

NEWS FROM HIGH LATITUDES

Letters from Eureka Sound, 80°N. Latitude

Dr. A. L. Washburn, Executive Director of the Arctic Institute, has a correspondent at the new Canadian-United States weather station at Slidre Fjord, Eureka Sound, in latitude 80°N. Writing in August, before the arrival of the supply vessel *Edisto*, Mr. Murray C. Dean noted that the climate was far more temperate than had been anticipated. He went on the "The fjord ice in April, the month we arrived here, measured 82 inches. A shore to shore crack developed in the last few days of May, and grew wider day by day. At about the same time our brook began to run and water started to form on the shore ice. Today (August 3rd) the fjord is about 60 per cent pan ice. Musk oxen abound; we see them daily in the valleys around us. Before our two dogs passed away we found that we could get reasonably close to a herd of four or five to take photographs, as the dogs would keep them in a defensive square. Though a rarity these days, in the spring we were often besieged by packs of wolves, singly, in pairs and in packs of up to sixteen".

Mr. Dean then reported an incident that puzzled members of the weather station staff—the discovery of a kerosene can marked "40" and "DDPA". This relic, at a place rarely visited, was presumably left by the Danish Van Hauen Expedition which visited the area by sledge from Greenland in April, 1940.

Mr. Murray Dean in a letter written from Eureka Sound on December 4th, 1947, reports a low temperature of -47°F. up to that time, with a mean of -20.1°F. for November. The first frost was on August 27th. The musk oxen seemed to have deserted the area. The letter ends "for the last two days we have been besieged by wolves which have ventured time and again to the doorsteps and have killed one of our dogs. We are forever running outdoors with firearms".

Danish Three Year Expedition to Northeast Greenland

Ebbe Munck and Eigil Knuth began in 1947 reconnaissance for a two year expedition to northeastern Greenland. The open season was employed in locating bases to be occupied from 1948-50. Two vessels, SS *Godthaab* and MV *Gamma* together with a Catalina aeroplane *Mameluk* carried personnel and stores. A suitable permanent base for the 1948 party of ten men was located on the northern side of Independence Fjord in 82°30' N. Lat.

Eigil Knuth returned to Copenhagen with nine others from Zackenberg, northeast Greenland on September 1st, 1947, in a twelve hour flight. He reported that bad weather prevented the reconnaissance group from making more than five flights of the fifteen planned, but they found Brönlundfjord clear of ice at the end of July, and located a hitherto unknown lake about 100 km long, also free from ice. Ebbe Munck returned to Denmark on September 11th with the remainder of the expedition personnel on SS *Godthaab*. He reported that work in 1948 will be started by air before ice conditions permit vessels to reach the northeast Greenland coast. Research will include mapping, geology, botany and glaciology of the interior of Pearyland as well as the coast. A meteorological and radio station will be established.

1947 Cruise of R.C.M.P. Schooner St. Roch

Floating R.C.M.P. detachment *St. Roch* sailed from Vancouver, B.C., June 30, 1947, for Winter Harbour on the south shore of Melville Island, N.W.T.

After calling at Dutch Harbour, Alaska, on July 12, the vessel continued to Herschel Island reaching there on July 27. At Walker Bay on August 12, Inspector H. A. Larsen, Master of the vessel, realized that ice conditions would make the voyage unusually difficult as ice from Melville Sound was being forced into Prince of Wales Strait. On September 1, *St. Roch* was off Peel Point, northwest Victoria Island when McClure Strait was jammed with ice. At this time U.S.S. *Edisto* was endeavouring to reach Winter Harbour from the east. Rather than delay for a possible crossing of Melville Sound, Inspector Larsen was ordered to return to Herschel Island for wintering. On arriving there five of the crew were picked up by R.C.M.P. aeroplane and flown outside to Edmonton. Inspector Larsen later travelled to Aklavik by dogteam and flew "outside" in December.

Northern Weather Stations

The meteorological network in northern Canada is being extended by the erection of new stations on Arctic islands. The first was established at Slidre Fjord on western Ellesmere Island in April, 1947. Men and equipment were flown in and landed on the sea ice from the joint Danish-United States station at Thule, Greenland. The second station was established by sea at Resolute Bay on Cornwallis Island. These and two subsidiary stations to be built by air in April, 1948, on the northwestern fringe of the Arctic islands are under joint Canadian-United States operation.

