

U.S. DEPARTMENT OF COMMERCE

Ronald H. Brown, Secretary

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION

D. James Baker, Administrator

NATIONAL ENVIRONMENTAL SATELLITE, DATA, AND INFORMATION SERVICE

Robert S. Winokur, Assistant Administrator

FEBRUARY 1996 NUMBER 618 - Part II

Solar-Geophysical Data comprehensive reports

Data for August 1995

International Standard Serial Number: 0038-0911

Library of Congress Catalog Number: 79-640375 //r81

NATIONAL GEOPHYSICAL DATA CENTER

Michael S. Loughridge, Acting Director
Boulder, Colorado

Subscription information is on the inside back cover.

SOLAR-GEOPHYSICAL DATA

Number 618

(Issued in Two Parts)

Editor: Helen E. Coffey

Chief: Herbert W. Kroehl
Solar-Terrestrial Physics Division

Staff: Christine D. Hanchett
Edward H. Erwin

Computer Consultant:
Daniel C. Wilkinson

CONTENTS

PART I (PROMPT REPORTS)

	Page
DETAILED INDEX FOR 1995-1996	2
DATA FOR JANUARY 1996	3- 40
DATA FOR DECEMBER 1995	41-123
LATE DATA	125-127
Hourly Equatorial Dst Oct-Nov 95	

PART II (COMPREHENSIVE REPORTS)

	Page
DETAILED INDEX FOR 1995-1996	2
DATA FOR AUGUST 1995	3-28
MISCELLANEOUS DATA	29-55
SAMPEX Interplanetary Energetic Particles Jan-Dec 94	

DETAILED INDEX OF OBSERVATIONS PUBLISHED IN SOLAR-GEOPHYSICAL DATA

CODE	KIND OF OBSERVATION	JUN 95	JUL	AUG	SEP	OCT	NOV	DEC	JAN 96
A. SOLAR AND INTERPLANETARY									
A.1	Sunspot Drawings	612A 44	613A 41	614A 39	615A 45	616A 41	617A 43	618A 52	
A.2aa	International Provisional Sunspot Numbers	611A 24	612A 25	613A 25	614A 24	615A 25	616A 21	617A 25	618A 27
A.2c	American Sunspot Numbers	611A 24	612A 25	613A 25	614A 24	615A 25	616A 21	617A 25	618A 27
A.3a	Mt. Wilson Magnetograms	612A 44	613A 41	614A 39	615A 45	616A 41	617A 43	618A 52	
A.3b	Sunspot Mag Class and Regions	612A 89	613A 88	614A 86	615A 91	616A 88	617A 89	618A100	
A.3c	Kitt Peak Magnetograms	612A 44	613A 41	614A 39	615A 45	616A 41	617A 43	618A 52	
A.3d	Mean Solar Magnetic Field (Stanford)	611A 31	612A 31	613A 31	614A 29	615A 33	616A 27	617A 29	618A 33
A.3e	Stanford Magnetograms	612A 44	613A 41	614A 39	615A 45	616A 41	617A 43	618A 52	
A.4	H-alpha Filtergrams	612A 44	613A 41	614A 39	615A 45	616A 41	617A 43	618A 52	
A.6c	Stanford Solar Mag Field Synoptic Maps	612A 34	613A 36	614A 34	615A 40	616A 36	617A 38	618A 42	
A.6d	Kitt Peak Solar Mag Field Synoptic Maps	612A 42	613A 40	614A 38	615A 44	616A 40	617A 42	618A 50	
A.6f	Active Prominences and Filaments	616B 20	617B 20	618B 18					
A.6g	Sac Peak Coronal Line Synoptic Maps	612A 36	613A 38	614A36	615A 42	616A 38	617A 40	618A 46	
A.6h	Photometric Observations (San Fernando)	Jan 90-Dec 94 in 612B 36; Jan-Sep 95 in 615B 32							
A.7h	Coronal Line Emission (Sac Peak)	612A 44	613A 41	614A 39	615A 45	616A 41	617A 43	618A 52	
A.7j	Coronal Holes (Sonora, Mexico)			614A118	614A121	615A 35	616A 29	617A 32	618A 35
A.8aa	2800 MHz- Solar Flux (Penticton)	611A 24	612A 25	613A 25	614A 24	615A 25	616A 21	617A 25	618A 27
A.8ac	2800 MHz- Adj. Solar Flux (Penticton)	611A 24	612A 25	613A 25	614A 24	615A 25	616A 21	617A 25	618A 27
A.8g	Adjusted Daily Solar Fluxes (Learmonth)	611A 24	612A 25	613A 25	614A 24	615A 25	616A 21	617A 25	618A 27
A.10g	Nancay Radioheliograph - 164 MHz	612A100	613A 98	614A 97	615A103	616A108	617A 99	618A108	
A.11g	Solar X-ray GOES (graphs/event table)	616B 13	617B 12	618B 10					
A.11k	Solar UV NOAA-9	May 86-Dec 88 in 566B 84							
A.11l	Solar UV NIMBUS7	Nov 78-Oct 84 in 542B 82							
A.11m	Solar UV SOLSTICE	Oct 91-Sep 94 in 607B 46							
A.11n	Solar YOHKOH Soft X-ray Images	612A 74	613A 72	614A 70	615A 75	616A 72	617A 73	618A 83	
A.12g	Solar Particles (GOES-7)	611A 4	612A 4	613A 4	614A 4	615A 4	616A 4	617A 4	618A 4
A.12h	Interplanetary Particles (SAMPEX)	Jan-Dec 93 in 606B 34; Jan-Dec 94 in 618B 30							
A.13e	Solar Plasma (IMP-8)	617B 32 617B 27 618B 26							
A.16c	ERBS, NOAA-9 & -10 Solar Irradiance	1989 in 551B 78; ERBS Oct 84-Dec 94 in 607B 32							
A.16d	UARS Solar Irradiance	1991-1993 in 608B 40							
A.17c	Inferred Interplanetary Mag Field	1984-1988 data in 542A168; 1989-Jan 94 in 611A118							
A.17	IMP-8 Interplanetary Mag Field	616B 28	617B 28	618B 27					
C. SOLAR FLARE-ASSOCIATED EVENTS									
C.1a	H-alpha Flares	611A 27	612A 28	613A 28	614A 27	615A 28	616A 24	617A 28	618A 30
C.1ba	H-alpha Flare Groups	616B 4	617B 4	618B 4					
C.1d	Flare Patrol Observations	616B 9	617B 7	618B 6					
C.3	Radio Bursts Fixed Frequency	616B 11	617B 9	618B 8					
C.3	Radio Bursts Fixed Frequency Selected	611A 30	612A 29	613A 30	614A 28	615A 31	616A 25		
C.4	Radio Bursts Spectral	612A 94	613A 93	614A 93	615A 95	616A 96	617A 94	618A104	
C.6	Sudden Ionospheric Disturbances	612A 92	613A 92	614A 91	615A 94	616A 94	617A 93	618A103	
D. GEOMAGNETIC EVENTS									
D.1a	Geomagnetic Indices	613A118	613A107	614A106	615A112	616A117	617A108	618A114	
D.1ba	27-day Chart of Kp Indices	612A111	613A109	614A108	615A114	616A119	617A110	618A116	
D.1cb	Monthly Mean aa Indices	613A112	613A110	614A109	615A115	616A120	617A111	618A117	
D.1d	Principal Magnetic Storms	612A115	613A114	614A112	615A119	616A123	617A115	618A122	
D.1f	Sudden Commencements/Flare Effects	612A116	613A115	614A113	615A120	616A124	617A116	618A123	
D.1g	Equatorial Indices Dst	613A120	613A113	615A122	615A118	618A126	618A127	618A121	
D.1i	Polar Cap (PC) Index	612A114	613A112	614A111	615A117	616A122	617A114	618A120	
F. COSMIC RAYS									
F.1a	Cosmic Ray Neutron Cts (Deep River)	612A101	613A 99	614A 98	615A104	616A126			
F.1b	Cosmic Ray Neutron Cts (Climax)	612A101	613A 99	614A 98	615A104	616A109	617A100	618A109	
F.1h	Cosmic Ray Neutron Cts (Thule)	612A101	613A 99	614A 98	615A104	616A109	617A100	618A109	
F.1i	Cosmic Ray Neutron Cts (Kiel)								
F.1j	Cosmic Ray Neutron Cts (Tokyo)								
F.1n	Cosmic Ray Neutron Cts (Beijing)	612A101	613A 99	614A 98	615A104	616A109	617A100	618A109	
F.1b	Cosmic Ray Neutron Cts (Haleakala)	612A101	613A 99	614A 98	615A104	616A109	617A100	618A109	
F.1o	Cosmic Ray Neutron Cts (Moscow)	612A101	613A 99	614A 98	615A104	616A109	617A100	618A109	
F.1p	Cosmic Ray Neutron Cts (Calgary)	612A101	613A 99	614A 98	615A104	616A109	617A100	618A109	
H. MISCELLANEOUS									
H.60	IUWDS Alert Periods	611A 19	612A 20	613A 20	614A 19	615A 20	617A118	617A 20	618A 20

The entry "612A 44" under Jun 1995, for example, means that the sunspot drawings for Jun 1995 appear in SOLAR-GEOPHYSICAL DATA No. 612, Part I, and that they begin on page 44. "A" denotes Part I and "B", Part II. Blanks indicate data not yet received and dashes mark unavailable data.

CONTENTS

Comprehensive Reports

Number 618 Part II

DATA FOR AUGUST 1995

	Page
SOLAR FLARES	
H-alpha Solar Flare Groups	4- 5
Intervals of No Flare Patrol Observation	6
Number of Solar Flares January 1965-present	7
SOLAR RADIO BURSTS AT FIXED FREQUENCIES	8- 9
SOLAR X-RAY RADIATION FROM GOES SATELLITE Graphs	10-15
Preliminary Event List	16
Preliminary Daily Average Background	17
ACTIVE PROMINENCES AND FILAMENTS	18-25
SOLAR IRRADIANCE (Unavailable at time of publication.)	
IMP-8 SOLAR WIND Plot	26
IMP-8 INTERPLANETARY MAGNETIC FIELD Plot	27-28

4
Aug 95

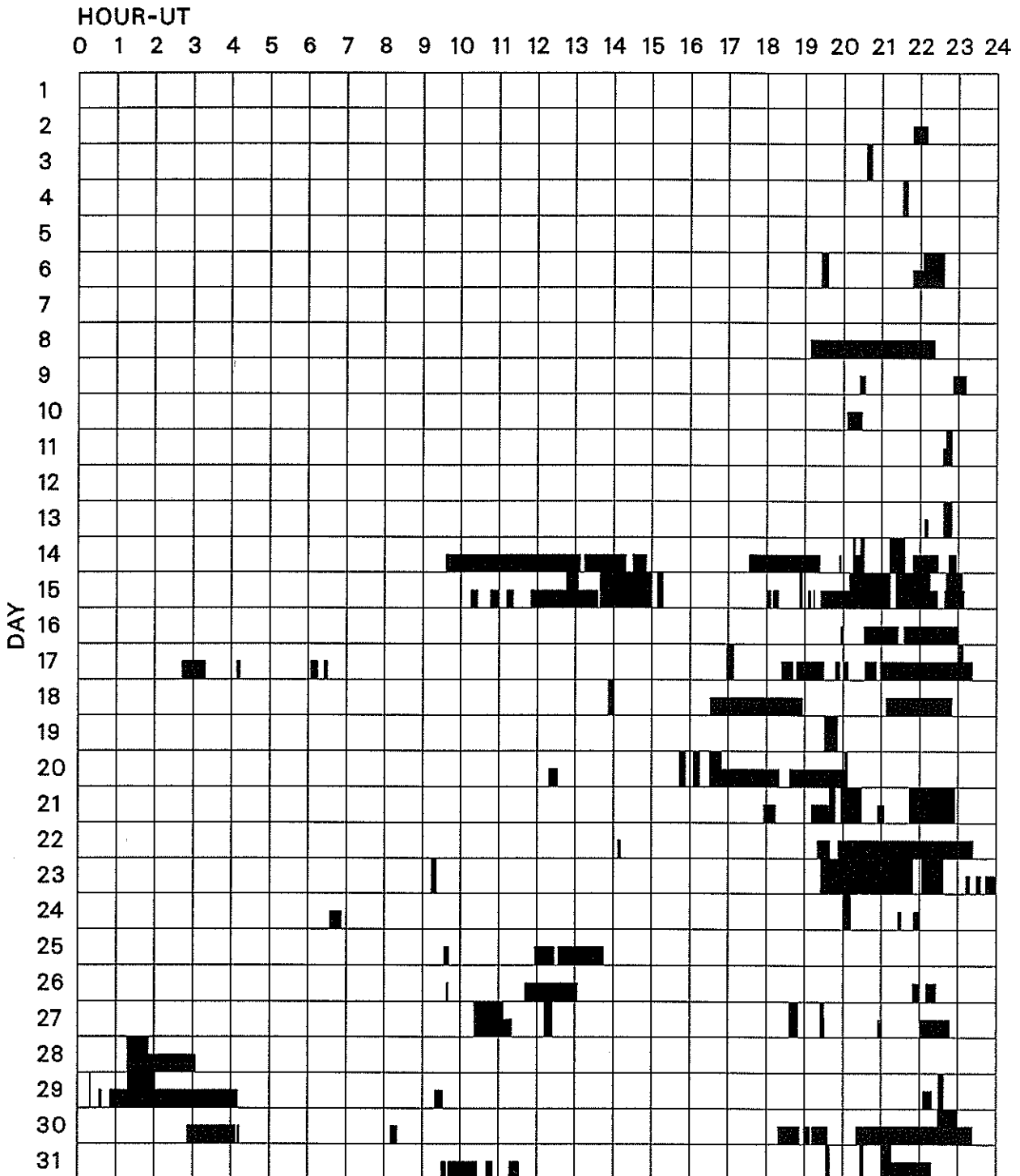
H α SOLAR FLARES

AUGUST 1995

Grp #	Sta	Day	Start (UT)	Max (UT)	End (UT)	Lat	CMD	NOAA/ USAF Region	CMP Mo	Dur (Min)	Imp Opt	Xray	Obs See	Type	Area Measurement			Remarks
															Time (UT)	Apparent (10-6 Disk)	Corr (Sq Deg)	
0001	MEUD	01	0745	0747	0751	N10	E25	7894	08	3.2	6	SF		C	0747	30	0.3	
0002	KANZ	01	1106	1106	1110	N29	E22		08	3.2	4	SF	2	C				
0003	MEUD	02	1312	1315	1328	N12	E12	7894	08	3.4	16	SF		C	1315	40	0.4	ET
0004		02	1955	2002	2014	N12	E04	7894	08	3.1	19	SF B 1.7				32		
	HOLL	02	1955	2002	2014	N12	E04	7894	08	3.1	19	SF B 1.7	3	E		26		
	PALE	02	1957E	1958U	2025D	N12	E03	7894	08	3.0	28D	SF	3	E		37		
		03	2036		2044	No Flare Patrol												
0005	MEUD	04	1103	1111	1116	N10	W70	7893B	07	30.3	13	SF		C	1111	10		D
		04	2133		2140	No Flare Patrol												
0006	MEUD	05	0648	0655	0719	N02	E08	7896	08	5.9	31	SF		C	0655	20	0.2	ET
0007	MEUD	05	1105	1124	1148	N02	E08	7896	08	6.0	43	SF		C	1124	30	0.3	D
0008	MEUD	05	1301	1325	1335	N02	E08	7896	08	6.1	34	SF		C	1325	30	0.3	DT
		06	1925		1935	No Flare Patrol												
		06	2205		2237	No Flare Patrol												
		11	2241		2249	No Flare Patrol												
0009	KANZ	12	0807	0811	0823	S21	E67	7899	08	17.5	16	SF	2	C				
0010	MEUD	12	0835	0846	0919	S07	W45		08	9.0	44	SF		C	0846	20	0.3	
0011	KANZ	12	1159	1203	1211	S19	E69	7899	08	17.8	12	SF	2	C				
		13	2237		2249	No Flare Patrol												
		14	2016		2018	No Flare Patrol												
		14	2027		2032	No Flare Patrol												
		14	2113		2136	No Flare Patrol												
		15	1246		1304	No Flare Patrol												
		15	1339		1458	No Flare Patrol												
		15	1509		1517	No Flare Patrol												
		15	1852		1855	No Flare Patrol												
		15	2010		2114	No Flare Patrol												
		15	2123		2216	No Flare Patrol												
		15	2241		2306	No Flare Patrol												
		17	1658		1708	No Flare Patrol												
		17	2301		2307	No Flare Patrol												
		18	1352		1401	No Flare Patrol												
0012	MEUD	18	1411	1413	1420	S20	E19		08	20.0	9	SF		C	1413	20	0.2	D
0013	PALE	18	1720E	1722U	1801D	N11	E90		08	25.5	41D	SN C 1.9	2	E		70		
0014		19	10579	11007	1110	N12	E78		08	25.3	13	SF						D
	MEUD	19	1057	1100	1109	N10	E80		08	25.5	12	SF		C	1100			
	KHAR	19	1106	1107	1111	N15	E76		08	25.2	5	SF	2	V				D
		19	1931		1951	No Flare Patrol												
0015	MEUD	20	1006	1013	1023	S05	W90		08	13.7	17	SF		C	1013			
		20	1544		1553	No Flare Patrol												
		20	1606		1615	No Flare Patrol												
		20	1631		1649	No Flare Patrol												
		20	2004		2007	No Flare Patrol												
0016		21	1639	16421	1655	N10	E50		08	25.4	16	SF B 1.3				25		FH
	HOLL	21	1639	1642	1655	N08	E50		08	25.4	16	SF B 1.3	3	E		30		H
	RAMY	21	1639	1643	1652D	N12	E49		08	25.4	13D	SF	3	E		20		F
		21	1939		1948	No Flare Patrol												
		21	1957		2029	No Flare Patrol												

INTERVALS OF NO FLARE PATROL OBSERVATION FOR PRECEDING SOLAR FLARE TABLE

AUGUST 1995

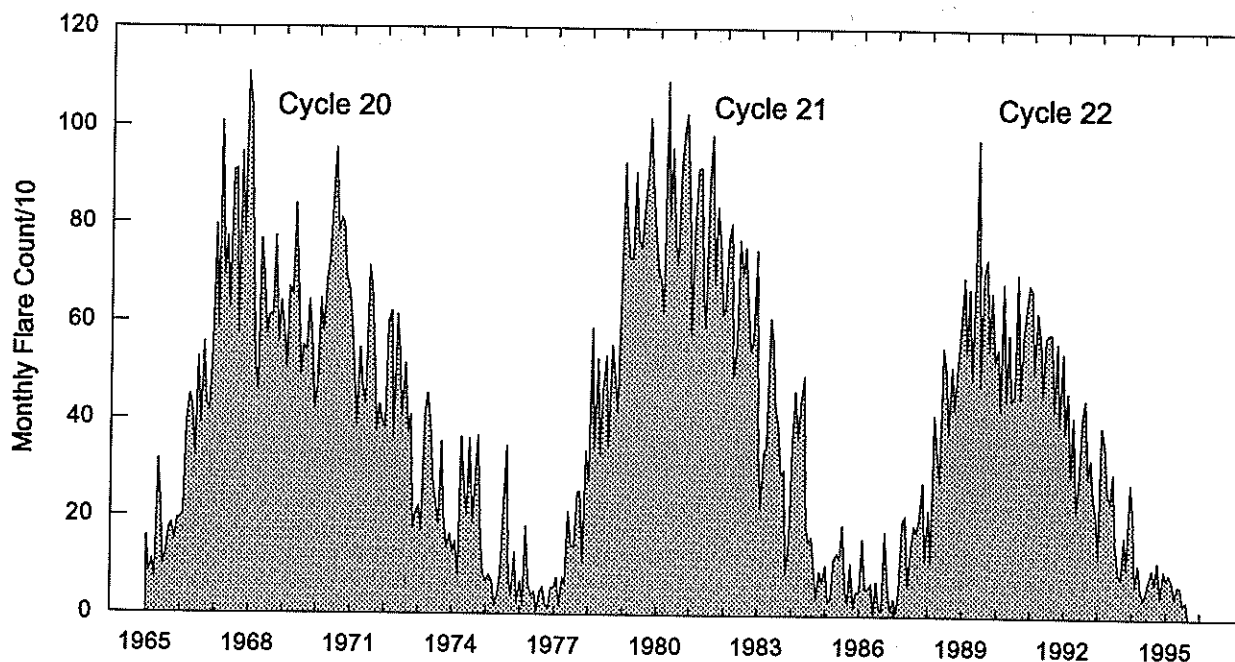


Times of no flare patrol, shown here as shaded areas, combine reports from the stations listed below. Portions of a panel completely shaded mark dates and times of no patrol of any kind (neither visual nor cinematographic); portions of a panel with only the bottom half shaded mark times of only visual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

- | | | | |
|-----------|-------------|-----------|----------|
| Catania | Istanbul | Learmonth | Palehua |
| Bucharest | Kanzelhoehe | Meudon | Ramey |
| Holloman | Kharkov | Mitaka | San Vito |
| Hurbanovo | | | Urumqi |

Monthly Counts of Grouped Solar Flares Jan 1965 - Aug 1995

7
Aug 95



Year	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Total
1965	158	85	110	74	315	231	99	127	173	184	150	193	1899
1966	194	205	390	449	429	323	528	391	558	432	417	543	4859
1967	796	589	1009	694	771	629	907	911	573	946	775	1109	9709
1968	1037	773	519	460	768	697	573	611	616	772	556	640	8022
1969	581	504	669	655	839	694	489	551	540	643	566	422	7153
1970	466	646	578	688	722	836	954	780	811	797	687	667	8632
1971	598	505	387	546	461	430	713	673	518	375	431	394	6031
1972	384	599	621	361	614	541	404	515	371	408	175	210	5203
1973	221	171	410	453	388	270	232	182	353	201	136	163	3180
1974	127	148	79	364	255	204	360	187	270	366	153	81	2594
1975	68	82	69	19	42	85	196	346	68	38	127	25	1165
1976	69	18	180	60	38	48	6	47	57	23	13	55	614
1977	54	77	18	76	64	210	140	140	250	252	107	336	1724
1978	274	588	338	526	330	460	533	346	554	499	418	648	5514
1979	926	781	731	731	907	772	750	821	901	1018	888	786	10012
1980	703	689	621	1092	811	956	763	720	924	988	1027	838	10132
1981	578	782	914	915	658	592	893	982	680	836	773	615	9218
1982	631	766	803	490	553	769	696	753	615	544	564	748	7932
1983	332	220	337	346	609	561	427	389	289	298	88	152	4048
1984	353	461	366	440	492	185	151	161	95	36	92	69	2901
1985	104	29	38	119	129	116	185	53	25	108	19	50	975
1986	51	158	54	56	68	3	71	12	14	174	56	13	730
1987	36	7	52	192	205	61	132	185	172	198	273	114	1627
1988	217	109	413	328	274	551	502	375	513	429	518	587	4816
1989	695	544	672	488	691	977	474	699	733	547	665	526	7711
1990	550	424	684	442	580	445	454	703	449	574	623	682	6610
1991	672	503	625	570	458	574	582	581	425	565	396	544	6495
1992	380	462	287	412	214	271	413	447	287	325	248	206	3952
1993	123	392	357	262	237	296	154	92	82	167	104	275	2541
1994	217	67	111	60	40	56	81	101	72	117	45	99	1066
1995	82	95	77	42	69	66	29	37					497

The term 'grouped' means observations of the same event by different sites were lumped together and counted as one.

8
Aug 95

S O L A R R A D I O E M I S S I O N
Outstanding Occurrences

AUGUST 1995

Day	Freq	Sta	Type	Start (UT)	Time of Maximum (UT)	Duration (Min)	Flux Density		Int	Remarks
							Peak (10 -22 W/m 2 Hz)	Mean		
01	[	280 CUBA	44 NS	1400.0E		325.0D		12.0		
		235 CUBA	44 NS	1400.0E		325.0D		6.0		
		204 IZMI	41 F	0829.5	0831.0	1.5	30.0			
02	[	235 CUBA	44 NS	1336.0E		494.0D		5.0		
		280 CUBA	44 NS	1336.0E		494.0D		12.0		
03	[	280 CUBA	44 NS	1300.0E		530.0D		12.0		
		235 CUBA	44 NS	1800.0E		530.0D		5.0		
		245 SVTO	8 S	0544.0	0544.0	1.0	85.0			QL=4 ST=2 TYP=3
		127 TORN	46 C	1350.0	1352.2	9.5	250.0	40.0		
		127 TORN	45 C	1411.1	1428.5	17.9	90.0	40.0		
		33 UPIC	2 S/F	1740.5	1740.7	0.3				
04	[	235 CUBA	44 NS	1300.0E		530.0D		6.0		
		280 CUBA	44 NS	1300.0E		530.0D		13.0		
		204 IZMI	7 C	0829.9	0830.2	0.4	45.0	23.0		
05	[	280 CUBA	44 NS	1300.0E		530.0D		12.0		
		235 CUBA	44 NS	1300.0E		530.0D		6.0		
06	[	280 CUBA	44 NS	1300.0E		530.0D		12.0		
		235 CUBA	44 NS	1300.0E		530.0D		6.0		
07	[	235 CUBA	44 NS	1400.0E		470.0D		6.0		
		280 CUBA	44 NS	1400.0E		470.0D		13.0		
09	[	280 CUBA	44 NS	1300.0E		360.0D		13.0		
		235 CUBA	44 NS	1300.0E		530.0D		7.0		
10	[	280 CUBA	44 NS	1300.0E		530.0D		11.0		
		235 CUBA	44 NS	1300.0E		530.0D		5.0		
		204 IZMI	7 C	1041.0	1041.4	0.5	17.0			
11	[	280 CUBA	44 NS	1300.0E		530.0D		12.0		
		235 CUBA	44 NS	1300.0E		530.0D		7.0		
12	[	235 CUBA	44 NS	1300.0E		300.0D		5.0		
		280 CUBA	44 NS	1300.0E		300.0D		11.0		
13		200 HIRA	6 S	2338.5	2339.6	1.0	34.0	15.0	0	
15	[	235 CUBA	44 NS	1300.0E		530.0D		5.0		
		280 CUBA	44 NS	1300.0E		530.0D		10.0		
16	[	235 CUBA	44 NS	1300.0E		420.0D		5.0		
		280 CUBA	44 NS	1300.0E		530.0D		10.0		
		204 IZMI	8 S	0813.2	0813.3	0.2	74.0			
17	[	280 CUBA	44 NS	1300.0E		300.0D		9.0		
		235 CUBA	44 NS	1300.0E		416.0D		5.0		
18	[	235 CUBA	44 NS	1300.0E		530.0D		5.0		
		280 CUBA	44 NS	1300.0E		530.0D		6.0		
19	[	280 CUBA	44 NS	1300.0E		530.0D		8.0		
		235 CUBA	44 NS	1300.0E		530.0D		5.0		
		204 IZMI	7 C	0642.5	0643.0	7.0	11.0			
20	[	280 CUBA	44 NS	1300.0E		530.0D		8.0		
		235 CUBA	44 NS	1300.0E		530.0D		4.0		
		33 UPIC	45 C	1415.8	1416.2	1.0				
21	[	235 CUBA	44 NS	1300.0E		531.0D		4.0		
		280 CUBA	44 NS	1300.0E		531.0D		8.0		
22	[	235 CUBA	44 NS	1300.0E		540.0D		7.0		
		280 CUBA	44 NS	1300.0E		540.0D		11.0		
		204 IZMI	8 S	0702.1	0702.2	0.2	40.0			

