

HFUS 1 BOU 282200

C O R R E C T E D C O P Y

FROM SPACE ENVIRONMENT SERVICES CENTER BOULDER COLORADO

SDF NUMBER 028

JOINT USAF/NOAA PRIMARY REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY
ISSUED 1220Z 28 JANUARY 1979

IA. SOLAR ACTIVITY HAS BEEN MODERATE FOR THE PAST 24 HOURS. REGION 1525 (N 13W 62) WAS THE MOST ACTIVE, WITH AN M3/SB MAXING AT 1309Z, AND AN M1/SB MAXING AT 1414Z. ASSOCIATED WITH THE M3/SB FLARE WERE SHORT WAVE FADES TO 18 MHZ AND RADIO BURSTS. THE ADJACENT REGION 1527 (N 11W 60) HAD AN M1/SB WHICH MAXED AT 1429Z. REGION 1532 (S 14W 32) ALSO WAS ACTIVE TODAY WITH ITS LARGEST FLARE, A C6/SN OCCURRING AT 1737Z. NEW REGION 1545 (N 29E 79) APPEARS TO BE RETURNING REGION 149# AND HAS BEEN REPORTED AS A LARGE RATHER COMPLEX GROUP WHICH IS BETA-GAMMA MAGNETICALLY. A C6/SN WAS OBSERVED AT 1422Z MAX TIME. NEW REGION 1544 (S 30E 28) EMERGED ON THE DISK AS A SMALL A-TYPE AS WELL AS NEW REGION 1546 (S 28W 08).

IB. SOLAR ACTIVITY WILL CONTINUE AT A MODERATE LEVEL. REGIONS 1525, 1527, 1532 AND 1545 ARE ALL CAPABLE OF SIGNIFICANT FLARES. THE 1525/1527 COMPLEX IS EXPECTED TO PRODUCE A LARGE FLARE PRIOR TO ITS ROTATION OVER THE WEST LIMB.

II. THE GEOMAGNETIC FIELD HAS BEEN AT HIGH UNSETLED CONDITIONS FOR THE PAST 24 HOURS. ACTIVE CONDITIONS ARE EXPECTED THROUGH THE NEXT 48 HOURS RESULTING FROM A CORONAL HOLE ASSOCIATED HIGH SPEED STREAM WHICH WILL ARRIVE EARLY ON THE SECOND FORECAST DAY.

III. EVENT PROBABILITIES 29 JANUARY - 31 JANUARY

CLASS M 80/80/80

CLASS X 25/25/30

PROTON 25/25/30

PCAF YELLOW

IV. OTTAWA (0.7 CM FLUX)

OBSERVED 28 JANUARY 215

PREDICTED 29-31 JANUARY 215/210/208

90-DAY MEAN 28 JANUARY 178

V. GEOMAGNETIC A INDICES

OBSERVED FREDERICKSBURG 27 JANUARY 15~~15~~18

ESTIMATED AFR/AP 28 JANUARY 12/14

PREDICTED AFR/AP 29-31 JANUARY 17/20 - 25/30 - (18/22)

SOLTERWARN

BT