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Product: Daily Forecast of Geomagnetic Activity
Issued: 2024 September 09 06:55UTC
Prepared by the Athens Space Weather Forecasting Center
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**I. Solar activity**
*--Current Status*
Solar Flux (10.7cm) measured on 08.09.2024 at 23:00 UTC was 228 sfu.
The background X-Ray flux is at the class C7.6 level.
AR3811 erupted on September 08 at 15:30 UT peak time producing a M1.6 class solar flare and a radio blackout of category R1.
No obviously Earth directed CMEs were observed in available LASCO imagery on September 05-06.
---CME arrival forecast
A CME was observed on September 08 at 01:36 UT. This CME could reach Earth on September 11 between 00:41 UT and 03:19 UT according to EAM predictions.

**II. Solar Energetic Particle Events**
Protons and electrons fluxes are quiet.

**III. Interplanetary and Geomagnetic conditions**
The solar wind speed measured by ACE satellite reached the max value 415 Km/s on September 08 at 11:00 UT during the last 24 hours.
The solar wind speed from STEREO A was detected 400 Km/s during the last 24 hours.
The vertical component of IMF Bz reached the max value -8 nT on September 09 at 00:00 UT during the last 24 hours.
The geomagnetic field was at quiet to unsettled levels during the last 24 hours.
The Kp index now is at quiet levels with Kp=2.

**IV. 3-day Geomagnetic Activity Forecast**
The geomagnetic field is expected to be at quiet to unsettled levels on September 09 and at quiet to minor storm (G1) levels on September 10-11 due to the CME observed on September 08.

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| **Date** | **Ap index forecast** | **Geomagnetic Activity level** |
| 09.09.2024 | 08 | Quiet to Unsettled |
| 10.09.2024 | 18 | Quiet to Minor storm (G1) |
| 11.09.2024 | 15 | Quiet to Minor storm (G1) |

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