

My Professional Career

Part 4 – (1984 - 1989) – Whitehorse, Yukon.

By Jacob A. de Raadt, P.Eng., MBA.

SDG

(Completed on 2021-10-13)

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(Started on 2020-06-05, completed on 2021-10-13)

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Once again, dedicated to those who would care to know how things were done in Canada's north in the mid-1980's, long before buzzwords like "electronics" and "engineering management" changed almost all other engineering activities. And to professional colleagues who, by acting ethically, also seemed to fall into dis-favour with the political environments in which they worked. Not everybody has the wherewithal to continue standing up during a continuous barrage of adversity, as was my case. Although I did not fully realize it at the time, I know Who rescued me and my family from an untenable situation, so that I could continue my professional career somewhere else. To Him be therefore all the glory, Psalm 16 : 5 and 6.

¹ Photo taken on 27 November 2020, my 78th birthday, at Osoyoos, BC.

Chapter 1 – Program Engineer III for YTG Highway Engineering, (1983 - 1989).

The heading above might be seen as somewhat **deceiving**, if an assumption is made that I worked **six years** in the great white north in Whitehorse. I started in very early November 1983 at the Highway Engineering Section of the Department of Highways and Transportation, and was summarily “let go” in early January 1989, when the Department was called CATS, meaning “Community and Transportation Services”. **What’s in a name?** Without trying to duplicate what was written in the short **Chapter 4** of **Part 3**, I now start with recording the beginning of 1984, when the various parts of my work functions started to take shape: In summary, I was responsible for:

- (1) Engineering for the Yukon funded **primary highway upgrading program**. This meant the responsibility for route location, planning, design, scheduling, project documentation, tendering and contract supervision of “numbered” primary highways, **except**
 - (a) Highway 2 (Klondike Highway) south of Highway 1 (which was in Robin Walsh’s bailiwick);
 - (b) Highway 5 (Dempster Highway) north of Highway 2 (which was in John Murray’s bailiwick);
- (2) Engineering for the Yukon funded **secondary highway upgrading program**. These highways were not numbered at the time, but their maintenance was clearly given in “codings” for the three Highway Maintenance Districts, (West, East and North) so that a “Road 101” would e.g. be in the Whitehorse area, a “Road 201” would be in the Watson Lake area, and a “Road 301” would be in the Dawson City area.
- (3) Engineering functions of a huge variety to assist the Highway Maintenance Section (meaning Ray Magnuson, and two of his three District Superintendents – Colin Yeulet, Gordon Eftoda and Al Coles – and the Roads Foremen, for work needed on the Alaska and Alaska Highways. These roads were at that time still under federal jurisdiction, contracted out to the YTG, through the Whitehorse office of Public Works Canada;
- (4) Engineering to assist Nate Casselman of the Airport Section on work at Class 2 and 3 airports in Yukon; (meaning all **except** Whitehorse – soon to be called “Erik Nielsen International Airport” – and Watson Lake.)
- (5) Engineering on all kinds of “paperwork” related to Land Use applications that came from DIAND, tote road funding applications for e.g. mineral exploration and tourism development;
- (6) **“Service to the Public”**, a catch-all phrase that meant dealing with correspondence on a very wide variety of topics, from the most logical to the absolutely weirdest. This type of work in fact increased with time.

I had understood these to be my job functions during my August 1983 job interview with Mr. Larry Blackman, Wally Hiding (who became my supervisor) and Mrs. Dorothy Drummond of the YTG Public Service.

I was somewhat leery to get out of Whitehorse that first winter, on **“new to me”** highways; on several occasions during our almost six years in Alberta, I had experienced uncomfortable travel conditions: Heavy snowfall and much wind on Highway 2 toward Calgary, on my way back from Drumheller; when only two wheel paths were sometimes visible; driving south near Nanton on the way to Fernie, BC; when a large semi truck passed my purple AMC Gremlin in heavy snow and almost blinded me; with that same short wheelbase car, on the way to Lacombe with Geoff Thomas, I had once slid on black ice on Highway 2, ending up in the very middle of the median (without any damage); plus our recent experience at Iron Creek. But travel could obviously not be avoided:

During 1983 (or earlier?) a southbound truck had come from Stewart Crossing on the Klondike Highway, down a sharp curve and hill, slamming into the nearest (west) vertical member of Crooked Creek Bridge, km 524.4. YTG did not have a Bridge Engineer at the time; bridges were still Public Works Canada’s responsibility. Eric Gibson, P.Eng. from their Whitehorse office on Range Road, had assisted Wally with a Tender document to have the bridge repaired under Contract. At tender opening, the low bidder was a Whitehorse firm called Melberg-Verrico Contracting Ltd.; Wally asked me to join him and Eric in a Tender Review Meeting with those two guys, discussing their approach to the project. Highway 2 would need to be closed completely for a certain period, even overnight, but they promised to start as early as possible on the first day, and to have the road open again by the very next afternoon. On Contract award, in mid-December, I was told to supervise the work in the New Year, for my first trip north, using the office’s orange Ford F-150 pick-up truck (numbered **19-365**) and. This was one of two pick-up trucks made available to us office staff; a few years later, a Ford Ranger was added to the fleet, but I seldom had to use one of the “seasonal rental” pick-up trucks, which were normally GMC’s. During the next few

years, I developed some level of affinity for 19-365 over 19-363, the GMC truck. Perhaps its heating system was better; perhaps its seats were a bit higher; perhaps it was both that and a number of other unimportant factors. (The Ford truck was later written off after a survey crew member called Mark, in some midsummer night frolicking, tried to pull a canoe out of the Stewart River directly east of Stewart Crossing. So in February, I stayed over for a night at the nearby Stewart Crossing Lodge, which establishment would definitely never be “rated” in any reputable tourist publication, and has since long been torn down. It was cold; the walls seemed to have paper-thin like walls; I “ate and signed a meal sheet” for the first time.

◀ Repairs to Crooked Creek Bridge, Klondike Highway, by Melberg-Verrico Contracting Ltd. Note the steel cable to temporarily suspend the timber deck (without a live load, the reason for the well-announced road closure by radio and newspapers). This photo was taken in an easterly direction, on the first day of work activities.

The damaged vertical member was cut with a blow torch and the rivets (top and bottom) were drilled out; a new H-beam was then cut to its exact length, and then drilled and inserted with new HT (high tensile) bolts and nuts. Near the old riveted joint at the bottom (just behind the top of the ladder on the iced of the creek) additional welding repairs were also needed for rusted out sections.

And though the temperature was very cold those two days, I survived. On that day, I was given the off-cut part of the new vertical beam, and took it home. Until fairly recently, our son Joss used it as an excellent anvil in his shop at home outside Chilliwack, BC. GoogleMaps imaging of ◀ August 2009 shows the difference in shadings between the **original green** and the **repair green** that was (assumedly) applied soon after 1984. So **this bridge had not yet been repainted in the interim!** This leads me into a detour into discussing Yukon’s **bridge maintenance program**. I do not think there was an actual “program” in those days. I handled three or more bridge painting projects on the (federally funded) Alaska Highway, but **none on Yukon funded highways**. I remember (a) underwater investigations at the east abutment of the Mayo River Bridge on Highway 11, (b) concrete deck repairs at the Flat Creek Bridge on Highway 2 between Stewart Crossing and Dawson City, and (c) work at the Yukon River Bridge at Carmacks, to repair/replace bearings on its south abutment. The following is added, which I recently found on the political end of this **bridge painting issue**:

Minutes of the 28th Legislature, Session 2, Monday, January 30, 1995 - 1:30 p.m.

Ms. Moorcroft: Can the Minister tell me what the overall policy is for building and maintaining bridges in the Yukon?

Hon. Mr. Brewster: The policy is that when a bridge is required we build it. They are inspected every year. After they have been there for 15 to 20 years, we have to check them to see if they need to be **repainted** so that they do not oxidize. It is just a matter of maintaining the upkeep on them.

Ms. Moorcroft: What happens when the state of disrepair goes beyond having to **simply paint them**? What is the government responsibility there?

Hon. Mr. Brewster: When it gets to that stage, we would have to budget to rebuild them.

Ms. Moorcroft: I would like to ask the Minister for a little more information regarding the road improvements and the bridge in Carmacks. The Minister has been aware of this project. Certainly, he was just talking about papers and there have been a flurry of letters back and forth, both from a department level and a ministerial level regarding the need for an improvement to the single-lane, old Bailey bridge on the Nordenskiöld River.² The village council requested cost estimates from the government on several routes, and expressed a number of concerns regarding safety features about road crossings and parking lots in the area of the nursing station. It was expected that the **(is there a word missing in Hansard? JAdR)** would provide some answers. When I asked the Minister about this on January 10, and again on January 19, he indicated that he was preparing to go to Carmacks on January 26 to talk to people there with some answers to their questions and to discuss their concerns with them. Can he explain why that did not happen?

Hon. Mr. Brewster: I can explain it. The municipality wrote back to us and asked us some more questions. They wanted the answers and they suggested that we delay the trip so that they could talk to the people in Carmacks about the answers we sent them before we arrived. Therefore, we will schedule the meeting when they are ready to have it.

Ms. Moorcroft: Is the Minister telling us then that all of the questions that have been raised have been responded to and that he is simply waiting for the village to digest the information?

Hon. Mr. Brewster: The letter has not been completely finalized yet. I would not say all the questions could be answered. I suspect that when we get to Carmacks there will be some questions arising that we will have to answer at that time.

Ms. Moorcroft: Can the Minister give me a commitment that the government is prepared to replace the bridge over the Nordenskiöld River when it becomes necessary to do so?

Hon. Mr. Brewster: I can give the commitment that if we do not decide to build a bridge upstream from it, it will be rebuilt. If we have to build a bridge upstream, then it is questionable whether we want to build two bridges that cross the same river.

Another early trip “north”, on 1984-03-13, was a flight to **Old Crow – via Dawson City**: Completion of the upgrading of railings and stair treads at the airport terminal had to be **certified** before payment could be made by “Ottawa”. Nate Casselman had suggested to Wally that I accompany Ray Magnuson and one of Dick Arnold’s mechanics who also flew north that day. For me, it was quite an experience: While they seemed to break their backs under a grader for most of the “ground time”, I had a chance to walk around the whole airport (airstrip?) and along the main streets, where there was even a **stop sign for skidoos**, as those were the only vehicles.



From left to right: Old Crow community wood pile, power plant, school buildings and gymnasium, March 1984. The airport is behind these buildings.

Old Crow street system ▼; basically, the village stretches out along the middle south side of the airstrip.



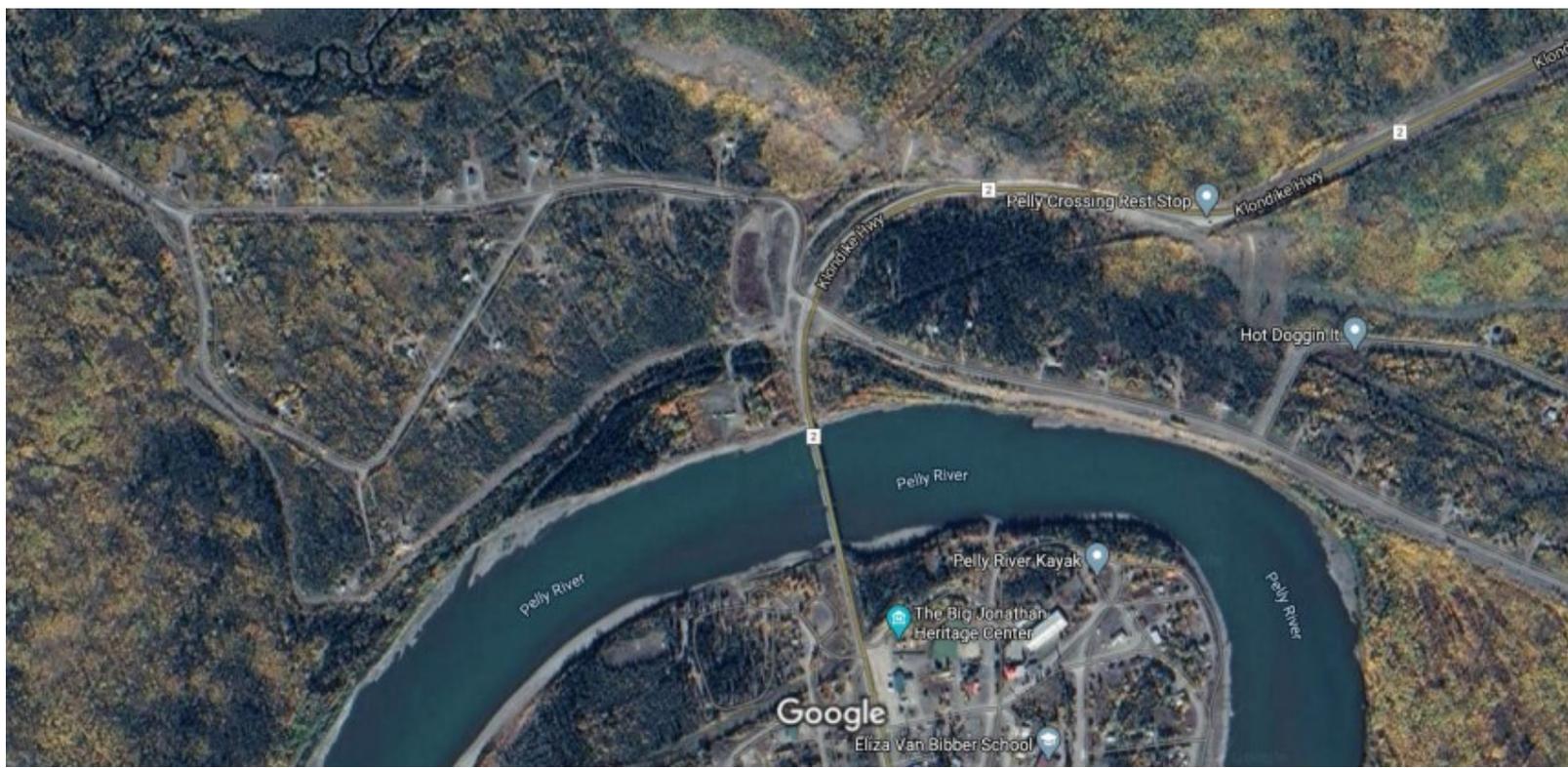
² See below for what I knew about this (and the Freegold Road) in 1986.

It was a bright and sunny day, and on all north and south flights I took photos, as well as on the ground. One photo was of a rock pit site we were already planning to use for a rip-rap project, where the Klondike Highway runs parallel to a section of the Klondike River that needed it. Doug Andrews would later do the grading analysis of the layer of rip-rap necessary to protect the highway from scour damage: There were three of these rock pits, and they provided different qualities of blasted rock, for a two-layer rock blanket to protect the highway from scour.



Ogilvie Mountains north of Dawson City / Klondike Highway near Dawson City / Klondike Highway rip-rap pit.

In the mean time, various projects for the 1984 construction season were already “being designed” in the office. The Klondike Highway North (between the Alaska Highway and Dawson City) was being upgraded with a gravel base course and chip sealing (with what was called BST or Bituminous Seal Treatment). At some locations, horizontal realignments had been considered necessary, and those sections were first to be improved in separate contracts. BST application was done in late summer by one specialized crew of Highway Maintenance staff. Moreover, the material for the crushed gravel overlays and for the BST process had to be provided along the way, in separate crushing contracts for one or both. These pit sites had to be found and the material analyzed, that was Doug Andrews’ job, in liaison with the Road Camp foremen, who had knowledge of materials in the existing pits.



One of the realignments had been surveyed in 1983 and designed in the winter of 1983/84, at **Pelly Crossing**. The 2020 GoogleMaps image ▲ show the **existing** alignment and the **pre-existing** alignment are both visible. During the detail design process (and after my site visit to Crooked Creek?), I made my concern known about the fact that the new curve would actually start right **at** the north bridge abutment. “I note”, I said to Walt Gutowski, “that the proposed radius is larger than the existing radius, and that is excellent, but that is not the only thing to be looked at for an upgrading. Is it not possible to design this improvement for more traffic safety, e.g. with a spiral, so that the horizontal curve does not start right at the end of the bridge?” (There was also a steep excavation on the north side, which oozed out water, and then a tourist viewpoint overlooking the valley, limiting the options.) Unfortunately, it was then too late to send out a survey crew and prepare a new horizontal alignment, and it was built in 1984 with what I would describe an “**internal design non-conformity**”, not unlike the one at Crooked Creek Bridge, 58 km further north, where a SB truck had hit the bridge. In **2020 hindsight**, I would also like to question the advisability of a four-way intersection in this area (for Pelly Ranch Road). Note the lack of bridge painting by 2009, but that a **pedestrian walkway** ▼ has been added to the west side of the bridge, which is a good thing, seeing the currently existing residential development north of the Pelly River, which was not even dreamt of in 1984.



May 2009 GoogleMaps NB streetscape image.



Looking towards Pelly River Bridge from the viewpoint.



(The embankment is where “Klondike Highway” is shown.)

A second **Klondike Highway** improvement project was **south of Tatchun Creek**, closer to Carmacks. This was not a horizontal realignment as such, so there was no separate “earthworks” contract: Within the surfacing project, the vertical alignment was (a) **raised** with a substantial side slope that needed to be addressed **geotechnically**, and was also (b) **lowered** around the horizontal curve further south. This was built in 1985. For (a), a number of vertical tubes had to be installed in the lower layer of the embankment, together with **slope indicators and piezometers**. During the gradual raising of the embankment (with specified maximum lift thicknesses), the piezometer readings would be read regularly to show when the pore pressure at a certain depth had been dissipated so that an additional layer

could be placed and compacted. This was all needed for the ultimate geotechnical stability of the underlying materials, and the process had not been used in Yukon before. We had the salesmen of this product fly in to us from Richmond BC, to describe to us what they could offer YTG. In Saskatchewan, Florian had previously used this technology, but I only had some theoretical knowledge about it, without having designed or used the slope indicator technology. The total costs of tubes, sensors and all the other paraphernalia was around \$ 3,300. (Note that this equipment was **very basic or primitive**, if compared to what is being used today!) The main reason for this feature was the extremely sensitive Tatchun Creek fish habitat, where it runs west, almost parallel to the highway, downstream of the bridge. Tatchun Creek Campground, one of YTG's campgrounds at the time, is just north of the bridge, and it was still fairly primitive at the time. There may well been a history of mudslides into the creek, just before it ends at the Yukon River. All projects had to be sanctioned by DIAND and by the Indian Bands, (now called First Nations). Tatchun Creek is an important source of fish; when Florian and Doug Andrews and the survey crew were supervising the construction contract, they caught many a large salmon after work.



These two NB construction photos show the curve south ▲ of Tatchun Creek. The vertical curve was (b) lowered by excavating material from the slope on the east side. The Yukon River is in the background.



Above **left** ▲ is a SB construction photo of the east end of the embankment, close to the bridge, showing some of the slope detectors in place. Highway Maintenance, while pre-clearing the site (as was the custom in those days) had done this for **too wide a swath** for this embankment, hence the little pond shown at far right. Above **right** ▲ is what GoogleMaps saw in August 2009, at **km 382 SB** (see the sign at left). There is a fairly long horizontal and vertical curve at the top of the SB hill, although (as I recall) the grade is not very steep. The current **NB additional lane** north of Tatchun Creek Campground was an “**add-on**” to this project. I am not sure if it was designed as a

“climbing lane” or as a “passing lane”; it may very well serve both purposes, as is fairly common. Much later, in Arizona, I developed concepts and prepared several Project Assessment Reports for climbing and passing lane proposals; ADOT had special “criteria” for their design, as shown ▼:

ADOT'S PREVIOUS METHODOLOGY TO IDENTIFY AND PRIORITIZE PASSING LANE LOCATIONS

The process for identifying and prioritizing passing lanes on the Arizona State Highway System was first developed by the 1999-2000 *Climbing/Passing Lane Study* and later updated in the 2003 *Passing Lane Prioritization Update*. The 2003 *Passing Lane Prioritization Update* identified issues in the 1999-2000 Study methodology and developed an enhanced methodology to identify and rank candidate passing lane locations. This section provides a summary of the methodology developed as part of the 2003 Study and are currently employed by ADOT to identify candidate locations and to establish an ultimate priority list of locations for passing lanes.

◀ (Copied from page 6 of Jacobs’ (the big consulting firm, not mine!) 2015 **Climbing and Passing Lane Prioritization Study**, for ADOT. This document is highly technical with “Level of Service (LOS) Criteria”, “Subjective Rating” “Score Method” and “Combined Method” verbiage.)



On GoogleMaps, I noted another realignment of the Klondike Highway, just north of Minto Landing. I believe that this former sharp curve had already been improved before 1983, as I remember that large gravel pit at the north end, km 433. I also note that by 2009, Yukon was already “changing over” from the use of creosoted timber posts and Armttec W-beam guardrails (as it was in the 1980’s), to the use of concrete barriers. I am ambivalent about these two safety features, as well as the use of cable barriers. Every system has its advantages and its disadvantages,

its promoters (i.e. salesmen, industry leaders) and also those who do “research” and write articles that state “Ours is the best!” and “Theirs is the worst?” The problem seems to be that to change over is first seen as easy, but may afterwards cause unexpected pains. That everything is now being proven by statistics, muddles the waters as well.



Remembering the dangerous NB approach to Crooked Creek Bridge in February 1984, I suggested a Klondike Highway realignment at this location, one with an **almost tangent approach** for NB traffic, and would run straight through the bush, within a north facing slope, which normally means “permafrost” at these latitudes and terrain. This suggestion did not come out of thin air: We had a thick book in the office, which consisted of the proceedings of some international conference on the issue of permafrost, and how to deal with it. I believed its content, and used the set of air photos in the office to prove the logic of this alignment, even before a “site survey” was initiated. (At that time, Mr. Alan Nordling, MLA, a young Whitehorse lawyer, who had done summer survey work for YTG during his student days, sometimes publicly chastised the practice of “cutting line” **time and time and time again**. I have no idea when and where this had occurred. But true, air photos had never been used by YTG to establish a

road alignment, which had almost been my “**breakfast, lunch and supper**” during my early career.) Anyhow, it was agreed to survey the proposed centre line, to do some in-situ soil tests, and to prepare a preliminary horizontal and vertical alignment. Mr. Wes Buyck (Stewart Crossing Roads Foreman) was happy, soils tests were promising, and on the basis of them, it was decided to prepare documentation for a contract to clear the swath of land for a year before actual road construction. After this work, the construction project’s contract was designed, documented and awarded for 1986 construction. I have often wondered if this project has actually eliminated some traffic crashes near Crooked Creek, and if permafrost became a problem along this short realignment.

In 1984, I was asked to prepare a **Report on Improvements to Whitehorse Airport Accesses – Alaska Highway**, and copy what I completed on 25 October 1984 as a 6-page report in which I quoted many professional sources. I now (2021) realize that I did what nobody in YTG had done before, (**see below**). Though I wrote a technical report on what I had understood to be a normal transportation engineering report on some necessary improvements to existing facilities built when the sub-discipline of civil engineering was less developed into codes, guidelines and design criteria or regulations, I must have tread on much ground not trodden before in Yukon. I do not know if I was understood by my peers or superiors, or by the architects who should have insisted on receiving more data from YTG in their design studies for the airport expansion. Those who later became my superiors (as a result of the reorganization into CATS) were likely never even made completely unaware of this report and of my capabilities. It was a time when “these kinds of studies” were no longer done in-house, but by consulting firms.

Much of the work I did after 1984 was done with a (subconscious) feeling that I was “**doing the right thing**”; this came through (a) in the design of intersections, (b) in my comments on land use applications, (c) in my concerns for Whitehorse Transit, and (d) in many other little things, as will likely be clear in the rest of this “Part 4”. I never received any positive (or negative) comments on it; and I sometimes wonder what happened to File 2142-3-2.



Department of Highways and Transportation
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Date File 2142-3-2
Your File

- 2 -

1984 10 23

Report on Improvements to Whitehorse Airport Accesses - Alaska Highway

It has been requested that the construction of acceleration/deceleration/passing lanes at the existing and new accesses of Whitehorse Airport be investigated. This report deals with the matter under the following headings:

- (a) History
- (b) Existing traffic counts and trip generation
- (c) Turn warrants for auxiliary traffic lanes
- (d) Practicality of construction
- (e) Cost Estimates

(a) History: The only record on file is the attached letter dated 1984 06 18 sent after the Airport Project Architect, Mr. Jeff Rowan, presented the proposed airport design to this Department. It is perhaps ironic that traffic counts had just been obtained in the area of the airport access (May 1982) but that the data had not been analyzed and were not considered at that time. The Consulting Engineering firm responsible for the design of the groundside facilities at the Airport side does not appear to have designed any improvements off Airport property (the east property line of the Highway).

Other information (Whitehorse Airport Master Plan, May 1984) indicates that previous studies and draft master plans had tried to address this matter (see attached pages 57, 95 - 98), but as things are now nothing has been done.

(b) Existing Traffic Counts and Trip Generation: During May 1982, traffic counts were obtained at all the intersections along the Alaska Highway in the Airport area. These all directional counts were recorded between 0600 and 2200 hrs. 116 hours and summaries of totals and peak hours were prepared.

- See attached sheets for accesses,
- no.31 Recreational Centre
 - no.32 Milcrest Road
 - no.33 Tower (new row ATS access)
 - no.34 Roundel Road
 - no.35 Airline Inn/Burns Meats
 - no.36 Whitehorse Airport Main Access
 - no.37 Airport Chalet
 - no.38 Burst Road

The validity of the traffic counts has to be correlated with trip generation figures of the ITE Trip Generation Report. For Commercial Airports, which also

accommodate general aviation, trip generation rates have been determined for three independent variables, namely:

- (a) Employees
- (b) Average flights per day
- (c) Commercial flights per day

These studies were done on airports with the following characteristics compared to those of Whitehorse Airport.

Studied Airports	Independent Variable	Whitehorse Airports
80 to 873	Employees	90 in 1981, a 502 in 1984
119 to 1335	Avg. flights/day	264 in 1981, 130 in 1982
18 to 158	Comm. flights/day	22 in 1981, 18 in 1982

Copies of the ITE Report pages are attached.

These parameters have been used to estimate trip generation figures for Whitehorse airport.

The following figures have been obtained.

Variable Used	Total Traffic Vehicles/day	Afternoon Peak Vehicles/hour	Saturday Peak Vehicles/hour	Sunday Peak Vehicles/hour
300 Employees (1984) Minimum rate	3665	303	264	336
130 Average flights/day (1982) Average rate	1538	236	210	243
18 Commercial flights/day (1982) Average rate	1401	187	96	111
1982 Counts	1693 between 6 am & 10 p.m. say 1800 vpd	283 vph 4-3 p.m.	NOT AVAILABLE (A second peak of 273 vph exists between 11 a.m. and noon)	

It is clear that the peaks coincide with the maximum use of the airport at arrival and departure times of the scheduled commercial flights. The first independent variable (employees) is not considered accurate, as the airport provides employment to a number of non-airport related activities like forestry, environment etc. Overall, the traffic counts of 1982 can be believed.

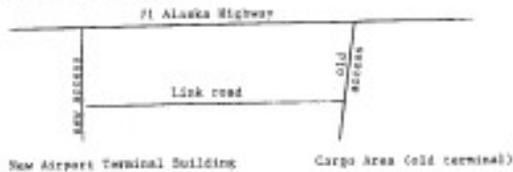
Official CATA forecasts regarding aircraft movements are available. The Whitehorse Airport Master Plan specifically warns against using these forecasts, due to the recent major downward trends in activities and revisions of CATA policies and procedures.

The 1979 preliminary estimate, mentioned on page 97, indicated 320 vehicles per hour as a maximum peak hour traffic volume by the year 2002. The ITE report provides no correlation between road traffic volumes and air passenger activity. However, a Transport Canada study "Staged Expansion of Ground Transportation Facilities", dated August 1982 does this for a number of facilities and peak hour passenger figures. According to this report, the Whitehorse design stage of 325 peak hour passengers represents a traffic volume of 343 vehicles per hour on the Main Access Road (358 vpd) and say 350 vehicles per hour on the Terminal Approach Road. This report recommends a growth strategy for 20 years.

The terminology MAR and TAR is not explained in this report.

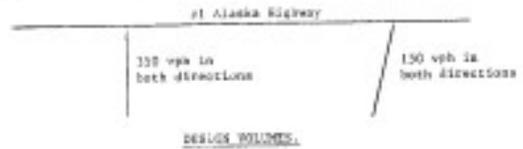
How are these figures applicable to the Whitehorse situation?

It appears that the airport will shortly have two entrances, both to be used for bi-directional traffic. The new access will serve the new ATB and the old access will serve the north area where most other activities take place. There is, however, an internal link road between these accesses.



The design volumes for the two accesses can perhaps be considered the lesser of the 343 or 350 vehicles per hour as shown for MAR and TAR. Actually, Whitehorse Airport does not have a Main Access Road.

Splitting design volumes among the two accesses would be required, perhaps a 75/25 split as indicated, using the least of the two figures.

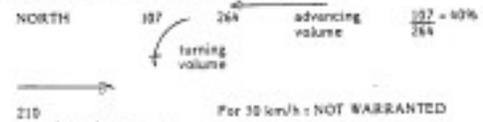


The figures 350 and 150 will be used to upgrade the existing traffic counts of 1982.

(c) Turn warrant for auxiliary traffic lanes

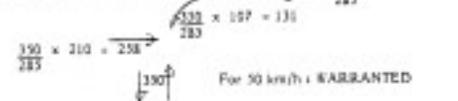
In the absence of any RTAC or ITE guidelines, the Ontario MTC warrants for left turn storage lanes for two lane highways have been used (see attached).

(i) Existing (1982) traffic counts at existing access.



For 30 km/h : NOT WARRANTED

(ii) Upgraded traffic counts to design volume



For 30 km/h : WARRANTED

(iii) Existing (1982) traffic counts at existing access would mean a MARGINAL WARRANT at 75 km/h.

This left turn storage lane has to be 15m long (= storage length)

(d) Practicality of Construction

It appears that upgrading with acceleration/deceleration lanes is warranted at the new access, which will be the main access to the airport. This location is opposite Bouché Road, Hillcrest, and it is clear that a proper four-legged intersection is required. Roundel Road traffic by itself would not warrant a left turn lane (on the south side) but the combined construction as shown is logical in all respects. See proposed design.

Proper acceleration/deceleration lanes, according to RTAC design standards can be constructed. The only problem is the access to the Airline Inn and Berra Mart, which will be on the deceleration lane. This traffic is very light.

It is also very appropriate to construct the earthworks for this upgraded intersection prior to the Alaska Highway overlay which is planned for 1985 by Public Works Canada.

The following utility relocations have to be carried out to make this upgrading possible.

1. Yukon Electrical Company - substation in NE corner - this demolition has been scheduled for 1983 and does not directly concern construction.
2. Yukon Electrical Company - one street light in SW corner (on underground cables).
3. Adaptation of storm sewer inlets in the ditch in NE and SE corners - this could be costly.
4. A pedestal of Northwestel cables in SW corner. This is a major telephone facility.

It is assumed that nothing be done at the existing airport access as this will become of minor importance and without real peak traffic. Moreover, the location of the Airport Charter building in this location (encroaching onto the highway right of way with a fence of occupation) might be problematic wherever upgrading is contemplated, as well as drainage of the parking lot (informal from City Engineer).

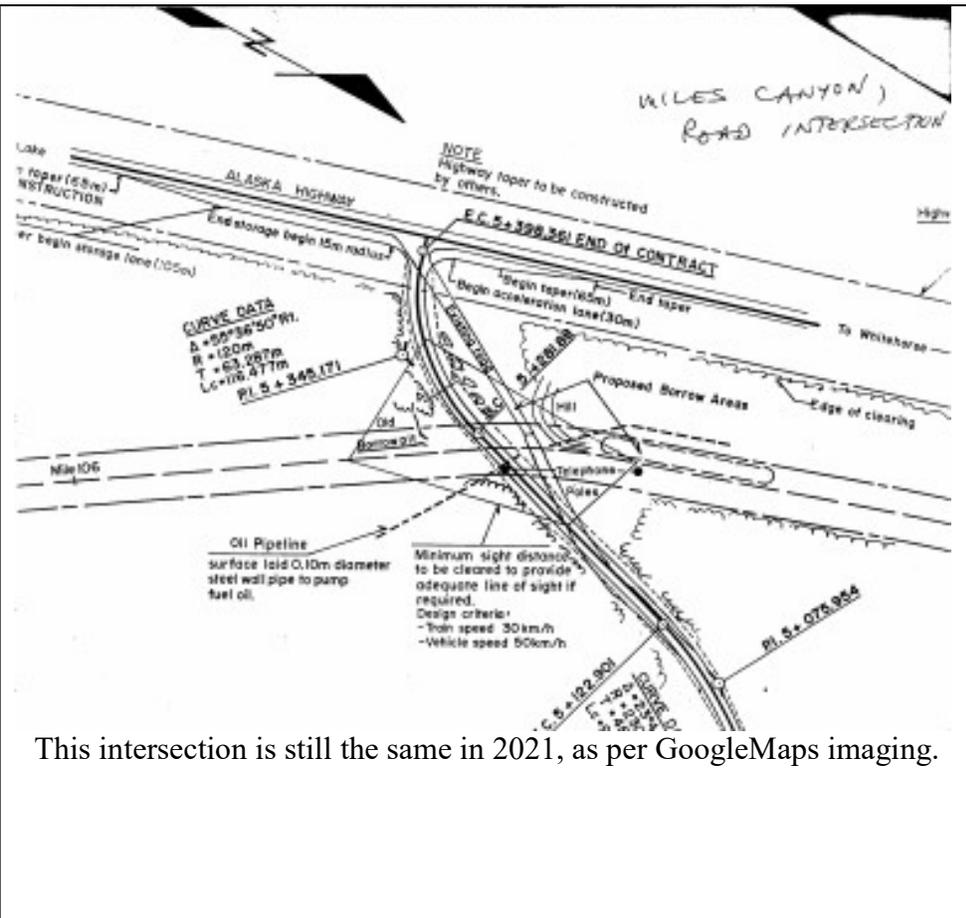
(e) Cost Estimate

1. Earthwork 200 m ³ @ \$4/m ³	\$ 8,400.00
2. Gravel (base) 120 m ³ @ \$10/m ³	\$ 1,200.00
3. Pavement (1983) overlay project	\$ 2,000.00
4. Streetlight relocation	\$ 1,000.00
5. Stormwater inlet relocation	\$ 1,000.00
6. Relocation of cables and pedestal	\$ 1,000.00
7. Contingencies	\$ 1,000.00
8. Survey and Engineering	\$ 1,000.00
TOTAL	\$ 12,000.00

J.A. de Haan

J.A. de Haan, P. Eng.
Program Engineer
Highways and Transportation
Department of Community
and Transportation Services

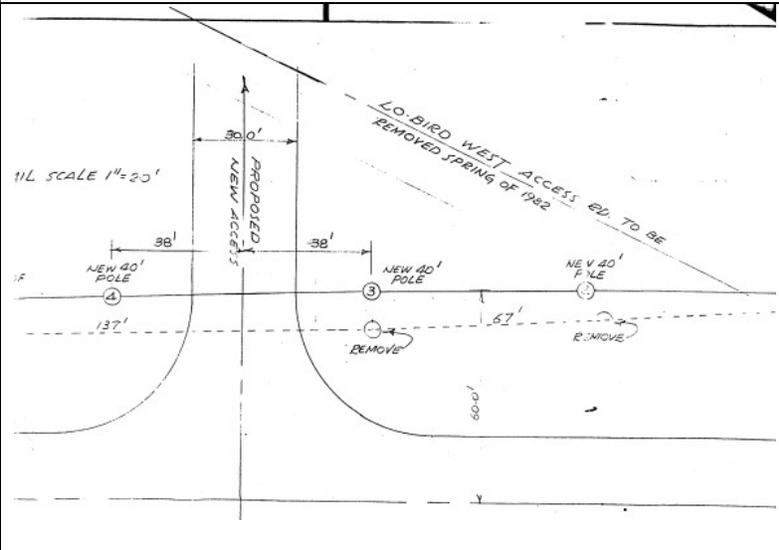
Ad



This intersection is still the same in 2021, as per GoogleMaps imaging.

As an example of my professional line of thinking, I add a portion of one of the engineering drawings for the reconstruction of the **Miles Canyon Road** at the Alaska Highway. On this, one may note:

- (a) The very skew intersection angle of the old road that just begged to be discarded because it was “inadequate”³ and/or “dangerous”.
- (b) The somewhat better (but not actually “preferable”) alignment (seeing the site limitations) with a 120m radius curve starting almost within the intersection with the Alaska Highway.
- (c) The parallel 105m deceleration and 30m acceleration lanes and their tapers (to be constructed by others).
- (d) The level crossing of the WPYR railway line and their oil pipeline (mostly above ground from Skagway to Whitehorse); it crossed over within the railway crossing.
- (e) We ripped up the old road for borrow, as well as the area next to the WPYR track, within their right-of-way!



In comparison to the above, the single drawing for the relocation of an even worse access to Lo-Bird Trailer Court ◀ is shown. I guess this had been built in 1981 (with a Highway Use Permit, **see below**), so that a part of the existing road and intersection could be “removed spring of 1982.”

Note the absence any of deceleration / acceleration lanes and tapers. I would not be surprised at all to learn that this “improvement” had been requested by Whitehorse Transit (perhaps after a serious bus crash?), because Lo-Bird was served by a regular bus schedule since the very beginning of the system.

LoBird Estates / Radar Apartments now has good access.

Early in 1984, I also made my first trip west, to look at a short re-construction project on the Alaska Highway, This was at **Oyster ▼ Lake**, (or Onion Lake?) just south of the intersection with Snag Road, where the work (done **by YTG forces**) had been left uncompleted over the winter. I do not how much other construction work was still being done by Highway Maintenance, and how Highway Engineering had previously been involved with those projects, but Ray Magnuson (and Colin Yeulet) told me that they did not want to be saddled with them. A Mr. Smith (?) was the Roads Foreman in Beaver Creek, and it must have been at that occasion that he told me about a

³ At ADOT in 2002, Mr. Brian Kinney PE, told me **never** to write “sub-standard” but only “not meeting current design criteria”.



large mysterious **Armco** (not **Armtec!**) SPCSP that lay in the bush close by, of which the floor was partly covered by equine excrement. See **below** on how we later used that long elliptical **structural plate corrugated steel pipe**. Returning to Whitehorse, I went on Kusawa Lake Road to look at the results of the previous year's minor earthquake that had caused a mudslide of Kusawa Creek right through the **Kusawa Lake Campground**, about 22 km south of the Alaska Highway. It was a sad sight, with several picnic tables on the south side still partly visible, and the rest covered by much mud and some rocks. While nothing could be done to save the campground itself (where all the trees were going to die, due to a cover of about a metre thick layer of mud) a reoccurrence was to be avoided so that (secondary) Kusawa Lake

Road could be reopened, e.g. for hunting and mineral exploration. Many Secondary Roads had no winter maintenance at all. The solution that was then developed and approved was to do rock work on the creek, upstream and downstream from the road, and to install larger and more CSP culverts. A survey of the creek was prepared that summer, and a design was prepared with a series of drawings of a creek profile and cross-sections of the anticipated work. It became a "quick and dirty" design, with no actual environmental studies or specific concern or anything, but only trying to keep this flood from recurring. The **four photos** taken in the spring of 1986 show the results, after construction completion in 1985. Note the large pipes and the smaller overflow pipes. I have no idea if this "solution" has been effective, nor how much traffic (exploration, hunting, logging, archaeological) there is.\



Upstream photos.



Downstream photos.





◀ 2020 GoogleMaps imaging shows the current Kusawa Lake Campground **north** of the creek crossing, with 53 campsites at daily rates “from \$12”, with room for pull-through RV sites and wheelchair accessible amenities. The campground was originally further **south**. Although there is no GoogleMaps streetscape imaging, but only imaging of the intersection of a gravel road on the Alaska Highway, plus some road signs, the old campground is likely still abandoned, but overgrown with new trees. I wonder if it could be rebuilt, on top of the old campground.

<https://www.travelyukon.com/en/plan/operator/kusawa-lake-campground>

◀ And yes, the Takhini River runs through Kusawa Lake, which is 142 square kilometres in area.

As a more important project (for the tourist industry!) in the Secondary Roads category, **Miles Canyon Road** stands out as interesting. This road snaked up along Schwatka Lake and by Moe Grant’s cabin, was dirt so that it could not be BST’ed, was very steep and curvaceous in places, and did not have an actual viewpoint to the real attraction for which it had been named. So we redesigned it in a way that currently, after 35 years, is still widely used, particularly the large viewpoint that can accommodate buses and RVs. GoogleMaps imaging shows that an additional access to the actual Miles Canyon and its suspension bridge has more recently been improved, and that the railway track was still in place in 2009. In 1984, I made letter and phone contact with a federal government official in Ottawa, about a question: “**What is needed for the railway crossing on Miles Canyon Road, close its intersection with to the Alaska Highway?**” Seeing my previous involvement with railway crossings, I thought that we had to do at least **something** to improve it (although trains were not running at that time); Mr. Ken Steele of White Pass & Yukon Railway also thought so and had suggested that I contact a certain **Mr. Lindsay Morris, P.Eng.**, who (ten years later) became my joint venture partner for some of my **Grassroots Consulting Services’** projects. Lindsay’s phoned suggestion (on behalf of the Federal Government!) to me was clear: “Just ignore it and build up to it; do not remove the tracks, don’t make an application to us, and do not even put anything on paper. We’ll cross that bridge when the train will be running again.” “But what then about the railway crossing signs, Mr. Morris?”, I asked, to which he replied: “**Just go and knock them over, Mr. de Raadt.**” That’s exactly what a junior technician (John Cross) and I went out to do one day, and did. Nobody even seemed to notice. ...



WP&YR crossing on Miles Canyon Road.

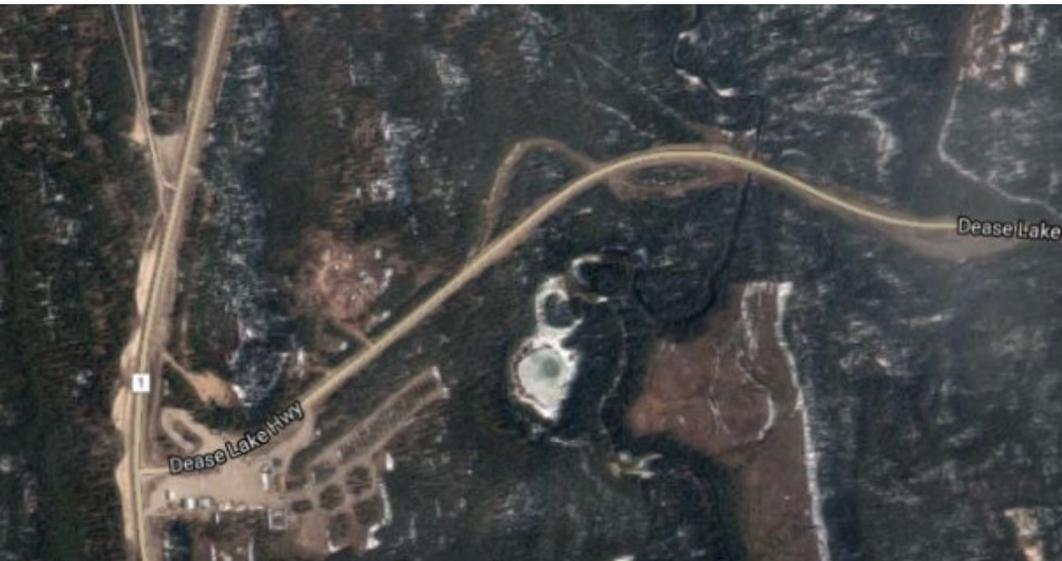
When I came to Yukon, **John Cross** was a fairly newly hired Engineering Tech I, who he had been surveying as a “casual” survey employee for a few years. He prepared the Miles Canyon Road plan-profile drawings, and was quite proud of that. His wife (who was a nurse) once visited the office and he showed her the mylar. His older brother Bernie was still a casual, but out-stayed John in Yukon by many years. John left YTG and went to work for Cewe Contracting in Nanaimo, BC, climbing the corporate ladder with them. During the early 1990’s, Lydia and I visited John and Barbara once at their home on **Littlejohn Road**. In Whitehorse, they had lived in Takhini Mobile Home Park, and more than once every winter, John had to go home and crawl under the single wide trailer, to thaw out frozen water pipes. Bernie and his family lived in Northland MHP; did such problems also exist there?

A Miles Canyon Road **clearing contract**, from the seaplane dock on Schwatka Lake, north of Mr. & Mrs. Moe Grant’s cabin, was documented, and a contract was awarded to a Contractor who stopped work when the work was only half-done, and actually **defaulted**. I do not remember how we resolved that rare situation; it is always sad to see such cases. There were no problems with the earthwork contract. nor with other contracts in those days.

The other Engineering Tech I under my direct supervision in late 1983 was **Stuart Drummond**, a son of the lady who had interviewed me in August 1983. Like John, he had been a casual employee, before being hired as a full-

time employee. In February 2019, I discovered that he had outlasted every-body else at YTG and was still there. I would need to be prompted to remind myself on which design projects he worked under my supervision, because I really do not remember, except that he was a conscientious and pleasant employee. One thing that I do know is that after the June 1987 WACHO Conference in Yellowknife NWT, where the Opening General Session has been opened by a Guest Speaker called **Dr. R.B. Tabler**, the world-renowned expert on snow fences, Stuart was allowed to take a course with him in Laramie, Wyoming in that specific (and appropriate for Yukon) “engineering” topic. I really trust that through the years, he made use of what he learnt there.

Before I arrived in Whitehorse, **Walt Gutowski, P.Eng.** (assisted by a survey crew and a technician) had already done much of the design and documentation of a realignment on the short section of BC’s **Highway 37**, (called the



Dease Lake Highway in BC but the Cassiar Highway in Yukon) that runs south from the Alaska Highway to the 60th parallel, starting a few kilometres west of Watson Lake. On this highway was a rickety timber bridge over Albert Creek that drains west. The project’s purpose was to straighten a road section and install a new large multi-plate culvert, without interfering with the timber structure itself, so that traffic could be maintained during construction and the bridge later be demolished when no longer needed. This project was advertised, awarded

and built during 1984, The structure (culvert) included sections of vertical sheet wall; these had to be tied back with steel cables to creosoted timber posts, and this containment of material was the typical way to shorten the actual multi-plate culvert lengths and reduce the costs. ▲ The middle of this current GoogleMaps image shows the very logical relocation of the Cassiar Highway, and although one cannot see Albert Creek itself due to the undergrowth; the GoogleMaps ▼ streetscape image (2009) shows its highway sign and some more clearing on the right side (= west, downstream) than on the other side. This highway is now numbered **YT-37**, Google calls it the Dease Lake Highway, (because Cassiar is no more) and it has a vertical crest curve at the Provincial/Territorial boundary. During the final design stage, I liaised with the BC Ministry of Highways in Victoria, (Richard James?) asking them (by fax) if they perhaps had a (preliminary) design at the common point. They had one, and faxed us

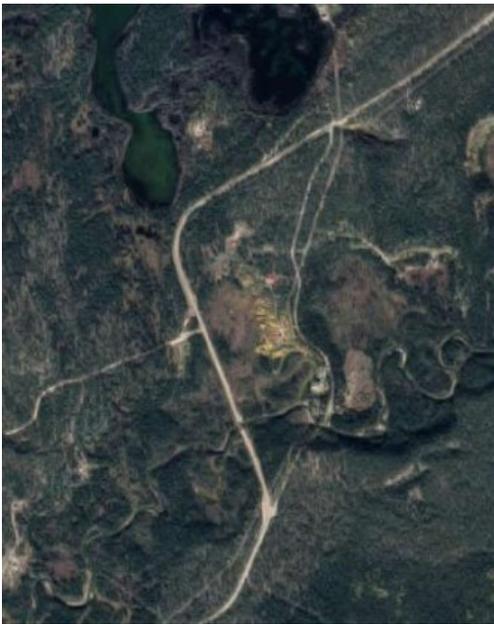


a copy! During the summer of 1986, when **EXPO 86** ran in Vancouver and the Government of Yukon pavillion featured a ¾ **scale version of the Yukon Queen**, (now hanging in the Museum in Whitehorse, see below), we joked that our **vertical curve adjustment** at exactly 60 degrees north of the equator (the line between BC and Yukon) on **this particular project had been Yukon’s contribution to that World Fair !**

The Albert Creek culvert design was typical for Yukon; it had also been used for three other major drainage structures on the **South Canol Road No. 6**, at **Rose River # 2**, **Sidney Creek** and **Rose River # 5**. Some of these multi-plate structures had actually been washed out, **not once, but twice**. These sites were north of Quiet Lake, where a Maintenance Camp (and we called them “Grader Stations”) existed, for summer maintenance only. The

whole South Canol Road was closed in winter; Brad Taylor suggested that we go out and have a look (in December 1983) but Wally vetoed it. After the first wash out, (year unknown) new material had already been ordered out of Ontario, **(to be installed by contract)** in the summer of 1983, the steel was way down the river once again! For the second time, lots of **replacement parts** were already on order in the winter of 1983/84. **See below for more.**

The **Annie Lake Road** project also came to us in 1984. A company called Mount Skookum Gold planned a mine in that area, and I visited **Mr. Peter Percival, P.Eng.** in his office trailer at the mine site. He had worked for Whitehorse Copper Mine before their closure, and his family lived somewhere close, south of town. We agreed (and so did YTG) that it was not possible to use an existing rickety timber bridge across the Watson River, as there were some residences in that area. I drew up a sketch for a proposed road realignment that would cross the Watson River about 200m further upstream. This obviously needed public input, and I had to get the residents' approval before anything else. And one evening in June, **Mr. Dan Lang**, a seasoned PC MLA already (but now Senator) sat down with me in the very crowded living room of one of the houses near the existing bridge. Everybody who came left quite happy – they would then be able to remove the sign “Slow children ahead” (!) Then I needed a bridge; the flow ruled out a multi-plate culvert. By that time, I had heard the story of the Robert Campbell Bridge downtown, of which one of the piers had collapsed one winter, so that it had to be torn down and a new bridge was built soon, (while traffic was diverted over Yukon Electric's dam!) The old bridge's steel was all stored in Highway Maintenance's Yard, together with a pile of huge round (and thick) multi-plate culverts that YTG had picked up at an auction – see below. So why not use the steel of one bridge span (trusses like Crooked Creek Bridge, plus floor beams) of the old Robert Campbell Bridge, and modify it to fit with a new steel grate deck, guardrails and concrete abutments? PWC's **Mr. Eric Gibson, P.Eng.** was found willing to design it, and this is exactly what was built during 1985, with only minor modifications to the steel floor beams for width adjustment, and a coat of paint.



Realignment of Annie Lake Road
across the Watson River.

The earthworks contract was awarded in 1985 for a length of about 10 km, starting from the South Klondike Highway. Near its (southwest) project limit was a substantial embankment and an old shell of a pre-WWII automobile close by, which had lain there for ages. That is where I instructed the Contractor to haul the junk into the road and just pound on it with a packer, and cover it with about two metres of dirt, instead of hauling it to the Whitehorse Dump, where there were a lot of them already⁴. The next year, Mount Skookum Gold applied for an extension (under the tote road program?) toward Annie Lake, which design in my view was not “up to snuff” with the first section, though in some tougher terrain adjacent to the Watson River, but remaining south of it up to the mine site, accessed by a timber bridge. By that time, the mining company had already changed its mind: Originally, they were going to mill the rock “on site”, then they decided to haul the ore out to Whitehorse, (or was it the other way around?) and just after the second section of Annie Lake Road had been constructed, **lo and behold**, it was somehow discovered that the original ore tests had been quite wrong, that there was **no viability at all** for a gold mine. Peter Percival then joined YTG on a permanent basis; he already worked for Robin in February 1985.

(The Whitehorse Star, **August 2, 1988: The Skukum mine closes.**)

In July 2009, GoogleMaps did not even “streetscape” this road, and it had not (yet) been BST'ed. **Will it ever be improved?** Note also the railway crossing over the WPYR railway in the background (where their pipeline also runs)⁵. Is Annie Lake a tourist attraction?⁶ It is now the Mount Lorne Hamlet, not quite a municipality.

⁴ This dump had a magnificent view; in the 1980's, a contractor crushed and hauled out the large pile of WWII vehicles.

⁵ Somebody once punched a hole in this pipe and stole the gasoline that came to Whitehorse. The culprit was never found.



Entrance to Annie Lake Road from the Klondike Highway.

I had no project on the South Klondike Highway; that was Robin Walsh's bailiwick. There were no secondary roads in that area, but I later checked some squatter legitimization sites and "Ag. Aps." south of Whitehorse. As a family, we once drove up a high mountain south of Carcross to pick blueberries, and had a magnificent view. We also visited the Percival family once, for a Christmas party at their home south of this point on the ◀ South Klondike Highway. One had to cross the tracks at a private level crossing. No trains ran at that time, but on the day of my job interview, railway cars still stood empty across from the McBride Museum.

Readers of an August 2020 draft have suggested that I insert a **single page (or two?)** about **our family life and church affiliation(s) in Whitehorse**. I'll try to be brief, for now. **Theo** arrived at Grade 10 of F.H. Collins Secondary School, after four months in the International Baccalaureate (IB) program at Western Memorial Secondary School in Calgary. These changes (no I.B. program at all!) affected him very seriously. **Plonia** fitted in much better at Grade 10 of the one-year old Porter Creek Junior High School, making friends (also with music), and **Sara** and **Joss** were at Grades 6 and 5 respectively at Jack Hulland Elementary School in Porter Creek. **Lydia's** progressively more hours per week (first by being "on call" and then as a "half-time" employee) at Whitehorse Public Library were quite acceptable to her; she later sometimes acted as Manager when Mrs. Faye Deer went on vacation. During our house-seeking trip, we had met **Al and Margriet Aasman**, a couple with young children (Zeke, Nathan and Emily) who lived in a self-built house in Wolf Creek. Al's cousin was Cathy Scholtens, whom we knew closely from the Canadian Reformed Church at Calgary. They attended **Riverdale Baptist Church** (near where we lived in November 1983) and on our arrival, we accompanied them to church for a while. That congregation had no pastor at the time; the elders (e.g. Mathes and Klassen) preached and lead Bible Studies. After some time, we dis-covered very "Arminian" thinking (= free will teaching) among the congregants; this was not to our liking at all, and we decided to change and attend **Whitehorse United Church** instead. We were (still) under the impression that the preaching by **Rev. Don Scott** might be more sound and scriptural!⁷

We kept contact, however, with some at Riverdale Baptist Church like John Russell, the sign painter; Plonia became a piano student of Mrs. Laverna Armstrong, and I was soon on the Whitehorse Transit Commission with her husband Bob (see below). On Sunday evenings, as a family, we read **ronoed sermons** by Canadian Reformed ministers, mailed to us from Abbotsford and Smithers, BC, and we sometimes had guests coming over to listen. We had letter contact with our fellow believers in Calgary, reading e.g. that Alberta's economy was doing quite poorly; at least five families (like Harry and Minnie Mans and children) returned to Ontario, and the congregation could not afford to call someone to replace Rev. Dick de Jong. Elders Gerrit Bikker and Jack Scholtens read the sermons there; the former had been laid off by Monenco and (after a while) got a job at Canadian Western Natural Gas. During the early nineties, that family returned to the Netherlands, as well as the Ramaker family. My colleague John Moelich was transferred to Toronto by Spantec, a division of UMA; he and Priscilla and their children later lived in Oakville, Ontario, starting Sims Moelich Associates. Many other Calgarians also returned "east" where they had come from as framers and plumbers during Alberta's boom days.

At Whitehorse United Church, I was asked to prepare outlines for the upper classes of Sunday School, namely Junior High School children (like Sara and Joss). I developed some a lessons based on Part I of my Afrikaans guide on the Heidelberg Catechism, (typing them out on my Commodore 64 computer + Roland dot matrix ink printer), and submitted it all to the Board. "Make it more simple, please" was the response, and I complied, so that this was all accepted, and I taught for one term. It was held in a room opposite the entry foyer of the church building. **Mr. Dick Arnold** was the church organist, and we appreciated Rev. Scott's sermons; he and his wife also lived around the corner on Bamboo Crescent, next to **Mr. Ralph Shopland**, one of the elders (see below). Al and Margriet also came to attend Whitehorse United Church with us; Al's brother Richard studied at the Hamilton Theological School at the time, and he visited Whitehorse one summer. We listened

⁶ Mr. Moe Grant, the manager of Whitehorse Motors, told me once that it was on Annie Lake that he had lost both his legs due to frostbite after an aircraft crash in winter. He could walk quite well with his prostheses.

⁷ Not that we had ever attended a United Church service in Calgary. Our knowledge was anecdotal and church-historical.

to United Church theological students' preaching during the summer months. The first summer there, a male student had a dramatic sermon about the Israelites crossing the Reed Sea (Exodus 14) which started out with what he remembered from visiting the set for the movie at Universal Studios. It was quite realistic! The second summer, a female student pastor had a "sermon" based on "clowning", less satisfying to us, and less scriptural. A representative of the Canadian Bible Society came to give an update on what the CBS was about, preaching the sermon. Sadly, it was during that visiting preacher's sermon that it became impossible for Lydia and me to continue listening: It was a "tirade" against the supposed atrocities of the South African government! During the sermon, we suddenly stood up and left the building, never to return. Rev. Scott visited us at home afterwards, but we explained to him that this was not acceptable according to us, as (a) we knew too much of the other side of the argument, it was (b) it was not in agreement with God's Word, and was (c) untrue.

(**Anti-South African sentiments** in Canada were rampant in those days, led by the Liberal Governments of Pierre Trudeau and then John Turner in Ottawa, exhibiting itself in boycotts of South African wines (by the Yukon Liquor Control Board) and Air Canada (refusing to book any airfare that included South African Airways). On more than several occasions, we were identified with the violence and emergency situations in South Africa, as if we had actually caused them to happen. We regularly received literature from the South African Embassy in Ottawa, where Mr. Glen Babb was doing his very utmost to meet Saskatchewan Indian Chiefs and brought alternative information to the Canadian media, most of whom did not even want to listen or print it. The takeover by the Conservative government of Brian Mulroney after the General Election of 17 September 1984 had no favourable effect on that foreign policy detail. This **bracketed note** is added as an indication of how strangely difficult it became for us, by small little steps, to live in Whitehorse as government employees and their children.)

We then "shopped around" by visiting services at Hillcrest Bible Chapel; Whitehorse Evangelical Lutheran Church (where Mark and Nora Hambridge attended); the Church of the Nazarene in Porter Creek; a small downtown fellowship hall (where the leader was a placer miner who applied for a tote road, but later became embroiled in a scandal); a small Southern Baptist Church in Porter Creek (whose pastor came to our house and we had an in-depth argument about some important point of doctrine - on which we disagreed); and a Salvation Army hall on 4th Avenue in downtown (where we first heard the beautiful term "the evangelical **BUT**" which was to our liking). We discovered a light blue boarded up Presbyterian Church in downtown, and learned that its members had (on abandonment of that congregation) all joined the Lutherans.⁸ But **Whitehorse Baptist Church** on 2nd Avenue is where we remained attending until the day that we left Yukon, hearing God's Word preached, and striking a good relationship with pastor **Ted Fiedler** (who told us up-front that he was "**a five point Calvinist**") and his wife and others like **Mr. Doug Jensen**, a part-time City of Whitehorse firefighter who also ran a Christian bookstore on 2nd Avenue with his spouse. We almost fully participated in church events like Bible Studies, "special music", the innovative "dinner for six" system, and picnics at Marsh Lake), but did not become members in this congregation that had fairly recently affiliated itself with the Fellowship Baptists. By doing that, they had shaken off the yoke of their original founding principles from 1945, when the congregation had been established with lots of people in uniform: (and also founding a residential school along the way?) Pastor Ted Fiedler has basically asked them "**that's not what we believe any longer, correct?**" And when some answers were given "No, not really", he had prodded more, and the members of the congregation had concluded to give up their "independent Baptist" status, in order to bind themselves to what the **Fellowship Baptist Conference** (as a denomination) stands for.

Particularly during the last year of our sojourn in Whitehorse, when things deteriorated although I still enjoyed the mental challenges of my heavy work load (**see below**) we received much moral support from these dear brothers and sisters in Christ. We kept contact with the Fiedlers, first in Nanaimo and then in Langley, BC, until they moved to Indio, CA, USA.

We also did some family travel around Yukon. Not much, seeing our experience at Fireside, BC, and our Matador's transmission problem. We soon explored the vicinity with day trips to Long Lake, Canyon City and the Miles Canyon footbridge. We visited the **Blackmans** one Sunday afternoon and the **Aasmans** in Wolf Creek and the **Sokalski** family in McPherson, whose son was in Theo's class. In May 1984, the South Klondike Highway opened for traffic after the winter's closure, and like many Whitehorse residents, we drove down. We found the octagonal Presbyterian Church in downtown Skagway. Going down into Alaska, we stopped on their newly reconstructed section of highway and noticed the unused railway line on the opposite side of the valley. At home, we still had snow on the ground, (and high snowbanks existed on White Pass), but in Skagway, the rhubarb was already growing around Victoria Day weekend in May. No wonder that we visited Skagway and its direct vicinity at least once or twice a year, at all the seasons of the year, though not really the tourist shops.

⁸ We never attended an Anglican or Roman Catholic service, but I attended a funeral of a YTG employee in each building.



◀ Viewpoint on the downhill past of the Klondike Highway, Skagway, Alaska. WP&YR track just visible on other side of the valley.

Pullen Creek Park, within the City of Skagway, Alaska, May 1984. ▶ Seeing some green on the ground was of great comfort to us, because in Whitehorse; that morning, we still had snow in our backyard.



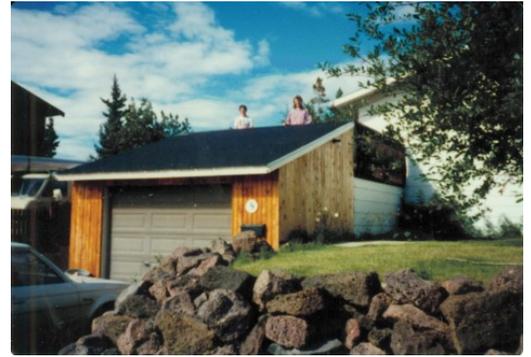
My cousin Jacqueline van Kooten visited us in the summer of 1984. We made a circle drive through Skagway, Haines and Haines Junction, camping along the way, and visiting the Headquarters of Kluane National Park at the latter town. We also toured the S.S. Klondike with her (photo below left), and attended an environmental and fire fighting demonstration on Grey Mountain Road. Lydia's parents came in 1985, (photo below right) and we drove down to Skagway only, and around Whitehorse. We also had a visit from W. van der Kamp, an older cousin of Marlene Sanderse whom we had known in Calgary. He was a musician and later sent us two cassettes of flute music played by a young girl from the Netherlands, called Berdien Stenberg. These likely prompted Plonia to keep on studying as flautist, taking lessons from **Bonnie Jones** on Evergreen Crescent and playing in school bands, (like Canada Day at the SS Klondike) and in exams and competitions.



We built a garage that summer of 1985 (see photos) as we could not live without one; the very first winter, the Mathes' car had slid down our steep driveway while visiting us on a sunny Sunday afternoon. Joss and I hauled gravel from the Crestview pit with Mark and Nora's utility trailer, and a concrete mixer was borrowed from Florian. My father-in-law was quite impressed with my hammering skills!



We built a retaining wall and a concrete trailer parking stall, with a 14' wide garage and an extension of the deck on a part of it. This was obviously a family project; Lydia and the children (and even their grandparents!) helped along the way; it turned out quite satisfactorily. Our neighbour was a weather forecaster who worked 12-hour shifts; Lydia cautioned me to stop hammering at 10 p.m. when it was still light. That was easier said than done, in the land of the midnight sun! In Cal-



▲ Before the construction, during it,▲ and after it was completed. ▲



gary, we had grown vegetables on a 5m x 5m corner of the backyard, That was not considered feasible in Whitehorse due to the sand. So we decided to build a greenhouse from lumber with a steep south sloping plastic, growing a crop of carrots and beans and lettuce in brought-in topsoil, and potatoes from peels that had just been dropped in the corner. Florian and Sandra once told us not to grow vegetables in a raised bed made from creosoted railway ties (or discard-

ed guardrail posts, which I used for the front steps, next to the garage!). Outside the greenhouse, normal vegetables grew well with the long sunshine hours. However, as our garden was entirely on the north side of the house, the growing season was quite short; there was only a single crop.

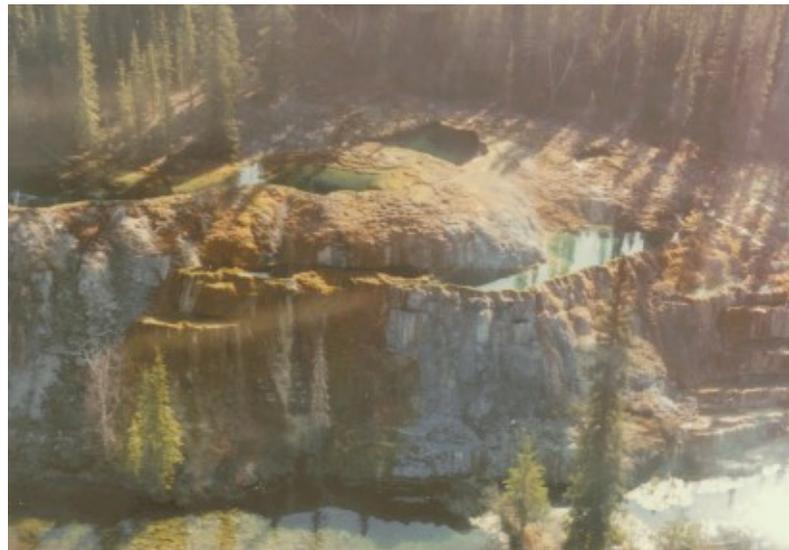


9

In May 1984, I was instructed to accompany **Mr. Perry Savoie** for an exploratory site visit to a unique **World Heritage Site** 60 km east of Watson Lake, at **Coal River Springs**. This rare phenomenon, a **cold water spring**, had been researched, and the US National Geographic Magazine had even asked why the area could be better used as a **park or campground**, accessed by a **road**, of course. We drove to Watson Lake ◀ Airport and used a helicopter from there; on the next page are two of the photos taken as we circled around the “**cold water caldera**” to find a spot to land. The Frontier pilot went with us as we bush whacked down to the emerald blue water; it was quite a sight. I felt privileged to have seen it. We flew back west, following a primitive logging road that zig-zagged right below us, to its starting point near the Contact Creek Lodge., Yukon,

This route was buildable, as also confirmed by information that DIAND had, based on the 1:250,000 series Topographical maps; a year or so later, YTG agreed to have an access road surveyed. Two crews were busy there until late October, up to where Bernie Cross coined the name **Frozen Finger Creek** to one waterway, for a very obvious reason! I had left that project to Walt Gutowski; the survey crews (and the lodge owner) had initially been quite glad about these extra employment weeks and income, until the cold struck. Design work started that same winter, but in the following spring it stopped quite suddenly. **We were told to abandon the work.** Why? Beavers had destroyed the main reason for this beautiful tourist attraction, by building a dam at the outlet of the little pond. Perry Savoie later made another trip to confirm this, and on his return made a statement that it would likely take **500 years** for the spring to return to its previous state. In this case, Canada’s national symbol (a beaver)

⁹ This photo was taken at Watson Lake Airport in May 1984. (I once flew “outside” with a Boeing 737 via Watson Lake.)



destroyed the environment, and this was probably not the first occasion, but one of many. Thinking about it after so many years, I am pretty sure than **no more than a dozen Yukoners** have ever seen that site, or were even made aware of it, **then and now**. I am grateful that I had that opportunity, one of several, to **very unexpected places of “work”**. Here follows another unexpected situation:



One day in 1984 as well, I was requested to see Mr. Larry Blackman in his office, and there I met Mr. Kurt Koken, the (bachelor) Assistant Deputy Minister, who had come from Germany a long time ago. They gave me a file (**obviously with red tape around it**) about the complaint by a Mr. Kinratyschin (?) requesting me to sort out this matter. It had been ignored for a while; perhaps this was trying out my skills in “**human relations**”. This older single man, Mr. K, lived in a small cabin in Carmacks, directly north of the Carmacks Hotel, which was owned by Howard Tracey, MLA of that riding. This politician had somehow been successful in blocking Mr. K’s front access to his

property, because he wanted to have better access to his hotel, as well as vehicle parking for the bar. “Highways” had actually installed a W-beam barrier from the corner of the hotel building **along the whole frontage of Mr. K’s property**, leaving him with access from the back lane only. **Discrimination, eh? In Canada?** Mr. K’s correspondence to YTG only mentioned “maltreatment” (for lack of a better word.) and how this possibly could have happened. Did he not have some access rights to his property from the front lot line? I researched this issue thoroughly, according to the provisions of the Yukon Highway Act, etc., and concluded in writing (to the file):

(1) that this W-beam guardrail should not have been placed there at first, and also ... (2) that it had to come down.

