The man for whom Wrangel Island is named actually never saw it, but among those early explorers who traveled over the land and along the ice north of the Siberian coast, he came the most tantalizingly close. An admiral in the imperial Russian navy, between 1820 and 1823 Wrangel was in command of an expedition that began from the mouth of the Kolyma River. The three-year undertaking included four forays onto the ice in a quest for northern lands, both new and explored, and the mapping of the coastline from the river to Kolyuchin Island. One of his directives was to ascertain the accuracy of maps made by previous explorers, most of which were considered questionable. Another addressed the belief (or hope) that somewhere east of the river an isthmus connected Asia and America. Besides these concerns, there had been the claim of an early nineteenth century explorer, Yakov Sannikov, of previously undiscovered land northeast of the New Siberian Islands.

The questionable existence of this mysterious "Sannikov Land" as well as an earlier claim of an "Andrejew Land," named for a sergeant who surveyed the Medvezhyi (Bear) Islands in 1763 and was certain he had seen a northern land, provided the motivation for Czar Alexander I ("Alexander the Blessed") to order two expeditions to the Arctic Coast. Alexander had assumed the throne after the murder of his father, Paul I, in 1801. He ruled during the Napoleonic Wars and, in the early part of his reign, was considered a liberal-minded emperor, although many of his reforms had been revoked by the time Wrangel was sent to Siberia.

Ferdinand Wrangel was fully aware of the mapping efforts of earlier explorers and of the claims made by Sannikov and Andrejew. There were also the Chukchi accounts of mountains observed north of Cape Yakan, far to the east and, as would later be shown, the closest landform on the Siberian coast to Wrangel Island. When Wrangel stepped from shore to ice he did not know that the Chukchi report might have been the only one with a grain of truth. The accurate mapping of islands and the hope for another continent, or at least a broad isthmus — one that would add significantly to the czar's domains — were considered goals worthy of time, effort, and money.

Besides the uncertainty surrounding the reports of Sannikov and Andrejew, the results of both Michailo Staduchin and Semen Dezhnev's separate explorations, undertaken 150 years earlier, were also considered questionable, particularly since they had not been published at the time. There simply was no solid evidence of lands north of the New Siberian Islands. Thus, one of Wrangel's goals was to survey to the most westerly point reached by Captain James Cook on his third voyage in 1778, and to dispel or confirm a continental link to America, a question that Dezhnev, if he did give an accurate account, would have been put to rest by rounding the tip of Siberia.

Wrangel's orders came from the Department of the Admiralty, where experience gained from previous explorations influenced the scope of Wrangel's directives. Both Andreyev and Sannikov had stated that it was the condition of the ice that limited their efforts, rather than weather or supplies, or their method of traveling on sledges pulled by dogs. Explorations of the Medvezhyi and New Siberian archipelagos depended on dogs, and it was felt that this mode of travel was most likely to meet with success. The orders of the Admiralty made the reasoning for such sledges clear, stating that:

"As this appears to be the only practicable plan for the execution of His Imperial Majesty's desire, its adoption has been resolved on by the Department of the Admiralty, with respect to the exploring expedition now to be sent. Accordingly, the first division of that expedition is directed to proceed in sledges to survey the coast eastward from the mouth of the Kolyma as far as Cape Schelagskoi, and from thence to proceed in a northerly direction, in order to ascertain whether an inhabited country exists in that direction, as asserted by the Tschuktschi and others."

Clearly this last statement was a reference to Wrangel Island.

Wrangel certainly agreed with the directive (and in any case, he was hardly able to argue), but he was also keenly aware of the organizational efforts that would be required to support such an ambitious

plan. Supplies would have to be acquired from Siberian communities along the proposed route, and in addition he would need the cooperation of local authorities to support the complex logistics of the undertaking.

The account of Wrangel's three-year undertaking is given in *Expedition to the Polar Sea*, published in 1840. The book is credited to Wrangel but was in fact first published in German by M. Engelhardt, who derived his text from the journals and papers of Wrangel and other officers. Later translated into English by "Mrs. Sabine," the wife of the explorer and scientist Edward Sabine (Sabine's Gull is named for him) who contributed to the editing, the book gives a detailed account of the expedition. The book also includes an extensive overview of previous efforts in the Arctic as well as Wrangel's own views of the explorers who preceded him.

In the introduction the Admiral's purpose is clearly set out:

"I have had no other object in view, than to extend the geographical knowledge of those regions; to correct previously-existing errors; and by a plain statement of what we ourselves have done, to make ourselves useful to those who may come after us. With these views, I have ventured to be rather diffuse in the description of particular circumstances and events connected with our journey, when they happened to bear directly upon the object of our mission. In all that relates to the natural history and physical characteristics of the country, I have adhered for the most part to the observations of Dr. Kyber, who accompanied me as naturalist."

Czar Alexander could not have chosen a more capable man to correct the errors of other explorers, rather they resulted from wishful thinking or honest mistakes. And, interestingly, the mixed outcome of Wrangel's expedition, including his failure to find the island, did not hinder him in the future: Wrangel's career would take him to Alaska, where a coastal town, a chain of volcanic mountains, and an island all bear his name.

The shore from the Medvezhyi Islands to Cape Shmidta, the latter's location confirmed by Captain Cook in 1778, had been poorly surveyed in Wrangel's opinion; he gave good marks only to the work of Cook and Joseph Billings, an explorer in his own right who accompanied Cook. Maps for specific landmarks often differed from each other by more than a degree in latitude. As far as Wrangel was concerned, the coast from Cape Shelagskiy to Cape Shmidta was unknown. The idea of a connection between America and Asia along this coast could not be fully discounted, although Wrangel makes it clear in his account that he doubted the existence of such a peninsula from the start, and that, regardless of whether Dezhnev was the first man to round the Siberian coast and enter the Bering Strait, his information was vague and of little use. Wrangel also discounted the results published in a book by James Burney, a scientist who had accompanied Cook on his explorations of the eastern Siberian coastline. In 1819, Burney published a book in which he expanded on the idea of a continental connection between Asia and North America. This hypothesis was, in Wrangel's view, based on unreliable sources.

With this background of exploration in the region, Wrangel could be certain of the existence of only two island groups — The Medvezhyi and the New Siberian — and not much else between the Kolyma River and Cape Shmidta (Cape North). Other than the surveyed islands, lands north of the coast were places of rumor, conjecture, and unconfirmed existence.

Fully cognizant of these gaps, the czar directed that starting at the mouth of the Kolyma River, Wrangel would undertake a coastal survey between Cape Shelagskiy and Cape Shmidta and would also venture north over the ice in search of the lands reported by Andreyev and Sannikov. At the same time a navy lieutenant, Pyotr Anjou, was instructed to proceed north from the mouth of the Yana River and survey the New Siberian archipelago. Both explorers were fully capable of undertaking their assigned

tasks. Only the weather and the terrain might interfere with their most determined efforts, while the necessity of relying on locally obtained supplies and dogs would be a continual concern.

In 1778, the venerable English Captain James Cook had reached Cape Shmidta from the east, providing an accurate account of his efforts to travel along the Siberian coast. By proceeding eastward from the Kolyma, Wrangel could close the gap with a coastal survey and then undertake his second objective of traveling north over the frozen sea.

Wrangel was fully acquainted with Staduchin's 1647 voyage and, although it was unclear of how far along the coast Staduchin had traveled, Wrangel believed that the explorer had journeyed beyond Cape Shelagskiy. This cape is positioned at a longitude of less than 171 degrees (east), whereas Wrangel Island is nearer 179 degrees, so even if Staduchin went farther east, it was unlikely that he ever saw land north of the cape.

