

signal after automatically tracking the satellite from the time it rises above the horizon. The incoming signals received are demodulated, synchronized (8 GHz carrier filtered away) and then recorded on two high density data tapes (HDDTs) operating in full-redundancy. Only one of the two tapes is considered to be a master at any given time, the other serving as a back up should the first develop an error.

The HDDT contains all the image data transmitted by the satellite and is the system archive. It is not, however, directly usable by researchers.

Archiving and inventory operations consist of playing back the raw data from the HDDTs, locating the image data, dividing the strip imaged by each HRV sensor into scenes and then creating a directory for the HDDT with this information in it.

Following those steps, the SPOT catalog is automatically updated. Each archived scene is defined by the following characteristics:

- geographical coordinates
- viewing conditions (multispectral or panchromatic, viewing angle)
- Grid Reference System (GRS) identification of the scene

When a user requests a particular scene, the archived data undergoes preprocessing. Five standardized preprocessing levels are available to the user:

- level 1A - radiometric corrections
- level 1B - radiometric and geometric corrections
- level 2 - radiometric and geometric corrections using ground control points (GCPs)
- Level 3 - radiometric and geometric corrections using GCPs and DTM
- level S - radiometric processing and geometric resampling for two scene registration
 - (level S1 when one input scene is level 1B)
 - (level S2 when one input scene is level 2)

The raw data are decompressed, corrected and recorded onto magnetic tapes usable by researchers. These tapes are known as Computer Compatible Tapes (CCTs). The tapes are needed to produce full resolution photographic film as well as being end products themselves.

Data Characteristics

Spatial Resolution

Mode	Band	Resolution
Multispectral	1	20 meters
	2	20 meters
	3	20 meters
Panchromatic	-	10 meters

Temporal Coverage

	Launch Date	Sensors	Status
SPOT 1	2/21/86	HRV(2)	Backup to SPOT 2
SPOT 2	1/21/90	HRV(2)	Primary Satellite

Spectral Range

Mode	Band	Micrometers
----	----	-----
Multispectral	1	.50 - .59
	2	.61 - .68
	3	.79 - .89
Panchromatic	-	.51 - .73

Data Organization

SPOT digital tapes are unlabeled with the number of volumes being determined by the imaging mode, viewing angle and level of processing. SPOT scenes vary from approximately 27 megabytes to approximately 100 megabytes of data depending on the level of processing and geometric corrections performed. A panchromatic scene consists of a single band image and the 3-band multispectral scene is organized as band interleaved by line (BIL).

Image data are recorded such that the first data pixel corresponds to the extreme Northwest corner of the scene; succeeding pixels corresponding to those immediately East of the first pixel, then line by line from North to South. All image data regardless of spectral imaging mode or level of processing are recorded as right-justified 8-bit pixels.

For additional information on data organization, select one of the topics listed below.

- Logical Volume
- Volume Directory File
- Leader File
- Imagery File
- Trailer File
- Null Volume Directory File

Products and Services

CRISP's ground station is capable of generating the following standard products:

- level 1a,
- level 1b,
- level 2a,
- level 2b,
- level 3

in SPOT CAP format,
and GEOSPOT format (SPOTVIEW®).

Standard SPOT products consist of digital 9-track tapes at 6250 bpi, 8mm Exabyte and CD-ROM products.

Applications and Related Data Sets

Current uses of SPOT data include: preparing basemaps for environmental impact studies; evaluating major geologic faults and structures; merging SPOT data with elevation information to produce a perspective view used in geologic exploration; forecasting crop yields; assessing natural disaster damage and preparing thematic maps for cartographic, urban and regional planning or transportation needs.

References

C.E.R.C.O., 1988. "The SPOT System and it's Cartographic Applications," Comite Europeen des Responsiablés de la Cartographie, A seminar held in Saint-Maude, France, June 6-15, 1988, 213p.

CNES, SPOT Image', 1989. "SPOT User's Handbook," 3 Volumes (Volume 1: Reference Manual, Volume 2: SPOT Handbook, Volume 3: SPOT Handbook Appendices), Centre National d'Etudes Spatiales and SPOT Image Corporation, Toulouse, France and Reston, VA.

Spot Image Corporation, 1986-1991. "Spotlight," Spot Image Corporation, 1986-current.

Appendix

- Grid Reference System (GRS)
- Logical Volume
- Volume Directory File
- Leader File
- Imagery File
- Trailer File
- Null Volume Directory File

Grid Reference System (GRS)

The SPOT Grid Reference System (GRS) is used to identify the geographic location of SPOT images. The grid is made up of nodes located at the intersection of columns (K) and rows (J).

When data strips are split into scenes, the SPOT GRS links each scene with two K,J designators representing a node on the GRS. Once the K,J designators have been identified for a new scene, they are added to the list of the scene's main characteristics file.

The Grid Reference System indicates the nominal location of scenes that can be acquired in the twin vertical viewing configuration for any region in the world minus the polar zones. In the case of oblique viewing, the scene centers do not normally coincide with the GRS nodes (defined by the surveying conditions of twin vertical viewing). SPOT scenes acquired in oblique viewing mode are identified by the K,J designators of the node closest to the scene center.

The GRS divides the Earth into five zones forming a symmetrical pattern on either side of the Equator. This division is dictated by the satellite's orbital characteristics and more specifically by the convergence of the ground tracks at high latitudes:

- The intermediate zone extends from 51.5 degrees North latitude to 51.5 degrees South latitude.
- The north and south zones extend from 51.5 degrees to 71.7 degrees North or South latitudes, respectively.
- The north and south polar zones extend from 71.7 degrees to the pole North or South latitudes, respectively.

In the north, intermediate and south zones, the K columns are arranged parallel to the satellite ground tracks while the J rows are latitude lines.

The pattern of nodes within the three zones is defined in terms of satellite viewing conditions corresponding to the twin vertical viewing configuration. It indicates the nominal location of the centers of scenes yielded by this viewing configuration. Oblique viewing will place the scene center always on a J row but the center may not coincide in longitude with a GRS node.

In the two polar zones the GRS node pattern is independent of satellite orbital and viewing characteristics. The pattern is obtained by hexagonal dissection using quasi-equilateral triangles where each side represents approximately 26 km (16 mi).

The K columns are derived directly from the SPOT reference tracks. Each track number N corresponds to two K columns:

$K = 2N-1$ associated with HRV-1 and located West of track N (odd number)

$K = 2N$ associated with HRV-2 and located East of track N (even number)

The distance between these two columns (i.e. between $K=2N-1$ and $K=2N$) is constant at about 58 km (36 mi) and is a direct result of the twin vertical configuration. Since the GRS nodes are located on either side of the reference tracks, the scene centers obtained in vertical viewing do not coincide with the GRS nodes. This constitutes an important difference from the Landsat Worldwide Reference System (WRS), where the nodes are located on the tracks and not on either side.

The J rows correspond to latitude lines (i.e. all GRS nodes at the same latitude share the same J designator). The interval between the rows has been calculated to ensure that endlap occurs between two successive scenes. The scenes of a given data strip are segmented in such a way that the centers are located on two adjacent rows, J and J+1.

Appendix 8

Appendix 9

sample list

regional area / locality	sample	rock type	description	analyses
Bacon-Marito				
Bacon	PTH209	Px andesite	coarse graine Px phenocryst, dark greenish color	R
Batasbas river	PKY213	float of altered andesite	light grey weak argillic altered.	GX
Batasbas river	PKY214	Px andesite	grey Px andesite lava.	T
Batasbas river	PKY215	altered tuff breccia	light grey colored weak argillie altered andesitic tuff breccia clast	R
Batasbas river	PKY216	altered andesite	grey colored argillie altered andesitic tuff breccia matrix portion, clasts are least altered	GX
Buyo River	PSM214	px andesite breccia	least alteration, cavity filled with gypsum (?)	X
Buyo River	PSM215	px andesite	least alteration, gray, joint well developed	T
Buyo River	PSM216	hb andesite	gray, smectite argillized	GX
Buyo River	PSM217	hb andesite	least altered, hb abundant: C-axis 5mm	DT
Calpi river	PKY217	float of Qtz vein	rounded float of altered rock w/ Qtz veinlet	G
Calpi river	PKY218	float of silicified rock	sub angular float of moderately silicified rock.	GX
Calpi river	PKY219	float of argillic rock	sub rounded floating boulder of creamy white colored argillic tuff.	R
Calpi river	PKY220	float of altered rock	sub angular floating boulder of altered rock w/ fine grained Py, patchy silica+Alu(?).	GX
Calpi river	PKY221	float of least altered andesite	rounded floating cobble of least altered Px andesite w/ white Qtz vein, 1cm in width.	G
Calpi river	PKY222	andesitic tuff breccia	weak argillie altered creamy white colored andesitic tuff breccia, matrix portion.	GX
Calpi river	PKY223	andesite	bluish grey colored altered andesite lava, silica mineral+Sme as altered minerals.	GXT
Cawayan river	PKY205	argillic rock	light grey colored intently argillic altered rock, high Py diss., Bt as relict.	GX

1 / 26pages

regional area / locality	sample	rock type	description	analyses
Cawayan river	PKY206	argillic rock	light grey to white colored intently argillic altered zone in least altered Px andesite.	X
Cawayan river	PKY207	Qtz-Py vein	Qtz-Py vein, 25cm in width, N75E90, in PKY206.	GX
Cawayan river	PKY208	float of Qtz-Py vein	grey Qtz-Py vein, irregular, up to 1.5cm in width, in silicified boulder floating rock.	G
Cawayan river	PKY209	Qtz-Py vein	vein-like Qtz-Py w/ Gt atain within argillic rock.	GX
Cawayan river	PKY210	argillic rock	Sme-Py argillic rock, host rock of PKY209.	X
Cawayan river	PKY211	silicified breccia	Silicified breccia, a clast is including Qtz-Py veinlets.	G
Cawayan river	PKY212	argillic rock	grey colored intently argillized rock, Py diss.	GX
Cawayan River	PSM210	altered andesite	gray argillized rock, w/ py diss., subtle clay	GX
Cawayan River	PSM211	altered andesite	gray, matrix smectite, mafic phenocryst replaced by limonite, pl by clay	GX
Cawayan River	PSM212	altered andesite	gray argillized	GX
Cawayan River	PSM213	wk. argillized tuff		GX
DDH-MO-1 (1256.7-1258.8m, 1578.0-1580.0m)	PBM010	tuff	Molybdenite (?) in Qtz veinlet stockwork: 1-2mm width. in w-sil. Ill alteration. Py diss. Anh veinlet stockwork (frature filling)	GX
DDH-MO-1 (279.5-281.3m, 279.9m)	PBM009	andesite	white to reddish gray in color. moderate to highly silicified with Py diss. acid alteration (alunite?)	GX
DDH-Pal-1 (1572-1574m)	PBM001	wk-sil andesite w/ Hm thin streak	Qtz v. 5mm wd. U20 < clear white coarse-medium grained Qtz w/ Hm thin rimb. Subtle epidote, cubedal Py diss. sparsely	GX
DDH-Pal-1RD (1625m)	PBM008	cuttings	cuttings mainley consists of gray fine grained quartz with subtle epidote, hematite. Qtz frag. +oxidized sulfide (prob. Py, flaky)	GX
DDH-Pal-2D (2395.0-2396.5m)	PBM002	black porphyritic andesite dike (?) (Cawayan Intrusive Complex)	Chl+Ep+Mag+Bt(?) +Py	WT
DDH-Pal-2D (2773.0-2773.1m)	PBM003	microdiorite (Cawayan Intrusive Complex)	mafic minerals are completely altered to Chl, Ep, felsic minerals are altered ill? or Pl? Py diss.	WT
DDH-Pal-3D (1632-1633.5m)	PBM004	Px diorite or gabbro? (Cawayan Intrusive Complex)	black in color, Px: 2-3 mm in diameter, Py diss.	WT

2 / 26pages

regional area / locality	sample	rock type	description	analyses
DDH-Pal-4D (1745m)	PBM005	cuttings	silica (Qtz) fragment + alt. andesite w/ Py dissem.	GX
DDH-Pal-4D (2091-2092m)	PBM006	propylitic alt. andesite w/ intensely Py dissem.	vein 30mm wd. Ü55 dominantly Cal. w/ patchy white clean Qtz. Py diss. corresponding shear zone.	GX
DDH-Pal-5D (2247.8m)	PBM012	argillized rock	fine grained andesite? anhydrite veinlets, Anh fill interstitially. Hl, Chl altered?	GX
DDH-Pal-8D (1500m)	PBM007	volcanic breccia	Clasts are 3-4 cm in length and 2-3 cm in diameter. The clasts are andesitic tuff in composition. The interstitial vein is a dark glassy mineral. It is slightly chloritized with disseminated Py. There are more Py on the clasts, but Py also exist also	GXT
DDH-PB-1A (2262.8m)	PBM011	Qtz vein	w=3cm gray to white in color. very fine grained Qtz with a little Py and very fine grained black mineral. host rock: bleached andesite, silicified/Py diss.	GX
east of Cawayan	PTH205	Px andesite	outcrop at bottom of the valley,	WDT
Malobago	PTH206	Px andesite	weak weathered, magnetic susceptibility	G
Malobago	PTH207	Px andesite	at waterfall	R
Malobago	PTH208	Px andesite	dark gray color, magnetic susceptibility	WDT
near Salvacion	PTH203	silicified rock	white - reddish brown color, weak silicified	GXT
near Salvacion	PTH204	altered rock	weak-moderate silicified, yellowish brown color, goethite stained	GX
Pili-Cumadcad	PKY201	Hbl-Px andesite	yellowish white least altered Hbl-Px andesite massive lava, Sme clay after mafic pheno. in place.	GX
Pili-Cumadcad	PKY202	Hbl-Px andesite	grey flow banded fresh Hbl-Px andesite lava flow, N56E26S platy jointing.	T
Pili-Cumadcad	PKY203	Hbl-Px andesite	light grey weak argillic altered Hbl-Px andesite, Sme after groundmass.	GX
Pili-Cumadcad	PKY204	lapilli tuff	yellowish brown colored weathered andesitic lapilli tuff.	G
Pili-Cumadcad	PSM203	altered andesite	pale gray, smectite argillization	X
Pili-Cumadcad	PSM204	argillized rock	50cm float, limonite, kaolinite, argillized rock	GX
Pili-Cumadcad	PSM205	argillized rock	uncohesive terrace debris, accompanying kaolinite-smectite	G

3 / 26pages

regional area / locality	sample	rock type	description	analyses
Pili-Cumadcad	PSM206	volcanic sandstone (?)	qz-hb-plag., least altered boulder in PSM205	T
Pili-Cumadcad	PSM207	hb andesite	gray - white, weak argillized, hb and pl: pseudomorph	X
Pili-Cumadcad	PSM208	hb andesite	float, gray hb-pl andesite w/ magnetite	R
Pili-Cumadcad	PSM209	hb andesite	gray, very weak argillized, w/ magnetite	X
Salvacion spring	PTH201	clay	light gray-pale yellowish color clay deposited in steaming ground, sulfuric smell	GX
Salvacion spring	PTH202	silicified rock	opaline silica-cristobalite, hydrothermal breccia float, white color clasts, black color matrix	GX
Eastern Caramoan				
Albert Hiway	PKY282	float of Qtz vein	floating boulder of clear coarse grained Qtz vein, segregation type.	G
Alto Point, Maagnas	PKY283	meta gabbro	plac greenish colored coarse grained meta gabbro, schistose.	R
Bulalacan	PTH310	Green Cu stained rock	Float. Malakite? stained andesite	G
Bulalacan	PTH311	andesite?	coarse gr. Pl, Px phenocryst. pale purplish to greenish color. epidote vein stockwork. dike rock?	T
Bulalacan	PTH312	metavolcanics	fine grain, pale greenish gray color/	T
Bulalacan	PTH313	metavolcanics	green color. compact. chlorite-epidote alt. green schist metamorphism? Qtz+Ep veinlet stockwork: general trend N60 W , 42 S . shear zone: N30 W , vertical	R
Bulalacan	PTH314	diorite	Float. greenish color. weak metamorphosed.	WDT
Bulalacan	PTH315	diorite	greenshe color. Qtz veinlet: w=2-4mm, along joint?(N50 W , 30 S) cutted by Ep vein (N50 E , 76 N)	R
Bulalacan	PTH316	metasediment	grain size: silt-sand alteration. particles ara composed of volcanic clasts. pale greenish gray to pale purplish gary color.	T
East Caramoan	PSM268	altered greenschist	m-c grained euhedral py disseminated, shear zone w/ width of 1.5m extends concordant to surownding schistosity, possibly epigenetic hydrothermal alteration	GXT
Pagsangahan	PPRS29A			GX
Pagsangahan	PPRS29C			GP

4 / 26pages

regional area / locality	sample	rock type	description	analyses
Pagsangahan	PPRS29D			GX
Pagsangahan	PPRS30A			GX
Pagsangahan	PPRS30B			GX
Pagsangahan	PPRS30C			GX
Pagsangahan	PPRS32			GP
Gate Mountains				
Aguinald	PSM222	andesite	gray argillized andesite, smectite possibly	GX
Aguinald	PSM223	andesite	dark gray, least altered andesite, aphanitic, (slightly silica rich ?)	T
Aguinald	PSM224	andesite	gray - brownish argillized, (weathered)	X
Bon-ot	PSM231	silicified rock	intensely silicified, original texture unknown	GX
Bon-ot	PSM232	argillized rock	oxidized, w/ dense limonite (hematite-rich)	G
Bon-ot	PSM233	argillized rock	kaolinite argillized lava, w/ subtle limonite streak	G
Bon-ot	PSM234	argillized rock	kaolinite argillized tuffaceous rock	G
Bon-ot	PSM235	argillized rock	kaolinite argillization	GX
Culasi, Matnog	PKY248	float of Qtz	rounded floating boulder of brecciated Chl-Qtz	G
Culasi, Matnog	PKY249	float of silicified rock	rounded floating boulder of silicified breccia w/ black matrix and yellowish patch.	GX
Culasi, Matnog	PKY250	float of Qtz	rounded floating boulder of Chat-Qtz. reddish yellow-greenish yellow-white banding w/ cavity in place, recrystallized silica sinter(?)	G
Culasi, Matnog	PKY251	float of silicified rock	rounded floating boulder of reddish brown colored opaline silicified breccia w/ white clast of Qtz, minor Py diss.	GX
Culasi, Matnog	PKY252	float of argillite rock	rounded floating boulder of white argillite rock, Alu+Kao(?).	GX

