

HFUS 1 BOU 242145

FROM SPACE ENVIRONMENT SERVICES CENTER BOULDER, COLO

SDF NUMBER 114

JOINT USAF/NOAA PRIMARY REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY
ISSUED 2200Z 24 APRIL 1979

IA. SOLAR ACTIVITY HAS BEEN LOW DURING THE PAST 24 HOURS. REGION 1705 (N17E50) HAS BEEN THE MOST ACTIVE WITH SEVERAL SUBFLARES REPORTED, BUT LITTLE X-RAY EMISSION ASSOCIATED WITH THESE FLARES. THE LARGEST, A C2/SN FLARE MAXED AT 0452Z. SLOW GROWTH IS EVIDENT, ALONG WITH A COMPLEX NEUTRAL LINE AND SOME MAGNETIC INTRUSIONS IN THE LEADER SPOT. REGION 1703 (N20E14) HAS DECAYED SLIGHTLY, WITH THE DELTA CONFIGURATION SEEN YESTERDAY NOW GONE. A C3 X-RAY BURST OCCURED AT 1634Z MAXIMUM WITH ASSOCIATED SHORT WAVE FADES TO 15MHZ AND LOW FREQUENCY RADIO BURSTS REPORTED, BUT NO FLARE WAS VISIBLE ON THE DISK. NEW REGION 1709 (S18W00) IS A SIMPLE B1-POLAR GROUP.

IB. SOLAR ACTIVITY IS EXPECTED TO BE LOW TO MODERATE DURING THE FORECAST PERIOD. REGION 1705 IS CAPABLE OF AN ISOLATED M-CLASS EVENT. ALSO, REGION 1707 (S24E61) WHICH HAS BEEN QUIET TODAY COULD PRODUCE AN M-CLASS EVENT.

II. THE GEOMAGNETIC FIELD HAS BEEN UNSETTLED DURING THE PAST 24 HOURS. THE FIELD IS EXPECTED TO BECOME INCREASINGLY ACTIVE THROUGH THE NEXT TWO DAYS AS A RESULT OF THE EFFECTS OF A HIGH SPEED STREAM AND WEAK SECTOR BOUNDARY INTERSECTING THE EARTH. THE THIRD DAY, THE FIELD WILL RETURN TO UNSETTLED CONDITIONS.

III. EVENT PROBABILITIES 25 APRIL - 27 APRIL

CLASS M 25/30/30

CLASS X 05/05/05

PROTON 01/01/05

PCAF GREEN

IV. OTTAWA 10.7 CM FLUX

OBSERVED 24 APRIL 160

PREDICTED 25-27 APRIL 162/163/164

90-DAY MEAN 24 APRIL 191

V. GEOMAGNETIC A INDICES

OBSERVED FREDERICKSBURG 23 APRIL

18

ESTIMATED AFR/AP 24 APRIL

12/15

PREDICTED AFR/AP 25-27 APRIL

17/20 21/23 10/18

SOLTERWARN

BT