S O L A R R A D I O E M I S S I O N
Outstanding Occurrences

9
Aug 95

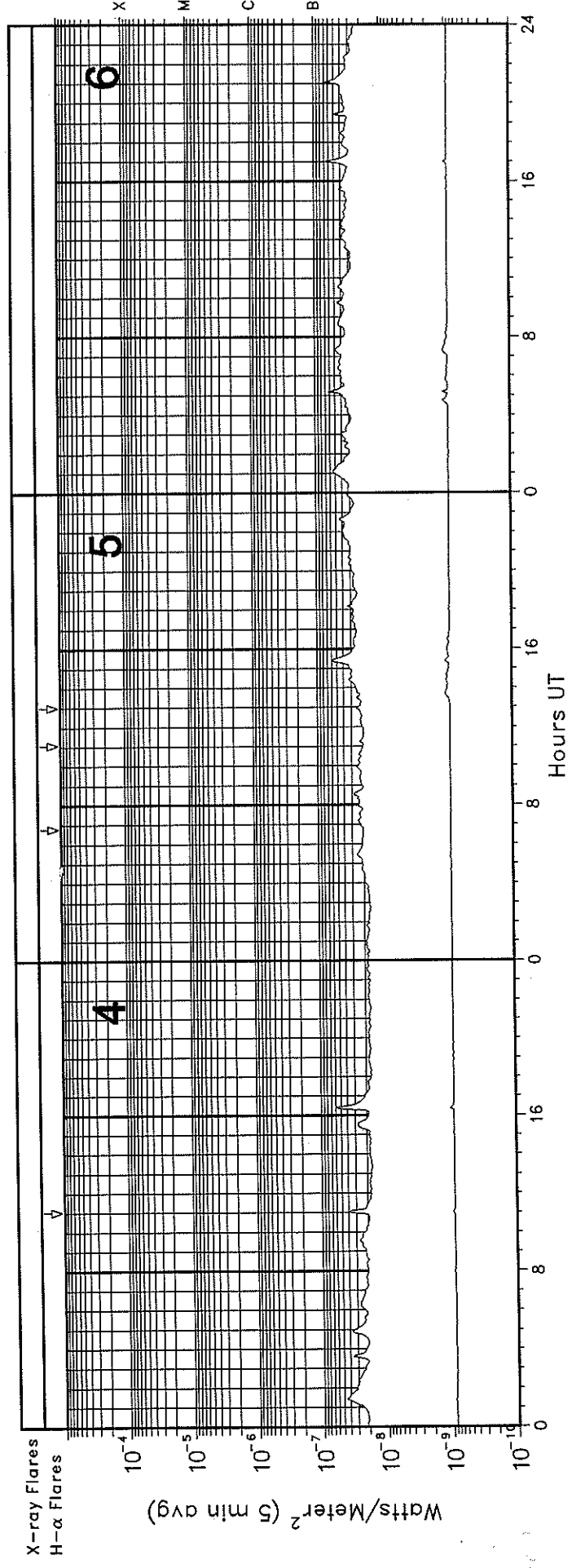
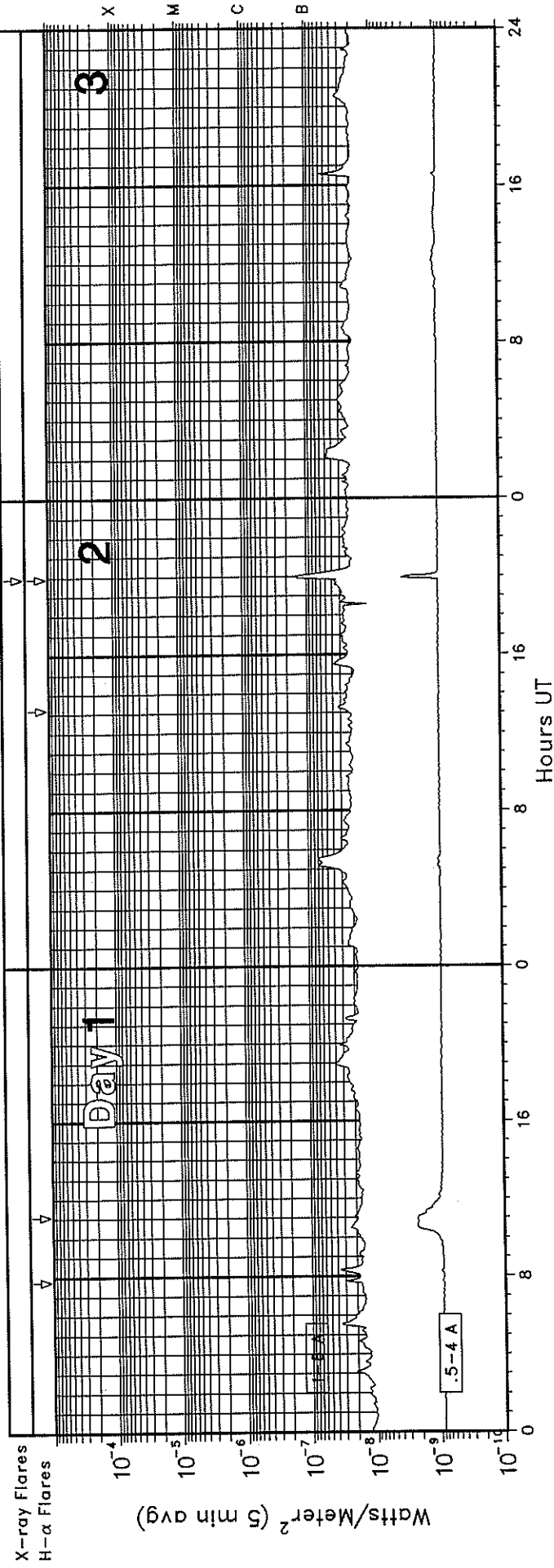
AUGUST 1995

Day	Freq	Sta	Type	Start (UT)	Time of Maximum (UT)	Duration (Min)	Flux Density (10 ⁻²² W/m ² Hz)		Int	Remarks
							Peak	Mean		
23	204	IZMI	7 C	0959.0	0959.5	0.6	31.0			
24	204	IZMI	43 NS	0600.0		360.0		5.0		
	235	CUBA	44 NS	1300.0E		530.0D		7.0		
	280	CUBA	44 NS	1300.0E		530.0D		16.0		
	410	SVTO	8 S	0805.0	0806.0	2.0	25.0			QL=2 ST=2 TYP=3
	245	SVTO	8 S	0805.0	0806.0	2.0	50.0			QL=2 ST=2 TYP=3
25	280	CUBA	44 NS	1300.0E		531.0D		14.0		
	235	CUBA	44 NS	1300.0E		531.0D		8.0		
	2840	PEKG	3 S	0633.0	0635.0	10.0	29.0			
	2695	LEAR	8 S	0636.0	0637.0	2.0	41.0			QL=4 ST=2 TYP=3
	4995	LEAR	8 S	0636.0	0637.0	1.0	21.0			QL=4 ST=2 TYP=3
	410	LEAR	4 S/F	0636.0	0639.0	4.0	13.0			QL=4 ST=2 TYP=3
	1415	LEAR	8 S	0636.0	0637.0	2.0	26.0			QL=4 ST=2 TYP=3
	610	LEAR	8 S	0636.0	0636.0	1.0	200.0			QL=4 ST=2 TYP=3
	8800	LEAR	8 S	0636.0	0637.0	1.0	11.0			QL=4 ST=2 TYP=3
	4995	SVTO	8 S	0636.0	0637.0	1.0	19.0			QL=4 ST=2 TYP=3
	1415	SVTO	4 S/F	0636.0	0637.0	3.0	27.0			QL=4 ST=2 TYP=3
	610	SVTO	8 S	0636.0	0636.0	1.0	220.0			QL=2 ST=2 TYP=3
	2850	CRIM	3 S	0636.1	0637.2	2.5	64.0	20.0		0
	500	HIRA	42 SER	0636.3	0637.3	7.5	66.0			QL=4 ST=2 TYP=3
	2695	SVTO	8 S	0637.0	0637.0	U	42.0			WR
2800	HIRA	3 S	0637.1	0638.0	2.0	40.0	33.0			
26	280	CUBA	44 NS	1300.0E		530.0D		14.0		
	235	CUBA	44 NS	1300.0E		530.0D		8.0		
	204	IZMI	41 F	0551.7	0553.0	1.5	58.0			
	204	IZMI	42 SER	0711.0	0731.0	90.0	25.0			
27	235	CUBA	44 NS	1300.0E		528.0D		7.0		
	280	CUBA	44 NS	1300.0E		528.0D		13.0		
28	235	CUBA	44 NS	1300.0E		530.0D		7.0		
	280	CUBA	44 NS	1300.0E		530.0D		12.0		
	245	LEAR	8 S	0618.0	0619.0	1.0	74.0			QL=4 ST=2 TYP=3
	204	IZMI	42 SER	0946.0	0956.0	12.0	23.0	12.0		
29	280	CUBA	44 NS	1300.0E		530.0D		13.0		
	235	CUBA	44 NS	1300.0E		530.0D		6.0		
30	280	CUBA	44 NS	1300.0E		530.0D		12.0		
	235	CUBA	44 NS	1300.0E		530.0D		7.0		
	410	SVTO	8 S	0804.0	0804.0	U	86.0			QL=4 ST=2 TYP=3
31	280	CUBA	44 NS	1300.0E		535.0D		12.0		
	235	CUBA	44 NS	1300.0E		535.0D		6.0		
	127	TORN	46 C	1008.0	1012.4	9.0	30.0	10.0		

10
Aug 95

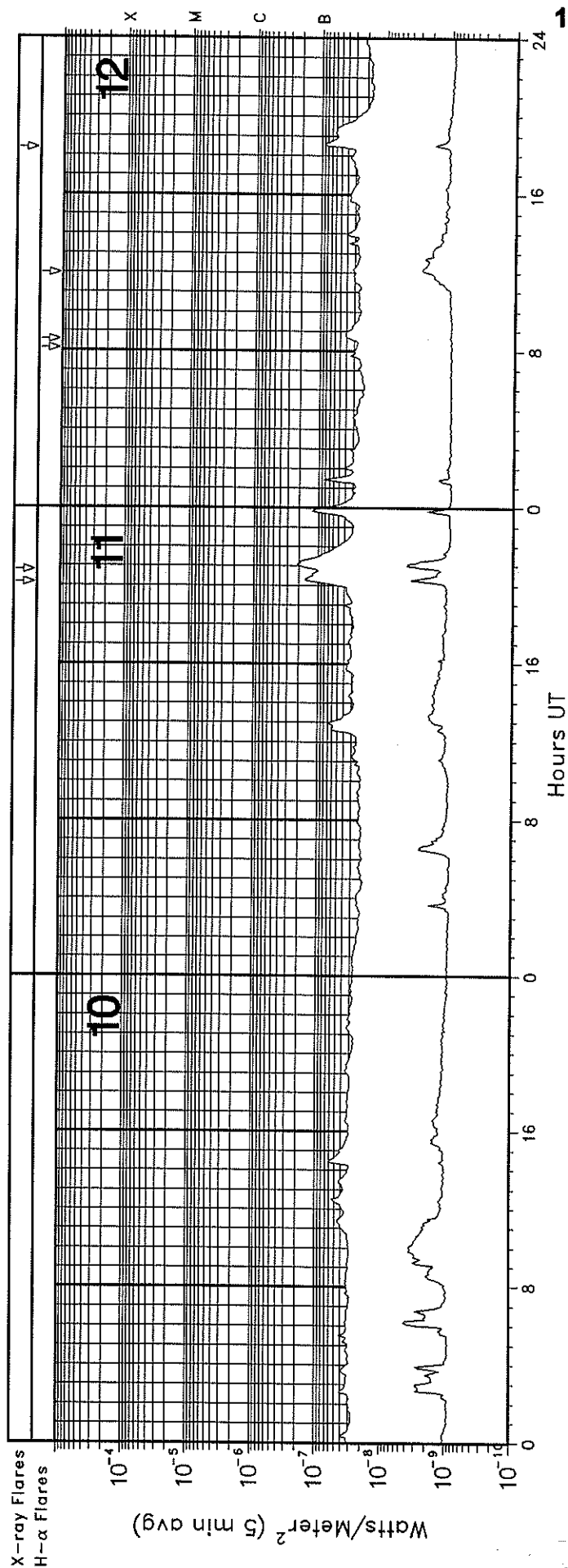
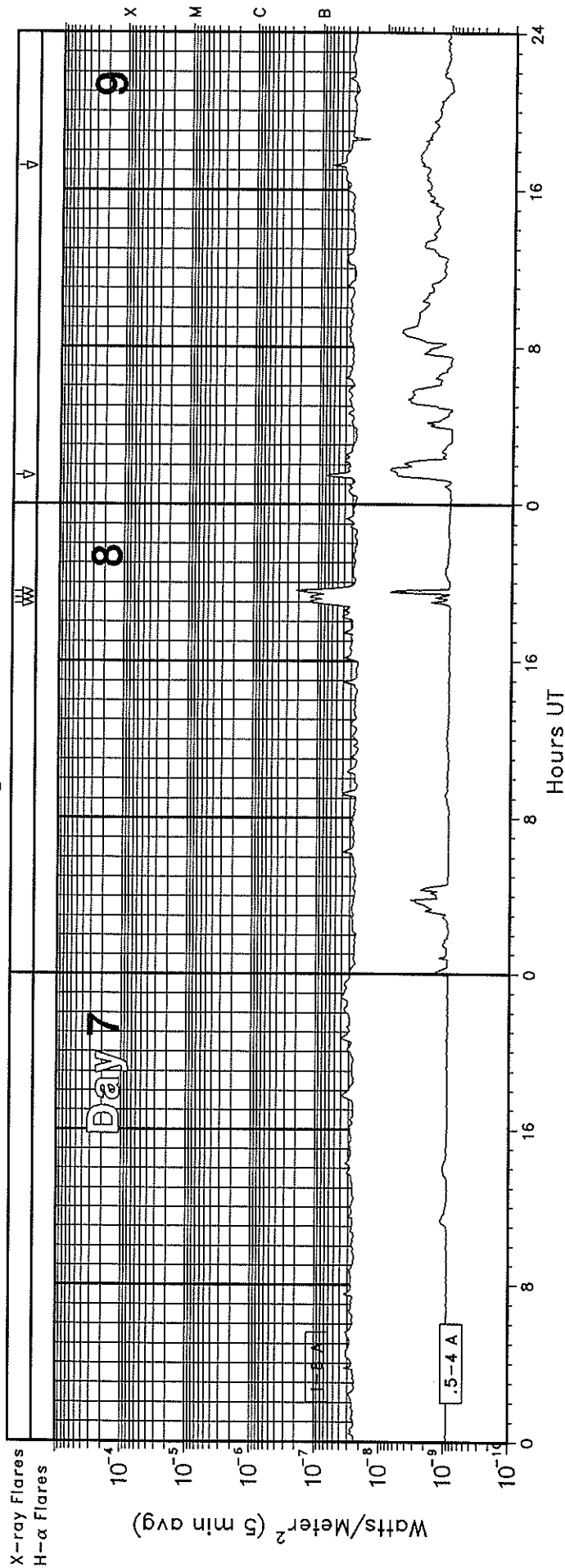
GOES-7 X-RAY DETECTOR

August 1995



GOES-7 X-RAY DETECTOR

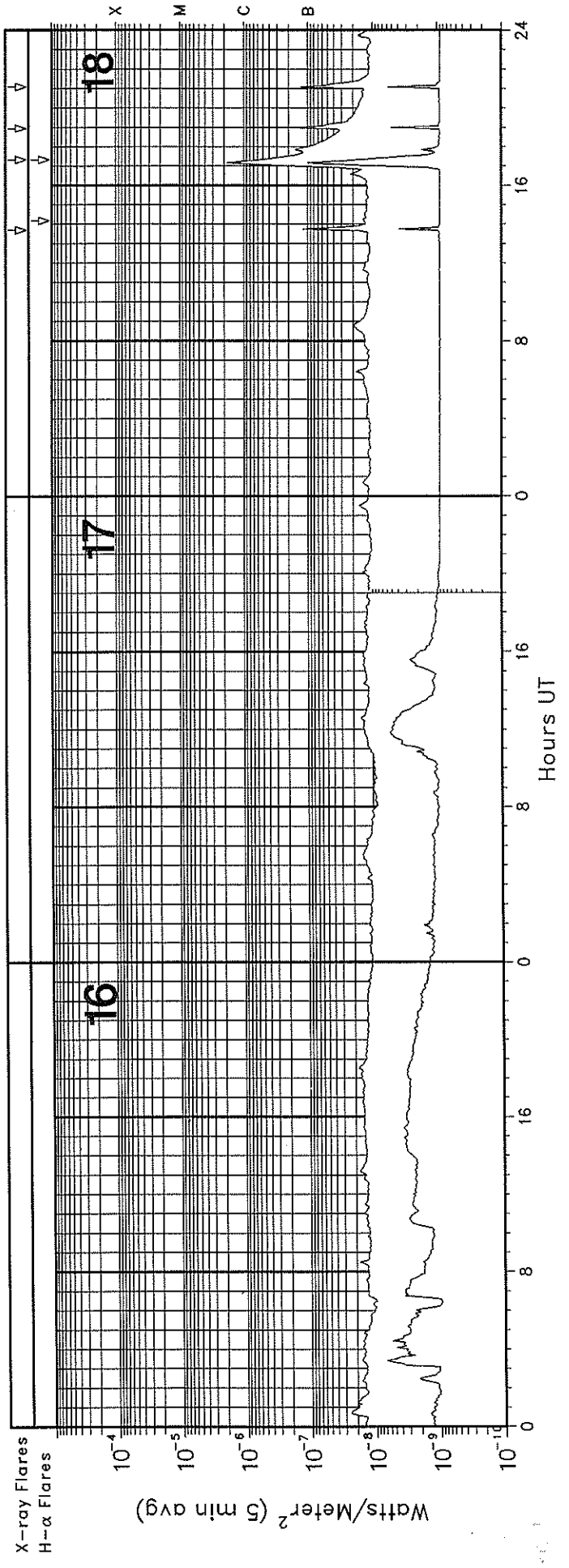
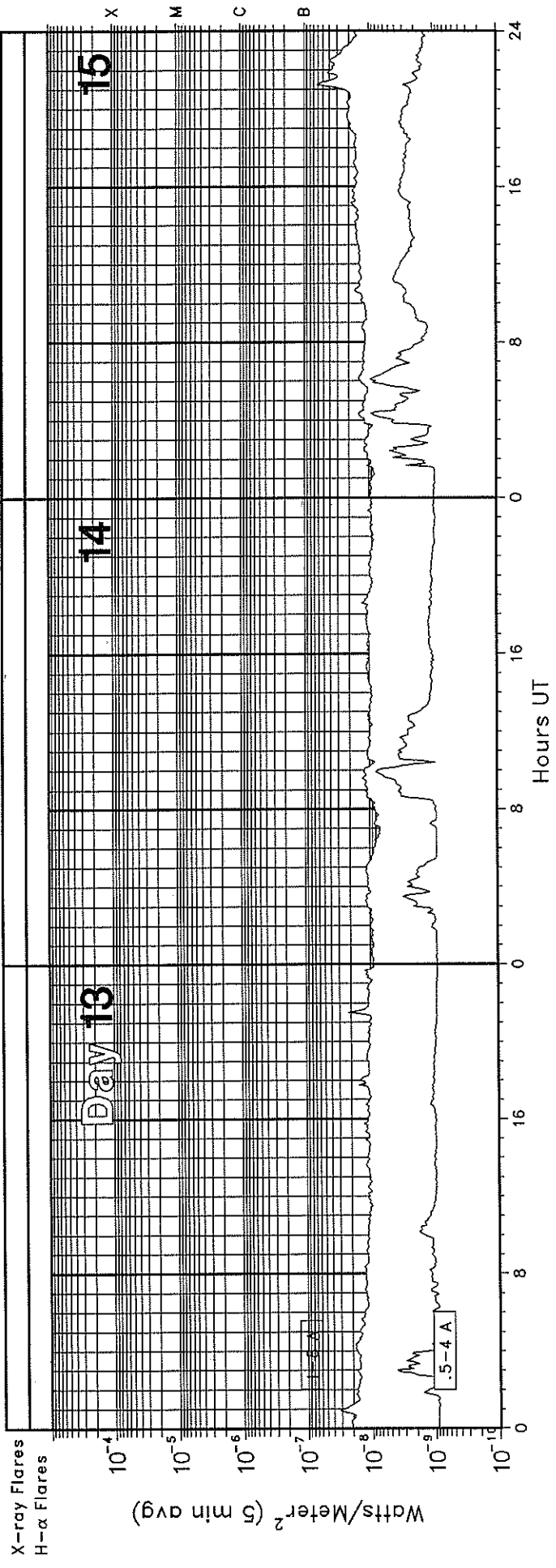
August 1995



12
Aug 95

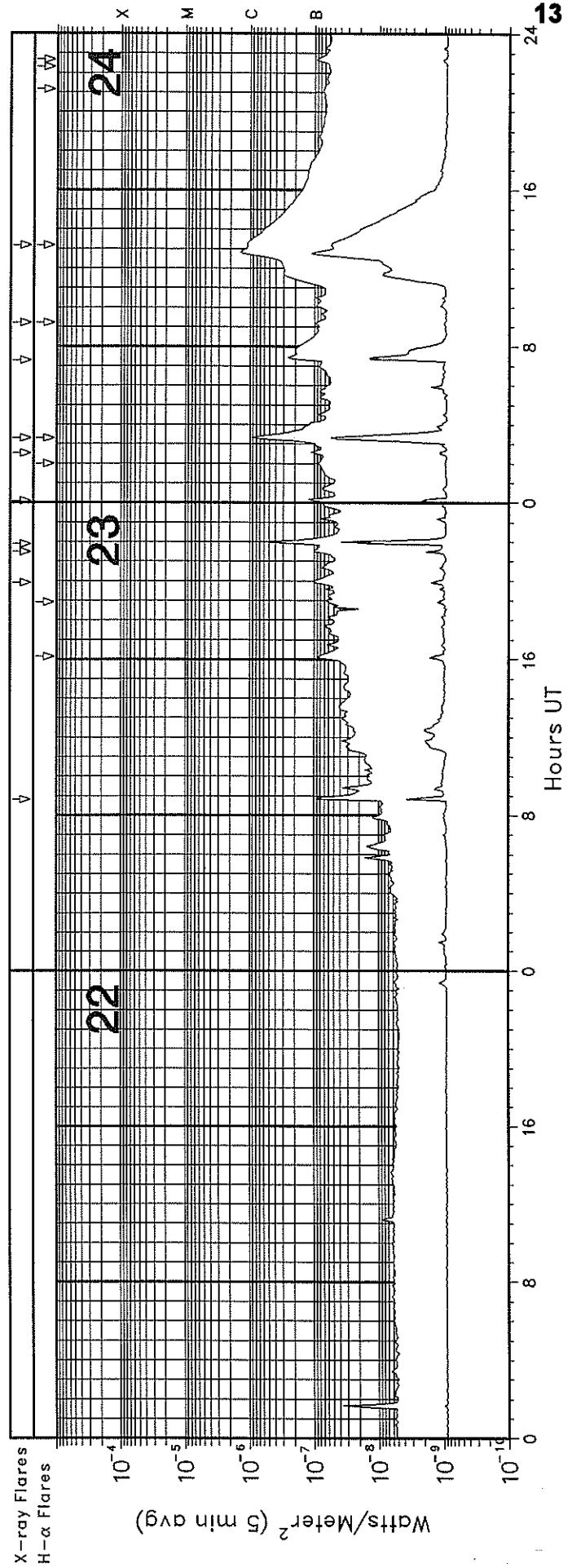
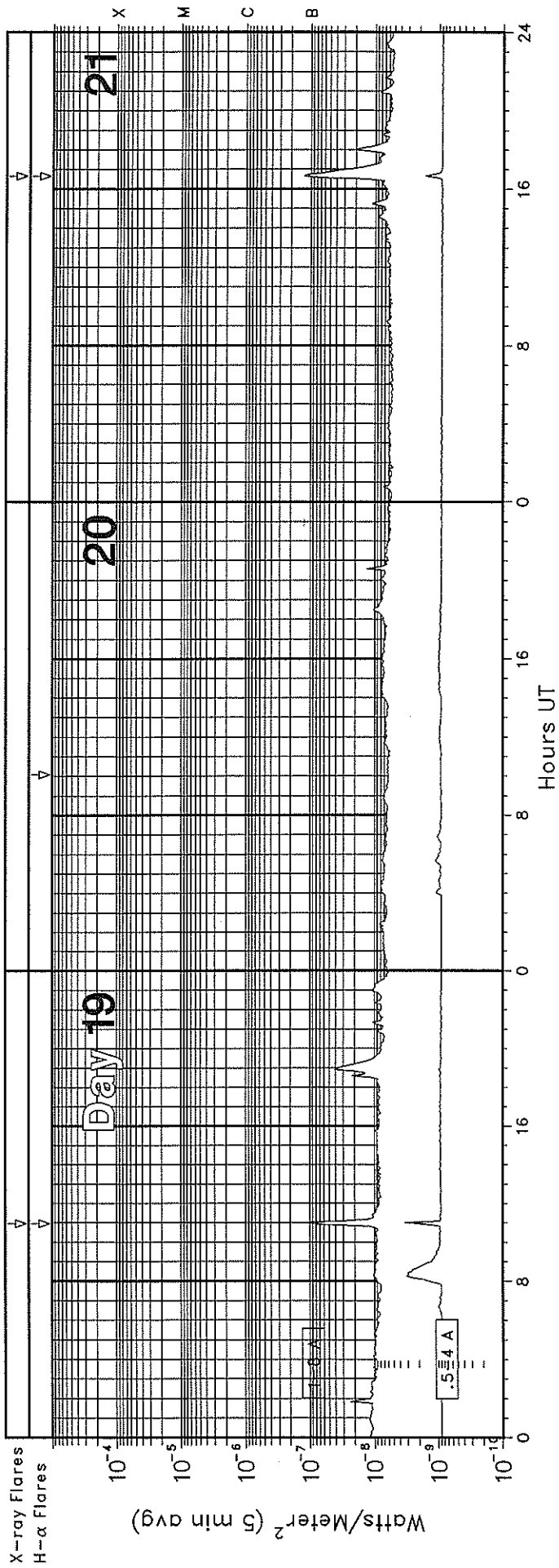
GOES-7 X-RAY DETECTOR

August 1995



GOES-7 X-RAY DETECTOR

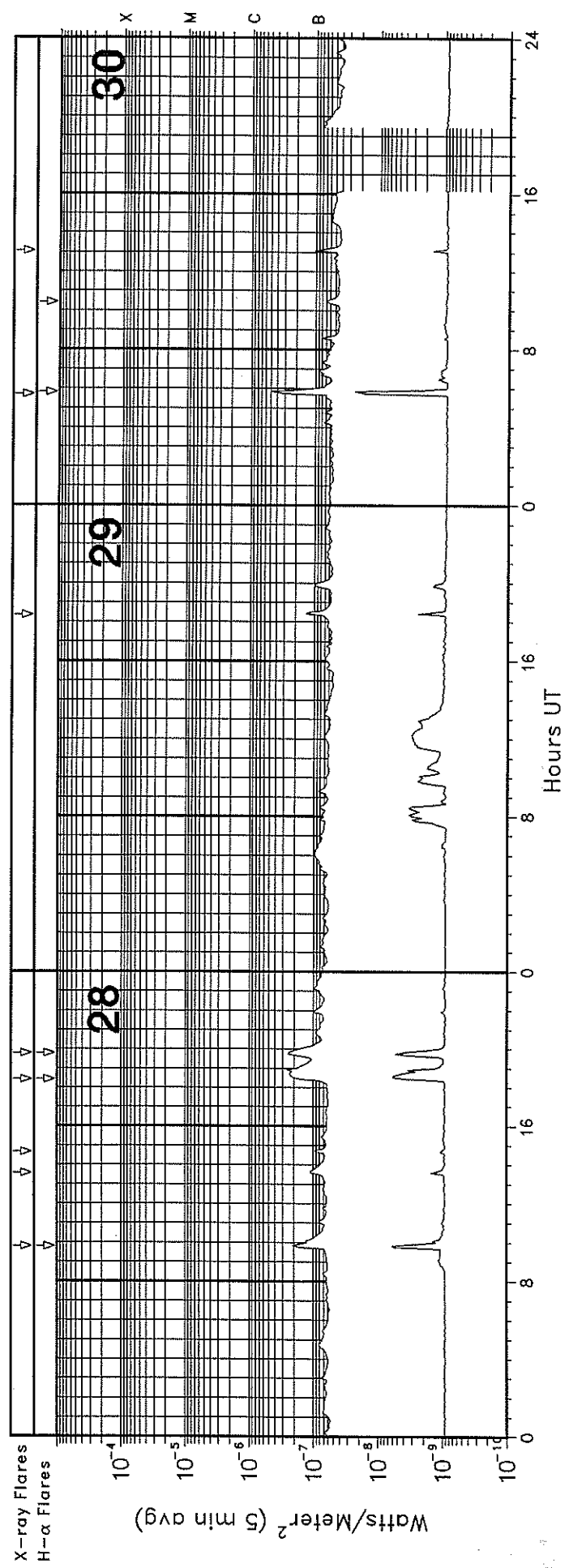
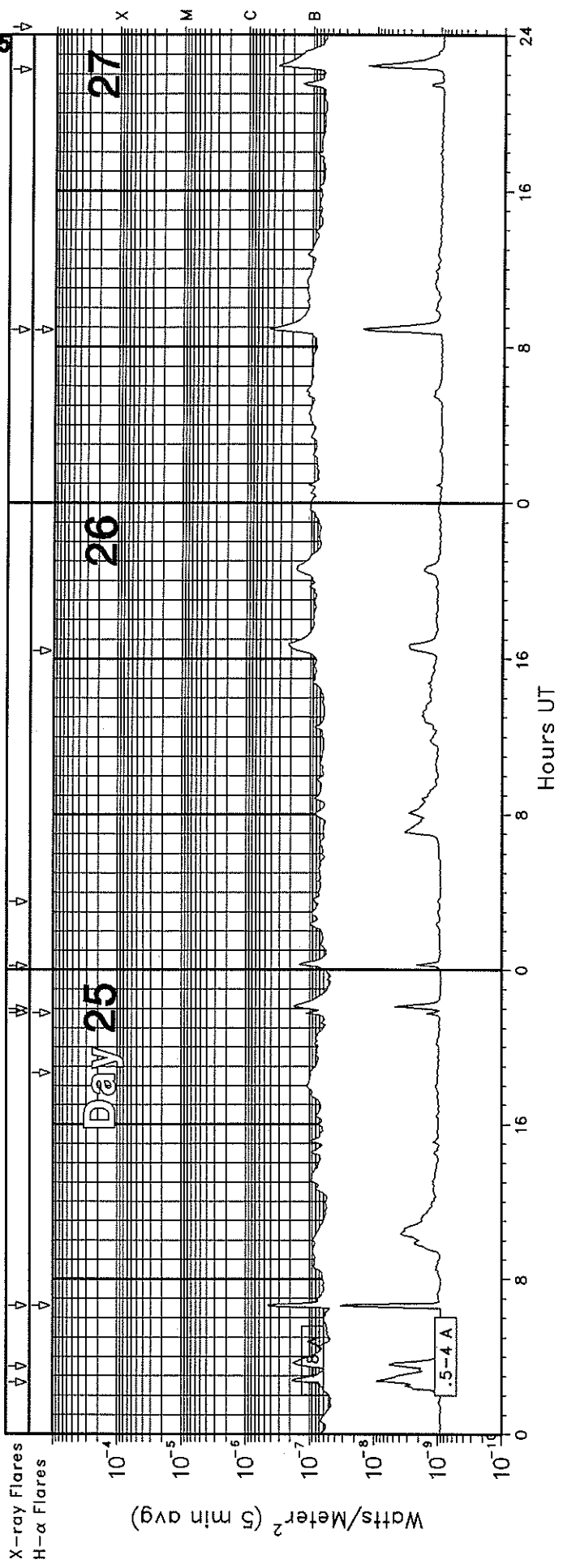
August 1995