5 / 26pages

regional area / locality	sample	rock type	description	analyses
Culasi, Matnog	PKY253	float of Qtz	angular floating boulder. Partly brecciated and partly banding texture, chalcodonic, sinter(?)	G
Culasi, Matnog	PKY254	float of silicified rock	rounded floating boulder of grey colored intensely silicified rock w/ fine grained Py diss.	G
Culasi, Matnog	PKY255	andesitic tuff breccia	very weak altered (weathering) andesitic tuff breccia to volcanic conglomerate, matrix supported.	G
Culasi, Matnog	PKY256	float of silicified rock	subrounded floating boulder of intensely silicified rock w/ minor Py.	R
Culasi, Matnog	PKY257	Px andesite	least altered Px andesite lava w/ white Qtz veinlets.	G
East of Mt. Sujac	PKY224	float of silicified rock	rounded floating boulder of white grey colored altered opaline silicified rock, after andesite	GX
East of Mt. Sujac	PKY225	andesite	bluish colored vitric aphanitic andesite lava flow, clay after mafic in place, N7E6W platy jointing.	WT
East of Mt. Sujac	PKY226	float of altered andesite	light grey massive weak altered (weathered) andesite	R
East of Mt. Sujac	PKY227	Px andesite	grey Px andesite lava, vitric, N14E30W platy jointing.	WT
East of Mt. Sujac	PKY228	tuff breccia	weak argillite altered andesitic tuff breccia to lapilli tuff within faulting zone trending N70 to 80E	GX
East of Mt. Sujac	PKY229	Px andesite	purplish black colored phenocryst-poor Px(?) andesite lava flow, same as PKY225.	T
Gate Mountains	PSM218	tuff or sandstone	gray wk argillized andesitic tuff (?), weak cohesive, w/ subtle limonite	X
Gate Mountains	PSM219	px andesite	wk argillization (weathered ?)	GX
Gate Mountains	PSM220	tuff or sandstone	weak argillization, smectite; (weathered ?)	GX
Ginablan River	PTH262a	rhyolite	moderate weathered, coarse biotite flakes.	R
Ginablan River	PTH262b	Px andesite	Float, fine-medium grained Px andesite.	R
Ginablan River	PTH262c	Hbl andesite	Float, medium grained Hbl andesite.	R
Marinab, Bulan	PKY230	Hbl-bg-Px andesite	dark grey colored Hbl-bg-Px andesite lava flow, horizontal platy jointing.	T

6 / 26pages

regional area / locality	sample	rock type	description	analyses
Marinab, Bulan	PKY231	float of silicified rock	moderately silicified andesite, Gt+Hem stain in place, rounded boulder.	GX
Marinab, Bulan	PKY232	float of silicified rock	yellowish brown colored moderately silicified rock, leaching, rounded boulder	GX
Mirinda, Matnog	PKY246	Px andesite	dark grey colored Px andesite massive lava.	R
Mirinda, Matnog	PKY247	tuff	weak purplish grey colored very weak argillic(?) altered andesitic coarse grained tuff	GX
Sua	PTH220	volcanic breccia	Volcanic breccia dike?. w=1.5m in Px andesite lava. N15 °E, vertical. Breccia: rounded, f ³ =1.0 cm x 40 cm.	G
Sua	PTH221	altered rock	Float. from the same place of PTH220. Moderate-silicified. Py dissemination	GX
Sua	PTH222	silicified rock	Float. Big boulder. f ³ =3.5m. Highly silicified. Qtz-Alu=Geo-Py	GX
Sua	PTH223	silicified rock	Float. Hydrothermal breccia? matrix: white milky opaline silica. H °M silicified.	GX
Sua	PTH224	argillized rock	Moderate argillic. Sme alt? or Kao? white - gray color.	GX
Sua	PTH225	argillized rock	Fault plane? EW, 6S °S dipping. Horizontal slicken side.	G
Sua	PTH226a	altered rock	W-silicified. M-argillized. Py dissemination. Original rock: andesite. white - yellowish brown color.	G
Sua	PTH226b	silicified rock	M °H silicified. Py dissemination.	GX
Sua	PTH227	altered rock	argillized. Py dissemination.	GX
Sua	PTH228	silicified rock	Float. highly silicified.	GX
Sua	PTH229	altered rock	M-argillized, W-silicified. yellowish - brown color.	G
Sua	PTH230	altered rock	Highly argillized. Sme alt? Py dissemination. white - yellowish color.	GX
Tugas	PSM225	silicified rock	float, white porcelain-like silica rock, intensely silicified, w/ granule texture, cavity filled with silica	GX
Tugas	PSM226	silicified argillized rock	float, accompanied dense fine grained py aggregate with some clay (kaolinite ?)	GX

7 / 26pages

regional area / locality	sample	rock type	description	analyses
Tugas	PSM227a	silicified rock	float, pinkish, fine grained alunite expect to be detected	GX
Tugas	PSM227b	silicified argillized rock	float (3m), clay possibly kaolinite	GX
Tugas	PSM228	silicified argillized rock	float (3m), clay possibly kaolinite	GX
Tugas	PSM229	px andesite	little aphanitic, propyrite alteration, px (cpx) replaced by chlorite	T
Tugas	PSM230	andesite	gray, vesicular andesite, cavity coated by zeolite (?)	X
Tugas, Matnog	PKY233	float of silicified rock	subrounded floating boulder of light grey colored silicified breccia, highly Py diss, Py fine veinlet, white clay due to supergene alteration.	GX
Tugas, Matnog	PKY234	argillic rock	grey colored weak to moderately argillic altered andesite lava flow, minor Py diss.	GX
Tugas, Matnog	PKY235	argillic rock	bluish grey colored moderately argillic altered rock after andesite lava, 2% py diss.	GX
Tugas, Matnog	PKY236	Px andesite	least altered massive andesite lava, greenish grey clay mineral after mafic phenocryst (Px?).	GT
Tugas, Matnog	PKY237	argillic rock w/ Qtz veinlet	light grey colored argillic alteration zone, n15W75E, 60cm in width, w/ very fine Qtz veinlet, 5% py diss, within least altered andesite.	GX
Tugas, Matnog	PKY238	Qtz vein	white massive Qtz vein, 4cm in width, brecciation in place, within argillic altered andesite. due to percolation?	GX
Tugas, Matnog	PKY239	argillic rock	light grey Sme argillic rock, compact, Py diss, host rock of PKY238.	X
Tugas, Matnog	PKY240	Py vein	irregular Py vein, 1cm in width, within PKY239.	G
Tugas, Matnog	PKY241	Bl-bg-Px andesite	grey colored massive Bl(?) -bg-Px andesite	WT
Tugas, Matnog	PKY242	Qtz-Py vein	Qtz+Py veinlet, less than 2mm in width, within PKY241.	G
Tugas, Matnog	PKY243	silicified rock	light grey colored silicified zone, 20cm in width, w/ Qtz veinlet, py diss.	G
Tugas, Matnog	PKY244	argillic rock	grey Sme argillic rock from 5m in width altered zone.	GX
Tugas, Matnog	PKY245	argillic rock	light grey colored strong argillic altered rock, less than 5% Py diss.	GX

8 / 26pages

regional area / locality	sample	rock type	description	analyses
upstream of Sua	PTH251	silicified rock	Float, highly silicified rock. Qtz-Alu? veinlet like structure	GX
upstream of Sua	PTH252	silicified rock	Float. $f^2=60\text{cm}$. almost Qtz. minor Goethite. highly silicified.	X
upstream of Sua	PTH253	silicified rock	Float. $f^2=1\text{m}$. Highly silicified. Qtz-Goe	X
upstream of Sua	PTH254	Px andesite	lava. platy joint develop: N55 °W, horizontal. very fine grained. aphanitic.	WT
upstream of Sua	PTH255	argillized rock	andesite. yellowish brown color. weak argillic alt. andesite	GX
upstream of Sua	PTH256	Px andesite	from same outcrop of PTH255. aphanitic. shear zone: $w=20\text{cm}$, N45 °E, dipping 65 °NW	R
upstream of Sua	PTH257	altered rock	andesite. weak silicified, moderate argillized andesite. Py dissemination	GX
upstream of Sua	PTH258	silicified rock	Highly argillized rock. Qtz-Alu-Geo?	GX
upstream of Sua	PTH259	silicified rock	Float. Highly silicified.	GX
upstream of Sua	PTH260	silicified rock	moderate silicified, argillized rock float.	GX
upstream of Sua	PTH261	dyolite	Float.	R
west of Mt. Sujac	PTH210	Px andesite	fine grained, weak weathered	R
west of Mt. Sujac	PTH211	volcanic breccia	matrix was collected. Smc alteration: weathering?, clast supported, clast: subangular subrounded, $f^2=1.0\text{cm}$ 30 cm.	GX
west of Mt. Sujac	PTH212	volcanic breccia	matrix was collected. Smc alteration: weathering?, moderate weathered. Clasts are scoriatic. agglomerate?	GX
west of Mt. Sujac	PTH213	Px? andesite	aphanitic andesite. joint: NS, dipping 69 °E	WT
west of Mt. Sujac	PTH214	altered rock	floats. white pale brown color. Kaolinite alteration.	GX
west of Mt. Sujac	PTH215a	argillized rock	strong pyritization. Smc+Kao? altered. yellow white black color. Joints: N8 °E, vertical.	GX
west of Mt. Sujac	PTH215b	argillized rock	strong pyritization. Smc+Kao? altered. yellow white black color. Joints: N8 °E, vertical.	GX

9 / 26pages

regional area / locality	sample	rock type	description	analyses
west of Mt. Sujac	PTH216	Px andesite	aphanitic andesite lava	R
west of Mt. Sujac	PTH217	volcanic breccia	Goethite, hematite stained. Highly weathered.	GX
west of Mt. Sujac	PTH218	opaline silica	Float. Host rock: lapilli tuff	GX
west of Mt. Sujac	PTH219	altered rock	Float. Fe stained. Goethite+hematite	GX
west of Pange	PTH241	volcanic breccia	clasts: polytictic, subrounded, $f^2=1\text{cm}$ -1.5m. dark gray Px andesite clasts. with many small amigdaloidal cavity.	R
west of Pange	PTH242	volcanic breccia	matrix: weathering.	GX
west of Pange	PTH243	Px andesite	dark greenish color: partly very weak altered: Smc alt? Most of the clasts are fresh.	GX
west of Pange	PTH244	volcanic breccia	weathering. matrix was collected as a sample.	GX
west of Pange	PTH245	silicified rock	Float. red colored Fe-silica stained rock.	G
west of Pange	PTH246	volcanic breccia	very weak altered (due to weathering?), pale greenish gray color. Smc alt.	GX
west of Pange	PTH247	Hbl-Px andesite	Black color. columnar crystals homblende	R
west of Pange	PTH248	silicified rock	Float. same location as PTH247. Qtz-Alu alt?	GX
west of Pange	PTH249	Hbl-Px andesite	sheared structure. sheared plane: N30 °E, dipping 25 °SE	GX
west of Pange	PTH250	Px-Hbl andesite	glassy andesite. small amount of Px andesite. include columnar Hbl phenocryst.	WDT
west of Tugaa	PTH231	silicified rock	Float. M H silicified. Py dissemination. $f^2=2\text{m}$. Qtz-Alu alt? In cavities: Alunite?	GXT
west of Tugaa	PTH232	Px andesite	Highly weathered Px andesite	G
west of Tugaa	PTH233	silicified rock	Float. highly silicified. Strong pyritization. white - light gray color.	GXT
west of Tugaa	PTH234	argillized rock	Highly argillized alt. Smc alt. Py dissemination. Major joint: N80 °E, dipping SW.	GX

10 / 26pages

regional area / locality	sample	rock type	description	analyses
west of Tugas	PTH235	argillized rock	Highly argillized andesite. Sme alt? Py dissemination.	GX
west of Tugas	PTH236	argillized rock	Moderate argillic andesite. Py dissemination. Joint: N25 °E, dipping 72 °W	GX
west of Tugas	PTH237	argillized rock	Moderate argillized. Py dissemination. Sme alt.	X
west of Tugas	PTH238	weak argillized rock	Weak argillized alt. andesite. Sme alt.	G
west of Tugas	PTH239	argillized rock	Float. Argillized andesite. Py dissemination.	GX
west of Tugas	PTH240	argillized rock	Highly argillized rock. Py dissemination.	GX
Kibay				
Alawihaw creek	PTH333	Hbl-Bt andesite	Hbl, Bt are fresh.	WDT
Alawihaw creek	PTH334	Qtz vein	banded Qtz vein. float. w=40cm. 5mm - 3cm/ one band width.	GF
Alawihaw creek	PTH335	argillized rock	moderate argillized. Py dissem. Sme alt. adjucent to hot spring.	G
Alawihaw creek	PTH336	Qtz vein	in the same outcrop of PTH335. w=0.5cm - 4cm. trending EW, dipping 26 °N.	G
Alawihaw creek	PTH337	silica sinter	form sinter terrace. height (width)=40cm - 1m. changed into Qtz.	G
Alawihaw creek	PTH338	Goethite vein	w-M silicified rock	G
Alawihaw creek	PTH339	Qtz vein	w=12cm, N30 °E, 76 °E dip. with Py in argillized, w-silicified rock.	G
Alawihaw creek	PTH340	Qtz vein	w=1.5cm, N45 °E, 50 °SE dip. in highly silicified andesite.	G
Alawihaw creek	PTH341	Qtz vein	w=20cm, porcelain Qtz with Py. N60 °E, 72 °S dip.	G
Alawihaw creek	PTH342	andesite	w-argillized. fault: N20 °W, vertical.	R
Alawihaw creek	PTH343	andesite	w-argillized.	X
Alawihaw creek	PTH344	Qtz vein	in PTH343 outcrop. porcelain Qtz. w=1mm -2cm. general trend:N70 °E.	G

11 / 26pages

regional area / locality	sample	rock type	description	analyses
Alawihaw creek	PTH345	Qtz veinlet with argillized rock	H - W argillized. Py dissem. along fault Qtz vein: N70 °W, 55 °S.	G
Alawihaw creek	PTH346	silicified vein	black color. w=3- 10mm. N50 °W, 40 °N with Py.	G
Alawihaw creek	PTH347	argillized rock	mixed layer clay? bleaching. Py dissem.	GX
Alawihaw creek	PTH348	Qtz vein	in PTH347 outcrop. N45 °E, vertical. Py rich	G
Alawihaw creek	PTH349	argillized rock	hydrothermal breccia. w-silicified. highly argillized. Py dissem. mixed layer clay?	GX
Alawihaw creek	PTH350	carbon materials	inclusions in pyroclastic flow deposit: M-silicified, argillized. carbon could be changed into graphite?	GX
Bacaco	PKY286	float of silicified rock	floating boulder of intensely silicified rock, hematite dominant limonite stain.	G
Bacaco	PKY287	argillic rock	massive grey colored moderately to intensely argillic altered rock after andesite w/ white patchy (Kao?), Py diss.	GX
Bacaco	PKY288	silicified rock	silicified block w/ stain of Hem, within argillic rock.	G
Bacaco	PKY289	Qtz vein	light grey colored Qtz vein within argillic rock, lenticular, less than 8mm in width, trending N20W, dipping vertically.	G
Bacaco	PKY290	float of Qtz vein	floating boulder of clear crystalline Qtz vein, 3cm in width, with comb texture, within intensely silicified and Py disseminated altered rock.	GF
Bacaco	PKY291	altered rock	dark grey colored intensely Py disseminated altered rock w/ minor green colored dots, after andesite lava or tuff.	GX
Bacaco	PKY292	silicified rock	intensely silicified rock w/ Lim stain.	GX
Bacaco	PKY293	altered rock	white grey colored argillic altered rock w/ minor green dots, same as PKY291 except color.	G
Bacaco	PKY294	Qtz vein	crystalline Qtz vein w/ comb texture, less than 3cm in width, within Py disseminated silicified zone, 4m in width.	GF
Bacaco	PKY295	andesite	light grey colored P1-andesite lava, weak altered, light green small dots.	GX
Kibay	PSM275	qz vein (?) aprite vein (?)	pale greenish, texture changes to part by part within a vein (5-10cm), from aphanitic to fine granular, N10W -90deg.	G
Kibay	PSM276	altered andesite	gray, argillized, w/ py dissemination	GX

12 / 26pages

regional area / locality	sample	rock type	description	analyses
Kilbay	PSM277	silicified rock	float w/ diameter of 20mm+, densely silicified, w/ limonite, massive	G
Kilbay	PSM278	hb andesite	hb bearing least altered andesite	R
Kilbay	PSM279	altered andesite	brownish, weathered, argillized, uncohesive, possibly andesite	GX
Kilbay	PSM280	silicified rock	densely silicified rock, w/ limonite	G
Layaton River	PTH317	silicified rock	float. Highly silicified with small vugs, partly goethite stained.	G
Layaton River	PTH318	argillized rock	float. W-sil. highly argillized. Py dissem. Cr+Smc+minor Kao?	GX
Layaton River	PTH319	lapilli tuff	clast. Hbl-Bt dacite. occasionally f=20cm. M-arg. partly W-sil. Py dissem. joints: N52 -E, 68 -S; N75 -E, 55 -N; N25 -W, 60 -W.	GX
Layaton River	PTH320	argillized rock	along fault Py stringer. H-M argillized. Py dissem.	GX
Layaton River	PTH321	Qtz vein	chaledonic. N40 -W, vertical. w=1-6mm. in lapilli tuff	G
Layaton River	PTH322	Qtz vein	chaledonic. same outcrop of PTH322. w=3-4mm. Py stringer	GF
Layaton River	PTH323	silicified rock	highly silicified	R
Layaton River	PTH324	lapilli tuff	highly argillized. Py dissem.	GX
Layaton River	PTH325	Qtz vein	black color. chaledonic Qtz vein. w=0.5cm - 10cm. N70 -E, 42 -N dip. cutted by PTH326 Qtz vein.	GX
Layaton River	PTH326	Qtz vein	white - gray color. w=0.5 - 3cm. N80 -E, 50 -N dip. cutted by fault: N65 -W, 42 -N dip.	G
Layaton River	PTH327	argillized rock	pale greenish color. Smc alt? propylitic alt.	X
Layaton River	PTH328	andesite	weak-argillized.	R
Layaton River	PTH329	silicified rock	highly silicified. vuggy Qtz. vugs are formed by supergene.	G
Layaton River	PTH330	silicified rock	highly silicified. massive. joint develop. N10 -E and N56 -E trending are dominant.	G

