

SIDC Space Weather Briefing

15 May 2022-22 May 2022

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& the SIDC forecaster team



Royal Observatory
of Belgium

Solar Influences
Data analysis Centre
www.sidc.be

Summary Report

Solar activity from 2022-05-15 12:00 to 2022-05-22 23:59

Active regions	NOAA AR and plages 3006-19
Flares	# C-class flare: 28 # M-class flare: 6 # X-class flare: 0
Coronal Holes	None
CMEs	Two CME possibly Earth-directed

Proton flux	Below limit
Electron flux	Below limit

Solar wind and geomagnetic conditions

ICMEs	None
SW Conditions	B : 0.93 - 12.1 nT //Bz: -7.15 nT to 10.83 nT //Speed: 393.2 - 755.6km/s
K-indices	max K-index (K_Bel): 4 max Kp-index (NOAA): 4

All Quiet Alert: TEXT TO BE ADJUSTED

Solar Activity

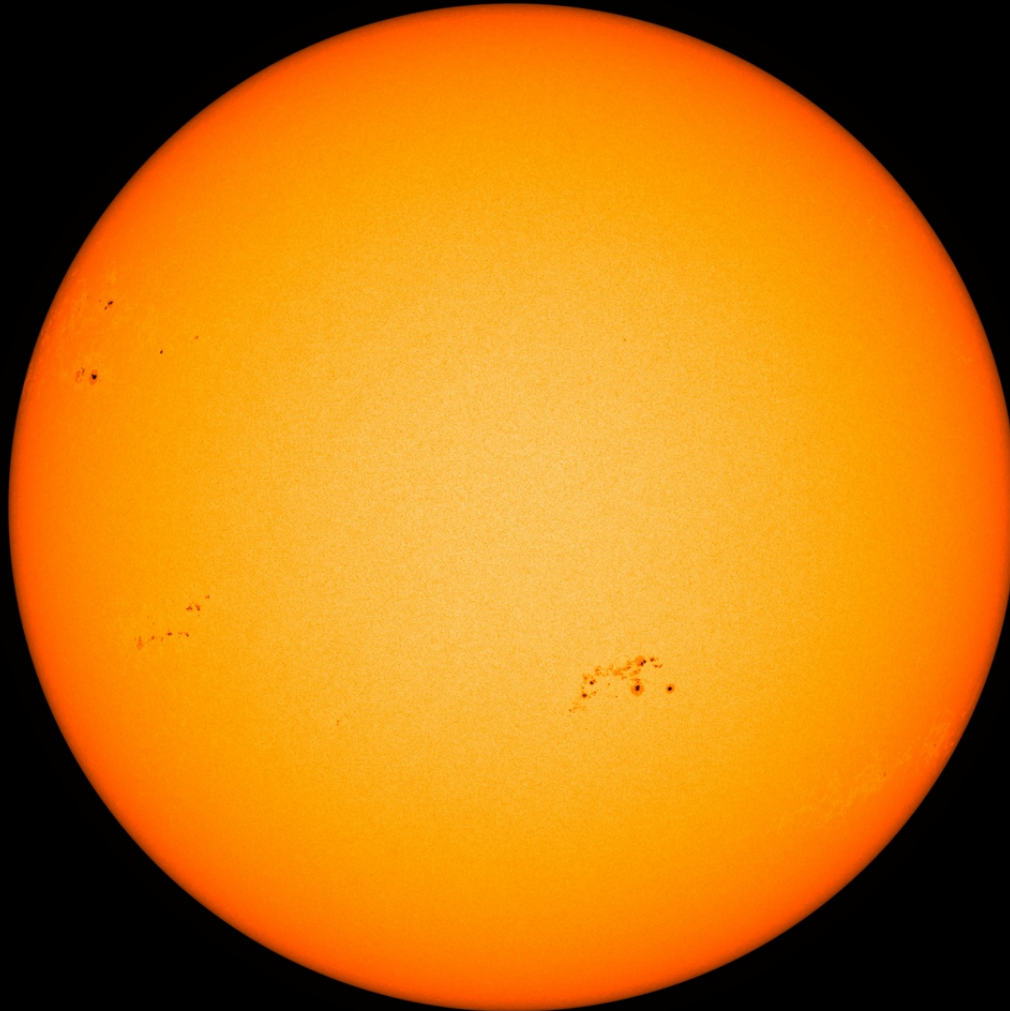


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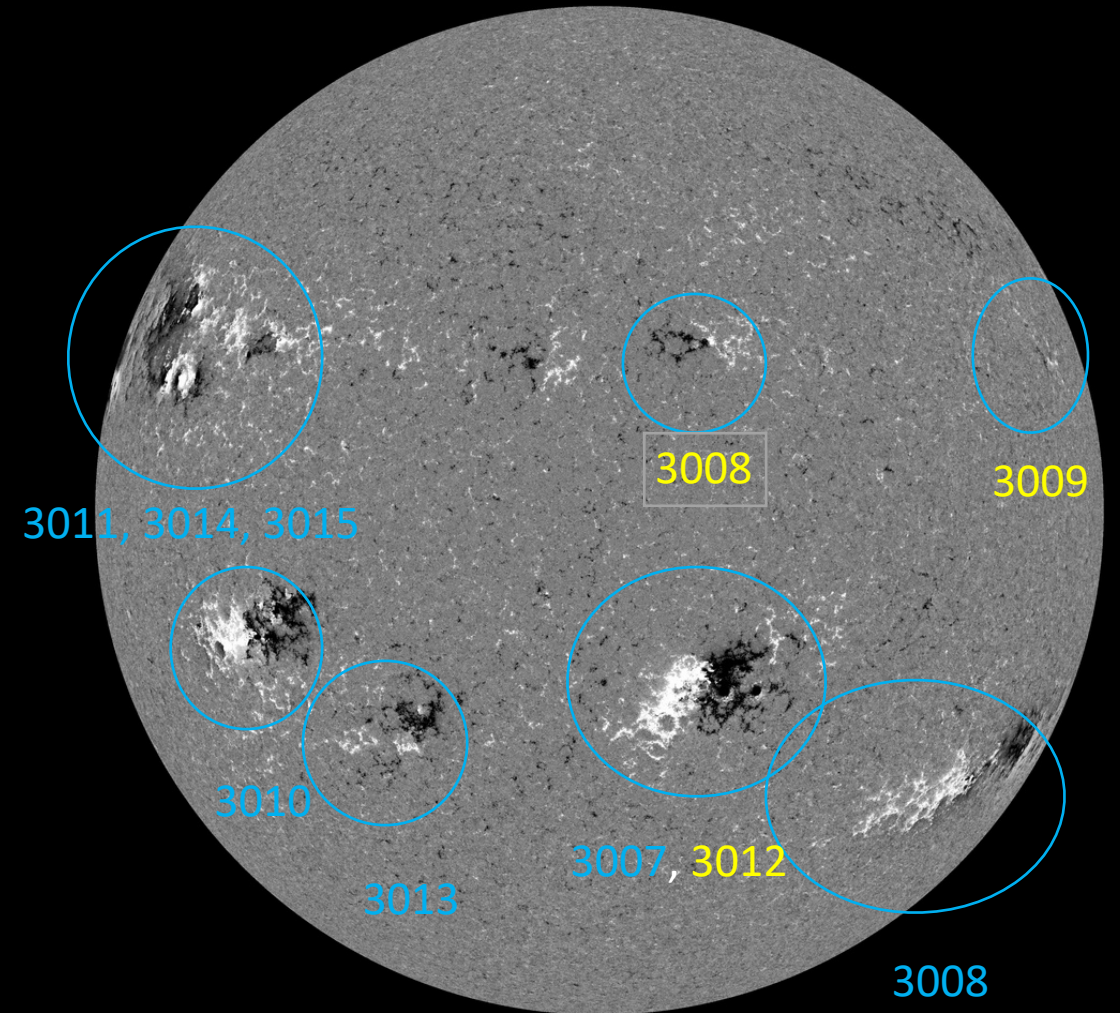
Solar active regions

