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

NOVEMBER 2002

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	235	CUBA	44	NS	1310.0E		330.0D		5.0		
	280	CUBA	44	NS	1310.0E		330.0D		6.0		
	500	HIRA	8	S	0140.0	0140.0	1.0	25.0			0
	200	HIRA	8	S	0216.0	0216.0	1.0	30.0			WL
	500	HIRA	8	S	0412.0	0412.0	1.0	10.0			0
	410	LEAR	8	S	0412.0	0412.0	U	86.0			QL=4 ST=2 TYP=3
	900	GORK	8	S	0631.2	0631.3	0.2	43.0			
	600	GORK	4	S/F	0636.4	0637.5	6.5	240.0			
	600	GORK	41	F	0823.8	0824.1	4.3	13.0			
	600	GORK	41	F	0823.8	0827.7		28.0			
	204	IZMI	41	F	0824.8	0825.1	0.9	23.0			
	245	LEAR	8	S	0827.0	0827.0	1.0	310.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0827.0	0827.0	1.0	150.0			QL=4 ST=2 TYP=3
	204	IZMI	7	C	0827.7	0827.8	0.2	32.0			
	204	IZMI	45	C	0828.4	0828.6	0.7	207.0			
	204	IZMI	42	SER	0856.1	0859.9	5.1	51.0			
	245	LEAR	8	S	0933.0	0933.0	U	170.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0933.0	0933.0	U	83.0			QL=4 ST=2 TYP=3
	204	IZMI	41	F	0933.6	0933.7	0.4	53.0			
	2695	SVTO	8	S	1027.0	1027.0	U	52.0			QL=4 ST=2 TYP=3
	3000	IZMI	7	C	1037.1	1037.8	2.3	7.0	2.4		
	610	SVTO	8	S	1120.0	1121.0	1.0	69.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	2235.0	2235.0	U	120.0			QL=4 ST=3 TYP=3
02	245	LEAR	43	NS	0925.0	1002.0	38.0	80.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1300.0E		530.0D		5.0		
	280	CUBA	44	NS	1300.0E		530.0D		12.0		
	245	LEAR	48	C	0210.0	0210.0	5.0	97.0			QL=4 ST=3 TYP=8
	245	LEAR	8	S	0220.0	0220.0	U	71.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	0220.0	0220.0	U	70.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0348.0	0348.0	U	85.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0516.0	0516.0	U	56.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0537.0	0537.0	U	56.0			QL=4 ST=2 TYP=3
	204	IZMI	7	C	0842.6	0842.8	0.3	16.0			
	245	LEAR	8	S	0917.0	0917.0	U	56.0			QL=4 ST=2 TYP=3
03	245	LEAR	43	NS	0203.0	0205.0	28.0	130.0			QL=4 ST=2 TYP=1
	245	SVTO	43	NS	0609.0	0623.0	198.0	390.0			QL=4 ST=2 TYP=1
	245	LEAR	43	NS	0638.0	0638.0	U	59.0			QL=4 ST=2 TYP=1
	127	TORN	44	NS	0640.0E		320.0D		6.0		V=1
	204	IZMI	44	NS	0700.0E		300.0D		15.0		
	245	LEAR	43	NS	0704.0	0704.0	U	100.0			QL=4 ST=2 TYP=1
	245	SVTO	43	NS	1030.0	1301.0	293.0	220.0			QL=4 ST=2 TYP=1
	245	SGMR	43	NS	1317.0	1855.0	443.0	300.0			QL=4 ST=3 TYP=1
	245	SGMR	43	NS	1317.0	1400.0	643.0	270.0			QL=4 ST=3 TYP=1
	245	PALE	43	NS	1708.0	2317.0	630.0	400.0			QL=4 ST=2 TYP=1
	200	HIRA	8	S	0130.0	0132.0	2.0	30.0			WR
	500	HIRA	8	S	0228.0	0228.0	1.0	10.0			0
	2840	PEKG	20	GRF	0550.0	0557.2	42.0	17.8			
	245	LEAR	8	S	0551.0	0551.0	U	69.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0610.0	0610.0	U	110.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0616.0	0616.0	U	58.0			QL=4 ST=2 TYP=3
	245	LEAR	48	C	0621.0	0623.0	7.0	410.0			QL=4 ST=2 TYP=8
	245	LEAR	48	C	0630.0	0632.0	2.0	100.0			QL=4 ST=2 TYP=8
	245	LEAR	8	S	0658.0	0658.0	U	140.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0854.0	0854.0	U	160.0			QL=4 ST=2 TYP=3
	900	GORK	7	C	0948.9	0952.4		6.1			
	900	GORK	7	C	0948.9	0950.9	5.2	3.7			
	9100	GORK	21	GRF	0949.3	0952.7	16.4	14.0			
	2950	GORK	41	F	0950.2	0952.7		7.0			
	2950	GORK	41	F	0950.2	0950.9	3.0	8.2			
	600	GORK	41	F	0950.6	0952.4		3.7			
	600	GORK	41	F	0950.6	0950.9	2.8	6.4			
	9100	GORK	7	C	0955.5	0957.3		24.0			
	9100	GORK	7	C	0955.5	0956.6	2.1	12.0			
	245	SVTO	48	C	1001.0	1004.0	3.0	75.0			QL=4 ST=2 TYP=8
	245	LEAR	8	S	1004.0	1004.0	U	100.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1008.0	1008.0	1.0	96.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	1009.0	1009.0	U	100.0			QL=4 ST=2 TYP=3

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

NOVEMBER 2002

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
03	245	SGMR	8	S	1314.0	1314.0	1.0	100.0			QL=4 ST=2 TYP=3
	9500	CUBA	20	GRF	1346.0	1413.0	108.0	22.0	11.0		
	245	SGMR	8	S	1411.0	1411.0	U	420.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1411.0	1411.0	U	130.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1948.0	1950.0	2.0	430.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	2152.0	2152.0	U	63.0			QL=4 ST=2 TYP=3
04	245	SVTO	43	NS	0612.0	0754.0	270.0	200.0			QL=4 ST=2 TYP=1
	127	TORN	44	NS	0650.0E		470.0D		50.0		V=2
	204	IZMI	44	NS	0700.0E		300.0D		60.0		
	610	SVTO	43	NS	1020.0	1029.0	22.0	86.0			QL=4 ST=2 TYP=1
	410	SVTO	43	NS	1020.0	1029.0	820.0	86.0			QL=4 ST=1 TYP=1
	245	SGMR	43	NS	1142.0	1530.0	567.0	570.0			QL=4 ST=2 TYP=1
	245	SVTO	43	NS	1304.0	1326.0	138.0	87.0			QL=4 ST=3 TYP=1
	235	CUBA	44	NS	1400.0E		300.0D		26.0		
	280	CUBA	44	NS	1400.0E		300.0D		36.0		
	245	PALE	43	NS	1718.0	1719.0	402.0	57.0			QL=4 ST=1 TYP=1
	245	LEAR	43	NS	2207.0	0449.0	715.0	1200.0			QL=4 ST=2 TYP=1
	245	LEAR	43	NS	2211.0	2238.0	421.0	110.0			QL=4 ST=3 TYP=1
	200	HIRA	47	GB	0127.0	0127.0	1.0	630.0			0
	200	HIRA	8	S	0234.0	0234.0	1.0	125.0			0
	410	PALE	8	S	0318.0	0318.0	U	54.0			QL=4 ST=2 TYP=3
	245	LEAR	49	GB	0449.0	0449.0	U	1200.0			QL=4 ST=1 TYP=6
	2840	PEKG	1	S	0815.0	0817.9	8.0	9.7			
	2840	PEKG	45	C	0836.0	0841.2	15.0	30.0			
	900	GORK	42	SER	1011.6	1012.0	9.0	12.0			
	900	GORK	42	SER	1011.6	1020.6		4.9			
	2950	GORK	7	C	1019.3	1020.1	2.1	4.7			
	2950	GORK	7	C	1019.3	1020.3		5.9			
	3000	IZMI	22	GRF	1019.7	1020.3	3.7	7.0	1.9		
	33	UPIC	46	C	1120.0	1121.0	2.0				
	2800	PENT	20	GRF	1604.0	1626.0	69.0	5.0			
	410	SGMR	8	S	1648.0	1648.0	U	94.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	1850.0	1850.0	1.0	110.0			QL=4 ST=2 TYP=3
	410	SGMR	49	GB	1856.0	1856.0	1.0	610.0			QL=4 ST=2 TYP=6
	2800	PENT	4	S/F	2045.0	2105.0	43.0	29.0			
	610	PALE	48	C	2104.0	2106.0	5.0	270.0			QL=4 ST=2 TYP=8
	1415	PALE	8	S	2104.0	2106.0	2.0	73.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	2213.0	2214.0	1.0	100.0			QL=4 ST=2 TYP=3
	200	HIRA	8	S	2214.0	2214.0	1.0	80.0			WL
	2800	PENT	29	PBI	2229.0	2237.0	44.0	17.0			
	200	HIRA	8	S	2236.0	2236.0	1.0	110.0			WL
	500	HIRA	8	S	2238.0	2239.0	2.0	70.0			WR
05	245	SVTO	43	NS	0601.0	0643.0	47.0	77.0			QL=4 ST=2 TYP=1
	245	LEAR	43	NS	0640.0	0643.0	1040.0	64.0			QL=4 ST=3 TYP=1
	127	TORN	44	NS	0650.0E		470.0D		30.0		V=2
	204	IZMI	44	NS	0700.0E		300.0D		40.0		
	245	SGMR	43	NS	1146.0	2043.0	542.0	920.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1310.0E		110.0D		9.0		
	280	CUBA	44	NS	1310.0E		110.0D		6.0		
	245	PALE	43	NS	1718.0	2036.0	620.0	370.0			QL=4 ST=2 TYP=1
	500	HIRA	47	GB	0117.0	0117.0	1.0	680.0			
	200	HIRA	8	S	0117.0	0117.0	2.0	415.0			
	245	LEAR	8	S	0117.0	0117.0	U	320.0			QL=4 ST=2 TYP=3
	410	LEAR	8	S	0117.0	0117.0	U	180.0			QL=4 ST=2 TYP=3
	245	PALE	49	GB	0117.0	0117.0	U	520.0			QL=4 ST=2 TYP=6
	410	PALE	8	S	0117.0	0117.0	U	210.0			QL=4 ST=2 TYP=3
	610	PALE	8	S	0117.0	0117.0	U	53.0			QL=4 ST=2 TYP=3
	200	HIRA	8	S	0248.0	0248.0	1.0	105.0			
	410	PALE	8	S	0250.0	0250.0	1.0	60.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	0325.0	0325.0	U	68.0			QL=4 ST=2 TYP=3
	200	HIRA	47	GB	0333.0	0334.0	3.0	1000.0			
	245	LEAR	8	S	0333.0	0334.0	2.0	160.0			QL=4 ST=2 TYP=3
	200	HIRA	8	S	0345.0	0346.0	1.0	50.0			
	245	LEAR	8	S	0346.0	0346.0	U	130.0			QL=4 ST=2 TYP=3
	200	HIRA	7	C	0406.0	0408.0	2.0	60.0			
	245	LEAR	8	S	0407.0	0407.0	U	110.0			QL=4 ST=2 TYP=3
	200	HIRA	8	S	0505.0	0505.0	1.0	40.0			