Wrangel and Anjou started from St. Petersburg on March 23, 1819. The two men separated in Moscow, as Anjou undertook the assignment of arranging for transporting their instruments, and Wrangel journeyed eastward towards Irkutsk. Wrangel was accompanied by Pyotr Matyushkin, a midshipman in the Russian Navy, and two seamen, Kuzmin — a mate in the navy — and Dr. Kyber. Carrying minimal luggage, the men hastened as quickly as possible to Irkutsk by small carriage, assured that these sturdy vehicles were the fastest and most reliable means of travel. According to Wrangel, Irkutsk was 5317 versts (3524 miles) from Moscow. Then as now, Russia was indeed a very broad country. In the lower elevations, spring was upon the land and here the men welcomed the sight of trees, grass, and flowers. They crossed the Urals, the boundary between the western regions and Siberia. The mountains were still in the icy grip of winter where travel could be slow and hazardous, but Wrangel was aided in his journey by the people of the country, who arranged for quick carriage changes and supplies. On May 18th, the men reached Irkutsk, situated on the shore of Lake Baikal. They stayed a month, making arrangements for their northern expedition. Here Wrangel met Matvai Hedenstrom, who although held the unenviable status of a banished smuggler, had nevertheless led an expedition for the czar to the island of New Siberia; from this starting point Hedenstrom had ventured over the ice. Although recognizing Hedenstrom's capabilities, Wrangel was skeptical of his claims; he also doubted the veracity of most reports of new land. It was his directive as a capable explorer, who seemed little motivated by ego, but rather by a questioning, keenly observant mind. The czar was looking for usable, exploitable land, not ice which thickened and thinned with the seasons, supporting little. Myth played no part in his expansionist dreams.

With the cooperation of the governor-general and other local authorities in Irkutsk, Wrangel felt confident that he could obtain both the necessary supplies and the required papers for passage through the lands to the north. Such help was probably as much in response to directives from the Governor-General of Siberia, who paved the path for the czar's men. Nonetheless, provisioning was not always forthcoming as the group traveled north; with each step taking them further into an increasingly hostile wilderness, they were as likely to encounter disdain as attention to their needs.

In early June, Anjou and other members of the expedition arrived in Irkutsk, bringing the instruments with them, and on June 25th, the two groups began an overland trek to the Lena River, which at over 2700 miles in length is one of the longest on the planet. With its source a few miles from Lake Baikal, the Lena was fully navigable at Wrangel and Anjou's first stopover, the village of Katschuga, about 120 miles from Irkutsk. From this point, they planned to row north, carrying their governmental passes that granted rights to travel on the river.

Acquiring a large flat-bottomed boat at the village for their transportation, Wrangel was made aware once again that the great rivers of Siberia were the only reliable means of internal navigation across the land, and that the residents of the region were dependent on supplies from the southern

cultivated lands, carried overland and up the Lena. Wrangel commented that a steamer on the river would be of great aid and assurance to the people who lived there.

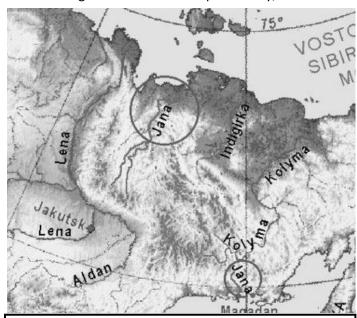
The Arctic Ocean is over 2500 miles from Irkutsk, and on their journey down the Lena Wrangel and his companions were to experience their own share of tribulations before undertaking the formal expedition along the coast and onto the ice. The weather varied from heavy rain and gale-force winds to sunny calm. In spite of the rain, large tracts of forest were burning, most of the fires the result of human carelessness. With his fertile mind occupied by his present circumstances, Wrangel wrote extensively about the experience of traveling down the Lena. The islands, the mountains, the struggles of the people who lived there, the twists and turns of the magnificent river— all were worthy of comment. He also documented many observations of the geology of the region and commented on the navigation of rapids and smooth waters alike. The river would deepen as it sped between precipitous cliffs and spread out as flatter terrain was encountered.

Wrangel also was a keen observer of the efforts at human habitation in this harsh land. In the southern regions, pastures and gardens were in evidence, but as the explorers rowed north, the land appeared more sparsely settled, and the widely spaced villages were much reduced in size. Here the acquisition of food depended more on hunting than farming. Wrangel noted that only the native Yakutsk had over the centuries acquired the necessary skills to ameliorate suffering and even thrive in such an unforgiving place. It was more difficult for the Russian newcomers.

On July 25th, Wrangel and Anjou arrived in Yakutsk, a town of 4,000, where they stayed with the local Commandant; this man would prove to be instrumental in supplying the expedition and offering much-needed advice on travel in the region. Wrangel noted that the town was the trade center of Siberia, and he observed many items offered for barter or sale, including ancient mammoth bones.

Roads being for the most part nonexistent north of Yakutsk, travel towards the sea would of necessity be by river or informal trails, beat down by human feet or horse. The two leaders now separated, with Anjou continuing down the Lena, while Wrangel traveled overland by horseback east to the Kolyma River. Accompanying Wrangel were horse handlers and a retired Russian sergeant, a man experienced in Arctic travel who would prove to be a very useful companion as well as interpreter. With 10 pack horses, each loaded with about 220 pounds, and riding mounts for Wrangel and his men, the group struggled along the muddy, rocky trail. The surrounding forest was composed of pines and larch, and the weather was chilling. If Wrangel had previously succeeded in putting aside thoughts of the approaching winter, the cold served as a prescient reminder. As they began their trek the region was dotted with lakes and ponds, with plentiful waterfowl, a welcome addition to their spartan fare. But soon the terrain became more rugged and inhospitable, with both desert and mountains to be traversed, and often muddy, nearly impassable trails. The men now hoped for cold weather which would solidify the earth beneath. They followed the Aldan River, and then crossed it, nearly sinking in a leaky flatboat. Smaller streams were negotiated on horseback, although the water sometimes came up to their saddles; nothing seemed small in this inhospitable, uninhabited land. Now the men felt the onset of winter in the lowering temperatures and falling snow. Wrangel did not complain but rather seemed to take delight in the comfort of a fire, a small tent, and tea and soup. He enjoyed the companionship of the native Yakuts, whose ability to handle the horses was greatly admired, and who provided entertainment with many hunting stories.

The temperature dropped below zero, and the men came to a chain of steep mountains, the Verkhoyansk. A dangerous passage along precipitous slopes was made only slightly easier by good weather; struggling over this range, the men now were in the watershed of the Yana River. The unwelcoming terrain softened its personality, and huts were available along the route; most were



The four major rivers that Wrangel encountered and crossed on his overland journey to the Kolyma River

formed of tree branches, although a more luxurious yurt was sometimes available. Such infrequent lodgings included the availability of local cuisine, which, if not at first a menu to which the men were accustomed, soon became preferred fare.

Crossing the Yana (Jana), and passing alongside hills and mountains, the group finally arrived at the Indigirka River. The temperature grew colder, the plains were swept clear of snow by wind, and the lodgings were generally drafty. The majority of the local peoples were Yakuts, herders of cattle and horses. Finally entering the Kolyma district, they found the land swampy to the extreme. The habitability of the land improved as the group continued towards the Kolyma, and once again trees dotted the landscape.

On the 25th of October, approaching the river in darkness, the men saw smoke

from many fires, some meager homes, and a church. Excited, barking dogs constituted the welcoming committee. They had reached Srednekolymsk (Ninske Sredne Kolymsk) on the Kolyma River; the town was one of three forts built on the Kolyma in the seventeenth century. Within a few days of their departure down the Kolyma, the men would trade the horses for dogs and sleds. More rapid and protective, Wrangel pronounced this mode of transportation much preferable to the horse.