SDO/HMI White Light 2022-05-15



SDO/HMI Quick-Look Continuum: 20220515_114500

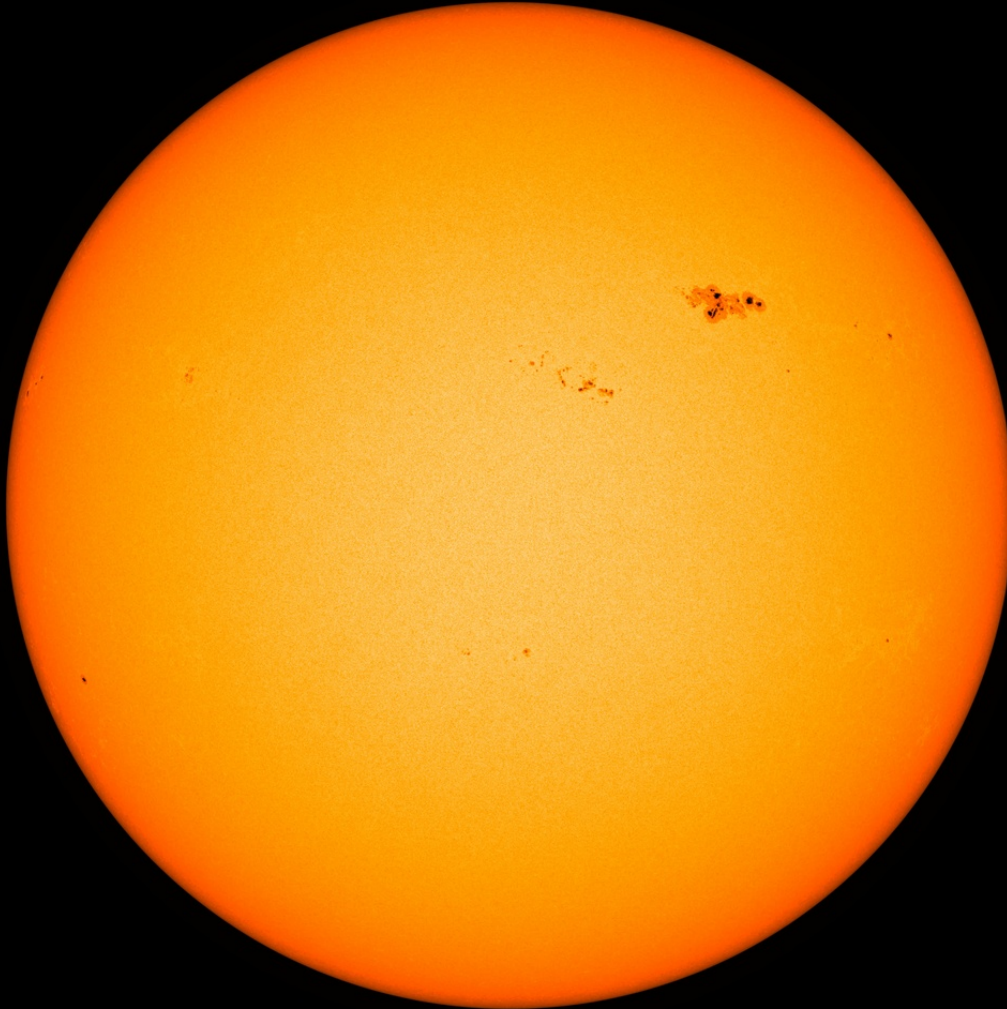
SDO/HMI Magnetogram 2022-05-15



SDO/HMI Quick-Look Magnetogram: 20220515_114500

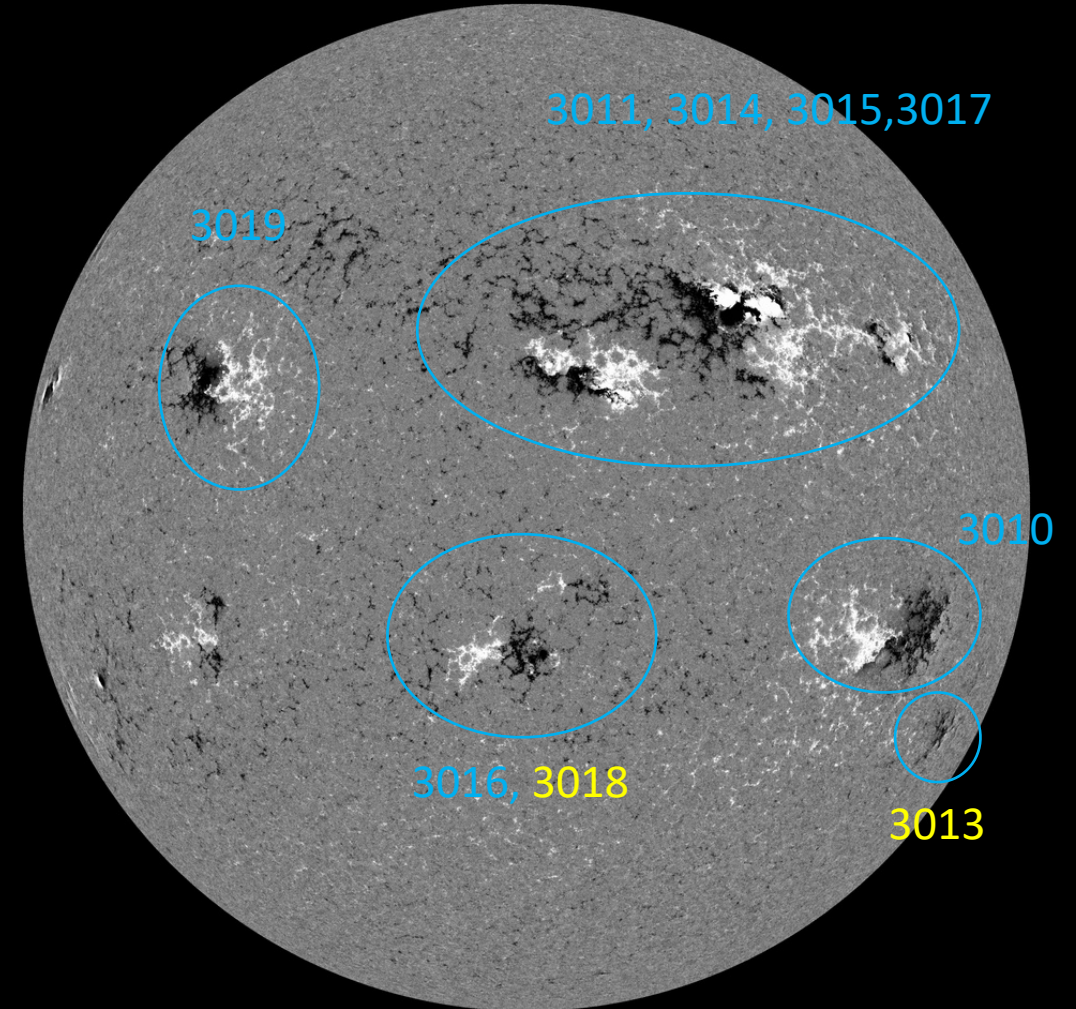
Solar active regions

SDO/HMI White Light 2022-05-22



SDO/HMI Quick-Look Continuum: 20220522_114500

SDO/HMI Magnetogram 2022-05-22

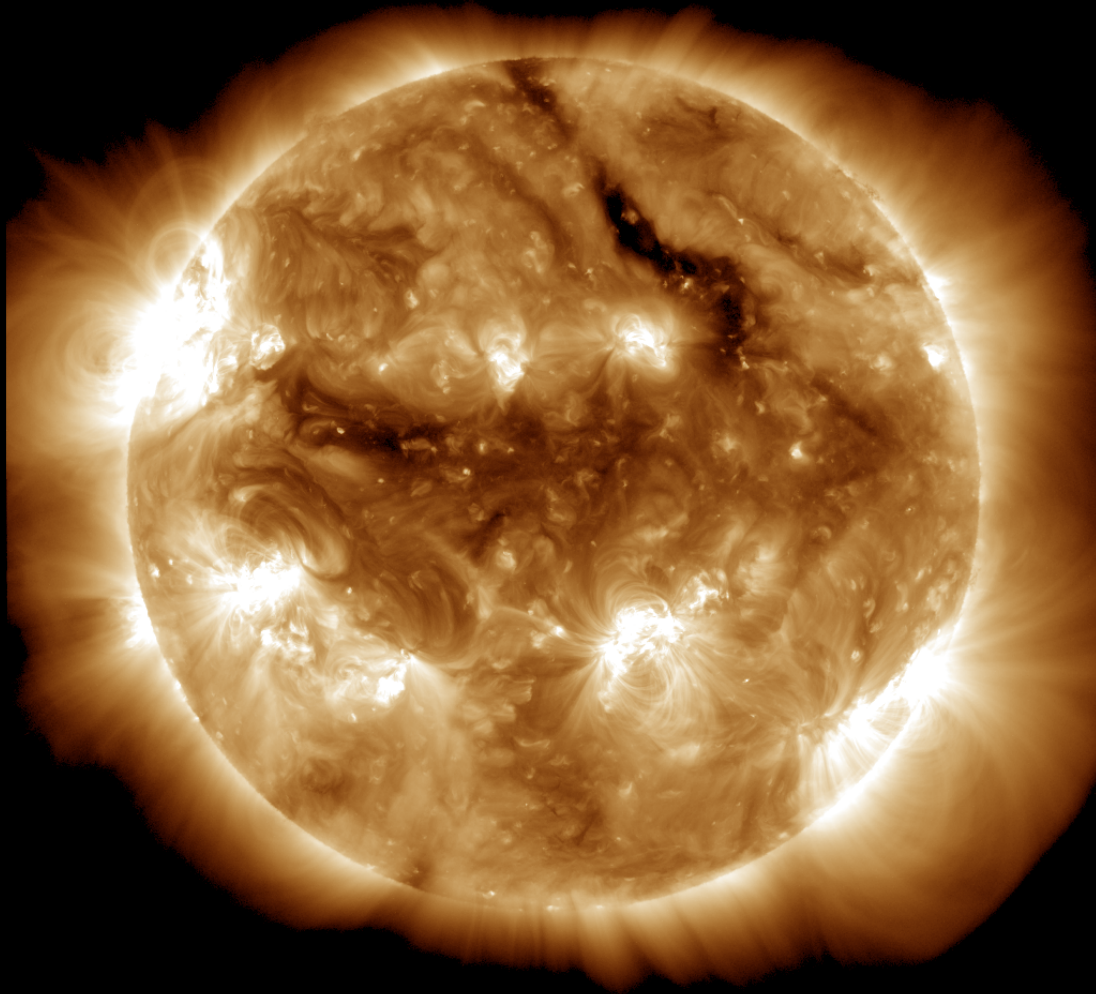


SDO/HMI Quick-Look Magnetogram: 20220522_114500

Coronal holes

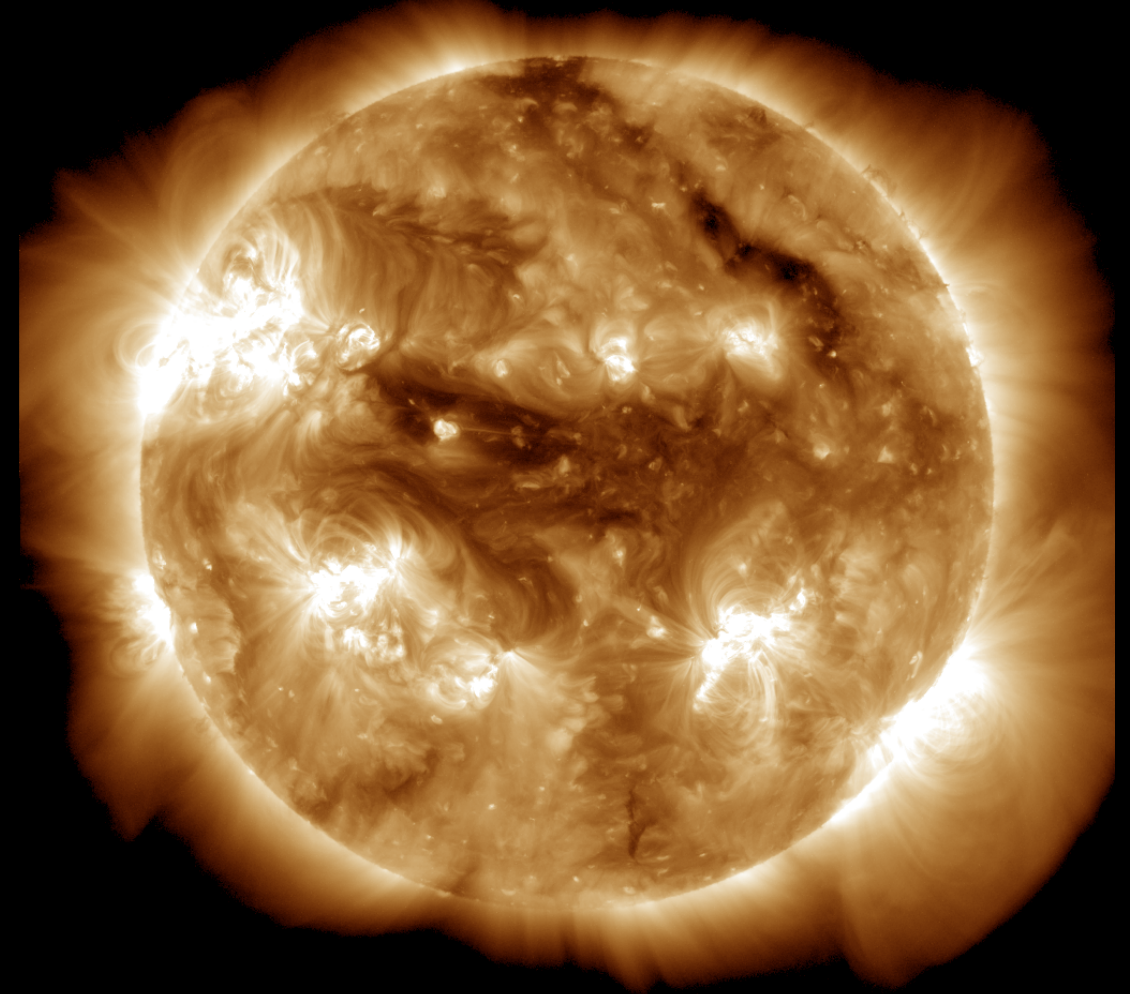
SDO/AIA 19.3 nm 2022-05-15

SDO/AIA AIA 193Å 2022-05-15T12:00:05.843



SDO/AIA 19.3 nm 2022-05-16

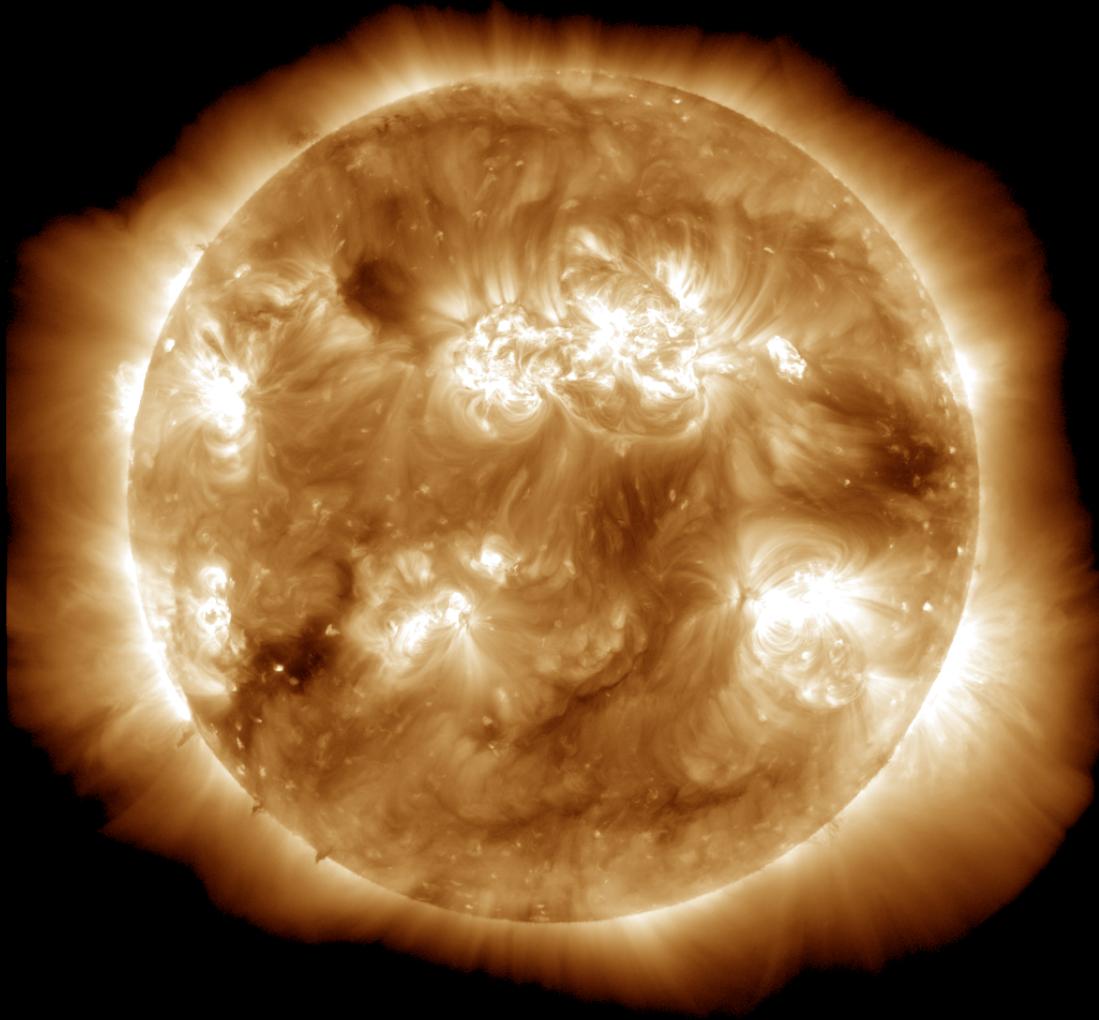
SDO/AIA AIA 193Å 2022-05-16T12:00:05.843



