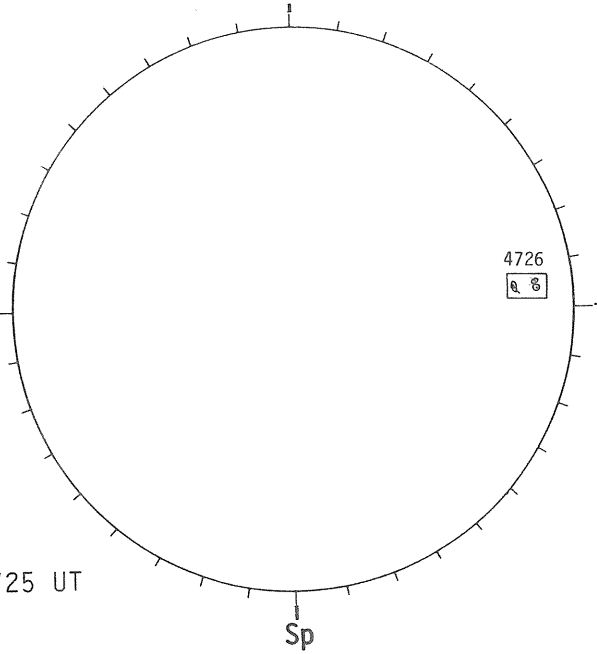
16.96 -
17.85 UT

SACRAMENTO PEAK H-ALPHA



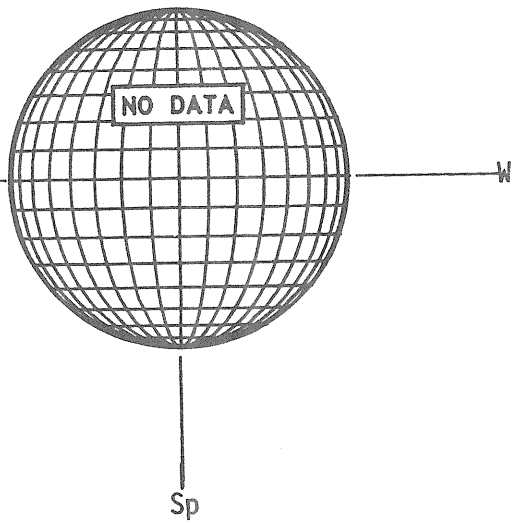
1534 UT

BOULDER SUNSPOTS



1725 UT

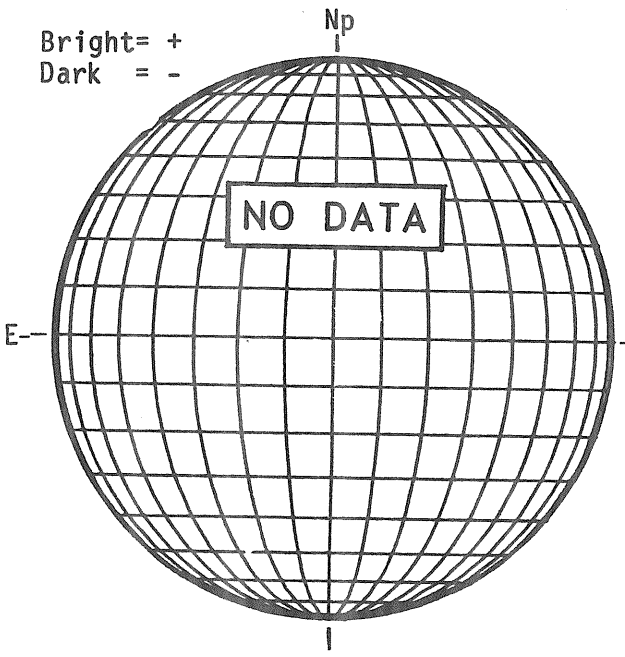
SACRAMENTO PEAK CORONA (1.15 Radii)



A P R I L 29, 1 9 8 6 (P=-24.45, B_0=-4.34, L_0= 58.34)

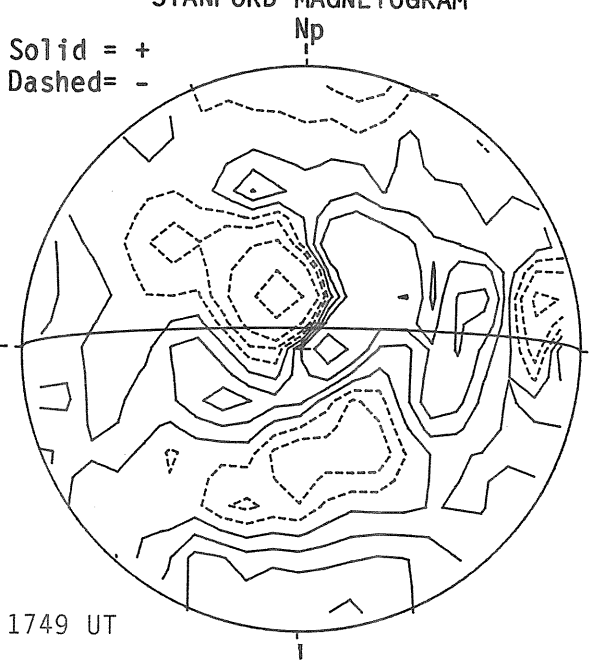
KITT PEAK MAGNETOGRAM

Bright= +
Dark = -



STANFORD MAGNETOGRAM

Solid = +
Dashed= -

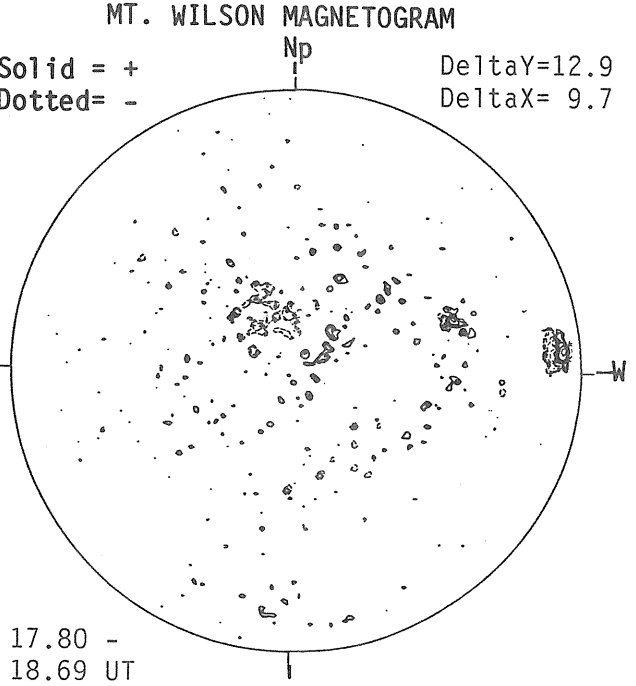


1749 UT

MT. WILSON MAGNETOGRAM

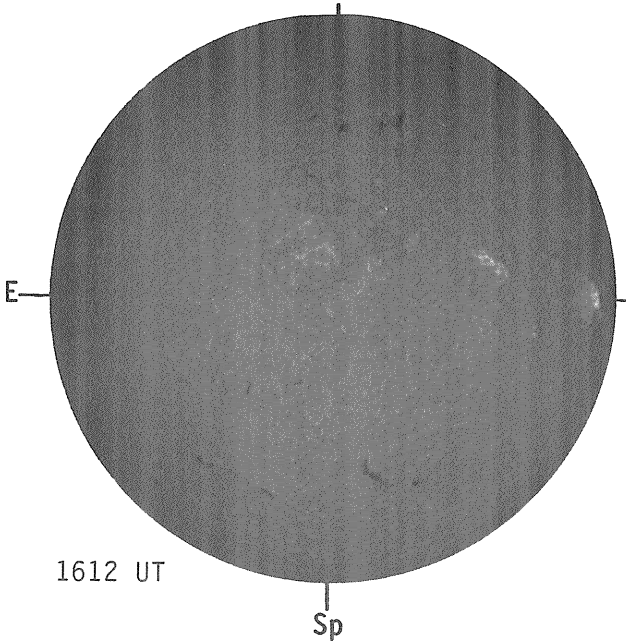
Solid = +
Dotted= -

DeltaY=12.9
DeltaX= 9.7



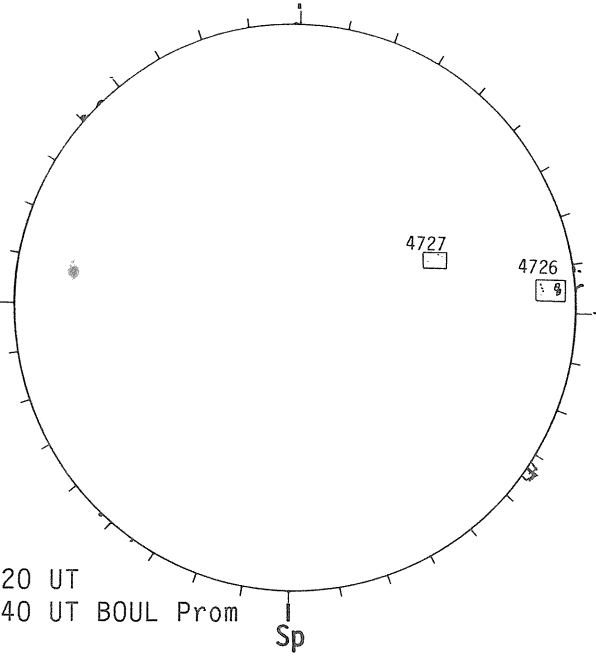
17.80 -
18.69 UT

SACRAMENTO PEAK H-ALPHA



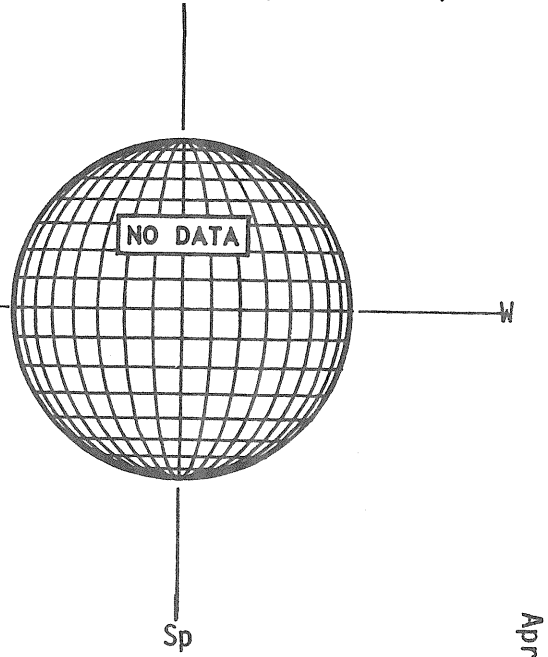
1612 UT

BOULDER SUNSPOTS



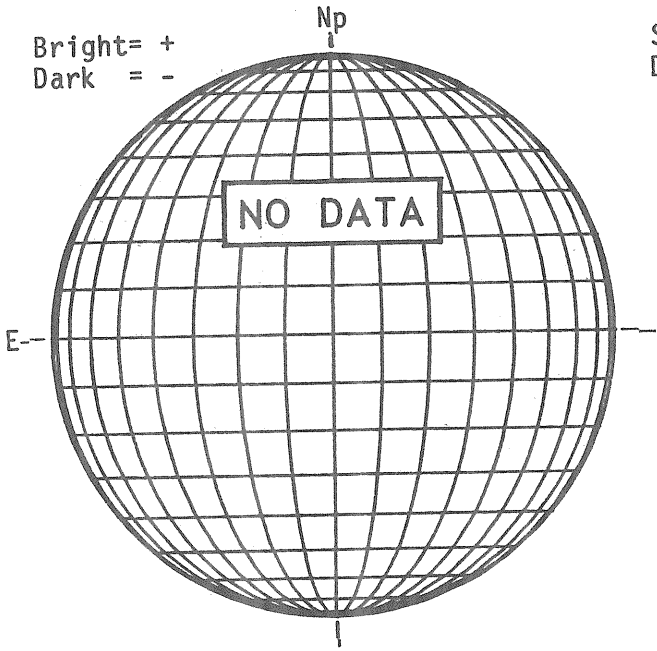
1320 UT
1540 UT BOUL Prom

SACRAMENTO PEAK CORONA (1.15 Radii)

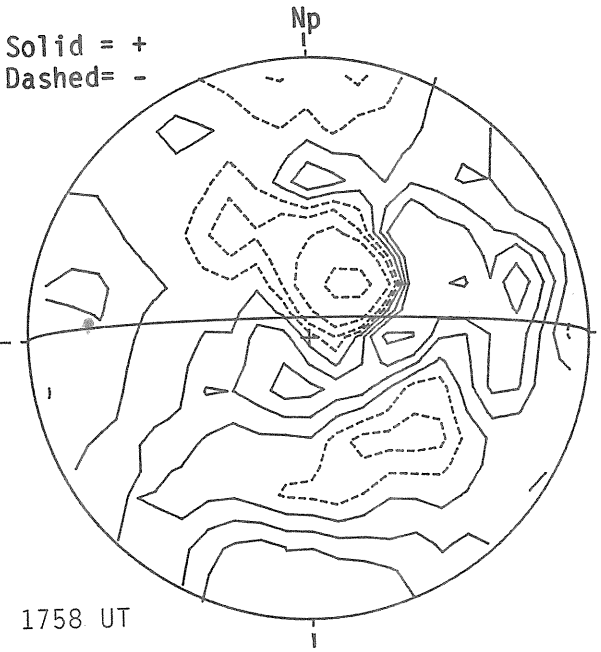


A P R I L 30, 1 9 8 6 (P=-24.29, B_0=-4.25, L_0= 45.13)

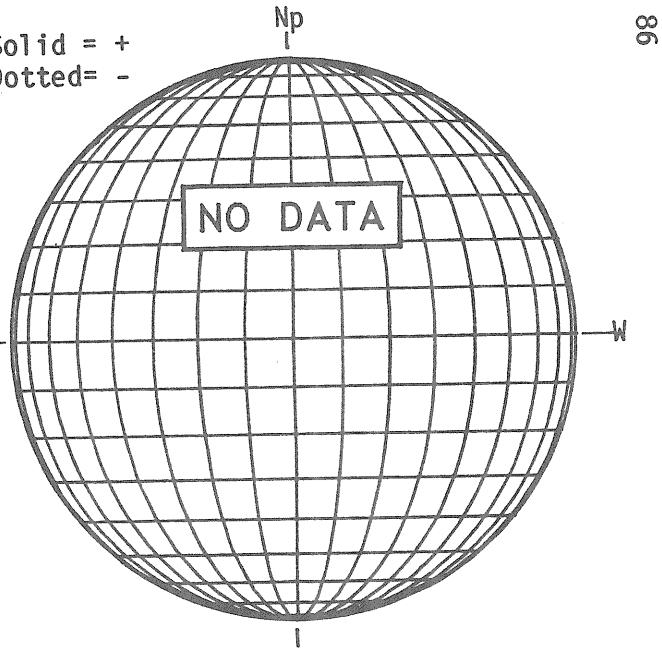
KITT PEAK MAGNETOGRAM



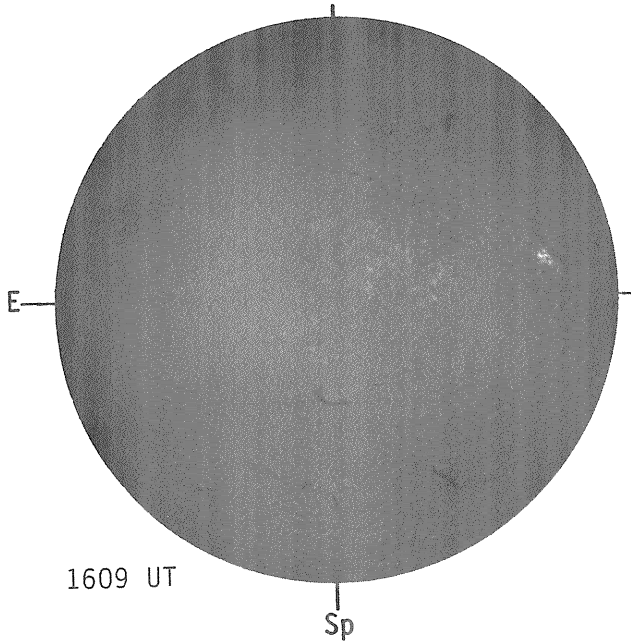
STANFORD MAGNETOGRAM



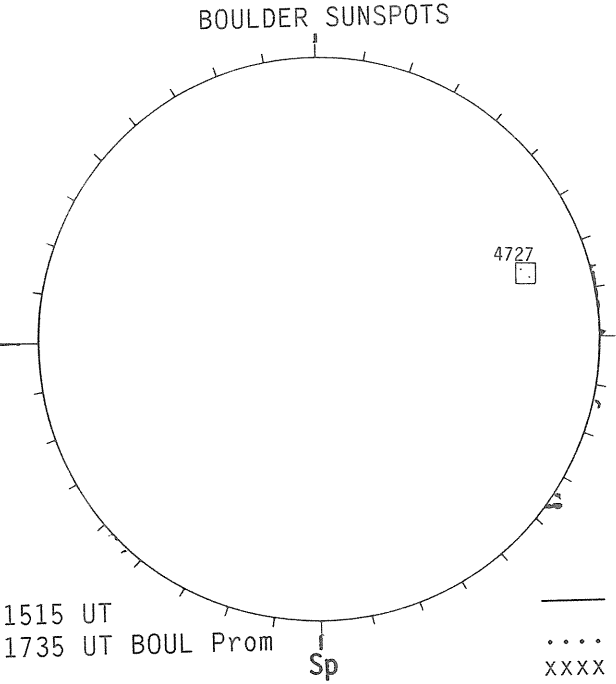
MT. WILSON MAGNETOGRAM



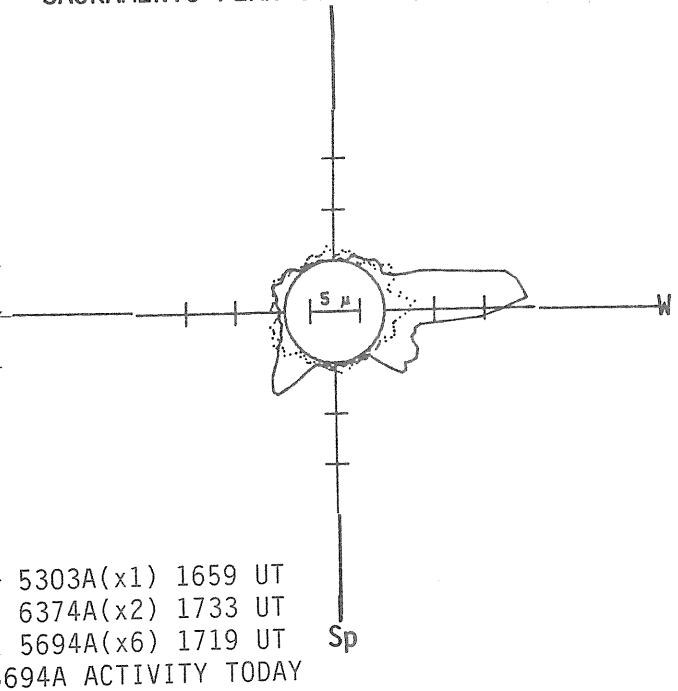
SACRAMENTO PEAK H-ALPHA



BOULDER SUNSPOTS



SACRAMENTO PEAK CORONA (1.15 Radii)



—— 5303A(x1) 1659 UT
.... 6374A(x2) 1733 UT
xxxx 5694A(x6) 1719 UT
NO 5694A ACTIVITY TODAY

SUNSPOT GROUPS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

APRIL 1986

NOAA/ USAF Group	Mt Wilson Group	Sta	Observation Time Mo	Day	(UT)	Lat	CMD	CMP Mo	Day	Max H	Mag Class	Spot Class	Corrected Area (10-6 Hemi)	Spot Count	Long. Extent (Deg)	Qual
4721		PALE	04	01	1836	S03	E10	04	2.5		B	BXO	20	3	2	3
4721		ATHN	04	02	0700	S01	E03	04	2.5		A	AXX	10	1		4
4721	24301	MWIL	04	02	1545	S02	W02	04	2.5	3	(AF)					
4721		BOUL	04	02	1706	S03	W03	04	2.5		A	AXX		1		2
4721		PALE	04	02	1825	S02	W04	04	2.5		A	AXX		1		3
4721		HOLL	04	02	1908	S02	W04	04	2.5		A	AXX	10	1		2
4721		LEAR	04	03	0006	S02	W07	04	2.5		A	AXX	10	1	1	2
4721		ATHN	04	03	0620	S02	W10	04	2.5			AXX	10	1	1	3
4722		BOUL	04	07	1817	S09	E01	04	7.8		A	AXX	10	1		3
4722		LEAR	04	08	0049	S08	W01	04	8.0		A	AXX	10	1	1	3
4723		LEAR	04	10	0322	S07	E57	04	14.4		A	AXX	10	1	1	3
4723		ATHN	04	10	0450	S12	E55	04	14.3			AXX	10	1	1	3
4723		HOLL	04	10	1512	S12	E50	04	14.4		A	AXX	10	1		3
4723		BOUL	04	10	1540	S11	E47	04	14.2		A	AXX		1	1	0
4723	24302	MWIL	04	10	2015	S12	E48	04	14.5	3	(B)					
4723		LEAR	04	11	0013	S07	E45	04	14.4		A	AXX	10	1	1	3
4723		LEAR	04	11	0306	S07	E46	04	14.6		B	BXO	20	4	9	3
4723		RAMY	04	11	1329	S11	E41	04	14.6		A	AXX	30	4	2	3
4723		BOUL	04	11	1537	S12	E36	04	14.4		A	AXX	20	1	1	2
4723		HOLL	04	11	1801	S11	E38	04	14.6		A	AXX	20	6	2	3
4723		LEAR	04	12	0030	S07	E35	04	14.6		B	CRI	20	9	3	3
4723		ATHN	04	12	0930	S13	E27	04	14.4			CRO	40	4	2	2
4723		RAMY	04	12	1350	S12	E29	04	14.8		A	AXX	10	5	2	3
4723		HOLL	04	12	1612	S12	E27	04	14.7		A	AXX	20	8	2	2
4723		BOUL	04	12	1815	S11	E24	04	14.6		B	BXO	20	4	1	2
4723		PALE	04	12	2001	S11	E23	04	14.6		A	AXX	10	4	2	2
4723		LEAR	04	13	0202	S10	E22	04	14.7		B	CRO	20	6	3	2
4723		ATHN	04	13	0836	S13	E15	04	14.5			CRO	20	2	2	1
4723		RAMY	04	13	1343	S13	E13	04	14.6		B	CAO	20	4	3	3
4723	24302	MWIL	04	13	1515	S12	E14	04	14.7	3	(BF)					
4723		HOLL	04	13	1718	S12	E12	04	14.6		B	CRO	10	3	3	3
4723		PALE	04	13	2118	S11	E11	04	14.7		A	AXX		1		1
4723		LEAR	04	14	0011	S09	E07	04	14.5		B	BXO	20	3	3	2
4723		ATHN	04	14	0730	S12	E04	04	14.6			BXO	20	3	2	2
4723		RAMY	04	14	1400	S12	W01	04	14.5		B	CAO	40	5	5	3
4723		HOLL	04	14	1455	S12	W01	04	14.5		B	BXO	20	4	3	3
4723	24302	MWIL	04	14	1500	S12	W01	04	14.5	3	(B)					
4723		BOUL	04	14	1545	S02	W02	04	14.5		B	BXO	10	2	1	2
4723		PALE	04	14	1752	S11	W02	04	14.6		A	AXX	10	3	2	3
4723		LEAR	04	15	0130	S14	W05	03	14.7		B	BXO	10	2	1	3
4723		ATHN	04	15	0555	S12	W08	04	14.6			AXX	10	1	1	2
4723		LEAR	04	16	0521	S11	W26	04	14.3		A	AXX	10	1	1	4
4723		RAMY	04	16	1326	S11	W31	04	14.2		A	AXX		1		2
4724		ATHN	04	14	0730	S09	E76	04	20.0			BXO	40	3	3	2
4724		RAMY	04	14	1400	S08	E75	04	20.2		A	HSX	10	1	2	3
4724		HOLL	04	14	1455	S08	E73	04	20.1		A	AXX		1		3
4724	24303	MWIL	04	14	1500	S08	E75	04	20.2	4	(AP)					
4724		BOUL	04	14	1545	S09	E74	04	20.2		A	AXX	10	1	2	2
4724		PALE	04	14	1752	S07	E74	04	20.3		A	HSX	10	1	1	3
4724		ATHN	04	15	0555	S09	E66	04	20.2			BXO	30	2	2	2
4724	24303	MWIL	04	15	1430	S08	E61	04	20.2	4	(AP)					
4724		BOUL	04	15	1530	S09	E52	04	19.5		A	AXX	20	1	1	3
4724		HOLL	04	15	1627	S08	E59	04	20.1		A	AXX		1	1	3
4724		PALE	04	15	2115	S09	E58	04	20.2		A	AXX	10	1	1	1
4724		LEAR	04	16	0005	S07	E55	04	20.1		A	AXX	10	1	1	3
4724		LEAR	04	16	0521	S07	E53	04	20.2		A	AXX	10	1	1	4
4724		RAMY	04	16	1326	S08	E49	04	20.2		A	AXX		1		2
4724		LEAR	04	21	0003	S09	W10	04	20.3		A	AXX	10	1	1	3
4724		ATHN	04	21	0615	S11	W11	04	20.4		A	AXX	10	1		3
4725		LEAR	04	14	0011	S02	E83	04	20.2		B	BXO	10	2	1	2
4725		ATHN	04	14	0730	S01	E81	04	20.4			BXO	30	2	2	2

