

July 2018

Dear All,

This is the story of our trip to the Arctic, specifically to drive the new road from Inuvik to Tuktoyaktuk. The all-season road was completed at the end of 2017 and it replaced the winter-only ice road. It is now the only place in North America where you can drive your own car to the Arctic Ocean.

Back in 2004 we had made a similar trip to Inuvik, but had flown the last leg to Tuktoyaktuk. That trip had taken nearly two months and we had visited most of the places north of the Alaska Highway. We didn't have as much time for this trip so we hoped to visit some of those we had missed and repeat a few that had been outstanding.

We'd just come back from a trip to Okotoks and Minnesota, and were home for just a week, long enough to get the trip letter finished and printed, and have the truck's fuel filter changed. There was also a whirl of doctor's visits and blood tests. I was booked in for some more physiotherapy and in the queue for another back operation. I had one of those doctor's visits when there's so much being discussed that I almost left without talking about what I'd visited for! I came away with a couple of opioid patches that were supposed to tide me over until the operation. I wasn't too happy



about using these but they turned out to have no effect on my back pain anyway.

Sunday June 24th

We set off early on the Sunday morning on a perfect sunny day. We were taking the most direct route north to the Arctic, as shown on this map. We'd be crossing about 20 degrees of latitude and driving about 2500 miles to the beach and the Arctic Ocean. Our route took us up the Fraser Canyon to Lytton and up the Thompson Canyon to Goldpan where we stopped for coffee. Goldpan is the park where Kumsheen Rafting would stop for lunch before tackling the Thompson's big rapids. When you see beautiful spots like this you might wonder why we leave home, but I guess it's the love of exploring.





We left the rivers behind at Cache Creek and headed north towards Prince George. We stopped for lunch at Chasm, which is just what it sounds like, a jagged hole in the ground. At the end of the last Ice Age, rushing waters from melting glaciers carved Chasm. Now that the glaciers have gone, all that's left is a little creek tumbling into the enormous hole.

Towns ahead have names like 70 Mile House and 100 Mile House, denoting their position on the old Cariboo Trail, which connected Lillooet with the Cariboo's gold fields. Back in 2005 we spent some time in 100 Mile House getting our trailer's shackles replaced after our trip to Alaska with John and Edna.

We were passing big areas of burned forest. This area was hard hit by last year's fires and many of these towns and even the major city of Williams Lake were evacuated for months.

We were happy that our planned campsite had escaped the flames. We'd stayed at Forest Lake before, on our way to Haida Gwaii. There



was a line of trailers well established along the shoreline, probably families there for a cheap vacation, and we found a perch on the side of a hill overlooking the lake. Sandie wanted to check out the flowers around the lake but the bugs slowed us down and then rain swept in and we retreated.

Monday June 25th

It rained all night, giving us a muddy drive out. Getting out of our spot was problematic too as a corner of our perch had eroded away and we were in danger of dropping our back wheels into a hidden hole. It's not hidden any more.



We met these bears on our way out to the access road. We saw the mama bear gazing up into a tree. Then we saw the cub on the ground, closer to us. Was she trying to tell the cub to climb the tree? It seemed to work as the cub climbed partway up. Then the mama bear seemed to decide we weren't a danger as both of

them ambled out of sight. Then to our surprise a second, smaller cub, almost hidden by the trunk, hurried down out of the treetop and followed the others.

Back on the highway, we had some letters to mail and Quesnel looked to be a good choice, big enough for a post office. Unfortunately, the road that the post office was on turned out to be under reconstruction. The whole road and its intersections had been dug out to about 4 feet down and was now a battle zone with

bulldozers and back hoes. Men wearing hard hats were available to help peds like me get from A to B, but all the routes involved ankle deep mud. Sandals were a poor choice.

The next big place was Prince George and there we had to make a choice. We prefer the Cassiar Highway as a route north to the Yukon, but we'd be too early for the arrival of the salmon and all that their arrival triggers, so we opted for the more direct route up the Alaska Highway. We'd save the Cassiar for our way home.

We found a Canadian Tire to buy a few things for the trip, including a new axe, and then headed into a park for lunch. Unfortunately the park has a tiny and very steep parking lot and lots of foot trails, so we moved on and found ourselves in a very up-market housing estate. The only decent parking spot was in the middle of their turn-around so that's where we had lunch, expecting to get a visit from the sheriff at any moment.

The scenery as we headed north was interesting: hills and lakes and various shades of green. It all looked to be perfect moose habitat, so I shouldn't have been surprised when one burst out of the forest and headed for the road. All I could do was hit the brakes hard and hope that the traffic behind me could stop. The cow moose's expression went from blissful ignorance to confusion to a desire to be somewhere else, and she rushed back into the forest. Perhaps we should get a dashcam to capture such near misses.

I'd had hopes of stopping at Pine Pass to take in the view, but the road was in the clouds, the rain was falling and it was definitely cold, close to snowing. And we were going another 2000 miles north?

We planned to fill up with diesel at Chetwynd but found the place in chaos, with trucks jostling to get to the few pumps that were working. We gathered that the delivery trucks were running late and every filling station was out of something, but you had to read little handwritten notes on the pumps to find out what they had. We were lucky and found diesel at our second try but those looking for unleaded weren't as fortunate – the station owners were only too happy to sell them premium grades instead.



Chetwynd, like Hope, styles itself "Chainsaw Carving Capital of the World". This enormous carving was gazing down on Chetwynd's main road. We have nothing like that in Hope, fortunately.

We could have stayed on the main highway and continued to Dawson Creek, famous as Mile 0, the beginning of the Alaska Highway, but we've done

that a few times and instead we were taking a more scenic short cut along the Peace River to join the Alaska Highway at Charlie Lake.

