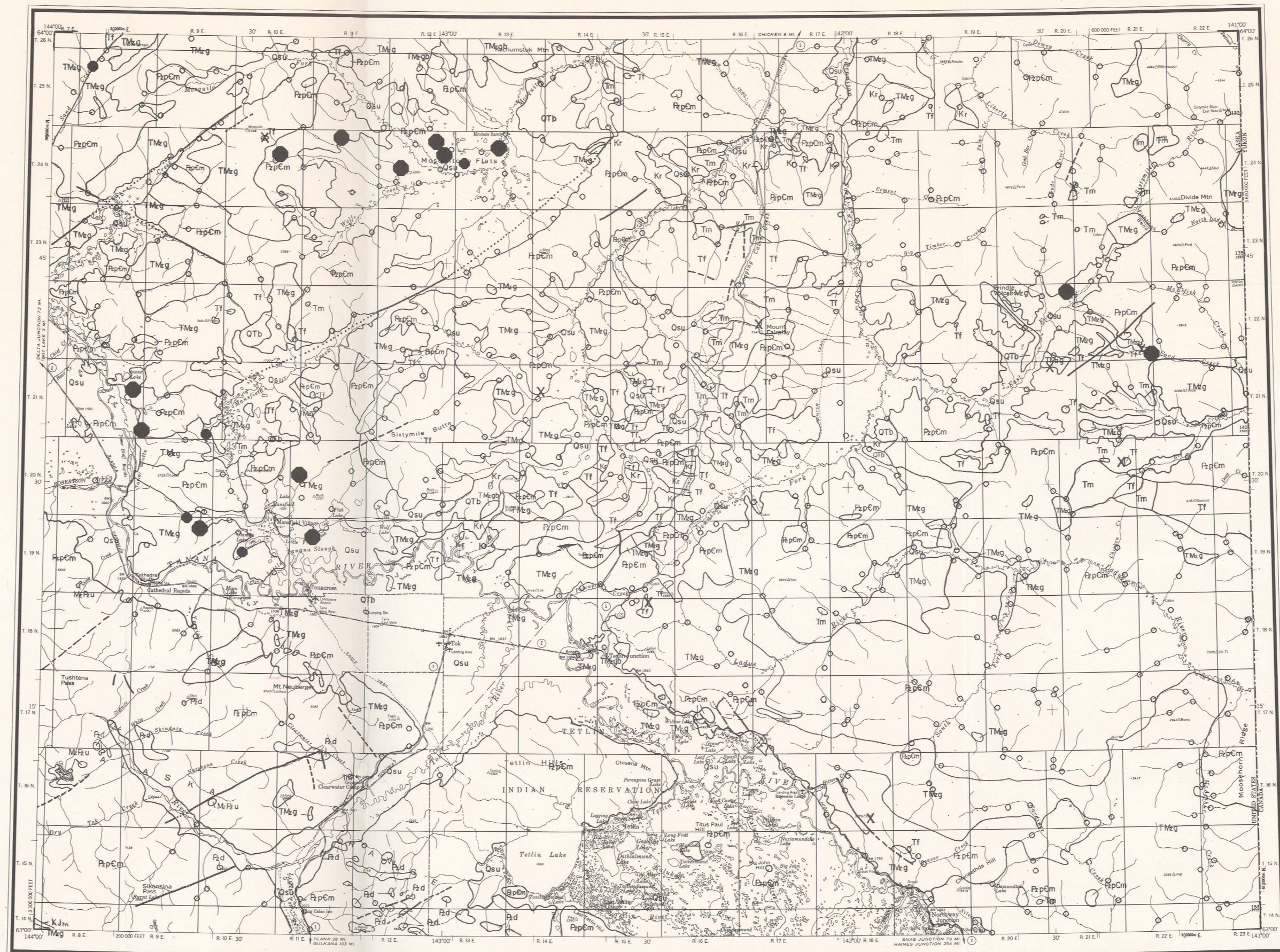