So the file with my report went back to the A/DM’s office across town, but sadly ... **nothing had yet been done when I left YTG employment four and a half years later**¹⁰. What others had failed to do before my time, I suggested to be addressed properly, and after that, it became clear that there was **no political will to correct some obvious wrong**. I once sat with Mr. K. in his cabin (accessed from the rear), and he just cried his heart out: **“You’re only a D.P.”, I have been told. Can I help that? Please tell me, what have I done wrong?**” I had not heard the term for “**Displaced Person**” at all before that year (1985), as it was unknown in South Africa, where assets of Axis country citizens, “taken care of during WWII”, had been returned to their rightful owners after 1945. I felt extremely sorry for him. This was clearly a case of **collateral damage** from WWII, or even of “**political discrimination**.” What I see ▲ on GoogleMaps, makes me think of king Ahab and Naboth’s vineyard in **I Kings 21**, or of the apostle Paul’ case when tried by the Roman governor Felix in **Acts 24**. This **north extension** of the

¹⁰ I mean by November 1988, when I last went to Carmacks, **campaigning** and on my way to Dawson City for a debate.

Carmacks Hotel was where Mr. Kinratyshin’s cabin existed; beside it (to the right on the image) was a vacant lot. If that is what the adage “**Power tends to corrupt; absolute power corrupts absolutely**” means, Lord Acton was spot on. Over the next forty years, I have seen similar “government wrongdoings” on all levels of governance in the public and private spheres, which saddens me and makes me quite critical of anything that smells like **money**.

In **January 1984** already, Mr. Blackman had nominated me to represent Yukon on a **Pavements Advisory Committee** of the Vehicle Weights and Dimensions Study, a national (= federal, provincial and territorial) RTAC project – to eliminate the variety of inconsistencies between the provinces’ regulations about vehicle weights, axle loadings and configurations, lengths and widths, also considering what happened in the USA. (This was before “free trade”, which became **the single** November 1988 federal election issue.) The political decision for this study had just been made, and it eventually led to the “Fredericton Accord” (where it was signed in 1988). I saw this committee work as a privilege, and took it seriously. A lot of air travel was involved, the Committee met about once every two months, in one of the provincial capitals, and I normally had to fly via Vancouver. It was not fun to return to my office and see the piles of paper files heaped on my desk, almost everybody asking for my attention, and being asked if I had had a good time! The Committee worked under the auspices of a Technical Steering Committee, who retained contracted expert consultants for research aspects that had nothing to do with pavement. But so I saw parts of Canada I had not seen before, particularly various boardrooms in major hotels for two long days. My first meeting was in late **February 1984**, in Toronto (where I had never been). Lydia accompanied me once to Victoria, and I went by myself to Charlottetown, Halifax, Montreal, Toronto, Winnipeg, Regina and Edmonton, but not to Fredericton, St. John’s (Newfoundland) or Ottawa. After 1986 when the “study” had been completed, I was asked to continue as Yukon’s representative on the Implementation Planning Subcommittee.

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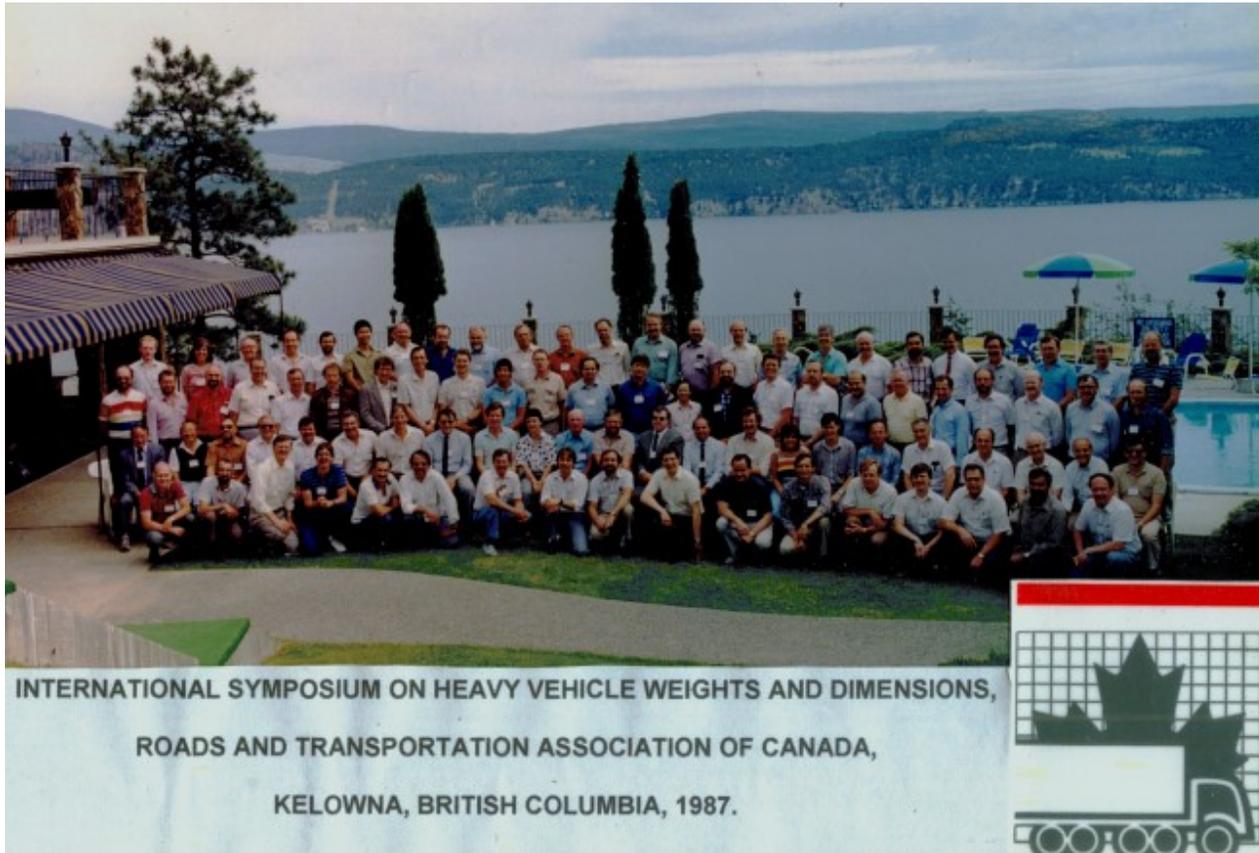
One of the VWD committee meetings coincided with the **International Symposium on Heavy Vehicle Weights and Dimensions** Conference, held from 8 to 13 June 1987 at Kelowna, British Columbia. This was attended by 125 delegates from 16 different countries, with 10 sessions and workshops. The symposium venue was not in the City of Kelowna itself, but at a fairly new CP Hotels resort on Westside Road across Okanagan Lake, now called Lake Okanagan Resort. Jim Symington, a colleague who dealt with licensing and permitting, but left Yukon a year or so later for the BC MoTH in Victoria, also attended. During one of the presentations, a bulb blew in the slide projector used by the speaker, and very soon, a few helping hands tried to solve the problem. No wonder that it did not take long before somebody in the back of the room asked: “**How many PhD’s from MIT does it take to fix a light bulb?**” Prior to the full week of meetings, on my way from Kelowna Airport, I conducted a Tender Review meeting with Rod Adams from Nuway Construction Ltd., a firm based in Lacombe, Alberta. This business was the low tenderer on a crushing project, the work was “urgently required” for BST, and it had not been possible to schedule this meeting before the Symposium. Dave Parfitt, who generally joined such meetings, had agreed to

the unusual situation, as Nuway had already become a reputable & dependable firm. After writing the Minutes of the tender review meeting, I typed them up at the resort's front desk, and then asked the staff to fax them to Whitehorse. This was one of the many gravel crushing contracts awarded to Nuway. There were situations where every tender opening has one or other "Highways" project. I did not always attend these formal openings which were held in the YTG Building and not in the Lynn Building. After checking certain legal requirements, Dave Parfitt would ask me to come and pick up the papers.

Above ▲ and on the **next pages** appear the **Table of Contents** parts of the "Proceedings" of that Symposium. Unlike most other conferences of any kind, there were no split sessions; Jim and I listened to all the experts. During free time, I had interesting discussions with Dr. Matti Huhtala, the Finnish delegate¹¹, with whom I kept up contact by mail for a few years, and also with a Mr. Addis from the British TRRL in Crowthorne, Berkshire, England. Remembering what had been accomplished at the TRRI of the CSIR, I was particularly intrigued with the **British way of doing research**: They had built a semi-permanent steel building over the test site, prepared a series of sections of base course, each with different thicknesses and physical characteristics, and then had an electric motor actuated beam with a single wheel (with a standard load) running to and fro over all those sections for a certain number (a few million) of passes. I organized to visit the laboratory, which we did toward the end of that August, during our annual vacation "outside".¹² I liked this innovative approach to study dynamic deflections due to repeated standard wheel loads. (See the title of the TRRI paper at **page 55** in the excerpt above.)

My position (in a white shirt) is in the second row from the rear, in front of somebody with a dark blue shirt in the back row. Next to me stands dr. Christison, also in a white shirt.

Jim Symington's back row position (in a light blue shirt) is almost directly behind the **only lady in the photo** (in a red striped shirt). In 2021, I find this strange to mention, but very few women followed an engineering career.



¹¹ He later taught at the University of Gothenburg in Sweden.

¹² "Outside" is a typical Yukon word; it not only means leaving a house or an office, but also "leaving Yukon", and more particularly, using the annual amount of "Northern Allowance" (YTG's vacation pay, one might consider it) for return airfare to either Vancouver or Edmonton, not for the employee alone, but for each person in the household. We used it every year: In **1985** we went to the Lower Mainland, in **1986** we went overseas and in **1987** to BC again. In late August **1988**, we took Northern Allowance money to drive Plonia to Edmonton – the other children had no vacation and worked very hard at home.

Mr. Blackman had presented my name to RTAC as Yukon's representative on the VWD study, with the title "**Program Manager**". He still believed at the time (spring 1984) that I had been hired as a "managerial" employee and not as a "bargaining unit" employee. This **title** was printed on all the documentation (agendas and minutes) of meetings, RTAC press releases and the like, even the envelope with **the photo on the previous page**. I believe that the internal "**confusion**" within YTG caused much of the later problems with my **performance evaluations** and the **Job Evaluation Study**. Why? I did much more than that expected of a "Program Engineer"; I was a "**PROGRAMS ENGINEER**" in the fullest sense of the word, and a Professional Engineer as well, with appropriate training and experience to do the work. That this personal view eventually became an embarrassment to some of my superiors, **including the Yukon Public Service Commission** and their "inquisitors", is crystal clear to me now, but was not so at the time. I multi-tasked almost seamlessly between my various job functions. As an example, I (not Wally) was asked to prepare a **priority list** for future upgrading of the Secondary Road network, the job function **(2)** mentioned above. I wrote a questionnaire to all Roads Foremen, through and with Mr. Ray Magnuson and the three Superintendents, with questions about all kinds of criteria like traffic volumes, road usage (mining, hunting, tourism, and tribal use) and annual maintenance costs. The reconstruction of **Miles Canyon Road** and **Annie Lake Road** had not been previously "programmed"; subsequent projects like **Fish Lake Road**, **Dome Road** and **Freegold Road** (see below) were the result of the questionnaire, which was to the satisfaction of those in power. But sadly, I do not know how long YTG stuck to this "upgrading program".

Likewise, brush clearing on these Secondary Roads was in those days done on a fairly regular basis. The various Roads Foremen were to hire locals to do this in winter, but I (not Wally) was asked to go and inspect if the work was done in the right locations, because of some future anticipated alignment improvements. **I sometimes felt like a consultant for Highway Maintenance!** One project comes to mind, on the Pelly Ranch Road, running west from the north abutment of the Pelly River Bridge. Quite some money was spent there in the spring of 1985, just before the Territorial Election, but **just after polling day, the work was suddenly stopped**. Mr. Wes Buyck told me this; **I'm not sure if it had helped a specific political party.**¹³

Another example of my (initially presumed) "**managerial**" function was the weekly reading of the departmental "reading file" (with a request to pass it on quickly!) to which Mr. Blackman had given me the privilege. But **in the fall of 1988** (when things were really souring), **I was suddenly denied to see those files**. I have reason to believe that I had already unofficially been "**demoted**" at that time, partly as a result of the Job Evaluation Study.

But let us return to my participation in RTAC's Heavy Vehicles Weights and Dimensions Study. On a previous occasion, I had already made work-related use of a trip "outside", namely with my attendance to the **Annual Meeting of ITE District No 7** in Calgary, 2 - 5 June 1985. Under the terms of the agreement of the RTAC study, Alberta Transportation was conducting standardized load tests on "their" structural road designs, and one site was on **Highway 21 north of Three Hills**. As similar tests were done in **six provinces** (but not in Yukon, NWT, Newfoundland, Saskatchewan, Manitoba and PEI), the Committee suggested that I make a side trip to visit the Alberta site and report to them what I thought about the work, and not only the views of Mr. Keith Walker (who was the Executive Director of the Alberta Motor Transport Board) or Mr. Bob Houston, AT's Transport Engineer¹⁴. These two gentlemen were both from Red Deer, an indication how the Alberta Government (at that time) still tried to decentralize services away from the provincial capital. Going by rental car, I spent about half a day at the test site, where a specially built truck (with varying axle configurations) laden with concrete lock blocks (to induce specific loads on the axles) were crossing up and then back again down the highway, driving over the specialized testing equipment embedded in the asphalt. **Dr. J.T. Christison** of the Alberta Research Council was there that day; I was satisfied that all the RTAC testing requirements were being met,¹⁵ and reported that to the next meeting. On the **next page** follows something I obtained in Yukon. Many years later, I discovered the value of having these drawings.

¹³ In British Columbia, highway resurfacing is normally done just before a Provincial Election: Your tax dollars at work!

¹⁴ After Bob Houston retired, I met him once again in Edmonton, in 1994, at the funeral of my uncle Albert Borkent.

¹⁵ On the way back to Calgary that afternoon, I dropped in to Mr. Ray Romanetz's office in Drumheller. He was then the City Manager (no longer the City Engineer) and his office was in the Old Court House on the "A" property. See "Part 3".

STATE OF ALASKA
DEPARTMENT OF TRANSPORTATION
&
PUBLIC FACILITIES

PLAN AND PROFILE
PROPOSED HIGHWAY PROJECT
F-097-2 (4) - (A - 38402)
KLONDIKE HIGHWAY - SANITORIUM
ROAD to CANADIAN BORDER
GRADING AND SURFACING,

END PROJECT NO. F-097-2(4)
"AS BUILT" 1980+86.80

BEGIN PROJECT NO. F-097-2(4)
"AS BUILT" 163+25.00

EQUATIONS	
①	201+24.50 P.T. BE - 100+24.50 P.B.T. BE.
②	204+30 P.T. BE - 10728+24.50 P.O.T. BE.
③	180+00 P.T. BE - 1800+00 P.O.T. BE.
④	207+40 P.T. BE - 20740+00 P.O.T. BE.

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9-10

6/10/01



During my VWD committee membership years, I was once asked about the design standards for the Klondike Highway from White Pass down to Skagway. From a State employee (who was a Juneau Toastmaster), I received a set of "As Built" drawings approved by their Chief, Southeast Design, on 1985-02-02. After this Title Sheet, plan-profile drawings for 11.29 miles (almost 19km) show many sharp horizontal curves and some steep grades up to 10%. The Design Speed of 40 mph (64 km/h) is shown, and also a note that the Federal Highways Administration had approved "design exceptions", shown **below left**. Design standards for a rural arterial highway (hor. and vert. curve radii as well as stopping sight distance (S.S.) could only meet a 40 m.p.h. design speed, though several advisory signs for 35 m.p.h. were also necessary at sharp curves. No BST but asphaltic concrete, and two Emergency Turnouts were also built. The interesting bridge at **William Moore Creek** existed already in those days.

YTG did not produce such nice title sheets; I found these drawings quite

- DESIGN SPEED:** 40 M.P.H. VS. 50 M.P.H. FOR RURAL ARTERIAL
- HORIZONTAL ALIGNMENT:** P.I. STA. 200+03, 1107+84-1112+28, 1126+2, 1383+63-1396+79, 1415+18-1430+00, 1497+85-1503+61
- INADEQUATE S.S. DIST.**
- ON HORIZONTAL CURVES:** P.I. STA. 183+89, 203+03, 224+61, 231+16, 260.00-280+00, 1092+95, 1090+00, 1133+00, 1294+63, 1383+63, 1392+75, 1425+84, 1457+18, 1490+00-1486+00, 1534+00, 1539+00 & 1150+00
- INADEQUATE S.S. DIST.**
- ON VERTICAL CURVES:** V.P.I. 1583+00
- INADEQUATE CLEAR ZONE BETWEEN EXISTING BACKSLOPE & EDGE T.M. 8.6 MILES ±**

EXCEPTIONS APPROVED

DIRECTOR OF DESIGN & CONSTRUCTION 12/14/84 & FHWA-12/2/84

complete with a typical section sheet. an estimate of quantities, a sheet of summary tables, a traffic control plan, a sheet with details at the U.S. Customs Station, three sheets about the State furnished materials site, and 23 plan-profile sheets. All drawings were signed, sealed and dated by a professional engineer. This was the "FWHA stipulated" way of doing things in all 50 states, because this work was federally funded and had to meet federal standards and design exceptions. Duplication exists; each state has two highways departments: The State's own department and the FHWA's "division" in that state. Only in early 2002, when working for ADOT in Phoenix, Arizona, I became competent in analyzing such

"As Built" drawings, when preparing Project Assessment Reports, AASHTO Controlling Design Criteria Reports and Design Exception Requests. Having looked at beautifully hand-drawn drawings (no longer prepared almost anywhere in the world), made my ADOT learning curve steep: I soon helped my younger colleagues with projects.

The Canada-wide problem was that every province had had its own “**structural pavement design standards**”, its own “**bridge design standards**”, and its own “**weight regulations**” for many years. Previous efforts to rationalize these had failed due to the “**RC factor**”, a.k.a. a resistance to change (as we joked). There was also pressure from the USA where a similar (?) rationalization was underway, as well as industry pressure from truck and trailer manu-facturers. We felt the idiosyncrasy of that historically explainable situation, and the insaneness of continuing it, quite severely in Yukon. It increased shipping cost for things like multi-plate CSP’s, which were made by Armco in Ontario, loaded on trucks meeting Ontario’s regulations, up to the Manitoba border. There they then had to be reloaded on another truck, so that that province’s regulations could be met. So the load proceeded up to the Saskatchewan border, where the process was (sometimes) repeated; likewise at the Alberta border and at the British Columbia border; maybe even at Watson Lake as well, as trucks entered Yukon (actually zig-zagging a few times!)

I need to mention something else, **as an aside**, although it may seem a bit “**out of place**”. In early 1987¹⁶, I was given **Project Managerial duties** for the interesting “**Takhini Area Transportation Study**” (TATS) to be prepared by a consulting engineering firm, as a **joint project of YTG (CATS) and the City of Whitehorse**. The pre-history of this had started with Mark Hambridge’s former serious concerns about access to the proposed **Mail Sorting Plant** at the top of Two Mile Hill, and the senseless “**jog**” between the Alaska Highway intersections of the 9% steep **Two Mile Hill** and the just completed **Hamilton Boulevard** – leading to the Ski Chalet and the proposed large McIntyre Neighbourhood. This boulevard had been designed and built by YTG Municipal Affairs, (when part of YTG Lands Branch, just before Mark became their Senior Planner and a while before CATS was formed). In 1984 already, I had attended a meeting with Mark about Canada Post’s proposal, and I had made some suggestions about site layout, which were implemented during its construction. (Ray Magnuson always thought that an interchange would be logical!) The City of Whitehorse completed its (first?) Official Community Plan in March, 1987 – without any formal YTG (meaning Highways or CATS) input and any representation on its Steering Committee (except Mark, who had left Yukon shortly after June 1986, on a **Downtown Plan Steering Committee**). The City Planning Development Staff had been quite “**fragmental**” or at limbo during this time, as if contract employees and new assistants could do the job. The OCP Recommendations had to be “**fleshed out**” by a **Transportation Study**, with project limits that included Range Road, the jail, the tentative site for Yukon College,

plus a road network linkage to Porter Creek. On 2 July 1987, a RSP Request under my signature shows that Jim Symington had been responsible until that date. A proposal from the Vancouver firm **Crippen Consultants** (a division of H.S. Simons Ltd.) with a Whitehorse office, (shared with UMA?) was selected from the proposals; they would do much of the work “**outside**”, I understood, with **Hamilton & Associates** as a sub-consultant. I had very pleasant dealings with **Mr. Andris Zeidaks, P.Eng.**, of Crippen and **Mr. Eanson Ho, P.Eng.**, of the firm that had been started by Graeme Hamilton from NZ. I also came to know **Mr. Paul Lee, P.Eng.**, whom I later saw in Burnaby during a presentation on buses or HOV lanes, when

Downtown Plan Steering Committee (June, 1986)	
Chairperson	John Dumas, Chamber of Commerce
Members	Marie Caron, Target Downtown Valerie Graham, Yukon Historical & Museums Association Mark Hambridge, Lands Branch, Government of Yukon Lois Hawkins, Municipal Planning Board Dave Stockdale, City Council Don Sweet, Downtown Business Association Peter Vana, City Administration
Planning Department Staff	
Ella LeGresley, Planning Technician/City Planner (April, 1981 - August, 1985)	Contract Planner (September, 1986 - March, 1987)
Peter Vana, City Planner (October, 1985 - November, 1986)	
Bill Hickman, Manager, Planning Services (February, 1987 -)	
Roza Aylwin, Planning Assistant (January, 1986 -)	

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he worked for the Greater Vancouver Regional District, which later “**morphed**” into TransLink. When the actual work was done, Mr. Ted Dillistone, P. Eng. (the second ITE member in Yukon), had left for Campbell River, BC; the City representative on the Steering Committee became **Mr. Bill Hickman**, Manager, Planning Services, who (I later learnt) was not actually a professionally “**registered planner**”. **Ms. Rosa Aylwin** is currently (2021) with the Regional District Okanagan-Similkameen.

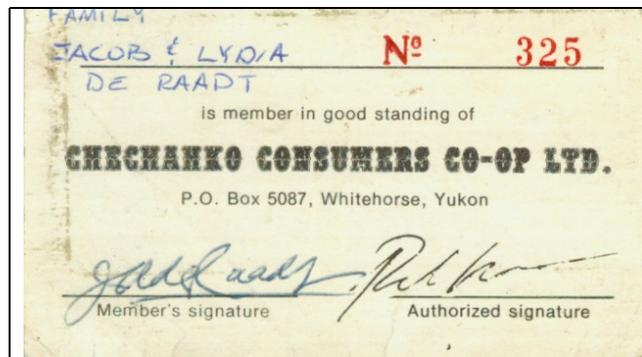
¹⁶ This date obviously means: **After Mr. Blackman had retired.**

¹⁷ From page (v) titled “**Acknowledgements**” in the City of Whitehorse OCP of March 1987, the basis of the TATS.

Back to where I left off with the VWD Study's way of solving (one of) Canada's problems with a lack of unanimity on vehicle weight, dimensions and particularly axle load limits. Yukon (and the north in TROS) had "road bans" a.k.a. "winter load reductions", and it occurred that additional shipping sometimes had to be paid if it could not be delivered to Whitehorse before these came into effect with a certain percentage of the standard load.

The "stickler" province seemed to be **Manitoba**: Their VWD committee member once told us how many years ago, during the construction of the Trans-Canada Highway (with federal funding) the Manitoba Department of Highways had almost "pleaded" the Federal Government to insist on a higher load limit for design of the bridge crossing the Red River in Winnipeg, where absolutely everything going west by road crossed, ever since the early days. "No", the reply from the feds had been; "HS25 loads and not HS30 loads." (I'm not sure about the actual numbers.)

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After Lydia and I became ▲ "family members" of **Chechahko Consumers Co-Op Ltd.**, this reality of **road bans** for living in the north also hit us personally. This group of people from Whitehorse and its rural surroundings met twice per year for ordering a variety of bulk foods from a catalogue of a supplier (CRS) on Vanness Road in Vancouver, BC. On delivery, we then had a distribution meeting (for tasting while paying). **Mrs. Gloria McPhee**, whose daughter Sarah was in our Sara's class at Jack Hulland, first got our attention to join, and after a year or so, I somehow became its President. Food was ordered to meet a specific delivery date; if late due to road bans, members had to fork out extra money. In the spring, this was quite a challenge. A few years later, an effort (politically driven?) to disband the Co-Op was successfully squashed by the members, and it still existed when we left.¹⁸ Only recently, I heard that the Co-Op was likely founded in a residence on the Annie Lake Road, or thereabouts.

¹⁸ The **Whitehorse Credit Union** had existed in Whitehorse until it closed its doors in January 1980, after 22 years in business. Chechahko Consumers Co-Op Ltd. had had an account there, and likely suffered with its demise, so it operated informally and without such "books". The suggestion to "dissolve" came from a newly elected board member – with political connections. The Co-Op food was normally good, the members were happy. Some of them had the weirdest taste: All kinds of tofu that we had never even heard of, and imagine someone buying a **25 kg bag of popcorn** every winter!

RTAC’s Project Manager for the VWD Study was **Mr. John Pearson, P.Eng.** The Technical Steering Committee was chaired by Mr. M.F. Clark, Associate Deputy Minister (Engineering), Saskatchewan Highways and Transportation, and our Pavement Advisory Committee (representing the governments of the ten provinces, two territories and some federal government departments) reported to the Technical Steering Committee. The study was “interdisciplinary”, with research on many aspects, contracted out by RTAC to researchers like the Alberta Research Council through a “**Canroad Transportation Research Corporation**”, funded by the federal government, provinces, territories and “industry”, meaning the Motor Vehicle Manufacturers Association, the Canadian Trucking Association, the Truck Trailer Manufacturers Association and the Private Motor Truck Council. Much of the research work was done by the universities and in the USA. A listing of the research elements is copied (on the **next page**) ▼ from Volume 8 – Pavement Response to Heavy Vehicles Test Program – Part 1 - Data Summary Report, the part of my (minor) involvement. This same diagram was shown in all the reports. All are now available (with what happened into this millennium!) <https://www.comt.ca/english/programs/trucking/Reports.htm> and even <https://www.comt.ca/english/programs/trucking/2019/History%20and%20the%20MOU.pdf>

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In **November 2018**, John Pearson (by then the Executive Director, Council of Ministers Secretariat), wrote a very nice PowerPoint presentation with the title: “**Harmonization of VWD Regulations in Canada**”. (I assume that this was written close to the end of his career.)

From the very beginning, one of Canada’s original provinces stood quite firm: “We cannot allow these **longer, higher, wider and heavier** vehicles, with much different axle configurations, on our highway system”, said the Province of **Prince Edward Island**, and they gave a reason, eloquently explained at first by their member on the Pavement Advisory Committee, **Mr. Michael Bailey**, (paraphrased as): “**Our ferries cannot handle them and our potato farm driveways cannot take them; neither can the ferry terminals and even the highways themselves. We may want to invoke the notwithstanding clause.**”

When the **Implementation Planning Sub-Committee** morphed out of the previous committees, and I became a member of it, this was more forcefully stated by **Mr. Tom Walker, P.Eng.**, at a meeting of the IPC in January 1987, **at Regina**, and the Committee decided that I (being a professional engineer with some geometric design experience) ask my employer (YTG) to allow me to and check out PEI’s claims, though

this was not really a pavement concern. This matter might have been addressed much earlier, but because it had been left out, now needed to be addressed. (Not many members of the RTAC committees were civil engineers.) On that occasion, I had flown via Vancouver, Calgary **and** Saskatoon to Regina, with “**excursion rates**”. The flight from Vancouver was late in Calgary, where I had to transfer to a much smaller plane that I saw next to the one I had exited from. Though I asked all the people responsible to ensure that my bags would be transferred, they did not make it to Regina, so that I had to book into the (much cheaper) Georgia Hotel. Sunday morning, after a

taxi had brought my luggage from the airport, I changed to the Regina Inn where the meeting started on Monday morning. An extra day had been authorized to meet the consultant for the “**Economic Impact Study**”, and the last night I slept again in the Georgia Hotel. Due to that situation, one leg of the return flight had to be upgraded, and guess what? An “**excursion rate**” was not available. **Oh, the joys of air travel!**)

The **Canadian Charter of Rights and Freedoms** is Part 1 of The Constitution Act, 1982. Clause 33 of 34 is shown **at right**, with the explanation as copied from page 41 of the **Christian Citizenship Guide** by Michael Wagner, published by the Association for Reformed Political Action (ARPA Canada) in 2011. **This Section 33 has only been used twice:** By Saskatchewan in 1986 and by Quebec in 1988. **Is it possible** that PEI’s “threat” of invoking Section 33 triggered the federal government into committing itself to build a bridge to Prince Edward Island, now known as the **Confederation Bridge**? I’m just asking, and would not be surprised to hear that this was the **impetus** to connect Canada’s smallest province to the rest of Canada.

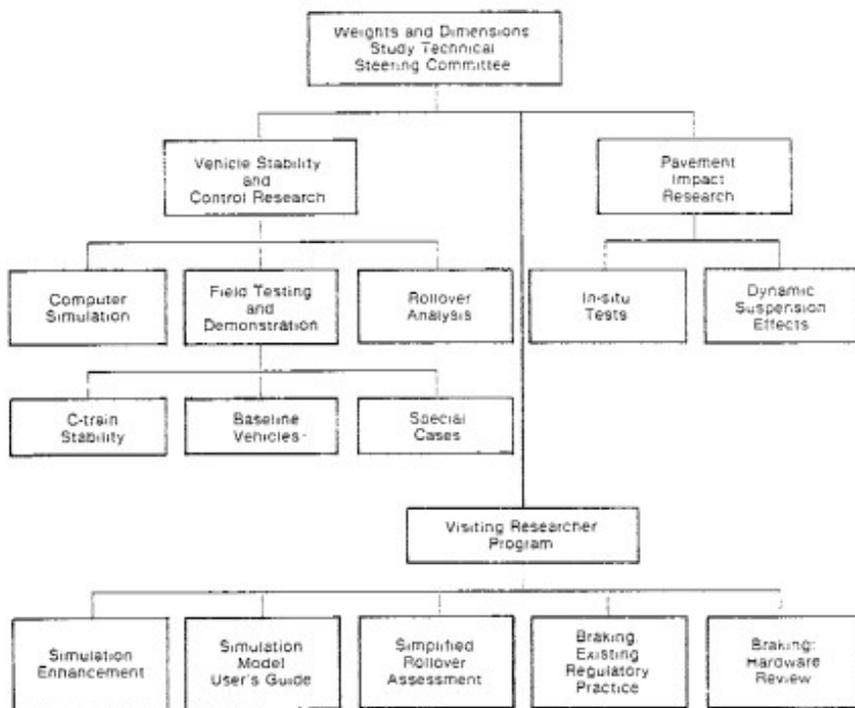
The Notwithstanding Clause

Section 33(1) of the Charter, commonly called the “notwithstanding clause” reads as follows:

33. (1) *Parliament or the legislature of a province may expressly declare in an Act of Parliament or of the legislature, as the case may be, that the Act or a provision thereof shall operate notwithstanding a provision included in section 2 or sections 7 to 15 of this Charter.*

This provision enables politicians at the federal and provincial levels to override certain parts of the Charter and therefore protect laws from judicial scrutiny. It can only be enacted for a five-year period, but it can be re-enacted every five years perpetually. The purpose of this section is to enable Parliament and the provincial legislatures to protect legislation from Charter challenges. With this power, politicians can overrule Charter-based judicial decisions that they think are wrong or bad for the country.

TECHNICAL WORK ELEMENTS OVERVIEW

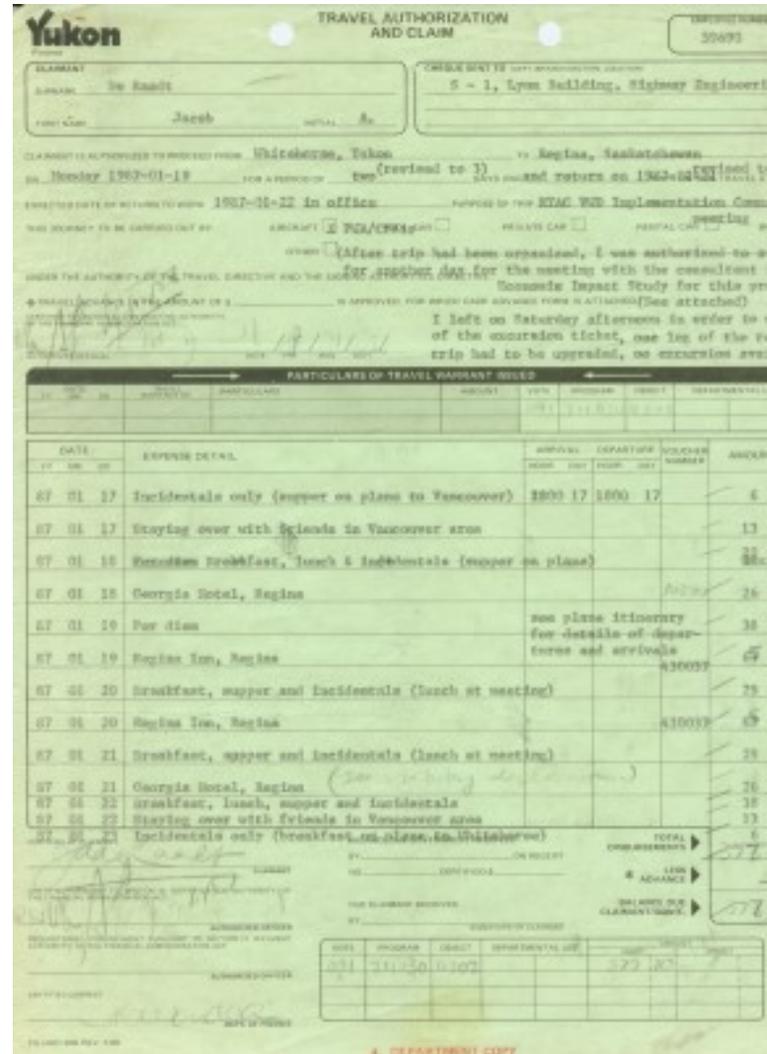
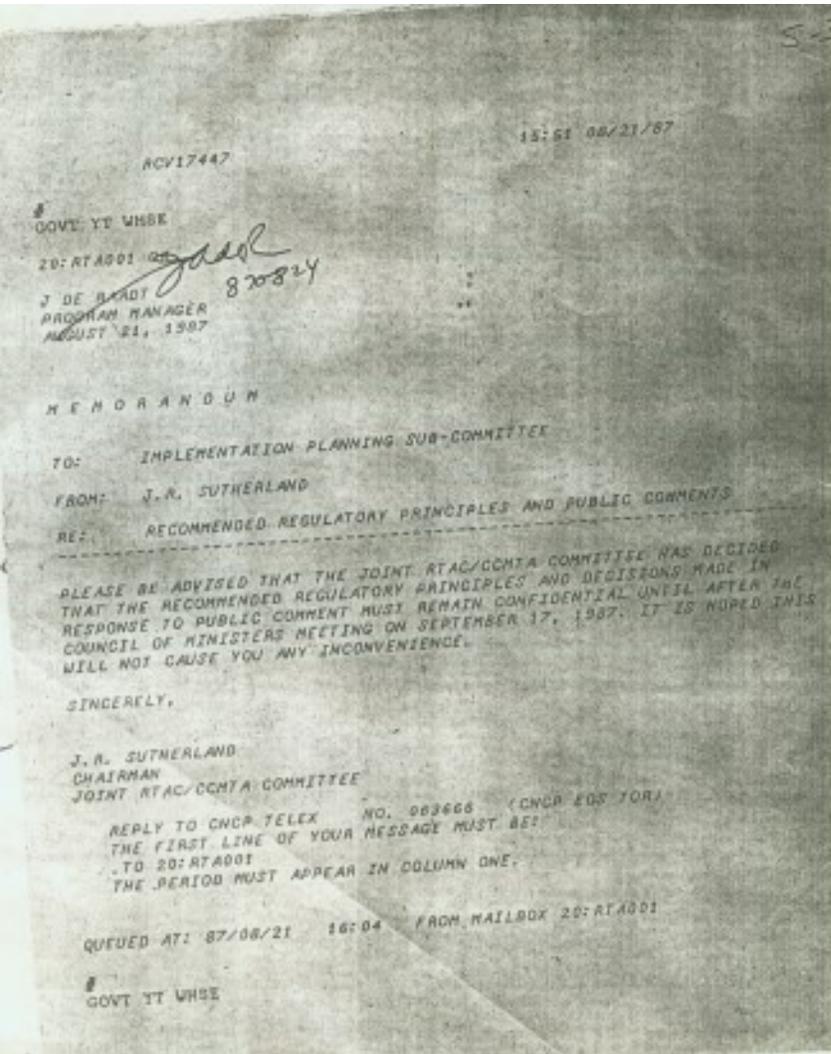


It so happened that the very next meeting of our committee would be held in Halifax **or** Charlottetown, and on 10 March 1987, it was agreed by Mr. Piers McDonald that I could fly east to Charlottetown and fly back west from Halifax, as an “**open jaw**” flight to spend some time on the Island for a “**site visit**” and verbal report to the Committee. I arrived there via Vancouver, Toronto and Montreal (nothing direct in pre-hub-and-spoke days!), and booked into the Prince Edward Hotel on Saturday afternoon 28 March. I walked over much of the downtown, seeing totally different house styles, culture, going into Confederation House and also noting the **19% Provincial Sales Tax** on most items like running shoes. On Sunday morning, Tom picked me up with my luggage, and I enjoyed a guided tour over most of the eastern half of Canada’s smallest province, crossing the Hillsborough Bridge and then east to as far as Souris, and back along the north side of an inlet known as the Hillsborough Riv-

er, and then to the Walker residence where Tom’s wife provided lunch. After that, we drove toward the ferry terminal at Borden, driving by the Lieutenant-Governor’s residence on our way. On both these trips, I was shown the many paved driveways to large potato farms. PEI’s Highway right-of-way widths are only 100 ft. wide, with power or telephone poles **in line with the fences**. Semi-trailer trucks could just make the curves into the driveways, straight up to the barns. To allow larger vehicles would obviously need a lot of reconstruction, including all those pole relocations! At the ferry terminal and on the venerable **MV John Hamilton Grey** (built in 1968, scrapped in India in 2004), I saw more limitations (for lack of a better word) of the whole PEI transportation system, as explained by Tom Walker. This vessel had first been equipped with train tracks, but Canadian National Railways had long abandoned that mode of transportation on PEI, and trucks with 48’ boxes could just fit into the hull on a single deck. (On this April trip, we almost got stuck in the Northumberland Strait ice.) Disembarking the ferry at Cape Tormentine, New Brunswick, it was only a three hour ride to the Delta Barrington in Halifax, Nova Scotia – the city where I had already been before. Our two-day meeting started on Monday morning; I was back at my desk on Thursday 2 April. (I seem to have mislaid the photos from that trip.)

I still possess some of the **orange reports** that were normally handed out at Committee Meetings, for our reading, understanding, absorption and distribution for possible YTG feedback, which I had to submit prior to the next Committee meeting. Receiving hardly any, I often felt like **working in a complete vacuum**. Why was Yukon, being at the end of the line, with direct highway access from British Columbia only, so **apathetic**?

Unexpectedly, on **24 August 1987**, I received a Telex ▼ sent on **21 August 1987** by the Chairman of the Joint RTAC/CCMTA Committee, to me (as a member of the **Implementation Planning Sub-Committee**, with this message: **“Please be advised that the Joint RTAC/ CCMTA Committee has decided that the recommended regulatory principles and decisions made in response to public comment must remain confidential until after the Council of Ministers meeting on September 17, 1987. It is hoped this will not cause you any inconvenience.”** “What now?”, I thought, “something has definitely gone wrong! Yukon had no comments!”



Mr. Jack Sutherland’s telex of 21 August 1987. My Travel Authorization and Claim form, January 1987.¹⁹

I directly wrote a note ▼ (**next page**) to Robin Walsh (then Acting Director, Highway Engineering), copied – as I usually did – to **Mr. Bob Iwanicki**, (Manager, Transport Services), explaining the situation in Yukon, where public comment had been **ZERO**, and all committee members had been advised ... to make an **earlier (June 1987) draft report public**. In fact, one of the two local newspapers had interviewed me and had printed an article about it. So I typed this memo (scanned in 2020 from my pink **“SENDER KEEP”** marked copy.

¹⁹ It was normally a time-consuming chore to prepare these claims on my return to the office.

SUBJECT Heavy Vehicle Weights and Dimensions: Recommended Regulatory Principles and Public Comments.

I just received the attached telex from Mr. Jack Sutherland.

While I cannot see withdrawing the few copies of the report "Recommended Regulatory Principles for Interprovincial Heavy Vehicle Weights and Dimensions - Draft - June 1987" from circulation, I presume that this request deals with the revisions of this draft, as based on the public input as received during the five public hearings.

As I have not attended any of the public hearings, nor the committee meetings in Toronto and Winnipeg (last week) I do not know what the final report will encompass. I presume that this will be sent to me in the next few weeks, however, and promise to keep the content, as well as the minutes of the Winnipeg meeting, confidential until Sept. 17, as requested.

As the next meeting of the Implementation Sub-Committee has been set for 18 September in Saskatoon, and prior travel arrangements are always advisable, I attach a travel authorization form.

Jacob

What had happened? Before attending the IPC meeting (with Lydia) in Victoria, early May, I had stated in my Outside Travel Request of 16 April 1987: **"This could be the last of a series of meetings. It appears that the work is only slightly off schedule, due to the industry consultation phase and the economic impact study, which came on stream late."** On 29 June 1987, John Pearson's fax to me arrived with the schedule of briefings across Canada that summer. I asked to attend only one of them, i.e. the one in Toronto, which would be held on 29 - 31 July while the normal IPC meeting would be on the 28th. Wally Hidinger approved my Travel Authorization Claim (to which John Pearson's fax had been attached), and he sent it on to **Mr. Terry Sewell (A/DM)**²⁰ who also signed and approved it and forwarded it to the Minister, Piers McDonald. Great was my disappointment to receive the yellow slip by Wally to John Murray²¹ with the scribbled words: **"This has been turned down ◀ by Minister. We are to monitor the meetings through the Minister."** This abruptly ended my involvement with the IPC meetings in Toronto and Winnipeg, and also the Briefings held in Regina (20 - 21 July), Vancouver (23 - 24 July), Toronto (29 - 31 July), Montreal (3 - 4 August) and Charlottetown (6 - 7 August). Note that I had received all the Agendas and Minutes, and also **the Committee's specific request that the Draft Report of June 1987 be made available to the public**, which I had done. I had done nothing wrong! Did Mr. Piers McDonald think I had?

²⁰ Previous authorizations had been given by Mr. André P. Gagnon. (Perhaps Mr. Gagnon was already on sick leave.)

²¹ See below for why John Murray became involved.

It seemed as if things were falling apart around me. But I was allowed to attend the final meeting of the Implementation Planning Sub-Committee, which coincided with RTAC's annual meeting at the Bessborough Hotel in Sas-katoon, around **18 September 1987**. All committee meetings in that province had been held in Regina, the provincial capital, where I had once taken a photo of a cute poster for Regina's transit system, in one of their downtown malls where the food court smelled like borscht. (Our meetings there were at the Regina Inn, where a huge wooden office chair stood in the lobby. That is where committee members met after the day's meetings, for a joint brisk stroll around the downtown, as far south as the beautiful park around the Saskatchewan Provincial Building, and as far north as the (not-so-pretty) part of downtown near the railway underpass. The Saskatoon RTAC meeting became the only occasion that I went further north in Saskatchewan for work purposes, and yes, the stroll along the east side of the North Saskatchewan River is also quite beautiful.



The new VWD regulations would apply to all trucking companies (like **Points North** and **Campbell Trucking**, the firm that had moved us north) but also to a particular (new) trucking company from Lynden, Washington State, that planned to operate in Yukon: **Yukon Alaska Transport Company**, a firm that would bring in large trucks for transporting lead-zinc concentrate from Faro to Skagway, Alaska. The former Cyprus Anvil mine just north of Faro was to be re-opened and operated by Curragh Resources Corp. While the concentrate had originally been taken west and south by the Campbell, Klondike and Alaska highways to MacRae, the first railway station (actually called Utah) south of Whitehorse, and then to Skagway by train, the almost completed South Klondike Highway over White Pass was now going to be used. These trucks were yellow (when clean!) and just met the new guidelines after adoption of the Fredericton Accord. YAT was going to use Western Star trucks built in Kelowna, BC, and they wanted to have a lay-over site, **somewhere** on the Alaska Highway just north of Crestview, within the City of Whitehorse. Logical reasoning, for sure, I thought. **One of my challenges became to find that site.**

At first, YAT used the McRae railway yard, but then applied to rezone land in an old gravel pit just north of Crestview, west of the Alaska Highway. (Maybe WP&YR charged them too much, or had sour grapes about YAT not using their railway!) That pit was within the City of Whitehorse, on YTG owned land, and within lands under control of the Territorial (and not the Federal) government. Access was obviously from a "Territorial Highway".



YAT truck at the temporary MacRae terminal, south of Whitehorse. The trailer contains the concentrate.



YAT truck at White Pass, South Klondike Highway, (and I guess it's running Northbound, spring 1987.

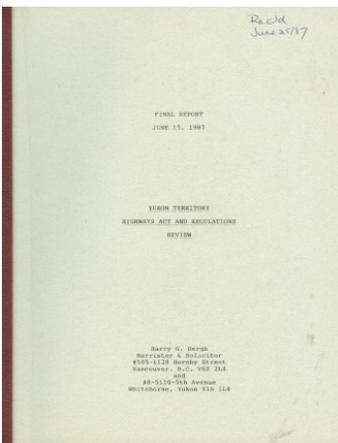


Typical YAT trucks passing on newly constructed grade of Faro Access Road, with Chester's rental truck. 1987.²²



Typical YAT truck (and an RV just behind it!) on the newly constructed grade of Faro Access Road, 1987.

The **next page** shows the Whitehorse Star report on **27 May 1986** about a Public Hearing for this zoning bylaw amendment. Under normal municipal procedures, First and Second readings had already been given by City Council. See how much opposed the Crestview residents were, and how I (uninvolved in the process, for reasons that I cannot fathom) decided to jump into the fray of things by making **certain strong transportation engineering statements** – one of which was then misquoted by Andrew Gregg (!) – see my hand-written correction. I do not remember why I even spoke up that night. Perhaps Doug Andrews (who lived in Crestview) had told me and brought me along, or the meeting had come to YTG's attention and I had been requested to attend and to speak up: Approval would need YAT's **access permit** under Section 7 (3) of the Highways Regulations, Commissioner's Order 1979/79, a regulation **that had not been used at all until that time!** See ▼ how slick YAT presented its case. And yes, a question may be asked. **What might have happened if I had not spoken with the Crestviewers? Without my verbal comments, what may perhaps have occurred with Curragh's terminal access proposal?** More importantly, during its next regular meeting, the City Council denied the bylaw amendment. YAT then applied to rezone another site, the one suggested by me, and in due course, this rezoning was approved.



Mr. Barry G. Bergh's Final Report, 15 June 1987.

Strange but very true: The Yukon Act, the Yukon Highway Ordinance (1975) and the Yukon Highways Regulations, (i.e. Commissioner's Order 1979/79), at that time had many internal inconsistency ambiguities on what many of these defined terms actually **meant**, like **'highway'**, **'territorial highway'**, **'access'**, **'public highway'** and **'roadway'**, as well as on the **'process'** to be followed to obtain an **'access permit'** and its **"application fee"** and **'form details'**. It was not known what the actual **authority** of the Commissioner was, as it had already devolved from the Federal Government over many years. Various changes in department names and responsibilities had compounded the problems, although some agencies knew very well that something was amiss. Then add to this mix of ingredients the Land Claims, and stir the pot well, like the witches' brew in Macbeth! The Territorial Lands Act and the National Parks Act could not resolve the issue either. Since the fall of ◀1986, **Mr. Barry G. Bergh**, a consulting solicitor from Vancouver, had been retained by YTG, and while interviewing staff, he had sat down with me in my office, for **a few very long hours**. (I told him much more than others did, I guess.) His Interim Report (March 1987) had already pointed out a number of issues under his general topic titled **Adjacent development and Access / Entry Control**. YYG needed to **act** on his recommendations.

²² See below for more on that project, another consequence of the re-opening of the mine at Faro.

Terminal plan rapped

By ANDREW GREGG
Star Reporter

The Yukon Alaska Transport Company has been confronted with a host of complaints even before it has sent its first concentrates truck from the Faro lead-zinc mine to Skagway.

Residents of Crestview say the firm's proposed truck terminal in their area will ruin wildlife, create noise pollution, and be dangerous to motorists.

Curraugh Resources Corp. and Yukon Alaska Transport representatives appeared before city council Monday night to give reasons why the rezoning of a gravel pit near Crestview would give them an ideal

place to build a truck terminal.

The gravel pit is now zoned open space, and there is a proposal before city council to have it rezoned as restricted service industrial.

Marv Pelley of Curraugh said the rezoning will give the company a chance to acquire the land, and that it would be a good spot for trucks en route to Skagway and those travelling back empty to Faro to stop, get cleaned off, and change drivers. There would even be facilities for refueling if necessary, though most refueling would take place in Skagway.

The drivers need to switch because the 12-hour haul between Faro and Whitehorse, and the long drive between Whitehorse and Skagway

are each the limits for drivers. Curraugh officials like the gravel pit because it's a spot drivers can pull directly off the road into.

But this plan drew the ire of several residents of the area, who complained that both noise and the danger of huge trucks turning in their neighborhood would make life miserable.

"With those trucks I would not be able to get any sleep, and neither would my three children," said Joyce Davis, a Crestview woman speaking against the rezoning of the gravel pit. "I would have to sell my house and who would buy it with those huge trucks there?"

Cont'd on P.2

Trucks

Cont'd from front

The gravel pit, in existence since the 1940s, is located just north of a turn-off into Crestview. It isn't being used officially by the city, and residents say the area around it has good ski and walking trails, and a lot of trees. They say it's really the only recreational area they have there.

And they say they can already hear traffic from the road, even the grumble from the odd tractor that may be in the pit from time to time. With the trucks, one would be pulling in once every 23 minutes or so. There would be one full truck heading south every 53 minutes, and one heading back, creating two an hour.

"Please don't tell me those trucks won't make noise," Davis told the Curraugh representatives, noting she was both "nervous and angry" about the proposed terminal. "I can hear traffic now, so you're way out of line."

Robert Grant, a spokesman for Curraugh, said he had put "over 100,000 miles on my car within the city of Whitehorse" looking for a suitable place to put the terminal. He said Whitehorse was their choice because it was an even distance both ways for the trucks to stop, it had suitable housing for the 130-150 people the terminal would employ, and the electrical, mechanical, water and communications needs would be facilitated a lot easier here than they would be in Carcross or Carmacks.

He said the Crestview spot was best because it's on the proper side of the road for loaded trucks to turn in without crossing another lane, and

it means the trucks don't have to drive down Two Mile Hill and back up it again.

"We can develop a gravel pit that's not suitable for anything else," said Grant, noting it is "desireable to be on the other side of the scales, so mud and ice can be chipped or washed off." The scales are just south of there, before the turn off to go downtown.

Jacob DeRaadt, a transport engineer with the Yukon government, said the present entrance to the pit is unsafe, because it's on a grade and a curve, and cars headed north don't have adequate visibility.

"We did a survey," said DeRaadt, "and 57 percent of the vehicles travelling along that route exceed the (90 km/hr) speed limit . . . Four turn movements must be accommodated there, and the problem is for vehicles coming from the south that are behind the truck crossing the road. They have to stop."

He said with the average speed of cars travelling that route, they'll come around the curve, see the truck turning into their lane and have to slow down quickly. That will happen once every 53 minutes, 24 hours a day, every day of the week.

DeRaadt said it would make more sense to move the entrance 125 metres south, opposite P.A. Welding, and would create a four-way intersection. There's a pile of gravel obstructing visibility there, but DeRaadt said the removal of that would make it an ideal location logistically for an entrance way.

But the gravel piles were one of Curraugh's excuses for the desirability of the site. They said they would muffle noise and create wind protection for the terminal at the same time.

But that still didn't convince some

of the residents this was a good idea.

David Jackson said he would want a residential turning lane off the highway into Crestview. The trucks have to go up and down a hill by the entrance, and Jackson said they'd be speeding up on that hill, looming in the rearview mirror of motorists slowing down to make the turn.

DeRaadt said a turning lane wasn't a priority in this case, but acting Mayor Art Deer cautioned him that they'd probably find they'd need one in the long run.

Valerian Nefedow, also of the Crestview area, said sewer lagoons there would be an ecological disaster, adding the noise would have the same effect.

"I hear about big friendly trucks . . . I've never heard about big friendly noise."

"We have a nice place there, leave it alone," he told Curraugh officials, "go to MacRae, go to an industrial area."

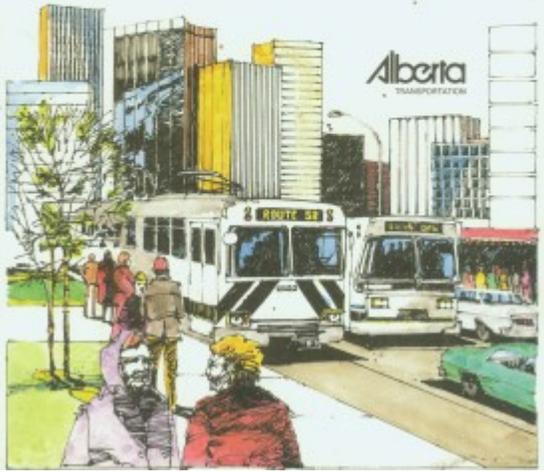
Pelly assured the residents Curraugh was doing all it could to make the trucks more compatible to residential areas. He said they'd eliminated the Jake brake, which creates a loud whirr when the trucks gear up and down, and they're enforcing residential speed limits on the their drivers, regulated by on-board computers that will record speeds through a trip. He also said they'll abide by regulatory requests from the city in managing the site.

"And we'll take care of the environment. The water we use (in washing off the trucks) will be recirculated as much as possible."

Pelly. "We're residents here

The bylaw amendment will appear before council again for a third reading during the next few weeks.

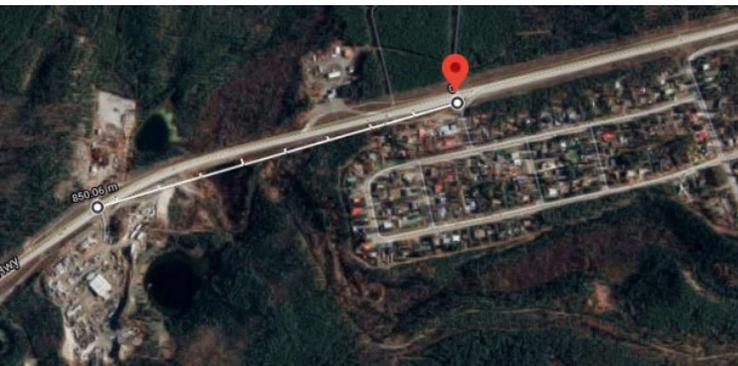
John Nordling
**Urban
 Transportation
 In Alberta**
 1984



During my time in Yukon, I tried to remain professionally knowledgeable about what happened in Alberta and elsewhere. I read and appreciated the ITE Journal, and at one or other VWD meeting, I was given a copy of the ◀ Alberta Government’s (promotional) 1984 update of the first edition of 1981. The Introductory “Letter from the Minister” (Marvin E. Moore) **did not mention** that many things had changed during these three years, due to the **recession** that still raged. It mentioned that “assistance is provided for both roadways and public transit” and that the Major Continuous Corridor Program had been completed in five cities and was nearing completion in two others, at a cost of **\$260 million** since 1979. During that period, the cities of Calgary and Edmonton had also received **\$229 million** for Light Rail Transit projects. He continued by “Approximately **\$930 million** in provincial funds has been committed to Urban Transportation projects during the last six years. For the City of Drumheller, the following stands out (in which I had played a **minor role** – see “**Part 3**”): “The city’s participation in the provincially initiated municipal amalgamation of the Drumheller Valley is the biggest planning task facing Drumheller at this time” (I had done the Road Needs Study) and “Construction of the city’s designated Major Continuous Corridor is now complete, providing adequate traffic capacity between Highway 9 north and south,

within the city limits.” (I had prepared 2 Street West Study and the traffic signals installation designs on South Railway Avenue.) I firmly believe that all this reading kept me professionally sane and alert, and also assisted me in doing respectable volunteer jobs as a member of the Whitehorse Transit Commission and of the YTMS.

The **next page** shows exactly what I meant that May evening of the Public Hearing, and **was actually built**. The original YAT proposal was for an access to the old gravel pit at about **550 metres** north of Kathleen Road, and this was **denied by the City**, by squashing the rezoning application. The intersection of Kathleen Road / Alaska Highway was greatly improved, and the YAT yard access was built **850 metres north** (=400m further north) of the intersection with ▼ Kathleen Road, (as measured by GoogleMaps, with NB and SB turning ▼ lanes!



But this did not happen before it had been “**discussed**” in the Yukon Legislature, on **7 April 1988**, at 1:30 p.m., when **Piers** was living up to the NDP’s “*Waffle Manifesto*” and **Alan** used his student days’ *survey skills & logic*:

<https://yukonassembly.ca/sites/default/files/hansard/26-5-009.html>

Question re: Crestview traffic flow

Mr. Nordling: My question is to the Minister of Community and Transportation Services. During the fall session, and specifically on December 16, 1987, I made representations to the Minister with respect to traffic safety at the **Yukon Alaska truck terminal near Crestview**, and the two access roads into Crestview. The **Takhini Area**

Transportation Study really only dealt with traffic flow and not safety, and did not look at the south access road to Crestview at all.²³ I would like to ask the Minister if the government has done anything to address this concern?

Hon. Mr. McDonald: I realize, for the Opposition, it is quite unacceptable for the government to try to correct the incredible, unsubstantiated allegations that are put before this Legislature on a regular basis, but let me just say this: the **Takhini Area Transportation Study** had very clear terms of reference. The report was concluded and made public by me in this Legislature.²⁴ I indicated at that time that, apart from the **Crestview truck terminal**, which we would be addressing as soon as time and the weather permitted construction to take place, but that the balance of the recommendations would be reviewed thoroughly between the City of Whitehorse and the Government of Yukon, and a report would be made public with respect to what the government was prepared to do in terms of its financial commitments. The negotiations are ongoing at this point between the city and the government, and I would expect the conclusions to be drawn according to the timetable that I have already indicated publicly to the House.

Mr. Nordling: The **Takhini Area Transportation Study** that the City of Whitehorse is dealing with did not deal at all with the area that I am talking about.²³ The **Crestview truck terminal was tacked on and is a separate little report**.²⁵ On December 16, the Minister said ...

Speaker: Order please. Would the Member please get to the supplementary question?

Mr. Nordling: Yes, Mr. Speaker. I would ask if, in these discussions and negotiations with the city, they will be looking at the problems at the **Crestview truck terminal** with respect to the need for a deceleration lane for safety reasons?

Hon. Mr. McDonald: The initial recommendation, I believe, - and correct me if I am wrong, I am going on memory - called for a left hand turning lane at Crestview and, at that point, I believe consideration was given to **deceleration lanes to turn right into the Crestview truck terminal as you come south along the highway**. The feeling at the time was that trucks could slow down because they were going uphill in any case, in order to turn right into the truck terminal; there was plenty of opportunity to do that and directions to the turnoff to the truck terminal were very clear. For that reason I believe, there was not a recommendation for a deceleration lane. I can check on that, as it is a detail I do not feel perfectly comfortable with; I will certainly ask the department to inform me as to the details.

Mr. Nordling: The constituents on the Mayo Road and MacPherson are not concerned with the traffic flow that would call for a deceleration lane. They are talking about the safety of the trucks slowing down in the middle of the road and turning right on the corner at the top of the hill. The Minister, on December 16, 1987, talking about his department making a final plan for that area and would report back as soon as he found out what the plans were and what would happen in that area. I would ask if the Minister would be prepared to bring back some report on what the Yukon Government is doing in that area within the next week.

Hon. Mr. McDonald: I might be missing something from the Member's question, but my understanding is that the trucks turning right into the Crestview terminal do not have to turn in the middle of the road. **The track is sufficient to enable the Yukon Alaska transport trucks to not have to swerve out into the middle of the road in order to turn right**. I will perhaps talk to the Member after today's sitting to get a clear understanding of what the Member is asking. I would be more than prepared to provide a written answer to the Member's question

Wikipedia, another wonderful tool, tells me what happened since: "Curragh Resources purchased the property in 1985 and production resumed in 1986. This time, ore was trucked in ore pots from Faro directly to Skagway, bypassing the railway. This operation ended in **1993**, not long after Curragh Resources suffered a coal mining disaster at the Westray Mine in Plymouth, Pictou County, Nova Scotia. A third operation, by the Anvil Range Mining Corporation, opened in **1995** and ceased production in January **1998**, followed by the bankruptcy of Anvil Range. Much of the heavy mining and milling equipment was sold and removed from the Yukon."

²³ Correct!

²⁴ It is not sure if the **Draft Report** or the **Final Report** had been "made public" in the Legislature, and on which date.

²⁵ I was likely responsible for that "**little report**" (and never knew that it had been made public in the Legislature). Crestview is 5 km north of Takhini.

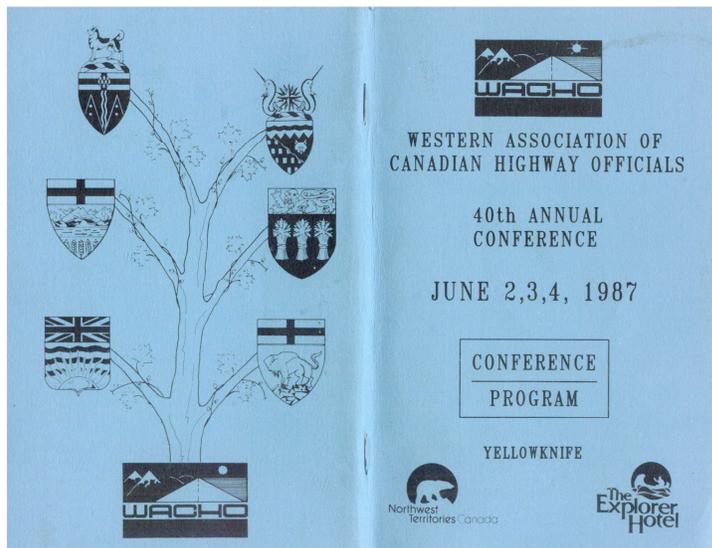
Cobalt Construction Inc. now uses the site extensively, and who knows, the continuation of P.A. Welding is still in operation on the east side. The old gravel pit (where Joss and I went with Mark Hambridge's trailer behind our Matador wagon to load gravel for concrete slabs and a garage, made with Florian's mixer) seems to be deserted.

Please note that the newspaper clipping on the previous page is titled "**APPENDIX "J"**". It was used as part of a Paper that I prepared for the 40th Annual Conference of the Western Association of Canadian Highway Officials, on 2 - 4 June, 1987, at Yellowknife, NWT, with the topic "**Access Control, a Northern Perspective**". For the first time since its inception, WACHO was meeting in one of the territories, as aided by the other one, as a Joint Organizer. This was an exciting event, as we first had to prepare for it, and then attend; it then became a very nice journey, particularly for Florian and me, with some unexpected twist toward the end.

The very nice 96-page Conference Program was developed so that all delegates would first listen to the Hon. Gordon Wray, (Alberta's Minister of Public Works & Highways and Dr. Ron Tabler (of Laramie, Wyoming) during a General Session, and then split up into ten Groups, where Papers and Presentations would be made. Here follow the names of these groups and their chairmen. See how the load was shared, except for the fact that "Right-of-Way" was not an issue at all in the two territories. That group was chaired by someone from Alberta.

Administration Andrew Gamble, NWT.	Bridge Eric Gibson , Yukon.	Construction John Murray . Yukon.	Equipment Everett Kinsman, NWT.	Maintenance Gary Hoffman, NWT.
Occupational Health and Safety Wilf Fournier , Yukon.	Preliminary/Functional Planning and Design Wally Hidinger , Yukon.	Right of Way Al Brown, Alberta.	Soils and Surfacing Peter Vician, NWT.	Systems Planning and Traffic Jim Richardson, NWT.

Regarding the Papers and Presentations for the Conference, **Eric Gibson** wrote a paper titled "**Faro – Skagway Ore Haul**" for the Administration Group, **John Murray** wrote a presentation titled "**Dempster Highway Reconstruction**" for his own Construction Group, **Dr. Don Macleod** of DIAND in Ottawa wrote a paper titled "**Performance of Bituminous Surface Treatments in Yukon**" for the combined Construction and Soils and Surfacing Groups, and yours truly wrote a paper titled "**Access Control; A Northern Perspective**" for the Systems Planning and Traffic Group. This meant that Yukon was responsible for **4 out of a total of 22** Papers and Presentations. I do not remember exactly how many of our staff attended, but Robin Walsh did not go. Somebody had to look after the office. How ongoing construction project supervision was handled, also escapes my mind.



During the planning phase of the conference, we had all been asked to provide "**questions**" to be discussed during the Group Sessions. These were collated by Wally and faxed (!) to Andrew Gamble in Yellowknife, who had them printed in the Conference Program at the proper location and session. If e.g. Saskatchewan and Alberta had a somewhat similar question, Andrew had just "**ad libbed**". A few of my questions made it; one dealt with a **beef** (that I still have) about a highway sign that ought to be **reversible**, but was not and is not and perhaps never will be made that way. For the other particular question, on a traffic situation that had first been brought to my attention by Ray Magnuson, I even made a video to describe and explain it as the on-going problem at Haines Junction. (See below.) At that time, I was once again the only Yukon ITE member, as explained. **Mr. Jim Richardson, P.Eng.** was Traffic Engineer, Transportation Plan-

ning, NWT Public Works and Highways, (the only ITE member in that jurisdiction), and he chaired that meeting which resulted in a good sharing session of how things were done in the six jurisdictions. He had already assisted me by providing details of NWT's access permits, which I had included in my paper. This was presented during the session of Wednesday 10:45 a.m., meaning between coffee break and lunch. The time was shared with a paper by **Mr. Murray Tekano**, Senior Sign Technician, of British Columbia, about the BC Ministry of Transportation and Highways Driver Information Display System (i.e. BC MoTH DIDS). I explained the situation, enlightening it by quoting some local problems, as shown and copied from the **handout on the next page**. This was followed by Mr. Bergh's recommendations (a) to (g) from his **Interim Report**. These were copied from **pages 6 and 7** of my 11-page paper (which with Appendices "A" through "J", came to a total of 34 pages).

