JOINT USAF/NOAA REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY
SDF NUMBER 361 ISSUED AT 2200Z ON 27 DEC 1993
IA. ANALYSIS OF SOLAR ACTIVE REGIONS AND ACTIVITY FROM 26/2100Z TO 27/2100Z: SOLAR ACTIVITY WAS MODERATE. REGION 7640 (N09W23) CONTINUED AS THE FLARE PRODUCER. IT WAS RESPONSIBLE FOR AN M1/SF FLARE AT 27/1836UT AND SIX SMALL C-CLASS FLARES THROUGH THE PERIOD. NEW REGION 7644 (N11W11) WAS NUMBERED AFTER BEING SPLIT OFF THE TRAILER PORTION OF 7640.
IB. SOLAR ACTIVITY FORECAST: SOLAR ACTIVITY IS EXPECTED TO BE LOW TO MODERATE. REGION 7640 HAS THE BEST CHANCE OF PRODUCING ADDITIONAL, OCCASIONAL M-CLASS ACTIVITY AND AN OUTSIDE CHANCE OF AN ISOLATED X-CLASS FLARE. REGION 7644 ALSO HAS A SMALL CHANCE OF AN ISOLATED M-CLASS FLARE.
IIA. GEOPHYSICAL ACTIVITY SUMMARY FROM 26/2100Z TO 27/2100Z: THE GEOMAGNETIC FIELD HAS BEEN AT MOSTLY QUIET LEVELS FOR THE PAST 24 HOURS.
IIB. GEOPHYSICAL ACTIVITY FORECAST: THE GEOMAGNETIC FIELD IS EXPECTED TO BE QUIET TO UNSETTLED FOR THE NEXT 24 HOURS, THEN UNSETTLED TO MINOR STORM FOR THE REMAINDER OF THE FORECAST PERIOD AS A CORONAL HOLE ROTATES INTO A FAVORABLE POSITION.
III. EVENT PROBABILITIES 28 DEC-30 DEC
CLASS M 50/50/50
CLASS X 05/05/05
PROTON 05/05/05
PCAF GREEN
IV. PENTICTON 10.7 CM FLUX
OBSERVED 27 DEC 140
PREDICTED 28 DEC-30 DEC 130/135/135
90 DAY MEAN 27 DEC 099
V. GEOMAGNETIC A INDICES
OBSERVED AFR/AP 26 DEC 006/007
ESTIMATED AFR/AP 27 DEC 007/010
PREDICTED AFR/AP 28 DEC-30 DEC 015/015-025/025-030/030
VI. GEOMAGNETIC ACTIVITY PROBABILITIES 28 DEC-30 DEC
A. MIDDLE LATITUDES
ACTIVE 20/30/25
MINOR STORM 10/25/25
MAJOR-SEVERE STORM 05/05/10
B. HIGH LATITUDES
ACTIVE 25/25/25
MINOR STORM 15/35/35
MAJOR-SEVERE STORM 05/10/15
NOTE: OBSERVED PENTICTON 10.7 CM FLUX APPEARS TO BE FLARE ENHANCED.