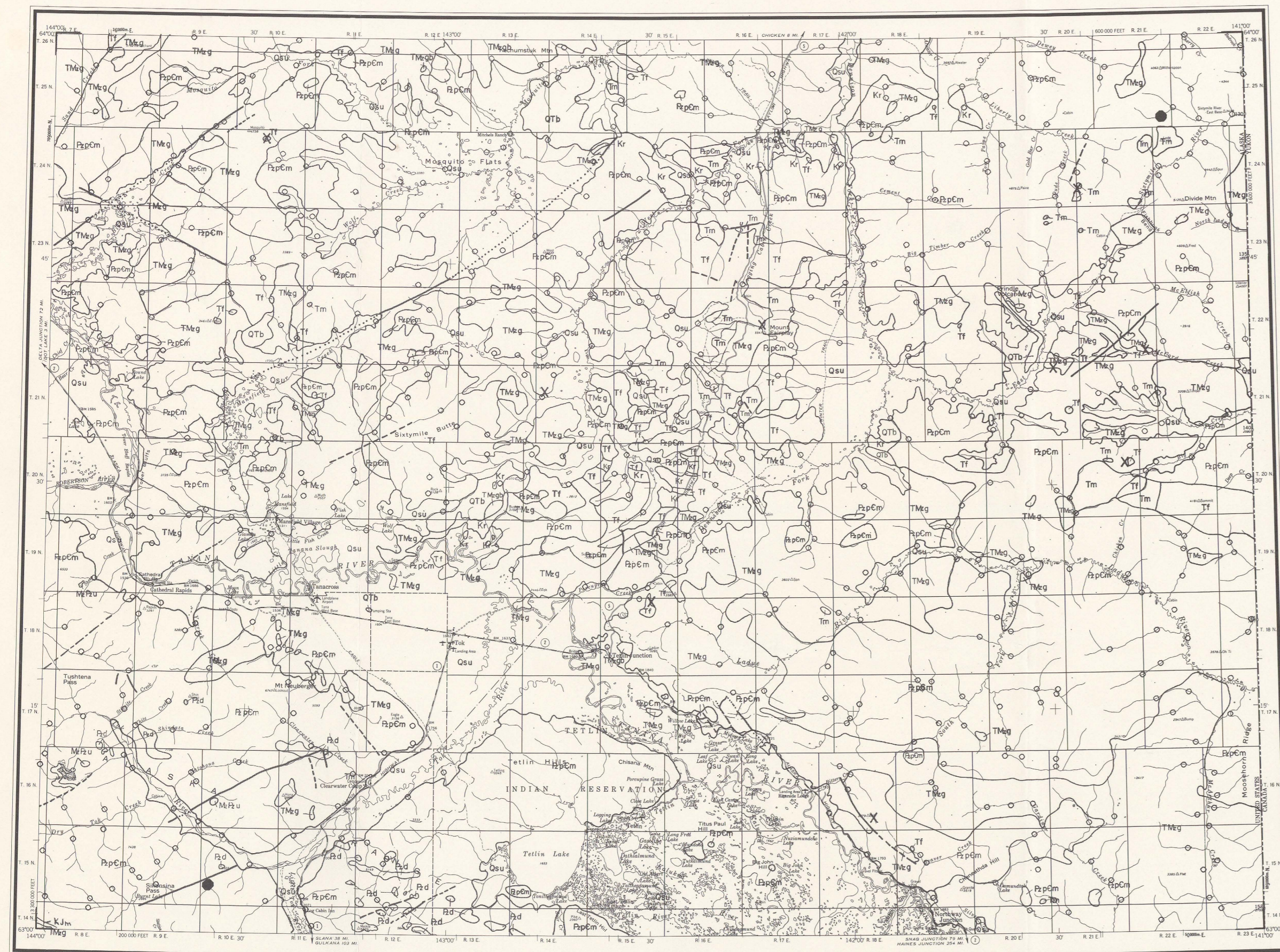