The "**second access**" driveway situation shown in the middle of page 6 was a real Yukon problem, in two cases:

(1). A second access to a commercial property had been constructed at the corner in **Haines Junction** where the Alaska Highway makes its single right-hand turn at an intersection, without the Roads Foreman's knowledge.

(2). Before even applying for a building permit on a property they did not own, **Melberg-Verrico Contracting Ltd.** started to fill in the entire area between the shoulder of the Alaska Highway and the property line, where there was a deep ditch, so high that the problem was brought to our attention by Mr. Gary Reynolds of Yukon Electric, who worried about the vertical clearance to their wires, and that some poles were almost buried. Paddlewheel Village Ltd. owned these properties on the downtown side of the Alaska Highway within the City of Whitehorse, south of the intersection of the South Access Road. Moreover, the "**driveway**" consisted of almost "**full frontage width**" which would enable a virtual parking lot within the 200 ft. wide Right-of-Way of the Alaska Highway, an "Arterial Highway" with supposed "access control"! All this without even an access permit application, which was then completed "**after the fact** – on 18 October 1984 and was not issued. On 5 November 1984 I wrote a detailed report on the application, making suggestions for a frontage road that would eliminate three existing access points. I made use of previous studies by EPEC Consulting Western Ltd (February 1982) which had become part of the City of Whitehorse OCP. It was clear that the City of Whitehorse had been less than diligent when issuing a building permit – without consulting YTG – and the site had no municipal or well water, so that water was delivered by truck. **This issue (2) dragged on for some years**, unresolved, and situation (1) was addressed much later in a very appropriate way. GoogleMaps imaging ▼ indicates the fairly current situation in "downtown" Haines Junction. The corner restaurant is now gone, and there are two proper road intersections to commercial properties, with accesses off **Kathleen and Luciana Street**. The area near the intersection is all landscaped with some walkways.



Haines Junction, according to GoogleMaps. Things have surely changed a lot since 1987.

This is a good design. And I wondered **IF** the fact that the upgrading of both Highway 3 (Haines Highway) and Highway 1 West (Alaska Highway) through Haines Junction was all **paid by the FHWA of the USA** (as part of the Shakwak Project) caused that "wink-wink" change of mindset (and a huge US\$ carrot) to accomplish "access management" (the former term was "access control"), **OR IF** this happened as a result of the changes in the legislation and highway regulations that were recommended by Mr. Barry Bergh? Not that it really matters, I am only curious; on page 11 of my paper, I wrote: "**Temporary accesses have a tendency to perpetuate themselves.**"

The next page shows excerpts from pages 6 and 7 of Mr. Barry Bergh's **Interim Report**, which was all I had in May 1987. The Final Report had much more good reading! This leads me into describing a **hostage taking situation on a road blockage**. This occurred in the spring of 1987, likely after submission of his Interim Report. (Sad that road blockages still occur in Canada.)

The Regulations also include Form No. 3, the permit for construction or maintenance of access. The form presently in use is the one with the Yukon Crest on it and it indicates the \$5.00 application fee. (Appendix "C"). (The name of the Department has changed twice since 1979. Department of Highways and Public Works became Department of Highways and Transportation became Department of Community and Transportation Services.)

The Yukon Municipal Act sets out in Section 346(1) that individuals applying for subdivisions of land must provide adequate highway access to each lot created by the subdivision, that the standard of the access road must conform to those set out by legislation and that the cost of providing for highway access must be borne by the applicant.

While I have not seen NWT's legislation and access regulations, I would anticipate that they are quite similar to Yukon's. However, the access permit form is more sophisticated, as can be seen from Appendix "D" (their old form, presently being phased out) and Appendix "E" (their new additional information sheet and acceptance conditions). It is clear that there is an application part and a part for official use. The problem we face in Yukon is that applicants build their own accesses, and in some cases, when the local maintenance foreman sees this, he has to give them an access permit form. People are then reluctant to fill it in, and it is also difficult to get such an access disestablished or even rejected. With the small population we have, the politicians are very close, and we have had cases where political pressure was exerted to grant a specific access to a certain property at a certain location, or to grant a second access to a commercial property. This has almost been an unwritten rule, to have two access to commercial land.

Recent Clarification on "Territorial Highway"

A few months ago, Yukon experienced a road blockage of a winter road under construction. This project had been considered a public road by the Regional Resource Road Committees, and the project was financially assisted by the Government of Yukon. It was actually a 19 year old winter road that had originally been built by a mining company and had also been partly funded under the Tote Trail assistance program. Nevertheless, the RCMP was advised by Federal Crown Counsel not to charge the people who blocked the road, because they were not contravening any Act, and particularly not contravening section 8(1)(c) of the Yukon Highways Ordinance. A tote trail is not a Territorial Highway but only a highway. The question arose whether there was a highway at all, since this was on federal land.

On 14 May 1987, the Government of Yukon revised Highways Regulations 8, and under 8(3) designated "each highway that connects directly or indirectly with a (numbered or unnumbered) (listed) highway" ... as a Territorial Highway.

Also note Section 8(5). (Appendix "F")

The implications of this clarification, and its accompanying policy and news release, are not yet clear. Access control, whether full or partial according to the Highway Ordinance sections 10 and 12, was previously only applicable on Territorial Highways which were all maintained by the Highway Maintenance section. All tote trails in Yukon are now basically designated as Territorial Highways, and how can access control be accomplished on them is not sure.

Review of Highways Act and Regulations

Since the fall of 1986, the Highways Act (= Ordinance) and Highways Regulations are being reviewed by a consulting solicitor, Mr. Barry G. Bergh of Vancouver. His Interim Report (March 1987) includes as issues under the general topic of Adjacent Development and Access/Entry Control:

- (a) Right of the government to control adjacent development and road access;
- (b) Perimeters within which control may be exercised;
- (c) Criteria for approval and denial;
- (d) Policy regarding public funding of access structures;
- (e) Control of entry/deress and other designated access points;
- (f) Placement of objects for example machinery in the vicinity of a highway;
- (g) Procedures for unauthorized/undesirable adjacent development or objects.

and states "During the consultation process there were more comments respecting highway access and adjacent development than with respect to any other topic". (page 46)

After reviewing legislation of Ontario, Alaska and the four western provinces, he recommends on the above issues:

(Clarification: The text of the Final Report is different and much more extensive than the text of the Final Report of 113 pages, which addresses 14 issues instead of 7. My Yellowknife presentation was based on the Interim Report.)

The situation described near the bottom ▲ of page 6, in which Florian Vedress had been **held hostage for a few hours**, was the **direct cause** of the **revision** in the Highway Regulations. What my paper did not mention, is what really happened. This strange story follows, as it needs to be told. Florian had gone to inspect the construction of very long winter road to a small but expanding fly-in fishing lodge on **McEvoy Lake off the Campbell Highway** early that spring, so that we could certify that the work had been done. (We would receive the Applicant's claim based on equipment rates per type of machine, compare that with his estimate, and rely on his honesty!) **Mr. Warren Lefave** could then be paid the money that had been applied for under the Regional Resource Road Program, which had been approved. He had already picked up the necessary Land Use Permit from the DIAND office of Mr. John Jennings in Ross River and started to get the snow clearing process. Normally, we at YTG conducted pre- and post-construction visits to these sites; due to the extreme remoteness of this site, we has likely skipped on that first visit, leaving it up to the Federal government employees to approve Mr. Lefave's funding application.²⁶ (If it started on the Campbell Highway near the east end of **Finlayson Lake**, the length is **at least 30km.**) That fly-in fishing lodge still exists at <https://inconnulodge.com/>, operated by the Lefaves!

Travelling from Whitehorse, (and he must have started very early, the distance is more than 400km!), Florian found that the winter road was not only "under construction", but that a whole caravan of track-powered equipment with building materials on skids (for the expansion of the lodge) stood ready to proceed once the winter road was

²⁶ This had first been called the **Tote Trail assistance program**, then the **Northern Exploration Facilities Program**, and then the **Regional Resource Roads Program**. (I wonder what it is called now.)



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completed and drivable. So Florian drove **in** (and I do not know how far) but was stopped on the way **out**, by a group of Ross River Indian Band members who wanted to make a point that this winter road infringed on their unsettled Land Claim. They had not been consulted with the issuance of DIAND's Land Use Permit for the winter road. Florian had to remain seated in his truck. After quite some hours of occasional talking to and fro, between the site and various people in Whitehorse, using the mobile phone in Florian's rental pick-up truck (remember this was all we had in those days, and both YTG and the federal government used the system, but not the Indian bands), he was **released** under the specific condition that he would personally deliver a **handwritten letter**, signed by the Chief and

Councillors, **addressed to the Government Leader, Mr. Tony Penikett**. Level headed Florian agreed and drove back to Whitehorse, did what he had been asked to do, and it was during the following days' utter confusion about **"Wrongdoing or Not?"** (by the RCMP and by Federal Crown Council) that brought the matter to a head: This "winter road" was **not** defined (or even definable) as a "Territorial Highway"; the road blockaders were on federal land; they had done absolutely nothing for which they could be charged. A mere (pragmatic?) **change in the definition of a "Territorial Highway"**, to include every trail in Yukon, was the obvious result. Even the trails in the Village of Old Crow would be included by this definition, because that community is connected to the Dempster Highway by a winter road of more than 150km long (as the crow flies)! See my comments at the top of [page 7](#) of the paper. **We lived in a state of flux!**

The only issue which I have been able to identify to date which might give rise to an application to quash based upon the Charter of Rights and Freedoms, is that of the denial of an access permit, particularly for one business over another. If an individual could show that an access permit was essential to them for the purposes of earning their livelihood, the YTG would be faced with a difficult situation. It would have to argue that Highways Department policy justifies the denial of the access. I am not aware of any cases in this regard and would suggest that the section remains as proposed for now. (page 84)

◀ Mr. Barry Bergh had one important outstanding issue at the end of the Interim Report; I would not be too surprised to hear that he took the strange **"denial of an access"** case of **Mr. K. in Carmacks** a bit to heart.²⁸ This was of course **"none of his business"**, but during our long interview. I had alerted him of my earlier involvement.

So far so good, one might say. But how did these changes affect my work? See what I wrote about it on [pages 10 and 11](#) ▼ – and how all these issues seemed to crop up (after the middle of 1987) in all my work functions and also in those of colleagues in N.W.T., and to a lesser extent in the four western provinces, where legislation exists? That is what conferences are for – information sharing.

In **Point 1**, I tried to reconcile the issues from the Melberg-Verrico property in Whitehorse into the big picture. This was not the only driveway "not meeting current design criteria"; along the Alaska highway were several properties with cabins, some of which had once been original Alaska Highway gas stations and in one case, I suggested a single joint driveway for two side by side properties. The argument was made by some people that traffic volumes were low (and would remain low) and that safety was not really an issue, but I countered by say-

²⁷ I have had this photo for many years, with "Warren LeFave's winter road" written on the back. In 2021, Florian directly recognized the site and we had a nice talk (in Peachland, BC) about this hostage taking, confirming the facts that none of us had forgotten it. The Ross River Band is part of the Dene First Nation, of which most members live in NWT, not in Yukon.

²⁸ Pages 64 to 66 in the Final Report do not deal with this issue. On Page 88, the matter is referred to "I. Recommendations, paragraph (e)" and this was indeed discussed on pages 99 to 101. (See below.)

F. Application of Access Control Requirements

The question may be asked: When does one use these regulations, how often does it happen that one has to comment on an access or driveway? The answer is that this happens regularly through various processes.

1. The owner of an existing (titled or leased) property along the highway who wants to develop the site, has to apply for an access permit. This can become tricky: for many years, the federal government granted leases along the highways and people obtained title without any development taking place. Or there was a cabin and now there is a zoning change and the owner wants to develop a gas station. Within city limits, the owner has to apply for a City building permit on this lot, and for a Territorial access permit for access to his lot, from the edge of the shoulder to the right-of-way limit. Which does he get first, and with which conditions?

In one such case in Whitehorse, there was an obvious lack of honesty by a property owner, and also a lack of willingness to deal with such a situation. Mr. Barry Bergh comments: "construction apparently commenced without a proper permit due to a misrepresentation of facts in the application for the permit. This could likely be solved by better enforcement." (page 46)

Easier said than done, but we find a number of new access every year. It seems that everybody who has earthmoving equipment, can build an access, and once it is spotted by the highway maintenance foreman, it is already too late. The flack from the public is something which would be too much for many an employee. The question remains: Do we want to control access?

2. For new development: Comments on access to a proposed parcel of land, as applied for through the Federal Territorial Lands Advisory Committee, FTLAC and LARC, for Federally and Territorial controlled land respectively, are provided. Direct input into LARC is provided through presence on the committee. Federally, comments are provided to the Manager, Land Disposal and Client Services, who in turn compiles comments from all Territorial Departments for presentation to DIAND, who control FTLAC.

ing that an arterial highway is an arterial highway, and it has certain professional standards to live up to, particularly for the many unaware tourists from outside Yukon.²⁹

The Alaska Highway's legal right-of-way had been surveyed as 200' wide (registered in Ottawa) while a "red-line" right-of-way widening was indicated on plans registered in Whitehorse. A **double standard**, one might say; what was the real width? The Alaska Highway was also built "**off-centre**" i.e. as if some additional roadway was supposed to be built beside it for a "freeway design". Most highways in Yukon had no registered right-of-way plans at all: Land Claims prevented a **single land registry, all the highway right-of ways were "half-registered", or there were no right-of-way plans at all**, just like it had been in the Orange Free State, as described in my "Part 1" – for the normal rural highways, whether primary, secondary or tertiary. Within the City, legal plans obviously also showed right-of-way widths. (See below for "parking in a lane".)

Dealing with access situations to the "**Agricultural Applications**" and to the approx. **300 illegal squatters** in Yukon who applied for one acre of land with legal access, became part of my work load. The latter program had been **outsourced** to a consultant, but I had to visit and check out all the trails for consistency with access points on the numbered highways, as well as reminding everybody that **even the trails would need a 60m legal right-of-way width**.³⁰ So what does one do if two squatters have applied for a single acre and there is no room between them (where they want a trail to be, or where there is an existing one) for a 60m wide swath of land for right-of-way for their (joint?) access trail – as a Territorial Highway? This caused me a lot of grief, long after my return from NWT.

I have still neglected to tell about the trip itself. That is coming. But as you can see at left (**on the next page**), my paper had no "**Conclusion**"; I was actually incapable to write one, (see point I) but we had a good talk among the small group of about fifteen people. Obviously, other Group sessions had more to offer for that time slot, and it became time for Mr. Tekano (whom I later re-met in Burnaby) to start with his presentation.

²⁹ As an example (about the unauthorized work by Melberg-Verrico, within the right-of-way of the Alaska Highway), Wally replied to Ray, on my Memo of 1985-11-08, by writing: "**Are we interested in making an issue of this? To discuss.**" So the three of us discussed it – **and got nowhere**. In May 1985, Wally had asked Mr. Blackman for advice, just before he left.

³⁰ Surveyed road right-of-way plans to these acreages were not even considered, as they would be almost anywhere else.

3. Agricultural applications/squatter legitimization: "Ag. ags" were previously handled by the Yukon Department of Renewable Resources, and comments were provided. This function has now been taken over by the Lands Branch within Department of Community and Transportation Services. Lands Branch, under a new squatter's policy (both within and outside the Block Land Transfer) will shortly try to legitimize squatters. Access to these sites will also be commented upon. The "clarification" as mentioned in section B above particularly concerns this work. It is clear that the "clarification" was only a stop-gap measure which may have created more problems that it was supposed to solve, but it appears that we would like to maintain the "status quo" as far as access control and the processing of permits is concerned. Whether this is good or bad, is beside the point.
4. Accesses onto existing "controlled access highways", mostly along those section of highways through communities, are even more difficult. People have many an illegal, unauthorized or at least unwarranted access, and to deny them to their neighbours while existing accesses remain, is a mystery to Joe Blo who lives in Pelly Crossing, where the Klondike Highway, with an ASDT volume of 200 vehicles per day, runs adjacent to his property (Appendix "G").
5. Access control for minor roads is normally accomplished by setting the location and standard of the intersection. We have only one drawing for this, STD-4, shown in Appendix "H". This is normally possible in most locations.
6. The criteria used for determining the conditions of the permit, vary from site to site. There may be conditions establishing a temporary access, but everybody knows that "Temporary access have a tendency to perpetuate themselves", and anybody who ever had to deal with the unenviable task of trying to enforce something which was decided upon years ago, will probably agree that this is difficult. The public, the politicians and precedent is difficult to deal with.

G. Case Studies (to be tabled)

H. Videos ?

I. Conclusion

This paper has no conclusion, but I hope that a general around the table discussion can develop, for our mutual benefit and enlightenment.

J.A. de Raadt, P. Eng.
 Program Engineer
 Highway Engineering
 Highways and Transportation
 28 May 1987



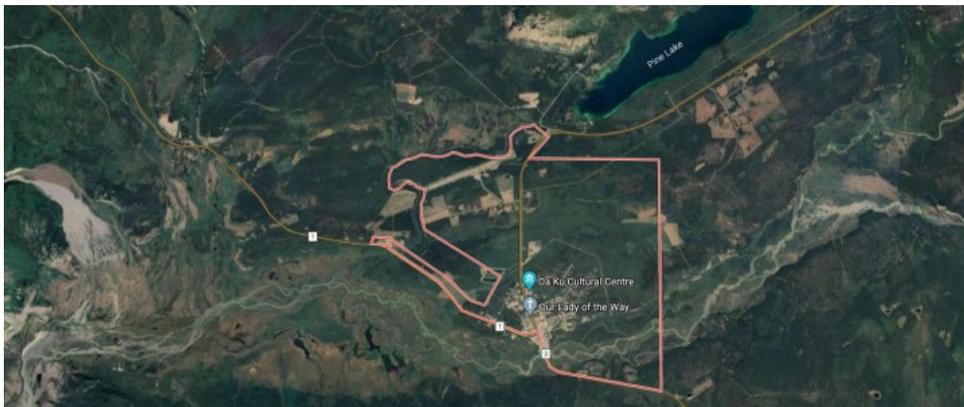
My other question on the Program, under the heading "Signs", was: **"Information Signing – Fairbanks, Alaska. Many tourists fail to notice the signs. Any suggestions to eliminate the situation?"** It had been brought to Ray Magnuson's attention that over the years, several tourists had gotten **lost in Haines Junction**. Not really lost, but when coming to that village of about 600 people, they had assumed that, just like **everywhere else** on the "Alcan" (as Americans still used to call it) from Mile 1 at Dawson Creek, British Columbia, to its very end, they could continue **straight on to Alaska**. So they had ignored the various (normal sized) road signs stating **"Fairbanks ►"** and/or **"Turn Right to Fairbanks, Alaska"**, or had been distracted by the scenery. Some of them had written letters, because after continuing straight on, they had not realized that they had been on the Haines Road. Only when they had reached US Customs, and asked: **"How much further to Fairbanks?"** (or Valdez, or Anchorage), they were disillusioned on hearing that they were indeed re-entering the 49th State of the USA, but had also been asked to **turn back into Canada** for about 174 kilometers and then turn left to go to Fairbanks or wherever.

Some of the tourists had run out of gas or diesel on the way back, and

"How can this be, don't you guys have road signs – you ruined our vacation!" and the like, these letters read. For experienced travellers, (some of whom had actually built the highway in the 1940's) this was not a problem, but yes, **what** ought to be done: More signs, advance signs, larger signs, better maps, details given at the information centres, perhaps a better intersection? **Some of the above, or all of the above?** When asked by Ray Magnuson, I remembered several things I had heard before on the **"human factors"** of driving, at an ITE meeting, from **Dr. Robert Dewar** at the University of Calgary, and what I had known from Dr. Odendaal's work at the NITRR. Traffic safety is not solely an engineering matter, it deals with **people**. A few months later, at the RTAC meeting (Saskatoon, 18-19 September 1987), **Dr. Robert Dewar** and Dr. Gerson Alexander of Positive Guidance Application, Inc, Rockville MD, USA presented a two-day long Seminar on **Human Factors in Traffic Safety**.

The following **visual abilities** were stated in that paper: *“static acuity, accommodation, adaptation, angular movement, central movement of depth, colour vision, contrast sensitivity, depth perception, dynamic acuity, eye movements, glare resistance, peripheral vision, stereopsis, vergence”*. **Fourteen different criteria that needed attention.** I attended that seminar, and have sometimes perused the contents of the document. (With the onset of old age, I am still driving accident-free – thanks be to God and to Lydia, my excellent co-driver and better half (!) – realizing my decreasing abilities, notwithstanding that **“Everybody is an above-average driver”**.)

To explain the situation to WACHO delegates, I had made a video recording. Coming from Whitehorse, driving west, the highway is fairly straight around Canyon, where one can see the large **St. Elias Mountain range** to the left. Through a **series of ever so slight curves to the left**, as if drawing one toward the south of that range, this might easily be interpreted that the highway would pass this mountain to the left. Starting at the west end of Pine Lake, just east of Haines Junction Airport, (previously used much more than in the 1980’s, e.g. by Wien Air) a sharp curve leads into the village, (so that the **massif** can be seen to the right), and the road then runs straight through, as one can see over the bridge to its south. Wouldn’t it be logical for you (and me and any driver) to at least **consider** driving straight to go around that mountain range? And only then the information signs started.



Whether the signs were good or bad, large or small, had the correct colours (white letters on green background) or not, many tourists did not make a 90 degree curve to the right at the intersection, carrying on happily (into BC, actually, where there were small border signs) until arriving at the US Customs, to become disillusioned with themselves, the YTG and everybody else. The situation was made worse because the visibility of the road that proceeded west (as Alaska Highway) was “hidden” from the

(Note that Haines Junction Airport is currently within the town limits.) intersection in “downtown” Haines Junction by some high land at the corner store / restaurant / gas station in the NW quadrant, (the one with two accesses, one on each side, as described above).

I made my video recording on a single little cassette of a now long-forgotten system, and cannot remember its name anymore. It was quite amateurish, the camera was large and clumsy, but I had an opportunity to show the result in Yellowknife during one Group Session. The consensus of the Group Session was obviously that the signage should be improved. Well, that is what YTG Highway Maintenance did (or already had done), **more than once**. How much did the situation improve then, and later? Were many more tourists misled, and for how long? Were any other information sharing improvement efforts pursued? **See the fairly current situation below.**



South from the Airport Access Road intersection. (July 2009) Overhead and lit signage at the intersection.

Another tidbit is added to this, whether **truth** or **fiction**: (I do not know who told me this.) Originally, the Alaska Highway was to run straight west, close to Haines Junction Airport. But supposedly (and as I heard it) the US commanding officer had a girlfriend in the pre-existing (Indian?) village, and wanted to please her by building the Alcan and its connection to the Alaska panhandle closer to where she lived. That is why for 75 years already, this poor intersection (with a right angle corner and two driveways too close for comfort next to its highway intersection) was built and has remained to exist; it is now part of the US Interstate System. Is that why the signage is now so vastly improved, (funded by Uncle Sam), to meet the AASHTO or US MUTCD standards?

Regarding my other questions to WACHO:

My first question was printed on Page 80, Q. 11: Warning Signs:

- a) Truck Entrance Sign WC-8 has a “right” and “left” version. Wouldn’t this also make sense for Fallen Rock or Landslides Sign WC-6?
- b) Do other jurisdictions use the supplementary tab signs (WA-21 S1 or S2) with the Hill sign WA-21?



{Question (a) had already been asked of ITE’s Mr. Tom Brahms at the 1985 ITE Conference at Calgary, giving him a print of this **clear and meaningful** ◀ South Klondike Highway north facing photo along Tagish Lake.}

To date, more than 34 years later, I have **NEVER** seen a reversed sign WC-6 in Canada or the western USA. I wonder what the end result might be in a not-so-far-fetched situation, where someone would be involved in a traffic crash from fallen rock (we do not call them accidents anymore!) and then turn around and claim that the sign was misleading, by “**There was no sign stating that rock may be falling from the right hand side!**”

My second question, printed on page 78, under the heading Administration, for Tuesday 2.00 p.m. meeting, was:

1. What is the relationship between other jurisdictions and
 - a) ITE – Institute of Transportation Engineers, and
 - b) WCTA – Western Canada Traffic Association,

particularly regarding membership of employees, participation in activities and the payment of fees?

(The discussion on this did not mean much; ITE membership has mostly been from **private sector** professionals.)

There was one joint session with the Preliminary / Functional Planning and Design Group, and I still have a copy of the paper by Ms. Roberta L. Clifford and Mr. Bill Leigh (her supervisor) of Alberta. “**Rethinking the Right Angle Corner**” was its title, dealing with a typical prairie road right-of-way layout in a rural setting, somewhere north of Turner Valley, where the original grid road mismatched at a Township line. It was interesting and well-presented; Yukon did not have that kind of problem at all, except the one inherited from the US Army (**see above**, although that was and is in an urban setting). From GoogleMaps, one can see that it has not yet been rebuilt.

I completed my paper, **signing, sealing and dating it on 28 May 1987**,³¹ including a reference to “three weeks ago situation” on page 4, and my reference to the recent designation of 14 May 1987, while ravel arrangements were being made. Most of our staff went; how would they get there? One could only fly from Whitehorse to Vancouver and Edmonton; there were no direct flights between the territorial capitals. It so happened that “West Edmonton Mall” had just opened its doors. All YTG staff members chose to fly there and do some shopping, and then fly north to Yellowknife. The problem was that all the paperwork for the conference (except the printed Program) had been word-processed and printed in Whitehorse, and had to be taken there **physically**. As I was anxious to see

³¹ Wally had read and perused my paper, and had approved it for my presentation. Great was my surprise when Mr. André Gagnon asked me on Monday night to slide a copy of my paper underneath his hotel room door. He had not read it, he said. Was I, or Wally, supposed to have him review it (**and perhaps change it**) because of a possible political backlash?

some of NWT's highways, (so that I could at least be knowledgeable whenever their point of view came up), **I volunteered to drive there, and Florian Vedress was agreeable to accompany me.** With a loaded GMC Suburban, we set out from Whitehorse, (via Carcross, **see below**), stopping in **Fort Nelson BC** that evening, after **994 km of travel.** The next day, we turned back for a short distance and then turned right onto the Liard Highway (BC Highway 77 and NWT Highway 7) and made it to **Fort Simpson NWT** shortly before midnight. (GoogleMaps tells me that this road no longer exist south of Fort Liard, as it was in 1987.³² Wikipedia also advises that the BC part was opened in 1984 and upgraded in 2012. **GoogleMaps cannot tell me the distance.**)

We crossed the Liard River by ferry and booked into the very first motel that we saw. During our breakfast, we heard that all the houses in the town had been repainted in anticipation of the (Polish) Pope, just before (or after) he had been in Calgary Alberta. We crossed the Liard River again, and then headed east on a **very long road with nothing but small trees on both sides.** We had a short break at a waterfall in Sambaa Deh Territorial Park (then named after a British princess?) and lodged at a motel (that is now abandoned) at the NWT Highway 1 intersection. The next morning, we drove north to the ferry crossing on the **MV Merv Hardie**, across the Mackenzie River near the western end of Great Slave Lake, which was a pleasant voyage. This ferry only operated between the late spring and early winter. Between fall and spring, everybody had to drive across the lake at various places, straight



Nahanni Range (Yukon border) in the background left, Northbound on the highway near Fort Liard.³³



South shore of Big Slave Lake, looking east from the ferry.



Florian looking east into Great Slave Lake; note the difference water colours: the light surface has ice particles.

to wherever they wanted to go on the north shore, even the long distance from Hay River to Yellowknife.³⁴ After a few minutes driving through Fort Providence (no tourist attraction!) we carried on driving, arriving at the Territorial capital late that Sunday afternoon and booking in at the Explorer Hotel. On Monday morning, we unloaded the boxes of paperwork from the van, I (as a speaker) had lunch with the Directors, Group Chairmen and secre-

³² The \$81 million Liard Highway, the first all-year road link between northeastern British Columbia and the Northwest Territories, had only been officially opened on 25 June 1984. NWT has changed highway numbers since 1985.

³³ I had also asked another question (as printed in the Conference Program): “**Headlights on at all times; (a)** Are other jurisdictions planning to enact measures to make the use of vehicle headlights compulsory, prior to the Federal legislation taking effect in a few years’ time? **(b)** Are any highway signs presently in use or proposed?” From **the photo above**, it is clear that near Fort Liard, NWT, **I already had some answer to these questions**, prior to the conference itself!

³⁴ In 2007, the Deh Cho Bridge was under construction when a claim was lodged by Canam Group Inc., a Quebec company, against Deh Cho Bridge Corp. and its project manager and design advisor, Andrew Gamble, P.Eng. (who had been NWT’s Director, Transportation Engineering during the 1987 WACHO Convention) for \$ 39 million of steel that was supposedly to be supplied by Canam. In August 2007, Gamble said that it had only been a quotation and not a contract; the contract had been awarded to ATCON Construction Inc. of Miramichi, New Brunswick. In February 2010, the NWT Government took over the project, and in 2011 Andrew Gamble and Jivko Jivkov counter-claimed the N.W.T. Government for not paying them \$ 1.3 million for work done, which was later settled by mediation, supposedly for an unannounced amount “well below the amount that was claimed”, according to an on-line article I discovered at <https://www.cbc.ca/news/canada/north/n-w-t-settles-deh-cho-bridge-lawsuit-1.1016791>

taries, and the desk for registration was open from 1 p.m. to 10 p.m. Most of our colleagues arrived that day, and had many stories about the magnificent West Edmonton Mall. They had been too long deprived of such place close to home, they said, which was true. Real “shopping malls” had not been built in Whitehorse, Yellowknife or even Juneau, Alaska. Chinook Centre in Calgary was one of the first “non-downtown” shopping malls in western Canada. Only some of us had attended the 1986 WACHO Conference in Victoria, BC: Walt Gutowski had then attended a field trip to the brand-new Coquiahalla Highway, while I had sat through a VWD meeting that day!



◀ This CBC photo (from the internet) shows the ferry breaking a channel through the ice at Fort Providence in November 2011, after completion of the **Deh Cho Bridge**, a part of which can be seen at left. The ferry service was then abandoned as redundant at this location, perhaps NWT Public Works and Highways used the vessel somewhere else, or just scrapped it. The internet has a lot of information about the **long** history of this **long** bridge, and the **long** court cases about it.



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The conference ran from Tuesday morning to Thursday lunch, with tours that afternoon and on Friday, e.g. to the Giant gold mine. I cannot remember attending them, because during that week, something very important came up (I think Jim Richardson told me), namely that the **Liard Highway had been closed** due to soggy surface conditions, and **it was unknown for how long it**



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would remain closed! Florian and I (he attended other Group sessions than I, but we saw each other now and then), could not return the way that we had come. We remembered that we had experienced some difficult driving conditions north of Fort Liard; we had also had some drizzle there, without thinking much about it at the time.

But I enjoyed the entertainment during the conference. There was a golf tournament, and I (as a non-golfer) was asked to accompany a group of players, just to keep the ravens away. This was a sand course without any lawn at all, players had to refurbish each “green” after completing playing it, for the next users. I believe we started at 11 p.m. and the game went through midnight, with good visibility. I kept the ravens away and stood aside when they yelled at me that a ball was coming. One evening, we drove east on Highway 4 for quite a distance with Dr. Tabler, who was interested in the rocks of that area’s Canadian shield, and told us a story of how he and his young family had gone vacationing in motels through the Rocky Mountains in the USA. What he and his wife normally found “OK” as a nice rustic cabin to stay in for the night, was generally rejected by their teenagers as “What, no TV! Let’s get out of here and go somewhere else!” The sun had set when we returned to the Explorer Hotel.

Dr. Don R. Macleod (mentioned above) then saw an opportunity before we even panicked. He was known to both of us from his visits to Whitehorse, although he mostly talked to John Murray and Robin Walsh about their programs, for which he was program manager. **He wanted a share a ride with us to Whitehorse**, because he had an idea to do a visual assessment of the BST on the Alaska Highway, starting at Wonowon, BC, to near Whitehorse, and for that he wanted our joint assistance. He said that he had never driven this section of the Alaska Highway before, and was going to write a paper on doing visual assessments, for another conference! (He also

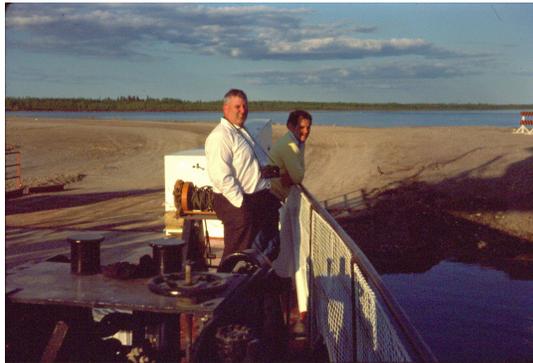
³⁵ Raised platforms existed for teeing off, with sand all around them, and here and there a little struggling evergreen tree.

³⁶ The water body in the background is likely Hidden Lake, as the photo was taken in a northerly direction, around midnight.

taught at Carleton University.) So that’s what happened. We had a courteous passenger and co-driver throughout, and much intelligent conversation for the **2,250 km long “bypass”** which would lead us through **Enterprise, High Level, Peace River and Dawson Creek**. We diverted twice from this itinerary, which took us much longer to get home, while the others flew back via Edmonton without even getting off the airport. Our spouses were kept in the loop. It was very pleasant to have a third driver, and **the three of us solved all the world’s problems** in these few days. Thinking about it after all these years, driving alone (without radio or musical entertainment) is actually **not nice at all**. (During the Grassroots days, I used to travel to the City of Surrey as my quiet time; no cell phone!)



◀ These two photos taken near ▶ Rae-Edzo, NWT, where Don wanted to inspect some newly laid BST, but it might be at another location of interest where we also took an opportunity for our bodily functions. Ray Magnuson had pioneered BST in Yukon during the mid-1970’s, and NWT had only later started using this technology.



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The harbour of Enterprise, NWT is actually a long inlet of the lake.

At Enterprise, Don suggested that we turn left and see two things: **(1)** The golf course at Hay River, supposedly the furthest north grass golf course in the world. “How can one argue with a Scotsman about golf?”, I thought, and so we did, also seeing the harbour where a row of boats lay, waiting to be towed across Great Slave Lake or down the Mackenzie River from this port, served by rail from Alberta. **(2)** We also travelled east to Pine Point, a “town site” 90 km further along the south shore of the lake, half of which was already being demolished and its railway abandoned. This was a sad sight: Boarded up houses in one subdivision, occupied houses in another part; the convenience store still somewhat in operation, not what it used to be. Decay all over! Wikipedia notes it was “deconstructed” in 1988: https://en.wikipedia.org/wiki/Pine_Point,_Northwest_Territories **If not on that specific day, we would never have seen it!** We returned to Enterprise and after ± 700km that day, overnighing there.

The next morning, as we headed south and into Alberta, Florian remembered that he had a cousin who lived in the Town of Peace River, and suggested that we make a (somewhat smaller) detour to go and visit him at such and such an address. That became a nice surprise visit for both: We crossed the Peace River and found the address, with him and his wife at home, and we had some coffee and cookies (or was it lunch?), stretched our legs and then returned back to Highway 2, heading west into British Columbia. I think we stayed in Dawson Creek that night, after another ± 800km. While doing the shared driving, Don brain-stormed us already with the ideas he had about the **“visual assessment”** process that the three of us would do the next day and a half, starting at **Wonowon, Mile 101**, the end of the highway under BC MoTH’s jurisdiction (and end of asphalt pavement at that time). Public

³⁷ This photo was taken on the return ferry ride, in the harbour of Hay River. Note the sandbanks behind Don and Florian.

Works Canada was responsible for the Alaska Highway north of there, because on a certain date, BC had rejected a proposal to take it over from the federal government, (as it was a liability?) until it had been upgraded and improved adequately. That's why PWC had one design office in Fort Nelson and one in Whitehorse.

From MP 101 on, **5 km markers existed**. Don's methodology with the "guinea pigs" was that all three of us would stop talking, and quietly observe the surface of the road in front of us, in terms of three criteria. After we had passed each 5 km marker, both of us would give him a rating (from 1 to 5) on each criterion. Sitting in the back, he would jot these numbers down and add his own. When we changed drivers, the one in the back would still do the recording. By the time we arrived in Whitehorse the next day, he had a few sheets with data, was quite satisfied with himself, and yes, he wrote a paper about it; also including the western section of the Alaska Highway, up to the border beyond Beaver Creek, and maybe also the Haines Highway. At that time, the asphalt paved section of the Alaska Highway extended for only a few kilometres east and west of the limits of the City of Whitehorse. Don's research actually stretched over many years, as I notice a 2012 paper about BST at the following website: <https://ctep.ca/wp-content/uploads/2017/05/Low-Volume-Roads-Don-MacLeod-2.pdf> so that now you, reader, may also read about it and I do not need to say anything more about it.

You may have noted the name **André P. Gagnon** above, as Deputy Minister, Department of Community and Transportation Services. Something should be written about him, as it leads to the rest of the story. At the time of the 1987 WACHO Conference, Wally Hidinger was Assistant Deputy Minister, Highways and Transportation, Department of Community and Transportation Services – as clearly printed in the Conference Program. Between the day of my hiring and 1987 WACHO, much had happened, administratively as well as politically.

Before my time, after the original federal devolution of power to the Commissioner of the Yukon,³⁸ the Department of Highways and Public Works (stated in the 1975 Highways Regulations) had already been split into pieces, one of them the Department of Highways and Transportation and another one the Department of Local Government.³⁹ (The **Highways Ordinance** overruled the **Municipal Ordinance** with regard to Territorial Highways.) These two Departments were (re)merged into a Department of **Community and Transportation Services** around 1985. Basically, the Municipal Engineering Branch and the Territorial Lands Branch were brought under the same umbrella Department with the acronym CATS. I do not really remember **when** this happened and **by which regime**. The Legislature had first been nonpartisan, (as the NWT Legislature still was in 1987) and when party representation started, the Progressive Conservative Party came to power (lead by Mr. Chris Pearson, who resigned in March 1985 to be succeeded by Mr. Willard Phelps), until defeated in a Territorial Election on 13 May 1985 by the NDP under Mr. Tony Penikett. Mr. Piers McDonald became its Minister of Education, Minister of Community and Transportation Services, and also Minister of the Yukon Housing Corporation. Though Mr. Andy Philipsen, the former Minister of Highways and Transportation, was re-elected as an opposition member, he died on 13 September 1985 when his commercial truck fell through the ice on the Dempster Highway, on the way to Fort McPherson. He was replaced by Alan Nordling in a by-election in February 1986. I do not know if Mr. Larry Blackman, P.Eng., announced his decision to retire **before** or **when within** these changes. He left by the end of May 1985. It might even be that he was somehow "ousted" (or elected to not cooperate with the NDP) before moving to a community south of Westbank, BC. Mr. Kurt Koken (A/DM, Department of Highways and Transportation, also retired at that time, and he went to live in the Vancouver area.

In March 1985, after hearing that Mr. Blackman was going to retire, I suggested that we take a **group photo** of all the staff of Highway Engineering, in the parking lot east of the Lynn Building. The purpose was to give him a framed enlargement on his retirement party, as a memento. To my knowledge, such photo had never been taken; Wally agreed to do this. It was a nice sunny but cold day; we did not stay outside for long. (The heating in the Lynn Building was actually often too hot.) The resulting photo (**on the next page**) shows all those working at

³⁸ This refers to the "**Jake Epp letter**" during Joe Clark's 3m term of office as (Progressive Conservative) Prime Minister.

³⁹ There may have been other "pieces" at the time, like "Public Works" meaning school buildings and court buildings. I do remember that the new Court House/Dept. of Justice building was handled by YTG staff in "Municipal Engineering".

Highway Engineering, except Peter Percival, P.Eng., who had just been hired to assist Robin Walsh on the South Klondike Highway program after the Mount Skookum project petered out. Wayne Breschears worked for Robin. Jim Symington (not my subordinate) was doing all kind of things that I cannot remember, and so did Richard Lloyd. (Jim Thom and John Jansen came later, and I think both of them joined us from PWC.) I had enlargements and postcard sized prints made, and colleagues bought them. Herb Redl, formerly a casual employee, had become a soils technician assisting Doug Andrews, and Yadvinder Dhillon had been hired as draftsman, coming from a mining environment somewhere outside Yukon.

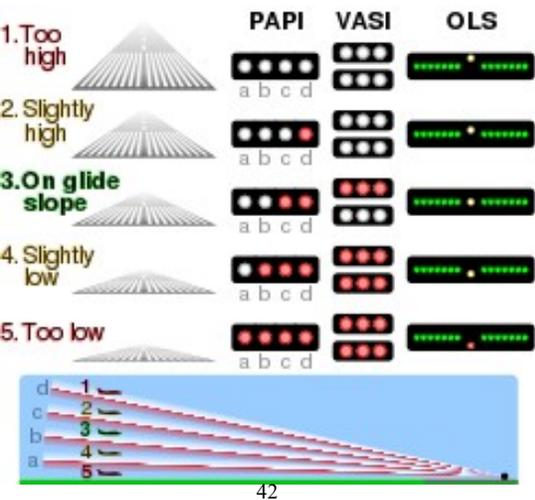


Rear: Brad Taylor, Herb Redl, Walt Gutowski, Rob Harvey, John Murray, Stuart Drummond, Wally Hidinger, Eric Becker, Jim Symington, Chester Kelly, Richard Lloyd, Robin Walsh, Jacob de Raadt. **Front:** Yadvinder Dhillon⁴⁰, Wayne Breschears, Shelley Aucoin, Florian Vedress, John Cross, Doug Andrews, Howard Joe. **Absent:** Peter Percival. (Shelley's assistant, Dawn ..., had not been hired, as well as John Jansen and Jim Thom).⁴¹

Something should be added about the design and construction work at the **Class B & C Airports** in Yukon. Design of improvements / upgrading at **Mayo Airport (Class B)** was already underway in 1984, Walt Gutowski had done the design for lengthening the east-west runway toward the east, major drainage improvements to accomplish that and the installation of the Visual Approach Slope Indicator or VASI lights, (see next page) at **very specific locations**, with its electrical wiring and permitting. This was all done with the co-operation of the other

⁴⁰ Yadvinder told me that he needed to speak English to his wife (whom he had met in Canada). Although both had been born and raised in India, she did not understand his native language, and he did not understand hers.

⁴¹ The photo was taken with my Kodak Retinette 1A camera on a tripod. Moments later, Brad Taylor placed his camera on my tripod (for a second shot, just in case). He was still adjusting his camera when a Yukon Times photographer came by, snapping us with Brad's bum toward his lens. Obviously, **that photo** next day appeared in the newspaper!



branches of YTG like the Chief Electrical Inspector and Transport Canada in Ottawa. Any project is always multi-disciplinary, as nobody can really work in a vacuum. **“No man is an island, indeed.”** Funding for this work seemed to be one of the problems at the time; Nate Casselman knew it and was not always happy with progress of funding of needed airport projects.

The work was contracted out, but like many such things, any existing **“infrastructure”** still needs regular upgrading work, for on the website of Yukon’s current **Ministry of Highways and Public Works** (yes, individual Department names can also be changed, even to what they were before) <https://yukon.ca/en/departement-highways-public-works> one may note what happened recently, and I have therefore copied the following **on the next page**, to show what “infrastructure improvements” really mean in Yukon.

Government of Yukon invests in Mayo airport

Published 14/07/2020.

Yukon’s newest certified airport⁴³ will soon be equipped to handle night flights. Starting this summer, the Government of Yukon will be installing a modern, energy efficient airfield lighting system, including LED lights and other electrical enhancements, to make the airport useful throughout the long Yukon nights. Electrical upgrades will include runway edge lights, taxiway and apron edge lights, apron floodlighting, new windsock towers and illuminated guidance signs. Estimated at around \$1.75 million, the construction is anticipated to begin in August, with expected completion by November 30, 2020.



The current listing of Yukon airports and aerodromes shows **29 such facilities**. I remember handling minor

⁴² Copied from https://en.wikipedia.org/wiki/Visual_approach_slope_indicator to show the various different systems.

⁴³ **Media Release of 14 November 2019:** “Following extensive upgrades, the Mayo aerodrome was certified as an airport by Transport Canada on November 1, 2019. The certification will allow the Mayo airport to support scheduled service on a long-term basis in anticipation of continued resource development in the region, increasing travel options for travellers, industry and Mayo citizens. Several upgrades were completed prior to certification, including runway rehabilitation and the purchasing of new maintenance equipment and facilities. New runway lighting has been designed and will be in-stalled in 2020–21. Currently the airport supports commercial day operations and night operations for emergency services. Upon completion the runway lighting will allow night use of the Mayo Airport for all users.

projects at some of them, with “Service Contracts”, like brush clearing, supply and installation of a new windsock – with a site plan showing Transport Canada’s requirements – at **Burwash Landing** and **Dawson City**, and other brush clearing work at others – through the local Roads Foreman – and researching what could be done with the



Carcross Airstrip⁴⁴ and **Pine Lake**, (a.k.a. **Daughney Lake**, the emergency airstrip north of the Alaska Highway near the Swift River Highway Maintenance Yard) where there was a squatter, surveyed lots and a narrow access situation⁴⁵. A major resurfacing at **Cousins Airstrip** (now called an aerodrome) was also needed. We jokingly called this “**Whitehorse Municipal**”, analogous to the airport situation at Edmonton. This single runway did not meet the required grades; it had quite a dip in the middle, and the north and south grades were too steep. So we designed an earthworks project to fill in this dip and solved the grade problems, like “killing two flies with one swat”. The material was a bit sandy, so that we capped it with good gravel from the nearby Crestview pit. Industrial lots (for private hangars and aircraft related businesses) had recently

been surveyed adjacent to the airstrip, and we addressed a rough and winding bush trail access situation by constructing a proper access road starting at the Alaska Highway, obviously at a good access point (**photo** taken on my return from Fairbanks, **below**.) Cousins Airstrip was (and is) classified as the “**emergency runway**” for Erik Nielsen Whitehorse International Airport, named after the long serving Yukon MP who had been a Canadian Deputy Prime Minister⁴⁶ and was still alive. **Braeburn** Aerodrome still lists under its “Services” (the only one!): **cinnamon buns** (at the convenience stop on the Klondike Highway, where I often stopped on the way home).

Faro Airport was also affected by my work and that of my subordinates. The highway to that Town (and mine) **ran almost through** the runway. This situation had existed (and been tolerated) since the Faro Access Road was built in **1968**, when Jean Chrétien was Minister of DIAND; at the intersection on the Campbell Highway was a billboard sized sign stating that he had opened the road and bridge across the Ross River. But something needed to be done to fix this deficiency (urged by Transport Canada?), particularly when Curragh Resources planned to reopen the mine and haul lead-zinc concentrate to Skagway with YAT. Chester Kelly and I sat down and developed a **bypass concept** around the west end of the runway, outside its “clear zone”. This would make the route longer but also much less steep than the existing one with a flat spot where it crossed the runway. The concept was shown to Wally and also to Mr. Blackman (who had trained pilots during WWII) in the early spring of 1985. He agreed: A site survey, complete with cross-sections, was started, and clearing an adequate swath of land commenced that same year (by Contract, before the highway design was even completed!). A geotechnical investigation was undertaken and the results were favourable. I once flew to Faro with **Mr. Richard Trimble, P.Eng.**, of EBA Engineering Consultants Ltd, in that company’s single engine Cessna, (with the registration letters **CF-EBA**; it had been owned by Mr. Elmer Brooker, P.Eng., the founder of the firm) to finalize terms of reference of their geotechnical responsibility. That day, I returned to Whitehorse with Chester, in his rental truck – Richard had to fly somewhere else. With Curragh Resources’ and YAT’s plans taking shape that year and almost nipping at our heels, we “fast tracked” the project and were using our collective brains to have the road built in time. We were very glad that the Land Use Committee co-operated all the way:

An earthworks contract was then advertised and awarded; the work was completed without mishaps. The GoogleMaps imaging **on the next page** shows some of the actual restraints that we had to overcome.

⁴⁴ This airstrip was once “temporarily” approved for a 6-month period, in the 1950’s. Due to its inadequate runway length of 2,200 feet, it was never authorized. It cannot be extended east because of Tagish Lake, nor west because of Highway 2.

⁴⁵ A major “fly-in” with the 50th anniversary of the Alaska Highway was another reason. This airstrip is now abandoned.

⁴⁶ Canadian airports are/were normally named after Prime Ministers. This custom also existed in South Africa at the time, and normally after their death: **Louis Botha** at Durban, **Jan Smuts** at the Witwatersrand, **J.B.M. Hertzog** at Bloemfontein, **D.F. Malan** at Cape Town, **J.G. Strydom** at Windhoek (Namibia), **H.F. Verwoerd** at Port Elizabeth, **B.J. Vorster** at Kimberley and **P.W. Botha** at George. I wonder which of these airport names are still in use, if any.



(1) Going around the airport on the east side was out of the question; (2) the very sharp curve where the existing road crossed the high-voltage power line from Whitehorse via Carmacks existed; not to be negatively impacted; (3) the Pelly River (Anvil) Bridge was obviously not to be touched; (4) the Transport Canada airport “clear zone” requirements had to be met, and (5) there were two little ponds and the escarpment down to the Pelly River to deal with. The long sweeping curve (a complete half circle!) had seemed to us the best workable solution, with some minor juggling below it, to make use of the north facing steep slope and some rock outcrops. It is actually a pity that this road was only used for a few years, as mentioned above on **page 28**, or until almost everything had become “in limbo” at Faro. (GoogleMaps did not do “streetscape” there in 2009.) Is the place still alive today? Do people live there?

There were all kind of proposals to extend the mine to the north, which came up in Land Use Committee meetings and were greedily absorbed by the newspapers and CBC North. Faro had two interesting features: (1) A motel with a sloping floor, (I never slept there, but Chester and the construction survey crew did), and (2) The local attraction (a.k.a. night life?) namely an 11 p.m. trip to the garbage dump, where one could encounter grizzly bears. Mr. Jim McLaughlin was the Yukon Legislature’s only Liberal member in those days. Before 1985 and also again after 1989, Mr. Maurice Byblow represented Faro, first as an independent, but later for the NDP.

But on **2020-07-17**, while writing these memoirs, I noted an amazing thing: Order-in-Council 1987/100 under the Highways Act, signed by Mr. J.K. McKinnon as Commissioner of the Yukon on 14 May 1987, **doesn’t even show the Faro Access Road** among the **numbered** highways designated as Territorial Highway, in Section 8(1)(a) or (b), but **shows it** among the many **unnumbered** highways designated as Territorial Highway, in Section 8(2)(a), called **Mitchell Road**. We did not use that name for the Faro Access Road, nor did PWC.

I am at a complete loss on how somebody would be able to interpret this Section (3) of the OIC, on the next page. Was the Faro Access Road a Territorial Highway **before the OIC, or was it not?** Might it be true that, just like Mr. Warren Lefaves’s winter road (**see above**), the **Faro Access Road** (connected to the # 4 Campbell Highway) only **became designated as a Territorial Highway** on that day in 1987, after millions of (federal and YTG)



of my colleagues were (heavy) smokers, that difficult chore might likely have caused resentment with some. But I never closed the door for any of my subordinates to have a word with me. Due to a multiplicity of project files of all kind that I was constantly barraged with, my office was normally a bit messy. **It still is!**

This project was completed successfully in 1986, in time for YAT's hauling operations, as can be seen from the photos on **pages 32/33** above. Ending this particular project's report, an additional situation came to mind: YAT wanted to have YTG build a **truck stop** on the Campbell Highway, about halfway between Faro and Carmacks. They requested a site opposite/next to the **Little Salmon Grader Station**, at the bottom of steep ($\pm 8\%$?) **downhill stretches from both sides**. I recall that a gas station and convenience store existed there, but not if YAT had already received support from the Roads Foreman (and/or of his wife who ran that store!). But when I pointed out that such location would be the **absolute worst of all to pick**, because from a stop in a dip, quite a lot more fuel would be spent in regaining operating speed, (whether loaded with concentrate or with mine supplies), would be **very uneconomical** at least, and **entirely stupid** at most. The proposal was then dropped. The RTAC Manual in use in those days (following the 1954 AASHO Guidelines and its derivatives), assisted me in pointing this out.



In Alberta, precast concrete pipes and cast-in-place concrete box culverts were normally used for highways, but in Yukon, these drainage structures were all made from **corrugated steel pipe sections** that came by truck from "outside", and perhaps that is why ARMCO's "nestable" pipes had first been used (saving truck volume). But in the 1980's, these had already been phased out, including their strange connectors. Materials could only be taken north during a certain time of year, due to road bans, and could only be installed during another certain time of

year, due to “**fish hatching situations**” – which have since that time become much stricter all over Canada. These structures (like Albert Creek on Highway 37) replaced original timber bridges, and a sub-program existed on the **South Canol Road**, between Johnson Crossing and Ross River. **See pages 15/16**. The lowest highway crossing of a river or creek is always called Crossing # 1, so that obviously Rose River # 5 had a smaller catchment area than Rose River # 1, where a long double Bailey bridge existed that did not warrant replacement at that time, due to the minute traffic volumes.⁴⁷ The road’s “winter closure” was perhaps tough luck for people like “Yukon Erik”, who had a cabin on Quiet Lake, but normally flew there anyway. The **North Canol Road**, from the seasonal Ross River ferry to MacMillan Pass, the NWT boundary, was nobody’s job; I never crossed that ferry or the footbridge.

The (re)-installation contract for **three multi-plate culverts** had been awarded, and for a reason that I cannot recall, the work was not completed by close-down in mid-September 1981. In the early spring of 1982, a huge flood on the Rose River had resulted in a mass of steel washing down the river, destroying all the work that had been done. So Walt Gutowski had gone there in the summer of 1982, determining how many new plates of such and such a configuration were needed, how many additional sheet wall sections, bolts and nuts and the like.⁴⁸ At one time or another (before my arrival in Yukon), Highway Maintenance had also done their very best to redo and complete some of the work, indemnifying the Contactor(s), until another flood came down,⁴⁹ so for the second time, replacement parts were already on order when I arrived before the winter of 1983/84. New contracts then had to be written for the **1984** construction season. If I remember well, I suggested to have the materials brought to the **Teslin** Grader Station, but was told that though this was closer from Ontario, it would be counterproductive. “Logistics” did not make it possible; I guess that for Albert Creek (near Watson Lake) this would have worked.



This **composite photo** (Rose River # 2 installation in 1984) shows the work required for this type of project:

(1) Traffic had to be maintained with a detour (**at right**); the existing bridge had long been demolished.

⁴⁷ The 120 ft. long Bailey bridge at Rose River # 1 (which was never even suggested for a replacement culvert!) washed out in 2008 and was rebuilt in 2009 with “spare parts”, of which YTG had many. This road closure (?) stopped GoogleMaps to go there in 2009 and since. I wonder if any other bridges on the South Canol Road might also have been rebuilt as Baileys.

⁴⁸ These materials were normally supplied to the Contractor by YTG. Tendering would otherwise become impossible!

⁴⁹ I later learnt from Eric Gibson that **a major error** existed on the (then) 1:250,000 topographical map for this area, so that the Rose River catchment area had been grossly miscalculated, and that 1:50,000 maps did not exist for the area, due to the lack of population and the foreseen priorities in Ottawa about completion of the 1:50,000 map series.

- (2) The truck is green/blue, meaning one of the “rental trucks” that were leased for the season, mostly from General Motors. Most pick-up trucks in Yukon were Fords, Whitehorse Motors was an iconic Yukon dealer.
- (3) The person behind the steering wheel is **Brad Taylor**; I must have visited him that day while he and a crew stayed at **Quiet Lake Grader Station**; the Roads Foreman had accommodation there, and meals were provided.
- (4) Lots of steel sheet wall, both upstream and downstream sides, which had to be tied back with steel cables into the embankment itself, with pipes, above and on both sides, with “wing walls”.
- (5) The two multi-plate culvert sections have already been installed, and both **inlet and outlet ends** are clearly visible while side backfill is underway in the middle of the roadway. Flow is obviously from right to left.

Now **why** would I go with Brad to those project sites **that day**, instead of using the truck (a Ford 19-365), but the Chevrolet 19-363? Due to its lack of gravel (or calcium chloride treatment?), the South Canol Road was notoriously slippery at times. (Without an application of CaCl₂, it would have been notoriously dusty. Add to that mix a little bit of rain, and it would be very slick the next day.) My photo shows that at km 146 (north of Quiet Lake) I slightly lost control, ever so slowly but surely veering to the left. From this, the **photo at right** was **not taken on the same day** as the ones above. (The print format is different.) But Brad pulled me out, and laughed. **Was I glad to use the radio phone!**



This contract included the construction / maintenance of three bypasses and diversion bridges. The photos from a **May 1985** site (with **Brad at left** on the photo right) show that the Contractor was unable to complete the project in 1984.



Rose River #5 diversion bridge, ►

◄ Sidney Creek diversion bridge.

To put the work on the South Canol Road in **context**, it might be good to know traffic counts. **Placer mining operations** existed (e.g. where Ken and Gloria McPhee went every summer, or was theirs on Irons Creek?) close to Johnson Crossing, as well as cabins along the river, and there was **hunting** (that’s where Vic Sokalski’s moose was stolen, “**one half at a time**”, so that he went home and wrote a complaint letter to the newspaper!) I also do not know how many (or few) cabins existed along the east shore of Quiet Lake, south of the Grader Station. In the summer of 1985, we also installed a multi-plate culvert at Cottonwood Creek, km 62, south of Quiet Lake.



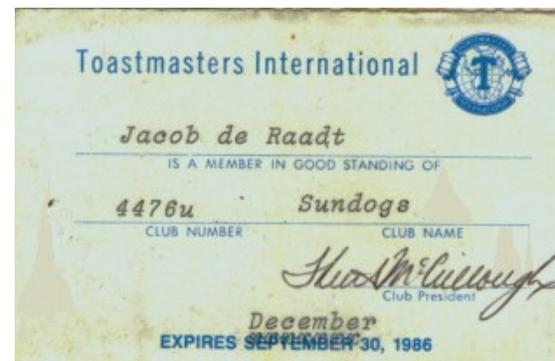
Quiet Lake, looking south.

But from the 2011 **Yukon Traffic Count Summary**, which I found on-line, I know that **traffic was very light**, and that after 1992 (and ± **22 vehicles per day**, for **3 months**), traffic counting at km 100 was **discontinued**.

TABLE 138: KM 100 SOUTH CANOL ROAD (QUIET LAKE) AMDT

YEAR	MAY	JUNE	JULY	AUG	SEPT	ASDT
1984	*	*	34	22	20	*
1985	*	*	*	*	*	*
1986	*	*	*	*	*	*
1987	*	12	26	22	*	*
1988	*	*	*	*	*	*
1989	17	10	31	36	35	26
1990	17	31	34	36	40	32
1991	15	20	17	33	35	24
1992	*	*	22	22	21	*

In 1984 already, through Mark and Nora Hambridge, I joined the **Sundogs Toastmasters Club**. This club had men and women members; Whitehorse Toastmasters Club had male members only, and there was also a Toastmistress Club of another US-based international group. I paid annual dues, was formally inducted, and faithfully attended weekly lunchtime meetings at the Whitehorse Public Library, studying documents on “set speeches” about public speaking. **Ruth McCullough** (of the YTG Art Gallery) and **April Neave** (of the Yukon Chamber of Commerce) were both active in the club, as well as **Pat Buckley** and **Jim Taylor**. In my “**Ice Breaker Speech**” titled “**Are you a filler-upper, Sir?**”, I told how my fairly recent sudden September 1982 unemployment woes had been wonderfully “relieved” at Will-Win Gas in Calgary, and its aftermath, which was of course the job offer from YTG and our move to Whitehorse (in “Part 3”). I followed with



50



(Year of parade not known)

a new speech on a fairly regular basis, one of them titled “**On the South Canol Road**”, relating how the Teslin RCMP vehicle had somehow “**crashed**” while backing up into my rental truck near Johnson’s Crossing and its quite comical outcome, quoting a long legal document that Her Majesty, Queen Elizabeth II, was not responsible! With the first speech, I later won the annual joint Speech Contest of the three local clubs; with the second one, I won a Speech Contest during a Humorous Speech contest in Anchorage. I also made a speech about the “**crest**” **situation**, lampooning Mr. Penikett (outside Yukon). I have very fond memories of all the club activities and those of YACT, the **Yukon Alaska Council of Toastmasters** and its Spring and Fall Conferences, which were mostly

⁵⁰ **Roberta Welsh** (at right) from Sundogs Toastmasters Club, leading informally during one of the YACT seminars of 1988-06-25, at Fairbanks, Alaska. She ran a private counseling service in Whitehorse, once visiting us in Langley, BC. Sad to say, after Mike Hambridge left, nobody from CATS participated in Toastmasters; only Richard Lloyd sometimes came as visitor.

held in Anchorage but occasionally in Fairbanks or Juneau. In April 1987, at Anchorage, (when Lydia went with me) it was my privilege to introduce **Mr. Doug Bell, Commissioner of Yukon**, to a mostly US audience; Mark had invited him to deliver the Keynote Address of that conference, as a “lapsed” member of the Whitehorse Club. In June 1987, we had a Summer Conference at Whitehorse with the slogan “**There are strange things done in the midnight sun**”, (à la Robert Service) and a party like none at Takhini Hot Springs. The clubs also had a “float” during the annual Klondike Parade, with me among others standing in the back of a Northland Beverages pick-up truck, trying to convince the public to “**join us soon**” with a microphone in my hand and red headwear. I completed all speeches for the ATM designation (Able Toastmaster) and when we left Yukon, had already delivered two or three speeches for DTM, the next level of competence (Distinguished Toastmaster). I also served as YACT Director for Yukon, and obtained several certificates for winning competitions and for “Distinguished Service” as the 1987 Summer Conference Coordinator. Later, when working for Crippen Consultants in 1992 in downtown Vancouver, I sometimes attended in-house club lunch meetings, but did not join. Alas, during mid-1988 already, I started to lose interest; it seemed to me that speech evaluation procedures (as used by some club members) criticized my (heartfelt and controversial, and also political) content more than what to me seemed to be required about the delivery. Unfortunately, I also found the whole set-up of the organization too overly *American*.

In the fall of 1984, Highway Engineering welcomed its first draftsman, **Yadvinder Dhillon**. Before that time, all Engineering Technologists had all done their own (manual) drafting with pen and ink, the juniors likely working for the seniors. One of the first things Yadvinder was told to do, was to sort out a small room with drawings, inherited from various agencies and through the decades (but mostly from PWC). He came upon a few rolls of orange checkered cross-section paper with ground line cross sections and no design as such, just like the ones I had prepared in 1966 on the other side of the world. The mystery was resolved⁵¹ when discovering that these rolls were for a design of the **Freegold Road**, that had at one time been envisaged to serve a gold mine west of Carmacks. There had been an anticipated extension of it, all the way west to Beaver Creek, as an alternative route to the Alaska Highway much further south. **PWC had had some ideas!** Nothing was done about it in late 1984. These drawings were put back in storage, and in some peoples’ brains. (It may well be that Brad Taylor, a former PWC employee, resolved the situation; the rolls themselves were completely unmarked, and Brad was just to start the investigation on the Casino Trail, which was/is the extension of the Freegold Road. **See below.**)

YTG was contractually responsible for maintenance of the Alaska Highway, including the new section between Jakes Corner and the Town of Teslin. At that time, **Yukon Electric** (= the Northern Canada Power Corporation) operated a diesel generator at Teslin. This was not connected to Yukon Electric’s main grid, based on the hydro-electric Whitehorse Rapids Power Plant, which served the city, its surroundings east up to Jake’s Corner, south (to Carcross) and north (to Carmacks and also to Faro), and west up to Haines Junction. The grid also included the Aishihik Power Plant (to which I drove only once). The expansion of the plant at Whitehorse Rapids by a fourth turbine made it possible to extend the electric grid to Teslin and disassemble the diesel plant there (or keep it as a backup I case of power outages). Under the auspices of APEY, I attended an evening tour into the very deep hole where this fourth wheel (for \$ 58 million) was to be installed, huge for Yukon (but probably not that huge compared to other hydro-electric plants). In order to get the electricity to Teslin, wires had to be strung along the brand new section of the Alaska Highway, and in early 1985, I was instructed to direct **Mr. Gary Reynolds**, their competent technologist, to determine a route for their in-house design drawings and in-house installation of poles and wiring. So I went out with him and carefully drove to Teslin, noting where all the poles, overhead guy wires and stays should be located, in order to limit (or eliminate) their maintenance problem and cause the least interference with traffic, highway maintenance operations and even the results of crashes. It was at that occasion that he told me that glass insulators were no longer made in Canada (and the United States?), and that Yukon Electric bought them from Brazil. Gary was very happy with the constructive comments I made that day, which (he said) were quite different from his earlier experiences with YTG staff! He even wrote a letter to the Government Leader (Mr. Tony Penikett) about in (on Yukon Electric letterhead) of which I later read the Minister’s response (on the

⁵¹ This small room was on the east side of the Lynn Building, without a single window, only meant for storage, of course.

circulating “**reading file**”!) It had also been a pleasant experience for me, so contact was kept up with him. Wiring was installed that summer, and after the 4th wheel had been completed in December 1985, electricity started to flow to Teslin and the (few) private customers along that highway section.

I also saw Gary Reynolds sometimes at joint Toastmasters venues; he was a member of the Whitehorse Club. He also had to deal with the disposal of many old transformers that contained **PCBs**; these were stacked along the South Access Road, near the Whitehorse Power Plant, and needed a special permit. But Gary Reynolds died before we dad left Yukon, and he was not even “old”. Yukon Electric is now called Yukon Energy. It was a progressive utility company; our subdivision was fairly new (without back alleys), and we did not have ugly electric wires in the street. Our house was actually served by an overhead wire from a pole in the back corner, from which three or more houses were served. I believe that the electric grid system in Riverdale was similar.

Another co-worker who died was Mr. Larry Blackman’s personal secretary/typist, who lived around the corner from us on Balsam Crescent. Her name was **Sue Morrison**, and she died of an aneurism, over a New Year’s Day weekend, and we only heard about it at work after she did not turn up there. None of the co-workers under my “line of command” died or had major accidents or surgeries during my 5¼ years with YTG. Of the senior management, only Mr. André P. Gagnon died, and I believe it was of brain cancer. He was not long in Yukon.

