JOINT USAF/NOAA REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY
SDF NUMBER 079 ISSUED AT 2200Z ON 20 MAR 1993
IA. ANALYSIS OF SOLAR ACTIVE REGIONS AND ACTIVITY FROM 19/2100Z TO 20/2100Z: SOLAR ACTIVITY WAS MODERATE. THE PACE OF FLARE PRODUCTION HAS PICKED UP CONSIDERABLY. REGION 7448 (N17W47) HAS GENERATED SEVERAL FLARES SINCE YESTERDAY. THE LARGEST WAS AN M1/1N AT 20/0106Z. THIS FLARE WAS ASSOCIATED WITH MODERATE TYPE II/IV SWEEPS. MANY OF THE FLARES IN THIS REGION WERE RADIO RICH, WITH DISCRETE BURSTS AND SWEEP ACTIVITY ACROSS THE SPECTRUM. ANOTHER FLARE OF NOTE IN 7448 WAS A C3/SN AT 20/1657Z. THIS FLARE WAS ACCOMPANIED BY A STRONG TYPE II SWEEP. THE REGION HAS SHOWN SOME DECAY OVER THE PAST 24 HOURS. THE SUNSPOT AREA IS REDUCED AND THE DELTA CONFIGURATION IS NO LONGER PRESENT.
IB. SOLAR ACTIVITY FORECAST: SOLAR ACTIVITY IS EXPECTED TO BE LOW TO MODERATE. ADDITIONAL FLARES ARE EXPECTED IN REGION 7448.
IIA. GEOPHYSICAL ACTIVITY SUMMARY FROM 19/2100Z TO 20/2100Z: THE GEOMAGNETIC FIELD WAS QUIET TO ACTIVE. STORM CONDITIONS WERE OBSERVED AT SOME HIGH LATITUDE STATIONS.
IIB. GEOPHYSICAL ACTIVITY FORECAST: THE GEOMAGNETIC FIELD IS EXPECTED TO BE UNSETTLED TO ACTIVE AT MOST LOCATIONS FOR THE NEXT TWO DAYS. STORM CONDITIONS ARE POSSIBLE AT HIGH LATITUDES.
III. EVENT PROBABILITIES 21 MAR-23 MAR
CLASS M 30/20/10
CLASS X 05/01/01
PROTON 01/01/01
PCAF GREEN
IV. PENTICTON 10.7 CM FLUX
OBSERVED 20 MAR 128
PREDICTED 21 MAR-23 MAR 130/125/120
90 DAY MEAN 20 MAR 134
V. GEOMAGNETIC A INDICES
OBSERVED AFR/AP 19 MAR 009/009
ESTIMATED AFR/AP 20 MAR 018/020
PREDICTED AFR/AP 21 MAR-23 MAR 020/030-020/030-010/015
VI. GEOMAGNETIC ACTIVITY PROBABILITIES 21 MAR-23 MAR
A. MIDDLE LATITUDES
ACTIVE 30/30/20
MINOR STORM 20/20/10
MAJOR-SEVERE STORM 10/10/05
B. HIGH LATITUDES
ACTIVE 35/35/20
MINOR STORM 20/20/10
MAJOR-SEVERE STORM 15/15/05