13 / 26pages

regional area / locality	sample	rock type	description	analyses
Layaton River	PTH331	andesite	Hbl andesite. Chl, Smc alt. propylitic alt.	GX
Layaton River	PTH332	andesite	low temperature propylitic alteration. pale greenish gray. Py dissem.	GX
Tablon Munti	PKY284	Bt-Hbl dacitic andesite	Qtz bg Bt-Hbl andesite.	R
Tablon Munti	PKY285	clay	brownish dark grey colored plastic clay, "Ball Clay".	R
the south of Susungdalaga Mts.	PKY296	argillic rock	dark grey colored intensely argillic altered rock w/ Py diss, after Bt-Hbl andesite of PKY297 obviously.	GX
the south of Susungdalaga Mts.	PKY297	Bt-Hbl andesite	Bt-Hbl andesite lava, country rock of the argillic / silicified alteration in this area.	WDT
the south of Susungdalaga Mts.	PKY298	argillic rock	pale green to grey colored intensely argillic rock w/ Bt as relict, after Hbl-Bt andesite.	GX
the south of Susungdalaga Mts.	PKY299	float of silicified breccia	floating boulder of silicified breccia w/ Lim stained matrix, degree of alteration of fragments vary.	G
the south of Susungdalaga Mts.	PKY300	argillic andesite	deep greenish grey colored weak argillic Hbl-Bt andesite w/ minor Py diss, immediately north of the fault trending N60W dipping 65SW.G95	GX
the south of Susungdalaga Mts.	PKY301	altered Hbl-Bt andesite	pale green colored altered Hbl-Bt andesite w/ Qtz-Py network.	GX
the south of Susungdalaga Mts.	PKY302A	silicified vein	white colored highly silicified vein, trending N12W dipping 90, 1.7m in width, within argillic rock. layered portion w/ Py diss.	G
the south of Susungdalaga Mts.	PKY302B	silicified vein	ditto. porous portion w/ Lim stain.	G
the south of Susungdalaga Mts.	PKY302C	leached altered rock	acid leached highly porous rock, host rock of silica vein.	GX
the south of Susungdalaga Mts.	PKY302D	argillic rock	light grey colored argillic rock hosting silicified vein network in same trend of the silicified vein, 2m in width.	X
the south of Susungdalaga Mts.	PKY303	silicified rock	intensely Py disseminated highly silicified rock w/ silica-Qtz veinlets in place.	G
the south of Susungdalaga Mts.	PKY304	argillic rock	light grey colored intensely to moderately argillic altered rock w/ silicified portion, Py diss.	GX
the south of Susungdalaga Mts.	PKY305	silicified rock	white to light grey colored intensely silicified rootless vein within argillic (Smc-Py) rock.	GX
the south of Susungdalaga Mts.	PKY306	least altered andesite	greenish grey colored low-temperature propylitic altered Hbl-Bt andesite.	GX

14 / 26pages

regional area / locality	sample	rock type	description	analyses
the south of Susungdalaga Mts.	PKY307	argillic rock	grey colored moderately argillic altered rock w/ Py diss.	R
the south of Susungdalaga Mts.	PKY308	altered andesite	pale green colored moderately compact argillic altered andesite, Py diss.	GX
the south of Susungdalaga Mts.	PKY309	silicified zone/vein	intensely silicified zone vein(?), 3m in width, trending NS dipping 90.	G
Tonton River	PTH351	Hbl-Bt dacite	clasts in volcanic breccia: subrounded, f ^h =3cm-80cm. Sme alt. Pl phenocryst=1cm. mafic phenocryst: opacite	GX
Tonton River	PTH352	Hbl-Bt dacite	pale greenish gray. Sme alt. Bt, Qtz, Pl phenocrysts. glassy matrix.	R
Tonton River	PTH353	Bt dacite	glassy. Bt: fresh. Fd: large phenocryst, more than 1cm	WDT
Tonton River	PTH354	argillized rock	Highly argillized. Py dissem. Sme alt.	GX
Tonton River	PTH355	Bt dacitic volcanic breccia	clast of volcanic breccia. subangular. monolithologic. autobrecciated lava?	R
Tonton River	PTH356	volcanic breccia	Bt-Hbl dacitic clasts: 1cm-1m. Fd phenocryst>=1cm.	R
Tonton River	PTH357	limestone	float. f ^h =50cm - 1m. glassy.	R
Tonton River	PTH358	Bt dacite?	aphyric. Fd phyrice>=1cm. mafic alt. must be Hbl.	T
Tonton River	PTH359	silicified rock	float. highly silicified. Japilli tuff. Py strong dissem.	G
Tonton River	PTH360	silicified rock	float. highly silicified. Japilli tuff. Py strong dissem.	G
Tonton River	PTH361	Bt dacite	pale green color. chlorite alt. low temperature propylite alt.	X
Tonton River	PTH362	silicified rock	float. M-silicified. black-dark gray Qtz veinlet with Py.	G
Tonton River	PTH363	Qtz vein	float. at panning site. high temperature Qtz vein. f ^h =15cm.	G
Tonton River	PTH364	Qtz vein	float. at panning site.	G
Tonton River	PTH365	Hbl-Bt dacite	no alteration. near panning site.	T

Larap-Exciban

15 / 26pages

regional area / locality	sample	rock type	description	analyses
Capacuan mine	PKY339	Py-Mag-Lm vein	4cm in width within metasediments.	G
Igang prospect	PTH391	Qtz vein	stockwork Qtz vein, w=3mm-1cm. vein interval: 15-40cm	GF
Igang prospect	PTH392	schist	host rock of PTH391 stockwork Qtz veins. dark greenish color. highly Py dissem. supergene acid alteration: kaolinitic	X
Igang prospect	PTH393	Qtz vein	high temperature Qtz. w=20cm, N60 °W, 75 °NE dip. cutting by Qtz vein (w=6cm, N40 °E, 74 °W dip.). host rock: dioritic rock	GF
Igang prospect	PTH394	Qtz vein	with Py, Cp. Cp coated by covellite. black metallic minerals with clear cleavage	P
Igang prospect	PTH395	Hbl dioritic rock	host rock of PTH396 stockwork veins. looks like Tamisan diorite	T
Igang prospect	PTH396	Qtz vein	stockwork Qtz vein, w=8 cm. stockwork vein w=0.5-8.0 cm. vein interval: 2-20 cm.	G
Larap-Exciban	PSM287	magnetite ore	float (20cm), massive, fine grained, slightly oxidized	O
Larap-Exciban	PSM288	andesite	float (5m), least altered plagioclase abundant andesite,	R
Larap-Exciban	PSM289	magnetite ore	from ore stockpile, massive m - c grained, w/ green Cu stain (marachite dominant) and Cu-sulfate	O
Larap-Exciban	PSM290	qz vein	hosted in magnetite ore outcrop, white - clear, m - c grained, 5 -10 cm width, N25W 35E, euhedral qz in druse	GF
Larap-Exciban	PSM291	hb andesite	float, least altered, Larap volcanics	R
Larap-Exciban	PSM292	diorite	float, weathered	R
Larap-Exciban	PSM293	altered andesite	gray, weakly silicified, w/ py dissemination	G
Larap-Exciban	PSM294	andesite	pl abundant, w/ py dissemination, w/ subtle sporadic qz veinlet of around 2mm	G
Larap-Exciban	PSM295	altered andesite	argillized, w/ dense limonite	GX
Larap-Exciban	PSM296a	qz diorite	coarse grained, w/ py dissemination	GP
Larap-Exciban	PSM296b	qz vein (?)	hosted in PSM296a, clear coarse grained, 10cm, N25E -90deg, several parallel veinlet of 2-5cm observed, some possibility of apritic dike	GT

16 / 26pages

regional area / locality	sample	rock type	description	analyses
Larap-Exciban	PSM297	silicified rock	densely silicified rock w/ py dissemination	G
Larap-Exciban	PSM298	silicified rock	reddish gray, densely silicified rock, w/ qz veinlet network	G
Larap-Exciban	PSM299a	altered andesite	smallish argillized part in PSM299b, hematite abundant	GX
Larap-Exciban	PSM299b	hb andesite	gray, pl abundant	R
Matalang	PTH383	andesitic hornfels?	black colored. Pl: thin laths.	T
Matalang	PTH384	Qtz vein	greenish color. Py, Cp. fibrous radiated greenish minerals actinolite? N45 -W, 60 -SW.	P
Matalang	PTH385	Qtz vein	stockwork Qtz vein, w=1 - 3cm vein interval: 3 - 20cm, host rock: andesitic hornfels?	GX
Matalang	PTH386	andesitic hornfels?	greenish color. magnetite dissem. magnetite stringer.	R
Matalang	PTH387	silicified rock	Qtz vein stockwork. silicified host rock. Py, Mt dissem. vein interval: 3 -10cm.	PF
Pangono north?	PTH389	dacitic porphyry	Qtz vein old adit site, Fd pyric porphyry Fd: f=3mm - 1cm. what is black minerals?	T
Pangono north?	PTH390	silicified porphyry	Py disseminate. mixed layer clay alteration?	GX
Paracale National mine	PKY335	altered rock	light grey altered rock tuff(?) or andesite(?), host rock of Py-Qtz vein.	X
Paracale National mine	PKY336	Ma-Py-Qtz vein	Ma stained Py-Qtz vein, 8cm in width.	G
Paracale National mine	PKY337	Py-Qtz vein	banding.	G
Paracale National mine	PKY338	Py-Qtz vein	massive, 30cm in width, N40E65NW, within andesite or tuff.	G
Ponarco	PTH388	magnetite ore	magnetite, Py, hydrothermal Biotite, Ep. Amp, or Px? very few Cp.	P
Tumbaga prospect	PKY326	Py-Lm-Qtz vein	Py-Lm-Qtz vein w/ Ccp(?)	G
Tumbaga prospect	PKY327A	Py-Qtz vein	crystalline comb texture in Qtz portion, 5cm in width.	GF

17 / 26pages

regional area / locality	sample	rock type	description	analyses
Tumbaga prospect	PKY327B	argillic rock	pale green argillic rock after tuffaceous sediments, host rock of PKY327A.	X
Tumbaga prospect	PKY328	sandstone	weak greenish grey colored, representative host rock of Qtz vein system.	T
Tumbaga prospect	PKY329	Py-Qtz vein	smoky and darty colored, 2cm in width.	GPF
Tumbaga prospect	PKY330	Qtz-Clay vein	Qtz-Clay vein in fault zone, NS40W, w/ Ma	G
Tumbaga prospect	PKY331	float of andesite, diorite		R
Tumbaga prospect	PKY332	altered porphyry andesite	pale green altered porphyritic andesite.	X
Tumbaga prospect	PKY333	Py-Lm-Qtz vein	crystalline.	GF
Tumbaga prospect	PKY334	Lm-Qtz vein	(Py)-Lm-Qtz vein, "high grade" type. (N10E70E)	G

MI. Bagacay

B. Mancasay	PKY310	clayey soil	reddish yellow colored clayey soil including fragments of crystalline Qtz, Lm block	G
B. Mancasay	PKY311	altered rock	reddish brown colored porous altered rock after andesite in clayey soil.	R
B. Mancasay	PKY312	float of Hb andesite	least altered Hb andesite float.	R
B. Mancasay	PKY313	Qtz vein	white, partly crystalline weak banding Qtz vein w/ comb texture.	GF
B. Mancasay	PKY314	limonite	limonite block in clayey soil.	G
B. Mancasay	PKY315	diorite or granodiorite	white colored medium grained. bed rock of clayey soil.	T
B. Mancasay	PKY316	granodiorite(?)	highly weathered altered granodiorite(?)	G
B. Mancasay	PKY317	ultramafic rock?, hornfels?	blackish colored, lath minerals.	GT
B. Mancasay	PKY318	diorite	bluish green colored least altered fine grained diorite w/ Py diss.	GT
B. Mancasay	PKY319	float of andesite	least altered andesite floating boulder.	T

18 / 26pages

regional area / locality	sample	rock type	description	analyses
Dancalan	PKY324	granodiorite	highly weathered clayey mica-granodiorite.	R
Dancalan	PKY325	Qtz vein	white Qtz vein w/ black stain (manganese mineral?)	R
Manungo	PKY320	granodiorite	highly weathered clayey mica-granodiorite.	X
Manungo	PKY321	Qtz vein	white Qtz vein w/ comb texture within granodiorite.	GF
Manungo	PKY322	Qtz vein	white massive Qtz vein w/ greenish stain with in granodiorite.	G
Manungo	PKY323	Qtz vein	white Qtz vein w/ black stain (manganese mineral?)	R
Mt. Bagacay	PSM281	qz vein	from Taiwance's new shaft, white, medium - coarse grained, w/ coarse grained euhedral py dissemination	GF
Mt. Bagacay	PSM282	altered andesite	gray, silicified hb andesite, w/ subtle py dissemination, hb pseudomorph	G
Mt. Bagacay	PSM283	silicified vein	hematite rich reddish silicified andesite vein w/ width of 30 - 50 cm in slightly altered andesite, w/ some leached cavities, w/ euhedral py dissemination,	GX
Mt. Bagacay	PSM284	diorite	medium grained, hb replaced by chlorite	R
Mt. Bagacay	PSM285	diorite	float (2m), hb remaining, same as PSM284	DT
Mt. Bagacay	PSM286	magnetite ore	float, massive, coarse grained magnetite, w/ covellite stain	O
Napangasan, Babel	PTH366	tonalite?	Tamisan diorite. float. $f^3=6m$. Hbl: fresh	T
Napangasan, Babel	PTH367	tonalite Qtz diorite	large boulder, $f^3 > 10m$,	WDT
Napangasan, Babel	PTH368	tonalite	at Napangasan mine pit. fine grained quartz diorite?	R
Napangasan, Babel	PTH369	gabbro?	float at Napangasan mine. Py metallic mineral dissem. from Babel prospect?	P
Napangasan, Babel	PTH370	silicified rock	aplitic rock? Py dissem. black metallic mineral dissem. from Babel prospect?	P
Napangasan, Babel	PTH371	Qtz vein	float. from Babel prospect? high temperature Qtz. Py: large cubic crystal	GF

19 / 26pages

regional area / locality	sample	rock type	description	analyses
Napangasan, Babel	PTH372	tonalite	with Qtz vein stockwork. w=1cm. green Cu dissemination. black colored sulfide: chalcocite? dissem.	GP
Napangasan, Babel	PTH373	goethite vein	w=3-4cm. N60 \swarrow W, 60 \swarrow N. box texture sulfide vein	G
Pinagbirayan	PTH374	magnetite ore	float. from stockpile of Pinagbirayan prospect.	R
Paracale				
Benget Mine	PTH380	Qtz vein	in Benget mine open pit. Cp, Py, Covellite	P
Benget Mine	PTH381	Qtz vein	in Benget mine open pit. dog teeth Qtz crystal.	F
Benget Mine	PTH382	granodiorite	Bt is main mafic mineral. gneissose texture. from underground.	WDT
Mt. Bunutan	PTH375	Qtz vein	in strong argillized granodiorite. w=2-4cm. N10 \swarrow E, 46 \swarrow E dip. high temperature Qtz vein. 3-4 veins in outcrop.	G
Mt. Bunutan	PTH376	Qtz vein	in Qtz-sericite alt. granodiorite. w=5-10cm, N10 \swarrow E, 20 \swarrow E, vertical. dog teeth Qtz crystals.	GPF
Mt. Bunutan	PTH377	Qtz vein	in Qtz-sericite alt. Cp, Py, Sp. w=20-30cm, N20 \swarrow W, vertical.	P
Mt. Bunutan	PTH378	granodiorite	weak weathered. Bt: fresh, gneissose texture.	R
Mt. Bunutan	PTH379	ultramafic rock	dark greenish black color. serpentinite. float.	T
Sta Barbara	PKY340A	Sp-Gn-Qtz vein	greenish colored.	O
Sta Barbara	PKY340B	"green Qtz" vein		T
Sta Barbara	PKY340C	clayey ore	reddish yellow colored, clayey, likely fault gouge, including host rock fragments.	G
Twi-Mt. Malinao				
Buhi Lake East	PSM256	qz vein	float, qz vein w/ silicified rock, gray porous silicified part mantled by white - clear qz vein like material, euhedral clear qz bearing pore	GX
Buhi Lake East	PSM257	altered andesite	gray, argillized (smec?) andesite, w/ intense py dissemination, weak cohesive, original texture well recognizable	GX
Buhi Lake East	PSM258	altered andesite	weakly argillized andesite, w/ py dissemination, surficial thin portion replaced by kaolinite - Jimonite	X

20 / 26pages

regional area / locality	sample	rock type	description	analyses
Buhi Lake East	PSM259	px andesite	dark gray - black, w/ weak py dissemination	T
Buhi Lake East	PSM260	altered dacite (?)	w/ some qz fragment, py dissemination	T
Buhi Lake East	PSM261	silicified vein + qz vein	float, white silicified vein (w/ granule texture) + py abundant qz vein w/ fine banding	G
Buhi Lake East	PSM262	altered andesite	gray, coarse grained euhedral py dissemination, some illite (?)	X
Buhi Lake East	PSM263	argillized rock	white clay (kaolinite) + py + smec, uncohesive	GX
Buhi Lake East	PSM264	argillized rock	brecciated texture, w/ dense py, clay dominantly kaolinite, sulfur smell	GX
Buhi Lake East	PSM265	argillized rock	less py than PSM264, compact, cohesive	GX
Buhi Lake East	PSM266	silicified rock	white silicified rock, brecciated texture, py poor	GX
Buhi Lake East	PSM267	hb andesite	weathered hb andesite, brownish, least altered	R
Cayohosan River	PTH301	altered rock	W-silicified. Moderate-argillized. Py dissem. chalcodonic Qtz veinlet: N32 °E, 75 °W; Py-silica veinlet: N6 °W, 42 °W.	GX
Cayohosan River	PTH302	Px andesite	same outcrop of PTH301. chlorite alt.	X
Cayohosan River	PTH303	Px andesite	dark greenish color. chlorite alt.	T
Cayohosan River	PTH304	silicified rock	Highly silicified. Highly brecciate, pyritization. breccia f ² =1.0-8cm.	GX
Cayohosan River	PTH305	argillized rock	Float. W-silicified. Kaolinite alt. f ² =5m	G
Cayohosan River	PTH306	Px andesite	weathered.chlorite alt. Hematis stained.	G
Cayohosan River	PTH307	argillized rock	weak-argillized Px andesite. weak Py dissem. weak silicified	GX
Cayohosan River	PTH308	silicified rock	Float. white color. Hgly silicified. minor Py.	G
Cayohosan River	PTH309	argillized rock	white-pale yellowish color. kaolinite alt.	GX

