From:

Woidak, Paul EM:EX

Sent:

Friday, December 07, 2001 1:51 PM

To:

Bob Lane; Jacques Houle; Mike Cathro; Terry, David EM:EX; Bergen, Wally EM:EX; Bill Price; Bruce Graff; Bryan Good; Daryl Hanson; Doug Flynn; Elaine Konschuh; Jill Pardoe:

Van Zalingen, Sylvia EM:EX: Wesley Kennedy

Cc:

Dave Lefebure; Derek Brown; Duane Anderson; Gib McArthur; Malott, Mary Lou MSRM:EX;

Rick Conte: Tom Schroeter

Subject:

Report to Dec 6/01

Copper Star - Doublestar Resources announced drill results on this porphyry copper property 60 km south of Smithers. Four IP anomalies were tested. Only the hole angled beneath the main showing (and the strongest IP anomaly) intersected significant copper, within a <u>Bulkley granodiorite stock - 0.26% Cu over 122.9 m.</u> This hole, # 7 of the program, was the next one after my Oct 12 visit (see Oct 19 weekly). <u>Complex geological relationships are evident between Hazelton(?) volcanics</u>, Skeena Group sediments, the <u>Bulkley stock and Cretaceous(?)</u>/Tertiary felsic and mafic volcanics. I may follow up with review of the core next season. Doublestar has terminated its earn-in agreement with Continental Minerals Corp. (a Hunter Dickinson company).

Endako- grilling program reported last week may be postponed until January.

Eskay Creek- Attend NWMDRC presentation by Homestake. Prompted by soon-to-be new owner (vote on Barrick merger on Dec 14), Eskay has applied to increase mining rate to 750 tpd from current (officially) 565 tpd. Actual output appears to be more like 590 tpd. In 2002, the company expects to achieve 670 tpd (300 tpd mill ore + 370 tpd direct shipping ore). As the mill is already operating at 300 tpd this increase will consist entirely of direct shipping ore, to 370 tpd. The company is considering viability of mill expansion to 360 tpd. Consideration of the rate of depletion of the two ore types is critical, mill ore is not viable without the cash flow of direct shipping ore. And clearly, it is easier to find more mill ore than direct shipping.

Northwest Exploration and Mine Review - begin to prepare write-up for Roundup distribution.

**Exploration Property file and Roundup Poster - Material from prospectors trickling in, being compiled by Elaine Konschuh. Daryl doing prelim work for poster.** 

#### Paul

Paul Wojdak, P.Geo. Regional Geologist, Smithers BC Ministry of Energy and Mines

tel: (250) 847-7391 fax: (250) 847-7603 email: paul.wojdak@gems5.gov.bc.ca

From: Wojdak, Paul EM:EX

Sent: Friday, October 19, 2001 8:40 AM

To: Bergen, Wally EM:EX; Bill Price; Bruce Graff; Bryan Good; Daryl Hanson; Doug Flynn;

Elaine Konschuh; Jill Pardoe; Van Zalingen, Sylvia EM:EX; Wesley Kennedy; Bob Lar.e;

Jacques Houle; Mike Cathro; Terry, David EM:EX

Cc: Dave Lefebure; Derek Brown; Duane Anderson; Gib McArthur; Malott, Mary Lou MSRM:EX;

Rick Conte; Tom Schroeter

Subject: Report to Oct 19, 2001

Copper Star - Doublestar Resources drilling program on porphyry copper prospect southwest of Houston visited on Oct 12, with high school student Lee Sundbord (job shadowing). Project geologist Paul Gray suffered compound fracture of collar bone in ATV accident just prior to the drilling and was replaced by Nils von Fersen. Results from the first six holes is disappointing (confidential), with 3 more holes anticipated. Bulkely granodiorite stock is weak to moderately fractured, locally contains chalcopyrite and molybdenite, but calcite-hematite veins are more prevalent and cause of IP anomaly is unknown. The southern portion of the large IP anomaly will not be drilled- surface work suggests the response is due to coal in Skeena sandstone. Hole 4 (the furthest northeast hole) intersected a thick sequence of fractured, pyritic Ootsa (?) rhyolite, an unknown leucocratic intrusion and Endako (?) andesite, litholigies not evident on surface.

Fossils- Houston prospector loaned, to display in Smithers office, an interesting collection of well preserved bivalves, ammonites, scallops, gastropods, belemnites, ..... from a new locality in the Smithers Formation (mid-Jurassic)

Exploration activity- contacting companies/individuals for end of season data.

RG - GSB conference calls, begin to prepare for various presentations and meetings.