It was getting late and still drizzling so we took the easy option and camped at Moberley Lake, a provincial campground. The park has a lake and a campground and a few trails but nothing to tempt us to spend more time there.

Tuesday June 26th

The drizzle had turned to heavier rain, so we never took a look at the rest of the park. Our route took us to a bridge over the Peace River. The bridge gave us a good view of the Peace Canyon dam, a little way upstream, but it's a narrow bridge with no walkways, so we didn't risk waking out to take pictures. Further upstream is the massive Bennet Dam, which we toured with Bob back in 1986, when he and Pat lived in Chetwynd.

Nearby is the town of Hudson's Hope, one of BC's oldest towns, though a lot of the buildings date from the construction of the dams. An exception is this very pretty log church. On the Internet we see a lot about the town, usually accidentally because of "Hope" in the name. I was once stopped in Hope and asked where a street was. I said I hadn't heard of it. He passed me a picture of a house and an address. I said "That's in Hudson's Hope". "How far's that?" "About two day's drive." "Oh! I s'pose that's why it's cheap."



We were driving down the Peace River

valley, truly peaceful and quiet. There are farms scattered through the valley, and the road cuts looked to be full of coal, but presumably not good enough for mining. This mule deer came so close we thought it had come over to chat with us.



This peace on the Peace is about to be destroyed by the construction of yet another dam. When I first heard about the plan on the radio I thought the dam had been given some Indian



name like "T'seitsee", so I was disappointed when I read it as "Site C". A and B are the two dams already in place. One of the arguments against building it was the loss of agricultural land, but the farms only seemed to be growing hay for animals, and not very productive. Certainly though, there'll be a loss of beauty.

We stopped to look down on the valley, soon to be drowned. Behind us was a gaggle of construction vehicles, probably working on the road, which will need to be rerouted out of the valley. The road eventually swung away from the river so we couldn't see the dam's construction site, but there were many reminders installed by protesters "Water comes up to here."

The rain seemed to be set in for the day. We joined the Alaska Highway at Charlie Lake, about mile 50. We'd be following it for about 800 miles, to Whitehorse in the Yukon, and then heading due north.



At this end of the highway it isn't too exciting; two lanes, with a very wide cut through the forest. The good news is that large animals like deer and moose and bear are easier to spot before they get to the road.

There are few actual towns on the highway. Most places are no more than roadhouses with fuel, tyres, food, camping, and perhaps a motel. Originally, many of them just used their mile number as a name but the post office objected to numeric names. Guess where Wonowon is located.



Once again we passed the famous Pink Mountain without seeing the pink or even the mountain.

Just before we reached Fort Nelson the weather cleared a little and Sandie spotted these sandhill cranes. Luckily the Alaska Highway is the kind of road where you can usually reverse up the road while pointing a camera out the window. Cranes are quite common up north but it's unusual to see them dancing.

By the time we reached Fort Nelson the weather had changed again and an enormous storm looked to be hovering over the city. We just had time to fill up with diesel before the downpour began and we limped out of the city with the wipers on max.

Our campsite at Beaver Lake was just outside the storm a short way up the Liard Highway, a road we'd last taken on our 2013 trip to the Yellowknife area. The Liard was one of the quietest roads we'd ever traveled, just three cars in two days of driving.

The campground was quiet too; even the beaver was away. I wandered the only trail, still in the drizzle; carpets of bunchberries and a few wild roses and lots of mosquitoes enjoying the damp.

Wednesday June 27th

The good news was that we had a few patches of blue sky as we headed back south to rejoin the Alaska Highway. There was noticeably less traffic; we still saw RVs and campers like ours and long-distance trucks but we'd left the pickups and delivery trucks behind in Fort Nelson.

The scenery was more interesting as we began our climb into the Northern Rockies; rushing rivers, blue-green lakes, and snowcapped mountains. We came across this black bear at the roadside, chomping away on the grass. Spring is a tough time for bears; winter-killed meat is long gone and it's too early for berries and salmon, so they all have to spend a month or so eating salad.





Shortly afterwards we stopped at a rest area to look at this view of peaks and valleys. These were serious mountains, the Northern Rockies. We were chatting with other campers, most of them on their way to Alaska. Across the road was another bear, also eating grass. Nobody paid much attention to the bear; these were experienced travelers, treating bears as part of the scenery..

We stopped at the Tetsa River for coffee and for Sandie to look for good rocks in the riverbed, but the river was running high and overflowing its banks.



We came across a fox hunting amongst the roadside grass. It kept a careful eye on us but continued hunting, making high leaps and coming down on its prey. I've seen them do this for mice, but we think this one was doing it for bugs, probably grasshoppers.

We stopped at Summit Pass to look at its light blue lake and the flowers. The

pass is at over 4000 feet and the section of road we'd driven that



day was one of the most difficult sections of the Alaska Highway to build. We were at the beginning of Stone Mountain park, an alpine wonderland of peaks, geological folds, and waterfalls, but also some difficult



driving. The road camber seems to be a few degrees off and bends in the road tighten at the worst moment. And this was in perfect driving weather. When I'd driven this section back in 2004 we'd had wet fog and I'd commented in the journal that it was a really scary drive.

We followed a track out to the shore of the Racing River, which was living up to its name, racing just below us. Our coffee stop perch wasn't much more than a pile of river rock that looked like it could slide into the river at any moment, so turning around to get out was a little tense.





The Toad River was also high. The story is that in the early days of the highway there was no bridge; instead, vehicles were winched or towed across the river. Over the years “Towed River” became “Toad River”. We stopped at the lodge there for fuel. After pressing the clear button, I went through the usual credit card PIN sequence and the instructions said to press the START button. Only I couldn’t find one. Sandie fetched the attendant who looked like she’d never seen the pump before, but hit the clear button again and the pump worked. She looked at us as if we were idiots and went back to the lodge. I can report to John and Edna that the ceiling inside the lodge is still covered with hats – and once again I forgot to ask why.

