



## **HST observations of Jupiter's UV aurora during Juno's orbits PJ03, PJ04 and PJ05**

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The intense ultraviolet auroral emissions of Jupiter are currently being monitored in the frame of a large Hubble Space Telescope (HST) program meant to support the NASA Juno prime mission. The present study addresses the three first Juno orbits (PJ03, 04 and 05) during which HST obtained parallel observations. These three campaigns basically consist of a 2-week period bracketing the time of Juno's closest approach of Jupiter (CA). At least one HST visit is scheduled every day during the week before and the week following CA. During the  $\sim 12$ -hour period centered on CA and depending on observing constraints, several HST visits are programmed in order to obtain as many simultaneous observations with Juno-UVS as possible. In addition, at least one HST visit is obtained near Juno's apojoive, when UVS is continuously monitoring Jupiter's global auroral power, without spatial resolution, for about 12 hours. We are using the Space Telescope Imaging Spectrograph (STIS) in time-tag mode in order to provide spatially resolved movies of Jupiter's highly dynamic aurora with timescales ranging from seconds to several days. We discuss the preliminary exploitation of the HST data and present these results in such a way as to provide a global magnetospheric context for the different Juno instruments studying Jupiter's magnetosphere, as well as for the numerous ground based and space based observatories participating to the Juno mission.