21 / 26pages

regional area / locality	sample	rock type	description	analyses
east of Buhi Lake	PKY269	argillic rock	dark bluish grey colored moderately argillic altered rock after andesite, Py diss.	GX
east of Buhi Lake	PKY270	silicified rock	silicified rock between PKY269 and PKY271, trending N20E65E.	G
east of Buhi Lake	PKY271	least altered andesite	least altered to weak propyritic altered Px(?) andesite.	T
east of Buhi Lake	PKY272	lapilli tuff	pinkish colored weak weathered andesitic lapilli tuff.	R
east of Buhi Lake	PKY273	Px andesite	Px andesite lava flow.	T
east of Buhi Lake	PKY274	argillic rock	pale to bluish grey colored intensely argillic altered rock, after andesite, Py diss and network.	GX
east of Buhi Lake	PKY275	silicified rock	silicified portion within argillic rock PKY274, euhedral Py crystal diss.	G
east of Buhi Lake	PKY276	altered Px andesite	dark greenish grey colored weak propyritic altered Px andesite, Py diss along fracture.	GT
east of Buhi Lake	PKY277	argillic rock	pale grey colored argillic altered rock after Px andesite, contact with PKY276, fault(?) trending N43W72NE.	GX
east of Buhi Lake	PKY278	altered Px andesite	greenish dark grey colored altered Px andesite.	T
east of Buhi Lake	PKY279	argillic rock	deep greenish grey colored strongly argillized rock, fracture or joint of PKY278	GX
east of Buhi Lake	PKY280	silicified rock	bluish light grey colored intensely silicified rock w/ Py diss.	GX
east of Buhi Lake	PKY281	Pi andesite	light grey colored Pi andesite lava.	R
Inalait River	PTH263	Qtz vein	Float. w=2cm. banding. one of bands consists of transparent Qtz.	GF
Inalait River	PTH264	volcanic breccia	Clast: subangular, f ² =1.0cm-2m. partly matrix supported. Px andesite clasts.	G
Inalait River	PTH265	Qtz vein	Float. f ² =8cm, w=3cm, white color. lattice Qtz texture.	G
Inalait River	PTH266	Qtz vein	Float. white milky Qtz. w=3cm. Include Py disseminated clasts.	G
Inalait River	PTH267	Px andesite	weak chlorite altered. low temperature propyitic alt. High magnetic susceptibility.	T

22 / 26pages

regional area / locality	sample	rock type	description	analyses
Inalait River	PTH268	Hbl dacite	float	R
Inalait River	PTH269	silicified rock	float. Highly siliceifed. Py dissemination	GX
Inalait River	PTH270	Px andesite	matrix: glassy.	WDT
Inalait River	PTH271	Qtz vein	float. white milky Qtz. w=2.5 cm. margin: Py	G
Inalait River	PTH272	altered rock	weak silicified. Ill/Smc mixed layer clay alt? Qtz/Cal veinlet. with Py dissem.	GX
Inalait River	PTH273	Hbl andesite	pale greenish gray color. Hbl opaque. weak propylitic alteration.	GX
Inalait River	PTH274a	Qtz vein	chalcedonic Qtz. w=3-6cm. N60°E, dipping 80°E. with silicified halo: w= 10cm	G
Inalait River	PTH274b	silicified rock	silicified halo of PTH274a Qtz vein. Py dissem.	GX
Inalait River	PTH274c	altered rock	outside of PTH274b. mixed layer clay alt? Py dissem.	GX
Inalait River	PTH275	Qtz vein	from the same outcrop of PTH274. w=8 - 10mm. N20°W, 75°E.	G
Inalait River	PTH276	Qtz vein	adjacent to PTH274, 275. w= 3-6mm. N24°E, dipping 75°E. chalcedonic.	G
Inalait River	PTH277a	Qtz vein	chalcedonic. w=3mm-1cm. trending N40°E, dipping vertical	G
Inalait River	PTH277b	Cal-Qtz-Gyp vein	Cal>Qtz vein. Cal-Gyp vein. ten veins. w=5-10mm. N80°W, vertical.	G
Inalait River	PTH278	altered rock	very weak argillized andesite. pale purplish gray color. chlorite alt. Cal veinlets. Lower temperature propylitic alt.	GX
Inalait River	PTH279	altered rock	andesite. chlorite alt. lower temperature propylitic alteration.	GX
Inalait River	PTH280	silicified rock	float. big boulder. f=6m. highly siliceifed.	GX
Inalait River	PTH281	altered rock	weak silicified. mixed layer clay alt? Py dissem.	GXT
Inalait River	PTH282	Qtz vein	float. w=10cm. 1 - 2mm width of Qtz banding.	GF

23 / 26pages

regional area / locality	sample	rock type	description	analyses
Mayong	PKY259	float of silicified rock	rounded floating boulder of intensely silicified rock w/ Py diss, white fine grained Qtz patchy.	GX
Mayong	PKY260	float of Qtz vein	rounded floating cobble of white Qtz vein w/ Py disseminated pale grey colored andesite(?) fragments, less than 2mm in diameter.	G
Mayong	PKY261	Hbl-Px andesite	least altered hbl-Px andesite volcanic breccia, partly weak altered, Py diss, compact and vesiculate	T
Mayong	PKY262	silicified breccia	grey to light grey colored intensely silicified breccia, intermineral brecciation, Py diss, after andesite(?).	GX
Mayong	PKY263	silicified andesitic lapilli tuff	moderately silicified rock after lapilli tuff w/ Py diss, thin Qtz veinlet	G
Mayong	PKY264	Qtz-Py vein	dark grey colored Qtz-Py vein, 5cm in width, after elastic dike trending N30E70E.	G
Mayong	PKY265	silicified rock	intensely silicified rock w/ white Qtz patchy and Py diss.	GX
Mayong	PKY266	Qtz vein	white to grey banding Qtz vein, less than 3cm in width, trending N35E75E, within moderately silicified rock.	G
Mayong	PKY267	argillie altered andesite	dark grey moderately altered andesite clast within tuff breccia.	GX
Mayong	PKY268	Px andesite	dark grey least altered Px andesite.	T
Santa Cruz, Buhi	PKY258	Px-Hbl andesite	grey colored Px-Hbl andesite lava	WDT
the coast	PTH283	Px-Hbl andesite	medium-coarse grain. high magnetic susceptibility	R
the coast	PTH284	Px-Hbl andesite	coarse gr. cognate inclusions. dacitic in composition? platy joint N50°W, 24°N	R
the coast	PTH285	(Px) Hbl andesite	dacitic composition? light gray to white color. abundant Hbl. cognate inclusions.	WDT
the coast	PTH286	Hbl andesite	dacitic composition? light gray to white color.	T
the coast	PTH287	Hbl andesite	dacitic composition? light gray to white color. orientation of Hbl laths. flow banding: trending EW, dipping 32°S.	WDT
the coast	PTH288	Px-Hbl andesite	gray color. cognate inclusion.	R
the coast	PTH289	Px-Hbl andesite	coarse gr. cognate inclusions. dacitic in composition? platy joint N50°W, 24°N	T

24 / 26pages

regional area / locality	sample	rock type	description	analyses
the coast	PTH290	silicified rock	w-M silicified, kaolinite alt. fracture: N40 °W, 62 °W.	GX
the coast	PTH291	argillized rock	Smc alt. andesite	GX
the coast	PTH292	Px andesite		R
the coast	PTH293	Hbl andesite	Platy joint, cognate inclusion	WT
the coast	PTH294	Px-Hbl andesite	coarse gr. pale purplish gray color. Hbl: opaque	R
the coast	PTH295	altered rock	very weak Smc alt. Px-Hbl andesite	GX
the coast	PTH296	Px-Hbl andesite	flow banding develop. white-pinkish color band and dark gray to black color band. trending N40 °W, dipping 35 °N	WDT
the coast	PTH297	altered rock	Py dissent. Px-andesite. Limonite stained	GX
the coast	PTH298	Px? andesite	columnar joint develop. glassy, aphanitic, with many small gas cavities.	WT
the coast	PTH299	Px andesite	small gas cavities.	WT
the coast	PTH300	Px andesite	volcanic breccia, dark gray to black color, fine-medium grain	R
Tiwi-Mt. Malinao	PSM236	altered andesite	float, slightly weathered, pl dominant andesite, weakly altered, w/ weak py dissemination	GX
Tiwi-Mt. Malinao	PSM237	silicified rock	float, w/ limonite dissemination and veinlet up to 4mm, original texture unknown	GX
Tiwi-Mt. Malinao	PSM238a	argillized andesite	clayey vein like occurrence within less altered andesite, PSM238b, greenish, w/ py dissemination, weakly cohesive, N80E trend with the width of 1.5m	GX
Tiwi-Mt. Malinan	PSM238b	andesite	weakly argillized, cohesive	X
Tiwi-Mt. Malinao	PSM239	altered andesite	from a pit with the dimension of 6 x 8m, weakly altered andesite, w/ weak py dissemination, pl replaced by white clay, cpx (?) by limonite aggregate,	GX
Tiwi-Mt. Malinao	PSM242	altered andesite	dominantly argillized (kaolinite), weakly silicified, w/ some limonite	GX
Tiwi-Mt. Malinao	PSM243	altered andesite	weakly silicified and argillized rock, kaolinite, brecciated texture	GX

25 / 26pages

regional area / locality	sample	rock type	description	analyses
Tiwi-Mt. Malinao	PSM244	intensely silicified rock	densely silicified, w/ limonite, massive	G
Tiwi-Mt. Malinao	PSM245	silicified rock	gray, w/ subtle py dissemination, original brecciated texture recognizable	GX
Tiwi-Mt. Malinao	PSM246	px andesite	possibly boulder in terrace deposit, least altered	XT
Tiwi-Mt. Malinao	PSM247	silicified rock	from cliff with a height of more than 10m, w/ subtle kaolinite clay,	GX
Tiwi-Mt. Malinao	PSM248	silicified rock	w/ dense py dissemination and randomly oriented py veining	GX
Tiwi-Mt. Malinao	PSM249	silicified argillized rock	w/ some limonite	GX
Tiwi-Mt. Malinao	PSM250	silicified argillized rock	kaolinite dominant, partly weakly silicified	GX
Tiwi-Mt. Malinao	PSM251	argillized rock	gray, weak py dissemination	GX
Tiwi-Mt. Malinao	PSM252	altered andesite	argillized, w/ weak py dissemination	GX
Tiwi-Mt. Malinao	PSM253	altered andesite	propylitic, mafic mineral replaced by chlorite, w/o epidote	XT
Tiwi-Mt. Malinao	PSM254	argillized silicified rock	w/ weak limonite dissemination	G
Tiwi-Mt. Malinao	PSM255	hb andesite	float on ridge, least altered	XT
Tuba				
Mapulo	PSM269	hb andesite	weathered, coarse grained porphyry,	R
Mapulo	PSM270	silicified rock (Cu ore)	float (30cm), silicified igneous rock, w/ euhedral py dissemination, green Cu stain (marchite dominant)	OT
Mapulo	PSM271	silicified rock	silicified igneous rock, w/ py dissemination, green Cu stain, native sulfur + gypsum crystallized at the surface of outcrop, limonite abundant	OXT
Mapulo	PSM272	qz vein	clear qz vein in PSM271, 10cm width, general trend: N80W 65S	GF
Mapulo	PSM273	silicified rock	silicified igneous rock, w/ py dissemination, green Cu stain	OT
Mapulo	PSM274	argillized rock	kaolinite dominant, argillized igneous rock, w/ green Cu stain	OX

26 / 26pages

Appendix 10

X-ray diffraction analyses

regional area / locality	sample	assemblage
Bacon-Manito		
Balasbas river	PKY213	>Crs>Trd, Hal>Qtz
Balasbas river	PKY216	>Crs>Hal, Hem>
Buyo River	PSM214	Pl>>>Hal, Cal
Buyo River	PSM216	>Crs, Kfs>Hal>
Calpi river	PKY218	Nal>>>Hal
Calpi river	PKY220	Nal>>>Hal
Calpi river	PKY222	>Nal>>
Calpi river	PKY223	Pl>>>Kfs, Cal
Cawayan river	PKY205	Py>Smc>Qtz, Pl>Mor, Lmt
Cawayan river	PKY206	>Py>Smc>Qtz, Crs, Trd, Hal
Cawayan river	PKY207	Qtz>Nal, Py>>Rt
Cawayan river	PKY209	Qtz>Nal>Gt>Rt
Cawayan river	PKY210	>Py>Crs>Qtz, Trd, Hal
Cawayan river	PKY212	Py>Qtz>>Crs, Kln, Hal, Gp
Cawayan River	PSM210	Py>Kfs, Smc>Pl>Gp
Cawayan River	PSM211	>>Crs, Hal>Kfs
Cawayan River	PSM212	>Hal>Crs>Trd
Cawayan River	PSM213	>Crs, Hal>>Gbs
DDH-MO-1 (1256.7-1258.8m, 1578.0-1580.0m)	PBM010	Qtz, Gp>Py>>S/S, C/S
DDH-MO-1 (279.5-281.3m, 279.9m)	PBM009	Qtz, Kln>>>Alu
DDH-Pal-1 (1572-1574m)	PBM001	Qtz>>S/S>
DDH-Pal-1RD (1625m)	PBM008	Qtz>Ab>Kfs>S/S
DDH-Pal-4D (1745m)	PBM005	Qtz>>S/S, Py>
DDH-Pal-4D (2091-2092m)	PBM006	>Pl>Qtz, Kfs>C/S, Cal, Py
DDH-Pal-5D (2247.8m)	PBM012	Chl>Gp>Qtz, S/S>Py
DDH-Pal-8D (1500m)	PBM007	>Qtz, Py>Pl, S/S, C/S>
DDH-PB-1A (2262.8m)	PBM011	Qtz>>Gp>Ser
near Salvacion	PTH203	Qtz>Nal>>Hal
near Salvacion	PTH204	>Nal>Gt>Trd
Pili-Cumadcad	PKY201	>Pl>Hal>Cal
Pili-Cumadcad	PKY203	>Hal>Hbl>Pl
Pili-Cumadcad	PSM203	>>Crs, Trd, Kfs, Hal>
Pili-Cumadcad	PSM204	Nal>Qtz>Gt>
Pili-Cumadcad	PSM207	>Crs>Kfs, Hal>
Pili-Cumadcad	PSM209	>Crs, Kfs, Gbs>Pl>
Salvacion spring	PTH201	>Sul>Crs, Trd>
Salvacion spring	PTH202	>Gt>Trd>Crs
Eastern Caramoan		
East Caramoan	PSM268	Chl>Ser, Py>Qtz>
Pagsangahan	PPRS29A	Qtz, Ser>>>Pl, Py
Pagsangahan	PPRS29D	Chl>Qtz>Gt>Hal

regional area / locality	sample	assemblage
Pagsangahan	PPRS30A	Qtz,Ser>>Gt>Py
Pagsangahan	PPRS30B	Chl>Ab>Qtz>Ser
Pagsangahan	PPRS30C	Ser,Py>Qtz>>Gt
<u>Gate Mountains</u>		
Aguinald	PSM222	>>Pl,Hal>
Aguinald	PSM224	>Hal>>Trd
Bon-ot	PSM231	Qtz>>>Rt
Bon-ot	PSM235	>Hal>>Trd
Culasi, Matnog	PKY249	>>Trd>Smc
Culasi, Matnog	PKY251	>>Trd>Smc
Culasi, Matnog	PKY252	Nal>>Qtz,Trd>Rt
East of Mt. Sujac	PKY224	>Alu>Trd>
East of Mt. Sujac	PKY228	>>Hal>Crs
Gate Mountains	PSM218	>Kfs>Crs,Hal>
Gate Mountains	PSM219	>Kfs>>Crs,Hal,Gt
Gate Mountains	PSM220	>Hal,Mgh>Crs>
Marinab, Bulan	PKY231	Qtz,Nal>>>
Marinab, Bulan	PKY232	Qtz,Nal>>>Rt
Mirinda, Matnog	PKY247	>>Crs,Kfs,Smc>Hal,Py
Sua	PTH221	Qtz>Nal>>Hem,Rt,Gt
Sua	PTH222	Qtz,Nal>>>Jar,Hem
Sua	PTH223	Nal>>>
Sua	PTH224	>Qtz>Pl>S/S,C/S
Sua	PTH226b	Pl>Chl>Qtz>Smc,Py
Sua	PTH227	Qtz>>>S/S,C/S
Sua	PTH228	Qtz,Nal,>>Py>Jar,Rt
Sua	PTH230	Qtz,Ab>>>S/S,Py
Tugas	PSM225	Qtz>>>Pl,Smc
Tugas	PSM226	Py>Kln>Trd>
Tugas	PSM227a	Qtz>>>
Tugas	PSM227b	>Qtz>>Pl,S/S
Tugas	PSM228	Qtz>>>Ant
Tugas	PSM230	>Pl>>Smc,Cal
Tugas, Matnog	PKY233	Qtz,Py>Kln,Alu>>Rt
Tugas, Matnog	PKY234	>Pl,Smc,Py>>Qtz,Gp,Cal
Tugas, Matnog	PKY235	>Qtz>Py>Pl,S/S,C/S
Tugas, Matnog	PKY237	>Qtz,Py>S/S>Gp
Tugas, Matnog	PKY238	Qtz>>>Kln,S/S,Alu
Tugas, Matnog	PKY239	>Qtz>S/S>Alu,Py
Tugas, Matnog	PKY244	>Qtz>S/S,Py>Pl,Kln
Tugas, Matnog	PKY245	>Py>Qtz,Pl,Kln>S/S,Gp
upstream of Sua	PTH251	Qtz,Nal>>>Py,Rt
upstream of Sua	PTH252	Qtz>>>Hem,Rt
upstream of Sua	PTH253	Qtz,Nal>>>Rt,Mar

