

# Surface Geology

## Turtle Lake Quadrangle, North Dakota

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**2008**

### EXPLANATION

#### QUATERNARY SYSTEM

##### RECENT

##### OAHE FORMATION

##### Qos Pond and Slough Sediment

Dark, obscurely bedded clay and silt; in modern ephemeral ponds.

##### PLEISTOCENE

##### COLEHARBOR GROUP

##### Silt Facies

(Insignificant amounts of this facies on this quadrangle)

##### Sand and Gravel Facies

River sediment. Moderately well-sorted, cross bedded sand and plane-bedded gravel, including sediment of meltwater rivers.

##### Qcrf Flat Fluvial Plains

Flat-bedded sediment of nearly level plains and river terraces, commonly with braided channel scars, oxbows, and other relict markings; relief of 1 to 10 feet.

##### Qcrf(u) Flat Fluvial Plains

Same as Qcrf, but slightly higher-level, discrete surface of gravel surrounded by a lower level of gravel (Qcrf); it is likely that the lower was incised by later-flowing water.

##### Qcic Ice-contact deposits

Mainly gravel and sand with cobbles and boulders common; inclusions of glacial sediment common; local relief up to 50 feet; eskers and kames.

##### Till Facies

Glacial sediment. Unsorted, unbedded mixture of angular, subangular, and rounded blocks of rock, gravel, and sand, generally in a stiff matrix of silt and clay; yellowish-brown to olive-gray in exposures depending on weathering intensity; contains discontinuous lenses of gravel and sand.

##### Qqch Hilly Surface -Kettles

Nonintegrated drainage, and abundant ice-disintegration features; linear trends rare; thick layer of till with scattered areas of gravel and sand; relief of 50 to 150 feet locally.

##### Qcdg Thin Layer of Till

Venier of till draped over and only slightly modifying the pre-existing (Tertiary bedrock or older till or gravel surface); relief of 10 to 50 feet.

##### Geologic Symbols

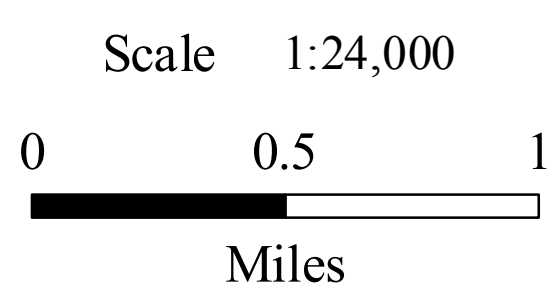
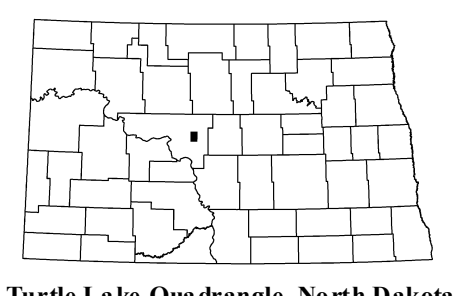
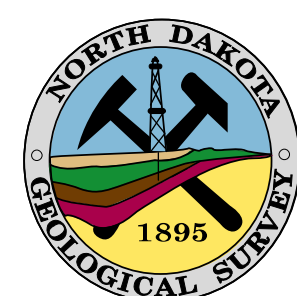
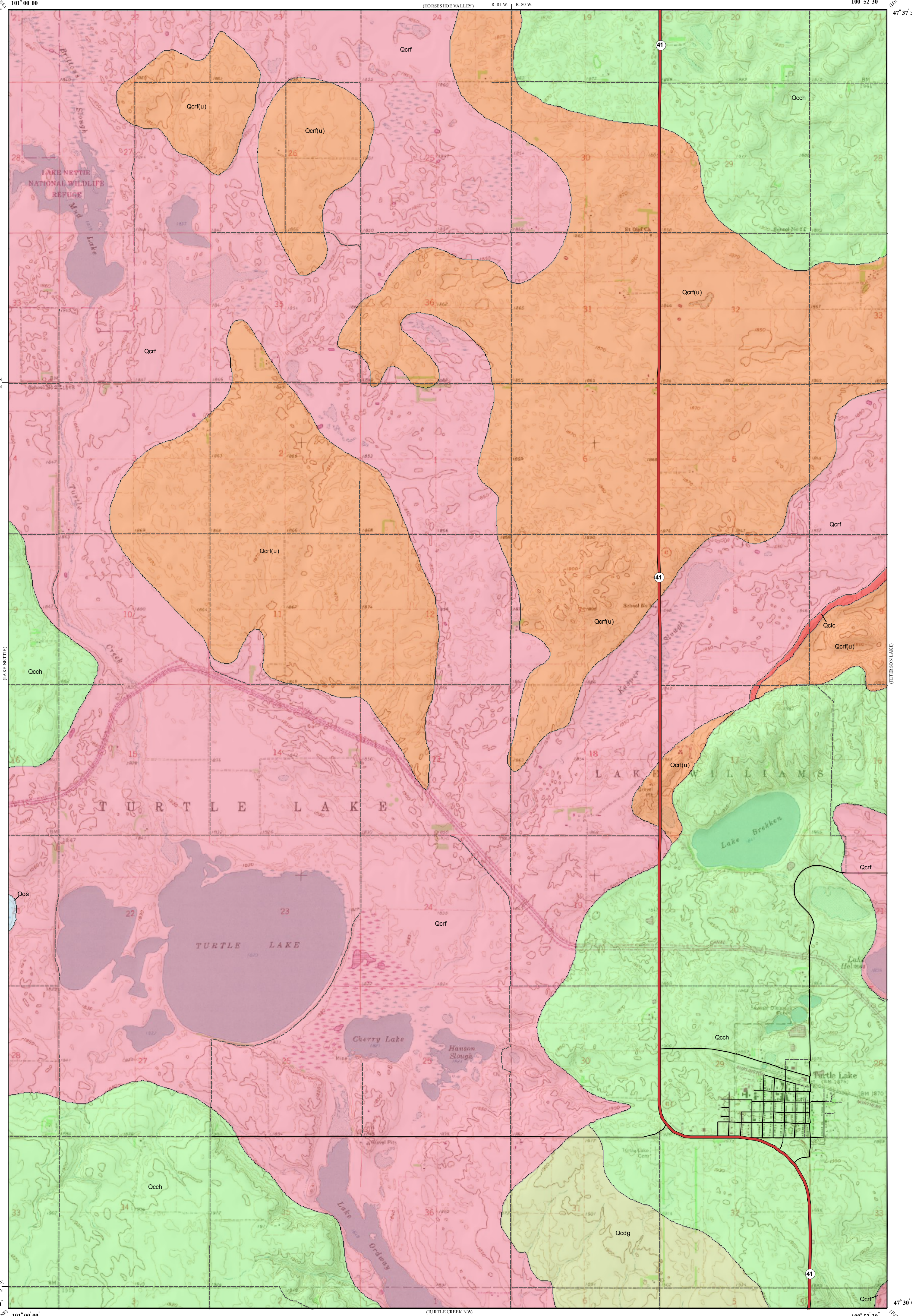
— Known contact between two geologic units

##### Other Features

41 State Highway

— Paved Road

--- Unpaved Road



Lambert Conformal Conic Projection Standard Parallels 47° 30' 00" and 47° 37' 30"  
1927 North American Datum NGVD 1929  
USGS 7.5 Minute Topographic Map Contour Interval 10 Feet  
Road Layer Rectified to 2003 NAIP Digital Orthophoto