Some memorable visits to tote trail funding application sites (and other land use applications like **Ag. Aps.**) need to be recorded: I once flew by helicopter to **Moosehorn Mountain north of Beaver Creek**, for an application to fund a long winter road starting near Customs on the Alaska Highway, north and east along wet ground, to the bottom of this mountain where exploration work was done. Accompanied by somebody from DIAND, we first flew to Beaver Creek, where a helicopter had been chartered. We landed on an airstrip just north of the summit, and were told that it had been condemned by Transport Canada, for being **too short** (only 900 feet?) **and too steep** (over 3% slope?). It had been built for one-way use: “**down the grade**” (=SW) for departures and “**up the grade**” (=NE) for landings! Exploration was conducted of a small gold vein at the summit; the geologist showed us the shining flakes in the ore body, and we could see the trail down the valley on the east side, where a previous winter road had been. The application was approved, and I sometimes wondered if this ever resulted in a profitable mine. It was, but only till 1996! <https://ingold.ca/projects/yukon-properties/moosehorn-project> **Sic transit Gloria!**

I once drove with a young female DIAND employee to conduct several site visits between Teslin and Watson Lake. We first drove through the “**Old Alaska Highway**” section (see below), and then the Pine Lake Airstrip, and then a Tote Road application (for logging) that included a new bridge across a creek, just west of the village of Upper Liard near Watson Lake. The structure proposed was a **flat railway car**, to be installed on timber abutments and with timber decking. This excellent and innovative type of “**steel recycling**” was just getting off the ground at the time; the applicant stated that he had already ordered one in Prince George. It took us longer than expected to evaluate the merits of the project and some other work. On our return, this young lady (who was tired, and her name was Lauren or Lorne, if I am not mistaken) suggested that we overnight in a small lodge (and I cannot recall if it was at Rancheria or Swift River.) They had only one room. We decided to drive on, back to Whitehorse. I write this not to be proud of my ability (?) to resist possible temptation (?) that day, but to show that being vigilant at work is always needed. “Lead us not into temptation”, the Lord Jesus taught his disciples (including me) to pray. **Doug Andrews** later conducted the completion inspection of that tote trail, and returned with two clear black and white Polaroid photos of the former **Canadian National Railways piece of rolling stock**, with the bogeys removed. Great idea! I sometimes wonder if this was the logging company that was bought by the NDP government, and caused a scandal when it suddenly (and promptly) proved to be not such a good investment.

Another adventurous trip was the flight to Dawson City and helicopter trip to **Rusty Mountain**, with Perry Savoie. This destination (a large proposed mining exploration site) was quite a distance east of Keno City, and we never even touched down there. After turning around, the pilot showed us the remnants (water glimmerings) of the original caterpillar tracks heading north as the **Wind River Trail**. This had been the first winter road link with Fort McPherson, NWT, long before the Dempster Highway was even conceived in Ottawa during the Diefenbaker

years (1959-1963). Nearing **Dawson City** on our return flight, I had a full bladder, and politely but urgently asked the pilot to touch down on the gravel on the north side of the Klondike River, for my pit stop. He gladly found a convenient spot, and five minutes later, we were back at the Dawson City airport. In mid-2021, I understand that **ATAC Resources Ltd.** (who wants to build the **Tiger Tote Road** into the area) is not yet fulfilling an agreement dated 21 January 2018 with the First Nation of Na-Cho Nyäk Dun and the YTG.

With Florian, I once conducted a **Tote Trail application** site visit near **Burwash Landing**, south of the Alaska Highway and into a long steep valley of the St. Elias Mountains. It was an extremely rocky creek bed, with huge boulders, so we left the truck and continued on foot for about a kilometre and a half. We had DIAND mapping with us and knew the limits of the funding application. Reaching the end (and finding nobody there), we saw a “short cut” cat trail, west of the creek bed, and (**adventurous me!**) I suggested to Florian that “**I’ll take the high road** (meaning over that short cut with a gentle hillside halfway) **and you’ll take the low road** (meaning the creek bed that we had come by)” and so we parted ways. But halfway up this trail, where it had already flattened out, I suddenly saw **very fresh bear scat, right next to where I was walking!** Dead scared, I ran forward for my life, not looking back even once, and was able to arrive where we were to meet each other. I had quite some time to relax until Florian reached our rendezvous, and he said “**But Jacob, you are white as a sheet! What happened?**”

There was also the situation west of Dawson City on the Top of the World Highway, where my truck was stuck on a Tote Trail application site visit, going over freshly downed timber, when I used the first generation mobile telephone that only civil servants used. Back in the office, Brad Taylor swore that I had cried “**Help!**” (while I knew that I had not, as I was very close to somebody to pull me out of the muck, and my main concern was getting back on the ferry; there was no motel west of the Yukon River). That “**radio telephone system**” had been pioneered by Ray Magnuson, and a unit was installed in every YTG truck and also in the rental trucks. In my office, I could also use it. Convenient perhaps, but I did not use it as much as I knew that others did.



In June 1984, we visited the Warm Bay, Atlin, BC, cabin owned by friends of Al and Margriet Aasman for the day. On the **photo left**, Lydia ◀ and our children are along the shore; the **right photo** was taken ▶ at **midnight on the Atlin Road**, on our return trip. The lack of darkness at night bothered us sometimes, but that is a situation one cannot change.



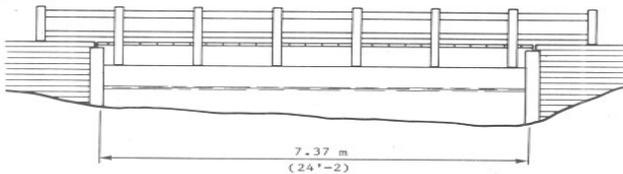
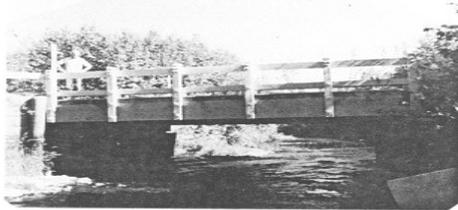
I only remember visiting Atlin again once, during survey work for realignment. A very small sternwheeler called Tarahne was lying on the beach, and there all kinds of ideas to restore it and make it a tourist attraction. These have come to fruition <https://explorenorth.com/library/ships/tarahne.html> but the one at Carcross was set on fire.

Eric Gibson is in the photos (on the **next page**) of **Snafu Creek Bridge** (left) and **Tarfu Creek Bridge** (right) on 1984-08-18, taken by his (then) PWC colleague G. Hibbert. These details of the bridges on the Atlin Road are copied from the PWC Bridge Inspection Report, 1984, with two pages per bridge on the Yukon highway system.

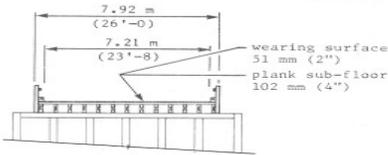
After completing a survey on the **Tagish Road No. 8** in 1984 for resurfacing work, two survey crews were to proceed with a survey the **Atlin Road No. 7**, where a few horizontal curves could be eliminated by realignment and widening, plus the replacement of two timber bridges, at **Snafu Creek (km 25.9)** and **Tarfu Creek (km 29.8)**. This highway had been built by the Canadian Department of Defence, Northwest Highway System (NWHs) after it had taken over the Alaska Highway from the US Army in 1946. Completed in 1951, its south half had already been improved by the BC Ministry of Highways and Transportation. The unimproved Yukon section starts on the Tagish Road close to Jakes Corner on the Alaska Highway, and runs due south, with km 42 on the 60th parallel.

PWC's Bridge Inspection Report (their first ever) had rated these two bridges as **"8 - good condition: no repairs necessary"** on 1984-08-18, and we received a draft copy later that year of from PWC in Whitehorse. Anticipating future repair needs, we sent out survey crews in the late spring 1985, to be lodged at Jakes Corner. It may well be that Mr. Ray Magnuson (born in Atlin in 1937, who started working on the Yukon highway system as a heavy equipment operator in Swift River) had made a plea to Mr. Larry Blackman and/or Mr. Kurt Koken and/or Wally Hidingier about **"When are we ever going to fix our portion of the Atlin Road?"** But it was (and remains) a very scenic road, and the geometric design (near these bridges) was quite poor. We at YTG were all set to go and reconstruct / improve the Atlin Road over the next decade or so, based on modern design criteria.

NAME: SNAFU CREEK BRIDGE
 LOCATION: ATLIN ROAD No. 7, km 25.9
 YEAR BUILT: UNKNOWN



ELEVATION

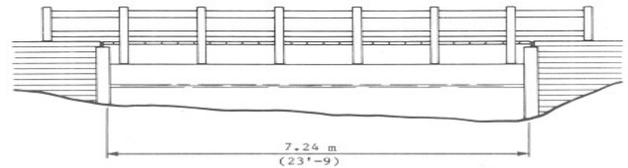
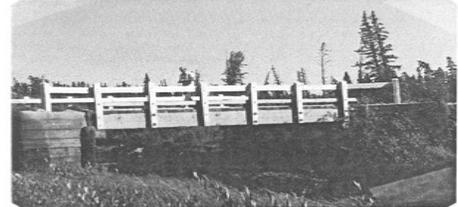


SECTION

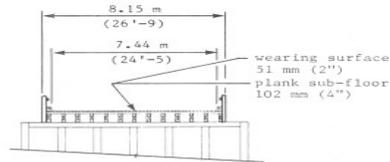
NOTES

1. Rock filled timber crib abutments behind timber pile retainers.
2. Timber plank decking on timber stringers.

NAME: TARFU CREEK BRIDGE
 LOCATION: ATLIN ROAD No. 7, km 29.8
 YEAR BUILT: UNKNOWN



ELEVATION



SECTION

NOTES

1. Rockfilled timber crib abutments behind timber pipe retainers.
2. Timber plank decking on timber stringers.

NAME: SNAFU CREEK BRIDGE
 LOCATION: ATLIN ROAD No. 7, km 25.9
 YEAR BUILT: UNKNOWN

GENERAL CONDITION RATING: 8 DATE OF INSPECTION: 84-08-18

OBSERVATIONS

DECK: Deck timber was in fairly good condition.
 CURBS: Timber curbs were in good condition.
 RAILING: Timber rails were in fair condition.
 GIRDERS: Timber stringers were in fairly good condition with minor splitting.
 ABUTMENTS: Timber abutment cribs were in fair condition.
 EMBANKMENTS: Both embankments were in good condition.
 REMARKS: Structure was generally in fair condition.

Note: Previous General Condition Rating: None
 Previous Inspection Report: None
 Original Design: Unknown
 Plans available: No

NAME: TARFU CREEK BRIDGE
 LOCATION: ATLIN ROAD No. 7, km 29.8
 YEAR BUILT: UNKNOWN

GENERAL CONDITION RATING: 8 DATE OF INSPECTION: 84-08-18

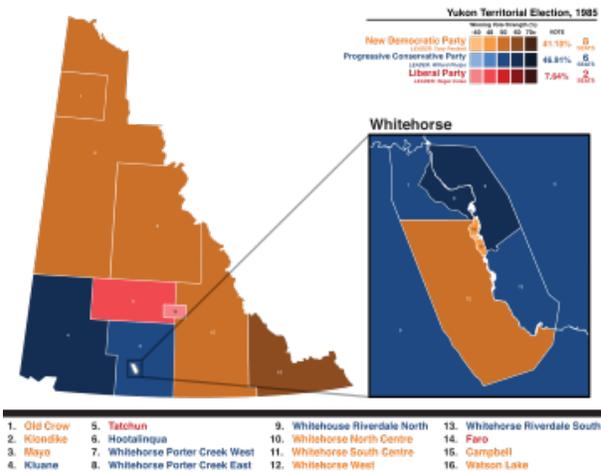
OBSERVATIONS

DECK: Deck timber was in fairly good condition.
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 RAILING: Timber rails were in fair condition.
 GIRDERS: Timber stringers were in fairly good condition with minor splitting.
 ABUTMENTS: Abutment timber cribwork was in good condition.
 EMBANKMENTS: Embankments were in good condition.
 REMARKS: Structure was generally in fair condition.

Note: Previous General Condition Rating: None
 Previous Inspection Report: None
 Original Design: Unknown
 Plans available: No

But then the Yukon Territorial Election of **13 May 1985** (quite unexpectedly) brought in an NDP government: (My uncle in Edmonton told me in May 1975 how **awfully bad** the Barratt NDP government was in British Columbia.)

Mr. Piers McDonald became our new Minister. Elected as the MLA for Mayo in 1982, he had been a miner at Elsa and President of the Yukon Federation of Labour. He (and the new Cabinet under **Mr. Tony Penikett**) decided to have a “fresh look” at the projects that Highway Engineering was planning to get built, and then made some quite unforeseen changes, which I hope to outline next, to show the different political direction to be followed. Without trying to be judgmental toward anybody, it is my firm belief that the culmination of the socialistic changes in direction, as it affected my position and its heavy workload, eventually lead to my discharge in January 1989, **but I must (and may!) also see God’s hand in it.** He is and remains the primary cause of all things that happen to us by way of secondary causes – and that should never be forgotten. The **small Map (at left)** ◀ shows that the NDP only had the majority support of one Whitehorse area riding. I guess other YTG employees also suffered.



(from Wikipedia, showing the party colours.)

(1) A preliminary study was needed of PWC’s **Freegold Road route**, which had been named **Casino Trail** by that time. “What type of study is actually required?” and “Who will do it?” were floating around for a while. In the end, it was decided that it could and would be done “in-house”, by **Brad Taylor**. He was an Engineering Technologist III under my “line authority”, but in his degree in Geography (University of Saskatchewan), he had taken a few courses that included doing this type of study. He would use an existing matrix of various land form parameters as well as other data to indicate possible advisable and unadvisable locations of this route, also using the old PWC information and the 1:250,000 topographical maps. I’m not sure if his investigations would meet the multitude of 2020 criteria, and it was a bit Greek to me, but this work was completed with a (single) large document with colourful maps, **without the use of any outside consultants.** The route seemed fairly simple when I questioned Brad about some “Why there’s?” and “Why not there’s?” and he had in fact even predetermined possible gravel pit locations, without doing what we called “geotechnical investigations” like doing seismic tests, drilling holes and testing samples. Wally Hiding was happy and Mr. Piers McDonald was sent a copy.

(2) The Minister (or Cabinet?) decided to have the **Stewart Crossing - Keno Road No. 11**,⁵² (universally better known as the **Silver Trail**) surveyed for future upgrading, **instead of the Atlin Road.** We (and I obviously mean Wally) were instructed to relocate the two survey crews “**tout suite**” to the **Mayo Riding.** This caused quite some uproar in our office, with the two crews and with the owner of the lodge at Jakes Corner: The NDP had won the election with a narrow margin, and was actually a minority government. On Election Day evening, CBC North TV had featured a local panel of three political pundits, live from Whitehorse, and when Dawson riding results were delayed, they had shut down near midnight with unanimous predictions (based on the few polling stations) that “**The PC’s will surely have it again.**” The next day, it must have been a rude awakening for **Mrs. Flo Whyard**, a panelist, who had been Yukon Minister (1975-1978), Mayor of Whitehorse and editor of the Whitehorse Star. The NDP got **8 seats** with **41.10%** of the popular vote, the PC got **6 seats** with **46.91%** of the popular vote, and the Liberals got **2 seats** with **7.64 %** of the popular vote; 4 independent candidates got nowhere but **10.33%**. It was almost a situation of “**Whitehorse and all points west**” vs. “**The rest of Yukon**”, with Faro and Tatchun (= Carmacks) the Liberal outliers, as the Map above shows.

The NDP only remained in power until the Territorial Election in 1992, its leader Tony Penikett resigned in 1994 and moved to Victoria where he started working for the NDP Provincial Government, and in 1995 he was succeeded by Piers McDonald. May 1985 marked our first (and only) Territorial Election as Canadian citizens.

⁵² That was the official road name used by Public Works Canada (only).

Eight months earlier, we had voted in a Federal General Election; I had attended a single election debate (with Doug Andrews) where Mr. Erik Nielsen spoke. This was my first attendance of a political meeting in Canada, and I had the confidence to ask Mr. Nielsen whether he (and his party) were pro-life. His political response (in legal terms, of course, what else?) satisfied me at the time. (I had not gone to listen to **Mr. John Turner** when he visited Yukon; he did not turn me on.)

As a result of relocating one (or two?) survey crews to the Silver Trail, design efforts that would follow the survey work were anticipated for the winter of 1985/86, with construction contracts during the summer of 1986. I left all that work in Walt Gutowski's capable hands, as he had also been handling the survey work on the Atlin Road, and was also doing similar preliminary design work on the **Top of the World Highway No.10**. Now I do not recall exactly when Walt was diagnosed with a rare type of bone cancer, but he was rapidly sent to Vancouver General Hospital for a fairly long period of radiation and/or chemotherapy treatment, and I visited him once in a Rehab Centre at Heather Street and 12th Avenue (likely after one of my VWD meetings in Victoria). I had to do my work without him, which increased my work load. But gladly, Walt recuperated and returned to the office, likely taking over one of the positions after the reorganization (see below).

(3) The Minister decided to **merge** the Department of Highways and Transportation with some sections of the Department of Local Government, to create **CATS**, as already mentioned above, with **two vacancies**, Larry Blackman and Kurt Koken. Terry Sewell became A/DM, and a search for a Deputy Minister yielded somebody from Ottawa, a Mr. André P. Gagnon, previously mentioned briefly. He had been one of the group of "Young Turks" civil servants, under the tutelage of Mr. Marc Lalonde, the Liberal Cabinet Minister (1974-1984). But before he arrived, Wally Hiding (temporarily?) took over the position of Larry Blackman, and Wally's position was **rotated** for a month each between John Murray, Robin Walsh and me. We would do this work together with our own work load. (During my month of "acting", I wrote some "clue cards" which the Minister would use.) When the search for Wally's replacement brought Mr. Doug Campbell, P.Eng. to YTG (and if I am not mistaken, he came from the City of Edmonton), he occupied Wally's office, but fairly soon moved to another office on the 4th floor, when the Department had been "reorganized". **John Cormie, P.Eng.**, Manager, Municipal Engineering, and others like **Brian Laird, P.Eng.** and **John Grainger, P.Eng.** then became part of CATS. It was perhaps at this time that Mark Hambridge MCIP also left YTG, accepting a position with the City of Prince George, BC, but I may be wrong with the assumption of this time frame. (We visited Mark and Nora in Prince George on our return from Edmonton at the beginning of September 1988. They later returned to Calgary, where Nora had grown up.)

(4) As follow-up of a late 1984 JES Questionnaire, a **Job Evaluation Study** was done of all YTG employees, perhaps with a view of the reorganization as described above. This meant that everybody would be subjected to an interview with a human resources specialist(?) who would ask all kinds of strange questions on what I did, how I did it, how exactly I did it, how minutely detailed I did it, what resources I used from within my reach, from others and the like. This soon became **absolutely nightmarish** for me, for the following reasons:

(a) My job was so varied that I sometimes had no idea what I would actually do on a specific workday. It might be determined by an important inter-office mail item that I would receive that morning; it might be determined by an urgent phone call from Ray Magnuson or Nate Casselman, (or one of the Highway Superintendents) would need my attention, or even Wally); it might be determined by an unexpected phone call from any of the field staff; I might be continuing what I had been doing the previous afternoon; I might be doing something as a result of the previous few days' site visits; it might be anything new or something that had been on my desk for a longer or shorter time. Now I knew about the "**A, B, & C**" of time management, and that I had to set priorities when looking at a file and glancing at a single letter in it, to determine if the work needed my "**immediate**" attention, had to be done "**soon**" or perhaps "**later**" whenever I had nothing else to do. The reason was that I never had such moments! I really tried to clean my desk by the end of a week, **IF** I was in the office on Friday afternoon; I often was unsuccessful. Add to this my VWD Committee travels all over Canada!

(b) The people who questioned me (and I had to suffer more than one session) were not of an **engineering mind**, and could not (I believed) think along the same lines by which I tried to respond to their pointed questions in

a truthful and honest way. I soon saw that I got nowhere with them by saying “I am using my engineering skills”, because that would likely trigger a multitude of other questions. In my book, “engineering” is as much an art as a science, and I guess that it may not have been taught like that in Canada, or perceived by others. I also saw that I got nowhere by being vague and evasive, by eliminating the “steps” in my thinking process, because they would sometimes ask the same question I had just adequately responded. (As if I had skipped a step and they could not catch up.)

(c) I also soon saw that it was clear to those who questioned me that I had a lot of work on my plate; this was very evident from the number of time sheets that I completed for every two-week pay cycle. If I would spend half an hour on a highway maintenance issue in the Beaver Creek area, I had to show that; (every grader station had its own coding) and of course, each of the various capital projects had its own coding (split between design, documentation and site supervision) and then the correspondence for Land Use Meetings had its own. I was glad to find an unused green Olivetti ball typewriter downstairs, and Nate Casselman (or Lynn Alcock from Motor Vehicles) said I could take it – so I typed all my own memos without bothering to write it out in long-hand and get it to the typist (who used to be in Mr. Larry Blackman’s office) and have it returned with typing errors so that I had to send it back to the second floor. (Was my handwriting that poor?) But the federal recipients of my typed memos were happy about the comments on land use issues and agricultural applications – and so was Mr. David Parfitt at Contract Administration about my letters. (Nowadays, everybody writes his or her e-mails and reports, but carbon paper – “What was that?”, today’s younger generation of engineers may ask. Check the archived red taped files!)

(d) I wondered if perhaps I was **too much set in my ways** as a consulting engineer, (and too much the son of a typewriter mechanic!) I had for many years (see my Parts 1, 2 and 3) already typed my own memos, and so had my colleagues in the private sector (like Bill Cameron and George Gordon) and it had almost become second nature to do so, actually thinking better while typing, except in cases of important documents that had to be “formally typed” on letterhead and the like. Had I been **too enthusiastic in my job expectations** of a Public Service position, once again after a time of unemployment? Had I wanted to run my job ... like a consultant?

(e) I gradually saw the “execution” (!) of the process of this Job Evaluation Study as an (either **formal** or **informal**, either **legitimate** or **less honest**, either **political** or **bureaucratic**) way to reduce rather than enhance my responsibilities, and to thereby eventually find some or other reason to end my employment, if I had already been relegated into a somewhat lesser position in which I would be easier replaceable. Not that I considered myself irreplaceable; not that I was paranoid about it or harboured a conspiracy theory. Perhaps my job description had originally been written **too wide and too broad**, and – unlike this Mr. Hein – (see footnote 143 in Part 3) I had not seen that on my arrival, and had stayed, because **I actually loved my work in the beginning, and still did**. Had I perhaps been a bit naïve in the beginning? Could I have been more inquisitive during my job interview?

(5) It was decided to initiate a **Squatters Legitimization Program**. I became responsible for comments on accesses. Some history needs to be told here. There was **federal legislation** against squatting on the 90% (or more) of the area of Yukon under federal jurisdiction, through DIAND. There also was **territorial legislation** against squatting on the remainder of Yukon that was under control of the Commissioner, somehow delegated to the Yukon Legislature since the days of the **Jake Epp letter**. But ... **these laws had not been enforced at all**; many Canadians and US citizens (i.e. mostly “**draft dodgers**” who had refused to go to Vietnam) had come to Yukon and had stayed, living on a seasonal basis or even year round in makeshift cabins made from plywood, wall tents, logs and old truck bodies, trapping and working on a seasonal basis, and those who did not have Canadian citizenship eventually did, with marrying or living with long term partners, with children and eligible to vote. Some of them had permanent positions with YTG or the Federal Government. The NDP (not in power in Ottawa but always in opposition until 2019, when they started siding with the Liberals) wanted to garner their votes for the NDP for the next territorial election, and remember that “Land Claims” had not been settled at the time. These squatters were all over the place, and the program meant to “grant” each squatter who applied (who had to prove that he or she had occupied the site before a stipulated date) an acre or a hectare, for which they would then have to pay a nominal fee and the legal survey and registration costs. By itself, this was not much different than all “**Small Holdings**” legislation from England and Wales through the centuries, and similar legislation in other European countries, whether under English Common Law or under the many derivatives of Roman law.

The only problem that I saw was that the Program seemed to **evade** the existing (federal and territorial) stipulations about **first paying a fine before applying**. I wrote a nice sounding **Letter to the Editor** about it, exercising my right of freedom of speech, as it had nothing to do with my work sphere, which dealt with checking driveway accesses to “territorial” highways and nothing else. After its printing in the Yukon News, I actually received some favourable comments from people I did not know at all, when passing them on the street. Much later, I also received a postcard, sent to our home address from New Zealand, on **1988-06-09!** (See below) At that time, I was still assigned to assist the consulting firm that handled the applications, providing comments on behalf of Highway Engineering, as part of CATS. Most of this field and office work was done during the second half of 1987 and well into 1988, particularly after the OIC of 15 May 1987. In 2021 retrospection, this **Letter to the Editor** may well have irked some people in high places, leading to what occurred later. What the eventual outcome would have been if I had not written it, is a moot point.

I tried to make “multiple purpose” out-of-town trips for this work, together with my construction site inspections. In the fall of 1987, I even had to go to the Top of the World Highway before the Dawson City ferry would be berthed for the winter, but I did not make it; **see below**. (I had a crash near km 242 on Highway 2!)

This task at hand was **challenging and quite satisfying** to me; I had to drive to all of these peoples’ cabins and assess the access situation to the closest (primary or secondary) highway, based on its geometric acceptability as a LVR (= Low Volume Road⁵³) and the access point in terms of stopping sight distance (for the design speed of that specific highway). I would return to the office and write up all my

From the text of this card, site access was indeed denied after (public) “hearings”, like the one off **“Fox Farm Road”**, within City of Whitehorse limits. (I cannot remember the specific details.)

comments on each application (and they came to me in batches, more or less in the same general area or on the same stretch of a highway) and after a week or so, the lady representing the consulting firm for the Program would come to me and we would sit down and discuss and finalize the comments in my office – we did not have a special room for those things. There were conflicting situations⁵⁴ and a few possibilities for adjusting the configuration of these parcels or a single access road to serve two or three, were explored and followed up. Some of these sites in the Dawson City area were on top the former dredges’ tailings, and mineral claims (placer and hardrock) had to be sorted out, but I only heard about them as that was none of my business. I seem to remember a number of **254**

⁵³ At the time, Wally sat on an RTAC Committee developing the geometric design standard for Low Volume Roads.

⁵⁴ As everybody knows, it is physically impossible to squeeze a 60m wide road right-of-way for a Territorial Highway between two adjacent “proposed parcels”, if there is only a dirt trail through the trees between them. I stuck to my guns about this **“highway right-of-way width”** need, in terms of the OIC of 1985-05-14. If this Squatters’ Legitimization Program would have started earlier, I could not have been so bold. I have no idea how “land claims” later influenced this.



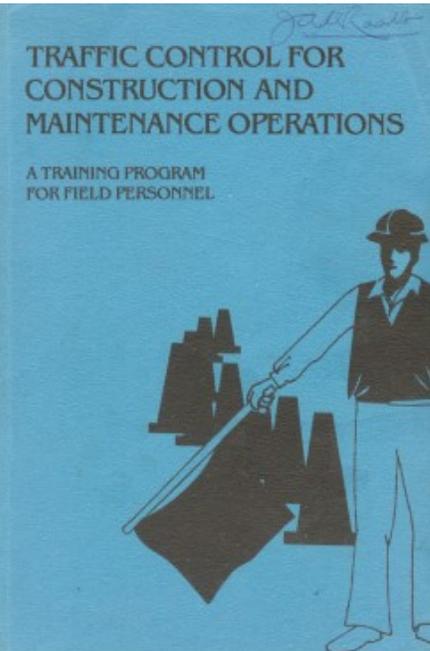
applicants, and that only half a dozen (**anarchists?**) had refused to apply, but when I go to Yukon Hansard, I understand that about **300** applications had been completed at the end of the program, and received their land. Within the boundary of the City of Whitehorse was an area called “Squatters’ Row” (with an atrociously poor access road that was not maintained at all), which later became a respectable subdivision; one of Lydia’s colleagues (hailing from Quebec, and here name was Genevieve) lived there in a wall tent. During the winter months, she had to drive home for lunch, so that she could put new logs on the woodstove.

(6) The whole CATS was immersed into the principles of “**Strategic Planning**”, and we all had to take a few days’ course in it. I guess that the idea had been blown over from Ottawa with the arrival of Mr. Gagnon, although

	<p>it was the “flavour and buzzword of the decade”. “Program planning” had been done in Yukon previously; I think it was more informal, with only a few programs for a few years, each with individual projects clearly spelled out from site visits by Mr. Ken Baker (Territorial Engineer) or the legendary Mr. Ches Champion. Take e.g. the South Canol Road program to replace rickety timber bridges from 1944 with multi-plate culverts, and how that “program” was messed up by huge floods. We knew that for any \$ 7 of capital spending, \$ 6 actually came from federal coffers, not only those of DIAND (for the Dempster Highway and the South Klondike Highway) and PWC (for maintenance of the Alaska Highway and the Haines Highway, but also for their own upgrading projects between Teslin and Watson Lake), and I guess that operational funding also came from Ottawa, like the tote trail program and the like. Liberal governments in Canada have always been seen as spendthrifts. Seeing that the Federal Government had changed with the General Election of 17 September 1984,⁵⁵ the “public trough” of Brian Mulroney’s PC’s was likely to become smaller. So OK, now we’re all on board, we’ll do some “Strategic Planning”. What’s new? We had to sit through all the presentations with a slide show and a (Government of Ontario!) ◀ handout, and much more. It was a bit to philosophical for me, I guess, and too political to boot. Ontario was (and still is) very different from Yukon.</p>
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It needs to be added (**and perhaps this is the right location to do so**) that the annual planning and scheduling of survey crews and construction supervision crews was not easy, and took up much of my time each spring. I tried to allow the Technologist who had designed a project to also supervise its construction, so as to provide some continuity, something which I have often valued in my own career. I believe that this was appreciated by them. Brad, Chester and Florian would supervise the larger projects, Eric some smaller projects, Doug was all over the place with geotechnical exploration, crushing and construction projects – his soils laboratory was not in the Lynn Building, but in the Industrial Area – and I even saw to it that Stuart and John were given experience by handling their first small construction projects, after having designed and drawn them, by which they learnt. I am not sure if they had had any formal technical training, and I am also not sure if Eric or Doug had a diploma from a technical college. But I knew that Chester had gone to BCIT in Burnaby for a number of years, that Florian had been trained in-house by Saskatchewan Department of Highways and Transportation in North Battleford (in the days when the public sector still did that training) and that Brad had his degree in Geography plus southern Saskatchewan (?) and Public Works Canada experience and training, before joining YTG. But scheduling the survey and flagging crews was different, and I often seemed to have intruded on personal relationships – like “Rodman A does not want to continue to work under crew chief B”, “I want to work close to Whitehorse for the whole season”, or “I’ve always done this or that when Wally or Walt dished out the work”. The reasons for these preferences became clearer to me with each annual iteration: Some “casuals” were on Yukon’s illustrious softball team; more than a few had a dislike of a certain crew chief (with reason, I discovered, see below), some wanted a month or so “time off” from a seasonal survey job, some wanted a “females only” survey crew, etc. etc. I may not even have heard them all. The

⁵⁵ I sometimes wonder if Mr. André P. Gagnon had perhaps **lost his job** with the shuffle after this change of government.



TRAFFIC CONTROL FOR
CONSTRUCTION AND
MAINTENANCE OPERATIONS

A TRAINING PROGRAM
FOR FIELD PERSONNEL

same situation, but less, existed with the flag persons, because they worked by themselves. I once had to discipline a trained female flag person with several seasons of YTG service, who had signaled an American tourist to “**Please slow down!**” On his rude violation and passing her in a bowl of gravel and dust, cursing as he passed, she had given him the finger! This US driver had turned around, back to Whitehorse, waltzing into the YTG Building and complaining to the Minister. On his instructions, I eventually had to do the disciplining. I think I suspended her for a week (as told by Wally to do), stating that I felt sorry for her and that I might have done the same thing if I had been in her situation. This occurred on the South Klondike Highway and I had to do it because Robin Walsh was on vacation (to Ireland?) I have great empathy for flag people; when YTG required that they also wear steel toed boots due to Occupational Health and Safety regulations, I personally organized with Northern Supplies (on 4th Avenue, opposite the fairly new Bay) to give them a discount (was it 15%?) when providing a “**YTG voucher**”, and the girls liked this because “Woman” sizes were normally not held in stock. Their training had likely used this ITE book (1979 edition). Wilf Fournier’s safety inspectors also reported to me when there were violations of hard hat and steel toed boots regulations; which had in the past been given lip service, or had not even existed in Yukon. Other kinds of violations that occurred “on site”, I allowed to be resolved “on site”.

In one case, I had to investigate a situation at Stewart Crossing, where lodging had been a problem, because of complaints about the Stewart Crossing Lodge: “There are bugs there, the food is lousy, we’ve seen scabs in the rooms!” and the like. As a result, survey and site supervision staff normally stayed over in Mayo, in which case travel time (on their time sheets!) reduced production and added cost. Before 1984, there had never been a long term site survey or construction project around Stewart Crossing, and Wes Buyck said he had a vacant double wide trailer that was in good shape, behind the Grader Station, so for the Crooked Creek realignment site survey, Terry Holway (crew chief) and his three (male) rodmen moved into it. Totally unbeknownst to me, his girlfriend, who worked as a (seasonal) waitress at this Stewart Crossing Lodge (and a condition of employment was that she lodge there) moved in with Terry, and the Lodge Owner complained to the Minister about his loss of revenue, not due to her services (she still worked there) but of his loss of her payment for lodging. When Wally commented on this, all he said was “**Terry’s just been lucky!**” and left me with trying to resolve it with the Lodge Owner, which was quite difficult. (Was it in those days, or much earlier perhaps, that Prime Minister Pierre Trudeau had said that the federal government did not want to interfere into what happened in the bedrooms of the nation?)

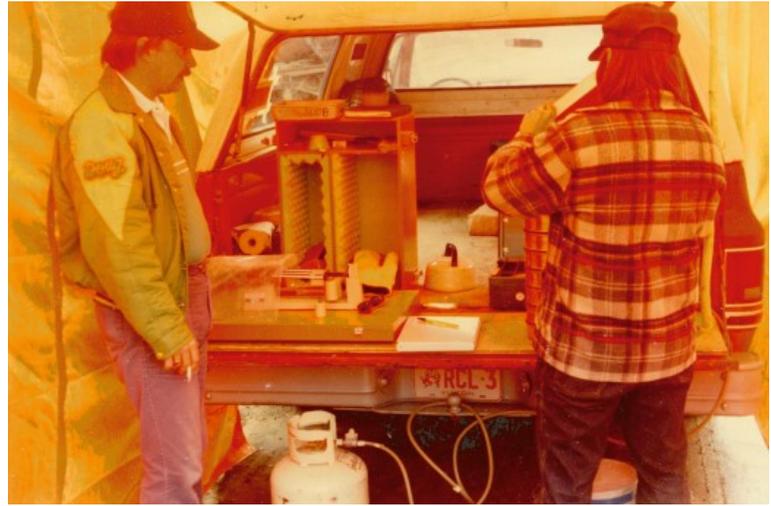
I had a very pleasant working relationship with **Doug Andrews**, the Technologist II responsible for geotechnical exploration and soils testing, as well as on-site construction or “quality control” (we did not use that phrase). Every construction project needed borrow pits (for pit run gravel) and for crushed gravel (of two types, namely for **base course construction** by a Contractor, and for **BST application**⁵⁶ by the special crew of Highway Maintenance. There was also the use of borrow material (for what we would call “cut to fill”), e.g. just south of Tatchun Creek, and of course compaction testing of sub-base and base course layers. Doug first did his exploratory testing, and from these test results, he would estimate the likely yield of each pit, and which future expansion direction of a pit would be most and least feasible. Doug also normally attended the Tender Review Meetings with Contractors who had tendered on a specific project. One situation comes to mind, (which spun off into something nasty – see below) about a Tender Review Meeting for crushing gravel just north of Carmacks, on the west side of the Klondike Highway. **This crushed gravel was needed by a certain date.** The low Tenderer was a firm from Faro,

⁵⁶ This crushed gravel for BST application was very different from the crushed aggregate used for single or double seal coat applications in South Africa. That was a **crushed rock** product, YTG used a **crushed gravel** product, with a **much higher percentage of fines**, and **no prime coat**. I have described the double seal coat application process in detail in “Part 1”; its life expectancy was more than 10 years, which cannot be said of the BST applications in Yukon during the 1980’s, except perhaps on sections rebuilt with a **proper basecourse**.

and the second lowest Tenderer was Impact Crushing from Lacombe, Alberta. As Yukon had a **10% local preference** clause, so even if the Alberta firm's price had been 10% lower than the Yukon firm, the Faro firm would have the first opportunity to prove to us that it could do the work satisfactorily. So we first scheduled our meeting with the Lowest Tenderer, in order to discuss the details of the tender, listing the crusher age and its capacity. (Beforehand, Doug and I had already noted several inconsistencies in it.) After the preliminary pleasantries of the meeting, I started by asking: "Mr. ABC, your tender states that the crusher is 10 years old and is readily available. Is that true?" The Tenderer started to waver and saying that yes, some minor repairs were necessary but the parts for that were available and in his warehouse; otherwise, the crusher was available. Then Doug asked: "But Mr. ABC, isn't your crusher the one that is currently sitting frozen solid in a gravel pit

on the Dempster Highway, the one that broke down last summer and could not complete a Contract there? Or do you propose to use another crusher?" More obfuscation followed, with the result (to give Mr. ABC the benefit of the doubt) that we asked that he provide us with some invoices of the parts. "Well", he responded, "they have not actually been received yet." "Have you ordered the parts, and may we see evidence that you have ordered them, please?" was our next question, and then we understood that these parts had not yet been ordered, but would be ordered on award of the contract. However, Dave Parfitt, Doug and I all understood that Mr. ABC did not even have a clue of which parts were needed to fix his "poj" (pejorative for "crusher"), how much they would cost and when they would be installed, so that crushing could start at Carmacks after completion of the work on the Dempster Highway. Would he default there? The final piece of the puzzle fell into place when Dave mentioned that two years earlier, Mr. ABC had stated (in his tender for the uncompleted Dempster Highway project) that the equipment was **15 years old**. Mr. ABC countered by maintaining that with the new parts installed, the **average age** of the crusher would be **10 years old** (!) We then closed the meeting and organized a Tender Review Meeting with Nuway, which proved very satisfactory, so that the contract was recommended to be awarded. That crushed gravel was then produced well within the contract period. It was saving YTG on supervision costs, so that the total project cost was much less than anticipated. (I recall that the difference between the two tender prices had been only \pm \$ 8,000.) I wrote a short letter to Mr. ABC, advising that his low Tender had been rejected. (I later discovered that this had never happened before in Yukon!) But denying the project to the Faro firm caused a question in the Yukon Legislature, by the (Liberal) MLA for that riding, Mr Jim McLaughlan: "**How can the Government deny a contract to one of my constituents?**" Impact Industries soon became "Nuway Crushing", a Yukon company; the Faro firm and the local crushing outfits owned by Mr. Charlie Friday and Mr. Hector Lang all closed down.

We also once had a **Fort Nelson, BC** contractor who would have had success with his tender for a gravel crushing contract, but – although Fort Nelson is a very northern British Columbia town – a Yukon firm had to be given priority due to this 10% preference clause. (That was why Nuway – based in Lacombe, **southern** Alberta – soon became a Yukon firm; their very first project in Yukon had been a PWC contract.) This "**local preference policy**" did not apply on any Alaska and Haines highway projects, nor on John Murray's and Robin Walsh's federally funded programs. After we left Yukon, Highways 3 and 1 (west of Haines Junction) were both upgraded as part of the **Interstate and Military Highway System**, with US funding by the FHWA under the name Shakwak Project. The NDP Government also brought in an additional preference for firms with "Indian" ownership. Reg Vance, a well-known Whitehorse contractor, once bitterly complained to me that a construction project (on the Tagish Road, see below) had been "**stolen**" from him; his family had lost their "**Indian status**" and "**band membership**" of the former "**Selkirk Indian Band**", in a federal government "**maneuver**" of the "**Indian Act**". (And I realize well



Doug Andrews (left) and Herb Riedl, at a "**pick-up truck and awning**" laboratory at a pit at km. 192, Highway 3, where crushed gravel was mainly needed for the BST.

that I am using the “**words**” that were used in those days.) These preference clauses have now been abandoned, as “discriminatory” practices. On recent Google-maps imaging, the whole Alaska Highway looks much different to what it was in the 1980s. Many bridges have been rebuilt.

During the 1980’s, the PWC office in Whitehorse started design work on the British Columbia portion of **Highway 3** (starting at the US border at Pleasant Camp, meaning within BC) and later on **Highway 1** projects in Yukon, between Jakes Corner and east of Teslin. Upgrading of the very long BC portion of Highway 1 south of Watson Lake was handled out of the Fort Nelson BC sub-office of PWC, and work in the Whitehorse Yukon office was done by **Mr. Jim Coxford, P.Eng.**, with everybody obviously reporting to **Mr. John Hudson, P. Eng.** I did not see John Hudson often, but had comfortable professional dealings with Jim Coxford, and I went to him for little detail as-built drawings of bridge railings and the like (**see below**). He and his family attended Whitehorse United Church, and his children were of the same ages as Sara and Joss. **Paul Knysh, P.Eng.** and **Mark Malinski, P.Eng.** were other PWC engineers at the time, Eric Gibson had already come over to YTG and many other employees also did that later, like **John Jansen** (of Dutch background) and **Jim Thom**. The PWC office on Range Road was “old” and old-fashioned, and has since long been demolished. The building was shared with DIAND staff – I attended some land use committee meetings there – and even other federal departments, while others (like the Mining Recorder and Customs) were accommodated in the “just as old” green concrete Federal Building downtown. This also served as the Post Office and the Courthouse.

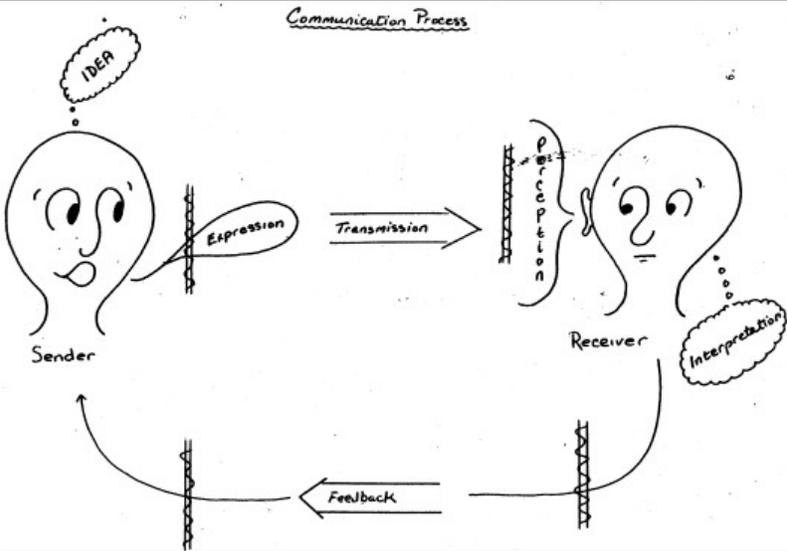
My letter to “**Mr. ABC**” may have been **factually correct** (because Doug and I had both felt that the tender ought to have been disqualified or thrown out, even **without a Tender Review meeting**), but it lead to the displeasure of Wally Hiding: I was told that I should not have written that letter, and this was one particular issue during my “Performance Evaluation” in the spring of 1986, when he denied me the normal wage increment, **for the second time!** Ms. Pat Cumming’s YTG letter of 17 October 1983 had formally appointed me as a Program Engineer III “at a salary of \$45,459 per annum effective November 1, 1983” with a “six month probationary period which may be extended a further period of time, not to exceed six months.” I had never heard anything about that after thye first 6 months, but after 12 months, I was denied an increase. “Why?”, I wondered.

A full year later, at my second performance evaluation, Wally once again found me **undeserving** of this “annual increment”, which had not even been mentioned in the above letter of appointment! In the spring of 1985, I had not liked my denial at all, seeing that after six months of service, **(a)** Wally had not mentioned any untoward thing, **(b)** I realized that I had come from the private sector (plus a time of unemployment), and that **(c)** I had needed to adjust to specific requirements of the public sector. In April 1985, I had therefore promised to do my very best, also attending a course “**Service to the Public**” that year. **On the next page** are two excerpts from the presentation on “**Barriers to Communication**” in that Workbook, and the response that I pencilled in. In April 1986, it seems that for various reasons (which might be related to some of my responses), communication between Wally and me had deteriorated, and was unfortunately a lot different from what it had been shortly after my arrival, and (on my careful 2020 reflection) I believe that I had been totally unaware of it for a very long time – as I honestly believed that I was doing my multi-faceted job “**WELL**”, with good relations with **ALL** my subordinates and **ALL** my peers. That is why I (**now**) believe that the change in the political regimen might have prompted some or other direction to Wally (for which I have no proof) to make my work first uncomfortable and then likely compel me to quit. Things like that had obviously occurred before in Yukon, and would happen again, as they also occur in all kinds of workplaces, in the public and private sectors alike, even internationally, due to the human condition.

(In early 2021, reading Michael Psellus’ magnificent book “**Fourteen Byzantine Rulers**”⁵⁷ (a Penguin Classic), I understood some of this kind of situation. That the author kept his job until the year 1078, when he was **fired** by the (weak) Emperor Michael VII, was mostly due to his rhetoric skills. He knew no Public Service Handbook, he had only been a political peon for many years; **should I perhaps have become one? Or not? And if not, why not? Would it have been “professional”?** There are many Scriptural warning about not getting involved in evil.)

⁵⁷ Michael Psellus’ book is called “The Chronographia” and was translated by E.R.A. Sewter in 1966.

Communication Process



PERSONAL POTENTIAL BARRIERS

Often we make prejudgments about others that are not objective or justified. These prejudgments can adversely affect the communication process. List below some situations or influences positive or negative which for you personally are possible sources of communication distortion or barriers.

- a) I have difficulty communicating with others when (describe situation) . . . *it is obvious they have an ulterior motive*
- b) I avoid the following types of people: *Those whose lifestyle I cannot often with.*
- c) I enjoy being with/talking to the following types of people: *Most people*
- d) Behaviour or outward appearances which I find distracting or annoying: *closed eyes - don't look at you.*
- e) My most apparent negative prejudices:
- f) My most apparent positive prejudices:

The lack of clarity of my job functions as YTG's first "Program Engineer III", namely if this were a "managerial" or "bargaining unit" position (as mentioned above), only added to this quagmire. I may well have been in a situation similar to a YTG colleague whose "duties, responsibilities and authority" were "redefined" in 1986, (as part of the results of the Job Evaluation Study) and who quit and sued. (For details,

see the newspaper clipping on the next page.) I never met this Mr. Ben Larsson, and do not know the outcome of his claim. But while attending the United Church, we knew Henry Kamphof and his family with young children (who had come from the Thunder Bay, Ontario, Christian Reformed Church) who were **similarly ousted (?) at Yukon Housing Corporation**, and returned to where they had come from. But the staff turnover was even higher at federal government departments (with "three year contracts") than at YTG.

My responses to (a) through (d) in the Workbook (above) were how I felt at that time, and still feel. My response to (a) may relate to the political realm, to which could be added that most of Highway Engineering's staff had come from Saskatchewan, the original NDP stronghold of the 1930's, and my own aversion to socialism, seeing my Alberta experience. My response to (b) can be understood from the religious and cultural shock since emigrating from the "shielded" situation of my earlier professional life in South Africa (and even in Calgary); note that being a "former" South African in western Canada was not easy in those days. Lydia and I were sometimes openly blamed for the worsening political situation in that country! Talk at the office coffee breaks mostly dealt with "sports" and matters about relationships that I only frowned upon; I never curled or skied and was just not keen in going for a drink at the Kopper King, as they did. I believe that we were the only "church attending family" from Highway Engineering after Larry and Eve Blackman retired to Westbank, BC. My response to (c) shows how I felt about "most people", I was still naïve enough to believe that "most of those people" would agree with what I said when talking to them - whether socially or professionally. And about my response to (d), I remember that Wally had some squinting problem, and did not look me in the face, while I always did. (I do not know if he did this with other people, but he reminded me sometimes of John Gill in Calgary, see "Part 3").

So in early 1986 (shortly after writing my "wrong" letter to the Faro firm), I grieved my dissatisfaction with Wally's second Performance Evaluation. To do this, I had to follow prescribed steps, first through the local shop

⁵⁸ Two pages copied from "Service to the Public" workbook, n.d.

Employee sues

A former Yukon government employee is suing for wrongful dismissal and saying he was forced to quit when the government redefined his job.

In a lawsuit filed with the Yukon Supreme Court, Ben Larrison said he moved to the Yukon in December of 1985 to take on the job of manager of housing. In that job, his suit states, he was responsible for government social housing programs, a staff of 22 and a budget of about \$5 million.

In 1986, he said, the government redefined the job, cutting his duties, responsibility and authority significantly.

The suit argues that was "a repudiation of the said employment contract."

Larrison stayed on for awhile and the suit said he tried to get clarification of his new status. He finally quit on March 2, 1987.

He "elected to accept the defendants repudiation of the said employment contract and terminated it," the suit states.

It seeks damages for the "unlawful termination and wrongful dismissal" to cover loss of income and the cost of relocating.

steward of the Public Service Alliance of Canada, Mr. Ralph Shopland, who lived close to us and was a Mechanical store man for CATS. As mentioned in earlier parts of this book, I had to use the PSAC, a labour union, as Yukon is a "Territory" and not one of Canada's 10 provinces, where professional engineers are exempt from union membership and its duties and benefits, and there are organizations for professional employees of the civil service. Jim Coford told me once that he belonged to that organization – which covered all professional federal employees working anywhere in Canada. Much later, in Arizona, USA, I discovered the phrase "**uncovered employee**", which meant that there was no "conflict resolution" mechanism at all. There, I was actually threatened by a letter, **to quit insisting** on their "Letter of Support" for my next one-year TN Visa under the NAFTA, as a **Canadian businessperson!** That is something that may be recorded in a future book, to be titled "My Personal

NAFTA woes". For now, in short, I then rejected ADOT's seventh "Letter of Support", called it fraudulent in a letter to the Director, and we returned to Canada at the expiry of my sixth visa in February 2008. That's how God also protected us from ... succumbing to evil.

How I (and Lydia, and our children) dealt with the problem of being denied a normally expected wage increment for the next three years as well, is a story that needs to be reconstructed from the few pieces of documentation left in my possession, aided by my memory and a single cassette tape of a meeting of **4 April 1986**, attended by **Wally Hidinger, Conny Zatorsky, Ralph Shopland** and me. In January 2002, in Walnut Grove, Langley, Lydia and I decided to discard some cardboard boxes about the whole unsavoury and acrimonious situation; the old fashioned cassette tape describes only the start. Toward the end of the recording, I described the denial of these increments as "**totally undeserved**" and "**professional harassment**" at this early stage, asking "**Do I have the leeway to do things that I see fit? I am not to be put in a straightjacket, a straightjacket that is much narrower than one I am supposed to be wearing, and that I am perfectly qualified for**" and that "**many functions of my job come straight from phone calls by members of the public, and not directly related to delivery of the Yukon funded highway program**". During the meeting, Wally said that he had never worked in a private enterprise environment, while I quoted my two years with the City of Pretoria and later having the City as a client of Mackintosh, Bergh & Sturgess. As a result of the meeting, the Union (meaning Ralph Shopland) asked Wally to rewrite the Performance Evaluation. That started the downhill trend of my "work enjoyment", although I did not show it to my colleagues.

Something must be added somewhere about the many differences between "Bituminous Surface Treatment" in all of New Zealand / England / Southern Africa / Australia (or even Turkey) and the process used in Yukon. I will try, and the excerpts on the **next page** may be helpful to explain. The words may be identical, but the **purposes** were different, the **materials** were different and so were the **application methods, costs, results** and the **periods they were supposed to last**. Yukon did and does not have a lot of accessible rock to crush, but lots of gravel to crush, and the work was always being done with a minimum disruption to (light) traffic. Tar (for prime) is unavailable in Western Canada, while bitumen (for prime and BST and hot-mix asphalt) comes from Alberta.

The Yukon process (later also used in NWT) started as an alternative to dust abatement with Calcium Chloride; Ray Magnuson was a pioneer in his own right, as per the eulogies presented in the Yukon Legislature on Tuesday 2017-05-16 – 34th Legislature, 2nd Session, 15th sitting, a few months after he had died.

FUNCTIONS OF A SURFACE TREATMENT (FOR SURFACING A NEW ROAD)

A surface treatment provides a durable all-weather surfacing that

- (a) seals and protects the base and provides strength at the road surface so that the latter can resist the abrasive and disruptive forces of traffic;
- (b) transmits to the base the vertical and horizontal forces imposed by the moving traffic – since it is a relatively thin layer, it has no significant load-distributing properties;
- (c) provides skid-resistance;
- (d) provides a waterproof cover over the pavement layers below;
- (e) provides the desired surface texture;
- (f) improves the riding quality by smoothing out small irregularities in the base (multi-layer treatments);
- (g) provides light-reflecting characteristics where these are required (by use of light-coloured stone);
- (h) enables paved shoulders or traffic-control lanes to be demarcated by providing a different texture or colour.

The functions of the bituminous binder are to bind the aggregate particles together and to the underlying surface, and to provide a waterproof seal. The functions of the aggregate are to resist traffic abrasion, to transmit wheel loads, and to provide skid-resistance and the desired surface texture.

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Surface Treatments
TRH 3, Pretoria, South Africa, 1971

THE SURFACE TREATMENT PROCESS

A surface treatment is constructed on a prepared base. Prior to the surface treatment it is usual to prime* the base as this

- (a) strengthens the thin layer of the base into which the prime penetrates;
- (b) seals the surface pores so making the base less permeable, and
- (c) provides a dust-free surface which facilitates wetting by the first spray of the surfacing binder, thus helping to develop a good bond between the surfacing and the base, which is essential if the surfacing is to perform well.

Very little of the surfacing binder will be absorbed by a dense base that has been properly primed.

In its simplest form a surface treatment consists of spraying the surface with a coat of bituminous binder, and covering this with a layer of stone or sand which is then rolled. The bituminous binder has a low viscosity when sprayed which enables it to rapidly wet and adhere to the prepared base.

The aggregate cover should be applied immediately after spraying the binder after which it should be rolled, to press it into contact with the binder film. This commences the process of orienting the particles and squeezing the binder into the voids. This process is completed by the action of traffic so that finally a dense impermeable surfacing is obtained.

Excerpts from pages ◀2, ▲3 and ▼6 of TRH 3 – Bituminous Surface Treatments for Newly Constructed Rural Roads, NITRR, CSIR, Pretoria, ed. 1978.

In general, the Yukon BST process did not add strength to the road, a prime coat was not applied, the aggregate was crushed gravel instead of crushed rock, and the percentage of fine material (passing a certain sieve size) was much higher than the process that had been called “Bituminous Surface Treatment” in the rest of the world since around 1920.

PROPERTIES OF THE STONE

The stone used should be resistant to traffic abrasion; should have sufficient strength not to crush under rolling and traffic forces, and should have a high enough ‘polished-stone’ value for the conditions envisaged. In addition it should have a single-size gradation, a cubical rather than a flaky shape and a low dust content. Porous stones are undesirable, since they usually have a lower crushing strength and require more bituminous binder because of the binder absorbed into their pores.

2.3.4 Prime: A bitumen or tar suitable for application to a gravel or crushed stone base, to promote adhesion between the base and the surfacing and to assist in sealing the voids and in binding the aggregate near the surface of the base.

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That same **April 1986**, I had to attend a VWD committee meeting in Victoria, BC, and there was also Toastmasters Spring Conference in Anchorage just after that. Mark Hambridge suggested that I attend my first conference (with my “**Are You a Filler-Upper, Sir?**” speech entered in the competition), and that I could have a ride with Nora and him for the return trip to Whitehorse. This needed YTG’s travel approval for a very unusual itinerary: A one-way ticket (**Whitehorse–Vancouver–Victoria**), plus a separate one-way ticket from **somewhere** (either Vancouver or Seattle) to Anchorage. The Travel Bureau in Whitehorse was **magnificent** that day, when discovering that a **one way ticket** (Seattle–Anchorage) + **another one way ticket** (Whitehorse–Vancouver–Victoria) would cost much less than a **return ticket** (Whitehorse–Victoria–Whitehorse), for which **by-the-way** an additional night’s motel cost and meal costs would be needed because (I believe) due to the season,

⁵⁹ From the South African Bureau of Standards Standardized Specification for Civil Engineering Construction – MG : Bituminous Surfaced Treatment, 1996. (There were specifications like that much earlier, not on the world wide web.).

April flights to Yukon were still limited – even with PWA and Air Canada. So Wally (and those who gave travel authorization) agreed, and this is what happened. After the two day VWD meeting in Victoria, I travelled to Seattle **by a bus** that went on **the Sidney-Anacortes ferry**, operated by Washington State Ferries. I stayed in a downtown Seattle hotel, and the next morning, I hopped on a shuttle bus to SeaTac Airport, with a **Northwestern Airlines** ticket in my hand. On the overhead board, noticing the departure time of my flight, I also saw that there was a much earlier **Alaska Airlines** flight that I could take – and I was able to exchange my ticket and fly north on that plane, without any questions asked. This was due to **“airline deregulation”** that had supposedly only recently made such “swops” possible. So I travelled with Alaska Airlines that day, in the designated team plane of the Seattle Seahawks, but cannot remember the name of the player that was etched on the plaque of my seat. The breakfast was good and was accompanied by a printed prayer, which I found appropriate. I saw **Mt. McKinley** (the pilot suggested that all passengers look to the right) and at the huge overcast Anchorage Airport, I took a bus to downtown, making a phone call to the Toastmasters lady where I was billeted. My speech got a Second Place award, and Mark volunteered to ask Doug Bell to come to the 1987 Spring Conference (also in Anchorage) and deliver the Keynote Address. During the return trip, I just sat and watched the scenery as a passenger, noticing **massive earthmoving equipment** (much larger than anything I had ever seen in South Africa and Alberta), starting to rebuild the Alaska Highway near Northway, east of Tok.

On 3 January 1984 already, I replied to a newspaper advertisement for membership of the **Whitehorse Transit Commission**, (with my resumé) and stated that doing this carried the verbal approval of the Deputy Minister, Mr. Larry Blackman. Councillor Vern Toews (YTG’s Electrical Inspector, who lived close to us), supported me, and City Council approved me for a three year term, starting in **July 1984**. I enjoyed participating (professionally) in this entirely voluntary “work”, which entailed attending monthly meetings and Finance Committee meetings, later becoming vice-chairman under **Bob Armstrong**; I also reported once to a City Council meeting. I knew that I was the only Commission member who regularly used Whitehorse Transit regularly⁶⁰, for work, transferring at the Bay. We oversaw the transition of transit managers (from **Randy** to **Clayton** to **Maryann**) and other staff changes, route and schedule changes (e.g. to serve Evergreen Crescent and LoBird Trailer Court better), budgeting and maintenance schedules, and it was a pleasant working environment. I also made a proposal to buy two good used buses for less than the already budgeted price of a single new bus. This story follows:

During the **ITE District 7 Meeting in Calgary in June 1985**, delegates were given free tickets to ride the brand new Northwest LRT link, and I went all the way to its terminal. An afternoon bus tour was also arranged to visit the City’s transportation features, with **Bob Keith, P.Eng.**, known to me from ITE meetings, as tour guide. As I had been away for some time, I decided to participate in the ride.⁶¹ While driving by the brand new Calgary Transit Yard along Deerfoot Trail (replacing the downtown Eau Claire site where Bernie Orford had been in charge for many years), Bob pointed to a long row of parked used buses, **“For Sale”** due to the City’s completion of their second LRT link. I heard his unintended sales pitch, asked “For how much?” and took his business card. As Transit Commission, we had just had a preliminary discussion on the 1986 Capital Budget, which included the purchase of one new bus (with YTG funding). At that time, WT had mostly Orions and one or two GMs; the few (smaller) Superiors were close to ending their economic life, and the fleet’s original Fleurys (even smaller) had all been abandoned⁶². Clayton White (just hired!) had suggested that maintenance costs would be reduced much by standardizing to Canadian built Orions. **Guess what?** Calgary Transit had some Orions for sale, just like the ones that I had used from Lakeview to my office at UMA a few years earlier.

I brought the Calgary information to the attention of Clayton, and he followed through. Calgary Transit buses ranged in price from \$15,000 to \$ 80,000 (depending on age and usage) and were provided **with** their complete

⁶⁰ I bused **by choice**. The North American reality is that most riders do not have that luxury, but use the bus by **necessity**.

⁶¹ We drove through the Bow Bottom Trail “bus trap”, which I had not seen before; I only knew one on Northland Drive. Everybody oohed and aahed about this novel way of “neighbourhood quieting” without reducing the transit service.

⁶² During our one month’s stay on Pelly Road (November 1983) I sometimes bused to and from work in a lime-green Fleury (converted RV) bus to the Lynn Building, but mostly in a larger Superior bus. When checking later, this was just before that specific Fleury was taken out of service; it was still in the old yard in the Industrial Area in 1986, as an “emergency standby” bus. It may be the one that was donated to the Yukon Transportation Museum.

maintenance records but **without** any tires. The Orions cost \$ 80,000 each (and CT had many of them, perhaps because bus drivers did not like them.)⁶³ The Commission asked me to visit the factory in Mississauga, Ontario where these buses were built, and I did this during one my very next VWD Committee meeting in Toronto, during



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July 1985! I reported to the WTC with photos and brochures of the manufacturing process of these buses, as I had been much impressed! As a result, WT purchased two Orions from CT; on approval of the 1986 capital budget, Clayton White and Bob Armstrong flew to Alberta and each drove back an Orion (plus some tires). Within a week, the two-tone blue buses were in service; it took a few months before they were repainted in red and white, like the other buses.

Whitehorse Transit drivers were mostly female; this had been so since the initial days of 1976, when the Yukon Women's Minibus Society (with a federal grant) had started operating the Fleury mini-buses. One of the male drivers was Wally, an elderly man, and at one lunchtime Commission meeting, I heard that it was his birthday. That same afternoon, when waiting in front of the Bay, a bus pulled up with Wally at

the wheel. I got a huge kick out of greeting him by singing "**Happy birthday to you!**", which drew other boarders' attention, some of whom joined in the singing. Wally did not even ask me "How did you know that?" A good group feeling existed between the staff and management, almost **like a family**.

Riding the bus had minor personal advantages as well: One afternoon, I left my mitts on the seat when arriving at the bus stop near our home; when I entered the house, Lydia noticed it and we decided to phone. All buses were equipped with mobile phones, and we were soon informed that "**the driver has already found them, Jacob; please be at the bus stop about 30 minutes from now, and we'll hand-deliver them to you.**" Our son Joss, who also had a bus pass, once fell asleep on the bus, and was kindly woken up by the driver when he did not seem to get up and leave at the bus stop on the corner of Bamboo Crescent and Cedar Crescent. In more than one way, Whitehorse was (still) a small city.

Toward the end of 1986, the Commission supported a City proposal to **reduce** future membership from 7 to 5. I decided to write some comments (**below at left**) about that idea in a letter to Mayor Don Branigan in December 1986, also reporting on WTC meeting attendance for the year (**below at right**). I have always believed⁶⁵ that a committee can only function properly if its members attend meetings faithfully. **Bert Law** and **Doug Gallup** were City Councillors; I had been nominated by the City; I do not know who had nominated the other members. **Bruce Willis** was a local lawyer, **Wally Vincent** later became the franchisee of a new McDonald's Restaurant in Whitehorse, on Fourth Avenue, just north of the Bay. On its Opening Day, the whole population of Skagway was there!

⁶³ In Lakeview in 1982, a CT bus driver had once told me that they preferred the double doors that were common in GM (and other) buses, and he thought that the single swinging doors of the Orion buses were less desirable, even dangerous, also for passengers! This may have been only a ploy of North American (= US labour union) protectionism. Orion had been started by an immigrant from Hungary; I spoke to the founder's son, **Tom Wollschlaeger**, at the factory.

⁶⁴ Two photos of ORION plant in Mississauga, Ontario. The firm had first repaired rusted-out wheel wells on existing buses. ORION also had a similar plant in Michigan.

⁶⁵ Prof. D.W. de Vos called himself "**someone doing his homework**" in his Presidential Address of SAICE in the 1960's. That Institution annually published attendance lists for its Council, Division and Committee meetings.. .

Jacob A. de Raadt, P.Eng.,
5 Bamboo Crescent,
Whitehorse, Yukon.
Y1A 4V4

1985-01-21.

The Clerk of the Supreme Court of Yukon Territory.

Dear Sir,
Re: Summary Conviction Appeal ⁶¹⁵ 611-84.

During the first week of January 1985, your Mr. Schmidt told me telephonically that the Order D.2, sought in my appeal dated 1984-12-27, has been denied, and that a full transcript of the Proceedings of the Territorial Court, dated 1984-11-29, has been requested by the Supreme Court Judge.

Subsequent to receiving this information, I obtained a verbal quote for a typed version of this transcript from Mr. Doug Ayres, J.G. Moore & Associates. This quote is \$150.00 (one hundred and fifty dollars) and was given to me after he had listened to the taped proceedings.

In my honest opinion, the transcript would not contribute any useful information to the Judge. The facts of the case are not being disputed, but only the interpretation of the bylaw and its applicability to the specific parking spot.

Furthermore, would it be possible that the Supreme Court would award the costs of getting a transcript, in case this appeal is upheld? I would like to know this, as the costs of \$ 150 are somewhat out of line when compared to the original ten dollar fine. Nevertheless, I consider that Justice will be served if this case is heard, which will not be the case if I concede, pay the \$ 15.00 and drop the matter. This objection against a wrong interpretation of an unclear city bylaw will then disappear into oblivion. Do I have to add an order sought D.3 to the appeal, requesting that costs of a transcript be awarded in this case?

Yours truly,


Jacob A. de Raadt.

The Yukon News of 28 December published an article about it, and I guess ► Al Aasman wrote it after a talk with me. A week later, Mr. Schmidt denied my Order D.3, seeking “that no transcript of the evidence taken upon the Trial before the Summary Conviction Court be required”. What now? The official Court Recorder, (Mr. Doug Ayres, whose family lived on Evergreen Crescent, Plonia and Sara were the regular – and preferred! – babysitters of their youngsters) said that it would cost **\$150**. I wrote a polite letter to the Clerk of the Court on 21 January 1985, asking that this requirement be waived. Mr. Schmidt (Clerk of the Supreme Court) replied that “**if you reverse the decision of the Territorial Court, you may ask for costs.**” When in March 1985, the City of Whitehorse removed the “No Parking” signs, and I also reported this to Mr. Schmidt on 16 April 1985. His second response letter (not on a formal letterhead) of 17 April 1985 stated that “The Supreme Court cannot become involved in investigations of any nature.” **Since then, I have never heard anything more of it, for more than 36½ years.** Earlier this year, I enquired, and received a response that the file has been destroyed. Well, I still have an envelope full of its papers.

Does that mean that I have “**won**” a case in the Yukon Supreme Court, **by doing absolutely nothing**? That would surely be somewhat similar to the strange case that I “**won**” (on behalf of clients of Grassroots Consulting Services) against the Township of Langley, on 15 April 2014. In that case, the Office of the BC Privacy Commissioner did everything. The citation of that case is **Langley (Township) v. De Raadt, 2014 BCSC 650.**

Principle vs. Bylaw

A city man says “principle” has prompted him to appeal a conviction for parking in a lane.

Jacob de Raadt says he was wrongfully convicted on Nov. 29, arguing a justice of the peace erred “by not considering the distinction between lane as defined in section 2(1) of the Whitehorse Traffic Bylaw and the usage of the world lane where description of legal property is considered.”

De Raadt received a \$10 ticket on Aug. 29 after parking in a lane next to the Municipal Services Building off Fourth Avenue, a lane he says is well over seven metres in width. A city bylaw describes a lane as “any highway where the width of the road is less than seven metres.”

“I hope the city will have to change the bylaw because it doesn’t apply to that specific spot,” de Raadt says.

Although the ticket and court costs only amount to \$15, de Raadt says he’ll pursue the matter because, “it’s the principle that counts.”

Whitehorse Transit's yard, shop and office was somewhere at the bottom of the Marwell Industrial Area. When another site with an empty warehouse became available (at the north end of Industrial Road, where Mountain View Drive starts), relocation was on. It was much better than the previous facility; I remember that the wishes of the Kwantlin Dun Band (which had at first not been considered) also weighed in when making the decision to move. (Land Claims negotiations played a role in many things during the 1980's.) My membership of the WTC ended at the end of my 3-year term in mid-1987, with a formal occasion in the new facility. I was handed a nice wooden trophy in the shape of Yukon. At the top was a ► plaque with the City of Whitehorse logo, and the rectangular bottom plaque reads: "**JACOB DE RAADT – In Appreciation For Your Contribution to the Transit Commission – City of Whitehorse.**" I felt appreciated for doing this voluntary work. Randy (...?) was the first Transit Manager, then **Clayton White** (who had been Leadhand Mechanic) and then **Maryann Olchowy**. Whitehorse Transit is now a normal "Department" of the City of Whitehorse.