The scenery was changing again as we approached Muncho Lake: waterfalls, folded mountains, great alluvial

fans, and, of course, the lake itself with its strange coppery green colour.

Much to our surprise we found a vacant slot along the lake shore. The view from our campsite was spectacular and constantly changing.



The light on the mountains around us was changing too as the sun went down

Sandie went looking for the pay station and she found that the woodlands were home to hundreds of yellow and white slipper orchids and other wildflowers.



Thursday June 28th

The sun was up long before we were, something else we'd have to get used to. We wanted to explore some of the park's special places, but there wasn't much signage to help. I remembered that there was a trail out to some pinnacles, but I wouldn't have found it at all without that memory. It was actually a trail to an overlook above a salt lick, a place where animals come to lick minerals. There were none there but the view was great and we found the pinnacles too.



Back on the road we found a pair of stone sheep; maybe on their way to the lick.



We drove down a track at Trout River but found it blocked to traffic. Sandie

went to look at flowers and I walked the track to take a closer view of the river. I soon gave up as the river was actually flowing through the forest. On my way back I saw some motion in the undergrowth and went for a closer look. An animal came barreling out, straight at me. At the last minute it swerved and missed me and dove back into the undergrowth. It was a largish bird, hunched down so it looked like an attacking terrier. At first I thought it was a grouse, but they don't attack like that. Then I realized it was a ptarmigan; back in '89 I'd experienced similar attacks on Gros Morne mountain. I looked around and sure enough there were a couple of balls of fluff; ptarmigan chicks, hidden away in the undergrowth.





There were plenty of flowers; a few captured here in a composite.

We came to two adult bears eating close to each other, which we assumed to be a mating pair, as bears aren't usually buddies. Nearby was a good-sized bison herd,



a few dozen animals, strung out along the highway. The bison just love the grass that grows along

the highway's verges and they spend their lives on the highway. Further along was yet another bear and yet more bison.



We were headed for Liard Hot Springs and wasted some time driving up and down before we remembered that the entrance labelled "campground" was also the one for day visits. We were getting changed into our swimming gear when we heard gunshots and saw this large bull bison trotting through the parking area. It was being pursued by the ranger on the right with a starting pistol. As he passed us his pistol went "click" and he was fumbling for more ammo; no Dirty Harry skills.



hundreds of miles north of their normal range. The springs have been "tamed" with steps and changing rooms on one side, but the remainder is left in its natural state. We didn't bother with the warm pool.

The walkway to the springs goes through meadows partly flooded with lukewarm water. The heat from the springs enables plants like fleabane and monkey flowers to survive,

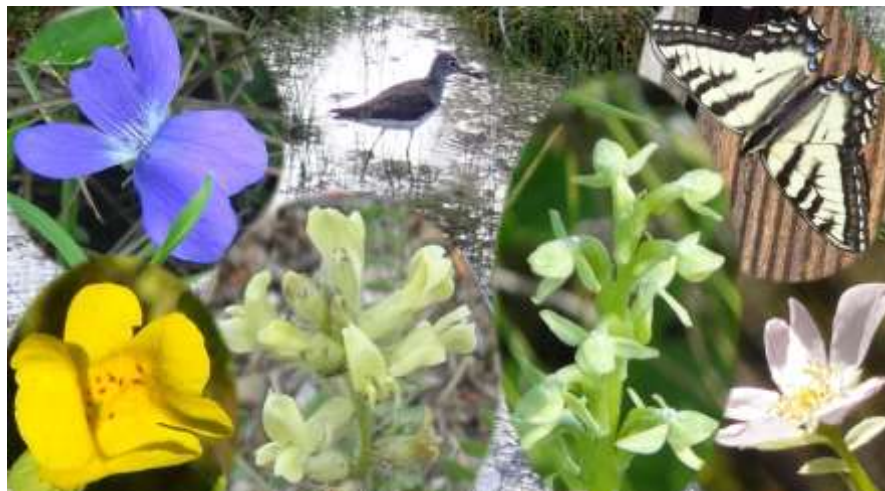




I took some pictures of us in the hot pool and then tried to get to the far end, where very hot water falls into the pool and also comes up through the sand under your feet. I managed to pick up a rock and stack it on the end wall; I don't think the water was quite as hot as when Edna did it in 2005.

The "hanging gardens" above the pool had been closed on our previous trips because of "problem bears" in the area, but this time it was open and we were able to go see the waterfall and the tufa formations created by the minerals in the water, and the flowers too.

On our way back we found numerous sundew plants around the boardwalk. These are the little plants that entice bugs onto their sticky leaves and then digest them. They seem to thrive in swampy environments.



I remembered a really neat camping spot we'd found in 2005, just upstream from Whirlpool Canyon on the Liard River. The Liard is a massive river and it must have encountered really hard rock as this point as the river turns sharply to its right, giving us this spectacular view. We found a spot to perch above the access track. It would have been a great opportunity to sit outside and watch the river but the bugs were out in force, mainly mosquitoes but also biting flies.



Friday June 29th

We had a cloudy morning and were soon back on the highway. We saw another fox; this one was munching away on something. We saw another bear too, this one on the edge of the forest, reluctant to be seen.



Then there was another bear, this one marching along the highway as if it was on a mission.



