

The Last Voyages Of The 'St. Roch'

By J. Lewis Robinson

The exploits of the RCMP schooner *St. Roch* as the first ship to pass through the Northwest Passage from east to west in a single season 50 years ago are well-known in Canadian history. Previous to that epic voyage, in 1940-42, the police patrol vessel had been the first ship to conquer the Northwest Passage through Canada's Arctic Islands from west to east. But little has been written about the "normal", day-to-day work and navigation problems of the RCMP and its supply ship in the few years following these historic voyages.

From 1928 to 1944, the *St. Roch* spent ten winters ice-bound in some Western Arctic harbour as a "floating" police detachment. For example, the *St. Roch* was frozen into the harbour ice at Tree River for four winters, 1930-34, and the police-crew patrolled by dog-team to the small settlements around Coronation and Amundsen gulfs during the winters, and brought supplies to the scattered police posts during the summers. In the winters of 1935-37 and 1938-39, the police detachment was based at Cambridge Bay. Occasionally, the *St. Roch* was

brought out of the Arctic, around Alaska, to be refitted or repaired in Vancouver or Victoria, B.C. Throughout these years, the *St. Roch* was skippered by Captain, later Inspector, Henry A. Larsen.

Following the notable Northwest Passage achievement from Halifax to Vancouver in 1944, the *St. Roch* and its police-crew were back in the Western Arctic during the short summer of 1945. It was "business as usual" as supplies were delivered to the regional police posts. The ship was then prepared for wintering at Cambridge Bay. But a new "way of life" for the police-crew had arrived in the Arctic with new transport technology. Several of the crew were flown to their homes in southern Canada while local police and welfare duties were performed by the permanent detachment at Cambridge Bay.

Another milestone historical event occurred in the spring of 1946 at Cambridge Bay. The *St. Roch*, the first conqueror of a water route through the Arctic, met a group of snowmobiles from Churchill, Manitoba, which were part of the Canadian Army's "Exercise Musk-Ox",

the first overland, mechanized expedition to cross the Central Arctic. Overhead, modern airplanes were dropping supplies and on the ground traditional dog-teams were carrying them to a temporary military camp. These four means of transportation together at one time was an event in the history of Arctic development.

During the summer of 1946 the *St. Roch* again picked up supplies sent down the Mackenzie River in barges to Tuktoyaktuk (then, for a brief period, called Port Brabant). These were delivered to Western Arctic posts during a surprisingly ice-free navigation season. Despite difficulties with large masses of pack ice pushed against the Alaska north coast by northerly winds, the *St. Roch* worked westward during late August through the shallow offshore water to Point Barrow. The tiny ship was an 80-ton, shallow-draught (13 feet) vessel which could motor inside of the thick polar ice which grounded a few miles offshore. Larsen had a strange experience in Bering Strait. He crossed the unmarked International boundary and anchored off Large Diomedé Island in Soviet Union territory. The beginnings of post-war "peace" were well illustrated when Larsen was arrested by the Russian garrison and held overnight. The rest of the voyage home was uneventful and more leisurely than in some years. They came into Vancouver harbour on 26 September.

For the summer of 1947 a challenging task was assigned to the *St. Roch* and its floating police detachment. They were to become explorers again, and to reverse the route of their historic Northwest Passage trip of 1944 through Prince of Wales Strait, between Banks and Victoria islands. The Strait is about 275 kilometres long and averages about 20 kilometres wide. It is wider and deeper at the south end. Until 1944 no ship had penetrated this ice-filled strait since McClure's original exploration in the *Investigator* in 1849. In September 1944 the strait had been virtually ice-free, giving the *St. Roch* no problems. The purpose of the 1947 expedition was to try to cross northward through ice-filled Viscount Melville Sound to Winter Harbour on southern Melville Island, and there to meet a joint American-Canadian scientific group in a United States government icebreaker coming from the east through Lancaster Sound. It was no easy assignment.

Captain Larsen and the *St. Roch* left Vancouver on 30 June 1947, had a rough crossing of the Gulf of Alaska, and then through Unimak Pass in the Aleutian Islands. They met their first sea-ice in mid-July off Wainwright, northwestern Alaska. The *St. Roch* rounded Point Barrow, the northern tip of Alaska, on 19 July and found large, solidly-packed floes stretching endlessly to the north and east. This part of the voyage was usually not dangerous because numerous trading and whaling vessels had used this route in the past to reach the Canadian Western Arctic. American aircraft from an air base near Point Barrow reported that although ice had

piled up on the shore, there was a wide, open lead through the thick ice offshore. Larsen decided to risk the offshore route, well remembering how a few vessels in the past had become trapped in such ice when the winds shifted to the south and carried ships into the Arctic Ocean.