regional area / locality	sample	assemblage
upstream of Sua	PTH255	Qtz>Pl>>Kfs,Kln,S/S
upstream of Sua	PTH257	>Pl>Qtz>Kfs,S/S
upstream of Sua	PTH258	Qtz,Nal>>>Hem
upstream of Sua	PTH259	Qtz>Nal>>Hal,Rt,Gt
upstream of Sua	PTH260	Qtz>Nal>>Kln,Rt,Gt
west of Mt. Sujac	PTH211	>Pl>Hal>Cal
west of Mt. Sujac	PTH212	>>Pl,Hal>Cal
west of Mt. Sujac	PTH214	>Hal,Gt>>Crs
west of Mt. Sujac	PTH215a	>>Hal,Gt>Alu
west of Mt. Sujac	PTH215b	>>Hal>Alu,Py,Gt
west of Mt. Sujac	PTH217	>Pl,Hem>>Hal,Cal
west of Mt. Sujac	PTH218	Nal>>>
west of Mt. Sujac	PTH219	>Hem,Gt>>
west of Pange	PTH242	>Pl>>Qtz,Kfs,Hal,Py
west of Pange	PTH243	Smc>Pl>>Cal
west of Pange	PTH244	Pl>>>Kfs,Smc,Hbl,Py
west of Pange	PTH246	>Pl>Crs,Kfs,Smc>Trd
west of Pange	PTH248	Qtz>>Nal>Rt
west of Pange	PTH249	Pl>>Smc>Crs,Trd,Py
west of Tugas	PTH231	Qtz>Nal>Kln>Py
west of Tugas	PTH233	Qtz>Nal>Py>Kln,Prl
west of Tugas	PTH234	>Smc>Qtz>Pl,Kln,Py
west of Tugas	PTH235	>Qtz>S/S>Pl,Kln
west of Tugas	PTH236	Qtz,Kln>>Prl,Nal>Py
west of Tugas	PTH237	>>Qtz,Smc>Pl,S/S,C/S,Py
west of Tugas	PTH239	>>Qtz,C/S>Pl,Smc,Py
west of Tugas	PTH240	>Qtz>Kln,S/S>Brt,Py,Ant
Kilbay		
Alawihaw creek	PTH343	Qtz>Dol>Kln,S/S>Py
Alawihaw creek	PTH347	Qtz>S/S>>Py
Alawihaw creek	PTH349	Qtz>Py>S/S>Ant
Alawihaw creek	PTH350	Qtz>Py>>
Bacaco	PKY287	>Qtz,Py>Kln>S/S,Ant
Bacaco	PKY291	Qtz>Py>Kln>S/S,Ant
Bacaco	PKY292	Qtz,Kln>>>Hem,Ant
Bacaco	PKY295	>Qtz,Py>Ab,Dol>Kln,S/S
Kilbay	PSM276	Qtz>Kln>S/S>
Kilbay	PSM279	Qtz>Hal>Gt,Mgh>
Layaton River	PTH318	Qtz>Prl,Py>>Kln
Layaton River	PTH319	Pl>Qtz>C/S>S/S,Jar,Py
Layaton River	PTH320	Qtz>Py>S/S>
Layaton River	PTH324	Qtz>Kln>>Alu
Layaton River	PTH325	Qtz>>>Kln,Py,Ant,Rt
Layaton River	PTH327	Ab>Qtz>>S/S,C/S

regional area / locality	sample	assemblage
Layaton River	PTH331	>Qtz,Pl>C/S>S/S,Cal
Layaton River	PTH332	>Qtz,Pl>C/S,Cal>S/S,Rds,Py
the south of Susungdalaga Mts.	PKY296	>Mar>Crs,Kln,Py>Kfs
the south of Susungdalaga Mts.	PKY298	Drv>Mar>Qtz,Crs,Pl,Hal,Py>Cal
the south of Susungdalaga Mts.	PKY300	Pl>Smc>Qtz,Kfs,Py>S/S,C/S,Cal
the south of Susungdalaga Mts.	PKY301	Pl>Qtz>Py>Kfs,S/S,C/S,Cal
the south of Susungdalaga Mts.	PKY302C	Qtz>Kln>>Alu,Gt
the south of Susungdalaga Mts.	PKY302D	Qtz,Kln>>Py>Gt
the south of Susungdalaga Mts.	PKY304	Qtz>>S/S>Py,Rt
the south of Susungdalaga Mts.	PKY305	Qtz,Nal>Py>Kln>
the south of Susungdalaga Mts.	PKY306	>Qtz,Pl>C/S>Kfs,S/S
the south of Susungdalaga Mts.	PKY308	Qtz>>Pl,C/S,Cal>S/S
Tonton River	PTH351	>Pl>Crs,Kfs,Smc,Py>
Tonton River	PTH354	>Hal>>Crs,Ser,Mar
Tonton River	PTH361	Pl>>Smc>Ser,Cal
Larap-Exciban		
Igang prospect	PTH392	Hbl>>Pl>Hal
Larap-Exciban	PSM295	Qtz,Ser>>>C/S,Gt
Larap-Exciban	PSM299a	>Qtz,Hal>>Gt
Matalang	PTH385	>Kfs>Qtz,Hal>Pl,S/S,Hbl
Pangono north?	PTH390	Kfs>>Qtz>Chl,S/S,Py
Paracale National mine	PKY335	>Qtz,S/S,Dol>>Chl
Tumbaga prospect	PKY327B	Qtz,Ser>>Chl>Py
Tumbaga prospect	PKY332	>Qtz,Ser>>
Mt. Bagacay		
Manpungo	PKY320	Qtz,Kln>Ser>>Kfs
Mt. Bagacay	PSM283	Qtz>Ser>>
Tiwi-Mt. Malinao		
Buhi Lake East	PSM256	Qtz>>>Cal,Rt
Buhi Lake East	PSM257	Qtz>Py>S/S>
Buhi Lake East	PSM258	>Qtz,Pl,Py>>Chl,Smc
Buhi Lake East	PSM262	>Qtz,Pl>Smc,Py>Chl
Buhi Lake East	PSM263	>Qtz,Pl>S/S,Gp>Py
Buhi Lake East	PSM264	Py>>Trd,Alu>Kln
Buhi Lake East	PSM265	>Nal>Trd,Py>Kln
Buhi Lake East	PSM266	>Alu>Trd>
Cayohosan River	PTH301	>Alu>Crs>Trd,Hal,Py
Cayohosan River	PTH302	>Pl>>Smc,Cal,Py
Cayohosan River	PTH304	Qtz>>Py,Rt>Gt
Cayohosan River	PTH307	Pl>>Crs,Smc>Trd,Kfs,Gp,Py
Cayohosan River	PTH309	Kln>>Trd>Alu
east of Buhi Lake	PKY269	>Kln>Crs>Alu
east of Buhi Lake	PKY274	>Qtz,Smc>Py>Gp
east of Buhi Lake	PKY277	Pl,Smc>>Cal>Py,Ant

regional area / locality	sample	assemblage
east of Buhi Lake	PKY279	Smc>>Pl>Kfs,Cal
east of Buhi Lake	PKY280	Kln>>Trd>Alu
Inalait River	PTH269	Qtz>>>Ant,Rt
Inalait River	PTH272	Qtz>Cal>C/S>S/S
Inalait River	PTH273	>Pl>Qtz>Kfs,Smc,C/S,Cal
Inalait River	PTH274b	Qtz>Pl>S/S>Py
Inalait River	PTH274c	>Pl>Qtz,Cal>S/S,C/S
Inalait River	PTH278	>>Qtz,Pl,C/S>Kfs,Hbl,Cal
Inalait River	PTH279	>Smc,C/S>Qtz,Pl,Cal>Kfs,Py
Inalait River	PTH280	Qtz>>Ant>Gt
Inalait River	PTH281	>Hem>Qtz,Pl,Mar>Kfs,S/S,C/S
Mayong	PKY259	Nal>>>
Mayong	PKY262	Nal>>Trd>Py
Mayong	PKY265	Kln>Alu,Py>Trd>
Mayong	PKY267	Pl>>Smc,Py>Cal
the coast	PTH290	Nal>>Qtz,Trd>
the coast	PTH291	>Crs,Hal>Trd,Hem>Rt
the coast	PTH295	>Hal>Crs>Trd
the coast	PTH297	>Pl>>Hal,Cal,Py
Tiwi-Mt. Malinao	PSM236	>Pl>Crs>Kfs,Hal
Tiwi-Mt. Malinao	PSM237	Qtz>>>Ant,Gt
Tiwi-Mt. Malinao	PSM238a	>Pl,Smc,Py>Crs,Trd>Kfs,Cal,Mar
Tiwi-Mt. Malinao	PSM238b	>Pl>Crs>Trd,Kfs,Smc,Cal,Py
Tiwi-Mt. Malinao	PSM239	>Pl,Kfs>Crs>Hal,Cal
Tiwi-Mt. Malinao	PSM242	>>Trd>Ant,Gt
Tiwi-Mt. Malinao	PSM243	>Trd>>Crs,Ant
Tiwi-Mt. Malinao	PSM245	Qtz,Nal>>>Py
Tiwi-Mt. Malinao	PSM246	>Pl>Crs,Kfs>Trd,Hbl
Tiwi-Mt. Malinao	PSM247	Qtz,Nal>>>Gt
Tiwi-Mt. Malinao	PSM248	Qtz,Py>Nal>>
Tiwi-Mt. Malinao	PSM249	Qtz>Nal>Gt>
Tiwi-Mt. Malinao	PSM250	Qtz,Nal>>>
Tiwi-Mt. Malinao	PSM251	Py>Kln>Crs,Trd>Qtz,Alu,Ant
Tiwi-Mt. Malinao	PSM252	>Pl>Py>Crs,Trd,Kfs,Hal
Tiwi-Mt. Malinao	PSM253	>Pl>Crs>Trd,Pri
Tiwi-Mt. Malinao	PSM255	>Pl>Hbl>Cal
Tuba		
Mapulo	PSM271	Qtz>>S/S>Rt
Mapulo	PSM274	Qtz>>S/S>C/S,Gt

Appendix 11

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm
Bacon-Manito																				
KY12	<5	<0.2	1.1	6	50	<0.5	<2	0.04	<0.5	1	12	7	1.33	<10	<1	0.19	<10	0.02	5	2
KY15	<5	<0.2	1.04	4	70	<0.5	<2	0.06	<0.5	2	39	8	2.48	<10	1	0.17	<10	0.04	25	<1
KY16	<5	0.2	7.37	4	340	0.5	<2	0.05	<0.5	28	45	86	5.9	10	<1	0.08	10	0.11	990	3
KY18	<5	<0.2	1.4	4	120	<0.5	<2	0.03	<0.5	7	31	19	3.39	<10	<1	0.25	<10	0.01	115	<1
KY20	<5	0.2	1.53	<2	60	<0.5	<2	0.11	<0.5	4	33	12	1.25	<10	<1	0.05	50	<0.01	150	<1
KY22	<5	0.2	3.02	<2	70	<0.5	<2	1.79	<0.5	17	52	48	3.97	<10	<1	0.13	10	1.79	1190	<1
KY23	<5	<0.2	3.08	<2	30	<0.5	<2	0.06	<0.5	26	32	72	4.56	<10	<1	0.04	30	0.57	275	<1
KY24	<5	<0.2	1.29	2	80	<0.5	<2	0.02	<0.5	7	29	22	2.77	<10	<1	0.03	<10	0.04	25	<1
KY26B	<5	<0.2	0.82	6	20	<0.5	<2	<0.01	<0.5	21	9	31	5.09	<10	<1	0.11	<10	0.04	15	<1
KY27	<5	<0.2	1.84	<2	40	0.5	<2	0.63	<0.5	15	20	63	2.78	<10	<1	0.17	10	0.37	140	1
PBM001	<5	<0.2	0.64	18	110	<0.5	<2	0.2	<0.5	3	34	7	1.5	<10	<1	0.45	<10	0.02	85	4
PBM005	<5	0.2	0.57	50	110	<0.5	<2	0.57	<0.5	12	67	16	1.73	<10	1	0.31	10	0.09	250	<1
PBM006	<5	<0.2	3.5	<2	10	<0.5	<2	4.39	<0.5	19	38	77	4.09	<10	<1	0.04	<10	2.02	345	<1
PBM007	5	<0.2	1.85	48	50	<0.5	<2	3.16	0.5	18	29	53	4.26	<10	<1	0.19	<10	1.59	575	<1
PBM008	<5	<0.2	0.61	6	50	<0.5	<2	0.36	<0.5	2	82	9	1.98	<10	1	0.35	<10	0.08	340	3
PBM009	<5	<0.2	0.39	14	870	<0.5	<2	0.05	<0.5	<1	104	3	0.26	<10	<1	0.06	<10	0.01	30	3
PBM010	65	<0.2	1.35	<2	10	<0.5	<2	4.35	<0.5	17	26	20	3.74	<10	1	0.13	<10	0.52	70	1655
PBM011	20	<0.2	0.38	6	30	<0.5	<2	1.1	<0.5	1	86	1	0.7	<10	<1	0.24	<10	0.01	25	22
PBM012	<5	<0.2	3.18	8	30	<0.5	<2	2.43	<0.5	19	33	61	4.59	<10	2	0.2	<10	2.9	1355	10
PKY201	<5	<0.2	4.23	<2	390	<0.5	<2	0.59	<0.5	22	9	41	4.77	<10	<1	0.05	40	0.27	1105	1
PKY203	<5	<0.2	7.81	<2	550	0.5	<2	0.52	<0.5	22	24	70	4.84	10	<1	0.06	40	0.52	855	3
PKY204	<5	<0.2	9.59	6	30	<0.5	2	0.12	<0.5	13	24	41	3.95	10	<1	0.01	<10	0.15	220	2
PKY205	<5	<0.2	2.28	<2	60	<0.5	<2	0.64	<0.5	14	39	67	3.88	<10	<1	0.22	20	1.18	640	<1
PKY207	<5	<0.2	0.71	6	130	<0.5	<2	0.01	<0.5	12	63	36	4.86	<10	1	0.15	<10	<0.01	15	1
PKY208	<5	<0.2	0.07	12	1670	<0.5	<2	<0.01	<0.5	<1	196	21	0.6	<10	<1	<0.01	<10	<0.01	20	<1
PKY209	<5	<0.2	0.7	10	160	<0.5	<2	<0.01	<0.5	1	66	180	6.13	<10	<1	0.14	<10	<0.01	5	7
PKY211	<5	<0.2	0.61	2	200	<0.5	<2	0.03	<0.5	<1	27	26	4.91	<10	1	0.08	<10	<0.01	15	19
PKY212	<5	<0.2	0.98	4	50	<0.5	<2	0.1	<0.5	18	8	79	4.26	<10	<1	0.16	<10	0.08	65	8
PKY213	<5	<0.2	9.27	<2	650	<0.5	2	0.01	<0.5	23	9	56	5.81	10	1	0.09	<10	0.11	745	5
PKY216	<5	<0.2	5.67	<2	680	0.5	<2	0.01	<0.5	22	6	45	4.61	10	1	0.06	<10	0.07	1295	<1
PKY217	<5	<0.2	0.91	<2	180	<0.5	<2	0.04	<0.5	1	15	21	1.95	<10	<1	0.1	<10	0.01	25	<1
PKY218	<5	<0.2	1.91	4	200	<0.5	<2	0.03	<0.5	1	17	30	1.88	<10	<1	0.2	<10	0.01	10	1
PKY220	<5	<0.2	0.92	4	50	<0.5	<2	<0.01	<0.5	<1	8	21	2.43	<10	<1	0.07	<10	<0.01	<5	<1
PKY221	<5	<0.2	2.17	<2	60	<0.5	<2	0.38	<0.5	6	24	35	1.71	<10	<1	0.12	<10	0.09	115	1
PKY222	<5	<0.2	0.67	<2	110	<0.5	<2	0.02	<0.5	<1	16	9	0.21	<10	<1	0.08	<10	<0.01	35	1
PKY223	<5	<0.2	3.2	<2	60	<0.5	<2	1.79	<0.5	11	31	34	2.98	<10	<1	0.08	10	0.23	230	1
PSM204	<5	<0.2	1.51	124	110	<0.5	<2	0.03	<0.5	3	24	625	13.8	<10	<1	0.05	40	0.01	185	6
PSM205	<5	<0.2	2.89	8	110	0.5	<2	0.52	<0.5	6	22	96	4.96	<10	<1	0.09	10	0.39	230	2
PSM210	<5	<0.2	2.14	<2	10	0.5	<2	0.78	<0.5	16	14	86	6.62	<10	<1	0.18	10	0.66	270	3
PSM211	<5	<0.2	4.71	<2	220	0.5	<2	0.08	<0.5	23	7	62	5.29	<10	<1	0.04	10	0.14	1340	1
PSM212	<5	<0.2	5.16	<2	470	0.5	<2	0.01	<0.5	24	7	96	6.2	10	<1	0.03	10	0.07	1275	2
PSM213	<5	<0.2	5.09	<2	230	<0.5	<2	0.01	<0.5	23	20	50	6.03	10	<1	<0.01	20	0.07	1165	2
PSM216	<5	<0.2	4.74	<2	180	0.5	<2	0.2	<0.5	20	9	63	4.93	<10	<1	0.06	<10	0.18	920	2
PTH201	<5	<0.2	0.8	<2	10	<0.5	<2	0.04	<0.5	1	12	7	0.68	<10	<1	<0.01	<10	0.04	15	1
PTH202	<5	<0.2	0.02	42	80	<0.5	<2	<0.01	<0.5	1	24	126	12.9	<10	<1	<0.01	<10	<0.01	<5	8
PTH203	<5	<0.2	0.72	<2	70	<0.5	<2	0.04	<0.5	<1	7	11	1.5	<10	<1	0.03	<10	<0.01	15	1
PTH204	<5	<0.2	1.59	24	40	<0.5	<2	<0.01	<0.5	1	35	118	>15.00	<10	<1	0.05	<10	<0.01	20	4
PTH206	<5	<0.2	2.48	<2	90	<0.5	<2	0.81	<0.5	12	17	53	3.29	<10	<1	0.08	10	0.21	450	4
SM15	<5	<0.2	1.59	8	<10	<0.5	<2	0.12	<0.5	<1	16	4	0.95	<10	<1	0.01	<10	0.01	15	<1
SM17	<5	<0.2	7.27	<2	40	<0.5	<2	0.27	<0.5	8	8	146	3.67	<10	<1	0.03	<10	0.69	145	<1

