

EXPLANATION

Surficial deposits of the Anchorage area, Alaska, exclusive of windblown sand and silt

SEDIMENTARY ROCKS

Qe
Postglacial estuarine deposits
Clay and silt, locally sand and gravel, beside and in Knik and Turnagain Arms (deposits on narrow beaches not mapped); postglacial and, in part, modern. Not a water-bearing formation

Peat
Bog deposits
Peat; chiefly postglacial, in part modern. Not a water-bearing formation

Qal
Stream deposits
Sand and gravel, locally silty or clayey; in channels, valley floors, and low terraces of streams on the lowland; chiefly postglacial. May yield small quantities of water to shallow wells

Qaf
Alluvial-fan deposits
Sand and gravel, locally silty and clayey; glacial and postglacial. May be a good water-bearing formation in some places

Qay
Younger outwash-stream deposits, of late-recessional age
Sand and gravel; chiefly north of end moraine, Qey; deposited during recession of ice from that moraine by meltwaters of the Eagle and Knik-Matanuska Glaciers. May yield small supplies of water to shallow wells in some places

Qgy
Younger ground-moraine deposits
Till and glaciomarine drift, locally mantled by sand and gravel; north of end moraine, Qey, with which they are in part contemporaneous. May yield small supplies of water from gravelly beds

Qyo
Older outwash-stream deposits, later phase
Sand and gravel; outwash plain of Eagle and Knik-Matanuska Glaciers formed during last glaciation of Anchorage area; yield small to moderately large quantities of water to shallow dug and drilled wells in Mountain View but finer grained and a poor water-bearing formation to the west and south

Qey
End-moraine deposits of Knik-Matanuska Glacier
Till, water-laid "fill," and outwash-stream deposits; formed during last glaciation of Anchorage area. Poor water-bearing formation

Qme
End-moraine deposits, Fire Island
Till, water-laid "fill," and outwash-stream deposits; may be correlated with end-moraine deposits of Knik-Matanuska Glacier, Qey. Yield moderate supplies of water from gravelly beds

Qyo
Older outwash-stream and lake(?) deposits, earlier phase
Sand, silt, and gravel; combined outwash plain of Eagle, Knik-Matanuska (?), and Turnagain Arm Glaciers formed during last glaciation of Anchorage area; may include lake deposits. Yield small quantities of water to shallow wells

Qeo
Estuarine and lake(?) deposits
Bootlegger Cove Clay; clay and silt, containing sporadic beds of sand and gravel. Finer elements yield little or no water, but in a few places coarse materials are present which yield moderate to large quantities of water to wells

Qdu
Glacial drift, undifferentiated
Outwash-stream and lake deposits west of International Airport, thought to be contemporaneous with units Qe and Qgo; till or till-like material present locally. Apparently does not contain water

Qri
Glacial-recessional deposits, later phase
Sand and gravel, in part silty and clayey; chiefly in melt-water drainage courses that incise older deposits; include deposits graded to several different temporary base levels. Yield small quantities of water to shallow wells

Qre
Glacial-recessional deposits, earlier phase
Sand and gravel and till; largely in pitted and other ice-contact features, undifferentiated; locally thin, covering ground-moraine deposits, Qgo. Yield small quantities of water from sandy or gravelly beds

Qgo
Older ground-moraine deposits
Till, locally mantled by sand and gravel; probably include some outwash-stream deposits, not differentiated. Yield small to moderate quantities of water from gravelly lenses

Qlo
Lateral glacier-margin deposits of older glaciation
Lateral-moraine and hummock-terrace deposits, in part pitted; undifferentiated. Yield small quantities of water from gravelly lenses

METAMORPHIC ROCKS

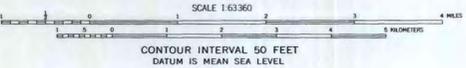
Mu
Metamorphic rocks of igneous and sedimentary origin: greenstone, graywacke, argillite, and slate

Contact
Dashed where approximate, dotted where placed originally

River terrace
Dashed where approximate; hachures point down scarp



GEOLOGIC MAP OF THE ANCHORAGE AREA, ALASKA



Base from U.S. Geological Survey topographic quadrangles

Interior-Geological Survey, Washington, D.C. 40° 1964-1965-1966-1967-1968-1969-1970-1971-1972-1973-1974-1975-1976-1977-1978-1979-1980-1981-1982-1983-1984-1985-1986-1987-1988-1989-1990-1991-1992-1993-1994-1995-1996-1997-1998-1999-2000-2001-2002-2003-2004-2005-2006-2007-2008-2009-2010-2011-2012-2013-2014-2015-2016-2017-2018-2019-2020-2021-2022-2023-2024-2025

Geology by F. W. Trainer. Bedrock outcrops in part after Miller and Dobrovoly (1959) and unpublished map by R. G. Gastil, U.S. Army Map Service, 1956

QUATERNARY

MESOZOIC