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FROM SPACE ENVIRONMENT SERVICES CENTER BOULDER, CO

OF NUMBER 250

JOINT USAF/NOAA PRIMARY REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY

ISSUED 2200Z 19 FEBRUARY 1979

I. SOLAR ACTIVITY HAS BEEN HIGH DURING THE PAST 24 HOURS.

REGION 1574 (N 18W 00) PRODUCED AN M8/1B FLARE WHICH REACHED MAXIMUM AT 1814 UT. THIS EVENT WAS ACCCOMPANIED BY A 130 FLUX UNIT BURST AT 10CM. REGION 1574 HAS DEVELOPED MANY NEW SMALL SPOTS IN ITS TRAILING PORTION AND GROWTH CONTINUES. THIS REGION REMAINS VERY COMPLEX MAGNETICALLY. REGION 1568 (N 18W 29) PRODUCED THE OTHER SIGNIFICANT FLARE OF THE PERIOD - AN M3/1B FLARE WHICH REACHED MAXIMUM AT 1527 UT. THIS FLARE WAS ALSO ACCOMPANIED BY A MINOR 10 CM BURST OF 57 FLUX UNITS. THIS REGION RETAINS ITS DELTA CONFIGURATION WITHIN ITS CENTRAL PORTION. MANY LESSER FLARES HAVE BEEN PRODUCED BY THESE TWO REGIONS TODAY. TWO NEW REGIONS HAVE BEEN OBSERVED AT S21W20 AND S25E73 AND HAVE BEEN NUMBERED 1584 AND 1585 RESPECTIVELY.

B. SOLAR ACTIVITY SHOULD REMAIN AT A HIGH LEVEL FOR THE FORECAST PERIOD, WITH REGIONS 1568 AND 1574 BEING THE MAJOR CONTRIBUTORS.

NO SIGNIFICANT REGIONS ARE DUE TO RETURN DURING THE FORECAST PERIOD.

II. THE GEOMAGNETIC FIELD HAS BEEN ACTIVE DURING THE PAST 24 HOURS WITH THE MOST ACTIVE PERIOD BEING FROM 1330 TO 1430 UT. THE FIELD SHOULD REMAIN ACTIVE WITH PERIODS AT MINOR STORM LEVELS.

III. EVENT PROBABILITIES - 20 FEBRUARY - 22 FEBRUARY

CLASS M 95/95/95

CLASS X 50/50/50

PROTON 50/50/60

PCAF YELLOW

IV. OTTAWA 10.7 CM FLUX

OBSERVED 19 FEB 243

PREDICTED 20 FEB - 22 FEB 244/244/243

90-DAY MEAN 19 FEB 192

V. GEOMAGNETIC INDICES

OBSERVED FREDERICKSBURG 18 FEB 18

ESTIMATED AFR/AP 19 FEB 16/18

PREDICTED AFR/AP 20 - 22 FEB 22/30 25/39 27/48

SOLTERWARN

BT