S U N S P O T G R O U P S
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

APRIL 1986

NOAA/ USAF Group	Mt Wilson Group	Sta	Observation Time Mo	Day	(UT)	Lat	CMD	CMP Mo	Day	Max H	Mag Class	Spot Class	Corrected Area (10-6 Hemi)	Spot Count	Long. Extent (Deg)	Qual
4725		RAMY	04	14	1400	S01	E78	04	20.4		A	HSX	70	1	1	3
4725		HOLL	04	14	1455	N01	E76	04	20.3		A	HHX	140	1	3	3
4725	24304	MWIL	04	14	1500	S00	E78	04	20.5	3	AP					
4725		BOUL	04	14	1545	S01	E76	04	20.3		A	HSX	30	2	4	2
4725		PALE	04	14	1752	N02	E77	04	20.5		A	HKX	30	2	3	3
4725		ATHN	04	15	0555	S02	E67	04	20.3			CSO	60	3	2	2
4725	24304	MWIL	04	15	1430	S00	E65	04	20.5	4	(AP)					
4725		BOUL	04	15	1530	S01	E62	04	20.3		B	HSX	80	3	2	3
4725		HOLL	04	15	1627	N01	E64	04	20.5		B	HKX	70	2	4	3
4725		PALE	04	15	2115	S00	E61	04	20.4		A	HAX	60	1	2	1
4725		LEAR	04	16	0005	N02	E58	04	20.3		A	HSX	90	2	3	3
4725		LEAR	04	16	0521	N02	E56	04	20.4		A	HSX	80	2	2	4
4725		RAMY	04	16	1326	N01	E52	04	20.4		A	HSX	270	2	2	2
4725	24304	MWIL	04	16	1545	S00	E50	04	20.4	5	(AP)					
4725		HOLL	04	16	1551	N01	E50	04	20.4		A	HKX	120	2	3	3
4725		BOUL	04	16	1625	S01	E49	04	20.3		B	HSX	90	2	3	3
4725		PALE	04	16	2044	N02	E47	04	20.4		A	HAX	90	2	2	2
4725		LEAR	04	17	0305	N01	E45	04	20.5		B	CSO	120	4	4	2
4725		ATHN	04	17	0907	N01	E40	04	20.4			HSX	100	2	2	2
4725		RAMY	04	17	1225	N00	E40	04	20.5		B	CSO	120	5	3	3
4725		HOLL	04	17	1514	N00	E38	04	20.5		B	CSO	130	3	3	3
4725		BOUL	04	17	1535	N01	E35	04	20.3		A	HSX	70	2	2	2
4725	24304	MWIL	04	17	1545	S00	E37	04	20.4	5	(AP)					
4725		PALE	04	17	2159	N02	E34	04	20.5		B	CSO	60	4	4	2
4725		LEAR	04	18	0647	N02	E28	04	20.4		A	HSX	90	1	2	2
4725		ATHN	04	18	0750	N01	E28	04	20.4			HSX	100	2	2	3
4725		RAMY	04	18	1228	N02	E25	04	20.4		A	HSX	90	2	2	3
4725	24304	MWIL	04	18	1530	N01	E24	04	20.4	5	(AP)					
4725		HOLL	04	18	1539	N01	E24	04	20.4		A	HSX	90	2	2	4
4725		PALE	04	18	1818	N03	E22	04	20.4		A	HSX	60	2	3	3
4725		LEAR	04	19	0148	N02	E17	04	20.3		A	HSX	100	2	2	3
4725		RAMY	04	19	1353	N01	E12	04	20.5		A	HAX	100	2	2	3
4725		HOLL	04	19	1430	N01	E11	04	20.4		A	HSX	60	2	2	3
4725		BOUL	04	19	1525	N01	E10	04	20.4		B	DSO	50	2	1	3
4725	24304	MWIL	04	19	1545	N01	E11	04	20.5	5	(AP)					
4725		PALE	04	19	1708	N02	E09	04	20.4		A	HSX	60	2	2	3
4725		LEAR	04	20	0020	N01	E05	04	20.4		A	HSX	60	2	2	3
4725		ATHN	04	20	0645	N01	E01	04	20.4			HSX	60	2	2	3
4725		RAMY	04	20	1437	N00	E03	04	20.8		B	CAO	50	5	11	3
4725		HOLL	04	20	1530	N01	E01	04	20.7		B	CAO	60	4	10	4
4725	24304	MWIL	04	20	1530	S00	W02	04	20.5	5	(BP)					
4725		BOUL	04	20	1710	N00	W05	04	20.3		B	DSO	20	2	2	3
4725		PALE	04	20	2056	N00	W06	04	20.4		A	HSX	70	2	2	1
4725		LEAR	04	21	0003	N01	W08	04	20.4		B	CSO	40	4	3	3
4725		ATHN	04	21	0615	N01	W12	04	20.4			CSO	30	3	2	3
4725		RAMY	04	21	1440	S01	W14	04	20.6		B	CAO	80	4	4	2
4725		BOUL	04	21	1555	N00	W18	04	20.3		B	HAX	60	2	2	3
4725		HOLL	04	21	1555	S01	W13	04	20.7		B	CAO	60	6	11	4
4725	24304	MWIL	04	21	1600	N01	W15	04	20.5	5	(B)					
4725		PALE	04	21	2120	S01	W15	04	20.8		B	CSO	50	5	10	2
4725		LEAR	04	22	0015	N00	W17	04	20.7		B	CSO	60	10	10	3
4725		ATHN	04	22	0510	S01	W23	04	20.5			CSO	40	5	3	3
4725		RAMY	04	22	1237	S01	W28	04	20.4		B	CAO	60	4	2	3
4725	24304	MWIL	04	22	1530	S00	W30	04	20.4	5	(AP)					
4725		BOUL	04	22	1531	S01	W30	04	20.4		B	CAO	70	3	3	2
4725		HOLL	04	22	1610	S01	W30	04	20.4		B	CAO	60	4	3	3
4725		PALE	04	22	1755	N00	W32	04	20.4		A	HAX	40	2	1	3
4725		LEAR	04	23	0050	N00	W35	04	20.4		B	DRO	20	6	2	3
4725		ATHN	04	23	0555	S03	W38	04	20.4			CAO	30	2	1	3
4725		HOLL	04	23	1459	S01	W42	04	20.5		B	CSO	30	4	3	4
4725	24304	MWIL	04	23	1545	S00	W44	04	20.4	5	(AP)					
4725		PALE	04	23	1745	S01	W46	04	20.3		A	AXX	10	3	1	3
4725		LEAR	04	24	0029	N00	W50	04	20.3		A	AXX	10	2	1	3
4725		RAMY	04	24	1247	S01	W58	04	20.2		A	AXX		2	1	4
4725		HOLL	04	24	1535	S01	W57	04	20.4		A	AXX		1		4

S U N S P O T G R O U P S
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NOAA/ USAF Group	Mt Wilson Group	Sta	Observation Mo	Day	Time (UT)	Lat	CMD	CMP Mo	Day	Max H	Mag Class	Spot Class	Corrected Area (10-6 Hemi)	Spot Count	Long. Extent (Deg)	Qual
	24305	MWIL	04	20	1530	S05	W02	04	20.5	4	(AP)					
4720A		BOUL	04	20	1710	S02	E04	04	21.0		A	AXX	10	1	1	3
4720A		PALE	04	20	2056	S02	E04	04	21.2		A	AXX	10	1	1	1
4720A		LEAR	04	21	0003	S03	W00	04	21.0		B	BXO	10	2	4	3
4720A		ATHN	04	21	0615	S02	W02	04	21.1			BXO	10	2	1	3
4720A		BOUL	04	21	1555	S02	W09	04	21.0		A	AXX	10	1	1	3
4720A		RAMY	04	23	1223	N00	W32	04	21.1		B	BXO	80	4	3	4
4720A		ATHN	04	24	0850	S00	W42	04	21.2			AXX	20	1		1
4726		HOLL	04	21	1555	N02	E42	04	24.8		A	AXX	10	2	3	4
4726	24306	MWIL	04	21	1600	N02	E42	04	24.8	4	(B)					
4726		PALE	04	21	2120	N04	E38	04	24.7		A	AXX	10	2	2	2
4726		RAMY	04	22	1237	N02	E30	04	24.8		B	BXO	10	4	1	3
4726	24306	MWIL	04	22	1530	N02	E28	04	24.7	4	(B)					
4726		BOUL	04	22	1531	N02	E26	04	24.6		B	BXO	20	3	3	2
4726		HOLL	04	22	1610	N02	E27	04	24.7		B	BXO	20	3	4	3
4726		PALE	04	22	1755	N03	E26	04	24.7		B	CRO	20	5	3	3
4726		LEAR	04	23	0050	N04	E22	04	24.7		B	DRO	70	22	5	3
4726		ATHN	04	23	0555	N03	E18	04	24.6			DAO	90	15	6	3
4726		RAMY	04	23	1223	N03	E15	04	24.6		B	DAO	200	32	6	4
4726		HOLL	04	23	1459	N03	E13	04	24.6		B	DHI	210	32	8	4
4726	24306	MWIL	04	23	1545	N03	E12	04	24.6	6	(B)					
4726		PALE	04	23	1745	N03	E11	04	24.6		B	DAI	190	34	7	3
4726		LEAR	04	24	0029	N04	E06	04	24.5		B	DHI	170	47	8	3
4726		ATHN	04	24	0850	N03	E04	04	24.7			DKI	250	19	7	1
4726		RAMY	04	24	1247	N03	E01	04	24.6		BD	DKI	480	31	9	4
4726	24306	MWIL	04	24	1530	N03	W02	04	24.5	6	(B)					
4726		HOLL	04	24	1535	N03	W01	04	24.6		B	DKI	460	31	10	4
4726		BOUL	04	24	1700	N04	W03	04	24.5		B	DKI	250	12	7	1
4726		LEAR	04	25	0050	N03	W06	04	24.6		B	DKI	430	22	9	2
4726		ATHN	04	25	0435	N02	W07	04	24.7			DKI	460	24	9	4
4726		RAMY	04	25	1345	N03	W14	04	24.5		B	DKI	430	35	9	4
4726	24306	MWIL	04	25	1600	N03	W16	04	24.5	6	(B)					
4726		BOUL	04	25	1605	N03	W14	04	24.6		B	DHI	210	8	9	3
4726		HOLL	04	25	1845	N03	W15	04	24.7		B	DKI	420	22	8	3
4726		PALE	04	25	1946	N03	W16	04	24.6		B	DKO	200	32	9	2
4726		LEAR	04	26	0110	N03	W20	04	24.6		B	DKO	340	26	9	2
4726		ATHN	04	26	0650	N03	W22	04	24.6			DKI	340	26	9	3
4726		BOUL	04	26	1520	N03	W27	04	24.6		B	DKC	310	15	8	2
4726	24306	MWIL	04	26	1530	N02	W27	04	24.6	5	(B)					
4726		HOLL	04	26	1550	N03	W27	04	24.6		B	DHI	400	22	8	3
4726		PALE	04	26	1806	N02	W29	04	24.6		B	DKI	420	36	8	3
4726		LEAR	04	27	0008	N03	W34	04	24.5		B	DKI	390	31	9	3
4726		ATHN	04	27	0530	N03	W35	04	24.6			DSI	370	19	9	2
4726	24306	MWIL	04	27	1530	N02	W41	04	24.6	5	(B)					
4726		HOLL	04	27	1558	N04	W41	04	24.6		B	DKI	440	15	10	3
4726		RAMY	04	27	1743	N03	W41	04	24.7		B	DKI	550	21	10	2
4726		PALE	04	27	1957	N03	W43	04	24.6		B	DKI	430	26	9	3
4726		LEAR	04	28	0410	N04	W58	04	23.8		B	EAO	310	28	11	3
4726		ATHN	04	28	0620	N03	W48	04	24.7			DKO	400	13	8	1
4726	24306	MWIL	04	28	1430	N03	W55	04	24.5	5	(B)					
4726		HOLL	04	28	1552	N04	W55	04	24.5		B	DKO	350	10	10	3
4726		RAMY	04	28	1646	N04	W55	04	24.6		B	DKO	220	13	10	3
4726		BOUL	04	28	1725	N02	W55	04	24.6		B	DKO	340	6	10	2
4726		PALE	04	28	2108	N03	W56	04	24.7		B	DKO	250	16	8	2
4726		LEAR	04	29	0117	N04	W60	04	24.6		B	DKO	390	6	9	3
4726		ATHN	04	29	0545	N03	W63	04	24.5			DKO	400	6	10	2
4726		BOUL	04	29	1320	N04	W64	04	24.8		B	CSO	230	6	9	3
4726		RAMY	04	29	1341	N03	W68	04	24.5		B	DKO	140	13	10	3
4726	24306	MWIL	04	29	1430	N03	W67	04	24.6	4	(B)					
4726		HOLL	04	29	1432	N04	W67	04	24.6		B	DKO	290	14	10	4
4726		PALE	04	29	2050	N03	W71	04	24.6		BG	DKO	200	8	9	3
4726		LEAR	04	30	0035	N04	W74	04	24.5		B	DKO	240	7	10	3
4726		RAMY	04	30	1412	N03	W84	04	24.3		B	EAO	60	3	12	3
4726	24306	MWIL	04	30	1430	N03	W80	04	24.6	3	B					
4726		HOLL	04	30	1547	N04	W80	04	24.7		B	DAO	60	7	10	4

SUNSPOT GROUPS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

APRIL 1986

NOAA/ USAF Group	Mt Wilson Group	Sta	Observation Time Mo Day (UT)	Lat CMD	CMP Mo Day	Max H	Mag Class	Spot Class	Corrected Area (10-6 Hemi)	Spot Count	Long. Extent (Deg)	Qual
4727		LEAR	04 23 0050	N07 E56	04 27.2		A	AXX	10	1	1	3
4727		RAMY	04 23 1223	N06 E47	04 27.0		A	AXX	10	2	1	4
4727		HOLL	04 23 1459	N06 E47	04 27.1		B	CRO	30	7	4	4
4727	24307	MWIL	04 23 1545	N06 E45	04 27.0	5	(BF)					
4727		PALE	04 23 1745	N07 E46	04 27.2		B	BXO	20	8	5	3
4727		LEAR	04 24 0029	N07 E42	04 27.2		B	CRO	40	6	5	3
4727		ATHN	04 24 0850	N05 E36	04 27.1			CSO	30	5	5	1
4727		RAMY	04 24 1247	N07 E34	04 27.1		B	DRO	60	11	5	4
4727	24307	MWIL	04 24 1530	N06 E33	04 27.1	4	(B)					
4727		HOLL	04 24 1535	N06 E33	04 27.1		B	DRO	90	11	5	4
4727		BOUL	04 24 1700	N06 E30	04 27.0		B	BXO	20	6	4	1
4727		LEAR	04 25 0050	N07 E27	04 27.1		B	BXO	40	10	4	2
4727		ATHN	04 25 0435	N05 E25	04 27.1			CRO	50	9	5	4
4727		RAMY	04 25 1345	N06 E21	04 27.1		B	DRO	50	10	4	4
4727	24307	MWIL	04 25 1600	N06 E20	04 27.2	4	(BF)					
4727		BOUL	04 25 1605	N04 E17	04 26.9		A	AXX	10	1	1	3
4727		HOLL	04 25 1845	N06 E18	04 27.1		B	DRO	20	5	4	3
4727		PALE	04 25 1946	N07 E17	04 27.1		B	BXO	40	9	4	2
4727		LEAR	04 26 0110	N06 E14	04 27.1		B	BXO	30	5	5	2
4727		ATHN	04 26 0650	N05 E10	04 27.0			BXO	10	2	2	3
4727	24307	MWIL	04 26 1530	N05 E06	04 27.1	3	(AF)					
4727		HOLL	04 26 1550	N06 E06	04 27.1		A	HXX		1		3
4727		PALE	04 26 1806	N05 E04	04 27.1		A	AXX		1		3
4727		LEAR	04 27 0008	N04 E00	04 27.0		B	BXO	10	2	2	3
4727		ATHN	04 27 0530	N04 W03	04 27.0			BXO	10	2	1	2
4727	24307	MWIL	04 27 1530	N05 W07	04 27.1	3	(AP)					
4727		LEAR	04 28 0410	N07 W15	04 27.0		B	BXO	10	2	1	3
4727		RAMY	04 28 1646	N09 W19	04 27.3		A	AXX		1		3
4727		LEAR	04 29 0117	N08 W24	04 27.3		B	BXO	20	4	3	3
4727		ATHN	04 29 0545	N06 W26	04 27.3			BXO	30	4	3	2
4727		BOUL	04 29 1320	N08 W29	04 27.4		B	BXO	10	3	4	3
4727		RAMY	04 29 1341	N08 W32	04 27.2		B	BXO	20	4	3	3
4727	24308	MWIL	04 29 1430	N08 W32	04 27.2	4	(B)					
4727		HOLL	04 29 1432	N07 W33	04 27.1		B	BXO	20	4	4	4
4727		PALE	04 29 2050	N07 W36	04 27.2		B	DRI	40	4	3	3
4727		LEAR	04 30 0035	N07 W37	04 27.3		B	BXO	30	6	4	3
4727		RAMY	04 30 1412	N07 W46	04 27.1		B	BXO	20	4	3	3
4727	24308	MWIL	04 30 1430	N08 W46	04 27.2	3	(B)					
4727		BOUL	04 30 1515	N10 W48	04 27.0		B	BXO	20	2	4	4
4727		HOLL	04 30 1547	N07 W47	04 27.1		B	BXO	30	5	4	4
4727		ATHN	05 01 1100	N07 W56	04 27.3			BXO	40	4	7	2
4727		RAMY	05 01 1325	N06 W59	04 27.1		B	DAO	40	7	5	4
4727		HOLL	05 01 1420	N07 W58	04 27.3		B	DSO	60	4	6	4
4727		BOUL	05 01 1425	N07 W57	04 27.3		B	BXO	40	4	5	2
4727	24308	MWIL	05 01 1600	N07 W60	04 27.2	4	(B)					
4727		PALE	05 01 1858	N06 W62	04 27.1		B	DRO	50	4	6	3
4727		LEAR	05 02 0152	N07 W67	04 27.1		B	DAO	70	5	6	3
4727		ATHN	05 02 0730	N07 W66	04 27.4			DAO	80	5	7	2
4727		RAMY	05 02 1325	N07 W70	04 27.3		B	DAO	20	8	9	4
4727	24308	MWIL	05 02 1430	N07 W73	04 27.1	4	(B)					
4727		HOLL	05 02 1443	N07 W70	04 27.4		B	DRO	40	8	8	3
4727		BOUL	05 02 1500	N05 W70	04 27.4		B	BXO	80	4	9	2
4728		LEAR	05 02 0152	N07 W44	04 28.8		B	BXO	10	2	3	3
4728		ATHN	05 02 0730	N05 W45	04 28.9			CRO	20	3	4	2
4728		RAMY	05 02 1325	N07 W49	04 28.9		B	CRO	20	3	3	4
4728	24309	MWIL	05 02 1430	N06 W51	04 28.8	4	(B)					
4728		HOLL	05 02 1443	N06 W49	04 28.9		B	CRO	20	2	4	3
4728		BOUL	05 02 1500	N06 W52	04 28.7		A	AXX	10	1	1	2
4728		ATHN	05 03 0955	N06 W63	04 28.7			BXO	20	4	4	2
4728		RAMY	05 03 1235	N08 W64	04 28.7		B	CRO	10	3	6	3
4728		BOUL	05 03 1325	N07 W63	04 28.8		B	BXO	10	2	5	2
4728	24309	MWIL	05 03 1445	N07 W65	04 28.7	4	(BP)					
4728		HOLL	05 03 1800	N07 W67	04 28.7		B	BXO	10	4	6	3
4728		PALE	05 03 1942	N06 W68	04 28.7		B	BXO	10	4	6	3
4728		LEAR	05 04 0040	N08 W71	04 28.7		B	BXO	10	6	6	2
4728		RAMY	05 04 1250	N08 W77	04 28.8		A	AXX		1		2

APRIL 1986

Day	Start (UT)	Max (UT)	End (UT)	Imp	Wide-spread Index	Number of Station Reports by Type SWF	SEA	SPA	LF-SPA	SES	Known Flare	X-ray Class	NOAA/SESC Region
03	0851	00858U	0918	1-	1		1				No flare		
03	1415	1431	1448U	1-	1		1				No flare		
06	1201	1204U	1214U	1-	1		1				No flare		
06	1328	1347U	1404	1-	1		1				No flare		
07	1130	1133	1145	1-	1					1	No flare		
10	1012	1015	1032	1-	1		1				No flare		
23	2303	2308	2328	1-	1			1			2303 UT		4726
23	2351	2356	0011	1-	1			1			2352 UT		4726
24	0038	0049	0257	2	3	1		1	1		0037 UT		4726
24	0345	0354	0500	2+	3	1		1	1	1	0345 UT	M1.2	4726
24	0546	0951	1010	1-	1					1	No flare		
24	0610	0620	0824	3	5	4	1	1	1	5	0607 UT	M2.4	4726
24	0746	0956	1020	1	1				1		No flare		
24	0946	0956	1010	1	3	1		1	1		0943 UT	C1.1	
24	1218	1227	1300	1-	3	1	1		1	1	1217 UT	C2.1	4727
24	1410	1415	1500	1+	5	2	3		1	8	1405 UT	C4.5	4726
24	1603	1615	1624	1-	1		1				No flare		
26	1640	1646	1710	1	5	2	3		1	11	1637 UT	C6.2	4726
27	0758	0806	0820	1-	3	1		1	1	3	0755 UT	C1.6	
27	1250	1257	1307	1	3					2	1240 UT	C1.2	

* No flare patrol

OBSERVATORIES REPORTING FOR APRIL 1986*

Amherst, New Hampshire, USA	SES	Louisville, Kentucky, USA	SES
Ayrshire, Scotland	SES	Maui, Hawaii, USA	SWF
Darmstadt, GFR	SWF	Panska Ves, Czechoslovakia	SEA, SWF, SES
Edenvale, Rep. of S. Africa	SES	Paterson, New Jersey, USA	SES
Farsta, Sweden	SES	Sofia, Bulgaria	SES
Hiraiso, Japan	SWF	St. Cloud, Minnesota, USA	SES
Houston, Texas, USA	SES	Tavares, Florida, USA	SES
Inubo, Japan	SPA	Tucson, Arizona, USA	SES
Juilusruh, German Dem. Rep.	SWF	Upice, Czechoslovakia	SEA
Kuhlungsborn, German Dem. Rep.	SPA, SEA	Valley Cottage, New York, USA	SES
Latrobe, Pennsylvania, USA	SES	Vsetin, Cczechoslovakia	SEA
Lintong, Peoples Rep. of China	SPA		

*Observations are not necessarily continuous for each site.