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

NOVEMBER 2002

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
05	200	HIRA	8	S	0512.0	0513.0	1.0	55.0			
	200	HIRA	8	S	0551.0	0552.0	2.0	400.0			
	245	LEAR	48	C	0551.0	0551.0	3.0	310.0			QL=4 ST=2 TYP=8
	245	SVTO	48	C	0551.0	0551.0	3.0	110.0			QL=2 ST=3 TYP=8
	410	SVTO	4	S/F	0551.0	0551.0	3.0	68.0			QL=2 ST=3 TYP=3
	500	HIRA	8	S	0552.0	0552.0	2.0	215.0			
	610	LEAR	8	S	0552.0	0552.0	U	55.0			QL=4 ST=2 TYP=3
	610	SVTO	8	S	0552.0	0552.0	U	54.0			QL=2 ST=3 TYP=3
	245	SVTO	8	S	0619.0	0620.0	1.0	90.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0620.0	0620.0	1.0	120.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0707.0	0707.0	U	97.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0754.0	0754.0	1.0	81.0			QL=4 ST=2 TYP=3
	600	GORK	7	C	0808.1	0808.4	0.9	27.0			
	600	GORK	7	C	0808.1	0808.7		7.7			
	2840	PEKG	5	S	0812.0	0814.8	8.0	12.6			
	9100	GORK	1	S	0812.6	0815.1	3.5	8.7			
	900	GORK	1	S	0814.4	0815.0	0.9	6.1			
	600	GORK	2	S/F	0814.5	0815.0	1.0	7.7			
	2950	GORK	2	S/F	0814.5	0814.8	1.2	15.0			
	3000	IZMI	5	S	0814.6	0814.8	0.4	13.0	7.5		
	127	TORN	4	S/F	0904.4	0905.8	2.4	310.0	8.0		
	9100	GORK	40	F	0909.5	0910.7	2.3	30.0			
	900	GORK	41	F	0914.3	0916.3		11.0			
	900	GORK	41	F	0914.3	0914.8	2.2	20.0			
	600	GORK	42	SER	0914.6	0919.2	23.1	7.1			
	600	GORK	42	SER	0914.6	0937.4		4.9			
	204	IZMI	42	SER	0920.7	0923.3	5.1	72.0			
	204	IZMI	42	SER	1005.9	1011.8	6.5	223.0			
	600	GORK	41	F	1009.0	1009.1	0.5	4.8			
	600	GORK	41	F	1009.0	1009.3		20.0			
	600	GORK	1	S	1014.8	1015.2	0.8	2.9			
	900	GORK	7	C	1017.9	1018.4	1.4	7.3			
	900	GORK	7	C	1017.9	1018.9		3.6			
	600	GORK	7	C	1033.6	1033.8	0.7	12.0			
	600	GORK	7	C	1033.6	1033.9		15.0			
	204	IZMI	7	C	1112.2	1112.2	0.2	17.0			
	204	IZMI	41	F	1138.8	1139.0	1.1	126.0			
	204	IZMI	46	C	1146.7	1146.8	0.7	1126.0			
	4995	SVTO	8	S	1255.0	1256.0	2.0	84.0			QL=4 ST=2 TYP=3
	8800	SVTO	8	S	1255.0	1256.0	2.0	93.0			QL=4 ST=2 TYP=3
	15400	SVTO	8	S	1255.0	1256.0	2.0	77.0			QL=4 ST=2 TYP=3
	2695	SGMR	8	S	1256.0	1256.0	1.0	66.0			QL=4 ST=2 TYP=3
	4995	SGMR	8	S	1256.0	1256.0	U	43.0			QL=4 ST=2 TYP=3
	8800	SGMR	8	S	1256.0	1256.0	1.0	48.0			QL=4 ST=2 TYP=3
	33	UPIC	8	S	1256.5	1257.5	1.5				
	245	SGMR	49	GB	1257.0	1257.0	2.0	610.0			QL=4 ST=2 TYP=6
	127	TORN	4	S/F	1257.2	1257.6	0.9	2000.0	1000.0		
	2800	PENT	29	PBI	1604.0	1609.0	71.0	36.0			
	245	SGMR	49	GB	1608.0	1608.0	5.0	4700.0			QL=4 ST=2 TYP=6
	410	SGMR	49	GB	1608.0	1608.0	1.0	3400.0			QL=4 ST=2 TYP=6
	410	SGMR	49	GB	1608.0	1608.0	2.0	3400.0			QL=4 ST=2 TYP=6
	1415	SGMR	8	S	1608.0	1608.0	U	29.0			QL=4 ST=2 TYP=3
	1415	SGMR	8	S	1608.0	1609.0	1.0	220.0			QL=4 ST=2 TYP=3
	2695	SGMR	8	S	1608.0	1609.0	1.0	49.0			QL=4 ST=2 TYP=3
	4995	SGMR	8	S	1608.0	1609.0	2.0	72.0			QL=4 ST=2 TYP=3
	15400	SGMR	8	S	1608.0	1609.0	1.0	96.0			QL=4 ST=2 TYP=3
	8800	SGMR	4	S/F	1608.0	1609.0	3.0	150.0			QL=4 ST=2 TYP=3
	245	PALE	48	C	1832.0	1837.0	7.0	74.0			QL=4 ST=2 TYP=8
	245	PALE	8	S	1945.0	1946.0	2.0	120.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	2001.0	2001.0	1.0	220.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	2015.0	2015.0	1.0	240.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	2015.0	2015.0	U	45.0			QL=4 ST=2 TYP=3
	245	PALE	49	GB	2039.0	2044.0	10.0	1100.0			QL=4 ST=2 TYP=6
	410	PALE	8	S	2043.0	2044.0	2.0	150.0			QL=4 ST=2 TYP=3
	610	PALE	8	S	2045.0	2045.0	1.0	150.0			QL=4 ST=2 TYP=3
	1415	PALE	8	S	2045.0	2045.0	U	70.0			QL=4 ST=2 TYP=3
	8800	PALE	8	S	2045.0	2045.0	U	47.0			QL=4 ST=2 TYP=3
	610	PALE	4	S/F	2111.0	2114.0	4.0	67.0			QL=4 ST=2 TYP=3
	200	HIRA	8	S	2224.0	2224.0	1.0	15.0			

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

NOVEMBER 2002

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
05	200	HIRA	8	S	2253.0	2253.0	1.0	20.0			
	500	HIRA	7	C	2339.0	2340.0	4.0	40.0			
06	204	IZMI	44	NS	0700.0E		300.0D		10.0		
	127	TORN	44	NS	1330.0E		70.0D		6.0		V=1
	235	CUBA	44	NS	1430.0E		240.0D		6.0		
	280	CUBA	44	NS	1430.0E		240.0D		14.0		
	245	LEAR	43	NS	2154.0	2218.0	30.0	55.0			QL=4 ST=2 TYP=1
	2840	PEKG	1	S	0105.0	0107.7	9.0	3.9			
	200	HIRA	47	GB	0107.0	0107.0	1.0	1015.0			
	245	LEAR	49	GB	0107.0	0107.0	U	670.0			QL=2 ST=2 TYP=6
	245	PALE	49	GB	0107.0	0107.0	1.0	980.0			QL=4 ST=2 TYP=6
	2840	PEKG	1	S	0132.0	0133.9	5.0	5.8			
	200	HIRA	8	S	0133.0	0133.0	1.0	355.0			
	245	PALE	8	S	0133.0	0134.0	1.0	320.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	0134.0	0134.0	U	88.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	0240.0	0240.0	1.0	94.0			QL=4 ST=2 TYP=3
	2840	PEKG	1	S	0256.0	0258.3	6.0	4.6			
	500	HIRA	8	S	0258.0	0258.0	1.0	45.0			
	200	HIRA	8	S	0258.0	0258.0	1.0	295.0			
	2840	PEKG	3	S	0459.0	0528.3	55.0	52.5			
	2800	HIRA	7	C	0517.0	0529.0	17.0	35.0			
	500	HIRA	47	GB	0517.0	0532.0	23.0	625.0			
	610	LEAR	4	S/F	0518.0	0519.0	4.0	170.0			QL=4 ST=2 TYP=3
	610	LEAR	48	C	0524.0	0531.0	10.0	440.0			QL=4 ST=2 TYP=8
	200	HIRA	8	S	0525.0	0525.0	1.0	110.0			
	410	LEAR	4	S/F	0525.0	0534.0	9.0	79.0			QL=4 ST=2 TYP=3
	245	SVTO	4	S/F	0614.0	0631.0	21.0	120.0			QL=4 ST=2 TYP=3
	245	SVTO	4	S/F	0630.0	0631.0	5.0	120.0			QL=4 ST=3 TYP=3
	200	HIRA	8	S	0631.0	0631.0	1.0	120.0			
	245	LEAR	8	S	0631.0	0631.0	U	250.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	0631.0	0631.0	U	37.0			QL=4 ST=2 TYP=3
	600	GORK	42	SER	0714.6	0717.6	8.4	6.0			
	600	GORK	42	SER	0714.6	0721.7		5.1			
	900	GORK	42	SER	0719.6	0739.4		3.4			
	900	GORK	42	SER	0719.6	0719.8	20.0	33.0			
	204	IZMI	42	SER	0903.9	0906.9	3.9	52.0			
	245	LEAR	8	S	0921.0	0921.0	U	79.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	1001.0	1002.0	1.0	260.0			QL=4 ST=2 TYP=3
	410	LEAR	8	S	1002.0	1002.0	U	57.0			QL=4 ST=2 TYP=3
	245	SGMR	48	C	1346.0	1348.0	2.0	130.0			QL=4 ST=2 TYP=8
	127	TORN	45	C	1346.8	1349.7	4.0	340.0	80.0		
	245	SGMR	8	S	1437.0	1437.0	U	120.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	1437.0	1437.0	U	91.0			QL=4 ST=2 TYP=3
	610	SGMR	8	S	1437.0	1437.0	U	32.0			QL=4 ST=2 TYP=3
	245	SGMR	49	GB	1517.0	1518.0	1.0	780.0			QL=4 ST=2 TYP=6
	410	SGMR	8	S	1518.0	1518.0	U	42.0			QL=4 ST=2 TYP=3
	2800	PENT	1	S	1629.0	1641.0	30.0	70.0			
	245	SGMR	48	C	1636.0	1638.0	3.0	280.0			QL=4 ST=2 TYP=8
	245	SGMR	48	C	1636.0	1642.0	7.0	340.0			QL=4 ST=2 TYP=8
	410	SGMR	49	GB	1639.0	1640.0	4.0	2500.0			QL=4 ST=2 TYP=6
	610	SGMR	8	S	1640.0	1641.0	1.0	470.0			QL=4 ST=2 TYP=3
	9500	CUBA	1	S	1641.2	1641.4	0.5	12.0	6.0		
	410	SGMR	8	S	1645.0	1646.0	1.0	340.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	1645.0	1646.0	1.0	340.0			QL=4 ST=3 TYP=3
	610	SGMR	8	S	1645.0	1646.0	1.0	88.0			QL=4 ST=2 TYP=3
	9500	CUBA	1	S	1646.1	1646.6	1.3	18.0	9.0		
	245	SGMR	8	S	1701.0	1701.0	U	100.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1821.0	1821.0	U	99.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	1822.0	1822.0	U	100.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1942.0	1942.0	U	55.0			QL=4 ST=2 TYP=3
	200	HIRA	7	C	2136.0	2138.0	4.0	55.0			0
	245	PALE	8	S	2138.0	2138.0	U	59.0			QL=4 ST=2 TYP=3
	610	PALE	8	S	2138.0	2138.0	1.0	99.0			QL=4 ST=2 TYP=3
	500	HIRA	8	S	2155.0	2157.0	3.0	95.0			WR
	245	PALE	48	C	2155.0	2156.0	4.0	210.0			QL=4 ST=2 TYP=8
	410	PALE	8	S	2203.0	2203.0	U	180.0			QL=4 ST=2 TYP=3
	2800	PENT	21	GRF	2306.0	2310.0	15.0	8.0			