Three United States Navy ships left Boston in mid-July 1947, to carry men, equipment and supplies to the station at Slidre Fjord and to a proposed site at Winter Harbour. U.S.S. *Edisto*, a 6,900 ton icebreaker of the "Wind" type, was able to reach Eureka Sound through Jones Sound and Norwegian Bay, but failed in four attempts to reach Winter Harbour during August and received some damage in the attempts. An experimental automatic weather station was placed a short distance from the R.C.M.P. post at Dundas Harbour on Devon Island.

French Scientific Expedition to Greenland 1948-1950

Paul E. Victor, who is well known in North America for his Arctic service during the recent war, is to be the organizer and leader of a French expedition to northern Greenland. The expedition, which will leave France shortly, plans to make several crossings of the Icecap during two seasons of about five months each using "Weasels". A meteorological station, equipped to make radiosonde observations will operate for several years at about 75°N. Lat. and 40°W. Long.

The Academie des Sciences of the Institute de France is sponsoring scientific work which is being co-ordinated with the program of the International Glaciological and Meteorological Year. Cost of the expedition is being borne in part by the Centre National de la Recherche Scientifique and in part privately. The expedition has been authorized by the Danish Greenland Administration.

New Arctic Ship for Canada

At the time of the loss of the Hudson's Bay Company vessel R.M.S. *Nascopie* in 1947, plans were already far advanced to construct a government-owned vessel for supplying Eastern Arctic settlements. The new ship is to be 276 feet long, of about 2,615 tons deadweight with capacity for 1,000 tons of cargo. Passenger accommodation is to be 88, in addition to a crew of 58 persons. Powered by 4,000 H.P. steam engines the new vessel will be capable of 14 knots.

The hull will be reinforced for protection against ice. The ship will carry a helicopter for scouting ice conditions. Northern voyages are likely to take three to four months each year, at other times the vessel will be available for ice-breaking on the St. Lawrence and for routine supply voyages along the eastern coast of Canada. The new ship is being constructed at Levis, Que.

Oil in Northern Alaska

Drilling is going on in the United States Navy Petroleum Reservation No. 4, in the Point Barrow region of Alaska. The object is to discover whether there is sufficient oil in the area to justify commercial exploitation. Preliminary exploration was carried on in the area twenty-five years ago, but serious work began in 1944. Drilling is being carried out by a syndicate of Texas companies under the name of "Arctic Contractors". Supplies arrive at Barrow by ship and are unloaded into scows, at other times of the year they are carried overland by air. Among outstanding feats is the freighting of drill pipe and other heavy equipment from Fairbanks to the Arctic coast by D.C.4's. "Weasels" have been found extremely useful during the summer season. Trains of sleds hauled by large tractors convey equipment and personnel to the interior from the coast during the winter. The key administrative and supply centre is at Umiat inland from Point Barrow. Exploratory work is scheduled to be completed before 1950.

Norwegian Expedition to the Antarctic 1947-48

The Norwegian Geographical Society was responsible for planning and equipping a small scientific expedition which left for the Antarctic late in 1947. The main purpose of the expedition, which is being financed by the Norwegian Whaling Association, is to carry on routine study of Antarctic waters in an area not regularly visited by whalers.

A 500 ton steel fishing vessel *Brattegg* is being used to carry four scientists and a crew of seventeen. Scientific staff includes a specialist in Antarctic birds, two physical oceanographers, and a marine biologist. If ice conditions are favourable a landing may be made on Peter Island.

Australian National Research Expedition

Australia has resumed exploration and research in the Antarctic on a considerable scale. The government expedition of 1947 has established stations on Heard Island and Macquarie Island using L.S.T. 3501 for transport. *Wyatt Earp* is making an extensive cruise, which if successful will result in a permanent station being established on the Antarctic continent. Daily weather observations are being transmitted to Australia from the two land stations. Other scientific work includes the study of cosmic rays using both a geiger counter and an ionisation chamber, magnetic readings, aurora investigations, measurement of the ozone content of the air, and of the reflection of radio waves from the ionosphere. Other work includes the collection of plankton water samples, taking soundings, and studies of whales, sea elephants and fish. Geologists will map Heard Island. The magnetic station at Sir Douglas Mawson's old base on Commonwealth Bay, not far from the magnetic pole may be reoccupied.

On the Antarctic continent itself elaborate studies of glaciers are planned together with seismic ice thickness determinations and geophysical prospecting.

All stations are to be under the direction of Group Captain S. A. C. Campbell with Mr. P. G. Law as senior scientific officer.