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## Structure of the magnetosheath as observed with Geotail spacecraft

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Twelve crossings of the magnetosheath near the dayside magnetopause were examined. These crossings were obtained during the period October 1995 to April 1996 and were located near the magnetopause subsolar point. Decreases and increases of plasma densities were found as previously reported in terms of a plasma depletion layer and standing slow-mode waves in front of the magnetopause. We examine the detailed character of these regions of density fluctuations with the three-dimensional velocity distributions of plasmas with the Comprehensive Plasma Instrumentation (CPI) on board the Geotail spacecraft. Our initial findings are that the anticipated signatures for a compressive slow-mode wave, such as an increase of bulk speeds or temperatures as the magnetopause is approached, are not found despite the existence of a large density increase.

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