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

NOVEMBER 2002

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
07	204	IZMI	44	NS	0856.0E		184.0D		10.0		
	245	LEAR	43	NS	0913.0	0913.0	49.0	90.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1400.0E		120.0D		4.0		
	280	CUBA	44	NS	1400.0E		120.0D		10.0		
	200	HIRA	8	S	0234.0	0234.0	1.0	25.0			0
	2950	GORK	46	C	0624.8	0628.1		23.0			
	2950	GORK	46	C	0624.8	0627.6	11.1	12.0			
	600	GORK	40	F	0625.0	0626.3	3.8	20.0			
	900	GORK	4	S/F	0625.0	0626.5	4.6	9.0			
	500	HIRA	7	C	0627.0	0628.0	2.0	35.0			0
	245	LEAR	8	S	0628.0	0628.0	U	91.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0628.0	0628.0	U	95.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	0628.0	0628.0	U	48.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	0646.0	0646.0	U	75.0			QL=4 ST=2 TYP=3
	900	GORK	4	S/F	0805.0	0805.4	2.6	29.0			
	9100	GORK	3	S	0839.4	0839.8	1.8	32.0			
	245	LEAR	8	S	0857.0	0857.0	U	52.0			QL=4 ST=2 TYP=3
	610	SVTO	8	S	0902.0	0902.0	U	32.0			QL=2 ST=3 TYP=3
	245	LEAR	8	S	0904.0	0904.0	U	61.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0904.0	0904.0	U	63.0			QL=4 ST=2 TYP=3
	900	GORK	42	SER	0905.1	0905.3	3.9	6.8			
	900	GORK	42	SER	0905.1	0908.7		11.0			
	9100	GORK	4	S/F	0909.4	0910.4	13.9	40.0			
	245	SVTO	8	S	1034.0	1034.0	U	54.0			QL=4 ST=2 TYP=3
	33	UPIC	42	SER	1134.0	1156.5	24.0				UNCERTN
	204	IZMI	42	SER	1142.1	1142.4	0.7	87.0			
	204	IZMI	45	C	1143.0	1143.1	0.2	664.0			
	204	IZMI	42	SER	1143.2	1143.3	0.6	49.0			
	204	IZMI	7	C	1154.2	1154.3	0.2	26.0			
	245	SVTO	49	GB	1155.0	1156.0	2.0	780.0			QL=4 ST=2 TYP=6
	204	IZMI	46	C	1155.6	1156.1	0.8	1398.0			
	245	SGMR	8	S	1305.0	1305.0	U	63.0			QL=4 ST=2 TYP=3
	9500	CUBA	1	S	1437.0	1437.3	1.8	17.0	8.0		
	2800	PENT	21	GRF	1619.0	1640.0	61.0	5.0			
	245	SGMR	8	S	1653.0	1653.0	1.0	320.0			QL=4 ST=3 TYP=3
	245	SGMR	8	S	1711.0	1711.0	U	250.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1813.0	1813.0	U	110.0			QL=4 ST=2 TYP=3
	2800	PENT	1	S	1842.0	1853.0	26.0	6.0			
08	235	CUBA	44	NS	1415.0E		455.0D		5.0		
	280	CUBA	44	NS	1415.0E		455.0D		13.0		
	245	LEAR	8	S	0154.0	0154.0	1.0	52.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0209.0	0209.0	U	60.0			QL=4 ST=2 TYP=3
	204	IZMI	42	SER	0822.9	0823.1	1.7	6.0			
	204	IZMI	41	F	0943.5	0943.7	0.4	10.0			
	245	LEAR	8	S	1001.0	1001.0	U	53.0			QL=4 ST=2 TYP=3
	410	LEAR	8	S	1001.0	1001.0	U	33.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1100.0	1100.0	U	51.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1833.0	1834.0	1.0	270.0			QL=4 ST=2 TYP=3
	245	PALE	49	GB	1834.0	1834.0	U	990.0			QL=2 ST=2 TYP=6
09	200	HIRA	7	C	0349.0	0351.0	4.0	15.0			WR
	200	HIRA	7	C	0400.0	0415.0	15.0	15.0			WR
	204	IZMI	42	SER	0712.3	0713.1	0.9	39.0			
	3000	IZMI	7	C	1147.1	1148.3	2.3	17.0			
	245	SGMR	48	C	1309.0	1312.0	651.0	390.0			QL=4 ST=1 TYP=8
	33	UPIC	42	SER	1309.0	1333.5	27.0				
	127	TORN	49	GB	1310.0		19.0		530.0		
	2695	SGMR	48	C	1310.0	1316.0	650.0	500.0			QL=4 ST=1 TYP=8
	2695	SGMR	4	S/F	1310.0	1312.0	650.0	210.0			QL=4 ST=1 TYP=3
	9500	CUBA	49	GB	1310.0	1321.2	18.1	602.0	301.0		
	610	SGMR	8	S	1311.0	1311.0	U	29.0			QL=4 ST=2 TYP=3
	610	SVTO	8	S	1311.0	1311.0	U	27.0			QL=4 ST=2 TYP=3
	1415	SGMR	48	C	1311.0	1316.0	649.0	330.0			QL=4 ST=1 TYP=8
	8800	SGMR	48	C	1311.0	1316.0	649.0	330.0			QL=4 ST=1 TYP=8
	4995	SGMR	4	S/F	1311.0	1312.0	649.0	200.0			QL=4 ST=1 TYP=3
	410	SVTO	8	S	1312.0	1312.0	U	25.0			QL=4 ST=2 TYP=3
	410	SGMR	4	S/F	1312.0	1314.0	648.0	130.0			QL=4 ST=1 TYP=3
	15400	SGMR	4	S/F	1312.0	1312.0	648.0	47.0			QL=4 ST=1 TYP=3

