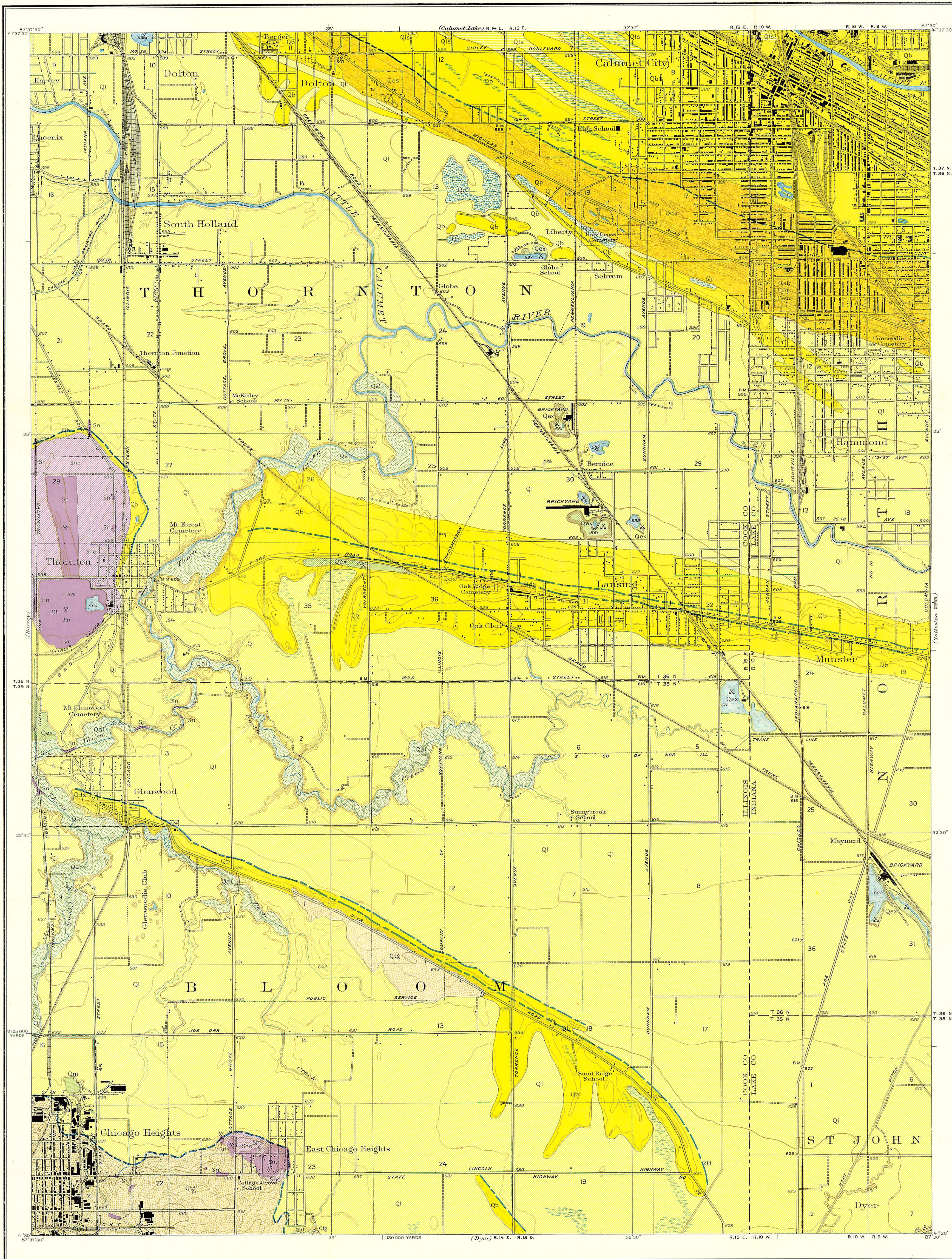
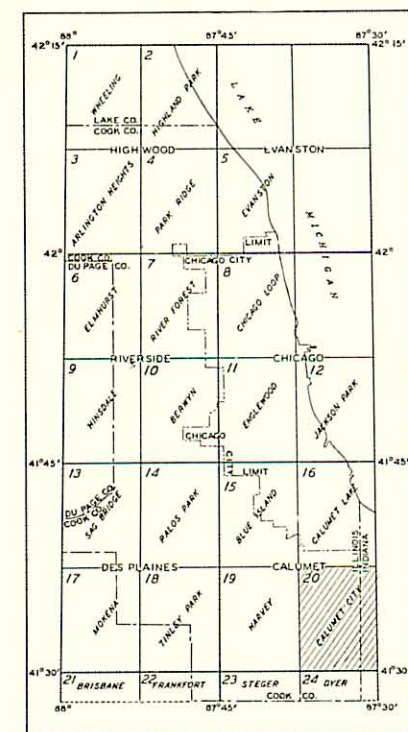




- LEGEND**
- Recent**
- Qm Made land (Artificial fills, spoil banks, dumps, etc.)
 - Qex Excavations in unconsolidated material
 - Qal Peat and muck deposits
 - Qa Alluvium (Silt, sand, and gravel deposited by present streams)
 - Qds Dune sand (Mainly beach sand reworked by wind)
 - Qb Beach ridges and related deposits of sand and gravel (Made during and since the various stages of Lake Chicago)
- Wisconsin**
- Ql Glacial lake bottom (Commonly without lacustrine deposits)
 - Qls Glacial lake bottom (Corrected by lacustrine silt and sand)
 - Qlg Tertiary ground-moraine
- Silurian**
- Sn Niagara series of undifferentiated dolomitic formations, exposed
 - Snc Niagara formations, thinly covered
- Shoreline of Tolleston stage of Lake Chicago (Where defined by beach deposits or wave-cut cliffs)
- Shoreline of Calumet stage of Lake Chicago (Where defined by beach deposits or wave-cut cliffs)
- Shoreline of Glenwood (oldest) stage of Lake Chicago (Where defined by shore features but generalized with reference to contour lines)
- Approximate position of shorelines of Lake Chicago (Where not defined by shore features but generalized with reference to contour lines)
- Definitely determined boundary between deposits
- Indefinite boundary between deposits
- Glacial striae, oriented in direction
- Rock quarry
- Sand or gravel pit
- Clay pit



Topographic base surveyed in cooperation with the U. S. Geological Survey, 1926

SURFICIAL GEOLOGY OF THE CALUMET CITY QUADRANGLE

BY
J HARLEN BRETZ

Geologically surveyed in 1930-1932.
In connection with other quadrangles of the Chicago area.