But now the trees disappeared entirely, and when the men came to Nizhnekolymsk on November 2, 1820, the thermometer read a chilling -40 degrees. His center of operations for the next three years, Nizhne Kolymsk was a palisaded fort with four towers. Inside were an administration building and storehouses, while houses were positioned outside the walls. Although a harsh place, the abundant wildlife and fish supported a substantial population of hunters. To the east the land was for the most part uninhabited, particularly beyond Cape Shelagskiy. To reach Nizhnekolymsk, Wrangel estimated he had travelled 11,000 verts (about 6,620 miles) in the 224 days since they had left St. Petersburg. For Wrangel, the expedition had now truly begun.

Surrounded by marshy land, with the ground beneath the surface permanently frozen, Nizhnekolymsk was a harsh place for human habitation. The vegetation consisted of mostly ground-hugging, short-season plants, with patches of willows and larch occasionally interrupting the monotony. Yet Wrangel found the human inhabitants to be overall quite healthy, although their existence was always on the edge. Enough forage did permit the keeping of cattle for some of the people, and disease was uncommon, with scurvy quite rare. Although crops could not be grown, animal life was abundant. Summer was an extremely busy time when game was hunted, and fish trapped. But in spite of the seasonal availability of food from a nearly unhabitable environment — at least by human standards — Wrangel could not help but ponder about the continual struggle for survival for anyone who lived so close to the northern sea. During the first winter he had time to observe the customs and industry of the

native peoples and wrote extensively of their culture. For him, the goals of his sojourn, dictated by his czar, limited the time he would spend in such inhospitable surroundings, and in the end, he would be glad to leave a land that demanded so much of the people while giving so very little. The rugged Admiral witnessed firsthand life truly on the edge, and he knew he would depend on these people to supply him with that which he could obtain not on his own.

Thus, Wrangel spent much time that first winter arranging supplies, persistently doing so without much cooperation from the local commissioner; this despite the directive from the Admiralty authorizing the acquisition of food. Meeting with Matyushkin, who had been somewhat successful in procuring fish, Wrangel invited the richest residents of the town to his lodgings to negotiate prices for supplies and determining the availability of wood for sledges and a boat. Dogs had to be obtained; Wrangel was fortunate to have the assistance of a knowledgeable Cossack for this effort.

Even with willing and able help, the procurement of supplies was maddeningly slow. The Commissioner of the region being one of the chief obstacles, this man spoke only of danger and was particularly adamant that the Chukchi people were to be feared. Never having traveled in the region, Wrangel could not totally discount the dire warnings. Thus, although he had intended to depart early in February, when the ice was still solid, as the expected date approached, Wrangel began to realize that acquiring sufficient numbers of dogs and food stores would mean a delay of a month. With the availability of a few sledges, Wrangel decided to send Matyushkin to Ostrog where his trusted associate would attend a fair, purchase items for the sledges, and most importantly, try to establish good relationships with the local Chukchi.

First Journey, February-March, 1820 - The Coast

On February 14th three sledges driven by Cossacks, one of them an interpreter, departed for the mouth of the Kolyma. Wrangel followed on February 19th, reaching Sucharnoi Island where he organized supplies and instruments. Three days later he began his foray eastward in the company of several sledge drivers, many howling dogs, and the mate Kuzmin. Wrangel led the entourage, confident that he had through experimentation with the sledges at Nizhnekolymsk acquired knowledge of what their pace would be.

Each sledge was loaded with 1,000 pounds of supplies; as the journey progressed, the plan was to return emptied sledges to the Kolyma. At times traveling away from the coast in order to follow a more direct line, Wrangel cached supplies along the route in structures known as saibas; constructed of four posts, nine feet in height, topped with a platform for the supplies, and covered with wood and snow, the stout saibas were designed to withstand destruction by local predators such as wolverines. This effort to safeguard their provisions would ensure the availability of much needed sustenance on their return.

Most often the men slept in tents, huts being uncommon in this isolated land. Food was simple, with dinner consisting of a fish or meat soup. Breakfast was much the same, while tea provided comfort if not nourishment. Temperatures hovered at 20 or 30 degrees below zero. This was an improvement over the -55 degrees endured in at Nizhnekolymsk in December, when people huddled by their fires and forsook the winter hunt. And although the sun now peeked above the horizon, in such cold it was necessary to take great care to remove damp clothing in the evening, particularly socks and boots, to prevent frostbite. Taking accurate position measurements was also difficult in the cold. Even the dogs were "clothed" with boots and a blanket. Nevertheless, Wrangel would report temperatures above -30 degrees as "pleasant." Only a headwind or soft snow seemed to slow them.

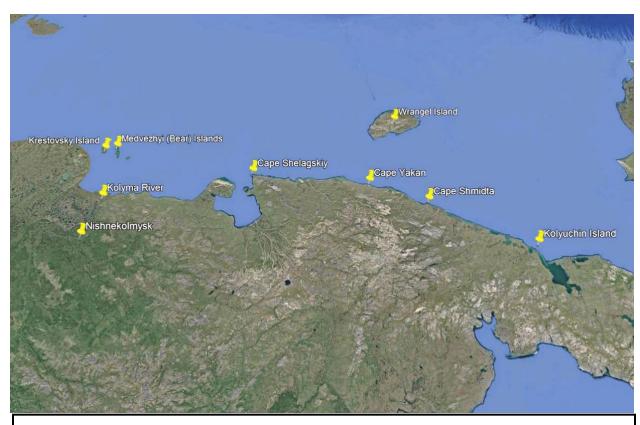
They were constantly on the alert for mobile Chukchi herders, the sledge drivers being in great fear of these people. The land was mostly uninhabited, although visited by inland Chukchi with their large reindeer herds; on occasion, the men found signs of encampments.

Russians had last visited this region in 1765.

Smooth snow over ice often enabled a rapid pace, but even when the sledges moved quickly, the flat, monotonous terrain they now traversed was mind-numbing for the men. Wrangel wrote of finding relief in the simplest of three-dimensional structures — "We hailed the sight of a heap of drift-wood with pleasure, and even the closing in of darkness was a welcome relief."

Sometimes traveling 25 miles in a day, cold and wind would cut the distance covered by half, and a frost that covered the ice would further impede travel. The instruments were affected by the cold, to the extent that Wrangel could not be certain of longitude measurement and struggled to keep his chronometer from freezing.

Eventually reaching a strait between the mainland and a small island, Wrangel and his men came upon a few uninhabited huts. Uncertain how far they were from Cape Shelagskiy and low on fuel and supplies, on March 3rd the men saw hills to the east and turned towards them. The group struggled through ice hummocks, which constantly put the sledges at risk of overturning, and at times forced the men to strap on harnesses and assist in pulling. Temperatures still hovered at -30 degrees. The Cape finally came into view and, finding refuge on a beach with driftwood available for a fire, explorers and dogs were at last able to rest. With only three days of supplies left, Wrangel debated about proceeding beyond the cape, as in addition to surveying the coastline, he could settle the unsolved question of whether an isthmus connected Asia and America. Proceeding with two sledges and the healthiest dogs, and traveling an additional forty miles, Wrangel observed that the coast trended to the southeast and the offshore water was probably deep. After erecting a pyramid of stones near a stream that marked their most eastern point, they returned to their campsite; here one of the Cossacks erected a large wooden cross, which the men engraved. The next day, March 7th, they started back by a more southerly route, avoiding the ice hummocks near the coast; the temperature was -31 degrees. By March 9th they



Landmarks along Siberian Coast and the Medvezhyi Islands, explored by Wrangel

reached one of their caches, which remained intact; unfortunately, the other three had been overturned, and the food consumed, apparently by four-legged mammals. They reached Nizhnekolymsk on March 14th, having traveled 1,122 versts (744 miles) in 22 days. Most importantly, they had achieved their goal of reaching a point east of Cape Shelagskiy. No additional land had been found. Wrangel could now turn his attention to the Arctic islands.