SOLAR RADIO EMISSION
Outstanding Occurrences

NOVEMBER 2002

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
09	15400	SGMR	4	S/F	1312.0	1317.0	648.0	190.0			QL=4 ST=1 TYP=3
	9500	CUBA	30	PBI	1327.0	1327.0	73.0	91.0	45.0		
	9500	CUBA	2	S/F	1404.5	1405.1	2.5	22.0	11.0		
	245	SGMR	8	S	1405.0	1405.0	U	200.0			QL=4 ST=2 TYP=3
	2695	SGMR	8	S	1405.0	1405.0	U	30.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1405.0	1405.0	U	87.0			QL=4 ST=2 TYP=3
	200	HIRA	8	S	2309.0	2309.0	1.0	245.0			0
	245	LEAR	8	S	2309.0	2309.0	U	90.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	2309.0	2309.0	U	190.0			QL=4 ST=2 TYP=3
10	127	TORN	44	NS	0700.0E		450.0D		12.0		V=0
	2840	PEKG	47	GB	0301.0	0311.3	32.0	556.8			
	2800	HIRA	3	S	0306.0	0311.0	13.0	410.0			0
	500	HIRA	7	C	0307.0	0311.0	14.0	45.0			
	200	HIRA	7	C	0307.0	0309.0	10.0	100.0			
	2695	PALE	4	S/F	0307.0	0311.0	10.0	400.0			QL=4 ST=2 TYP=3
	245	PALE	48	C	0308.0	0308.0	5.0	72.0			QL=4 ST=2 TYP=8
	4995	PALE	49	GB	0308.0	0311.0	9.0	700.0			QL=4 ST=2 TYP=6
	8800	PALE	4	S/F	0309.0	0311.0	6.0	460.0			QL=4 ST=2 TYP=3
	610	PALE	8	S	0311.0	0311.0	2.0	59.0			QL=4 ST=2 TYP=3
	15400	PALE	8	S	0311.0	0312.0	2.0	160.0			QL=4 ST=2 TYP=3
	410	PALE	4	S/F	0311.0	0316.0	6.0	58.0			QL=4 ST=2 TYP=3
	204	IZMI	42	SER	0740.8	0741.7	1.3	70.0			
	204	IZMI	42	SER	0742.4	0744.0	1.7	7.0			
	2950	GORK	20	GRF	0826.0	0919.1	61.0D	12.0			
	9100	GORK	20	GRF	0844.8	1017.9	102.2D	37.0			
	204	IZMI	42	SER	0848.2	0850.8	49.2	17.0			
	900	GORK	46	C	0853.2	0904.4		55.0			
	900	GORK	46	C	0853.2	0859.4	15.9	50.0			
	600	GORK	41	F	0914.6	0915.1	1.4	10.0			
	600	GORK	41	F	0914.6	0915.8		3.9			
	204	IZMI	42	SER	1148.0	1148.1	1.6	25.0			
	245	SGMR	8	S	2006.0	2006.0	1.0	170.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	2007.0	2007.0	U	190.0			QL=4 ST=2 TYP=3
	2840	PEKG	3	S	2336.0	2343.1	15.0	30.8			
11	127	TORN	44	NS	0700.0E		450.0D		14.0		V=0
	235	CUBA	44	NS	1400.0E		470.0D		7.0		
	280	CUBA	44	NS	1400.0E		470.0D		14.0		
	200	HIRA	8	S	0008.0	0008.0	1.0	30.0			0
	500	HIRA	8	S	0402.0	0402.0	1.0	50.0			
	200	HIRA	8	S	0402.0	0402.0	1.0	15.0			0
	410	LEAR	8	S	0402.0	0402.0	U	280.0			QL=4 ST=2 TYP=3
	2840	PEKG	3	S	0723.0	0730.0	25.0	214.7			
	9100	GORK	3	S	0726.3	0729.8U	16.5	500.0U			
	2950	GORK	4	S/F	0726.4	0730.1	11.1	260.0			
	2950	GORK	21	GRF	0726.4	0824.7	141.3	22.0			
	3000	IZMI	45	C	0728.9	0730.0	3.7	221.0			
	8800	LEAR	49	GB	0729.0	0730.0	2.0	550.0			QL=4 ST=3 TYP=6
	2695	LEAR	8	S	0729.0	0730.0	2.0	190.0			QL=4 ST=3 TYP=3
	15400	LEAR	8	S	0729.0	0730.0	2.0	490.0			QL=4 ST=3 TYP=3
	4995	LEAR	4	S/F	0729.0	0730.0	3.0	340.0			QL=4 ST=3 TYP=3
	8800	SVTO	49	GB	0729.0	0730.0	6.0	600.0			QL=4 ST=2 TYP=6
	1415	SVTO	4	S/F	0729.0	0730.0	7.0	120.0			QL=4 ST=2 TYP=3
	2695	SVTO	4	S/F	0729.0	0730.0	3.0	180.0			QL=4 ST=2 TYP=3
	4995	SVTO	4	S/F	0729.0	0730.0	5.0	330.0			QL=4 ST=2 TYP=3
	15400	SVTO	4	S/F	0729.0	0730.0	3.0	430.0			QL=4 ST=2 TYP=3
	204	IZMI	42	SER	0729.3	0733.2	7.1	50.0			
	900	GORK	45	C	0729.8	0731.1	7.5	25.0			
	900	GORK	45	C	0729.8	0732.2		20.0			
	1415	LEAR	8	S	0730.0	0730.0	1.0	120.0			QL=4 ST=3 TYP=3
	600	GORK	7	C	0730.0	0733.3		11.0			
	600	GORK	7	C	0730.0	0730.4	4.8	9.5			
	127	TORN	49	GB	0731.0	0732.0	11.7	570.0	90.0		
	245	SVTO	8	S	0732.0	0732.0	U	27.0			QL=4 ST=2 TYP=3
	2950	GORK	1	S	0740.8	0741.0	0.5	3.6			
	9500	CUBA	2	S/F	1437.0	1441.3	6.9	31.0	15.0		
	9500	CUBA	21	GRF	1512.0U	1611.0	105.0D	212.0	106.0		
	9500	CUBA	2	S/F	1523.0	1524.5	3.0	11.0	5.0		

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

NOVEMBER 2002

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
11	2800	PENT	29	PBI	1559.0	1611.0	87.0	232.0			
	1415	SGMR	4	S/F	1605.0	1606.0	9.0	73.0			QL=4 ST=2 TYP=3
	4995	SGMR	48	C	1605.0	1607.0	14.0	230.0			QL=4 ST=2 TYP=8
	2695	SGMR	4	S/F	1605.0	1611.0	13.0	230.0			QL=4 ST=2 TYP=3
	8800	SGMR	4	S/F	1605.0	1611.0	13.0	120.0			QL=4 ST=2 TYP=3
	9500	CUBA	4	S/F	1605.2	1611.8	13.8	89.0	44.0		
	245	SGMR	8	S	1606.0	1606.0	U	51.0			QL=4 ST=2 TYP=3
	610	SGMR	8	S	1607.0	1607.0	1.0	130.0			QL=4 ST=2 TYP=3
	15400	SGMR	4	S/F	1607.0	1610.0	6.0	45.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	1610.0	1610.0	1.0	41.0			QL=4 ST=2 TYP=3
	2800	PENT	1	S	1845.0	1850.0	10.0	5.0			
	2800	PENT	40	F	2229.0	2322.0	55.0U	30.0			
12	235	CUBA	44	NS	1305.0E		525.0D		6.0		
	280	CUBA	44	NS	1305.0E		525.0D		13.0		
	500	HIRA	7	C	0353.0	0400.0	13.0	30.0			0
	2840	PEKG	20	GRF	0353.0	0401.7	17.0	14.6			
	200	HIRA	3	S	0355.0	0400.0	14.0	490.0			0
	245	LEAR	49	GB	0356.0	0400.0	7.0	1000.0			QL=4 ST=2 TYP=6
	410	LEAR	49	GB	0356.0	0358.0	4.0	780.0			QL=4 ST=2 TYP=6
	245	LEAR	8	S	0707.0	0707.0	U	97.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0707.0	0707.0	U	65.0			QL=4 ST=2 TYP=3
	2950	GORK	1	S	0707.2	0707.6	1.0	4.9			
	2840	PEKG	3	S	0741.0	0745.9	15.0	14.2			
	2950	GORK	1	S	0744.6	0746.1	4.2	14.0			
	9100	GORK	1	S	0745.2	0746.2	7.2	11.0			
	600	GORK	1	S	0937.4	0938.8	2.2	3.8			
	600	GORK	45	C	0946.1	0946.3	1.1	32.0			
	600	GORK	45	C	0946.1	0946.6		40.0			
	900	GORK	7	C	0946.2	0946.3	0.4	5.9			
	900	GORK	7	C	0946.2	0946.5		7.4			
	245	LEAR	8	S	1000.0	1000.0	U	85.0			QL=4 ST=2 TYP=3
	9100	GORK	7	C	1047.1	1048.1		14.0			
	9100	GORK	7	C	1047.1	1047.7	2.8	16.0			
	2950	GORK	1	S	1047.3	1048.0	5.0	4.9			
	245	SGMR	8	S	1517.0	1517.0	U	89.0			QL=4 ST=3 TYP=3
	9500	CUBA	2	S/F	1813.8	1814.7	3.2	39.0	19.0		
	4995	PALE	8	S	1814.0	1814.0	U	41.0			QL=4 ST=2 TYP=3
	4995	SGMR	8	S	1814.0	1814.0	2.0	61.0			QL=4 ST=2 TYP=3
	8800	SGMR	8	S	1814.0	1814.0	2.0	53.0			QL=4 ST=2 TYP=3
	2800	PENT	29	PBI	1837.0	1853.0	55.0U	39.0			
	9500	CUBA	4	S/F	1848.2	1854.8	9.8	29.0			
	4995	PALE	4	S/F	1853.0	1853.0	3.0	55.0			QL=4 ST=2 TYP=3
	8800	PALE	4	S/F	1853.0	1855.0	3.0	63.0			QL=4 ST=2 TYP=3
	2695	SGMR	46	C	1853.0	1853.0	U	33.0			QL=4 ST=2 TYP=8
	4995	SGMR	48	C	1853.0	1853.0	2.0	58.0			QL=4 ST=2 TYP=8
	8800	SGMR	48	C	1853.0	1854.0	3.0	58.0			QL=4 ST=2 TYP=8
	245	PALE	8	S	1900.0	1901.0	2.0	200.0			QL=2 ST=2 TYP=3
	410	PALE	8	S	1900.0	1901.0	2.0	68.0			QL=4 ST=2 TYP=3
13	235	CUBA	44	NS	1400.0E		240.0D		6.0		
	280	CUBA	44	NS	1400.0E		240.0D		12.0		
	245	LEAR	43	NS	2350.0	0051.0	10.0	79.0			QL=4 ST=1 TYP=1
	245	LEAR	43	NS	2350.0	0132.0	10.0	120.0			QL=4 ST=1 TYP=1
	600	GORK	4	S/F	0642.7	0643.0	0.8	20.0			
	204	IZMI	7	C	0817.9	0817.9	0.2	13.0			
	600	GORK	41	F	0912.0	0912.3	2.4	3.0			
	600	GORK	41	F	0912.0	0913.7		14.0			
	600	GORK	46	C	0933.5	0933.7	0.7	17.0			
	600	GORK	46	C	0933.5	0933.9		30.0			
	2950	GORK	20	GRF	0953.0	1007.9	46.0	10.0			
	245	SGMR	8	S	1154.0	1154.0	U	60.0			QL=4 ST=2 TYP=3
	204	IZMI	41	F	1154.6	1154.6	0.3	16.0			
	4995	SGMR	8	S	1437.0	1437.0	U	68.0			QL=4 ST=2 TYP=3
	8800	SGMR	8	S	1437.0	1437.0	U	55.0			QL=4 ST=2 TYP=3
	9500	CUBA	1	S	1437.0	1437.9	1.8	42.0	21.0		
	245	SGMR	8	S	1648.0	1648.0	1.0	100.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1653.0	1653.0	U	79.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1656.0	1656.0	U	58.0			QL=4 ST=2 TYP=3