About my "**professional work**" on **Mountain View Drive**, I write something in a **long footnote**,⁶⁶ **on purpose**, as it had absolutely nothing to do with my work for YTG, yet caused a lot of animosity during the last months of my employment, as it was (I believe) one of several "**straws that broke the camel's back**". I trust that divulging this after so many years, proves my innocence and the managerially / politically driven environment that I worked in.

I also became involved in the **Yukon Transportation Museum Society**, the brain child of a former Mayor of the City of Whitehorse, **Mrs. Flo Whyard**. (Strange, but her **Obituary** does not mention this feat, although it shows a photo of her, getting an award at the "Ice Palace".) This very enjoyable part of my sojourn in Yukon started when attending an Open House (Public Information Meeting) in the basement of the McBride Museum, to establish a Task Force for the formation of a society for this "special" museum. Attendees were told that evening that Mrs. Whyard had already received Transport Canada's favourable response to her initial concept to lease an abandoned building at the Airport for such museum. We were told that that Canadian Air Force built Recreation Centre, which had been taken over and operated by the City of Whitehorse after the Air Force had left Yukon, was available for a lease of \$1 per year. Why that site and building? Due to its exposure to tourists on the Alaska Highway,

⁶⁶ An alternative name "**Dan Lang Drive**" was already mentioned in those days. This road had been planned by the City since early 1980, and was still gravel with CaCl₂ treatment when we came to Yukon. In 1988, it would be upgraded, and the City retained Mr. Brian Laird, P. Eng., who had formerly worked for YTG (Municipal Affairs) and had started his own consulting practice ▼. Brian asked me to review his design drawings for widening and paving, and I did this by pointing out

some necessary lengthening of the multi-plate culvert in the dip for the crossing of McIntyre Creek, and the need of some lengths of guardrail. This later somehow came to the ears of John Cormie, who claimed that I had been in a **conflict of interest** position, seeing that YTG (my employer) would pay for the work. After I had been able to **prove in writing** that Brian Laird (in a letter of **Laird Engineering**) had initially approached me and that I had not solicited my skills to him, and that Brian Laird had assured me that he had inquired about this possibility of a "**perceived conflict of interest**", **John Cormie** (Brian's former supervisor!) **changed his claim** by saying that I ought to have asked Robin Walsh (then my direct supervisor) about this **possibility**

of a conflict of interest, which request Robin would logically have passed on to him (for a rejection?) This was what I objected to, because I believed this was an unreasonable expectation, Mountain View Drive was not a territorial highway. This was one of the things that later resulted in the weird acrimonious situation when I had returned to work from "**political leave**", but I decided to stand firm. Brian Laird was never asked to state his views to John Cormie, nor to the APEY, nor **Phil Blaker, P.Eng.**, (a Yukoner by birth) who had become City Engineer and had formally retained Brian Laird. (I later met Phil again in Chilliwack, BC.) I remain confident that I had absolutely done no wrong, as I had had never been told that YTG would fund this **city road upgrading project**. In all my Yukon time, I had not dealt with any of such funding cases. Should (or could) I have guessed it? I believe that the claims by John Cormie were vexatious, or alternatively, may have been made further to political instructions to him. Brian Laird later gave up his consulting practice and returned to work for YTG.

Brian Laird P.Eng.

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of course: It consisted of a full size gymnasium, with various ancillary rooms around it, for pottery, painting, etc. But it was in poor shape and needed to be refurbished or replaced. Due to my interest and earlier involvement with museums and transportation history, I signed up that evening as member of a society that had yet to be established, participating with about half-a-dozen people to develop its constitution and bylaws over the next few weeks, with meetings at the McBride Museum. I came up with the wording that the museum would be “for the benefit and enjoyment of **all Yukoners alike**” which was adopted. When the YTMS was formally established, I automatically became a Governor! It was very unlike in the poem

**“Oh give me your pity! / I'm on a committee, / Which means that from morning to night,
We attend and amend / And contend and defend / Without a conclusion in sight.”**

because we really accomplished something. The lease became a reality, the Society applied for Charitable Status, and the voluntary work was enjoyable. **Richard Roberts, Brent Hougen, Norm Eady and Vern Toews** were of the first Governors; after a year or so, Mrs. Whyard resigned and Vern replaced her as President and I became Vice-President. When Vern Toews also left, I remained Vice-President and nobody took over the President's title. After some years, interest waned and membership dropped, for various reasons like: **(1)** The McBride Museum no longer wanted any cooperation; **(2)** the Yukon Government wanted to build a Visitor Centre very near the old Rec. Centre, even cutting off the Alaska Highway access. **(3)** My increasing “public exposure” as a CHP candidate for the November 1988 Federal Election may have put off some folks who supported any of the three existing political parties. By the end of 1988 we had only half a dozen active members, and decided to call everybody a “Governor”. We had a variety of backgrounds and skills to draw on; the concept was that the eventual facility would have “**rail**”, “**water**”, “**road**” and “**air**” divisions.⁶⁷ We needed to fix the building, and therefore organized a territorial funding application for a contract to board up the windows in the gym with plywood and blow a lot of pink fibre-glass insulation in those areas, from the inside. We rented out the shell “as is” to the **Yukon Frostbite Society** each February. When their directors first came to see the facility, they noticed the ice in the basement, where the huge (useless) oil furnace was, and named it the “**Ice Palace**”.⁶⁸ That name stuck for a few years; they put an ugly noisy propane furnace in the middle of the gym, for otherwise the place was unheated. (What the washroom situation was, I do not remember, but I do recall that Yukon Electric installed a temporary power connection, and there were porta-potties outside.) With federal funding (Department of Heritage), we retained **Reid, Crowther & Partners** (Edmonton) to develop a set of plans to upgrade the facility to federal “museum standards” for humidity and lighting (even UV) conditions.⁶⁹ This resulted in a very beautiful report! Alas, all the proposed alternatives⁷⁰ were considered far too expensive. RCPL also developed a building layout with a propeller as a feature on the front wall, very visible from the Alaska Highway!⁷¹ So the decision was already in the back of our minds that this was an unattainable “pipe dream” and that the only way to continue was to consider refurbishing the building to have the future Museum only open during the summer months. That was of course the season for tourists.

The YTMS also took part in the annual Klondike parade, with Brent Hougen's WWII jeep and other “floats”,⁷² and we solicited and collected artifacts. The White Pass & Yukon Railroad Company promised to donate many artifacts at its 90th birthday in April 1988, even a stage coach. On Main Street, one Canada Day, someone offered me two cork life jackets, one stencilled “**Casca**” and one marked “**Canadian**”. Now I knew that one of those two

⁶⁷ If I am not mistaken, the original idea was to have a “Museum for Flight and Transportation” only.

⁶⁸ Underground water had seeped into the furnace room, but had not been a problem when the furnace ran. After some years, the water mains and the furnace had calcified, and that is actually why the City of Whitehorse had abandoned its use.

⁶⁹ That firm had a small (shared) office in Whitehorse for a few years, Wayne Moorman operated it from but Edmonton.

⁷⁰ For a **certain amount** of money, all Heritage Canada requirements could be met, and for a **lesser amount** of money, only some of these requirements. It was a tough choice to make. How tough? Lydia and I had visited the downtown Juneau, Alaska Museum, where original kayaks from the Beaufort Sea, dating from the early 1800's, were on display; all shriveled up due to erroneous levels of humidity and light, by which they had become ridiculously useless artifacts of a distant past.

⁷¹ An aircraft propeller was available in Abbotsford, we were told, it was free, **except the shipping charges!**

⁷² With his bagpipes, John Murray was active in the Klondike Pipe Band leading the parade. He lived in Wolf Creek.

sternwheelers was at the Hootalinqua boneyard; I had seen it there. We also received a “Stewart River boat”, and Whitehorse Airport Manager phoned me at work, donating a huge red light bulb, which had been an approach light for the north approach of Whitehorse Airport. All these things were put in storage in a warehouse near Hillcrest.

I also heard many a transportation history anecdote when travelling for work purposes. An older man surnamed Moses, who lived west of Highway 2, opposite the Stewart Crossing grader station, told me that as a young boy, he (or his brother) had been asked to assist a floatplane pilot who had come down on **Ethel Lake** with single engine problems. It was late summer, and he could not fix the problem. He decided to walk west to Stewart⁷³ with some of the parts, where he boarded a sternwheeler (or stage coach?) and ended up in Seattle for the winter. After getting the replacement parts, he reversed his journey, the plane was still intact on the shore of Ethel Lake, and he got the engine fixed so that it ran. He then asked this young Indian fellow to help. With a rope, he tied the plane to a tree and gave the lad an axe. He would get into the cockpit and rev the engine. At the word “go”, the lad on the shore would cut the rope, and after that, (and it was actually done) he skimmed across the lake and made it over the trees, disappearing.⁷⁴ A real Yukon story, I believe, told to me in earnest. I mentioned this to Richard or Brent at the time, but have yet to discover the veracity of the story, and the name of the pilot. And then there was the story of the Liberator crew (on the way to Russia under the WWII lend lease program?) who landed on the ice of a small lake north-east of Beaver Creek. My role within this museum society was very enjoyable, and I felt appreciated.

My membership (also as a City of Whitehorse representative) of the **Whitehorse General Hospital Advisory Committee**, was less pleasant, but needs to be mentioned for completeness’ sake. This hospital was an old concrete building from the days of WWII, which needed lots of money (from the Federal government of course) for its upkeep, utilities and eventual replacement. (It was uninsulated.) These issues seem to have been the main thrust of the monthly meeting agenda. Road Access (from the very east abutment of the Robert Campbell Bridge, on Wickstrom Road) was also an issue due to ambulance traffic safety, as well as the intent to perform abortions at this facility, to which I voiced my objection. This caused a statement from the Executive Director, that this issue was entirely “not one to be discussed by the Advisory Committee”. This soured the stew, and I was actually glad when my (2-year?) term was up; I did not volunteer to stay on for another term. By that time, I guess that I had already “shown my colour” by questioning Mr. Erik Nielsen on Canada’s abortion laws, during a public meeting during the 1984 Federal Election, in which the Conservative Party (of which he was the Deputy Leader, under Mr. Brian Mulroney) swept to power. Sadly, Mr. Nielsen afterwards disagreed with the Prime Minister, he resigned (and wrote a biography) and there was a Yukon bi-election, in which Ms. Audrey McLaughlan won for the NDP.

Another project within the **Secondary Roads program** was the reconstruction of **Fish Lake Road**, located within Whitehorse City limits. This road starts at the south end of Rabbit’s Foot Canyon on the Alaska Highway, and it was to be rebuilt up to a proposed and heavily subsidized (but not yet built) Fish Hatchery for trout, west of crossing the Whitehorse Copper Haul Road⁷⁵. It was a very rough and crooked alignment, with lots of large boulders. I assigned this project to Florian Vedress, and we developed a realignment that was much better than what had already existed there for many years, staying away from McIntyre Creek and also from the clay bluff (close to the Alaska Highway). Fish Lake Road was underlain with mineral hardrock claims, owned by Hudson Bay Mines and Minerals, and we needed their approval for the new road alignment, as well as a legal right-of-way drawing⁷⁶. This was likely the first time this had been put as a “development condition” to YTG, and a first for Yukon during my time there, based on what has already described above, with land claims, the OIC and the three levels of government. It was decided to have a full topographic survey done (**with coordinates**) that would allow a proper design that would satisfy the mining company based in Flin Flon, Manitoba. We successfully negotiated all

⁷³ Stewart is a former settlement at the junction of the Stewart River and the Yukon River. These flat bottomed boats may likely have been used as far east as Mayo.

⁷⁴ Almost as knuckle-biting an experience as the one in the movie, when Charles Lindbergh departed on his historic solo flight across the Atlantic, but that’s of course the “Hollywood version”.

⁷⁵ Whitehorse Copper had formerly hauled **waste materials** to what became the City of Whitehorse dump.

⁷⁶ Mr. Gabe Aucoin, CLS, (Shelly’s former husband) was retained to prepare **Yukon’s first “multi-purpose survey”!**



conditions with two of their staff members, in the local office of Whitehorse Copper (a subsidiary of Hudson Bay Mines and Minerals and had shut down in 1982).

Top right hand corner: Whitehorse Dump and the end of the Whitehorse Copper Haul Road.

Top left hand corner: Fish Hatchery, and Whitehorse Copper Haul Road running to the abandoned plant.

Middle top left hand: Viewpoint and lay-by overlooking McIntyre Creek.

Bottom right hand corner: Clay cliff; intersection with the Alaska Highway at Rabbit's Foot Canyon.

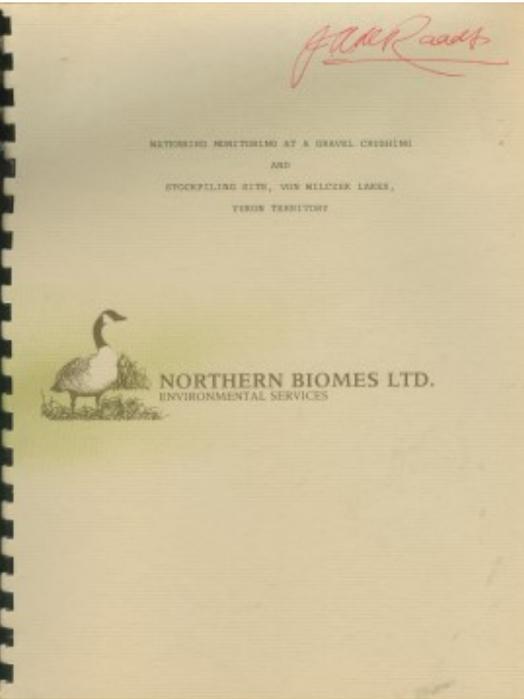
Note the long tangent and gentle curves, replacing the crooked alignment that is still somewhat visible! Near the Alaska Highway, the alignment stuck to the pre-existing one between McIntyre Creek and a high bluff. This construction project was one of the very few that were advertised “**later**” in the year, with the intention to award the contract so that it would be completed in the mid-autumn rather than in the end of summer. Experience showed that after construction contracts had been awarded for “starts” that would be dictated by weather conditions (i.e. earlier in the south than in the north), this often resulted in the completion of some projects earlier than others, and as a result we had to lay off some casuals earlier than others, which obviously caused repercussions. As the number of Contractors in Yukon was small, some complained that if they had successfully completed a “small” project early, there was no more work in that whole season, so we tried this **as a novelty**. In this particular case, the “**gamble**” worked and paid off nicely. Yukon has a short construction season, but becoming aware of its pitfalls and its challenges, this approach made perfect sense. Florian also supervised construction of this project.

The topographic survey indicated to me that an opportunity existed for a small residential subdivision that would be accessed off a short cul-de-sac on the north side of Fish Lake Road, on a tangent and within the limits of the mineral hardrock claims. Five or six rural lots (like the Wolf Creek subdivision) seemed possible. I made a preliminary proposal to those who dealt with land development issues (at YTG and City levels) but there was no interest in such project. Only while starting to write this “Part 4” in 2020, I became aware that a fairly large residential subdivision was later developed on the south side of McIntyre Creek, west of the Alaska Highway.

I handled **four** Klondike Highway resurfacing projects, two of them south of Carmacks; **(1)** one close to **Carmacks**, and **(2)** one **along Fox Lake and Little Fox Lake**.⁷⁷ In 1984 already, I also handled a contract to crush **BST aggregate only** for a long stretch of the Klondike Highway between Minto Landing and Pelly Crossing. Crushed aggregate was needed from three existing pits at km 433, **km 446** and km 462, the **middle one** close to the three **Von Wilczek Lakes**. That site was east of the “new” highway, but west of where it had been before (within a registered right of way!) adjacent to North Lake.⁷⁸ The Land Use Committee had allowed the Contract to proceed but required a study to determine if migrating birds at this very important “**bird route stop**” would be negatively affected by the crushing operation during the fall bird migration period. So we wrote up a Service Contract to Northern Biomes Ltd., (Mr. W. Gavin Johnson) **for about \$ 5,500**. He pitched his tent on the west of South Lake, close to the highway, and counted and observed the behaviour of huge flocks, while a crushing contractor called **Impact Industries** set up camp and did the work from 7-15 October. A nice ring-bound 37-page report in December stated that during the period of clearing, gravel crushing and stockpiling, **the birds did not really seem**

⁷⁷ This work was obviously needed due to the additional traffic from Faro – lead-zinc concentrate trucks – at the time. An additional resurfacing project was along the Klondike River and near the start of the Dempster Highway.

⁷⁸ This reconstruction had likely been done with the curve improvement at Mint Landing, before my arrival in Yukon.



to be affected at all, irrespective of more than 20 species, (1701 birds at North Lake, 2591 at South Lake and 711 at Island Lake). The author had been quite busy! The report also included a list of the Contactor's equipment and a comment on noise and dust, but left unsaid if he had read "War and Peace" in his tent, at night! And I wondered: Was this perhaps how this firm from Lacombe, Alberta, with a **cone rusher**, indicated a "new way" of "getting in, getting done and getting out" at a rate of 250m³ per hour?⁷⁹ This type of equipment is much more efficient, and is also less noisy than a jaws crusher. (Nuway Construction was soon registered in Yukon.)

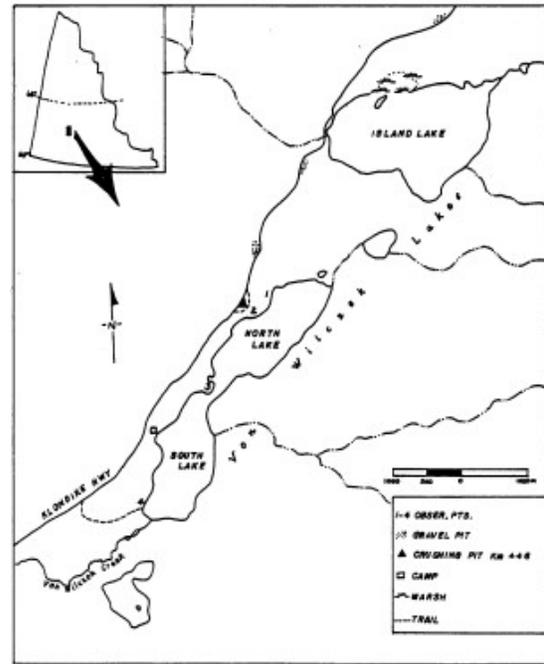


Figure 1. Study area of Von Wilczek Lakes, October 1984

Resurfacing contract (1) directly south of the Yukon River Bridge at Carmacks had an interesting pre-history, and I first need to describe YTG's (successful) **Heavy Equipment Operator Training Program** – in which I played a minor role, but am quite proud of. It was quite a public issue at the time, starting in the late summer of 1985: Together with someone from the Department of Education, I was asked to select five young people from Carmacks. They would be sent to a College at Lac La Biche, Alberta⁸⁰, for an "all expenses paid" 10-week long winter training course (with both **class work** and **hands-on segments** on real machines). In the mean time, I was asked to select a few years of upcoming highway construction projects in the Carmacks area, so that on these students' return to Yukon, successful bidders on those contracts could employ the five trainees, and would be paid an additional \$2 per hour for further on-the-job training. It was later understood that the concept of this "**multi-layer training**" had initially come from **Chief Roddy Blackjack** of the (then called) Carmacks Band, straight to Mr. Piers McDonald (his MLA and Minister of CATS) or Mr. Tony Penikett.

After some newspaper notices and radio announcements, the YTG Department of Education administrator and I drove north together very early on a September morning, and **we interviewed 20 people for 20 minutes each**.⁸¹ This happened in a small meeting room at the RCMP station. Together, we selected the five candidates who (in our opinion) would be successful with this kind of training: four men and one woman.⁸² Shortly thereafter, with much radio support from the local non-CBC radio station CKRW, they were sent off, flown to Edmonton and then bused to Lac La Biche, where all five completed the course satisfactorily. **John Anderson** actually became the class' "top student" and he came back with the "belt buckle award" (donated by Caterpillar). **Velma Washpan** was the lady in the class, and the third person whose name I remember was **Rodrick Blackjack**. (The Council Clerk of the Little Salmon/Carmacks First Nation, Ms. Cathy Kowalchuk, advised by e-mail on **2021-03-19** that the others were **Robert Cochrane** and **James Billy**, and also provided information (see next page) about their careers resulting from this training.

⁷⁹ This term was more recently **coined** after a major road reconstruction at the very busy **Port of Long Beach, California**, which had to shut down for the absolute minimum of time. It has become an accepted construction management phrase.

⁸⁰ Currently called **Portage College**, and still offering many types of vocational training courses from three campuses

⁸¹ We obviously had only very minor "breaks" within the 400 minutes (almost seven hours!) of straight interviewing.

⁸² Before leaving Carmacks, we had already received "**tacit approval**" of our choices from the RCMP officer, who had much more local knowledge of the individual residents. (We just laid the list of 5 before him on the desk, and he nodded his head!)

That winter, “we” (meaning Florian, Brad and I, plus Yadvinder and everybody else in the office, including Contract Administration, for this “**novelty**” in contract documentation) got our design act together with **two** specific “construction training” projects with the **\$2 per hour clause**:

- (1) the Freegold Road realignment, including the Murray Creek multi-plate culvert installation, and
- (2) the very long Klondike Highway resurfacing project directly south of Carmacks.

During the summer of 1986, **four** trainees worked for YTG Contractors, and **one** went to work for his dad who operated a gold claim west of Carmacks. All five of them were properly employed that summer, and four of received the additional training. John Anderson was soon promoted to “grade man” on the **major resurfacing project south of Carmacks**. I spoke to him once later that summer, as I wanted to know why “**their**” training had been successful while another (similarly conceived but differently executed) YTG effort (that same winter, early 1986) had **miserably failed**. (How I heard about it, I do not recall.) For an upcoming large water improvement project, the Town of Teslin had suggested a similar training program, and the Chief of the Teslin Band had **individually selected** five candidates for this similar Lac La Biche course, one that likely contained backhoe training and pipe laying techniques. This group from Yukon had supposedly gone on a drinking and carousing binge during their very first weekend in Lac La Biche, and they had summarily been kicked out of the dorm and sent home by bus, (not even reaching Whitehorse, so that the local media did not even know about it; **the matter was hushed up**.) John told me that this had been very different from their group’s experience at Lac La Biche, and also why:

Very soon after their arrival, an older trainee (from an Alberta Indian band) had taken the class aside, telling them that he was very grateful for this training opportunity, as it was his “last chance” of a proper job; he had sternly warned them that he wanted all of them to succeed, without any drinking and carousing. His moral persuasion power over the group (class size ± 25?) had been heeded. Be that as it may, but it might also be argued that the method by which the Carmacks (**group**) selection had taken place, needs to be much preferred over the Teslin (**individual**) selection method.⁸³ For this, I would only like to **express my thanks to my co-selectors**, one from YTG Education and one from the Mounties.) **But, as always ... the proof of the pudding is in the eating.**

Until recently, my question had always been if (35 years later) it would be possible to discover which of the 5 trainees continued with a Heavy Equipment Operator career, and for how long? I mused that some of them might still have memories about their training time and whether they thought it was all worth it. All training is useful, but if it leads to long-term employment or a career (though sometimes mostly seasonal), it would show that this costly training programme was worth offering. Close to the end of my own professional career, I feel proud of having been able to do this “selection” so long ago, and also **delighted to have received confirmation (in 2021) that:**

John Anderson (who started with Pelly Construction / General Enterprises in 1986) is still there, now likely with a **30+ year** employment seniority within the firm. If he still operates heavy equipment, is not known.

James Billy (who went to work on his father’s mining outfit west of Carmacks) later became a “**civil servant**”, and has stuck it out till now for YTG, as **Heavy Equipment Operator I, Eastern Region**.

Rodrick Blackjack works for the Little Salmon/Carmacks First Nation as an **equipment operator**. Some functions that used to be YTG’s responsibility, (like maintenance of roads within the village, and perhaps on the “Secondary Road System” like Freegold Road, are now carried out locally. He obviously still uses his training.

Robert Cochrane (in Cathy Kowalchuk’s words): “worked for the Municipality Government for years and retired and is now working for us in Carmacks Development Corporation for Little Salmon Carmacks First Nation. We were married for 24 years and he is now re-married. Our son Zack is a Deputy Chief and my youngest daughter is a **heavy equipment operator** and I am so proud of her for young lady at age 26.”

Velma Albert (née Washpan) worked “six years with the chipper crew” (i.e. YTG’s fast moving BST crew), also an appropriate experience following the training, and a better job than selling shoes in the Hougens Mall (*as that’s what she did after returning from Lac la Biche!*) She is now House Manager of the **Anderson Lodge Healing Centre for Women in Vancouver**, of the Circle of Eagles Lodge Society, (which is likely a very challenging job!)

⁸³ Obviously, nepotism and all kinds of other suspect practices (favouring some over others) are never to be ruled out.



Klondike Highway resurfacing project (2) was along Fox Lake⁸⁴ and Little Fox Lake, and various culvert extensions were needed; this had been the first section of the Klondike Highway built by DPW, and the road width standards had been different. It was a horizontal alignment with a lot of small and short curves, hugging the high ground. In one particular little gorge, I suggested that the culvert extension be extra-long, which might eliminate the need of thawing out the culvert of ice build-up in the early spring. This idea had not been come up before, and I do not know if this solution actually worked. The added advantage was a little lay-by (as a shoulder widening) on the northbound lane side, away from the lake, which was fairly deep down at that point. During the summer of 1986, when this project was being surveyed, the YTG photographer came by and took a photo of Tom O'Donovan's crew, which featured in a Yukon promotional brochure. On this project (I think) I saw a rare culvert with a drop outlet into a pond of water. That was obviously only ◀ possible if the stream had no fish in it at all. It may have been at Fox Lake.

Klondike Highway resurfacing project (3) near Dawson City used crushed gravel from an existing pit, but also crushed left over material from the rip-rap sources along the Klondike Highway. Crushing was also done for the first BST application into Dawson City. At km 0 of the Dempster Highway, we decided to resurface the short distance (less than 100 metres) up to the bridge over the Klondike River. This was obviously much appreciated by the owner of the restaurant at the NW corner of that intersection: Everybody parked in front of that place. During this period, Al Close received a brand new Ford F-350 pick-up truck. The YTG Workshop in Whitehorse had attached a rack of **large moose antlers** on top of the hood, and when taking receipt of the vehicle, he had to "take it home" with this decoration, where his arrival was made into a festivity when their boss drove in. This was fairly shortly before he retired and was replaced by Charlie Profeit, who had been the Dawson City Roads Foreman.

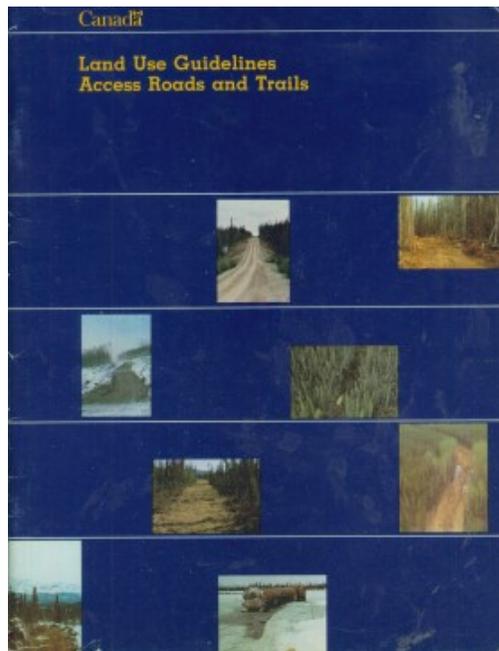


Klondike Highway resurfacing project (4) was between the bottom end of an abandoned section of the Klondike (called 11% Hill) and Stewart Crossing, exempting from that \pm 18 km length the recently constructed Crooked Creek relocation. This project needed gravel from an existing pit close to Crooked Creek Bridge, and an existing pit close to Stewart Crossing. The former pit was somewhat "**marginal**" and Doug Andrews made suggestions for the direction in which it might be expanded. When crushing the gravel, Nuway discovered that the material barely met gradation limits, as the pit was too sandy. We then had to use more from the Stewart Crossing pit, that still existed in 2009, believing GoogleMaps, ▲ close to the (then) Grader Station, 1.1 km from the Stewart River Bridge. This resurfacing resulted in a very acceptable surface that (I was assured) lasted for many years. I cannot recall if studies were ever conducted by YTG to determine the life expectancy of such BST'ed gravel surfaces. In the beginning of the BST surfacing program, some sections lasted two, three or perhaps four years only.

The old DPW cross-section rolls that Yadvinder Dhillon had found in the small room in the hallway were identified as those for the **Freegold Road**, starting at the Nordenskjold River. Florian then went out and found almost all centre line pins (at 100 ft. distances, of course) and we established a **specific project length** that might be reconstructed under the training program. (Not too short, not too long, and "buildable in one season".) We once drove the route (with side trips to the centre line pins in the bush) and beyond, up to an old timber mine building at the former **Freegold Mine** (approximately where Brad's **Casino Trail Study** started). Florian and I also discovered **a few additional benefits** of this project. Discounting the first kilometer or so adjacent to the west end of the Nordenskjold River, due to unknowns about the Carmacks Bypass, we determined that this project would:

⁸⁴ Initially called Richthofen Lake; the name was changed after WWI, just like Berlin (Ontario) was renamed Kitchener. Ferdinand von Richthofen had been a 19th century geologist, who became an uncle of Manfred, the Red Baron of WWI. Every numbered highway in Yukon had a "Fox Creek"; could they not think of a larger variety of names?

- (1) straighten out the route considerably and make it safer;
- (2) realign the route away from the Yukon River and some well-used seasonal “fishing camps”, and
- (3) enable replacing the existing timber Murray Creek bridge with a multi-plate culvert.



The Land Use Committee gave its blessing, and that winter, instead of surveying the route anew in metric units (because we had no time), we simply “**metricated**” the cross-sections and then prepared the plan-profile drawings, quantities and tender documents in metric units. We also documented a separate novel / unusual “**winter clearing contract**”.⁸⁵ This idea worked excellently, and the Chief and Council were happy.⁸⁶ **Remembering** the abandoned culvert on the trail between Beaver Creek and Snag, we checked the flow of Murray Creek and discovered that its length and size would suit the project perfectly. Colin Yeulet was found quite amenable to have one of his low-bed truck drivers “go and pick it up”, and deliver it as close as possible to the bridge site northwest of Carmacks, somewhere on the pre-cleared swath of land.

◀ The federal **Land Use Guidelines – Access Roads and Trails** (1984) was used for tote trails. Perry Savoie had been on the Steering Committee for the study team for this handbook, by Hardy Consultants in Calgary. A road like Freegold Road, as a Territorial Highway, would likely be considered to be “out of scope” for the highest of its classifications, but the principles in the 49-page booklet were seen as valuable at the time. Are they still I valid today?



Freegold Road near the (long-abandoned) Freegold Mine.



Ford 19-365 truck on the Freegold Road.⁸⁷



Round CSP section, (**not** the one for Murray Creek as it was a **horizontal ellipse**).⁸⁸ I suggested this particular one for improving Duncan Creek Road, near Keno City.

After the delivery, Colin came into my office, and with a **huge grin on his face**, told me exactly how “**they**” – meaning his subordinates – had done it: Knowing that it was **long and heavy**, the driver had **(1)** decided to pass by

⁸⁵ I likely followed my former experience with what had been done by others on the Clocolan overpass project in “Part 2”, as a bit cumbersome but saving money on a site re-survey. Mr. Alan Nordling would have approved of this, had he known!

⁸⁶ If memory does not fail me, I believe that the Carmacks Band got the contract and salvaged all the trees for firewood.

⁸⁷ These two photos are not on the section that was to be reconstructed. They are from our visit to the Freegold Mine.

⁸⁸ YTG had bought many lengths of these 10’ round culverts at auctions of **Clinton Creek** and **Whitehorse Copper** assets on the closures of those mines, laying in the Maintenance Yard, for parts. Some of these pipes had large square holes in them (because they had been used covering conveyor belts?) and Highway Maintenance used them for salvaging individual plates (or even plates of plates).

the Haines Junction Weigh Scale at night (when they knew quite well it was closed). Reaching the junction of the Alaska Highway and the Klondike Highway, he had then (2) decided to make a left turn, instead of following the rules to first go to the weigh scale close to the Kopper King. And additionally, when arriving at the Nordenskjold River, (a 120 ft. “double single”⁸⁹ Bailey bridge), he realized (3) that the load might just barely pass over the panels, but that a blowtorch was needed to **temporarily get rid** of the long-worded “**Nordenskjold River**” signs, and weld them again on ▼ their posts. Mission accomplished! This is what GoogleMaps saw in July 2009, at the very end of their “interest”; no streetscape imaging exists beyond the bridge. Pity!



General Enterprises (or Pelly Construction⁹⁰) was the low bidder on this project, and they were quite comfortable with the training clause of \$2 per hour of training time (which Florian had to confirm with the progress claims), and the Contractor hired one of the male trainees and also Velma Washpan, who told me once that she learnt a lot that summer, on every kind of equipment. Only when coming into my office to sign the final project claim, **Mr. Keith Byram, P.Eng.**, (owner and Managing Director of both firms), told me that during the very last week of work, Velma had

(apparently or supposedly?) not checked the oil in the vibrating packer, so that it had blown a gasket and had to be replaced with another packer. **He just shrugged it off as a normal risk of the contracting business.**



Nordenskjold River Bridge, start of re-alignment, Murray Creek Bridge replacement, end of realignment, and note the straight “new alignment” and the **faint** crooked “old alignment” that was very close to the fish camps.

I do not recall similar training courses funded by YTG in those years, except a “mathematics for surveyors” course at Yukon College, for which all our existing “casuals” were encouraged to enroll, and some did, thought it was “out of season”. (Rosemary Popadynece once visited us at home to ask me something about the mathematics.) This was needed and welcomed when the use of “**Total Station**” equipment (TOPCON brand, with a Texas Instruments calculator inside?) made the old-fashioned **theodolites** redundant within a single year. While the one summer, YTG had rented one unit for the sole use of **Roy Slade**⁹¹, a senior crew chief (“**just to check it out**”, Wally said), five of these fancy machines were rented (or purchased?) the following summer; all crew chiefs told Wally that they wanted one! Productivity increased dramatically on the Campbell Highway; Mr. Alan Nordling would really have loved it if he had known. But when someone from Okanagan College once came to ask if YTG had any likely candidates for “**sandwich courses**” of their Technologist Program in Kelowna, the answer was “**No**”. For one or other reason, YTG could not even sponsor “winter/spring courses”.

Some of our “casuals” came from Quebec, others from TROC (= the rest of Canada) south of Yukon; one rod-person was a daughter of the Carmacks MLA (see page 18); I heard about **Ken Quong** (son of PWC’s former Yukon manager **Jim Quong, P.Eng.**), who had surveyed for YTG during his dentistry studies at UBC, before my

⁸⁹ This means doubling up on the panels, but with a single panel height – or is this called a “single double”?

⁹⁰ The one company was “non-union” and the other was “union”. I was not told why the Owner decided to tender some projects under the one and others under the other name.

⁹¹ He was on Yukon’s softball team (and if I am not mistaken, he curled with Wally and Gabe Aucoin.)

arrival in Yukon, and then there was **David Boorse (see below)**. Our son Theo also applied for survey work after completing Grade 12 in 1986, ending up at Fraser Camp on White Pass. He was not allowed to work if I had to sign his timesheet, which I found reasonable, so he worked for Robin instead. Lydia and I once visited him there, and there was a dispute about the caterer or the food. Not wanting to interfere – Theo was not one of the complainants – we did not do anything about it; these caterers contracted with YTG and (as I recall), it was all handled by Ray Magnuson as “Service Contracts”. So the cook at Quiet Lake only worked for a summer season (too short), and others for a whole year. But when a survey crew member under my “line of command” supposedly **always** ordered and ate a New York steak, thereby compelling that **private establishment** to overbill YTG on “meal sheets” (which had a daily maximum limit per person), it was sometimes my difficult duty to sort out. Let’s face it: Survey work is not always as easy as a nine to five office job. I sympathized with them and the flagpersons.

Below is my Certificate for completing a training course in January 1986, for our **office staff**. “Remote Sensing” deals with ways in which the LANDSAT (= land satellite) imagery was interpreted. This was “high technology” that only Brad could use for the Casino Trail study; he probably knew a lot about it already. I found this (typical) but unnecessary federal spending at the time, particularly because LANDSAT is extremely “dynosauric” by now, while the principles are definitely not. Most likely, **David Boorse** benefitted also from this; he had been a NorthwestTel scholarship recipient (his father was their employee), studying Survey Engineering at the University of New Brunswick in Fredricton. During the long summer months, he was paid about **\$ 16 per hour**⁹², plus a lot of

overtime, plus room and board, and was already a crew chief in 1984. He told me once that he had felt uncomfortable when on his return to Fredricton, he had to hear from his fellow students what they had done that summer, and that they had been paid something like **\$ 3.80 per hour!** After graduating in 1985, he returned to Yukon and was under my (informal) tutelage. In the summer of 1986, Theo was on his survey crew at Fraser Camp on White Pass. He later designed some highway projects, and when he applied to APEY as an EIT (Engineer-in-Training) in 1988, he asked me for a reference, to endorse what he had already done. I did this gladly. **He continued to study, he then told me!**

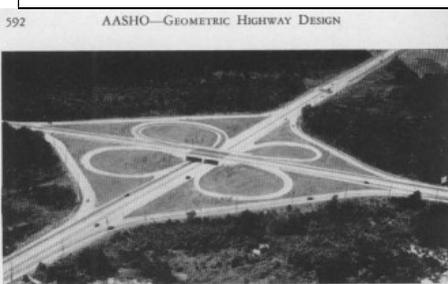
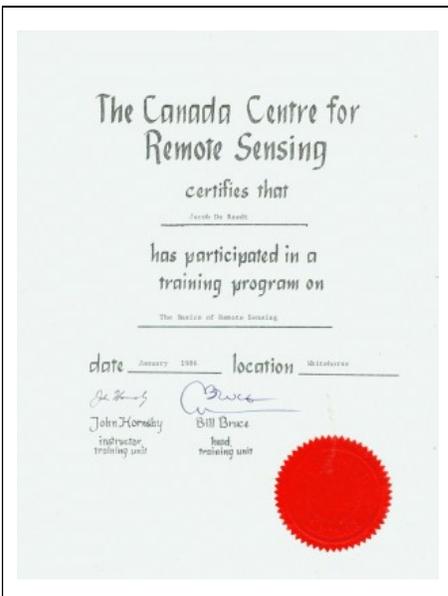
The **Carmacks Bypass Route** was already discussed in those days, and I knew this from Mark Hambridge. See **above** about the discussion in the Yukon Legislature in 1995. I do not dispute that the way in which the Klondike Highway No. 2 runs through Carmacks, results in a really awkward situation, and that **any relocation** would be **extremely costly**. Only recently, I discovered a link to the “**Yukon Resource Gateway Program**” about it, **see below**. Is it ever going to be built?

Much later in Arizona, I heard about several **Interstate highway bloopers** of the past, and how these situations had to be ameliorated **at massive costs**. One example is the **I-40 / I-17 interchange** just southwest of Flagstaff, where trucks were having winter weaving and merging problems, during the first winter after completion of a **“standard cloverleaf”**. Somebody had somehow overlooked the icy conditions at almost 6,000 ft. above sea level! It took more than 20 years to “**fix**” or even “**upgrade**” this interchange, and guess what: In 2018, it was being rebuilt again:

<https://azdot.gov/adot-news/i-40i-17-interchange-restrictions-starting-monday-april-9>

In Arizona as well, I heard about US Supreme Court decisions on the alignment of the Interstate highway, when a State had planned to build it through an area with poor people. “Fundamental Justice” had to be used in the routes.

⁹² I am not sure of the actual hourly rate for YTG rodmen and crew chiefs in those days. It was probably the highest in all of Canada. Though it was seasonal work, these crews were hired and started to work during May, and were normally laid off in mid-September or early October. The possibility of favouritism about the date of the end of their seasonal work was always in the back of my mind. Any delay by a Contractor would automatically enhance these casuals’ pockets.



But in addition to this, the many errors in several of the States within “**the union of the seceded colonies**”⁹³ about road bypasses have had a very detrimental effect on small towns, and some have actually suffered financially due to lack of business from passing motorists. Particularly when a Walmart starts at the interchange just outside the town limits, and the town sees its downtown core deteriorate into a slum and all locals go out of town to shop, the negative effects may be more than the positive effects which were first anticipated. Many examples can here be mentioned⁹⁴, also in Canada, and it does not even have to be a freeway to kill a town; a two-lane highway bypass may just as easy devastate a small community. A decision on a bypass is extremely difficult to undo or redress.

Agreement reached for the Yukon Resource Gateway Project

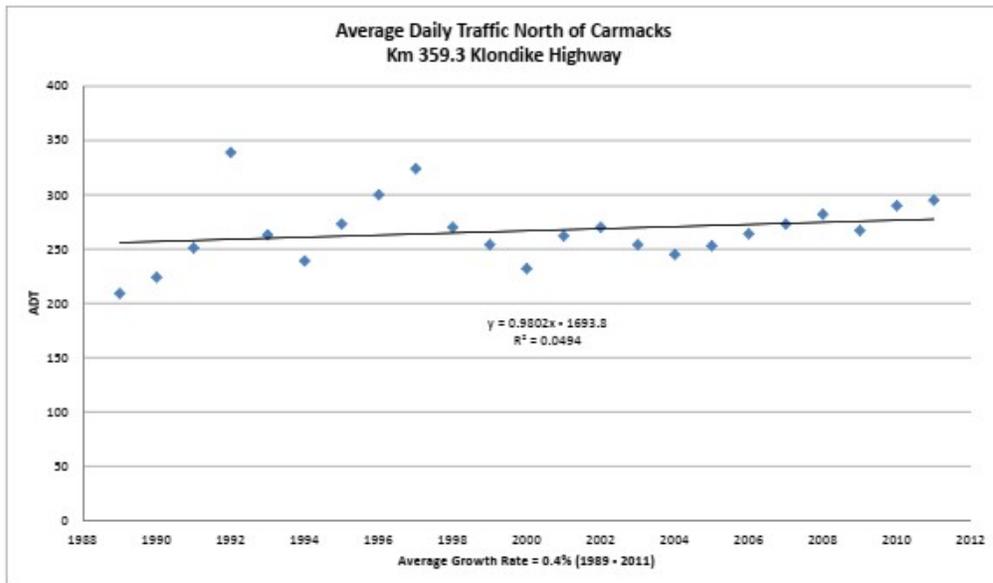
Published 04/04/2019.

The Government of Yukon and Little Salmon / Carmacks First Nation have reached an agreement for the **proposed Carmacks Bypass project**. The agreement enables the Little Salmon/Carmacks First Nation to access potential contracting, education and training benefits associated with the project. The Yukon government has also agreed to provide funding so the First Nation can participate effectively in the planning, design, assessment and regulatory processes for the proposed project.

The construction of the **bypass** is dependent on the Government of Yukon receiving the agreed-to funding from the Government of Canada for the Yukon Resources Gateway Project. Each of the Yukon Resource Gateway Project components will be subject to the territory’s assessment and regulatory processes, which include opportunities for public input and consultation with affected First Nations.

Klondike Highway

FIGURE 19 KLONDIKE HIGHWAY ADT TREND KM 359.3



I understand this ▲ is the first of six such agreements, the sixth one being dated 01/03/21 about Highway No. 11.

◀ This graph shows the AADT on Highway 2 north of Carmacks, just north of the intersection with the Campbell Highway. It is very unfortunate that the traffic volume at Carmacks is not available, except for one at Braeburn (km 260) where the AADT was **460 vehicles per day in 2011**.

The question then arises: With a long term traffic volume (AADT) based on a growth rate of 0.4%, of (say) **500 vehicles per day, is a bypass project really worth it? To be very honest, I really do not know the answer.**

Somewhat similarly, the ideas to relocate portions of the **Top of the World Highway No. 9** did not seem to go anywhere in the mid-1980’s. Walt Gutowski sometime gave another “**kick at the cat**” and a roll of drawings was on top of a cabinet in his office, but nothing was resolved, particularly during his illness. The major problem areas

⁹³ Quoted from page 16 of “English Courts of Law” by H.G. Hensbury, Oxford Paperbacks University Series (OPUS) 27, Fourth Edition prepared by D.C.M. Yardley, Oxford University Press, New York & Toronto, 1967.

⁹⁴ Willcox (I-10), Winslow and Holbrook (I-40) – all three in Arizona - come to mind, and there are also several towns on I-5 in Washington and Oregon, particularly the City of Medford, Oregon. Merritt BC is a local example.

seemed to be in the “high country” close to the Alaska border, starting at ± km 80 and further west. Highway 9 ran close to a “ridge” between the many south- and north-running creeks, some of which increased their slope as they departed from the top, but it also sometimes ran north of a hill. (I recall my own 1967 design experiences with the (similar) highway between Chrissiesmeer and Oshoek, that followed the top of a long ridge (see “Part 1”) but this was also entirely different, due to permafrost conditions.) To reconstruct the entire road along the “sunnier side” of the ridge would obviously be advantageous, but for which actual lengths, and at what cost, and eventually, for what (short and varying seasonal) traffic volume? The next page shows multi-year manual counts on the Top of the World Highway at left, together with my analysis at right. In winter, West Dawson residents cross the Yukon River on the ice, but only when it is thick enough, and this is monitored and cleared. Traffic

Top of the World Highway

TABLE 66- KM 106 TOP OF THE WORLD HIGHWAY (BORDER CROSSING LITTLE GOLD & FORER CREEK) - AADT

YEAR	Start Date for Ferry at Dawson	Manual count										ADT	End Date for Ferry at Dawson
		MAR	APR	MAY	JUNE	JULY	AUG.	SEPT.	OCT.	AADT	ADT		
1985	22-May	*	*	10	84	148	105	42	0	*	*	96	15-Oct
1986	22-May	*	*	*	*	*	*	*	0	*	*	*	21-Oct
1987	20-May	*	*	153	190	188	135	76	0	*	*	157	21-Oct
1988	17-May	*	*	79	119	271	93	73	0	*	*	144	17-Oct
1989	16-May	*	*	63	112	198	123	70	0	*	*	129	16-Oct
1990	16-May	*	*	73	136	199	138	85	0	*	*	143	16-Oct
1991	16-May	*	*	29	122	198	131	73	0	*	*	132	16-Oct
1992	13-May	*	*	47	136	234	177	96	0	*	*	167	15-Oct
1993	14-May	*	*	50	176	265	185	82	0	*	*	181	17-Oct
1994	15-May	*	*	*	*	*	*	*	0	*	*	*	15-Oct
1995	10-May	*	*	*	*	*	*	*	0	*	*	*	22-Oct
1996	16-May	*	*	33	221	238	123	84	0	*	*	169	22-Oct
1997	15-May	*	*	69	137	224	180	87	0	*	*	161	14-Oct
1998	15-May	*	*	44	171	270	204	108	0	*	*	180	16-Oct
1999	14-May	20	*	22	179	236	189	73	*	*	*	*	17-Oct
2000	15-May	*	*	17	140	224	177	66	*	*	93	*	15-Oct
2001	15-May	*	*	38	169	211	179	59	5	142(138)	126(138)	24-Oct	
2002	15-May	*	*	27	187	157	190	74	*	136(136)	136(136)	07-Oct	
2003	11-May	*	*	25	149	192	152	48	*	123(138)	123(138)	01-Oct	
2004	15-May	*	*	48(16)	117	142	125	49	33(2)	*	100(140)	02-Oct	
2005	15-May	*	*	74(16)	172	205	131	68	*	*	136(138)	02-Oct	
2006	15-May	*	*	26(16)	127	158	102	42	10(13)	*	91(151)	13-Oct	
2007	15-May	*	*	70(16)	215	265	275	78			142(138)	12-Oct	
2008	16-May	*	*	23(16)	121	147	110	48			100(138)	25-Oct	
2009	15-May	*	*	36(16)	116	104	96	43	*	84(138)	84(138)	?	
2010	15-May	*	*	52(16)	132	81	63	34	*	74(138)	74(138)	?	
2011	May	*	*	41(16)	122	145	111	45	*	99(138)	99(138)	Sept	

volumes recorded at km 106 (i.e. near the Alaska border) show a maximum 275 vehicles per day, August 2007, and an Average Daily Traffic volume that varies between a high of 181 per day in 1993 and a low of 74 per day in 2010.⁹⁵

The duration of the manual counts varies, based on the start and end runs of the George Black ferry at Dawson City, and it hovers around 155 days per year.

The other counter on Highway 9, at km 5 is just west of the “West Dawson” neighbourhood. At that location, the ADT is shown as ± 300 vehicles per day. This clearly includes all the mining, exploration,

environmental and non-Alaska destination traffic, and excludes the rural residential traffic component generated by West Dawson. Various tote trails exist off Highway 9 west of West Dawson.

◀ In 1988, John Hall initiated the expansion of the Yukon traffic count program. He worked under Mr. Doug Campbell, coming to Yukon from Calgary, where he had been my colleague at UMA, recorded in “Part 3”. Mr. Turgot Ersoy, P.Eng.⁹⁶, also became his colleague, but I do not know how long they worked together.

Above ▲ are manual traffic counts for many years (with my comment at right) and on the next page are four parts of 2021 GoogleMaps imagery. Highway 9 has by now been improved in several locations near the top. These relocations must have greatly alleviated problems with the previous route.

Manual Counts: Seasonal continuous 24 hour counts at border crossings and ferries. Manual counts may also be day/hour counts conducted visually by staff. A manual count often includes vehicle classification, speed studies and turning movements at intersections of interest.

Average Annual Daily Traffic (AADT): The average daily traffic volume for a period of one year. For this summary report we use the convention that all days in the year must be counted and recorded before the AADT is calculated. If not, the ADT is calculated (see below) and the number of days counted is shown in brackets.

Average Daily Traffic (ADT): The average daily traffic volume for a specified period of time. The period of time may contain gaps. For example, if a few days of data are missing in the current year, then the ADT is calculated rather than the AADT. This is the total traffic counted divided by the number of days counted. The number of days counted is shown in brackets.

⁹⁵ It is likely that 2010 was a construction year, or that there were forest fires, so that tourists were dissuaded use the route.

⁹⁶ Turgot had come from NWT and was actually a geotechnical engineer who had written reports on the Alaska Highway Gas pipeline. I do not know if he had been hired as geotechnical engineer or not.

In 1988/89 an expanded traffic count program was established in the Yukon. Because traffic information was lacking in many areas, new counter locations were established. The objective was to obtain traffic counts on all primary highways. Traffic count statistics are now available for all primary highways. In addition, mechanical counters are installed and monitored on a seasonal basis on some secondary roads.

How much did it cost, and how much benefit can be reaped from that substantial (federal and territorial) investment?⁹⁷ How much has it cost per vehicle driving from Dawson City to Tok or Eagle? I would like to leave that issue with you, dear reader. From <http://pelly.net/previous-projects/>, between 1987 and 2003, Keith Byram's firms⁹⁸ built (or rebuilt?) 70km of the Top of the World Highway, and many others in Yukon.



Reviewing all this (obviously federal) spending, is it a wonder that many normal Canadians are so sceptical of the improvement of “infrastructure”? How much tourist dollars does it yield? With a changing tourism industry, how was it possible that none of the **politicians, bureaucrats** and even **engineers**, ever said “NO!”? My reason for asking this is that fairly recently, in the newspapers, more and more retired senior civil servants (not only engineers) seem to be coming out of the woodwork, complaining about one or other kind of wrongdoing or deficient “program delivery issue” – of which they supposedly have some knowledge – and then claim that “**This would not have happened in the days when I was in charge!**” Why?

How light was Yukon highway traffic in winter? A Dow Chemical salesman from somewhere in The Rest of Canada came into my office after a trip, and he told me how he felt after driving from Whitehorse to Mayo and Elsa one winter day (or while on his way back from the mine), when he had seen **two** vehicles coming towards him. The distance is 451km, and there were likely only two narrow bare rows in the middle. “**It was a culture shock to me, Mr. de Raadt!**”

⁹⁷ The traffic volumes recorded at **km 106** (i.e. near the Alaska border) show a maximum **275 vehicles per day**, August 2007, and the Average Daily Traffic volume varies between a high of **181** per day (1993) and a low of **74** per day (2010).

⁹⁸ The one firm was “union” and the other one was “non-union” during the 1980’s.

◀ Alaska speed limit sign, 35 m.p.h. near Tok.

YACT Conference photo and Alaska pipeline crossing. ▶

On Sunday night **1988-06-26**, returning from a Toastmasters Conference at Fairbanks, **I crossed the US border on the Top of the World Highway**, re-entering Canada after leaving it at Beaver Creek on the previous Friday. After arranging an on-site progress meeting with a Contractor for the next Monday, I drove my Dodge Omni to Fairbanks. Bonnie Pagel got an award that weekend, from some “bigwig” at the TI National office. On my return trip, I stopped where the huge oil **pipeline crosses the Tanana River**.



Turning left near Tok and driving through Chicken to the border crossing, seemed to be a splendid idea – Robin Walsh had approved my “vacation” for the Friday, and also that I would be “at work” on that Monday – until I **smelled sulphur** while relieving myself on the shoulder, and I realized that the car battery was on the blink. When I switched the car off, I could not get it started. This happened “**in the middle of nowhere**”, as the saying goes; it was quite a distance east of Delta Junction. **I then decided to hitchhike forward to Tok**, where I would be able to buy a new battery and return to the Omni parked on the shoulder. I did not wait long: An older Roman Catholic priest decided to stop for me, and I hopped in and told him my reason for doing this for the first time since my student days. His story was that he had already held one service at Delta Junction and had to lead another one in Tok. We did not talk any theology; I was too glad to have found a **Good Samaritan!** He did not drive fast, but dropped me off at a store in Tok where yes, they had that specific battery model, and I was back on the north shoulder within a few minutes with a new 12V battery in my hands. I was fortunate again when a car stopped and I was allowed to get in, sitting next to a passenger, with the battery on my lap. Next to me were two German men, tourists, and in the back seat two others slept. This quartet had flown to New York, where they had bought this older full size car, which they were planning to sell on their return to the Big Apple and fly back to Frankfurt. At least, the driver told me that in a hushed voice, because he did not want to wake his friends in the back of the car; the guy next to me was quiet, and I suppose his English was not that fluent, or as fluent as my German. The battery on my lap was getting heavier by the mile, and I was very glad when I saw my Omni looming in the distance. I was stiff when getting out of the car, thanking them profusely and anticipating to “get going” once again after replacing the battery. I realized that **I had lost a few hours travel time** when turning left, 12 miles east of Tok.



Highway 5 between Tok and Chicken, Alaska. 1988-06-26 - Abandoned dredge at Chicken, Alaska,

The first part of Alaska’s **Highway 5** (see above) had a **well maintained gravel surface**, but it was wide and followed a good geometric alignment. This was quite different than what I had seen on its Yukon counterpart, east of the border crossing, where I had never been before. It was obviously kept open in winter, serving Eagle, Alaska, which (like Dawson City) has a permanent population, and is also an important checkpoint on the annual Yukon Quest. I only stopped once along

the way, at an **abandoned gold dredge**, eating some food that I had grabbed in haste when fueling up at Tok. At that point, the Taylor Highway had already become more primitive, just like some minor Yukon highways. But seeing that this was very close to the longest day of the year, it was **just after 10 p.m.** that I arrived at the border. **It was closed – with a little tripod made out of pieces of two-by-four lumber, blocking my way.** What was I to do? Turn back, or wait till opening time? I walked twice around the single building (both customs?), hearing radio music inside. Nobody, however, answered when I knocked on the door. So I decided to move the little tripod out of the way, drive through and replace the hand-made lumber contraption, and keep on going east, which was mostly downhill anyway, and **I was just in time** for the (last) departure of the George Black ferry, at 11:30 p.m.

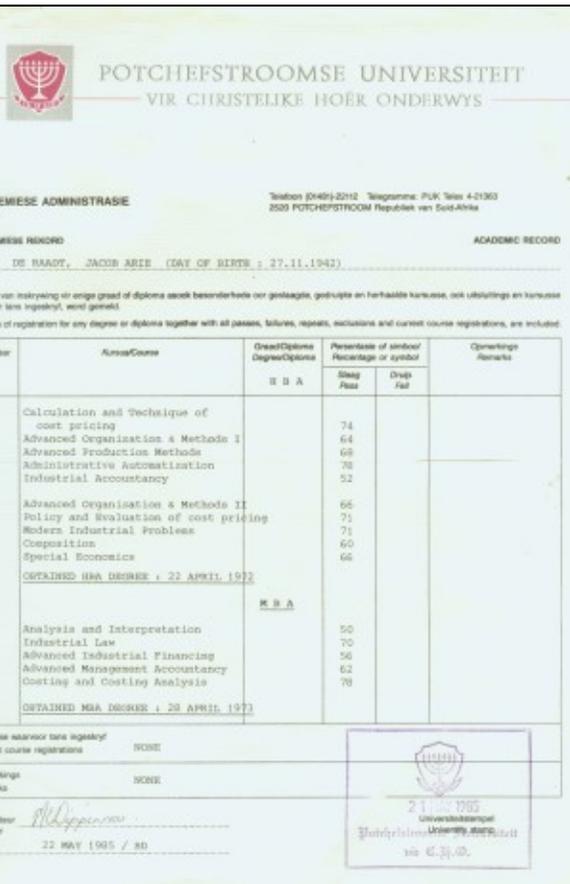
So I had (supposedly) **entered Canada illegally**, and I knew it. I also knew that in those days, (and this was shown in notices in the Yukon News) hikers were allowed to enter Canada from Skagway or Dyea (via Chilkoot Pass), but only if they proceeded to Whitehorse at Canada Customs in the Federal Building. So I was not worried at all while continuing from Dawson City to the Contractor’s camp at Crooked Creek (where I dropped in very late), and had my progress meeting with the Contractor the next morning. I attended another site visit on Tuesday and was back at my desk in the Lynn Building on Wednesday. During lunch, I walked to the green building, told my story and presented myself. Initially, the officer at the desk was a bit upset, saying something like **“Don’t you know that we can have your car impounded?”** and **“Where’s your passport?”**, but he calmed down when I politely told him that I knew about the Chilkoot Pass hikers, and that I had not even used my Canadian passport when leaving Canada at Beaver Creek. **So I am not included in the traffic volume statistics on Highway 9 for 1988, as seen in Table 66 above.**

In 1985, aware that the working relationship with my supervisor (and to my knowledge, with nobody else) was not the greatest, I was still hopeful that I ought to **“stick it out”** in Yukon for a while longer. Things in Alberta (and in Calgary particularly) were not improving; we were regularly reminded of this due to the precarious situation with our rented house. We had to replace the dishwasher more than once, and at one occasion, the renter had kept a parrot that had bitten through an electrical cord in the living room. My lack of an increase did not bother us financially, as I worked quite some overtime hours. Even before Wally had been promoted, I entered Competition No. 85-7001-1, which had been Mr. Blackman’s position. Before doing that, **◀ I had written for an Academic Record from the Potchefstroom University for Christian Higher Education, where I had completed my HBA and MBA degrees (for 2 years and 1 year part-time studies).** I had also completed three graduate courses at the University of Calgary, and **20+ years of a very varied experience.** To my application of 16 May 1985, the bilingual (!) abstract was added on 10 June 1985.

I was granted an interview, but **Mr. Doug Campbell, P.Eng.** was appointed in September in Wally’s position and Wally went to Mr. Blackman’s office. From the start, it seemed that Doug knew very little about highway design or construction itself. Walt and I had to give him answers to questions that were very basic. (We were almost next to him; John and Robin were not on our floor of the Lynn Building. Shelly once found him crawling under his desk, looking for

one of his contact lenses. But he had a very pleasant personality; he was (much) older than any of us and obviously had to become acquainted with a new job, we thought, so I (and others?) decided to give him a chance without saying too much; I was too busy anyway.⁹⁹ It was not long before he moved to newly rented offices on the fourth floor, (as part of the reorganization of CATS?), heading up a separate group (was it called “Transportation Planning”?) of employees like Jim Symington (who soon left) and Richard Lloyd, and then one day asked me

⁹⁹ His wife was a member of the Whitehorse Toastmistress Club. I have no idea how long he worked for YTG after I left.



about an application (as a Transportation Analyst?) by my former colleague John Hall, as described in “Part 3”. By that time, John Murray had left Yukon by getting a job with a consulting firm (RCPL?) in Kelowna, BC, and Robin Walsh had occupied Wally’s office; did I apply again? John Cormie had moved into Mr. Blackman’s second floor office. In May 1986 already, I applied for a position as “Development Engineer” with the Township of Langley, BC. We discussed the situation with my brother-in-law Chris van Tonder, when we visited England that August, and Martha and he were attending a planning conference.

As can be seen on the document on **page 42**, I decided early on that I was **required** to “**sign, seal and date**” drawings and reports, just as I had done in Alberta. After registering with the Association of Professional Engineers for Yukon (I cancelled my APEGGA registration, where I had been exempt in 1983 due to unemployment), I started to do this for all drawings prepared by me and those working under my direct supervision. In 1984 already, this was frowned upon by Wally, who told me firmly that “**this has never been done by any YTG employee**”.

After reading the Yukon Engineering Profession Act carefully, I decided to lodge a written enquiry about this to APEY, a small organization, with less than **100 members**, the majority of them being public servants, (territorial, federal and local). The APEY verdict was that this was indeed proper; **YTG was not exempt**. At that time, Robin Walsh (tacitly supporting my view) was only responsible for the South Klondike Highway portion within British Columbia; he had been required to register with APEGBC; he had formerly also been registered with APEGGA. Likewise, PWC employees responsible for redesigning the portion of the Haines Road in BC were registered with APEGBC. This decision by APEY caused (or widened) the rift between Wally and me. Why?

My view has been that being trained as an **electrical engineer** (but without any actual experience in **electrical engineering**) and having some experience in **civil engineering** (but without any real training as a **civil engineer**) ought not enable anybody to qualify for registration as a Professional Engineer in any of Canada’s professional associations that categorize all the sub-disciplines like mechanical, civil, chemical, electrical, metallurgical, agricultural, geotechnical, mining (and some others). But having **no such “set categories”**, APEY had already somehow registered Wally as a P.Eng. when he had applied, and it is likely that he felt a bit uncomfortable to “sign, seal and date”.¹⁰⁰ I also **suspect** that this issue might have been **a (not the)** reason why Wally (while already **Assistant Deputy Minister of CATS**) was summarily fired (in the fall of 1987?) by Deputy Minister Mr. André P. Gagnon, and then started an electrical consulting engineering firm from home. But after I had left YTG, Wally was hired again into CATS, where he remained until his retirement, as Director, Transportation Planning (not Transportation Engineering.) for Yukon Highways.

I also laid a **confidential complaint** to APEY about one of my subordinates, when seeing a **business card** that he had printed with the wording **Brad Taylor, Engineer**. What happened in the summer of 1987 needs to see the light, when Brad was responsible for the site supervision of the long resurfacing contract directly south of Carmacks. That spring,

<p>PART 6</p> <p>GENERAL</p> <p>Use of stamp or seal</p> <p>59(1) A professional engineer, holder of a limited licence, or permit holder shall sign and stamp or seal documents or records in accordance with the regulations.</p> <p>(2) No person other than a professional engineer, holder of a limited licence, or permit holder shall use a stamp or seal issued by the registrar under this Act.</p>
<p>Exclusive use of the name Engineer</p> <p>3(1) No individual, corporation, partnership or other entity, except a professional engineer, or the holder of a limited licence or a permit holder entitled to engage in the practice of engineering, shall</p> <p>(a) use</p> <p>(i) the title “professional engineer”, the abbreviation “P. Eng.”, or any other abbreviation of that title, or</p> <p>(ii) the word “engineer” or any derivative thereof in combination with any other name, title, description, letter, symbol, or abbreviation that represents expressly or by implication that they are a professional engineer, the holder of a limited licence, or a permit holder;</p>
<p>(Excerpts from the Current Yukon Professional Engineering Act.)</p>

¹⁰⁰ I also have no idea if and when any of my colleagues at YTG started to “stick to their guns” and also signed, sealed and stamped, based on the clear decision by APEY.

a major Tote Trail funding application had already been approved for access to a new gold mine on the **Ketza River**, south of the Campbell Highway and east of Ross River. I had not been involved with that specific application, (had I delegated it to Walt Gutowski, who also handled the survey work on the Campbell Highway), but I knew that the road construction work was being done by John Rudolph’s firm **Golden Hill Ventures**, for a mining company. But I had seen the plans and profiles along the north side of the Ketza River; this had never been done for a tote road. It was a much larger construction project than any other tote road at the time. I do not know how or when I first saw this “**business card**” of Brad; our technologists had no such cards and I also cannot remember ever having one. (Since that time, things have changed a lot, because now, every civil servant seems to have one.) So I sent a copy of Brad’s card to **Ms. Glynnis Horel, P.Eng.** from PWC, who was on the APEY Board, asking if this was all kosher and above board. The decision was made fairly soon: Brad was not allowed to “pose” as an engineer. A few days later, Brad’s time sheet (which I had to sign) showed an inordinately high number of hours, compared to those of my other subordinates and previous years. I smelled a rat, Robin agreed, and we tried to match this with questions that had been in the back of my mind: “**Why did Brad have that card made?**” and “**What would he use it for?**” In the end, the sad truth came out: Brad had been “**working**” for YTG **and** Golden Hill Ventures, for a total of up to **20 hours per day**, travelling up and down the Campbell Highway for many non-YTG related kilometres on his YTG rental pick-up truck, and then ... making an error on his YTG timesheet! Robin decided to make further investigations, and a week later, Brad was no longer a YTG employee, though **I had nothing to do with that**. On the one hand, it was depressing to see him go, but I soon realized (hearing it mostly from others but once from himself) that **Brad blamed me** for the outcome of this situation. He continued to work for Golden Hills Ventures and later became involved with a land development project directly opposite Mary Lake Subdivision. I believe **Jim Thom** was hired in his place.

(b) represent or hold out, expressly or by implication, that they are

(i) entitled to engage in the practice of engineering, or

(ii) a professional engineer, holder of a limited licence or permit holder; or

(c) affix the stamp or seal of a professional engineer, holder of a limited licence, or permit holder, or permit that stamp or seal to be affixed, to a plan, drawing, detail drawing, specification, or other document or a reproduction of any of them unless

(i) that plan, drawing, detail drawing, specification, other document or reproduction was prepared by or under the supervision and control of, and

(ii) the stamp or seal is affixed with the knowledge and consent or in accordance with the direction of

the professional engineer or holder of a limited licence, or the permit holder that the stamp or seal was issued to.

(2) Subsection (1) applies to employees of the Government of the Yukon in their capacity as such. S.Y. 2002, c.75, s.3

▲ Current Subsection (2).

