



FIGURE 39

GEOLOGIC MAP OF THE BERYLLIUM AND TIN DEPOSITS IN LOST RIVER VALLEY, WESTERN SEWARD PENINSULA, ALASKA

0 400 800 1200 FEET
 Contour interval 50 feet
 Datum is approximate mean sea level

Base from plane-table survey by
 C. L. Sainsbury and D. W. Peters

Geology by C. L. Sainsbury, J. M. Kelly, and
 D. W. Peters, 1964

ALASKAN GEOLOGY BRANCH
 TECHNICAL DATA FILE

<p>Recent</p> <p>Pleistocene</p> <p>Upper Cretaceous</p> <p>Lower Ordovician</p>	<p>Qal Alluvium</p> <p>Qf Terrace gravels</p> <p>Qf Alluvial fans</p> <p>D Dikes Includes rhyolite, rhyolite porphyry, altered rhyolite, and fresh and altered dark dikes</p> <p>Km Mafic intrusive Dark-colored augite-bearing intrusive with xenoliths of limestone and dolomite</p> <p>Oish Limestone and shale Medium-bedded, medium-gray to dark-gray limestone which weathers dark brown, and minor dark shale and gray-black crystalline limestone</p> <p>Osh Shale Black shale and minor black, crystalline limestone; gives rise to black soil</p> <p>Olm Limestone and argillaceous limestone At top consists of medium to thick-bedded light-gray limestone that weathers bluish gray; grades downward into massive micritic medium-gray to light-gray limestone with interbedded argillaceous limestone</p> <p>Oia Limestone and argillaceous limestone Interbedded medium- to thick-bedded medium-gray limestone, locally contains chert, and thin-bedded argillaceous limestone that weathers limonitic yellow Oia, dolomitized equivalent along fault</p> <p>Oal Argillaceous limestone Thin bedded argillaceous limestone that weathers limonitic</p> <p>Fluorite-beryllium rock and sulfides At surface denotes float which is very heavy where cross hatched, moderately heavy where lined, and noticeable where dotted (dot spacing denotes relative amount); pluses denote sulfide minerals in drill holes, denotes mineral in place</p> <p>Hydrothermal silica Includes gray chalcedonic silica west of Lost River, and rusty, siliceous boulders of unknown origin east of Tozer prospect; generally lies on periphery of fluorite-beryllium lodes</p> <p>Contact Dashed where gradational or approximately located; dotted where concealed completely; queried where probable</p> <p>Tundra limit Marks upper limit of tundra sufficiently thick to prevent precise geologic observations</p> <p>Fault, showing dip U, upthrown side; D, downthrown side. Dashed where approximately located; dotted where concealed; queried where probable. Teeth denotes part of a fault that is dipping very shallowly</p> <p>Thrust fault, showing dip Sawtooth on upper plate. Dashed where approximately located; dotted where concealed</p> <p>Strike and dip of beds Dip symbol in alluvium, fans, or terrace gravels signifies small outcrop of bedrock</p> <p>Strike of beds and direction of dip</p> <p>Strike and dip direction of crenulated beds</p> <p>General direction of plunge of dragfolds</p> <p>Prospect trench</p> <p>Adit Caved at portal</p> <p>Diamond drill hole Shows location of collar and Bureau of Mines number on plan, profile on cross section</p> <p>Stake Shows location and number assigned by U.S. Steel Corporation</p> <p>Triangulation station Location of triangulation station placed in 1964 by the U.S. Geological Survey</p> <p>Contour line Dashed where approximately located</p> <p>Stream bed Minor streams only</p>	<p>QUATERNARY</p> <p>CRETACEOUS</p> <p>ORDOVICIAN</p>
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