Matyushkin returned five days later (March 19th) and reported that he had succeeded in establishing good relationships with the local Chukchi, despite the warnings of local officials that these people would be hostile. He had been present in Ostrog for the yearly fair and by presenting gifts and requesting assistance of people from the eastern areas, while assuring them that if Wrangel succeeded in accurate surveys of the area, ships would follow and bring cheap goods from which the Chukchi would benefit. The local leaders promised that the expedition would be met with kindly support.

Second Journey, March-April, 1821 – North on the Ice

On March 26, 1821, a year after his departure from Moscow, confident in his surveying of the coastline to Cape Shelagskiy, Wrangel undertook the first of his northern forays onto the ice. Successful in procuring supplies, Wrangel led a much larger party than the previous year, and the load was commensurate with the size. Twenty-two sledges drawn by 240 dogs transported 30 days of supplies. To augment the diet, the men hoped to hunt for Polar Bear. As with the earlier trip to Cape Shelagskiy the emptied provision sleds would return to Nizhnekolymsk. From a starting point at Sucharnoi Island, Wrangel was accompanied by Matyushkin, a retired sergeant, Reschetnikow, a sailor, Nechoroshkow, and sledge drivers. A merchant, Bereshnoi, also joined the large group, bringing his own sledges.

Although Wrangel's instructions dictated that he should proceed to Cape Shelovskiy before venturing northward, his worry about the hummocky terrain and the possibility of encounters with the Chukchi influenced his decision to begin their ice travel at the Baranov Rocks. The first day provided enough toil and excitement to have daunted the hardiest of the explorers; large hummocks impeded their progress, and overturned sleds had to be extracted from the ice.

On the 27th the party turned north, leaving the continent and entering the world of ice. They were now in a land of large hummocks, flat ice plains, snowy gulches, and fissures in the ice. It was a variable, uninviting terrain. A long (and successful) pursuit of a polar bear provided fresh meat, restoring the tired men when they stopped for the night. The following day the temperature inched to +5 degrees in the morning, the winds were favorable, and ice conditions good; they traveled more than 28 miles that day. Believing they had sighted land, while keenly aware of the tricks atmosphere and ice could play, from their position Wrangel was confident that they had discovered an uncharted island. Their position indicated they were not approaching the Medvezhyi Islands (known as the Bear Islands at the time). Exhausted after a day of long travel, the party halted on the shore, where Wrangel could climb a prominence and obtain an excellent view of the new land. Certain that it was an eroded remnant of continental rock, he named the find Four-Pillar Island (for rock formations, it is also known as Chetyryokhstolbovoy).

On the following day, Wrangel directed Matyushkin to survey the island; in the evening the two men prepared a map of the results. Measuring their position with as much accuracy as he could obtain, Wrangel determined that Four-Pillar Island was indeed part of the Medvezhyi Islands, located at the eastern end of the chain. It had been visited, with the previously reported position in error by over 60 miles. Without expressing any disappointment, Wrangel felt confidence in his own measurements; correcting mistakes was part of the reason he was there.

With the temperature still favorable (up to +14 degrees) the party continued over the ice beyond the Medvezhyi chain. Now the group struggled with many of the difficulties encountered by anyone who ventured away from the continent. Forced to walk when ice conditions burdened the dogs, the

deepening snow and the thickening fog contributed to a slower pace and increasing discomfort as their clothes became saturated. Wrangel was convinced that the ice, which was too salty to be used as a source of drinking water, and worsening conditions implied that they were approaching open water. Yet they continued northward, encountering more hummocks, and measuring the thickness of the ice at about a foot. Snow blindness forced night travel; by the second of April their latitude was greater than 71 degrees. The ice thinned to five inches, and they swung south to safer terrain. The surface was covered with a salty frozen brine, and when the ice undulated in response to a strong northerly wind, Wrangel realized they could not proceed much farther. Taking two sledges loaded with supplies for 24 hours and leaving the party under the capable command of Matyushkin, Wrangel pushed north. The ice thinned and broke into fissures, which eventually separated the surface into fragments of earth, mud, and thin ice. He described it as "a great morass" with many cracks in the ice, but they proceeded until "At last they became so numerous and wide, that it was hard to say whether the sea beneath us was really still covered by a connected coat of ice, or only by a number of detached floating fragments." At a latitude of 71 degrees 43 minutes, and approximately 215 versts (142 miles) north of the Baranov Rocks, Wrangel turned around.

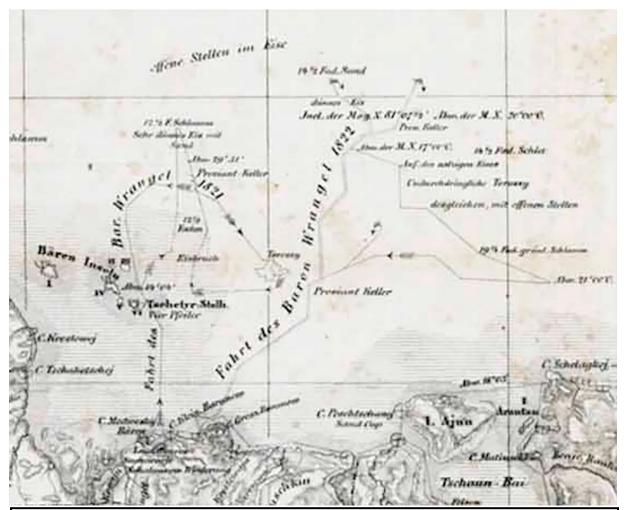
Moving the party out of danger of fracturing sea ice, they proceeded southeast, now encountering 80-foot-high hummocks, hollows filled with snow, "conical hills," and bare ice. The conditions were difficult to the extreme, and although Wrangel had not abandoned the hopes of traveling north once more, he nevertheless acknowledged the exhaustion of men and dogs and the deteriorating condition the sledges. Caching the provisions in a deep hole covered with firewood and snow, he sent eight empty sledges back to Nizhnekolymsk under the command of Reschetnikow, whose unerring sense of direction he trusted and greatly admired. With the reduced group of ten men, six sledges, and 14 days of provisions, Wrangel endeavored to turned northward once again. The temperature rose to 18 degrees, and the ice continued to melt. Ultimately, he would be thwarted by the warming days. Hummocky ice of variable thickness and age (Wrangel classified two types as "winter" and "spring"), miniature icebergs, open water patches, ridges, and weather that varied from windy to warm calm days left little doubt that conditions would get worse before they improved. This was not a quiet time passed in unending flattened vistas, but rather an experience of sounds like distant thunder, and the crack of a rifle. Progress to the north was continually thwarted by the dynamics of a melting sea that could transform itself from a benevolent calm to a threat in minutes.

Unable to proceed north, Wrangel took observations and on April 6th reported that "we pitched our tent 300 fathoms from a recent cleft, and near a large fragment of ice. A strong breeze prevailed from the east; the ice beneath us was agitated more or less the whole time we rested; and in the N.E. quarter there was a loud noise of crushing together of the masses of ice."

On April 8th as Wrangel and Matyushkin pursued a bear, a loud cracking of an opening ice lead threatened the party. With the men weakened and supplies dwindling, and the ice conditions as variable as the winds, on April 11th Wrangel turned the group around, back to the west. In the distance they could see Four-Pillar Island.

Struggling through hummocks, around openings, and dealing with eight wet dogs that had broken through the thin ice, after eleven hours of travel on April 14th, Wrangel and his nine companions came upon a cache of supplies left on their outward journey. The stores were undisturbed, although bears had been in the area. Hunting the bears took time and proved fruitless. Dried provisions would continue to constitute their diet.

