14265

PHYSICAL CHARACTERISTICS

Mass Dimensions

65.79 g 5.5 x 5.5 x 4.5 cm

The sample is angular, with half the surface coated with dark greenish gray to black glass. The rock is a medium dark gray, coherent fragmental rock.

SURFACE FEATURES

The surface of the rock is irregular and 50% glass-coated. Traces of what may have been glass linings of zap pits on the breccia suggest that some surfaces may have been pitted, but abrasion has removed most of the evidence of pitting. There are no pits on the glass. The glass is finely vesicular. Many penetrative fractures are present in the samples, some of which are filled with glass.

PETROGRAPHIC DESCRIPTION

Eighty-five to ninety percent of the sample is a medium dark gray material less than 0.1 mm in size. It does not have the resinous luster of glass and may be aphanitic crystalline texture. The remaining 10-15% of the sample is composed of two types of lithic fragments and two types of mineral fragments. Type I are very light gray lithic fragments and account for all but a couple percent of the remaining material. They are subangular to subrounded and are dominantly less than 0.1 mm in size, but range up to 3 mm in size. These lithic fragments contain various proportion of crushed white and gray material looks vitreous. The second type of lithic clast is medium light gray and is less than 1% of the sample. Grains are subrounded to subangular in shape and are less than 1.0 mm in size. These appear to be finely recrystallized material. The first type of mineral fragment is light yellow-green olivine occurring as subrounded grains making up less than 2% of the sample. The second type of mineral fragment is reddish brown, probably pyroxene and is subrounded in shape. It is less than 1% of the sample. Both types of mineral fragments are less than 1.0 mm in size.

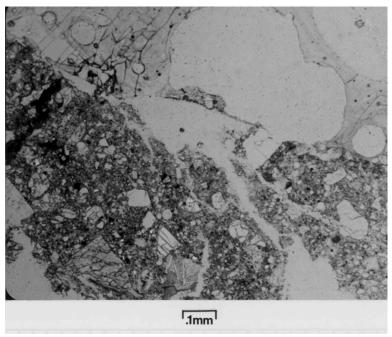
Thin section 14265,7 is to a large extent composed of vesicular glass bonding small fragments of a polymict breccia. The glass shows only minor devitrification and is highly fractured. The vesicles are 0.1-0.2 mm in diameter. The glass is more or is continuous. The breccia part of the section has abundant glass in the matrix both as free fragments and as bonding material. The glass accounts for approximately 30% of the matrix. There are no clasts present and the largest fragments are glass. The remaining fragments are pyroxene, plagioclase, devitrified glass, and small pieces of microbreccia.

DISCUSSION

Sample 14265 is one of those investigated by Eldridge et al. (1972). Concentrations of K, Th, U, ²⁶Al, and ²²Na were determined by gamma-ray spectrometry.



Width of image is approximately 5.5 cm, S-71-29151



14265,7