**DISCUSSION**

Spatial analysis shows the spatial distribution of major fracture orientation sets observed in the quadrangle and their hydrogeologic significance. Figure B7 shows the fracture zones in the Ayer quadrangle are typically steeply dipping, and occur in conjugate north-south trending sets. Well-foliated biotite-sillimanite gneisses, amphibolites, and sulfidic schists. Partings parallel to foliation generally poorly developed except near Clinton-Newbury fault. Orthogonal, northwest-dipping fractures dominate groundwater flow. Xenoliths are commonly aligned with foliation in the granites.

**HYDROSTRUCTURAL DOMAINS**

See Sheet 2 for summary and explanation of the hydrostructural domains.

**LEGEND**

- **MASSIVE GRANITES AND FOLIATED GNEISSES OF THE MERRIMACK BELT**
  - Data collected by R.H. Jahns, 1940
  - See Sheet 2 for summary and explanation

**APPENDIX B: SPATIAL ANALYSIS - SHEET 3 OF 4**

**PRELIMINARY FRACTURE CHARACTERIZATION MAP OF THE AYER QUADRANGLE, MASSACHUSETTS:**

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2006