120454
received September 16, 2019

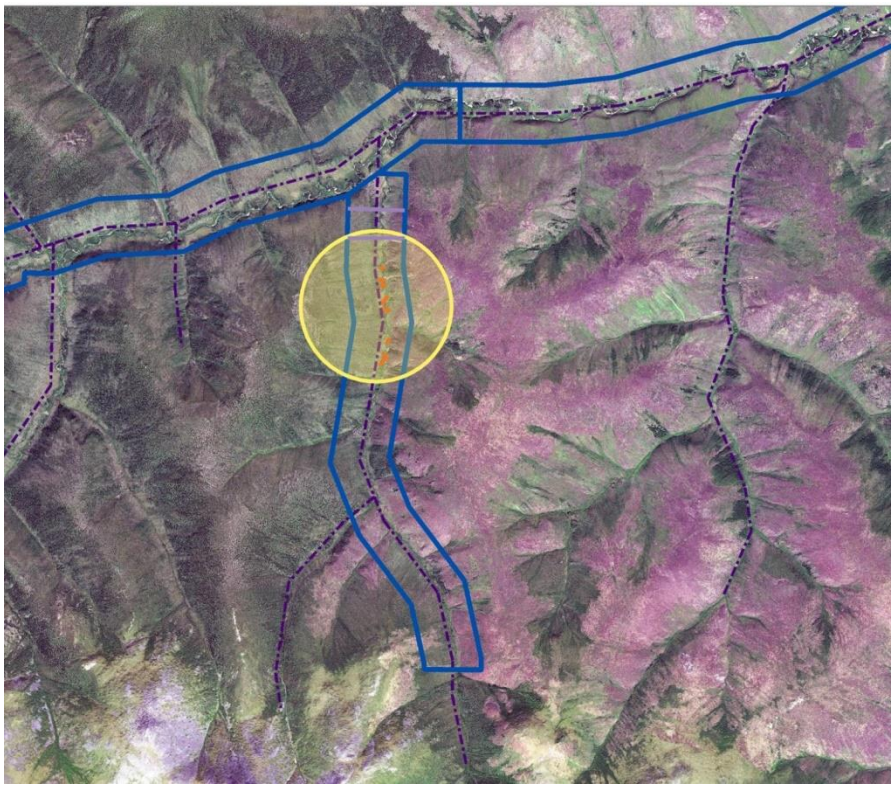
Dawson City,12 September 2019

- Geological/Geophysical survey with a Ground Penetrating Radar**-**

on

“Red” Property (Huot Gulch)

Map 115N16



Huot Gulch: area surveyed in 2019 (GPR lines are in red).

by Sandro Frizzi, geologist and prospector

INTRODUCTION.

During August of 2019 geologist Sandro Frizzi with the help of Matthias Brunnmayr conducted a geophysical survey along the “Red” Property located on Huot Gulch, a right limit tributary of Boucher Creek (right limit tributary of Sixty Mile River).
The Red Property is composed by two co-discovery claims (Red 1 and 2) plus three miles of prospecting lease (ID 01621).
Yukon Exploration Green Gold Inc. owns the property for 100%.

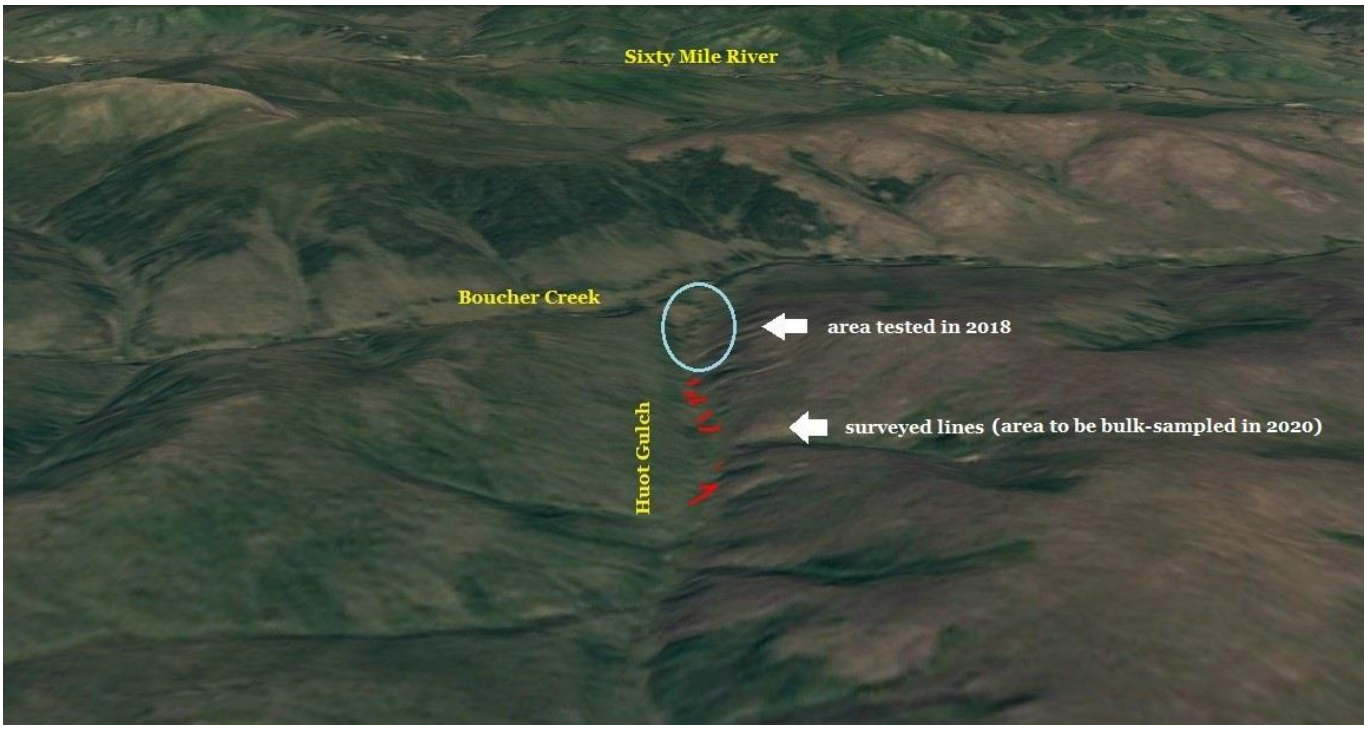
In 2017 our company prospected the creek and decided to perform a testing campaign in 2018. During September of that year we moved our excavator (Komatsu PC138us) on the lower part of the property to dig a bunch of test-pits (Class 1 Permit doesn’t allow to ford the creeks, so the exploration has been limited to the bottom section of the creek, close to its mouth).
Due to extremely frozen conditions of the ground (“Red” is a north-facing property located at considerable elevation: ≈ 900m), we managed to reach the bedrock only on four pits among ten attempts.
From each one of the four successful pit we managed to recover noticeable amounts of gold: the testing campaign at Huot Gulch was definitely successful!

