

PROBLEM

The most important fields (e_Y , e_Z , b_X), being the smallest fields, are contaminated by the largest fields when the normal to the current sheet is inaccurate.

The analysis assumes a normal direction that is constant, whereas the normal oscillates ~ 5 degrees due to surface waves on the magnetopause. These produce error signals $\sim (\text{Big Field}) * \sin 5^\circ$ which are comparable to the (Small Field).

CONCLUSION

The parameters that determine that reconnection is occurring and what its magnitude is, are poorly measured.