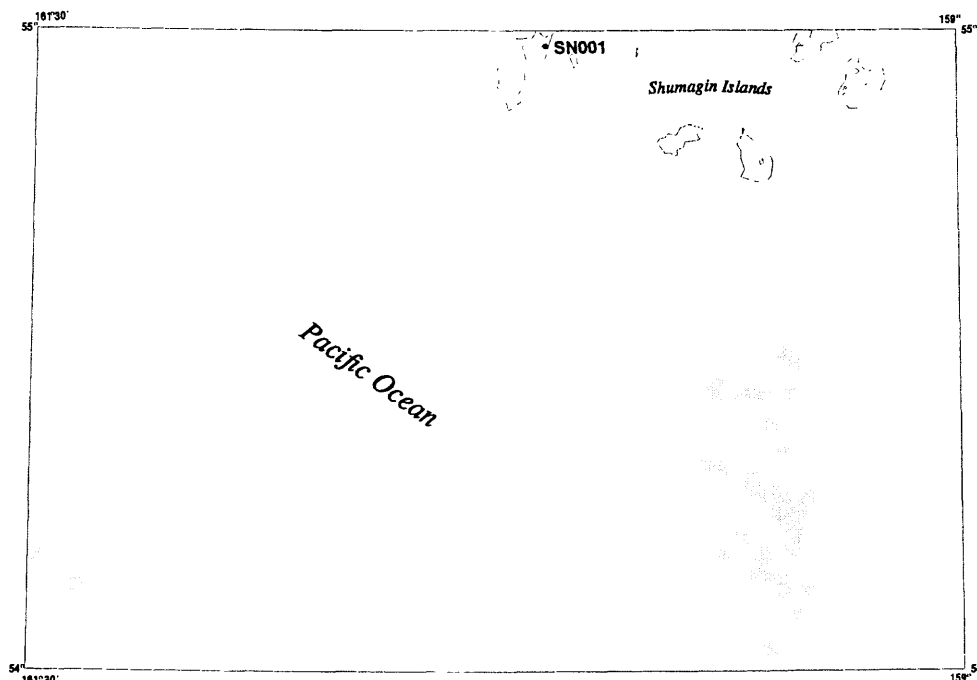


## Simeonof Island quadrangle

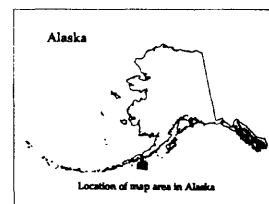
Descriptions of the mineral occurrences shown on the accompanying figure follow. See U.S. Geological Survey (1996) for a description of the information content of each field in the records. The data presented here are maintained as part of a statewide database on mines, prospects and mineral occurrences throughout Alaska.



*Distribution of mineral occurrences in the Simeonof Island  
1:250,000-scale quadrangle, Aleutian Islands, Alaska*

This and related reports are accessible through the USGS World Wide Web site <http://ardf.wr.usgs.gov>. Comments or information regarding corrections or missing data, or requests for digital retrievals should be directed to: Frederic Wilson, USGS, 4200 University Dr., Anchorage, AK 99508-4667, e-mail [fwilson@usgs.gov](mailto:fwilson@usgs.gov), telephone (907) 786-7448. This compilation is authored by:

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*This report is preliminary and has not been reviewed for conformity with U.S. Geological Survey editorial standards or with the North American Stratigraphic code. Any use of trade, product, or firm names is for descriptive purposes only and does not imply endorsement by the U.S. Government.*

**OPEN-FILE REPORT 00-121**

**Site name(s):** Unnamed (on southeast coast of Nagai Island)

**Site type:** Occurrence

**ARDF no.:** SN001

**Latitude:** 54.975

**Quadrangle:** SN D-4

**Longitude:** 160.115

**Location description and accuracy:**

This site is on the southeast coast of Nagai Island approximately 2 miles northeast of Saddler Peak and includes mineral showings at sea level and in the adjacent sea-cliffs. Location is accurate to within a few hundred feet.

**Commodities:**

**Main:** Au

**Other:** As

**Ore minerals:** Arsenopyrite, gold, pyrite

**Gangue minerals:** Quartz

**Geologic description:**

At this mineral occurrence two Tertiary quartz diorite sills intrude siltstone and sandstone of the Cretaceous Shumagin Formation (Ellis and Apel, 1989). The strata strike northwest and dip 20-50 degrees to the southwest. They are silicified and pyritic adjacent to the contact. The sills crop out along the sea cliffs and beach for approximately 1600 feet.

Gold is present in the sills in quartz-arsenopyrite veins and stockworks thought to be associated with northwest-trending faults and shear zones. Gold also occurs in the altered rocks adjacent to the sills and in a 100-foot wide hydrothermal breccia zone.

In 1989 Battle Mountain Exploration Company collected 61 rock-chip samples, 22 of which contained >100 ppb gold (Ellis and Apel, 1989). Fifteen samples contained 100 to 499 ppb gold, 5 contained 500 to 999 ppb gold, and 2 had >1ppm ppm gold (up to 6.55 ppm). Elsewhere on the island they also obtained scattered pan concentrate and rock samples anomalous in arsenic, gold, and mercury. Free gold was also noted on the beach at Saddlers Mistake and in several streams draining the area. Anomalous gold was also found over a 1/2 mile area associated with a color anomaly located in steep cliffs approximately 3 miles north of this site. Numerous gold anomalies were detected on the north part of the island by the U.S. Geological Survey (Friskien and Kelly, 1992).

**Alteration:**

Sedimentary country rocks are silicified and pyritic adjacent to the sills. Hydrothermal breccia zone in sills. Color anomaly about 3 miles north of site.

**Age of mineralization:**

Tertiary.

**Deposit model:**

**Deposit model number (After Cox and Singer, 1986 or Bliss, 1992):**

**Production Status:** None

**Site Status:** Inactive

**Workings/exploration:**

In 1989 Battle Mountain Exploration mapped and sampled this mineral occurrence. Of 61 rock-chip samples collected 22 contained >100 ppb gold. The highest value obtained was 6.55 ppm gold (Ellis and Apel, 1989).

The U.S. Geological Survey mapped and geochemically sampled in the Simeonof Island quadrangle in the late 1980's (Wilson and others, 1991; Frisken, 1992).

**Production notes:****Reserves:****Additional comments:**

This site is located on land selected by the Aleut Native Corporation.

**References:**

Ellis and Apel, 1989; Wilson and others, 1991; Frisken, 1992; Frisken and Kelly, 1992.

**Primary reference:** Ellis and Apel, 1989

**Reporter(s):** S.H. Pilcher (Anchorage)

**Last report date:** 1/24/00

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- Wilson, F.H., Detterman, R.L., and Harris, D.E., 1991, Generalized geologic map of the Port Moller, Stepovak Bay, and Simeonof Island quadrangles, Alaska Peninsula, Alaska: U.S. Geological Survey Map MF-2155A, 1 map sheet, scale 1:250,000.