That same winter we decided to apply for water license and Class 4 permits in order to be allowed to perform a more exhaustive bulk-sampling campaign along the upper section of that creek. In August of 2019 we finally received all the permits to start mining.
The beginning of a preliminary mining attempt has been planned for the summer of 2020.
The areas to be sampled during the next year have been chosen after the meticulous examination of satellite pictures followed by field surveys.
To help us to locate the best spots where to start digging the selected floodplain, we performed a geophysical survey by using our ground penetrating radar.
The purpose of this geophysical survey is to trace depth and profiles of the bedrock along few cross-sections of the valley: the knowledge of the morphology of the valley-bottom will prevent us from unnecessary digging.

The results of this survey are illustrated in this report.

Sandro Frizzi

LOCATION OF GEOPHYSICAL-SURVEYED LINES.



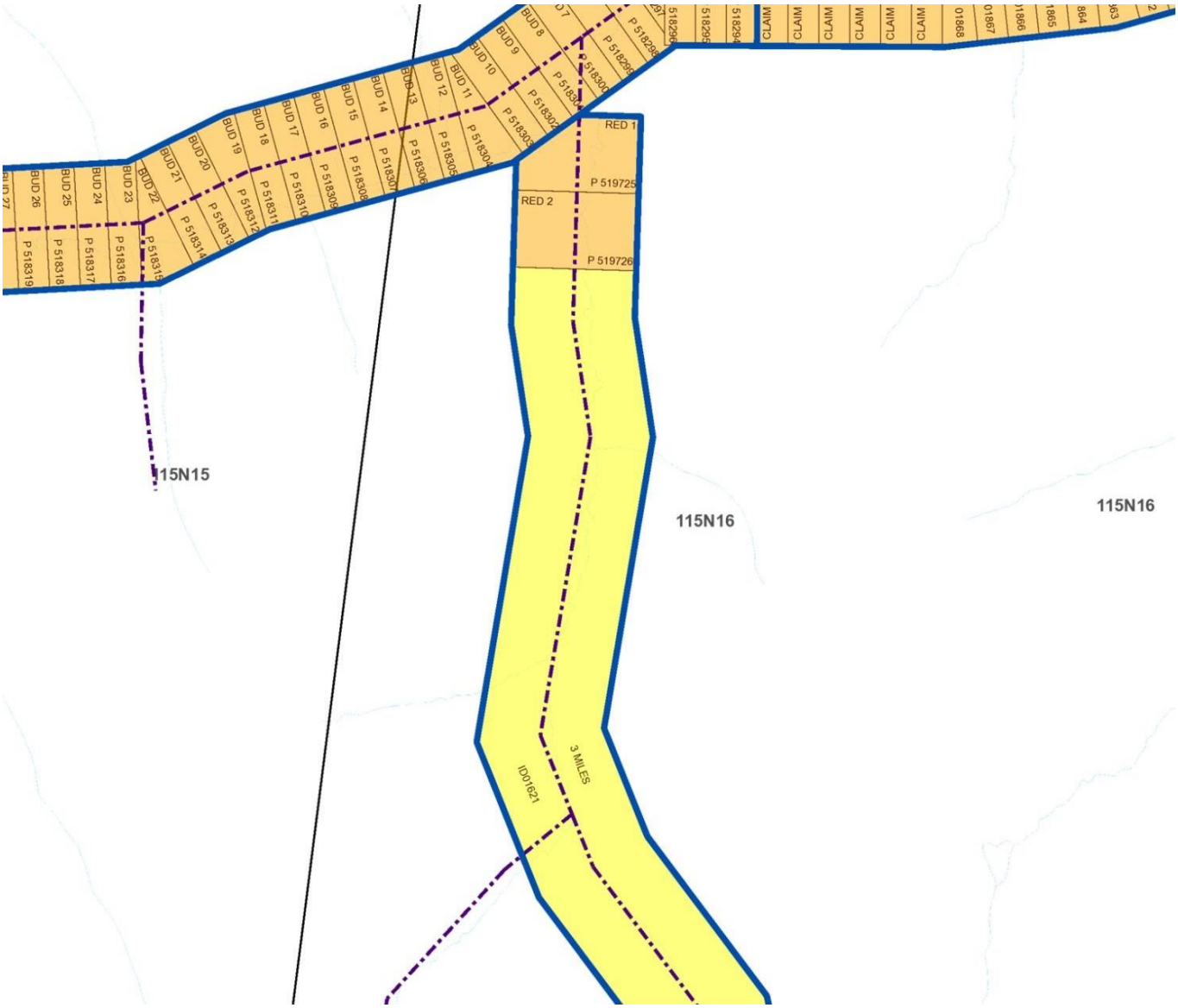
LOCATION OF HUOT GULCH.

Huot Gulch is visible on Map 115N16. It‟s part of the Sixtymile district and tributary of Boucher Creek, which flows into Sixtymile River. This gulch measures 6 km of length and is located in the western part of the Yukon, between Dawson City (51 km straight east from the creek) and the Alaska borders (26 km straight west). It runs from south toward north and its headwater starts from the north-facing slope of Mountain Hart, the highest peak in the area. Huot Gulch is accessible by different roads and trails. The shortest one from Dawson City goes through the Top of the World Highway until the junction with lower California Creek (left turn at km 80), then through an unpaved road until the crossing of Sixtymile River (14 km away) and continues up to km 9th of the new road to Enchantment Creek. Thence turn right (north direction) on the new trail along the ridge of Granite Creek, until reaches Boucher Creek, 5 km later. From there, the trail turn toward west, upstream Boucher Creek for 4.5 km, to reach the mouth of Huot Gulch. The road is driveable with 4x4 vehicle until Granite Creek, but for the final 4 km it‟s necessary the use of tracked vehicles or Argo 8x8. The total driving distance between Huot Gulch and Dawson City measures less than 120 km, but due to rough conditions it will take few hours to arrive.