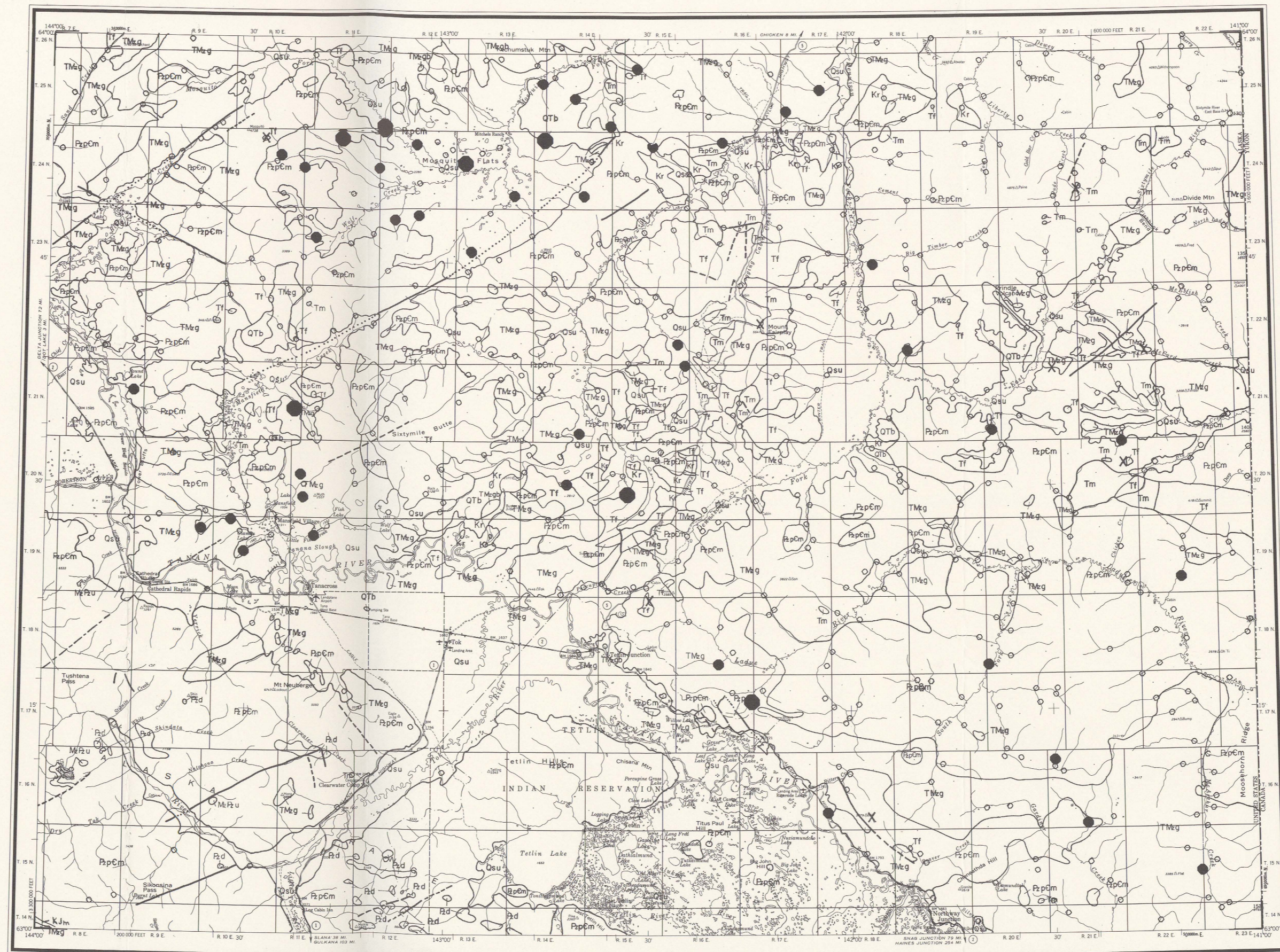
A. Molybdenum in the oxide residue of stream sediment