14
Aug 95

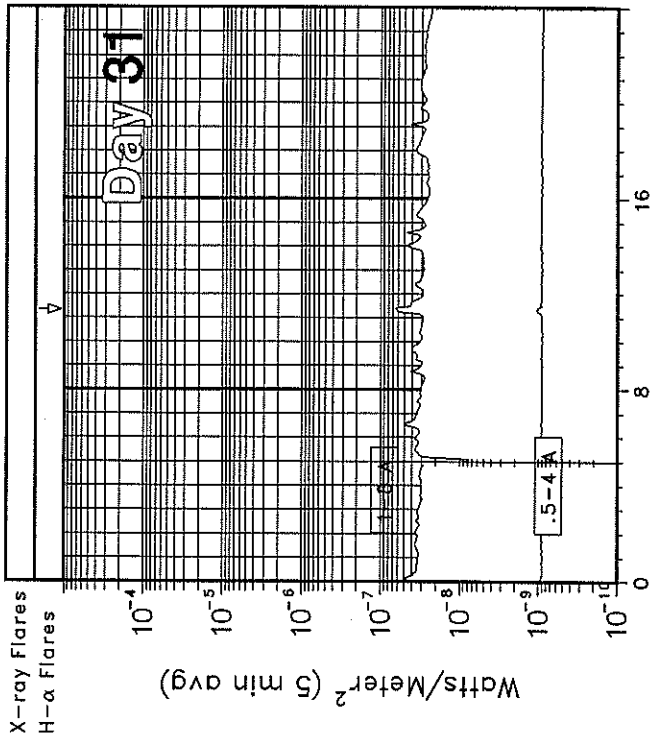
GOES-7 X-RAY DETECTOR

August 1995



GOES-7 X-RAY DETECTOR

August 1995



16
Aug 95

GOES SOLAR X-RAY FLARES
Preliminary Listing

August 1995

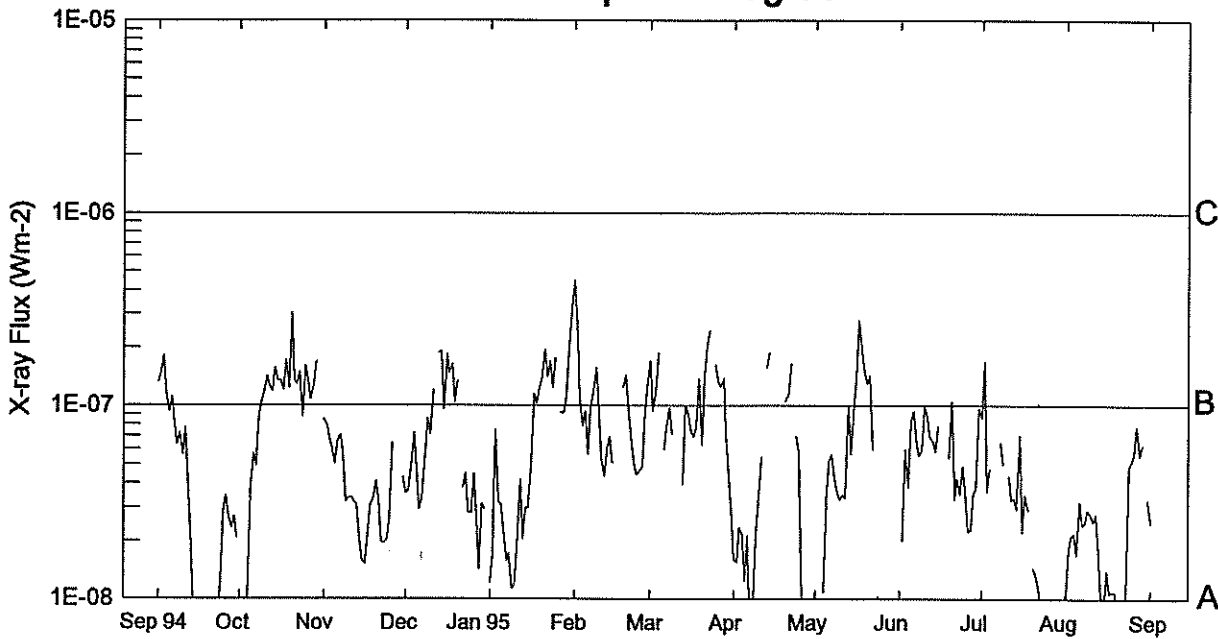
Start Day	Start (UT)	Max (UT)	End (UT)	Lat	CMD	Imp Opt	Xray	NOAA/USAF Region
02	1955	2002	2014	N12	E04	SF	B1.7	7894
08	1855	1904	1909				B1.5	
08	1913	1919	1923				B1.5	
08	1931	1934	1938				B3.2	
09	0125	0129	0132				B1.1	
09	1712	1717	1722				B1.1	
11	2010	2019	2032				B1.6	
11	2048	2105	2119				B2.2	
12	1822	1834	1941				B1.0	
18	1342	1346	1349				B1.6	
18	1720	1722	1801	N11	E90	SN	C1.9	
18	1857	1901	1904				B2.6	
18	2104	2108	2110				B3.1	
19	1057	1101	1103				B1.6	
21	1639	1642	1655	N08	E50	SF	B1.3	
23	0849	0852	0859				B1.4	
23	1955	1958	2004				B1.1	
23	2130	2133	2136				B1.2	
23	2154	2201	2204				B7.5	
24	0005	0010	0013				B1.5	
24	0231	0235	0240				B1.2	

Start Day	Start (UT)	Max (UT)	End (UT)	Lat	CMD	Imp Opt	Xray	NOAA/USAF Region
24	0318	0320	0337	N05	W14	SF	B9.9	7901
24	0718	0725	0805				B2.6	
24	0913	0915	0925	N03	W18	SF	B1.0	7901
24	1311	1318	1323	S10	W14	SF	C1.4	7902
25	0240	0247	0255				B1.9	
25	0329	0340	0357				B1.8	
25	0637	0638	0645	N04	W27	SF	B7.4	7901
25	2146	2146	2155	S10	W32	SF	B1.2	7902
25	2159	2208	2218				B1.8	
26	0012	0017	0025				B1.5	
26	0331	0334	0336				B1.0	
27	0852	0853	0905	N04	W59	SF	B4.6	7901
27	2424	2130	2135				B1.5	
27	2213	2228	2243				B3.6	
28	0948E	0948U	1015	N05	E48	SF	B2.4	7903
28	1335	1337	1344				B1.1	
28	1440	1444	1447				B1.1	
28	1825	1837	1851	N02	E45	SF	B2.8	7903
28	1947	1947	1957	N04	E44	SF	B2.5	7903
29	1822	1829	1833				B1.5	
30	0542	0550	0554				B6.4	
30	1304	1308	1311				B1.2	

EDITOR'S NOTE: Please note that whenever optical flares are given, the times given are times of the optical flares and not the times of the X-ray flares. These data are taken directly from the NOAA SEC "Preliminary Report and Forecast of Solar Geophysical Data" weekly report.

Preliminary GOES Satellite Daily X-Ray Background Sep 94 - Aug 95

17
Aug 95



Day	Sep 94	Oct	Nov	Dec	Jan 95	Feb	Mar	Apr	May	Jun	Jul	Aug
1	B1.3	---	A8.5	A3.5	A1.2	B4.4	B1.7	A1.5	<A1.0	---	A8.6	A1.5
2	B1.4	<A1.0	A7.8	A3.6	A1.6	B2.6	A9.3	A1.5	<A1.0	A1.9	B1.6	A2.9
3	B1.8	<A1.0	A6.7	A5.0	A7.4	B1.1	B1.1	A2.3	---	A5.9	A3.6	A2.7
4	B1.1	<A1.0	A5.9	A7.2	A3.2	A7.8	B1.9	A2.1	A1.0	A3.8	A4.7	A2.4
5	A9.3	A3.6	A5.0	A4.7	A3.1	A9.3	---	B1.2	A3.2	A8.2	---	A3.4
6	B1.1	A5.7	A6.6	A2.9	A2.2	A5.6	A5.9	B2.1	A5.2	A9.3	---	A3.4
7	A8.1	A4.9	A7.1	A3.3	A1.5	A9.7	A7.6	<A1.0	A5.6	A6.7	---	A1.9
8	A6.3	A8.9	A5.4	A5.5	A1.7	B1.2	A9.7	<A1.0	A4.1	A5.5	A6.4	A1.8
9	A7.2	B1.0	A3.2	A8.5	A1.1	B1.5	A7.1	A2.0	A3.5	A5.9	A4.9	A2.2
10	A5.6	B1.1	A3.3	A7.0	A1.1	A9.4	---	A3.1	A3.2	A9.8	---	A3.7
11	A7.7	B1.4	A3.3	B1.2	A1.8	A5.3	A8.5	A5.4	A3.4	A8.8	A4.3	A3.0
12	A4.1	B1.2	A3.2	---	A4.1	A4.3	---	---	A3.3	A6.9	A3.2	A6.9
13	A2.2	B1.1	A3.0	B1.8	A2.0	A6.0	A3.9	B1.5	A9.9	A6.5	A3.3	B1.3
14	<A1.0	B1.5	A2.0	B1.9	A3.0	A6.9	A9.9	B1.9	A5.6	A5.8	A2.9	A8.6
15	<A1.0	B1.3	A1.5	A9.5	A2.9	A5.0	A9.1	---	A9.3	A7.8	A7.0	A7.1
16	<A1.0	B1.3	A1.5	B1.8	A5.1	---	A7.3	---	B1.3	---	A2.2	A4.8
17	<A1.0	B1.2	A2.1	B1.4	B1.1	A5.5	A6.9	---	B2.7	---	A3.4	A4.0
18	<A1.0	B1.7	A3.1	B1.6	B1.0	---	A7.7	---	B1.8	---	A2.8	A4.9
19	<A1.0	B1.2	A3.3	B1.0	B1.2	B1.2	B1.3	---	B1.4	A5.4	---	A5.6
20	<A1.0	B3.0	A4.0	B1.3	B1.3	B1.4	A6.2	B1.0	B1.2	B1.0	A1.4	A3.0
21	<A1.0	B1.3	A3.3	---	B1.9	A9.5	B1.4	B1.1	B1.4	A3.2	A1.3	A2.0
22	<A1.0	B1.2	A1.9	A3.7	B1.4	A6.5	B2.0	B1.6	A5.9	A4.2	A1.1	A1.0
23	<A1.0	B1.5	A1.9	A4.4	B1.7	A5.0	B2.4	---	---	A3.4	<A1.0	<A1.0
24	A1.2	A8.7	A2.0	A2.8	B1.2	A4.4	---	A6.9	A1.0	A4.8	<A1.0	A1.1
25	A2.8	B1.6	A2.6	A2.8	B1.7	A4.5	B1.6	A5.6	<A1.0	A3.6	<A1.0	<A1.0
26	A3.4	B1.3	A6.4	A4.4	---	A4.8	B1.3	<A1.0	<A1.0	A2.2	<A1.0	<A1.0
27	A2.6	B1.0	---	A2.6	A9.2	A9.4	B1.2	<A1.0	---	A2.2	<A1.0	<A1.0
28	A2.3	B1.2	---	A1.4	A9.1	B1.3	B1.3	<A1.0	<A1.0	A3.5	<A1.0	A1.2
29	A2.6	B1.7	---	A3.1	B1.0	---	A7.4	<A1.0	<A1.0	A3.7	<A1.0	B1.7
30	A2.0	---	A4.2	A2.9	B1.9	---	A4.3	<A1.0	<A1.0	A9.6	---	B4.3
31	---	---	---	---	B3.3	---	A2.8	---	<A1.0	---	<A1.0	B1.9

NOTE: Background levels below B1.0 are unreliable.

ACTIVE PROMINENCES AND FILAMENTS

AUGUST 1995

Day	Event Type	Start (UT)	End (UT)	Lat	CMD	Mo	CMP Day	Imp	Extent	Blue Shift (.1 A)	Red Shift (.1 A)	Obs Type	NOAA/USAF Sta Reg#	Remarks
01	DSF	0110U	1246U	S34	E61	08	5.9	2	27	0	0	E	HOLL	
01	AFS	0120E	0944	N11	E27	08	3.1		02	5	5	E	LEAR	7894
01	ADF	0140E	0944	N14	E29	08	3.3	1	06	9	9	E	LEAR	7894
01	DSF	0627U	2315U	S13	E29	08	3.4	2	17	0	0	E	LEAR	
01	ADF	0820E	0850U	N19	E20	08	2.9	1	10	9	9	V	KHAR	
01	AFS	1045E	2239	N12	E16	08	2.6		02	9	9	E	RAMY	7894
01	AFS	1110E	1540	N13	E22	08	3.1		02	9	9	E	SVTO	7894
01	AFS	1246E	0119	N19	E15	08	2.7		02	4	5	E	HOLL	7894
01	ADF	1400E	1540	N07	E13	08	2.5	1	04	9	9	E	SVTO	
01	ADF	1400E	1540	N21	E15	08	2.7	1	08	9	9	E	SVTO	7894
01	DSD	1513E	2239	N13	E17	08	2.9		02	9	9	E	RAMY	7894
01	DSD	1806	1821	N12	E16	08	2.9		02	9	9	E	HOLL	7894
01	DSD	1923E	0119	N13	E15	08	2.9		02	9	9	E	HOLL	7894
01	DSD	1930E	0119	N12	E15	08	2.9		02	0	0	E	HOLL	7894
01	DSD	2024	2032	N12	E14	08	2.9		01	0	0	E	HOLL	7894
01	AFS	2215E	0224	N11	E16	08	3.1		04	9	9	E	PALE	7894
01	DSD	2215E	0224	N12	E14	08	3.0		02	9	9	E	PALE	7894
02	DSF	0103U	1300U	N40	E60	08	6.9	2	06	0	0	E	HOLL	
02	DSF	0240U	2122U	S25	E37	08	5.0		21	0	0	E	PALE	
02	BSL	0655	0702D	N89	W90	07	25.0	1-				C	CATA	
02	BSL	0702	0702D	S34	E90	08	9.5	1-				C	CATA	
02	BSL	0922	0922D	N17	E90	08	9.2	1-				C	CATA	
02	BSL	1032	1043	N24	E90	08	9.4	1-				C	CATA	
02	BSL	1120E	1124	N78	E90	08	10.8	1-				C	CATA	
02	BSL	1120E	1124D	S89	E90	08	10.9	1-				C	CATA	
02	BSL	1124	1124D	N62	E90	08	10.4	1-				C	CATA	
02	AFS	1234E	0153	N12	E07	08	3.0		02	9	9	E	HOLL	7894
02	AFS	1555E	1701	N12	E05	08	3.0		02	9	9	E	SVTO	7894
03	AFS	0230E	0939	N09	W02	08	2.9		02	9	9	E	LEAR	7894
03	AFS	0725E	1722	N12	W08	08	2.7		02	9	9	E	SVTO	7894
03	BSL	0909E	0909D	S78	E90	08	11.7	1-				C	CATA	
03	BSL	0948E	0953	N63	E90	08	11.4	1-				C	CATA	
03	BSL	1127E	1132	N48	W90	07	27.0	1-				C	CATA	
03	AFS	1533E	1635D	S09	E52	08	7.5		02	9	9	E	SVTO	
03	AFS	1655E	0440	N12	E04	08	4.0		04	9	9	E	PALE	7894
03	AFS	1700E	2147	N11	W09	08	3.0		03	9	9	E	PALE	7894
03	ADF	1705E	2147	N23	W05	08	3.3	1	08	9	9	E	PALE	7894
03	DSD	1833E	1907	N13	W09	08	3.1		03	0	0	E	HOLL	7894
03	AFS	2010E	0148	N12	W12	08	2.9		02	9	9	E	HOLL	7894
03	ADF	2224E	0148	N14	W12	08	3.0	1	03	9	9	E	HOLL	7894
04	ADF	0100E	0525D	N11	W14	08	3.0	1	04	9	9	E	LEAR	7894
04	AFS	0710E	1515D	N11	W16	08	3.1		03	9	9	E	SVTO	7894
04	DSD	0715E	1050D	S07	E58	08	8.6		02	9	9	E	SVTO	7895
04	DSD	0745E	1050D	S12	E42	08	7.5		01	9	9	E	SVTO	
04	BSL	0923E	0927D	S84	W90	07	27.1	1-				C	CATA	
04	BSL	1145	1145D	S49	E90	08	12.1	1-				C	CATA	
04	ADF	1231E	1735	S02	E62	08	9.1	1	06	9	8	E	SVTO	7895
04	AFS	1439E	1630D	N14	W19	08	3.2		02	8	9	E	RAMY	7894
04	ASR	1443E	1512D	N10	W82	07	29.5			0	0	E	HOLL	
04	ADF	1730E	1905	N21	W24	08	2.9	1	08	7	7	E	PALE	7894
04	AFS	1733E	1905	N12	W22	08	3.1		03	9	9	E	PALE	7894
04	ADF	1735E	1905	N06	W26	08	2.8	1	03	9	9	E	PALE	7894
04	DSD	1740E	1905	S07	E59	08	9.1		02	9	9	E	PALE	7895
04	ADF	2110E	0104	N16	W25	08	3.0	1	03	9	9	E	HOLL	7894
05	AFS	0215E	0945	N02	E10	08	5.8		01	9	9	E	LEAR	
05	AFS	0500E	1725	N02	E08	08	5.8		03	9	9	E	SVTO	7896
05	AFS	0500E	1725	S06	E51	08	9.0		02	9	9	E	SVTO	7895
05	AFS	0745E	1530D	N13	W31	08	3.0		02	9	9	E	SVTO	7894
05	ASR	0800E	1000D	N06	W90	07	29.7			9	9	E	SVTO	
05	DSD	1050E	1206D	N02	E05	08	5.8		01	9	9	E	RAMY	
05	AFS	1050E	2121	N03	E05	08	5.8		02	9	9	E	RAMY	7896
05	BSL	1113	1115D	S57	E90	08	13.3	1-				C	CATA	
05	BSL	1128E	1129D	S58	E90	08	13.3	1-				C	CATA	
05	BSL	1128E	1129D	S89	W90	07	28.1	1-				C	CATA	
05	ADF	1145E	1725	N18	W33	08	3.0	2	04	9	9	E	SVTO	7894
05	AFS	1204E	1235D	S03	W16	08	4.3		01	9	9	E	SVTO	

ACTIVE PROMINENCES AND FILAMENTS

19
Aug 95

AUGUST 1995

Day	Event Type	Start (UT)	End (UT)	Lat	CMD	CMP Mo	Day	Imp	Extent	Blue Shift (.1 A)	Red Shift (.1 A)	Obs Type	Sta	NOAA/USAF Reg#	Remarks
05	AFS	1237E	0007	N02	E03	08	5.7		02	9	6	E	HOLL	7896	
05	AFS	1518	0007	N13	W34	08	3.1		02	7	9	E	HOLL	7894	
05	AFS	1615E	2121	N14	W34	08	3.1		02	9	9	E	RAMY	7894	
05	DSF	2230U	2139U	S04	E43	08	9.1		11	0	0	E	PALE		
05	AFS	2335E	2357	N03	W02	08	5.8		03	9	9	E	PALE	7896	
05	AFS	2347E	0241D	N13	W42	08	2.8		01	9	9	E	LEAR	7894	
05	AFS	2350E	0930	N03	W02	08	5.8		05	9	9	E	LEAR	7896	
06	ADF	0040E	0930	N24	E38	08	9.0	1	03	8	7	E	LEAR	7895	
06	DSD	0210E	0930	N01	W03	08	5.9		02	9	9	E	LEAR	7896	
06	AFS	0600E	1155D	N00	W05	08	5.9		01	9	9	E	SVTO	7896	
06	ADF	0605E	1155D	N00	W05	08	5.9	1	02	9	9	E	SVTO	7896	
06	BSL	0819E	0821D	N71	W90	07	29.2	1-				C	CATA		
06	BSL	0848E	0852D	N13	E90	08	13.1	1-				C	CATA		
06	DSF	0921U	0040U	N01	E40	08	9.4	2	08	0	0	E	LEAR		
06	AFS	1040E	1736	N03	W08	08	5.8		01	9	9	E	RAMY	7896	
06	AFS	1200E	1710	N01	W09	08	5.8		02	9	9	E	SVTO	7896	
06	ADF	1212E	1710	N26	W35	08	3.8	1	09	7	7	E	SVTO		
06	DSD	1316E	1615D	N05	W10	08	5.8		01	9	9	E	RAMY	7896	
06	AFS	1326E	0019D	N01	W10	08	5.8		02	9	9	E	HOLL	7896	
06	ADF	1613E	1710	N10	W47	08	3.1	1	08	9	9	E	SVTO	7894	
06	DSD	1742	1757	N03	W14	08	5.7		02	9	9	E	HOLL	7896	
07	DSF	0033U	1401U	S08	E06	08	7.5	2	03	0	0	E	HOLL		
07	AFS	0150E	0946	N03	W18	08	5.7		02	9	9	E	LEAR	7896	
07	ADF	0445E	0946	S08	E02	08	7.3		02	9	9	E	LEAR		
07	AFS	0547E	1722	N01	W19	08	5.8		02	7	7	E	SVTO	7896	
07	BSL	0811E	0815	N59	W90	07	30.5	1-				C	CATA		
07	ADF	0907E	1230D	N25	W47	08	3.7	2	17	8	7	E	SVTO		
07	DSF	0921U	0400U	N01	E40	08	10.4	1	08	0	0	E	LEAR		
07	DSD	1028E	2200	S09	E18	08	8.8		02	9	9	E	RAMY	7895	
07	ADF	1029E	2200	N14	W56	08	3.2	1	07	9	9	E	RAMY	7894	
07	AFS	1030E	2200	N03	W23	08	5.7		03	9	9	E	RAMY	7896	
07	BSL	1043	1048	N86	W90	07	30.1	1-				C	CATA		
07	ADF	1055E	2200	N08	E30	08	9.7	1	05	9	9	E	RAMY	7895	
07	BSL	1115	1128	N51	W90	07	30.9	1-				C	CATA		
07	ADF	1132E	1722	N11	W57	08	3.2	1	05	9	9	E	SVTO	7894	
07	DSF	1141U	0704U	N04	E42	08	10.6	1				C	CATA		
07	BSL	1150E	1201D	N79	E90	08	15.8	1-				C	CATA		
07	BSL	1150E	1201D	N89	E90	08	15.9	1-				C	CATA		
07	AFS	1321E	0146	N03	W24	08	5.8		02	9	9	E	HOLL	7896	
07	ADF	1321E	0146	N13	W60	08	3.0	1	04	9	9	E	HOLL	7894	
07	DSD	1519E	1558D	S08	E14	08	8.7		04	9	9	E	HOLL	7895	
07	AFS	1523E	0146	N14	W66	08	2.6		02	9	9	E	HOLL	7894	
07	BSD	1608E	1634D	N16	W60	08	3.1		02	6	5	E	HOLL	7894	
07	DSD	1612E	2200	N04	W27	08	5.6		02	9	9	E	RAMY	7896	
07	DSD	1613E	1802D	N04	W27	08	5.6		02	9	9	E	HOLL	7896	
07	ADF	1726E	0325	N13	W57	08	3.4	1	05	9	9	E	PALE	7894	
07	DSD	1726E	0325	N16	W66	08	2.7		02	9	9	E	PALE	7894	
07	DSD	1728E	0325	N01	W27	08	5.7		03	9	9	E	PALE	7896	
07	AFS	1728E	0325	N02	W27	08	5.7		03	9	9	E	PALE	7896	
07	ADF	1738E	0325	S05	E17	08	9.0	1	04	9	9	E	PALE	7895	
07	AFS	2125E	0415	N02	W15	08	6.8		03	9	9	E	PALE	7896	
07	ADF	2125E	0415	N12	W51	08	4.0		07	9	9	E	PALE	7894	
08	AFS	0610E	1725	N00	W34	08	5.7		02	9	9	E	SVTO	7896	
08	AFS	1033E	1602D	N03	W34	08	5.9		01	7	9	E	RAMY	7896	
08	DSD	1116E	1654	N05	W39	08	5.5		01	8	9	E	RAMY	7896	
08	BSL	1156E	1200D	N72	W90	07	31.3	1-				C	CATA		
08	BSL	1156E	1200D	N82	E90	08	16.9	1-				C	CATA		
08	DSD	1345E	1725	S06	E05	08	8.9		02	9	9	E	SVTO	7895	
08	ADF	1345E	1725	S14	W14	08	7.5	1	04	6	8	E	SVTO		
08	ADF	1421E	1650D	N02	W36	08	5.9	1	05	9	7	E	RAMY	7896	
08	DSD	1620E	1654	S13	W17	08	7.4		01	8	9	E	RAMY		
08	ADF	1622E	1654	S17	W14	08	7.6	1	03	7	8	E	RAMY		
09	AFS	0550E	0759D	N01	W48	08	5.6		01	8	7	E	SVTO	7896	
09	ADF	0852E	1030D	S05	W06	08	8.9	1	04	9	9	E	SVTO	7895	
09	ADF	0852E	1030D	S06	W03	08	9.1	1	03	9	8	E	SVTO	7895	
09	BSL	0950E	0958D	N12	E90	08	16.2	1-				C	CATA		

20
Aug 95

ACTIVE PROMINENCES AND FILAMENTS

AUGUST 1995

Day	Event Type	Start (UT)	End (UT)	Lat	CMP CMD	Mo Day	Imp	Extent	Blue Shift (.1 A)	Red Shift (.1 A)	Obs Type	NOAA/USAF Sta Reg#	Remarks
09	BSL	1102	1102D	N09	E90	08 16.2	1-				C	CATA	
09	BSL	1102	1102D	N73	W90	08 1.2	1-				C	CATA	
09	DSD	1120E	1315D	S06	W10	08 8.7		01	9	9	E	RAMY 7859	
09	AFS	1122E	1644D	N03	W51	08 5.7		01	7	9	E	RAMY 7896	
09	AFS	1130E	1720	N02	W52	08 5.6		02	9	9	E	SVTO 7896	
09	ADF	1130E	1720	S12	W29	08 7.3	1	10	8	8	E	SVTO	
09	BSL	1134	1146	N05	E90	08 16.2	1-				C	CATA	
09	DSD	1134E	1358D	S10	W28	08 7.4		01	9	9	E	RAMY	
09	ADF	1134E	1711D	S17	W24	08 7.6	1	05	8	9	E	RAMY	
09	ASR	1335E	1720	N06	E90	08 16.3			7	8	E	SVTO	
09	DSF	1646U	0548U	S09	W09	08 9.0		07	0	0	E	SVTO 7895	
09	DSF	1647	1717	S13	W29	08 7.5	3	03	0	0	E	HOLL	
09	AFS	1705E	0006	S06	W07	08 9.2		03	9	9	E	PALE 7895	
09	ADF	1705E	0144	S15	W01	08 9.6		05	9	9	E	PALE 7895	
09	AFS	1707E	0144	N03	W54	08 5.7		03	9	9	E	PALE 7896	
09	AFS	1709E	0006	S11	W30	08 7.4		02	9	9	E	PALE	
09	ADF	1709E	0006	S17	W26	08 7.7		03	9	9	E	PALE	
09	DSF	1711U	1716U	S12	W31	08 7.4	3	06	0	0	E	RAMY	
09	ADF	1716E	2211	S16	W28	08 7.6	1	04	9	9	E	RAMY	
09	DSF	1927U	1150U	N03	W34	08 7.3	2	04	0	0	E	RAMY	
09	DSF	1928U	1145U	S10	W07	08 9.3	2	03	0	0	E	RAMY 7895	
10	ADF	0414E	0935	S19	W35	08 7.5	1	04	9	9	E	LEAR	
10	DSD	1358E	1642D	N11	E17	08 11.9		02	6	9	E	RAMY	
10	DSD	1642E	2012D	N11	E20	08 12.2		01	9	9	E	RAMY 7898	
11	ADF	0200E	0645D	S10	W50	08 7.3	1	11	9	9	E	LEAR	
11	BSL	0737E	0740D	N89	W90	08 2.9	1-				C	CATA	
11	BSL	0751E	0807	N08	E90	08 18.1	1-				C	CATA	
11	ADF	0800E	1651	N05	E75	08 16.9	1	07	7	8	E	SVTO 7897	
11	BSL	0814	0828	N81	W90	08 3.0	1-				C	CATA	
11	DSF	1150U	0622U	N44	W48	08 7.5	1				C	CATA	
11	DSD	1528E	2150D	S06	W37	08 8.9		02	9	9	E	RAMY 7895	
11	DSD	1620E	2005D	N03	W77	08 5.9		01	9	9	E	RAMY 7896	
11	DSD	1707E	1843	N11	E18	08 13.1		03	9	9	E	PALE 7898	
12	ADF	0230E	0837	N01	E64	08 16.9	1	06	9	5	E	LEAR 7897	
12	ADF	0230E	0933	N05	W05	08 11.7	1	06	5	5	E	LEAR	
12	ADF	0608E	1730	N07	E67	08 17.3	1	11	8	7	E	SVTO 7897	
12	ASR	0609E	0705D	N01	W90	08 5.5			9	9	E	SVTO 7896	
12	DSD	0620E	0834D	N04	E58	08 16.6		03	9	8	E	SVTO 7897	
12	BSL	0643E	0706D	S07	E90	08 19.0	1-				C	CATA	
12	BSL	0757E	0800D	N85	W90	08 3.9	1-				C	CATA	
12	BSL	0834	0836D	N12	E90	08 19.1	1-				C	CATA	
12	BSL	0834	0836D	N19	W90	08 5.5	1-				C	CATA	
12	DSD	0907E	1044D	N11	W04	08 12.1		01	9	9	E	SVTO 7898	
12	ADF	0957E	1730	N03	W08	08 11.8	1	06	9	8	E	SVTO	
12	ADF	1134E	1300D	N07	E59	08 16.9	1	01	9	9	E	RAMY 7897	
12	DSD	1500E	1730	S07	W53	08 8.6		03	9	9	E	SVTO 7895	
12	DSD	1620E	2240	S20	E63	08 17.5		01	9	9	E	RAMY 7899	
12	DSF	1651U	0535U	S31	W32	08 10.2		09	0	0	E	SVTO	
12	DSF	1651U	0535U	S41	E60	08 17.6	1	42	0	0	E	SVTO	
12	DSF	1943U	2156	S25	E29	08 15.1	2	26	0	0	E	RAMY	
12	DSF	2015	2211	S24	E23	08 14.6	2	15	0	0	E	HOLL	
12	DSF	2332	0013U	S24	E27	08 15.1	1	20	0	0	E	PALE	
13	DSF	0100U	1308U	S32	W32	08 10.5	2	08	0	0	E	HOLL	
13	AFS	0535E	1130D	S17	E54	08 17.3		01	9	9	E	SVTO 7899	
13	DSD	0615E	0830D	N10	E47	08 16.8		02	9	9	E	SVTO 7897	
13	AFS	0825E	0946	N05	E43	08 16.6		04	9	9	E	LEAR 7897	
13	AFS	1038E	2215	N07	E44	08 16.7		03	9	9	E	RAMY 7897	
13	BSL	1059E	1109D	S53	E90	08 21.2	1-				C	CATA	
13	BSL	1105	1109D	S38	E90	08 20.7	1-				C	CATA	
13	BSL	1105	1109D	S78	E90	08 21.8	1-				C	CATA	
13	AFS	1134E	1508	N09	E44	08 16.8		02	9	8	E	SVTO 7897	
13	DSF	1149U	0716U	N02	W08	08 12.9	1				C	CATA	
13	DSF	1149U	0716U	S16	E18	08 14.8	1				C	CATA	
13	DSF	1149U	0716U	S32	E42	08 16.8	1				C	CATA	
13	DSD	1211E	1508	N07	E41	08 16.6		01	9	9	E	SVTO 7897	
13	AFS	1443	0105	N16	E38	08 16.5		02	7	9	E	HOLL 7897	