### Paul

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tel: (250) 847-7391 fax: (250) 847-7603 email: paul.wojdak@gems5.gov.bc.ca

From:

Woidak, Paul EM:EX

Sent:

Thursday, August 30, 2001 4:33 PM

To:

Bob Lane; Jacques Houle; Mike Cathro; Terry, David EM:EX; Bergen, Wally EM:EX; Bill Price; Bruce Graff; Bryan Good; Daryl Hanson; Doug Flynn; Elaine Konschuh; Jill Pardoe:

Van Zalingen, Sylvia EM:EX; Wesley Kennedy

Cc:

Dave Lefebure; Derek Brown; Duane Anderson; Gib McArthur; Rick Conte; Tom Schroeter

Subject:

Week Report

### Exploration Activity

Copper Star (formerly WG or Chisholm Lake) - Doublestar Resources Ltd. and Gold-Ore Resources Ltd. have entered into an earn-in agreement with the Hunter Dickinson Group on this porphyry copper prospect 60 km south of Smithers. Program of 7 drill holes (1500 m) at about \$100,000 will commence in late Sept.

\*DN/Second round of drilling by Newmont to proceed in September, to follow up on encouraging results (geological and geochemical) from July drilling on this Eskay-type prospect near Bob Quinn.

Homestake Ridge (Teck)- Stewart area project visited with Graeme Evans. Good case being built up from geology and geochem data for drilling next year. Elements of Eskay model are present except no pillow basalt.

Praxis- Program completed on this Stewart area Eskay target. Examined by Teck but not by Homestake. No regional work or property exams by Homestake this year.

Lucky - Séveral companies, including Teck-Cominco and Hyder Gold, are examining this "new" copper-gold find by prospecting partners Rick Kasum and Gerry Morrison, near the head of American Creek north of Stewart.

Swamp Point- Kasum and Morrison (of Stewart) claim to have an agreement with Lafarge Cement to test quality of gravel from this deposit on the Portland Canal.

#### **Prospector Assistance**

Peter Ross completed his program in the Surprise Lake "specialty granite" looking for Ta-Sn. Staked 16 claims.

John Hope staked 4 claims on Hazelwood Creek in the Blue River ultramafite. Examined John's target on Aug 21- a mineralized fault zone near the structural contact of the complex with (a pendant of ?) Sylvestor volcanic rocks. Creek is named for disseminated hazelwoodite (nickel sulphide) in peridotite that was explored by Falconbridge in the 1950's. Current thinking is that nickel sulphides formed during contact metamorphism of serpentinized peridotite by the nearby Cassiar batholith (which produced talc, amphibole and re-generated olivine). Hope is testing chalcedonic quartz and sulphide in the fault for platinum group metals.

Shawn Turford/ Ralph Keefe - Hudson Bay will examine the Dani and Bell claims in the Ecstall belt on Sept 10.

### Other Activities

Participated in (excellent) joint BC Geologic Survey - Geologic Survey of Canada field trip in the Rancheria area ε long the B.C. / Yukon border. Co-leaders were JoAnne Nelson, Mitch Mihalynuk, Charlie Roots (GSC) and Rob Stevens (BCIT). Focus on stratigraphy and correlation, geologic evolution of continental margin. Felsic metavolcanics are key component for mineral exploration.

#### Paul

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Thursday, August 30, 2001 4:33 PM

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Dave Lefebure; Derek Brown; Duane Anderson; Gib McArthur; Rick Conte; Tom Schroeter

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tel: (250) 847-7391 fax: (250) 847-7603 email: paul.wojdak@gems5.gov.bc.ca

From:

Woidak, Paul EM:EX

Thursday, August 16, 2001 4:21 PM Sent:

Bob Lane: Jacques Houle: Mike Cathro; Terry, David EM:EX; Bergen, Wally EM:EX; Bill To:

Price; Bruce Graff; Bryan Good; Daryl Hanson; Doug Flynn; Elaine Konschuh; Jill Pardoe:

Van Zalingen, Sylvia EM:EX; Wesley Kennedy

Dave Lefebure: Derek Brown: Duane Anderson: Gib McArthur: Rick Conte: Tom Schroeter Cc:

2-Week Report, Aug 17, 2001 Subject:

Delta Gold (Marcus Tomkinson, Group - Project Generation Leader) and James Stewart (international geological consultant) visited Smithers office, inbetween visits to Kemess and Eskay Creek. Delta Gold is a mid-tier Australian gold miner with a healthy cash flow derived from \$140 per ounce production cost that wants to diversify to other countries and maybe commodities. Countries being considered include Canada, Chile, Peru etc. BC's aboriginal land claim situation looks good compared to Aussie (Queensland has not issued a single exploration permit in 3 years!! according to Tomkinson). Canada scored at top of political risk assessment, a big item for Delta Gold because of their recent experience in Solomon Islands and Zimbabwe. In the Solomon Islands, Delta bought an operating gold mine for \$114 million, but it was expropriated and then extensively vandalized. (Side note: \$70 million has been recovered from political risk insurance, but under the stipulation that the insuror not be identified). Discussed terrane geology of BC, mineral deposits (suite of Eskay Creek rocks in particular), current activity and opportunities in NW region, in the Iskut region in particular. Some items of interest and concern raised by Tomkinson