The highway runs along the 60th

parallel and we kept crossing into the Yukon and back into BC. We'd covered about 1200 miles already and we were only just leaving BC; it's a big province. We came to

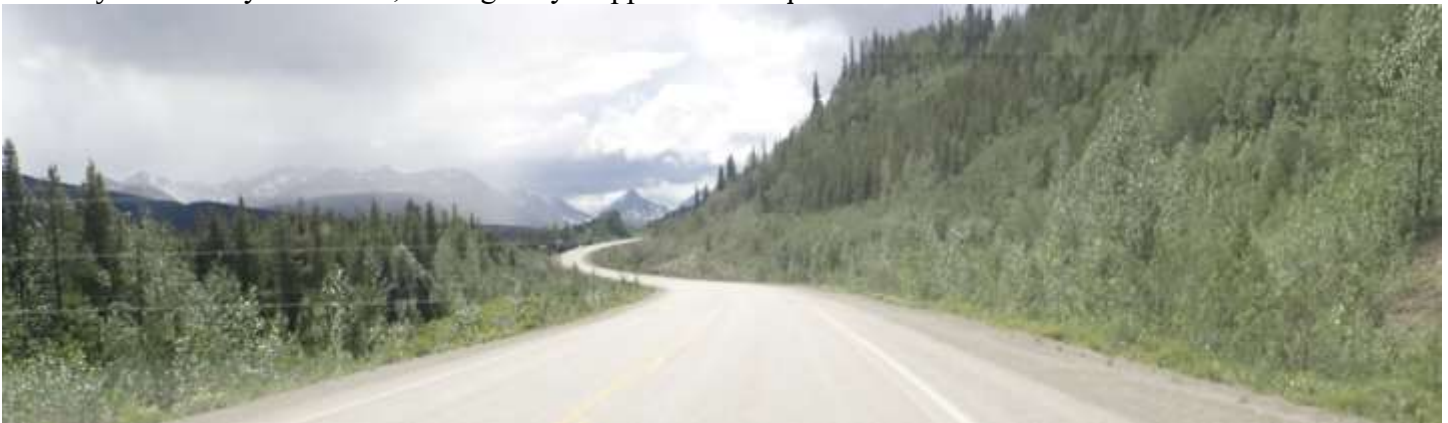


Watson Lake, Gateway to the Yukon, It's a useful gateway, with a great



visitor's centre. They gave us maps and brochures, showed us a movie about the building of the Alaska Highway, and gave us access to their water supply to fill our tanks. The town has a supermarket, dump station, fuel, and a really odd attraction, the Signpost Forest. It was started back in the 1940s when a homesick soldier put up signpost to his home town. Now there are tens of thousands of them from all over the world.

Back on the road, we passed the turn off south to the Cassiar Highway, our likely route home. We passed a lake with two moose feeding in the shallow water, but by the time we'd reversed back to the lake both moose had disappeared into the trees. We'd already noticed that we were spotting fewer animals now we were in the Yukon. Unlike BC, which mows its verges, the Yukon allows shrubs to grow, so the animals are there, just not as easily seen. As you can see, the highway's appearance is quite different.





We came to the massive Teslin Lake, over 70 miles long. The town of Teslin continues to rely on plywood policing to slow traffic. Last time we were there some hooligan had driven over the car, reducing it to a jigsaw puzzle, but it's been repaired or replaced. Time though for a newer model car I think.

Also on Teslin lake was Mukluk Annie's, famous for its Salmon Bake. The meal deal included free lakeside camping, a free RV wash, and a lengthy boat trip on the lake. However, once he had you in the midst of all that beauty and far offshore, Mukluk George would reveal that he was from St Paul, Minnesota, where he was "known to the police", and tell

you how he'd subsequently found Jesus. Their food was good anyway.

The buildings were still there, but the place was gated and closed. Apparently Annie and George had retired.

We came to Johnson's Crossing, one end of the Canol Road, built in the 1940s to support the Canol pipeline and a possible choice of route for our return trip.

We camped that night somewhere near Marsh Lake, an appropriate name as we were surrounded by shallow lakes and marsh. We had loons and hares and flowers and, of course, plenty of bugs.



Saturday June 30th

We were back on the Alaska Highway on a sunny and cool morning. We passed the turnoff to Carcross and Skagway, home of the White Pass Railway, all fascinating stuff but we'd already explored the area in 2004.

We came to Whitehorse, by far the biggest city of the Yukon, home to about 70% of its population. We stopped briefly to pick up and send emails at the Visitors' Centre and then headed back to the Carcross junction to find the Yukon Rock Shop. It was hidden away behind some trailer homes; no garden, just a yard full of machinery and rocks.



Owner Paul was busy cutting up rocks but took his gear off and did his best to answer Sandie's questions about what rocks she might find on the Dempster Highway. Unfortunately, he'd never been there; the highway's a few hundred miles north. He had a copy of an ancient government booklet describing the geology of the area but it predated the building of the highway so even that was vague.

He did give us a map of the mines of Whitehorse, all played out and closed now but interesting stuff could still be found. We bought some rocks from his shop: malachite from the Congo and tourmaline from Brazil, also an example of the copper rocks to be found around Whitehorse.



We drove to the old mining area and found that the access road had been blocked with giant concrete cubes, but some well-wisher had moved one of them over so we could squeeze through. The area beyond was a wasteland of tailings, pits, building shells, and fossilized wrecks of cars and trucks. Just the kind of place that rockhounds enjoy. However, although we searched a few piles, Sandie didn't find that many interesting rocks.

Just outside of Whitehorse we turned north on the Klondike Highway. This took us past the turnoff for Takhini Lodge where we stayed in February 2015 to see the Northern Lights. Beyond there the road follows the shores of a number of large lakes. One of these is Lake Leberge, made famous in Robert Service's poem "The Cremation of Sam McGee".