ACTIVE PROMINENCES AND FILAMENTS

21
Aug 95

AUGUST 1995

Day	Event Type	Start (UT)	End (UT)	Lat	CMD	CMP Mo	Day	Imp	Extent	Blue	Red	Obs	Sta	NOAA/	Remarks
										Shift (.1 A)	Shift (.1 A)			Reg#	
13	ADF	1449	1911	N19	E40	08	16.7	1	03	4	5	E	HOLL	7897	
13	DSD	1811E	2215	S19	E48	08	17.4		01	9	9	E	RAMY	7899	
13	AFS	1935E	0434	N04	E36	08	16.5		03	9	9	E	PALE	7897	
13	DSF	2332	0013U	S24	E27	08	16.1	1	20	0	0	E	PALE		
13	DSF	2345U	0013U	S27	E24	08	15.8	2	18	0	0	E	LEAR		
14	AFS	1212E	2239	N07	E29	08	16.7		02	9	8	E	RAMY	7897	
14	DSD	1216E	2239	S19	E38	08	17.4		01	9	9	E	RAMY	7899	
14	AFS	1733E	0432	N05	E26	08	16.7		03	9	9	E	PALE	7897	
15	AFS	0403E	0948	N10	E23	08	16.9		02	5	5	E	LEAR	7897	
15	AFS	0900E	1535	N07	W15	08	14.2		01	9	9	E	SVTO	7900	
15	AFS	1042E	1530D	N07	E17	08	16.7		02	9	9	E	RAMY	7897	
15	DSD	1050U	1120D	N04	W15	08	14.3	1	02	9	9	V	KHAR		
15	DSD	1104E	2240	N06	W15	08	14.3		01	9	9	E	RAMY	7900	
15	DSD	1110E	2240	S18	E26	08	17.4		01	7	7	E	RAMY	7899	
15	AFS	1337E	1535	S17	E23	08	17.3		02	9	9	E	SVTO	7899	
15	AFS	1520E	2240	N06	W18	08	14.3		01	9	9	E	RAMY	7900	
15	AFS	1607E	2240	S18	E23	08	17.4		01	9	9	E	RAMY	7899	
15	AFS	1710E	0320	N06	W18	08	14.4		02	9	9	E	PALE	7900	
15	AFS	1710E	0320	S18	E24	08	17.5		02	9	9	E	PALE	7899	
15	AFS	1857E	0107	N06	W20	08	14.3		01	5	7	E	HOLL	7900	
15	AFS	2116E	0107	S18	E21	08	17.5		02	9	9	E	HOLL	7899	
16	DSD	0501E	0535D	N02	E04	08	16.5		02	9	9	E	LEAR	7897	
16	AFS	0615E	1140	N05	W27	08	14.2		02	9	9	E	SVTO	7900	
16	DSD	0620E	0710D	N02	W02	08	16.1		02	6	9	E	LEAR	7897	
16	BSL	0621E	0621D	S75	W90	08	8.0	1-				C	CATA		
16	BSL	0636	0651D	N88	W90	08	7.8	1-				C	CATA		
16	BSL	0706	0706D	N76	E90	08	24.6	1-				C	CATA		
16	BSL	0807E	0819D	N80	W90	08	8.0	1-				C	CATA		
16	BSD	0825E	0850D	N01	E03	08	16.6		01	9	9	E	LEAR	7897	
16	DSD	0825E	0850D	N01	E03	08	16.6		02	9	9	E	LEAR	7897	
16	BSL	0830	0841D	N37	W90	08	9.1	1-				C	CATA		
16	BSL	0945	0955D	N84	W90	08	8.0	1-				C	CATA		
16	BSL	1026	1035D	S10	E90	08	23.2	1-				C	CATA		
16	AFS	1033E	2127	N07	W29	08	14.3		01	6	8	E	RAMY	7900	
16	BSL	1052E	1056D	S10	E90	08	23.2	1-				C	CATA		
16	DSD	1100U	1128	N04	W31	08	14.1	1	01	9		V	KHAR		
16	ADF	1105E	1140	N33	E10	08	17.2	2	10	0	0	E	SVTO		
16	DSD	1119E	1414D	N08	W28	08	14.4		01	9	9	E	RAMY	7900	
16	AFS	1125E	1600D	N08	E02	08	16.6		02	9	9	E	RAMY	7897	
16	BSL	1127E	1151D	S12	E90	08	23.2	1-				C	CATA		
16	DSD	1157	1227D	N04	W31	08	14.1	1	03	9	9	V	KHAR		
16	DSD	1645E	1845D	S17	E08	08	17.3		01	8	7	E	RAMY	7899	
16	ADF	1730E	0421	N07	W32	08	14.3	1	02	9	9	E	PALE	7900	
16	AFS	2345E	0948	N07	W23	08	15.3		02	6	6	E	LEAR	7900	
16	AFS	2345E	0948	S19	E17	08	18.3		03	5	7	E	LEAR	7899	
17	ADF	0120E	0948	N34	E03	08	17.3	1	09	5	6	E	LEAR		
17	ADF	0258E	0421	N34	W01	08	17.0	1	09	5	5	E	PALE		
17	AFS	0545E	0815	S24	E12	08	18.2		01	9	9	E	LEAR		
17	AFS	0632E	0834D	S22	E13	08	18.3		01	9	9	E	SVTO		
17	BSL	0647	0701	N70	W90	08	9.1	1-				C	CATA		
17	BSL	0656	0712	S53	E90	08	25.0	1-				C	CATA		
17	ADF	0913E	1455	N34	W04	08	17.1	1	11	8	7	E	SVTO		
17	ADF	0929E	1455	S11	E04	08	17.7	2	04	7	7	E	SVTO	7899	
17	DSF	0931U	2315U	N23	W01	08	17.3	1	09	0	0	E	LEAR		
17	BSL	0947	0950D	N79	E90	08	25.7	1-				C	CATA		
17	DSF	1455U	2315U	N34	W04	08	17.3		11	8	7	E	SVTO		
17	AFS	1730E	0439	N06	W14	08	16.7		03	9	9	E	PALE	7897	
17	DSF	1822U	1309U	N35	W11	08	16.9	2	11	0	0	E	RAMY		
18	BSL	0655	0702D	N83	E90	08	26.7	1-				C	CATA		
18	BSL	1021	1031	N24	E90	08	25.4	1-				C	CATA		
18	BSL	1021	1031	N24	W90	08	11.5	1-				C	CATA		
18	DSF	1152U	0622U	N30	W04	08	18.2	1				C	CATA		
18	ASR	1230E	1700	N14	W90	08	11.7			8	8	E	SVTO		
19	DSD	0938U	0955	N19	E72	08	24.9	1	03	9	6	V	KHAR		

22
Aug 95

ACTIVE PROMINENCES AND FILAMENTS

AUGUST 1995

Day	Event Type	Start (UT)	End (UT)	Lat	CMD	CMP Mo	Day	Imp	Extent	Blue Shift (.1 A)	Red Shift (.1 A)	Obs Type	Sta	NOAA/ USAF Reg#	Remarks
19	DSD	1441	2315	S16	W34	08	17.0		01	9	9	E	HOLL	7899	
19	ADF	1450E	1700	S01	W70	08	14.4	1	07	9	9	E	SVTO	7900	
19	DSD	1450E	1700	S20	W33	08	17.1		01	9	9	E	SVTO	7899	
19	AFS	1630E	1700	S20	W30	08	17.4		01	9	9	E	SVTO	7899	
19	ADF	1741E	2315	N06	W71	08	14.4	1	05	8	6	E	HOLL	7900	
19	AFS	1840E	1929	N09	E70	08	25.0		01	9	9	E	PALE		
19	AFS	2010E	2315	S16	W35	08	17.2		02	9	9	E	HOLL	7899	
19	DSD	2026	2315	S17	W36	08	17.1		03	9	9	E	HOLL	7899	
19	AFS	2104E	2215	S19	W33	08	17.3		01	9	9	E	RAMY	7899	
19	DSD	2106E	2215	S22	W35	08	17.2		01	9	9	E	RAMY	7899	
20	DSD	0030	0100	N45	W01	08	19.9		03	9	9	E	LEAR	7897	
20	DSD	0605E	0900D	S18	W38	08	17.3		01	9	9	E	SVTO	7899	
20	DSD	0605E	0900D	S19	W41	08	17.1		01	9	9	E	SVTO	7899	
20	BSL	0725	0725D	N57	E90	08	28.1	1-				C	CATA		
20	AFS	0800E	0945	N09	E66	08	25.3		01	9	9	E	LEAR		
20	AFS	1110E	1927	N13	E66	08	25.4		01	9	9	E	RAMY		
20	AFS	1120E	1927	S18	W44	08	17.1		01	9	9	E	RAMY	7899	
20	AFS	1440E	1455	N13	E64	08	25.4		02	9	9	E	SVTO		
20	DSD	1856E	0058	N05	W54	08	16.7		03	9	8	E	HOLL	7897	
20	DSD	2110E	0058	N09	E59	08	25.3		01	7	4	E	HOLL		
21	AFS	0030E	0946	N09	E59	08	25.4		03	9	9	E	LEAR		
21	ADF	0615E	0946	S12	W55	08	17.1		07	4	5	E	LEAR	7899	
21	ADF	0709E	1618	N12	E56	08	25.5	2	05	9	8	E	SVTO		
21	BSL	1141E	1145D	N69	E90	08	29.6	1-				C	CATA		
21	ADF	1332E	1535D	S16	W57	08	17.2	1	03	9	9	E	SVTO	7899	
21	ADF	1345E	2315	N07	E47	08	25.1	1	05	9	9	E	HOLL		
21	ADF	1349E	2136	S16	W56	08	17.3	1	07	9	9	E	RAMY	7899	
21	ADF	1406E	2136	N13	E53	08	25.6	1	05	9	9	E	RAMY		
21	ADF	1435E	2315	S20	W58	08	17.2	1	06	9	9	E	HOLL	7899	
21	ADF	1802E	0310	N11	E50	08	25.5	1	05	9	9	E	PALE		
21	ADF	1804E	0310	S16	W57	08	17.4	1	04	9	9	E	PALE	7899	
22	ADF	0700E	0949	N11	E42	08	25.4	1	04	5	9	E	LEAR		
22	ADF	0730E	1119	N15	E44	08	25.6	1	05	9	9	E	SVTO		
22	AFS	0900E	1119	N04	E11	08	23.2		02	9	9	E	SVTO	7901	
22	AFS	1126E	2158	N04	E10	08	23.2		01	9	9	E	RAMY	7901	
22	AFS	1400E	1952	N04	E09	08	23.2		01	9	8	E	HOLL	7901	
22	DSF	1409U	1753U	N17	W52	08	18.6		12	0	0	E	HOLL		
22	AFS	1827E	0425	N05	E06	08	23.2		02	9	9	E	PALE	7901	
22	AFS	2340E	0817	N04	E03	08	23.2		02	9	9	E	LEAR	7901	
23	AFS	0524E	1630	N03	W01	08	23.1		02	9	9	E	SVTO	7901	
23	DSD	0636E	0649D	N04	W01	08	23.2		03	9	9	E	SVTO	7901	
23	DSD	1025E	1055	N05	W08	08	22.8	1	01	9	9	V	KHAR		
23	AFS	1055E	1658	N05	W03	08	23.2		01	9	9	E	RAMY	7901	
23	DSD	1158E	1658	N06	W04	08	23.2		01	9	9	E	RAMY	7901	
23	AFS	1308E	0137	N04	W03	08	23.3		02	9	9	E	HOLL	7901	
23	APR	1324E	1658	N17	E90	08	30.4	1		7	7	E	RAMY		
23	APR	1325E	1658	S03	E90	08	30.3	1		9	8	E	RAMY		
23	DSD	1327E	1658	N03	W06	08	23.1		02	9	9	E	RAMY	7901	
23	DSD	1435E	1630	N03	W07	08	23.1		02	9	9	E	SVTO	7901	
23	APR	1508E	0137	S05	E90	08	30.4	1		9	7	E	HOLL		
23	APR	1520E	1924	S03	W90	08	16.9	1		7	6	E	HOLL		
23	AFS	1617E	1658	S09	W03	08	23.4		01	9	9	E	RAMY		
23	AFS	1627	0137	S09	W04	08	23.4		01	8	9	E	HOLL		
23	AFS	2340E	0432	N04	W08	08	23.4		01	9	9	E	PALE	7901	
24	AFS	0015E	0950	N03	W12	08	23.1		02	9	9	E	LEAR	7901	
24	AFS	0245E	0950D	S09	W10	08	23.4		02	9	9	E	LEAR		
24	AFS	0450E	1409D	S10	W08	08	23.6		02	9	9	E	SVTO	7902	
24	AFS	0450E	1452	N04	W13	08	23.2		03	9	9	E	SVTO	7901	
24	DSD	0524E	1206D	N03	W15	08	23.1		02	9	9	E	SVTO	7901	
24	AFS	0545E	1452	N05	W12	08	23.3		03	9	9	E	SVTO	7901	
24	ADF	0709E	1618	N12	E56	08	28.5	2	05	9	8	E	SVTO		
24	BSL	0745E	0750	S31	E90	08	31.4	1-				C	CATA		
24	DSD	0825E	0903	N04	W12	08	23.4		04	9	9	E	LEAR	7901	
24	DSD	0845E	0905	N03	W13	08	23.4	1		9	9	V	KHAR		
24	DSD	0905E	1401D	N05	W14	08	23.3		03	9	9	E	SVTO	7901	

ACTIVE PROMINENCES AND FILAMENTS

23
Aug 95

AUGUST 1995

Day	Event Type	Start (UT)	End (UT)	Lat	CMD	CMP Mo Day	Imp	Extent	Blue	Red	Obs Type	Sta	NOAA/	Remarks
									Shift (.1 A)	Shift (.1 A)			USAF Reg#	
24	BSL	0956	1005	S85	E90	09 1.8	1-				C	CATA		
24	DSD	1120E	1135	N00	W20	08 23.0	1		9	9	V	KHAR		
24	DSD	1140	1155	N03	W19	08 23.0	1				V	KHAR		
24	AFS	1312E	2340	N04	W18	08 23.2		02	9	7	E	HOLL	7901	
24	ADF	1332E	1535D	S16	W57	08 20.2	1	03	9	9	E	SVTO	7899	
24	DSD	1421	2340	N04	W22	08 22.9		02	9	9	E	HOLL	7901	
24	AFS	1616E	1626	N03	W21	08 23.1		02	9	9	E	RAMY	7901	
24	AFS	1618E	1626	S10	W17	08 23.4		02	9	9	E	RAMY	7902	
24	AFS	1626E	2340	S10	W18	08 23.3		01	5	8	E	HOLL	7902	
24	AFS	1800E	0147	N04	W22	08 23.1		02	9	9	E	PALE	7901	
24	DSD	1800E	2124D	S10	W18	08 23.4		01	9	9	E	PALE	7902	
24	DSD	2124E	0147	N04	W22	08 23.2		02	9	9	E	PALE	7901	
24	AFS	2124E	0147	S10	W18	08 23.5		02	9	9	E	PALE	7902	
24	DSD	2315E	0215D	N02	W23	08 23.2		04	9	9	E	LEAR	7901	
24	AFS	2315E	0951	N05	W25	08 23.1		03	9	9	E	LEAR	7901	
24	AFS	2315E	0951	S09	W22	08 23.3		02	9	9	E	LEAR	7902	
25	DSD	0645E	0740D	N04	W26	08 23.3		03	9	9	E	LEAR	7901	
25	DSD	0739E	1701	N04	W26	08 23.4		03	9	9	E	SVTO	7901	
25	DSD	0739E	1701	N05	W26	08 23.4		03	9	9	E	SVTO	7901	
25	AFS	0740E	1701	N05	W30	08 23.1		02	8	7	E	SVTO	7901	
25	DSD	0745E	0840D	N05	W26	08 23.4		03	9	9	E	LEAR	7901	
25	AFS	0745E	1701	S05	W31	08 23.0		02	5	5	E	SVTO	7902	
25	BSL	0841E	0907	N78	W90	08 17.0	1-				C	CATA		
25	DSD	0955E	1701	N04	W29	08 23.2		03	9	9	E	SVTO	7901	
25	DSD	0958U	1010	N05	W28	08 23.3	1	02	9		V	KHAR		
25	DSD	1010U	1028D	S02	W26	08 23.5	1	01	9		V	KHAR		
25	DSD	1020U	1028D	N05	W28	08 23.3	1	01		9	V	KHAR		
25	AFS	1210E	2040	N04	W31	08 23.2		02	9	9	E	RAMY	7901	
25	AFS	1212E	2040	S10	W28	08 23.4		01	9	9	E	RAMY	7902	
25	ASR	1418E	1454D	N02	E90	09 1.3			8	7	E	RAMY		
25	AFS	1454E	2040	N11	E57	08 29.9		01	9	9	E	RAMY	7904	
25	AFS	1504E	1701	S12	W57	08 21.3		01	9	9	E	SVTO		
25	ASR	1604E	1915D	N01	E90	09 1.4			9	9	E	RAMY	7903	
25	DSD	1610E	2040	N03	W39	08 22.7		02	9	9	E	RAMY	7901	
25	DSD	1612E	2040	N03	W30	08 23.4		02	8	8	E	RAMY	7901	
25	DSF	1637U	0511U	S01	W43	08 22.5		05	0	0	E	SVTO	7901	
25	DSD	1638E	2040	N10	E56	08 29.9		01	9	9	E	RAMY	7904	
25	AFS	1800E	0043	N04	W36	08 23.0		02	9	9	E	PALE	7901	
25	DSD	1800E	0043	N04	W41	08 22.7		04	9	9	E	PALE	7901	
25	DSD	1800E	0043	N05	W33	08 23.3		05	9	9	E	PALE	7901	
25	AFS	1805E	0043	N11	E55	08 29.9		02	9	9	E	PALE	7904	
25	AFS	1805E	0043	S10	W32	08 23.3		02	9	9	E	PALE	7902	
26	AFS	0130E	0951	S09	W37	08 23.3		02	9	9	E	LEAR	7902	
26	BSD	0535E	0630D	N04	E73	08 31.7		03	7	7	E	SVTO	7903	
26	AFS	0535E	1007	N05	W45	08 22.9		03	9	9	E	SVTO	7901	
26	AFS	0535E	1007	S09	W39	08 23.3		02	9	9	E	SVTO	7902	
26	AFS	0630E	1007	N04	E72	08 31.6		02	9	9	E	SVTO	7903	
26	ADF	0630E	1007	N05	E43	08 29.5	2	16	9	9	E	SVTO		
26	BSL	0731	0735D	N58	W90	08 18.4	1-				C	CATA		
26	BSL	1015	1034	S32	W90	08 19.3	1-				C	CATA		
26	DSD	1120E	2222	N05	W41	08 23.4		01	9	9	E	RAMY	7901	
26	AFS	1340E	0007	N06	W47	08 23.0		02	9	9	E	HOLL	7901	
26	AFS	1346E	0002	N05	W34	08 24.0		02	5	7	E	HOLL	7901	
26	ASR	1413E	1613D	N03	E90	09 2.3			0	0	E	HOLL	7903	
26	AFS	1421E	2222	N04	W47	08 23.1		01	8	9	E	RAMY	7901	
26	DSD	1435E	1532D	N06	W43	08 23.4		02	5	6	E	HOLL	7901	
26	DSD	1501	2230D	N06	W31	08 24.3		03	9	9	E	HOLL	7901	
26	AFS	1510E	0002	N09	E57	08 30.9		01	8	9	E	HOLL	7904	
26	AFS	1520E	0002	S09	W29	08 24.5		01	7	9	E	HOLL	7902	
26	AFS	1543E	0007	N00	E70	08 31.9		01	8	8	E	HOLL	7903	
26	ADF	1558E	2148D	N15	E42	08 29.8	1	03	9	9	E	RAMY	7904	
26	DSD	1609E	2222	N05	E66	08 31.6		02	8	9	E	RAMY	7903	
26	ASR	1612E	2222	N08	E90	09 2.4			8	9	E	RAMY		
26	ASR	1624E	1946D	N03	E90	09 2.4			7	8	E	RAMY		
26	ASR	1742E	1950	N05	E90	09 2.5			8	6	E	HOLL		
26	AFS	2000E	2222	N03	E69	09 1.0		01	9	9	E	RAMY	7903	
26	ASR	2050E	0007	N08	E90	09 2.6			9	9	E	HOLL		

24
Aug 95

ACTIVE PROMINENCES AND FILAMENTS

AUGUST 1995

Day	Event Type	Start (UT)	End (UT)	Lat	CMD	CMP Mo	Day	Imp	Extent	Blue Shift (.1 A)	Red Shift (.1 A)	Obs Type	Sta	NOAA/USAF Reg#	Remarks
27	AFS	0100E	0950	N05	W55	08	22.9		02	9	9	E	LEAR	7901	
27	BSL	0631E	0657	N09	E90	09	3.0	1-				C	CATA		
27	BSD	0645E	0830D	N04	E87	09	2.8		02	9	9	E	SVTO		
27	APR	0645E	0830D	N08	E90	09	3.0	1		9	9	E	SVTO		
27	ASR	0645E	0830D	N09	E90	09	3.0			6	7	E	SVTO		
27	DSD	0645E	1020D	N04	E63	09	1.0		03	9	9	E	SVTO	7903	
27	AFS	0645E	1658	N03	E64	09	1.1		02	9	9	E	SVTO	7903	
27	AFS	0645E	1658	N03	W59	08	22.9		02	9	9	E	SVTO	7901	
27	AFS	0645E	1658	S11	W52	08	23.4		02	7	8	E	SVTO	7902	
27	BSL	0700	0720	N11	E90	09	3.1	1-				C	CATA		
27	BSL	0710	0751	N09	E90	09	3.0	1-				C	CATA		
27	BSL	0726	0802	N10	E90	09	3.1	1-				C	CATA		
27	BSL	1020	1020D	N78	W90	08	19.1	1-				C	CATA		
27	DSD	1115E	2227	N06	E56	08	31.7		01	9	9	E	RAMY	7903	
27	DSD	1118E	1429D	S12	W57	08	23.2		01	9	8	E	RAMY	7902	
27	AFS	1122E	2227	N03	W59	08	23.1		01	9	9	E	RAMY	7901	
27	DSF	1141U	0630U	N09	W04	08	27.2	1				C	CATA		
27	AFS	1350E	1745	N01	E54	08	31.6		01	9	9	E	HOLL	7901	
27	DSD	1350E	1745D	N03	E53	08	31.5		02	8	6	E	HOLL	7901	
27	DSD	1350E	1745D	N05	W64	08	22.8		01	9	7	E	HOLL	7902	
27	DSD	1357E	2227	N04	E59	09	1.0		02	9	9	E	RAMY	7903	
27	AFS	1630E	2227	N03	E57	08	31.9		01	9	9	E	RAMY	7903	
27	DSD	1931E	0424	N04	E58	09	1.1		01	9	9	E	PALE	7903	
27	DSD	1950E	2353D	N04	W61	08	23.3		01	9	9	E	PALE	7901	
27	AFS	2210	0424	N04	E58	09	1.2		01	9	9	E	PALE	7903	
27	ADF	2220E	0424	N04	E58	09	1.3	1	02	9	9	E	PALE	7903	
27	AFS	2349E	0944	S02	E54	09	1.0		02	9	9	E	LEAR	7903	
28	DSD	0515E	1235D	N04	E48	08	31.8		03	9	9	E	SVTO	7903	
28	AFS	0515E	1619	N03	E50	08	31.9		02	9	9	E	SVTO	7903	
28	AFS	0515E	1619	N03	W70	08	23.0		02	9	9	E	SVTO	7901	
28	ADF	0745E	1619	S03	E22	08	30.0	1	05	6	6	E	SVTO		
28	BSL	0748E	0755	S76	E90	09	5.6	1-				C	CATA		
28	BSL	0750	0755	S12	E90	09	4.1	1-				C	CATA		
28	AFS	1135E	1630D	N03	W74	08	22.9		02	7	7	E	RAMY	7901	
28	DSD	1150E	1225	N10	E23	08	30.2		02	9	9	E	SVTO	7904	
28	DSD	1151E	1208D	N11	E23	08	30.2		02	9	9	E	RAMY	7904	
28	AFS	1202E	2212	N03	E47	09	1.0		01	9	9	E	RAMY	7903	
28	DSD	1202E	2212	N04	E41	08	31.6		01	9	9	E	RAMY	7903	
28	ADF	1230E	2212	N05	E48	09	1.1	1	05	9	9	E	RAMY	7903	
28	AFS	1425E	1900D	N00	E46	09	1.0		01	9	7	E	HOLL	7903	
28	ADF	1425E	1900D	N00	E47	09	1.1	1	04	9	9	E	HOLL	7903	
28	DSD	1425E	1900D	N02	E41	08	31.7		02	9	9	E	HOLL	7903	
28	DSD	1430E	1900D	N06	W76	08	22.9		02	9	9	E	HOLL	7901	
28	ADF	1435E	1900D	N04	E38	08	31.4	1	07	9	7	E	HOLL	7903	
28	ADF	1440E	1900D	S10	W71	08	23.3	1	04	9	9	E	HOLL	7902	
28	DSD	1440E	1641D	N02	E43	08	31.8		01	9	9	E	RAMY	7903	
28	AFS	1450E	0118	N06	E74	09	3.1		01	8	6	E	HOLL		
28	DSD	1533E	1619	N05	E40	08	31.6		02	9	9	E	SVTO	7903	
28	DSF	1550U	1625	S02	E41	08	31.7	2	05	9	9	E	HOLL	7903	
28	DSD	1636E	0424D	N04	E44	09	1.0		01	9	9	E	PALE	7903	
28	DSD	1646E	2212	N03	E41	08	31.8		01	9	9	E	RAMY	7903	
28	DSD	1940E	2015D	N09	W74	08	23.3		06	9	5	E	HOLL	7901	
28	BSD	2100E	0118	N04	W84	08	22.6		04	9	9	E	HOLL	7901	
28	ADF	2115E	0424D	N04	E44	09	1.2	1	01	9	9	E	PALE	7903	
28	DSD	2250E	0118	N00	E38	08	31.8		04	9	9	E	HOLL	7903	
29	BSL	0730	0735	N04	E90	09	5.0	1-				C	CATA		
29	ASR	0735E	0825D	N04	W88	08	22.7			9	9	E	LEAR	7901	
29	ASR	0845E	1710	N01	W90	08	22.6			9	9	E	SVTO	7901	
29	AFS	0845E	1710	N03	E35	09	1.0		02	9	9	E	SVTO	7903	
29	AFS	0845E	1710	N03	E62	09	3.0		01	9	9	E	SVTO		
29	DSD	0915E	0940	N10	E41	09	1.5	1		9		V	KHAR		
29	DSD	0938	0947D	N04	E31	08	31.8	1	01		9	V	KHAR		
29	BSL	1030E	1036	N01	W90	08	22.7	1-				C	CATA		
29	BSL	1030E	1036	N78	E90	09	6.8	1-				C	CATA		
29	ASR	1203E	1616D	N03	W90	08	22.8			9	9	E	RAMY	7901	
29	DSD	1217	1245D	N11	E38	09	1.4	1		9	4	V	KHAR		
29	DSD	1240E	2219	N02	E31	08	31.8		02	9	9	E	RAMY	7903	