- keen interest in terrane-bounding faults as locus of big deposits, why aren't there more big deposits in BC on major faults (I listed Bralome, Polans Taku on Llewellyn, Juneau, Surf Inlet, Barkerville?, forgot Specogna, Structural control less evident for BC porphyries? RG's any others?)
- lack of readily available regional geophysical data in BC. In Australia (and most other jurisdictions?) all airborne surveys must be turned over to government and become public data (item for our Core Review team?).
- absence of epithermal overprint in BC porphyry deposits (collapsed hydrothermal systems) to sweeten grade (common feature of SE Pacific and South American deposits). I suggested Kerr porphyry/Suphurets epithermal and Hearne Hill breccia as BC examples, Red Chris with high grade core and potential for skarn in some porphyry settings). Comments from other RG's?
- questioned presence of "bona fide" epithermal deposits in BC (I listed Cheni, Lawyers, Engineer) For Tom Schroeter- Tomkinson intends to visit your office, perhaps you can follow up on any of the above topics, in particular samples of Specogna on the Sandspit fault, and Blackdome. Fault control in Babine porphyry district (and others?).

Cumberland Resources rep Roger March visited Smithers office. Junior company with advanced gold prospects in Nunavut and \$4 million in the bank is looking for gold exploration projects in BC, both long range and drill-ready (for flowthru). Discussed current activity and opportunities, facilitated contacts with prospectors and companies. Library and public access computer used for 2 days research and office services thanks to Elaine.

Westgarde (Chisholm Lake porphyry copper south of Houston)- Darrel Johnson said Hunter-Dickinson is nearing agreement with an unidentified company that would result in a drilling program (reduced from 16 proposed holes) this year. Doublestar? (165)

Bell (Ecstall belt massive sulphide claims) - following examination, Doublestar Resources declined property option from Shaun Turford, Ralph Keefe and third partner.

Atlin-Taku (the next LRMP?) - Completed geology and mineral deposits sections for background report being prepared by Jill Pardoe. Placer section by Daryl Hanson.

Guide Outfitters Assoc of BC - Dale Drown (Richmond office) inquired about helicopter activity southeast of Atlin, concerned about "mineral exploration". Explained the work is by GSB's Nakina program headed by Mitch Mihalynuk, and invited Atlin area guide/outfitter(s) attend final instalment of public lecture series on Aug 18 to learn more and make direct contact with Mitch.

Paul

Paul Wojdak, P.Geo. Regional Geologist, Smithers BC Ministry of Energy and Mines

From: Bergen, Wally EM:EX

Sent: Monday, July 02, 2001 10:32 PM

To: Adams, Rick EM:EX; Anderson, Duane EM:EX; Beswick, Ed EM:EX; Booth, Richard EM:EX;

Braidwood, Brian FIH:EX; Carr, Chris EM:EX; Carter, Tom EM:EX; Cheetham, Pat EM:EX; Cochrane, Marlene EM:EX; Conte, Rick EM:EX; Curtis, Ross EM:EX; EM MB Smithers DL; Errington, John EM:EX; Finvers, Maija EM:EX; German, Gerald EM:EX; Guthrie, Shelley EM:EX; Hall, Ted EM:EX; Hermann, Fred EM:EX; Hesketh, Joan EM:EX; Hoffman, AI EM:EX; Jorgensen, Sharon EM:EX; Kennedy, Wesley EM:EX; Kilmartin, Sandra EM:EX; Lieutard, Denis EM:EX; McKillop, Greg EM:EX; McLaren, Graeme EM:EX; O'Rourke, Patrick EM:EX; Phelan, Bill EM:EX; Readshaw, Kerry EM:EX; Schroeter, Tom EM:EX; Starkes, Terri

EM:EX; Stewart, Gregg EM:EX; Stewart, Linda EM:EX; Whale, Andrew EM:EX

Subject: NW Region Weekly Report

#### **MINING**

Huckleberry - A small brush fire was reported to have occurred at Huckleberry about June 17th, in an area at the toe of the tailings dam. This was unusual, because the cause was believed to have been due to re-ignition of a fire that had been "put-out" last fall before the snows came. Mine equipment dealt with this quickly.

Huckleberry - Work has commenced on the south saddle dam to stop water from the tailings impoundment from flowing into the main pit. In the past week 2 metres of till has been placed.

Eskay creek reported a short power outage underground due to the bucket of a 3.5 yd. scoop contacting a high voltage power cable in the course of loading a truck. OHSC report is expected. Loading site relocated.