Location of Huot Gulch (red star)

THE “RED” PROPERTY.

The property consists in two co-discovery claims, RED 1 and RED 2 (P 519725-26) plus three miles of prospecting lease (ID 01621) which will be converted into 31 new claims before start mining (as per current legislation).



Scale: 1:30,000

BEDROCK GEOLOGY.

Scale 1:80,000

Legend:

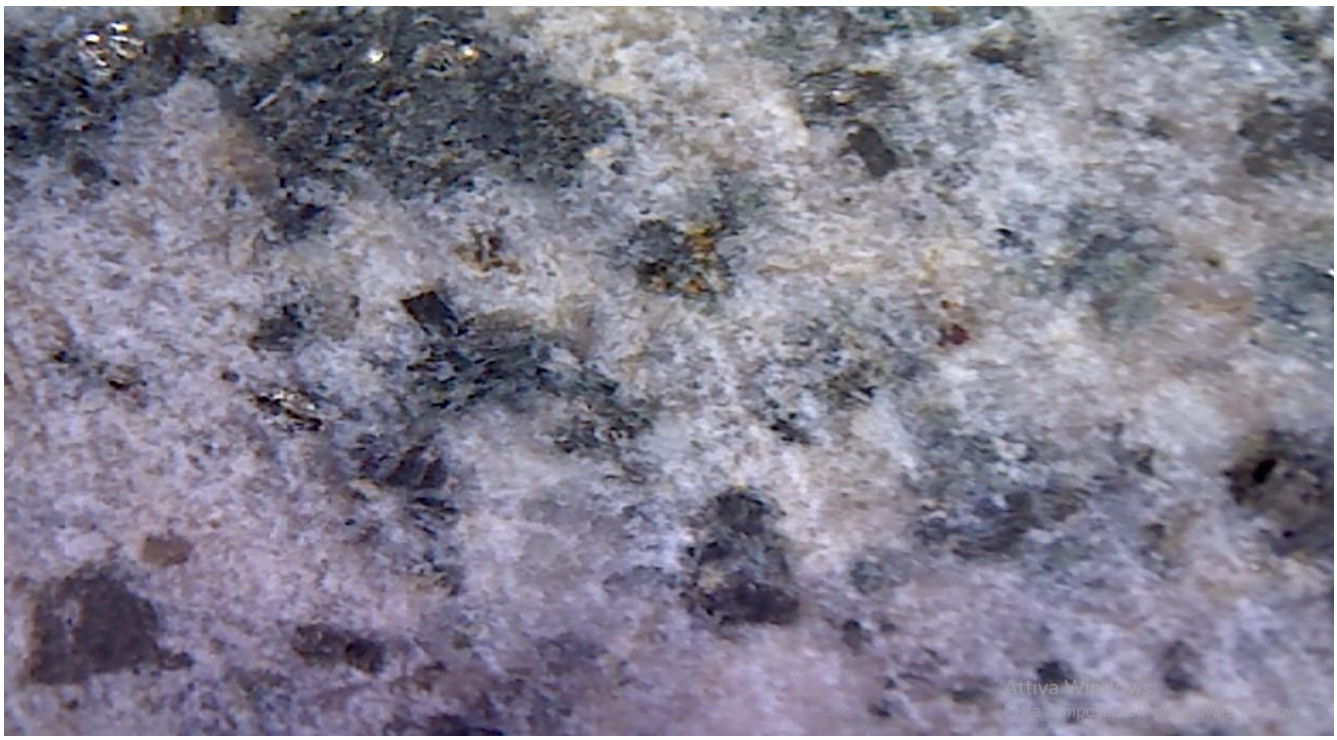
DMF1 = Yukon-Tanana Terrane, Devonian-Carboniferous (365-345) – metamorphic (mafic): cl-schist, amphibilite, quartzite, gneiss, ultramafic . DMF5 = white marble.

MgSR = Yukon-Tanana Terrane, Carboniferous (355-345) –metamorphic: orthogneiss.

IKIR = Cretaceous (112-99) – sedimentary: conglomerate.

uKC1 = Cretaceous (73-68) – vulcanic (mafic): trachyte, andesite, basalt.

LKgP = Cretaceous (72-68) – plutonic: granodiorite, diorite, quartz-diorite.



A microscopic image (x65) of the bedrock found at pit 5 during 2018

SURFICIAL GEOLOGY.

The picture here below shows part of the gravel extracted during last year testing campaign at pit5 and is a good representation of the different rocks which are composing the alluvial mattress of this lower section of Huot Gulch.
In the bunch are easily recognizable schist, quartzite, diorite, gneiss, different greenstones, trachyte, etc. etc.
Those rocks are for the most part sub-angular of partially rounded, due to their short travelling from the areas of origin. In one world they are allochthonous (local).

GEOPHISICAL SURVEY.

The geophysical survey performed at Huot gulch by geologist Sandro Frizzi with the help of of Matthias Brunmayr has been done by using a ground penetrating radar of Bulgarian fabrication: the “Oerad Scudo 500”, especially customized for the Yukon terrains and equipped with an antenna of 300 MHz.
This devices is able to reach depths of up to 15 meters (in favorable conditions).

The georadar is an electronic device which transmit short energy pulses of EM waves into the ground. Each material has different electrical properties that dictate the behavior of an energy pulse beam travelling through it. Reflection, refraction, attenuation and transmission are characteristics of an energy beam travelling through a material. A receiver antenna is fine tuned to 'listen' for this behavior or ‘material response’ and report it to a controller unit. A radargram is produced from the reported signal by the Rx module.