Coronal holes

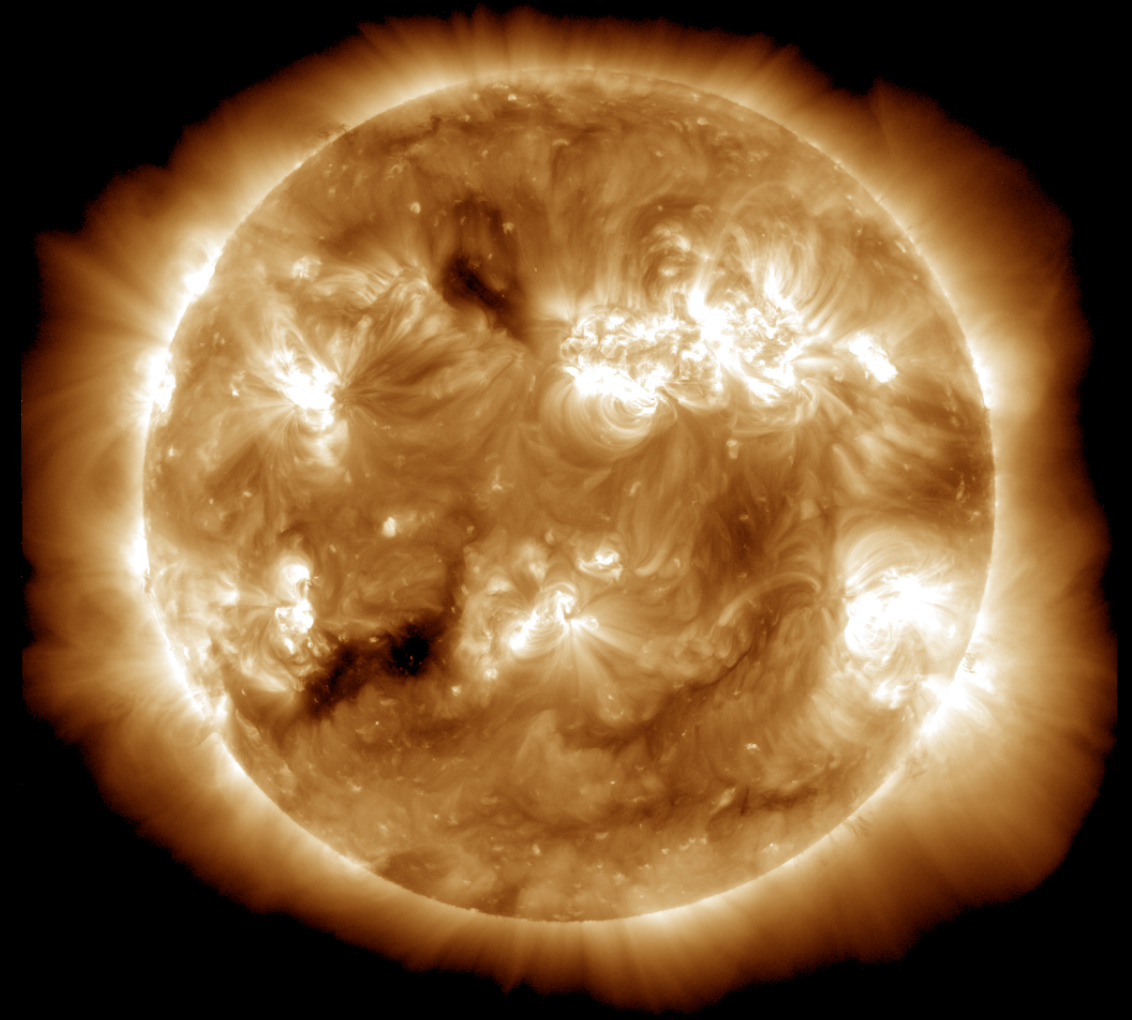
SDO/AIA 19.3 nm 2022-05-21

SDO/AIA AIA 193Å 2022-05-21T12:00:05.843



SDO/AIA 19.3 nm 2022-05-22

SDO/AIA AIA 193Å 2022-05-22T12:00:05.843



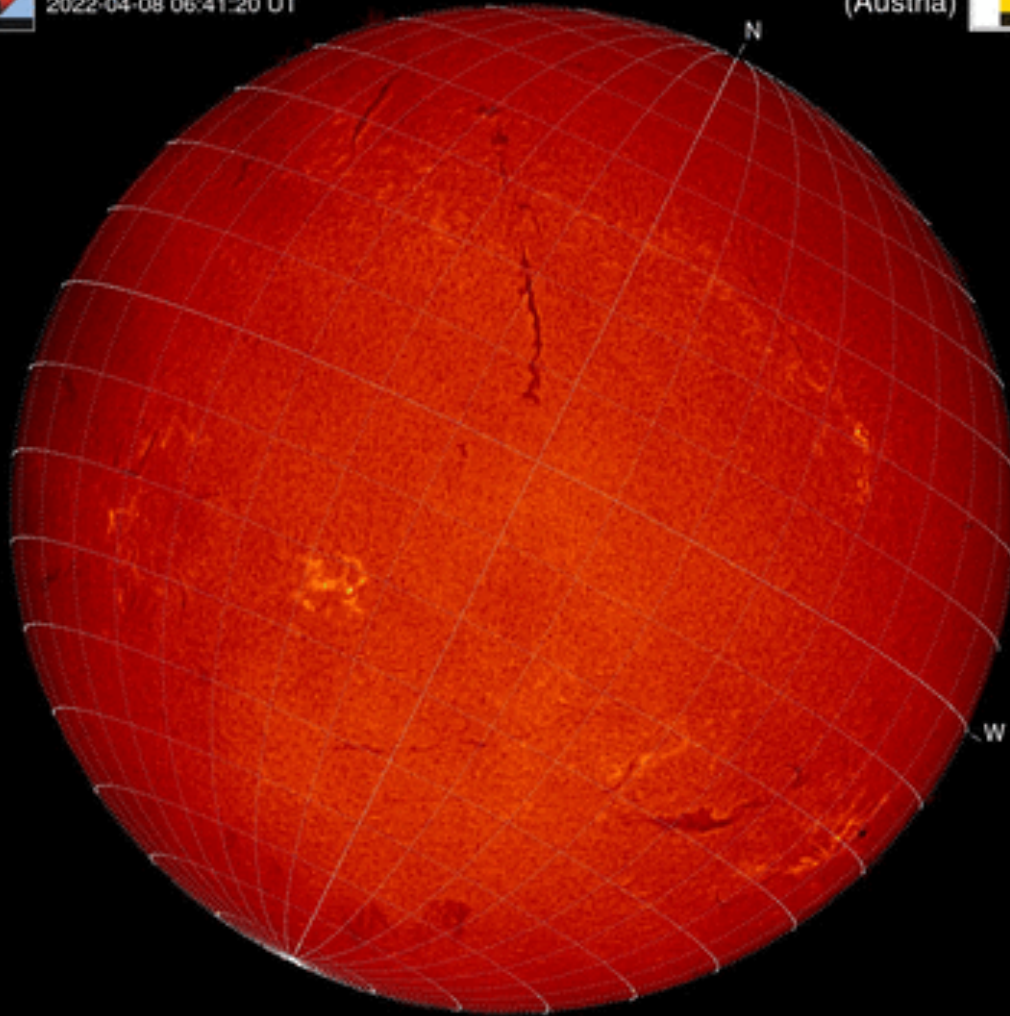
Filaments & Filament eruptions

H-alpha 2022-05-15



Kanzelhöhe Observatory
2022-04-08 06:41:20 UT

University of Graz
(Austria)