SIDs by NOAA/SESC REGION

APRIL 1986

Day:	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
Events in Region #																														
4726																							2	4		1				
4727																								1						
Events with X-ray																								5		1	2			
Events with No Flare Reported			2				2	1		1														2						
Events with No Flare Patrol																														
Events with No Region Numbers																														
Daily Event Totals			2				2	1		1													2	9		1	2			

SOLAR RADIO EMISSION
SPECTRAL OBSERVATIONS

APRIL 1986

Day	Observation Start (UT)	Observation End (UT)	Sta	Decimetric Band Start (UT)	Decimetric Band End (UT)	Decimetric Band Int (1-3)	Metric Band Start (UT)	Metric Band End (UT)	Metric Band Int (1-3)	Dekametric Band Start (UT)	Dekametric Band End (UT)	Dekametric Band Int (1-3)	Spectral Type
01	0541	1730	WEIS										
02	0534	1728	WEIS										
03	0535	1626	WEIS										
	1632	1731	WEIS										
04	0533	1734	WEIS										
05	0533	1734	WEIS										
06	0529	1720	WEIS										
07			LEAR				0328.0	0335.0	2				II
	0541	1739	WEIS										
08	0525	1318	WEIS										
	1353	1740	WEIS										
09	0525	1742	WEIS										
			PALE				2116.1	2117.0	2				V
			PALE				2131.6	2131.8	2				III
10	0522	0932	WEIS										
	0938	1742	WEIS										
11	0521	1744	WEIS										
12	0518	1745	WEIS										
13	0517	0903	WEIS										
	1041	1747	WEIS										
14	0514	1427	WEIS										
	1450	1748	WEIS										
15	0514	0544	WEIS										
	0565	1750	WEIS										
16	0511	1349	WEIS										
	1359	1750	WEIS										
17	0510	1753	WEIS				1351.1	1351.7	3				III,G,U
18	0507	0837	WEIS										
	0843	1754	WEIS										
19	0507	1755	WEIS										
20	0607	1756	WEIS										
21			LEAR				0354.8	0355.5	1				III
			LEAR				0412.3	0412.5	1				III
	0503	0759	WEIS										
			WEIS				0744.1	0744.2	2				IIIG
	0806	1758	WEIS										
22	0500	1523	WEIS										
	1618	1758	WEIS										
23	0612	1801	WEIS										
			SGMR				1816.5	1817.1	1				V
24	0456	1141	WEIS				0530.0	1743.0	2				IS,DC
	1223	1801	WEIS				0613.9	0614.2	2				IIIG
			WEIS	0619.7	0619.8	1							DCIM
			WEIS				0623.9	0624.1	3				IIIG
			WEIS				0653.6	0653.9	3				IIIG
			WEIS				0742.4	0743.0	3				IIIG
25			LEAR				0503.3	0503.8	2				III

SOLAR RADIO EMISSION
SPECTRAL OBSERVATIONS

APRIL 1986

Day	Observation Start (UT)	Observation End (UT)	Sta	Decimetric Band Start (UT)	Decimetric Band End (UT)	Decimetric Band Int (1-3)	Metric Band Start (UT)	Metric Band End (UT)	Metric Band Int (1-3)	Dekametric Band Start (UT)	Dekametric Band End (UT)	Dekametric Band Int (1-3)	Spectral Type
25	0456	1804	WEIS				0521.0	1749.0	2				IN
			WEIS				0603.1	0603.3	3				IIIG
			LEAR				2252.8	2253.0	1				III
			LEAR				2314.6	2314.8	1				III
26			WEIS				0519.0	0845.0	1				IS
28	1024	1133	WEIS										
	1245	1542	WEIS										
			SGMR				1927.8	1934.8	1				V
29	0926	0953	WEIS										
	1114	1809	WEIS										
30	0447	0534	WEIS										
	0703	1528	WEIS										
	1625	1900	WEIS										

The symbols used under the column heading SPECTRAL TYPE have the following definitions:

B = Single burst
G = Small group (< 10) of bursts
GG = Large group (> 10) of burst
C = Underlying continuum (particularly with Type I)
S = Storm in the sense of intermittent but apparently connected activity
N = Intermittent activity in this period
U = U-shaped burst of Type III

RS = Reverse slope burst
DP = Drifting pairs
DC = Drifting Chains
H = Herringbone
W = Weak
P = Pulsations
CONT = Continuum
UNCLF = Unclassified activity
DCIM = Fast drift

Stations Reporting:

BLEN = Bleien LEAR = Learmonth PALE = Palehua SGMR = Sagamore Hill WEIS = Weissenau

COSMIC RAY INDICES
(Neutron Monitor)

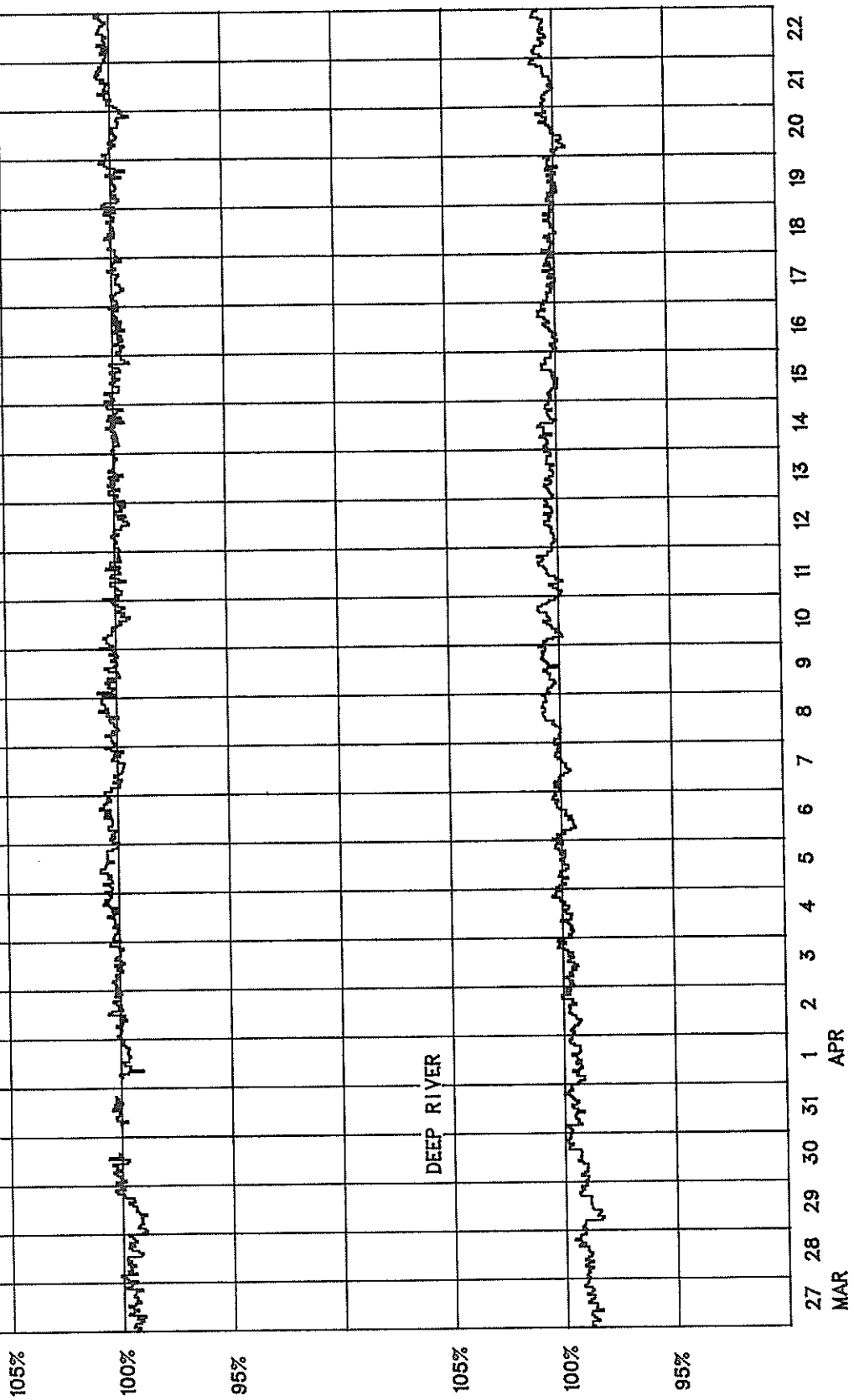
APRIL 1986

Day	THULE Average (cts/h)/100	ALERT Average (cts/h)/100	DEEP RIVER Average (cts/h)/300	KIEL Average (cts/h)/100	CLIMAX Average (cts/h)/100	PREDIGTSTUHL Average (cts/h)/100	TOKYO Average (cts/h)/256	HUANCAYO Average (cts/h)/100
1		7330.8	6975.5	6257.9				
2		7355.5	6990.9	6243.3				
3		7358.3	6998.5	6254.7				
4		7371.6	7006.0	6257.8				
5		7384.6	7016.8	6264.0				
6		7379.2	7012.0	6240.8				
7		7355.5	7017.5	6227.7				
8		7375.2	7047.6	6241.7				
9		7366.1	7053.7	6264.7				
10		7353.4	7047.2	6270.0				
11		7348.5	7042.1	6268.7				
12		7336.6	7040.4	6295.9				
13		7350.2	7039.7	6301.2				
14		7350.0	7046.2	6316.0				
15		7343.6	7033.6	6291.0				
16		7334.0	7038.9	6292.6				
17		7338.5	7033.0	6286.7				
18		7351.8	7029.7	6288.1				
19		7347.3	7025.5	6285.3				
20		7340.0	7022.3	6291.6				
21		7368.1	7044.9	6287.6				
22		7374.0	7058.2	6287.1				
23		7378.2	7045.0	6276.9				
24		7370.5	7035.1	6277.9				
25		7385.1	7041.5	6281.2				
26		7381.0	7058.4	6300.4				
27		7402.0	7064.9	6320.0				
28		7393.5	7070.2	6317.5				
29		7386.0	7088.3	6306.1				
30		7404.9	7092.3	6299.5				
Mean		7363.8	7037.2	6279.8				

For less than 24-hour coverage, parentheses enclose the number of hours for which data are available.
For Climax and Huancayo, parentheses enclose the number of section hours whenever the sum of both sections falls below 40 hours.

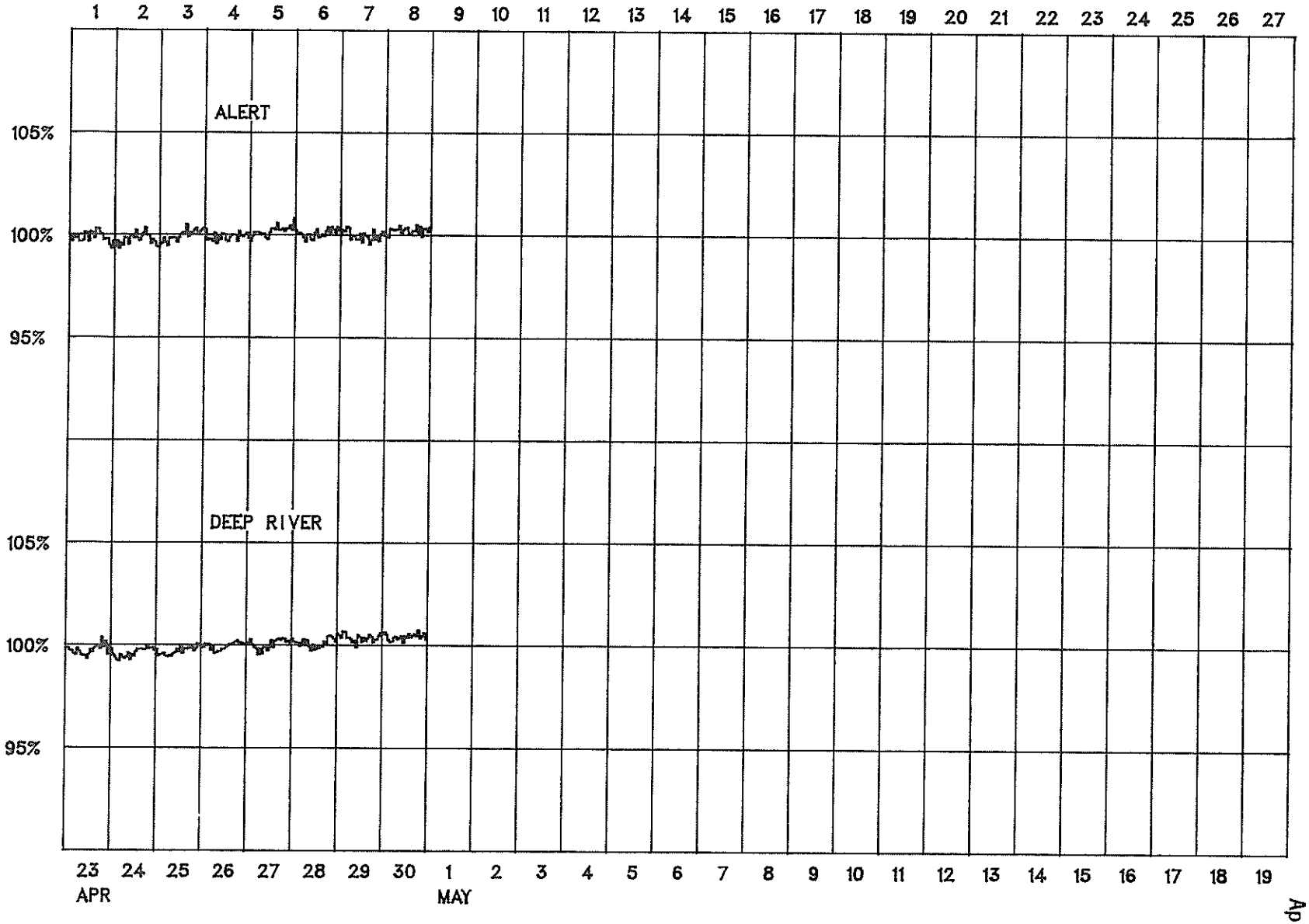
COSMIC RAY INDICES
(Neutron Monitor)

Bartels Rotation 2086 (March 1986–April 1986)



COSMIC RAY INDICES
(Neutron Monitor)

Bartels Rotation 2087 (April 1986–May 1986)



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Apr 86

GEOMAGNETIC ACTIVITY INDICES

April 1986

Day		Kp Three-Hourly Indices 1	2	3	4	5	6	7	8	Sum	Ap	Cp	Km Three-Hourly Indices 1	2	3	4	5	6	7	8	aa Provisional Am	N	S	M	
1		1+	2-	2-	3	1+	1+	3	1	14+	8	0.4	2-	2-	2-	3-	1+	1+	2+	1	13	21	10	15	17	
2	Q9	2	2	1-	2-	1	1	1+	2-	11+	5	0.2	2-	2	1	2-	1+	1+	1+	1+	10	12	9	11	10	C
3	D2*	4-	4	3+	1	2	3-	3-	2-	21	14	0.8	3	3	3	1	2	2-	2+	1+	19	26	18	23	21	
4	Q1	0+	1+	1	1	1-	1-	1	2-	8-	4	0.1	0+	1	0+	1	1-	0+	1-	1+	5	7	4	5	7	CK
5		1-	3	2	2	1	2+	3-	3+	17	9	0.5	1	2+	2-	1+	1-	2	2+	3	14	20	14	13	21	K
6	Q4	1-	2-	2-	0+	1-	1-	1	2	9-	4	0.1	0+	1+	1+	0+	1-	1-	1	2-	6	10	7	7	10	CK
7	Q6	2-	2-	1	1+	1	1+	1+	1+	11-	5	0.2	1+	1+	1	1	1+	1+	1+	1+	8	10	10	9	11	CC
8	Q10	1-	1+	1+	2+	2	0+	1	2	11	5	0.2	0+	1+	1+	3-	2-	0+	1-	2-	10	13	10	11	12	CK
9	D3*	3-	3+	3-	2-	3	2+	3	3	22-	13	0.7	2+	3	3-	2	3	2	3-	2+	22	28	14	17	26	
10	D1*	5-	4	4	3-	3-	4	2-	0	24-	19	1.0	4+	4	4-	3+	3-	4-	1+	0	36	29	34	39	24	
11		1-	2+	1+	0+	1-	2-	1	3-	11-	6	0.2	1-	2+	1	0+	0+	2-	1	2	8	11	4	5	11	C
12		3+	2-	3-	2+	2-	2+	2	2+	18+	10	0.5	3-	2-	3-	3-	2+	2	2	2	19	16	18	17	18	K
13	Q8	2	1-	1+	1+	1+	1-	2	2-	11	5	0.2	2-	1	1+	2	2	1-	2-	2-	11	13	10	8	15	CC
14	Q2	1	1+	1	1	1	1+	1+	1+	9+	4	0.2	1-	1-	1	2	1+	1	1	1	7	10	7	9	9	CC
15		0+	2+	1+	1	2+	3-	2-	2-	13+	7	0.3	0	2	2-	1+	2	2-	2-	2-	11	13	11	9	15	CK
16		3	2	1-	3	2	2+	2-	1+	16	8	0.5	3-	2-	1	3-	2-	2-	1+	2-	14	22	11	17	16	
17		1-	1	1-	2-	2	2-	2+	2	12	6	0.3	1-	1-	1	2-	2-	2-	2	2-	10	15	10	9	16	C
18		3+	3-	2	1-	1-	0+	1-	2+	13-	7	0.4	3	2+	3-	1+	1-	0+	1-	2-	13	13	12	18	8	K
19		3	3-	2-	2	3-	3	3-	2-	19+	11	0.6	3-	3-	2-	2	3-	2+	2	2-	18	25	13	16	23	K
20	Q7	1+	1	1-	2-	1	1+	2-	2	11-	5	0.2	1	1	1	1+	1+	1	2-	2-	9	10	7	7	10	C
21		4-	2-	1	2	1	1-	1	2	13	7	0.4	3	2-	1+	2	1+	1-	1	2-	12	18	9	18	10	
22	D5*	2	3+	2+	4-	2-	2-	3-	2+	20-	11	0.6	2-	3	2+	4-	1+	1+	2+	2+	20	23	14	20	17	
23		2-	2+	3-	2-	1	2	4-	3	18	10	0.6	1+	2	3-	1+	1	2-	3	3	17	24	10	15	20	
24	D4*	3+	3-	3	3	2	2+	3-	2-	21-	12	0.7	2+	2-	3-	3-	2+	2-	2-	2-	17	22	14	20	17	
25		3-	3-	2	2-	2-	1+	1	1	14	7	0.4	3-	2+	2-	2-	2-	1	1	1-	12	12	8	13	7	C
26		3	3-	2	2	2-	0+	1	1+	14	7	0.4	3-	2	2	2	2-	1-	1-	1+	12	17	9	18	9	CC
27	Q3	2-	1+	1-	1-	0+	2-	0+	2-	8+	4	0.1	1+	1-	1-	1-	1-	1	0+	1+	6	13	4	9	8	C
28		3	3+	4-	3	2	2	1	1-	19-	11	0.7	3	3	4-	3	2-	1+	1	1-	21	22	19	33	8	
29		2-	3	3	3-	3-	1-	1-	1-	15	9	0.5	1+	3	3-	2+	3-	1	1-	1-	16	21	12	19	14	K
30	Q5	2-	2	1-	1	1+	2-	1	1-	10	5	0.2	2-	2-	0	1	2-	2-	1+	1-	8	15	8	11	12	CC
Mean											8	0.41									13.5	17.1	11.4	14.3	

Day	Kn Three-Hourly Indices 1	2	3	4	5	6	7	8	An	Ks Three-Hourly Indices 1	2	3	4	5	6	7	8	As	S_a	Prov R_I	R_a	R_s	IMF	
1	2-	2-	2	3	2-	2-	3	1+	16	2-	2-	1+	3-	1	1	1+	0+	10	71.8	9	0	16	D	-
2	1+	2-	1	2-	1+	1+	2-	2-	11	2-	2	1	1+	1	1+	1	1	9	70.6	10	0	14	A	-
3	3	3	3	1+	2+	2+	3	2	23	3-	3	3-	0+	1+	1	1+	1	15	70.9	12	7	15	T	-
4	0+	1	1-	1+	1-	1	1+	2-	7	0+	1	0+	1-	0+	0	0+	1	3	71.7	0	0	15	A	-
5	1	3-	2	2	1+	3-	3-	3+	18	1	2+	1+	1	0+	1	2-	2+	10	71.9	0	0	16	-	-
6	0+	1+	1	1-	1	1	1+	2+	8	0+	2-	1+	0	0+	0	0+	1+	5	71.9	0	0	16	N	-
7	1+	1	1	1+	1+	2	1+	2-	9	1+	1+	1+	1-	1+	0+	1	1-	7	71.9	9	0	16	O	-
8	1-	1	1+	3-	2	1-	1+	2+	11	0+	1+	1+	3-	2-	0	0+	1+	8	71.8	11	0	16	T	-
9	2+	3	2+	2+	3	2+	3-	3-	23	2+	3	3-	2-	3	2-	3	2	22	72.0	0	0	16	-	-
10	4	4-	4	3+	3-	4-	2	0+	34	5-	4+	3+	4-	3	4-	1-	0	37	72.5	9	7	16	A	-
11	1-	2+	1	1-	1-	2	1+	3-	10	0+	2+	1	0+	0	1+	1-	1+	6	72.4	13	9	16	V	-
12	3-	2-	3-	3-	2+	2	2	2+	19	3-	2	3	3	3-	2	2-	2-	20	73.1	15	10	17	A	-
13	1+	0+	2-	1+	1+	1-	2	2	10	2-	1+	1	3-	2+	0+	1+	1+	11	74.2	14	10	18	I	-
14	1	1-	1-	1+	1+	1+	1+	1+	8	0+	1-	1	2+	1+	1-	0+	0+	7	76.0	26	19	20	L	-
15	0+	2	2-	2-	2+	2+	2	2	14	0	2	2-	1	2	1	1	1+	9	76.0	25	15	20	A	-
16	3-	2-	1+	3-	2	2+	2-	2	16	2+	2-	0+	3-	1+	1+	1+	1+	11	75.8	26	10	20	B	-
17	1	1-	1+	2-	2	2	2+	2	12	1-	1-	1	1+	2-	1+	2-	1	8	75.3	14	10	19	L	-
18	3	2	3-	1+	1	1-	1+	2	14	3+	3-	2+	1+	0+	0	0	1+	13	74.4	15	11	18	E	-
19	3-	3-	2-	2	3-	3	2+	2	20	2+	2+	1+	2	3-	2-	1+	2-	15	74.9	13	10	19	-	-
20	1+	1	1+	2-	1+	1+	2	2+	11	1	1	1	0+	1+	1-	1	1+	6	75.0	18	16	19	C	-
21	3	2-	1+	2	1+	1	1+	2+	14	3	1+	1-	2-	1	0+	0+	1+	9	74.2	25	15	18	U	-
22	2-	3-	2+	4	2	2	3-	2+	22	2-	3+	2	3+	1	1-	2	2+	18	75.1	20	21	19	R	-
23	2-	2	3-	2-	1+	2+	3+	3	20	1+	2-	3-	1-	0+	1	3	3-	14	82.1	54	41	27	R	-
24	3-	2	3-	3	3-	2	2+	2	20	2+	2-	2+	3-	2+	1	1	1+	14	87.4	64	37	32	E	-
25	3	2+	2	2	2	1+	1+	1+	15	2+	2+	1	2-	1+	1-	0+	0+	9	85.7	48	35	31	N	-
26	3-	2-	2+	2+	2	1	1+	2-	14	2+	2+	2	2	1+	0	0	1	10	84.2*	43	40	29	T	-
27	1+	1+	1+	1-	1	2-	1-	2-	8	1+	0+	0+	1-	0	0+	0	1-	3	83.4	33	32	28	L	-
28	3-	3	4-	3	2	2-	1+	1+	22	3+	3+	4	3	1+	1-	0+	0+	21	80.1	23	23	25	Y	-
29	2-	3	3-	2+	3	1+	1	1	16	1	3+	3-	3-	3-	1-	0	0+	15	77.0	31	22	21	-	-
30	2-	2	0+	1+	2-	2	1+	1	10	2-	1+	0	1	1+	1+	1	0	6	74.7	33	14	19	-	-
Mean									15.2									11.7	75.6	20.4	13.8	19.6		

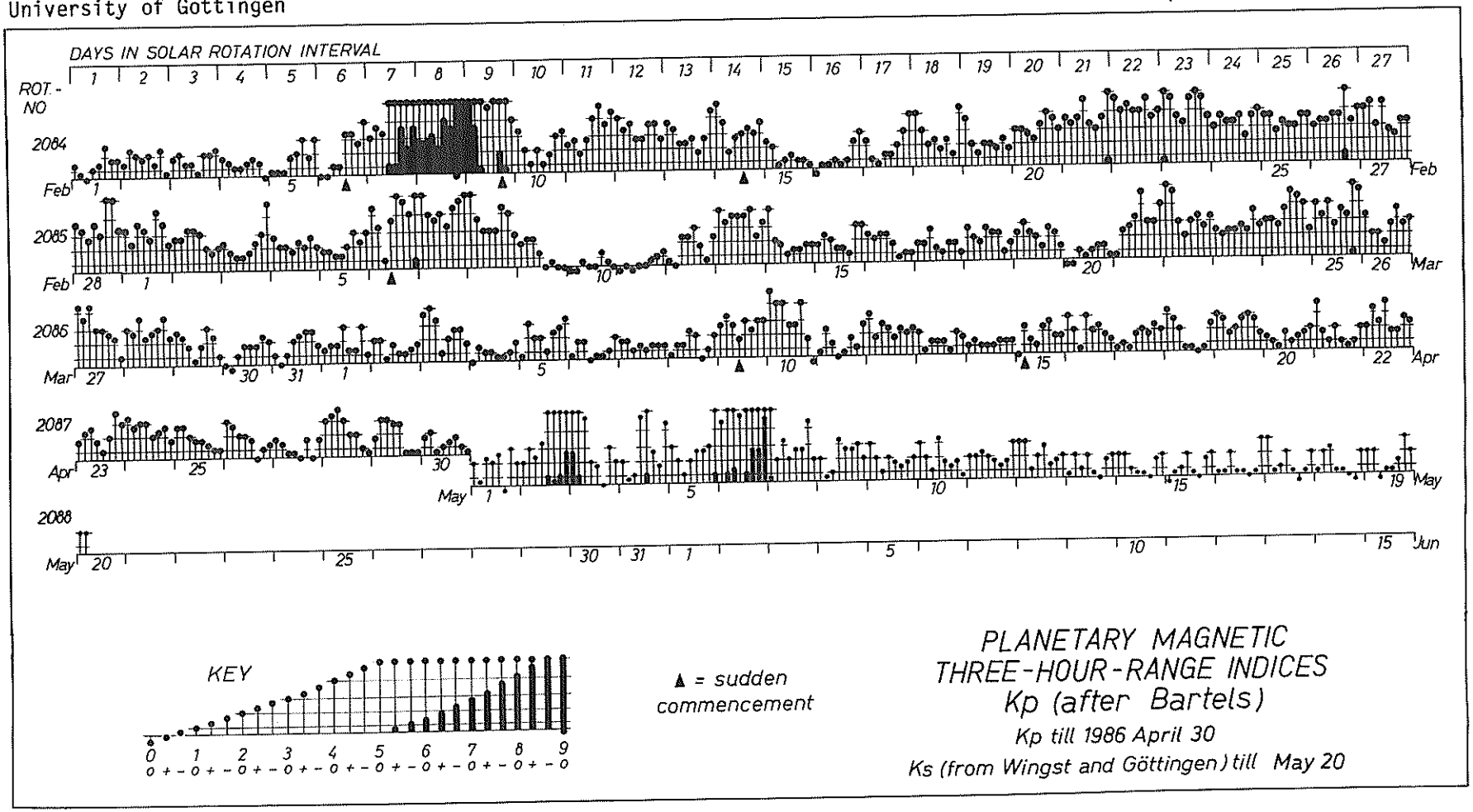
DAILY AVERAGE INDICES Ap

Day	1985 May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	1986 Jan	Feb	Mar	Apr
1	10	18	14	18	6	3	15	15	25	5	18	8
2	38	6	3	11	4	5	32	14	18	6	12	5
3	6	4	6	6	4	11	28	9	10	6	12	14
4	10	5	33	6	2	12	16	12	5	5	8	4
5	7	5	16	4	3	66	10	8	4	7	8	9
6	10	25	21	3	9	41	13	7	20	11	32	4
7	8	30	19	4	9	27	7	5	32	82	33	5
8	8	16	16	6	10	16	6	3	11	202	23	5
9	8	22	8	5	12	6	14	5	14	100	5	13
10	4	30	8	7	12	6	19	17	11	10	2	19
11	5	11	10	5	9	16	10	11	4	20	2	6
12	12	10	48	27	5	12	4	7	5	18	7	10
13	11	4	20	41	5	20	24	30	3	15	21	5
14	8	4	16	11	29	8	17	11	4	19	8	4
15	15	5	7	12	18	18	16	10	5	5	8	7
16	11	3	5	9	33	17	10	6	3	5	6	8
17	8	7	20	9	13	15	14	8	6	9	6	6
18	9	4	13	12	5	22	15	12	7	14	8	7
19	9	3	8	12	35	14	14	41	4	9	9	11
20	5	13	8	12	29	6	3	11	15	17	3	5
21	8	7	5	10	23	16	5	5	27	26	17	7
22	5	6	4	28	13	17	8	6	11	30	22	11
23	4	7	13	17	9	13	4	4	17	35	11	10
24	5	5	12	7	17	8	4	10	12	19	21	12
25	8	12	12	18	18	9	6	6	26	18	27	7
26	9	21	16	14	19	4	6	8	12	26	12	7
27	5	13	15	15	17	4	20	12	37	20	18	4
28	5	18	13	13	6	4	8	35	30	25	14	11
29	4	13	5	17	4	11	37	7	19		8	9
30	3	10	11	10	5	3	52	46	14		5	5
31	7		36	32		6		22	8		7	
Mean	9	11	14	13	13	14	15	13	14	27	13	8

