



EXPLANATION

WE
Westerly Granite
Fine-grained light-gray massive granite with colorless to light-gray microcline, light-gray to white oligoclase, smoky quartz, and about 5 percent biotite

ndg
Narragansett Pier Granite
Medium-grained pink, flesh-colored, and light-gray granite, locally with euhedral phenocrysts of pink feldspar commonly 20 mm long. Dominant minerals are smoky quartz, flesh-colored microcline, white plagioclase, and 2 to 5 percent biotite. Massive, or locally faintly foliated where contaminated by inclusions of schist. Fine-grained to aplitic or pegmatitic in small bodies

Pri
Rhode Island Formation
Medium- to coarse-grained medium-gray to silvery gray quartz-muscovite-biotite schist, locally with small garnets; medium- to fine-grained medium- to light-gray quartz-feldspar-mica gneiss and schist, locally with sillimanite; black graphite schist in thin beds or lenses; and southeast of Kingston, medium-grained rusty-weathering quartz-mica-feldspar-sillimanite schist, schistose gneiss, and impure quartzite, some beds with flattened pebbles of quartz-mica-sillimanite schist up to 82 mm in size. Much of the formation contains euhedral graphite in flakes 0.1 to 0.2 mm in diameter

UNCONFORMITY

fg
Fine-grained granite
Fine-grained pink, flesh-colored, and light-gray massive to finely foliated granite, locally with lineation expressed by streaks of biotite; in places porphyritic, with phenocrysts of microcline up to 25 mm long. Contains microcline, plagioclase, quartz, 1 to 3 percent biotite, and accessory minerals

trg
Ten Rod Granite Gneiss
Medium- to coarse-grained light- to medium-gray and pinkish-gray granite gneiss; typically with 10 to 15 percent pink to gray microcline as single grains or as lens-shaped aggregates commonly 12 to 20 mm long; faintly to well foliated and moderately well to well-developed lineation. Composed of pink to gray microcline, white or colorless plagioclase, smoky quartz, 5 to 10 percent biotite, and accessory minerals

hva
Hope Valley Alaskite Gneiss
Pinkish-gray to flesh-colored gneiss composed of pink or flesh-colored microcline, white or colorless plagioclase, smoky quartz, 1 to 3 percent biotite and magnetite, and accessory minerals; generally medium- to coarse-grained but locally fine-grained; moderately well to well-developed lineation by aligned flattened rod-shaped aggregates of quartz up to 20 mm long, and by streaks of biotite, foliation faint or absent. Phenocrysts of microcline occur locally

bs
Blackstone Series
bs, medium- to fine-grained medium-gray, light-gray, and blue-gray quartz-feldspar-biotite gneiss and schist, and quartz-mica schist, commonly with some garnet or sillimanite; fine- to medium-grained light- to dark-gray quartz-hornblende-feldspar gneiss and schist; feldspathic quartzite; and thin lenses of medium-grained light-green nearly massive epidote-quartz-feldspar and epidote-quartz hornblende. A few flattened pebbles of quartz or quartzite occur locally; aggregates of quartz and sillimanite commonly 40 mm long are locally abundant. bsf, highly feldspathic areas of the Blackstone are medium- to fine-grained medium- to light-gray quartz-feldspar-biotite gneiss, commonly with 5 to 15 percent meteorite of flesh-colored or white feldspar up to 20 mm long

Bedrock outcrops

W
Weathered bedrock ("rottenstone")

Contact

Dashed where apparently located; short dashed where indefinite

Strike and dip of beds

Strike of vertical beds

Strike and dip of foliation

Strike and dip of parallel bedding and foliation

Direction and plunge of lineation

Strike and dip of foliation
Shows direction and plunge of lineation

Strike and dip of parallel bedding and foliation
Shows direction and plunge of lineation

Strike and dip of axial plane of minor fold
Shows direction and plunge of fold axis

Strike and dip of axial plane of minor fold
Shows direction and plunge of fold axis

Strike and dip of joint

Abandoned quarry

Core drill hole
Drilled by U.S. Geological Survey

Specimen locality
Numbers correspond to those in text

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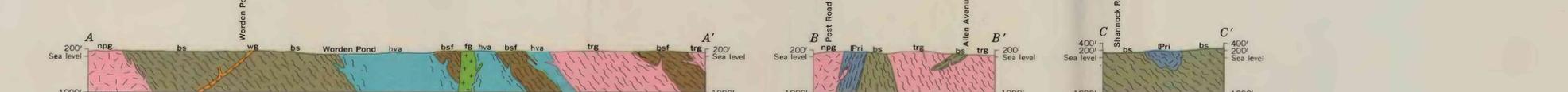
Base by U.S. Geological Survey, 1957

Geology by George E. Moore, Jr., 1957-58

SCALE 1:24 000



CONTOUR INTERVAL 10 FEET
DATUM IS MEAN SEA LEVEL



BEDROCK GEOLOGIC MAP AND SECTIONS OF THE KINGSTON QUADRANGLE, RHODE ISLAND