



Type III source locations as inferred from stereoscopic observations

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We study the Type III solar bursts simultaneously recorded by radio experiments onboard Cassini, Ulysses and Wind. Those radio bursts cover a large frequency range from about 14 MHz to a few kHz. The corresponding source locations are mainly in the solar corona and the interplanetary medium. The empirical electron density models provide different distances depending on the emission mode, fundamental or harmonic. A real trouble arises due to the distance discrepancies, as inferred from the models. Also the Archimedean spiral trajectories of the electrons, at the origin of the Type III bursts, are another difficulty to correctly estimate the source locations. We show in our analysis that the stereoscopic observations are essential to reduce the source location inaccuracy. We finally discuss the relationship between the Type III beams, the emission modes and the source locations.