The website http://www.ketza.ca/projects/miningprojects/91-03-10/Ketza_River_Mine.aspx tells me that: “**The Ketza River gold mine, southwest of Ross River, operated at about 350 t/d from 1988 to 1991. Oxidized gold-bearing veins and mantos were mined until the oxide ore reserves were depleted.**” and another website <https://www.canada.ca/en/crown-indigenous-relations-northern-affairs/news/2019/08/the-northern-abandoned-mine-reclamation-program.html> gives the actual history of the **Ketza River Mine**, with **my annotations in red**: The Ketza River Mine is an **abandoned** gold and silver mine. It is located in south-central Yukon, 50 km south-east of the community of Ross River, in the traditional territory of the Ross River Dena Council, Liard First Nation, and Teslin Tlingit Council. The Devolution Transfer Agreement identifies the Ross River Dena Council, Liard First Nation, Kaska Dena Council, and Teslin Tlingit Council as the affected First Nation for the Ketza River Mine. Environmental care and maintenance activities are being conducted by the Yukon Government with **funding from the Government of Canada while remediation planning is underway**. The project remediation plan is expected to be completed in 2022, with the schedule of payments with Yukon Government to be negotiated by 2023. This will define the schedule for **remediation**, and will allow them to move forward with obtaining the required regulatory authorizations for the project and completing the

remediation activities. Once **remediation** is complete, the project will move into adaptive management, in order to monitor the performance of the **remediation work**, before proceeding to long-term monitoring.

This solicits the following questions: **(1)** Was it all worth it? **(2) What length** of this road off Highway 4 will remain? **(3) What** will remain of this Ketz River Road? **(4)** Isn't this almost like Mount Skookum Gold at the end of the (then existing) Annie Lake Road? The above website mentions **four** such Yukon mines.

That summer of 1987, I made a canoe trip with Joss, from **Johnson's Crossing to Little Salmon**. Organized by the United Church Youth Group, it was actually "interdenominational" as the Lutheran pastor also drifted downstream with us in one of eight canoes, for 5 days along the Teslin River and then the Yukon River. We slept in tents and I had a heavy mobile telephone with me: Ray Magnuson wanted to know if it worked at the winter crossing to Livingstone, one of the sites where we would overnight. The signal was weak and not useable. At **Hootalinqua**, where several old sternwheelers had years ago been berthed by WP&YR, we rowed over to the bone yard and walked around the rotten vessels, some of which still had nameplates and other distinguishing features. Arriving late Friday afternoon at the **Little Salmon Campground**, Lydia, Plonia and Sara waited for us: We had planned to camp there for the weekend in our soft-top tent trailer, which Lydia had packed, readied and hooked up, but a trailer wheel had fallen off near the south end of Fox Lake, and they had left it there on the shoulder and taken the Matador to Big Salmon to pick us up and then take us back to Whitehorse. On Saturday, I returned to the trailer which was still sitting on the shoulder. (A few weeks earlier, I had done repair work on one wheel, and I had not properly tightened the nuts when putting the wheel back.) That became actually our last attempt at a camping vaca-



tion while living in Yukon; since 1984, we had only camped four times: Once at **Snag Lake Campground** and then ◀ a weekend at the **Twin Lakes Campground**. On a trip with my cousin Jacqueline, we had camped a night **south of Haines** and ▶ then went north via **Kathleen Lake** (Kluane National Park) and Haines Junction. Yukon mosquitoes were just too ma-



ny, too vicious and too large, sometimes even at home! But we visited Skagway regularly for day trips, and we went to Juneau twice; the first time in October by ourselves, staying in an old hotel in downtown, and visiting the Mendenhall Glacier viewpoint. The second time we went with our three youngest children, for a weekend around Christmas, so they could enjoy the indoor pool at the Best Western Hotel. On that return voyage with the **MV Taku**, that the captain summoned all passenger on deck to watch the **Northern Lights**. Making his announcement, he said that he had **never in his whole career** seen them that beautiful.



About our **August 1985 BC** family vacation, the following stands out: We had been offered to **housesit** the home of Gerry Scholtens (a brother of Jack Scholtens from Calgary), who went to Ontario for a 2-week family reunion. We flew down to Vancouver with 3 children; Theo took the Greyhound to first visit a friend in Calgary



and would see us later. We bought a ▲ Dodge Omni on Kingsway; we then saw all the sights around the Lower Mainland and took the Horseshoe Bay ferry to Sechelt for a day trip to visit Norm Rudolph and his wife (Norm was a retired ▲ WP&YR employee) and we also drove to Westbank to visit the Blackmans, via Princeton and Keremeos. We also took a

ferry to Victoria on Vancouver Island, to Butchart Gardens and much more, and in the Lower Mainland, visited the Fort Langley National Historical Park. In downtown Vancouver, we saw the South African movie¹⁰¹ **“The Gods must be crazy”** in a cinema adjacent to a huge mural painting. The theatre was almost empty; South African humour was seemingly not known or appreciated at that time. In Delta, we drove below the huge Alex Fraser Bridge that was under construction at the time. As arranged, we found Theo on Granville Island, and the next day, he flew back to Whitehorse with the family Lydia, with the unused half of my return ticket (with CP Air or PWA?)¹⁰² I drove the Omni home via Prince George, Smithers and Watson Lake. It had been quite a “touristy” trip; nobody realized that we would soon be living in the Lower Mainland.



Butchart Gardens, Victoria.



Wind River Trail sign.



Fort Langley Historical Park, Langley.



Downtown Vancouver cinema mural.

To use the other culverts in the Highway Maintenance Yard, I searched the Yukon Secondary Roads system for other candidate projects; one was on **Duncan Creek Road** that runs between the Silver Trail north of Mayo and Keno City, and then “anti-clock-



Alex Fraser Bridge, Delta.

wise” back to Elsa, around Galena Hill. A few kilometres west of Keno City, a deep ravine runs into Duncan Creek, and the road crossed that ravine with some tight curves. The only mapping we had were those at 1:50,000 scale; these showed mineral claims and contours, probable transcribed from the 1:250,000 scale topographical series. Straightening the road with a realignment on a short high embankment would be possible, and in this large fill a culvert. I seem to remember that the site was surveyed (Walt handled it) but I do not know if this project was ever built. The demise of mining at Elsa – just after completion of the Silver Trail between Stewart Crossing and Mayo – resulted in a population drop from 722 to 9 within a month of that “mining town”. In evaluating this culvert site – suggested to me by Wes Buyck – I once had to drive one October around Galena Mountain, passing the **▲ Wind River Trail** sign. (During my helicopter trip to Rusty Mountain, I had heard about that trail.) Near the very north point of the road, I noticed a tiny mining shaft structure in the ditch on the south side of the road. I stopped 19-365 and went to see what was going on, because I saw nobody, until I noticed somebody climbing out of the hole and hoisting a wheelbarrow out, by hand. Once the wheelbarrow was at the surface, the “miner” sorted out its content, taking the good ore out and then taking the wheelbarrow in hand and dumping the remaining rock over the north bank of the road, (That whole road is one a steep side slope.) After this, the “miner” told me that he did this for a living and that a horizontal tunnel existed from the bottom of the 3m shaft, running about 100 metres straight into the mountain of pure silver ore. The Mining Recorder in Whitehorse later told me that they knew

¹⁰¹ During its second showings in Canada, “The Gods must be crazy” drew huge crowds and was a blockbuster. We saw it the second time in Calgary while visiting Plonia, when she was a music therapist intern for a year, and then returned to BC.

¹⁰² It was the decade of “mergers and acquisitions” of Canadian airlines: Wardair was gobbled up, PWA merged into CPA (which then became known as CAI for a short while) which was eventually also bought up, not by Onex but by Air Canada.

nothing about this “unauthorized operation”, and I sometimes wonder: **How long did it continue? Who was that guy? Did he make enough money to survive? Was he an employes at Elsa, doing this “on the side”?**



photo ▲ shows us eating in a restaurant near Zandvoort in Nederland, the other photo shows us ▲ inside a church at Pevensey.

Our family vacation in 1986 took us to the Netherlands and Great Britain. In the first country, it was “cultural” with a lot of driving in a rental car, as well “visiting” relatives we had last seen in December 1977. In Great Britain, we toured through the south from ► Pevensey (East Surrey) to Monmouth and Gloucester, staying over in B&B’s all over, whether on a farm or in a small village, visiting various cathedrals as we went. This



◀ Our favourite Sunday picnic spot near Skagway was at a city park along the shore, west of the “downtown strip”, off the road to Dyea. We found it in 1984 already, and went there often. This photo is from the summer of 1985, with **Theo**.

One Sunday, we drove down from White Pass and saw a Yukon propane truck that had overturned on its downhill journey towards Skagway, and was lying on its right side in a small ravine on the uphill side the road. The driver must have been aware of that only spot to overturn “safely”, and had just climbed out of the cab. (On the opposite side of the road, it was a continuous cliff.) The truck was probably empty and not in danger of exploding, so we just continued our trip to church. Unbeknownst to us, John Murray had already seen this and had gone to Skagway to alert the Fire Department. On our return from Skagway that afternoon, an ancient Ford LaFrance fire truck was still on site, almost overheated.



◀ **Plonia** and Marna Smith (the oldest daughter of Porter Creek Junior High School’s principal) playing a flute duet (with the FH Collins band sitting behind them) on one Canada Day beside the SS Klondike in downtown Whitehorse. Both of them were in that school band (lead by Mr. Campbell at both schools) and they took flute lessons from Mrs. Bonnie Jones on Evergreen Crescent. The band also went to Vancouver and played at the Yukon Pavillion at EXPO 86.

Sara participated in a Porter Creek Junior High School canoe trip that started just below the YTG Building, and ended up at the confluence of the Takhini River and the Yukon River, and not at Lake Laberge as had been planned originally, due to wind. This was in September. We both saw her off; opposite the river (which was ◀ low), Whitehorse Hospital on Wickstrom Road can be seen. She sang in a choir in Porter Creek Junior High School.



In the Porter Creek Junior High School band, **Joss** played saxophone. He claim that ◀ this flounder was not the first fish he ever caught, but the first saltwater fish, off a dock west of Haines Alaska, (1984), without some kind of fishing license!



(Joss still catches fish with his father-in-law and Gregory!)

I became a member of the Yukon Stamp Club and once formally suggested that Canada should have a postage stamp for the 50th anniversary of the first completion of the Alaska Highway, at Soldiers’ Summit (1992). Canada Post said “No.” Sad.

The Sunday afternoon in August 1988 that the **MV Anna Maria** arrived and had to be hauled onto a trailer, we happened to be at the Skagway dock, so this story must be told, including my **minute professional involvement**. This was a brand new fibreglass boat, built on the west coast of the US, to be used for seasonal voyages between Whitehorse and Dawson City, down the Yukon River as a nostalgic reincarnation of the days of the sternwheelers. The initial idea to bring it up the Yukon River (from the Bering Sea) had been found impractical due to the many sandbanks in Alaska, so it was decided to bring it into Yukon via Skagway. A Whitehorse firm had been asked to build a long trailer to haul this vessel over White Pass, where the south Klondike Highway was still incomplete. Perhaps due to my involvement with the VWD study, (this would be a **heavy, long, wide and high load**), an inspector from Bob Iwanicki's Transport Services division asked me to accompany him one day to a yard south of town, where a trailer (with a very heavy gooseneck) was being welded together. But that day, I declined to comment on the **adequacy** of what I saw being manufactured before my eyes, saying that this obviously needed **an expert opinion** before YTG could issue the required "special permit" for this heavy load. A few months later, on

leaving the octagonal Skagway Presbyterian Church and arriving at the quay, we saw that the vessel had arrived. At the slipway (east of the Alaska State Ferries terminal) a bulldozer could not pull it out. This was tourist season; a group of about forty US senior citizens had already brought their lawn chairs to see the outcome of the battle between an older Caterpillar, friction and gravity. Some of them clearly had experience with equipment, and they loudly tried to impress the others about "**what really ought to be done, and why**". After the cable broke (more than once), it was decided to lighten the vessel, and a lot of furniture was hauled out and hand carried to shore. A second (= stronger) bulldozer was then summoned (the only other one in the town of ± 1000 people?) and the trailer was moved so that it was partly submerged on the slipway. Eventually, the MV Anna Maria rose from the water surface, ever so slowly, but when it was almost to be pulled onto the trailer, its suspension gave in so that it rode on the tires, and then the gooseneck was collapsing. By that time, it was already getting very late, and we had to leave that episode of "**Entertainment Tonight**". The

local newspapers kept us informed of everything that happened next. The MV Anna Maria got loaded in the end, and passed Canadian Customs, but then it got stuck in the mud on White Pass, and sat frozen in for a month or so, next to a "closed for the winter" highway. At last, arriving in Whitehorse, the vessel was put into the river and the furniture was put back on board. Only a few voyages were made to Dawson City in 1989. As summarized by the Whitehorse Star:

- **August 1, 1988:** MV Anna Maria, a replica of the original vessel built in B.C., arrives in Skagway. On August 18, 1988 concerns are raised that the vessel might be too heavy to make it from Skagway to Whitehorse. Nevertheless, the MV Anna Maria leaves Skagway on September 7, arriving in Whitehorse on November 26th after many problems.
- **May 24, 1989:** MV Anna Maria is put into water for the first time. The vessel reaches Dawson City on July 8, a year later than originally planned.

Herbie Bouwman, a local musician and piano tuner, was hired to play piano on the vessel, but the very next year (1990), this heavily federally funded tourism venture failed, and we heard about it from Herbie. He had borrowed an Afrikaans song book from us, as he wanted to play "**My Sarie Marais**" (which he knew from his youth in the Netherlands) on the Yukon River. It had obviously not been returned to us before we left Yukon in August 1989. When we wrote him a letter with our latest Lower Mainland address, he mailed our "FAK Sangbundel" with a letter (in Netherlands) dated 1993-06-03, congratulating Plonia with completing her B.Mus. degree from UVic with a Yukon Grant. He had enjoyed the songbook a lot. But the MV Anna Maria could hardly make it back to Whitehorse in 1989, as it was underpowered. Its owners had decided to use the vessel only for day trips to the north end of Lake Laberge, for which occasions Herbie had been retained in 1990. That was her (note that boats are always female) **ignominious** end as a tour boat. **How much dough had it all cost the taxpayers?** I wonder if that fibreglass lady is also resting somewhere in a boat scrapyards in Yukon, or perhaps even in Alaska?

REMARKS: The recommended repairs include:
 (i) removing all deteriorated concrete to sound concrete on the curb, deck slab, backwalls and wing walls and replacing with new concrete;
 (ii) rebuilding the deck end dams;
 (iii) replacing the expansion joints.

Note: Previous General Condition Rating: 6
 Previous Inspection Report: 1974
 Original Design: by Consultant to HS-20 Loading
 Plans Available: Yes

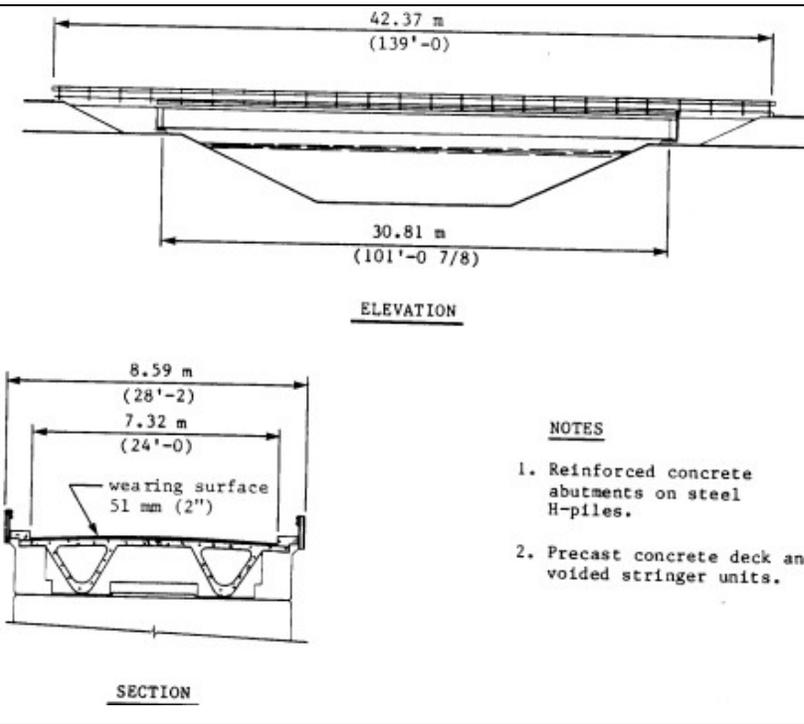
◀ My minor involvement with the repairs to Flat Creek Bridge, which was Yukon’s only **consultant designed** bridge at the time, Klondike Highway km 668.0, was interesting. This “bathtub design” concrete deck had been poured (1) in cold fall weather in 1968, (2) using pea gravel and not crushed aggregate, which (3) had been only 51mm thick.

Everything seemed to have gone awry, the necessary bond between aggregate and cement was inadequate, according to **Point 3 in PWC’s 1984 Bridge Report**. With a similar problem at Tatchun Creek Bridge and exposed piles at Pelly River Bridge, this was identified as one of three bridges that “**require early action to improve their general conditions**”. Highway Maintenance asked me for assistance, that lead to a Service Contract for repairs, using **Embecon’s SET-45** cement¹⁰³ for low temperatures, after jack hammering until a competent layer of concrete had been found, as well as a layer of steel mesh reinforcement. The “**precast concrete deck and voided stringer units**” were not (yet) affected.

The repair work was done under the supervision of **Charlie Profeit**, and it must have been before Eric Gibson joined YTG, otherwise he would have handled this as “bridge work”, which was his professional specialty.

On a bridge on the Alaska Highway west of Whitehorse¹⁰⁴, a section of green steel bridge railing on one of the approaches had been hit by a vehicle, and it was damaged beyond repair. Ray Magnuson asked me to obtain a copy of the detail design drawing of that railing panel at PWC, and to ask for quotations (by fax) for the manufacturing and galvanizing of a replacement panel, including shipping to Whitehorse. Highway Maintenance would then **install and paint it** (or **paint it and install it**, or **install it and paint all railings?**) So I faxed a few pages (cover letter, drawing, YTG’s actual requirements and payment conditions, etc.) to various firms in Alberta and British Columbia. Yukon had no galvanizing plant; painting with a zinc-

rich paint was, as elsewhere, an emergency fix.) In checking the documentation that I had received from these firms by mail, I discovered the name **Nick de Raadt** as Owner/Manager of a galvanizing outfit on Annacis Island, Delta. His firm (well, manufacturing of the structural steel was obviously done by someone else) was the low tenderer; **Silver City Galvanizing** (with the largest zinc bath in BC) was awarded the work by a Service Contract, and they completed the work satisfactorily, with installation by YTG forces, but not before I had phoned Nick with the good news and then asking “**Are you perhaps related to me, Nick?**” We met Nick and Rita several times while we lived in the Lower Mainland between 1989 and 2002 and even after our return from Arizona in 2008, but we never knew. In 2020, I discovered our actual blood relationship. Our grandfathers seem to have been cousins; his grandfather **Jacob Leendert** (1872-1948) was Mayor of Muiden, and my grandfather **Jacob** (1883-1959) was a radio manufacturer in Gouda. That is quite a story by itself, outside the scope of this book, though describing it would also lead me into the collateral damages of World War II (for both families).



¹⁰³ This product (by Embecon = Master Builders’ Concrete) had not been used by YTG before, but I had known about it from Calgary. The number 45 means that is appropriate for use at temperatures down to -45°, (whether Celsius or Fahrenheit).

¹⁰⁴ I cannot recall the name and do not have a copy of a PWC Bridge Report on the Alaska and Haines highway bridges.

We did many things by Service Contract, also equipment rentals. Every year, a list of available equipment was prepared, and from this, we knew which privately owned bulldozer, grader or backhoe was available, with an hourly rate that included the operator and fuel. The annual list was in a book with black cerlox ring binders, and we also used these rates in determining a project cost estimate, that was compared with the various tender prices after opening the tenders – and with those of former years, of course. Normally (but not always) the low bidder was awarded the work. We had to “space” our projects’ tender advertising dates in the spring, because tenders openings were only on Tuesday and Thursdays. We had to make recommendations for awarding a contract in a speedy manner, preferably before next closing date. This was not always possible.

How many (former) South Africans did we meet in Yukon? Only a **very few**, in fact, and this describes them and how we made contact during the days when everything South African was “anathematized” all over Canada.

We had a wood-oil combination furnace¹⁰⁵ at 5 Bamboo Crescent, and instead of getting our own wood (as described in “Part 3” for the one month in Riverdale), we decided to have a load of firewood logs delivered to the backyard. Lydia phoned in from the Yellow Pages, finding a contractor who recognized her accent. That is how we met the Swiss **Robby Grawehr** and his South African born wife **Rita Grawehr**. She had been born to a German father and a coloured (or Xhosa?) mother in Port St. Johns, Eastern Cape Province, before such liaisons had been made “illegal” and that area became the independent Republic of Transkei. Robby (a plumber by trade) had met her in Cape Town, South Africa and I do not know where they married. They had toured North America and decided to stay in Yukon; while getting his Yukon plumbing license, he started a firewood delivery business, and Rita (who was pregnant) ran an answering service from their tiny downtown house. One of her calls was actually from Robby, after he had overturned his yellow Ford truck on the Alaska Highway West of town, and he could not move at all and could just reach the radio phone, from which near death situation he was rescued. The police and ambulance had to drive by a few times before they saw the yellow truck, and brought him to the hospital where he walked in and they suddenly realized his problem and put him in a body cast as he had broken his neck. We then met on a fairly regular basis, Astrid was born and Robby started a plumbing firm,¹⁰⁶ Rita (who had librarian skills from Cape Town) worked with Lydia at the Whitehorse Public Library for a few years, and they purchased a parcel of land on the Klondike Highway North, where they farmed and had huskies. Twice more, Robby might well have been killed: **(1)** On a boat trip at

◀ Fish Lake on 16 June 1985, he fell out of his boat and was miraculously saved by Debbie and Don Fulmer. The very next day, he returned to Fish Lake to look for his dog, and found it! **(2)** in 1989, competing in the Yukon Quest (starting in Whitehorse that year) he helped a female competitor crossing the Yukon River at Carmacks, and in the process got frostbite, so that he had to abandon the race. Robby lost a toe on that occasion, never entering the race again. They once flew to Switzerland for a vacation, by driving to Fairbanks first, for the shortest direct flight.¹⁰⁷ We lost contact when we left Yukon, but often remembering the innocent question by Astrid, when four: **“May I please have some more of Susie?”**

Reported on page 2 of the Cassiar Courier, February 1986.

Debbie Fulmer receives award

A former Cassiar resident, Deborah Jean Fulmer, was awarded the M. G. Griffiths Plaque, Royal Life Saving Society Canada's highest rescue commendation. This was presented to her at the November Investiture of the BC and Yukon Branch for her part in saving the life of 30 year old Robert Grawehr last summer.

“I used to be a lifeguard, and all the training I took finally paid off at the end,” said Debbie. “I’ve pulled people from the water before, but never in such a bad state as Rob Grawehr.”

When Debbie and her husband, Don, went fishing in Whitehorse at Fish Lake last June 16, they didn't expect to end their outing by saving a man from drowning. The victim, Robert Grawehr, and a friend of the Fulmers, toppled out of his 16-foot motorized canoe while fishing.

Don Fulmer noticed the empty canoe circling in the one to two foot waves and raised the alarm. They found the victim face down in the extremely cold, 70-foot deep water. His three or four minutes in the icy water had left him unconscious and non-breathing.

“We didn't even hesitate, but flew across the lake to where he was,” Debbie recalled. “Rob had on insulated, vinyl coveralls, and there was an air bubble in them which was holding him up. We got him into our boat and he looked dead. Everytime we moved him, you could hear the water move in his lungs.”

Debbie, a 26-year old employee of the Territorial Government Services Department, administered rescue breathing throughout the one mile ride back to the dock. Rob had regained consciousness, but was having severe convulsions and was suffering from shock.

On shore, with the help of other onlookers, they loaded him from the boat into the Fulmer's suburban. Don called other boaters to get an ambulance, but to do so, they had to go two miles to a telephone at the Sky High Wilderness Ranch. About half way down the 15 mile Fish Lake road the ambulance met the suburban.

Debbie accompanied the still-convulsing victim during the ride to the Whitehorse General Hospital. Oxygen had been given to Mr. Grawehr in the ambulance and he was kept in the hospital overnight.

Debbie earned four RLSSC awards in Prince George in the early 1970s. She holds the Bronze Medallion, the Bronze Cross, Senior Resuscitation and Award of Merit.

Deborah Jean Fulmer is highly commended for her dedicated efforts to revive and further assist Robert Grawehr in these perilous circumstances. There is no doubt Debbie was responsible for Rob's regaining consciousness and ability to respond to hospital treatment.

(Both parents had been very afraid that Astrid would be adverse of eating meat from a pet sow that Robbie had slaughtered.)

¹⁰⁵ This system is cumbersome and not a good idea at all. When running on wood, the ash eventually goes into everything, particularly the stippled ceilings. When running on oil, it is much better, but likely more expensive.

¹⁰⁶ One of his first projects was for Yukon Housing, in Mayo. RBG Plumbing Ltd. existed for many years.

¹⁰⁷ Look at a globe and fathom the logic – US flights from SeaTac to Europe had a single stopover at Fairbanks at the time.

Martin and Jacque Lambrechts came to Yukon from South Africa (via Victoria, BC) with twin teenage daughters. Jacque was Martin's second wife.¹⁰⁸ While Jacque worked in a shoe store and the daughters went to school, Martin became the desk manager of the Whitehorse YMCA where during the summer months, many visitors stayed, like a "budget motel". That summer, Martin's father came to visit them from South Africa. But it was not long before they moved back south to North Vancouver, and then returned to Victoria. Arriving at UVic in September 1989, Plonia met the twins again, and Lydia and I visited them when they lived in an apartment on McKenzie Avenue – while I was designing the interchange close by, about one kilometre to the west.

One day, when Martin was at the YMCA reception desk, the Anglican bishop brought in a **black South African youngster**, who had (supposedly) been a stowaway on a ship from Cape Town to Vancouver, where he had evaded Canadian Customs and become a stowaway on a truck that ended up in Whitehorse. The bishop wanted to ensure that this young man would be treated well, and had already provided additional clothing and all kind of necessities. During the registration process, this person's face became as white as a sheet when Martin, who recognized the surname as Xhosa, addressed him kindly in that language. (Not many Afrikaans speaking white South Africans know one of the ten "black" regional languages; perhaps Martin had grown up in the Eastern Cape Province.) The bishop's next visit was to the Whitehorse Public Library where Lydia (or one of her colleagues) was asked to write up a membership card, so that this young man could borrow some worthwhile books from this worthwhile library. The newspapers recorded the arrival of this new "immigrant" or "refugee" who reportedly said that he had never seen such a big harbour and city as Vancouver. (At which statement we had laughed with Martin, as Cape Town is larger on both accounts.) I cannot remember how long this young black man stayed at the YMCA; I think he disappeared completely after a few days, which became quite an embarrassment to the bishop and his flock.



I handled two steel bridge painting projects on the Alaska Highway:
(1) The White River Bridge ► (near Beaver Creek, which had already been replaced in 2009 – the previous bridge was further south)
◀ (2) The Yukon River Bridge (east of Whitehorse, still standing in 2009). The lowest tender for the



White River Bridge project came from a North Vancouver firm that normally painted ships. As there was a lull in the shipbuilding industry. **"We need some work"**, the principals told us, **"and if our paint is good enough for salt water, it should also be good enough for the pure water from the glaciers in the St. Elias Mountains"**. They were awarded the project, and did a marvelous job. A year later, for the Yukon River Bridge project, there were some concerns about spilling materials considered detrimental to fish (and fish habitat) into the water during sandblasting operations and spraying, and shielding had to be placed around the operation – which had to be added to the specifications, and added to the costs. This gives an idea of how in those days, dealing with environmental concerns crept into all kinds of procedures for construction and maintenance of infrastructure. It is not that these things had been entirely ignored before, but they became more prominent during the 1980's.

The question of **"paint colour"** also surfaced with these projects. The White River Bridge was the very first bridge painting project in Yukon, the paint colour had not been specified, and I cannot recall if PWC was consulted or anybody else. So the Contractor chose a **light blue**, and I do not know why. The Yukon River Bridge had a matt silvery grey paint, and perhaps the 2009 colour (**also a light blue**) was still the coat applied in 1987. At that time, I was well aware that BC, Alberta and Saskatchewan each had their own provincial bridge code, and that green was very common in the United States. The Alberta Specification of 2014 states **Grey**, but then the interesting question arises: **How many of these steel bridges still exist?**

At **Christmas Creek**, on the **Alaska Highway** (somewhere east of the Snares River Bridge) was a 3m dia. Corrugated Steel Pipe culvert of which the bottom plates had been completely rusted out. This creek was noto-

¹⁰⁸ It always amazes Lydia and me how many South Africa immigrants had their marriages dissolved in their new country.

rious for its very high load of gravel; during spring runoff, cobbles had run through the culvert for many years. (I believe that it was at this creek that an unexpected summer avalanche occurred, trapping tourists from both side for a few days, and helicopters were used for medical emergencies.) There was no steel left at all, and the only reason why the structure remained in place was the equal external soil pressures. Ray Magnuson asked my advice, and I suggested that the pile of old steel culverts be checked for individual plates without square holes (they had been used to cover conveyor belts at either Clinton Creek or Whitehorse Copper) and to replace the bottom plates by welding these pieces in as a “double layer”. This would last for some years, realizing that with the already anticipated Shawkwak funding, the culvert would logically be replaced with a bridge.

(Strange, but in 2009, GoogleMaps saw no culvert in this area, and does not know about a “**Christmas Creek**”).

Our children had ample work while at Junior and Secondary High Schools. Plonia, Joss and Sara delivered newspapers, (one paper was free and for the other one, they had to “collect”.) One summer, Plonia typed at **Sports Yukon** in the WP&YR Building, and another summer, she acted for somebody on vacation at **Northern Industrial Sales**. Through the year, she also did the invoicing at **Points North Transportation**, and in the summers of 1988 and 1989, she was Night Manager at the **Sheffield Hotel**¹⁰⁹, while Joss was a “bag boy”.¹¹⁰ By that time, Sara had taken over Plonia’s position at Points North, but she also worked at **The Bay’s Restaurant**, where Theo had worked by pricing all kinds of merchandise in the back room, even coat hangers (discovering that their mark-up was 50%!)¹¹¹ Joss had an early Saturday morning job at the brand new **Alpine Bakery**; one day, **Mr. Suat Tuskak** saw that Lydia dropped him off by car at 6 a.m., and the next Saturday, he was asked to arrive an hour later. (Did he feel sorry for Lydia?) Joss’ co-worker was Lucy, a very happy young lady with Down’s Syndrome: she was a dishwasher and Joss kneaded the dough. We were seldom together for meals as a family.

On 7 July 1987, I requested proposals for the **Takhini Area Transportation Study (TATS)**. Jim Symington sat with me on the Steering Committee. After the work had been awarded to Crippen, he gave me a copy of the **City of Whitehorse Official Community Plan Bylaw of March, 1987**, with hand-written critical notes in the margins and a memo ▼ with terms like “Surprised at the overall lack of general direction”, “a reflection of Council’s (i) re-

ognition of their overall lack of fiscal power, and (ii) view of the Territorial Government’s role in the City of Whitehorse affairs (i.e. Transportation, Weigh Scale, Cousins Airstrip, Arterials, Alaska Hwy.)” By then, I had to handle the study as an “offshoot” of the OCP. I cannot recall how many other proposals were received and considered, but **Andris Zeidaks, P.Eng.**¹¹² and **Eanson Ho P. Eng.** were the men who flew up for the project meetings on a scheduled basis. **Paul Lee, P.Eng.** was also with Hamilton & Associates; after 1992, he later joined TransLink in Metrotown.

JACOB

87.09.28

I'VE REVIEWED THE ATTACHED "OFFICIAL COMMUNITY PLAN" AND MUST ADMIT I'M SURPRISED AT THE OVERALL LACK OF GENERAL DIRECTION GIVEN BY THE DOCUMENT. THIS MOST CERTAINLY IS A REFLECTION OF COUNCIL'S (i) RECOGNITION OF THEIR OVERALL LACK OF FISCAL POWER, AND (ii) ~~RECOGNITION OF THEIR OVERALL LACK OF FISCAL POWER, AND~~ VIEW OF THE TERRITORIAL GOVERNMENT'S ROLE IN THE CITY OF WHITEHORSE AFFAIRS. (i.e. TRANSPORTATION: WEIGH SCALE, COUSINS AIRSTRIP, ARTERIALS, ALASKA HWY.)

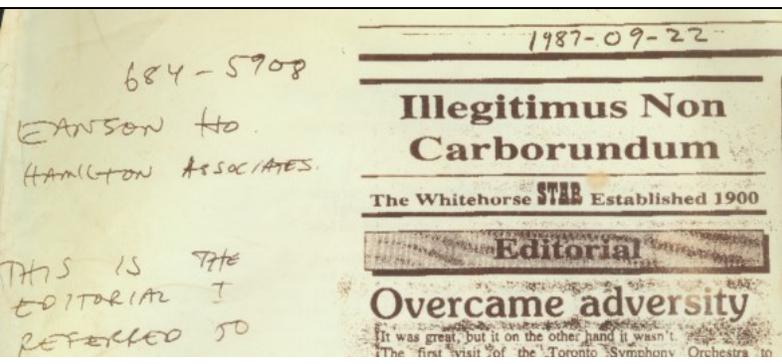
JIM

Jim Symington’s comments.

¹⁰⁹ Plonias’s resumé obviously drew a lot of attention at The King’s College and UVic about the level of her responsibility.
¹¹⁰ Joss made a bundle in tips in July 1988, when tourists were stranded on both sides of an Alaska Highway mudslide.
¹¹¹ Two of our children (Theo and Sara) have therefore worked for Canada’s **oldest employer**. HBC was founded in 1670. Together with a friend from school, Theo also washed commercial trucks for a while.
¹¹² I never heard of him again when at Crippen Consultants in Vancouver. **Mike Skorka, P.Eng.** became my supervisor from August 1990 until his illness and unexpected death in 1991 already. He had been in the 1956 Hungarian class of forestry engineering students, who escaped across the Iron Curtain into Austria (with a professor) and were all allowed to enroll at UBC to continue their studies. I visited him once in Richmond Hospital; many of Mike’s former classmates attended his funeral. During his illness, Alan Drab, P.Eng. became my supervisor. At that time, we liaised with Hamilton & Associates.

In **May 1981** already, the Yukon Government had decided to build a new campus for **Yukon College**, on a hillside property in Takhini, with access off Range Road, adjacent to Correctional Centre or jail. This political decision (by the **former political regime!**) was perhaps purposely addressed inadequately (?) in the OCP, as needing to be clarified by a “study”. Maybe the City considered that an additional access was needed, maybe they were leery about it altogether. But there was another issue: a proposed **Arts Centre**, which many residents wanted to be built some-where else, namely **downtown**. There was a group of people (lead by Mrs. Flo Whyard, former Editor of the Whitehorse Star), adamant that it ought to be built closer to where the people lived who supported the arts, like music teachers and choir directors and those who organized annual music competitions and the Whitehorse Concerts series of visiting artists. Up to that time, all performances of note had F.H. Collins Secondary School as their venue, and music examinations were held in Riverdale Baptist Church.

In **September 1987**, when the TATS was already ongoing, members of the Toronto Symphony Orchestra (TSO) came to town for a single performance in that school’s gym in Riverdale. After the event, traffic across the Robert Campbell Bridge had **completely gridlocked**; the Whitehorse Star featured an **Editorial**, asking what would have happened if that event had been held on the proposed site of the Arts Centre / Yukon College, off Range Road. Why? A brand new road (prematurely called **College Drive**) had already been built (according to a design by the Municipal Engineering Branch, **before** CATS had come into being) with a **very steep grade** and a **very sharp corner (“bad curve”)**, going around the Yukon Jail. The Editor (and I would guess the **former Editor** might well have had a hand in this particular masterpiece) had several harsh words, very much in line with the paper’s well established Latin slogan.¹¹³



Overcame adversity

It was great, but on the other hand it wasn't.

The first visit of the Toronto Symphony Orchestra to Whitehorse was a glorious event. The orchestra met more than the expectations of people who lined up, some for over two hours, to get tickets before they sold out.

It's amazing the quality that a world-class orchestra can turn out despite considerable adversity. In fact, many of the sold-out crowd of over 600 probably forgot the

the adversities by the time Beethoven's Symphony No. 7

began to wash over the F.H. Collins High School gym, where the huge orchestra took up one third of the floor space.

But there were problems. The seating was uncomfortable, the acoustics inadequate at best, and the room temperature soared up to uncomfortable heights. In fact, the warmth of the room coupled with the chilliness of the adjoining waiting rooms, forced a break in mid-Mozart as the harp reacted unfavourably to the move from a cold to hot room and had to be warmed.

They all served as reminders of the lack of decent theatrical and musical facilities in Whitehorse and why there is the current effort, much masked by bickering over location, to build a new arts centre.

Okay, so none of us really needed to be persuaded why an arts centre was needed.

But there is one other thing that cropped up last night – the traffic – an item that is just now getting consideration for the new Yukon College, the government-ordered site for the new arts centre.

Could you imagine if those hundreds of cars were funneled onto falling-apart Range Road and up the narrow road to the college? The chaos would ensure the concerts ran hours late! Lewes Boulevard, a paved and divided road, was stretched to capacity – how can some of the worst roads handle a similar event?

So this is another reason why it's a shame that government forced abandonment of the downtown site for the

¹¹³ I may have mentioned my concerns to Mrs. FW at that time, as we often saw each other due to several YTMS issues. The slogan had been in use since 1963 or earlier; and it is translated as **“Don't let the bastard grind you down.”**

arts centre.

Yes, there is a move afoot to provide better road access to the college. But colleges have people coming and going on a more or less constant basis, so while they may serve many people, they don't face huge surge traffic jams. The arts college will and that's why it needs far better road access than the college itself needs.

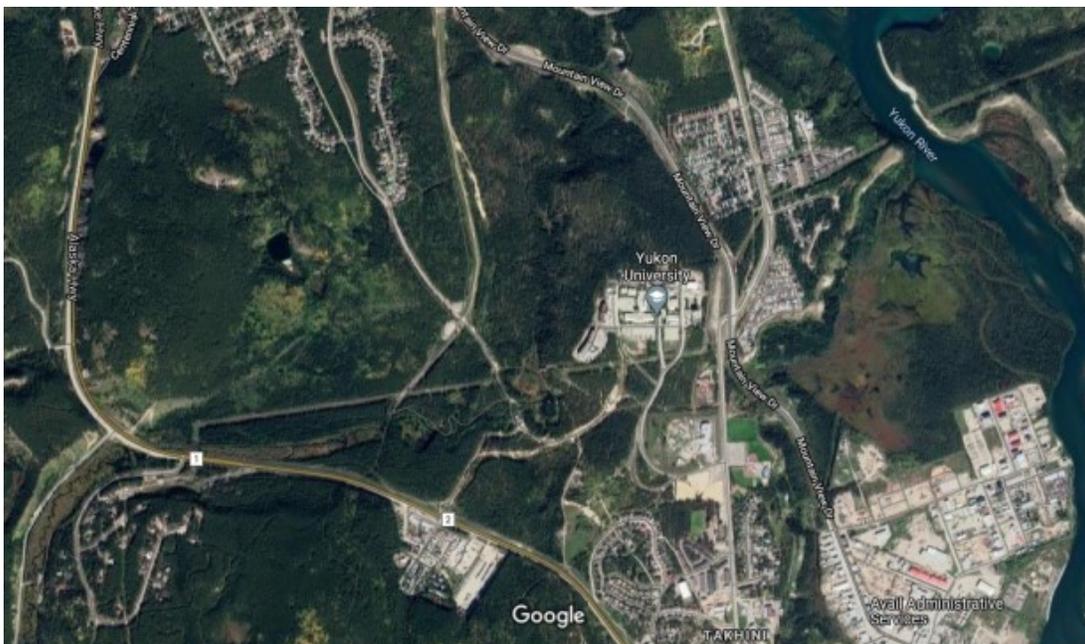
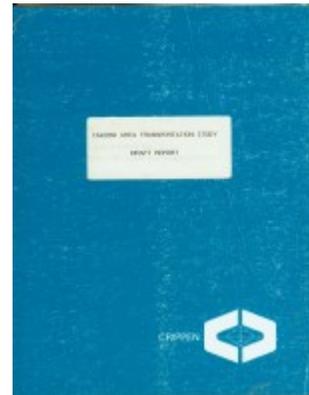
That costs money. And it's a significant hidden cost of moving the arts centre to the college – something government has so far managed to leave out of the picture.

I sent the above ▲ clipping of the Editorial to Eanson Ho at Hamilton Associates, c/o Crippen Consultants' fax number, (and made a thermal fax paper copy for myself). We had just had a Project Meeting shortly before this date. This is where things started to become very awkward. Did Crippen/Hamilton have a copy of the City's OCP, or not? It appeared that the Consultant was somehow not getting the anticipated "direction" from the Steering Committee, as it became a tug-of-war between "What YTG wanted" and "What the City wanted". Had the terms of reference been vague, or even too vague? What was I to do, chairing the meetings, with my own views?

This Yukon College access issue became controversial when my (personal) **suggestion** of a **second** (meaning a **real**) road to Yukon College be considered – from the Alaska Highway, directly opposite the Kopper King, with a possible connection to the south end of a residential development area on Ponderosa Drive, which was in fact a long cul-de-sac (though already a Collector Road, connected to Porter Creek's Pine Street). That idea of a link brought the **Friends of McIntyre Creek** group into the fray, though they were not yet called by that name.

A thick Draft Report was completed on 16 November 1987, and one copy was mailed to me in Hamilton, Ontario (see below) with 11 copies to Jim Symington, for local distribution and ► a request for comments to be discussed at **Project Meeting #5** on 23 November 1988. The Report contained preliminary plan-profiles of the various future road links (as Appendix IV, Functional Design Drawings) and strange, they had been drawn by a person called **BL**.

The battle was on. The City (through Mr. Bill Hickman, who had not been involved at all with the OCP) came along with all kinds of requests to **amend or expand the parameters of the TATS** into things completely alien from what a Transportation Study actually does: The City even wanted to ensure the rebuilding of Range Road at the cost of YTG, **as if this were the single study issue.** It became increasingly difficult for me to remain an **impartial chair-**man of the Steering Committee. Strange situations, like (1) the "offset" between Hamilton



Boulevard and Two Mile Hill at the Alaska Highway, and (2) the "bad curve" access road to the proposed Yukon College site might both well have been John Cormie's (former) responsibilities; he had supervised **John Grainger** (and we joked that Hamilton Boulevard accessed the **Granger** Neighbourhood). But by the autumn of 1987, John Cormie had already become my supervisor's supervisor! (Could I criticize his work?) My personal view was that the TATS ought to set the framework for ideas to resolve these inadequacies, without details or deter-

mining a financial burden on any of the two parties. Crippen and Hamilton really did not know what to do. There was also no guidance from PWC, owners of the Alaska Highway. The matter then dragged on and on, and I think that what was tabled during the **Fall 1987 Session** of the Yukon Legislature was not the Final Report. Mr. Piers McDonald misquoted the facts during Question Period in the **Spring 1988 Session** (see page 32). I cannot remember the actual outcome of the Study, and can also find **no reference at all to it** in any of the City's more recent transportation studies (as if it has completely disappeared into thin air!) Had it been that bad?

Google Maps imaging (see ▲ and ►) shows that in 2009, some ideas had yet to be implemented. A berm existed at the south end of Pine Street. The **“bad curve”** on College Drive (around the jail site) had been replaced by one with a much larger radius (**and obviously with a steeper grade**). Range Road had been entirely **rebuilt and extended south** as a frontage road to the Alaska Highway, (following my suggestion!) and Two Mile Hill (already reconstructed around 1995) had at last been realigned to run **north of the Canada Post mail sorting plant**, with a four-way signalized intersection at Hamilton Boulevard. Because perhaps nobody ever knew that an inappropriate **diamond interchange** had once been suggested at that location, and a ▼ small tidbit follows! **Your eyes, dear reader, should not deceive you.**

At left ▼ is part of **Figure 3 of the City of Whitehorse OCP Bylaw No. 86-50**. Note the proposed grade separated traffic interchange on the Alaska Highway at a point where Hamilton Boulevard intersects and Two Mile Hill does not. This clearly indicates the idea to relocate Two Mile Hill to run north of the (then) Fire Hall. Note also that the on- and off-ramps for a (narrow) diamond interchange assume that Hamilton Boulevard/Two Mile Hill¹¹⁴



Detail of College Drive – built twice!

would be the **“major”** route and the Alaska Highway would be the **“minor”** route! (This would obviously defy all reason, as well as the basic principles of transportation engineering.) The latter assumption would also clearly violate the **hierarchical principle** of highway systems, and even the text of the OCP itself. One may counter this by saying that an Official Community Plan is merely a planning document and not a Design Concept Report, but an official document should (in my view) refrain from details and stick to the basics.

But I must confess that an initial concept of a diamond interchange (which Mr. Blackman once asked me to investigate, and I actually drew up some rough layouts and profiles), seems to have fallen through the cracks with the preparation of the OCP. I vividly remember **doodling** two alternative concepts for him:

- Hamilton Boulevard / Two Mile Hill **over** the Alaska Highway;
 - Hamilton Boulevard / Two Mile Hill **below** the Alaska Highway.
- Ramps would obviously be **“off”** and **“on to”** the Alaska Highway.

The excerpt at **left on the next page** comes from **Figure 4 of Bylaw 86-50**, in **glorious black-and-white** and with the bare minimum information. But it shows the strange **“jog”** on the Alaska Highway, and (from the **Legend** below) that Range Road is only a **“collector”**, while Mountain View Drive, Two Mile Hill and Hamilton Boulevard are **“arterials”**.

¹¹⁴ The latter on a relocation south of the Fire Hall, now Canada Post Mail Sorting Plant.

The Transportation Network

Figure 4

Legend

-  Alaska Highway
-  Arterial
-  Collector
-  WP & YR Rail Line
-  Public Transit Routes
-  Aircraft

(Crippen had to sort out the “errors” in the City’s OCP, by the TATS.)

See also ▼ two excerpts from the OCP Bylaw about the functionality of the Alaska Highway and Two Mile Hill, as **annotated** by Jim Symington.

Who Even Wrote This Has No Concept Of The Definition? 4.6.1 The primary function of the Alaska Highway as the major thoroughfare linking Alaska and Yukon with the remainder of Canada and the U.S.A. shall be recognized and protected. However, the Alaska Highway shall also serve the City of Whitehorse as a major community arterial and this secondary function shall be permitted along with the Highway’s primary function.

Note also that a set of traffic signals now functions with **horizontal heads**, just like in Calgary and Drumheller.



THIS DOES NOT BELONG IN THIS DOCUMENT!! 4.6.4 The reconstruction of Two Mile Hill and its intersection with the Alaska Highway shall be planned and carried out by the authority having jurisdiction. Improvements to Two Mile Hill, particularly those to the horizontal alignment at the base of the escarpment, should be designed for safe vehicular movement.

While driving **up and down** the Klondike Highway fairly often, two endings of its “former alignment” had been noticed. Office investigations, a talk with Mr. Wes Buyck and DIAND mapping all indicated that these stubs lead to the original Highway 2, until a realignment had been built and this **11% Hill** (uphill for southbound traffic) had fallen into complete disuse and disrepair. One could still carefully navigate among the newer trees that had sprouted in its embankment. (The old route is shown at the **bottom** of the GoogleMaps imaging ▼ on the **next page**.) As any natural revegetation is very slowly in Yukon, I had (and have) no idea when this road was replaced

by the alternative road, that is shown at the **top ▼**, but it may have been after 1956, when dredging equipment was removed for scrap from the Rock Creek area, or after 1978, when the Clinton Creek asbestos mine had closed. During the former hauling operations, a huge bucket had fallen off a truck near the Crooked Creek Bridge, and was visible in the water on the left side, going north. When the road was realigned near Crooked Creek, I asked the Melberg-Verrico to get that bucket out of the water, so that it could be used as an artifact at the Transportation Museum, to show what type of heavy loads had once been transported in Yukon.¹¹⁵ At the next opportunity, it was carefully loaded on my (rental) pick-up truck, and I took it south to the Museum's storage facility near the tank farm. But at the end of the season, when the rental trucks were returned, I was blamed for damaging that particular vehicle, and also for supposedly "taking it home"! These rental trucks needed to remain "spotless" after four or five months, which was quite impossible; at the end of every construction season, we went through some "**who-dunit**" play, and by that time, some of the casual drivers (!) had gone "outside". Although Robin was very aware of my intent on behalf of the YTMS, this situation was later held against me. But though this 11% hill "replacement" was not as steep, it had (1) more curves, (2) inadequate superelevation, and (3) poor materials, so that it was already heaving and nicknamed "Moss Road" (which name has stuck, even into the 21st century!)

Because 11% Hill had a (proper) surveyed and **half-registered** right-of-way (see above) and was not considered "**beyond repair**", it was agreed¹¹⁶ to investigate its "**reconstruction/upgrading**" which meant "**lessening the grade to a maximum of 8%, without changing its horizontal alignment**". Chester did this with and for me, and it resulted in what we believed to be a good design, with major excavations in good granular material near the top (**left** on GoogleMaps image). Knowing that this area was in a belt of "**discontinuous permafrost**" on a generally



north-facing slope, we knew that it was important to use a lot of good granular materials, which had (we knew!) not always been done in former decades. By that time, we also had gained some experience of the short realignment south of Crooked Creek, where permafrost, in the form of ice crystals, was clearly visible at the west edge of the grubbed area. So it was decided to do "**pre-clearing**" of a fairly wide swath of the roadbed and old road prism¹¹⁷, for the whole length of the project – and this work was done by a Contract during the summer of 1987. We were following the recommendations in that thick book on **Permafrost Technology** in the office. I was aware that in Alaska, reconstruction of the Alaska Highway had an experimental program to install solar panels on poles next to the highway and then monitor the temperature inside culvers beneath the road prism, thinking that air movement would keep the material in a frozen state. I had seen these before on the way to Anchorage, and later, in

¹¹⁵ Most likely, originally going "**north**" by rail and sternwheelers, and later going "**south**" by road.

¹¹⁶ "agreed" means that **first Wally** and **then Robin** knew about it and were supporting this work on the "Yukon Program".

¹¹⁷ The old road prism had obviously been exposed to daylight for a number of years, lessening its permafrost somewhat.



the summer of 1988, would take a photo of ◀ one such site west of Tok. But we realized the situation on 11% Hill was not “continuous” permafrost but “discontinuous” permafrost. While designing (and after completion of the clearing contract), it was also discovered that only minor drainage structures would be needed for 11% Hill, with no major culvert at all, and site survey was fairly easy, with total station technology. The “cut” at the top (south end) was quite deep, but it was all useful material, to be hauled downhill. It may also be (but I doubt it) that we received the as-built drawings from PWC.

During the winter of 1987/88, Chester completed the design for this large earthworks project for a tentative advertising date around May 1988, and was estimated with a completion date of later that year, so

that a crushed gravel base course and BST could be constructed in 1989 – Doug was already exploring sources. The improved access made that work easier; on the GoogleMaps imaging, one can see some exposed sites which were the **original borrow pits** (still visible in 2009!)

But by early 1988, John Cormie had risen the bureaucratic ladder right into Mr. Blackman’s position. I have no idea when he first heard about the proposed earthworks contract, (though he must have known about the clearing contract much earlier), whether he discussed it with Robin (or even Wally) or anybody else, or if somebody from another agency (within YTG or outside YTG, even the two geotechnical consulting firms in town) had mentioned any concerns. In any case, he did not discuss anything with Chester, Doug Andrews or me, and his decision to **“scrap the whole project”** came to us (collectively) as an unexpected meteor falling from the sky. He decided not only to make us stop all work on this, but also virtually charged me with professional incompetence and intentional wrongdoing, without using those words (but it seemed as if I heard his thoughts.) Did he make this decision without having all the information? I guess so. Moreover, John Cormie decided that instead of redesigning 11% Hill, Walt Gutowski was to see how he could somehow redesign the Klondike Highway that was in use at that time, and known as “Moss Road” as described. To add injury to insult (as the saying goes), Walt would no longer report to me any longer, and would report directly to Robin for this and other projects “north”, meaning the Silver Trail which had yet to be completed in 1988, and likely the Dempster Highway projects as well, because John Murray had left a staff vacancy to be filled!

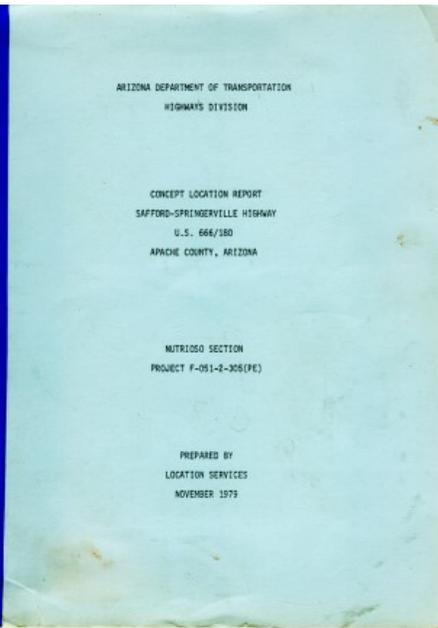


I took this **“virtual demotion”** quite seriously, and it soured the situation considerably for the remainder of 1988. I do not know how Chester – or even Doug – may have felt about it at the time; perhaps they took it more stoically and not as a personal affront (as I did). When I spoke to Chester in early 2020, he said *“We did not get a chance to express our views at all, Jacob; John and Robin had made up their minds already, John overreacted; nothing could have changed his take on the project. It was a good and feasible project; what was done to the old road was not a solution.”*¹¹⁸

Now note on the GoogleMaps imaging ▲ that only 1.5km of the Klondike Highway was relocated at that time, and that the remainder has since been modified with (1) no shoulders, (2) lots of guardrails and (3) a surface that looks awful on GoogleMaps streetscape imaging, and it would be no wonder to hear that it needs a lot of maintenance dollars for BST surfacing every few years.

¹¹⁸ I notice from the internet that Chester has been much exposed to development issues in the Dawson City area, sitting on various committees before and after his retirement from YTG.

On the **realignment of roads**, including bypasses, I do not think a lack of skills existed in Yukon. I also do not believe that there was no political will to “**do things right.**” I am sometimes reminded when looking at a report that I received in Arizona where it was considered “old hat” – the relocation of US 666/180 through Nutrioso, AZ.



◀ This November 1979 report was an update of “a 1972 location study for a proposed improvement of a portion of US 666/180 through the community of Nutrioso in eastern Arizona” (length 2.4 miles). This highway had been built in 1951 with a 22 ft. wide paved roadway and no shoulders.

Design speed = 60 mph.
1978 AADT = 900 vpd, projected to increase to 3,000 vpd by 2000.

Alt. A: Improvement through Nutrioso, (with some 40 mph.)

Alt. B: Bypass east of the creek.

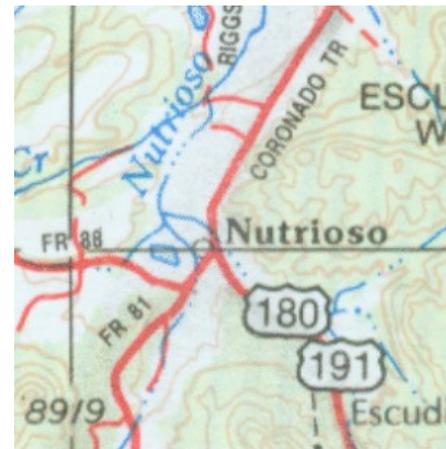
Cover of 1979 report.

Aerial photograph Exhibit C – in SE direction.

Cost estimates (from the report, approved by the Assistant State Engineer, Location Section, on 1 November 1979). **Alt. A = \$ 1,820,000; Alt. B = \$ 1,904,000**, both exclusive of preliminary engineering and land acquisition, with Alternative A running through the community, and Alternative B bypassing the community on the east side of Nutrioso Creek (see aerial photo above ▲.)



The unavoidable thing is that with changing times, concepts and ideas also change. Whether or not the winding Nutrioso Creek and the environmental impact upon it by **any bypass** at the bottom of the Coronado Trail Scenic Byway (rising to an elevation of over 9,000 feet) caused somebody to rethink the situation, and when, I do not know, because the Arizona Atlas & Gazetteer of 1993 still shows the old location. But GoogleMaps imaging shows that the highway now bypasses Nutrioso on high land to the **west** of the hamlet, which currently (2020) has no population at all. **Really!** Arizona Highways reports that “The **Wallow Fire**, which was started in 2011 by two careless campers from Tucson, torched more than **550,000 acres of gorgeous forest, including**



Excerpt from the 1993 Arizona Gazetteer.

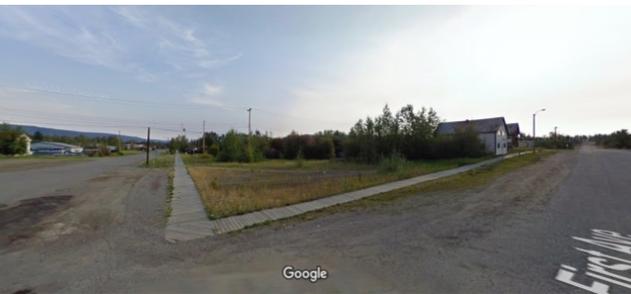
most of Escudilla Mountain.” (Lydia and I drove this route Southbound in 2007, and almost became seasick!)

<https://www.arizonahighways.com/explore/scenic-drives/coronado-trail>

Technology in the office really took hold of us in **early 1988**; we were told that we would soon learn a computer language called **dBase**, and that we would need to attend courses that would soon be set up. This could be used for programming (whatever that really meant, was not made clear at the time – except financial programming to extract money from Ottawa) and for correspondence within YTG. Robin, Walt and I had to get a **machine and**

wiring installed in our offices; in mine, it took up valuable desk space and I had to study a manual before I could get anything done. I may have sent a few internal messages, cannot remember if I ever attended a course in dBase, and do not think that its use outlasted me very long at YTG, nor anywhere else (as it was replaced by another system?) except at Wikipedia, where one may now read a lot about it.¹¹⁹ But I took good care of the **green IBM ball typewriter** that had long been considered redundant by those on the main floor (Nate Casselman or Lynn Alcock?), and got all my work done. At that time also, the Lynn Building received a **fax machine**; before that, one had to walk to the YTG Building to send a fax; an incoming fax (on thermal paper, illegible today) would be put into an envelope and brought by inter-office mail, unless one answered a phone call by “Yes, I’ll walk over and pick it up.” We already had “**total stations**” in use, and would soon use DTM (**digital terrain modelling**) for design purposes (perhaps even **McAuto**) and discard the out-of-date computer programs that Wally had written for plotting cross-sections of ground levels and road prisms for the calculation of quantities, even for crushed gravel piles. I had never used that program; the technologists knew what it could do. I actually knew very little about **highway design by computer** itself; in 1972, when studying for my HBA, I had attended a Symposium on **Administrative Automatization**, where the following quote by Gilbert Brock was mentioned in one of the papers: “**The time when executives could fool around with the machine is gone. Either they make the computer an indispensable part of their business, or they become a dispensable part of business.**” But I was convinced that this would happen sooner than later; by the fall of 1989, in Abbotsford, BC, (see Chapter 3 below), I was typing letters and reports and invoices on a computer with a green monitor screen, connected to a somewhat more sophisticated dot matrix printer that did not need paper rolls! But that it would also revolutionize **design techniques**, was even more important, and **in the not-so-distant future!** And when “**Windows**” came, I took a course from Mr. Marissen at Credo Christian High School in Langley, BC. If I am not mistaken, it was in version 3.1..... Then came Windows 95, Windows 98, etc., etc. (and many more after that).

The Whitehorse Star records state for “**March 24, 1987: Fire destroys the 55-year old Chateau Mayo hotel.**” I was there and saw this absolutely non-Canadian Pacific chateau bite the dust, and so was Florian. I was in Mayo to supervise the bridge repair work on that early spring day, but on arrival, I was already told that a minor fire had been discovered and I could not book in yet. Florian was there for something else and had a room at the motel at the north end of Mayo; he may have been there to supervise survey or design work on the Silver Trail, as per the Minister’s change of heart, or work at Mayo Airport. So I inspected the underwater and rip-rap placement work at the Mayo River bridge, and when returning to the log cabin chateau, where I had sometimes had lunch in the front room, was told that the fire was supposedly “almost under control.” Famous last words, eh?



When the firefighters opened up the roof for a final check up around 6 p.m., the fire just lit up like a candle, and did not stop until it was a huge ash filled hole; we stood and looked at it from the dike along the Stewart River (where a platform now exists), in the cold, and ... I had to find shelter on the carpet of Florian’s motel room. All other rooms had been taken that afternoon by those more knowledgeable than me about timber structure fires. So much for my pyromaniac tendencies! It has not been rebuilt at the corner of 1st Avenue & Centre Street. On p. 17 of “**The New Morning side Papers**” (1987), Peter Gzowski of

CBC fame told the story “**Keep Your Fork, Duke – Or Something**”, and when I read that book about 10 years ago, I reminded myself that I had heard **another version** of it – from a former RCMP officer, during an ITE luncheon in Calgary – and that it had happened in the **Chateau Mayo**. “**Please keep your fork, Prince, pie’s next.**” This Mountie had been the security agent during that trip to Yukon – but ... I cannot find such trip on the world wide web, and this might be only one of the many versions of the “**vintage Canadian**” saying, as one of Morningside’s aficionados had called it!

¹¹⁹<https://en.wikipedia.org/wiki/DBase#:~:text=dBase%20is%20application%20development%20language%20and%20integrated%20navigational,typing%20them%20in%20a%20command%20line%20%22dot%20prompt%22>

Yukon was still very “rural” and “behind-the-times” in some ways, but on the other hand a real “one industry town”, that industry being “government”. One strange thing was the use of alcohol when driving. This was made clear when returning from our first visit to Skagway, in May 1984, when the Canadian customs agent handed us a pamphlet stating that “**drinking and driving is not allowed in Canada**” – while we knew that this was true in Alberta and British Columbia, but not in Yukon. This only changed the next year, as the Whitehorse Star reported for “**July 19, 1985: A law goes into effect that makes it illegal to drink liquor in moving motor vehicles in the Yukon.**” A week or so earlier, our two newspapers had actually reported opposition to this new measure in the Yukon Legislature. The other issue was **seatbelt legislation**, where opposition raged about “**a Yukon way of life**” that was being changed. I think that our own Porter Creek East MLA, Mr. Dan Lang, spoke up on one of these measures, in which he decried the new rules, perhaps because he was in opposition. But a traffic related measure was reported by the Whitehorse Star on **February 6, 1987: The Yukon government decides to make daytime use of headlights on Yukon highways mandatory.**” I think that Yukon was a bit progressive with that measure; its mandatory installation in cars and trucks was later handled differently in Canada than in the USA. Four months after we left Yukon, the Whitehorse Star reported on **December 14, 1989: The Yukon government announces to introduce mandatory seatbelt use in 1990.**

Humanly speaking, I might have been killed if I had not worn a **seat belt** in a collision on the Klondike Highway, near **km 242**, between Fox Lake and Little Fox Lake, when I drove straight into a YAT truck-and-trailer combination that was stationary in the northbound lane and I hit a piece of black ice while driving a YTG GMC Suburban on an October 1987 Sunday afternoon. My reason for leaving home that afternoon (after church) was that I had to do several inspections for the Squatters Legitimization Program near Dawson City, some of the caterpillar-like remnants of dredging operations, and one of them at the old “Hydraulic” pump station north of the Klondike River. **By the grace of God, I only suffered minor injuries that day.** Ford 19-365 was no more; I had obtained a Suburban from the YTG workshop, because all the rental trucks had been returned. They had no Ford F-150 which would have been adequate for me. Robin had given his permission to obtain a vehicle from the Workshop, so it was all above board; all my files were on the seat next to me. I was not tired, and I had my fairly new (driving) glasses with me. (On my daily commute to and from work I had found that, sitting in the very back of the bus, I could no longer read the sign near the driver, so I went to an optometrist.) I was also not distracted, because I knew where I was, when asked by the truck driver directly after the smash. I had planned to stay over at “Stewart Crossing Bed and Breakfast”¹²⁰, and continue on Monday morning to the Dawson Dome Road from there; a site near West Dawson had also to be reviewed, and the ferry would be taken out of the water soon.

It was a **patch of black ice on a slight (not even sharp) curve to the right**, going north, and I saw the truck in the NB travel lane, a narrow shoulder and ditch on my right hand side and people in the SB travel lane; I braked hard, but could not stop in time, seeing the dirty grey mass coming up closer and closer. Did I drive too fast? I do not think so; I have never been known as a fast driver, and I had all the time to get to Stewart Crossing. Did I perhaps drive too fast for the expected condition of the road? Did I see the big truck a second or two before I actually saw it, so that I could have taken a better evasive action? This was the very first serious vehicle crash in my life; I was almost 45 years old. And by the grace of the same God, I have not had a serious crash since.

Now **why** was that yellow monster stopped in the NB travel lane, without any flashing lights or cones behind it, at this point where the **horizontal sight distance** might be diminished? I discovered that soon after the crash, during which I must have been momentarily stunned and then felt a bloody nose and hands, and a broken steering wheel, a shattered windshield, and that my seat belt (as was discovered by the staff of Robert Magnuson) had barely held

¹²⁰ After the debacle with Stewart Crossing Lodge (before the fire at the Chateau Mayo) I suggested that Rosemary Popadynec get a business licence for “Stewart Crossing B&B” in her parental home, and I slept in her brother Joey’s room several times. Nothing “untoward” happened, I may assure you **gladly**, dear reader; I paid Rosemary \$ 35 and claimed that amount from YTG. But whenever a Contractor had a trailer on-site, as e.g. with Melberg Verrico’s Crooked Creek realignment, I stayed and ate there. (I was once asked – by Robin – to reprimand Doug Andrews for driving to Dawson City and back in a single workday – which GoogleMaps tells me is **532km** and takes **5 hours and 57 minutes**, one-way.)

me from hitting the glass worse, and was a bit in tatters. Both YAT drivers rushed to me and asked the standard questions (name, age, date, do you know where you are, etc.), because those people have all taken First Aid courses. They told me that they had stopped because they had seen a SB vehicle with a few youngsters (from Carmacks) go off on the outside of that curve (and had overturned), and they asked me if they might put two crying teenage girls with several bruises behind me, in the rear bench of the Suburban, until the ambulance would arrive, for which they had already radioed in. The teenage male driver was still in the ditched vehicle. So there I sat, reminiscing on what my three children at home would say when contacted. Lydia had flown to visit Theo in Cal-



Gary; he was in the U of C dorm in his second year. The first half of the 1986-1987 year, he had rented an apartment with Jason Shorty, a fellow Yukon Grant recipient. I once visited Theo there with a **red rental car**. Jason had also received “band or CYI money”, and had spent much of it on all kinds of electronics like a TV, hi-fi equipment and a drum set. When he failed almost all courses before Christmas, he had to quit and return to Yukon.) Theo kept renting that basement apartment till June, came home that summer to work for YTG, installing the main frame computer, returning

to the U of C and living at a dorm on campus. It was now Lydia’s turn to visit our eldest; she stayed at the Sanderse family, and soon, Plonia would phone her there.



When a **second** ambulance had been requested and (at last!) arrived from Whitehorse, it was dark already and I was asked all the very same questions, By that time I seemed to be quite myself again, just as confident about my “vitals” and the date and the “km 242 between the two lakes”, though with the damaged nose and some fingers and my knees (because the column gear lever had broken off with the impact.)

That I also had a damaged or injured ego, is for you, dear reader, to establish; a month or so earlier, I had attended a 1½ day Seminar on “**Human Factors in Traffic Safety in Saskatoon**”! Wasn’t this an unavoidable situation, like “being between Scylla and Charybdis – a rock and a hard place”? I was also thinking about how I would get through the pile of paper on my desk and how this would affect my “perfect driver profile”. But from the bottom of my heart, I particularly thanked God for saving me from much worse injuries. Was this His sign to me **not to rely on my own strength, but rather to live for His glory, for more years?** If not, what else?

