

31/12/18

ANALYTICAL QUOTATION

COMPANY: Hawker Geological

ADDRESS: 13 Thomas Place

Ravenswood

WA 6208

PHONE: +61 427 755 595

CONTACT: Andrew Hawker

INTERTEK GENALYSIS

Western Australia. 6109

15 Davison Street, QUOTE NO.: Q190209

Maddington **QUOTE VALIDITY:** 45 days

PHONE: +61 8 9263 0100 **DATE:** 16/3/18

QUOTE EXPIRY:

FAX: +61 8 9251 8110 **CONTACT:** Mick Gerrard

Dear Andrew,

Intertek Genalysis is pleased to confirm the following analytical options and prices. The prices quoted relate to our 2019 schedule of services and will be held in place until 31st of December 2019.

Summary:

- 1. ~ 7100 soil sample for Terra Leach gold focus
- 2. Terra leach options as follows 33(customized) and 58 element packages
- 3. Sample to be delivered to Intertek Perth Gate 6 of 16 Davison St. Maddington.
- 4. Sample to be clearly marked for "TERRA LEACH" as they do not need sample preparation.
- 5. Please keep batches between 150-200 sample per batch, this helps improving reporting TAT.
- 6. TAT up to 3 weeks based on 150-200 sample per batch.

All costs quoted are in Australian dollars (AUD) and exclude GST.

We look forward to working with you and providing quality analysis and service.

Kind Regards,

Mick Gerrard

Business Development Manager

Minerals

Mobile +61 429 910 063 Office +61 8 9263 0100 mick.gerrard@intertek.com

www.intertek.com

Intertek testing services Australia (Pty) Ltd, Level 3, 235 St Georges Terrace, Perth 6000, Western Australia



FREIGHT / LOGISTICS

SAMPLE DELIVERIES - PERTH LABORATORY

Contact: Stephen Wademan – Receipt and Data Supervisor Address: Gate 6, 16 Davison Street, Maddington WA, 6109

Facsimile: +61 (0) 8 9251 8160

Email: min.aus.samples@intertek.com

SAMPLE PREPARATION

Not Required

ANALYTICAL SCHEMES

TERRALEACH™ PARTIAL DIGEST GEOCHEMISTRY

Partial selective digests are carried out on soil media to detect mineralisation under cover in areas where conventional geochemistry may be ineffective. Buried ore bodies may release trace levels of metals into groundwater which are inferred to travel vertically in the overlying substrate and accumulate in the top portion of the soil profile where they are added to the background metal concentrations.

Targeted metal ions generally reside on the surfaces of soil particles requiring only weak selective digest to remove them, thus producing a superior anomaly to background contrast. This differentiates partial digests from stronger leaches which also extract occluded substrate metal ions that contribute to background levels of metal, resulting in inferior anomaly contrast.

A range of partial digests are offered designed to target certain element suites and specific element species. Detection limits may vary as a consequence of the sample media. Before commencing any new partial digest program we recommend consultation with our Geochemist. An orientation survey to help select the optimum sample media and digestion technique is strongly recommended.

TERRALEACH DIGEST TL1

An alkaline cyanide digest for gold and associated pathfinder elements.

CUSTOMISED PARTIAL DIGEST 28 ELEMENT PACKAGE TO INCLUDE CE, BA, LI, TA, TI = TOTAL 33

TL1 PACKAGE

ELEMENT	DL PPB	FINISH	ELEMENT	DL PPB	FINISH	ELEMENT	DL PPB	FINISH
Ag	0.2	MS	K	1ppm	OES	S	2ppm	OES
As	2	MS	La	0.5	MS	Sb	0.5	MS
Au	0.05	MS	Mg	0.2ppm	OES	Sn	2	MS
Bi	0.5	MS	Mn	0.2ppm	OES	Th	0.1	MS
Ca	0.2ppm	OES	Мо	1	MS	U	0.1	MS
Cd	0.5	MS	Ni	0.02ppm	MS	V	0.2ppm	OES
Со	2	MS	Р	2ppm	OES	W	10	MS
Cr	0.2ppm	OES	Pb	0.02ppm	MS	Zn	0.2ppm	MS
Cu	0.02ppm	MS	Pd	1	MS	Ce	1	MS
Fe	0.2ppm	OES	Pt	0.2	MS	Ва	0.02ppm	MS
Li	1	MS	Та	0.1	MS	Ti	0.2ppm	OES
DESCRIPTION					CODE		PRICE	
TL1 Package					TL1/OM33-TBC		\$33.50	



