

HFUS 3 BOU 302200

FROM SPACE ENVIRONMENT SERVICES CENTER, BOULDER, COLORADO

SDF NUMBER 211

JOINT USAF/NOAA REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY.

ISSUED 2200Z 30 JUL 1983

IA. ANALYSIS OF SOLAR ACTIVE REGIONS AND ACTIVITY FROM 29/2100Z TO 30/2100Z: SOLAR ACTIVITY WAS AT MODERATE LEVELS DURING THIS PERIOD DUE TO A M1/SB AT 1507UT FROM REGION 4269 (N14W34). THIS EVENT PRODUCED MINOR RADIO BURSTS ACROSS THE SPECTRUM, 96 FLUX UNITS AT 2695MHZ. REGION 4269 HAS EXHIBITED RAPID GROWTH AND HAS BEEN THE CAUSE OF SEVERAL SMALL EVENTS DURING THE PAST 24 HOURS. REGION 4263 (S10E44) CONTINUES TO BE A LARGE COMPLEX REGION HOWEVER IT HAS ONLY PRODUCED SMALL "C" CLASS EVENTS THE LARGEST OF WHICH WAS A C3/1B AT 1820UT THIS EVENT DID PRODUCE A 3000 FLUX UNIT BURST AT 245MHZ. NO NEW REGIONS WERE OBSERVED TODAY.

IB. SOLAR ACTIVITY FORECAST: SOLAR ACTIVITY IS EXPECTED TO REMAIN MODERATE AS REGION 4263 AND 4269 CONTINUE TO EXHIBIT GROWTH.

IIA. GEOPHYSICAL ACTIVITY SUMMARY FROM 29/2100Z TO 30/2100Z: THE GEOMAGNETIC FIELD WAS AT GENERALLY ACTIVE LEVELS WITH SHORT PERIODS, AT BOTH THE HIGH AND MID LATITUDE SITES, OF MAJOR STORM LEVELS. THE DISTURBANCE IS BELIEVED TO BE FROM THE FILAMENT WHICH DISAPPEARED LATE ON 24 OR EARLY ON 25 JULY. THE DISTURBANCE WAS GENERALLY CONFINED TO THE NIGHT TIME SECTORS.

IIB. GEOPHYSICAL ACTIVITY FORECAST: DUE TO EFFECTS OF A SMALL CORONAL HOLE WHICH IS NOW TWO DAYS PAST CENTERAL MERIDIAN THE GEOMAGNETIC FIELD IS EXPECTED TO BE UNSETLED TO SLIGHTLY ACTIVE DURING THIS FORECAST PERIOD.

III. EVENT PROBABILITIES 31 JUL-02 AUG

CLASS M 40/40/40

CLASS X 05/05/05

PROTON 01/01/01

PCAF GREEN

IV. OTTAWA 10.7 CM FLUX

OBSERVED 30 JUL 140

PREDICTED 31 JUL-02 AUG 145/150/150

90 DAY MEAN 30 JUL 133

V. GEOMAGNETIC A INDICES

OBSERVED AFR/AP 29 JUL 015/019

ESTIMATED AFR/AP 30 JUL 019/025

PREDICTED AFR/AP 31 JUL-02 AUG 015/015-015/015-015/015

SOLTERWARN

BT