

TSI and Ground-Based Data: What Can be Learned?

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The San Fernando Observatory (SFO) has 20+ years of ground-based photometric data taken in the red (672.3 nm), blue (472.3 nm), and CaII K-line (393.4 nm) wavelengths. Models using SFO data correlate well with satellite data and can help determine the contribution of sunspots and faculae/network to total solar irradiance (TSI). PSPT provides similar ground-based data. Currently, TSI composites based on data from several different space-borne instruments are being proposed. How well do SFO's models, as well as those using PSPT data, correlate with each of these composites and what can be learned from such an exercise?