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

NOVEMBER 2002

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
13	245	SGMR	8	S	1710.0	1710.0	U	72.0			QL=4 ST=2 TYP=3
	2800	PENT	1	S	1833.0	1836.0	6.0	3.0			
	245	SGMR	8	S	1838.0	1838.0	U	58.0			QL=4 ST=2 TYP=3
14	204	IZMI	43	NS	0700.0		300.0D		15.0		
	127	TORN	44	NS	0700.0E		450.0D		40.0		V=1
	235	CUBA	44	NS	1305.0E		415.0D		9.0		
	280	CUBA	44	NS	1305.0E		415.0D		20.0		
	245	SGMR	43	NS	1505.0	1505.0	62.0	65.0			QL=4 ST=2 TYP=1
	245	LEAR	43	NS	2350.0	0132.0	462.0	120.0			QL=4 ST=2 TYP=1
	2840	PEKG	1	S	0137.0	0139.5	6.0	4.3			
	245	SVTO	8	S	0731.0	0731.0	1.0	120.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	0731.0	0731.0	U	52.0			QL=4 ST=2 TYP=3
	1415	SVTO	8	S	1109.0	1109.0	U	33.0			QL=4 ST=2 TYP=3
	2695	SVTO	8	S	1109.0	1109.0	U	51.0			QL=4 ST=2 TYP=3
	4995	SVTO	8	S	1109.0	1109.0	U	23.0			QL=4 ST=2 TYP=3
	3000	IZMI	7	C	1109.4	1109.7	0.7	54.0			
	245	SVTO	49	GB	1339.0	1343.0	5.0	530.0			QL=4 ST=2 TYP=6
	410	SGMR	48	C	1342.0	1344.0	2.0	150.0			QL=4 ST=2 TYP=8
	410	SVTO	48	C	1342.0	1344.0	2.0	130.0			QL=4 ST=2 TYP=8
	245	SGMR	49	GB	1344.0	1344.0	U	1400.0			QL=4 ST=2 TYP=6
	245	SGMR	8	S	1414.0	1414.0	U	50.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1503.0	1503.0	U	68.0			QL=4 ST=2 TYP=3
	500	HIRA	8	S	2223.0	2224.0	2.0	335.0			0
	2800	HIRA	8	S	2224.0	2224.0	1.0	40.0			0
	4995	LEAR	8	S	2224.0	2224.0	U	52.0			QL=4 ST=2 TYP=3
	8800	LEAR	8	S	2224.0	2224.0	U	66.0			QL=4 ST=2 TYP=3
15	204	IZMI	44	NS	0700.0E		300.0D		20.0		
	127	TORN	44	NS	0700.0E		450.0D		70.0		V=2
	235	CUBA	44	NS	1340.0E		260.0D		11.0		
	280	CUBA	44	NS	1340.0E		260.0D		15.0		
	500	HIRA	7	C	0112.0	0128.0	45.0	80.0			0
	2840	PEKG	1	S	0149.0	0153.7	10.0	5.9			
	2840	PEKG	1	S	0553.0	0556.1	7.0	8.0			
	245	LEAR	8	S	0726.0	0726.0	U	52.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1206.0	1208.0	2.0	72.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1211.0	1212.0	1.0	60.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1216.0	1216.0	U	56.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1711.0	1711.0	U	160.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1856.0	1856.0	U	90.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	2009.0	2009.0	1.0	51.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	2156.0	2156.0	U	60.0			QL=4 ST=2 TYP=3
	610	PALE	8	S	2157.0	2157.0	U	49.0			QL=4 ST=2 TYP=3
16	204	IZMI	44	NS	0700.0E		300.0D		25.0		
	127	TORN	44	NS	0700.0E		450.0D		20.0		V=1
	245	SGMR	43	NS	1158.0	1222.0	522.0	530.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1410.0E		460.0D		23.0		
	280	CUBA	44	NS	1410.0E		460.0D		34.0		
	245	PALE	43	NS	1722.0	1739.0	398.0	100.0			QL=4 ST=1 TYP=1
	245	LEAR	43	NS	2212.0	0705.0	713.0	540.0			QL=4 ST=2 TYP=1
	900	GORK	1	S	0633.6	0635.2	4.8	2.2			
	600	GORK	20	GRF	0633.7	0639.2	14.0	4.8			
	245	LEAR	8	S	0832.0	0832.0	U	72.0			QL=4 ST=2 TYP=3
	204	IZMI	41	F	0955.7	0955.8	0.3	40.0			
	15400	SVTO	8	S	1059.0	1100.0	2.0	110.0			QL=4 ST=2 TYP=3
	2695	SGMR	8	S	1357.0	1358.0	1.0	62.0			QL=4 ST=2 TYP=3
	4995	SGMR	8	S	1357.0	1358.0	1.0	100.0			QL=4 ST=2 TYP=3
	8800	SGMR	8	S	1357.0	1358.0	1.0	64.0			QL=4 ST=2 TYP=3
	33	UPIC	45	C	1423.0	1423.5	1.5				
	2800	PENT	1	S	1708.0	1715.0	12.0	5.0			
	410	PALE	8	S	1856.0	1856.0	2.0	75.0			QL=4 ST=2 TYP=3
	200	HIRA	8	S	2315.0	2315.0	1.0	110.0			0
17	204	IZMI	44	NS	0700.0E		300.0D		65.0		
	127	TORN	44	NS	0700.0E		450.0D		50.0		V=3
	245	SGMR	43	NS	1621.0	1812.0	254.0	600.0			QL=4 ST=2 TYP=1
	245	PALE	43	NS	1722.0	2108.0	579.0	180.0			QL=4 ST=2 TYP=1

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

NOVEMBER 2002

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
17	410	LEAR	8	S	0251.0	0251.0	1.0	69.0			QL=4 ST=2 TYP=3
	200	HIRA	8	S	0504.0	0504.0	1.0	10.0			0
	200	HIRA	8	S	0539.0	0540.0	1.0	50.0			ML
	500	HIRA	7	C	0540.0	0544.0	10.0	80.0			0
	410	LEAR	48	C	0543.0	0543.0	3.0	120.0			QL=4 ST=2 TYP=8
	900	GORK	1	S	0854.5	0854.8	0.6	3.3			
	900	GORK	41	F	0909.5	0909.6	1.5	3.3			
	900	GORK	41	F	0909.5	0910.6		11.0			
	9100	GORK	1	S	0952.9	0955.0	4.8	15.0			
	2950	GORK	1	S	0954.4	0955.6	3.0	3.5			
	600	GORK	1	S	0954.6	0955.8	2.1	2.9			
	600	GORK	41	F	0957.3	1001.1		5.8			
	600	GORK	41	F	0957.3	0958.8	4.3	6.8			
	600	GORK	41	F	1013.8	1014.1		4.8			
	600	GORK	41	F	1013.8	1013.9	0.4	5.8			
	1415	SVTO	8	S	1445.0	1446.0	1.0	49.0			QL=2 ST=2 TYP=3
	2695	SVTO	8	S	1445.0	1446.0	2.0	80.0			QL=2 ST=2 TYP=3
	4995	SVTO	8	S	1445.0	1446.0	2.0	150.0			QL=2 ST=2 TYP=3
	8800	SVTO	8	S	1445.0	1446.0	2.0	100.0			QL=2 ST=2 TYP=3
	15400	SVTO	8	S	1446.0	1446.0	U	37.0			QL=2 ST=2 TYP=3
	2800	PENT	29	PBI	1646.0	1654.0	41.0	7.0			
	15400	SGMR	49	GB	1733.0	1733.0	387.0	510.0			QL=4 ST=1 TYP=6
	410	SGMR	4	S/F	1733.0	1733.0	387.0	55.0			QL=4 ST=1 TYP=3
	610	SGMR	4	S/F	1733.0	1733.0	387.0	47.0			QL=4 ST=1 TYP=3
	1415	SGMR	4	S/F	1733.0	1733.0	387.0	120.0			QL=4 ST=1 TYP=3
	2695	SGMR	4	S/F	1733.0	1733.0	387.0	170.0			QL=4 ST=1 TYP=3
	4995	SGMR	4	S/F	1733.0	1733.0	387.0	220.0			QL=4 ST=1 TYP=3
	8800	SGMR	4	S/F	1733.0	1733.0	387.0	310.0			QL=4 ST=1 TYP=3
	2800	PENT	20	GRF	2036.0	2049.0	29.0	4.0			
	245	PALE	49	GB	2134.0	2135.0	1.0	970.0			QL=4 ST=2 TYP=6
	410	PALE	8	S	2134.0	2134.0	2.0	68.0			QL=4 ST=2 TYP=3
	610	PALE	8	S	2134.0	2135.0	2.0	240.0			QL=4 ST=2 TYP=3
	4995	PALE	8	S	2134.0	2134.0	1.0	47.0			QL=4 ST=2 TYP=3
	8800	PALE	4	S/F	2134.0	2135.0	3.0	180.0			QL=4 ST=2 TYP=3
	15400	PALE	4	S/F	2134.0	2135.0	3.0	210.0			QL=4 ST=2 TYP=3
18	127	TORN	43	NS	0730.0		190.0		10.0		V=1
	204	IZMI	43	NS	0820.0		220.0D		15.0		
	245	SVTO	43	NS	0824.0	0855.0	42.0	180.0			QL=4 ST=2 TYP=1
	245	SVTO	43	NS	1152.0	1208.0	39.0	110.0			QL=4 ST=2 TYP=1
	245	SGMR	43	NS	1203.0	1306.0	255.0	310.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1500.0E		240.0D		6.0		
	280	CUBA	44	NS	1500.0E		240.0D		20.0		
	245	PALE	43	NS	1727.0	1729.0	605.0	310.0			QL=4 ST=2 TYP=1
	245	SGMR	43	NS	1756.0	1756.0	154.0	75.0			QL=4 ST=2 TYP=1
	2695	PALE	8	S	0022.0	0023.0	1.0	58.0			QL=4 ST=2 TYP=3
	4995	PALE	8	S	0022.0	0023.0	1.0	74.0			QL=4 ST=2 TYP=3
	2840	PEKG	5	S	0022.0	0023.8	9.0	64.9			
	410	LEAR	8	S	0023.0	0023.0	U	83.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	0023.0	0023.0	U	120.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	0023.0	0023.0	U	76.0			QL=4 ST=2 TYP=3
	8800	PALE	8	S	0023.0	0023.0	U	43.0			QL=4 ST=2 TYP=3
	2840	PEKG	3	S	0200.0	0205.5	17.0	222.3			
	2800	HIRA	3	S	0202.0	0206.0	8.0	170.0			0
	610	LEAR	49	GB	0203.0	0208.0	7.0	1300.0			QL=4 ST=2 TYP=6
	4995	LEAR	4	S/F	0203.0	0205.0	6.0	320.0			QL=4 ST=2 TYP=3
	610	PALE	49	GB	0203.0	0208.0	6.0	850.0			QL=4 ST=2 TYP=6
	2695	PALE	4	S/F	0203.0	0205.0	3.0	140.0			QL=4 ST=2 TYP=3
	4995	PALE	4	S/F	0203.0	0205.0	5.0	340.0			QL=4 ST=2 TYP=3
	500	HIRA	47	GB	0203.0	0208.0	10.0	905.0			0
	200	HIRA	8	S	0204.0	0205.0	3.0	450.0			0
	410	LEAR	48	C	0204.0	0209.0	6.0	210.0			QL=4 ST=3 TYP=8
	8800	LEAR	48	C	0204.0	0205.0	5.0	210.0			QL=4 ST=2 TYP=8
	245	LEAR	49	GB	0204.0	0205.0	1.0	1000.0			QL=4 ST=2 TYP=6
	1415	LEAR	8	S	0204.0	0205.0	2.0	92.0			QL=4 ST=2 TYP=3
	2695	LEAR	8	S	0204.0	0205.0	2.0	160.0			QL=4 ST=2 TYP=3
	410	PALE	48	C	0204.0	0208.0	6.0	190.0			QL=4 ST=2 TYP=8
	8800	PALE	48	C	0204.0	0205.0	4.0	190.0			QL=4 ST=2 TYP=8
	245	PALE	49	GB	0204.0	0204.0	1.0	960.0			QL=4 ST=2 TYP=6