During my long ambulance ride, I remained lucid, giving our home phone number to the attendant, so that our children could be notified without becoming too overly alarmed, and to phone Lydia and Theo in Calgary. I experienced all the road curves in town, crossing the bridge and turning left onto Wickstrom Road and the hospital. It is perhaps the destiny of a transportation professional to be so very aware of one’s surroundings, but I may be wrong with such assumption. Plonia, Sara and Joss were at my bedside soon; they had already phoned Lydia.

I had suffered no major external or internal injuries; my knees were also bleeding, due to contact with the steering column. It was on Tuesday that I was allowed to go home by being picked up. and “please stay home for a few more days”. Lydia returned on Tuesday evening, and I felt well enough to return to my office on Wednesday, attacking the files and Shelley’s yellow notes about peoples’ phone calls. It was one of the only times that I made use of (quite liberal) sick leave allowance. Telling the office was not necessary, an article with a photo had already appeared in one of our newspapers even before I showed up in the Lynn Building.

The outcome of this was a bit unpleasant. Robin first denied that I had told him about my weekend travel plans that would mean my absence till Wednesday morning, until I reminded him of something that we had also discussed in his office on Friday afternoon. Charges were laid – **file # 87-04134 (Motor Vehicle Act s. 155) and file**

¹²¹ The weather during the crash was definitely not as nice as on this July 2009 GoogleMaps imaging.

87-04176 (**Motor Vehicle Act s. 179**¹²² – for (I think) “not driving according to road conditions” and for “not wearing a seatbelt” and I needed to defend myself in Territorial Court (for the second time). I presented my case with the facts, but was declared guilty as charged – (with extenuating circumstances?) – and paid the “**voluntary fines**”, also following a defensive driving course, as the honourable judge had required. As far as I know, there was no annotation on my driving record, but note that we left Yukon within a year and a half later.

Now note the **steep bank** on the right hand side of the GoogleMaps imaging; this (still) indicated a restricted visibility in 2009; it had been a true “accident” in which things could have been worse if I had opted for (1) the shoulder/ditch or (2) the people on the SB travel lane instead of (3) braking and barging ahead in the NB travel lane. I had an opportunity to see the “written off” Suburban outside the YTG Workshop, with Trevor Martin. (With 2021 eyesight, the question never came up in Court if I had worn my glasses; it was never **in dispute** and was not yet shown on my Yukon Driver’s License. Lydia maintains that I told her that they were in my shirt pocket, but I seem to remember putting them there after I had found them undamaged and “off my nose” by my feet, just after recovering from my very short unconsciousness. But why then a bloody nose? Would my forehead first have hit the top of the steering wheel, and then the glass? Was that why the seat belt was in shreds?)

While writing, the question arose what the **crash statistics** are on Yukon highways. Were the highways that I and my subordinates designed (and redesigned) and constructed in the 1980’s actually “**safe**”? That they met the RTAC Design Guidelines that existed at the time, is not what I would like to establish, more than 35 years later, because I know that we followed them. But could (and should) we have done better? Now I realize that even the horizontal curve at km 242 (see above) might have been flattened with the surfacing project – with more federal dollars, of course – to increase visibility on its inside. Almost anything can be improved by spending money. Checking “stopping sight distance” for the “design speed” of the highway would be an automatic procedure for a resurfacing project in Arizona, at least when I worked for ADOT from March 2002 to February 2008. Why? The Federal Highways Administration requires it.

The table at **right** shows that **per 100,000 population**, highway travel in Yukon in 2018 had a fatalities rate (15.7) that is **more than 3x as high** as the Canadian fatalities rate (5.2) and that the injuries rate (444.5) is **only 7.8% higher** than the Canadian injuries rate.

Also, the **per billion vehicle-kilometres** fatalities rate (10.1) and injuries rate (284.5) are **more than 2x as high** and **27.3% lower** than the Canada wide rates.

But when **per 100,000 licensed drivers** is used as a criterion, the Yukon fatalities rate (24.1) is **more than 3x as high**, and the injuries rate (681.1) is **18.6% higher** than the national average rates.

	Per 100,000 Population		Per Billion Vehicle-Kilometres		Per 100,000 Licensed Drivers	
	Fatalities	Injuries	Fatalities	Injuries	Fatalities	Injuries
Canada	5.2	412.4	4.9	391.1	7.2	575.0
NL	7.4	517.0	7.2	498.9	6.6	460.8
PE	9.8	424.2	9.6	415.6	13.2	573.8
NS	7.8	747.8	6.3	603.5	10.2	978.9
NB	6.5	348.3	5.6	301.1	9.0	484.3
QC	4.3	418.9	4.5	444.1	6.4	622.1
ON	4.2	356.9	4.1	347.4	5.8	491.3
MB	5.2	891.7	4.6	791.6	7.6	1,310.0
SK	11.0	361.9	8.6	284.0	15.8	517.5
AB	6.8	396.9	4.5	265.8	9.0	530.0
BC	5.6	393.4	6.9	477.5	8.0	555.7
YT	15.7	444.5	10.1	284.5	24.1	681.1
NT	4.5	224.5	4.7	235.8	7.6	382.5
NU	5.2	65.1	48.8	609.8	74.2	928.0

Footnotes

Footnote 1: Statistics Canada, Annual Demographic Estimates: Canada, Provi Territories, 2019, Catalogue No. 91-215-X.

Footnote 2: Statistics Canada, 'Canadian Vehicle Survey', Catalogue No. 53-2

<https://tc.canada.ca/en/road-transportation/motor-vehicle-safety/canadian-motor-vehicle-traffic-collision-statistics-2018>

Whitehorse Star: September 19, 1988: Statistics Canada reports the Yukon has the highest rate of impaired driving cases in Canada.

Without detailed analysis of individual crashes to determine if “black spots” exist and can easily be eliminated, it would appear that not much more can be said on this – except: **Yukon driving, then and now, is more challenging than it seems.**

¹²² On 4 June 2021, I was told these facts by the Clerk of the Yukon Territorial Court, but not the actual fines, as the files were already destroyed more than 15 years ago.

Are there locations that have since exhibited a “higher than normal” crash record? Yes, of course, unfortunately. (What that “normal” is, is an even more profound question.) That is why I like the **AASHTO Controlling Design Criteria Report** process so much – used in Phoenix with the Arizona Department of Transportation.

Much earlier already, an office **dispute** had arisen about the operational policy of “our” two-sided parking lot, located on the east side of the Lynn Building. On the west side, only the two (later three) Ford office trucks were parked, plus vehicles of staff and customers to the insurance agent in the building and the small building along Fourth Avenue, one of them a hairdresser. Initially, it was used on a “**first come, first served**” basis, meaning that with the staff expansion, one could sometimes not find an empty stall. When someone had complained about not finding a stall in the morning, so that he or she had to go somewhere else – on the street – and forego the use of power connections for block heaters (a valuable fringe benefit!), Mr. Kurt Koken (?) **decided to designate** all the stalls, based on position and seniority. So Mr. Blackman likely got the stall next to the front door, Mr. Magnuson and Mr. Casselman the ones next to it, and so on and so forth, down the ranks to recently hired typists and clerks,



and what then about our “casuals” ? Nice-looking aluminum plaques were made and affixed to the horizontal beams of the electrical outlets. But this arrangement did not last long, as it was grieved through the Union (by an underling who got no stall?) and this very soon went to the Public Service Commissioner for a verdict. He **struck it down** and then made a ruling (and I paraphrase what he decided about it; every employee got a

copy): “**I find it repulsive to even suggest that someone with a higher rank or salary, or more years of service, should be entitled to a better parking stall than a colleague with no such privileged position**”. What he decreed was basically that there ought to be “fairness and equality”, and this was then done by a draw of names, out of a hat. In that draw (and I did not even put my ticket in the hat myself, because I normally used the bus!), I unexpectedly came out with the ticket for the stall next to the front door! My plaque was moved from where it had been; it still graces the front corner of our house and has done so ever since, as a reminder that somewhere within bureaucracy, logic does sometimes prevail. (I note that the black tape surround on my plaque is in need of some patching up.) **In a certain way, Yukon was quite egalitarian in those days.** But this must be qualified: Equality among civil servants, I guess. The public sector was by far the largest employer, then and now.

The Dawson Dome Road improvement was my only construction project with **a lot of rock excavation**. This was needed for one curve with a minimum radius – about 2/3 up from the start at the Klondike Highway. I do not know how old the current alignment is that started on the “flats” of the Klondike River, as I heard stories that the original route went up from downtown, along what is now known as Mary McLeod Road. This steep road was a real tourist attraction, for cars, bicycles and even racing pedestrians like Chester (many times) and Florian (only once).

(From the internet: The Dome race has been running for more years than we can remember and has become a Dawson City classic. Starting at the beautiful Palace Grand Theatre runners and walkers make their way up the **old Dome Road**¹²³ and weave through the Dome trail system and **new Dome Road** as they climb the 1 852 feet to the top of Dawson's Midnight Dome. That's right ... 1 852 feet over a 7.2 km distance.¹²⁴)

¹²³ This “old Dome Road” can only be the route of Seventh Avenue and Mary McLeod Road.

¹²⁴ This is very *American*, I must add. Canada metricated officially in 1975. **Mixing Imperial and Metric measurements** often leads to things like the Gimli Manitoba Air Canada crash (1983), giving the Boeing 767 the nickname “Gimli Glider”.

This design did not use the DTM technology as described above, which is sad; perhaps a better alignment might have been established, but we used the tools we had, sticking to existing maintenance trouble free tangents, also trying to keep the grade within the (set?) maximum grade and insisting on the (set?) minimum cross sections. The Dawson Dome Road starts on the Klondike Highway, near an industrial area where the YTG Grader Station and workshops were. The top is called the Midnight Dome because the sun does not set there on the longest day of the year. Along the project limits, some existing borrow areas were re-used, and it was only at one sharp curve to the



left (with a 90 degree deflection angle), that a real rock cut was necessary, come what may, and let's see how much needs to be dumped over the edge! (Q. Did we think of an environmental impact? A. Not really.)

The result was fairly pleasing, but I also remember the gloomy area just north of that corner, where the trees were much larger than shown on the current Google-Maps imagery. That may of course be an illusion that stuck in my brain, as it was on a late fall day of 1987 that I was there, when the site survey had been completed and design was about to start that winter. This design was entrusted to John Cross; he completed it just before leaving Whitehorse for Nanaimo BC, and Jim Thom supervised construction in the summer of 1988. Whether he reported to me or to Walt Gutowski (after John Cormie's intervention as described above) is not very clear to me anymore. I took Lydia there just after we had sold our house, in July 1989, and the panoramic view across the Yukon River impressed her, of course, more than my amateurish **photographic glueing** ▼ does. Sad that GoogleMaps streetscape did not go to the bus turnaround.



And now (early 2021) there is a proposal for a large residential neighbourhood within the area surrounded by the lower loop of the Dawson Dome Road, unthinkable in the 1980's. Stantec is the consultant for the City.

Another technological change since those days was about trip information. In the 1980's, "The Milepost" was the promotional source used by most tourists. Annually, the Alaska representative (or editor?) came to enquire about all kinds of new things. Ray Magnuson sent him to me (and not to Wally), and I normally spent an hour or so with this gentleman, in my office. Afterwards, I then received a copy that incorporated the year's changes. These days, almost everything is digital / electronic, and no longer print, except for **The Milepost** at <https://themilepost.com/>

Seeing that I had been able to getting the idea across of a minor residential subdivision off Fish Creek Road, which would have been feasible though not straightforward, Lydia and I decided that I "apply" for a vacant lot in the development known as **Mary Lake Subdivision**, accessed off the Alaska Highway, south of YTG's similar Wolf

Creek Subdivision. Al and Margriet had plans to sell their completed house there and build another one, and he suggested that both of us participate in the offer (by paying de deposit) in YTG's land lottery. If he were unsuccessful and I were successful, he would buy the lot from me or we would perhaps do things together, and if he were successful and I were not, that would not be so bad either because Lydia and I were not really interested to move away from Bamboo Crescent. So both of us (Al and I) paid the small deposit in **June 1988**, and were "in" for Phase I. I do not remember the number of lots or applicants. The system worked by putting all names in a hat and drawing one at a time. The first person would be asked to come in and decide (within a few days) on the lot he or she chose, as the lots had different characteristics and prices. Only after the first person had chosen, a second name would be drawn, and this process would then continue until all the available lots were taken and "sold".

This lottery system still operates: Mary Lake Subdivision is not yet fully developed. Though now undertaken by the City, a website <https://www.whitehorse.ca/departments/land-building-services/lot-sales/mary-lake-country-residential-lots> indicates that two lots were available on 3 August 2018, that there were 22 applicants for Lots 160 and 161, (48 & 50 Fireweed Drive respectively), priced exceptionally high at ► **\$ 230,000 + GST**. These two lots are **very very close** to Lot 105 at 3 Larkspur Place!



But Al and I were both successful! So Al and Margriet purchased, and directly decided to build a temporary two storey "cabin" at **10 Iris Place**, in which they would live for a single winter, with an outhouse, no inside plumbing at all, and during 1989 they would sell their house in Wolf Creek, complete a proper house in Mary Lake, move in and sell the cabin (which was designed to be moved out of the driveway). A week or two after Al had told me of his success, I was phoned and told that I ought to come and see which lots were still available and if I could choose one. Lot 105 was one of the half a dozen or so lots that were still available. There was (in our minds) a logical reason why nobody else had picked it. It was the unfortunate result of an **engineering error**, made during the **planning phase** of the project. This glitch had then been **corrected** during the **engineering phase**:

When planning the subdivision, Mark Hambridge had conceptualized the collector road around its perimeter, called **Fireweed Drive**, which name was also given to the short access stub off the Alaska Highway. Various cul-de-sacs inside this perimeter road would enable privacy of rural residential lots, just like in McPherson and Wolf Creek. One of these cul-de-sacs was a fairly long Larkspur Place, straight up from Fireweed Drive, running in a south-easterly direction. This layout was then approved, lots and road right-of-way were surveyed, and the whole of these cul-de-sac right-of-ways were cleared of all the ◀ vegetation, anticipating construction of the (rural) gravel cul-de-sac roads.

However, when the design engineering phase started, it was discovered that Larkspur Place would be so steep that it could not meet the design standards. The lot layout in the area was then **amended** with a new (= longer) leg of Larkspur Drive, that would start on Fireweed Drive a bit further north. The previously cleared area became part of Lot 105, which would remain barren for a long time. That situation did not make the lot "unacceptable" to us; in fact, a

large flat cleared area existed near the lot's driveway location, off the (new) cul-de-sac bulb, as access was not allowed off Fireweed Drive. The earlier surveyed "stub" of Larkspur Place had remained unbuilt. That it also was within walking distance to Al and Margriet's new property meant a lot, though it was fairly tough "bush whacking". When building there in the spring of 1989, I sometimes took a break and helped Al there, or (mostly) walked to ask advice.

In the summer and fall of 1988, I helped Al as much as I could, and he helped me as much as he felt needed and possible within his set goal of moving into the cabin for the winter. I drew a building permit plan and applied for a building permit; we did percolation tests together and I obtained a septic permit (I had no experience with those things); he ordered a septic tank and plastic pipes and filter cloth, and we installed it together, with the appropriate lengths of runs, in gravelly material and a fairly downhill slope. The cabin was proposed close to the cul-de-sac, still fairly private, with no noise from Fireweed Drive. I hired a local Contractor – **H. Coyne & Sons** – to build a gravel access driveway (with a 12” dia. CSP for the drainage ditch in the cul-de-sac, one that I had somehow found somewhere and taken home; YTG had long ago stopped using anything less than 18” dia.) When I later needed electricity, Al later sold me (for \$ 75) the temporary service pole and connection box that he had first built and used in Wolf Creek and then on Iris Place. And I assisted him, first with framing, then with cladding and insulation, and then with roofing. One whole day in late August was spent by nailing cedar shingles on the roof of his cabin. As we were talking, he said that we used the materials **parsimoniously**. I liked that word, and decided to write and present a Toastmasters speech about this, and on the topic of the use of long or short words. In the speech, I even wrote a long part with words that had only one (and not more) pair of brief ... **syllables**. It was much appreciated.

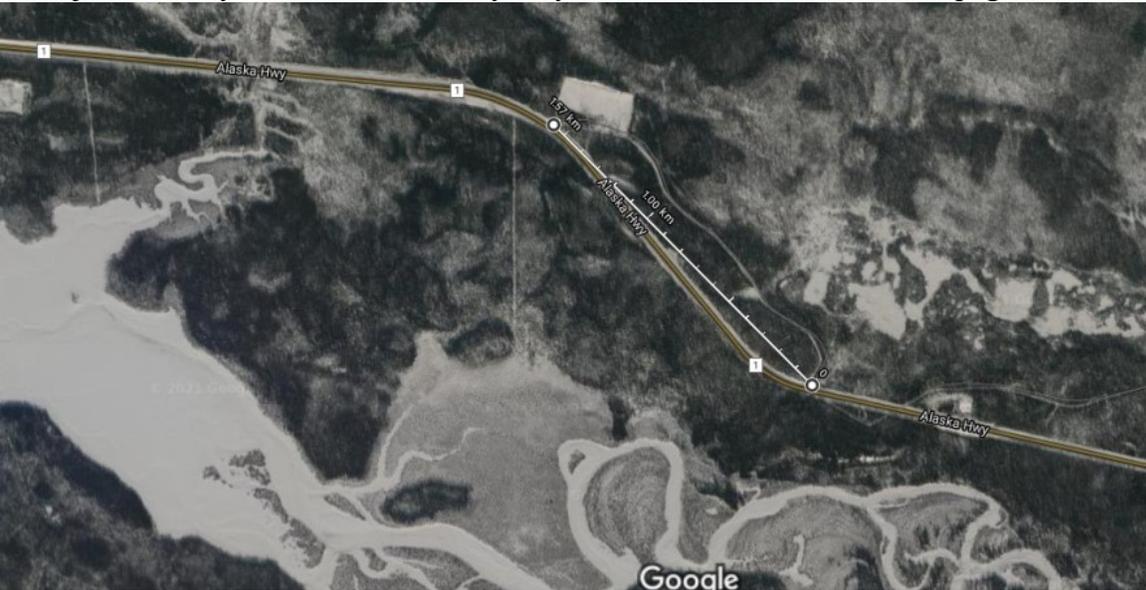
Due to the logistics of Yukon, I had less reason to deal with Highway Maintenance issues for Gordon Eftoda than for Colin Yeulet or Al Close. Gordon’s Eastern Region included the (partly) reconstructed Highway 1, the east and lesser trafficked part of Highway 4, and the virtually deserted Highway 10 up to the NWT boundary. He once told of a trip by which he had returned home from Watson Lake via the Campbell Highway to Carmacks, a distance of **584 km** in the middle of winter, and had experienced a temperature of “**60 below**” (I do not know whether Fahrenheit or Celsius) at **Tuchitua Grader Station (km 108)**, and had almost turned around. The importance of a good dependable vehicle should never be underestimated, he said, because between that outpost at the start of the **Nahanni Range Road**¹²⁵ and the Ross River Grader Station was **253 km, where almost nobody lived**. “You take your life into your own hand if you go there in that cold”, he told me. I confess that I can only remember going once up to Tuchitua, as both Highway 4 and Highway 10 were definitely not to expect engineering input, there was no traffic and hardly any mining activity at that time. It was very different there than on the Alaska Highway, where more people lived, in a village like Upper Liard and at the various lodges and gas stations, remnants of the WWII and its aftermath, when civilian trucks were allowed to drive to Whitehorse. At Whitehorse Baptist Church, we met someone (Fred) who as a teenager had accompanied his father on one of the very first civilian convoys, in 1946. His experiences were very different than ours, with lots and lots of dust along the way, jerry cans of gasoline, many mechanical eventualities to think about, many tires, and slow going.

The Watson Lake Roads Foreman had a **surname** that I remember from his non-work related passions, which later turned into an investment, enjoyment and income. **Bob Greenway** applied for a Land Use Permit on a parcel at Upper Liard. This was approved in the mid-1980’s, and when he retired, the beginnings of the current **Watson Lake Golf course**, (known as **Liard Golf and Country Club** and/or **Greenways Greens**) was the outcome of an 18 hole golf course, located at Cormier Creek Road, Upper Liard, Yukon. The other passionate golfer was **Nate Casselman**, heading a committee to start a golf course below Porter Creek, which succeeded in 1987 already with a lot of volunteer work when **Mountain View Golf Course** opened. Although he talked a lot about it at work, he failed miserably to interest me in golf. I sometimes reminded him of Mark Twain’s words: “**Golf is an excellent way to spoil a good walk.**” Which, I am glad to add, did not spoil our good collegial relationship. Lydia and I sometimes stopped by their house when going for a walk through the neighbourhood.

I applied for many positions: In October 1986, as **Senior Transportation Engineer** with “an international multi-disciplinary consulting engineering firm” in Toronto; applications had to be made to a Box at The Globe and Mail, and below the advertisement were the words “**Our Employees Are Aware Of This Advertisement**”. No success. I even applied for a position of **Executive Director** of the Reformed Christian Business Professionals Association, in Burlington, Ontario. No success. In July 1987, I applied for the **Deputy Engineer** position at the District of

¹²⁵ I noticed somewhere online that this road is no longer considered a numbered highway. I never went there.

Chilliwack, BC, and the **Manager, Engineering Services** position at the City of Prince George, BC. No success. I entered YTG's Competition 87-MG8-3 for **Director of Transportation Engineering** in August 1987, and the reply was **“although every consideration has been given to your application, it was unsuccessful on the above noted competition, and the position was offered to another candidate”** on 30 October 1987. Note that this was just after my crash, and that everybody had read about it on the front page of the Yukon News!



It may have been by my YTMS position (but I doubt it) when a request was made to investigate the restoration potential (to original 1944 standards!) of a short portion of the Alaska Highway, at its exact midpoint near Nisutlin Bay east of Teslin. This might have become a **“show-and-tell”** feature if done properly, I argued, with maps and boards of US Army design drawings, before the US Army project overspent and Contractors

took it over for its completion at Soldiers' Summit. I visited the section with somebody from the YTG Heritage Branch, by driving through and back *slowly*. This ± 2 km long section ▲ was indeed “original” with cross-wise logs and hardly any drainage structures. It was within hearing distance of the rebuilt BST'ed highway, and might have become a real **“halfway”** tourist attraction if in time for 1992. But somebody said “No.” Sad.



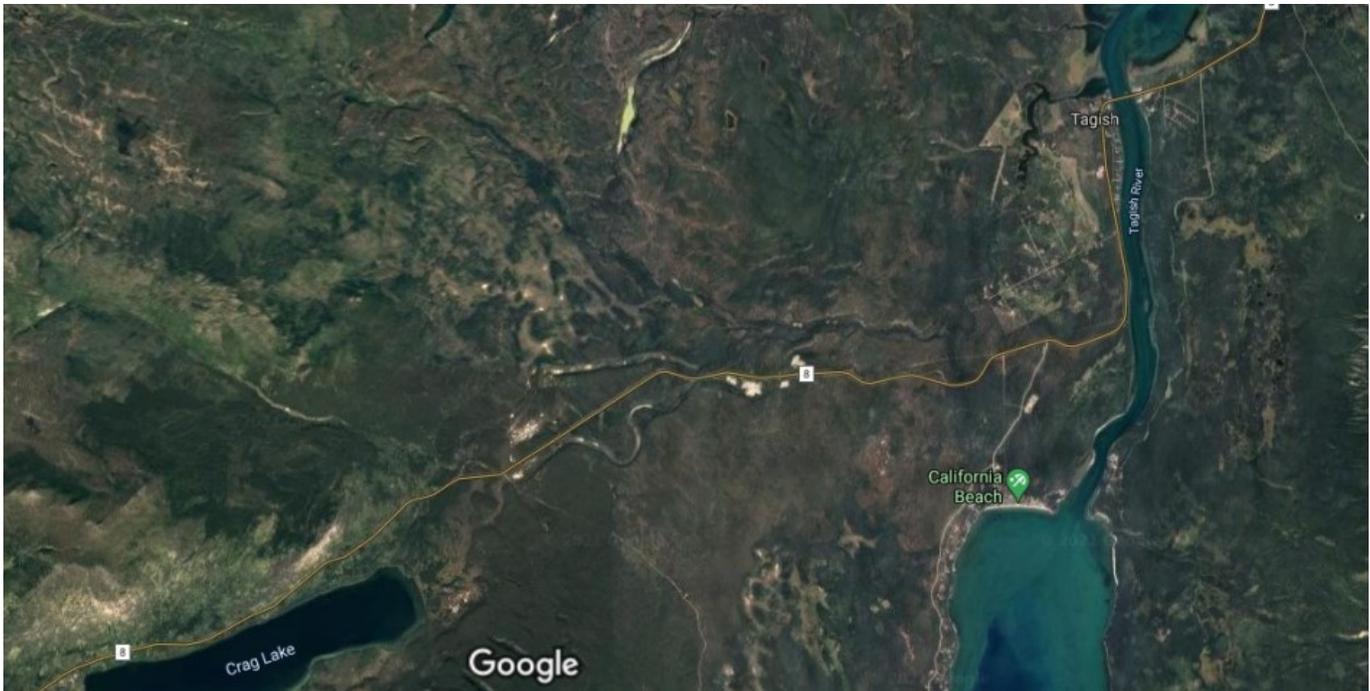
Toward the end of August 1988, Lydia and I travelled to Edmonton, to take Plonia to **The King's College**. We drove south by the whole Alaska Highway to Dawson Creek and further, but we returned via Prince George (where we visited our previous close neighbours Mark and Nora) and Smithers, where we visited friends, including the widow of the man who – on the way to Whitehorse for the second time¹²⁶ that summer, with a truckload of home-grown cabbage – had driven off the road again near Dease Lake, killing himself and also causing serious brain damage injuries to his teenaged son. We then took Highway 37 north, and very

late that evening, ▲ pitched Theo's old little blue pup tent below and beside the east approach of the Little Rancheria River Bridge, where it was very cold and we woke up with ice cover on the uninsulated tent. **It was the first week of September!**

Another gravel resurfacing occurred in 1987, and had a less than pleasant outcome. It was on the western half of the Tagish Road No. 8 that runs from Carcross to Jakes Corner. The work was on its eastern leg, between Carcross and the concrete bridge across the Tagish River, but not starting at Carcross but somewhere near Crag Lake. The design was like a proverbial **“piece of cake”**, with nary a relocation or geometric design issue, and on fairly flat terrain. At Tagish were (and are) about twenty small lots with cabins and docks, just as popular as those at Marsh Lake on the Alaska Highway, and most of these had an individual long driveway. This historical situation had to be addressed, and was resolved by designing and building a **frontage road, with a highway access at each end**.

¹²⁶ The first time, he had driven by himself, but had gone off the road near Dease Lake. He was then flown by helicopter to Whitehorse General Hospital, and Lydia received a phone call from our watchmaker acquaintance (van der Linde) about this member of the Canadian Reformed Church in Smithers. When we went to the Hospital, he had already somehow discharged himself against doctor's and matron's warnings, hitch hiking back to his irrigated farm on the Telkwa River SW of Smithers.

Between Tagish and Jakes Corner, some realignments had already been surveyed under Walt's direction, before the crew(s) were summarily summoned to the constituency of the Hon. Piers McDonald, because he wanted to have the Silver Trail improved instead of the Tagish Road that lead to nothing but British Columbia. We were unsure if the eastern half of the Tagish Road resurfacing / improvement project would go ahead in 1988. I do not know if the southern Yukon improvements had been politically motivated; I do seem to remember that Willard Phelps was from "out-of-town, south of Whitehorse," but note that he was Leader of the Opposition.



Only minor opposition against this improvement measure had been voiced; cabin owners were mostly ◀ from Whitehorse, only few lived there year round. Doug and I were aware that the gravel pit for this resurfacing project was not the greatest, but only marginal. We had crushed for base course and BST, which would be done during 1988. Eric Becker, the

other Engineering Technician II, had done the detail design drawings, and I do not remember if he had done so directly for Walt or for me. He had also been scheduled to supervise this construction project, once advertised and awarded. I do not know if this was his very first major construction supervision project or not.

The first controversy arose when **Reg Vance**, the owner of **H.R. Vance Construction Ltd.**, a Whitehorse company, was denied an opportunity for a first "kick at the cat" during a Tender Review Meeting. He had claimed the **10% Native Ownership preference clause**¹²⁷ (as a member of the former Selkirk Band) but this was denied by Dave Parfitt and those at CATS Contract Administration, because supposedly, at one stage in Yukon's distant past, his mother and her offspring had "lost" their Indian status. He later confided to me and was furious that YTG could have done this to him, even showing me the old papers from Ottawa, and brought it up whenever we met, by saying "**John Rudolph stole that project from me!**" From this, you may fathom that the project was then awarded to **Golden Hill Ventures Ltd.**, and Walt and I (rotating?) conducted site inspections there. In fact, on our way to Yellowknife, Florian and I had made a first leg detour by driving to **Jakes Corner via Tagish**, and I signed a progress claim there for an interim payment certificate, which Eric would submit to Robin's "john henry" and then to Dave Parfitt. So far, so good.

¹²⁷ This measure had been legislated by the NDP government and was fairly new in 1987.

Our rules clearly stated that when the work would be almost completed, before the Contractor was allowed to demobilize his equipment, Eric was supposed to liaise with the Road Foreman in Carcross, and they would go with the Contractor's designated foreman and together (= **three people, without me**) drive over the project from end to end, checking all the paperwork like density tests and itemized quantities, and then the Contractor would write up an itemized Payment Certificate (Completion) which they both would date and certify as correct by a signature, and this would be submitted to me for my signature. (This is an almost internationally accepted procedure.)

(Written in the present tense): One day in late August, Eric Becker comes into my office **around 11 a.m.**, with the paperwork for a "completion" payment certificate for Golden Hill Ventures' project on the Tagish Road. I ask him a number of questions: "Is the work all done?"; "Has it been done well?"; "Have all the normal procedures been followed?"; "Is Highway Maintenance happy?"; "Are all the quantities and extensions correct?" – while I am extremely busy and even distracted(?) with a number of other important things. Assuming that Eric has done everything necessary and proper, I then sign the payment certificate, which he takes and passes on to Robin for his signature, and from there, he says that he is going to hand deliver it straight to Dave Parfitt in the YTG Building. (A normal routine, one might say, not knowing why John Rudolph would not want to stand in line and wait for his time for the processing of his claim.) But **just after 1 p.m.**, Colin Yeulet waltzes into my office with the (bad) news that the Tagish Road is very soft and that the Contractor has demobilized the equipment; he (Colin) has therefore already authorized the Roads Foreman in Carcross to bring in a layer of sandy material to cap the soft spots, because of the upcoming "heavy Labour Day traffic." I am stunned when Colin tells me that Golden Hills Ventures' equipment has already been demobilized back to its yard in Whitehorse.

YTG's regulations for paying invoices (like a Contractor's payment certificate) had a clause stipulating that **the normal payment date was 30 days after a claim had been submitted**, and that, if for various reasons, after a claim had been submitted and approved, **it was possible to request a delay**. I knew that this was a general contract clause in jurisdictions where I had worked before, so I directly phoned Dave Parfitt with a **verbal request to invoke that clause**. (I did not know that YTG had never used – nor had a reason to use – this clause.) I then walked over to the YTG Main Building and begged Dave not to process the claim by Golden Hills Ventures, as a serious lack of process had cropped up, that I had been "misled" by one of my subordinates, and that Highway Maintenance had already taken steps to "undo" the crushed gravel surface that was intended to be BST'ed the next year, but would now be impossible, because of the lack of aggregate in the surfacing. Unfortunately, Dave Parfitt declined my plea, it felt a bit as if Pontius Pilate was telling me "**What you have written, you have written.**"

When this came to Robin's attention (by Dave Parfitt, who made several allegations to him about the way in which I had begged him, and he also claimed that this clause did not mean what it actually stated), things became really serious. Since taking over from Wally as my supervisor, he had also denied me annual increases, for which I could do nothing else than continue submitting grievances through the Union. But in this case, Robin took a more drastic action: After blaming me for everything that had gone wrong, giving details of the most minute things in the process of signing off on a progress claim, (without involving Eric Becker at all, which I found strange, and ignoring that he had also signed it), I had an opportunity to defend myself, and I presented the text of the specific article in the Conditions of Contract. I said that I had made use of that clause, and that I had done this as part of my responsibility, when one of my subordinates had somehow misled me, and that the error had actually been caused by the fact that Eric Becker should have done his job before submitting the paperwork on my desk. Robin did not want to listen to my defence, and then **suspended me for 5 days, without pay**. This obviously needed to be grieved as well, and that took quite some time. (For these details, I go by memory; the paperwork was thrown out 20 years ago.) I stayed home for a week and then returned without saying a thing; it appeared that some of my subordinates knew about it and sympathized with me. After dealing unsuccessfully with Ralph Shopland's assistance, a lady negotiator came from the PSAC (Public Service Alliance of Canada) in Ottawa, and there was a long meeting that accomplished nothing, except that both parties agreed to "binding arbitration", for which somebody would come from Saskatoon. That took a few months, and eventually (in the spring of 1988) this man arrived and we all sat down in a fairly dark meeting room at the Sheffield Hotel. It was a very long meeting, and the inves-

tigation was thorough. I stood my ground while the accusations flew. The breaking point came late, when Robin seems to have lost his cool by declaring that **“This Department has already spent more than \$7000 on this silly investigation, and we are getting nowhere”** which did not sit well with the adjudicator at all. He stopped Robin abruptly by saying **“Yes, and this man has a perfect right to grieve what has been done to him”** and then wrapped up the day’s proceedings by declaring **that the 5-day suspension was overturned and reversed.**

Sadly, I never knew if the blame for this “mishap” (a neutral word) was then put on Eric Becker, whose actions that day should have been reviewed – **even together with what I had done** – and I have also wondered if this whole situation was **a dirty set-up to trap me**, a very productive employee, into making one single (but fatal) side step, and denying me to make use of the legally accepted corrective action – by delaying payment for up to 30 days. John Rudolph wanted his money, and he wanted it directly. I also do not know how the matter of “hold-back” was resolved for this contract. Normally, 5% is withheld from the Contractor’s completion payment for a year, so that after 11 months, a site inspection can identify any deficiencies, the Contractor can repairs them during that month, and after their final acceptance, the 5% is paid out. This was how things were done in South Africa, see e.g. the Completion Certificate at the end of Chapter 3 of my “Part 1”, and it is an almost universally accepted procedure, (except in Arizona, where Contractors get everything on completion, and there is no “holdback” at all.)

Doing performance evaluations on “my” employees (meaning the 8 or 9 full-time employees under my direct line of command and the many more casual employees during the summer months), was something that I did not enjoy. During my five years, I did not deny anyone an increase, and in retrospection, I believe that most of them worked hard and efficiently, and also enjoyed what they accomplished. Eric Becker might have been the one that in earlier years had not shown adequate zeal and gusto for his work, but how would I have known that he was not aware of all the steps to complete a construction project? (I don’t think we had training courses for possible upgrading from Tech II to Tech III.) Might it be that in 1984, 1985 and 1986, Eric had left those details to Walt Gutowski, and only in 1987 was by himself on the Tagish Road project, and leaving them to me? Regarding one casual employee, a crew chief, however, action had to be taken, because several complaints came to my ears (and others’ ears), from rodmen (male and female) who worked directly for him, out in the beating sun on the road, or cutting line in the bush, for his cursing and swearing and rough language, and also, his inefficiency. On the basis of these complaints, (which I had somehow been able to verify during my site visits, without his knowledge) it was determined one spring that he would not be **automatically** rehired. I think Wally made that actual decision, so it must have been the spring of 1985. But this backfired when Tom O’Donovan heard about it, and walked straight to the **newly sworn in** Minister (Piers McDonald) with a demand that he be rehired. CATS had to rehire him, to the detriment of everybody. He was one of the few rotten apples in the basket. He lured colleagues into his room at the cabins behind the Carmacks Hotel, where he showed X-rated movies. I cannot remember if any of “my” staff were incapacitated from drinking on the job. I guess it may have well have happened, but I did not see it when there. Was I allowed to comment on employees’ **moral conduct**, as part of a **work performance** evaluation?

At <https://www.infrastructure.gc.ca/gmap-gcarte/index-eng.html?pt=yt> one may see a description of the many individual projects of a new highway construction program, and in a joint News Release of Whitehorse, Yukon, **March 12, 2021**, seen at <https://yukon.ca/en/news/governments-canada-and-yukon-sign-multi-million-dollar-contribution-agreement-yukon-resource-gateway-program>, the Governments of Canada and Yukon signed a multi-million-dollar contribution agreement for the Yukon Resource Gateway Program. **This ▼ following detail:**

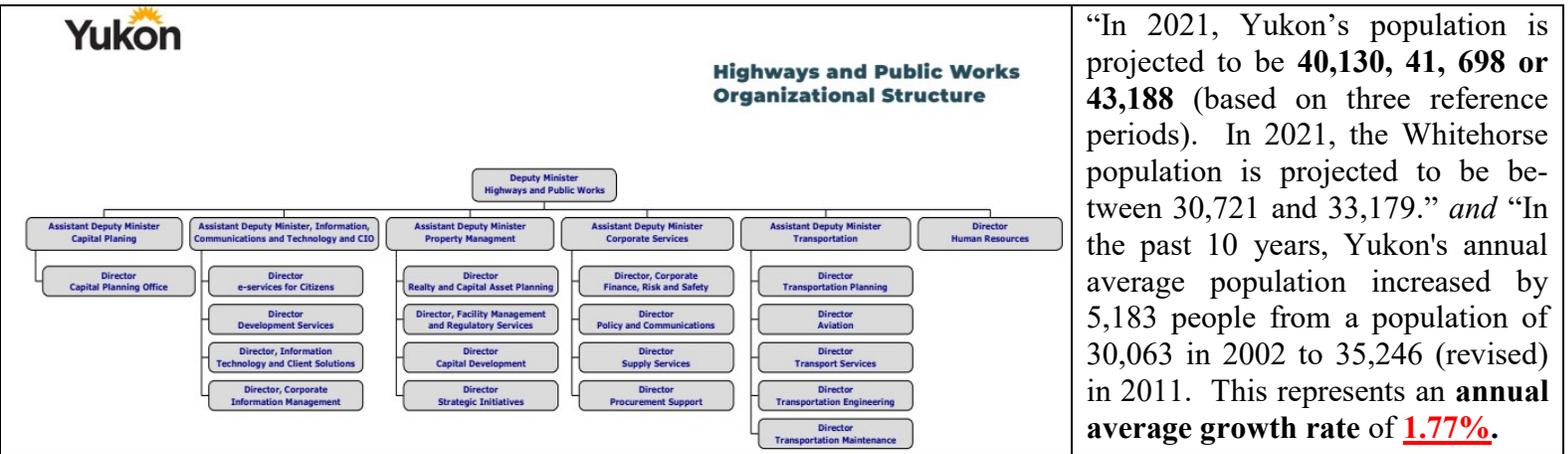
North Klondike Highway Reconstruction km 418.0 to km 646.0

Capacity of national trade corridors has been enhanced
Delivery Department/Agency: Transport Canada
Federal Contribution: \$ 118,212,428
Estimated Total Cost: \$ 157,616,571
Estimated Start Date: Autumn 2027



The project will reconstruct **96.5 km** of the North Klondike highway, rehabilitate two bridges and replace one bridge.

An even more recent Media Release states that this work is solely for the section between Carmacks and Stewart Crossing. Not that it matters much; political promises will always come and go, as in the case of the Atlin Road and the Silver Trail. But I also wonder how much of the funding will be **gobbled up** by salaries and fringe benefits of a (bloated?) organizational structure ▼like the one of April 2021, for a predicted Territorial population ▼like:



Was communication within the bureaucracies (federal, YTG and municipal) **adequate** during the 1980’s? No.

Mr. R.J. Gourley, P.Eng.
 Director of Engineering
 City of Whitehorse
 2121 - 2nd Avenue
 Whitehorse, Yukon
 Y1A 1X2

Dear Sir:

Alaska Highway Corridor Plan

We have received and reviewed the final draft of the above noted plan and would like to offer the following comments.

Our main area of concern lies with the lack of emphasis on highway access in general. We believe that before further development in the Alaska Highway Corridor is considered the existing access problems should be analyzed especially in the heavily used area from Crestview to the Whitehorse Airport. We would like to see the report contain some specific recommendations on which accesses should be retained, realigned or eliminated through this area or alternate proposals to allow free and safe traffic flow on this arterial route.

On 11 January 1982, Mr. Larry Blackman had written to Mr. R.J. Gourley, P.Eng., Director of Engineering, City of Whitehorse, ◀ about his “**main concern**” regarding the final draft of the City’s Alaska Highway Corridor Plan (by EPEC Consulting Western Ltd., i.e. a “**lack of emphasis on highway access in general**”. I wonder what DPW’s comment would have been, **IF** they (being the “**owners**” of the Alaska Highway) had been asked. (I think they were not asked by this “outside” consultant (from Edmonton).

But five years later, in early 1987, Mr. Barry Bergh asked DPW for comments on his YTG paid “Legal Review” and on his Topic ◀ number One, “**Control and Administration of the Highway System**”, Mr. John Hudson, P.Eng., and I were the only two people commenting on “**the lack of adequate liaison between the YTG, the DPW and the City of Whitehorse.**” I wonder what the City of Whitehorse would have responded, **IF** they had been asked.

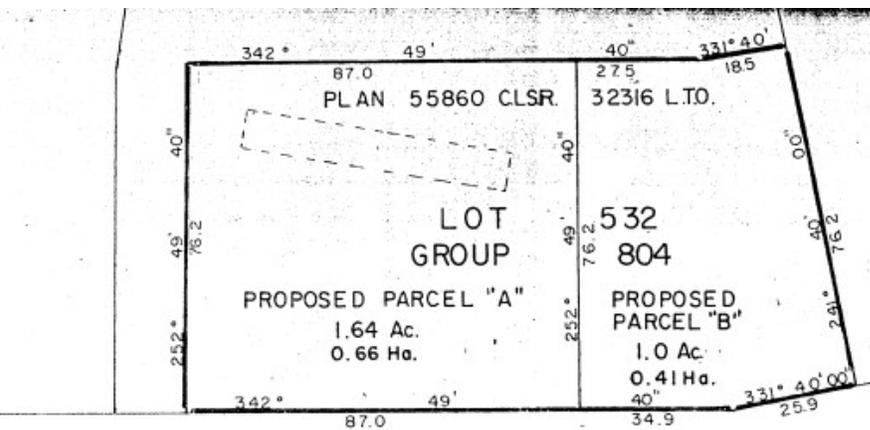
See how this had already resulted in a stalemate at **Paddlewheel Village**, where further to Mr. Blackman’s letter, the City’s OCP had concluded that this area was not a “**development node**” on the Alaska Highway, and that no additional accesses ought to be allowed where three already existed, though EPEC had only shown ▼ **a single one**.

532 & 530	913.0	Private	Restaurant, Campground
			Trailer Park 15.5 ac. C.T.

Alternative 1 ▼ Service Road proposal. Alternative 3 ▼ (Wally's suggestion) GoogleMaps 2021 imaging. ▼



Nothing happened for **almost a year**. On 1985-11-05, Wally wrote me that he had discussed the issue with Ms Ella LeGresley, the City's Planning Technician, and Mr. Phil Blaker, P. Eng., in favour of eliminating accesses, but also suggesting an extra lane. I countered that this would be dangerous! On 1985-11-08, I wrote a memo to Wally (with a copy to Ray Magnuson), reporting that Melberg-Verrico had done much unauthorized work within the right-of-way, without obtaining a permit. Ray suggested to Wally finding the property pins, and Wally said that it



ALASKA HIGHWAY NO. 1

was possible, asking us **“are we interested in making an issue of this?”** The property pins were all found, and I reported this on 1985-11-25. Nothing happened for another **half a year**. On **2 May 1986**, the City of Whitehorse Planning Board decided to **“conditionally support the subdivision subject to a service road being constructed to accommodate all adjacent properties, prior to the subdivision ▲ of Lot 532.”**

Yukon INTER-OFFICE MEMO 2142-3-2

FROM: Jacob de Raadt, Program Engineer DEPARTMENT: Highway Engineering

TO: Wally Hidtger, Manager, Highway Engineering DATE: 1985-11-08

Ray Magnuson, Manager, Highway Maintenance SUBJECT: Paddle Wheel Village - Melberg-Verrico Contracting Ltd - work on highway R.O.W.

MESSAGE: It has been reported to me that Melberg-Verrico Contracting Ltd., owners of Lot 100A-1, have recently done some clearing and earthworks within the Right-of-way of the Alaska Highway in front of this lot, without even requested permission for this by way of the application under Section 12(6) Highways Ordinance. This work was done during the beginning of this week. As Melberg-Verrico still has not obtained the permit for the "fourth" access in this area pursuant to your letter of 1985-05-15, and still have not done anything to initiate the construction of a "service station", I think it would be appropriate to inform them of the above unpermitted work being carried out.

I am pretty sure that the work is within the highway right-of-way, as last year I walked around that area and saw that they had flagged the corner of the lot themselves. Their earthwork then progressed till the property line.

REPLY FROM: Wally Could we go out and find the property pins?
Ray.
Possible to do - see. Desirable? i.e. are we interested in making an issue of this? I discuss with

Jacob de Raadt
Wally
yes as described
Ray

(This would therefore serve five 5 parcels, and this was appropriate.) As the work for the **Alternative 1 Service Road** needed approval and funding from DPW under the Alaska Highway Maintenance Agreement, I prepared a cost estimate (which came to \$30,000 including engineering), I sent this request to Mr. John Hudson on 1986-05-21, with a copy to Mr. Peter Vana of the City of Whitehorse. And I never heard anything more about this; Google-Maps imaging (2021) shows **four wide driveways** to the Alaska Highway, and **no service road nor extra lane**. The situations like this made me feel professionally unwanted and unappreciated, as if I were talking like a voice in the wilderness, somewhat like **Mr. Irving Armstrong** with his roll of maps promoting living quarters in the cliffs,

He was an individual who lived in a self-made shack in the swamp between the downtown and Marwell, leading the life of an unemployed hobo, though well learned. He was normally nominated and seconded to run for Mayor in the municipal election, and promoted the City becoming involved in “community living” (in the cliffs) and “social clubs”. Year after year, he received some votes from those who did not like Dr Branigan or the others.

Since the autumn of 1987 and particularly during the second half of 1988, while I got quite some public exposure to various political issues (see **Reflections of a CHP Pioneer** on the **next few pages**), the reorganization and reclassification that followed the Job Evaluation Study took its long awaited course, and I heard somehow that the work that I had done to date, would in the near future be done by **four people**, of which three would be Professional Engineers, while the fourth one would not need to have that professional designation. Nothing was actually in writing. With time, positions were advertised for the three professional positions – which would basically maintain the **status quo** from early 1984, with John Murray, Robin Walsh and Yours Truly in somewhat similar “program engineer” positions, (although my position had been on a different pay scale and had a much different and wider project description.) These positions would obviously all report directly to Robin. I did not apply for any of them. The fourth position was also advertised, and its job description showed that this was more of an “office research and resource position”, for which a technology diploma might be helpful but surely not a degree in

civil engineering (+ an MBA). So I did not apply. This is how my job was voided, or to use the idiom, **“how the rug was pulled out from under my feet.”** This is how things stood by the end of September 1988. I was still very busy, doing all the work that was piled onto my desk, in the full knowledge that things might very soon not be the same. This is how things stood when **the General Federal Election was called, and I applied for “political leave”**, as candidate for Parliament, duly nominated by the Yukon members of the Christian Heritage Party of Canada. The clause in one or other Yukon statute that allowed a YTG employee to apply for political leave, had never been used before, so I did. Unsurprisingly, that piece of paper received as many signatures as the Memo could hold, and absolutely nobody objected to my application. As if it had stated **“Please go ahead, we will not stop you in committing political suicide...”** In September 2021, Yukon’s Chief Medical Officer (Dr. Brian Hanley) used the same clause, and won as the Liberal Party’s candidate in the General Election.



CHP Founding Convention, Hamilton, November 1987.

About my **political career** that started in Yukon, I would not like to say very much; **from the context** of this “Part 4”, much can already be concluded. In **2012**, I provided some reflections to Mr. Harold J. Ludwig of Abbotsford, BC, for a book that he planned to write about the first quarter century of “Canada’s Responsible Alternative”. He completed and edited this as Project Coordinator, titled **“Remembering 25 Years”**, ISBN 9781494926369 under his 2015 copyright. In July **2020**, I received a surprise hardcopy of the book from Harold, and my reminiscences are printed on its pages 47 and 48, (**copied on the next two pages**) under the grouping **“The Early Years”**. I got tears in my eyes when I read what I had written, and how Harold singled me out as a **“CHP Pioneer”**. I remained involved with the party till around the turn of the century.

(In November 1993, I ran for office in the municipal election in the Township of Langley, receiving 1648 votes, which was 8th out of 20 candidates, which was not enough to become one of the six Councillors. In October 1996, Lydia and I visited the Europe for a vacation, so that I missed the nomination deadline for the next election; good.)

Reflections of a CHP Pioneer

JACOB DE RAADT

Jacob was another one of many pioneers of the party who played an important role in policy development on issues such as proportional representation—he favoured a system of MMP—and many others. He was a tireless worker on the local and national level and helped me in a number of my campaigns as well. He is still in the public eye today due to his involvement in local governance issues in Langley, BC. He has since moved out of the area but still keeps a close eye on things. Check it out on the internet and I'm sure you'll find his name there—but don't believe everything you read.



Jacob de Raadt lining up
to speak to a motion.

I BECAME A MEMBER OF THE CHP in the summer of 1987. In the fall of 1987, I paid for a plane trip for Ed Vanwoudenberg's visit to Whitehorse, Yukon, where he had the CBC Radio interview with a "hidden questioner" giving the interviewer leading questions. During 1988, John Voorhorst also came for a few days.

In November 1987, I attended the Founding Convention in Hamilton, Ontario, and participated in various long policy development sessions. In February 1988, I prepared a draft policy on an Indirectly Elected Senate. You may remember that the Reform Party had senate

reform with the Triple E approach as a serious plank in its platform. Today, 25 years later, the NDP is asking for abolition of the Senate.

In the summer of 1988, I made a presentation on behalf of our fledgling riding association at a candlelight vigil very soon after the Tiananmen Square massacre. I said that day that Canada was partly responsible for it as we traded more and more with Communist China without demanding that human rights be considered first. Some people wrote letters of objection to the Whitehorse Star or the Yukon News about this. This issue has not changed in 25 years either; I now read that China's leaders believe the Communist party will die of old age.

That summer also, prior to the November 1988 General Election in which I became the CHP candidate, the Canadian Senate conducted a few days of Public Hearings in Whitehorse, Yukon, about the Meech Lake Accord. As leader of a small riding association (we were about 25 people), I prepared a brief on behalf of the CHP, opposing the Accord. The material was written based on information in the CHP policies and with the help of Miff Crommelin in Vancouver, BC, and was sent to me by letter and by fax—really 20th century technology. This should be on the official record, I remember later receiving a transcript. One of the Liberal senators asked me the question if this was a new separatist party that was being started by Preston Manning in Alberta, and I said no and explained that the CHP was national in scope and had had its Founding Convention in Hamilton in November of 1987.

The record of the November 1988 General Election is public knowledge. By the grace of God, I witnessed for the truth, but could not unseat the incumbent Audrey McLachlan (NDP). The other candidates were Charlie Friday—a Whitehorse contractor that I had dealings with, as I was an employee of the Government of Yukon's Highway Engineering Branch—for the Progressive Conservative Party, and Joe Jack. He was the Liberal candidate but lost his deposit, partly due to the 248 votes I garnered. Before the 1987 by-election, Eric Nielsen (PC) had been Yukon's MP for many years. The local newspapers gave me a lot of credit. I remember one all candidates' meeting at the Ski Chalet where all the phoned in questions were directed at me (organized by CBC Radio) and I was able to give satisfactory answers. After another all-candidates' meeting in Dawson City, the journalist reported that although most questions were about Free Trade (remember that this was the single election issue) but I was able to bring everything back to the underlying moral issues.

Soon after the election campaign, my position as Transportation Engineer III was terminated and I was left with a choice to take a much lower paid position that did not even require professional engineering status. This was clearly a ploy by the NDP controlled Yukon Government to get rid of me—I had too much of a public profile. I elected to accept a three months gold-plated handshake on termination. This was the Lord's way to bring us back to civilization and we chose to drive to the Lower Mainland of BC instead of back to Calgary, Alberta where we had lived from 1977 to 1983. In October 1989 I started to work in Abbotsford.

In December 1989, Ed Vanwoudenberg sent a copy of my almost two year old document to Mr. Bill Van der Zalm (former Premier of BC). I do not know if it surfaced since in any policy development session of any Canadian party.♦

Media coverage was fair. Two samples follow from the Whitehorse Star. The Yukon News was likely similar.

◀ **Top of page 3, Whitehorse Star, 1988-10-13, by ED CASIMIRRI, Star Reporter.**



Jacob de Raadt holds up three fingers of one hand to symbolize the three national political parties. Then he holds up the index finger on his other hand symbolizing the Christian Heritage Party.

“The three parties say the same thing and we’re one party that stands apart. We are principled,” says De Raadt, a Porter Creek resident who is running in the Yukon as one of four candidates in the Nov 21 federal election.

The Christian Heritage Party founded at a convention in February 1986¹²⁸ is the “new kid on the block” in Canadian politics, De Raadt said. But he does not consider himself or the party on the fringe.

“We have the basic support of Christians from all kinds of denominations. We are taking over or assuming responsibility in this country after they (the Progressive Conservative Liberal and New Democratic Parties) have left the bedrock, the foundation. We’re a grassroots party – no fringe – that is definitely not the case”.

De Raadt is the father of four and has lived with his wife Lydia in the territory for the past five years. He said he expects to be grilled by Yukoners on his stance on issues such as free trade, day care, abortion and the Meech Lake Accord. But he said he is optimistic that the party with 50 members in the territory and 14000 members across Canada will gain the support of Canadians who are disillusioned with the three main political parties.

In perfect English although with an Afrikaans accent, De Raadt, a civil engineer with the Yukon government, said his campaign will focus on letting Yukoners know the “fundamental fact that things are going in the wrong direction” in the country.

The principles the party has embodied in its constitution can turn things around, De Raadt said. Thirdly, the party is seeking a mandate from the voters to begin to speak up and be heard nationally.

De Raadt, who was born in the Netherlands, moved to South Africa with his family when he was nine years old. He lived there for 25 years then moved to Canada with his family. He had no illusions of Canada being the land of milk and honey especially after visiting Vancouver in 1975 in the midst of a garbage strike.¹²⁹ But in his 11 years in Canada, De Raadt said, he has noticed things have not been working well at all.

Economically the country is “in deep trouble” because of the \$300 billion debt, said De Raadt. Thirty per cent of Canadians’ tax dollars go toward the national debt, he said. During this campaign all three national political leaders continue to promise more money for various programs without regard for where the money will come from, De Raadt said.

Wearing a blue blazer that matches the color of his eyes, De Raadt said if Christian Heritage Party members are elected they would ask the Auditor-General of Canada for a complete account of Canada’s debt, who the money is owed to and how much. “Deficit spending should stop.”

¹²⁸ The journalist was wrong with this; it might have been the founding date of Preston Manning’s Reform Party of Canada.

¹²⁹ The journalist was wrong with this; we arrived in **Calgary on 6 December 1977**, during a long municipal workers’ strike.

Free trade is not an issue in the election, he said matter-of-factly. If elected he would work to alleviate the adverse effects of the Canada-US deal on Yukon industries but “those industries should not become burdens of the state.” They should be given incentives to diversify to get into a different kind of business.

De Raadt said he objects to Prime Minister Brian Mulroney’s attempt to make the deal more palatable by offering money to industries, who will be adversely affected such as the grape growers in Ontario. “That’s no way to go” he said. “(Liberal Party leader John) Turner can campaign high and low but he won’t undo the free trade deal” said De Raadt.

Day care is an important issue for the Christian Heritage Party, but unlike the other candidates, De Raadt said, he and his party do not support the state paying for “the hobbies of others”. “We believe in mother care first of all”, said De Raadt. “We’re not against day care but we’re against it for those who don’t need it”.

The government should not be paying for yuppies to send their children to day care, De Raadt said. “Society has changed and there are many couples who both work.” But De Raadt said if individuals or families decide to work then they are responsible for paying for their children’s day care, not the government.”

Land claims is a grey area for De Raadt. He admits that he has not developed a clear position on the issue yet but he said he questions whether it is fair to give aboriginals more rights than other Canadians. “What you’re doing is creating a class of Canadians that have more rights than others.”

The slim and silver-haired De Raadt also puts his party’s stance on abortion at the top of his issues list for the election. The party is prolife. Love your neighbour as yourself is the party’s basic tenet. “The party values the sanctity of life. A nation has no future unless it protects the most defenceless members of the community.” The Christian Heritage Party supports the right of the mother “to not get pregnant” he said. De Raadt said he and his party oppose the Meech Lake Accord and support spending money on defence, especially to protect Canada’s sovereignty in the Arctic.



◀ **Top of page 1, Whitehorse Star, 1988-11-17, by ED CASIMIRRI, Star Reporter.**

Candidate roundly booed by students

Jacob de Raadt’s policies and principles don’t seem to be too popular among young people in Whitehorse.

This morning the candidate for the Christian Heritage Party received boos and hisses from students at FH Collins Secondary School for his position on women in the workplace and having Sunday as a day of rest.

At a forum sponsored by the youth group PAX earlier this week¹³⁰ de Raadt came under fire for those same issues plus his position that Canada should not support economic sanctions against South Africa.

This morning all 700 students at the high school plus a class from Christ the King Elementary School packed the gym to hear from all four candidates vying to become the Yukon’s next MP Monday.

Today’s forum will likely be helpful for the students eligible to vote and also for the entire student body who will be voting in a mock election at FH Collins Friday.

Social studies teacher and forum moderator Richard Martin says the forum and the mock election are intended to help expose students to the election process. After the 90-minute forum Martin said he was ... (Cont’d on Page 3.

¹³⁰ I was also booed at that meeting, when Charlie Friday and Joe Jack did not turn up; I faced **Audrey McLaughlin** alone.

Yearbook Quiz

1. How many classes have you skipped this year?
A. 1
B. 23
C. 180
D. None
E. How many times have we had block B?
2. How do you get to school in the morning?
A. I ride the bus.
B. By private helicopter.
C. I take two rights, then a left, then . . .
D. I walk.
E. My mommy walks me to my locker.
3. If John is 2 years older than Mary, and Tim is 16, how old are you now?
A. 16
B. 15
C. 18
D. 17
E. Is this a trick question?
4. Who is the principal of our school?
A. Mr. Lord
B. Ms. Sward
C. One of the custodians.
D. Mr. McLay
E. Elmer Fudd
7. Did you make it on the Honour Roll this year?
A. I just missed it by 1%
B. I just missed it by 17%
C. Yeah.
D. Nope.
E. What's the Honour Roll? Do you have to audition?
8. Who would you have voted for in the last Federal election?
A. Audrey McLaughlin
B. Jacob de Raadt.
C. Roger Rabbit.
D. Joe Jack.
E. Charlie Friday.
9. Do you have a job?
A. Does "sort of" count?
B. Yes.
C. Only when I have to clean my room.
D. No.
E. Living is a job to me.
10. How much do you get paid?
A. \$4.00 per hour.
B. \$5.39 per hour.
C. You mean I should be getting paid?
D. \$12.00 per hour. (My dad knows the boss.)
E. \$15.00 per hour. (My dad is the boss.)
11. How many washrooms are there in this school?
12. What is your opinion of the announcements in the mornings?
A. I love them. They're my style.
B. I never hear them. I'm always late.
C. What announcements.
D. You call that stuff announcements?
E. I ripped the speaker off the wall, so what do you think?
13. What is your favorite school?
A. F.H. Collins
B. F.H. High School
C. F.H.C.
D. Fredrick H. Collins
E. All of the above.
14. How many times do you appear in the yearbook?
A. More than 10. (I'm on the Yearbook staff.)
B. More then 3, but less than 10. (I know the Yearbook staff.)
C. Once.
D. Twice.
E. I'm in this book . . . where?
15. When your teacher tells a joke, you laugh because:
A. You never laugh at jokes.

Sara was in Grade 11 and Joss in Grade 10; I still want to find out how they experienced it when I was openly booed during one of the two meetings, and if they attended.¹³¹

Mrs. Flo Whyard then seems to have tried to come to my rescue with a letter that strongly criticized the students' behaviour and also that of the moderator's lack of control over the group, as he had done nothing to stop or avoid it.

With the whole "Audrey McLaughlin Fan Club" against me, is it a wonder of God's grace that I did not just quit that day?

And the public also spoke up. In fact, Joe Muff commented on the former editor's comments (or editorial?):

Students' booing of candidate wasn't a surprising occurrence

Mrs. Flo Whyard's comments on the behavior of the students attending the all-candidates forum at F.H. Collins School prompts this response. While I concur with Mrs. Whyard's traditional values regarding mutual respect and courtesy in the exchange of opposing views in public debates involving democratic process, current events unfortunately demonstrate that almost any means achieves the political end.

For those attendant students, most of them eligible to vote in the next election, this event was not a textbook exercise. Constantly exposed to such "adult" antics as picket ministers picketing private businesses, the everyday spectacle of our own House of Commons' brawls, ad nauseam, I am not surprised at their reaction to a political candidate's controversial views on

the direction of Canadian society.

In bygone times, our ancestors either ran from, or hurled spears at dinosaurs. More recently, many of them blindly followed twentieth-century dinosaurs along dubious paths of self-gratification, or worse. If these students hooted at such a one, then I believe that our old textbooks have finally been dragged out of the cave and studied in clear daylight.

Hopefully, the lesson on rules of conduct in public debates will remain on the curriculum, but in a better semester, and with improved study material. Parliamentary procedure is at its finest when all participants abide by its rules, everywhere.

Joe Muff
Whitehorse

¹³¹ I have yet to find the rest of the journalist's report, or the ones at the Ski Chalet and at Dawson City (referred to above).
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ABOUT JACOB RAADT

Jacob de Raadt was born in the Netherlands in 1942, lived in South Africa for 25 years, immigrated to Canada in 1977 and has lived in Whitehorse for the last five years. He and his wife, Lydia, have four children: two of them study "outside" and two of them attend F.H. Collins Sen. Sec. School.

As a highway engineer with the Government of Yukon, Jacob has travelled extensively through Yukon. He has served on the Whitehorse Transit Commission, the Whitehorse General Hospital Advisory Board, the Yukon Transportation Museum Society, Toastmasters and in church activities.

Jacob and Lydia became Yukon's first CHP members more than two years ago, and organized Mr. Ed Vanwoudenberg's visit to Whitehorse in February, 1987. Jacob also attended the party's Founding Convention.

The CHP candidate takes the issues facing this election very seriously, and is committed to restore morality, integrity and responsibility in federal leadership across our land.

ABOUT THE CHP

The Christian Heritage Party of Canada is a federal political party officially formed in June of 1986. The party has experienced very rapid growth. The CHP is a truly national party with membership in every province and territory served by nine provincial and regional offices in addition to our national headquarters in British Columbia. The 534 delegates attending the Party's 1987 Founding Convention in Hamilton, elected Mr. Ed Vanwoudenberg, from Surrey, British Columbia, as leader of the Party. At least 50 candidates will be running under the CHP banner in this election.

Jacob de Raadt

WELCOMES
YOUR QUESTIONS AND INPUT

Please contact him at
5 Bambro Crescent,
Whitehorse, Yukon Y1A 4V4
Tel. 633-5524

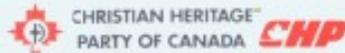
On Election Day, Vote

de Raadt, Jacob



For the True North, Strong and Free.

*Authorized by Trevor Martin,
Official Agent for Jacob de Raadt*



JACOB DE RAADT

CANDIDATE FOR
YUKON

CANADA'S RESPONSIBLE
ALTERNATIVE

WHAT DOES THE CHP STAND FOR?

ECONOMIC POLICIES:

- Planned repayment of Canada's huge and growing \$ 300+ billion national debt.
- Constitutional amendment to balance the federal budget, over a business cycle.
- Reduction of taxes by less government control; support for small business.
- Free trade coupled to environmental protection and support for diversification of adversely affected industry.

SOCIAL AND MORAL POLICIES:

- Welfare and daycare as necessary and important forms of public charity: no unqualified and unlimited rights.
- Legislation protecting human life: rights for the unborn — no euthanasia.
- Land Claims justice, without creating a separate class of Canadian citizens.
- Reinstatement of capital punishment for first degree murder.
- Criminal Code restrictions against sexual deviancy and pornography.
- Education a parental responsibility.

CONSTITUTIONAL POLICIES:

- Scrapping the Meech Lake Accord: a bad deal for the North and an even worse deal for Canada in the long run.
- Devolution of federal responsibilities to the Territories where warranted and feasible, without duplication.
- Strong national defence policies, reaffirming our identity & sovereignty within NATO & NORAD, particularly in the Arctic.
- Common-sense bilingualism (unlike Bill C-72)
- Constitutional amendment on property rights.

Dear Yukoners,

Voting is a privilege we have in Canada, and you may cherish the opportunity to exercise your ballot this time with your conscience. The CHP is Canada's Responsible Alternative to the three parties currently in Parliament.

The issues to be addressed in this election are complex, as they include local, national and international concerns. We can no longer claim to be isolated from what happens "outside", as the economic, social and constitutional issues affect all Canadians alike.

I share these issues with you, and have listed those policies that the CHP feels are vital to the future of this great land.

As a new political entity in federal politics, we do not have all the answers. However, our vision for Canada is to restore this hurting land of ours.

I would like to convince you of three things:

1. It is a fundamental fact that things in Canada are going in the wrong direction.
2. The CHP has the Biblical-based principles embodied in its platform that can turn things around.
3. As CHP candidate, I need your support and mandate to speak up and be heard.

O Canada, we stand on guard for thee!

Jacob de Raadt.

RESPONSIBLE LEADERSHIP, FAVOURING:

- A strong, united Canada
- Honesty and integrity
- The family as the basic unit of society
- Sanctity of life from conception to natural death
- Balanced federal budget
- Conservation and environmental protection
- Compassion for the working poor and underprivileged
- Restitutional justice, law, and order
- Restoration of self-esteem and self-sufficiency for Canada's native peoples
- Responsible free enterprise
- National day of rest
- Co-operative labour relations
- Parental responsibility in child-rearing
- Agricultural surpluses purchased at fair market value for foreign aid relief
- A voice for the North

The election pamphlets were printed in Ontario, together with twelve (?) large and hundred (?) smaller election signs, which came by truck and were a bit late, so that not very many of them made it to individuals' lawns, particularly outside the vicinity of Whitehorse. I made one very long day trip (west) to Haines Junction and no further, and I did not go (east) beyond Jakes Corner. I covered Whitehorse pretty well from door to door, discovering that sign vandalism was rampant in Yukon — or was it a souvenir hunt?

I provided much input into the pamphlet's text due to my exposure to the CHP election platform and its policy development committee for quite some time. My platform was not a populist one, nor a single issue (pro life) platform as e.g. the BC Family Coalition Party's became much later. Contact with the party's National Campaign Headquarters was by fax, which I had to pick up in downtown, and then pay for! Trevor Martin (a fellow CATS employee) was my official agent.

Nationwide, CHP candidates garnered 2% of the popular votes cast, in Yukon, 255 votes for me were in that range.

