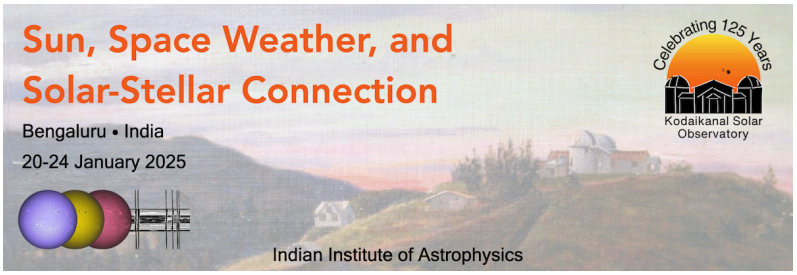

Contribution ID: **117** Type: **Poster**

Connection Between Coronal Abundances and Underlying Lower Atmospheric Properties in Solar Active Regions

The solar corona and solar wind are often observed to have elemental abundances different from the solar photosphere, and the observed fractionation appear to depend on the element's first ionization potential, and it is thought to be linked to the processes leading to the solar atmospheric heating. We have used coordinated coronal (Hinode/EIS) and chromospheric and transition region (IRIS) observations to investigate the presence of a footprint of the fractionation process in the lower atmosphere. We discuss intriguing correlations between observed coronal abundances and the properties (turbulence, non-thermal width) of the lower atmosphere, and the potential implications for models of chemical fractionation.

Contribution Type

Theme

Connecting Solar Corona to Heliosphere

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Session Classification: Poster Session-II / Coffee Break