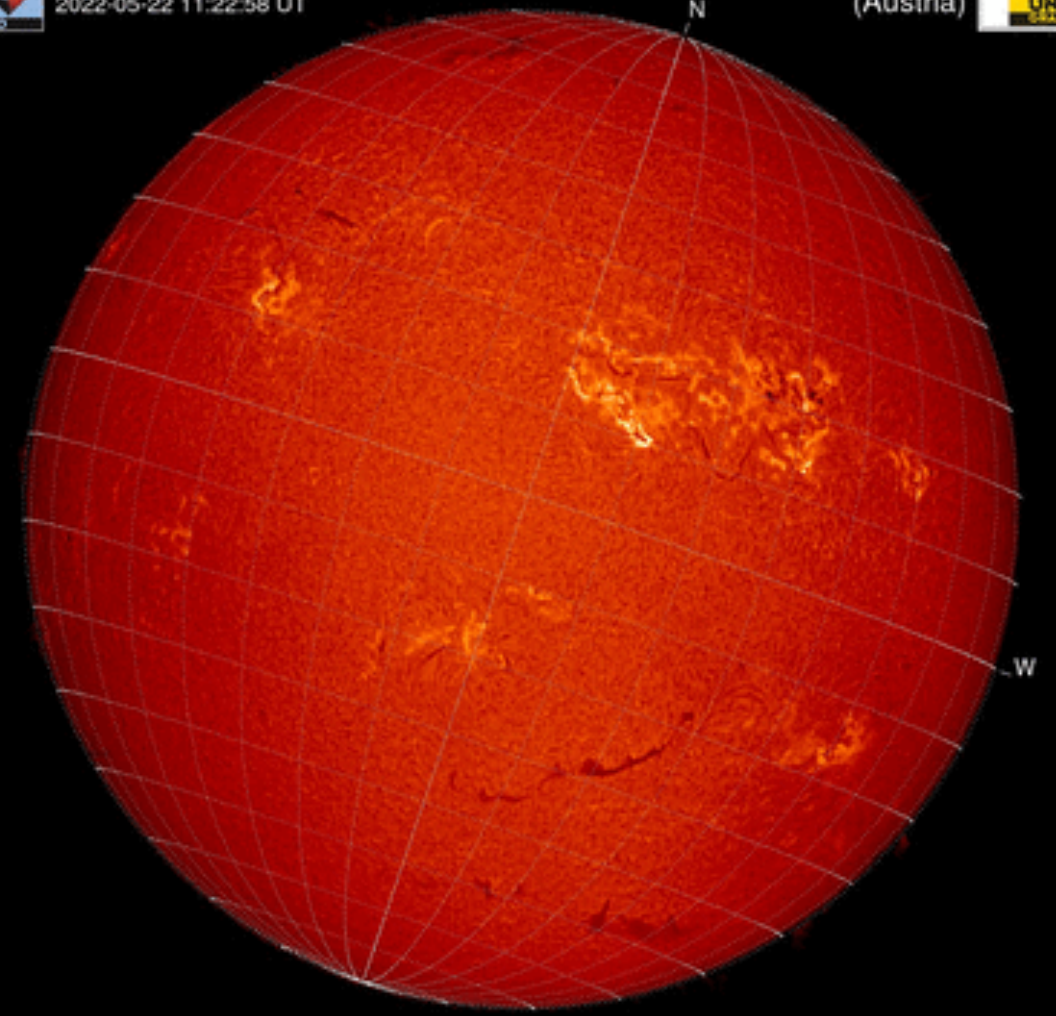


H-alpha 2022-05-22

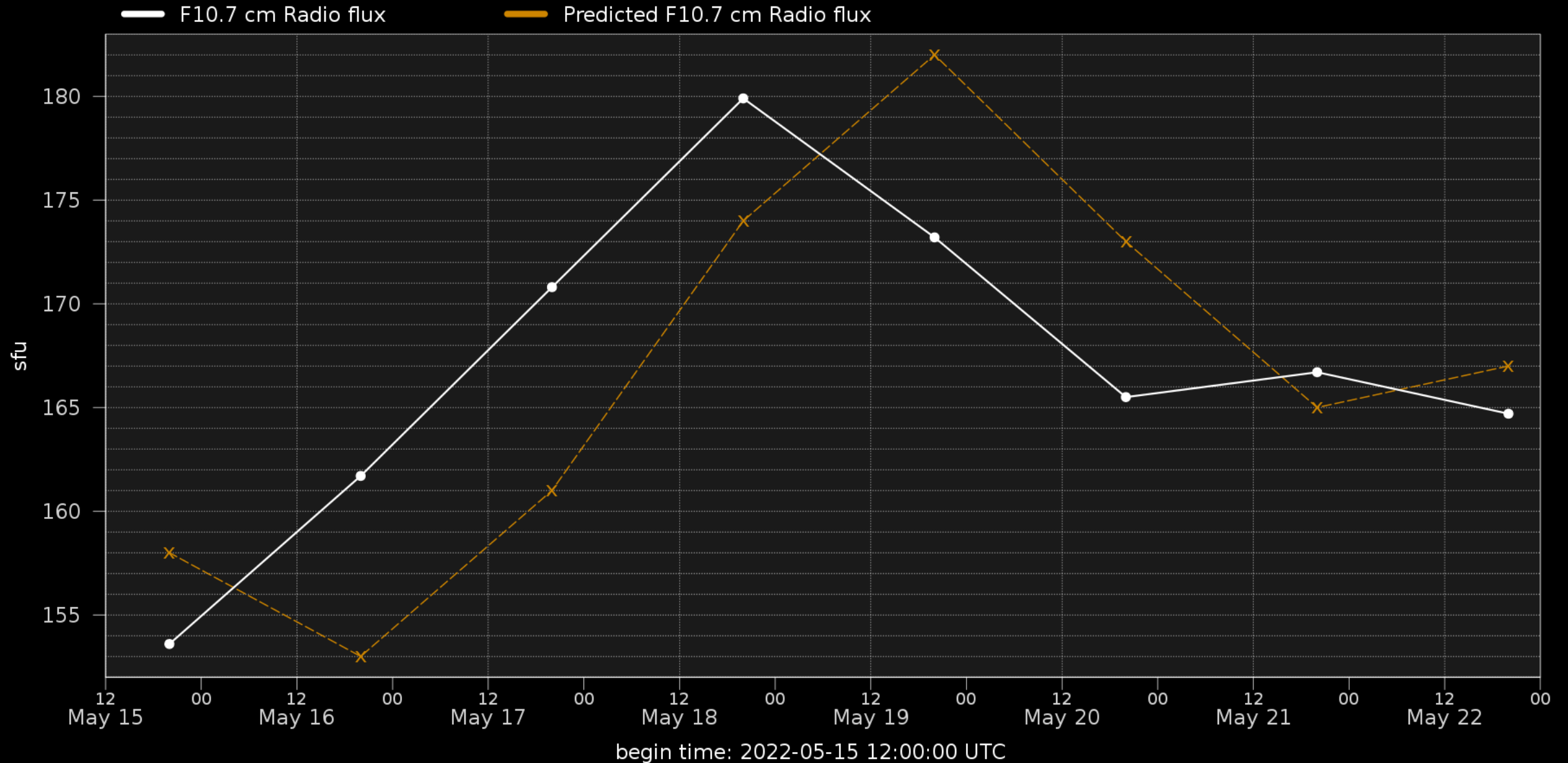


Kanzelhöhe Observatory
2022-05-22 11:22:58 UT

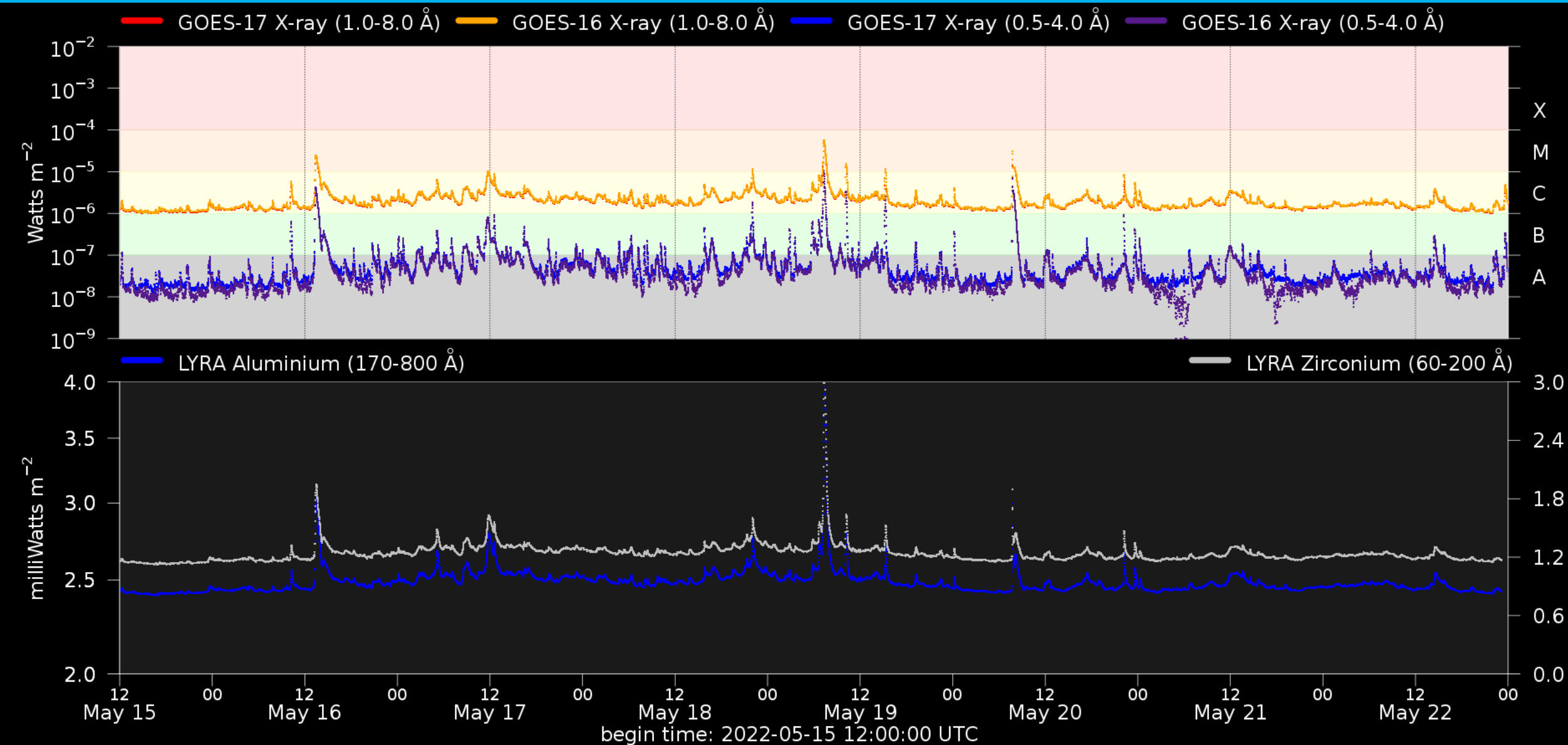
University of Graz
(Austria)