For the exploration campaign at Huot Gulch Sandro chose a dielectric constant (the measure of a material's ability to store electrical energy in an electric field) specific for permafrost: 7, which allows this specific GPR to “see” ‘till the maximum depth of 6 meters.
Each line has been passed many times: at first with a long time-window of 150 ns (better depth but less resolution) and then with a shorter time-window of 75 ns (more details but less depth). The data produced by the georadar have been selected among the ‘clearest’ ones obtained and later elaborated with the use of Prizm 2.5 software (not the best one on the marked, but reliable and easy to handle).

Green note:

“Yukon Exploration Green Gold Inc. is an exploration company with a strong ‘green ethical code’ and seriously committed in developing and promoting low-invasive prospecting and mining techniques.
The efficiency of our exploration campaigns has been proven in the past years on our properties staked on virgin grounds of new areas, which are today successfully mined.”

In the next pages are published the results (cross-sections of GPR lines and elevations) of this geophysical survey. The graphical representation has been converted in simplified drawings of the bedrock-profile, without modifying it and without using filters (ground noise-reduction or other), in order to consent an interpretation to other geophysicists.

UTMs AND LENGTH OF SURVEYED LINES.

Satellite view (1: 10,000) of surveyed lines at Pat Murphy Creek.

line 1: start 525529 - 7093577 length: 58.3 m
end 525490 –7093538

line 2: start 525486 – 7093434 length: 55.7m
end 525539 – 7093429

line 3: start 525575 – 7093390 length: 73.5 m
end 525513 – 7093358

line 4: start 525607 – 7093267 length: 92 m
end 525568 – 7093185

line 5: start 525577 – 7093122 length: 86 m
end 525657 – 7093116

line 6: start 525689 – 7092824 length: 60 m
end 525669 – 7092777

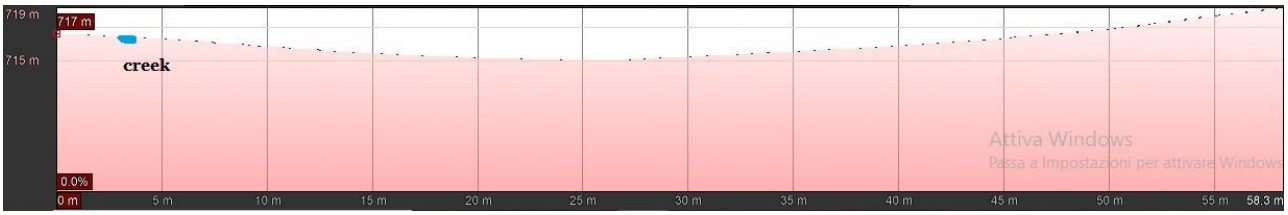
line 7: start 525635 – 7092648 length: 65 m
end 525689 – 7092630

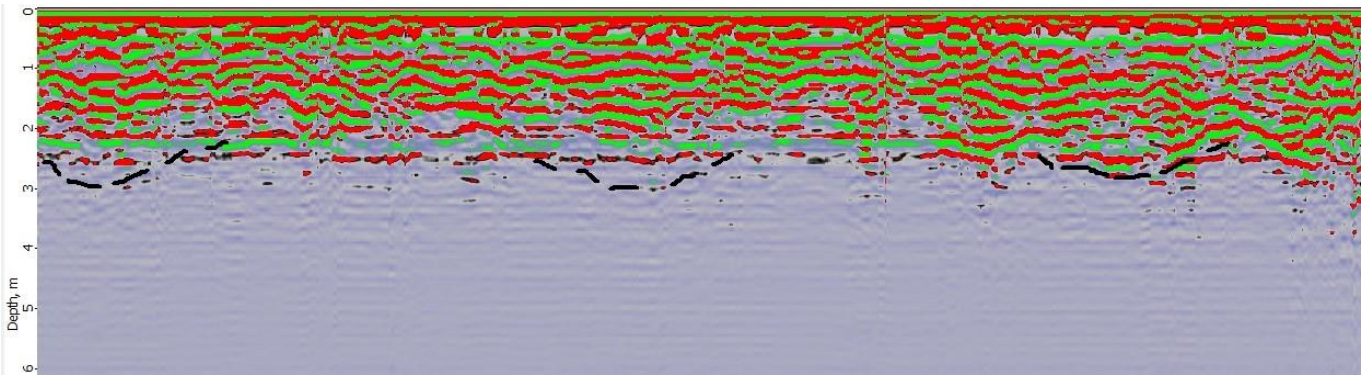
line8: start 525689- 7092630 length: 133 m
end 525620-7092523

Profiles of surface and depth of bedrock along each surveyed line.

line 1:

W E

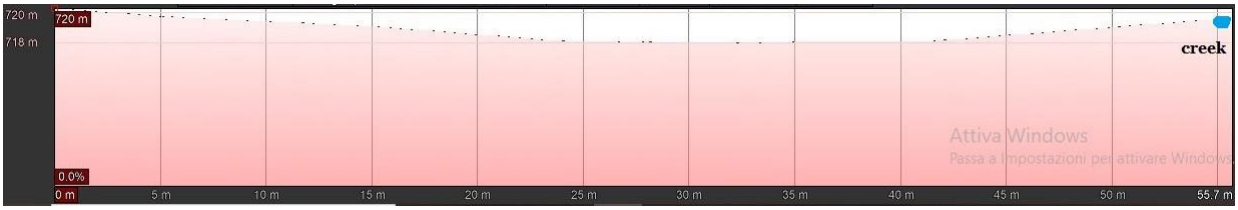


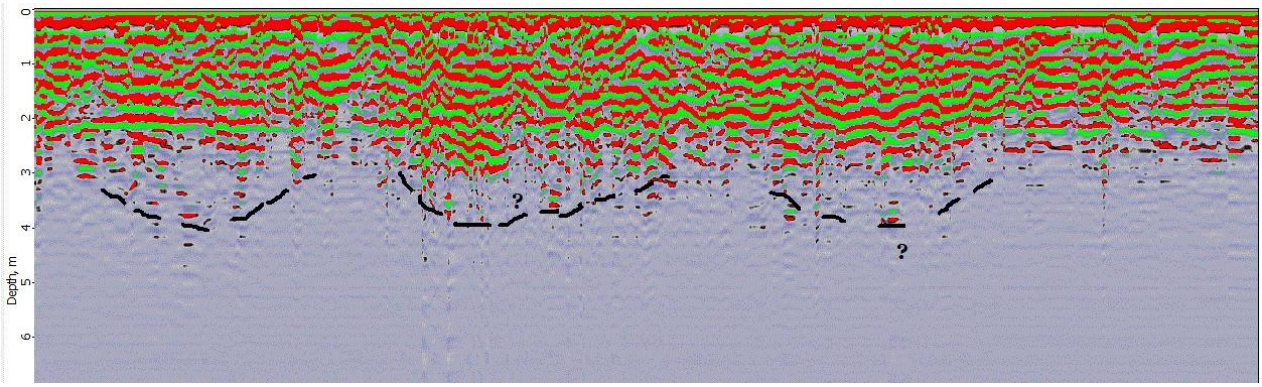


Observations: This 58 meters of cross-valley section is showing a shallow depth of the bedrock (around 3 meters, as confirmed by our digging of 2018) with the existence of 3 areas of depression, possibly represented by old channels. The surface of the bedrock is definitely weathered for a couple of feet, as already observed in the pits dug during last summer, just few hundred meters downstream.

line 2:

W E

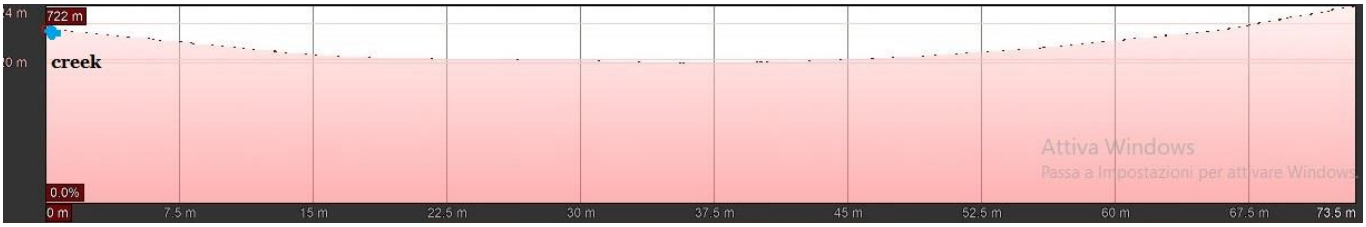


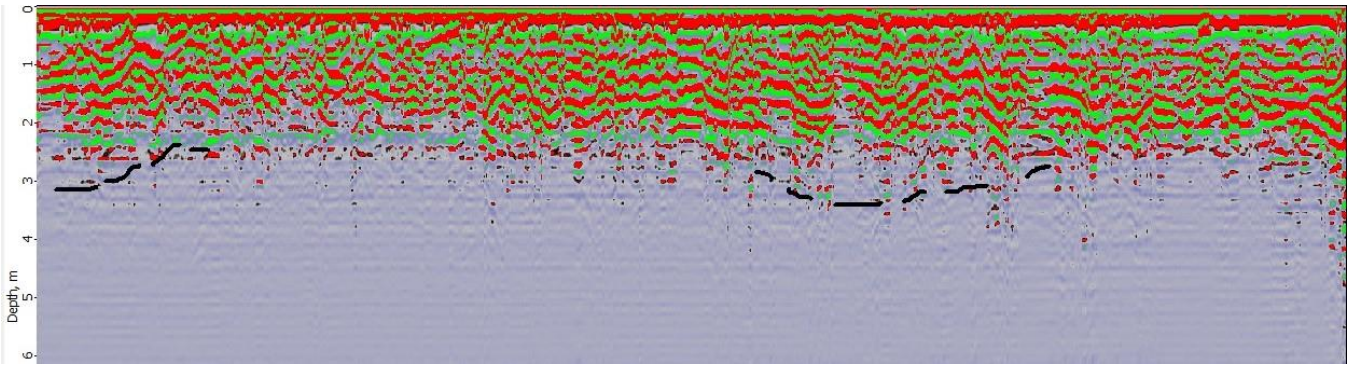


Observations: The valley here is narrower and the creek is digging a bit deeper into bedrock: the maximum depth seems to be increasing be two or three feet. The best section of alluvium investigate seems to be included by m 15 and m 45.

line 3:

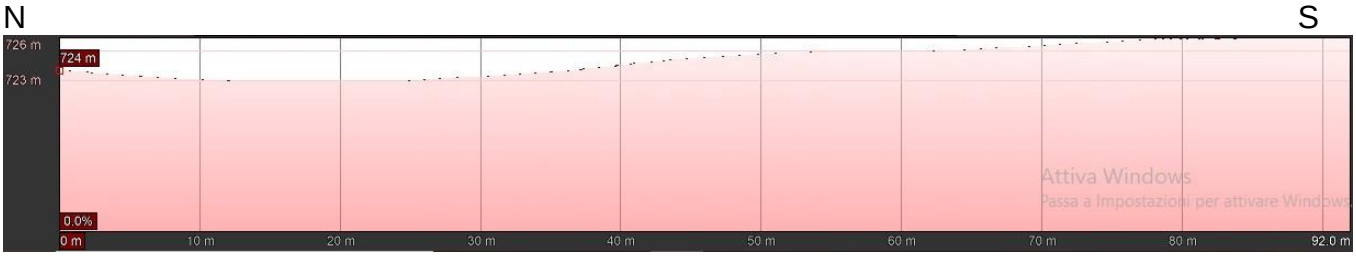
W E

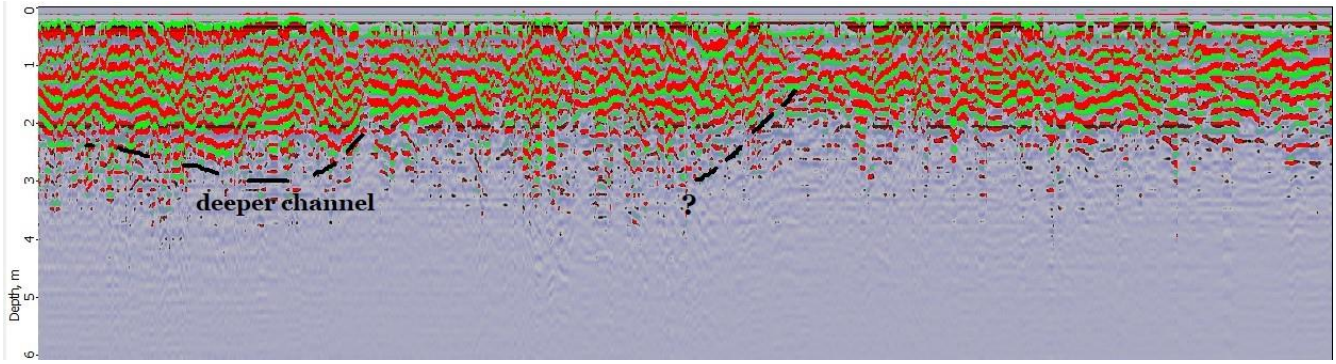




Observations: This is a wider section of valley, with an appealing, well flattened floodplain. The radargram revealed the usual shallow bedrock (3.5 meters of maximum depth) and the presence of an old channel at 45 m. The other depression at 0m indicate the location the actual creek. That flat layer visible at -2.5 meters could be made by weathered bedrock, which in fact seems to drastically reduce the radar's penetrating power (wet silt and wet clay are natural barriers to waves propagation).

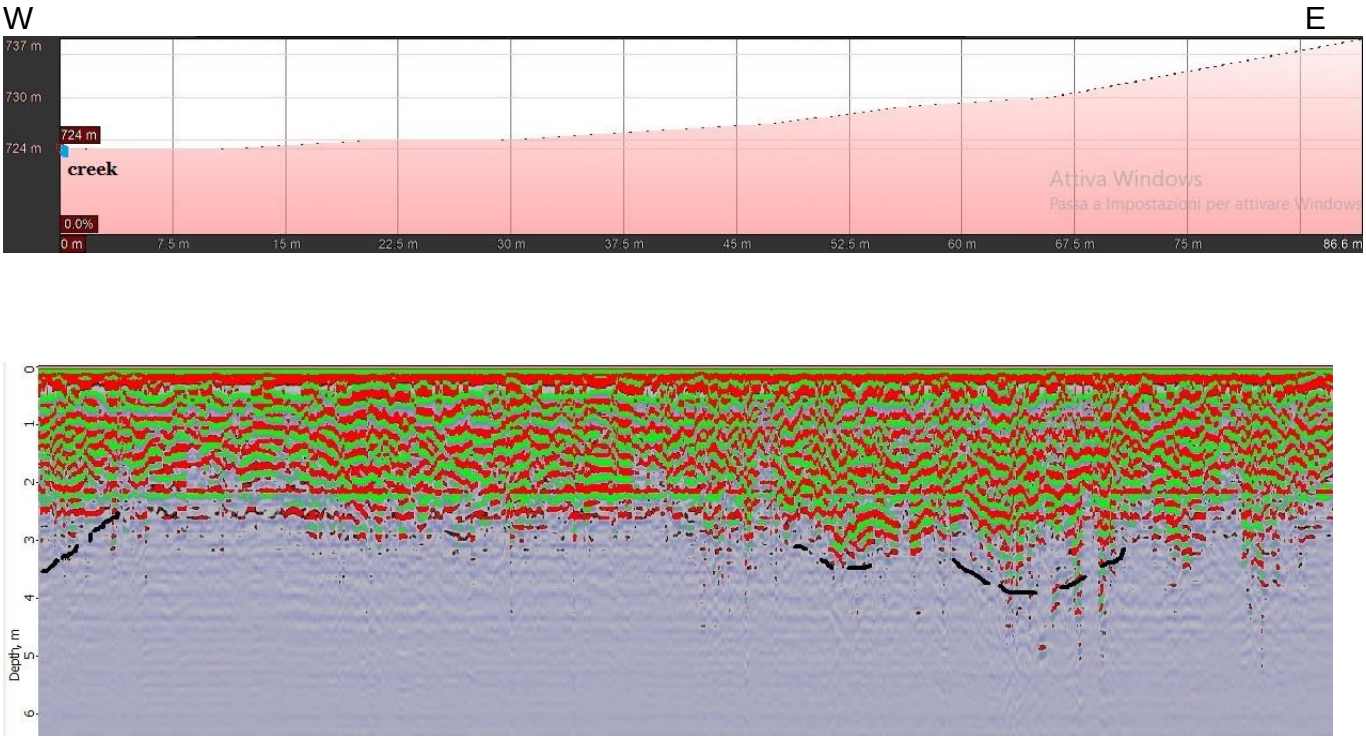
line 4:





Observations: This is a line surveyed along a left limit bench, and it's running parallel to the valley. On the north side (at 0m) there is the creek, which is meandering across the valley.
The radargram shows the thickest section of the alluvial mattress from 0m to 20m, and the signs of an older riverbed at 50m.
From 50m to 92m the bench is shallow and probably a mix between overflowed material and colluvium.

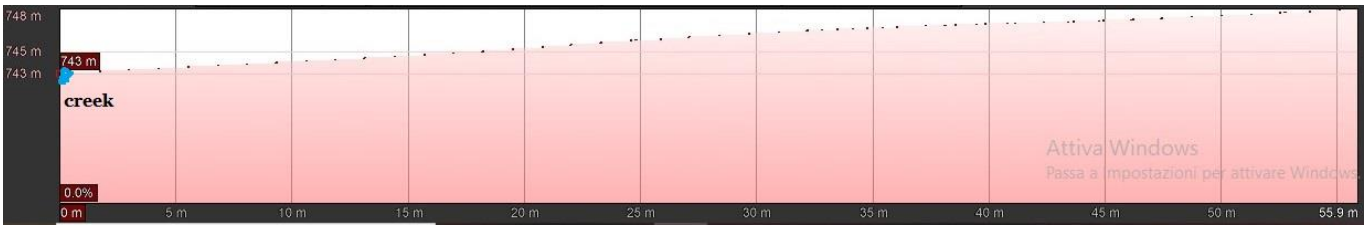
line 5:

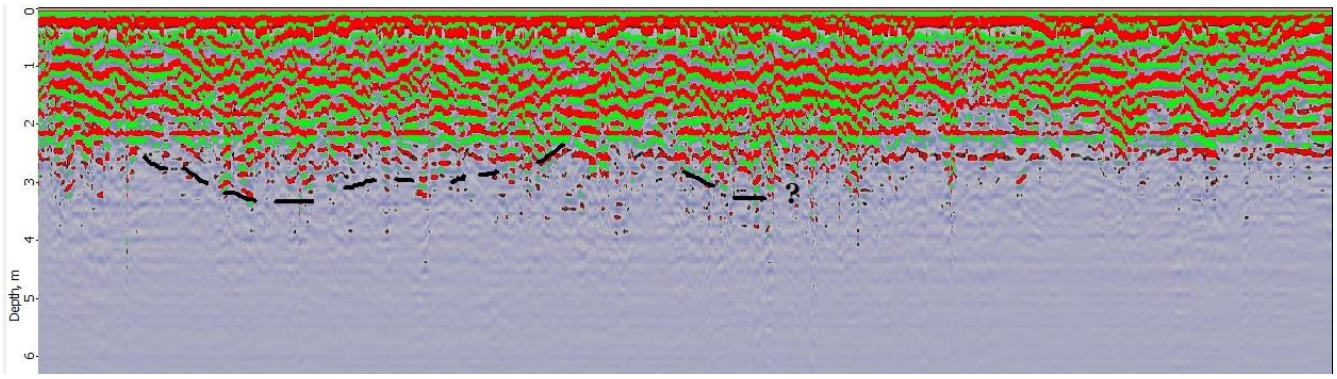


Observations: Another appealing section of floodplain, located right on a bend of the valley. Between 50 and 70 meters there are definitely the signs of the old creek passage.
The depth of bedrock seems to be increasing but it's actually an impression due to the 'flat' projection of the GPR, as evidenced by the elevation-profile above.

line 6:

N S

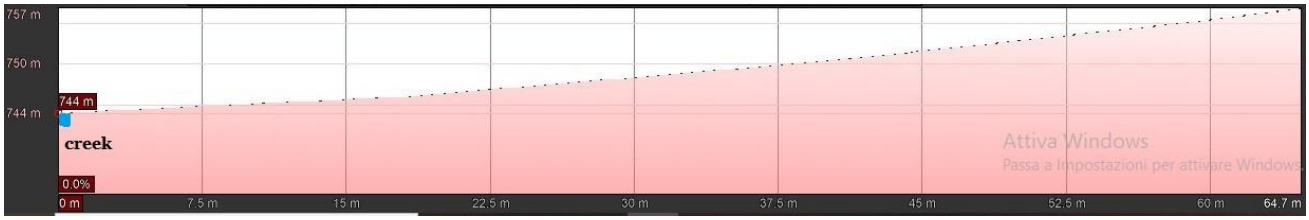


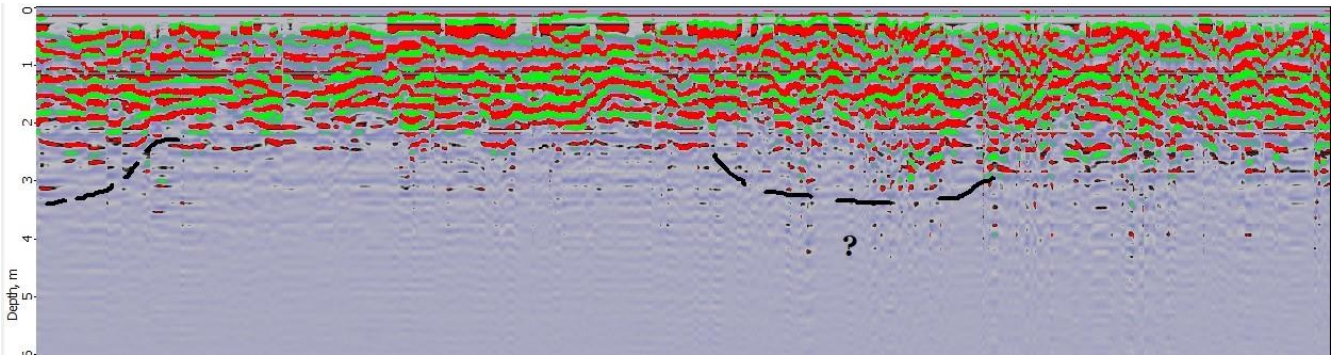


Observations: Another line surveyed along a shallow left limit bench. The depression in the bedrock located at 10m shows an old external curve of a meander, which won't be interesting for our purposes (gold will be eventually deposited at the head of the meander, not at its end). This is an area that we will avoid during our bulk-sampling campaign.

line 7:

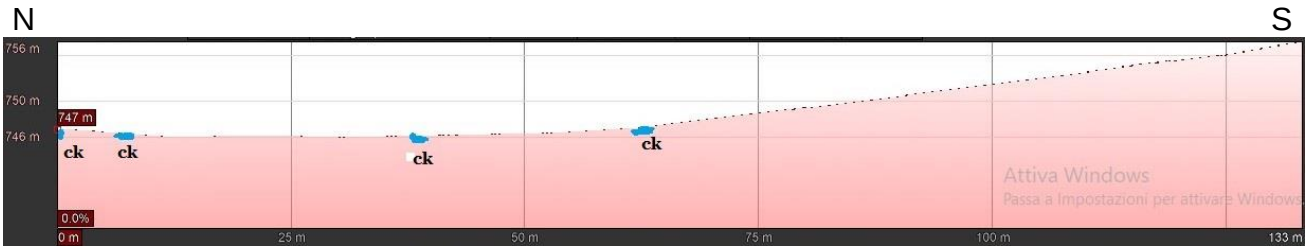
W E

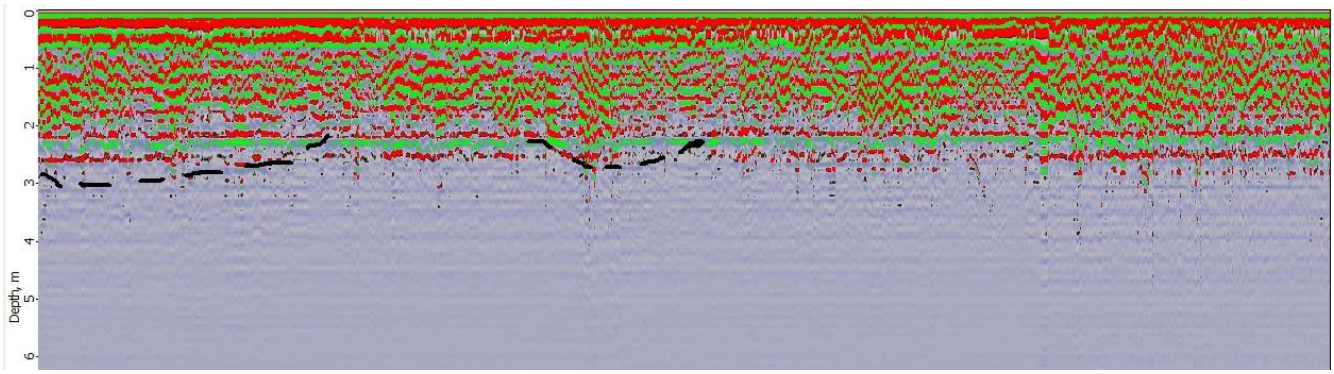




Observations: The survey of this line returned poor results in spite of the several passages done with different settings (the use of different dielectric constants and time-windows). The reason is probably the presence of groundwater at shallow depth: groundwater is drastically reducing the propagation of waves (permafrost give much better results).
The good news is that this seems to be the only thawed spot in the area, which means easy digging for an excavator.
Between 35m and 50m seems to be a section where the GPR is trying to go deeper, which will possibly indicate the existence of an old channel.

line 8:





Observations: This is the longest one among the all surveyed lines (133m). It runs in a N-S direction on a diagonal which is cutting the valley from its left limit to the right one.
To complete the line we had to cross the creek, which is meandering across the valley, for three times.
The radargram confirms the already recorded features of the alluvium of the lower section of Huot Gulch: shallow depth of bedrock (on average around 3m), presence of a couple of feet of weathered bedrock around -2.5-3m, mostly frozen condition of the soil.
Two major depressions in the bedrock seems to be located by the north-end of the line and around its middle.

CONCLUSIONS.

After the positive results achieved during the testing campaign of 2018 at Huot Gulch, where noticeable quantities of gold have been recovered from each one of the test pits dug to bedrock, we decided to plan an extended bulk-sampling campaign for 2020.
This preliminary mining attempt will be performed along a portion of a kilometer of floodplain located few hundred meters upstream from the area tested in 2018.
The creek on its lower part is meandering across the valley, creating natural sections of floodplain which will be extremely suitable for an extensive 'rim to rim' bulk-sampling.
This targeted stretch of the creek has been chosen after a careful examination of satellite pictures anticipated and then followed by several ground surveys.

In order to optimize this ultimate testing campaign by avoiding the unnecessary digging, we decided to perform a geophysical survey aimed to locate the depth of the bedrock and its profile across the targeted sections of floodplain.

The results produced by our ground penetrating radar are showing an alluvial mattress with a uniform thickness mostly around 3-3.5 meters, lying above an homogenous bedrock which doesn't seems to have been complicated (offsets) by tectonic structures or local fractures.
For its majority the soil seems to be extremely frozen (except for line 7), but fortunately the bedrock is located at shallow depth.

According with the information produced by our GPR, the morphological conditions of this placer seems to be optimal for our purposes!

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Sandro Frizzi, geologist and prospector
For Yukon Exploration Green Gold Inc.
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LIST OF EXPENSES

Field expenses:	1 Geologist for 2 days (at $400/day)	= $ 800
	1 Field-helper for 2 days ($ 275/day)	= $ 550
	TOT:	= $ 1,350
Data interpretation and report compilation:		= $ 2,5oo
GPR rental:	“Scudo 500” with 300 MHz antenna (500/day)	= $ 1,000
	TOTAL	= $ 3,500
	GRAND TOTAL	**= $ 4,850**

Expenses not recognizable for assessment work (camp-cost, transportation) : = $ 600

PROFESSIONAL QUALIFICATION OF SANDRO FRIZZI.

Sandro Frizzi is an Italian citizen and a permanent resident of Canada since 2009, born in Italy the 28th of August 1961. He works and lives in Dawson City since 2011 (1342, 4th Ave.).

In 1993 Sandro obtained the University degree in Geological Sciences at the “Universita’ di Bologna” with specialization in hydrogeology, aquifers and alluvial deposits.

As geologist he worked as a consultant for several companies in Italy (1993-2004), in Canada (1997-2017), in Bolivia and Argentina (2009), and in Mexico (2010-11).

Since 2005 Sandro is operating in Yukon as geological consultant in hard-rock exploration (2005-2009) and successively self-employed in placer mining industry (2009-today).

Since 2013 is co-founder and director of Yukon Exploration Green Gold Inc., a placer exploration and mining enterprise. The company today is holding several fully licensed properties, some of those already in production (Big Creek, California Creek, Bruin Creek and 12 Mile Creek).

In 2018 he created Gold Pan Corp, a small placer exploration company specialized in low-impact technologies (since 2009 Sandro dedicated part of his time to test and to promote non-invasive and eco-friendly exploration techniques like ground penetrating radars, magnetometers, gravimeters, etc.).

In 2013-14-15 he conducted his first successful exploration along the floodplain of Big Creek (Map 115P15) with mechanical equipment and also by using for the first time a ground penetrating radar of Russian fabrication. That experiment revealed the efficiency of the GPR in the determination of bedrock’s profile and led to an important discovery (an hidden bench which revealed rich in gold). After this positive result, during the winter of 2016-17, Sandro travelled to Plovdiv (Bulgaria) to work together with electronic engineer Anton Doychev to customize two GPRs: Oerad Scudo 500 and Dipole 300, especially calibrated for the placer characteristic of the Yukon.

He’s best prospects have been done at Big Creek (Red Mountain), California Creek (Sixty Mile), Huot Gulch and Excelsior Creek (Yukon River).

During this summer of 2019 Sandro is working along the Top of The World Highway, trying to find a geological link among the many gold-carrying tributaries running from the watershed divide between Fortymile and Sixty Mile rivers.