PLANETARY 3-HOUR-RANGE INDICES (Kp) BY 27-DAY SOLAR ROTATION INTERVAL

University of Gottingen

Kp through April 30, 1986



PRINCIPAL MAGNETIC STORMS

APRIL 1986

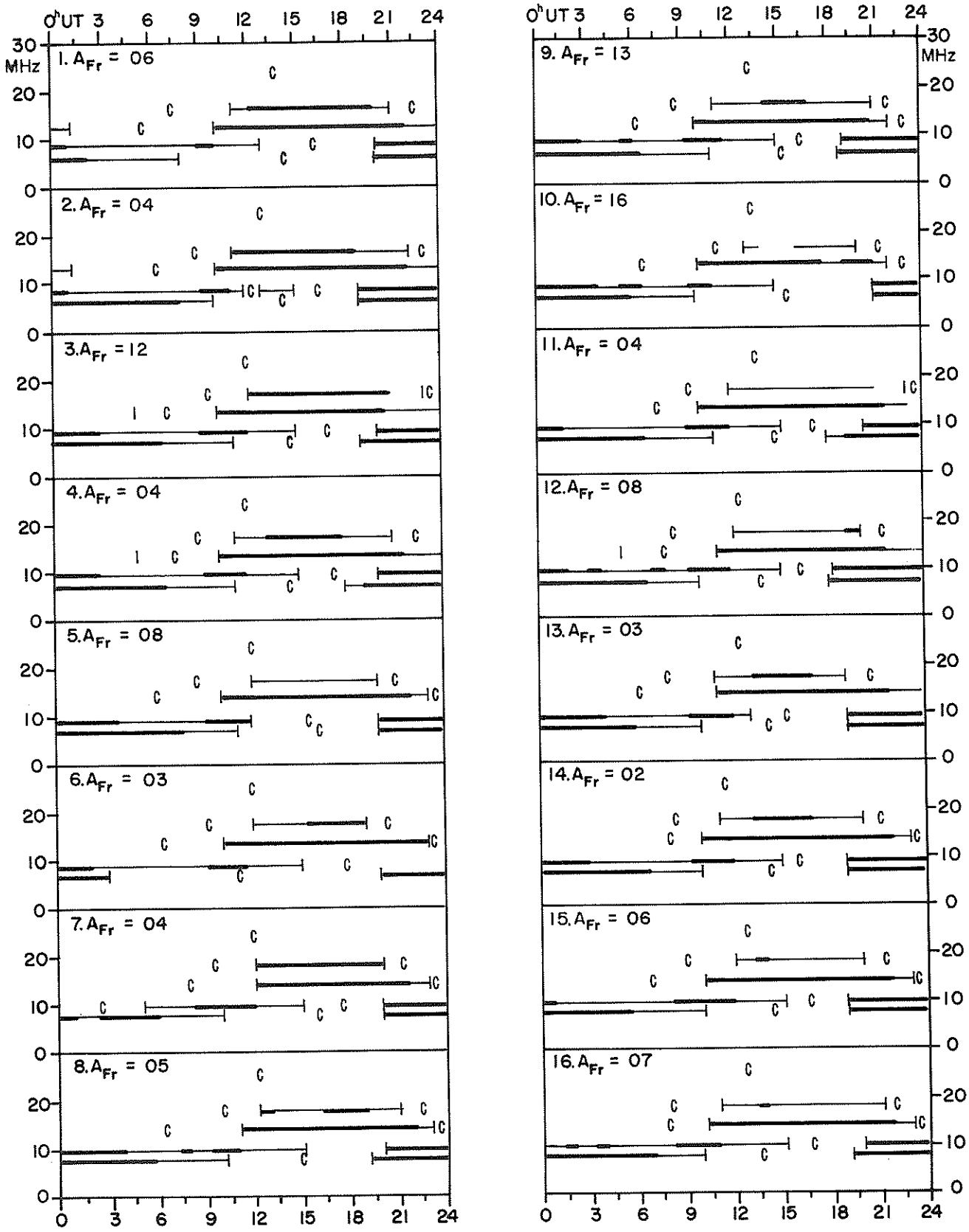
Sta	Geomag Lat	Commencement Time Day	(UT)	Type	SC Amplitudes D (Min)	H (Gamma)	Z (Gamma)	Maximum 3-Hour K Index Day(3-Hour Periods)	K	Ranges D (Min)	H (Gamma)	Z (Gamma)	End Day	Hour (UT)
JAI	17.3N	09	0900	..	..	..	..			4	77	29	10	20
KRC	16.4N	09	1031	SC	- 1	14	8	09(5) 10(1)	5	4	80	40	11	07
SHL	14.7N	09	0900	..	..	..	..			4	58	25	10	20
UJJ	13.5N	09	0900	..	..	..	..			4	76	28	10	20
ABG	09.5N	09	0900	..	..	..	..	09(5)	5	3	85	29	10	20
HYB	07.6N	09	1034	SC	- 0.2	9	- 1	09(5) 10(1,3,5,6)	4	3	98	24	10	20
ANN	01.5N	09	0900	..	..	..	..			2	129	58	10	20
TRD	01.1S	09	0900	..	..	..	..			2	154	69	10	20
KGL	56.5S	09	1035	SC	1.9	15	5	10(1)	6	38	231	--	10	21
GUA	04.0N	10	0104	..	..	..	..	10(4)	5	--	100	20	10	12
HYB	07.6N	15	0434	SC	- 0.4	23	- 2	15(2)	4	5	89	23	16	22
HYB	07.6N	23	1600	..	..	..	..	23(6,7,8) 24(1,4,7)	3	5	66	30	24	22

Stations Reporting:

ABG = ALIBAG
ANN = ANNAMALAINAGAR
BJI = BEIJING
COL = COLLEGE
FRD = FREDERICKSBURG
GNA = GNANGARA
GUA = GUAM
HER = HERMANUS
HON = HONOLULU
HYB = HYDERABAD
JAI = JAIPUR
KRC = KARACHI
KGL = KERGUELEN
SHL = SHILLONG
SIT = SITKA
TRD = TRIVANDRUM
UJJ = UJJAIN

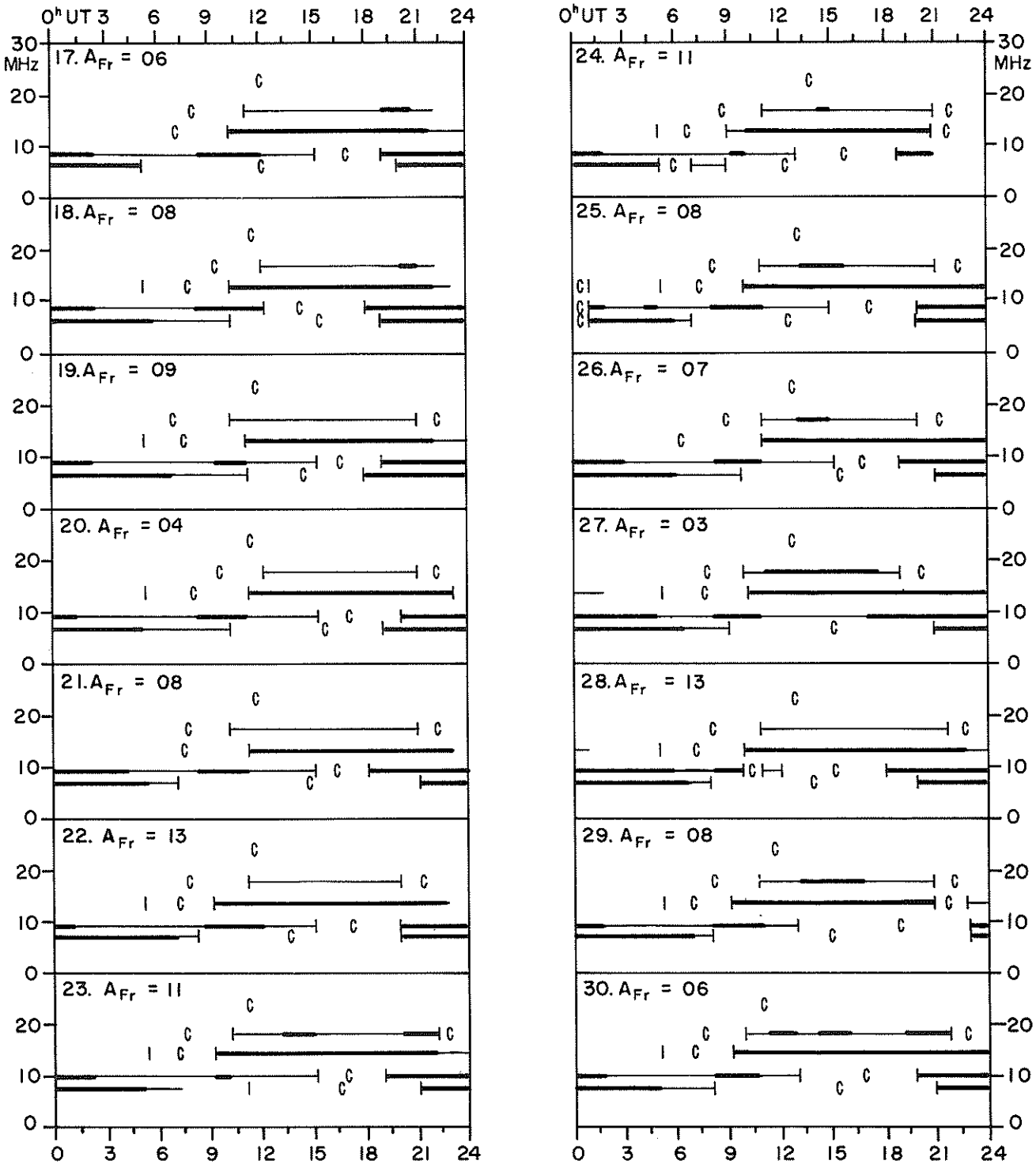
TRANSMISSION FREQUENCY RANGES -- NORTH ATLANTIC PATH

APRIL 1986



TRANSMISSION FREQUENCY RANGES -- NORTH ATLANTIC PATH

APRIL 1986



Field strengths from four frequencies (6.4, 8.6, 13.0 and 17.0 MHz), observed on a Norddeich-New York circuit, are shown above. Heavy solid lines represent field strength greater than or equal to -12 dB above 1 microvolt per meter (transmitter power reduced to 1 kilowatt). Observed field strengths between -12 and -40 dB above 1 microvolt per meter are represented by fine lines.

RADIO PROPAGATION QUALITY INDICES

APRIL 1986

Day	Bracknell	Teheran	New York	Tokyo	Johannesburg	Canberra
1	6.1	4.1	6.3	8.5	5.6	6.0
2	6.3	6.0	6.9	9.0	6.6	6.8
3	6.2	5.2	7.3	4.6	5.2	6.5
4	5.7	6.1	6.7	6.0	6.1	6.1
5	5.8	3.2	5.7	5.7	4.2	6.4
6	5.3	3.9	6.2	5.9	8.1	5.7
7	5.1	3.6	6.7	6.3	5.5	6.1
8	4.6	2.5	6.1	4.2	3.5	5.3
9	5.3	4.8	5.4	6.1	4.6	3.6
10	3.3	3.4	2.4	4.1	4.4	4.3
11	4.4	3.4	4.8	6.5	6.0	4.8
12	4.9	4.5	6.5	5.4	5.6	5.5
13	4.0	2.8	6.9	4.4	3.0	4.1
14	4.8	3.8	5.5	4.9	5.1	4.0
15	4.9	3.1	5.3	4.6	4.3	4.3
16	5.4	3.6	5.1	6.1	4.9	5.2
17	5.0	3.1	5.2	7.0	5.0	4.6
18	5.9	5.9	5.8	6.4	4.4	5.8
19	6.0	5.2	4.6	6.7	4.1	6.1
20	6.4	5.1	5.1	7.1	3.6	6.0
21	5.6	6.0	4.0	7.3	5.2	5.8
22	4.8	5.6	4.9	5.4	4.2	5.7
23	6.4	5.6	5.1	6.2	6.6	6.3
24	5.5	6.7	4.1	5.4	4.0	7.1
25	7.0	7.0	6.0	7.2	5.6	6.0
26	7.0	6.9	6.5	7.5	6.4	7.3
27	7.4	6.6	7.5	7.3	6.4	5.9
28	6.4	7.3	4.8	6.5	5.6	6.8
29	6.6	6.3	5.1	7.4	5.1	5.3
30	6.3	6.5	6.4	8.4	5.8	6.5
Mean	5.6	4.9	5.6	6.3	5.2	5.7

CALCULATION OF QUALITY INDICES (Q)

From all 24 hourly field strength values and from all frequencies of the same circuit a median field strength value is calculated (FD). This daily value is compared with the average value (FA) of the preceeding 27 days (1 sun rotation).

$$Q = 6.0 + 20 \log(FD/FA)/3.0$$

The quality indices vary from 0.0 to 9.9 where 6.0 is normal. Conditions are "normal" (index = 6.0), if they correspond to the average of the preceeding 27 days.

SCALE FOR QUALITY INDICES
- 0.0 - 1.0 = very poor
- 1.1 - 3.0 = poor
- 3.1 - 5.0 = fair
- 5.1 - 7.0 - normal
- 7.1 - 9.0 = good
- 9.1 - 9.9 = very good

C O N T E N T S

Prompt Reports LATE DATA Number 502 Part I

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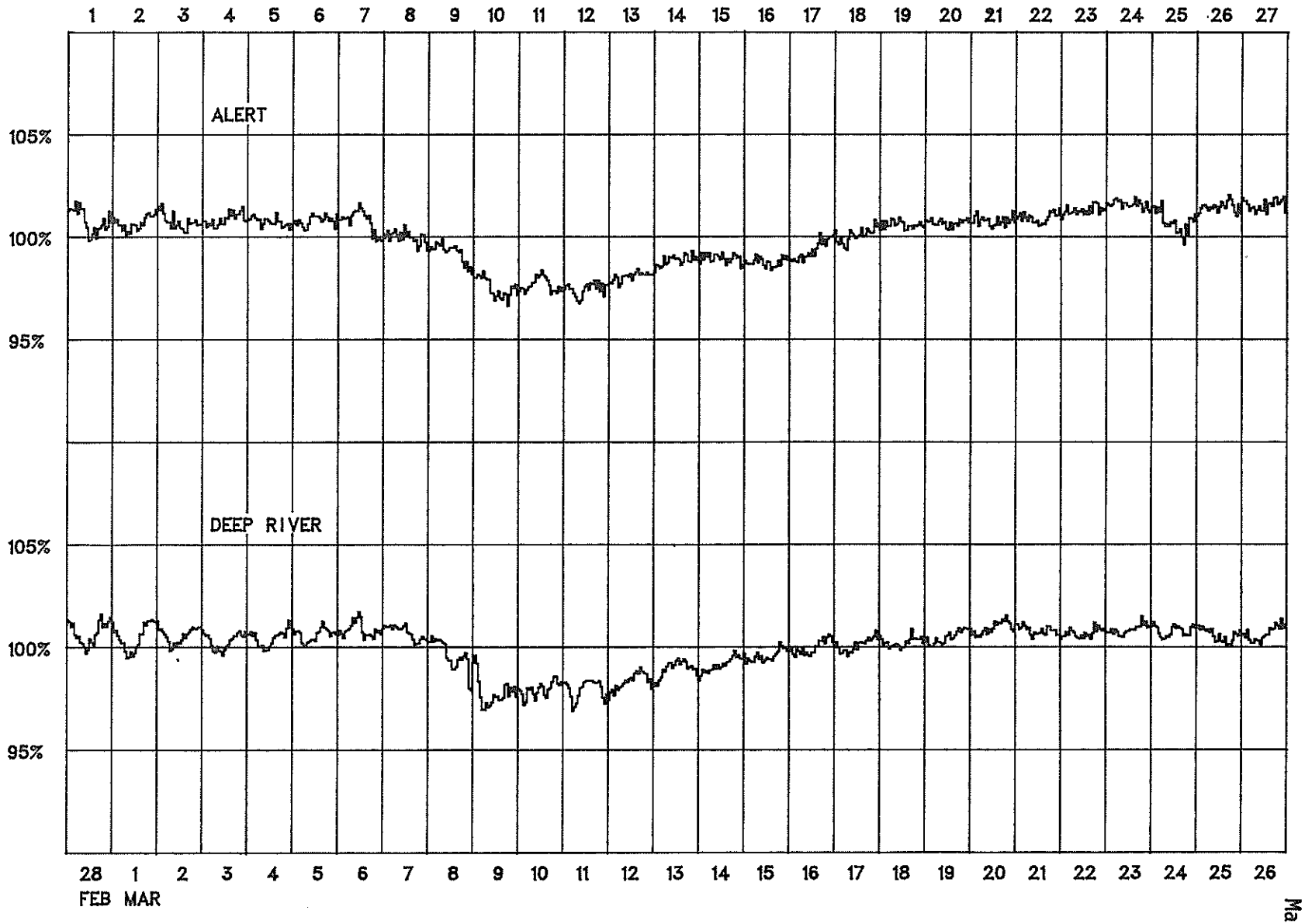
COSMIC RAY INDICES
(Neutron Monitor)

Bartels Rotation 2085 (February 1986–March 1986)



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Late
Mar 86

COSMIC RAY INDICES
(Neutron Monitor)

MARCH 1986

Day	THULE Average (cts/h)/100	ALERT Average (cts/h)/100	DEEP RIVER Average (cts/h)/300	KIEL Average (cts/h)/100	CLIMAX Average (cts/h)/100	PREDIGTSTUHL Average (cts/h)/100	TOKYO Average (cts/h)/256	HUANCAYO Average (cts/h)/100
1		7254.7	6893.9	6193.6			3665.9	
2		7359.3	6899.3	6202.4			3665.7	
3		7267.2	6880.2	6192.9			3674.0	
4		7258.2	6890.4	6190.1			3656.8	
5		7262.0	6901.4	6177.9			3674.2	
6		7260.1	6916.7	6219.3			3680.6	
7		7203.2	6908.7	6182.7			3673.5	
8		7148.7	6833.5	6142.1			3657.4	
9		7025.6	6709.2	6056.6			3623.0	
10		7035.4	6718.6	6058.8			3624.8	
11		7020.4	6719.1	6043.9			3633.0	
12		7065.4	6743.6	6079.4			3641.9	
13		7120.9	6785.8	6121.1			3647.3	
14		7128.7	6798.9	6114.4			3623.1	
15		7114.9	6829.9	6130.4			3622.3	
16		7156.4	6857.9	6153.9			3657.0	
17		7210.6	6865.6	6157.8			3660.5	
18		7246.6	6874.7	6174.6			3649.1	
19		7254.0	6891.3	6184.7			3652.6	
20		7260.5	6921.7	6196.6			3675.2	
21		7271.7	6914.5	6194.8			3667.1	
22		7296.8	6904.1	6200.8			3645.1	
23		7318.4	6916.8	6220.4			3574.2	
24		7257.3	6912.6	6240.5			3669.4	
25		7307.8	6898.5	6229.4			3677.4	
26		7316.0	6903.5	6224.4			3675.6	
27		7313.0	6936.9	6209.0			3669.8	
28		7323.8	6954.0	6211.1			3656.4	
29		7312.6	6942.5	6226.3			3677.5	
30		7361.6	6973.0	6264.3			3665.6	
31		7361.4	6988.0	6263.4			3694.3	
Mean		7225.6	6873.7	6176.0			3655.8	

For less than 24-hour coverage, parentheses enclose the number of hours for which data are available.
For Climax and Huancayo, parentheses enclose the number of section hours whenever the sum of both sections falls below 40 hours.

WDC-C2 FOR GEOMAGNETISM, KYOTO UNIVERSITY

HOURLY EQUATORIAL DST VALUES(PROVISIONAL)

JANUARY 1986

UNIT=NT U.T.

DAY	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24
1	-28	-28	-24	-17	-16	-17	-22	-17	-17	-20	-23	-22	-21	-19	-22	-26	-27	-28	-30	-34	-36	-28	-25	-26
2	-21	-16	-20	-21	-18	-22	-24	-19	-21	-21	-22	-26	-27	-30	-31	-32	-32	-29	-34	-34	-32	-28	-27	-29
3	-29	-27	-27	-24	-21	-18	-19	-22	-23	-25	-21	-19	-13	-12	-12	-17	-20	-22	-24	-27	-29	-23	-27	-30
4	-27	-24	-24	-21	-18	-15	-13	-11	-11	-13	-13	-13	-15	-20	-24	-23	-17	-14	-17	-16	-13	-10	-11	-17
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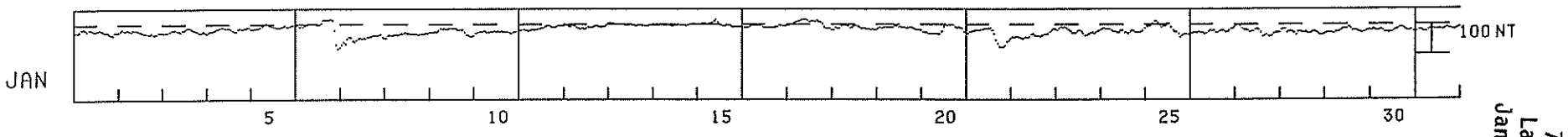

79
Late
Jan 86

WDC-C2 FOR GEOMAGNETISM, KYOTO UNIVERSITY

HOURLY EQUATORIAL DST VALUES(PROVISIONAL)

FEBRUARY 1986

UNIT=NT

DAY	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	U.T. 24
1	-15	-18	-16	-14	-14	-12	-10	-6	-5	-4	-6	-10	-11	-8	-9	-12	-14	-15	-12	-11	-10	-9	-6	-3
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4	-5	-5	-3	-7	-10	-7	-4	0	1	4	6	5	5	4	3	3	1	-1	-1	0	2	1	-1	4
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7	-3	8	9	11	-2	-13	-17	-13	-3	-18	-29	-52	-63	-71	-80	-79	-90	-89	-86	-85	-93	-114	-127	-111
8	-92	-93	-100	-93	-94	-94	-103	-118	-125	-149	-129	-138	-126	-132	-126	-132	-173	-175	-148	-135	-143	-193	-264	-258
9	-312	-291	-253	-225	-206	-185	-173	-168	-166	-151	-150	-144	-136	-129	-127	-138	-134	-123	-135	-140	-140	-139	-132	-126
10	-124	-117	-116	-114	-115	-113	-112	-112	-110	-107	-105	-104	-103	-104	-103	-102	-100	-102	-103	-103	-96	-90	-97	-86
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14	-71	-68	-61	-59	-63	-63	-66	-66	-64	-54	-53	-51	-50	-49	-44	-36	-35	-32	-38	-39	-31	-36	-38	-36
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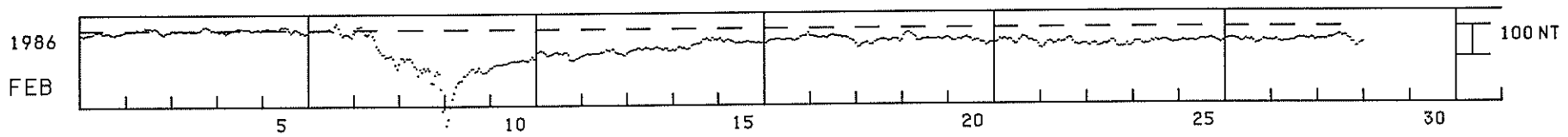


MAGNETIC STORM SUDDEN COMMENCEMENTS AND SOLAR FLARE EFFECTS
(PRELIMINARY REPORT ON RAPID MAGNETIC VARIATIONS)

MARCH 1985

Storm Sudden Commencements (ssc)			Solar Flare Effects (sfe)		
Day	Time	Quality: Station Group*	Day	Begin-End	Station(s)
04	1827	A: MPO; B: WNG WIT HRB COI; C: DOU BDV CLF DUM	05	0944-1040	NGK
			06	0855-0904	CLF (ssc: C: NGK SPT
			15	0512-0521	LNP
10	0924	B: WNG WIT MPO AMS CZT; C: DOU BDV GCK (si: B: EBR; C: SPT - sfe: NGK CLF LNP)	18	0230-0241	LNP
			29	0920-0936	NGK

Reporting Observatories:

DOB NUR WNG WIT NGK HAD DOU BDV CLF HRB GCK MMB EBR
COI SPT FRD KAK KNY LNP MPO GNA CAO AMS CZT DUM

*Three-letter codes identify each observatory.