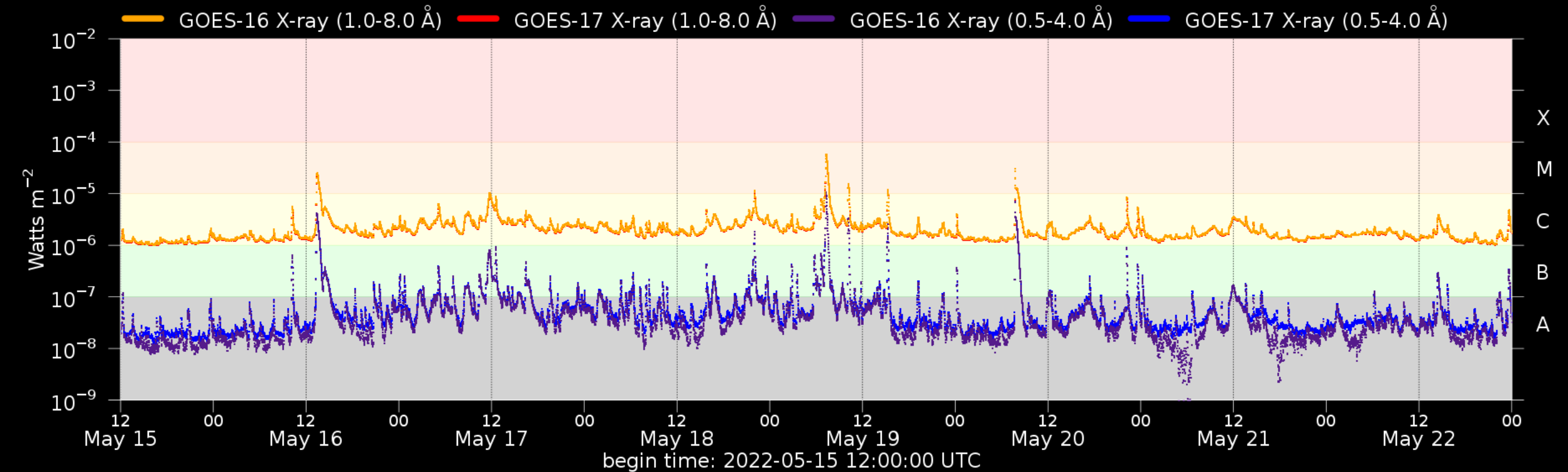
Solar F10.7cm radio flux



Solar X-Ray and UV flux



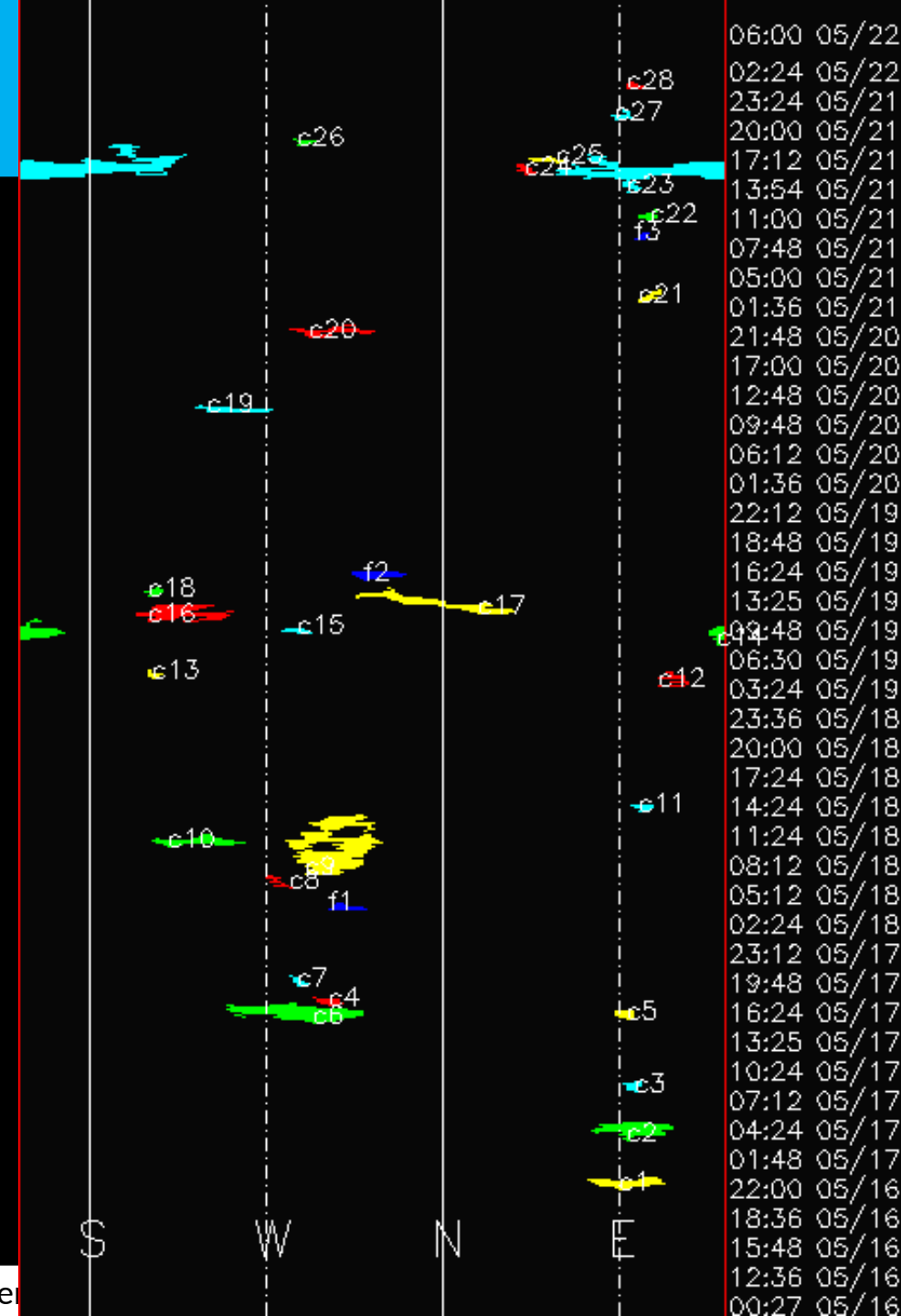
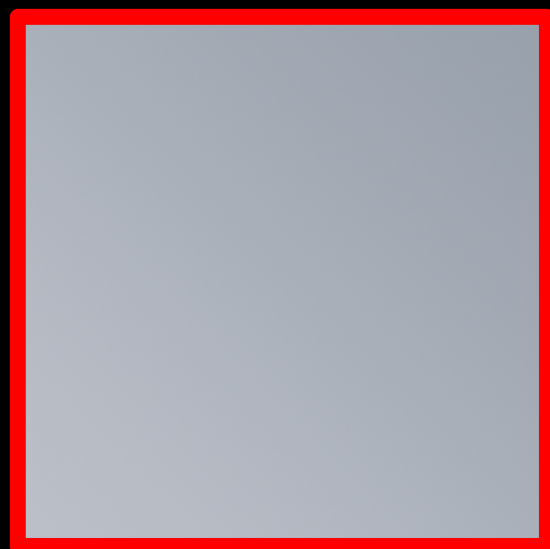
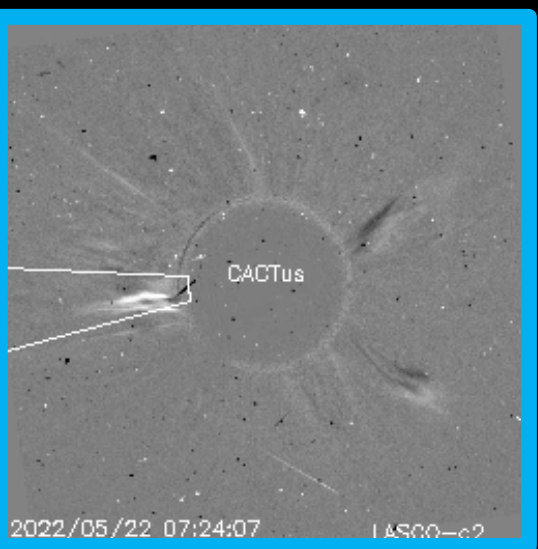
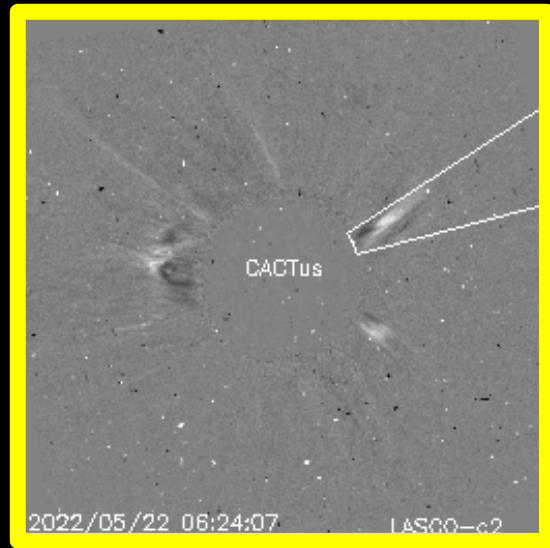
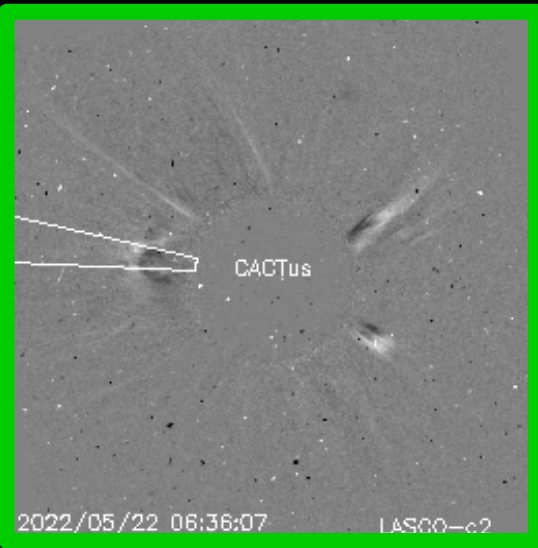
Flaring activity



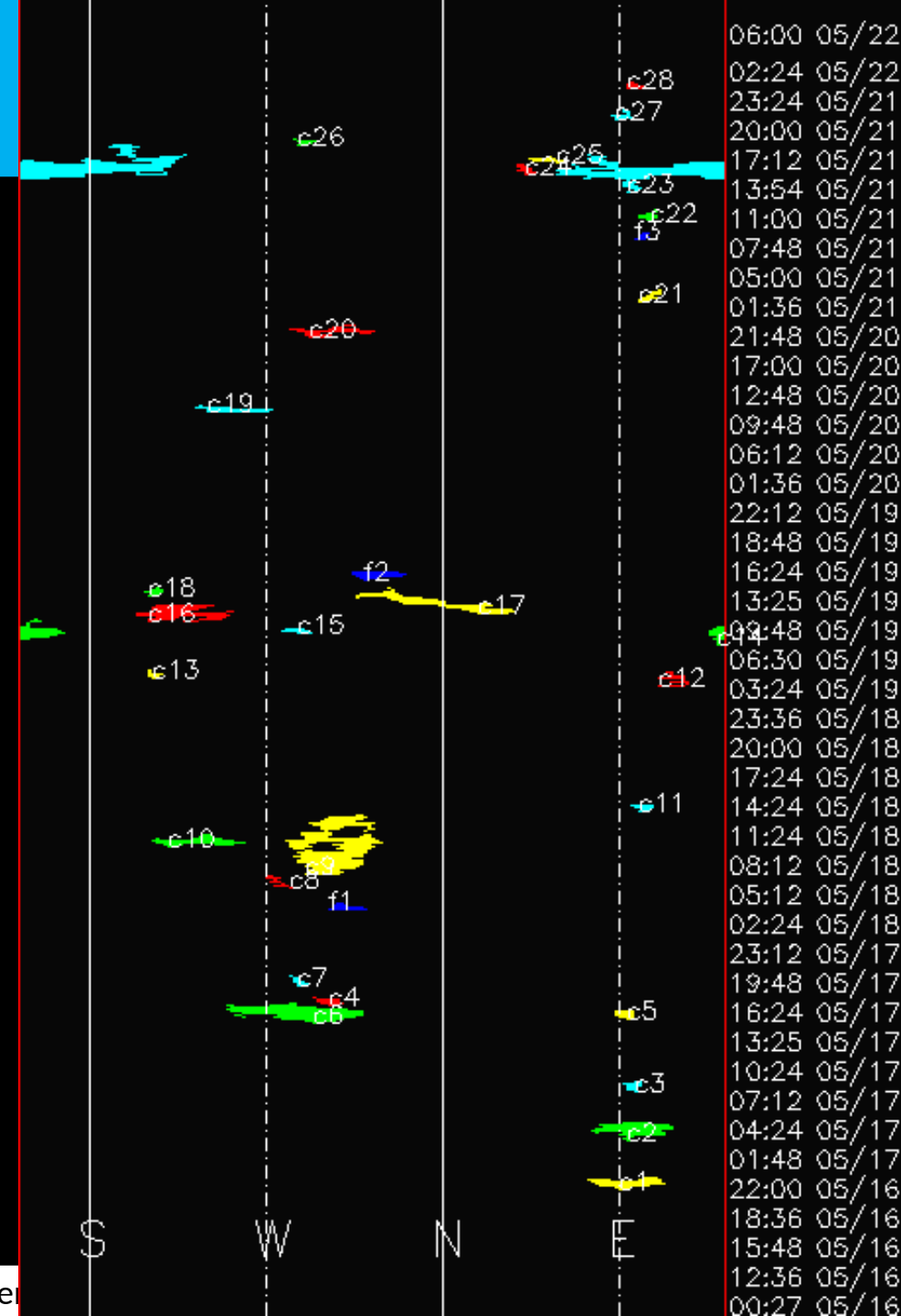
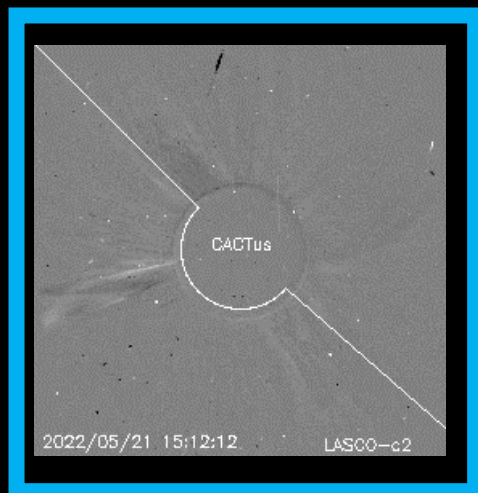
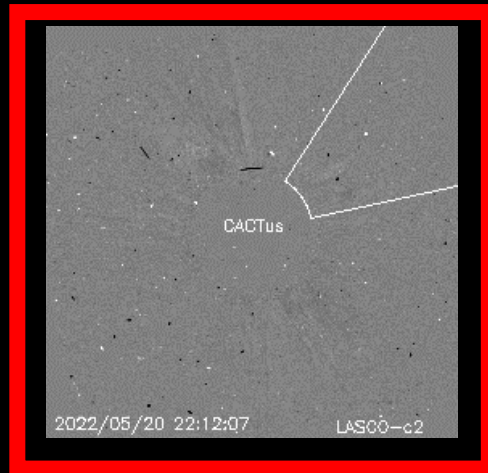
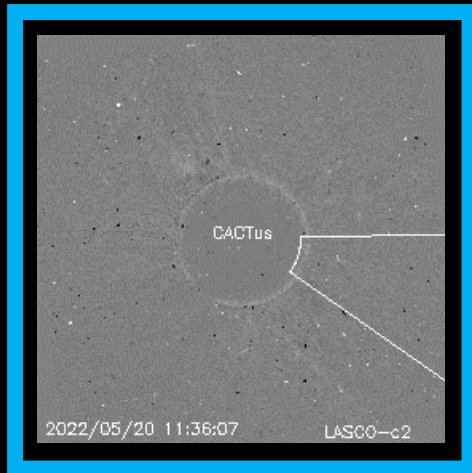
Probabilities (%) and occurrences (#) of C/M/X-flares daily, from noon to noon:

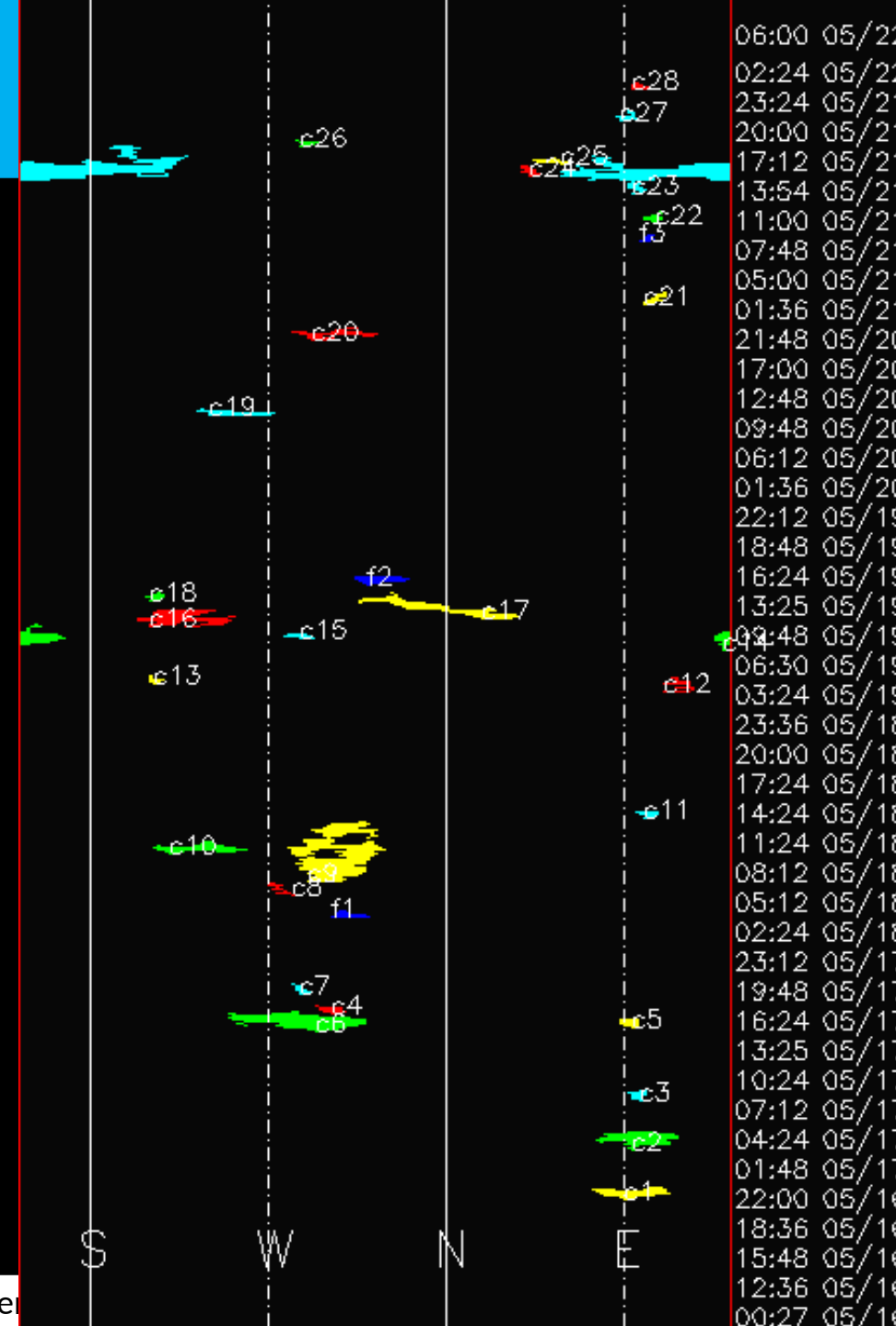
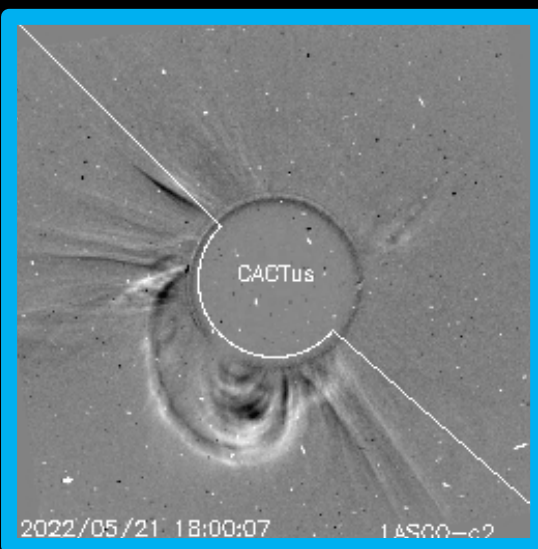
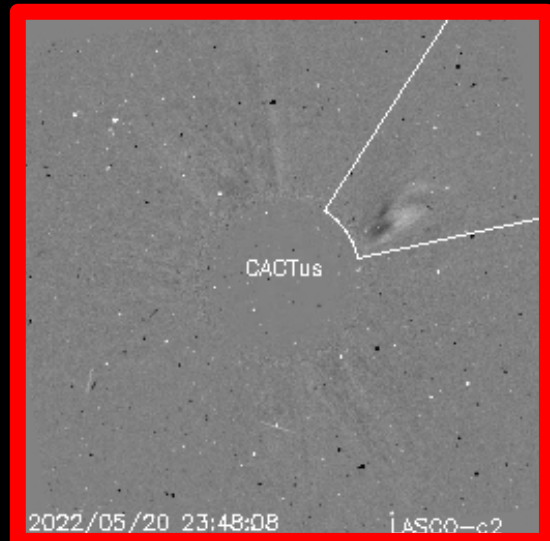
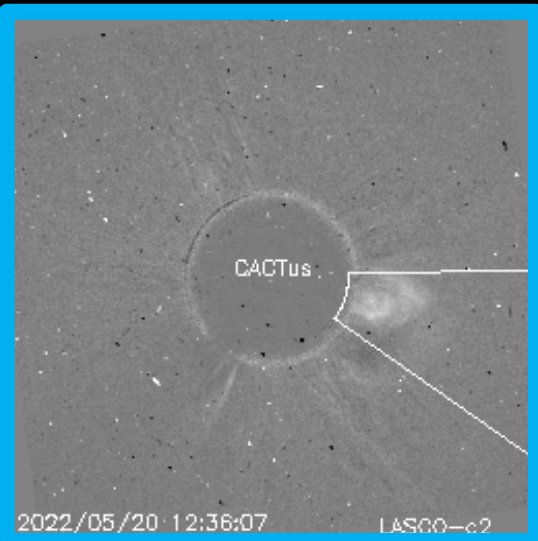
Issue date	2022-05-15	2022-05-16	2022-05-17	2022-05-18	2022-05-19	2022-05-20	2022-05-21	2022-05-22
Probability (%)	98 50 15	90 15 01	99 70 05	99 25 01	99 60 15	99 60 05	95 35 05	98 45 05
Observed (#)	04 00 00	03 01 00	07 00 00	05 03 00	02 02 00	03 00 00	02 00 00	02 00 00