ACTIVE PROMINENCES AND FILAMENTS

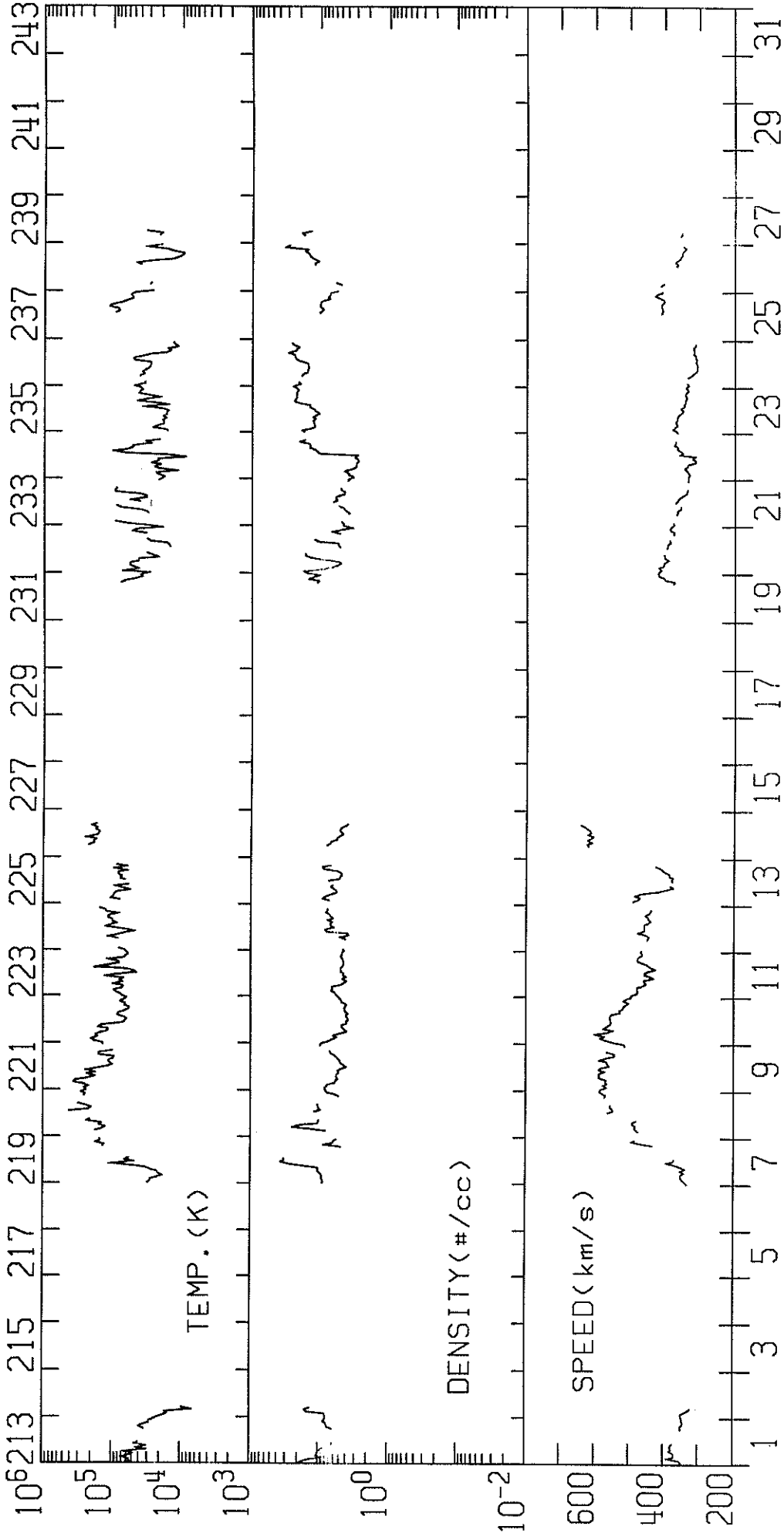
25
Aug 95

AUGUST 1995

Day	Event Type	Start (UT)	End (UT)	Lat	CMD	CMP Mo Day	Imp	Extent	Blue Shift (.1 A)	Red Shift (.1 A)	Obs Type	Sta	NOAA/USAF Reg#	Remarks
29	ADF	1300E	1845D	N04	W04	08 29.2	1	05	8	8	E	RAMY		
29	AFS	1443E	2012D	N09	E57	09 2.9		01	8	9	E	RAMY		
29	ASR	1445E	1710	N05	W90	08 22.9			9	9	E	SVTO	7901	
29	DSD	1737E	0325	N03	E27	08 31.7		04	9	9	E	PALE	7903	
29	AFS	1740E	2350	N10	E57	09 3.0		02	9	9	E	PALE		
29	ADF	1845E	1940D	N02	E29	08 31.9	1	02	9	9	E	RAMY	7903	
30	BSL	0647	0652D	S78	E90	09 7.6	1-				C	CATA		
30	BSL	0743E	0751D	N38	W90	08 23.0	1-				C	CATA		
30	BSL	0816E	0816D	N14	E90	09 6.1	1-				C	CATA		
30	AFS	0830E	1220D	N01	E18	08 31.7		01	9	9	E	SVTO	7903	
30	DSD	0842E	1200D	N47	E09	08 31.1		02	9	9	E	SVTO		
30	BSD	0900E	0935D	N15	E57	09 3.7	1		9		V	KHAR		
30	DSD	0927U	0935D	N03	E15	08 31.5	1			9	V	KHAR		
30	DSD	1005E	1017	N03	E15	08 31.6	1			9	V	KHAR		
30	DSD	1043E	2222	N02	E15	08 31.6		03	9	9	E	RAMY	7903	
30	DSD	1048U	1100	N04	E14	08 31.5	1		9	9	V	KHAR		
30	DSD	1215E	1302	N02	E18	08 31.8		02	9	9	E	SVTO	7903	
30	ASR	1354E	0124	N04	W90	08 23.8			9	9	E	HOLL	7901	
30	AFS	1450E	2222	N01	E15	08 31.7		02	9	9	E	RAMY	7903	
30	DSD	1542E	1646	N01	E14	08 31.7		05	0	0	E	HOLL	7903	
30	DSD	1542E	1646	N01	E15	08 31.8		02	0	0	E	HOLL	7903	
30	DSD	1600E	0124	S01	E30	09 1.9		03	9	9	E	HOLL	7903	
30	ADF	1620E	2222	N05	E17	08 31.9	1	06	9	9	E	RAMY	7903	
30	DSD	1757E	0415	N02	E16	08 31.9		02	9	9	E	PALE	7903	
30	AFS	1758E	0415	N02	E15	08 31.9		03	9	9	E	PALE	7903	
30	ADF	1759E	0415	N03	E19	09 1.2	1	04	9	9	E	PALE	7903	
30	DSD	2004E	2222	N02	E14	08 31.9		01	9	9	E	RAMY	7903	
30	DSD	2345E	0415D	N10	E41	09 3.1		04	9	9	E	PALE		
31	BSL	0636E	0644	S85	E90	09 8.7	1-				C	CATA		
31	DSD	0640E	0711D	N01	E09	09 1.0		02	9	9	E	LEAR	7903	
31	ADF	0715E	0955	N04	E11	09 1.1	1	04	9	9	E	LEAR	7903	
31	DSF	0926U	2355U	S07	E14	09 1.4	1	06	0	0	E	LEAR	7903	
31	BSL	0938E	0940D	N89	W90	08 23.0	1-				C	CATA		
31	BSL	1035	1040D	S76	E90	09 8.7	1-				C	CATA		
31	BSL	1051E	1110	N89	W90	08 23.0	1-				C	CATA		
31	DSF	1142U	0637U	S09	E03	08 31.7	1				C	CATA		
31	DSD	1218	1226	N04	E06	08 32.0	1	01		9	V	KHAR		
31	ADF	1230U	1245D	S17	W42	08 28.3	1	03	9	9	V	KHAR		
31	ADF	1336E	2107D	S02	E07	09 1.1	1	07	9	9	E	RAMY	7903	
31	AFS	1454E	1634	N02	E02	08 31.8		01	9	9	E	SVTO	7903	
31	DSD	1520E	1634	N01	E00	08 31.6		02	9	9	E	SVTO	7903	
31	ADF	1910E	0121	S02	W27	08 29.8	1	07	9	9	E	HOLL		
31	DSD	1930E	0121	N03	E01	08 31.9		01	9	9	E	HOLL	7903	
31	DSF	2209U	1132U	N21	W18	08 30.5	2	10	0	0	E	RAMY		

IMP 8 SOLAR WIND PLASMA
AUGUST 1995

MIT/CSR IMP 8 PLASMA PARAMETERS



AUG 1995

IMP 8
ONE-HOUR AVERAGES

MIT

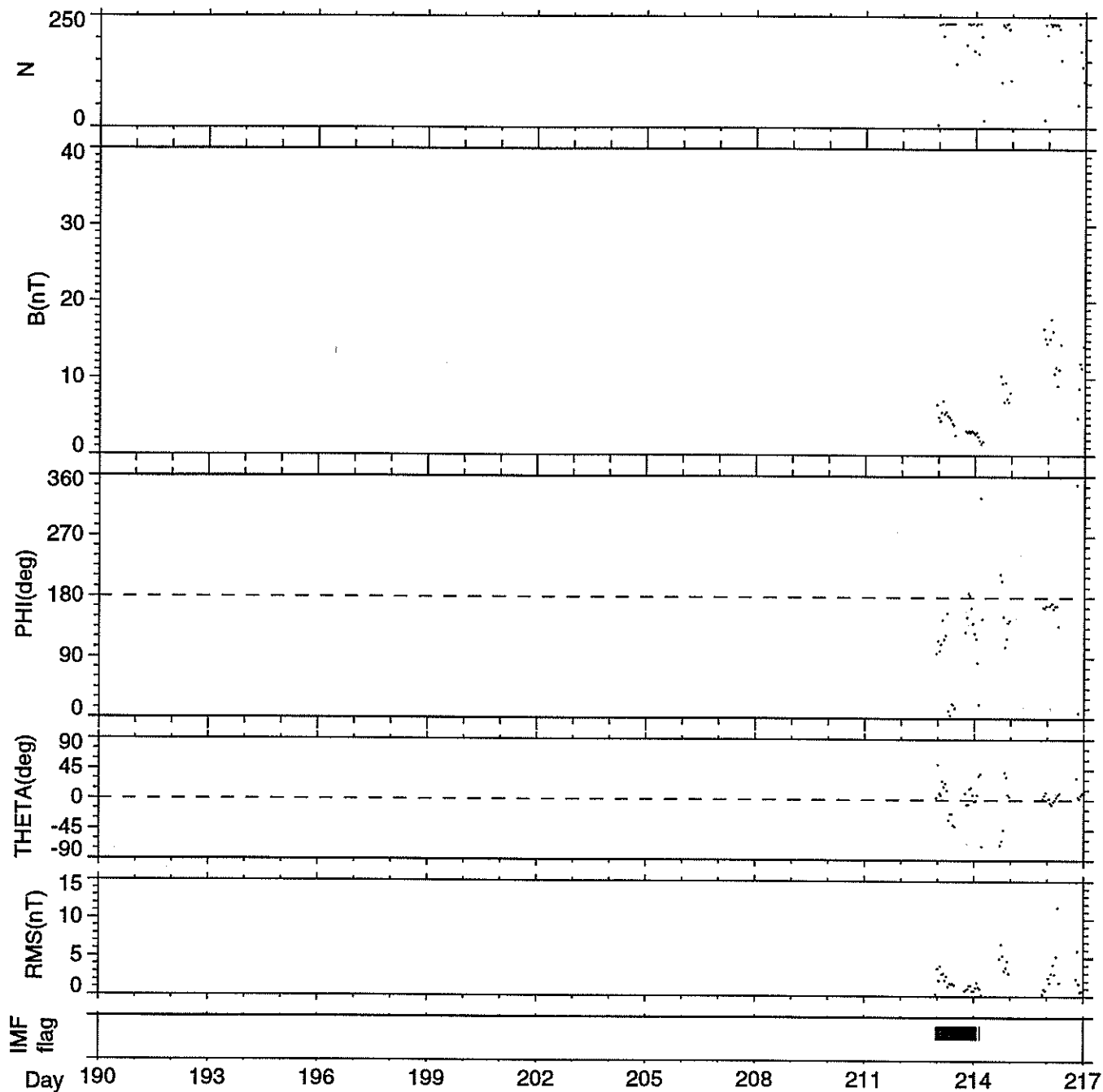
IMP 8

IMP-8 Magnetic Field Data in GSE Coordinates

1 Hour Averages

(c) DOY 212 - 217

July 31 1995 - August 5 1995



Generation Date : Mon Feb 5 07:45:13 1996

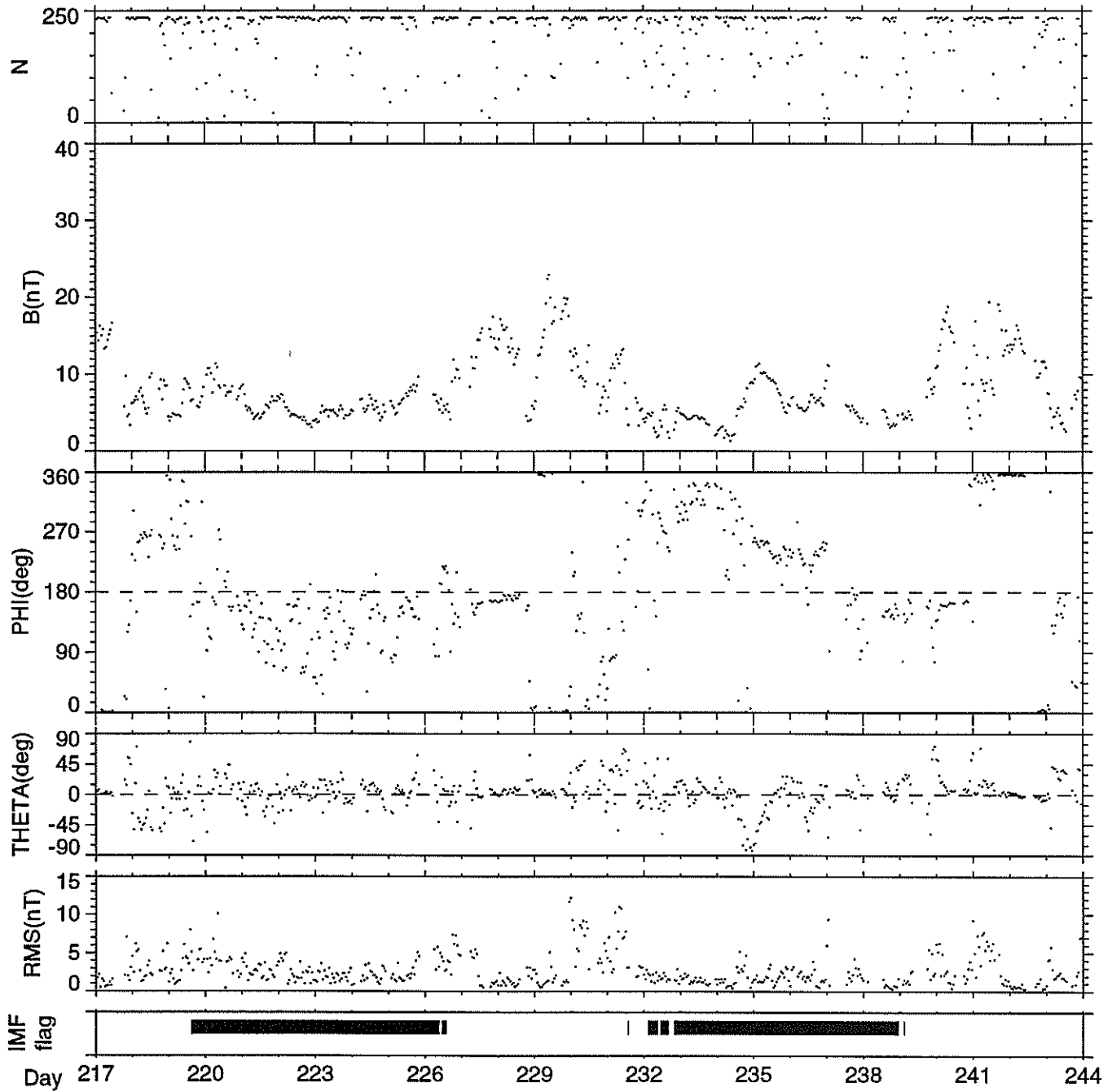
NOTE: The IMF "flag" (black boxes at the bottom of the plots) indicates where the interplanetary magnetic field regions are according to a dynamic model of the location of the bow shock. At all other times IMP-8 is in the magnetosphere.

IMP-8 Magnetic Field Data in GSE Coordinates

1 Hour Averages

(c) DOY 217 - 243

August 5 1995 - August 31 1995



Generation Date : Mon Feb 5 07:46:00 1996

NOTE: The IMF "flag" (black boxes at the bottom of the plots) indicates where the interplanetary magnetic field regions are according to a dynamic model of the location of the bow shock. At all other times IMP-8 is in the magnetosphere.

CONTENTS

Comprehensive Reports

Number 618 Part II

MISCELLANEOUS DATA

Page

INTERPLANETARY ENERGETIC PARTICLES from SAMPEX

Descriptive Text	30-31
Electrons, Protons, Helium and Heavy Ions January-December 1994	32-55

Notes on Interplanetary Fluxes of Energetic Particles from SAMPEX.

This issue contains new interplanetary measurements of the flux of energetic electrons, protons, helium nuclei, and heavy ions with $Z > 6$ for the period January to December, 1994. These plots are derived from measurements made on NASA's Solar, Anomalous, and Magnetospheric Particle Explorer (SAMPEX), the first of these series of plots appeared in March 1994, along with the original version of these notes.

Two main revisions have occurred since then. One revision is to the 0.5 - 6.6 MeV/nuc He flux, where it has since been recognized that a time-dependent correction is necessary to account for variations in the instrumental efficiency for detecting He. This change was implemented in the republication of data from January to June 1993 and the new publication of data from July to December 1993.

In the current publication, the medium energy proton rate undergoes a change between April and May 1994. Up through April, the data are derived as before from the MAST M12 counting rate, covering an energy range of ~5-10 MeV. The rate for May and later is derived from the MAST Z1sec counting rate, covering a range from ~7-13 MeV. Caution should be used in comparing the absolute fluxes of the medium energy proton rate from before and after the change. The (older) M12-derived rate is systematically higher than the Z1sec-derived rate, both because the older rate included He and heavy ion counts and because of the different energy range. In addition, however, the geometry factor and efficiency factor used for the M12 rate may have been slightly underestimated; the Z1sec rate is expected to be more reliable. We have no plans to revise the previously published data, however.

For the convenience of the user, we repeat the following description of these plots, essentially as published in March, 1994.

SAMPEX, the first of NASA's Small Explorer series, was launched in July, 1992 into an 82° inclination orbit with an altitude of 520 x 670 km. SAMPEX carries four instruments designed to measure heavy ion composition from ~0.4 to 300 MeV/nuc, proton intensity from ~2 to 85 MeV, and electron intensity from ~0.5 to 30 MeV. The Heavy Ion Large-area Telescope (HILT), built by the Max Planck Institut (Garching) and the Aerospace Corp., is a gas proportional counter, silicon solid-state detector, and scintillating crystal detector system that measures particle energy loss (ΔE) and total energy. The Low-energy Ion Composition Analyzer (LICA), built by the University of Maryland, uses microchannel plates and silicon detectors to measure time-of-flight and total energy. The Mass Spectrometer Telescope (MAST) and the Proton Electron Telescope (PET), built by Caltech and Goddard Space Flight Center, are all-silicon detector stacks which measure ΔE - total energy. The instruments and spacecraft are more fully described in IEEE Transactions on Remote Sensing, volume 31, issue 3, 1993.

SAMPEX has access to interplanetary fluxes of solar energetic particles and galactic cosmic rays over the polar portions of its orbit. The intensities displayed here are obtained by averaging selected counting rates (time resolution of 6 seconds) over two polar cap passes, one north and one south, of one orbit, giving a ~90 minute average with a typical duty cycle of ~20%. For the proton, helium, and heavy ion fluxes, the polar cap was defined by averaging data above 70° invariant latitude. For the electron intensity and the 3.2 - 11 MeV proton intensity, the polar cap was defined by averaging above 78° invariant latitude in order to avoid contributions from particles in the radiation belts. Note that because some orbits do not reach 78° latitude, there are periodic gaps in the electron and 3.2 - 11 MeV proton data.

To derive these particle fluxes, the instrument count rates were divided by the appropriate energy interval (in MeV or MeV/nuc) and the effective geometry factor (in $\text{cm}^2 \text{sr}$). Each point represents one or more complete orbits. When fluxes are low enough so that fewer than 25 counts are accumulated in a given rate, a point may represent more than one orbit. A horizontal bar indicates the appropriate time interval. The first onset of high intensities is always plotted as an independent point. When an instrument is off or data are not available from an orbit, no point is plotted. Vertical error bars represent statistical uncertainties only.

The user of these data should be warned that while an effort has been made to ensure that the absolute flux levels displayed here are correct, there may be instrumental background that affects the lowest measured flux levels, and instrumental dead-time effects at the very highest flux levels reported here (see also discussion below). As a result, these data are appropriate for identifying

the occurrence and magnitude of solar and interplanetary particle events, but caution should be exercised in any quantitative application of the plotted fluxes.

There are several instrumental and spacecraft operations issues that affect the availability of data. Operation of MAST and PET often includes periodic turnoffs for periods of 12 or 24 hours. The HILT sensor is sometimes turned off for a month or more to conserve proportional counter gas. Because of its large geometry factor, HILT cannot operate at the peaks of the largest solar particle events observed.

- The **2 - 6 MeV electron flux** is derived from the PET ELO rate, based on coincidences between the front two 2-mm-thick silicon detectors with pulse-height limits designed to select electrons exclusively. There is possible background from radiation belt electrons when on some orbits the $> 78^\circ$ invariant latitude selection does not exclude them.

- The **3.2 - 11 MeV proton flux** is derived from the HILT PCFE rate, based on measurements in a gas proportional counter which responds to all ions, and to electrons with a much smaller efficiency. Galactic cosmic ray ions cause a residual background rate of the order of $5 \times 10^{-3} \text{ (cm}^2 \text{ sr sec MeV)}^{-1}$. At flux levels greater than about $10^3 \text{ (cm}^2 \text{ sr sec MeV)}^{-1}$, the flux level is dominated by protons rather than heavy ions. There is possible background from radiation belt electrons when on some orbits the $> 78^\circ$ invariant latitude selection does not exclude them.

- The **5 - 10 MeV proton flux** is derived from the MAST M12 rate, based on coincidences between the front two 115 μm silicon detectors. This rate responds to helium and heavy nuclei as well as to protons, which results in a residual background level of \sim a few $\times 10^{-3} \text{ (cm}^2 \text{ sr sec MeV)}^{-1}$. At flux levels greater than about $5 \times 10^{-3} \text{ (cm}^2 \text{ sr sec MeV)}^{-1}$, the flux level is dominated by protons. From May, 1994 onward, these data are replaced by the **7 - 13 MeV proton flux** based on the MAST Z1sec rate, based on coincidences between the 2nd and 3rd 115 μm silicon detectors with a pulse-height and range limit. This rate responds almost exclusively to protons

- The **19 - 28 MeV proton flux** is derived from the PET PLO rate, based on coincidences between the front two 2-mm silicon detectors with pulse height restrictions designed to select protons exclusively.

- The **0.5 - 6.6 MeV/nuc helium flux** is derived from the LICA LOPRI rate. This rate responds to lower-energy heavy ions ($Z \geq 3$) as well as to helium. In some types of solar energetic particle events, these heavy ions may compose up to 50% of the "helium" flux. There is some saturation at peak intensities in the large solar energetic particle event in October-November 1992. The plotted intensity has not been corrected for this effect.

- The **8 - 15 MeV/nuc helium flux** is derived from the MAST Z2 rate, which responds only to helium nuclei.

- The **0.5 - 8.2 MeV/nuc heavy ion flux** is derived from the LICA HIPRI rate, which responds only to nuclei with $Z \geq 3$ and is typically dominated by C, N, and O. The quoted energy range is for oxygen nuclei.

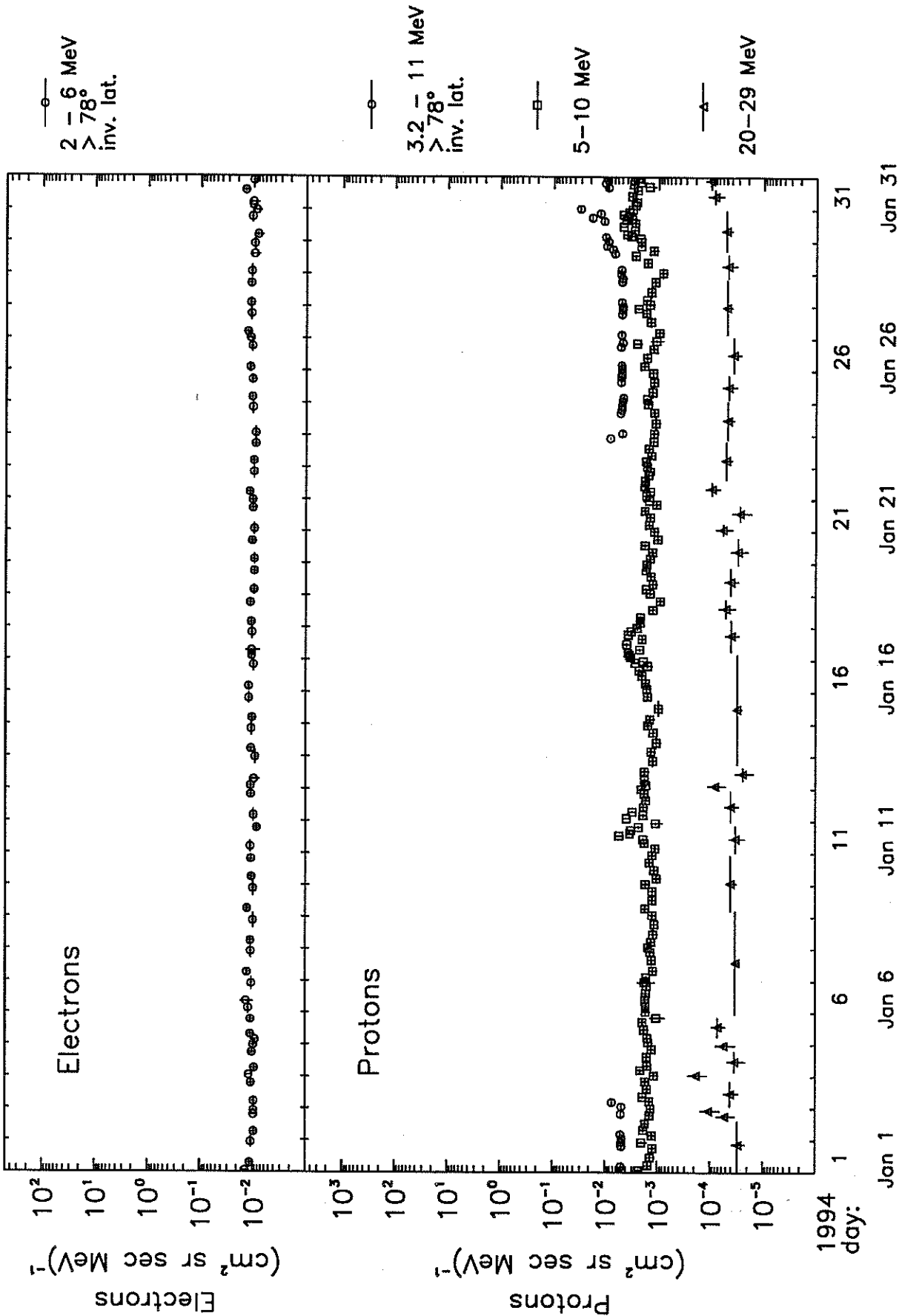
- The **8.2 - 42 MeV/nuc heavy ion flux** is derived from the HILT HiZ1 rate, which responds primarily to nuclei with $Z \geq 6$ and is typically dominated by C, N, and O. High proton intensities, such as those encountered in the South Atlantic Anomaly or in large solar particle events can cause background. This rate is not plotted during periods of such high intensity. The quoted energy range is for oxygen nuclei.

- The **18 - 50 MeV/nuc heavy ion flux** is derived from the combination of the MAST HIZR1, HIZR2, and HIZR3 rates, which respond only to nuclei with $Z \geq 3$ and are typically dominated by C, N, and O. The quoted energy range is for oxygen nuclei.