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

JULY 1984

Calcium Plage Region	Sta	Observation Time Mo Day (UT)	Lat CMD	CMP Mo Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19391	BIGB	06 29 1618	N04 E35	07 2.3	3.0	2300	4523		
19391	BIGB	07 03 1435	N03 W17	07 2.3	2.0	1800	4523		
19391	BIGB	07 04 1549	N04 W31	07 2.3	2.0	1900	4523		
19391	BIGB	07 05 1454	N04 W45	07 2.2	2.0	1900	4523		
19391	BIGB	07 07 1750	N03 W70	07 2.5	2.0	1900	4523		
19372	BIGB	06 29 1618	N01 E67	07 4.7	2.5	3500	4523A		
19372	BIGB	07 03 1435	N02 E09	07 4.3	2.0	3500	4523A		
19372	BIGB	07 04 1549	N02 W06	07 4.2	2.0	3500	4523A		
19372	BIGB	07 05 1454	N01 W20	07 4.1	2.0	3400	4523A		
19372	BIGB	07 07 1750	N02 W48	07 4.1	1.5	3400	4523A		
19372	BIGB	07 09 1711	N03 W72	07 4.3	2.5	3400	4523A		
19392	BIGB	06 29 1618	N13 E72	07 5.1	2.5	3000	4525	4529	
19392	BIGB	07 03 1435	N11 E25	07 5.5	2.5	5000	4525	4529	
19392	BIGB	07 04 1549	N11 E11	07 5.5	2.5	5000	4525	4529	
19392	BIGB	07 05 1454	N11 W03	07 5.4	2.5	5000	4525	4529	
19392	BIGB	07 07 1750	N10 W31	07 5.4	2.5	5000	4525	4529	
19392	BIGB	07 09 1711	N11 W53	07 5.7	3.0	5000	4525	4529	
19392	BIGB	07 10 1658	N12 W67	07 5.6	2.5	5000	4525	4529	
19396	BIGB	07 03 1435	S03 E25	07 5.5	2.0	0800			
19396	BIGB	07 04 1549	S02 E11	07 5.5	1.5	0700			
19396	BIGB	07 05 1454	S03 W01	07 5.5	1.5	0600			
19396	BIGB	07 07 1750	S03 W30	07 5.5	1.5	0500			
19396	BIGB	07 09 1711	S02 W56	07 5.5	1.5	0500			
19396	BIGB	07 12 1629	S04 W45	07 9.3	2.0	1000			
19396	BIGB	07 14 1545	S03 W72	07 9.3	1.0	0800			
19393	BIGB	07 03 1435	N10 E61	07 8.2	3.0	0700	4528	4531	
19393	BIGB	07 04 1549	N09 E47	07 8.2	2.5	0700	4528	4531	
19393	BIGB	07 05 1454	N09 E34	07 8.2	3.0	0700	4528	4531	
19393	BIGB	07 07 1750	N08 E06	07 8.2	3.0	0600	4528	4531	
19393	BIGB	07 09 1711	N09 W19	07 8.3	2.5	0600	4528	4531	
19393	BIGB	07 10 1658	N10 W32	07 8.3	2.5	0600	4528	4531	
19393	BIGB	07 11 1759	N09 W50	07 8.0	1.0	0600	4528	4531	
19393	BIGB	07 12 1629	N08 W59	07 8.3	1.5	0550	4528	4531	
19398	BIGB	07 03 1435	S23 E61	07 8.3	2.5	1400			
19398	BIGB	07 04 1549	S24 E48	07 8.4	2.5	1300			
19398	BIGB	07 05 1454	S25 E34	07 8.2	3.5	1000			
19398	BIGB	07 07 1750	S25 E06	07 8.2	1.5	1000			
19398	BIGB	07 09 1711	S26 W22	07 8.0	1.0	0700			
19398	BIGB	07 10 1658	S24 W34	07 8.1	1.0	0650			
19399	BIGB	07 03 1435	S09 E82	07 9.8	3.0	0300	4532	4536	4540
19399	BIGB	07 04 1549	S08 E68	07 9.7	3.0	3700	4532	4536	4540
19399	BIGB	07 05 1454	S08 E56	07 9.8	3.0	3700	4532	4536	4540
19399	BIGB	07 07 1750	S07 E21	07 9.3	2.5	3600	4532	4536	4540
19399	BIGB	07 09 1711	S07 W05	07 9.3	3.0	3400	4532	4536	4540
19399	BIGB	07 10 1658	S08 W19	07 9.3	2.5	3200	4532	4536	4540
19399	BIGB	07 11 1759	S09 W33	07 9.3	2.0	3200	4532	4536	4540
19399	BIGB	07 12 1629	S08 W45	07 9.3	2.0	0950	4532	4536	4540
19399	BIGB	07 14 1545	S05 W72	07 9.3	1.5	0700	4532	4536	4540
19395	BIGB	07 03 1435	N01 E78	07 9.4	3.0	0325	4533	4536A	
19395	BIGB	07 04 1549	N01 E67	07 9.7	3.0	2700	4533	4536A	
19395	BIGB	07 05 1454	N01 E56	07 9.8	3.0	2700	4533	4536A	
19395	BIGB	07 07 1750	N01 E26	07 9.7	2.5	2700	4533	4536A	
19395	BIGB	07 09 1711	N01 W01	07 9.6	2.0	2400	4533	4536A	
19395	BIGB	07 10 1658	N01 W15	07 9.6	2.0	2400	4533	4536A	
19395	BIGB	07 11 1759	N02 W29	07 9.6	2.0	2400	4533	4536A	
19395	BIGB	07 12 1629	N03 W42	07 9.5	2.0	1200	4533	4536A	
19395	BIGB	07 14 1545	N03 W77	07 8.9	1.5	1200	4533	4536A	

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

JULY 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19397	BIGB	07	05	1454	S16 E70	07	10.9	2.0	1700	4532	4536	
19397	BIGB	07	07	1750	S14 E26	07	9.7	2.0	1700	4532	4536	
19397	BIGB	07	09	1711	S13 W00	07	9.7	1.0	1500	4532	4536	
19397	BIGB	07	10	1658	S13 W14	07	9.6	1.0	1200	4532	4536	
19397	BIGB	07	11	1759	S16 W29	07	9.5	1.0	1200	4532	4536	
19397	BIGB	07	12	1629	S12 W41	07	9.6	1.5	0700	4532	4536	
19397	BIGB	07	14	1545	S09 W71	07	9.3	1.5	0500	4532	4536	
19400	BIGB	07	07	1750	S15 E41	07	10.8	2.0	1000			
19400	BIGB	07	09	1711	S14 E15	07	10.8	1.5	1000			
19400	BIGB	07	10	1658	S14 E05	07	11.1	1.5	1200			
19400	BIGB	07	11	1759	S13 W16	07	10.5	1.5	1200			
19400	BIGB	07	12	1629	S12 W30	07	10.4	2.0	1000			
19400	BIGB	07	14	1545	S13 W59	07	10.2	1.5	1200			
19400	BIGB	07	16	1355	S13 W80	07	10.5	1.0	0700			
19401	BIGB	07	07	1750	S11 E74	07	13.3	1.0	2000	4537		
19401	BIGB	07	09	1711	S09 E41	07	12.8	4.0	1800	4537		
19401	BIGB	07	10	1658	S09 E29	07	12.9	2.5	1800	4537		
19401	BIGB	07	11	1759	S08 E15	07	12.9	2.5	2200	4537		
19401	BIGB	07	12	1629	S10 E03	07	12.9	3.0	1750	4537		
19401	BIGB	07	14	1545	S10 W24	07	12.8	2.5	1750	4537		
19401	BIGB	07	16	1355	S10 W51	07	12.7	2.5	1750	4537		
19401	BIGB	07	17	1618	S10 W65	07	12.8	2.5	1800	4537		
19401	BIGB	07	18	1628	S10 W76	07	13.0	2.0	2000	4537		
19409	BIGB	07	17	1618	N11 W42	07	14.5	2.5	0500	4544		
19409	BIGB	07	18	1628	N10 W55	07	14.5	2.0	0500	4544		
19409	BIGB	07	19	1649	N11 W67	07	14.6	2.5	0500	4544		
19409	BIGB	07	20	1558	N11 W85	07	14.3	2.5	0300	4544		
19402	BIGB	07	09	1711	S07 E75	07	15.3	2.0	2500	4539		
19402	BIGB	07	10	1658	S10 E65	07	15.6	2.5	2500	4539		
19402	BIGB	07	11	1759	S07 E49	07	15.4	2.5	2400	4539		
19402	BIGB	07	12	1629	S07 E36	07	15.4	2.5	1200	4539		
19402	BIGB	07	14	1545	S07 E08	07	15.2	2.5	1200	4539		
19402	BIGB	07	16	1355	S07 W17	07	15.3	2.0	1000	4539		
19402	BIGB	07	17	1618	S08 W31	07	15.3	2.5	0700	4539		
19402	BIGB	07	18	1628	S08 W44	07	15.4	3.0	0800	4539		
19402	BIGB	07	19	1649	S07 W58	07	15.3	2.0	0800	4539		
19402	BIGB	07	20	1558	S09 W71	07	15.3	1.5	0750	4539		
19412	BIGB	07	16	1355	S16 W17	07	15.3	2.0	0500	4542	4544A	
19412	BIGB	07	17	1618	S17 W31	07	15.3	1.0	0400	4542	4544A	
19412	BIGB	07	18	1628	S17 W44	07	15.3	1.0	0600	4542	4544A	
19412	BIGB	07	19	1649	S18 W57	07	15.4	1.0	0550	4542	4544A	
19412	BIGB	07	20	1558	S16 W70	07	15.3	1.0	0500	4542	4544A	
19406	BIGB	07	14	1545	N13 E20	07	16.2	1.0	0300			
19406	BIGB	07	16	1355	N13 W05	07	16.2	1.0	0125			
19403	BIGB	07	11	1759	S07 E63	07	16.5	1.5	1500			
19403	BIGB	07	12	1629	S11 E51	07	16.5	2.0	0900			
19403	BIGB	07	14	1545	S13 E25	07	16.5	1.5	1200			
19403	BIGB	07	16	1355	S11 E01	07	16.6	1.0	1200			
19403	BIGB	07	17	1618	S13 W10	07	16.9	1.0	1000			
19403	BIGB	07	18	1628	S13 W24	07	16.9	1.0	1000			
19403	BIGB	07	19	1649	S13 W37	07	16.9	1.5	1000			
19403	BIGB	07	20	1558	S12 W50	07	16.9	1.5	1000			
19403	BIGB	07	21	2031	S13 W63	07	17.1	1.5	1000			
19408	BIGB	07	16	1355	S06 E10	07	17.3	2.0	0225			
19408	BIGB	07	17	1618	S05 W03	07	17.4	1.0	0300			

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

JULY 1984

Calcium Plage Region	Sta	Observation Time Mo Day (UT)	Lat CMD	CMP Mo Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19404	BIGB	07 11 1759	S15 E80	07 17.8	2.5	2000	4541		
19404	BIGB	07 12 1629	S16 E63	07 17.5	3.0	2000	4541		
19404	BIGB	07 14 1545	S17 E39	07 17.6	2.5	1700	4541		
19404	BIGB	07 16 1355	S16 E15	07 17.7	2.0	1400	4541		
19404	BIGB	07 17 1618	S17 E05	07 18.0	2.5	1100	4541		
19404	BIGB	07 18 1628	S17 W08	07 18.1	2.5	0850	4541		
19404	BIGB	07 19 1649	S17 W22	07 18.0	2.0	0800	4541		
19404	BIGB	07 20 1558	S17 W35	07 18.0	2.0	0800	4541		
19404	BIGB	07 21 2031	S18 W51	07 18.0	2.0	0750	4541		
19404	BIGB	07 23 1631	S16 W80	07 17.6	1.0	0700	4541		
19405	BIGB	07 11 1759	S01 E79	07 17.6	1.0	3600	4543		
19405	BIGB	07 12 1629	S10 E69	07 17.9	1.0	1000	4543		
19405	BIGB	07 14 1545	S10 E45	07 18.0	1.5	2300	4543		
19405	BIGB	07 16 1355	S07 E20	07 18.1	2.0	2000	4543		
19405	BIGB	07 17 1618	S07 E09	07 18.3	2.0	2000	4543		
19405	BIGB	07 18 1628	S07 W04	07 18.4	2.0	2000	4543		
19405	BIGB	07 19 1649	S06 W16	07 18.5	2.0	2000	4543		
19405	BIGB	07 20 1558	S07 W29	07 18.5	2.0	2000	4543		
19405	BIGB	07 21 2031	S07 W44	07 18.5	2.0	1900	4543		
19405	BIGB	07 23 1631	S08 W70	07 18.4	1.5	1800	4543		
19413	BIGB	07 21 2031	N19 W39	07 18.9	1.5	0100			
19413	BIGB	07 23 1631	N19 W61	07 19.0	1.5	0100			
19407	BIGB	07 14 1545	S16 E75	07 20.3	1.5	2000	4548		
19407	BIGB	07 16 1355	S16 E51	07 20.4	1.5	1800	4548		
19407	BIGB	07 17 1618	S14 E39	07 20.6	2.0	2000	4548		
19407	BIGB	07 18 1628	S14 E27	07 20.7	2.5	2000	4548		
19407	BIGB	07 19 1649	S15 E13	07 20.7	2.0	2000	4548		
19407	BIGB	07 20 1558	S15 E01	07 20.7	2.0	2000	4548		
19407	BIGB	07 21 2031	S15 W15	07 20.7	2.0	2000	4548		
19407	BIGB	07 23 1631	S14 W42	07 20.5	2.0	2000	4548		
19407	BIGB	07 24 2300	S17 W65	07 20.0	2.0	2000	4548		
19407	BIGB	07 25 1645	S17 W75	07 20.0	1.0	2000	4548		
19418	BIGB	07 24 2300	S16 W51	07 21.1	2.0	0300			
19418	BIGB	07 25 1645	S16 W61	07 21.1	1.5	0300			
19418	BIGB	07 26 1740	S16 W73	07 21.2	1.5	0300			
19410	BIGB	07 17 1618	S07 E53	07 21.6	1.0	0200	4545		
19410	BIGB	07 18 1628	S07 E40	07 21.7	1.5	0350	4545		
19410	BIGB	07 19 1649	S07 E28	07 21.8	1.0	0600	4545		
19410	BIGB	07 20 1558	S07 E08	07 21.3	1.5	0900	4545		
19410	BIGB	07 21 2031	S07 W06	07 21.4	2.5	1400	4545		
19410	BIGB	07 23 1631	S07 W36	07 21.0	2.0	1600	4545		
19410	BIGB	07 24 2300	S08 W55	07 20.8	2.5	1800	4545		
19410	BIGB	07 25 1645	S08 W65	07 20.8	2.5	1800	4545		
19410	BIGB	07 26 1740	S08 W76	07 21.0	2.0	1800	4545		
19411	BIGB	07 18 1628	S14 E38	07 21.5	2.0	0250	4546		
19411	BIGB	07 19 1649	S14 E25	07 21.6	1.0	0250	4546		
19411	BIGB	07 20 1558	S14 E12	07 21.6	1.5	0225	4546		
19411	BIGB	07 21 2031	S14 W03	07 21.6	1.0	0200	4546		
19414	BIGB	07 23 1631	S06 W26	07 21.7	2.0	0150	4551		
19414	BIGB	07 24 2300	S07 W43	07 21.7	2.0	0300	4551		
19414	BIGB	07 25 1645	S08 W53	07 21.7	1.5	0400	4551		
19414	BIGB	07 26 1740	S08 W66	07 21.8	1.5	0400	4551		
19420	BIGB	07 25 1645	N06 W35	07 23.1	1.5	0300			
19420	BIGB	07 26 1740	N06 W48	07 23.1	1.0	0125			
19421	BIGB	07 26 1740	N20 W35	07 24.0	1.0	0150			
19421	BIGB	07 28 1354	N20 W60	07 24.0	1.0	0100			

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

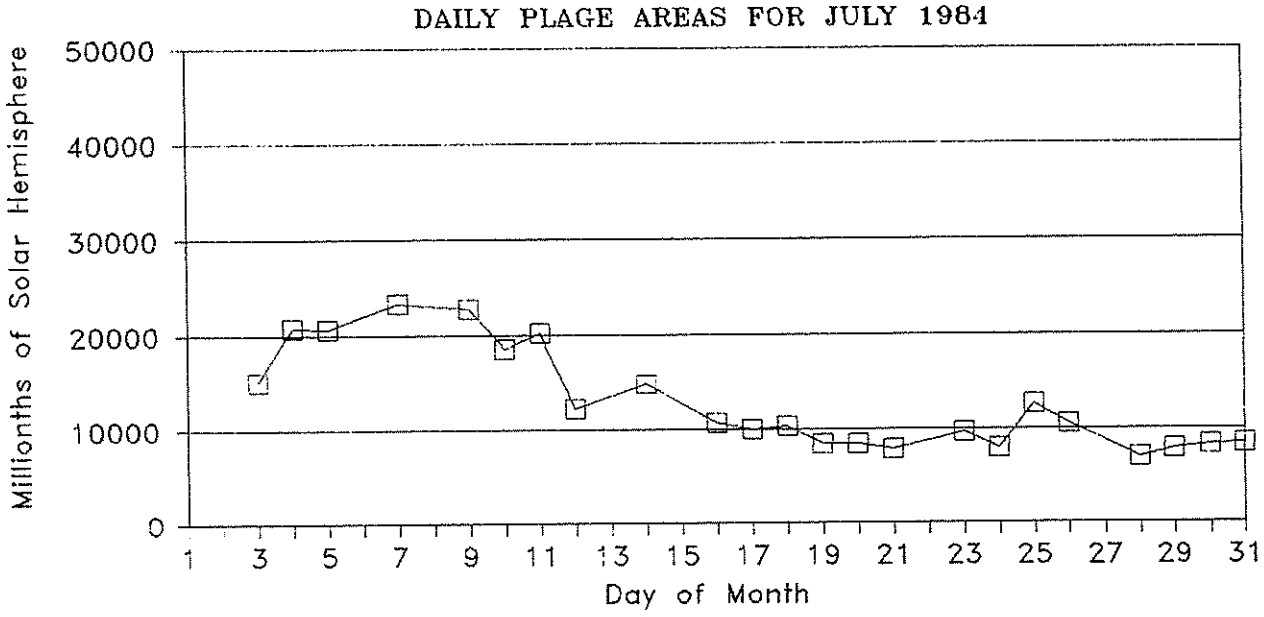
JULY 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat	CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19415	BIGB	07	21	2031	S09	E49	07	25.5	1.0	0550			
19415	BIGB	07	23	1631	S12	E23	07	25.4	1.5	0600			
19415	BIGB	07	24	2300	S15	E08	07	25.6	1.0	0600			
19415	BIGB	07	25	1645	S15	W01	07	25.6	1.0	0600			
19415	BIGB	07	26	1740	S15	W15	07	25.6	1.0	0600			
19415	BIGB	07	28	1354	S14	W40	07	25.5	1.0	0400			
19415	BIGB	07	29	1703	S14	W52	07	25.8	1.0	0400			
19415	BIGB	07	30	1409	S14	W65	07	25.7	1.0	0400			
19423	BIGB	07	30	1409	N06	W35	07	28.0	1.0	0200			
19423	BIGB	07	31	1623	N05	W52	07	27.8	1.0	0250			
19416	BIGB	07	23	1631	S17	E64	07	28.5	2.5	2000	4549	4551A	
19416	BIGB	07	24	2300	S18	E52	07	28.9	2.0	2000	4549	4551A	
19416	BIGB	07	25	1645	S18	E41	07	28.8	2.5	1900	4549	4551A	
19416	BIGB	07	26	1740	S17	E23	07	28.5	2.0	1900	4549	4551A	
19416	BIGB	07	28	1354	S18	W02	07	28.4	2.0	1500	4549	4551A	
19416	BIGB	07	29	1703	S17	W15	07	28.6	2.0	1600	4549	4551A	
19416	BIGB	07	30	1409	S17	W28	07	28.5	2.0	1600	4549	4551A	
19416	BIGB	07	31	1623	S17	W41	07	28.6	2.0	1700	4549	4551A	
19416	BIGB	08	01	1636	S19	W58	07	28.4	2.0	1000	4549	4551A	
19416	BIGB	08	02	1716	S18	W63	07	29.0	1.5	1000	4549	4551A	
19417	BIGB	07	23	1631	N04	E71	07	29.0	1.0	0700	4550		
19417	BIGB	07	24	2300	N04	E60	07	29.4	1.5	1050	4550		
19417	BIGB	07	25	1645	N04	E50	07	29.4	2.0	1400	4550		
19417	BIGB	07	26	1740	N04	E31	07	29.0	1.5	1300	4550		
19417	BIGB	07	28	1354	N03	E06	07	29.0	1.0	1000	4550		
19417	BIGB	07	29	1703	N04	W07	07	29.2	1.0	0900	4550		
19417	BIGB	07	30	1409	N03	W09	07	29.9	1.0	0800	4550		
19417	BIGB	07	31	1623	N03	W33	07	29.2	1.0	0800	4550		
19417	BIGB	08	01	1636	N04	W46	07	29.3	1.0	0650	4550		
19417	BIGB	08	02	1716	N04	W58	07	29.5	1.0	0600	4550		

DAILY PLAGE SUMMARIES

JULY 1984

Day	Sta	Plage Index	Plage Count	Smallest Plage (Millionths	Largest Plage of Solar	Total Area Hemisphere)	Smallest Intensity	Largest Intensity
01	No Observations This DAY							
02	No Observations This DAY							
03	BIGB	26.7	9	300	5000	15125	1.5	3.0
04	BIGB	33.6	9	700	5000	20800	1.0	3.0
05	BIGB	37.8	9	600	5000	20700	1.5	3.5
06	No Observations This DAY							
07	BIGB	38.0	11	500	5000	23400	1.0	3.0
08	No Observations This DAY							
09	BIGB	37.5	11	500	5000	22800	1.0	4.0
10	BIGB	27.4	9	600	5000	18550	1.0	2.5
11	BIGB	23.7	10	600	3600	20300	1.0	2.5
12	BIGB	18.7	11	550	2000	12250	1.0	3.0
13	No Observations This DAY							
14	BIGB	16.8	12	300	2300	14850	1.0	2.5
15	No Observations This DAY							
16	BIGB	15.2	10	125	2000	10700	1.0	2.5
17	BIGB	15.3	10	200	2000	10000	1.0	2.5
18	BIGB	15.4	10	250	2000	10350	1.0	3.0
19	BIGB	12.4	9	250	2000	8500	1.0	2.5
20	BIGB	11.6	9	225	2000	8475	1.0	2.5
21	BIGB	12.0	8	100	2000	7900	1.0	2.5
22	No Observations This DAY							
23	BIGB	9.6	9	100	2000	9650	1.0	2.5
24	BIGB	8.4	7	300	2000	8050	1.0	2.5
25	BIGB	10.2	9	300	4000	12700	1.0	2.5
26	BIGB	9.1	9	125	4000	10575	1.0	2.0
27	No Observations This DAY							
28	BIGB	8.6	5	100	4000	7000	1.0	2.0
29	BIGB	9.6	6	300	4000	7900	1.0	2.0
30	BIGB	9.9	8	200	3800	8300	1.0	2.5
31	BIGB	10.5	8	175	3900	8425	1.0	2.5



BIG BEAR SOLAR OBSERVATORY
ACTIVE REGION SUMMARY

JULY 1984

Region Number	Return Of Region	Rotation Age	First Seen This Rotation	Duration This Rotation
19391	New	1	840629	09 Days
372	Leading portion of 19365	4	840629	11
392	Trailing portion of 19365	4	840629	12
396	New	1	840703	06
398	New	1	840703	08
393	New	1	840703	10
395	New	1	840703	12
397	New	1	840705	10
399	New	1	840703	12
400	19366	3	840707	10
401	19371	2	840707	12
409	New	1	840717	03
412	New	1	840716	05
402	19375	2	840709	12
406	New	1	840714	02
403	19377	4	840711	11
408	New	1	840716	02
404	New	1	840711	13
405	19379	5	840711	13
413	New	1	840721	03
407	19383	2	840714	12
410	New	1	840717	10
418	New	1	840724	03
411	New	1	840718	01
414	New	1	840723	04
420	New	1	840725	02
421	New	1	840726	03
415	19389	3	840721	10
423	New	1	840730	02
416	19392 and 19372	5	840723	12
417	19391	2	840723	12

1. No CaK Observations at BBSO on July 1, 2, 6, 8, 13, 15, 22, 27.

2. No CaK Plots on July 1, 2, 6, 8, 12-16, 22, 23, 27, 28, 30.

3. No KPNO Magnetograms on July 1-11, 13, 15, 19-22, 27.

4. Contiguous Plages: 19372/19392, 19397/19399, 19403/19405/19408.

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

AUGUST 1984

Calcium Plage Region	Sta	Observation Time Mo Day (UT)	Lat CMD	CMP Mo Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19419	BIGB	07 25 1645	N12 E74	07 31.3	1.5	4000	4558A	4558B	
19419	BIGB	07 26 1740	N13 E65	07 31.6	1.5	4000	4558A	4558B	
19419	BIGB	07 28 1354	N10 E40	07 31.6	1.5	4000	4558A	4558B	
19419	BIGB	07 29 1703	N13 E30	08 1.0	1.5	4000	4558A	4558B	
19419	BIGB	07 30 1409	N10 E18	07 31.9	1.5	3800	4558A	4558B	
19419	BIGB	07 31 1623	N12 E05	08 1.1	1.5	3900	4558A	4558B	
19419	BIGB	08 01 1636	N11 W12	07 31.8	1.5	4500	4558A	4558B	
19419	BIGB	08 02 1716	N10 W22	08 1.1	1.5	4500	4558A	4558B	
19419	BIGB	08 03 2200	N11 W37	08 1.1	1.5	4400	4558A	4558B	
19419	BIGB	08 04 2320	N10 W48	08 1.4	1.5	4300	4558A	4558B	
19419	BIGB	08 05 2245	N11 W60	08 1.4	1.5	4300	4558A	4558B	
19419	BIGB	08 06 2330	N12 W65	08 2.1	1.0	2900	4558A	4558B	
19422	BIGB	07 29 1703	S04 E45	08 2.1	2.0	0300			
19422	BIGB	07 30 1409	S04 E31	08 1.9	1.0	0300			
19422	BIGB	07 31 1623	S04 E19	08 2.1	1.0	0300			
19426	BIGB	07 31 1623	N06 E29	08 2.9	1.0	0175			
19426	BIGB	08 01 1636	N05 E16	08 2.9	1.5	0200			
19426	BIGB	08 02 1716	N05 E03	08 2.9	1.0	0250			
19426	BIGB	08 03 2200	N05 W14	08 2.9	1.0	0170			
19424	BIGB	07 29 1703	S04 E77	08 4.5	1.0	0700			
19424	BIGB	07 30 1409	S05 E65	08 4.4	1.0	0500			
19424	BIGB	07 31 1623	S04 E52	08 4.6	1.0	0500			
19424	BIGB	08 01 1636	S03 E38	08 4.5	1.0	0450			
19424	BIGB	08 02 1716	S03 E26	08 4.7	1.0	0550			
19424	BIGB	08 03 2200	S04 E09	08 4.6	1.0	0300			
19424	BIGB	08 04 2320	S03 W05	08 4.6	1.0	0350			
19424	BIGB	08 05 2245	S03 W17	08 4.7	1.0	0400			
19424	BIGB	08 06 2330	S05 W33	08 4.5	1.0	0500			
19424	BIGB	08 07 2047	S06 W49	08 4.2	1.0	0500			
19424	BIGB	08 08 1616	S07 W59	08 4.2	1.0	0450			
19424	BIGB	08 09 1600	S06 W72	08 4.3	1.0	0450			
19431	BIGB	08 06 2330	N09 W27	08 5.0	1.0	0125	4558		
19431	BIGB	08 07 2047	N10 W43	08 4.6	1.0	0300	4558		
19431	BIGB	08 08 1616	N09 W53	08 4.7	1.5	0700	4558		
19431	BIGB	08 09 1600	N09 W66	08 4.7	1.5	0700	4558		
19425	BIGB	07 30 1409	S17 E75	08 5.3	2.5	0700	4552		
19425	BIGB	07 31 1623	S16 E64	08 5.5	2.5	0800	4552		
19425	BIGB	08 01 1636	S16 E51	08 5.5	2.0	1000	4552		
19425	BIGB	08 02 1716	S17 E37	08 5.5	2.5	1100	4552		
19425	BIGB	08 03 2200	S17 E18	08 5.3	2.5	1100	4552		
19425	BIGB	08 04 2320	S17 E03	08 5.2	2.5	0900	4552		
19425	BIGB	08 05 2245	S17 W09	08 5.3	2.0	0800	4552		
19425	BIGB	08 06 2330	S16 W24	08 5.2	1.5	0800	4552		
19425	BIGB	08 07 2047	S19 W39	08 4.9	1.0	0500	4552		
19425	BIGB	08 08 1616	S19 W50	08 4.9	1.5	0400	4552		
19425	BIGB	08 09 1600	S19 W62	08 4.9	1.5	0400	4552		
19427	BIGB	08 02 1716	S06 E75	08 8.3	1.5	1400	4553		
19427	BIGB	08 03 2200	S08 E61	08 8.5	2.0	1100	4553		
19427	BIGB	08 04 2320	S08 E48	08 8.6	2.0	1100	4553		
19427	BIGB	08 05 2245	S09 E34	08 8.5	2.0	1100	4553		
19427	BIGB	08 06 2330	S10 E23	08 8.7	2.0	1300	4553		
19427	BIGB	08 07 2047	S11 E14	08 8.9	1.5	1200	4553		
19427	BIGB	08 08 1616	S12 E03	08 8.9	1.5	1250	4553		
19427	BIGB	08 09 1600	S12 W10	08 8.9	1.5	1250	4553		
19427	BIGB	08 12 1640	S11 W54	08 8.6	1.5	1100	4553		
19427	BIGB	08 13 1749	S11 W68	08 8.6	1.0	0900	4553		