Coronal Mass Ejections



Coronal Mass Ejections





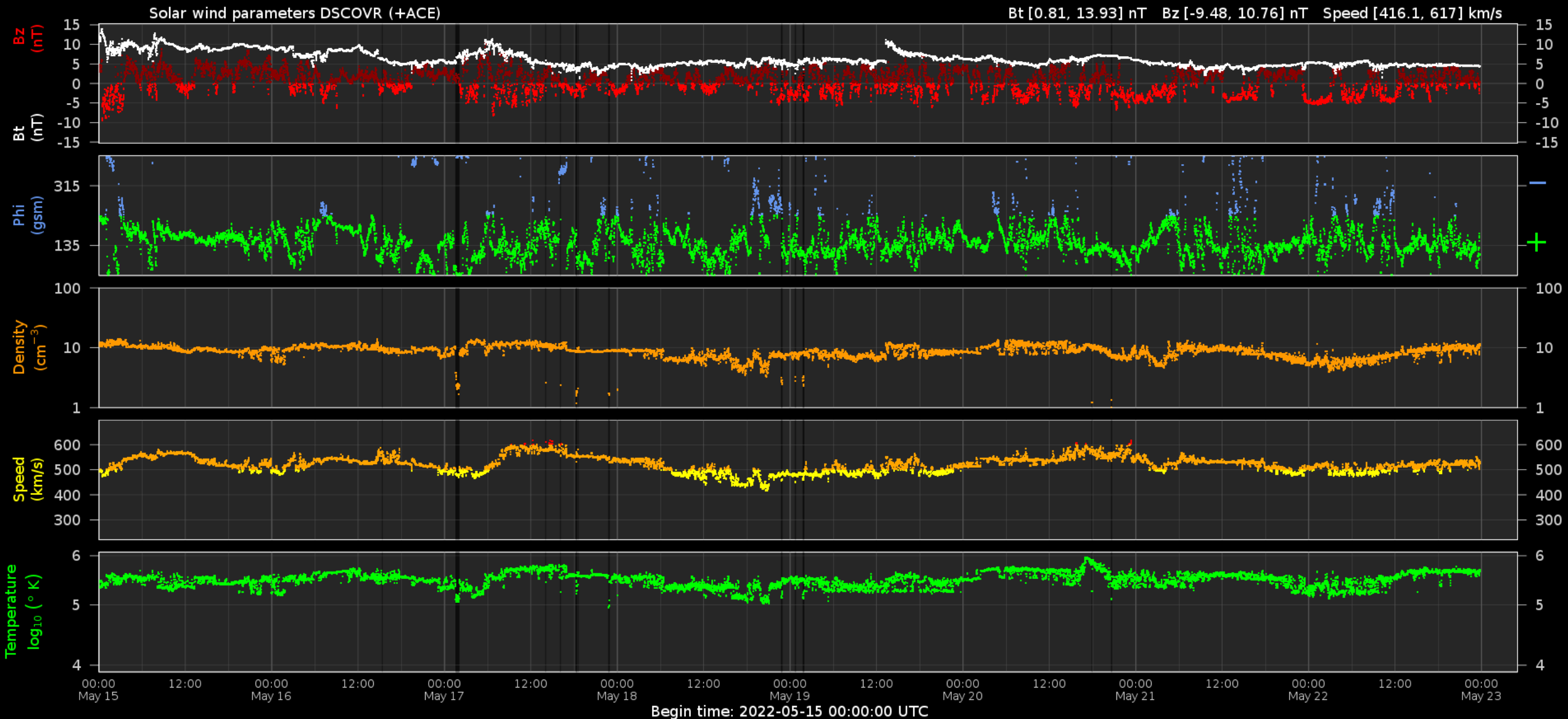
Solar Wind and Geomagnetic Activity



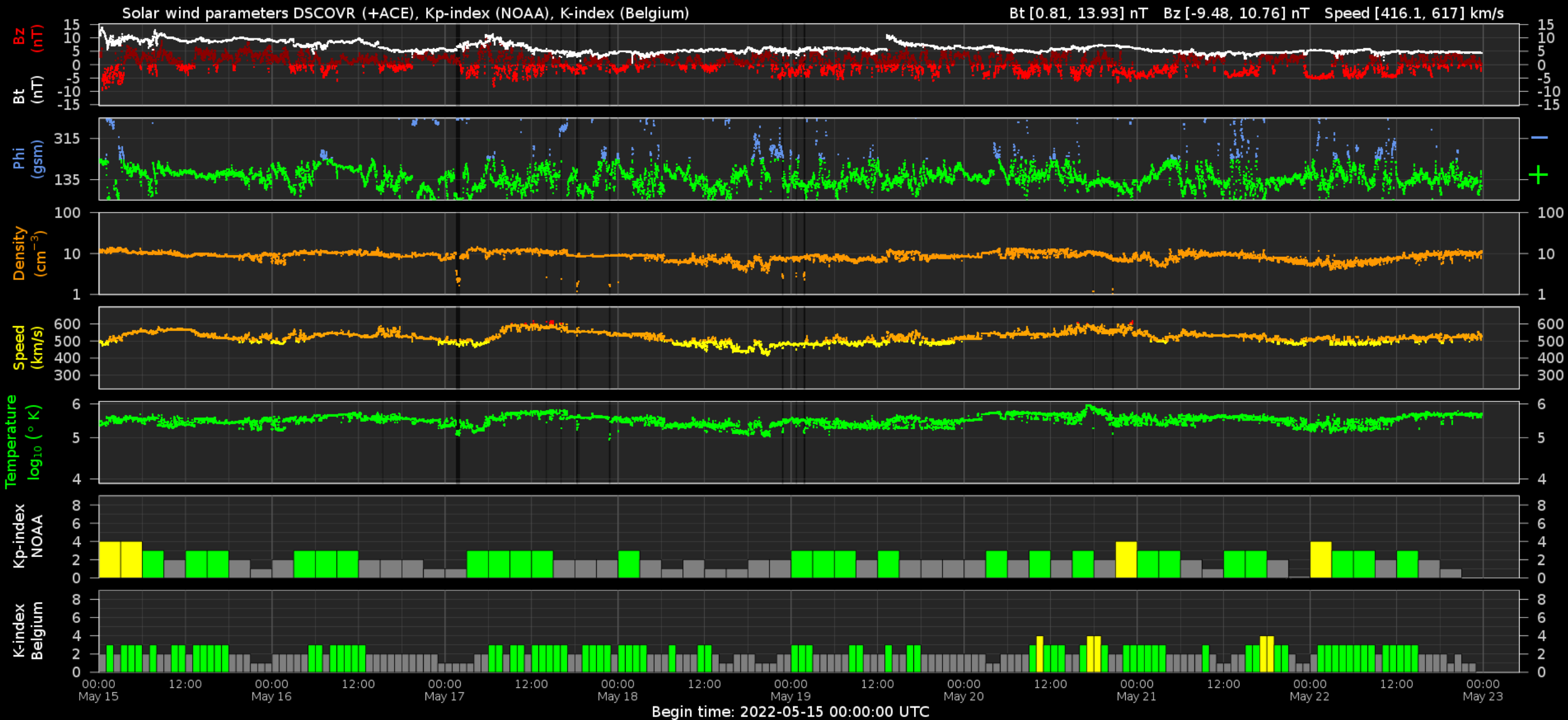
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Solar wind parameters



Solar wind parameters & K-indices



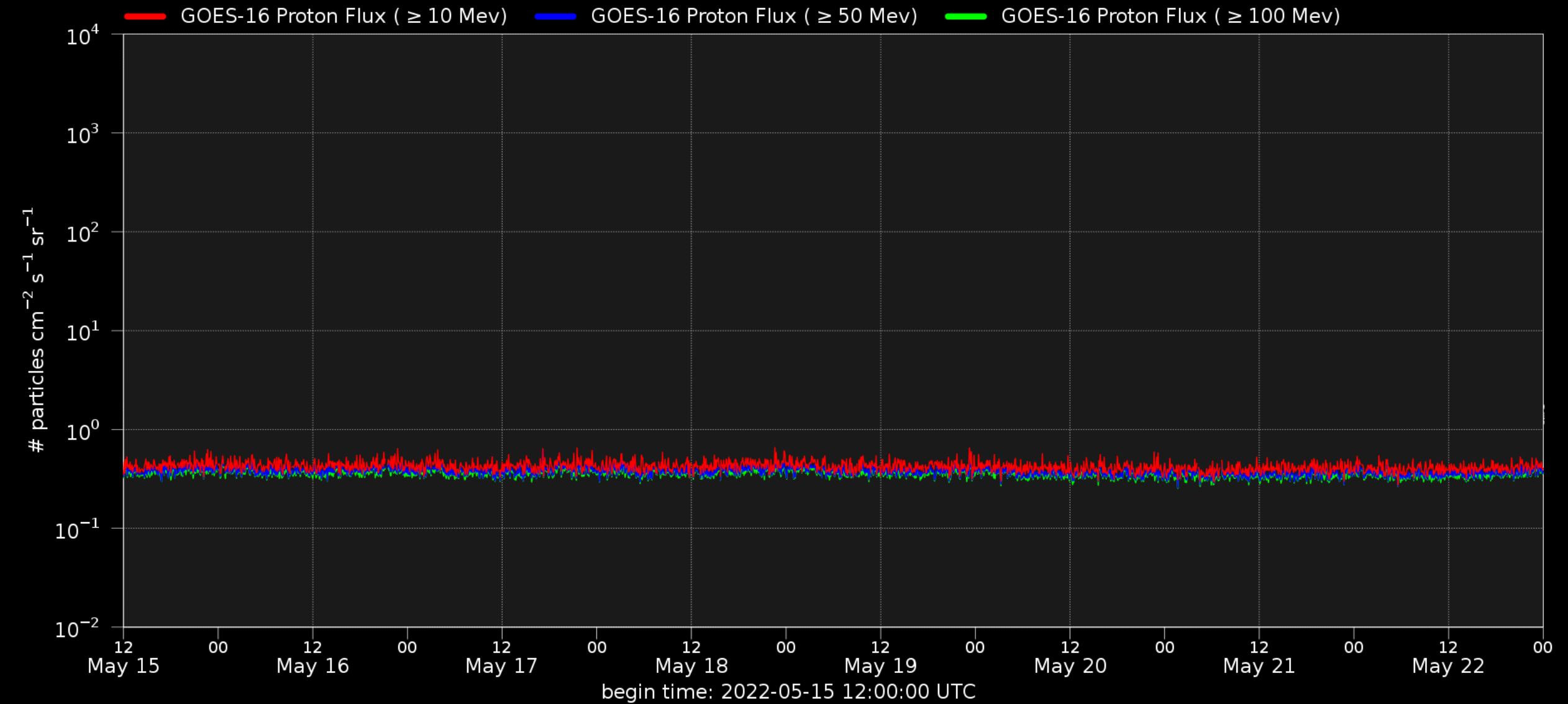
Energetic Particles



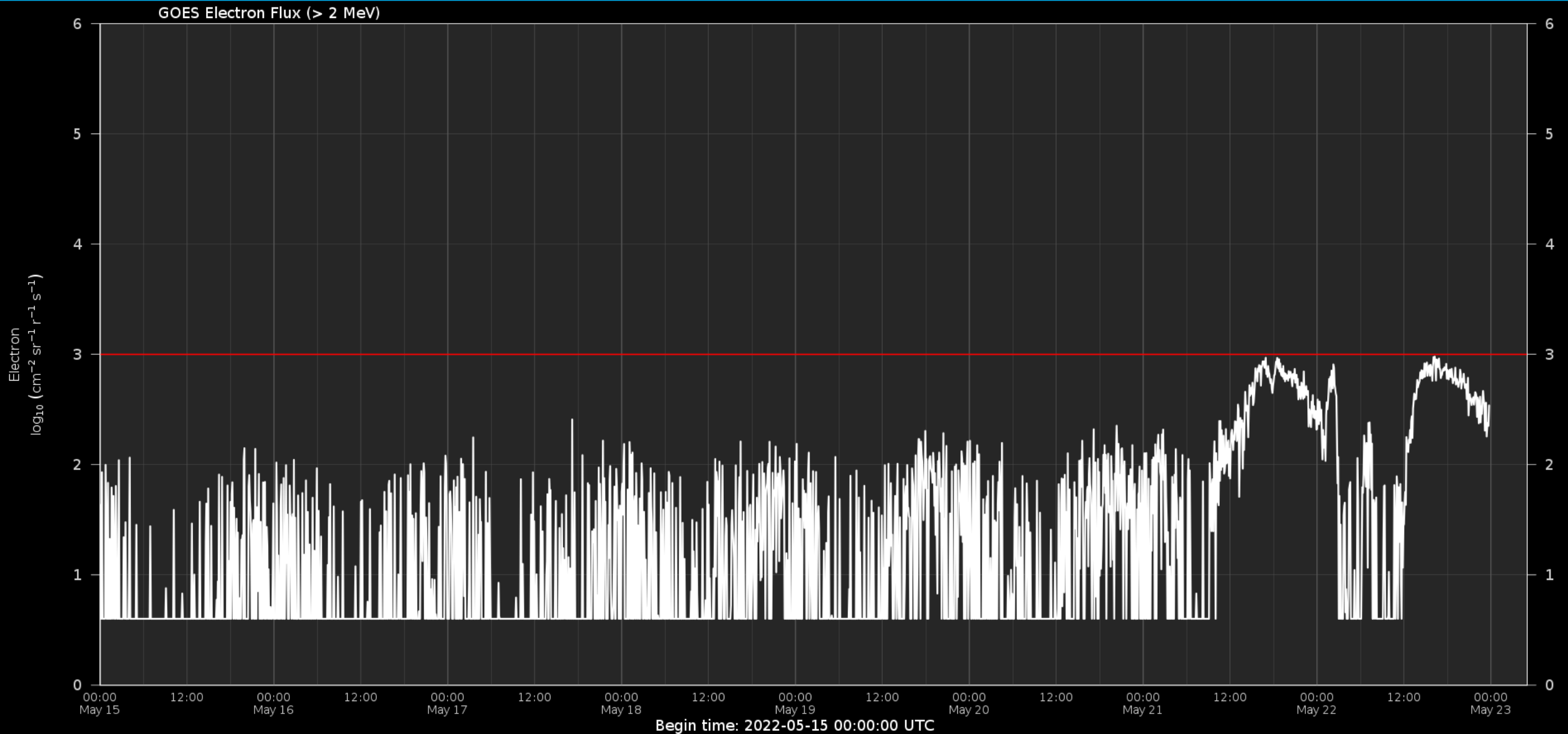
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Solar proton flux