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm	
SM21	<5	<0.2	0.6	<2	160	<0.5	<2	0.01	<0.5	<1	257	9	0.36	<10	<1	0.2	<10	<0.01	10	<1	
SM22a	<5	<0.2	1.56	2	230	<0.5	<2	0.01	<0.5	<1	59	15	2.11	<10	<1	0.24	<10	<0.01	<5	<1	
SM23	<5	<0.2	0.94	6	70	<0.5	<2	0.01	<0.5	10	83	51	5.08	<10	<1	0.16	<10	<0.01	<5	<1	
SM25	<5	<0.2	2.26	<2	70	<0.5	<2	0.08	<0.5	5	14	41	2.82	<10	<1	0.01	<10	0.06	45	<1	
TH08	<5	<0.2	0.94	16	230	<0.5	<2	0.01	<0.5	<1	14	19	0.4	<10	<1	0.18	<10	<0.01	25	1	
TH10	<5	<0.2	0.52	12	570	<0.5	<2	<0.01	<0.5	28	22	61	1.99	<10	<1	0.06	<10	<0.01	815	8	
TH11	<5	<0.2	1.29	6	30	<0.5	<2	0.01	<0.5	<1	33	13	1.66	<10	<1	0.24	<10	<0.01	5	1	
TH12	<5	0.4	0.09	2	80	<0.5	<2	<0.01	<0.5	1	326	4	0.78	<10	<1	0.01	<10	<0.01	25	2	
TH13	<5	<0.2	0.37	30	20	<0.5	<2	<0.01	<0.5	1	169	95	7.98	<10	<1	0.03	<10	<0.01	10	5	
TH14	<5	<0.2	0.01	2	120	<0.5	<2	<0.01	<0.5	<1	168	3	0.47	<10	<1	<0.01	<10	<0.01	5	3	
TH18	not/se	<0.2	2.07	10	330	<0.5	<2	0.07	<0.5	4	1440	19	2.44	<10	<1	0.32	10	<0.01	65	4	
TH19	<5	<0.2	1.19	<2	90	<0.5	<2	0.05	<0.5	2	8	38	3.23	<10	<1	0.07	<10	0.03	60	1	
TH21	<5	<0.2	1.31	<2	30	<0.5	<2	0.03	<0.5	4	44	79	4.16	<10	<1	0.05	<10	<0.01	50	1	
TH22	<5	<0.2	0.7	8	10	<0.5	<2	0.01	<0.5	10	44	74	5.23	<10	<1	0.04	<10	<0.01	30	1	
TH23	<5	0.2	1.01	2	30	<0.5	<2	<0.01	<0.5	1	59	55	3.42	<10	<1	0.12	<10	<0.01	10	1	
TH25	<5	<0.2	0.98	6	20	<0.5	<2	<0.01	<0.5	20	36	434	2.02	<10	<1	0.1	<10	<0.01	15	7	
Tiwi-Mt. Malinao																					
PKY259	<5	<0.2	0.79	<2	50	<0.5	<2	0.01	<0.5	3	14	35	2.75	<10	<1	0.15	<10	<0.01	<5	1	
PKY260	<5	<0.2	0.76	<2	130	<0.5	<2	<0.01	<0.5	7	21	48	1.51	<10	<1	0.25	<10	<0.01	5	3	
PKY262	<5	<0.2	1.07	<2	280	<0.5	2	0.03	<0.5	7	15	145	1.49	<10	<1	0.09	<10	<0.01	5	4	
PKY263	<5	<0.2	0.6	<2	80	<0.5	<2	<0.01	<0.5	1	48	44	1.75	<10	<1	0.18	<10	<0.01	5	2	
PKY264	<5	<0.2	0.32	<2	30	<0.5	<2	0.01	<0.5	7	56	43	3.39	<10	<1	0.06	<10	<0.01	15	3	
PKY265	<5	<0.2	0.92	<2	50	<0.5	<2	0.01	<0.5	13	6	72	2.45	<10	<1	0.05	<10	<0.01	5	3	
PKY266	<5	<0.2	0.77	<2	50	<0.5	<2	0.02	<0.5	1	12	15	0.66	<10	<1	0.14	<10	<0.01	20	<1	
PKY267	<5	<0.2	2.46	<2	60	0.5	<2	0.78	<0.5	20	22	113	3.66	<10	<1	0.07	20	0.37	115	2	
PKY269	<5	<0.2	1.52	<2	40	<0.5	<2	0.18	<0.5	17	1	156	1.42	<10	<1	0.02	<10	0.11	5	1	
PKY270	<5	<0.2	0.75	<2	50	<0.5	<2	0.07	<0.5	4	6	34	2.58	<10	<1	0.06	<10	0.04	20	6	
PKY274	<5	<0.2	1.32	<2	40	<0.5	<2	0.32	<0.5	16	8	72	3.8	<10	<1	0.25	10	0.45	235	4	
PKY275	<5	<0.2	0.79	<2	30	<0.5	<2	0.78	<0.5	18	20	123	4.33	<10	<1	0.1	20	0.3	710	4	
PKY276	<5	<0.2	2.26	<2	40	<0.5	<2	1.34	<0.5	14	31	120	3.62	<10	<1	0.1	10	0.83	725	3	
PKY277	<5	<0.2	2.43	<2	30	0.5	<2	4.15	<0.5	15	20	110	2.93	<10	<1	0.04	30	0.69	1570	3	
PKY279	<5	<0.2	1.65	<2	100	<0.5	<2	1.57	<0.5	11	8	54	2.86	<10	<1	0.25	10	0.99	855	1	
PKY280	<5	<0.2	1.83	<2	40	<0.5	<2	0.02	<0.5	10	4	167	0.5	<10	<1	0.01	<10	0.01	10	3	
PSM236	<5	<0.2	1.37	<2	120	<0.5	<2	0.33	<0.5	13	34	76	2.07	<10	<1	0.05	10	0.06	45	2	
PSM237	<5	<0.2	0.18	190	120	<0.5	<2	0.01	<0.5	1	122	32	6.66	<10	<1	<0.01	<10	<0.01	20	7	
PSM238a	<5	<0.2	1.4	26	30	<0.5	<2	0.73	<0.5	14	19	44	3.96	<10	<1	0.05	10	0.41	480	3	
PSM239	<5	<0.2	3.31	<2	280	0.5	<2	0.3	<0.5	12	21	87	3.69	<10	<1	0.1	10	0.32	505	3	
PSM242	<5	<0.2	0.22	28	10	<0.5	<2	0.03	<0.5	1	14	102	7.41	<10	<1	<0.01	<10	0.01	55	3	
PSM243	<5	<0.2	0.08	<2	10	<0.5	<2	0.01	<0.5	<1	29	1	0.14	<10	<1	<0.01	<10	<0.01	15	<1	
PSM244	<5	<0.2	0.85	4	90	<0.5	2	0.01	<0.5	1	40	57	1.93	<10	<1	0.14	<10	<0.01	30	1	
PSM245	<5	<0.2	1.42	<2	60	<0.5	<2	0.01	<0.5	9	62	98	3.27	<10	<1	0.26	<10	<0.01	15	1	
PSM247	<5	<0.2	1	8	30	<0.5	<2	0.01	<0.5	1	48	74	3.56	<10	<1	0.15	<10	<0.01	5	2	
PSM248	<5	<0.2	0.67	6	20	<0.5	<2	<0.01	<0.5	21	69	105	6.77	<10	<1	0.18	<10	<0.01	5	2	
PSM249	<5	<0.2	1.08	<2	90	<0.5	<2	0.05	<0.5	1	50	29	4.63	<10	<1	0.18	<10	<0.01	295	3	
PSM250	<5	<0.2	0.97	<2	90	<0.5	<2	0.01	<0.5	<1	69	25	1.94	<10	<1	0.19	<10	<0.01	10	3	
PSM251	<5	0.2	1.48	10	30	<0.5	<2	0.03	<0.5	28	23	170	6.91	<10	<1	0.01	<10	0.01	105	2	
PSM252	<5	<0.2	1.3	<2	80	<0.5	<2	0.08	<0.5	13	23	60	2.88	<10	<1	0.18	<10	0.11	160	2	
PSM254	<5	<0.2	0.23	36	60	<0.5	<2	<0.01	<0.5	2	17	48	4.14	<10	<1	0.01	<10	<0.01	80	8	
PSM256	<5	<0.2	0.12	<2	90	<0.5	<2	<0.01	<0.5	1	138	2	0.42	<10	<1	<0.01	<10	<0.01	35	1	
PSM257	<5	<0.2	0.89	<2	50	<0.5	<2	0.01	<0.5	32	21	51	4.29	<10	<1	0.25	10	0.02	5	4	
PSM261	5	0.2	0.05	20	80	<0.5	<2	<0.01	<0.5	15	208	95	2.92	<10	<1	<0.01	<10	<0.01	20	3	

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm
PSM263	<5	<0.2	1.21	<2	70	<0.5	<2	1.69	<0.5	6	20	34	1.76	<10	<1	0.2	<10	0.08	20	3
PSM264	<5	<0.2	0.53	<2	30	<0.5	<2	0.01	<0.5	26	9	140	7.19	<10	<1	0.03	<10	<0.01	5	2
PSM265	<5	<0.2	1.51	<2	50	<0.5	<2	0.01	<0.5	4	17	104	1.38	<10	<1	0.22	<10	<0.01	<5	<1
PSM266	<5	<0.2	0.89	10	40	<0.5	<2	0.01	<0.5	<1	24	13	1.13	<10	<1	0.08	<10	<0.01	10	1
PTH263	<5	<0.2	0.13	<2	<10	<0.5	<2	0.01	<0.5	1	174	17	3.54	<10	<1	<0.01	<10	<0.01	40	3
PTH264	<5	<0.2	2.18	<2	50	<0.5	<2	1.05	<0.5	9	26	30	2.49	<10	<1	0.08	10	0.2	285	2
PTH265	<5	<0.2	0.11	<2	<10	<0.5	<2	0.16	<0.5	<1	181	1	0.28	<10	<1	0.01	<10	<0.01	15	1
PTH266	<5	<0.2	0.13	<2	<10	<0.5	<2	0.45	<0.5	<1	165	<1	0.27	<10	<1	<0.01	<10	0.01	20	<1
PTH269	<5	<0.2	0.01	22	250	<0.5	<2	<0.01	<0.5	<1	224	15	1.6	<10	<1	0.03	<10	<0.01	15	1
PTH271	<5	<0.2	0.11	<2	<10	<0.5	<2	0.28	<0.5	<1	171	2	0.27	<10	<1	<0.01	<10	0.01	40	<1
PTH272	<5	<0.2	2.49	<2	40	<0.5	<2	4.21	<0.5	16	24	71	3.97	<10	<1	0.13	10	1.22	1010	1
PTH273	<5	<0.2	2.37	<2	50	<0.5	<2	2.13	<0.5	13	21	29	4.04	<10	<1	0.07	10	1.55	1135	2
PTH274a	10	<0.2	0.61	12	50	<0.5	<2	0.16	<0.5	10	74	30	5.27	<10	<1	0.14	<10	0.07	85	43
PTH274b	<5	<0.2	1.17	<2	80	<0.5	<2	0.36	<0.5	10	12	27	3.39	<10	1	0.16	10	0.29	215	3
PTH274c	<5	<0.2	1.87	<2	70	<0.5	<2	2.85	<0.5	14	13	29	3.88	<10	<1	0.13	10	1.02	1130	2
PTH275	5	<0.2	0.54	<2	40	<0.5	<2	0.73	<0.5	9	123	48	3.43	<10	<1	0.03	<10	0.29	445	3
PTH276	<5	<0.2	0.44	<2	40	<0.5	<2	0.16	<0.5	8	109	20	3.6	<10	<1	0.09	<10	0.05	470	1
PTH277a	5	0.4	1.25	22	50	<0.5	<2	0.4	<0.5	15	167	34	6.11	<10	<1	0.11	<10	0.7	310	88
PTH277b	<5	0.2	1.5	8	20	<0.5	<2	7.8	<0.5	6	149	6	2.3	<10	<1	0.09	<10	0.65	935	18
PTH278	<5	<0.2	2.07	<2	30	<0.5	<2	1.56	<0.5	18	44	79	4.29	<10	<1	0.06	10	1.27	1085	2
PTH279	<5	<0.2	2.98	<2	40	<0.5	<2	2.65	<0.5	18	23	62	3.8	<10	<1	0.12	20	2.33	635	3
PTH280	<5	<0.2	0.43	8	10	<0.5	<2	0.08	<0.5	3	110	25	4.35	<10	<1	<0.01	<10	0.03	135	2
PTH281	<5	<0.2	1.75	<2	50	<0.5	<2	1.92	<0.5	15	20	60	4.22	<10	<1	0.15	20	1.1	705	1
PTH282	<5	<0.2	0.2	<2	10	<0.5	<2	0.12	<0.5	<1	194	1	0.4	<10	<1	<0.01	<10	0.03	30	<1
PTH290	<5	<0.2	0.34	<2	180	<0.5	<2	0.01	<0.5	<1	14	8	1.73	<10	<1	0.05	<10	<0.01	15	<1
PTH291	<5	<0.2	3.39	<2	90	<0.5	<2	0.02	<0.5	11	8	23	3.65	<10	<1	<0.01	10	0.07	250	<1
PTH295	<5	<0.2	4.65	<2	220	1.5	<2	0.09	<0.5	46	19	315	6.19	10	<1	0.01	10	0.12	1475	4
PTH297	<5	<0.2	1.69	<2	110	<0.5	<2	0.2	<0.5	7	25	54	2.98	<10	<1	0.16	<10	0.01	90	1
PTH301	<5	<0.2	1.08	<2	50	<0.5	<2	0.09	<0.5	14	12	60	1.76	<10	<1	0.05	<10	0.05	30	<1
PTH304	<5	<0.2	0.16	8	30	<0.5	<2	<0.01	<0.5	24	190	134	6.8	<10	<1	<0.01	<10	<0.01	70	1
PTH305	<5	<0.2	0.71	8	250	<0.5	<2	0.04	<0.5	1	13	47	1.69	<10	<1	0.12	<10	0.01	250	1
PTH306	<5	<0.2	2.31	<2	70	<0.5	<2	1.29	<0.5	19	29	45	5.11	<10	<1	0.08	10	0.85	725	3
PTH307	<5	<0.2	1.17	<2	90	<0.5	<2	0.5	<0.5	22	38	49	3.09	<10	<1	0.08	<10	0.24	140	<1
PTH308	<5	<0.2	0.07	<2	630	<0.5	<2	0.01	<0.5	<1	174	<1	0.31	<10	<1	<0.01	<10	<0.01	25	<1
PTH309	<5	<0.2	0.43	4	80	<0.5	<2	0.03	<0.5	<1	6	5	0.33	<10	<1	<0.01	<10	0.01	60	<1
SM27	<5	<0.2	0.16	4	<10	<0.5	<2	<0.01	<0.5	<1	85	3	0.13	<10	1	0.01	<10	<0.01	<5	<1
SM29	<5	0.2	3.46	12	10	<0.5	<2	11.15	<0.5	12	59	60	3.01	<10	<1	0.03	<10	1.7	450	1
SM30	85	1	0.96	108	50	0.5	<2	1.63	14.5	15	74	19	3.65	<10	<1	0.44	<10	0.27	540	9
SM31	<5	<0.2	0.81	<2	40	<0.5	<2	8.35	<0.5	10	39	8	1.97	<10	<1	0.4	<10	0.02	25	12
SM32	<5	0.2	0.92	34	10	<0.5	<2	10.3	<0.5	8	23	11	1.52	<10	<1	0.12	<10	0.54	675	1
SM34	<5	<0.2	1	2	60	<0.5	<2	1.97	<0.5	9	15	48	1.47	<10	<1	0.22	10	0.15	190	1
SM35	<5	<0.2	0.31	2	130	<0.5	<2	0.03	<0.5	<1	27	10	0.53	<10	<1	0.08	<10	<0.01	<5	2
SM70c	<5	<0.2	0.2	20	40	<0.5	<2	0.04	<0.5	<1	13	75	4.68	<10	<1	0.02	<10	0.01	60	3
SM71b	<5	<0.2	0.34	4	190	<0.5	<2	9.08	<0.5	2	26	36	1.41	<10	<1	0.02	<10	0.14	810	<1
Pio Duran																				
KY06	<5	<0.2	2.95	<2	<10	<0.5	<2	1.84	<0.5	9	36	42	1.9	<10	<1	0.01	<10	1.19	270	<1
KY08	<5	<0.2	2.02	4	20	<0.5	<2	1.43	<0.5	11	94	36	3.06	<10	<1	0.01	<10	1.1	505	<1
KY28A	<5	0.6	2.03	6	20	<0.5	2	0.72	<0.5	14	37	1460	3.37	<10	<1	0.11	<10	1.45	675	<1
KY29	<5	<0.2	1.71	<2	30	<0.5	<2	0.64	<0.5	10	56	39	3.41	<10	<1	0.15	<10	1.33	695	<1
SM05	55	0.4	0.13	38	40	<0.5	<2	7.38	<0.5	8	23	34	1.77	<10	<1	0.06	<10	0.01	20	1