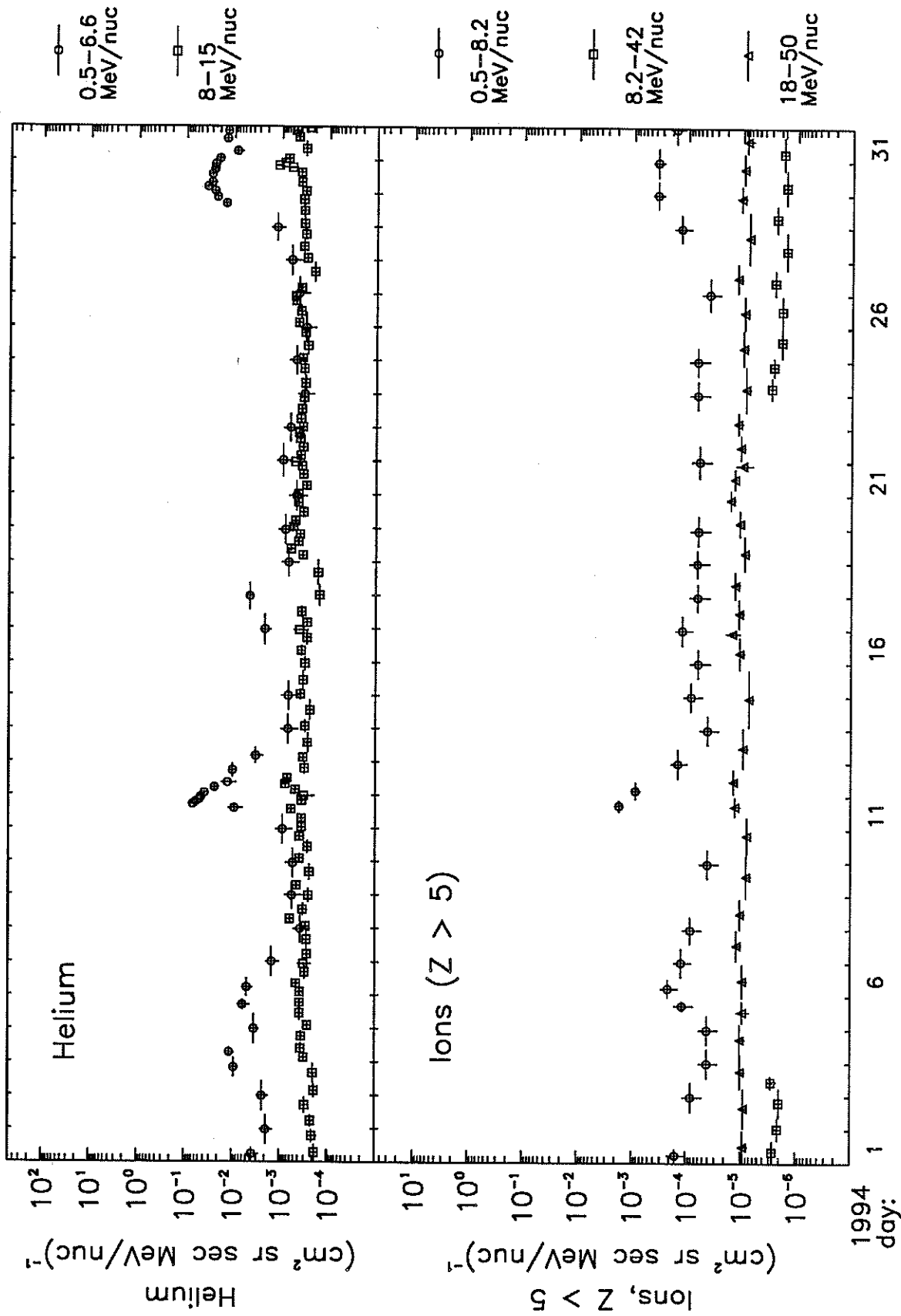
Further information is at: <http://lepsam.gsfc.nasa.gov/www/sampex.html>. Specific questions on:

MAST, PET or these plots:	LICA or SAMPEX:	HILT:
Jay Cummings or Richard Mewaldt	Glenn Mason	Berndt Klecker
Space Radiation Laboratory	Department of Physics	Max Planck Institut
220-47 Caltech	University of Maryland	D-85740 Garching
Pasadena, CA 91125	College Park, MD 20742	Germany
jrc@citsrl.caltech.edu	mason@sampx2.umd.edu	klecker@sampx2.umd.edu

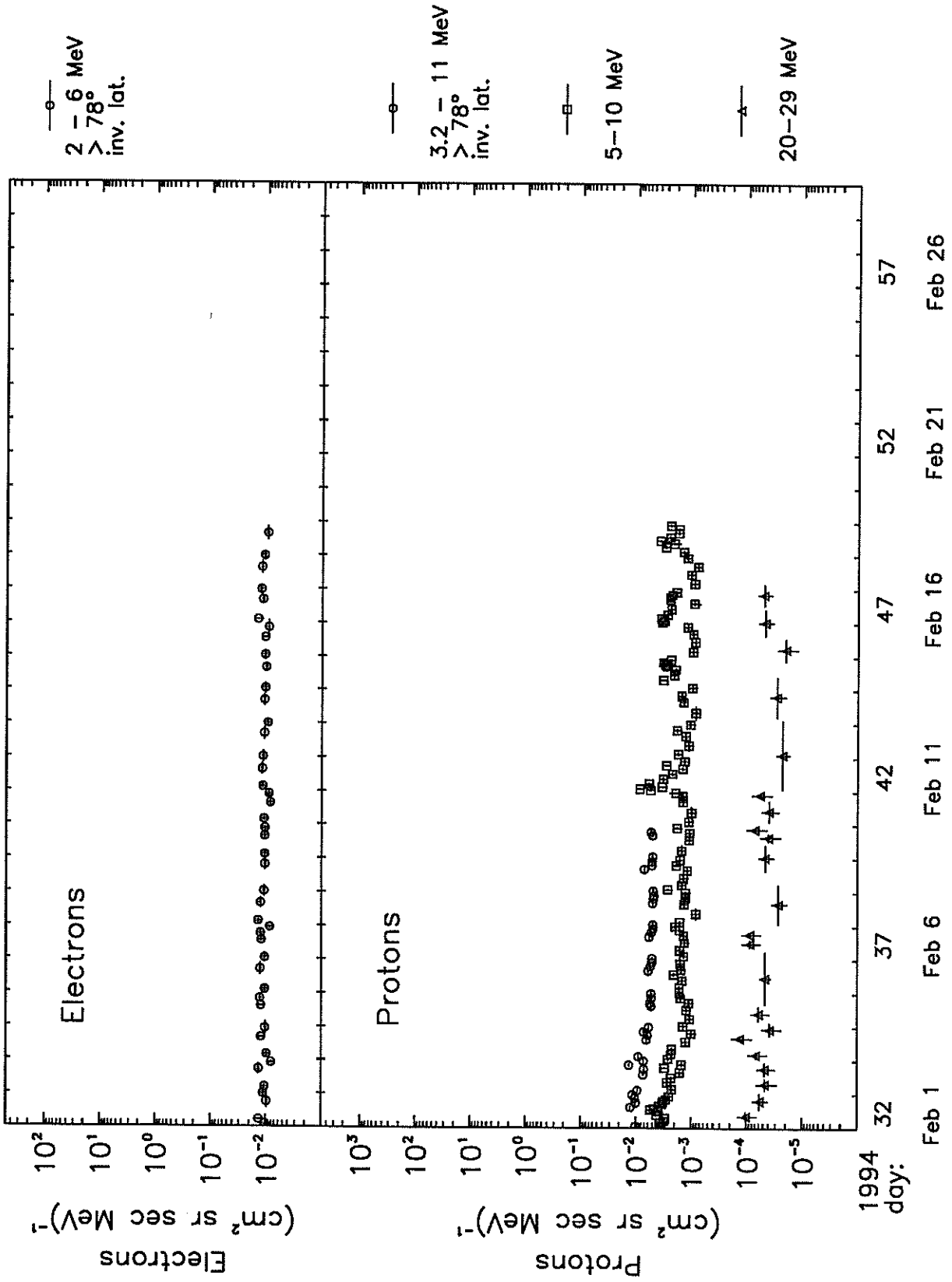
Selected Particle Fluxes from SAMPEX
Polar averages ($> 70^\circ$ invariant latitude except where noted)



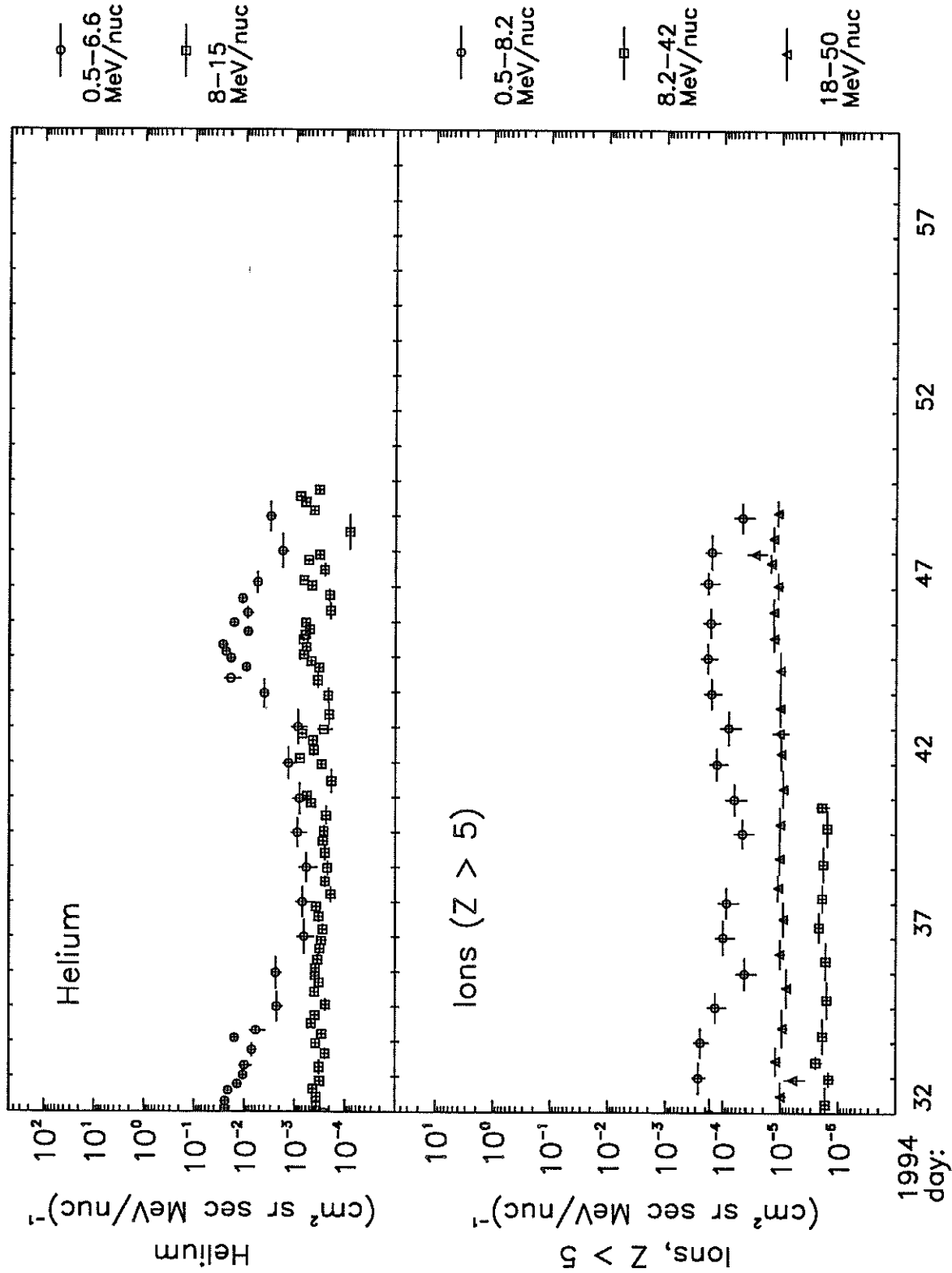
Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)



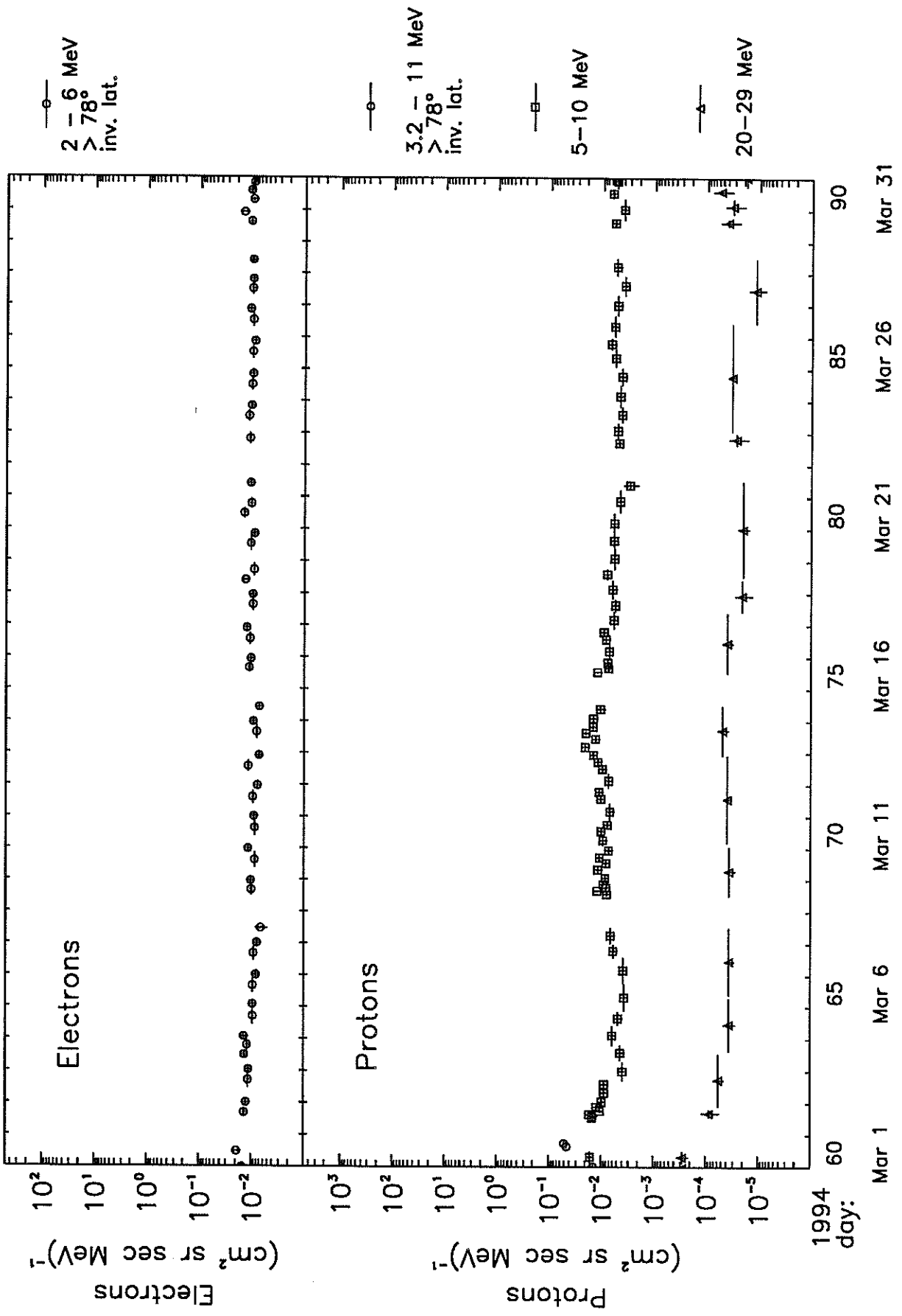
Selected Particle Fluxes from SAMPEX
Polar averages ($> 70^\circ$ invariant latitude except where noted)



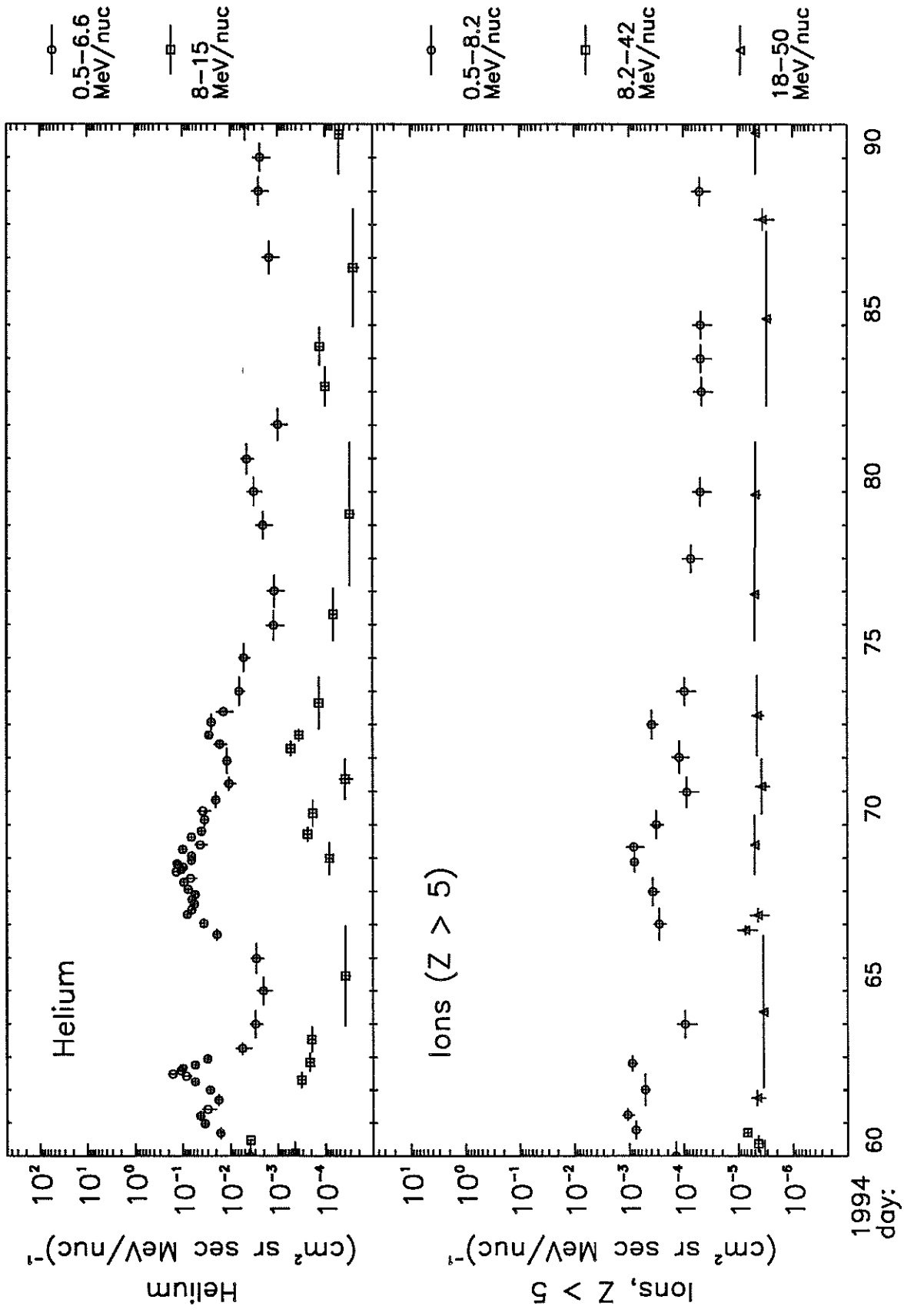
Selected Particle Fluxes from SAMPEX
Polar averages ($> 70^\circ$ invariant latitude except where noted)



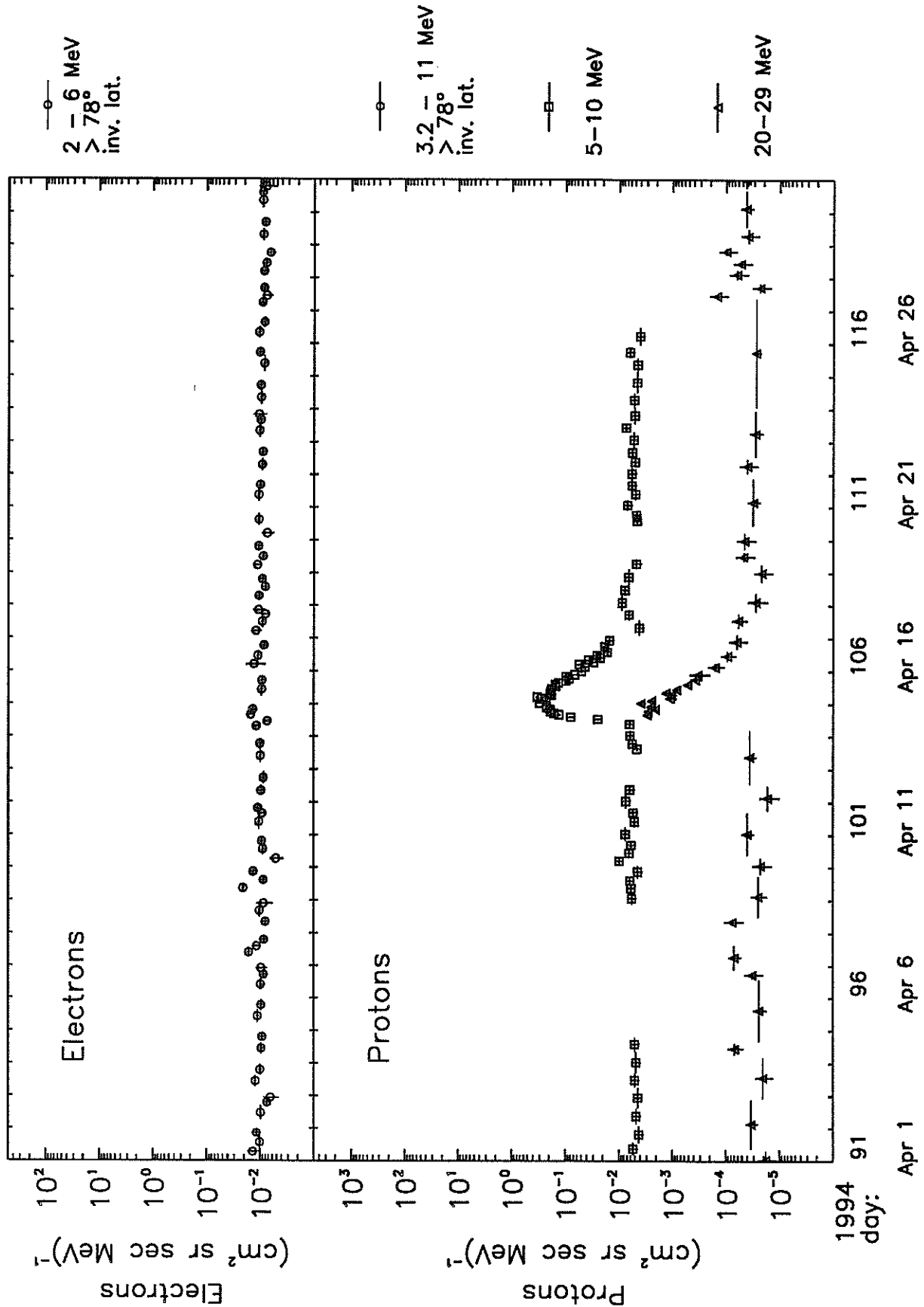
Selected Particle Fluxes from SAMPEX
Polar averages (> 70° invariant latitude except where noted)



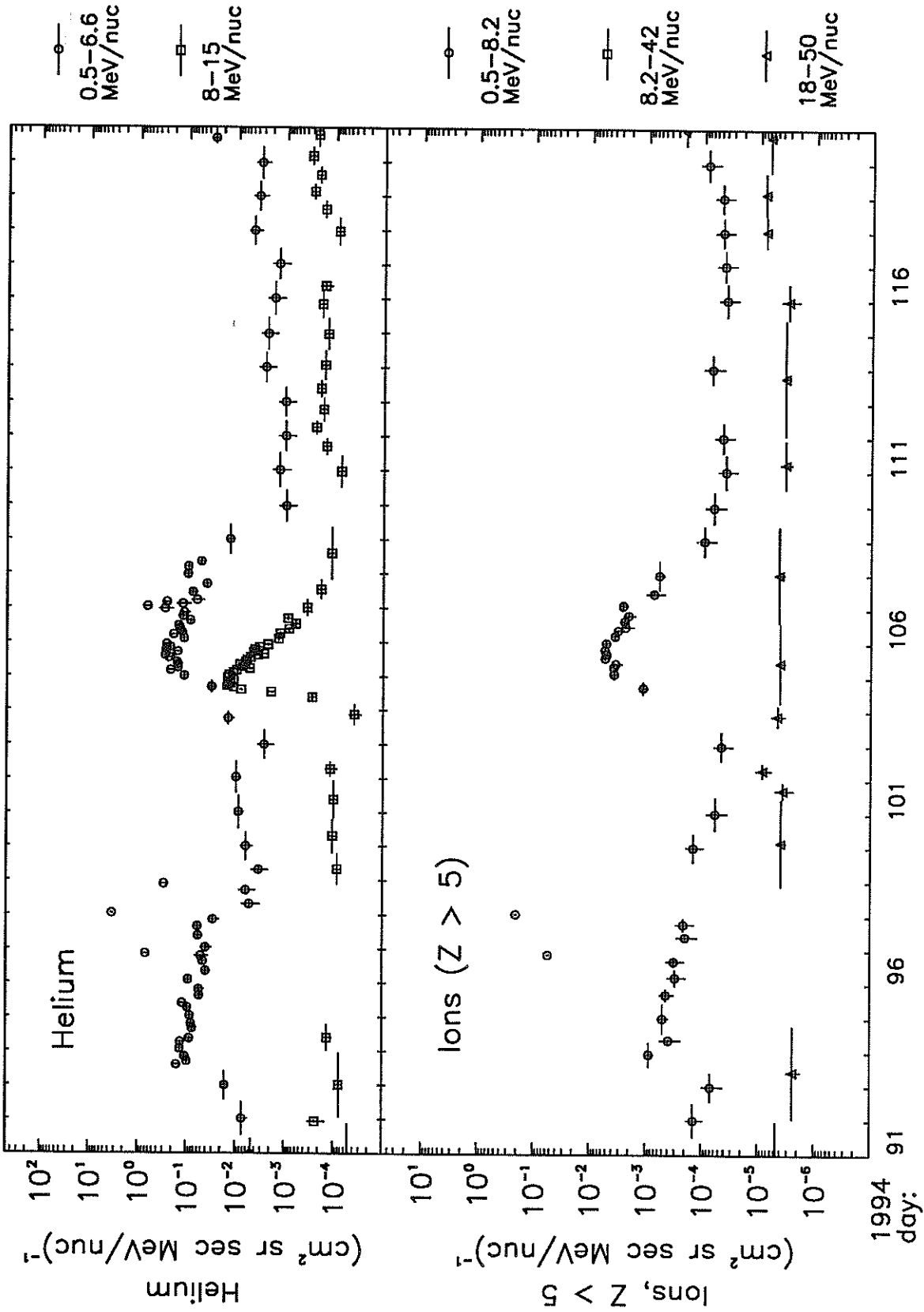
Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)



Selected Particle Fluxes from SAMPEX
Polar averages (> 70° invariant latitude except where noted)

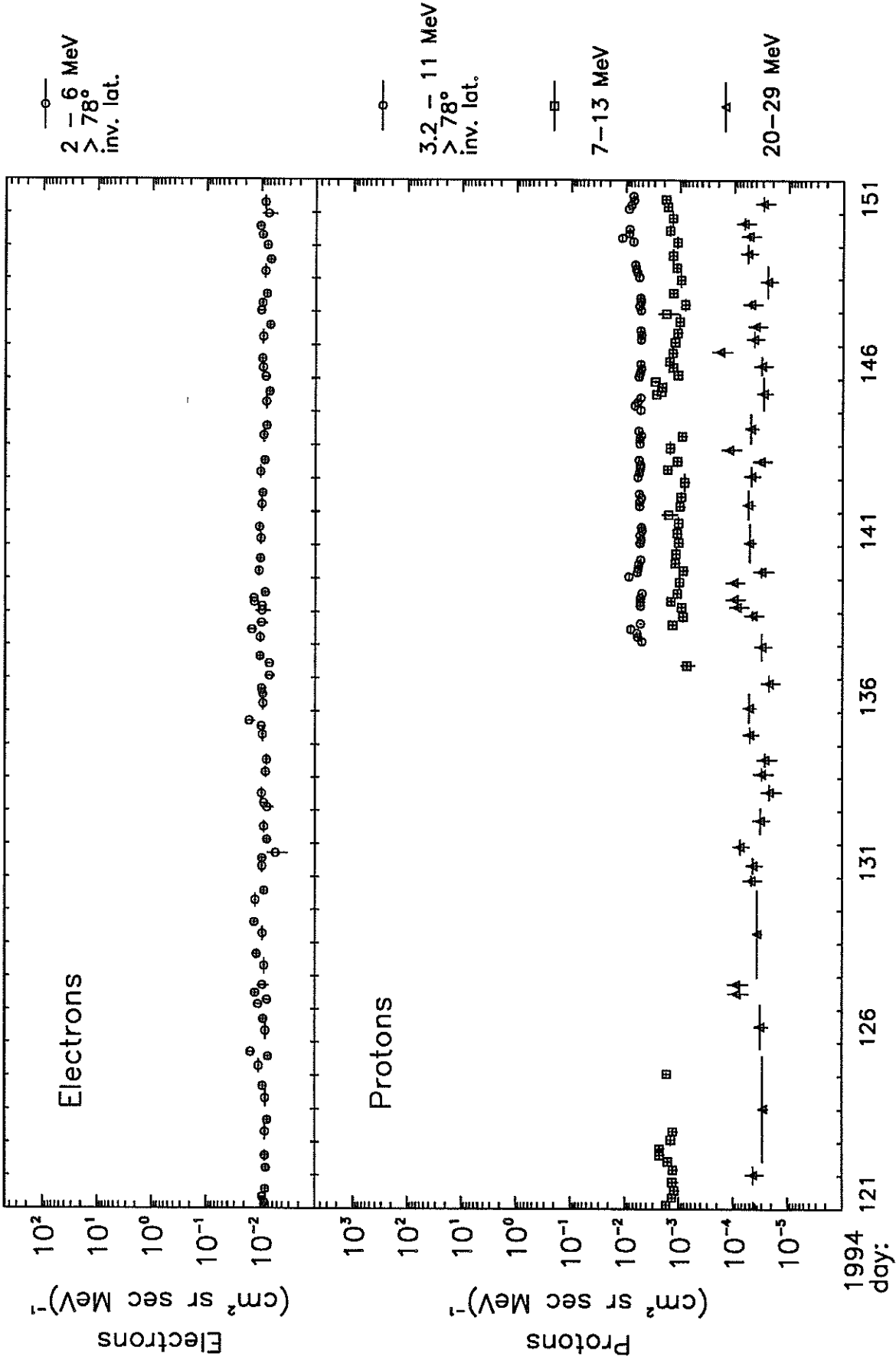


Selected Particle Fluxes from SAMPEX
Polar averages ($> 70^\circ$ invariant latitude except where noted)