On 20 July the *St. Roch* nosed into the wide, offshore lead. Fog, which is ever-present in an arctic summer, soon surrounded the vessel as it crept slowly along the northern edge of the pack-ice. The next day the dreaded event happened. The wind began to blow strongly off the land from the southeast. Within a few hours a large mass of ice broke off from the main pack which was anchored to shore and the *St. Roch* was carried helplessly northward along with it. Larsen tried desperately to work back through the broken ice edge, but the outward drift of the ice was faster than his vessel's power. Soundings became deeper, and he knew that he would soon be off the continental shelf and in the deep ocean.

For a full day the vessel battled with heavy ice, moving from opening to opening to keep from being crushed. On 23 July the wind died, visibility improved, and the *St. Roch* began twisting through the broken floes. It moved from one lead to another, awaited openings, sheltered behind large floes when the ice began jamming, moved at the right time, stopped at the right time, and generally did all of the many movements which are



RCMP Archives, Ottawa

Henry A. Larsen on patrol. Opposite page: The "St. Roch" in Amundsen Gulf, Western Arctic, seeking a passage.



J. Lewis Robinson photo

Southern McClintock Channel is almost filled with last year's sea-ice in mid-August, 1947. The blue sea-ice is covered with white snow, the black areas are open water leads. The solid sea-ice is about three feet thick.

calmly noted in Larsen's logs as "worked through heavy ice". Luck and skill combined to bring the *St. Roch* and her anxious crew safely back to shallow water.

This offshore wind had broken up the land-fast ice, permitting the *St. Roch* to work slowly eastward. Inuit at Barter Island informed the police that it was the first time that the ice had broken up that "summer". At Demarcation Point, which marks the Alaska-Yukon boundary, open water appeared. The weary crew then had smooth sailing to Herschel Island, which was reached on 27 July, one of the earliest arrival dates for vessels from the west.

On 1 August the *St. Roch* crossed ice-free Mackenzie Bay. The reason for clear sailing was soon apparent. All the ice had been blown into the eastern side of Amundsen Gulf. At Cape Parry the sea was blocked by a solid mass of floes extending to the northern horizon. The *St. Roch* anchored in the harbour at Big Booth Island and there met the Hudson's Bay Company supply schooner *Fort Ross* which was also trying to work eastward.

When an eastward route was still blocked on 8 August, Larsen crossed the open gulf northward to Banks Island. At DeSalis Bay he met three Inuit schooners awaiting an opportunity to cross southward with their winter's catch of valuable white-fox pelts. The Inuit followed Larsen's advice and cut directly to the south rather than staying close to shore, as was their custom. On 11 August the *St. Roch* entered the south end of

Prince of Wales Strait and rescued a small Inuit schooner which had been trapped in heavy floes. With this assisting work successfully completed, Larsen turned to his assignment of penetrating into Prince of Wales Strait.

The first view was not encouraging. Much of last winter's ice had not yet broken up; it stretched solidly from shore to shore. The *St. Roch* anchored at Walker Bay on the east side. This harbour brought back memories, for it was there that the police crew had wintered in 1940-41, at the end of the first year in their west to east crossing of the Northwest Passage. They left Walker Bay on 19 August and found the Strait still frozen to the shores, but with a narrow strip of open water in mid-channel. The stubby *St. Roch* rode jauntily down this "highway" for about 50 miles until heavy floes of last winter's ice again blocked the way.

Fortunately, the ice was moving back and forth with the currents through the Strait, enabling the *St. Roch* to work northward gradually. Shelter was found behind the Princess Royal Islands for a few hours and Larsen recalled reading about McClure's expedition which had wintered there almost a century before. Northward, the floes were grinding together but mid-channel was open as the currents seemed to move along both coasts. On 21 August the *St. Roch* reached the north end of Prince of Wales Strait. Large, unbroken floes, several years old, stretched to the northern horizon across Viscount Melville Sound.

The north end of the Strait was like the mouth of a

funnel. When the wind blew from the north, heavy ice from Viscount Melville Sound jammed into the narrow Strait. Whenever the wind reversed, loose ice in the Strait pushed northward and threatened to crush the *St. Roch* against the solid pack which barred the way. Five days were spent avoiding ice in this dangerous passageway. Through day and night they struggled, with little rest for the captain or weary crew. Fortunately, winds and currents kept the ice moving and it never jammed solidly, but their view from the mast-head showed solidly-packed ice blocking the way northward into Viscount Melville Sound.