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

NOVEMBER 2002

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
18	1415	PALE	8	S	0204.0	0204.0	1.0	74.0			QL=4 ST=2 TYP=3
	15400	PALE	4	S/F	0204.0	0206.0	4.0	100.0			QL=4 ST=2 TYP=3
	15400	LEAR	4	S/F	0205.0	0206.0	4.0	120.0			QL=4 ST=2 TYP=3
	610	LEAR	8	S	0226.0	0226.0	U	69.0			QL=4 ST=2 TYP=3
	410	LEAR	8	S	0345.0	0345.0	U	80.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	0608.0	0608.0	U	100.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0702.0	0702.0	U	70.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0702.0	0702.0	U	71.0			QL=4 ST=2 TYP=3
	610	LEAR	8	S	0708.0	0708.0	1.0	64.0			QL=4 ST=2 TYP=3
	610	SVTO	4	S/F	0708.0	0709.0	3.0	67.0			QL=4 ST=2 TYP=3
	600	GORK	41	F	0708.7	0708.8	1.1	100.0			
	600	GORK	41	F	0708.7	0709.8		130.0			
	410	LEAR	8	S	0709.0	0709.0	U	230.0			QL=4 ST=2 TYP=3
	410	SVTO	49	GB	0709.0	0709.0	U	630.0			QL=4 ST=2 TYP=6
	900	GORK	41	F	0709.4	0709.8	2.7	16.0			
	900	GORK	41	F	0709.4	0710.8		6.1			
	245	SVTO	8	S	0715.0	0715.0	U	51.0			QL=4 ST=2 TYP=3
	900	GORK	2	S/F	0715.5	0716.0	1.6	4.9			
	245	LEAR	8	S	0810.0	0810.0	U	54.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0959.0	1001.0	2.0	130.0			QL=2 ST=2 TYP=3
	245	SVTO	8	S	1000.0	1000.0	U	56.0			QL=4 ST=2 TYP=3
	410	LEAR	8	S	1001.0	1001.0	U	59.0			QL=2 ST=2 TYP=3
	900	GORK	8	S	1001.9	1002.0	0.2	22.0			
	245	SVTO	8	S	1048.0	1048.0	U	77.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1152.0	1152.0	1.0	56.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1200.0	1200.0	U	120.0			QL=4 ST=2 TYP=3
	9500	CUBA	1	S	1614.8	1615.4	1.3	27.0	13.0		
	2800	PENT	29	PBI	1649.0	1656.0	43.0U	24.0			
	410	SGMR	8	S	1654.0	1654.0	U	37.0			QL=4 ST=2 TYP=3
	610	SGMR	8	S	1654.0	1654.0	1.0	95.0			QL=4 ST=2 TYP=3
	1415	SGMR	8	S	1654.0	1655.0	1.0	31.0			QL=4 ST=2 TYP=3
	4995	SGMR	8	S	1654.0	1655.0	1.0	45.0			QL=4 ST=2 TYP=3
	8800	SGMR	8	S	1654.0	1654.0	1.0	100.0			QL=4 ST=2 TYP=3
	15400	SGMR	8	S	1654.0	1654.0	1.0	54.0			QL=4 ST=2 TYP=3
	2695	SGMR	8	S	1655.0	1655.0	U	27.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1708.0	1708.0	U	64.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1711.0	1711.0	1.0	100.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	1854.0	1854.0	U	59.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	2030.0	2030.0	U	88.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	2201.0	2201.0	1.0	74.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	2253.0	2253.0	U	58.0			QL=4 ST=2 TYP=3
19	204	IZMI	43	NS	0916.0		164.0D		20.0		
	245	SGMR	43	NS	1326.0	1411.0	294.0	410.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1330.0E		270.0D		8.0		
	280	CUBA	44	NS	1330.0E		270.0D		11.0		
	245	SVTO	43	NS	1404.0	1411.0	62.0	150.0			QL=4 ST=2 TYP=1
	410	PALE	43	NS	2122.0	2153.0	158.0	570.0			QL=4 ST=1 TYP=1
	245	PALE	43	NS	2341.0	2342.0	189.0	70.0			QL=4 ST=2 TYP=1
	245	SGMR	8	S	1236.0	1236.0	U	79.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1240.0	1240.0	U	56.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1332.0	1332.0	2.0	170.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1332.0	1332.0	U	77.0			QL=4 ST=2 TYP=3
	2800	PENT	20	GRF	1644.0	1701.0	34.0	3.0			
	2800	PENT	20	GRF	2042.0	2103.0	43.0	5.0			
20	245	LEAR	43	NS	0009.0	0025.0	131.0	230.0			QL=4 ST=2 TYP=1
	245	PALE	43	NS	0022.0	0025.0	103.0	320.0			QL=4 ST=2 TYP=1
	245	LEAR	43	NS	0556.0	0605.0	61.0	170.0			QL=4 ST=2 TYP=1
	204	IZMI	44	NS	0600.0E		300.0D		20.0		
	245	SVTO	44	NS	0603.0E	0633.0U	30.0D	64.0			QL=2 ST=2 TYP=1
	127	TORN	43	NS	0730.0		160.0		12.0		V=2
	245	LEAR	43	NS	0913.0	0951.0	50.0	270.0			QL=4 ST=2 TYP=1
	245	SVTO	43	NS	0927.0	1059.0	100.0	260.0			QL=4 ST=2 TYP=1
	245	SGMR	43	NS	1216.0	1556.0	283.0	340.0			QL=4 ST=3 TYP=1
	245	SVTO	43	NS	1234.0	1255.0	59.0	84.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1320.0E		280.0D		8.0		
	280	CUBA	44	NS	1320.0E		280.0D		13.0		
	410	LEAR	8	S	0028.0	0028.0	U	73.0			QL=4 ST=2 TYP=3

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

NOVEMBER 2002

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
20	2840	PEKG	5	S	0304.0	0308.1	8.0	16.1			
	200	HIRA	8	S	0308.0	0308.0	1.0	90.0			0
	410	LEAR	8	S	0308.0	0308.0	U	130.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0440.0	0441.0	1.0	71.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0447.0	0447.0	U	82.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0606.0	0607.0	2.0	390.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0606.0	0607.0	2.0	180.0			QL=2 ST=2 TYP=3
	204	IZMI	42	SER	0732.2	0732.7	1.4	37.0			
	245	LEAR	8	S	0742.0	0742.0	U	210.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0742.0	0742.0	U	190.0			QL=4 ST=2 TYP=3
	204	IZMI	41	F	0742.4	0742.6	0.5	38.0			
	245	SVTO	8	S	0754.0	0754.0	U	53.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	0754.0	0754.0	U	23.0			QL=4 ST=2 TYP=3
	2840	PEKG	20	GRF	0811.0	0815.4	21.0	4.0			
	245	LEAR	8	S	0847.0	0847.0	U	81.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0847.0	0847.0	U	52.0			QL=4 ST=2 TYP=3
	245	SVTO	4	S/F	0850.0	0851.0	4.0	150.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0851.0	0851.0	1.0	150.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0913.0	0913.0	1.0	84.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0924.0	0924.0	U	57.0			QL=4 ST=2 TYP=3
	204	IZMI	7	C	1030.1	1030.3	0.3	13.0			
	204	IZMI	42	SER	1058.2	1059.6	2.3	301.0			
	204	IZMI	7	C	1117.4	1117.4	0.1	14.0			
	204	IZMI	42	SER	1119.9	1121.2	2.4	38.0			
	245	SVTO	8	S	1201.0	1201.0	U	92.0			QL=2 ST=2 TYP=3
	245	SGMR	48	C	1210.0	1211.0	3.0	450.0			QL=4 ST=2 TYP=8
	245	SVTO	48	C	1210.0	1211.0	3.0	300.0			QL=2 ST=2 TYP=8
	245	SVTO	8	S	1419.0	1419.0	U	59.0			QL=2 ST=2 TYP=3
	245	SVTO	8	S	1451.0	1451.0	U	92.0			QL=2 ST=2 TYP=3
	2800	PENT	1	S	1659.0	1703.0	9.0	3.0			
	9500	CUBA	21	GRF	1801.0	1808.0	40.0	17.0	8.0		
	9500	CUBA	2	S/F	1805.0	1806.9	3.3	33.0	16.0		
	245	SGMR	8	S	1814.0	1814.0	U	59.0			QL=4 ST=2 TYP=3
	2800	PENT	8	S	1839.0	1842.0	6.0	24.0			
	245	SGMR	8	S	1854.0	1854.0	U	110.0			QL=4 ST=2 TYP=3
	2800	PENT	20	GRF	2109.0	2118.0	18.0	5.0			
	2840	PEKG	3	S	2352.0	2356.1	11.0	12.0			
21	235	CUBA	44	NS	1320.0E		400.0D		6.0		
	280	CUBA	44	NS	1320.0E		400.0D		13.0		
	245	SGMR	43	NS	1532.0	1545.0	25.0	250.0			QL=4 ST=2 TYP=1
	200	HIRA	8	S	0139.0	0139.0	1.0	35.0			
	2840	PEKG	3	S	0636.0	0638.2	21.0	24.5			
	600	GORK	46	C	0823.1	0824.1		8.7			
	600	GORK	46	C	0823.1	0823.5	1.3	2.9			
	204	IZMI	45	C	1143.5	1143.6	0.3	140.0			
	33	UPIC	45	C	1148.0	1148.5	1.5				
	1415	SGMR	8	S	1243.0	1243.0	U	65.0			QL=4 ST=2 TYP=3
	1415	SVTO	8	S	1243.0	1243.0	U	70.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1409.0	1410.0	1.0	190.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1410.0	1410.0	2.0	87.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1519.0	1519.0	1.0	92.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1529.0	1529.0	U	150.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1649.0	1649.0	1.0	75.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1655.0	1656.0	2.0	110.0			QL=4 ST=2 TYP=3
	2800	PENT	29	PBI	1853.0	1901.0	39.0U	8.0			
	410	PALE	8	S	2025.0	2025.0	U	62.0			QL=4 ST=2 TYP=3
	2800	PENT	20	GRF	2112.0	2124.0	18.0	4.0			
22	235	CUBA	44	NS	1315.0E		330.0D		6.0		
	280	CUBA	44	NS	1315.0E		330.0D		15.0		
	200	HIRA	8	S	0030.0	0030.0	1.0	20.0			0
	2840	PEKG	20	GRF	0212.0	0216.5	13.5	4.3			
	900	GORK	46	C	0916.0	0916.2	1.0	13.0			
	900	GORK	46	C	0916.0	0916.4		27.0			
	900	GORK	41	F	1027.4	1028.2		140.0			
	900	GORK	41	F	1027.4	1027.8	1.1	10.0			
	600	GORK	2	S/F	1028.4	1028.7	1.4	12.0			
	204	IZMI	42	SER	1047.2	1047.7	1.3	23.0			