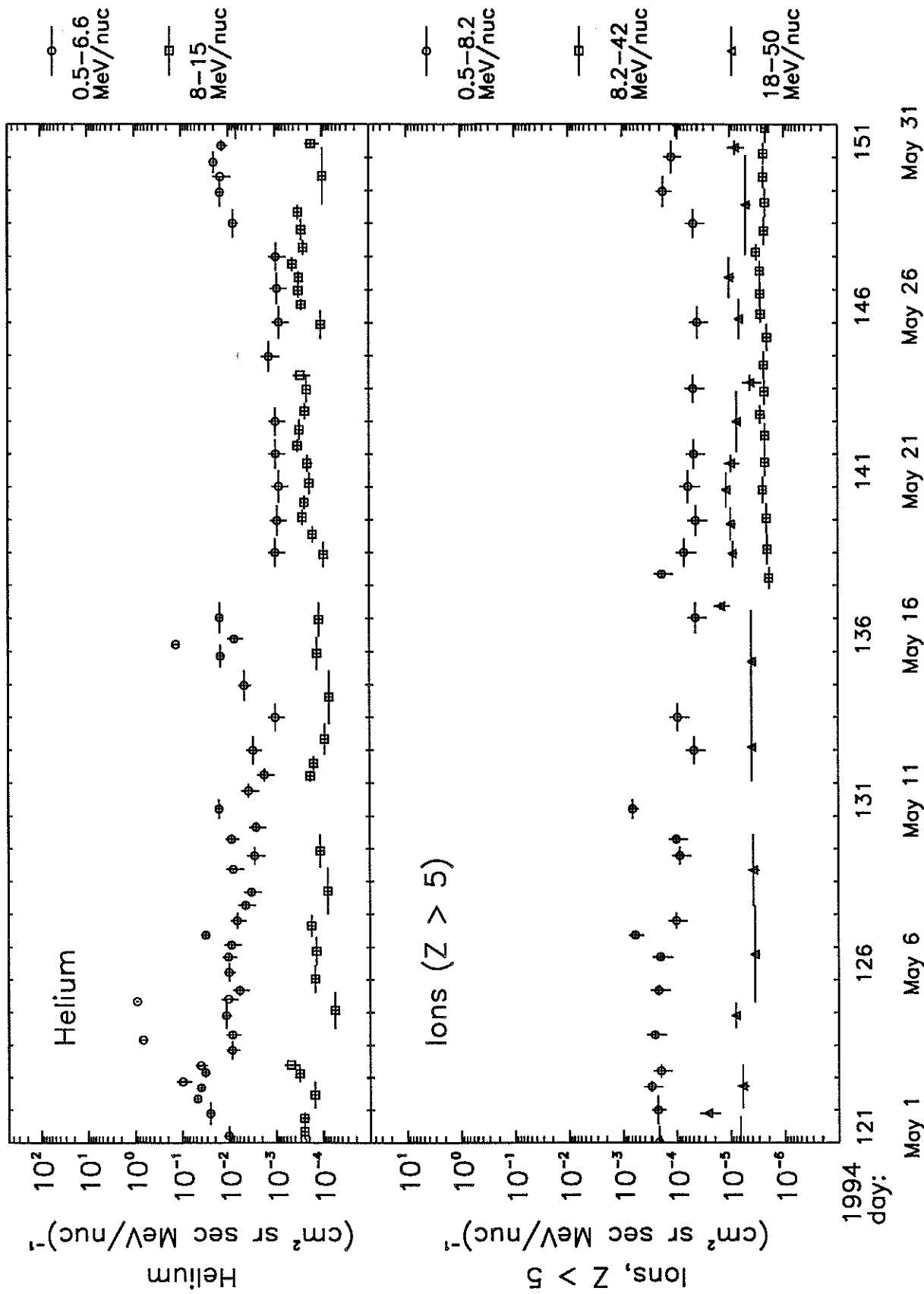


1994 day: 91 Apr 1 96 Apr 6 101 Apr 11 106 Apr 16 111 Apr 21 116 Apr 26

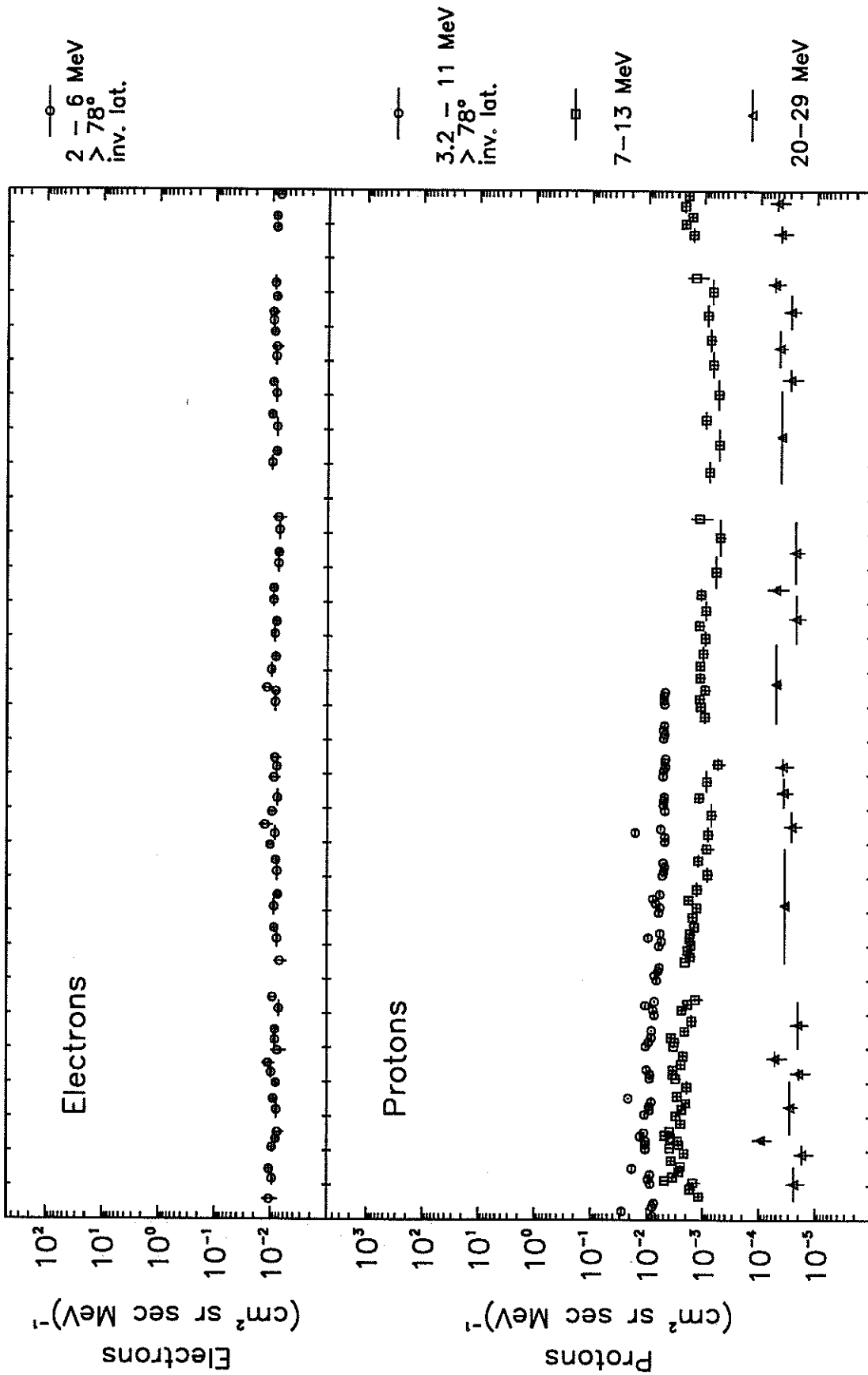
Selected Particle Fluxes from SAMPEX
Polar averages (> 70° invariant latitude except where noted)



Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)

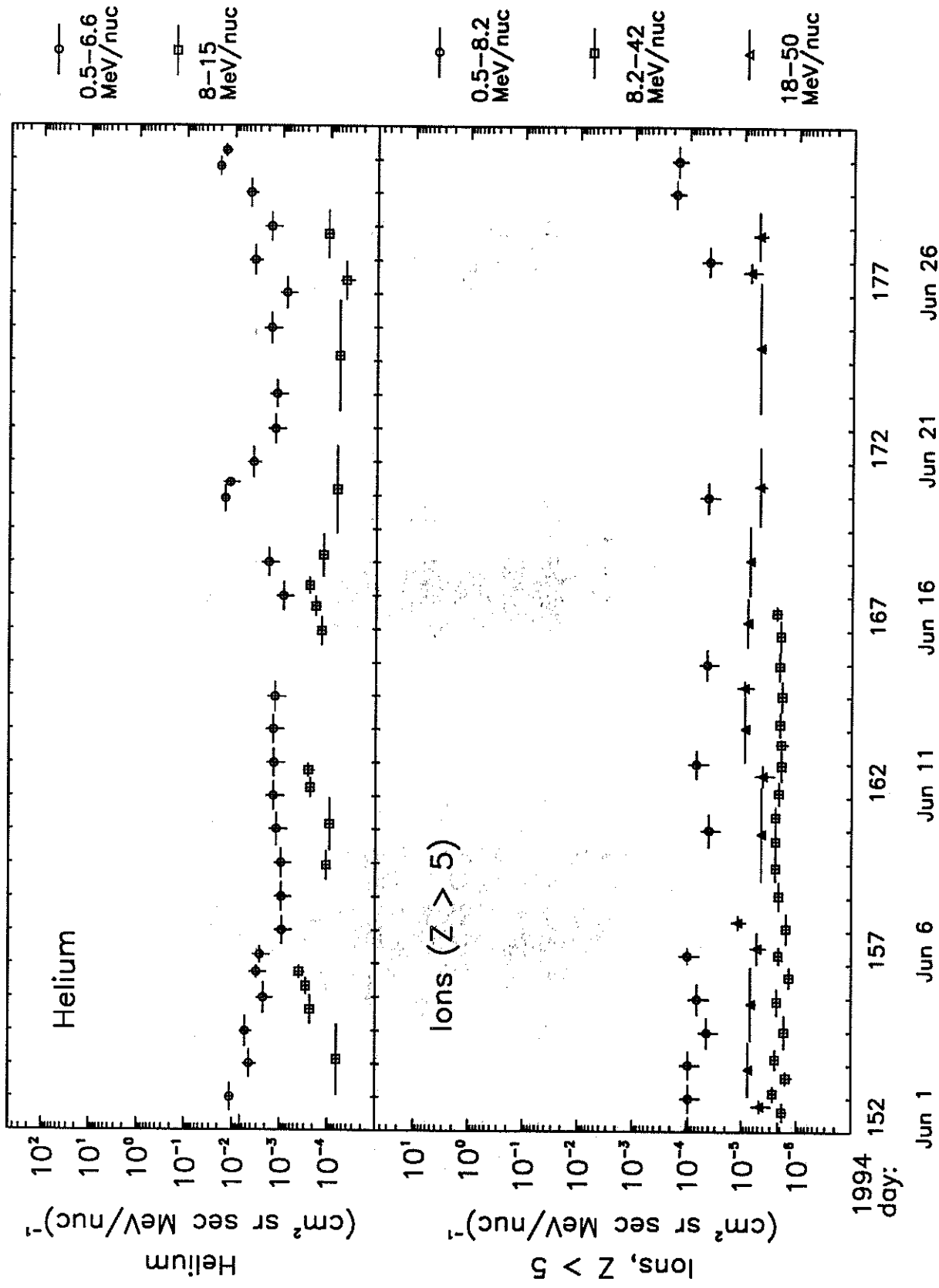


Selected Particle Fluxes from SAMPEX
Polar averages (> 70° invariant latitude except where noted)

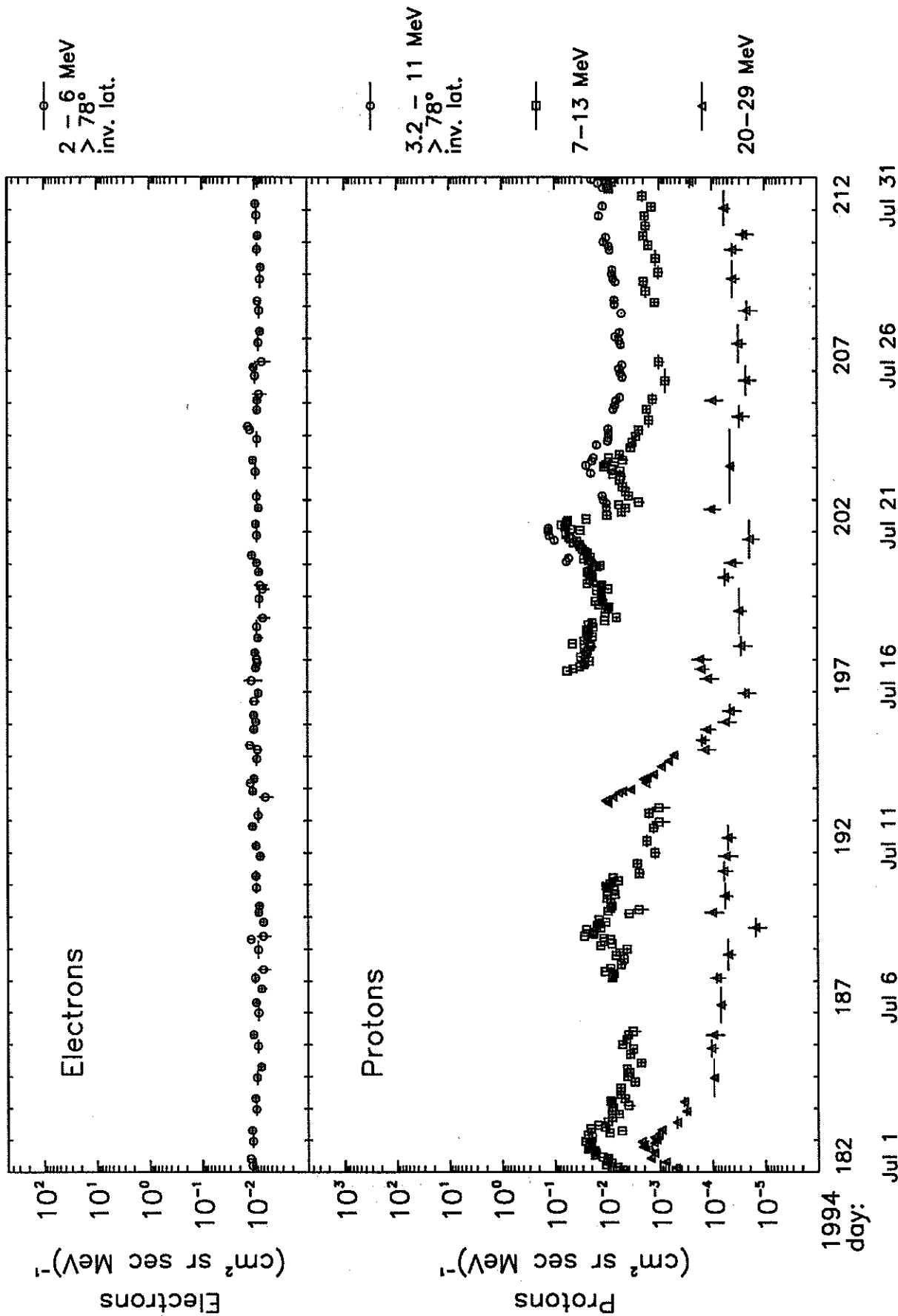


1994 day: 152 Jun 1 157 Jun 6 162 Jun 11 167 Jun 16 172 Jun 21 177 Jun 26

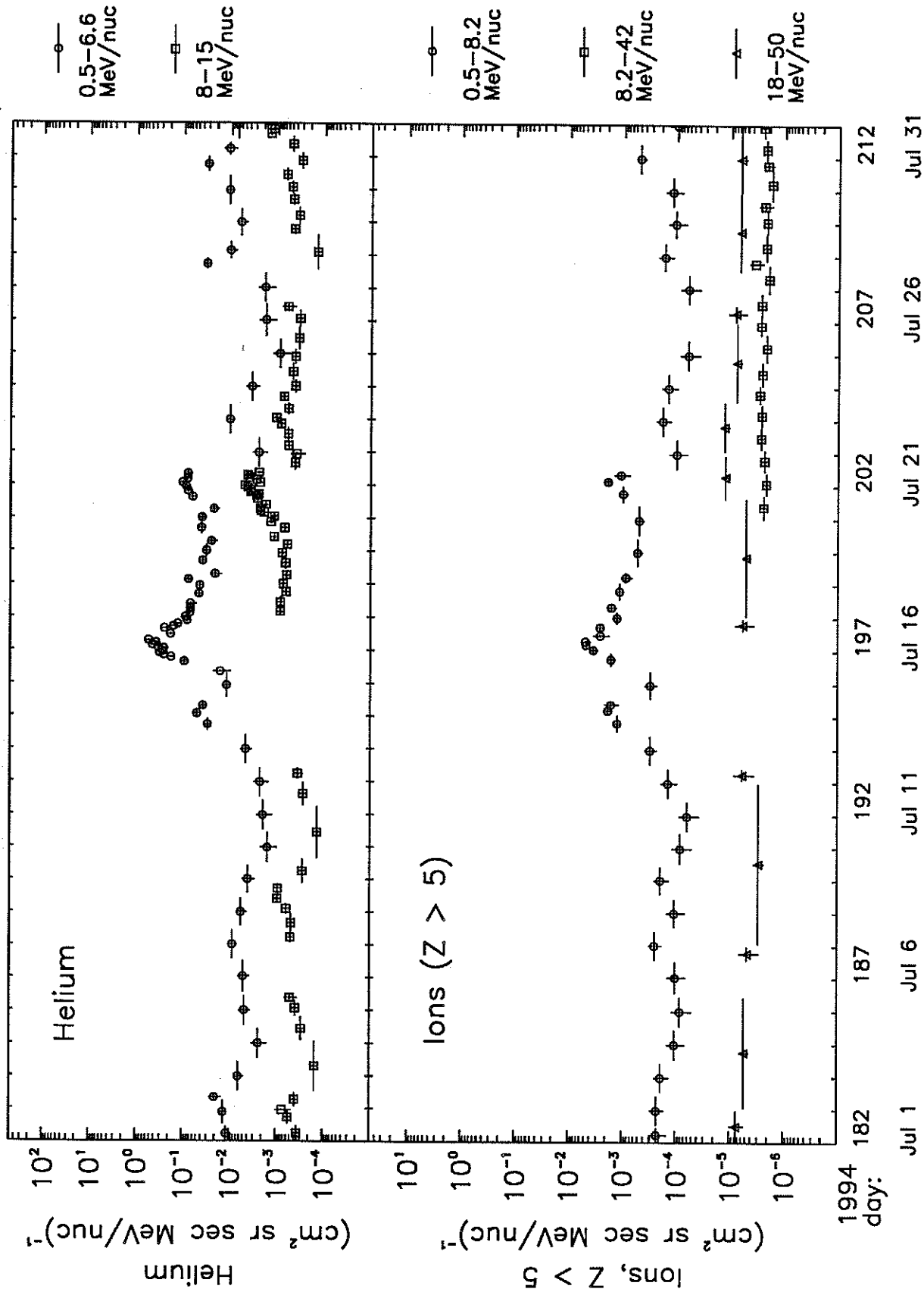
Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)



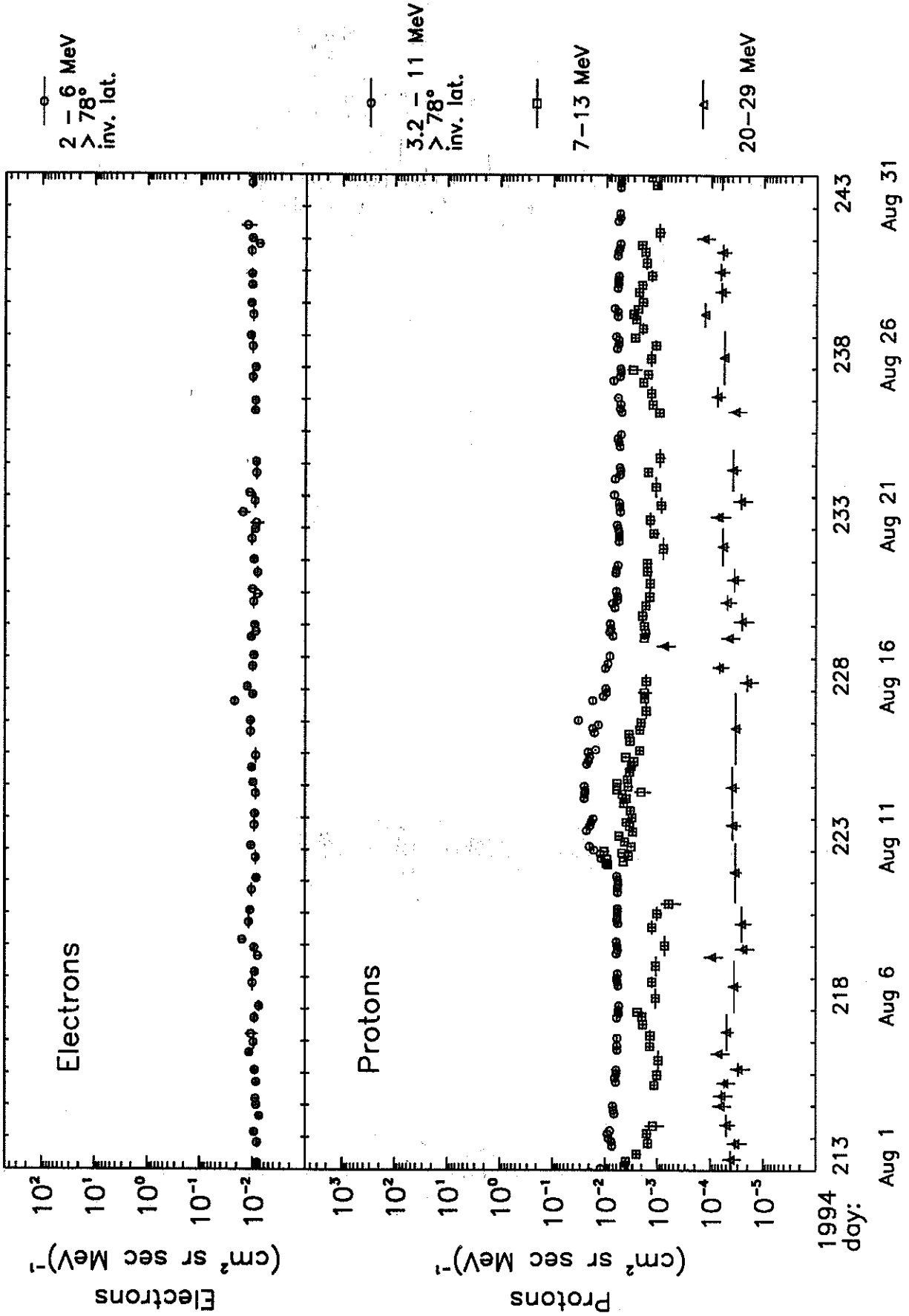
Selected Particle Fluxes from SAMPEX
Polar averages ($> 70^\circ$ invariant latitude except where noted)



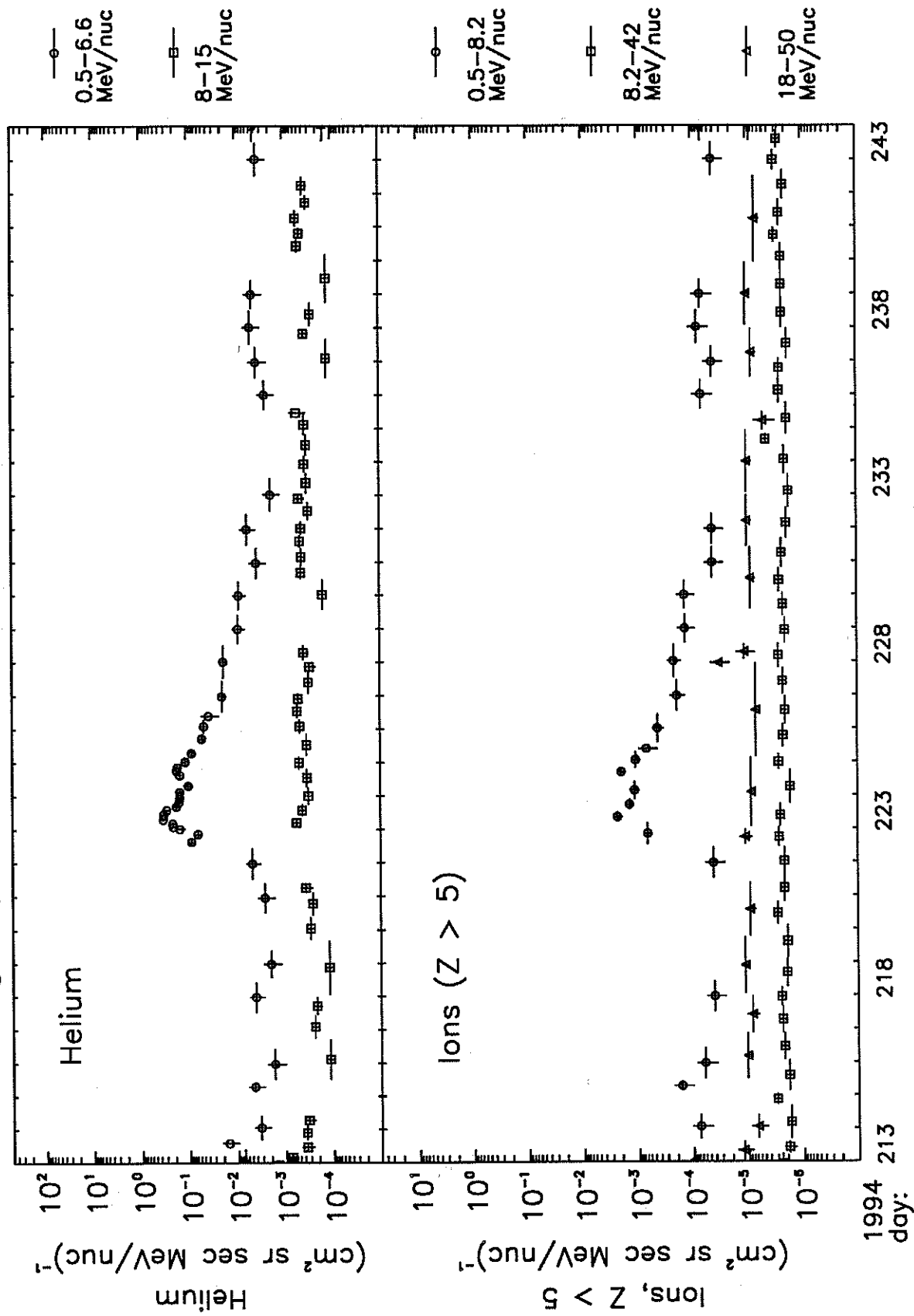
Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)