Crossing their outward track, with Wrangel's own accurate map in hand, the reduced group



Portion of a map of Wrangel's routes north of the Medvezhyi Islands, published in Berlin in 1839.

traveled unerringly towards Four-Pillar Island, in spite of a blizzard that necessitated tying the sleds together, followed by a fog that obscured their view of the land. Forced to stop, they spent an uncomfortable night on a featureless ice plain, buffeted by the storm, unable to build a fire. Uncovering the dogs from a blanket of snow in the morning, and extricating the sleds, they traveled 30 miles to the north side of Four-Pillar Island. Here they found shelter beneath a cliff, and with plentiful driftwood on the land they built a large fire, dried their clothes, and enjoyed tea and soup — a respite that restored the embattled men.

On the following day, Wrangel and Matyushkin parted company briefly to shorten the time required to complete their survey of the Medvyezhi Islands. There were six islands, one of them Four Pillar Island. They found signs of human habitation, including many old artifacts as well as mammoth

bones on one of the islands. (Reports of a seventh island would be answered the following winter, when a survey determined the land to be part of one of the known islands.)

The group now traveled west and south, reaching the mainland at the Agfonowka River where they could for the first time in a month enjoy the comfort of a hut. Thwarted in their mapping work by the dismal spring weather, and relying on the knowledge of the drivers, they reached a small Russian village on the Tchukotskia River: the date was April 27th. Although snow still fell, signs of Spring were evident in the exposed brown earth and shades of green. After resting and eating well, thanks to the hospitality of the villagers, the refreshed party proceeded to Nizhnekolymsk, arriving on April 29th, thirty-six days after their departure. They had traveled more than 810 miles, in which they accurately surveyed much of the Bear Island group, putting to rest the myth of Andreyev land. What Wrangel hadn't succeeded in, however, was finding any land north of the Bear Islands.

During the brief summer of 1822, Wrangel devoted time to procuring supplies for the following winter; he also traveled the lower part of the Kolyma River by a boat built the previous winter and sent a party out on horseback to survey the coastline. The temperature "soared" to +68 degrees, the willows burst their buds, and as if on cue, the mosquitoes surged upwards in swarms. Respite only came when the temperature dropped near freezing once again; it was heaven to Wrangel when it did. They hunted birds and reindeer, and traveled along the coastline in the new boat, checking the fisheries and progress on the procurement of horses. By the middle of July, ice was forming along the coast, and the temperatures were dropping.

Suffering from "rheumatism" Wrangel was advised to return to Srednekolymsk where the weather was warmer. There he saw trees, absent near the coast, enjoyed the "luxuriant grass," and noted the presence of many valleys that would fill with water in spring; these lakes would be plentiful sources of fish for the local people who spent the summers in large camps along the shorelines. Wrangel benefitted greatly from the friendly reception of the natives and the restorative nature of a warmer land that seemed nearly tropical by comparison to the coolness near the mouth of the Kolyma. In Nizhnekolymsk, he learned of the success of the fishery they had established. He was also informed that the eastern Kolyma river mouth was already frozen. By September 8th, the entire river was solid. On September 29th, Wrangel was reunited with his companions — Matyushkin, Kyber, and Kuzmin — who had completed their survey work.

Third Journey, March-May, 1822 – North on the Ice

Unfortunately for the native inhabitants of the region, and for Wrangel as well in his efforts to search for and survey new lands, a disease began to spread through the dog population. These animals were of critical importance to humans making their home in the region, and necessary for Wrangel's explorations. Wrangel quickly tried to procure healthy dogs and separate them, but he was able to obtain only 36, most of whom subsequently died. Wrangel sent one of his Cossack employees to the Indigirka River where he was to purchase 60 dogs; he succeeded in obtaining only 45. Estimates put the death rate at nearly fully four-fifths of the population. Many of the remaining healthy animals in Nizhnekolymsk were obtained for Wrangel by local Cossacks. Still short on what was required, of necessity Wrangel reduced the size of the expedition. With what he hoped were enough supplies and strong enough dogs, Wrangel left Nizhnekolymsk on the 10th of March. By the fifteenth Wrangel and his rugged companions were at the greater Baranov Rock.

With 40 days of provisions and 15 days' supply of dried driftwood plus train oil for fires, the men started over the ice and turned northeast towards a point about 90 miles due north of Cape Shelovskiy. Here Wrangel hoped to finally put to rest the question of the existence of an isthmus north of the coast. If anything, the ice conditions were worse than the previous year and the group was greatly fatigued by battling wind and snow. The daily mileage was less than twenty, and at times their provision sleds

traveled at a measly mile per hour. At one time separated from two drivers and their sledges by the inhospitable terrain and bad weather, Wrangel feared the men might have been taken by Polar Bears, one of which had entered their camp at night. Reunited by the men, who recounted a night of cold and fear, Wrangel cached provisions and sent empty sledges back to Nizhnekolymsk.

The temperature sank well below zero, and the men passed 70 degrees latitude. At last the misery of cold and wind abated, and the temperature rose above freezing. With reports that the land was characterized by many hummocks to the northeast, Wrangel determined to swing west, but conditions were no better in that direction, and his sledge was subsequently broken at the top of one of these route-stifling mounds. The following day (April 24th) the increasingly fractured terrain was rendered more difficult by worsening weather, and the provision sleds fell further behind each day, often not reaching camp until well after dark. On the 25th the drivers of these sleds, under Wrangel's orders, prepared to return to the Kolyma; the provisions were placed in a cache sealed with water that froze immediately. On the 26th thirteen sledges started back.

With Kuzmin, three sledges, and five days of provisions, Wrangel once again started to the northeast. As they left, Wrangel determined they were about 18 miles eastward of the point reached the previous year. Sending Matyushkin northeastward to look for a passage, no land except the shore was in sight. Making their way north of 71 degrees, Kuzmin believed he saw an island to the northeast. Complete with rocks, valleys, undulating hills, the men believed they had finally achieved one of the most important goals of their expedition — finding new land. It would make any suffering worthwhile. It had appeared so real, but when the hills appeared to shift position, the disappointed men realized that it was a mirage, one of those near mystical occurrences not uncommon in the Arctic Ocean. Disappointed, the men turned back, meeting with Matyushkin on April 29th, as they had previously agreed. This dependable man had also imagined seeing land to the northeast.

Turning north and once again meeting with hummocks, making little time, and dealing with overturned sledges and other mishaps, Wrangel reported that they made it as far as he and Kuzmin and gone, taking four times has long. At this point one of the drivers became severely ill, and Wrangel sent him south in the company of two other men, on a sledge in good repair drawn by 24 dogs. They were 150 miles from the nearest land.

With six men and three sledges, Wrangel continued north, still dealing with nearly impassable hummocks, interspersed with occasional flat relief. Noting the greener hue of the hummocks to the north, Wrangel determined they were new formations near the edge of the continental ice. They had reached the sea; land to the north, if there was any, was not visible. This ice also proved increasingly difficult to navigate, and the exhausted dogs and difficult terrain slowed them to a rate of less than 20 miles in a week. Wrangel decided to turn back.

The effort was not completely abandoned, as Wrangel sent the trusted, capable Matyushkin and two drivers north. They were at 71 degrees 52 minutes. Matyushkin returned in six hours, having reached the dangerously broken ice at the edge of the open sea and returning to find much of his outward track beneath water. Wrangel now had reason to fear that the advancing sea would reach their cache a few miles away.

Fortunately, the stored provisions were safe, and reloading the sledges, Wrangel chose the least difficult route, and making better time led the men once again to a more northerly location than previously attained. He commented about the thunderous sound of the breaking ice, accompanied by columns of "dark-blue vapour."

He hadn't quite given up. They passed the 72-degree latitude mark but were stopped once again by thin ice covered with saltwater. The sea had deepened as they approached the edge of the continental shelf, and Wrangel was convinced that the possibility of any northern land was much farther than the year's efforts could take them. He decided to return to Cape Shelaskyoi and search the region one more time before quitting for the year. They started east, making reasonable time considering the wind and

extensive snow drifts. Attempts to kill a bear either met with failure (and lost time) or when successful the acquisition of an animal so thin as to be a poor source of nutrition. Sending Matyushkin and Kuzmin ahead to search for a route, these two men encountered open water, determined that a strong current was present, and the sea over 100 feet deep. They turned southeast towards the cape.