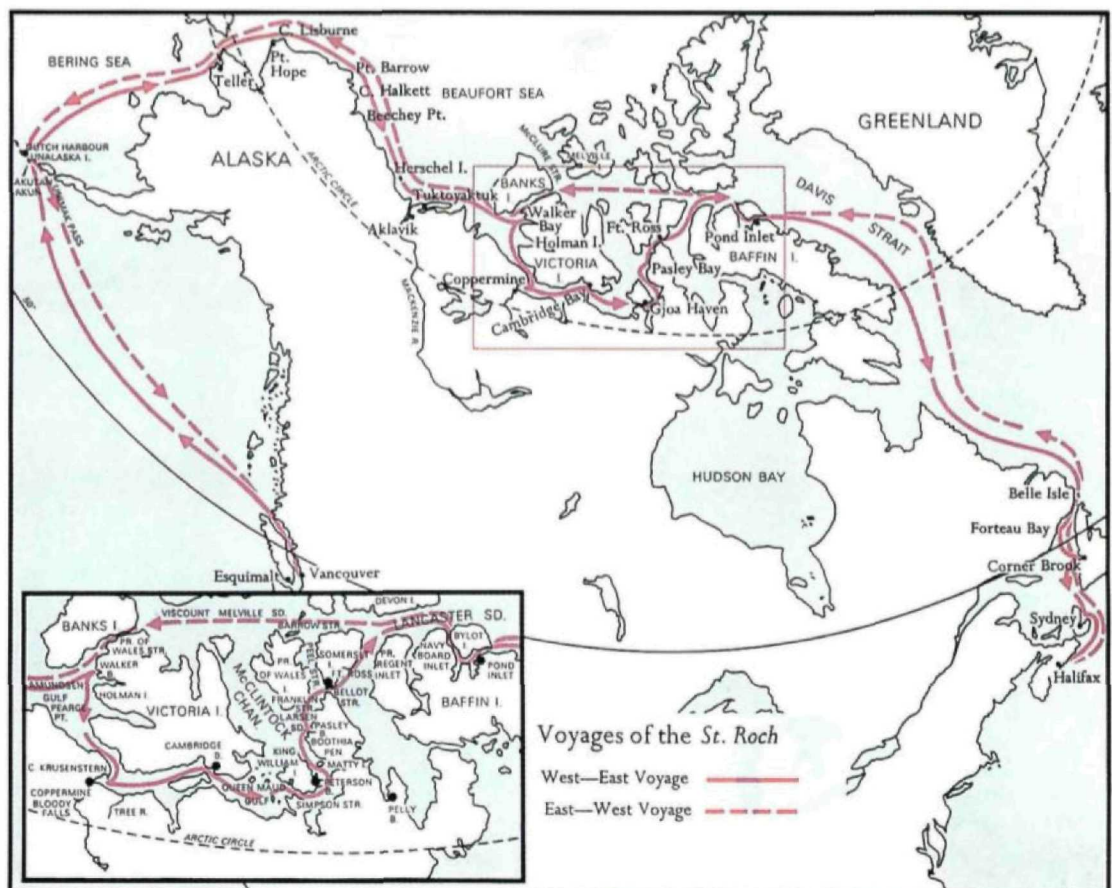
On 26 August the police patrol surrendered and retreated southward. They found shelter in an unmapped harbour, later called Jessie Bay, along the Banks Island coast. Exploration on the land revealed ancient stone tent rings of Inuit camps and moss-covered musk-ox skulls. Neither Inuit nor musk-ox had inhabited eastern Banks Island for a long time.

Although Larsen did not know it then, about the same time the American ice-breaker, which had conquered Antarctic ice the preceding winter, was also being stopped by Arctic ice in its effort to reach Melville Island from the east. Also at this time, in late August 1947, I was flying out of Cambridge Bay with an RCAF plane on the North Magnetic Pole Survey in the Central Arctic. McClintock Channel, east of Victoria Island, was full of

solid ice, and no open water was found along the coasts of Prince of Wales Island. It was indeed a "bad" year for ship navigation.