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm
Gate Mountains																				
KY31	<5	<0.2	0.99	<2	30	1	<2	0.61	<0.5	17	6	22	5.4	<10	<1	0.3	<10	0.3	185	<1
KY33	<5	0.2	3.62	<2	30	2	<2	0.26	<0.5	27	11	65	5.2	<10	<1	0.06	20	2.54	1165	<1
KY35	<5	<0.2	1.71	4	40	<0.5	<2	0.08	<0.5	30	12	36	6.13	<10	<1	0.18	<10	0.93	205	1
KY36	<5	<0.2	1.74	6	20	<0.5	<2	0.01	<0.5	28	13	24	6.5	<10	<1	0.25	<10	0.16	75	<1
KY37	<5	<0.2	2	<2	500	<0.5	<2	0.11	<0.5	1	6	13	2.57	<10	<1	0.45	<10	0.19	25	<1
KY39	<5	0.2	1.38	<2	50	<0.5	<2	0.83	<0.5	10	30	29	2.83	<10	<1	0.09	10	0.24	245	1
KY40	<5	<0.2	0.46	44	10	<0.5	<2	0.03	<0.5	22	25	118	7.33	<10	<1	0.1	<10	0.02	20	2
KY41	<5	0.2	6.03	14	300	0.5	<2	0.39	<0.5	19	12	81	6.69	10	<1	0.04	20	0.31	480	<1
KY42	<5	<0.2	0.46	6	20	<0.5	<2	<0.01	<0.5	18	28	42	6.36	<10	<1	0.03	<10	<0.01	10	2
KY43	<5	<0.2	0.41	2	90	0.5	2	0.01	<0.5	20	24	51	2.03	<10	<1	0.05	<10	<0.01	5	1
KY44	<5	0.2	0.14	26	420	0.5	<2	0.65	<0.5	8	83	1	2.13	<10	<1	0.01	<10	0.04	3140	<1
KY45	<5	0.2	4.03	<2	190	<0.5	<2	2.9	<0.5	15	57	76	4.5	<10	<1	0.13	10	1.06	655	<1
KY46	<5	<0.2	0.25	52	40	<0.5	4	0.12	<0.5	1	13	22	13.05	<10	<1	0.01	<10	0.03	225	3
KY47	<5	<0.2	0.54	28	<10	<0.5	<2	2.56	<0.5	19	11	64	4.38	<10	<1	0.03	10	1.83	1050	<1
KY48	<5	<0.2	0.8	30	<10	<0.5	<2	1.19	<0.5	28	6	62	3.79	<10	<1	0.07	20	0.25	190	<1
PKY224	<5	<0.2	0.45	12	400	<0.5	<2	0.03	<0.5	<1	16	27	2.4	<10	<1	0.03	<10	<0.01	20	1
PKY228	<5	<0.2	9.4	<2	1060	1.5	<2	0.45	<0.5	17	17	44	2.17	10	<1	0.14	20	0.17	200	<1
PKY231	<5	<0.2	0.9	<2	290	<0.5	<2	0.01	<0.5	<1	56	2	0.54	<10	<1	0.11	10	<0.01	45	2
PKY232	<5	<0.2	0.66	<2	70	<0.5	<2	0.01	<0.5	<1	16	<1	0.33	<10	<1	0.09	<10	<0.01	20	<1
PKY233	<5	<0.2	0.79	6	50	<0.5	<2	<0.01	<0.5	28	28	20	4.78	<10	<1	0.07	<10	<0.01	40	9
PKY234	<5	<0.2	2.63	<2	60	<0.5	<2	0.83	<0.5	31	12	79	4.43	<10	1	0.09	10	0.85	450	<1
PKY235	<5	<0.2	2.89	10	80	<0.5	<2	0.05	<0.5	23	7	60	4.52	<10	1	0.31	<10	0.99	655	2
PKY236	<5	<0.2	3.76	<2	140	<0.5	<2	3.14	<0.5	14	25	19	3.41	<10	1	0.05	<10	0.73	835	<1
PKY237	<5	<0.2	0.69	8	30	<0.5	<2	0.26	<0.5	22	8	17	4.55	<10	1	0.15	<10	0.21	110	6
PKY238	<5	<0.2	0.34	2	80	<0.5	<2	<0.01	<0.5	1	24	6	0.76	<10	<1	0.15	<10	<0.01	5	3
PKY240	<5	<0.2	0.56	2	60	<0.5	<2	0.03	<0.5	15	15	75	2.97	<10	<1	0.24	<10	0.04	95	5
PKY242	<5	<0.2	1.34	30	30	<0.5	<2	0.17	<0.5	28	10	28	3.33	<10	1	0.25	10	0.76	285	14
PKY243	<5	<0.2	0.52	4	20	<0.5	<2	0.01	<0.5	6	18	13	1.36	<10	<1	0.03	<10	<0.01	20	3
PKY244	<5	<0.2	0.88	16	30	<0.5	<2	0.01	<0.5	14	5	34	3.46	<10	<1	0.29	<10	0.06	15	1
PKY245	<5	<0.2	1.08	6	60	<0.5	<2	0.55	<0.5	15	14	29	3.25	<10	<1	0.23	40	0.14	80	1
PKY247	<5	<0.2	6.4	<2	1060	1	<2	0.33	<0.5	20	22	26	3.98	<10	<1	0.11	<10	0.38	485	4
PKY248	<5	<0.2	0.32	2	30	<0.5	<2	0.08	<0.5	15	42	3	0.47	<10	<1	<0.01	<10	0.05	55	<1
PKY249	<5	<0.2	0.21	2	940	0.5	<2	1.17	<0.5	17	34	4	1.83	<10	<1	0.01	<10	0.1	5260	1
PKY250	<5	<0.2	0.33	<2	150	0.5	<2	0.41	<0.5	5	42	5	0.89	<10	<1	0.03	<10	0.13	875	1
PKY251	<5	<0.2	0.24	22	60	4	<2	0.25	<0.5	15	46	9	3.85	<10	<1	0.01	<10	0.08	150	1
PKY252	<5	<0.2	0.91	6	160	<0.5	<2	0.06	<0.5	4	9	11	1.54	<10	<1	0.18	70	0.01	135	1
PKY253	<5	<0.2	0.19	<2	80	0.5	<2	0.23	<0.5	9	31	3	0.73	<10	<1	0.01	<10	0.07	390	1
PKY254	<5	<0.2	0.21	6	10	<0.5	2	<0.01	<0.5	13	32	43	9.34	<10	<1	0.03	<10	<0.01	5	1
PKY255	<5	<0.2	5.05	<2	90	0.5	<2	0.15	<0.5	10	6	16	3.32	<10	<1	0.03	20	0.26	195	3
PKY257	<5	<0.2	3.98	<2	110	<0.5	<2	0.08	<0.5	7	3	24	2.6	<10	<1	0.06	<10	0.11	135	1
PSM219	<5	<0.2	6.05	<2	590	1.5	<2	0.25	<0.5	24	17	68	5.6	10	<1	0.12	50	0.42	725	4
PSM220	<5	<0.2	3.97	<2	270	1.5	<2	0.04	<0.5	18	5	64	5.4	10	<1	0.11	30	0.13	305	4
PSM222	<5	<0.2	3.06	<2	360	0.5	<2	0.28	<0.5	16	12	25	4.85	<10	<1	0.05	80	0.2	470	3
PSM225	<5	<0.2	0.1	<2	10	<0.5	<2	0.01	<0.5	1	217	6	0.44	<10	<1	<0.01	<10	0.01	35	<1
PSM226	<5	<0.2	0.66	68	20	<0.5	<2	0.01	<0.5	14	25	165	9.26	<10	<1	0.01	<10	<0.01	40	6
PSM227a	<5	<0.2	0.04	6	10	<0.5	<2	<0.01	<0.5	1	171	9	0.84	<10	<1	<0.01	<10	<0.01	35	6
PSM227b	<5	<0.2	2.89	<2	170	0.5	<2	0.63	<0.5	7	11	61	3.07	<10	<1	0.19	50	0.33	380	3
PSM228	<5	<0.2	0.05	4	10	<0.5	<2	<0.01	<0.5	1	304	6	0.58	<10	<1	<0.01	<10	<0.01	25	7
PSM231	<5	<0.2	0.07	<2	220	<0.5	<2	<0.01	<0.5	1	231	5	0.39	<10	<1	<0.01	<10	<0.01	45	2
PSM232	<5	0.2	8.43	6	710	<0.5	<2	0.43	<0.5	12	48	31	3.29	<10	<1	0.18	<10	0.22	325	4

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm
PSM233	<5	<0.2	3.51	<2	420	<0.5	<2	0.09	<0.5	<1	3	22	2.75	10	<1	0.05	<10	0.05	20	2
PSM234	<5	<0.2	0.43	102	80	<0.5	4	0.03	<0.5	2	7	6	10.7	<10	<1	0.01	<10	<0.01	60	3
PSM235	<5	<0.2	2.72	10	220	<0.5	<2	0.08	<0.5	1	4	5	0.85	<10	<1	0.02	<10	0.03	115	2
PTH211	<5	<0.2	2.86	<2	210	0.5	<2	0.59	<0.5	13	8	24	3.8	<10	<1	0.08	20	0.45	310	1
PTH212	<5	<0.2	3.96	<2	450	<0.5	<2	1.06	<0.5	39	5	30	5.37	<10	<1	0.09	10	0.67	1540	2
PTH214	<5	<0.2	2.99	68	130	<0.5	<2	0.07	<0.5	3	104	55	10.25	10	<1	0.03	<10	0.03	85	3
PTH215a	<5	<0.2	6.32	54	100	<0.5	<2	0.01	<0.5	16	53	52	5.46	<10	<1	0.05	<10	<0.01	120	4
PTH215b	<5	<0.2	6.44	48	210	<0.5	<2	<0.01	<0.5	8	50	70	4.85	10	<1	0.06	<10	0.01	65	2
PTH217	<5	<0.2	4.02	<2	240	2	<2	0.44	<0.5	20	5	40	5.44	<10	<1	0.06	20	0.24	865	3
PTH218	<5	<0.2	0.61	6	190	<0.5	<2	0.01	<0.5	<1	18	9	0.75	<10	<1	0.06	<10	<0.01	20	<1
PTH219	<5	0.2	1.32	1760	190	<0.5	<2	0.01	<0.5	5	107	17	>15.00	10	<1	0.01	<10	<0.01	245	3
PTH220	<5	<0.2	2.46	8	80	<0.5	<2	1.34	<0.5	16	24	32	4.54	<10	<1	0.08	10	0.94	320	4
PTH221	<5	<0.2	0.43	6	<10	<0.5	<2	0.03	<0.5	5	43	20	7.44	<10	<1	0.06	<10	<0.01	15	3
PTH222	<5	<0.2	0.36	16	70	<0.5	<2	0.01	<0.5	<1	33	10	6.14	<10	<1	0.04	<10	<0.01	20	3
PTH223	<5	<0.2	0.39	6	220	<0.5	<2	0.01	<0.5	1	20	<1	0.76	<10	<1	0.05	<10	<0.01	90	<1
PTH224	<5	<0.2	2.29	<2	240	<0.5	<2	0.25	<0.5	6	10	23	3.74	<10	<1	0.13	10	1.28	1100	4
PTH225	<5	<0.2	0.74	10	60	<0.5	<2	0.02	<0.5	<1	16	27	7.47	<10	<1	0.11	20	0.07	30	<1
PTH226a	5	<0.2	2.5	2	40	<0.5	<2	0.02	<0.5	18	20	47	6.13	<10	<1	0.07	<10	1.89	1100	1
PTH226b	<5	<0.2	4.31	<2	120	<0.5	<2	0.05	<0.5	11	14	12	5.66	10	<1	0.05	10	2.82	2100	3
PTH227	5	<0.2	1.01	8	190	<0.5	<2	0.02	<0.5	1	14	23	2.93	<10	<1	0.24	30	0.08	40	4
PTH228	<5	<0.2	0.43	12	50	<0.5	<2	0.01	<0.5	13	96	9	2.62	<10	<1	0.07	<10	<0.01	15	1
PTH229	5	<0.2	0.54	6	120	<0.5	<2	<0.01	<0.5	6	7	20	6.65	<10	<1	0.1	<10	<0.01	20	4
PTH230	<5	<0.2	0.82	6	30	<0.5	<2	<0.01	<0.5	13	19	17	1.52	<10	<1	0.06	<10	0.16	25	<1
PTH231	<5	<0.2	0.57	34	70	<0.5	<2	<0.01	<0.5	1	57	12	6.6	<10	<1	0.07	<10	<0.01	35	5
PTH232	<5	<0.2	2.28	<2	60	<0.5	<2	1.37	<0.5	12	29	36	3.08	<10	<1	0.07	<10	0.4	410	2
PTH233	5	<0.2	0.41	6	20	<0.5	<2	0.01	<0.5	4	29	14	3.03	<10	<1	0.05	<10	<0.01	20	3
PTH234	<5	<0.2	1.88	<2	70	<0.5	<2	0.58	<0.5	17	4	19	2.49	<10	<1	0.11	<10	0.58	40	<1
PTH235	<5	<0.2	1.26	<2	130	<0.5	<2	0.08	<0.5	3	4	46	2.84	<10	<1	0.27	<10	0.16	55	3
PTH236	<5	<0.2	0.42	16	100	<0.5	4	0.01	<0.5	4	33	25	6.59	<10	<1	0.03	10	0.01	15	1
PTH238	<5	<0.2	3.94	<2	50	<0.5	<2	0.17	<0.5	22	15	6	5.68	10	<1	0.06	20	3.28	1800	1
PTH239	<5	<0.2	3.76	<2	60	<0.5	<2	0.04	<0.5	11	17	75	5.55	10	<1	0.03	10	2.15	850	3
PTH240	<5	<0.2	1.09	<2	40	<0.5	<2	0.03	<0.5	14	12	17	5.47	<10	<1	0.13	10	0.08	30	3
PTH242	<5	<0.2	2.64	<2	390	0.5	<2	0.38	<0.5	19	10	34	3.88	<10	<1	0.06	20	0.31	275	2
PTH243	<5	<0.2	2.33	<2	90	0.5	<2	1.14	<0.5	11	8	37	2.94	<10	<1	0.07	30	1.23	390	1
PTH244	<5	<0.2	1	<2	300	<0.5	<2	0.64	<0.5	9	9	38	2.58	<10	<1	0.22	40	0.35	1770	1
PTH245	<5	<0.2	1.8	<2	230	<0.5	<2	1.15	<0.5	15	11	35	3.46	<10	<1	0.21	30	0.43	3100	3
PTH245	5	<0.2	0.08	<2	80	<0.5	<2	0.01	<0.5	1	179	8	3.23	<10	<1	<0.01	<10	0.01	75	3
PTH246	<5	<0.2	0.35	<2	70	<0.5	<2	0.03	<0.5	1	64	1	0.55	<10	<1	0.04	20	<0.01	120	<1
PTH249	<5	<0.2	1.94	<2	140	<0.5	<2	0.92	<0.5	13	9	30	4.4	<10	<1	0.07	40	0.28	580	1
PTH251	<5	<0.2	0.54	<2	50	<0.5	<2	0.01	<0.5	<1	35	10	2.46	<10	1	0.13	<10	<0.01	35	4
PTH255	<5	<0.2	0.55	6	60	<0.5	<2	0.06	<0.5	1	24	<1	2.4	<10	<1	0.25	30	0.03	1005	3
PTH257	<5	<0.2	1.71	<2	50	<0.5	<2	0.13	<0.5	7	12	32	4.85	<10	<1	0.18	10	0.23	155	3
PTH258	<5	<0.2	1.01	10	80	<0.5	<2	0.01	<0.5	<1	58	11	2.15	<10	<1	0.11	<10	<0.01	45	2
PTH259	<5	<0.2	0.75	6	170	<0.5	<2	0.01	<0.5	<1	25	19	2.8	<10	<1	0.05	<10	<0.01	55	2
PTH260	<5	<0.2	0.94	8	150	<0.5	<2	0.01	<0.5	1	19	26	10.3	<10	<1	0.07	30	<0.01	65	5
SM50	<5	<0.2	3.17	<2	190	0.5	<2	1.16	<0.5	6	7	80	1.7	<10	<1	0.19	10	0.36	110	<1
SM53	<5	<0.2	1.69	20	90	0.5	6	0.05	<0.5	5	13	47	10.85	<10	<1	0.06	10	0.03	170	4
SM55	120	<0.2	0.49	12	40	<0.5	<2	0.01	<0.5	<1	131	2	0.52	<10	<1	0.11	<10	<0.01	35	36
SM60	<5	<0.2	0.05	<2	10	<0.5	<2	<0.01	<0.5	<1	187	1	0.28	<10	<1	<0.01	<10	<0.01	10	<1
SM61	<5	<0.2	0.68	4	80	<0.5	<2	<0.01	<0.5	4	19	21	0.43	<10	<1	0.15	<10	<0.01	10	1
SM65	<5	<0.2	0.5	2	50	<0.5	2	0.02	<0.5	<1	56	4	0.82	<10	<1	0.06	<10	0.05	<5	1
SM66	<5	<0.2	0.65	<2	30	<0.5	<2	0.01	<0.5	2	44	14	3.48	<10	<1	0.04	<10	0.01	45	1

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm
TH26	<5	<0.2	0.35	6	160	<0.5	<2	0.01	<0.5	3	137	15	4.52	<10	<1	0.02	<10	<0.01	30	2
TH28	<5	<0.2	0.34	16	60	<0.5	<2	0.01	<0.5	11	49	10	1.1	<10	<1	0.01	<10	0.01	5	<1
TH29	<5	<0.2	2.5	10	40	<0.5	<2	0.01	<0.5	5	7	4	4.91	<10	<1	0.09	10	0.16	20	<1
TH34	<5	<0.2	2.97	<2	80	0.5	<2	0.24	<0.5	21	9	123	3.13	<10	<1	0.06	30	0.11	130	1
TH37	<5	<0.2	0.13	<2	120	<0.5	<2	0.01	<0.5	5	326	35	0.82	<10	<1	<0.01	<10	<0.01	20	<1
TH38	<5	<0.2	6.99	2	1040	2.5	<2	0.07	<0.5	21	14	20	6.71	<10	<1	0.03	70	0.09	1270	1
TH39	<5	0.4	5.04	8	790	2	<2	0.01	<0.5	32	8	32	5.54	<10	<1	0.01	30	0.2	2260	<1
TH42	<5	0.5	3.84	2	110	0.5	<2	0.01	<0.5	10	18	52	5.6	<10	<1	<0.01	<10	0.05	225	<1
TH46	<5	<0.2	1.29	6	160	<0.5	<2	0.01	<0.5	1	93	9	0.47	<10	<1	0.18	<10	<0.01	365	<1
TH48	<5	<0.2	0.28	44	170	<0.5	2	<0.01	<0.5	12	236	212	2.27	<10	<1	0.01	<10	<0.01	45	1
TH49	<5	<0.2	0.09	12	30	<0.5	2	<0.01	<0.5	2	133	21	3.22	<10	<1	<0.01	<10	<0.01	125	1
TH51	<5	<0.2	1.44	6	170	<0.5	<2	0.22	<0.5	14	18	6	1.69	<10	7	0.08	<10	0.17	840	<1
TH55	<5	0.8	0.07	90	1840	<0.5	<2	<0.01	<0.5	20	93	34	4.22	<10	<1	<0.01	<10	<0.01	8580	2
Irosin South																				
SM38	<5	<0.2	0.35	8	<10	<0.5	<2	0.01	<0.5	<1	38	23	2.77	<10	<1	0.08	<10	<0.01	15	1
SM41	<5	<0.2	0.29	8	30	<0.5	2	0.01	<0.5	9	45	23	3.17	<10	<1	0.08	<10	<0.01	10	<1
SM42	10	<0.2	0.36	10	40	<0.5	<2	0.01	<0.5	1	100	11	0.98	<10	<1	0.09	<10	<0.01	40	1
SM44	<5	<0.2	0.19	2	30	<0.5	<2	0.01	<0.5	<1	42	20	2.27	<10	<1	0.03	<10	<0.01	15	4
SM47	<5	<0.2	0.43	12	60	<0.5	<2	<0.01	<0.5	<1	29	14	4.94	<10	<1	0.16	<10	<0.01	<5	4
Bacolodo																				
SM67	<5	0.2	2.33	1930	210	0.5	<2	0.56	0.5	4	57	16	5.33	<10	<1	0.06	<10	0.13	225	1
Siruma Peninsula																				
TH71	<5	<0.2	0.81	2	<10	<0.5	<2	<0.01	<0.5	1	222	16	2.4	<10	<1	<0.01	<10	0.01	20	<1
TH72	<5	<0.2	2.06	8	10	<0.5	<2	1.31	<0.5	16	315	160	2.26	<10	<1	0.04	<10	1.56	505	<1
TH74	<5	<0.2	0.42	<2	10	<0.5	<2	<0.01	<0.5	<1	227	3	0.37	<10	<1	0.1	<10	0.03	10	<1
TH75	5	0.2	0.23	4	30	<0.5	<2	0.03	<0.5	1	446	9	0.5	<10	<1	0.02	<10	0.03	65	<1
TH77	10	<0.2	0.15	<2	10	<0.5	<2	0.02	<0.5	5	344	44	0.55	<10	<1	<0.01	<10	0.03	130	<1
TH78	2200	0.6	3.01	<2	30	<0.5	<2	0.06	<0.5	51	227	565	3.16	<10	<1	0.14	<10	1.03	520	<1
TH81	5	<0.2	0.36	2	170	<0.5	<2	0.02	<0.5	10	643	28	0.87	<10	<1	0.07	<10	0.07	1990	1
TH84	55	0.4	0.8	12	30	<0.5	2	2.31	<0.5	11	52	155	2.76	<10	<1	0.15	<10	1.13	760	3
Tamban-Olas																				
TH87	10	<0.2	1.21	<2	<10	<0.5	<2	0.61	<0.5	9	301	311	1.91	<10	<1	<0.01	<10	0.57	300	2
TH89	10	<0.2	0.54	<2	<10	<0.5	<2	>15.00	<0.5	5	59	4	0.98	<10	<1	0.01	<10	0.54	1465	<1
Western Goa																				
KY67C	<5	0.2	0.29	2	20	<0.5	<2	0.13	<0.5	16	51	284	2.55	<10	<1	0.11	<10	0.22	905	<1
Pasacao																				
KY57B	<5	<0.2	0.88	10	50	<0.5	<2	0.53	<0.5	11	20	99	1.89	<10	<1	0.15	20	0.28	165	1
KY57C	<5	0.2	0.24	<2	40	0.5	<2	10.8	<0.5	11	29	58	5.34	<10	<1	0.02	<10	5.43	2010	<1
KY57D	<5	0.2	0.12	<2	10	0.5	<2	10.8	<0.5	13	55	5	3.89	<10	<1	0.01	<10	5.3	1630	<1
KY59A	<5	0.8	0.13	616	420	<0.5	<2	0.14	<0.5	30	366	4	0.77	<10	<1	0.02	<10	0.13	40	<1
KY59D	<5	0.2	0.28	432	820	<0.5	<2	10.05	<0.5	39	229	<1	3.12	<10	1	0.01	<10	5.67	825	<1
KY60B	<5	<0.2	0.19	22	120	<0.5	<2	2.28	<0.5	51	213	10	3.66	<10	<1	0.01	<10	11.55	555	<1
KY61	80	0.2	0.78	138	50	<0.5	<2	7.55	<0.5	42	897	1	2.97	<10	<1	<0.01	<10	8.47	1515	18
SM74	<5	0.4	0.59	<2	90	0.5	<2	13.95	<0.5	15	27	68	4.01	<10	<1	0.04	<10	1.24	1415	<1
SM75	<5	<0.2	0.91	<2	40	<0.5	<2	7.53	<0.5	9	101	14	3.25	<10	<1	0.01	<10	1.47	1250	<1
Balatan																				
KY65C	<5	0.2	1.22	2	60	<0.5	<2	0.9	<0.5	14	98	77	3.8	<10	<1	0.08	10	1.03	555	3