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

AUGUST 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat	CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19429	BIGB	08	04	2320	N00	E67	08	10.0	1.0	0100	4556		
19429	BIGB	08	05	2245	N00	E55	08	10.0	1.5	0300	4556		
19429	BIGB	08	06	2330	N01	E39	08	9.9	1.0	0500	4556		
19429	BIGB	08	07	2047	N01	E26	08	9.8	1.0	0450	4556		
19429	BIGB	08	08	1616	N01	E16	08	9.9	1.0	0450	4556		
19429	BIGB	08	09	1600	N01	E01	08	9.7	1.0	0450	4556		
19428	BIGB	08	03	2200	N09	E76	08	9.6	2.5	2000	4554	4559	
19428	BIGB	08	04	2320	N10	E68	08	10.1	2.5	4850	4554	4559	
19428	BIGB	08	05	2245	N10	E56	08	10.1	3.0	5000	4554	4559	
19428	BIGB	08	06	2330	N11	E40	08	10.0	3.0	4800	4554	4559	
19428	BIGB	08	07	2047	N11	E33	08	10.3	3.0	4800	4554	4559	
19428	BIGB	08	08	1616	N11	E22	08	10.3	3.0	4800	4554	4559	
19428	BIGB	08	09	1600	N11	E09	08	10.3	3.0	4800	4554	4559	
19428	BIGB	08	12	1640	N10	W34	08	10.1	2.5	4700	4554	4559	
19428	BIGB	08	13	1749	N10	W49	08	10.1	2.5	4700	4554	4559	
19428	BIGB	08	16	1554	N11	W80	08	10.6	1.0	2100	4554	4559	
19430	BIGB	08	05	2245	S13	E75	08	11.6	1.0	0600	4559A		
19430	BIGB	08	06	2330	S11	E61	08	11.6	1.0	0600	4559A		
19430	BIGB	08	07	2047	S12	E52	08	11.8	1.5	0350	4559A		
19430	BIGB	08	08	1616	S10	E36	08	11.4	1.5	0300	4559A		
19430	BIGB	08	09	1600	S10	E24	08	11.5	1.5	0300	4559A		
19435	BIGB	08	16	1554	N04	W63	08	11.9	1.0	0300	4563		
19435	BIGB	08	17	1651	N04	W76	08	12.0	2.0	0700	4563		
19432	BIGB	08	06	2330	N02	E76	08	12.7	1.5	0200	4560	4560A	
19432	BIGB	08	07	2047	N01	E73	08	13.3	2.0	0700	4560	4560A	
19432	BIGB	08	08	1616	N03	E53	08	12.6	2.0	0800	4560	4560A	
19432	BIGB	08	09	1600	N02	E42	08	12.8	2.0	0800	4560	4560A	
19432	BIGB	08	12	1640	N03	E01	08	12.8	1.5	0650	4560	4560A	
19432	BIGB	08	13	1749	N03	W12	08	12.8	1.5	0550	4560	4560A	
19432	BIGB	08	16	1554	N03	W52	08	12.8	2.0	0400	4560	4560A	
19432	BIGB	08	17	1651	N03	W67	08	12.7	2.0	0500	4560	4560A	
19432	BIGB	08	18	1431	N03	W79	08	12.7	1.0	0500	4560	4560A	
19433	BIGB	08	13	1749	N06	E17	08	15.0	1.0	0200	4560C		
19434	BIGB	08	13	1749	N12	E27	08	15.8	1.0	0150	4562		
19434	BIGB	08	16	1554	N13	W11	08	15.8	1.0	0150	4562		
19434	BIGB	08	17	1651	N14	W25	08	15.8	1.0	0250	4562		
19434	BIGB	08	18	1431	N13	W36	08	15.9	1.0	0200	4562		
19438	BIGB	08	24	2258	S11	W74	08	19.4	1.0	0100			
19439	BIGB	08	24	2258	S16	W62	08	20.2	1.0	0200	4566		
19439	BIGB	08	25	1805	S16	W69	08	20.5	3.0	0400	4566		
19436	BIGB	08	16	1554	S11	E78	08	22.5	1.5	1000	4564		
19436	BIGB	08	17	1651	S11	E66	08	22.7	2.0	1200	4564		
19436	BIGB	08	18	1431	S10	E53	08	22.6	2.0	1000	4564		
19436	BIGB	08	20	1711	S09	E27	08	22.7	2.0	0500	4564		
19436	BIGB	08	21	1509	S09	E12	08	22.5	2.0	0650	4564		
19436	BIGB	08	24	2258	S10	W29	08	22.8	2.0	0600	4564		
19436	BIGB	08	25	1805	S10	W40	08	22.7	2.0	0400	4564		
19436	BIGB	08	26	1655	S10	W52	08	22.8	1.0	0400	4564		
19436	BIGB	08	27	1552	S11	W72	08	22.2	1.0	0300	4564		
19437	BIGB	08	20	1711	S12	E52	08	24.6	1.0	0325	4565		
19437	BIGB	08	21	1509	S13	E40	08	24.6	2.5	0550	4565		
19437	BIGB	08	24	2258	S12	W06	08	24.5	2.5	0850	4565		
19437	BIGB	08	25	1805	S13	W18	08	24.4	2.5	1100	4565		
19437	BIGB	08	26	1655	S14	W31	08	24.4	3.0	1450	4565		
19437	BIGB	08	27	1552	S14	W47	08	24.1	3.0	1450	4565		

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

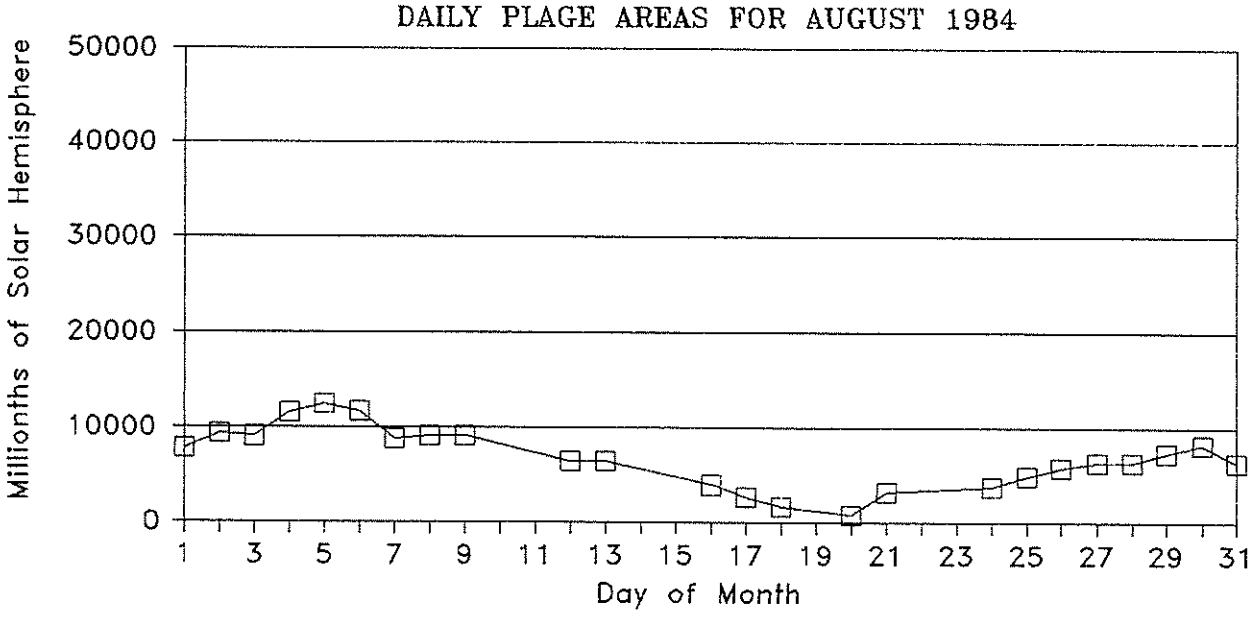
AUGUST 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19437	BIGB	08	28	1610	S14 W62	08	24.0	2.5	1600	4565		
19437	BIGB	08	29	1655	S14 W73	08	24.2	3.0	2000	4565		
19440	BIGB	08	21	1509	N08 E77	08	27.4	1.0	2000			
19440	BIGB	08	24	2258	N11 E48	08	28.6	1.0	2000			
19440	BIGB	08	25	1805	N13 E28	08	27.9	1.0	2000			
19440	BIGB	08	26	1655	N13 E16	08	27.9	1.0	2000			
19440	BIGB	08	27	1552	N11 E01	08	27.7	1.0	2000			
19440	BIGB	08	28	1610	N12 W09	08	28.0	1.0	2000			
19440	BIGB	08	29	1655	N11 W24	08	27.9	1.0	2000			
19440	BIGB	08	30	1445	N11 W34	08	28.0	1.0	2000			
19451	BIGB	08	31	1826	S19 W35	08	29.1	1.0	0100			
19451	BIGB	09	01	2200	S19 W50	08	29.2	1.0	0125			
19451	BIGB	09	02	1811	S20 W61	08	29.2	1.0	0125			
19451	BIGB	09	03	1811	S19 W74	08	29.2	1.0	0100			
19444	BIGB	08	29	1655	N00 W01	08	29.6	1.0	0200			
19443	BIGB	08	27	1552	N17 E32	08	30.1	1.0	0200	4565A		
19443	BIGB	08	28	1610	N17 E21	08	30.3	1.0	0200	4565A		
19443	BIGB	08	29	1655	N17 E05	08	30.1	1.0	0150	4565A		
19441	BIGB	08	25	1805	S05 E68	08	30.8	3.5	0700	4567		
19441	BIGB	08	26	1655	S06 E56	08	30.9	3.0	1600	4567		
19441	BIGB	08	27	1552	S06 E41	08	30.7	3.0	2000	4567		
19441	BIGB	08	28	1610	S06 E30	08	30.9	3.0	2000	4567		
19441	BIGB	08	29	1655	S06 E15	08	30.8	3.0	2200	4567		
19441	BIGB	08	30	1445	S06 E04	08	30.9	3.0	2300	4567		
19441	BIGB	08	31	1826	S06 W12	08	30.9	3.0	2300	4567		
19441	BIGB	09	01	2200	S05 W26	08	31.0	3.5	2500	4567		
19441	BIGB	09	02	1811	S07 W39	08	30.9	3.5	2500	4567		
19441	BIGB	09	03	1811	S07 W52	08	31.0	3.5	2350	4567		
19441	BIGB	09	04	1555	S08 W70	08	30.5	3.0	2350	4567		
19441	BIGB	09	05	1602	S08 W76	08	31.0	2.5	2350	4567		
19450	BIGB	09	04	1555	S19 W62	08	31.0	1.5	0800	4574		
19450	BIGB	09	05	1602	S18 W74	08	31.0	1.5	0800	4574		
19442	BIGB	08	25	1805	N08 E75	08	31.4	1.0	0300	4574A		
19442	BIGB	08	26	1655	N07 E63	08	31.4	1.0	0350	4574A		
19442	BIGB	08	27	1552	N10 E50	08	31.4	1.0	0400	4574A		
19442	BIGB	08	28	1610	N10 E37	08	31.4	1.0	0500	4574A		
19442	BIGB	08	29	1655	N10 E24	08	31.5	1.0	0450	4574A		
19442	BIGB	08	30	1445	N09 E12	08	31.5	1.0	0400	4574A		

D A I L Y P L A G E S U M M A R I E S

AUGUST 1984

Day	Sta	Plage Index	Plage Count	Smallest Plage (Millionths	Largest Plage of Solar	Total Area Hemisphere)	Smallest Intensity	Largest Intensity
01	BIGB	9.7	6	200	4500	7800	1.0	2.0
02	BIGB	10.3	7	250	4500	9400	1.0	2.5
03	BIGB	10.1	6	170	4400	9070	1.0	2.5
04	BIGB	12.2	6	100	4850	11600	1.0	2.5
05	BIGB	15.0	7	300	5000	12500	1.0	3.0
06	BIGB	16.4	9	125	4800	11725	1.0	3.0
07	BIGB	15.4	8	300	4800	8800	1.0	3.0
08	BIGB	17.8	8	300	4800	9150	1.0	3.0
09	BIGB	18.6	8	300	4800	9150	1.0	3.0
10	No Observations This DAY							
11	No Observations This DAY							
12	BIGB	11.4	3	650	4700	6450	1.5	2.5
13	BIGB	8.8	5	150	4700	6500	1.0	2.5
14	No Observations This DAY							
15	No Observations This DAY							
16	BIGB	1.3	5	150	2100	3950	1.0	2.0
17	BIGB	1.8	4	250	1200	2650	1.0	2.0
18	BIGB	1.4	3	200	1000	1700	1.0	2.0
19	No Observations This DAY							
20	BIGB	1.1	2	325	500	825	1.0	2.0
21	BIGB	2.6	3	550	2000	3200	1.0	2.5
22	No Observations This DAY							
23	No Observations This DAY							
24	BIGB	4.5	5	100	2000	3750	1.0	2.5
25	BIGB	6.1	6	300	2000	4900	1.0	3.5
26	BIGB	8.4	5	350	2000	5800	1.0	3.0
27	BIGB	9.7	6	200	2000	6350	1.0	3.0
28	BIGB	9.4	5	200	2000	6300	1.0	3.0
29	BIGB	10.5	7	150	2200	7300	1.0	3.0
30	BIGB	10.1	5	400	3000	8200	1.0	3.0
31	BIGB	9.4	4	100	3500	6400	1.0	3.0



BIG BEAR SOLAR OBSERVATORY
ACTIVE REGION SUMMARY

AUGUST 1984

Region Number	Return Of Region	Rotation Age	First Seen This Rotation	Duration This Rotation
19419	19392 and 19372	5	840725	14 Days
422	New	1	840729	03
426	New	1	840731	04
431	New	1	840806	04
424	New	1	840729	07
425	New	1	840730	07
427	19401	3	840802	12
429	New	1	840804	06
428	New	1	840803	14
430	New (in vicinity of 19430)	1	840805	05
435	New	1	840816	02
432	New	1	840806	13
433	New	1	840813	01
434	New	1	840813	06
438	New	1	840824	01
439	New	1	840824	03
436	New	1	840816	12
437	New (in vicinity of 19416)	1	840820	11
440	19419	6	840821	13
451	New	1	840831	04
444	New	1	840829	01
443	New	1	840827	03
441	New	1	840825	11
450	New	1	840904	02
442	19431	2	840825	06

1. No CaK Observations at BBSO on August 10, 11, 14, 15, 19, 22, 23.

2. No CaK Plots on August 1, 2, 6, 8, 12-16, 23, 27, 28, 30.

3. No KPNO Magnetograms on August 9-11, 14, 15.

4. No Contiguous Plages.

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

SEPTEMBER 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19452	BIGB	09	05	1602	N11 W50	09	1.9	2.0	0450	4575		
19452	BIGB	09	06	1806	N11 W65	09	1.9	3.0	0450	4575		
19452	BIGB	09	07	1911	N11 W80	09	1.8	2.0	0600	4575		
19449	BIGB	09	02	1811	S11 W01	09	2.7	2.0	0300	4572		
19449	BIGB	09	03	1811	S11 W13	09	2.8	3.0	0750	4572		
19449	BIGB	09	04	1555	S11 W26	09	2.7	2.5	1350	4572		
19449	BIGB	09	05	1602	S14 W42	09	2.5	2.0	1350	4572		
19449	BIGB	09	06	1806	S13 W56	09	2.5	2.5	1000	4572		
19449	BIGB	09	07	1911	S13 W68	09	2.7	2.0	1000	4572		
19445	BIGB	08	29	1655	S05 E75	09	4.3	1.0	0300			
19445	BIGB	08	30	1445	S06 E64	09	4.4	1.0	0500			
19445	BIGB	08	31	1826	S05 E49	09	4.4	1.0	0500			
19445	BIGB	09	01	2200	S05 E34	09	4.4	1.5	0300			
19445	BIGB	09	02	1811	S05 E23	09	4.5	1.5	0300			
19445	BIGB	09	03	1811	S05 E10	09	4.5	1.0	0250			
19445	BIGB	09	04	1555	S05 W02	09	4.5	1.0	0275			
19445	BIGB	09	05	1602	S05 W15	09	4.5	1.0	0300			
19445	BIGB	09	06	1806	S05 W29	09	4.6	1.0	0300			
19454	BIGB	09	07	1911	N02 W25	09	5.9	1.0	0150			
19446	BIGB	08	30	1445	N09 E75	09	5.2	1.5	3000	4569	4573A	
19446	BIGB	08	31	1826	N09 E62	09	5.4	1.5	3500	4569	4573A	
19446	BIGB	09	01	2200	N18 E51	09	5.8	2.0	3500	4569	4573A	
19446	BIGB	09	02	1811	N11 E42	09	5.9	2.0	3500	4569	4573A	
19446	BIGB	09	03	1811	N12 E30	09	6.0	2.0	3500	4569	4573A	
19446	BIGB	09	04	1555	N13 E18	09	6.0	1.5	3500	4569	4573A	
19446	BIGB	09	05	1602	N12 E05	09	6.0	2.0	3500	4569	4573A	
19446	BIGB	09	06	1806	N11 W09	09	6.1	1.5	3500	4569	4573A	
19446	BIGB	09	07	1911	N12 W24	09	6.0	1.5	3350	4569	4573A	
19446	BIGB	09	09	1544	N13 W45	09	6.3	1.5	3300	4569	4573A	
19446	BIGB	09	10	1727	N12 W62	09	6.0	1.0	3200	4569	4573A	
19446	BIGB	09	11	1610	N13 W67	09	6.6	1.0	1300	4569	4573A	
19447	BIGB	09	01	2200	N06 E58	09	6.3	2.5	0850	4573		
19447	BIGB	09	02	1811	N01 E48	09	6.3	2.5	0850	4573		
19447	BIGB	09	03	1811	N00 E34	09	6.3	2.0	0800	4573		
19447	BIGB	09	04	1555	N00 E22	09	6.3	2.5	0800	4573		
19447	BIGB	09	05	1602	N00 E08	09	6.3	2.5	0900	4573		
19447	BIGB	09	06	1806	N01 W06	09	6.3	2.5	0900	4573		
19447	BIGB	09	07	1911	N01 W19	09	6.4	2.0	0700	4573		
19447	BIGB	09	09	1544	N01 W49	09	6.0	2.0	0700	4573		
19447	BIGB	09	10	1727	N00 W64	09	5.9	1.0	0600	4573		
19448	BIGB	09	01	2200	N04 E77	09	7.7	2.0	2200	4569A	4571	
19448	BIGB	09	02	1811	N04 E66	09	7.7	2.5	2200	4569A	4571	
19448	BIGB	09	03	1811	N04 E52	09	7.6	3.0	2200	4569A	4571	
19448	BIGB	09	04	1555	N04 E43	09	7.9	2.5	2300	4569A	4571	
19448	BIGB	09	05	1602	N04 E28	09	7.8	2.5	2300	4569A	4571	
19448	BIGB	09	06	1806	N04 E15	09	7.9	2.5	2000	4569A	4571	
19448	BIGB	09	07	1911	N04 E01	09	7.9	2.0	1900	4569A	4571	
19448	BIGB	09	09	1544	N04 W24	09	7.9	2.0	1900	4569A	4571	
19448	BIGB	09	10	1727	N04 W37	09	8.0	2.0	1700	4569A	4571	
19448	BIGB	09	11	1610	N04 W50	09	7.9	2.0	1700	4569A	4571	
19448	BIGB	09	12	1700	S01 W78	09	6.9	2.0	1700	4569A	4571	
19453	BIGB	09	05	1602	S15 E38	09	8.5	1.0	0200			
19453	BIGB	09	06	1806	S16 E24	09	8.6	1.0	0325			
19455	BIGB	09	07	1911	N11 E30	09	10.0	1.5	0150			

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

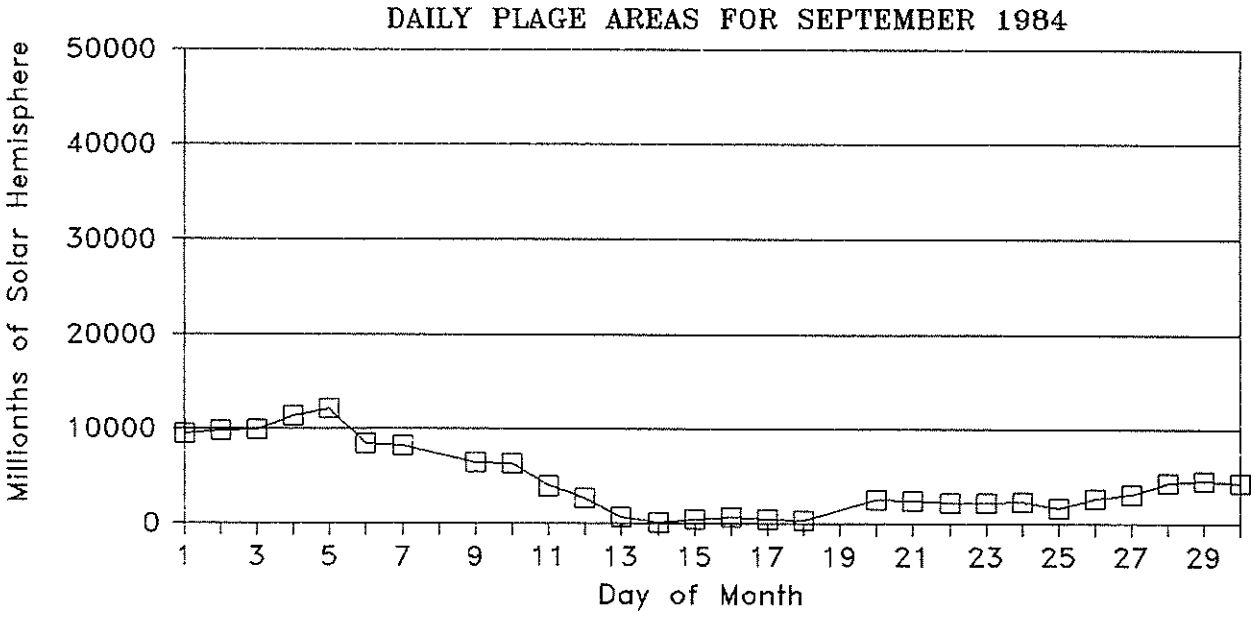
SEPTEMBER 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19456	BIGB	09	07	1911	S03 E58	09	12.1	2.0	0100	4576		
19456	BIGB	09	09	1544	S03 E33	09	12.1	2.0	0150	4576		
19456	BIGB	09	10	1727	S03 E19	09	12.1	1.0	0250	4576		
19456	BIGB	09	11	1610	S03 E06	09	12.1	1.5	0400	4576		
19456	BIGB	09	12	1700	S03 W11	09	11.9	1.0	0400	4576		
19456	BIGB	09	13	1627	S05 W23	09	12.0	1.0	0300	4576		
19458	BIGB	09	09	1544	N10 E33	09	12.1	1.0	0100	4571A		
19458	BIGB	09	10	1727	N10 E19	09	12.1	1.0	0150	4571A		
19458	BIGB	09	11	1610	N15 E06	09	12.1	1.0	0150	4571A		
19458	BIGB	09	12	1700	N15 W08	09	12.1	1.0	0100	4571A		
19457	BIGB	09	07	1911	S13 E68	09	12.9	1.0	0300			
19457	BIGB	09	09	1544	S13 E45	09	13.0	1.0	0300			
19457	BIGB	09	10	1727	S14 E31	09	13.1	1.0	0400			
19457	BIGB	09	11	1610	S14 E19	09	13.1	1.5	0400			
19457	BIGB	09	12	1700	S14 E05	09	13.1	1.0	0500			
19457	BIGB	09	13	1627	S14 W07	09	13.1	1.0	0400			
19459	BIGB	09	14	1747	N13 W21	09	13.1	1.0	0100	4576A		
19459	BIGB	09	15	1653	N13 W32	09	13.3	1.0	0400	4576A		
19459	BIGB	09	16	1611	N13 W45	09	13.3	1.0	0400	4576A		
19459	BIGB	09	17	1413	N13 W58	09	13.2	1.0	0300	4576A		
19459	BIGB	09	18	1412	N13 W71	09	13.2	1.0	0300	4576A		
19462	BIGB	09	20	1414	S09 W22	09	18.9	1.5	0600	4579		
19462	BIGB	09	21	1646	S09 W40	09	18.7	1.5	0500	4579		
19462	BIGB	09	22	1635	S09 W53	09	18.7	1.5	0500	4579		
19462	BIGB	09	23	1825	S09 W71	09	18.4	1.0	0550	4579		
19462	BIGB	09	24	1846	S09 W84	09	18.5	1.0	0550	4579		
19461	BIGB	09	15	1653	N14 E46	09	19.2	1.0	0100	4579A		
19461	BIGB	09	16	1611	N13 E33	09	19.2	1.0	0250	4579A		
19461	BIGB	09	17	1413	N13 E20	09	19.1	1.0	0175	4579A		
19464	BIGB	09	23	1825	N07 W42	09	20.6	1.0	0100			
19464	BIGB	09	24	1846	N07 W55	09	20.7	1.0	0100			
19463	BIGB	09	20	1414	S04 E77	09	26.3	2.0	2000	4579B		
19463	BIGB	09	21	1646	S05 E64	09	26.5	2.0	2000	4579B		
19463	BIGB	09	22	1635	S05 E52	09	26.6	2.0	1700	4579B		
19463	BIGB	09	23	1825	S05 E40	09	26.7	2.0	1600	4579B		
19463	BIGB	09	24	1846	S04 E25	09	26.6	2.0	1700	4579B		
19463	BIGB	09	25	1714	S04 E12	09	26.6	2.0	1700	4579B		
19463	BIGB	09	26	1737	S05 W01	09	26.6	1.5	1700	4579B		
19463	BIGB	09	27	1654	S05 W15	09	26.6	1.5	1700	4579B		
19463	BIGB	09	28	1623	S04 W28	09	26.6	1.5	1650	4579B		
19463	BIGB	09	29	1657	S04 W39	09	26.8	1.5	1600	4579B		
19463	BIGB	09	30	1558	S04 W52	09	26.8	1.5	1500	4579B		
19467	BIGB	09	29	1657	S09 W06	09	29.2	1.0	0250	4580		
19467	BIGB	09	30	1558	S09 W18	09	29.3	1.0	0300	4580		
19467	BIGB	10	03	1735	S07 W73	09	28.4	1.0	0250	4580		