The roads here were lined with yellow and purple flowers, arnica and bear root I think. This stretch of the highway from Leberge to Carmacks was new to us, very scenic with its lakes and flowers. There were also these yellow paintbrush, a change from the usual reds.





At Carmacks we enquired about rock hounding in the area and were given a few pages of directions to agate mines in the area. We picked one that we could drive to and headed down a muddy track into a small quarry, which I recognized from one of our earlier trips. The instructions

though said we still had a way to go so we continued down the track, which narrowed to where we were pushing through the trees. We were in trouble, as backing up would be very difficult. I walked ahead to find a spot with small trees and no big stumps, and then went back for Sandie. She had to make about a dozen tos and fros, but managed to push enough trees down to get turned around.



As it was getting late we decided to camp in the quarry. The site had obviously been well picked over though, as there were plenty of rocks but no agates. Too late, I found an old copy of a better set of instructions we'd been given; this one had the distance to the quarry correct and had the warning "Do not continue on the track as there is no turnaround." Well, there is now. But not for trailers, of course.

Even though we found no agates we had a pleasant evening, eating outside, with few bugs around. We found these unusual and beautiful penstemons amongst the rocks.



Sunday July 1st, Canada Day

I'd been a little worried about camping so close to town on a weekend, in case it was the local kids' party spot. Sandie said we'd had some night visitors and someone had slammed a car door but no one bothered us.

Our bad news was that the camper's battery had gone down to nothing even though very little was on. We'd bought it on our Newfoundland trip, so it was on its way out after only 2 years. Our plan had been to go directly to the Dempster Highway but now we'd likely have to go into Dawson City to buy another battery.

We followed the Yukon River for a while, and stopped for this view of Five Finger Rapids. This was a very dangerous point for overloaded boats and rafts making the journey from Skagway via Lake Bennett and the Yukon River to the Klondike. Eventually some of the fingers were amputated with dynamite.



the station was a familiar sight, a Tiger Motorhome, belonging to Don and Mickey from New Mexico. Don is a retired mechanic, and is restoring an ancient Harley when not traveling. Mickey is a rock hound and a quilter. There went about 2 hours of our day!

The roads were getting rougher, OK for us but difficult for some trailers. They'd slow to walking pace so we had to be aware that we might have to screech to a halt too.

We stopped at the service station in Pelly Crossing just in case they had batteries, but the cashier just pointed to the AAs behind the till. To our surprise though, outside



We drove past the entrance to the Dempster; it was another 30 miles to the outskirts of Dawson City. We didn't have high hopes as we were shopping for a battery on Canada Day and it was also a Sunday. At the first service station I tried, the assistant looked vague when I asked for a camper battery and then said do you mean one of those? She was pointing to about twenty batteries of various shapes and sizes on the floor. Perfect! I found one that matched our dead one and handed over about twice the price I'd have paid in Chilliwack.

Between the two of us we managed to install it. Even without any additional charging it was already better. We found a spot to eat our much delayed curry lunch, surrounded by gigantic wormcasts.

These were created decades ago by gold dredges which ate their way up and down the valley filtering out the gold and spitting out the remains.

We went back to the junction with the Dempster to fill up with diesel; it's a long road so you want to start it full. The pumps had instructions but no credit card reader, so I went to the hut only to find it empty. Someone else came over and pointed at a single reader set into the door at about waist height. Then it was back to find out which pump I was parked at. I went back to the reader and the other person was yelling "Don't touch it or it'll cancel mine! Let me start my pump first." Eventually, while I was filling up I looked up and saw the detailed instructions about 8 feet up! Of course I didn't get a receipt or even an indication of how much I'd spent, but at least we were full, with enough in the tank to make it to Inuvik without refueling, if needs be.



We were just happy to be on the Dempster Highway after a week of driving. We took the obligatory picture in front of the sign and then crossed the single track bridge across the Klondike River. Inuvik was now about 450 miles of gravel road to our north.



This picture shows a typical section of the highway, lined with stunted black spruce, billions of them. The trees would disappear as we climbed into the high plains and then reappear as we descended into the Mackenzie River lowlands and Inuvik.

The road was good gravel and it soon became apparent that there were three classes of travelers. Those with fragile RV gear were doing about 40 mph, truckers and workers in pickups were blasting along at 60 mph or more, and people like us who had resilient gear but



weren't in a hurry doing about 50 mph. It still made sense to slow down for oncoming trucks or risk losing your windshield.



The scenery beyond the road was wilderness, with more of those short black spruce trees standing in swampy ground, and distant mountains mostly bare of trees but coloured by lichen and low shrubs. Most of the area

is permafrost, with ice going down hundreds of feet and only a few feet melting in summer and supporting the stumpy trees.

We came to Tombstone Territorial Park, named after this mountain, very distinctive, though it doesn't really look like a tombstone from the road. We noted the very stylish Interpretive Centre, new since our last visit, but now closed as it was late. We'd visit on our way back.



We remembered that Tombstone's campground had some good trails so we were quite prepared to pay for a campsite, but all fifty sites were taken. We were surprised but probably shouldn't have been; it was after all the Canada Day long weekend.

We stopped at the spectacular view of the valley with Tombstone Mountain at its head, but didn't stay long as by now the day was dark, cold, and windy. We climbed up to North Fork Pass, the highest point on the highway. At 4600 feet and close to the Arctic, the pass has a grim climate and little grows there on the tundra. Tundra means "no trees". At this altitude not enough permafrost melts to support trees or even large shrubs.

Paradoxically, this is also the beginning of an area that was ice-free during the Ice Age. The climate was too dry for glaciers to form locally and the mountain ranges formed a barrier to glaciers that formed elsewhere. The ice-free area has been termed Beringia and it stretched from the Yukon, west across Alaska and the Bering Straits to Siberia. It supported mammoths and giant bison and sloths. One theory is that the first Americans were hunters from Siberia following game across the Bering Straits, then dry land because of the low sea levels.