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

NOVEMBER 2002

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
22	245	SGMR	8	S	1547.0	1547.0	U	180.0			QL=4 ST=2 TYP=3
	245	SGMR	48	C	1557.0	1557.0	3.0	170.0			QL=4 ST=2 TYP=8
	245	SGMR	8	S	1602.0	1602.0	U	71.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1939.0	1940.0	1.0	460.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1943.0	1943.0	U	240.0			QL=4 ST=2 TYP=3
23	204	IZMI	43	NS	1122.0		38.0D		25.0		
	245	SGMR	43	NS	1300.0	1300.0	U	52.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1335.0E		265.0D		6.0		
	280	CUBA	44	NS	1335.0E		265.0D		12.0		
	245	SGMR	43	NS	1519.0	1519.0	7.0	190.0			QL=4 ST=2 TYP=1
	245	PALE	43	NS	2323.0	0237.0	248.0	290.0			QL=4 ST=2 TYP=1
	2840	PEKG	1	S	0119.0	0121.8	5.0	7.3			
	500	HIRA	8	S	0121.0	0121.0	1.0	10.0			0
	2800	HIRA	1	S	0123.0	0129.0	6.0	25.0			0
	2840	PEKG	45	C	0127.0	0128.9	6.0	21.9			
	200	HIRA	8	S	0131.0	0131.0	1.0	30.0			0
	200	HIRA	8	S	0309.0	0309.0	1.0	30.0			0
	200	HIRA	8	S	0529.0	0529.0	1.0	45.0			0
	200	HIRA	8	S	0623.0	0623.0	1.0	20.0			0
	2840	PEKG	1	S	0712.0	0714.3	7.0	2.4			
	600	GORK	4	S/F	0717.9	0718.1	0.7	21.0			
	2840	PEKG	1	S	0756.0	0757.5	6.0	6.0			
	600	GORK	46	C	0800.7	0801.0		73.0			
	600	GORK	46	C	0800.7	0800.8	0.5	40.0			
	2950	GORK	2	S/F	0826.3	0826.8	2.4	3.8			
	2950	GORK	45	C	0840.8	0842.0	2.2	22.0			
	2950	GORK	45	C	0840.8	0842.2		18.0			
	610	SVTO	8	S	0841.0	0841.0	U	260.0			QL=4 ST=2 TYP=3
	600	GORK	46	C	0841.6	0841.8	1.5	150.0U			
	900	GORK	46	C	0841.8	0842.0	3.2	54.0			
	3000	IZMI	5	S	0841.8	0842.0	0.6	20.0	13.7		
	900	GORK	46	C	0841.8	0842.2		30.0			
	900	GORK	46	C	0841.8	0842.4		10.0			
	410	SVTO	8	S	0842.0	0842.0	U	27.0			QL=4 ST=2 TYP=3
	1415	SVTO	8	S	0842.0	0842.0	U	30.0			QL=4 ST=2 TYP=3
	2950	GORK	29	PBI	0843.0	0843.0	2.9	3.8			
	204	IZMI	41	F	0848.0	0848.2	0.3	12.0			
	900	GORK	42	SER	0950.0	0953.2	46.2	13.0			
	900	GORK	42	SER	0950.0	0954.8		22.0			
	600	GORK	41	F	0958.9	1000.1	5.8	2.9			
	600	GORK	41	F	0958.9	1002.8		2.9			
	2950	GORK	2	S/F	0959.6	1000.0	0.7	26.0			
	245	SVTO	49	GB	1000.0	1000.0	U	1000.0			QL=4 ST=2 TYP=6
	410	SVTO	8	S	1000.0	1000.0	U	150.0			QL=4 ST=2 TYP=3
	3000	IZMI	1	S	1000.0	1000.1	0.2	11.0			
	204	IZMI	7	C	1000.1	1000.2	0.3	45.0			
	204	IZMI	7	C	1022.3	1022.3	0.2	16.0			
	204	IZMI	42	SER	1029.3	1031.5	5.2	52.0			
	610	SVTO	8	S	1049.0	1049.0	2.0	100.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1258.0	1258.0	U	100.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	1258.0	1258.0	U	38.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1317.0	1317.0	U	86.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	1317.0	1317.0	U	41.0			QL=4 ST=2 TYP=3
	245	SVTO	4	S/F	1332.0	1333.0	3.0	210.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	1333.0	1333.0	2.0	56.0			QL=4 ST=2 TYP=3
	1415	SGMR	8	S	1355.0	1356.0	2.0	100.0			QL=4 ST=2 TYP=3
	1415	SVTO	4	S/F	1355.0	1356.0	4.0	100.0			QL=4 ST=2 TYP=3
	1415	SGMR	8	S	1358.0	1358.0	1.0	85.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1514.0	1514.0	U	61.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1908.0	1908.0	U	51.0			QL=4 ST=2 TYP=3
	2800	PENT	21	GRF	2049.0	2104.0	43.0U	4.0			
24	245	SVTO	43	NS	0607.0	0640.0U	74.0	160.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1400.0E		270.0D		10.0		
	280	CUBA	44	NS	1400.0E		270.0D		22.0		
	245	SGMR	43	NS	1436.0	1528.0	311.0	240.0			QL=4 ST=2 TYP=1
	245	SVTO	43	NS	1441.0	1458.0	22.0	96.0			QL=2 ST=2 TYP=1
	2840	PEKG	1	S	0220.0	0222.1	6.0	6.0			

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

NOVEMBER 2002

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
24	410	SVTO	8	S	0617.0	0619.0	2.0	70.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0653.0	0653.0	U	330.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	0653.0	0653.0	2.0	110.0			QL=4 ST=2 TYP=3
	245	SVTO	48	C	0710.0	0710.0	2.0	190.0			QL=4 ST=2 TYP=8
	410	SVTO	8	S	0710.0	0710.0	1.0	120.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0732.0	0732.0	U	100.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0744.0	0744.0	2.0	130.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	0744.0	0744.0	U	44.0			QL=4 ST=2 TYP=3
	245	SVTO	4	S/F	0816.0	0822.0	9.0	88.0			QL=4 ST=2 TYP=3
	900	GORK	41	F	0817.1	0818.0	1.6	2.2			
	900	GORK	41	F	0817.1	0818.5		5.6			
	600	GORK	2	S/F	0817.6	0817.8	0.4	7.7			
	245	SVTO	8	S	0832.0	0832.0	1.0	190.0			QL=4 ST=2 TYP=3
	245	SVTO	49	GB	0835.0	0836.0	2.0	1000.0			QL=4 ST=2 TYP=6
	410	SVTO	8	S	0836.0	0836.0	U	97.0			QL=4 ST=2 TYP=3
	204	IZMI	7	C	0842.4	0842.5	0.2	6.0			
	245	SVTO	8	S	0847.0	0847.0	U	56.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0855.0	0855.0	U	150.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	0855.0	0855.0	U	67.0			QL=4 ST=2 TYP=3
	204	IZMI	7	C	0903.6	0903.6	0.1	6.0			
	204	IZMI	41	F	0927.6	0927.7	0.3	24.0			
	245	SGMR	48	C	1332.0	1333.0	1.0	92.0			QL=4 ST=2 TYP=8
	245	SGMR	8	S	1336.0	1336.0	1.0	74.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1338.0	1338.0	2.0	150.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1338.0	1338.0	U	92.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1432.0	1432.0	1.0	130.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1432.0	1432.0	U	95.0			QL=4 ST=2 TYP=3
	2800	PENT	29	PBI	1718.0	1727.0	14.0U	32.0			
	245	PALE	8	S	1756.0	1756.0	2.0	99.0			QL=4 ST=2 TYP=3
	2800	PENT	20	GRF	1859.0	1908.0	17.0	5.0			
25	204	IZMI	43	NS	0818.0		222.0D		60.0		
	245	LEAR	43	NS	0823.0	0824.0	1.0	100.0			QL=4 ST=3 TYP=1
	245	SVTO	43	NS	0840.0	0858.0	110.0	110.0			QL=4 ST=2 TYP=1
	245	LEAR	43	NS	0858.0	0858.0	69.0	150.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1320.0E		220.0D		7.0		
	280	CUBA	44	NS	1320.0E		220.0D		20.0		
	245	SGMR	43	NS	1331.0	1334.0	31.0	130.0			QL=4 ST=2 TYP=1
	245	SGMR	43	NS	1942.0	1954.0	29.0	80.0			QL=4 ST=2 TYP=1
	2840	PEKG	20	GRF	0603.0	0608.3	15.0	5.1			
	245	LEAR	8	S	0804.0	0804.0	U	51.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0812.0	0812.0	U	57.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0819.0	0819.0	U	71.0			QL=4 ST=2 TYP=3
	245	SVTO	48	C	0819.0	0821.0	6.0	810.0			QL=4 ST=2 TYP=8
	410	SVTO	8	S	0819.0	0821.0	2.0	150.0			QL=4 ST=2 TYP=3
	610	SVTO	8	S	0820.0	0821.0	1.0	37.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	0827.0	0827.0	U	71.0			QL=4 ST=2 TYP=3
	2950	GORK	20	GRF	0948.6	1032.3	66.2	6.5			
	9100	GORK	8	S	1003.8	1004.0	0.4	69.0			
	600	GORK	28	PRE	1018.7	1038.4	20.6	18.0			
	9100	GORK	2	S/F	1019.3	1019.8	1.0	24.0			
	204	IZMI	45	C	1019.3	1019.8	0.9	69.0			
	600	GORK	46	C	1039.3	1046.2	20.7D	100.0			
	600	GORK	46	C	1039.3	1056.9		37.0			
	9100	GORK	20	GRF	1041.6	1042.1	9.9	12.0			
	204	IZMI	46	C	1041.7	1042.2	0.8	1102.0			
	3000	IZMI	7	C	1041.8	1041.9	0.4	15.0	5.6		
	245	SGMR	48	C	1237.0	1237.0	4.0	110.0			QL=4 ST=2 TYP=8
	245	SGMR	8	S	1258.0	1258.0	U	56.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1327.0	1327.0	U	53.0			QL=4 ST=2 TYP=3
	2800	PENT	20	GRF	1617.0	1624.0	15.0	3.0			
	245	SGMR	8	S	1619.0	1619.0	U	62.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1630.0	1630.0	U	66.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1641.0	1641.0	U	76.0			QL=4 ST=2 TYP=3
	2800	PENT	24	R	1650.0	1703.0	42.0U	4.0			
	245	SGMR	8	S	1706.0	1706.0	U	60.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	1712.0	1713.0	2.0	85.0			QL=4 ST=2 TYP=3
	245	SGMR	48	C	1712.0	1714.0	7.0	150.0			QL=4 ST=2 TYP=8
	410	PALE	8	S	1748.0	1748.0	1.0	61.0			QL=4 ST=2 TYP=3