The *St. Roch* put into shelter again on 29 August, south of Peel Point, on Victoria Island. From the high land inland, the RCMP crew confirmed with binoculars that no passage existed northward. They remained in the area for a few more days hoping for the ice to open up as it had done in 1944. On 2 September new ice began to form across the open water, reminding them that the short arctic summer was drawing to a close. It was to be another 22 years before another ship traversed Prince of Wales Strait. In 1969 the huge U.S. tanker and icebreaker *Manhattan* used this route, with few ice problems, when making its east-to-west Northwest Passage trip.

It was a disappointed crew that again pointed the *St. Roch* southward. Their dreams of exploring new channels in the northern islands, the thrill of being first to accomplish a navigation feat, and the satisfaction in conquering the icy barriers of nature, all had to be forgotten. The score was evened. The Strait had been conquered once by the *St. Roch*, but this time it had resisted successfully. Arctic ice was indeed unpredictable. On 4 September they passed the high cliffs of Nelson Head on southern Banks Island. There was clear sailing across Amundsen Gulf, which had been packed with ice a month previously.



On 6 September the RCMP patrol vessel reached Herschel Island and preparations were begun for wintering there. Again, the physical environment of the Arctic proved changeable and favoured them with a mild fall. It was not until 15 October that heavy snowfalls finally formed slush ice over the harbour. By the end of October, almost a month later than usual, the harbour began to freeze over. The ship was covered with canvas to protect it from the weather and the ice was cut away from the hull to prevent crushing. The *St. Roch* was to spend its 13th, and last, winter in the Arctic, as the headquarters for a temporary RCMP detachment. Its exploration work was done for the season, but the policemen's "normal" duties continued, as they had during preceding winters.

In late November Inspector Larsen travelled by dog-team to Aklavik, and was flown outside by the RCMP Norseman aircraft for consultation with police officials and arctic experts in Ottawa. Some of the other crew were also flown out for the winter. During the winter the resident police patrolled to nearby Inuit camps, where a poor trapping and hunting year left many natives in need of food. The police also supervised a minor gold rush which was developing along Firth River on the nearby Yukon mainland.

In early June 1948 the bilges began to thaw in the *St. Roch* and the ice around the ship began to melt. During this break-up period the *St. Roch* leaked badly and had to be pumped continuously. On 2 July the sea-ice began to break up and a strong westerly wind cleared the harbour. On 23 July the police, with Larsen again in charge, left Herschel Island and proceeded through heavy ice across Mackenzie Bay to Tuktoyaktuk.

Another arctic season had begun – the final one for the *St. Roch* – but there were no exciting plans. The several police posts had to be provisioned, the prime purpose of the RCMP schooner. On 29 July the *St. Roch* left Tuktoyaktuk with freight for the tiny settlement of Coppermine. That year Amundsen Gulf was almost ice-free, illustrating the great and frustrating contrasts in

summer seasons in the Arctic. Fog, always prevalent where there are contrasts between cold water and warming land, caused more delays than did ice. The police aided the Hudson's Bay Company by also carrying their annual supplies to trading posts at Read Island and Holman Island off the southwest coast of Victoria Island.

By late August the *St. Roch* and her crew had completed their supply functions and prepared for the journey to Victoria, B.C., via the north Alaska coast. The ice, which is ever-present over the Beaufort Sea, had been blown southward and was packed solidly against the mainland coast west of Cape Parry.

From 29 August to 2 September the *St. Roch* struggled through heavy ice in Franklin Bay. The police were joined by the Hudson's Bay Company supply ship *Fort Ross*, and the R.C.A.F. supply ship *Snowbird*, which were trying to return to winter quarters at Tuktuk. Because Captain Summers, veteran captain of the *Fort Ross* was very ill, Larsen broke a way through the ice for all vessels. The ice-field terminated near the shallow water west of Baillie Island, and the vessels finally worked free and reached Tuktuk.

For the *Fort Ross* another season was finished but the *St. Roch* still faced the difficult passage around Alaska. The vessel had been leaking badly all summer and it was necessary to reach dry-dock in Victoria for a complete overhaul. Larsen began to doubt the likelihood of getting out of the Arctic that year, for ice was packed heavily against the mainland. It took three days to cross ice-filled Mackenzie Bay. While loading fuel and supplies at Herschel Island, Larsen saw that solidly-packed ice masses, with no navigation cracks, were a jumbled white desert to the western and northern horizons. One of the sad events of this final departure from the Arctic was a procession of local Inuit who came to say goodbye and to say how much they appreciated the help of the police over several years.