We bypassed a lot of the park until we found a nice gravel area with a view of lakes and mountains. We hoped to see more of the park on our way back. We were wondering if the park rangers would find us and boot us out but the park's really too big to police, and nobody bothered us..

Monday July 2nd

We had a cloudy and cool morning. We set off up the highway, following a ridge that is part of the continental divide; to our west all streams are part of the Yukon watershed, flowing into the Bering Sea. To our east they are part of the Mackenzie watershed flowing into the Beaufort Sea and the Arctic Ocean.

From now on there is almost continuous permafrost. Any structure which conducts heat is a problem. Paths conduct heat and melt permafrost so the trees on either side will fall sideways forming a "drunken forest". Roads will sink unless the roadbed is thick enough to insulate the ground and protect the permafrost. Roads are often built as much as eight feet above the tundra, with little or no shoulder so it's all too easy to fall off the road and roll into the tundra.



Buildings will also sink, particularly if they are heated, unless they are built on piles driven through the permafrost onto solid ground..

The area we were in is called the Blackstone Uplands. We came to a lake where we spotted some ducks and a pair of tundra swans, and then realized there was a moose feeding in the water behind them. Other people stopped and the moose took off, giving us this picture of it trotting against the mountains.



On the other side of the road were two more moose though we only caught this one with the camera. Appropriately enough the lake is called Two Moose Lake.



There was little plant growth on these mountains, just patches of lichen, but there were pockets of arnica along the roadside to give some colour.

We were passing through magnificent mountains, the Ogilvies, great blobs of limestone with the surface fractured by frost so that they looked like piles of rocks, no strata to be seen.



We passed Windy Pass summit and began our descent. One of the signs had commented that apart from the road, this area had been unchanged for 100000 years. It had looked the same when the first Americans had walked out of Asia. Except that they were probably hunting mammoths and we hadn't seen any!

Drizzle began and the mountains disappeared into the clouds. The road was muddy but quite firm.

We were driving alongside Engineer Creek, a wide boulder-strewn creek with flowers growing

in its gravel bars. From its width I'd guess it would be full and roaring in the spring but now it was just pretty.



All that changed when Red Creek and similar streams poured into it. These were stained red and stank of sulphur; acid from hot springs was dissolving iron oxide in the shale. The water had a weird colour and the rocks at the edges of the creek were stained an orangey-red. Not a place to fill your water bottle!



We came to a large limestone cliff named Sapper Hill, after the Royal Engineers who built the bridge over the Ogilvie River. We stopped there and found that the road seemed to be covered with black glue; my feet stuck to it, and the back of the camper was coated from bottom to top. I had trouble finding the lock and then had difficulty turning the key because of the goo inside.



We followed the Ogilvie River for a while and we had trees again. There is no surface-level permafrost around the river and there's enough topsoil to support tall trees like white spruce.

However we climbed up onto the Eagle Plains where we were back into permafrost and tundra. We could see the twisting and

turning into the distance, following the contours of the hills.

We stopped at Gwazhai Kak, an overlook of the valleys of the Ogilvie River and the Peel, which we'd be crossing in another day or so. The rain became heavy, obscuring much of the distant Ogilvie Mountains, so we'll save most of the views for our trip back.



By the time we reached the Eagle Plains Hotel we had lightning and rumbles of distant thunder. The hotel is what the Australians call a roadhouse: a hotel, bar, campground, and service station, surrounded by wilderness. Apparently it's located on a rare outcropping of solid rock so they didn't have to worry about permafrost and were able to build without piles.

We went to fill up with diesel, but I couldn't find a diesel pump, just a nozzle attached to a collection of tubes and gauges and what might have once been the insides of a pump. The guy came out of the office to fill us up

just as the rain came down in a torrent. I told him that we weren't in a hurry and could wait for the rain to stop, but he insisted on filling the truck. I sheltered in his office. As he squelched back to the office the rain stopped!



The road north from there was very slick and slimy with black mud. We'd already noticed that it was very hard to wash off, rather like engine grease. Much of the road is elevated, with narrow or no shoulders, so meeting large trucks was a white-knuckle affair.



We came to the Arctic Circle. It is celebrated with a large parking area and signs for travelers to pose in front of. The circle is at latitude $66^{\circ} 33'$. Its only significance is that places north of the circle experience at least one day a year when the sun does not set. However, we had no sun at all at the time. The thunder and lightning was very close and the rain was coming and going. The good news was that it seemed a bit warmer on the other side of the storms.

If we'd come here in winter we might have seen thousands of caribou, as they can find lichen to eat under the area's light snow cover, but they leave in May and go up north to the coast for calving.



Along the eastern horizon are the rounded and colourful Richardson Mountains, named after John Franklin's surgeon; he and Franklin had surveyed nearly 2000 miles of the Arctic coast in the 1820s. Richardson was lucky enough not to be on Franklin's later naval expedition that disappeared in the Northwest Passage, and he died at home of old age.

We had been seeing patches of white on the hills and assumed it was snow but as we got closer it looked like flowers, and then we realized it was the fluffy seed heads of Arctic cottongrass.





We were looking for a campsite. We couldn't just pull off the road onto the tundra or we might sink so we had to find a track leading to a gravel pit or similar. There were a few dead-straight side roads, all marked as private, and we thought these might be seismic lines, owned by oil companies.