The Lord ultimately elects people to govern on earth, and who can question His choice? During December 1988, my political leave continued for a CHP executive meeting in Langley BC, going by Greyhound and being billeted with a family on 4th Avenue, South Surrey. Bill Stilwell¹³², party president, picked me up the next morning and drove many additional kilometres to avoid a dangerously narrow 184th Street. Financial statements for the campaign were handled through the law firm of Cable, Veale. Another newsworthy item from the Whitehorse Star that month: **December 22, 1988: Deputy minister Andre Gagnon dies of cancer at the age of 45.** Somewhat to my shame, I must admit that when I heard that about my adversary (whom I had never seen in the Lynn Building, and I only once went to his office with Wally), I did not shed a tear, but I felt sorry for his wife and young children (whom I never even met.) It must have been hard for her – being French speaking – and it was not long before she returned to Montreal. The French element in Yukon obtained a huge boost with their pursuit of French education.

On Monday 2 January, 1989, we attended the normal **Commissioners’ Levee**, which was a huge party in the multi-storied foyer of the YTG Building. Mr. Ken McKinnon had already succeeded Mr. Doug Bell in March 1986, but there was always a lot of food and opportunity to meet people. We had attended every New Year’s Day, but I did not realize what would happen only a few days later. It was on Thursday that John Cormie came into my office to schedule a very unusual evening meeting for the next day (**Friday 6 January**) in his office – which had been Mr. Blackman’s in 1983, where I had been interviewed. So I agreed to his request, and he left my office. I do not remember if I suspected that something was going to happen.

That Friday evening meeting was **weird**. John Cormie pulled out all the stops to try and blame me for not doing my job and for being a disgrace to the Department. Perhaps my recently acquired political skill allowed me (by the grace of God) to defend myself on all his accusations, point by point, stating e.g. that my five-day suspension (about the Golden Hill Ventures/Tagish Road contract) had already been reversed, that I was innocent on the Brian Laird/Mountainview Drive situation, and that Robin had at first been very supportive of the 11% Hill reconstruction. But my statements seemed to fall on deaf ears, and he became very irate and started to scream while I kept my cool. (I was likely too embarrassed to have a professional engineer scream at me, as I had never experienced this.) At first, I did not know that John had a pre-typed document with him, in a file on the desk. After some time, he showed that letter to me and suggested that I sign it, because there was no longer a position titled “Program Engineer III” with YTG, and I had no other recourse, because this was the result of the Job Reclassification that had started with the Job Evaluation Study, over which he (John) had obviously no control. The wheels of government had slowly but surely turned – **on me**. So I signed that letter, thereby declaring that I would no longer be employed by the Government of Yukon Department of Community and Transportation Services.

In this letter, I was promised a lump sum **gilded handshake** of three¹³³ months’ salary, plus all my accrued vacation pay and unused sick leave, (which was substantial, as I had seldom come down with flu or anything else, although I had occasionally visited Dr. Bridgeman, the chiropractor.) Lydia, Sara and Joss were not really shocked when I returned home that night, nor Theo and Plonia. We saw this as the Lord’s way to get us out of an impossible situation, which we accepted in terms of Romans 8: **“And we know that for those who love God all things work together for good, for those who are called according to His purpose,”** On Sunday 8 January, we went to church in a normal way, and were encouraged by the sermon and what our brothers and sisters in Christ told us.

On 9 January 1989, the Elsa mine closed, laying off 170 people. After collecting my personal belongings from the Lynn Building, I walked through the YTG Building foyer (where the Levee had been held a week earlier), on my way to the Finance Department. In an impromptu Media Conference, Mr. Piers McDonald announced a (weak) government response. Within a few months, the population of Elsa dropped from 722 to 9. The money spent on the improvement to the Silver Trail had all been in vain, while absolutely nothing had been done to the Atlin Road.

¹³² Bill Stilwell was an (electrical) Traffic Operation Technologist in the District of Surrey Engineering Department.

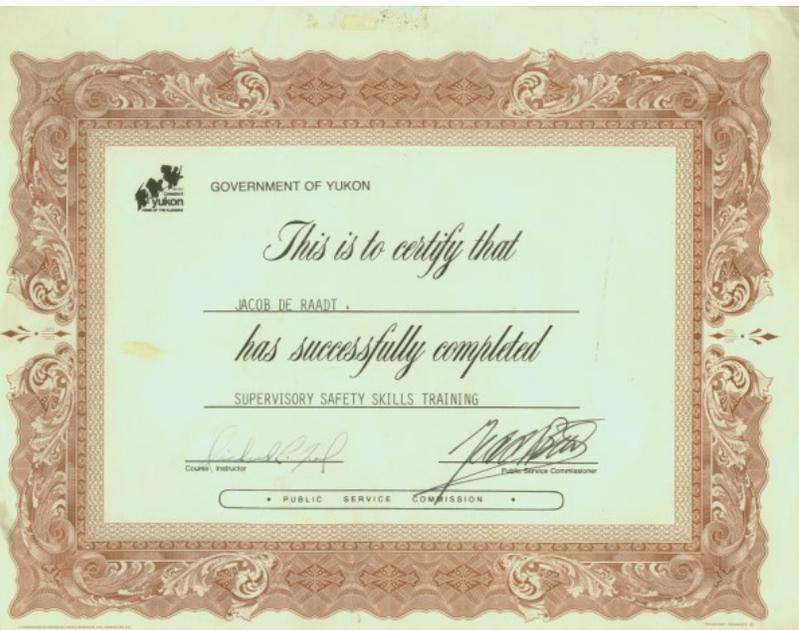
¹³³ From my earlier Calgary experience, I ought to have refused to sign John Cormie’s letter, saying **“No, unless you change that little three to a little five, please.”** A month per full year of service is the general rule in Canada, John Knibbe had told me (see “Part 3”). Not that it mattered then, not that it matters now; in between, it may have made some things easier to bear.

Chapter 2 – A time of unemployment, in Yukon and British Columbia (1989).

11/1983 – 01/1989: Program Engineer III, Department of Community and Transportation Services, Whitehorse, Yukon Territory, Canada.

- Responsible for planning, organizing, directing and monitoring Yukon funded highway construction program. (CS 6m / year)
- Supervised a staff (junior engineers, technologists, surveyors and soils technicians) that varied from seven during the winter months to more than thirty during the summer months.
- Site surveys were generally done in the summer months, design was completed in the winter months and construction was done in the following year from end of May to end of September.
- On behalf of the Highway Maintenance Section, responsible for a variety of federally funded Alaska Highway maintenance projects (bridge painting, emergency bridge repairs, gravel crushing, minor airport improvements, brush clearing, culvert repairs.)
- Carried out transportation studies for the federal “tote road program”.
- Administrative duties regarding access permits, land use permits, Indian land claims and the “squatter legitimization program”.
- City-appointed member of Whitehorse Transit Commission (3 years).
- Yukon representative on RTAC “Heavy Vehicle Weights and Dimensions Committee” and “Implementation Committee” from 1984 to 1988. Attended meetings once every three months all over Canada.
- Development and implementation of a heavy equipment operator training program and a following “training” construction project (Freegold Road).
- Presented a paper “Access Control – A Northern Perspective” at the Western Association of Canadian Highways Officials (WACHO) meeting in June 1987 in Yellowknife NWT, and chaired a session on highway safety issues during that conference.
- Completed all Yukon Government sponsored training sessions.

(Portion of my resumé ▲ dated October 2007, when I tried to get work in BC again, from Arizona.)



About the ▲ last bullet in my resumé. I add here the ◀ certificate in Supervisory Safety Skills Training, signed by Mr. Jean Besier, the Public Service Commissioner who ruled on the parking lot issue. Below left ▼ is UMA’s paperweight commemorating the firm’s 75th anniversary. I received this from Dwight Carter, P.Eng. (in Calgary) or from Wayne Moorman, P.Eng., who ran UMA’s Whitehorse office during the 1980’s. (I met him later again in Victoria.)



Those working under me, gave me a farewell lunch at the Taku Arms, a well known restaurant and bar in Whitehorse. Obviously, not everybody was in attendance!

Lydia and I knew that finding another professional job in Yukon was impossible; we would have to leave the Great White North. Only a few consulting existed in Yukon; one engineer in Municipal Engineering had zig-zagged more than once between the private and the public sector, **Brian Laird** was also soon to return to “job security”. So we approached **Keith Dye**, a Pentecostal brother, local auctioneer and realtor (who had been the Libertarian Party’s candidate in the federal by-election of 1984) to sell our house at 5 Bamboo Crescent. It was listed, and unfortunately, there was not much interest for about half a year. Lydia kept working, and our two remaining children at home continued their schooling and work as before.

I almost had an acting career that spring, and an environmental clean-up specialist job! Cadbury was to make a commercial about people eating their chocolate bars in a train, and had chosen White Pass for the site, unaware that Swiss mountain railways have all been electrified for ages. This commercial was supposedly for the gullible US TV market, ignorant that European countries produce much better chocolates! In February, I responded to a newspaper advertisement for “extras”, in the F.H. Collins gymnasium, and was chosen – with specific clothing, namely my brown Sunday church suit. A few weeks later, a group of about 15(?) of us were asked to turn up in Skagway, Alaska, (passports were unknown in those days), where we were put up in a motel for the night and would be groomed the next morning and then bused up to White Pass (in BC), where a lonely WP&YR passenger coach was already standing on the rails, visible from the highway. I had no speaking role, of course, and we would all be told what to do and what not to do. We waited all morning, and it was around lunchtime that the Director / Producer / Big Shot (of the project) told us that there was not enough snow on the pass for a successful commercial, that it would therefore not be made that spring because no major additional snow was in the forecast, and that we would be paid. So everybody took their **per diem fee** and drove home. A few weeks later, I gave some thought (but not much) to a newspaper advertized call for people to go and clean up the shores of Prince William Sound, Alaska, near where the tanker Exxon Valdez had run aground on 1989-03-24, spilling 240,000 barrels of crude oil. Lydia said that I was too old for that kind of nonsense, climbing over slippery rocks and guck and what not, in cold weather, and as a 46-year old who had rather used brain than his muscles, I agreed with her.

I was then eligible for federal Unemployment Insurance Benefits after the 7th of April (seeing the three months of gilded handshake) and applied in the Federal Government office where **Sandra Vedress** gave and took my papers. Note that this was officially the third time that I was out of work, although only the second time that I registered.

And I continued hammering away at the cabin on Larkspur Drive. My construction progressed well, and by the summer, when the days were long and I had nothing to worry about a neighbour who worked 12-hour shifts and needed his sleep during the day, I had the framing and outside plywood up for the main floor, while the basement had been tarred on the outside, and backfilled. I had also assisted Al with his house, and after they had moved in, helped Al to adjust placing the cabin (that had already been moved) on a lot on Columbine Place, one cul-de-sac east of Iris Place. That lady owned a team of huskies, and wanted them to stay below the main floor!

During the previous five years, I had occasionally attended luncheon meetings of the **Full Gospel Business Men’s Fellowship International**, which was quite “interdenominational” in Whitehorse, though Mr. Sterling Young, an insurance broker and its long term representative, was of that persuasion and led those meetings. I continued to do that in 1989. When once asked to share my testimony, (and it may have been in 1988 already, during my political candidacy) I agreed to do so, and did this along my understanding of my faith, along the lines of various key parts of the Heidelberg Catechism, i.e. God’s **providence** (Q & A 27 and 28)¹³⁴ and the **basis of our justification** (Q & A 60)¹³⁵ which (I believe) was much appreciated by most as being “the basics” of our commonly held faith.

¹³⁴ **Question 28:** What does it benefit us to know that God has created all things and still upholds them by His providence? **Answer 28:** We can be **patient in adversity**, thankful in prosperity, and with a view to the future we can have **a firm confidence in our faithful God and Father** that no creature shall separate us from His love, for all creatures are so completely in His hand, that **without His will, they cannot so much as move.** (Emphasis added.)

¹³⁵ **Question 60:** How are you righteous before God? **Answer 60: Only by true faith in Jesus Christ.** Although my conscience accuses me that I have grievously sinned against all God’s commandments, have never kept any of them, and am still

So in this (deficient and weak) faith, I continued to apply for positions in the Lower Mainland of British Columbia, by mail and by personal visits. The Greyhound bus took a day and a half, via Watson Lake, Dawson Creek and Prince George. It was possible to match some of these trips with CHP Board meetings, and I was billeted with various families. But I had to travel by bus from Surrey to Vancouver and back, because most consulting firms were based there. I was told that a new provincial initiative was in the works, to build many new highways. This anticipation of “**plenty of work**” of a highway engineering nature lured me to the Lower Mainland of British Columbia Vancouver, rather than returning to Alberta, where we still had a rented out house but where things had been lackluster if not grim since the time we left. Even before my “firing”, I had applied for various positions with consulting engineers, the MoTH and municipalities. I had even once applied to MoTH during a meeting of the VWD Committee, Around May 1989, **Mr. Terry Anstey** of Crippen Consultants in Vancouver told me: “**We will surely hire you, but only after you have come to BC.**” Obviously no moving costs offered by the private sector!

O yes, we had to move down at our own cost, unlike the Yukon Government paying \$ 8,000 for our move to Whitehorse in Oct./Nov. 1983. We were very glad to hear that White Pass & Yukon Railway had a special deal in those days: **\$ 1000 for a container of household goods**, from Whitehorse to anywhere in the Lower Mainland. We had to pack one of their containers (for narrow gauge; I do not remember its actual size) and that would be picked up, trucked to Skagway, put on their “Frank H. Brown” container ship, which would dock at North Vancouver. “Just phone us with the delivery address, when you can; we do everything!” were Mr. Ken Steele’s words. We were loaded with cash when suddenly leaving YTG – see above for the gilded handshake details. Although I had more than 5 years and 2 months locked in as “pensionable service”, Lydia and I decided not to become “locked in” and rather receive a cash payout, which together with all the rest, we put into mutual funds with Peter Scott, the financial planner who had an office in the Hougen Mall. Lydia received more pay when acting as Library Supervisor for Faye Deer for a while. My building project was still far from complete; I knew that quite well.



Driveway from the cul-de-sac of Larkspur Drive.



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I had obtained City of Whitehorse building and plumbing permits (for \$300 and \$48 respectively) and paid Yukon Electric a \$695.46 “Installation Charge” in December, and then \$79.72 (total) for January to August, with a temporary connection taken over from Al for \$75. The septic system, the driveway off the cul-de-sac, the special plywood foundation walls (with tar on the outside) and the concrete basement floor had been completed with some main floor outside framing, when we unexpectedly sold our house in late July 1989 to a NorthwesTel employee who had been transferred from Yellowknife. His house had burnt down there; with his transfer and insurance money, he and his wife had already ordered all new furniture, said Keith Dye, and they wanted possession on the 15th of the month! We had to be out by then. And a month later, (in Delta, BC), we sold 3 Larkspur Drive “**as is**” (with materials on site) for \$ 37,000 to John and Thelma Bonnefoy, and had all the documents faxed (**a novelty!**)

inclined to all evil, yet God, **without any merit of my own, out of mere grace, imputes to me the perfect satisfaction, righteousness, and holiness of Christ.** He grants these to me as if I had never had nor committed any sin, and as if I myself had accomplished all the obedience which Christ has rendered for me, **if only I accept this gift with a believing heart.**”

¹³⁶ North side of the uncompleted house, with access pipes of the pre-installed septic system in the foreground.

¹³⁷ South side of the uncompleted house, showing the red Matador wagon on the driveway.

through a notary on Scott Road in Surrey. Faxing these papers had just been approved as “legal”! The “Funds due Vendor on closing” that we asked Walters & Walters to deposit into our Whitehorse Bank of Montreal account¹³⁸ was \$ 24,391.81, after the payment of their \$ 257.35 fee and the Real Estate Commission of \$ 2,590.00. (Our property tax for 257 days was \$412.44.)



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But after my position as Program Engineer III was made impossible in January 1989, I also continued as **Vice-President of the YTMS**, (without a President, as Vern Toews was Past-President at the AGM of 17 April 1989, and Flo Whyard also attended), though I made it clear to the other Governors that I would leave Yukon as soon as Lydia and I sold our house, and that was regretfully accepted, so I accepted the presidency with that condition.¹⁴¹ By that time, Ed Campbell had become our Building Coordinator, Harry Lowry¹⁴² and Jim McManus had joined, and Ron Pond attended as YTG Anniversaries Commissioner.¹⁴³ Elsie Fleshman attended as representative of the Frostbite Society, our major seasonal tenant. (I do not know for how many more years they rented the Ice Palace.) Even with an otherwise unemployed, very busy and job-seeking President, the lame duck society remained afloat, and during that first half of 1989, much work was actually done by the YTMS. We applied for and obtained additional territorial funding for a contract to **remove the asbestos insulation** around the water mains under the floor of the gym. One day, I crept into all the tiny corridors under the floor of the gym to measure the total length of the asbestos covered water main system! The Society obtained its Charitable Status, and a grant was also applied for and received to hire a part time (2 years) Executive Director. After we had interviewed various candidates, Steve Zimmermann was appointed into the position, occupying a rented office in the T.C. Richards Building. For me, this meant no more home writing of Agendas and Minutes and Correspondence on my Commodore 64 based system! While I was away in BC, Richard and Brent held the fort magnificently.

My last Board Meeting occurred on 1 August 1989, just after we had sold our house. For that occasion, Steve had prepared **Newsletter # 1** and a letter asking former members to rejoin, so that the “long set goal” of opening a Museum could be met. To these were attached a **Message from the Outgoing President**, see **next page**. In its

¹³⁸ We had not yet opened a bank account in the Lower Mainland. This gesture was much appreciated.

¹³⁹ Outside framing of main floor just being started.

¹⁴⁰ North side showing progress with outside framing.

¹⁴¹ On 16 January 1989, Flo Whyard was appointed administrator for the Yukon, and she was sworn in on 24 January. As she would be busy in that position (under the Commissioner?) this was perhaps why she could no longer be YTMS President for a while. But she was elected again as President after my pro tem position ended!

¹⁴² Harry Lowry later became President, and remained in that position for many years.

¹⁴³ Two major celebrations were being envisaged for 1992: (1) The half century of the Alaska Highway (with a drive through) and (2) the half century of the Northwest Staging Route (with a fly by.) The 90th birthday of White Pass was also getting closer, and YTG took note.

first paragraph, I recalled my first time becoming exposed to a real life story about the Canada's North, in 1977, in which I made a **mistake**. My reference to the **1935 National Geographic Magazine's Expedition** was what a lady had told me during one of our initial meetings in the McBride Museum. **She had given me the wrong year, and the time and direction of the journey as well.** After quite some searching all over (in books and magazines, and more recently on the internet, I found **the real thing** on 2021-06-06, and the details follow on the next page. It is quite a story! Very fortunately, nowadays, at <https://franceslake.ca/history.html>, anyone can read the following about it, in the history of **Frances Lake**:

Message from the Outgoing President.

Dear Members,

In 1977, prior to coming to Canada, my family saw a movie about Yukon. A husband and wife, with two children, went on a few weeks' bush-whacking expedition, living off the land, and were later picked up by a float plane at a previously arranged location. Little did we know at that time, that we would spend almost six years in Yukon ourselves.

This movie is part of Yukon's transportation history: In the fall of 1985, when the initial YTMS meeting was held in the basement of the McBride Museum, I learned that it was made during the 1935 National Geographic Magazine's expedition in the Watson or Francis Lake area. Meanwhile, our stay in Yukon has also become history, as our family expedition moves on.

I feel privileged to have been involved in the dream of a Transportation Museum, which, as you can read on these pages, is being realized rapidly. I would like to thank those who were part of that dream for the past four years, the few die-hards who saw things through with me, maybe not as efficiently and as speedily, but with the enthusiasm. Come to think of it, quite a lot was accomplished.

I would challenge you to continue bringing this exciting project to completion, with many more new and returning members, with volunteer brains and hands, as well as with Steve Zimmermann, who I would like to congratulate with his position. This museum can and will be a main attraction for many years to come: for tourists to see and walk through, but for Yukoners to understand.


Jacob de Raadt, President.

1989-08-02

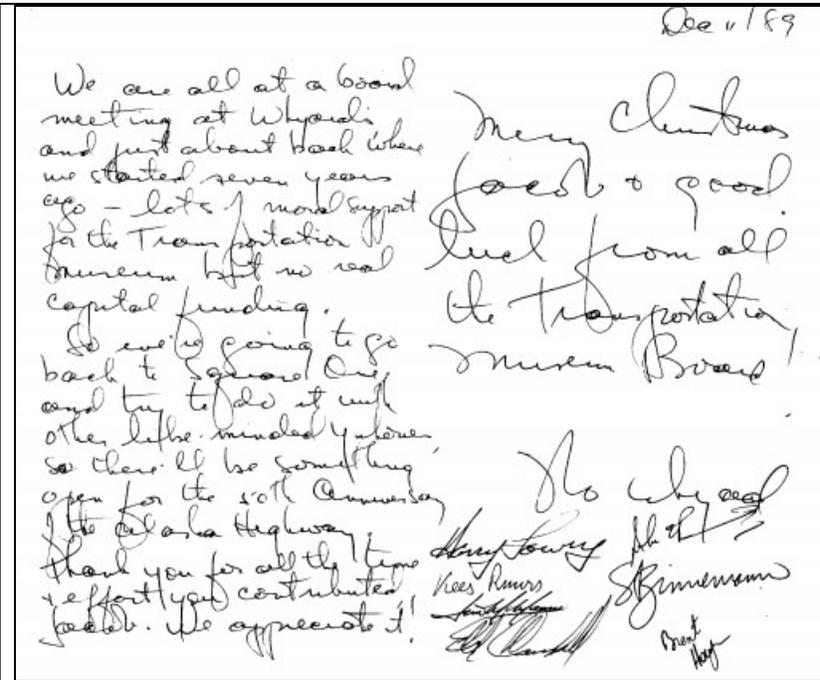
"1942 Travelogue of a family: William Hamilton and Ruth Albee write in their paper, *A Family Afoot in Yukon Wilds*, published by the *National Geographic Magazine*, about their foot journey from Watson Lake to Frances Lake and back. On their trip, which lasted several months, they were joined by their children, Billy (8 years) and Jo-Evelyn (5 years), and lived largely off the land. The text and photos display a very interesting picture of the area from 70 years ago."

The story about the Albees' **first hiking trip north**, (from Prince George, BC to Dawson City, Yukon) in the summer of **1930**, and that their second trip (Watson Lake - Frances Lake - Watson Lake) with two children: Billy (born in Fairbanks, Alaska) and Jo-Evelyn (born in Wales, Siberia) was only made after **"In 1940, the National Geographic Society sponsored the Albee family for a return trip to the north. The story of that trek was published in the May 1942 issue of the National Geographic"** must be added here as in important detail.

This information is now available at <https://explorenorth.com/library/bios/albee-william.html> In that article is also the confirmation of my view: It states **"For a few years starting 1941, Ruth Albee travelled across North America with a colour film about the 1940 trek, entitled "Family Afoot in the Yukon Wilds."** This must

have been the movie that Lydia and I, with our four children saw at the Transvaal Museum on Paul Kruger Street in Pretoria in 1977, after we had already received tentative approval of visas, depending on a job in Alberta or BC. (The fact that this was actually “discriminatory”, had not dawned on us at that time, nor for many years since!)

After we had left Yukon, the YTMS kept track of us, and that was nice. At **left** is the 1989 Christmas Card from 1989, in Mrs. Whyard’s handwriting and signed by all during a Board Meeting. For a few years, I was also sent copies of a nice looking **The Transporter**, the Official Newsletter of the YTMS.



The Museum opened (as planned earlier) in the summer of 1992, and has been open since then. Only our daughter Sara has once returned to Whitehorse with her husband Don Dowling; obviously, they visited the Museum. Over the years, I have heard that this Museum became a reality and serves all Yukoners alike, as well as tourists from all over, at a very visible location. My treasured artifact of the YTMS is a hard plastic (?) **GOVERNMENT OF THE YUKON TERRITORY** briefcase, given to me by Vern Toews,



when relinquishing his position as YTMS director; he may have used it as YTG’s Electrical Inspector. (I never had one of those when employed in Yukon or anywhere! I also have an actual **Yukon road sign**, featured on the **front page** of this “Part 4”. Please figure out for yourselves why I consider this an important artifact, every time I look at it!

Only once we had sold our house, we obviously sighed with relief, and I decided to take Lydia on a vacation to Dawson City, where we drove up ◀ to the Midnight Dome and then also visited the **dredge at Bonanza**. This was the first and only time that Lydia went further north than Carmacks. (She had been west to Beaver Creek on our trip to Anchorage.) We also visited a family that farmed near the McQuesten River Bridge

on the Klondike Highway, an acquaintance of Dan Budd. Those families attended Hillcrest Bible Chapel and they were CHP members. In the group of that chapel was also Roger O’Brien, whom we later re-met in Langley, where they attended Cloverdale Bibleway Baptist Church. He handled a few “hand digging” projects for my firm Grass-



roots Consulting Services’ clients in the late 1990’s; in 2008, his son Silas was killed in a “road rage” incident on the busy 16th Avenue.

◀ 5 Bamboo Crescent, Porter Creek, Whitehorse.

3 Larkspur Place, Mary Lake Subdivision. ▶

(Both 2009 GoogleMaps imagery.)



From the Whitehorse Star: “**July 17 - August 28, 1989: Record-breaking temperatures cause record fires requiring help from outside the territory.**” **This is when we moved!** The last night in Whitehorse, we slept in Al and Margriet’s brand new house; they went somewhere else on vacation. We had already started packing the container, and gave away several things we thought we would not need. Plonia stayed behind as the Night Manager at the Sheffield Hotel, (a well paying vacation job), and she boarded at the Reimer family. The day we left, we turned right before Watson Lake, entering BC on Highway 37. On the boundary between Yukon and BC, we stopped; ceremoniously, I shook the sand from my sandals¹⁴⁴, and we got back into our two vehicles and drove as far as **Boya Lake** Provincial Park. Both Sara and Joss had a Yukon learner driver’s license, so Lydia and I were never in the same vehicle. The next day we drove to **Tyhee Lake** Provincial Park between Smithers and Telkwa. Most of Highway 37 was still gravel at the time, but Highway 16 was paved. We visited the van der Linde family again and also the lady whose husband had been killed in 1988 when driving to Whitehorse **for the second time**, with a truckload of cabbages). At the campsite, the loons were just fantastic, and the following day, we drove to **Tabor Lake Regional Park** east of Prince George. Lydia and Sara were to stay there while Joss and I made a “side trip” to Edmonton to pick up some of Plonia’s personal belongings (including a bookcase) at the dorm of The King’s College. Joss and I slept one night in the pup tent in a City Park on the south side of the North Saskatchewan River, and returned to where Lydia and Sara had seen the weather changing to overcast with rain and then more rain. Through Prince Gorge, we went south to Miff Crommelin’s cabin at **108 Mile House** – where we slept inside (but it was moldy!) From there, we made it to Chilliwack in one day, and it was pouring rain west of Hope. We saw torrents of water coming straight down the cliffs on the Highway 1 twinning (which was under construction near Jones Lake). In downtown Chilliwack, we bought some pizza at Panagopoulos, and decided to phone Jacques and Henny de Vries. We were invited to park our soft-top trailer (which we had bought from them in 1978, was old and has leaking canvas) in their garage, and sleep inside the house. We had kept a bit in touch with them, but had lots to talk about. The day after that, we made it to Surrey, where Bert Vane’s mother Wilma suggested that we go to the campsite at the **Brownsville Pub** (which had hook-ups) for two weeks and start looking for a house to rent for September. That site was almost directly below the (uncompleted) Skytrain bridge.

To rent a house on short notice has perhaps always been an awful chore, and so it was for us. While our container was on the water down the Inside Passage, we found a house at **11941 – 75A Avenue, Delta** (just west of Scott Road) and planned to move in with everything we had, also notifying WR&YR that our container had to be delivered at that address a.s.a.p. In the campground, we saw the weather changing, with early fog over the Fraser River; we were next to the water. By the time the container arrived, it was pouring a lot. The house was just a plain square box, south facing, with five small bedrooms and a single attached garage. Two bedrooms were downstairs, and from one that I used as my office, I directly applied for a phone and for APEGBC membership, and recontacted all the consulting firms, by phone and mail (with dot-matrix printed letters.) On 12 September, we received a phone call about a fax to be picked up at a notary office on Scott Road. This was a formal offer for 3

Larkspur Place “**as is**” to John and Thelma Bonnefoy for the price of \$ 37,000.00, and I accepted this offer, so that the sale was completed through that notary, by fax. We were quite relieved about this! The cash proceeds from our Whitehorse properties were soon transferred into a new Bank of Montreal account in Delta. On 8 September, we had already driven to “stock up” on some basic foods, at the firm that supplied Chechahko Consumers’ Co-Operative Ltd., on Vaness Road in Vancouver. The **next page** shows what we purchased, and the (wholesale) prices show what could then be bought for **\$ 139.12**, so much more than nowadays!



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¹⁴⁴ According to Matthew 10:14, “And if anyone will not receive you or listen to your words, shake off the dust from your feet when you leave that house or town.” Lydia took that black-and-white photo with my first Bilora box camera, in 120 film format. This type of film can no longer be developed, and **the film is still in the camera!**

¹⁴⁵ This is what 11941 – 75A Avenue looked like in 2020. The exterior has been vastly upgraded since 1989.

CUSTOMER ORDER NUMBER		DATE ORDERED		TERMS			SHIP VIA		
JACOB		SEP06/89		CASH			PICKUP		
PRODUCT CODE	PRODUCT DESCRIPTION	CASE SIZE	QUANTITY ORDERED	QUANTITY SHIPPED	CASE WEIGHT	CASE PRICE	EXTENSION	PRICE PER	SHIPPING WT(lbs)
10010	Tomato Paste, SunPic	48/156ML	1.00	1.00		22.56	22.56	0.47	24.30
16415	+Plum Good Rice Cakes Bckwheat	12/1856	1.00	1.00		9.96	9.96	0.83	6.00
16420	+Plum Good Rice Cakes Millet	12/1856	1.00	1.00		9.96	9.96	0.83	6.00
18050	Papaya Spears, Sulphured	1/5KG	1.00	0.00		18.00	0.00		
22050	+Oats Rolled, Quick Cooking	1/10KG	1.00	1.00		13.60	13.60	1.36	22.00
70048	Peppercorns, Black Whole, BULK	1/454G	1.00	1.00		5.10	5.10	11.23	1.00
26045	Peanuts Roasted, No Salt Unbla	1/11.34K	1.00	1.00		23.00	23.00	2.03	25.00
32070	Comm Long Gr Brn Rice (25#)	1/11.34k	1.00	1.00		10.75	10.75	0.95	25.00
36110	+Fruit Leather Apple-Peach	36/156	1.00	1.00		10.62	10.62	0.30	1.50
36130	+Fruit Leather, Tutti Frutti	36/156	1.00	1.00		10.62	10.62	0.30	1.50
44005	+Honey, Unpast White #3 Sa	1/3KG	1.00	1.00		7.35	7.35	2.45	7.00
38172	* SPICY Refried Beans, L.Bear	12/454gm	1.00	1.00		15.60	15.60	1.30	14.00
\$136.15 CREDIT ON ACCOUNT DEDUCT FROM THIS PAYMENT									
SUBTOTAL							139.12		

But I remained entirely unsuccessful with applications to all those “major consulting firms” who had promised to hire me “as soon as you arrive”. Why? What had changed from when they had promised me? Was it *politics* perhaps? Yes, unfortunately, as it proves to be so often: Page 172 of Michael Kluckner’s book “Paving Paradise” published in May 1991, contains the following statement about the Lower Mainland’s **transportation challenges** in those days, and how it was (in his view) almost impossible to be addressed by the government(s) of the day:

“The misnamed “Freedom to Move” report of the **Greater Vancouver Transportation Task Force**, released in the summer of 1989, demonstrated the cost and complexity of the problem. Although most of the growth of the region is expected to occur in the suburbs on both sides of the Fraser River, nearly half the jobs in the Lower Mainland will be created in central areas such as Vancouver, Burnaby and Richmond, encouraging a great increase in commuter traffic.” *(meaning no new highways....?)*

I received all kinds of excuses from these large consulting engineering firms: “We did not get a specific contract we were expecting to get”, “We submitted our proposal a couple of months ago, and have not heard anything from Victoria”, and the like. I also had an interview with **Robin Johnson, P.Eng.**, a fellow former South African, (who had already left South Africa before me, and had been an elected Junior Director of the SAICE). This was held in his DELCAN office at 604 Columbia Street, New Westminster. Showing me some sketches of their proposal for the interchange between Highway 91 and Highway 91A on Lulu Island, Richmond, he then asked me whether I was interested in a career in “**engineering management**” or in “**engineering design**”. I actually found this a very strange question, one which I had never heard before (and I told Robin that), and I continued to respond that I had

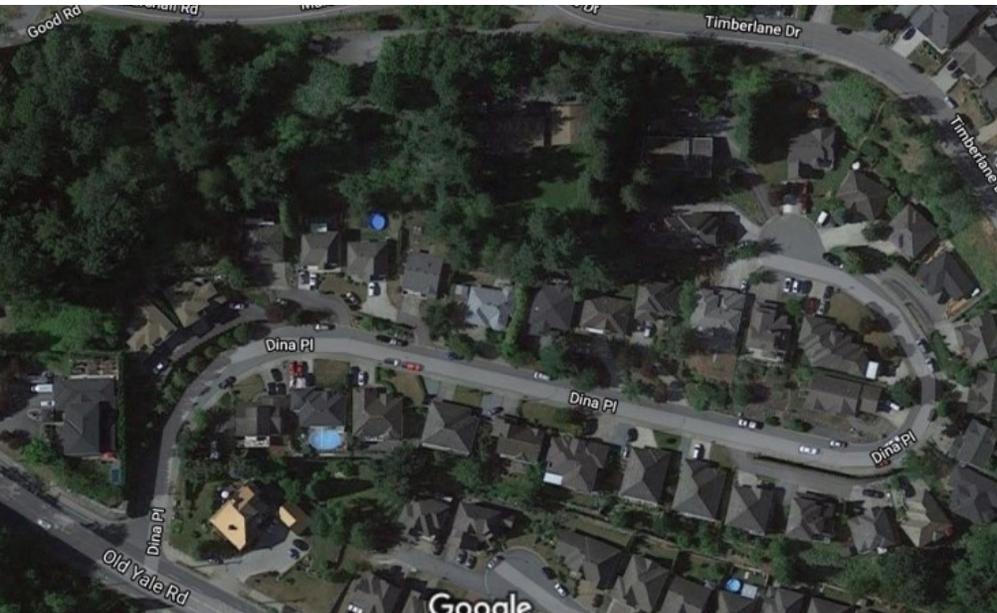
(4) Walking through the neighbourhood, we noticed (**and liked!**) Jarvis Elementary School nestled in the middle of a street block ▲ between collectors (116 & 119 Street, 75A & 78 Avenue), making it very pedestrian safe, and in line with the design principles outlines in J.B. Floyd’s textbook that I had used in South Africa. (See “Part 1”.)

(5) We joined the Maranatha Canadian Reformed Church, and were built up by good expository sermons by Rev. G.H. Visscher, good singing and organ music, and fellowship with several of the members who lived close by.

Our children grew into **tall people** in Yukon. This is a genetic trait, and our nine grandchildren are also of “above average” height. There are advantages and disadvantages to this situation, which one has to accept from the Lord, who said in Matthew 5:27: “*And which of you by being anxious can add a single hour to his span of life?*” (which can supposedly also be understood as “*a single cubit to his stature*”) and of which the opposite is also true, although some people – particularly women – sometimes wish that they would be shorter. Most of us want to be younger, I guess, but let’s return to what I did when being about half my current age!

Chapter 3 – Head, Transportation and Planning, CVES, Abbotsford, B.C, (1989 - 1990).

Only when I started to look further east from “home”, I found work with a small consulting firm called **Central Valley Engineering Services Ltd.**, in Abbotsford, owned by **Mr. Jan Schouten, P.Eng.** He told me that he wanted somebody “**immediately if not sooner**”, to develop a concept layout with a preliminary cost estimate for a proposed subdivision off Old Yale Road. The client (land owner?) was a contractor/developer with the name **Progressive Construction Ltd.**; it was a challengingly odd shaped site with steep slopes that needed various retaining walls. By this time it was the end of September, and I said “**Yes, I’ll help you, and start tomorrow**”, and this is how I became an employee in the office on Montrose Avenue in downtown Abbotsford, next to the former Greyhound Depot that had been converted in a BC Hydro office. I left some other applications pending, did the job in a about two weeks “**full-bore**”, and Jan was so satisfied with the results that I remained there with some nice



sounding title “**Head, Transportation and Planning**” on newly printed business cards, and a little brochure (see the **following pages**) with specific duties and functions, particularly for the subdivisions in Surrey, because “**isn’t that where your home is?**” (!) This “home” was more than 50km away, and although I was paid for business travel, by using 64th Avenue in Surrey and 56th Avenue in Langley, staying away from freeway gridlock, it took me more than an hour every morning and every evening. That was just too much! Very soon, we started to investigate buying a house closer to the office, but still on a school bus route. We found one soon.

This ▲ is the site of the project for which I did a conceptual layout and a preliminary cost estimate: **Dina Place**.

We purchased a house at **3493 Picton Street, Abbotsford**,¹⁴⁷ and moved in at the end of November 1989, paying a rent of \$ 850 for that month. Buying this property was actually a poor choice, seeing the precarious salary situation and the lack of progress to a salary level – and job responsibilities – where I had been before. This house was “**of a custom contemporary design and there are very few similar houses in the area,**” stated an Appraisal Report of 1 November 1989. It was too small for us, even before finishing the south half of the basement (which we did, in 1990) and the backyard had no afternoon sun at all during both summer and winter, due to a huge row of maple trees just off the back lot line, and had no garage. It was accessed “over the saddle” (via Saddle Road!) and very foggy and overcast in winter; Lydia would notice the sun shining everywhere else in town, except where we lived! We were welcomed by the family across the street, with whom Joss later boarded while working for Motorcade. But the neighbour to the south made us very **uncomfortable** from the start. More about this, and about the “non-conforming shed” situation, in “Part 5”, D.V.

In Delta, Lydia had applied for an “on-call” position at the Surrey Public Library. Only after moving, we heard that she could go and work there, but had to drive many kilometres for a few hours of paid work. (Surrey was not affiliated with the Fraser Valley Regional Library system, to which all other jurisdictions belonged.) So that was out of the question. Moreover, many members of the Abbotsford Canadian Reformed Church saw us as “not belonging”, due to having come from far away like Yukon “where there is no church”, (even via Surrey) and said so. But yet, we made some friends in church, and participated in Bible Studies and the choir.

¹⁴⁷ This was located within the District of Matsqui at the time, before the merger with the District of Abbotsford.

Two other Surrey projects need to be mentioned. Both subdivisions were eventually completed, i.e. **four lots in Fleetwood** and **fourteen lots on 132 Street near 96th Avenue**, each with particularly challenging situations:



◀ Two lots in this four lot subdivision have no access from 168 Street just south of the Fraser Highway in Fleetwood. The developer, a Mr. Nick Adams, had a glass business in Mission Industrial Park. The large BC Gas main ran skew across the site, restricting one lot's building envelope. Progress was complicated because another subdivision next to it had to be completed first by building the lane. This project file had already arrived on the "second pile"

(see below), and I was introduced to the Surrey Engineering Department staff, mostly in the Land Development Division, hearing the phrases "**Engineering Servicing Agreement**" and "**Latecomers Agreement**" for the first time. ("**Development Cost Charges**" I had heard when applying to the Township of Langley.) One engineer in the Transportation Engineering Division had studied a course of Project Scheduling with me at the University of Calgary. I only met Mr. Adams twice; once in Jan Schouten's office and once in his office in Mission. The project was likely completed by CVES after I left, but I am not sure. Every municipality had its own rules at that time, as this was before a level of consistency was developed by the MMCD and drafting technology. At CVES, everything was still hand-drawn; and (as I later learned) it was very time-consuming and unproductive to do work in more than one or two jurisdictions. Since 2001, some things have perhaps not really changed that much.



CENTRAL VALLEY ENGINEERING SERVICES LTD.

Consulting Engineers 2469 Montrose Avenue, Abbotsford, B.C. V2S 3T2 Phone 853-0303
Fax 853-1916

1989-10-30

TO WHOM THIS MAY CONCERN

This is to confirm that Jacob A. de Raadt, P.Eng., is presently employed by Central Valley Engineering Services Ltd. in a full-time permanent position, without probation and without a foreseeable layoff, at a monthly salary of \$27,500.00.

Jan Schouten, P.Eng.

◀ The salary that I was offered in a letter of 30 October 1989 was only \$ **2,750 per month**, which was much less than what I had been paid by YTG. In fact, it was the same as what I had been paid by UMA when I was "let go" there in September 1979. But I accepted this salary "**pro tem**". Was I being too stupid or overanxious to get back to work, or perhaps in a panic when seeing all these dead-end roads with the major consulting firms? Was CVES not a dead end in itself? Was I perhaps "underselling" the skills that I had (or thought that I had)? Was there any possible chance of a bit higher salary at CVES, in the future?

Or ... was it God's plan to teach me (and lead me to) something that I could never have foreseen at all? Did this lead me into something much better **eventually** (meaning at a time I did not know)?

Jan Schouten's qualification was an H.T.S. diploma (Hogere Technische School) from the Netherlands, with which had come to Canada and registered with APEGBC. The main floor office suite of CVES was on the north side of

the long hallway in a rectangular 2-storey building in the (former) Village of Abbotsford. Jan's main floor office faced Montrose Avenue ▼ with two windows, and he had a large desk in the middle of it, with old drafting tables on three sides, loaded with rolls of drawings. **Tom Windt, P.Eng.** had no personal office, and neither had I and the



others namely **Rick Celinski, E.I.T.**, another UBC alumnus, and **Jamil Salman**, who had studied at a University in Beirut, Lebanon, but recently also at Arizona State University in Mesa AZ, where he had obtained an M.Eng. in structural engineering. APEGBC required that he obtain an English transcript of all courses at the (French language) University, which would cost him much, and he was still weighing the options. (I found this discriminatory, suggesting to Jamil that he move to Quebec or New Brunswick, (Canada's only fully

ly bilingual province) and register there first, before returning to BC and then transferring his P.Eng. status, but his wife was pregnant at the time, so moving was not possible.) Jan's married daughter, Trudi Enns, occasionally did some drafting (which was by LeRoy and mylar, and she talked to all the local realtors and developers and house builders when Jan was not available. This had probably been done for several years. There was also a survey crew, who had an equipment room behind our "big room", and they accessed from the rear of the building. There were some computers for word processing, with green screens; the brochure was made on that system, and I did my project correspondence and even invoicing. A new young drafts lady started while I worked at CVES; while I do not remember her name, she had a Hyunday Pony, the first one that I ever saw. When I started to use the local bus system, I discovered that it was very convenient, driving straight by our house on Picton Street, on a good schedule! And I remember that it rained almost every day, with a leaking gutter on the north side of the building, and a mouldy smell.



◀ A request to develop a site on 132 Street just north of 96 Avenue came to us from a realtor in Vancouver, who asked us "up front" if we were able to complete the project before Canada's GST kicked in, which was **1 January 1991!** When the concept was developed and I presented a sketch to **Ms. Lee-Anne Pitcairn** at the District of Surrey Planning Department staff, she almost laughed at me; they had quite a backlog! **The subdivision application file would go on top of a pile; whenever they drew a file from the bottom of the pile, a memo would be sent to the Land Development Division, where a new file would be placed on top of a pile.** The fourteen lots are of virtually equal size, and I was told by Planning Department staff that somebody at CVES (meaning me) had to liaise with the owner of the corner property, because the District wanted to eliminate its direct access off 132 Street, being too close to the traffic signal. This was a good engineering idea, I thought. This was a Care Home for about a dozen mentally (and/or physically?) challenged people, operated by a male Manager, who also operated an annex on the adjacent property on 96 Avenue. The solution was obviously that the corner lot had to obtain a "**legal access**" off the lane, which was already existing east of the property and planned in the middle of the parcel, as the new lots would also not have any access to 132 Street, a Major Collector. Surrey was proud of its

system of lanes at the time, before they fell in disgrace. This project was probably not completed by Central Valley Engineering Services Ltd., and definitely not before Canada started its General Sales Tax! But by doing this urban planning work, I met many people whom I would never have met if I had done work in Masque or Abbotsford alone; this assisted me tremendously when starting Grassroots Consulting Services a mere three years later. That's how the Lord provided. I am not sure if I realized it at the time.

Jan Schouten sent me to **Mr. Gaff Larose, P.Eng.**, who had a single office at the suite of **Lammerts Land Surveying Ltd.** near Guildford in Surrey. Giff had been charged with wrongdoing by the Corporation of Delta, (i.e. **Mr. Ross Rettie, P.Eng.**) about **unprofessional conduct** – meaning an **inadequate storm sewer design check** for a small subdivision north of 72 Avenue west of Scott Road (=120 Street), in North Delta. In those days, land surveyors were allowed to handle small and uncomplicated subdivision projects, and Giff and Bill Lammerts had probably done several of them over the years, as the municipalities still required an engineering check of the existing storm drainage, water and sewerage systems. Bill and Jan knew each other well, and Jan (as former em-

ployee of the Greater Vancouver Water, Sewerage and Drainage District) had already promised to defend Giff before I came to CVES. So I was requested to “**check the system**”. I had to get all the information from Giff and from Delta (so I had to drive to Ladner) and discovered that it was not an easy task. Through the years, two storm-sewers had been built on 72 Avenue, both flowing west toward Burns Bog and the new Highway 91 that connects the Alex Fraser Bridge with Highway 99. (More recently, 72 Avenue was cut off from Highway 91.) **On each side of the road was a storm sewer!** But I used my calculation skills from my days in Calgary, and somehow figured it out. It so happened that Giff had made no mistake in calculating the capacity of the **double system**, but that Mr. Rettie (and/or his support staff?) had strangely not been able to understand what Giff had done, and had been a bit **overhasty** in laying a complaint at APEGBC. It may have just been a lack of communication. The maximum flow of the whole catchment area, including this tiny subdivision, was less than the downstream capacities. As my P.Eng. status (by registration with APGEBBC) had not yet been confirmed, Jan Schouten signed, sealed and dated the “response document”, and the **complaint was then dropped**. But when starting Grassroots and meeting Bill Lammerts again, Giff was no longer at the **3 - 14853 – 108 Avenue** strip mall suite. Giff Larose had moved to Hornby Island and practiced there as **Gifco**, and he also became fire chief of that island in the Straight of Georgia until 2017. Much later, I heard that Bill Lammerts closed shop after some suppose “wrong-doing” of his own, and disciplinary action by the ABCLS, and Ross Rettie became an employee of the APEGBC, dealing with professional engineering issues like these complaints. During the 1990’s, I met him annually at the ENCON professional liability insurance seminars. GoogleMaps informs me that in 2020, the Surrey office of the Elizabeth Fry Society of Greater Vancouver occupied what had been Lammerts’ upstairs suite.

A new client, a Mr. Beer, came into the office of CVES. He owned a large parcel of mountainous land near **Lake Errock**, and wanted to develop a lower part of it, adjacent to an existing subdivision with lakefront lots. This needed an OCP amendment bylaw, a rezoning bylaw and the other normal subdivision processes. This project was then in the Regional District of Dewdney-Alouette, which had its offices at the west end of downtown Mission. So



Lake Errock (south).

I drove to their office¹⁴⁸ and spoke to the Planner, who agreed to accept an OCP Amendment Bylaw application for a residential **strata development**. But he told me clearly that we first had to hear what the people in that neighbourhood felt, by way of a **Public Information Meeting**. This was scheduled for January 1990, at the Community Church on Watkins Road off Highway 7, by a newspaper notice plus handbills among the houses in the neighbourhood, and the RDDW Planner would also attend. (The site has a single access off Hodgkins Road that joins Malcolm Road and then crosses the busy Canadian Pacific Railway line with a level crossing.)

◀ Guess what? Most of the ± 50 property owners on Hodgkins Road **did not want this development at all**, and were vocally opposed. It is now still a vacant property; according to data of the BC Assessment Authority; the 2021 Assessed Value was \$ 451,000 and it had been sold for \$ 599,000 on 2021-04-20.



An “idea” came to CVES about using an existing multi-plate culvert on Pratt Street under Highway 11 for developing a vacant lot in the ◀ southeast corner of Highway 11 (Sumas Way) & Gladys Avenue, (the road link between downtown Abbotsford and downtown Mission, via Matsqui Village and the Fraser River bridge.) **Pratt Street through the multi-plate culvert** accessed Maclure Road which is a section line and had an intersection at Gladys Avenue at that time. Nothing happened in 1989 / 90, possibly due to the **3.24m** clearance which is “low”. This short part of Mac-

lure Road is now an unimportant local street to a cemetery, while Pratt Street accesses Gladys Avenue and the site is developed. MoTH’s idea of a link between Highway 11 and Maclure Road (west) was never pursued. Why not?

¹⁴⁸ Since 1995, Lake Errock and Harrison Mills are both in Electoral Area “C” of the Fraser Valley Regional District.



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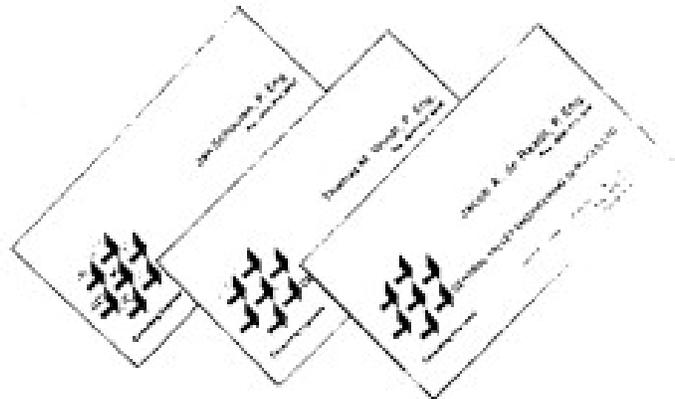
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AN INTRODUCTION TO

- OUR PEOPLE
- OUR CLIENTS
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◀ I was asked to go and supervise the construction of a huge concrete “**manure pit**” at a dairy farm on the east side of **McDonald Road** on Nicomen Island, almost at the edge of the Fraser River. This was also in the Regional District of Dewdney-Alouette, and it had to meet the requirements of the **BC Agricultural Building Specifications** – which are somewhat different than the (normal) BC Building Specifications. A signed, sealed and dated certification for this reinforced concrete work (according to a standard drawing) had to be submitted to the Regional District and also to the BC Ministry of Agriculture at their office on Angus Campbell Road, off Delair Road but very visible from Highway 1. Doing such concrete footing inspections (for house builders) was one of the main activities of CVES in those days, but I was not asked to do one for a house – which would obviously have exposed me to Abbotsford and Matsqui staff.

CENTRAL VALLEY ENGINEERING SERVICES LTD.

Central Valley Engineering Services Ltd. was established in Abbotsford in 1971 by Jan Schouten, P.Eng., who is still its major shareholder and president. Prior to starting this consulting firm, he had been employed for more than 15 years by the Greater Vancouver Water, Drainage and Sewerage District - the present GVRD.

Through the years, CVE has served a range of (mostly private) clients with their Land Development, Municipal and Structural Engineering projects in the Lower Mainland and Central Fraser Valley. We are proud to have been associated with the planning, design and construction supervision of residential subdivisions in Matsqui, Abbotsford, Mission and also further afield, as well as with a variety of industrial and institutional buildings and their utility systems. Our present team of professionals is keen to build on the good relations with our clients, as we expand our scope into some other sub-disciplines of civil engineering.

Jan Schouten, P.Eng. continues his active technical involvement and responsibility of land development projects, and leads the structural engineering activities. For many years, he has served on the executive of the Fraser Valley Home Builders Association.

Tom Windt, P.Eng. has been with CVE for 4 1/2 years. He is a 1983 UBC graduate and obtained two years of construction experience with a local contractor prior to joining CVE. He is responsible for land development projects, and the firm's 1988 CHBA Housing Award for Technical Innovation was particularly due to his excellent design of storm drainage in Fairfield Estates, a 500+ lot subdivision

CENTRAL VALLEY ENGINEERING SERVICES LTD.

We have served clients like:

Wall Financial Corporation, Vancouver:

- Numerous single family residential subdivisions, townhouses and apartment projects over the years, including Fairfield Estates, Clearbrook.

Hoort Development Corporation, Burnaby:

- Single family residential subdivisions, townhouses, apartments and commercial developments through the years, in Matsqui, Abbotsford, Mission, Surrey and Langley.

School District No. 34 (Abbotsford):

- Structural engineering and site works at various schools, over the years.

Fraser Pacific Holdings Inc.:

- Design of Proposed Fraser Valley Auto Mall site, Clearbrook.

Abbotsford Christian Elementary School:

- Structural engineering and site works.

Christian Schools in Duncan and Terrace:

- Structural engineering.

Site works for various trailer parks:

- Larco Trailer Park, Clearbrook.
- Aloha Trailer Park, Langley.

Structural engineering & site supervision for numerous home builders in Abbotsford, Matsqui and Mission.

Al Browns/Dexter Construction, Matsqui:

- Various residential subdivisions and multi-family developments.

Frank Sleigh, Architect, De Roche:

- Structural Engineering and site works for Ford Road condominiums, Pitt Meadows.

I was asked to accompany Jan to an **Information Meeting for consultants**, arranged by the MoTH, for consulting services. Jan Schouten had hired me so that my experience might allow CVES to participate in work for the MoTH, as a few **upcoming Highway 1 projects** needed to be designed and supervised. Highway 1 had not yet become a full freeway by the end of 1989; the interchanges at **Whatcom Road** (District of Abbotsford) and **Yale Road West** and **Annis Road** (both in the City of Chilliwack) were lacking. This was **"up my alley"**! We went to the Rancho Restaurant on Delair Road (next to the freeway) and listened to presentations by Ministry staff, among them Mr. Bill Cunningham, chief engineer for this work. We left with a stack of information on how to obtain a piece of the Socred's highway construction pie, which had had its beginning with "Flying Phil" Gagliardi, BC's Minister of Highways from 1952 to 1972. CVES's brochure had stated what I could do, and I was **quite excited** about this; though it was a bit different than the "Freedom to Move" work for the more urbanized areas to the west.

for Mall Financial Corporation of Vancouver, which has just been completed after nine years of development.

Sick Galinski, M.T. (P.Eng. pending) has been with CVE since his 1985 graduation from UBC. He has been exposed to and responsible for projects in all types of land development.

Jacob de Raadt, P.Eng., has recently joined CVE as Head, Transportation and Planning. A graduate of the University of Pretoria, South Africa, he has more than 22 years of experience as highways & transportation engineer, most recently with the Government of Yukon Department of Community and Transportation Services. He is a Member of the Institute of Transportation Engineers, and also brings his planning expertise to CVE.

Jamil Salnan is a civil engineer with structural and foundation experience who recently joined CVE. He studied at the Universities of Beirut and Arizona, and will be eligible for APEBC registration after the customary two years of Canadian experience.

Central Valley Engineering Services is built upon integrity and trust with our customers - that is why many of them have become "repeat clients". Broadening the firm's base of operations, to provide a wider variety of consulting services, means that the same principles of professionalism can now be applied in a more multi-disciplinary environment. We look forward to assist you with your next project.

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Jan asked me to present him with a **list of prerequisites** to get one or other design, survey or contract supervision assignment from the MoTH. I ended the Year of our Lord 1989 by doing that research, by phoning Victoria and New Westminster offices. **Before year-end**, however, I had joined many Yukoners by a letter to Lynn Alcock at CATS Transportation Services, in opposition to the proposal to remove the **"gold panner"** from the Yukon car licence plates. In 1984, we had made use of an offer for free personalized licence plates; Lydia and I had chosen for **PU4CHE** (Potchefstroom University for Christian Higher Education) because we had both studied there, although not at the same time. We got quite some stares! **"What does poo for chew mean?"** But these free "vanity plates" lapsed after some time; we then received Yukon's first gold panner plates for the Matador and the Omni.

The Whitehorse Star reported about this on **November 29, 1989**: One of the year's loudest public uproars begins with the government's announcement it will change the licence plate design and remove the gold panner from it.

In early January 1990, I received a response from Lynn with **these two tidbits**: “Hi Jacob. Many thanks for your notes and comments on the proposed license plate design. You would have loved the controversy and the multitude of letters to the Minister and the Editor. The review by the graphic artists are similar to those expressed by our humble staff here in Transportation Services. Cabinet will be reviewing the thousands of responses received and rethinking their decision, I’m sure.” (and) “**Ray Magnuson** retired at Christmas. The place won’t be the same without him. Other than that, not too much news. Still finding my new job challenging and learning everyday. I have made some strides but still lots on the work plan. Regards, Al & Lynn Alcock. (Since that time, Yukon introduced the multi-coloured and much better looking gold panners on its licence plates.)

A 1989 Yukon political story, (and a **twist**) must be mentioned here, as it brings together my personal thoughts on one of Canada’s crimes, one that is remembered each year since. The Whitehorse Star reporting show the dates:

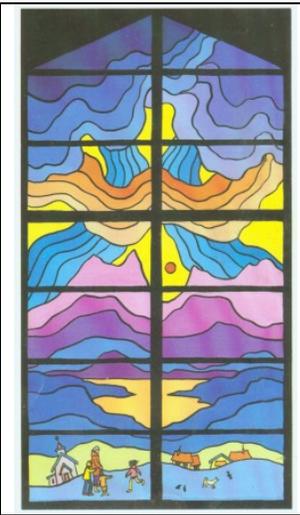
May 24, 1989: Audrey McLaughlin announces to run for NDP leadership. On **December 4th** she became the first woman in Canadian history to lead a federal political party with her victory at the New Democratic Party leadership convention in Winnipeg.

On Monday night, Lydia and I had watched ▲ the CBC National News at 10 p.m. It so happens that on the very next afternoon, Tuesday **5 December 1989**, a certain **Marc Lépine** went into a mechanical engineering class at the École Polytechnique in Montreal PQ, where he shouted that he was “fighting feminism” (according to Wikipedia), opening fire on nine female engineering students, killing six of them, and later killing eight more women and wounding six other people (including four male students) and eventually also committing suicide by gunshot. This “École Politechnique Massacre” is still being commemorated annually. Without a Public Inquiry (as a “Search for a rationale”) all kinds of reasons were investigated, psychological, his upbringing, his love for violent movies, etc., but in **June 1990**, a **possible link to what had happened the previous evening** had yet to be mentioned.

I worked in Nanaimo at the time of the “**search for a rationale**”, for Chatwin Engineering Ltd. and one of that City’s two newspapers had an **editorial** about this case. In response, I then wrote a letter to its Editor, opining that perhaps this anti-feminist sentiment in the sick mind of Marc Lépine might have been fueled by watching TV on the evening of the 4th, bringing his hatred “over the top” as a trigger, and leading him to the École the next afternoon. He may well have been an ardent NDP supporter, and when he watched TV and saw that the Yukon MP had become the party leader, he may have become so disgusted with the situation (his name at birth was Gamil Gharbi and he had an Algerian father, so he was likely a Mohamedan) that he decided “**That’s it, and no more!**”

But my letter was “edited” by that Nanaimo newspaper editor, and what was printed a few days later was a **disgrace to journalistic ethics**. It (a) took out several portions of my arguments, (b) the lines that were printed did not make sense, and even more, (c) they made a fool out of the writer and proved that the editor did not understand my view at all.

Jan asked me to do construction inspections for various **industrial steel structures**. A Cali-fornia firm, Hoektra (?) was importing the steel into Canada (this was before the Free Trade Agreement) and local construction firms then just built them as they unloaded truckloads of beams, columns, crossbars, cables, bolts and nuts, sent from a depot in Lynden WA. I inspected **five** of these; the **first** one a large “lean to” of a steel factory on Annacis Island, Delta, where Wolverine Copper made water pipes, close to Silver City, Nick de Raadt’s galvanizing plant. A year or so later, a huge row huge erupted when “Type K” copper pipes (which had been installed inside the interior walls of many houses) started to get “pin leaks” and it was determined that the wall thickness had been “not meeting code”. This might have caused multiple class action suits for damage to houses where drywall had to be replaced. Wolverine then decided to remove the plant from BC, which caused an uproar and even a road blockade before Customs at the Peace Arch border crossing.



Back to 1989/1990. Just before Christmas, we received another Yukon tidbit – the card from the YTMS Board of Governors, with Ted Harrison’s wonderful stained glass window, made for ◀ Whitehorse’s Anglican Church on the front.

A **second** site was a factory at the very west end of Twigg Place, on Mitchell Island, Vancouver, accessed from Knight Street. That factory has been torn down recently, but it was just south of the **red marker** at right. About 15 years ago, when GoogleMaps started, I pointed out this fairly small factory building to colleagues in Arizona; Canada Rice Mills must have been built since that time, as GoogleMaps now shows its large building. (TransLink’s Canada Line has a single column at the very west tip of Mitchell Island.)



West end of Mitchell Island.

A **third** factory was in the City of Coquitlam, accessed off United Boulevard, behind an existing piled concrete frame **office block**, that had been built on Vancouver’s former garbage dump– allowing for methane ventilation below the floor! But the new building was a **truck repair shop**, designed as a light steel structure on a heavily reinforced concrete slab that was supposed to be flexible on top of the compacted rubbish mixed with some clay. My job was to check that bolts had been torqued, wind braces and steel cables had been installed in terms of the detailed engineering “shop” drawings, and reporting to the municipalities, which I faxed. Unfortunately, I cannot remember anything specific about the other **two sites**, nor where they were.

I completed my list of requirements for Jan Schouten. The first of these was that CVES would need to present proof of **Professional Liability Insurance** for each of the professionals that would be working on any of these “projects”. That information did not sit well with Jan at all, and he balked: “For almost 20 years, my firm has never had any professional liability insurance policy; I do not want it now, I want to keep this firm small”, was the response that he gave me. He told me this while having lunch in the **Amsterdam Restaurant** off South Fraser Way, almost opposite the District of Matsqui Municipal Hall. (He was the owner of that establishment, and often went there to meet with Matsqui employees and politicians. Trudy also did the books for the restaurant, and sometimes had to borrow from CVES to pay AR, and the other way around!)

In February 1990, Jan told me that due to the lack of any possibility of MoTH work, CVES would not be able to afford an increase of my salary. Sorry! As if this was my fault? A few weeks later, I told Jan that my job description was an **empty shell**, and that though inspecting the shells of steel buildings and manure pits, while interesting, was not what I had been trained for and done before. I said this just after receiving a quite unexpected phone call from **Mr. Terry Anstey, P.Eng.** of Crippen Consultants in downtown Vancouver, offering me a three-month contract with one of their sub-consultants, **Chatwin Engineering Ltd.** in downtown Nanaimo (on Vancouver Island). Jan accepted my statement stoically, wishing me well, and we left each other in good spirits and without any bad feelings by the end of March. Lydia and I sometimes happened to see him during performances of the Vancouver Welsh Male Choir, of which the Director had a black skin and hailed from ... Jamaica.

As you, dear reader, may already have noticed, “Part 4” does not end in December 1989, but overlaps a few months into 1990. This difference from Parts 1, 2 and 3 is intentional, because the variety of seemingly menial and unimportant work (that I had not been acquainted with before) at CVES, cannot be broken down accurately. I may have made an error or two in the chronology of the projects in which I was involved, or even an omission or two. I recall that I had some input into the lot layout east of Old Clyburn Road (**Sandy Hill Road**), and heard about a Clearbrook subdivision built on a previous garbage dump (**Dehavilland ...?**). It was in 1990 and the following five years that many things happened in my career, to be recalled in a future “Part 5.” Whether these things were all good, you may then decide for yourself. But whether they were destined by God to happen to me, is quite sure. As Job said in Job 2:10, and also to us: “**Shall we receive good from God, and shall we not receive evil?**”

Conclusion.

At the end of 1989, I had completed **twenty-four years** in the profession, and had honestly not accomplished what I had envisaged when climbing the stairs of the JBS building to start work on 2 January 1966. I had a lot of technical knowledge and expertise in various sub-disciplines of civil engineering, in both the private and public sectors, and in a research environment. I had experienced unemployment two times (and a bit!) I had used the acquired skills from my studies in business administration (= management) in “how to be a better engineer”, and had ended up by inspecting concrete manure pit walls (not that there is anything amiss with a requirement checking them.)

Was I at that time satisfied with what I had achieved? Was I happy about the situation, or still bitter about my fate in Yukon? Had I not made a huge blunder, or come upon a “bad curve” when accepting a job more than six years earlier, and naïve or reluctant to live with the consequences? Were Lydia and our children happy about having lived in Yukon? Unlike other professionals like **Peter Percival** (born in 1930) who after a mining engineering career at Whitehorse Copper, still worked for CATS from 1984 to beyond 1997 – in a section called “Functional Planning and Special Projects” – and like **my father-in-law**, who spent his whole career in the public service, why could I not seem to settle down and find my niche? Was there something wrong with me? Was I too opinionated? Was I a square peg that could not fit in a round hole? Was there any way in which I should change my mind, or my character? That was pretty tough at the age of 47...

It is very difficult to think, say and write answers to these questions in 2021 (thirty-two years later), as it would be very easy to lie or put things on paper that were not in my heart after the traumatic time in Yukon and the move to Canada’s westernmost province, where the Premier regularly spoke about “fantastic British Columbia” and it was not really true. What was in my deepest heart of hearts? I would like to lead you, dear reader, to Psalm 84 for that. Afrikaans and Netherlands renderings of verse 6 are shown, followed by four English versions of verse 5¹⁴⁹:

Afr. (1953)	Welgeluksalig is die mens wie se sterkte in U is, in wie se hart die gebaande weë is.
Ned. (1637)	Welgelukzalig is de mensch, wiens strekte in U is, in welker hart de gebaande wegen zijn. (Staten)
Eng. (1599)	Blessed <i>is</i> the man whose strength ¹⁵⁰ <i>is</i> in thee, <i>and</i> in whose heart <i>are thy ways</i> . ¹⁵¹ (Geneva Bible)
Eng. (1611)	Blessed <i>is</i> the man whose strength <i>is</i> in thee; in whose heart <i>are the ways of them</i> . (KJV)
Eng. (2001)	Blessed are those whose strength is in You, in whose heart are the highways to Zion , (ESV)
Eng. (1917)	Happy is the man whose strength is in Thee; In whose heart are the highways . (JPS) ¹⁵²

Professor **Joseph Addison Alexander** (1809-1860), an eminent theologian of Princeton, NJ, USA, commented on the “odd” King James Version ending of v.5, presenting his own translation and explanation:¹⁵³ His version would then be: **“Happy the people who have strength in You, who have highways in their heart.”**

By these **“highways”** are obviously meant **the ways of the Lord**: Serving Him with gladness, attending the three normal means of grace, i.e. **(a)** worship services, **(b)** sacraments and **(c)** prayer, and keeping the moral law out of thankfulness for the salvation by Jesus Christ, through faith in Him. The real question then was not if I was a “good” **highway engineer**, “making rough places plain” as also sung as a version of Isaiah 40:8¹⁵⁴ in Händel’s oratorium “Messiah”, but if and how God’s moral law (as e.g. expounded in Psalm 119) meant anything to me, and if I showed this in my **life**. Did I have strength in Him? If I did, I did it **very imperfectly**; it was not always understood that only by His grace, I could continue my life and my career. So be it. JAdR, 2021-10-13, 5.08 p.m.

¹⁴⁹ Verse numbers in 53 Psalms are different in English than in Latin and modern translations like Nederlands and Afrikaans.

¹⁵⁰ Footnote: **“Who trusteth nothing in himself, but in thee only, and learneth of thee to rule his life.”** No wonder King James did not like the Geneva Bible, and got his bishops to revise an earlier (poor) translation without footnotes!

¹⁵¹ Words in ***italics*** are supposedly not part of the Hebrew text. This was already recognized before 1599.

¹⁵² This is a (mostly) North American translation into English, used by English speaking Jews.

¹⁵³ “The Psalms Translated and Explained” – first 1850, then Edinburgh 1864, now Classic Commentary Library, Zondervan.

¹⁵⁴ Martin Harris, the Jewish guy in our class at UP in 1964, told us that this is a **civil engineering text!**