PARTIAL DIGEST 58 ELEMENT PACKAGE

PARTIAL DIGEST TL1

ELEMENT	DL PPB	FINISH	ELEMENT	DL PPB	FINISH	ELEMENT	DL PPB	FINISH
Ag	0.2	MS	Но	0.5	MS	Se	5	MS
Al	0.2ppm	OES	In	0.1	MS	Si	1ppm	OES
As	2	MS	K	0.2ppm	OES	Sm	0.5	MS
Au	0.05	MS	La	0.5	MS	Sn	2	MS
Ва	0.02ppm	MS	Li	1	MS	Та	0.1	MS
Ве	2	MS	Lu	0.5	MS	Tb	0.05	MS
Bi	0.5	MS	Mg	0.2ppm	OES	Те	2	MS
Ca	0.2ppm	OES	Mn	0.2ppm	OES	Th	0.1	MS
Cd	0.5	MS	Мо	1	MS	Ti	0.2ppm	OES
Ce	1	MS	Nb	0.1	MS	TI	0.2	MS
Со	2	MS	Nd	0.5	MS	Tm	0.5	MS
Cr	0.2ppm	OES	Ni	0.02ppm	MS	U	0.1	MS
Cu	0.02ppm	MS	Р	2ppm	OES	V	0.2ppm	OES
Dy	0.5	MS	Pb	0.02ppm	MS	W	10	MS
Er	0.5	MS	Pd	1	MS	Υ	1	MS
Eu	0.5	MS	Pr	0.5	MS	Yb	0.1	MS
Fe	0.2ppm	OES	Pt	0.2	MS	Zn	0.2ppm	MS
Ga	0.5	MS	S	2ppm	OES	Zr	0.5	MS
Ge	1	MS	Sb	1	MS			
Hf	0.5	MS	Sc	0.2ppm	OES			
DESCRIPTION	V						CODE	PRICE
TL1 Package							TL1/OM58	\$37.00

Note: Na, (sodium) in not offered on the TL1/OM58 package



ENVIRONMENTAL WASTE DISPOSAL LEVY

DESCRIPTION	CODE	PRICE
Environmental waste disposal levy	WL	\$0.80

SAMPLE STORAGE

All solid samples (assay pulps, bulk pulps and residues) will be stored without charge for 60 days after completion of the analysis. After this time all samples will be stored at a daily rate until the client's written advice regarding return, collection or disposal is received. If storage information is not supplied on the submission, or arranged with the laboratory in writing, the default will be to store the samples with applicable charges.

Samples submitted as all liquids will be stored (at the ambient temperature), without charge, for 60 days after completion of analysis and then discarded, unless the laboratory is advised otherwise in writing.

DESCRIPTION	CODE	PRICE
Storage of bulk or pulp samples calculated daily after 60 days	ST10	\$4.22/m³
Bulk disposal of samples	ST20	\$175.00/m³
Bulk disposal of hazardous materials		POA
Expenses related to the return of samples	ST30	At cost
Retrieval of selected samples from storage	ST40	\$90.00/hr

RESULTS TURNAROUND

Results turnaround is estimated to be within 15-20 business days from receipt of samples at Intertek's Perth Laboratory

Every effort by Intertek will be made to commit to the above results turnaround estimate. At times there may be reasons beyond the laboratories control that could impact provided estimates. Where this occurs Intertek will contact submitting company and advise on revised results turnaround estimate