The road suddenly widened and signs warned as that we were now on an emergency airstrip, so probably not a good place to camp either! The rain was heavy and the light poor when we came to the Rock River campground, so we thought we'd give it a try. It is in a sheltered valley with tall trees, protected from the wind. Just getting in was a challenge as

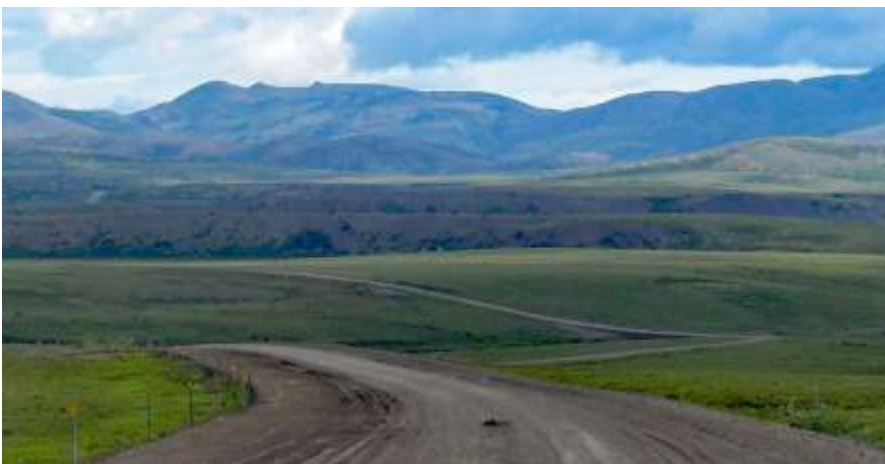
the entrance was a sea of mud. And then we stepped out and were assaulted by clouds of mosquitoes. Sandie dived inside and tossed me the repellent. I don't often use it but I had to go and get the forms and pay for the campsite. If I didn't use it then I'd be bringing a few hundred mozzies back inside with me. Even so Sandie was busy with the swatter most of the evening.

Tuesday July 3rd

We had a lazy morning, reluctant to go out and face the bugs. But the rain stopped and it was time to be off. We never did walk to see the river. Despite the rain we were still covered in mud; that stuff was super sticky. The road seemed to be better, maybe more gravel and less mud, even though it looks greasy in this picture.



We came to the border between the Yukon and the Northwest Territory. Both territories have welcome signs, the Yukon in English and French, the NWT in English and Gwich'in, the native people's main language.



The time also changed to Mountain Time, even though it's a north-south border. The NWT is administered from a thousand miles away in Yellowknife, so it's more convenient for politicians

there and in Ottawa to have one zone even though there's no direct road connection across the NWT to Yellowknife. As a result, all travelers on the Dempster have to cope with a 1 hour time change.

The Richardson Mountains were looming ahead of us, mostly bare, with no trees, but reds and yellows in the rock strata. There were streaks of snow across their faces, not glaciers but just slow to melt at this latitude. We were taking pictures of the mountains when we noticed these little bodies rolling around amongst the rocks. We think they are Arctic ground squirrels. I counted four of them but I never got more than two in the pictures.



We were getting some welcome glimpses of sunshine. We stopped in a canyon to look at one flower and our stop turned into an hour of climbing around the canyon wall taking pictures. Some of these are captured in this composite.



This was the view through the other end of the canyon, with the Richardson Mountains showing off their sensuous curves. Nearby was this display of strata.





On the north side of the mountains we could see ice in the valleys, places where the streams had backed up behind an ice dam and then frozen into a lake of ice, persisting into July.



We dropped down into the Peel River valley, part of the Mackenzie lowlands, an area warmed by all that water coming from the south. Trees grow in the lowlands: stunted spruce, birch, and tamarack. The Peel flows into the Mackenzie, as do the waters from BC's Liard and Peace and Alberta's Athabasca. The Mackenzie drains one fifth of Canada.

We took the cable ferry across the Peel River; this ferry is free, part of the road network. We passed the turning to Fort McPherson, one of the few towns in the area; we'd visit there on our way back.

About an hour later we were lining up for the ferry across the Mackenzie River, over a half mile wide.. This is located just downstream of the confluence of the Mackenzie and the Arctic Red



Rivers. The little Gwich'in village of Tsiigehtchic is perched on the wedge between the rivers. This ferry is free-running and the skipper has to deal with the strong currents of both rivers, spinning the ferry so that its ramp can land on a piece of riverbank at the right height. Looking at some of the vehicles struggling on and off I was thankful I wasn't pulling a big trailer.

~~We took the cable ferry across the Peel River; this ferry is free, part of the road network. We passed the turning to Fort McPherson, one of the few towns in the area; we'd visit there on our way back.~~ A nasty surprise was the cloud of bulldog flies, which we hadn't encountered back in 2004, perhaps because that trip had been a month later. We were familiar with them though from our trip to the Great Slave Lake in 2013. They were a real problem for us in the area where the Mackenzie River flows out of the lake. And where were we now? In the Mackenzie Lowlands, about 600 miles downstream!



It's my theory that bulldog flies evolved to eat the giant mammals: mammoths and mastodons and giant sloths, but now all that's left for them are a few bison and musk oxen, so they go after anything similar, like our GMC truck. We'd found that they'd rarely bother us when hiking, but during those few minutes after parking and opening doors they will attack in force as if we were the soft bits of a giant metallic bison. We once had so many on the inside of the windshield that we couldn't see!

Oh and why are they called bulldog flies? They don't let go! They are horseflies with armour and you have to break them in half to unlatch them. There didn't seem to be as many here but I was still bitten a couple of times. They don't usually bother Sandie.



We were glad to see that there are swallows nesting in the ferry's girders; they get to eat on both sides of the river without any effort. We wished them as many bulldog flies as they could eat.