Electron flux at GEO



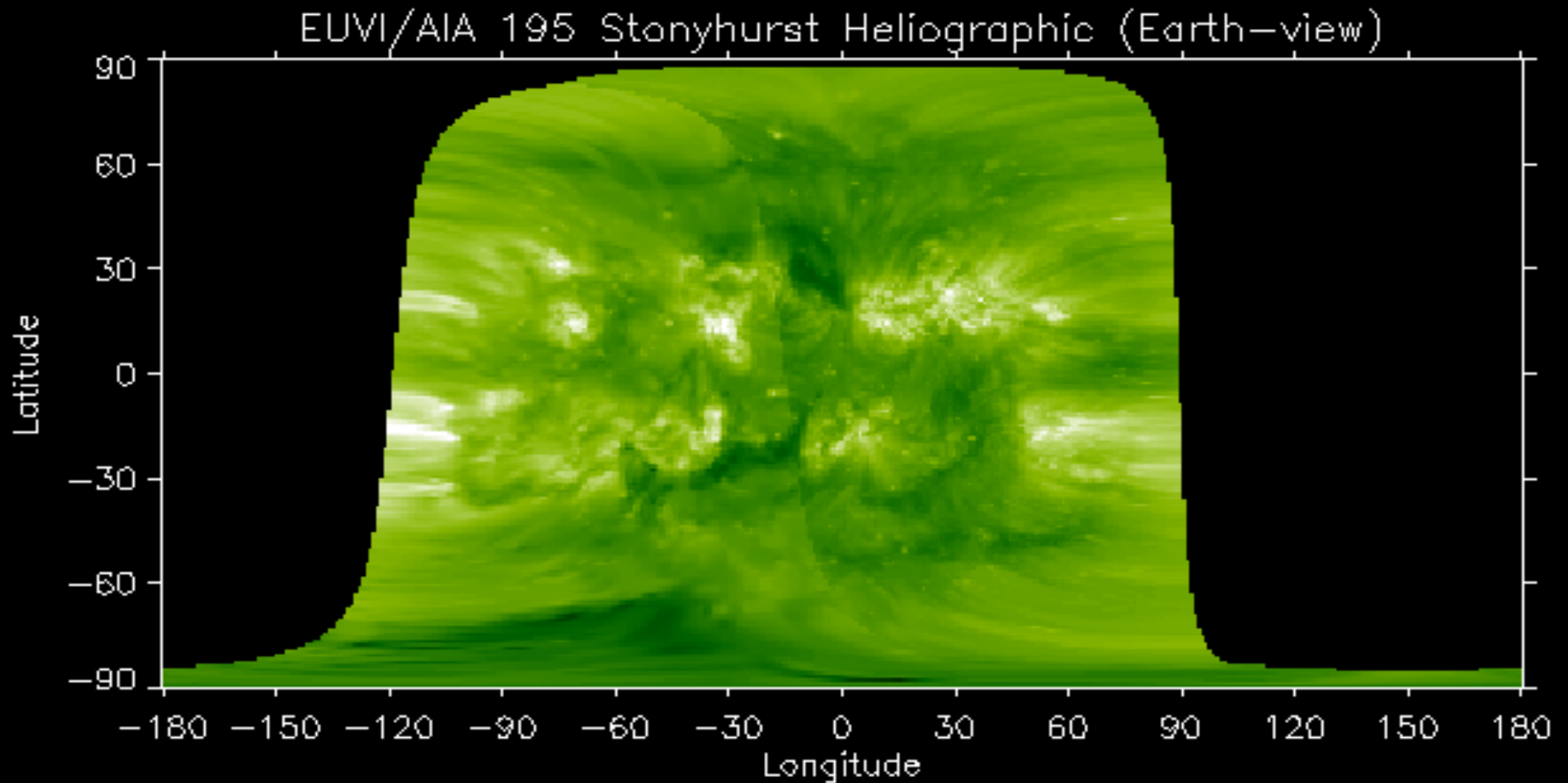
Outlook



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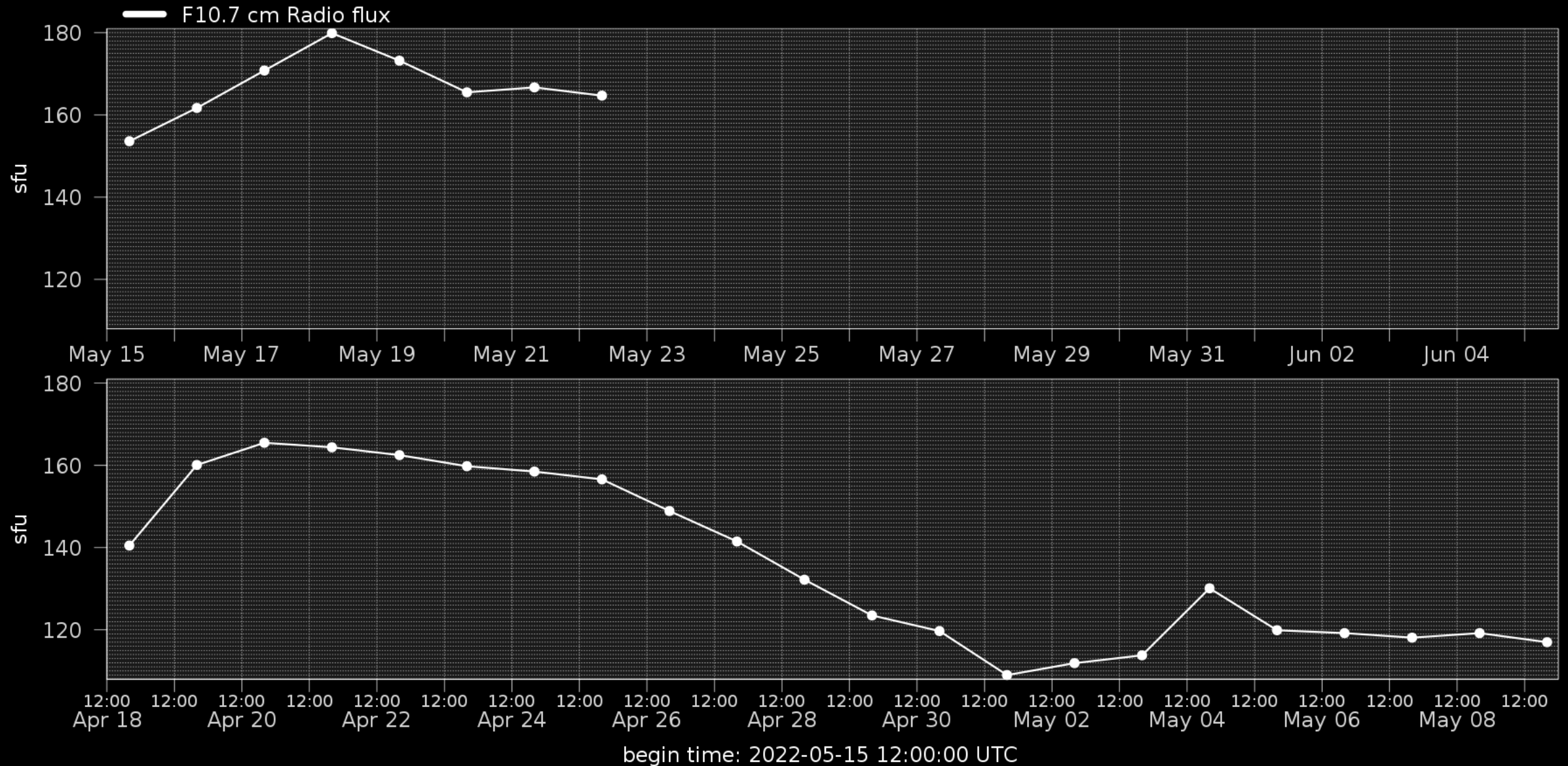
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Outlook: Solar activity

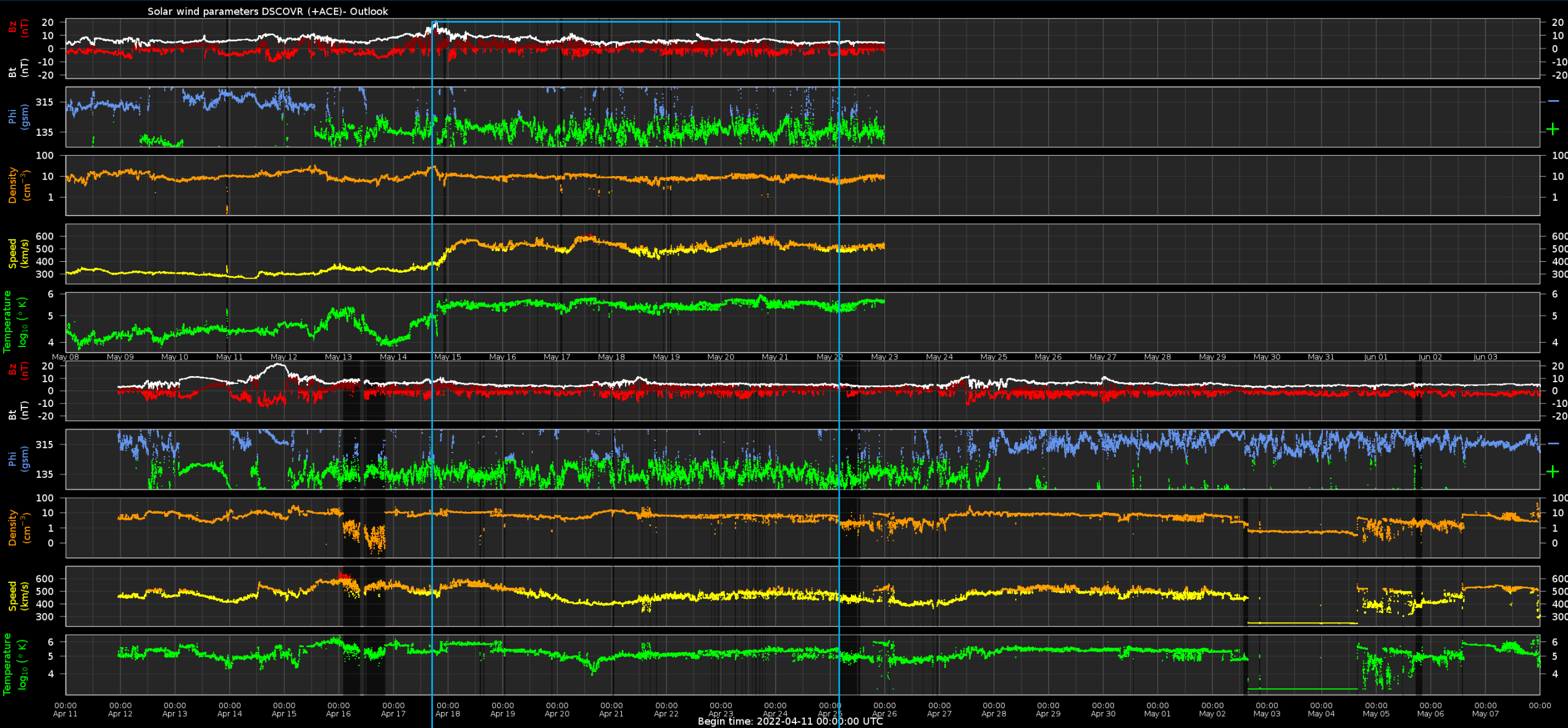


Observation date: 2022/05/22 23:15:00

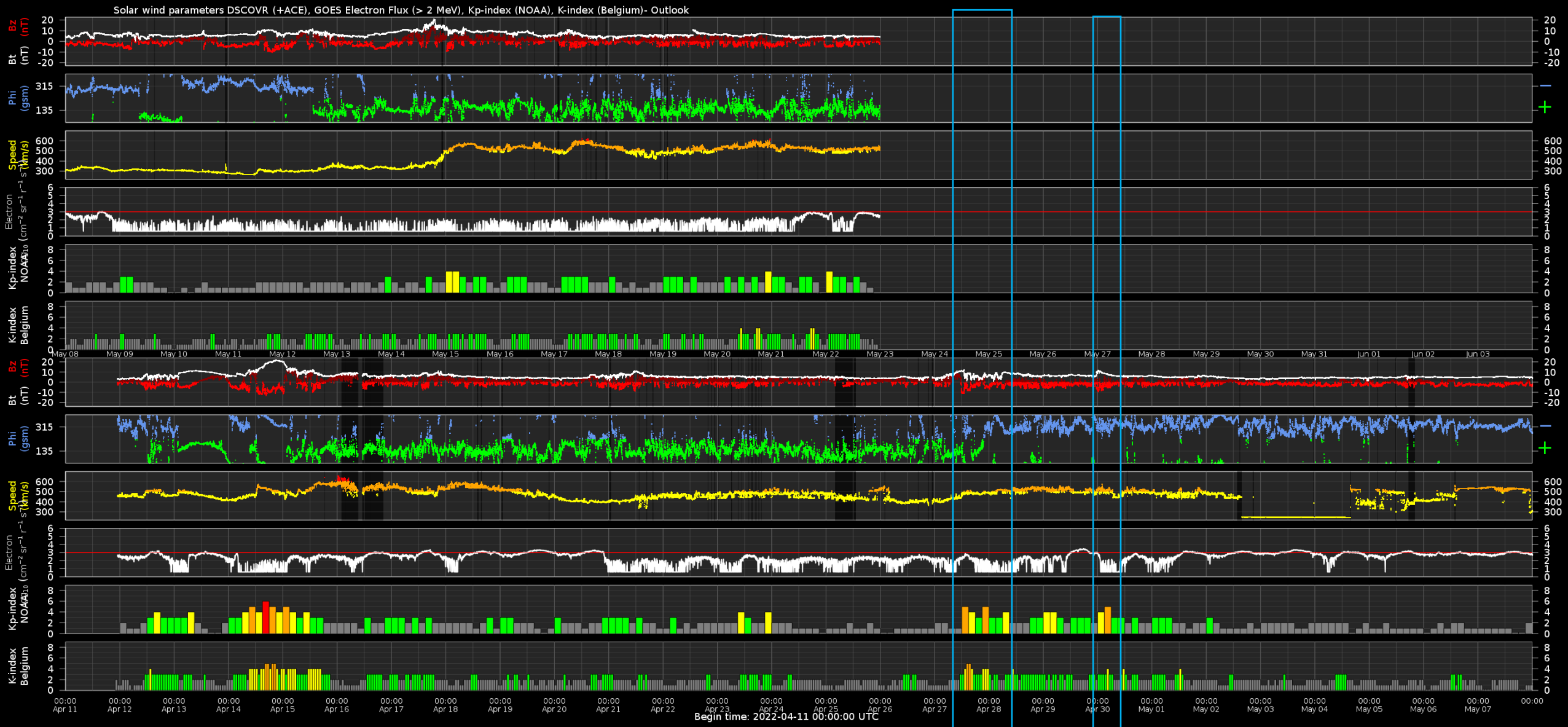
Outlook: Solar F10.7cm radio flux



Outlook: Solar wind parameters



Outlook: Electron Flux at GEO Outlook



SIDC Space Weather Briefing

See you at our next briefing!

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