C. Molybdenum in the ash of streambank sod



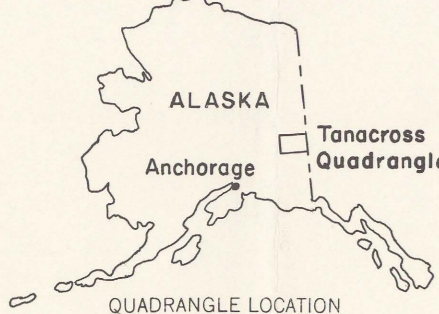
B. Molybdenum in the minus-80-mesh stream sediment



D. Molybdenum in the ash of aquatic bryophytes (mosses)

BASE FROM U. S. GEOLOGICAL SURVEY, 1:250,000, TANACROSS QUADRANGLE, 1964

Scale 1:500,000
1 inch equals approximately 8 miles



GEOCHEMICAL MAPS SHOWING THE DISTRIBUTION AND ABUNDANCE OF MOLYBDENUM IN THE TANACROSS QUADRANGLE, ALASKA

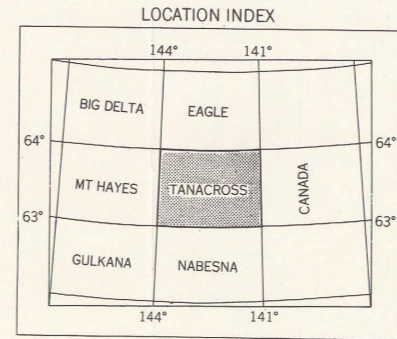
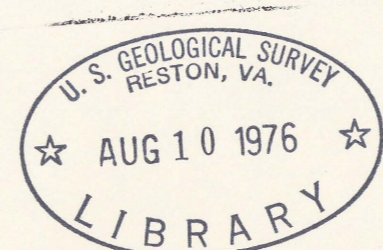
BY

G. C. CURTIN, G. W. DAY, R. B. CARTEN, S. P. MARSH, AND R. B. TRIPP

BACKGROUND INFORMATION RELATING TO THIS MAP IS PUBLISHED AS U.S. GEOLOGICAL SURVEY CIRCULAR 734, AVAILABLE FREE OF CHARGE FROM THE U.S. GEOLOGICAL SURVEY, RESTON, VA, 22092

1976

For sale by U. S. Geological Survey, price \$5.50



Base metal prospects at seven localities north of the Tanana River were not shown by high molybdenum values in any of the four sample media. These prospects are located in T. 21 N., R. 14 E., T. 18 N., R. 15 E.; T. 22 N., R. 16 E.; T. 18 N., R. 20 E.; T. 21 N., R. 20 E.; T. 21 N., R. 21 E.; and T. 16 N., R. 21 E. The absence of anomalous molybdenum values around the prospects indicates that either the molybdenum content of the altered and mineralized rock at the prospects is too low or the mineralized rock is too small to produce molybdenum-bearing dispersion ratios that could be detected at the sampling density used in this study.

The results of the geochemical sampling demonstrate that molybdenum occurrences in the maturely dissected terrain are more completely defined when the oxide residue and ash of streambank sod or aquatic bryophytes are used in combination than when any one of these media is used alone. The fact that only two molybdenum values were detected in the classic minus-80-mesh stream sediment indicates that this sample medium is not useful in geochemical exploration for molybdenum in this terrain.

Patterns defining areas of molybdenum potential are shown on the composite geochemical map of copper and molybdenum distribution (Curtin and others, 1976), which is included in this folio.

REFERENCES CITED

- Curtin, G. C., Day, G. W., O'Leary, R. M., Marsh, S. P., and Tripp, R. B., 1976a, Composite geochemical map of anomalous copper and molybdenum distribution in the Tanacross quadrangle, Alaska: U.S. Geol. Survey Misc. Field Studies Map MF-767, 1 sheet, scale 1:500,000.
1976b, Geochemical maps showing the distribution and abundance of copper in the Tanacross quadrangle, Alaska: U.S. Geol. Survey Misc. Field Studies Map MF-767a, 1 sheet, scale 1:500,000.
1976c, Geochemical maps showing the distribution and abundance of lead in the Tanacross quadrangle, Alaska: U.S. Geol. Survey Misc. Field Studies Map MF-767b, 1 sheet, scale 1:500,000.
1976d, Geochemical maps showing the distribution and abundance of zinc in the Tanacross quadrangle, Alaska: U.S. Geol. Survey Misc. Field Studies Map MF-767c, 1 sheet, scale 1:500,000.
Curtin, G. C., O'Leary, R. M., and Carten, R. B., 1976, Geochemical maps showing the distribution and abundance of arsenic and mercury in the Tanacross quadrangle, Alaska: U.S. Geol. Survey Misc. Field Studies Map MF-767d, 1 sheet, scale 1:500,000.
Foster, H. L., 1970, Reconnaissance geologic map of the Tanacross quadrangle, Alaska: U.S. Geol. Survey Misc. Geol. Map 1-593, scale 1:250,000.
O'Leary, R. M., McNeal, S. K., McLaughlin, C. M., Day, G. W., Curtin, G. C., and Foster, H. L., 1976, Spectrographic and chemical analysis of geochemical samples and related data from the Tanacross quadrangle, Alaska: U.S. Geol. Survey open-file report 76-422, 98 p.

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Alaska (Tanacross quad) Molybdenum 1:500,000 1976