Larsen left Herschel Island on 9 September and fol-



Vancouver Maritime Museum

"St. Roch" during her last winter in the Western Arctic, 1947-48, frozen in at the bay adjoining the RCMP barracks at Herschel Island.

lowed the shoreline westward. As in previous years, numerous islands and sand bars off the coast formed a barrier to the ice and the grounded floes left a strip of shallow, open water near the shore. The policemen arrived at Point Barrow on the night of 12 September. Floes were only 400 yards offshore of this low sand spit jutting into the Arctic Ocean. The wireless operator on the *St. Roch* had been in touch with the radio station at Point Barrow and the whole settlement prepared for their arrival. Every light in the village was put on, thus enabling Larsen to mark the shoreline. He inched the *St. Roch* around the point in 14 or 15 feet of water, sounding continuously with the lead line. As is often the case, there was open water west of Point Barrow, and the *St. Roch* left the ice behind for another year. Larsen would have been amazed to know that in a few years this small native village at Point Barrow would become a modern, busy town centering on the oil industry of northern Alaska.

At Dutch Harbour in the Aleutian Islands the *St. Roch*'s engineer discovered impending trouble with the ship's connecting rods. Larsen therefore decided to stay close to the southern Alaska coast rather than crossing the open Gulf of Alaska. On 1 October the *St. Roch* rolled east and southward in strong gales. The weather finally improved after leaving Ketchikan on 14 October. After two seasons of buffeting by ice and wind, the tired captain and crew found it a pleasure to relax and enjoy the scenery of the central B.C. coast during the leisurely last part of their voyage. Journey's end was reached at Vancouver on 18 October 1948. The log for the two seasons read 7,290 miles, with a steaming time of 1,077 hours. This was the last voyage of the historic *St. Roch* in the Canadian Arctic. For 21 years, the ship had patrolled through ice-filled arctic waters, experiencing difficult, stressful conditions, so it was not surprising that it was in need of repair. In late October, the *St. Roch* was moved to winter quarters at Esquimalt for a general overhauling.

Can one count the number of times that hundreds of pounds of ice floes crashed into the sturdy wooden hull? How many times hard, sharp ice had ground into the Douglas fir planks as the vessel slid between grasping floes? How many times the engine had worked doggedly to push aside several miles of crushing ice, or clattered wildly into reverse to escape an onrushing ice juggernaut? How many times ice had frozen and expanded in the many cracks during severe winters when temperatures dropped below -50°F for several days in succession? Truly the *St. Roch* had earned a rest.

EPILOGUE

After two decades of faithful, and sometimes glorious, service the *St. Roch* was virtually forgotten and neglected for a couple of years in Esquimalt harbour in Victoria, B.C. In 1950 Henry Larsen, then commanding



"*St. Roch*" heads for home.

the RCMP Arctic Division in Ottawa, persuaded police officials to bring the *St. Roch* to Halifax, possibly to be put back into service in the Canadian Eastern Arctic. This trip from Vancouver to Halifax, through the Panama Canal, meant that the *St. Roch* became the first ship to circumnavigate North America.

However, plans for further arctic work were cancelled and the *St. Roch* was once more neglected in Halifax harbour. During this time Larsen persuaded the City of Vancouver to buy the *St. Roch* for \$5,000 and he sailed it back to Vancouver in the fall of 1954. But again, verbal battles broke out over what to do with the vessel and it sat for four years at a Vancouver wharf with minimum care. In 1958 the *St. Roch* was partially restored and pulled ashore into a concrete drydock at Kitsilano Beach near the site of construction of the Vancouver Maritime Museum. Once in the open and in Vancouver rains, the hull began to decay.

In 1966 the National Historic Sites Division of the federal government and the city of Vancouver agreed to preserve the *St. Roch* and built an A-frame cover, adjoining the Maritime Museum. Beginning in 1971, there were three years of replacement of timbers and other restoration work and the *St. Roch* was finally opened for public display and visits in 1974. Extensive repairs were needed for the drydock in 1991 and dry rot in the hull had become serious. After a lengthy debate over which level of government should be responsible for continual maintenance costs, Heritage Canada withdrew financial support in July 1995 as part of federal government cut-backs. All of the staff and tour guides were let go. Reduced funding would continue for two years only and the *St. Roch* site fell under the administration of the Vancouver Maritime Museum. So the ship's role in reminding people of its part in Arctic transport and exploration is preserved for a few years.

J. Lewis Robinson, a distinguished Canadian geographer, wrote the official record of the two historic voyages of the "St. Roch" through the Northwest Passage. Henry Larsen died, full of honours, in 1964.