D A I L Y P L A G E S U M M A R I E S

SEPTEMBER 1984

Day	Sta	Plage Index	Plage Count	Smallest Plage (Millionths	Largest Plage of Solar	Total Area Hemisphere)	Smallest Intensity	Largest Intensity
01	BIGB	14.2	6	125	3500	9475	1.0	3.5
02	BIGB	16.2	7	125	3500	9775	1.0	3.5
03	BIGB	18.4	7	100	3500	9950	1.0	3.5
04	BIGB	16.7	7	275	3500	11375	1.0	3.0
05	BIGB	18.5	9	200	3500	12150	1.0	2.5
06	BIGB	14.5	7	300	3500	8475	1.0	3.0
07	BIGB	10.9	9	100	3350	8250	1.0	2.0
08	No Observations This DAY							
09	BIGB	8.2	6	100	3300	6450	1.0	2.0
10	BIGB	5.0	6	150	3200	6300	1.0	2.0
11	BIGB	3.9	5	150	1700	3950	1.0	2.0
12	BIGB	1.6	4	100	1700	2700	1.0	2.0
13	BIGB	0.7	2	300	400	700	1.0	1.0
14	BIGB	0.1	1	100	100	100	1.0	1.0
15	BIGB	0.4	2	100	400	500	1.0	1.0
16	BIGB	0.5	2	250	400	650	1.0	1.0
17	BIGB	0.3	2	175	300	475	1.0	1.0
18	BIGB	0.1	1	300	300	300	1.0	1.0
19	No Observations This DAY							
20	BIGB	1.6	2	600	2000	2600	1.5	2.0
21	BIGB	2.2	2	500	2000	2500	1.5	2.0
22	BIGB	2.5	2	500	1700	2200	1.5	2.0
23	BIGB	2.6	3	100	1600	2250	1.0	2.0
24	BIGB	3.1	3	100	1700	2350	1.0	2.0
25	BIGB	3.3	1	1700	1700	1700	2.0	2.0
26	BIGB	2.9	2	1000	1700	2700	1.5	1.5
27	BIGB	3.4	2	1400	1700	3100	1.5	1.5
28	BIGB	3.9	3	1000	1700	4350	1.5	1.5
29	BIGB	3.8	4	250	1700	4550	1.0	1.5
30	BIGB	3.7	4	300	1700	4400	1.0	1.5



BIG BEAR SOLAR OBSERVATORY
ACTIVE REGION SUMMARY

SEPTEMBER 1984

Region Number	Return Of Region	Rotation Age	First Seen This Rotation	Duration This Rotation
19452	New	1	840905	03 Days
449	New	1	840902	06
445	Upper portion of 19427	4	840829	09
446	19428	2	840830	14
454	New	1	840907	01
447	New	1	840901	10
448	19435	2	840901	13
453	New	1	840905	02
455	New	1	840907	01
456	New	1	840907	07
458	New	1	840909	04
457	New	1	840907	07
459	New	1	840914	05
461	New	1	840915	03
462	New	1	840920	05
464	New	1	840923	02
463	19441	2	840920	13
467	New	1	840929	06

1. No CaK Observations at BBSO on September 8, 19.

2. No CaK Plots on September 8, 14, 21, 30.

3. No KPNO Magnetograms on September 1, 8-10, 20, 22, 25, 26.

4. Contiguous Plages: 19447/19454.

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

OCTOBER 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat	CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19465	BIGB	09	26	1737	N10	E74	10	2.3	1.5	1000	4581B		
19465	BIGB	09	27	1654	N10	E62	10	2.4	1.5	1400	4581B		
19465	BIGB	09	28	1623	N11	E50	10	2.4	1.5	1700	4581B		
19465	BIGB	09	29	1657	N11	E37	10	2.5	1.0	1700	4581B		
19465	BIGB	09	30	1558	N11	E24	10	2.5	1.0	1700	4581B		
19466	BIGB	09	28	1623	N05	E81	10	4.7	1.5	1000	4581	4581C	
19466	BIGB	09	29	1657	N05	E65	10	4.6	1.0	1000	4581	4581C	
19466	BIGB	09	30	1558	N05	E52	10	4.5	1.0	0900	4581	4581C	
19471	BIGB	10	07	1735	S09	W38	10	4.9	1.0	0150			
19471	BIGB	10	08	1923	S09	W53	10	4.8	1.0	0125			
19474	BIGB	10	12	1752	N03	W65	10	7.9	2.5	0237	4581D		
19474	BIGB	10	13	1727	N03	W79	10	7.8	1.3	0312	4581D		
19470	BIGB	10	07	1735	S04	E19	10	9.1	2.0	0100	4582		
19470	BIGB	10	08	1923	S05	E03	10	9.0	2.0	0300	4582		
19470	BIGB	10	09	2127	S05	W11	10	9.1	1.6	0402	4582		
19470	BIGB	10	10	1736	S05	W24	10	8.9	1.4	0450	4582		
19470	BIGB	10	12	1752	S05	W51	10	8.9	2.5	1010	4582		
19470	BIGB	10	13	1727	S05	W64	10	8.9	2.6	1229	4582		
19470	BIGB	10	14	1845	S05	W79	10	8.9	2.0	1364	4582		
19468	BIGB	10	03	1735	S04	E76	10	9.4	1.5	0850	4582		
19468	BIGB	10	04	1750	S05	E64	10	9.5	1.5	0850	4582		
19468	BIGB	10	05	1940	S04	E48	10	9.4	1.5	0850	4582		
19468	BIGB	10	06	1807	S04	E37	10	9.5	1.5	0850	4582		
19468	BIGB	10	07	1735	S04	E23	10	9.4	1.5	0825	4582		
19468	BIGB	10	08	1923	S03	E09	10	9.5	1.5	0825	4582		
19468	BIGB	10	09	2127	S04	W04	10	9.6	.8	0626	4582		
19468	BIGB	10	10	1736	S04	W15	10	9.6	1.0	0534	4582		
19468	BIGB	10	12	1752	S04	W42	10	9.6	1.0	0477	4582		
19468	BIGB	10	13	1727	S04	W55	10	9.6	1.0	0686	4582		
19468	BIGB	10	14	1845	S03	W69	10	9.6	1.0	0651	4582		
19469	BIGB	10	03	1735	N05	E79	10	9.6	1.5	0750	4582A		
19469	BIGB	10	04	1750	N03	E69	10	9.9	1.5	0750	4582A		
19469	BIGB	10	05	1940	N03	E54	10	9.8	1.5	0725	4582A		
19469	BIGB	10	06	1807	N04	E42	10	9.9	1.5	0700	4582A		
19469	BIGB	10	07	1735	N03	E29	10	9.9	1.5	0700	4582A		
19469	BIGB	10	08	1923	N03	E14	10	9.8	1.5	0700	4582A		
19469	BIGB	10	09	2127	N03	W00	10	9.9	.9	0500	4582A		
19469	BIGB	10	10	1736	N03	W11	10	9.9	1.0	0524	4582A		
19469	BIGB	10	12	1752	N03	W37	10	10.0	1.0	0377	4582A		
19469	BIGB	10	13	1727	N03	W50	10	10.0	.7	0468	4582A		
19469	BIGB	10	14	1845	N03	W64	10	10.0	1.0	0602	4582A		
19472	BIGB	10	10	1736	S08	E22	10	12.4	2.0	0226	4583		
19472	BIGB	10	12	1752	S08	W05	10	12.4	2.0	0431	4583		
19472	BIGB	10	13	1727	S08	W18	10	12.4	1.5	0337	4583		
19472	BIGB	10	14	1845	S08	W32	10	12.4	1.0	0313	4583		
19472	BIGB	10	15	2142	S08	W47	10	12.4	1.0	0309	4583		
19472	BIGB	10	16	1746	S08	W59	10	12.3	1.0	0243	4583		
19472	BIGB	10	17	1621	S08	W74	10	12.1	1.0	0579	4583		
19473	BIGB	10	10	1736	N20	E62	10	15.5	2.1	0203			
19475	BIGB	10	12	1752	N21	E67	10	17.9	1.5	0274			
19475	BIGB	10	13	1727	N21	E53	10	17.8	.6	0115			
19475	BIGB	10	14	1845	N21	E39	10	17.8	1.0	0057			
19477	BIGB	10	18	2055	N46	E05	10	19.3	1.3	0095			
19477	BIGB	10	19	1728	N46	W06	10	19.2	.9	0186			
19477	BIGB	10	21	1640	N47	W32	10	19.0	.5	0117			

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

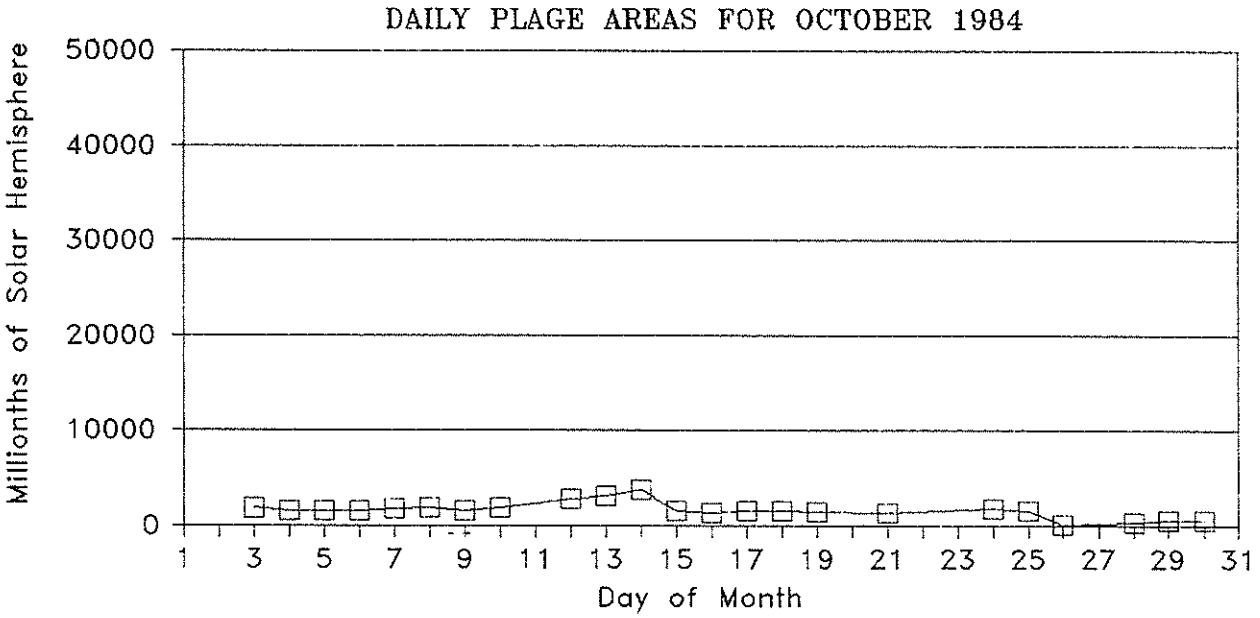
OCTOBER 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19476	BIGB	10	14	1845	N04 E69	10	19.9	3.0	0802	4586		
19476	BIGB	10	15	2142	N04 E53	10	19.9	2.5	1248	4586		
19476	BIGB	10	16	1746	N04 E41	10	19.8	2.5	1153	4586		
19476	BIGB	10	17	1621	N04 E29	10	19.8	2.5	0975	4586		
19476	BIGB	10	18	2055	N03 E12	10	19.8	2.0	1104	4586		
19476	BIGB	10	19	1728	N03 E01	10	19.8	2.0	0885	4586		
19476	BIGB	10	21	1640	N02 W26	10	19.7	2.0	1246	4586		
19476	BIGB	10	24	1633	N03 W70	10	19.4	2.0	1842	4586		
10476	BIGB	10	25	1636	N03 W78	10	19.9	2.3	1559			
19478	BIGB	10	18	2055	N05 E69	10	24.0	1.2	0410			
19478	BIGB	10	19	1728	N05 E58	10	24.1	1.4	0349			
19479	BIGB	10	26	1533	N13 E10	10	27.4	.8	0127	4587		
19479	BIGB	10	28	1659	N14 W16	10	27.5	.9	0140	4587		
19479	BIGB	10	29	1940	N17 W35	10	27.1	1.0	0237	4587		
19479	BIGB	10	30	1839	N17 W47	10	27.2	.5	0147	4587		
19480	BIGB	10	28	1659	N08 E13	10	29.7	.6	0180			
19482	BIGB	10	30	1839	S12 W03	10	30.5	1.3	0220	4589		
19482	BIGB	11	01	2250	S12 W34	10	30.5	2.0	0403	4589		
19482	BIGB	11	02	1610	S12 W44	11	30.4	2.0	0350	4589		
19482	BIGB	11	03	2237	S12 W62	10	30.4	1.2	0118	4589		
19482	BIGB	11	04	2245	S13 W78	10	30.2	1.0	0355	4589		
19483	BIGB	11	01	2250	S10 W28	10	30.9	1.6	0186	4590		
19483	BIGB	11	02	1610	S10 W38	11	30.8	1.5	0400	4590		
19483	BIGB	11	03	2237	S10 W54	10	31.0	2.5	0603	4590		
19483	BIGB	11	04	2245	S09 W70	10	30.8	3.0	1435	4590		
19483	BIGB	11	05	1915	S11 W79	10	30.9	3.0	1946	4590		

D A I L Y P L A G E S U M M A R I E S

OCTOBER 1984

Day	Sta	Plage Index	Plage Count	Smallest Plage (Millionths	Largest Plage of Solar	Total Area Hemisphere)	Smallest Intensity	Largest Intensity
01	No Observations This DAY							
02	No Observations This DAY							
03	BIGB	0.5	3	250	850	1850	1.0	1.5
04	BIGB	0.9	2	750	850	1600	1.5	1.5
05	BIGB	1.4	2	725	850	1575	1.5	1.5
06	BIGB	1.8	2	700	850	1550	1.5	1.5
07	BIGB	2.3	4	100	825	1775	1.0	2.0
08	BIGB	2.9	4	125	825	1950	1.0	2.0
09	BIGB	1.6	3	402	626	1528	.8	1.6
10	BIGB	2.2	5	203	534	1937	1.0	2.1
11	No Observations This DAY							
12	BIGB	3.4	6	237	1010	2806	1.0	2.5
13	BIGB	2.5	6	115	1229	3147	.6	2.6
14	BIGB	2.0	6	57	1364	3789	1.0	3.0
15	BIGB	2.0	2	309	1248	1557	1.0	2.5
16	BIGB	2.3	2	243	1153	1396	1.0	2.5
17	BIGB	2.3	2	579	975	1554	1.0	2.5
18	BIGB	2.4	3	95	1104	1609	1.2	2.0
19	BIGB	2.1	3	186	885	1420	.9	2.0
20	No Observations This DAY							
21	BIGB	2.3	2	117	1246	1363	.5	2.0
22	No Observations This DAY							
23	No Observations This DAY							
24	BIGB	1.2	1	1842	1842	1842	2.0	2.0
25	BIGB	0.6	1	1559	1559	1559	2.3	2.3
26	BIGB	0.1	1	127	127	127	.8	.8
27	No Observations This DAY							
28	BIGB	0.2	2	140	180	320	.6	.9
29	BIGB	0.4	2	237	324	561	.9	1.0
30	BIGB	0.4	3	147	220	547	.5	1.3
31	No Observations This DAY							



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Late
Oct 84

BIG BEAR SOLAR OBSERVATORY
ACTIVE REGION SUMMARY

OCTOBER 1984

Region Number	Return Of Region	Rotation Age	First Seen This Rotation	Duration This Rotation
19465	19446	3	840926	13 Days
466	19448	3	840928	13
471	New	1	841007	02
474	New	1	841012	02
470	New	1	841007	08
468	New	1	841003	12
469	New	1	841003	12
472	New	1	841010	08
473	New	1	841010	02
475	New	1	841012	03
477	New	1	841018	04
476	New	1	841014	12
478	New	1	841018	02
479	New	1	841026	06
480	New	1	841027	02
482	New	1	841030	06
483	New	1	841101	05

1. No CaK Observations at BBSO on October 1, 2, 11, 20, 22, 23, 27, 31.

2. No CaK Plots on October 1, 2, 11, 20, 22, 23, 27, 31.

3. No KPNO Magnetograms on October 1-3, 5, 11, 12, 15, 17, 18, 20, 21, 24-26.

4. Contiguous Plages: 19468/19470.

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

NOVEMBER 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat	CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19481	BIGB	10	29	1940	N03	E45	11	2.2	.9	0324	4588		
19481	BIGB	10	30	1839	N02	E31	11	2.1	.7	0180	4588		
19481	BIGB	11	01	2250	N01	E01	11	2.0	1.5	0135	4588		
19481	BIGB	11	02	1610	N01	W12	11	1.8	1.0	0350	4588		
19487	BIGB	11	09	1725	S07	W61	11	5.1	2.5	0125	4588A		
19487	BIGB	11	10	1839	S09	W77	11	5.0	2.0	0632	4588A		
19488	BIGB	11	09	1725	N03	W35	11	7.1	1.3	0100			
19460	BIGB	11	02	1610	N10	E75	11	8.3	.7	0400			
19460	BIGB	11	03	2237	N09	E57	11	8.2	.7	0357			
19493	BIGB	11	11	2055	N08	W45	11	8.5	1.1	0154			
19493	BIGB	11	12	1749	N08	W56	11	8.5	1.2	0243			
19493	BIGB	11	13	1619	N08	W69	11	8.5	.7	0270			
19484	BIGB	11	03	2237	S16	E76	11	9.7	2.4	1534	4591		
19484	BIGB	11	04	2245	S17	E65	11	9.9	2.8	1614	4591		
19484	BIGB	11	05	1915	S17	E56	11	10.0	2.5	1407	4591		
19484	BIGB	11	06	1754	S18	E42	11	9.9	2.2	1004	4591		
19484	BIGB	11	07	1646	S18	E29	11	9.9	2.2	0857	4591		
19484	BIGB	11	08	1940	S17	E14	11	9.9	2.0	0783	4591		
19484	BIGB	11	09	1725	S15	W00	11	9.7	2.0	1500	4591		
19484	BIGB	11	10	1839	S18	W12	11	9.9	1.5	1300	4591		
19484	BIGB	11	11	2055	S18	W27	11	9.8	1.3	0940	4591		
19484	BIGB	11	12	1749	S18	W38	11	9.8	1.0	0705	4591		
19484	BIGB	11	13	1619	S17	W51	11	9.8	1.0	1110	4591		
19484	BIGB	11	14	1607	S17	W64	11	9.8	1.0	0850	4591		
19484	BIGB	11	15	1823	S17	W71	11	10.4	.5	0650	4591		
19494	BIGB	11	12	1749	N20	W26	11	10.7	.6	0144			
19494	BIGB	11	13	1619	N22	W38	11	10.7	.5	0260			
19494	BIGB	11	14	1607	N18	W52	11	10.7	.3	0260			
19494	BIGB	11	15	1823	N18	W65	11	10.8	.4	0260			
19485	BIGB	11	05	1915	S12	E73	11	11.3	1.8	1033	4591A		
19485	BIGB	11	06	1754	S11	E59	11	11.2	1.5	0592	4591A		
19485	BIGB	11	07	1646	S11	E44	11	11.0	1.9	0444	4591A		
19485	BIGB	11	08	1940	S11	E29	11	11.0	1.0	0350	4591A		
19485	BIGB	11	09	1725	S09	E18	11	11.1	1.0	0650	4591A		
19485	BIGB	11	10	1839	S12	E04	11	11.1	.8	0125	4591A		
19485	BIGB	11	11	2055	S12	W10	11	11.1	.8	0182	4591A		
19485	BIGB	11	12	1749	S12	W21	11	11.2	.3	0161	4591A		
19485	BIGB	11	13	1619	S11	W34	11	11.1	.3	0300	4591A		
19485	BIGB	11	14	1607	S11	W48	11	11.1	.3	0300	4591A		
19485	BIGB	11	15	1823	S11	W65	11	10.9	1.5	0300	4591A		
19486	BIGB	11	07	1646	N15	E47	11	11.2	2.2	0168	4592		
19486	BIGB	11	08	1940	N16	E32	11	11.2	2.3	0176	4592		
19486	BIGB	11	09	1725	N18	E19	11	11.2	2.5	0500	4592		
19486	BIGB	11	10	1839	N15	E05	11	11.1	3.0	0341	4592		
19486	BIGB	11	11	2055	N15	W09	11	11.2	2.8	0450	4592		
19486	BIGB	11	12	1749	N15	W20	11	11.2	2.5	0448	4592		
19486	BIGB	11	13	1619	N17	W34	11	11.1	2.5	0840	4592		
19486	BIGB	11	14	1607	N17	W48	11	11.0	2.5	0840	4592		
19486	BIGB	11	15	1823	N17	W60	11	11.2	2.5	0840	4592		
19492	BIGB	11	10	1839	S14	E20	11	12.3	2.5	0138	4594		
19492	BIGB	11	11	2055	S14	E06	11	12.3	2.0	0140	4594		
19492	BIGB	11	12	1749	S14	W06	11	12.3	.8	0120	4594		
19492	BIGB	11	13	1619	S14	W19	11	12.2	1.0	0240	4594		
19492	BIGB	11	14	1607	S14	W33	11	12.2	.3	0240	4594		
19492	BIGB	11	15	1823	S14	W48	11	12.1	1.0	0290	4594		

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

NOVEMBER 1984

Calcium Plage Region	Sta	Observation Time Mo Day (UT)	Lat CMD	CMP Mo Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19489	BIGB	11 09 1725	N04 E49	11 13.4	1.5	0200	4593		
19489	BIGB	11 10 1839	N02 E35	11 13.4	2.2	0182	4593		
19489	BIGB	11 11 2055	N02 E20	11 13.4	2.2	0186	4593		
19489	BIGB	11 12 1749	N02 E09	11 13.4	.4	0141	4593		
19489	BIGB	11 13 1619	N03 W04	11 13.4	.5	0280	4593		
19489	BIGB	11 14 1607	N03 W17	11 13.4	.5	0500	4593		
19489	BIGB	11 15 1823	N03 W30	11 13.5	.3	0500	4593		
19498	BIGB	11 17 2203	S22 W55	11 13.7	1.4	0170			
19496	BIGB	11 15 1823	N13 W25	11 13.9	1.0	0100	4596		
19496	BIGB	11 17 2203	N05 W51	11 14.1	1.5	0390	4596		
19496	BIGB	11 18 1743	N06 W62	11 14.1	1.5	0580	4596		
19496	BIGB	11 19 1738	N05 W77	11 14.0	1.5	0420	4596		
19490	BIGB	11 09 1725	S13 E71	11 15.1	1.5	0600			
19490	BIGB	11 10 1839	S12 E58	11 15.1	1.3	0640			
19490	BIGB	11 11 2055	S12 E44	11 15.2	1.3	0531			
19490	BIGB	11 12 1749	S12 E32	11 15.1	.5	0418			
19490	BIGB	11 13 1619	S12 E17	11 15.0	.5	0710			
19490	BIGB	11 14 1607	S12 E05	11 15.0	.5	0710			
19491	BIGB	11 09 1725	N04 E78	11 15.5	.7	0700	4596A		
19491	BIGB	11 10 1839	N05 E67	11 15.8	.7	0990	4596A		
19491	BIGB	11 11 2055	N05 E53	11 15.8	.6	0680	4596A		
19491	BIGB	11 12 1749	N05 E42	11 15.9	.5	0555	4596A		
19491	BIGB	11 13 1619	N04 E23	11 15.4	.5	0820	4596A		
19491	BIGB	11 14 1607	N04 E11	11 15.5	.5	0820	4596A		
19491	BIGB	11 15 1823	N04 W02	11 15.6	.5	0820	4596A		
19495	BIGB	11 12 1749	S04 E69	11 17.9	.5	0760	4595		
19495	BIGB	11 13 1619	S05 E55	11 17.8	.5	0760	4595		
19495	BIGB	11 14 1607	S05 E42	11 17.8	2.5	0500	4595		
19495	BIGB	11 15 1823	S05 E27	11 17.8	2.5	0700	4595		
19495	BIGB	11 17 2203	S05 W04	11 17.6	2.0	0480	4595		
19495	BIGB	11 18 1743	S07 W13	11 17.8	1.5	0750	4595		
19495	BIGB	11 19 1738	S07 W26	11 17.8	1.5	0670	4595		
19495	BIGB	11 20 1828	S07 W42	11 17.6	1.2	0390	4595		
19495	BIGB	11 22 1752	S10 W74	11 17.2	1.3	0490	4595		
19497	BIGB	11 18 1743	N18 E08	11 19.3	2.5	0280	4597		
19497	BIGB	11 19 1738	N18 W02	11 19.6	3.0	0480	4597		
19497	BIGB	11 20 1828	N18 W18	11 19.4	3.0	0990	4597		
19497	BIGB	11 22 1752	N18 W46	11 19.2	3.1	1720	4597		
19497	BIGB	11 23 2235	N19 W69	11 18.7	3.0	1710	4597		
19497	BIGB	11 24 1552	N19 W79	11 18.6	3.0	1700	4597		
19500	BIGB	11 22 1752	S12 W34	11 20.2	2.3	0510	4599		
19500	BIGB	11 23 2235	S12 W51	11 20.1	2.7	0550	4599		
19500	BIGB	11 24 1552	S11 W60	11 20.1	2.8	0500	4599		
19499	BIGB	11 20 1828	S10 E74	11 26.3	2.8	1240	4598		
19499	BIGB	11 22 1752	S12 E51	11 26.6	3.3	2420	4598		
19499	BIGB	11 23 2235	S12 E34	11 26.5	3.2	2230	4598		
19499	BIGB	11 24 1552	S11 E25	11 26.5	3.3	2700	4598		
19499	BIGB	11 26 2112	S12 W05	11 26.5	3.5	2800	4598		
19499	BIGB	11 27 1804	S12 W18	11 26.4	3.5	2800	4598		
19499	BIGB	11 28 2128	S12 W32	11 26.5	3.5	2900	4598		
19499	BIGB	11 29 1650	S12 W41	11 26.6	3.0	2900	4598		
19499	BIGB	11 30 1800	S12 W55	11 26.6	3.0	2900	4598		
19499	BIGB	12 01 2109	S12 W69	11 26.8	3.0	2900	4598		
19499	BIGB	12 02 1842	S13 W81	11 26.8	2.0	1200	4598		
19503	BIGB	11 26 2112	N01 W03	11 26.6	.5	0125			