With the sea so deep but the continent not far distant (about 55 miles) Wrangel felt he did not have concrete evidence that there wasn't land to the north; however, the thin ice, the damp northern winds, and the increasing thickness in their location led him to believe that "both these circumstances indicate that the general state of the sea to the north differs materially from its condition in the vicinity of the continent." Given their line of sight to the north and south Wrangel could with confidence state that there was no land within 80 miles of Cape Shelaskyoi, and given their efforts to the west, none was in evidence 180 miles from Baranov Rock. Any other reports of land were clearly in error. It was an important result.

They pushed west as hard as possible, keenly aware that they needed to reach their cache of supplies so necessary for the health of both dogs and men. They found driftwood, evidence of decayed trees, and, most important, discovered their provisions intact. Now they could follow their old track to Nizhnekolymsk, at times traveling 30 miles in a day. The snow gave way to brown earth, a few birds added cheery notes to the awakening land, and on May 4th, 1822, the men reached the village of Pochodsk. There Wrangel met up with Anjou, just returned from the New Siberian Islands. The next day they came to Nizhnekolymsk, having been absent for 57 days. The ice was melting, the land was flooding, and the local residents had moved away from the river to their summer camps. The winter toils ended, Wrangel could make plans for their summer work along the Kolyma, and for the provisioning of another spring foray onto the ice.

With the help of the merchant Bereshnoi, Wrangel acquired horses at no cost for a coastal survey. Sending Matyushkin ahead to Ostrog and then on to Chaunskaya Bay, Wrangel traveled east towards the Baranov Rocks where he would repeat a survey undertaken by Billings 55 years before. The disadvantages of such surveys in the summer included navigating difficult boggy terrain — even though the tundra was frozen a scant 7 inches below the surface — enduring the clouds of mosquitoes and adjusting to temperatures that varied from below freezing to more than 50 degrees. They encountered both variable terrain and vegetation as they descended the Kolyma. At the shore they took a sextant reading of the little Baranov Rock, one of the landmarks which had been surveyed by Billings. They feasted on summering geese and noted the presence of many ancient mammoth bones. With their observations complete, the party turned west, encountering rivers flooded with seawater, barren landscapes devoid of animals, and thick fog. Winter began to seem preferable to a summer that varied from infrequent warm days to bone-chilling cold. The shelter of a hut at the mouth of the Baranika River provided a welcome relief. Here they saw high snow-covered mountains to the south, small lakes, and flocks of geese. Snow fell, followed by rain, and then snow once again. Sometimes the humidity was high, and thunder rumbled over the land. The sea appeared frozen in the distance, and giant blocks of ice moved along the shoreline, swept by currents.

Baranika was named for the sheep near the river's source, "baran" meaning "sheep." Wrangel journeyed up the river in the company of two men. Taking readings regularly and observing the details of topography, animals, and geology, the explorers moved southward. They passed through a narrow canyon and encountered herds of reindeer pursued by wolves. Although game seemed plentiful, acquisition was not so easy and, to add to their troubles, the guide was uncertain of their location, particularly in relation to inhabited villages. Reduced to tea and a bark broth made from larch, Wrangel and his men struggled on; as rain fell, the pangs of hunger were increasingly felt. Pack horses disappeared overnight, apparently frightened off by bears, food supplies were diminished, and, with one old horse to carry the supplies, the men sought the roots of Makarscha, a starvation plant. Wrangel fixed their position once again and was assured that they were approaching a settlement on the Annui

River. Unfortunately, the huts were abandoned for the summer, and locally the people were having little success in their yearly reindeer hunt. Without seasonal success, the inhabitants faced the prospect of winter starvation.

Returning to Nizhnekolymsk, mostly by a watery route down the Annui, Wrangel met up once again with his reliable companions, Matyushkin and Kyber. They had been absent for 94 days, surveying land and river, and had succeeded in reaching Chaunskaya Bay. The river was beginning to freeze, an early indicator of the transition from summer to winter. Wrangel and his companions would soon be on the ice once again.

It was at this time that Wrangel spoke with the Chukchi about an island that could be seen from the cliffs east of Chaunskaya Bay. The Chukchi claim of snow-capped lands to the north was hardly new: explorers had heard such local reports for nearly two centuries. The land was even shown on a map created a hundred years earlier by Philip Johan von Strahlenberg, a Swedish cartographer who made important contributions to the study of Russian geography. The map shows several islands off the coast; these may have reflected local tales rather than confirmed sightings. Nevertheless, in response to the stories and always mindful of his primary order to search for land, in 1823 Wrangel decided to make one final attempt over the ice, starting east of Cape Shelagskiy which marked the eastern boundary of Chaunskaya (Chaun) Bay; the bay is about 60 miles wide at this point. The cape is approximately 665 mi (1070 km) in a direct (great circle) line from the mouth of the Kolyma.

Wrangel sent some of his sledges back to the land and continued north, clambering over ridges, across thin ice, and around open leads. Exhausted by the effort of crossing such terrain, the dogs grew weaker with each passing day. The unfortunate if not unanticipated reward for their mutual struggles was the sight of the unfrozen sea. As Wrangel stood and gazed over this dark water, the ice beneath him seemed under attack as the swells buckled and fractured the surface. Soon men and dogs found themselves on an ice island. Abandoning most of their supplies, the belabored group made for land. When they reached it, they were fortunate to come upon Matyushkin's survey party. This would be Wrangel's final attempt that year to travel north from the Siberian coast, and even with this last effort, he was still too far to the west to see the island that would eventually bear his name.

Fourth Journey, 1823 - Search for the Island

"The winter of 1822-23, was generally considered a very mild one at Nijnei Kolymsk: the temperature was only once as low as -51° (on the 19th of January), and auroras were rare, and not so brilliant as usual." Thus wrote Wrangel concerning his last winter in the Arctic. Things were looking positive for the new season, at least in terms of official aid. A new commandant promised more support than the previous, the fisheries had been productive over the summer, and the raging disease that had killed so much of the dog population had abated. Wrangel was confident that he could eventually find enough dogs for his journey, although he had to travel to other regions to obtain assurances of good animals. On January 30, 1823, he sent his assistant, Kuzmin to the Medvezhyi Islands to determine the position of Krestowoi Island. Kuzmin was back by February 17th, assured that his survey had put to rest the reports of additional islands in the archipelago.

Wrangel was still located at Nizhnekolymsk on the Kolyma and now enlisted the help of many of the people to help him prepare for this final year on the ice. New sledges were constructed, old ones repaired, and supplies acquired. At this time, too, Wrangel decided that Matyushkin would survey the coast as far as Cape Shmidta, with Dr. Kyber along to report on the natural history of the area. Wrangel would take Kuzmin, an interpreter, and the necessary sledge drivers on his final journey northward over the ice.

Disappointed with the condition of the dogs, Wrangel traveled with the few good animals to Sucharnoi Island. There he had previously assembled other dog teams and five sledges. The group started east along the coast on February 26, 1823. At this time a Cossack overtook them with new orders carried from St. Petersburg (a distance of over 6500 miles) from the Governor-General of Siberia; the orders took eighty-eight days to reach Wrangel's party. Wrangel sent two of the sledges back with the Cossack and moved on with the remaining nineteen to a balagan (a type of hut) they had built near the Baranika River. The temperature was -42°.