We were now only a couple of hours from Inuvik and this area had obviously escaped the rains; the problem now was dust! Every vehicle was spewing a thick white cloud of dust behind it and, with no wind it would hang there for a long time. The locals must have radar as it doesn't slow them down.



On a sunny afternoon it was now a very pleasant 25C (77F). We were looking for a place to camp before Inuvik, but places around water were very buggy, with mosquitoes and bulldog flies. We came to a campground in

Gwichin Territorial Park, perched on a crest overlooking Campbell Lake. We noted the large thunder cloud advancing across the lake and decided to camp there and then. See the weird light on the trees as the cloud covered us.



It's an odd campground, with strange-shaped campsites and an elaborate kids' playground. Camping cost \$22.50 + tax, or \$23.63, a difficult amount of change to accumulate and put in an envelope and force into a slot. Even more difficult for foreigners to understand, particularly as Canada has no one cent coins!

Even so, the view was great and we had the entire campground to ourselves. The rain was heavy but had little impact on our coating of mud. It was dark inside the camper with its blacked-out windows.

Wednesday July 4th

I tried to brush the mud off the windows but it had dried like paint. Luckily I'd packed our ice scraper (You never know when you'll need it!) and that worked

fine. We had light again.

The weather was perfect, so we were going to make a brief stop in Inuvik to shop for food and then drive the new road from there to Tuktoyaktuk.

Inuvik is an odd place, a "new town" created by the government, mostly in the 1960s. It was designed to replace the existing administrative centre of Avvavik, which had no room for expansion and was prone to flooding. Most building materials came in by barge as the Dempster Highway wasn't completed for another twenty years.

We came to the airport and then bounced our way to Inuvik. The road from the airport to town is notorious for its massive ripples; it was built before the Dempster and before there was much understanding of how to build roads on permafrost.



We shopped at the General Store, which lived up to its name and sold everything that you'd expect to find in a department store and a supermarket. We were there for just a few groceries. I met an Alaskan motorcyclist outside the store. He had just come back from Tuktoyaktuk. His advice was to go while the road was dry as it can be undrivable when wet; it had been closed numerous times in the spring. Even in the dry it was difficult; he thought they'd used pea gravel, too small. His tyres had been squirming through it.

It was time to drive the

80 miles to Tuktoyaktuk, but where was the new road? There were no signs in town yet. Our GPS took us down to the boat launch on the Mackenzie River and we realized that it was taking us via the ice road, not a good idea in summer!

Finally, we saw two teenagers standing next to signs asking for a ride to Tuk. We thought they must know where to stand and we followed that road. The road was good



for a little while then we came to where two women were driving road rollers and beyond there was about 15 miles of mud. For a new road it was appalling, just not enough gravel for the job. Our truck has four-wheel drive and that helps with direction, but our dual rear wheels are a problem. Their advantage is that we can run tyres at a comfortable 60 psi versus a single tyre at 90 psi, but in deep snow or mud we'd be better off with a single tyre that could penetrate the mud rather than a pair that floats across it.



The road eventually improved and we were able to look at the scenery. The road crosses the Mackenzie Delta, a maze of channels and islands. It follows the contours of the land and has an economy of bridges, so it winds around lakes, up and down the hills, but never far above river level. There were, of course, no houses but there were a few sleds scattered along the side of the road. We'd seen similar in Labrador and thought those had been for transporting firewood, but there were few trees to cut here. Perhaps they're used for hunting,





As usual we made many stops for flowers. There were a few ducks and tundra swans too.



Then we saw a figure on the road at the top of a hill and it came down the slope towards us. We had no idea what it was until it turned sideways and we could see it was a caribou. We'd like to have seen thousands flowing over the tundra but we'd settle for one. This one seemed to be confused about what we were and it came much closer than it should and then wavered to and fro before trotting off into the bushes.



There are no rest areas or parking places on the road, so we stopped for coffee in a slow vehicle lane, not that there are any lane markings on a gravel road.. We were probably the slowest vehicle around anyway.



As we got closer to Tuk we began seeing pingos in the distance. These are cones of ice, some hundreds of feet high. Pingos form when there is a spring coming up below permafrost. The water forms a lake and the edges then freeze to the ground. When the centre freezes it is forced up. Repeat for thousands of seasons and you have a cone of ice, a pingo.

We came to more roadworks. The motorcyclist had warned us that they were particularly bad but the road had dried and we just took it slowly.

We came to this Land of the Pingos sign, with a view of two giant pingos on the horizon. The water beside the road was a little salty. We had made it to the Arctic Ocean, truly Canada's Far North! But how far north were we? Well, we were 1400 miles north of Hope and 500 miles north of the Alaska Highway. But we were still 1400 miles south of the geographic North Pole. Most of Nunavut was to the north of us, including the hamlet of Alert, just 500 miles from the pole. There is no road access to Nunavut from the Canadian mainland.



The entrance to Tuktoyaktuk is not pretty. The town itself is a fishing community, mostly on a peninsula at the end of the road, and everything industrial or unpleasant is located out of town and away from people. We were entering past



the extensive rubbish dump, oil storage tanks, power station, and the airport runway.

Tuk has a 15kph (10 mph) speed limit so we tried to be good visitors but the locals were blasting past and around us. Our first impression was that the place was amazingly busy for a village of less than a thousand people. Trucks and cars, motorcycles and ATVs were buzzing up and down the main street.



There is no official campground in Tuk but visitors are allowed camp on the beach at The Point, the tip of the peninsular, looking out over the Arctic Ocean.

Our plan was to stay for a couple of nights and explore the town and the area.

That wasn't how things worked out, but that's a

story for the next part of this journal. For now, here is a picture of our campsite on the beach and another of my Arctic swim at the far tip of the peninsula.



Love to you all from Pete and Sandie