

FROM SPACE ENVIRONMENT SERVICES CENTER, BOULDER, COLORADO
SDF NUMBER 114

JOINT USAF/NOAA REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY.
ISSUED 2200Z 23 APR 1984

IA. ANALYSIS OF SOLAR ACTIVE REGIONS AND ACTIVITY FROM 22/2100
TO 23/2100Z: SOLAR ACTIVITY HAS BEEN HIGH THIS PERIOD. REGION
4474 (S12E56) HAS PRODUCED SEVERAL M CLASS X-RAY FLARES, THE
LARGEST WAS A M7 THAT OCCURRED AT 1555 UT. A 1B OPTICAL FLARE
WAS ASSOCIATED WITH THIS X-RAY EVENT, AS WELL AS A 280 FLUX
UNIT 2695 MHZ RADIO BURST. REGION 4474 HAS COMPLETELY ROTATED
ONTO THE VISIBLE DISK AND IS A VERY IMPRESSIVE REGION. IT NOW
HAS A BETA GAMMA DELTA MAGNETIC CONFIGURATION TO GO ALONG WITH
IT'S F TYPE SPOT CLASSIFICATION. NO NEW REGIONS WERE NUMBERED
THIS PERIOD AND THE REMAINDER OF THE DISK APPEARS STABLE AT
THIS TIME.

IB. SOLAR ACTIVITY FORECAST: SOLAR ACTIVITY SHOULD BE MODERATE
TO HIGH THROUGHOUT THE FORECAST PERIOD. REGION 4474 IS THE MOST
LIKELY CANDIDATE FOR ANY SIGNIFICANT FLARE ACTIVITY.

IIA. GEOPHYSICAL ACTIVITY SUMMARY FROM 22/2100Z TO 23/2100Z:
THE GEOMAGNETIC FIELD HAS BEEN QUIET TO UNSETTLED, AT ALL
LATITUDES, THIS PERIOD.

IIB. GEOPHYSICAL ACTIVITY FORECAST: THE GEOMAGNETIC FIELD
SHOULD BE AT ACTIVE TO STORM LEVELS, AT ALL LATITUDES,
THROUGHOUT THE FORECAST PERIOD. THIS ACTIVITY IS DUE TO THE
EXPECTED RETURN OF RECURRENT CORONAL HOLE STREAMS.

III. EVENT PROBABILITIES 24 APR-26 APR

CLASS M 90/90/90

CLASS X 20/20/20

PROTON 05/05/10

PCAF GREEN

IV. OTTAWA 10.7 CM FLUX

OBSERVED 23 APR 133

PREDICTED 24 APR-26 APR 135/137/137

90 DAY MEAN 23 APR 131

V. GEOMAGNETIC A INDICES

OBSERVED AFR/AP 22 APR 004/008

ESTIMATED AFR/AP 23 APR 007/012

PREDICTED AFR/AP 24 APR-26 APR 030/040-040/040-022/030

SOLTERWARN

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