

HFUS 180U 052200

FROM SPACE ENVIRONMENT SERVICES CENTER BOULDER COLO

SDF NUMBER 248

JOINT USAF/NOAA PRIMARY REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY

ISSUED 2200Z 05 SEPTEMBER 1978

IA. SOLAR ACTIVITY HAS BEEN LOW. ONLY LOW LEVEL CLASS C X-RAY EVENTS AND SUBFLARES HAVE BEEN OBSERVED. REGION 1272 (S20W07) HAS DEVELOPED A WEAK DELTA CONFIGURATION IN ITS TRAILER PORTION. REGION 1282 (S21W08) IS GROWING RAPIDLY AND CONTINUED GROWTH MAY INITIATE FLARE ACTIVITY FROM NEARBY 1272. SOME SLIGHT DECAY HAS BEEN NOTED IN REGION 1276 (N16W26) AND THE PROPER MOTION OBSERVED BETWEEN THIS REGION AND REGION 1271 (N16W17) APPEARS TO HAVE CEASED. REGION 1284 (N33E74) IS ROTATING OVER THE LIMB AND HAS PRODUCED SEVERAL SMALL X-RAY FLARES.

IB. SOLAR ACTIVITY SHOULD ELEVATE TO MODERATE LEVELS WITH A CONTINUING PROBABILITY OF SIGNIFICANT ENERGETIC EVENTS FROM REGIONS 1276/1271 AND 1272.

II. THE GEOMAGNETIC FIELD HAS BEEN UNSETTLED. SEVERAL FACTORS SHOULD CONTRIBUTE TO THE ACTIVATION OF THE GEOMAGNETIC FIELD THIS FORECAST PERIOD. ACTIVE REGIONS 1272 AND 1271/1276 ARE ROTATING INTO LONGITUDES WHERE THE OCCURRENCE OF A LARGE FLARE IN EITHER AREA COULD CAUSE A SIGNIFICANT GEOMAGNETIC STORM.

III. EVENT PROBABILITIES 06 SEPTEMBER - 08 SEPTEMBER

CLASS M 90/90/90

CLASS X 40/50/60

PROTON 30/40/45

PCAF YELLOW

IV. OTTAWA 10.7 CM FLUX

OBSERVED 05 SEPTEMBER 177

PREDICTED 06-08 SEPTEMBER 178/182/182

90-DAY MEAN 05 SEPTEMBER 133

V. GEOMAGNETIC A INDICES

OBSERVED FREDERICKSBURG 04 SEPTEMBER 06

ESTIMATED AFR/AP 04 SEPTEMBER 06/06

PREDICTED AFR/AP 06-08 SEPTEMBER 15/30 - 15/25 - 20/30

SOLTERWARN

BT

HFUS 180U 052200

FROM SPACE ENVIRONMENT SERVICES CENTER BOULDER COLO

SDF NUMBER 248

JOINT USAF/NOAA PRIMARY REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY
ISSUED 2200Z 05 SEPTEMBER 1979

IA. SOLAR ACTIVITY WAS LOW TO MODERATE DURING THE PAST 24 HOURS.
AN M1 X-RAY EVENT OCCURRED AT 0356Z (MAXIMUM AT 0413Z) BUT COULD
NOT BE CORRELATED OPTICALLY DUE TO WEATHER. THIS EVENT HAD NO
RADIO BURSTS OR SHORT WAVE FADES. A C3/SN FLARE (MAX 0715Z) FROM
REGION 1971 (S21W44) WAS MORE IMPRESSIVE IN RADIO WITH CENTIMETRIC
BURSTS REPORTED. A C4/SB FLARE (MAX 1427Z) FROM REGION 1972
(N14E61) PRODUCED POST-FLARE LOOPS. REGION 1967 (N14E01) ALTHOUGH
BEING THE MOST MAGNETICALLY COMPLEX ON THE DISK AS A BETA-GAMMA,
HAS BEEN SURPRISINGLY QUIET TODAY. SUBFLARES HAVE BEEN OBSERVED
FROM REGIONS 1958 (N18W54), 1965 (N13W53) AND 1963 (N12W19). NEW
REGION 1975 (N13W11) HAS EMERGED BETWEEN 1963 AND 1967 AT N13W11
AS A B-TYPE GROUP.

IB. SOLAR ACTIVITY IS EXPECTED TO REMAIN AT LOW TO MODERATE LEVELS
DURING THE NEXT THREE DAYS. REGIONS 1967 AND 1972 APPEAR TO BE
CAPABLE OF ISOLATED M-CLASS X-RAY EVENTS.

II. THE GEOMAGNETIC FIELD WAS MILDLY ACTIVE DURING THE PAST 24
HOURS. UNSETTLED CONDITIONS INTERSPERSED WITH SHORT PERIODS OF
ACTIVE LEVELS DURING NIGHTTIME SECTORS ARE EXPECTED DURING THE
NEXT TWO DAYS, FOLLOWED ON THE THIRD DAY BY RECURRENT ACTIVE
CONDITIONS.

III. EVENT PROBABILITIES 06 SEPTEMBER - 08 SEPTEMBER

CLASS M 40/40/50

CLASS X 01/01/01

PROTON 01/01/01

PCAF GREEN

IV. OTTAWA 10.7 CM FLUX

OBSERVED 05 SEPTEMBER 174

PREDICTED 06-08 SEPTEMBER 175/177/179

90-DAY MEAN 05 SEPTEMBER 170

V. GEOMAGNETIC A INDICES

OBSERVED FREDERICKSBURG 04 SEPTEMBER 11

ESTIMATED AFR/AP 05 SEPTEMBER 15/15

PREDICTED AFR/AP 06-08 SEPTEMBER 10/12 - 13/15 - 18/35

SOLIERWAR N

BT