

HFUS 1 BOU 151300
FROM SPACE ENVIRONMENT SERVICES CENTER, BOULDER, COLORADO
SDF NUMBER 196A
JOINT USAF/NOAA REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY
ISSUED 1300Z 15 JUL 1982

IA. ANALYSIS OF SOLAR ACTIVE REGIONS AND ACTIVITY FROM 14/1200Z TO 15/1200Z: SOLAR ACTIVITY HAS BEEN MODERATE AS USUAL. CLASS FLARES CONTINUE FROM REGION 3804 (N14W05) WITH AN OCCASIONAL CONTRIBUTION FROM REGION 3812 (N22E38). REGION 3812 DEVELOPED CONSIDERABLE SPOT AREA YESTERDAY RESULTING IN AN E TYPE SPOT GROUP WITH A FAIRLY COMPLEX PENUMBRA. REGION 3804 MEANWHILE RECOVERED SOME OF THE SPOT AREA IT LOST AND MAY BE REORGANIZING ITS PLAGUE STRUCTURE. BOTH REGIONS ARE FLUCTUATING IN INTENSITY AND SHOWING POINT BRIGHTENINGS. REGION 3806 (S25W22) HAS DECAYED IN PLAGUE AREA. A LACK OF STRUCTURE IN THE PLAGUE GAVE THE REGION A LESS POTENT APPEARANCE AND IN FACT IT LOOKS "WASHED-OUT". TWO REGIONS WERE NUMBERED DURING THE PAST 24 HOURS: 3814 (N21E11) AND 3815 (S20E37).

IB. SOLAR ACTIVITY FORECAST: SOLAR ACTIVITY SHOULD BE MODERATE TO HIGH.

II. GEOPHYSICAL SUMMARY AND FORECAST: THE GEOMAGNETIC FIELD HAS BEEN AT MINOR STORM LEVELS. A CONTINUED DECLINE IN STORM INTENSITY IS EXPECTED DURING THE NEXT 24 HOURS WITH GENERALLY ACTIVE CONDITIONS ON 16 AND 17 JULY. THE PROTON EVENT DROPPED BELOW EVENT THRESHOLDS AT 150015Z.

III. EVENT PROBABILITIES 16 JUL-18 JUL

CLASS M 99/99/99

CLASS X 60/60/60

PROTON 30/30/30

PCAF YELLOW

IV. OTTAWA 10.7 CM FLUX

OBSERVED 14 JUL 262

ESTIMATED 15 JUL 265

PREDICTED 16 JUL-18 JUL 265/260/255

90 DAY MEAN 14 JUL 160

V. GEOMAGNETIC A INDICES

OBSERVED AFR 13 JUL 133 AP 14 JUL 117

ESTIMATED AFR 14 JUL 104 AFR/AP 15 JUL 040/040

PREDICTED AFR/AP 16 JUL-18 JUL 020/032-015/022-012/022

SOLTERWARN

BT

HFUS 3 BOU 152200
FROM SPACE ENVIRONMENT SERVICES CENTER, BOULDER, COLORADO
SDF NUMBER 196B
JOINT USAF/NOAA REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY.
ISSUED 2200Z 15 JUL 1982

IA. ANALYSIS OF SOLAR ACTIVE REGIONS AND ACTIVITY FROM 15/1200Z TO 15/2100Z: SOLAR ACTIVITY HAS BEEN MODERATE FOR THE PAST 9 HOURS. REGION 3812 (N20E32) PRODUCED AN M1/1B FLARE MAXING AT 1238Z. C-CLASS SUBFLARES OCCURRED IN REGIONS 3804 (N14W11), 3810 (N12E31), AND NEW REGION 3817 (N19E68). REGION 3804 IS RESTRUCTURING AND SHOWING MINOR GROWTH ALTHOUGH MAGNETIC GRADIENTS HAVE RELAXED SOMEWHAT. REGION 3812 HAS STABILIZED BUT REMAINS MAGNETICALLY COMPLEX. REGION 3812 AND ITS NEIGHBOR, 3810, SHARE A COMMON NEUTRAL LINE. REGION 3817 IS THE RETURN OF OLD REGION 3782. NEW REGION 3816 (S18W51) IS A SINGLE A-TYPE SPOT.

IB. SOLAR ACTIVITY FORECAST: SOLAR ACTIVITY IS EXPECTED TO BE HIGH BASED ON FLARE POTENTIAL CONTAINED IN REGION 3804.

II. GEOPHYSICAL SUMMARY AND FORECAST: THE GEOMAGNETIC FIELD HAS BEEN UNSETLED TO ACTIVE FOR THE PAST 9 HOURS. THESE CONDITIONS ARE EXPECTED TO PERSIST WHILE GRADUALLY DECLINING TO UNSETLED LEVELS BY THE END OF THE FORECAST PERIOD. HOWEVER, A MAJOR FLARE WOULD BRING A RETURN OF GEOMAGNETIC STORM CONDITIONS AND SIGNIFICANT ENERGETIC PARTICLE FLUXES.

III. EVENT PROBABILITIES 16 JUL-18 JUL

CLASS M 99/99/99

CLASS X 60/60/60

PROTON 30/30/30

PCAF YELLOW

IV. OTTAWA 10.7 CM FLUX

OBSERVED 15 JUL 265

PREDICTED 16 JUL-18 JUL 265/260/255

90 DAY MEAN 15 JUL 161

V. GEOMAGNETIC A INDICES

OBSERVED AFR/AP 14 JUL 109/117

ESTIMATED AFR/AP 15 JUL 028/040

PREDICTED AFR/AP 16 JUL-18 JUL 020/032-015/022-012/022

SOLTERWARN

BT

HXUS BOU 152200
PREDM 09916 09917 09918
PREDX 06016 06017 06018
PREDP 03016 03017 03018
PCAFT 00216
TENCM 26516 26017 25518
AFRED 02016 01517 01218
AFAPF 03216 02217 02218
BT