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

NOVEMBER 2002

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
25	245	PALE	8	S	1750.0	1750.0	U	48.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	1833.0	1833.0	U	51.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1914.0	1914.0	2.0	78.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	1915.0	1915.0	1.0	78.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1935.0	1935.0	U	70.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	1949.0	1950.0	1.0	110.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	1950.0	1950.0	U	81.0			QL=4 ST=2 TYP=3
	2800	PENT	1	S	2228.0	2231.0	7.0	9.0			
26	245	LEAR	43	NS	0333.0	0334.0	50.0	220.0			QL=4 ST=2 TYP=1
	245	LEAR	43	NS	0600.0	0921.0	245.0	160.0			QL=4 ST=2 TYP=1
	245	SVTO	43	NS	0618.0	0917.0	213.0	160.0			QL=4 ST=2 TYP=1
	204	IZMI	44	NS	0700.0E		300.0D		20.0		
	245	SGMR	43	NS	1228.0	1835.0	462.0	210.0			QL=4 ST=2 TYP=1
	245	PALE	43	NS	1930.0	2309.0	420.0	260.0			QL=4 ST=2 TYP=1
	9100	GORK	46	C	0751.8	0752.0		55.0			
	9100	GORK	46	C	0751.8	0751.9	0.5	30.0			
	204	IZMI	7	C	0915.6	0915.7	0.1	9.0			
	204	IZMI	42	SER	0921.4	0921.5	0.4	80.0			
	600	GORK	41	F	0944.2	0946.0		12.0			
	600	GORK	41	F	0944.2	0944.4	2.5	4.1			
	245	SGMR	8	S	1220.0	1220.0	U	58.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	1427.0	1427.0	U	52.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1606.0	1606.0	U	380.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	1650.0	1650.0	U	51.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	1807.0	1807.0	U	60.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	2036.0	2036.0	U	58.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	2044.0	2045.0	1.0	73.0			QL=4 ST=2 TYP=3
	500	HIRA	8	S	2305.0	2305.0	1.0	20.0			0
27	204	IZMI	44	NS	0700.0E		300.0D		25.0		
	127	TORN	43	NS	0750.0		150.0		18.0		V=2
	235	CUBA	44	NS	1320.0E		400.0D		6.0		
	280	CUBA	44	NS	1320.0E		400.0D		16.0		
	245	PALE	43	NS	2144.0	0115.0	347.0	680.0			QL=4 ST=2 TYP=1
	245	LEAR	8	S	0001.0	0001.0	U	72.0			QL=4 ST=2 TYP=3
	245	LEAR	49	GB	0202.0	0202.0	1.0	700.0			QL=4 ST=2 TYP=6
	200	HIRA	47	GB	0203.0	0203.0	1.0	845.0			0
	245	LEAR	8	S	0743.0	0744.0	1.0	85.0			QL=4 ST=2 TYP=3
	245	SVTO	4	S/F	0743.0	0743.0	4.0	58.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0752.0	0752.0	U	58.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1205.0	1205.0	U	110.0			QL=4 ST=2 TYP=3
	245	SVTO	8	S	1218.0	1218.0	U	54.0			QL=4 ST=2 TYP=3
	245	SVTO	4	S/F	1352.0	1354.0	3.0	100.0			QL=4 ST=2 TYP=3
	410	SVTO	8	S	1355.0	1355.0	U	30.0			QL=4 ST=2 TYP=3
	410	SGMR	8	S	1435.0	1435.0	U	58.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1505.0	1505.0	U	110.0			QL=4 ST=3 TYP=3
	2800	PENT	20	GRF	1620.0	1629.0	37.0	5.0			
	245	LEAR	8	S	2200.0	2200.0	1.0	140.0			QL=4 ST=2 TYP=3
28	127	TORN	44	NS	0720.0E		250.0D		20.0		V=2
	204	IZMI	43	NS	0858.0		182.0D		40.0		
	235	CUBA	44	NS	1315.0E		345.0D		5.0		
	280	CUBA	44	NS	1315.0E		345.0D		14.0		
	610	LEAR	4	S/F	0030.0	0031.0	4.0	31.0			QL=4 ST=2 TYP=3
	2840	PEKG	1	S	0030.0	0032.0	5.0	7.9			
	1415	LEAR	8	S	0031.0	0031.0	1.0	30.0			QL=4 ST=2 TYP=3
	410	LEAR	4	S/F	0031.0	0031.0	7.0	44.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	0031.0	0031.0	1.0	70.0			QL=4 ST=2 TYP=3
	500	HIRA	8	S	0257.0	0258.0	1.0	65.0			0
	2840	PEKG	1	S	0433.0	0436.3	7.0	6.4			
	410	LEAR	8	S	0724.0	0724.0	U	79.0			QL=4 ST=2 TYP=3
	2840	PEKG	3	S	0803.0	0806.9	10.0	12.4			
	2840	PEKG	3	S	0820.0	0825.3	6.0	21.0			
	245	LEAR	8	S	0913.0	0913.0	U	54.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	0924.0	0925.0	1.0	57.0			QL=4 ST=2 TYP=3
	245	SVTO	48	C	0924.0	0925.0	8.0	55.0			QL=4 ST=3 TYP=8
	410	SVTO	48	C	0925.0	0926.0	6.0	58.0			QL=4 ST=3 TYP=8
	245	LEAR	8	S	1005.0	1005.0	U	67.0			QL=2 ST=2 TYP=3

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

NOVEMBER 2002

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
28	245	SVTO	8	S	1023.0	1023.0	U	53.0			QL=4 ST=2 TYP=3
29	245	SGMR	43	NS	1223.0	1506.0	163.0	89.0			QL=4 ST=2 TYP=1
	235	CUBA	44	NS	1330.0E		330.0D		3.0		
	280	CUBA	44	NS	1330.0E		330.0D		31.0		
	200	HIRA	8	S	0421.0	0421.0	1.0	20.0			0
	204	IZMI	42	SER	0840.2	0840.2	0.1	7.0			
	245	LEAR	8	S	0952.0	0952.0	U	52.0			QL=4 ST=2 TYP=3
	204	IZMI	42	SER	0952.6	0952.8	0.4	33.0			
	245	LEAR	8	S	1005.0	1005.0	U	140.0			QL=4 ST=2 TYP=3
	410	LEAR	8	S	1005.0	1005.0	U	53.0			QL=4 ST=2 TYP=3
	33	UPIC	46	C	1050.0	1051.5	5.0				UNCERTN
	245	SVTO	8	S	1129.0	1129.0	U	54.0			QL=4 ST=2 TYP=3
	410	PALE	8	S	1845.0	1845.0	U	55.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	1943.0	1943.0	U	74.0			QL=4 ST=2 TYP=3
	245	SGMR	8	S	1943.0	1943.0	U	97.0			QL=4 ST=3 TYP=3
	245	PALE	8	S	2030.0	2030.0	U	56.0			QL=4 ST=2 TYP=3
	245	LEAR	8	S	2323.0	2323.0	U	53.0			QL=4 ST=2 TYP=3
	245	PALE	8	S	2323.0	2323.0	U	120.0			QL=4 ST=2 TYP=3
	200	HIRA	8	S	2324.0	2324.0	1.0	175.0			0
30	204	IZMI	43	NS	0809.0		231.0D		10.0		
	235	CUBA	44	NS	1400.0E		300.0D		4.0		
	280	CUBA	44	NS	1400.0E		300.0D		13.0		
	33	UPIC	42	SER	1040.0	1055.5	34.0				UNCERTN

Reports are received routinely from the following observatories:

BERN = Berne	HUMN = Humain	ONDR = Ondrejov	SVTO = San Vito
CRIM = Crimea	IZMI = IZMIRAN	PEKG = Peking	TORN = Torun
CUBA = Havana	KISV = Kislovodsk	PALE = Palehua	TRST = Trieste
GORK = Gorky	KRAK = Krakow	PENT = Penticton	TYKW = Toyokawa
HIRA = Hiraiso	LEAR = Learmonth	POTS = Potsdam	UPIC = Upice
HUAN = Huancayo	NOBE = Nobeyama	SGMR = Sagamore Hill	

Explanation of Type Code:

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

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

RSTN Site Information: Beginning in April 1986, the RSTN sites LEAR, PALE, SGMR, and SVTO fixed frequency solar radio data are periodically adjusted to several world standard stations. These world standard stations include: Kislovodsk, USSR 15,500 MHz; Penticton, Canada 2800 MHz; and Hiraiso, Japan 500 and 200 MHz.