On June 25, 2001 Barrick Gold and Homestake mining Company announced plans to merge. The combined company will be the second largest gold producer with the lowest cash costs of any major producer and have approximately US \$900 million in cash. The Boards of Directors have unanimously approved the transaction. There is no indication if this will mean any changes at Eskay Creek.

The Board of Directors of Cassiar Magnesium Inc. announced on June 1 that control of the company had been acquired by the Greyling Group through ownership of 49.62% of the shares. Greyling has indicated that it will introduce and install its own nominees to the Board of Directors and operating management of the Company at the next Annual and Special Meeting, scheduled for July, 2001. Greyling does not intend to continue with the present Board of Directors or the present senior officers and management of the company. There has been no indication of how or if this will impact on the proposed rebuilding of the Cassiar mill.

#### **EXPLORATION**

Notices of Work for mineral exploration in the Northwest region have been reaching the Smithers office in a steady, slow pace to date. There have been discussions with various operators over the last month regarding permit processing, but they have yet to file them. Up to June 14, 2001, the Northwest Region has processed 46 Mineral Notices of Work. This is comparable to the last two (2) years when at this time there were 57 processed in 2000 and 53 in 1999. It is hoped with new direction and indications that the province is open for business that we will see an increase in Notice of Work applications.

Huckleberry Mine will be collecting 10 kilometres of geophysical data of the next few weeks to the northwest of the current pit. The data will be used to determine the shape of pyrite alteration in that area. It is thought that there may be additional ore reserves in the area which would extent the life of the mine.

Anyox- Paul Wojdak met with Granby Mining's consultants John Perry and Bernie Dewonck (Coast Mountain) regarding proposed exploration. Large ground position but program contingent on funding.

Westgarde (Chisholm Lk) - Hunter Dickinson Inc. are looking for a partner to drill this porphyry copper prospect, located 60 km southwest of Houston. Paul Wojdak visited the site on June 19 and discussed with Darrel Johnson. Strong iP anomaly (1-by 1.5 km in size) coincident with a new logging road exposure of chalcopyrite-pyrite-secondary biotite veining in Bulkley granodiorite stock and biotite homfels.

Amy (104 004) - a silver-zinc-lead prospect near Silvertip has been optioned by Gold City Industries Ltd. Mineralization occups at a limestone-argillite contact within the Kechika Group, in close association with the marginal phase of the

From: Wojdak, Paul EM:EX

Sent: Wednesday, June 27, 2001 10:54 AM

To: Bergen, Wally EM:EX; Bill Price; Bruce Graff; Bryan Good; Daryl Hanson; Doug Flynn;

Elaine Konschuh; Esther Burchett; Jill Pardoe; Mary Lou Malott; Wesley Kennedy; Bob Lane:

Jacques Houle; Mike Cathro; Terry, David EM:EX

Cc: Anderson, Duane EM:EX; Brown, Derek EM:EX; Conte, Rick EM:EX; Lefebure, Dave

EM:EX; McArthur, Gib EM:EX; McLaren, Graeme EM:EX; Schroeter, Tom EM:EX

Subject: Report to June 26

Anyox- Met with Granby Mining's consultants John Perry and and Bernie Dewonck (Coast Mountain) regarding proposed exploration. Large ground position but program contingent on funding.

Westgarde (Chisholm Lk) - Hunter Dickinson Inc. want a partner to drill this porphyry copper prospect, located 60 km southwest of Houston. Visited on June 19 and discussed with Darrel Johnson. Strong IP anomaly (1 by 1.5 km in size) coincident with a new logging road exposure of chalcopyrite-pyrite-secondary biotite veining in Bulkley granodiorite stock and biotite hornfels. Disappointing news that HDI needs a partner, they are looking for PGE projects.

Teck field crew passed thru Smithers en route to <u>3 months of geology/prospecting</u> on new Eskay-VMS claims at Homestake Ridge and Illiance River, south of Stewart. How long has it been since there was a program like that?

Huckleberry- 1P survey between East zone and Tahtsa Reach. Drilling planned.

Silvertip- Geophysical survey (AMT) about to begin.

Praxis- CSS Exploration will follow up airborne EM anomalies with geology/prospecting by Grant Hendrickson and Charlie Greig by Eskay-VMS targets.

Dease Lake RGS- Pacific Western Helicopters report no advance bookings for July 5. (only helicopter based in the area)

Prospectors (PAP) - Visits planned to Jim Hutter, John Hope, Peter Ross, Egil Livgard, Bernie Kreft.

John Field Elementary school (Hazelton) - participate in Careers day, June 22.

-> maggie- to print.

Smithers Exploration Group - Presentation on anticipated exploration activity at Hillton.

Smithers Exploration Golf Tournament and field trip - Planning in progress. Major sponsors confirmed.

Golf poster 2001.cdr

Paul

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