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

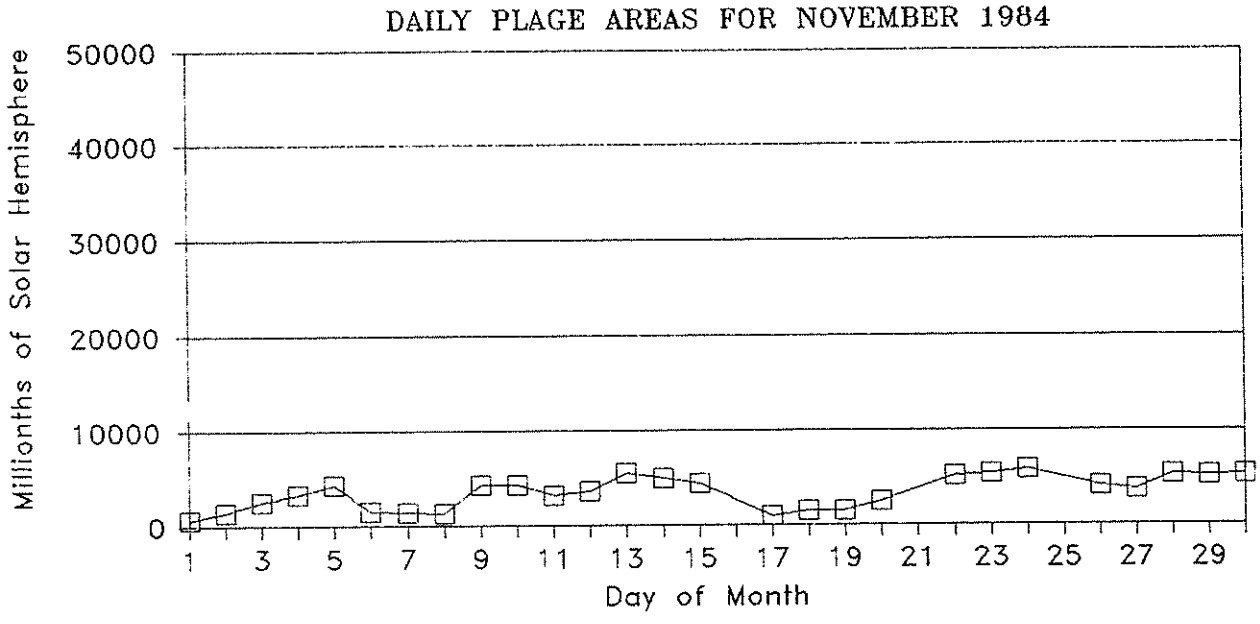
NOVEMBER 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19501	BIGB	11	22	1752	S12 E66	11	27.7	1.1	0120	4598A		
19501	BIGB	11	23	2235	S12 E50	11	27.7	1.4	0280	4598A		
19501	BIGB	11	24	1552	S12 E38	11	27.5	1.5	0300	4598A		
19501	BIGB	11	26	2112	S12 E06	11	27.3	.7	0350	4598A		
19502	BIGB	11	23	2235	S11 E60	11	28.4	1.4	0660	4600		
19502	BIGB	11	24	1552	S11 E46	11	28.1	1.5	0700	4600		
19502	BIGB	11	26	2112	S13 E16	11	28.1	1.5	0700	4600		
19502	BIGB	11	27	1804	S13 E03	11	28.0	1.3	0700	4600		
19502	BIGB	11	28	2128	S11 W13	11	27.9	1.3	0900	4600		
19502	BIGB	11	29	1650	S12 W23	11	28.0	1.5	0900	4600		
19502	BIGB	11	30	1800	S12 W38	11	27.9	1.5	0900	4600		
19502	BIGB	12	01	2109	S12 W52	11	28.1	3.0	2300	4600		
19502	BIGB	12	02	1842	S12 W64	11	28.0	3.0	2100	4600		

DAILY PLAGE SUMMARIES

NOVEMBER 1984

Day	Sta	Plage Index	Plage Count	Smallest Plage (Millionths	Largest Plage of Solar	Total Area Hemisphere)	Smallest Intensity	Largest Intensity
01	BIGB	1.1	3	135	403	724	1.5	2.0
02	BIGB	1.3	4	350	400	1500	.7	2.0
03	BIGB	1.8	4	118	1534	2612	.7	2.5
04	BIGB	3.1	3	355	1614	3404	1.0	3.0
05	BIGB	3.2	3	1033	1946	4386	1.8	3.0
06	BIGB	2.0	2	592	1004	1596	1.5	2.2
07	BIGB	2.4	3	168	857	1469	1.9	2.2
08	BIGB	2.1	3	176	783	1309	1.0	2.3
09	BIGB	5.4	8	100	1500	4375	.7	2.5
10	BIGB	4.4	8	125	1300	4348	.7	3.0
11	BIGB	3.9	8	140	940	3263	.6	2.8
12	BIGB	2.5	10	120	760	3695	.3	2.5
13	BIGB	3.8	10	240	1110	5590	.3	2.5
14	BIGB	3.7	9	240	850	5020	.3	2.5
15	BIGB	3.6	9	100	840	4460	.3	2.5
16	No Observations This DAY							
17	BIGB	1.4	3	170	480	1040	1.4	2.0
18	BIGB	2.1	3	280	750	1610	1.5	2.5
19	BIGB	2.4	3	420	670	1570	1.5	3.0
20	BIGB	3.9	3	390	1240	2620	1.2	3.0
21	No Observations This DAY							
22	BIGB	9.4	5	120	2420	5260	1.1	3.3
23	BIGB	8.9	5	280	2230	5430	1.4	3.2
24	BIGB	10.3	5	300	2700	5900	1.5	3.3
25	No Observations This DAY							
26	BIGB	10.8	5	125	2800	4175	.3	3.5
27	BIGB	10.0	3	300	2800	3800	.4	3.5
28	BIGB	9.6	5	300	2900	5300	.4	3.5
29	BIGB	7.9	5	300	2900	5200	.5	3.0
30	BIGB	6.4	6	100	2900	5300	.5	3.0



BIG BEAR SOLAR OBSERVATORY
ACTIVE REGION SUMMARY

NOVEMBER 1984

Region Number	Return Of Region	Rotation Age	First Seen This Rotation	Duration This Rotation
19481	New	1	841029	06 Days
487	New	1	841109	02
488	New	1	841109	01
460	New	1	841102	02
493	New	1	841111	03
484	New	1	841103	12
494	New	1	841112	04
485	New	1	841105	10
486	New	1	841107	10
496	New	1	841115	05
492	New	1	841110	06
489	New	1	841109	07
498	New	1	841117	01
490	New	1	841109	05
491	19476	2	841109	07
495	New	1	841112	11
497	New	1	841118	06
500	New	1	841122	04
499	New	1	841120	13
503	New	1	841126	01
501	19482	2	841122	11
502	19483	2	841123	11

1. No CaK Observations at BBSO on November 16, 21, 25.

2. No CaK Plots on November 14, 16, 21, 24, 25.

3. No KPNO Magnetograms on November 8, 16-19, 21-23, 25, 29.

4. No Contiguous Plages.

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

DECEMBER 1984

Calcium Plage Region	Sta	Observation Time Mo	Day	(UT)	Lat	CMD	CMP Mo	Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19504	BIGB	11	26	2112	S09	E70	12	2.1	.3	0200	4601		
19504	BIGB	11	27	1804	S07	E58	12	2.1	.4	0300	4601		
19504	BIGB	11	28	2128	S08	E45	12	2.3	.4	0300	4601		
19504	BIGB	11	29	1650	S08	E35	12	2.3	.5	0300	4601		
19504	BIGB	11	30	1800	S08	E23	12	2.5	.5	0300	4601		
19504	BIGB	12	01	2109	S08	E05	12	2.2	1.0	0400	4601		
19504	BIGB	12	02	1842	S08	W07	12	2.2	1.0	0400	4601		
19505	BIGB	11	30	1800	S04	E19	12	2.2	.8	0100			
19508	BIGB	12	01	2109	N03	E20	12	3.4	1.0	0125			
19508	BIGB	12	02	1842	N01	E07	12	3.3	1.0	0100			
19507	BIGB	11	28	2128	S08	E78	12	4.7	.6	0700			
19507	BIGB	11	29	1650	S08	E68	12	4.8	.7	0700			
19507	BIGB	11	30	1800	S08	E52	12	4.6	.8	0700			
19507	BIGB	12	01	2109	S10	E37	12	4.7	1.0	0650			
19507	BIGB	12	02	1842	S10	E24	12	4.6	1.0	0650			
19507	BIGB	12	04	1635	S12	W01	12	4.6	1.0	0650			
19507	BIGB	12	05	1800	S11	W16	12	4.5	1.0	0650			
19506	BIGB	11	28	2128	N08	E80	12	4.9	.4	0500			
19506	BIGB	11	29	1650	N08	E69	12	4.9	.5	0400			
19506	BIGB	11	30	1800	N08	E55	12	4.9	.6	0400			
19509	BIGB	12	01	2109	S08	E64	12	6.7	1.0	0250	4601A		
19509	BIGB	12	02	1842	S08	E46	12	6.2	1.0	0400	4601A		
19509	BIGB	12	04	1635	S08	E20	12	6.2	1.3	0400	4601A		
19509	BIGB	12	05	1800	S08	E06	12	6.2	1.2	0400	4601A		
19509	BIGB	12	06	1726	S09	W07	12	6.2	1.2	0300	4601A		
19509	BIGB	12	07	1815	S09	W23	12	6.0	.8	0275	4601A		
19511	BIGB	12	02	1842	S08	E74	12	8.3	.8	0700	4603		
19511	BIGB	12	04	1635	S08	E49	12	8.4	.8	0900	4603		
19511	BIGB	12	05	1800	S08	E34	12	8.3	.7	0900	4603		
19511	BIGB	12	06	1726	S09	E22	12	8.4	.8	0500	4603		
19511	BIGB	12	07	1815	S09	E06	12	8.2	.8	0350	4603		
19511	BIGB	12	08	2120	S09	W06	12	8.4	.8	0350	4603		
19511	BIGB	12	09	1922	S08	W19	12	8.4	1.2	0350	4603		
19511	BIGB	12	10	1555	S08	W33	12	8.2	1.0	0350	4603		
19511	BIGB	12	12	2058	S09	W60	12	8.4	.7	0350	4603		
19512	BIGB	12	04	1635	S03	E47	12	8.2	2.0	0300	4603		
19512	BIGB	12	05	1800	S03	E34	12	8.3	2.0	0350	4603		
19512	BIGB	12	06	1726	S04	E20	12	8.2	2.0	0200	4603		
19512	BIGB	12	07	1815	S04	E06	12	8.2	2.3	0500	4603		
19512	BIGB	12	08	2120	S03	W08	12	8.3	2.0	0350	4603		
19512	BIGB	12	09	1922	S04	W21	12	8.2	1.5	0350	4603		
19512	BIGB	12	10	1555	S04	W32	12	8.3	1.5	0400	4603		
19512	BIGB	12	12	2058	S05	W64	12	8.1	.8	0350	4603		
19510	BIGB	12	01	2109	N18	E80	12	8.0	3.0	2000	4602		
19510	BIGB	12	02	1842	N18	E72	12	8.3	3.0	2200	4602		
19510	BIGB	12	04	1635	N19	E48	12	8.3	3.0	2200	4602		
19510	BIGB	12	05	1800	N19	E35	12	8.4	3.0	2200	4602		
19510	BIGB	12	06	1726	N18	E22	12	8.4	2.8	2100	4602		
19510	BIGB	12	07	1815	N18	E09	12	8.4	2.5	1900	4602		
19510	BIGB	12	08	2120	N17	W06	12	8.4	2.3	2000	4602		
19510	BIGB	12	09	1922	N18	W19	12	8.4	2.3	2000	4602		
19510	BIGB	12	10	1555	N18	W30	12	8.4	2.1	2000	4602		
19510	BIGB	12	12	2058	N18	W59	12	8.4	2.3	2000	4602		
19514	BIGB	12	09	1922	S15	W04	12	9.5	1.5	0100	4603A		
19514	BIGB	12	10	1555	S15	W17	12	9.4	1.5	0100	4603A		

CALCIUM PLAGE REGIONS
(ORDERED BY CENTRAL MERIDIAN PASSAGE DATE)

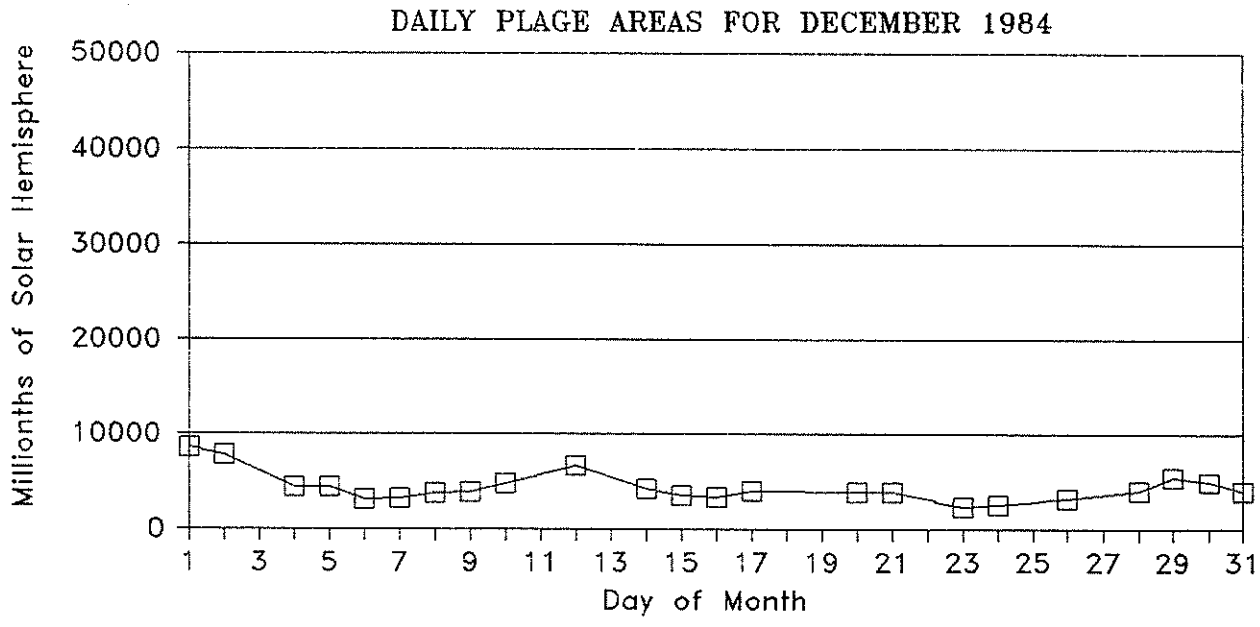
DECEMBER 1984

Calcium Plage Region	Sta	Observation Time Mo Day (UT)	Lat CMD	CMP Mo Day	Intensity	Corrected Area (10^{-6} Hemi)	NOAA/USAF Sunspot Groups #1	#2	#3
19513	BIGB	12 07 1815	S11 E38	12 10.6	1.7	0200	4604		
19513	BIGB	12 08 2120	S10 E23	12 10.6	1.5	0500	4604		
19513	BIGB	12 09 1922	S11 E10	12 10.5	1.5	0500	4604		
19513	BIGB	12 10 1555	S11 W01	12 10.6	1.5	0450	4604		
19513	BIGB	12 12 2058	S12 W30	12 10.6	1.1	0450	4604		
19513	BIGB	12 14 1828	S13 W58	12 10.4	.6	0450	4604		
19513	BIGB	12 15 2122	S14 W74	12 10.3	.5	0350	4604		
19516	BIGB	12 10 1555	S12 E12	12 11.6	2.3	1000	4607		
19516	BIGB	12 12 2058	S12 W18	12 11.5	2.7	1000	4607		
19516	BIGB	12 14 1828	S12 W44	12 11.4	2.7	1200	4607		
19516	BIGB	12 15 2122	S12 W59	12 11.4	2.5	1200	4607		
19516	BIGB	12 16 2144	S13 W74	12 11.3	2.5	1300	4607		
19516	BIGB	12 17 1917	S14 W82	12 11.6	2.0	0700	4607		
19515	BIGB	12 08 2120	S05 E76	12 14.6	1.3	0550	4605		
19515	BIGB	12 09 1922	S06 E65	12 14.7	1.2	0550	4605		
19515	BIGB	12 10 1555	S06 E52	12 14.5	1.5	0550	4605		
19515	BIGB	12 12 2058	S06 E22	12 14.5	1.0	0550	4605		
19515	BIGB	12 14 1828	S05 W04	12 14.5	.7	0550	4605		
19517	BIGB	12 12 2058	N19 E55	12 17.1	3.0	2000	4608		
19517	BIGB	12 14 1828	N21 E31	12 17.1	2.7	2000	4608		
19517	BIGB	12 15 2122	N21 E16	12 17.1	2.5	2000	4608		
19517	BIGB	12 16 2144	N21 E03	12 17.1	2.5	2000	4608		
19517	BIGB	12 17 1917	N21 W10	12 17.0	2.7	2300	4608		
19517	BIGB	12 20 2253	N19 W50	12 17.1	2.0	2300	4608		
19517	BIGB	12 21 2026	N19 W62	12 17.1	2.0	2300	4608		
19521	BIGB	12 26 1703	N03 W51	12 22.9	2.5	0600			
19521	BIGB	12 28 1933	N03 W80	12 22.8	2.0	0600			
19518	BIGB	12 17 1917	S12 E73	12 23.3	1.7	1000	4609		
19518	BIGB	12 20 2253	S13 E34	12 23.5	2.0	1600	4609		
19518	BIGB	12 21 2026	S12 E23	12 23.6	2.0	1600	4609		
19518	BIGB	12 23 2021	S12 W04	12 23.5	2.0	1700	4609		
19518	BIGB	12 24 2333	S12 W19	12 23.5	1.9	1800	4609		
19518	BIGB	12 26 1703	S12 W40	12 23.7	1.8	1800	4609		
19518	BIGB	12 28 1933	S13 W70	12 23.5	.5	1800	4609		
19518	BIGB	12 29 2028	S13 W80	12 23.8	.6	0800	4609		
19523	BIGB	12 26 1703	S11 W25	12 24.8	.8	0150	4612		
19523	BIGB	12 28 1933	S11 W50	12 25.0	1.2	0200	4612		
19523	BIGB	12 29 2028	S13 W65	12 24.9	2.5	0700	4612		
19523	BIGB	12 30 2109	S12 W80	12 24.8	2.5	1000	4612		
19519	BIGB	12 23 2021	S04 E15	12 25.0	2.0	0200	4609A	4610	
19519	BIGB	12 24 2333	S04 W01	12 24.9	2.0	0250	4609A	4610	
19519	BIGB	12 26 1703	S04 W24	12 24.9	1.2	0200	4609A	4610	
19519	BIGB	12 28 1933	S04 W53	12 24.8	1.0	0350	4609A	4610	
19519	BIGB	12 29 2028	S04 W70	12 24.6	.8	0350	4609A	4610	
19519	BIGB	12 30 2109	S05 W80	12 24.9	.6	0300	4609A	4610	
19520	BIGB	12 23 2021	S11 E69	12 29.0	.5	0500	4611		
19520	BIGB	12 24 2333	S11 E53	12 29.0	2.3	0500	4611		
19520	BIGB	12 26 1703	S11 E31	12 29.0	2.8	0500	4611		
19520	BIGB	12 28 1933	S11 E03	12 29.0	2.3	0500	4611		
19520	BIGB	12 29 2028	S11 W12	12 29.0	2.2	0900	4611		
19520	BIGB	12 30 2109	S10 W24	12 29.1	2.5	0900	4611		
19520	BIGB	12 31 1936	S11 W37	12 29.0	2.1	1000	4611		
19520	BIGB	01 01 1757	S11 W48	12 29.2	2.2	1000	4611		
19520	BIGB	01 02 1711	S11 W61	12 29.2	2.5	0900	4611		
19520	BIGB	01 03 1704	S11 W79	12 28.9	1.3	0700	4611		

DAILY PLAGE SUMMARIES

DECEMBER 1984

Day	Sta	Plage Index	Plage Count	Smallest Plage (Millionths	Largest Plage of Solar	Total Area Hemisphere)	Smallest Intensity	Largest Intensity
01	BIGB	8.8	7	125	2900	8625	1.0	3.0
02	BIGB	6.1	8	100	2200	7750	.8	3.0
03	No Observations This DAY							
04	BIGB	6.1	5	300	2200	4450	.8	3.0
05	BIGB	7.2	5	350	2200	4500	.7	3.0
06	BIGB	6.3	4	200	2100	3100	.8	2.8
07	BIGB	6.3	5	200	1900	3225	.8	2.5
08	BIGB	6.2	5	350	2000	3750	.8	2.3
09	BIGB	6.1	6	100	2000	3850	1.2	2.3
10	BIGB	7.7	7	100	2000	4850	1.0	2.3
11	No Observations This DAY							
12	BIGB	9.0	7	350	2000	6700	.7	3.0
13	No Observations This DAY							
14	BIGB	7.0	4	450	2000	4200	.6	2.7
15	BIGB	6.0	3	350	2000	3550	.5	2.5
16	BIGB	5.4	2	1300	2000	3300	2.5	2.5
17	BIGB	6.3	3	700	2300	4000	1.7	2.7
18	No Observations This DAY							
19	No Observations This DAY							
20	BIGB	5.3	2	1600	2300	3900	2.0	2.0
21	BIGB	4.8	2	1600	2300	3900	2.0	2.0
22	No Observations This DAY							
23	BIGB	3.8	3	200	1700	2400	.5	2.0
24	BIGB	4.3	3	250	1800	2550	1.9	2.3
25	No Observations This DAY							
26	BIGB	4.8	5	150	1800	3250	.8	2.8
27	No Observations This DAY							
28	BIGB	2.2	6	200	1800	4050	.5	2.3
29	BIGB	3.3	7	350	1600	5500	.6	2.5
30	BIGB	3.2	6	300	1600	4950	.5	2.5
31	BIGB	2.9	5	250	1600	4000	.5	2.1



BIG BEAR SOLAR OBSERVATORY
ACTIVE REGION SUMMARY

DECEMBER 1984

Region Number	Return Of Region	Rotation Age	First Seen This Rotation	Duration This Rotation
19505	New	1	841130	01 Days
504	19487	2	841126	07
508	New	1	841201	02
507	New	1	841128	08
506	New	1	841128	03
509	New	1	841201	08
510	19486	2	841201	13
511	New, in vicinity of 19485	1	841202	11
512	New	1	841204	09
514	New	1	841209	02
513	New	1	841207	09
516	New	1	841210	08
515	New, in vicinity of 19495	1	841208	07
517	19497	2	841212	10
521	New	1	841226	03
518	19499	2	841217	04
519	New	1	841223	08
523	New	1	841226	05
520	New	1	841223	11

1. No CaK Observations at BBSO on December 3, 11, 13, 18, 19, 22, 25, 27.

2. No CaK Plots on December 3, 5, 7, 10, 11, 13, 18, 19, 22, 25, 27.

3. No KPNO Magnetograms on December 1, 3, 4, 8, 11-13, 15, 16, 18-31.

4. Contiguous Plages: 19511/19512.

*U.S. GOVERNMENT PRINTING OFFICE: 1986-0-676-027/40000

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The ICSU Panel on WDCs has recommended that it would be appropriate courtesy to acknowledge in publications that data were obtained from the originating station or investigator through the intermediary of the WDCs. The following statement is suggested:

"Data used in this study were provided by WDC-A for Solar-Terrestrial Physics, NOAA E/GC2, 325 Broadway, Boulder Colorado 80303, USA."