Detained by a storm, they headed east on March 5th, arriving at Cape Shelagskiy on the 8th. It was in this region that they could be certain of encounters with the Chukchi, for they had entered the traditional territory of these still little-known people. The Chukchi had never submitted to the Cossacks' attempts to subdue them and extract tribute, and at this time, the beginning of the 19th century, relationships between this proud people and the Russians were tentative. Wrangel was most anxious to become better acquainted and knew that at the Cape they would have this opportunity. That evening, three Chukchi arrived on a sledge pulled by reindeer. Indicating that they were unarmed, one of the them was a chief – a Kamakei – of a tribe near Chaun Bay. The chief gave Wrangel and his men some meat and was offered tobacco and fish in return. He was most interested in why they traveled in the region and whether they were armed. Wrangel assured him of their peaceable intentions and questioned the chief about the cross the previous party had erected at Cape Shelagskiy. The cross had apparently been left untouched by the Chukchi, partly because it had been a successful hunting year; the chief had sacrificed a young reindeer at the cross in acknowledgement. He also related that he was descended from the Schelagi, a mysterious tribe that had disappeared to the west, leaving behind names of landmarks and rivers — Cape Shelagskiy had been named by these people.

The chief, accompanied by family members, returned on the 9th. One of the children stole a couple of items, but Wrangel remained calm, demanding no action, and the encounter with the Chukchi continued to be one of mutual respect and conviviality.

The chief clearly understood that Wrangel was only interested in exploring and, in fact, provided much information about the coast. He told them of an island to the east (which Wrangel later saw), and then related a story of a land to the north between Cape Shelagskiy and Cape Shmidta. In Wrangel's words, the chief stated that "there was a part of the coast, where from some cliffs near the mouth of a river, one might on a clear summer's day descry snow-covered mountains at a great distance to the north, but that in winter it was impossible to see so far." The chief also indicated that reindeer were seen on the ice, probably traveling to and returning from such a land. He himself had seen such a herd and followed them until forced by the ice to turn back. He believed (as certainly did many Europeans) that the land was not an island but much more extensive. He also said that a Chukchi elder had traveled to the island, but he did not know if the party returned, although he was confident the land was inhabited. Wrangel thanked him, promising a reward from the Emperor if the information was good.

With this most reliable report yet concerning an island or continent to the northeast, on the 10th the party began their explorations once more; the weather failed to cooperate but rather seemed to personally assault their efforts with winds strong enough to overturn sledges. The coast was rocky until they reached Kuzmin Rock where the terrain was hilly. He named a local prominence Cape Kyber, in honor of the intrepid doctor, and noted an island close to the coastline, as reported by the chief, which Wrangel designated Schalarov. On this island they saw whale bones and remains of inhabitants who supposedly were more closely related to the native peoples of the Bering Straits region, perhaps including the Inuit of Alaska and Greenland.

With memories of the previous year's sojourn still fresh, the presence of hummocks and their slow, laborious slog around them, where the use of crow-bars was sometimes necessary to carve a path, Wrangel made the decision to send back eight sledges and leave twenty-three days of supplies encased

in the ice. Reduced to four sledges and five people, and carrying a minimum of weight, they proceeded north with five days provisions and a small amount of fuel. They were at 70°12' north, 174°00' east.

The weather remained uncooperative, blowing so hard as to break up the ice, and isolating the group on a floe. Eventually this refuge disintegrated to only 90 feet or so in diameter, but shifting winds jammed them against the pack, so that they were safe for a time. To the north, however, they could see rising mists, indicating open water. Now they contended with water and hummocks, making few miles and growing more discouraged about their chances of proceeding much farther. And although the weather improved, the hummocks impeded any northern movement, and to the west open water presented a barrier that could not be breached. They stopped once more, the only hope now being that the thin ice that stretched before them might hold their weight. The dogs ran across the ice, instinct and the drivers' shouts encouraging them, and surprisingly they made the other side where the hummocks were less formidable. Dogs and men could travel northward and eastward once again. They were at 70° 20', south of their previous year's efforts.

They walked a fine line between cold and the slowly warming days of spring that melted the ice beneath. It would seem the outcome of their attempts held a certain inevitability, as enduring the storms wore them down, and the annual creation of an open sea created a barrier they could not cross. Food for the dogs was scarce and as Wrangel well knew, the dogs needed a constant supply of nourishment to maintain strength for what was required of them. Now he sent two more sledges back towards the mainland and proceeded with only two. The weather was fine for a time, but soon another gap in the ice was reached, widened every moment by wind and current. From the top of an icy hill, they saw the ocean, wide and ice free except for the occasional floes here and there. Their three-year quest for land was nearing an end. They were at 70°51' North, 175°27' East, 105 versts (70 miles) from the mainland in a direct line. On March 24th they turned around, concerned that the opening sea could cut off their route at any time. They reached their cache and the other sledges on March 29th; still on the ice, and warming days put them in increasing peril.

Onward the party went, trying to reach the coast and their first provision cache, located close to the land. They came near the mouth of the Werkon River, and as the temperature dropped and a fresh storm abated, Wrangel harbored hope that they would find their supplies. They tried now, sending Kuzmin ahead, to search for the depot, but he was unsuccessful. Stopped by the open water, Wrangel would have a hazardous return across open leads. That night they reached their cache. On March 26th they attempted to begin their trek once more but were detained by the illness of one of the sledge drivers. Twenty-four hours later they started out with the driver on a sledge and found that they could not follow the track from their voyage north, as the changing ice conditions had so obliterated it, forcing them to rest. Conditions deteriorated as they continued, until they were surrounded by water. The wind drove them closer to a larger expanse of ice and by creating an ice bridge with poles and noting with relief that the night cold cemented the ice together, they made some progress over the bridge. Yet they still were hampered, for although the temperature hovered below freezing, it was springtime; the ice could fracture at any time.

Resting on an ice island where they felt somewhat secure, increasing winds drove them with a resounding crash against an ice barrier, shattering their underpinnings. The dogs once again instinctively aware of the danger, dashed towards safer ground. Stopping briefly, and still over two miles from the shore, they moved southward. By dark on that day — March 27th — the weary dogs and frightened men stood on solid ground once more.

Hopeful of a meeting with Matyushkin, Wrangel and his men were in desperate need of food. Hunting forays met with no success, even though reindeer tracks were tantalizing. They proceeded along the tundra now, more than 240 miles from the closest food depot. On April 6th they turned towards that place, having the good fortune to encounter the Matyushkin's party. The supplies carried by this intrepid man represented salvation for Wrangel, his men, and his severely weakened dogs.

As they rested and exchanged news, Matyushkin related a most interesting story. In his coastal survey, he had learned of a group of huts east of the Werkon River discovered by the Chukchi, where human bones were found. According to the story, the hut had been built by Russians, who had escaped from a large ship and perished in the shelter. This, Wrangel decided, must be the last place visited by Schalarov, a merchant from Yakutsk, who had built a vessel in 1760 with the intent of sailing the Northeast Passage. His commercial interest was in mammoth bones, at least according to some reports, but Wrangel believed that Schalarov was an explorer at heart and wanted to be the first to go around Cape Shelagskiy. His fate was unknown. In July of 1761 he set sail from the Jana, keeping close to the coast and reaching the Indigirka. Stopped by ice, he went into the Kolyma for the winter. There the expedition thrived on reindeer and fish, not departing until July. Schalaurow made the goal of Cape Shelagskiy in August, where he was stopped by ice and forced to return to the Kolyma and wait for spring once again. But now his crew mutinied, forcing Schalaurow back west to the Lena. In 1764, he went east again and disappeared from history. Until, that is, Wrangel learned of the huts near the Werkon River. Wrangel considered Schalaurow's charts of Cape Shelaskyoi to be excellent, although his latitudes were somewhat inaccurate in places, and Chaun Bay was accurately surveyed. But Schalaurow also reported an island subsequently shown to not exist, although he was more dependable in his account of the New Siberian Islands. To Wrangel, he was a most admirable explorer, and now they had come upon Schalaurow's final resting place on the Werkon River. He had pushed farther east than any other explorer of the time.