Intertek understands the importance of providing high quality analytical data within the strict time frames, however to ensure turnaround is maintained the following parameters should be considered: -

- Where possible sample weights submitted are ≤3kg
- Samples will not be excessively wet, requiring extended drying times. Where this is evident Intertek will notify submitting company immediately and a revised turnaround time for the specific sample submission will be provided.
- Note that sample preparation pricing and turnaround commitments is based on the <u>routine</u> 5 minute grind time as part of
 delivering Intertek's required quality specification of P85 75um. If under routine operating conditions submitted sample
 media fails grind quality parameters, Intertek will conduct test work to establish extended grind time required to achieve
 P85 75%, with all data and test work provided to client. Additional costs may apply should additional grind time be required
 for hard material
- More frequent sample pickups or consistent deliveries is recommended for large programs to streamline laboratory operations resulting in reduced and reliable turnaround times

Elements where the concentration exceeds the upper limit will be re-digested by the appropriate analytical method which will incur additional charges. If you do not require over-range analysis or only target elements require re-analysis please advise us.

The lower and upper limits for each element shown in the tables are a guide to the ranges that can be routinely measured, however these may vary in some cases as a result of the sample matrix.



QA/QC

At Intertek Genalysis we take quality seriously. Our quality program includes reference materials which should ideally be grade and matrix matched as far as possible. We have a diverse number of reference materials at our disposal which can be used in the QC program. To ensure that the data are traceable to appropriate reference materials, please tell us something about the samples. This could include the principal elements of interest, the expected grades and the type of mineralisation expected (if any). For example "sandstone hosted uranium with grades up to 1000ppm uranium" will ensure that grade appropriate matrix matched U-Mo-As reference materials are selected. Another example may include "unmineralised soil looking for possible Pb, As contamination" will ensure that low grade soil standard are included in the job.

Certified Reference Materials and/or in house controls, blanks and replicates are analysed with each batch of samples. These quality control results are reported along with the sample values in the final report. Prices include the reporting of all QC data except where more than 10% repeats are considered necessary in cases such as poor reproducibility due to particulate gold, in which case additional repeats may be charged for.

LABTRAK

Responding to Minerals industry needs, Intertek Genalysis have further developed their "LabTrak" system to enable customers to view the status of submitted samples and download analytical results online.

LabTrak provides tools for tracking samples through the laboratory, viewing and downloading analytical data, generating customised quality control reports and managing access rights. All designed to provide information that is timely, accurate, accessible and secure.

The latest release of LabTrak delivers current and historical analytical report data in the customers preferred file format from a secure online web portal.

To register for LabTrak please use the below link; https://www.intertekminerals.com.au/Account/Login

REPORTING

We are progressing towards an electronic system at Intertek Genalysis. All final results will be delivered to the designated recipients via email, unless a hard copy report is specifically requested. Invoices will also be delivered electronically to a nominated representative in PDF format which can be printed from this file if required.

SAMPLE DELIVERIES

PERTH LABORATORY

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SAMPLE STORAGE

All solid samples (assay pulps, bulk pulps, and residues) will be stored without charge for 60 days after completion of analysis. After this time all samples will be stored at a daily rate of \$4.00/m³ until the client's written advice regarding return, collection or disposal is received. Current disposal costs are \$150.00/m³.

TERMS AND CONDITIONS

Intertek Terms and Conditions of business apply, a copy of which is available online at <u>intertek.com</u> or in our Schedule of Services & Charges or will be supplied upon request. Acceptance of this quotation or submission of samples under this quotation implies acceptance of these terms and conditions unless advised otherwise in writing.

Intertek Genalysis does not charge an administration or batch fee, however there is a minimum invoice charge of \$250.00 for routine geochemistry and \$300.00 for all other work. All the prices in this quote are calculated on the basis of multiple samples rather than single sample batches; consequently single sample jobs will be invoiced at triple rates and submissions of 2 samples will carry a 50% surcharge.