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HFUS 1 BOU 281408

FROM SPACE ENVIRONMENT SERVICES CENTER, BOULDER, COLORADO

SDF NUMBER 028A

JOINT USAF/NOAA REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY

ISSUED 1200UT 28 JANUARY 1981

IA. ANALYSIS OF SOLAR ACTIVE REGIONS AND ACTIVITY FROM

27/1200UT TO 28/1200UT:

SOLAR ACTIVITY HAS BEEN MODERATE DURING THE PAST 24 HOURS.

THREE M-CLASS EVENTS HAVE BEEN RECORDED, ALL FROM REGION 2911
(S12E52), AN M4/1B AT 27/1540UT, AN M1/1B AT 28/0216UT AND A
M8/3N AT 28/0420UT. THE TWO M-CLASS EVENTS ON 28 JANUARY
HAD MINOR RADIO BURSTS ASSOCIATED WITH THEM. REGION 2919
(S16E65) HAS PRODUCED SEVERAL OPTICAL FLARES, THE LARGEST A
1N AT 27/1540UT. OTHER REGIONS WHICH PRODUCED SMALL FLARES
ARE 2903 (S10W35), 2916 (N16E61) AND 2918 (S11E69).

IB. SOLAR ACTIVITY FORECAST:

SOLAR ACTIVITY IS EXPECTED TO CONTINUE AT MODERATE LEVELS.

REGION 2911 HAS AN APPARENT REVERSED POLARITY ORIENTATION AND
A CONFIRMED DELTA. IF ANY RAPID CHANGE OCCURS IN REGION 2911
THEN A MAJOR EVENT IS PROBABLE. OTHER REGIONS CAPABLE OF
PRODUCING SIGNIFICANT EVENTS ARE 2918 AND 2919.

II. GEOPHYSICAL SUMMARY AND FORECAST:

THE GEOMAGNETIC FIELD HAS BEEN UNSETLED. THE FIELD IS EXPECTED
TO BE GENERALLY UNSETLED WITH SHORT PERIODS OF ACTIVE CONDITIONS
DURING THE NEXT 72 HOURS.

III. EVENT PROBABILITIES: 29-31 JAN

CLASS M 60/65/70

CLASS X 10/15/15

PROTON 01/01/01

PCAF GREEN

IV. OTTAWA 10.7 FLUX

OBSERVED 27 JAN 184

ESTIMATED 28 JAN 205

PREDICTED 29-31 JAN 210/215/220

90 DAY MEAN 27 JAN 207

V. GEOMAGNETIC A INDICES

OBSERVED AFR 26 JAN 09 AP 27 JAN 09

ESTIMATED AFR 27 JAN 09 AFR/AP 28 JAN 10/10

PREDICTED AFR/AP 29-31 JAN 10/10 10/10 11/12

SOL TER WAR N

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HFUS 3 BOU 282045

FROM SPACE ENVIRONMENT SERVICES CENTER, BOULDER, COLORADO.

SDF NUMBER 028B

JOINT USAF/NOAA REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY.

ISSUED 2200UT 28 JAN 1981

IA. ANALYSIS OF SOLAR ACTIVE REGIONS AND ACTIVITY FROM

28/1200UT TO 28/2200UT :

SOLAR ACTIVITY HAS BEEN MODERATE. FLARES OCCURRING SINCE 28/1200 UT HAVE BEEN AS FOLLOWS: AN M2/1B AT 1606 UT FROM REGION 2918 (S11E64) AND FOUR SUBFLARES, TWO FROM REGION 2911 (S12E44) AND ONE EACH FROM REGIONS 2912 (S28W41) AND 2916 (N16E54). THREE NEW REGIONS WERE NUMBERED TODAY, 2920 (S19E27), 2921 (S05E58), AND 2922 (N15E74).

IB. SOLAR ACTIVITY FORECAST :

SOLAR ACTIVITY IS EXPECTED TO REMAIN MODERATE. BOTH REGIONS 2911 AND 2918 ARE PROVEN M-CLASS X-RAY PRODUCERS AND BOTH HAVE GROWN TODAY. MAGNETIC GRADIENTS APPEAR STRONG IN BOTH REGIONS WHICH MAY CAUSE AN ISOLATED X-CLASS FLARE BEFORE THE END OF THE FORECAST PERIOD.

II. GEOPHYSICAL SUMMARY AND FORECAST :

THE GEOMAGNETIC FIELD HAS BEEN UNSETLED AND IS EXPECTED TO CONTINUE UNSETLED FOR THE FORECAST PERIOD.

III. EVENT PROBABILITIES: 29 JAN - 31 JAN

CLASS M 60/65/70

CLASS X 10/15/15

PROTON 01/01/01

PCAF GREEN

IV. OTTAWA 10.7 FLUX

OBSERVED 28 JAN 200

PREDICTED 29-31 JAN 210/215/220

90 DAY MEAN 28 JAN 207

V. GEOMAGNETIC A INDEXES

OBSERVED AFR/AP 27 JAN 09/09

ESTIMATED AFR/AP 28 JAN 10/10

PREDICTED AFR/AP 29-31 JAN 10/10 10/10 14/12

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