

TEKTITE FROM JENKINS COUNTY, GEORGIA Harold Povenmire Florida Institute of Technology 215 Osage Dr. Indian Harbour Beach, FL 32937 and Seth Chance Box 314, Perkins, GA 30882

In April 1996, a tektite was found in northeastern Jenkins County, GA by S. Chance. This is significant as this extended the known limits of the Georgia tektite strewn field by 75 km to the ENE. This tektite was found in a gravel quarry where the typical pebble was of tumbled quartz with an average diameter of 4 cm. This quarry has the coordinates of long. 81° 49' 46" W. and lat. 32° 53' 12" N. at an elevation of 100 m. This location is on the U.S.G.S. 7.5 Sardis, Ga. 1978 quadrangle. This tektite is a very long and slender teardrop with dimensions of 50 X 9 X 8 mm with a weight of 4.56 g. It is a paradox as to how this very delicate tektite could have been transported with the much larger quartz pebbles and not suffered severe damage.

One of the unresolved questions is whether there are systematic differences in the composition of georgiites over the 180 km length of the strewn field. The Jenkins Co. specimen is from the extreme northeastern part of the strewn field. A well-documented georgiaite from Houston County was chosen to represent the extreme western end of the strewn field. Another well-documented georgiaite from Emanuel County was chosen to represent the center of the strewn field. All three specimens have similar major element compositions as determined by energy dispersive x-ray analysis (Table 1).

Table 1. Major Oxide Composition of Three Georgiites.

	Houston Co.	Emanuel Co.	Jenkins Co.
SiO <sub>2</sub>	82.1	82.2	81.7
Al <sub>2</sub> O <sub>3</sub>	10.9	10.6	11.2
FeO*	2.2	2.5	2.3
MgO	0.7	0.7	0.9
CaO	0.5	0.5	0.6
Na <sub>2</sub> O	0.6	0.6	0.5
K <sub>2</sub> O	2.5	2.5	2.4
TiO <sub>2</sub>	0.4	0.4	0.5

\*Total iron given as FeO

The significant finding is not that there was little difference in composition of tektites from the extreme ends of the strewn field, but that the three specimens were so nearly identical. The differences are not much more than the error of measurement and could be found in specimens found next to each other or even in different parts of the same specimen. I wish to thank B.P. Glass for the major element analysis of these specimens.

References: B.P. Glass (1996) personal communication.