

Magnetotail flow-pattern dependences on auroral breakup locations

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Geotail plasma flow observations between 5 and 30 Re down the tail have been investigated at times when 1400 auroral breakup events were identified in the Polar ultraviolet imager observations.

As a result, the fast flows were restricted in the dawn-dusk direction and their longitudes were associated with breakup longitudes. It was also found that the fast flows were more often observed when the breakups occurred in the low-latitude regions.