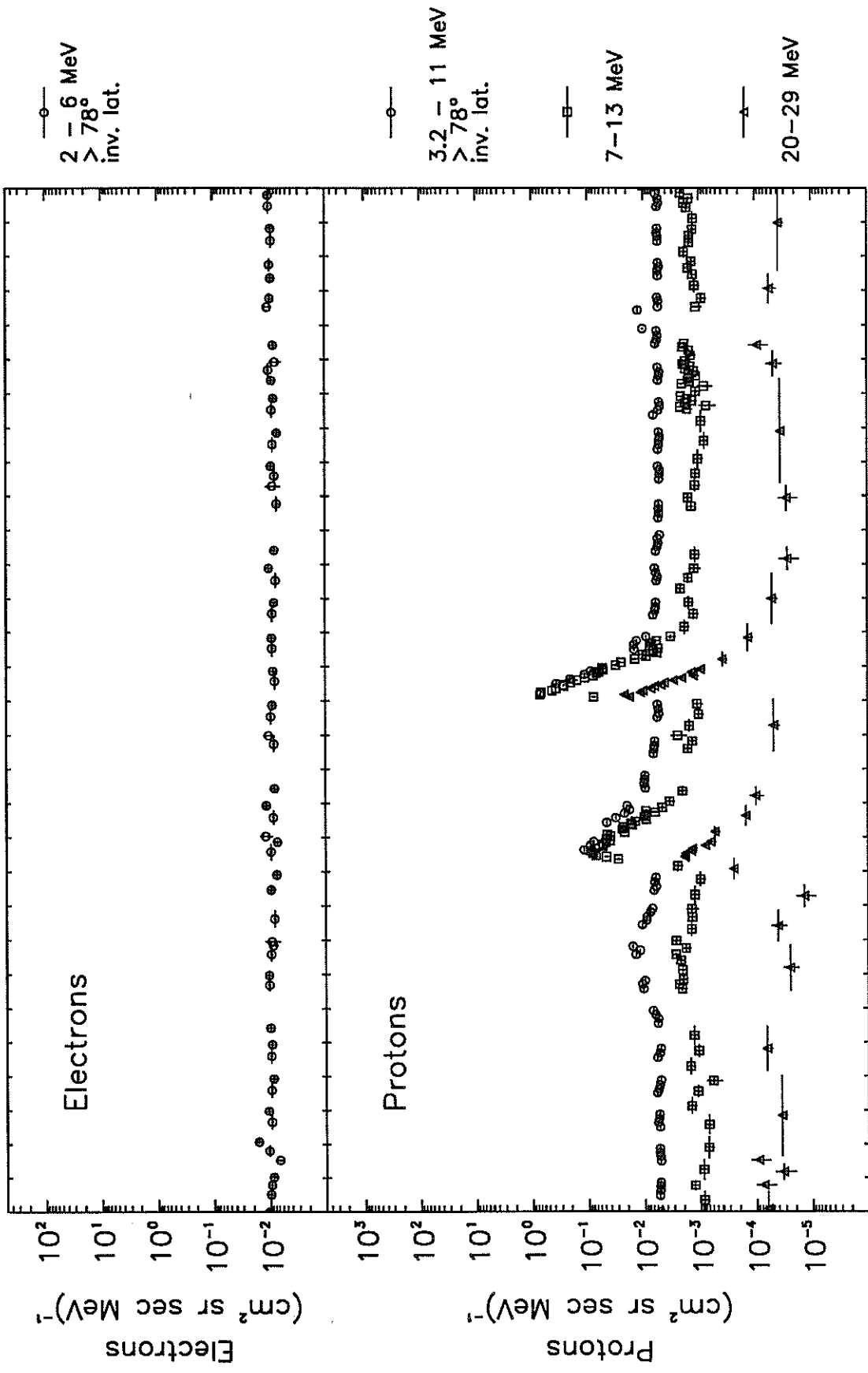
Selected Particle Fluxes from SAMPEX
Polar averages ($> 70^\circ$ invariant latitude except where noted)



Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)

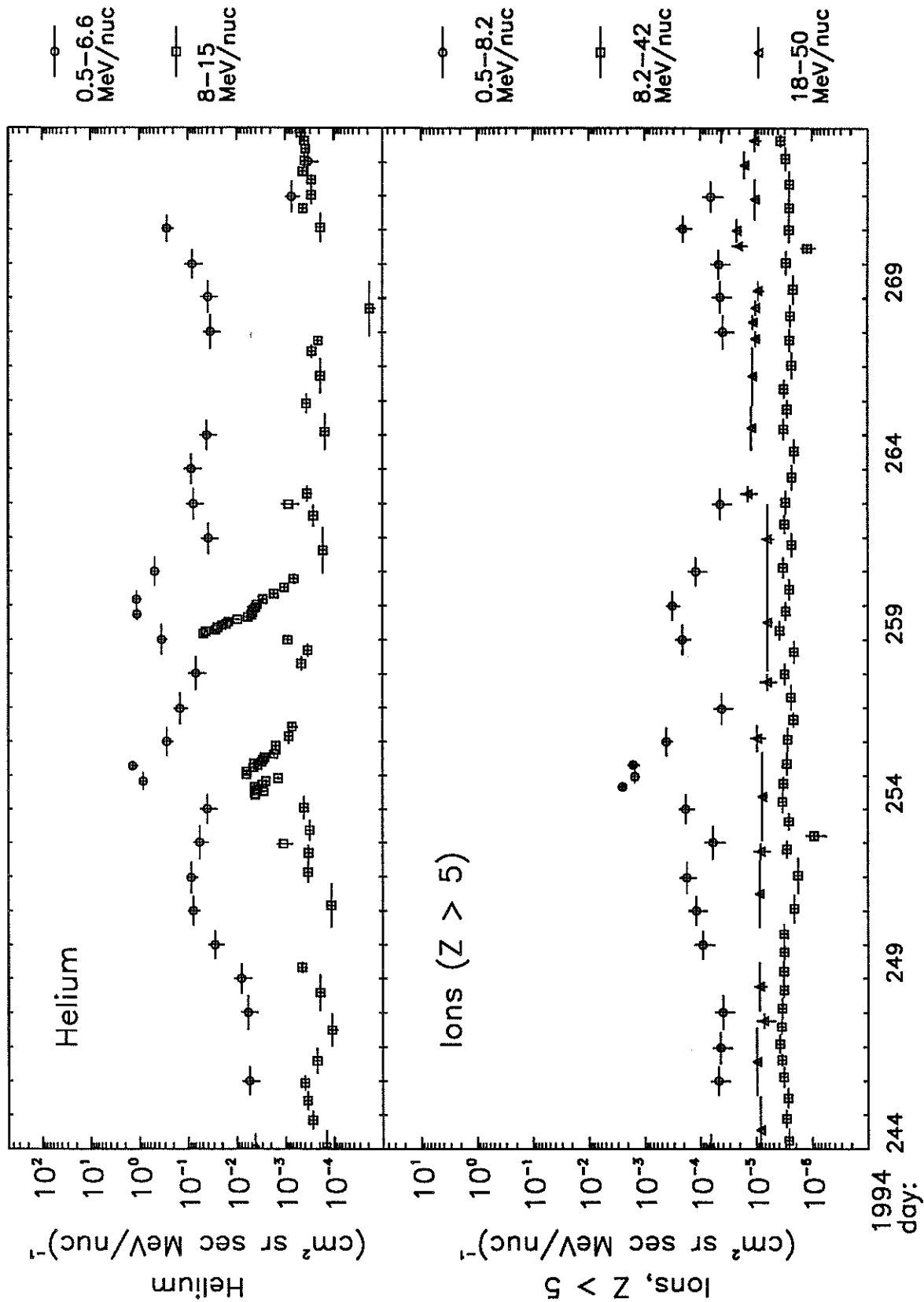


Selected Particle Fluxes from SAMPEX
Polar averages (> 70° invariant latitude except where noted)

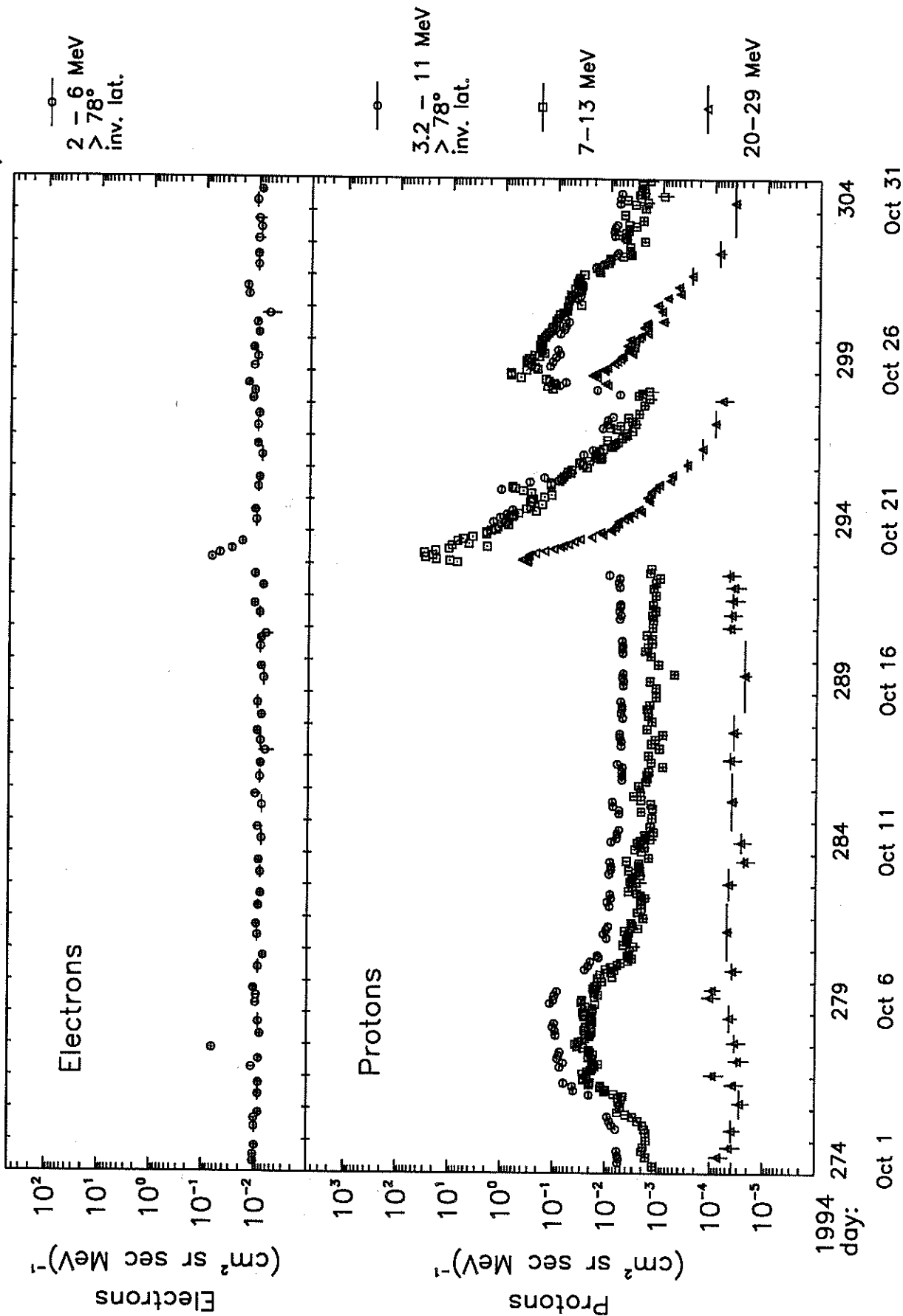


1994 day: 244 249 254 259 264 269
Sep 1 Sep 6 Sep 11 Sep 16 Sep 21 Sep 26

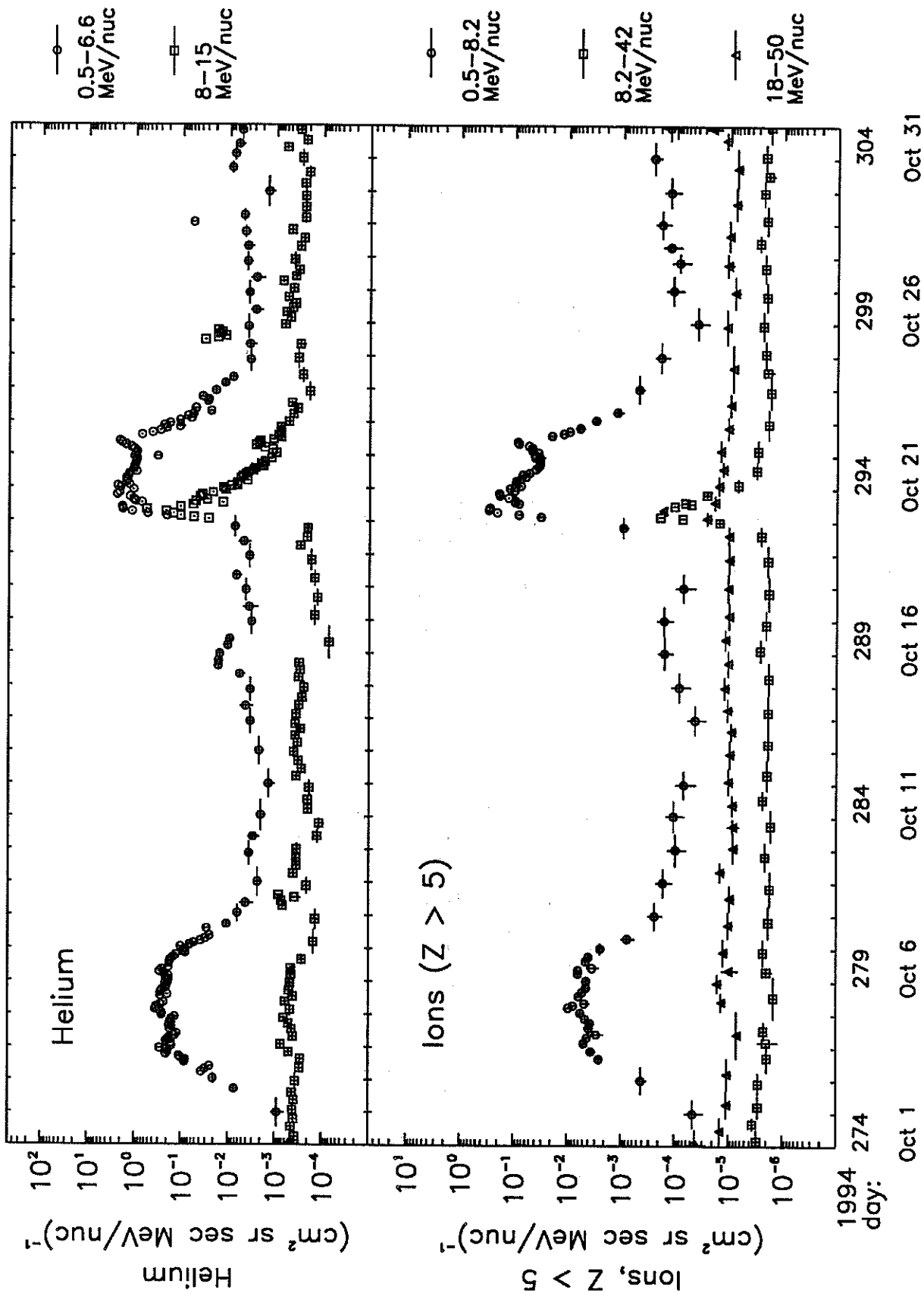
Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)



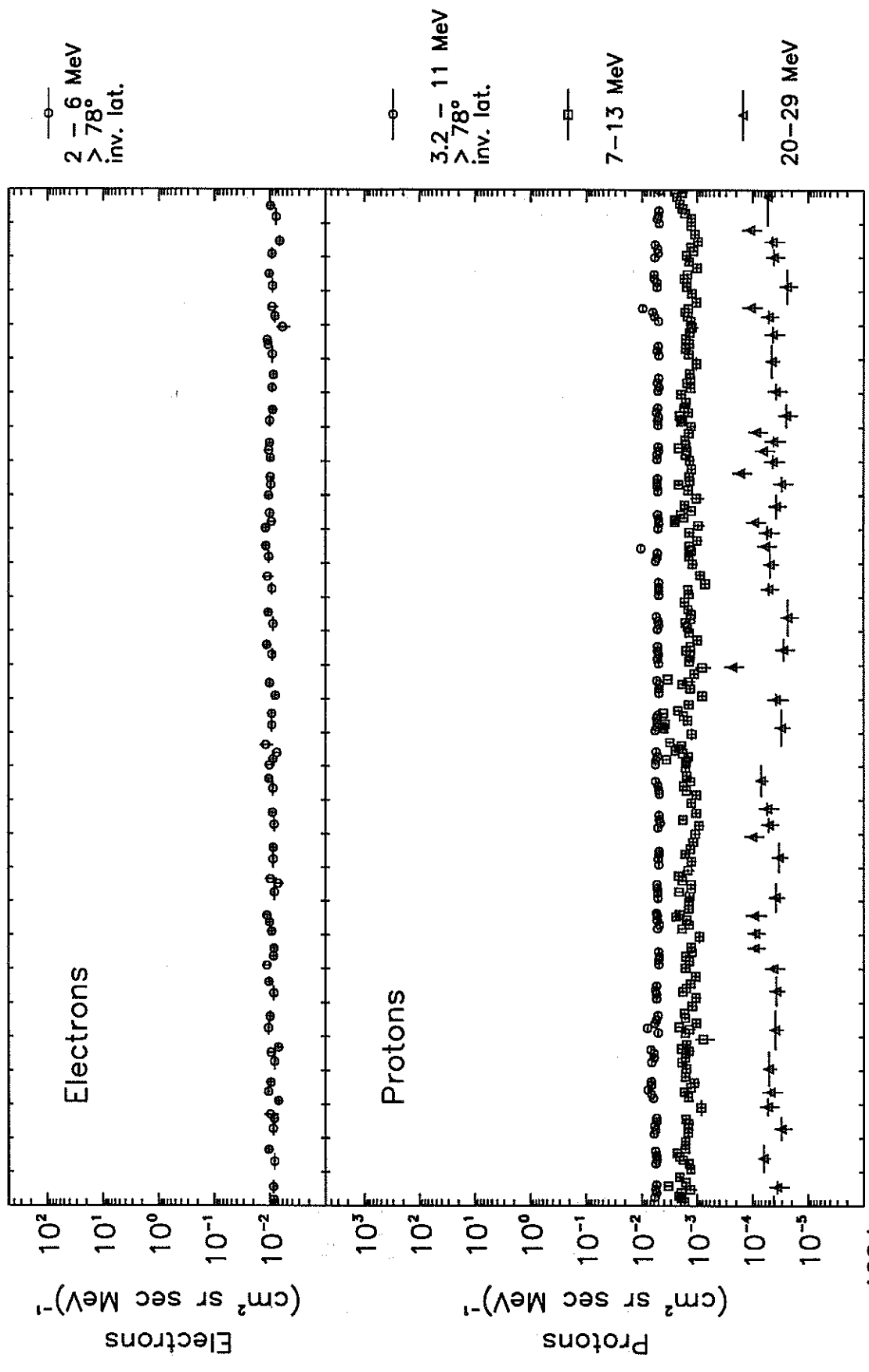
Selected Particle Fluxes from SAMPEX
Polar averages ($> 70^\circ$ invariant latitude except where noted)



Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)

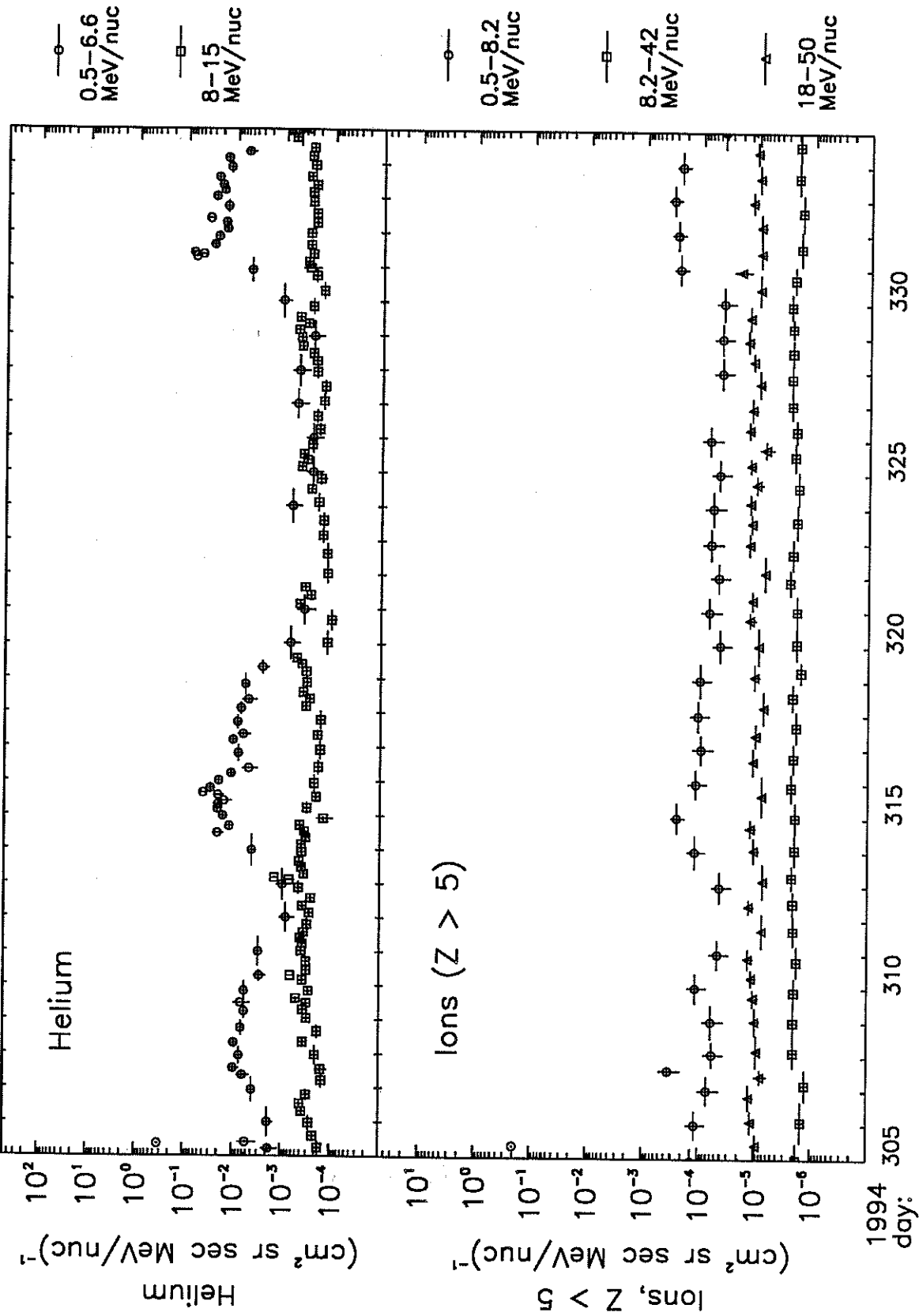


Selected Particle Fluxes from SAMPEX
Polar averages (> 70° invariant latitude except where noted)

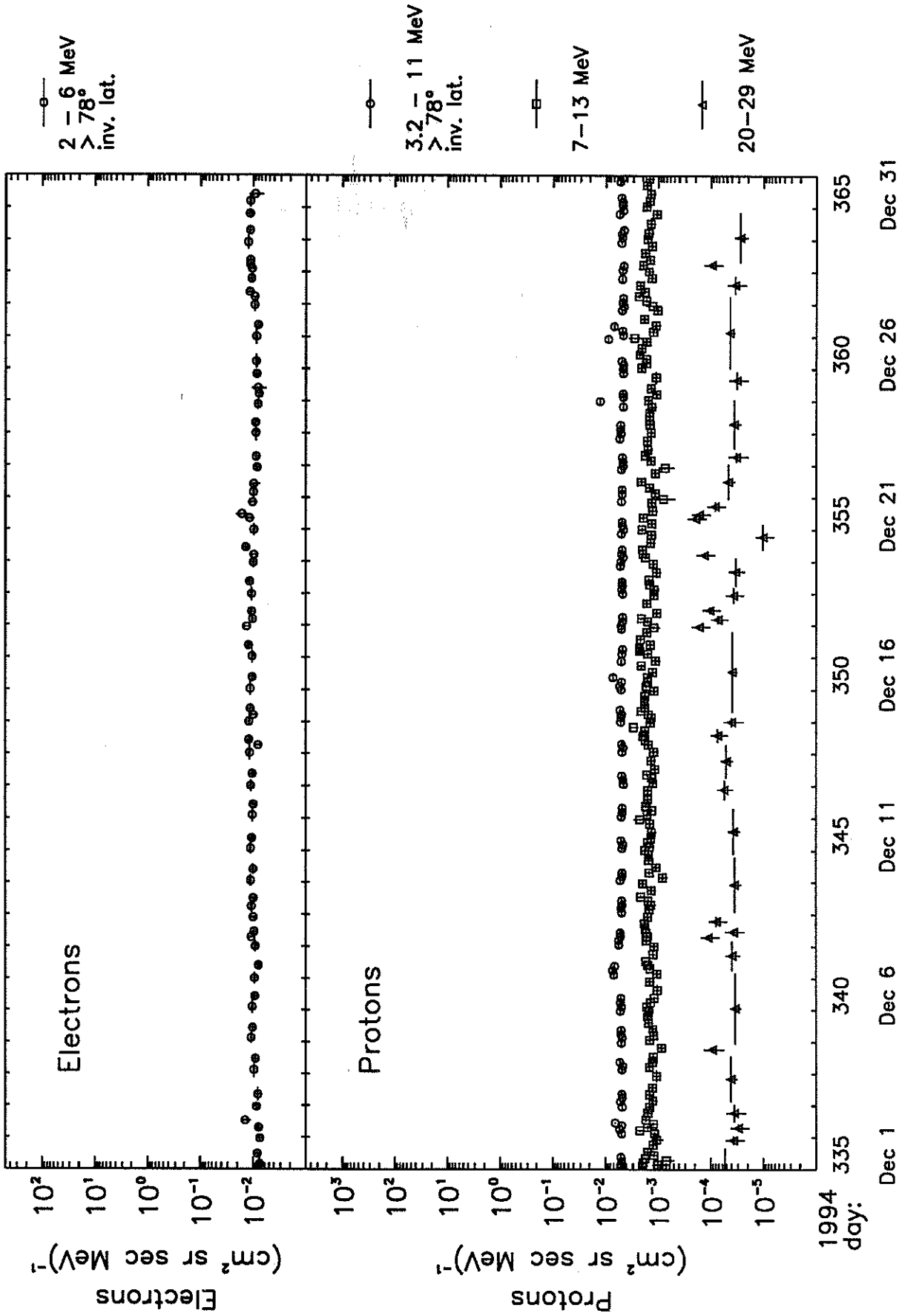


1994 day: 305 310 315 320 325 330
Nov 1 Nov 6 Nov 11 Nov 16 Nov 21 Nov 26

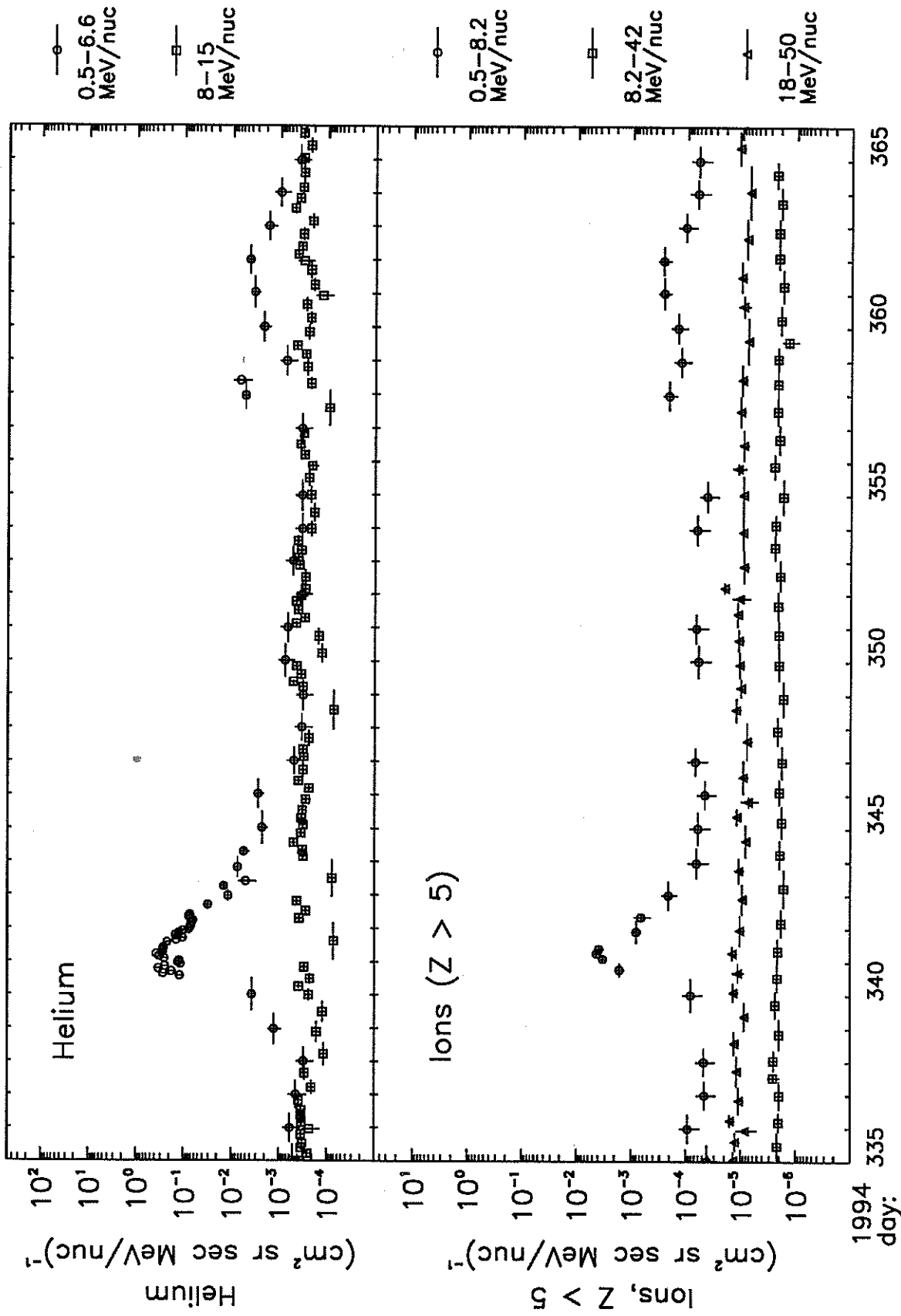
Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)



Selected Particle Fluxes from SAMPEX
Polar averages ($> 70^\circ$ invariant latitude except where noted)



Selected Particle Fluxes from SAMPEX
 Polar averages ($> 70^\circ$ invariant latitude except where noted)





WORLD DATA CENTER A
FOR
SOLAR-TERRESTRIAL PHYSICS



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."