

HFUS 1 BOU 222200

FROM SPACE ENVIRONMENT SERVICES CENTER BOULDER COLO

SDF NUMBER 142

JOINT USAF/NOAA PRIMARY REPORT OF SOLAR AND GEOPHYSICAL ACTIVITY
ISSUED 2200Z 22 MAY 1979

IA. SOLAR ACTIVITY HAS BEEN LOW DURING THE PAST 24 HOURS. THE DISK IS SPECKLED BY SMALL SPOT GROUPS WITH REGION 1761 (S21E12) CONTINUING TO DOMINATE IN DYNAMIC BEHAVIOR. FLARE FLUCTUATIONS AND ARCH FILAMENTS REMAIN AS PRIME CHARACTERISTICS OF 1761. ALTHOUGH ITS DEVELOPMENT HAS SLOWED. REGION 1759 (N17E43) SHOWED OVER NIGHT GROWTH IN WHITE LIGHT BUT MAY HAVE DECLINED IN FLARE AREA. REGION 1756 (S20E25) HAS ALSO SHOWN GROWTH AND THE SPOTS LABELED AS REGION 1766 EARLIER TODAY WERE SHOWN BY MAGNETIC ANALYSIS TO BE TRAILER SPOTS OF 1756. TWO ADDITIONAL GROUPS WERE BORN ON THE DISK TODAY; REGION 1764 (S29W56) AND 1765 (S32W03). FAINT FLARE MARKINGS ON THE LIMB NEAR NE25 AND A DIMLY VISIBLE H-TYPE SPOT NEAR NE15 ARE PROBABLY OLD 1730 AND 1711 RESPECTIVELY. IB. SOLAR ACTIVITY IS EXPECTED TO MAINTAIN ITS PRESENT TREND OF OCCASIONAL CLASS "C" X-RAY BURST WITH "M" CLASS BURST LESS LIKELY BUT DEFINITELY A THREAT.

II. THE GEOMAGNETIC FIELD WAS AT MINOR STORM LEVELS DURING THE NIGHT AND AT UNSETTLED TO ACTIVE LEVELS DURING THE DAY. ACTIVE TO MINOR STORM LEVELS IN NIGHTTIME SECTORS CAN BE EXPECTED FOR THE NEXT 24 HOURS AND THEN GENERALLY UNSETTLED TO ACTIVE CONDITIONS SHOULD PERSIST.

III. EVENT PROBABILITIES 23 MAY - 25 MAY

CLASS M 50/50/50

CLASS X 01/01/01

PROTON 01/01/01

PCAF GREEN

IV. OTTAWA 10.7 CM FLUX

OBSERVED 22 MAY 154

PREDICTED 23-25 MAY 155/156/157

90-DAY MEAN 22 MAY 179

V. GEOMAGNETIC A INDICES

OBSERVED FREDERICKSBURG 21 MAY 11

ESTIMATED AFR/AP 22 MAY 25/42

PREDICTED AFR/AP 23-25 MAY 15/30 - 15/25 - 15/25

SOLTERWARN

BT