Denied the northern lands, Wrangel turned eastward once again with four sledges, sending Matyushkin with three, and the rest back to Nizhnekolymsk. Wrangel was determined to reach Cape Yakan. It was from this point that the Chukchi had reported seeing mountains to the northeast. This, if a reliable source, was undoubtedly new land. By the 8th of April they reached a large rock, perhaps sixty feet high, projecting into the sea. This Wrangel believed to be Cape Yakan – the latitude was 69°42′ N, 176°32′ E, although this measurement was based on observations taken the previous day. Now certain he was at the location where the Chukchi had seen mountains on the northern horizon, Wrangel reported: "We gazed long and earnestly on the horizon, in hopes, as the atmosphere was clear, of discerning some appearance of the northern land, which the Tchuktches affirm they have seen from this place, but we could see nothing of it." If an island or continent was there, it remained hidden to their view.

They did find a vessel, an old skin boat twenty-one feet long, and according to the local Chukchis, a vessel that indicated they were near Cape Yakan. Thus Wrangel was confident they were in the correct place.

Refusing to give up the search, Matyushkin attempted another trip northward over the ice; he left with 15 days of supplies; Wrangel continued east.

On the 11th they reached Cape Shmidta, the "Cape North" of Captain Cook; the party was at more than 179° E longitude at this point, and 69° 12′ latitude, thus south of the cape which he reported as 105 feet high and joined to another cliff to the east and to the continent by a low isthmus. His confidence in his readings convinced Wrangel that there was no land connection between America and Siberia along the northern coast. Only the sea stretched out before them. He had fulfilled his directive.

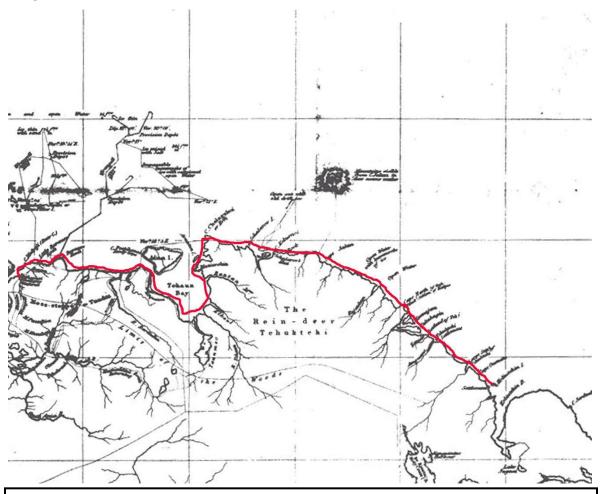
At the Cape they met up with another Chukchi group, and were formally received as gifts were exchanged. Invited to return the following day, Wrangel visited the leader's large tent and negotiated a trade of a gun for dogs and firewood. Wrangel also wanted the chief (Etel) to accompany them to Kolyuchin Island. Etel agreed and came fully prepared to travel with Wrangel and his men.

They also spoke with an elderly man who had seen the *Resolution* and *Discovery,* Cook's two ships, 45 years before.

With fresh provisions provided by the Chukchi for both men and dogs, and accompanied by the group's chief, the combined group traveled on. Wrangel described pine and fir driftwood which the Chukchi assured him were of American origin, much of it having been felled with axes.

They made excellent time, reaching the Wankarem River and cape, where a village was situated. Etel knew the residents and, provided with more provision for the dogs, the party continued along the coast. Rounding Cape Onmyan, they saw Kolyuchin Island (Cook's Burney Island), about 20 miles distant. They traveled over the ice to the island where they encountered an armed group of Chukchi. It was fortunate that the Etel was with them, as he assured his countrymen that Wrangel's intentions were peaceful. They remained on the island for two days, trading beads and tobacco for supplies. Other peoples arrived from the coast, wanting to trade, and Wrangel realized his store of items was rapidly diminishing.

On April 20, 1823, at 184° 24' East (175° 36' West), Wrangel turned back; at this point he was east of Wrangel Island. His dogs were too worn to be of much use, and he lacked enough items for trade, particularly tobacco; such items were considered necessary for both good relations with the local people and for bartering in order to provision the expedition. With the season drawing to a close, Wrangel professed satisfaction with what had been accomplished in his forays over the ice and along the coast. He had not reached the Bering Strait, but he had traveled far enough to intersect with Cook's and Billing's routes.



Wrangel's journey from Cape Shelagskiy to Koluychin Island. (The map, published in 1839, shows an island north of Cape Yakan, reported by the Chukchi but not seen by Wrangel.)

The return to the Kolyma was difficult for men and dogs. Provisions were nearly gone and Nizhne Kolmysk was 600 miles distant. Parting company with Etel at his village, by May 1st they were back to Cape Shelaskyoi where Wrangel received a letter with an account of Matyushkin's unsuccessful northern foray. Efforts to trade with the Chukchi were not particularly, as their spring hunting efforts had resulted in enough only to feed their own people. Resting for two days, they started west again on May 5th, coming upon softened snow and streams and rivers charged with meltwater. Finally, on May 10th the tired party reached Nizhnekolymsk; they had been gone for 78 days and traveled nearly 1,400 miles.

Waiting for orders at Nizhnekolymsk, and taking an opportunity to settle any accounts, in the middle of November, Wrangel finally started south along the Kolyma towards Irkutsk, taking a road preferred by trading caravans. Pasture for the horses was considered best along this route. Thirty-two days later, they reached Verkhoyansk (Boronuk); they had traveled 1224 versts (811 miles). Here a local commissioner resided, and cattle ranching was the most important industry. On December 27th, Wrangel left the village; the temperature was a cold -58 degrees. Muffled to the point of stiffness in furs, the men endured a miserable journey on horseback. The horses fared no better. The sound of labored breathing was occasional broken by the burst of a tree trunk, or the mass of a rock, loosened and sent crashing down. Crossing the Verkhoyansk Mountains, as they had done on their outward trek, the weather moderated some, and on January 10th Wrangel arrived at Yakutsk There he met up with Anjou, returned from his own northern voyage. They left Yakutsk on February 8th, reaching Irkutsk on Lake Baikal on February 25th. With permission to visit restorative warm springs on the other side of the lake, invigorated and healthy, Wrangel returned to St. Petersburg on August 15th, 1824.

With his successful excursion to Cape Shmidta, Wrangel had definitely set aside any claims of a land connection between the Kolyma River and East Cape. Yet did not see Wrangel Island and could not say for certainty what land might lie to the north and east of the Medvezhyi Islands. Despite the three efforts between 1821 and 1823, Wrangel would continue to call the reported islands the "Problematical land of the North." Although he did not see the island, Wrangel's map of the region does show an island close to the true location of Wrangel Island. It is positioned at approximately 176° West and 71° North. Ironically, in the years following his attempts to find it, the island that bears his name would more often be portrayed as part of an extensive land mass. Sixty summers would pass before that myth was finally laid to rest when the *Jeannette*, locked in the ice, drifted past Wrangel Island on its north side. For his part, Wrangel sensibly recommended that any attempt to find this mystical land should begin from Cape Yakan, and that such a journey would most likely be successful after a long, cold, stormless winter, and a late spring. With this recommendation Wrangel clearly gave credence to the Chukchi's report.

Although Wrangel did not see the island, his three-year expedition added greatly to the knowledge of the northern coast, and he was celebrated as a hero at the time. He wrote a narrative of his expedition in 1828, prior to his departure for America, where he was to become manager of the Russian-American Company at Novo-Arkhangel'sk. Ever resourceful and an excellent leader, Ferdinand Wrangel gave his czar what the ruler had long sought — knowledge and land.

The coordinates of the highest peak on Wrangel Island are 71°14' North, 179°25' West. If Wrangel's measurements were accurate, he was about 118 miles from the center of the island. A little too far to see the land, they were so very close. Wrangel had come nearly as close from the west as Cook had from the east, nearly half-a-century before.