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm
SM80	<5	<0.2	0.01	<2	<10	<0.5	<2	13.9	<0.5	3	1	27	1	<10	<1	<0.01	<10	<0.01	5	2
SM81	<5	0.2	2.41	6	<10	<0.5	<2	1.86	<0.5	19	85	<1	3.52	<10	<1	0.01	<10	2.37	465	<1
SM82	<5	<0.2	1.92	6	<10	<0.5	<2	0.5	<0.5	4	31	13	3.38	<10	<1	0.01	<10	1.05	300	3
SM86	<5	<0.2	0.01	<2	<10	<0.5	<2	14.55	<0.5	2	2	16	0.33	<10	<1	<0.01	<10	<0.01	<5	1
SM87	<5	<0.2	0.71	2	30	<0.5	<2	0.06	<0.5	<1	28	15	2.79	<10	<1	0.17	<10	0.31	35	1
SM89	15	<0.2	0.05	2	<10	<0.5	2	0.02	<0.5	20	83	208	>15.00	<10	<1	0.01	<10	<0.01	5	<1
SM91	<5	<0.2	0.05	2	10	<0.5	<2	0.08	<0.5	1	261	11	0.91	<10	<1	0.02	<10	<0.01	10	4
Calabanga-Tinembac																				
TH57	<5	<0.2	0.44	2	<10	<0.5	<2	0.03	<0.5	<1	37	1	0.22	<10	<1	0.03	<10	0.01	20	<1
TH58	<5	<0.2	1.39	2	<10	<0.5	<2	0.02	<0.5	<1	93	3	0.41	<10	<1	0.13	<10	<0.01	85	<1
TH60	<5	<0.2	0.38	<2	10	<0.5	<2	<0.01	<0.5	<1	9	1	0.06	<10	<1	0.03	<10	<0.01	<5	<1
TH65	<5	<0.2	1.59	6	40	<0.5	<2	<0.01	<0.5	<1	49	9	0.36	10	<1	0.09	<10	<0.01	5	3
TH66	15	<0.2	1.33	<2	70	<0.5	<2	0.06	<0.5	7	18	90	2.23	<10	<1	0.08	<10	0.01	15	6
TH68	<5	<0.2	0.87	2	20	<0.5	<2	<0.01	<0.5	<1	92	4	0.6	<10	<1	0.19	<10	<0.01	5	<1
Paracale																				
PKY340C	4460	0.8	1.39	<2	10	<0.5	<2	0.01	<0.5	70	845	194	2.73	<10	<1	0.05	<10	1.06	200	1
PTH375	100	11.4	0.44	<2	520	<0.5	<2	<0.01	<0.5	26	204	134	1.76	<10	<1	0.08	<10	<0.01	3760	4
PTH376	1190	2.8	0.4	2	30	<0.5	<2	<0.01	2	3	199	428	1.78	<10	<1	0.22	<10	0.01	70	6
Larap-Exciban																				
PKY326	6020	16.2	0.07	<2	<10	<0.5	120	0.01	<0.5	29	68	2940	>15.00	<10	<1	<0.01	<10	0.02	170	6
PKY327A	5770	1	0.4	<2	<10	<0.5	12	0.05	<0.5	20	91	190	>15.00	<10	<1	0.19	<10	0.09	70	1
PKY329	89267	4.6	0.55	<2	<10	<0.5	10	3.6	<0.5	27	72	468	7.92	<10	<1	0.12	<10	0.39	2250	3
PKY330	2870	3.8	1.12	<2	20	1	6	1.34	2.5	15	34	3460	3.07	<10	<1	0.36	10	0.5	2140	6
PKY333	50	2.8	0.04	<2	10	<0.5	12	0.02	<0.5	1	153	335	0.67	<10	<1	<0.01	<10	<0.01	85	3
PKY334	4940	5.4	0.38	10	30	3	464	0.01	<0.5	4	124	1625	6.67	<10	<1	0.1	<10	0.01	195	34
PKY336	13997	13.2	0.37	4	10	<0.5	8	0.01	0.5	28	105	7820	8.59	<10	<1	0.14	<10	0.15	175	10
PKY337	1640	7.2	0.66	<2	10	<0.5	4	0.07	<0.5	6	113	3060	2.09	<10	<1	0.23	<10	0.39	575	7
PKY338	2210	5.2	0.27	<2	70	<0.5	2	0.04	<0.5	4	169	22	3.71	<10	<1	0.08	<10	0.05	55	4
PKY339	20	12.2	1.54	156	20	0.5	Intf*	<0.01	0.5	108	10	47300	>15.00	10	<1	0.01	20	0.04	15	8
PSM290	90	1.2	0.11	22	60	<0.5	<2	0.05	1	4	285	194	3.61	<10	<1	0.02	<10	0.01	1470	12
PSM293	<5	<0.2	1.35	<2	40	<0.5	<2	0.91	<0.5	15	21	96	2.93	<10	<1	0.07	30	0.18	170	3
PSM294	<5	<0.2	2.05	<2	150	<0.5	<2	0.29	<0.5	14	42	99	3.46	<10	<1	0.78	10	1.34	845	8
PSM295	20	<0.2	1.18	2	120	<0.5	<2	0.04	<0.5	<1	47	287	5.31	<10	<1	0.23	50	0.15	60	125
PSM296a	<5	<0.2	0.56	<2	60	<0.5	<2	0.43	<0.5	4	53	173	2.03	<10	<1	0.15	10	0.37	565	5
PSM296b	<5	<0.2	0.19	<2	10	<0.5	<2	0.04	<0.5	<1	68	87	0.58	<10	<1	0.08	<10	0.06	95	1
PSM297	<5	<0.2	0.38	4	80	<0.5	<2	<0.01	<0.5	<1	33	25	5.24	<10	<1	0.02	<10	<0.01	5	10
PSM298	<5	<0.2	0.34	56	<10	1	<2	0.11	<0.5	1	80	62	9.25	<10	<1	<0.01	<10	<0.01	85	10
PSM299a	<5	<0.2	3.77	<2	170	0.5	<2	0.01	<0.5	1	6	99	4.81	10	<1	0.05	20	0.01	25	4
PTH385	15	<0.2	2.45	<2	120	0.5	<2	<0.01	<0.5	75	128	632	4.24	<10	<1	0.07	110	0.11	1265	137
PTH390	260	1.4	0.41	184	20	<0.5	<2	0.23	2	9	68	22	2.93	<10	<1	0.27	<10	0.1	145	1
PTH391	not/ss	0.2	0.78	6	50	<0.5	<2	0.04	<0.5	6	424	309	1.27	<10	<1	0.06	<10	0.04	35	52
PTH393	<5	<0.2	0.2	<2	<10	<0.5	<2	<0.01	<0.5	1	253	17	0.34	<10	<1	<0.01	<10	<0.01	25	10
PTH396	10	1	0.07	<2	540	<0.5	<2	0.01	<0.5	20	241	436	0.29	<10	1	0.03	<10	<0.01	5580	126
TH100	2180	22.6	0.34	74	380	<0.5	<2	0.03	<0.5	6	133	1775	1.62	<10	<1	0.12	<10	0.03	25	13
TH111	25	0.2	1.4	<2	80	<0.5	<2	1.34	<0.5	26	66	397	2.86	<10	<1	0.45	<10	1.12	425	21
TH112	15	<0.2	1.16	2	70	<0.5	<2	0.21	<0.5	3	78	362	2.14	<10	<1	0.71	<10	0.55	150	2
TH113	250	0.2	1.73	10	30	<0.5	<2	0.24	<0.5	7	34	375	3.44	<10	<1	0.63	<10	0.91	225	1
TH99	60	<0.2	4.46	<2	10	<0.5	Intf*	0.24	<0.5	749	60	0.388	5.37	<10	1	0.03	<10	0.17	155	29

Mt. Bagacay

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Ba_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm	
PKY310	35	<0.2	2.89	<2	<10	0.5	16	<0.01	<0.5	26	1340	1270	>15.00	10	<1	<0.01	<10	0.01	45	11	
PKY313	60	<0.2	0.26	2	<10	<0.5	<2	<0.01	<0.5	3	215	60	1.58	<10	<1	<0.01	<10	<0.01	15	45	
PKY314	<5	0.2	1.17	52	10	1.5	2	<0.01	<0.5	14	1160	1000	>15.00	<10	<1	0.02	<10	<0.01	205	60	
PKY316	<5	<0.2	5.39	<2	40	<0.5	<2	0.05	<0.5	678	1100	288	7.49	<10	<1	<0.01	<10	0.81	2590	7	
PKY317	<5	<0.2	0.2	2	10	<0.5	6	0.13	<0.5	83	230	20	4.72	<10	<1	<0.01	<10	>15.00	930	2	
PKY318	<5	<0.2	3.39	<2	10	<0.5	<2	2.41	<0.5	25	201	52	1.1	<10	<1	0.01	<10	1.34	85	4	
PKY321	<5	<0.2	0.13	6	<10	<0.5	<2	0.01	<0.5	20	187	6	0.75	<10	<1	0.01	<10	0.08	70	1	
PKY322	<5	<0.2	0.63	<2	<10	<0.5	<2	<0.01	<0.5	5	40	6	0.15	<10	<1	0.1	<10	0.03	170	1	
PSM281	2730	1	0.32	<2	30	<0.5	<2	0.34	<0.5	11	88	95	2.95	<10	<1	0.23	10	0.03	25	3	
PSM282	10	<0.2	1.15	<2	300	<0.5	<2	1.13	<0.5	10	29	14	3.1	<10	<1	0.18	30	0.66	750	<1	
PSM283	5230	0.8	0.57	<2	30	<0.5	<2	0.02	<0.5	<1	70	14	3	<10	<1	0.21	<10	0.02	20	1	
PTH371	28273	31	0.11	74	<10	<0.5	78	<0.01	12.5	12	151	1315	11.5	<10	1	0.05	<10	<0.01	10	7	
PTH372	995	10.8	0.65	92	10	<0.5	6	<0.01	<0.5	13	221	1305	5.31	<10	<1	0.24	<10	0.03	35	114	
PTH373	4330	2	1.21	20	<10	<0.5	8	<0.01	<0.5	20	81	960	>15.00	<10	<1	0.06	<10	0.01	70	14	
TH91	880	<0.2	1.1	6	140	<0.5	2	0.14	<0.5	3	122	4	1.62	<10	<1	0.67	10	0.07	40	1	
TH94	6780	6.2	2.47	6	60	<0.5	14	0.99	<0.5	14	85	3810	5.75	<10	<1	0.89	<10	0.72	455	8	
TH95	2600	6.6	1.34	<2	40	<0.5	8	0.27	<0.5	9	82	4710	2.98	<10	<1	0.35	<10	0.68	290	5	
Bulala																					
KY68B	<5	<0.2	0.33	116	10	<0.5	<2	0.02	<0.5	5	73	21	3.65	<10	<1	<0.01	<10	0.04	45	1	
KY72	<5	<0.2	0.53	14	50	<0.5	<2	<0.01	<0.5	2	10	44	3.66	<10	<1	0.08	<10	<0.01	5	1	
KY74	<5	<0.2	0.2	74	<10	<0.5	<2	<0.01	<0.5	9	139	142	4.5	<10	<1	<0.01	<10	<0.01	20	1	
Mt. Culasi																					
SM93	<5	0.2	0.01	14	470	<0.5	<2	0.01	<0.5	1	84	11	0.59	<10	<1	<0.01	<10	<0.01	5	3	
SM94	<5	7.2	0.01	158	30	<0.5	86	0.01	<0.5	5	55	35	4.12	<10	<1	0.03	<10	<0.01	20	58	
Mt. Labo																					
SM100	5	0.2	1.39	12	10	<0.5	<2	0.03	<0.5	7	29	45	3.22	<10	<1	0.14	<10	0.06	25	4	
SM101	<5	<0.2	0.79	28	90	<0.5	<2	0.02	<0.5	6	37	22	4.13	<10	<1	0.03	<10	0.01	20	4	
SM102	<5	<0.2	0.99	18	140	<0.5	<2	0.02	<0.5	4	38	21	1.98	<10	<1	0.19	<10	<0.01	615	5	
SM103	<5	1	2.59	10	20	<0.5	<2	0.01	<0.5	2	83	16	1.89	<10	<1	0.59	<10	<0.01	40	2	
Eastern Caramoan																					
PKY282	<5	<0.2	0.1	<2	<10	<0.5	<2	0.01	<0.5	1	200	3	0.35	<10	<1	<0.01	<10	0.02	40	1	
PPRS29A	95	0.2	2.34	2	50	<0.5	<2	0.02	<0.5	12	91	920	8.75	<10	<1	0.1	<10	1.17	480	4	
PPRS29C	2190	5.8	0.09	1630	<10	<0.5	4	<0.01	<0.5	188	55	723	>15.00	<10	<1	0.01	<10	0.01	130	67	
PPRS29D	35	0.4	5.1	58	40	<0.5	<2	<0.01	<0.5	29	406	1470	14.5	10	<1	<0.01	<10	1.94	465	5	
PPRS30A	85	1.2	0.55	8	30	<0.5	<2	<0.01	<0.5	32	93	247	11.3	<10	<1	0.29	<10	0.05	15	7	
PPRS30B	15	<0.2	4.57	<2	50	<0.5	<2	0.21	<0.5	17	21	239	5.67	10	<1	0.01	<10	2.18	1090	4	
PPRS30C	245	3	0.57	8	30	<0.5	6	<0.01	<0.5	12	63	2670	14.8	<10	<1	0.19	<10	0.03	20	29	
PPRS32	105	5.2	0.31	4	50	<0.5	Intf*	0.11	0.5	5	66	23400	6.63	<10	<1	0.05	<10	0.08	25	12	
PSM268	10	0.2	3.84	<2	10	<0.5	<2	0.39	1.5	21	20	2830	9.7	<10	<1	0.11	<10	4.09	795	14	
PTH310	<5	0.2	0.64	344	<10	<0.5	Intf*	0.56	<0.5	4	13	61900	0.7	<10	1	<0.01	<10	0.24	405	<1	
Kilbay																					
PKY286	<5	<0.2	0.25	246	380	<0.5	2	<0.01	<0.5	3	146	100	9.83	<10	<1	0.01	<10	<0.01	20	8	
PKY287	60	1.2	0.98	36	40	<0.5	<2	0.62	<0.5	24	13	62	4.32	<10	<1	0.16	10	0.53	765	3	
PKY288	220	1.8	0.33	42	650	<0.5	2	<0.01	<0.5	2	60	59	3.3	<10	<1	0.01	<10	<0.01	15	3	
PKY289	5	<0.2	0.98	8	80	<0.5	<2	0.02	<0.5	3	36	8	2.01	<10	<1	0.12	<10	0.76	140	2	
PKY290	50	0.8	0.09	<2	190	<0.5	<2	0.02	<0.5	3	156	10	1.35	<10	<1	0.03	<10	<0.01	20	1	
PKY291	5	0.2	0.52	10	40	<0.5	<2	<0.01	<0.5	26	23	80	4.17	<10	<1	0.15	10	0.02	5	1	
PKY292	<5	<0.2	0.44	58	60	<0.5	<2	0.01	<0.5	4	44	15	2.97	<10	<1	<0.01	<10	<0.01	230	3	

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm
PKY293	<5	0.6	0.54	50	220	<0.5	<2	0.02	<0.5	<1	23	21	3.1	<10	<1	0.13	10	0.01	10	1
PKY294	340	2.6	0.11	22	90	<0.5	2	<0.01	<0.5	9	106	40	4.58	<10	<1	0.03	<10	<0.01	95	5
PKY295	<5	<0.2	0.38	<2	40	0.5	<2	6.94	<0.5	12	29	11	2.06	<10	<1	0.08	10	3.57	1025	2
PKY296	<5	<0.2	2.13	<2	20	<0.5	<2	0.03	<0.5	44	17	129	5.85	<10	<1	0.01	<10	0.03	65	40
PKY298	<5	0.2	3.76	10	10	<0.5	<2	0.01	<0.5	83	32	41	7.55	<10	<1	0.07	10	0.15	250	62
PKY299	<5	<0.2	0.79	10	240	<0.5	<2	0.01	<0.5	5	38	37	12.85	<10	<1	<0.01	<10	0.01	55	25
PKY300	<5	<0.2	1.65	<2	100	<0.5	<2	0.41	<0.5	13	20	27	2.82	<10	<1	0.07	20	1.18	255	2
PKY301	<5	<0.2	2.06	8	120	<0.5	<2	0.81	<0.5	15	29	20	3.14	<10	<1	0.09	20	1.23	595	8
PKY302A	<5	<0.2	0.2	2	70	<0.5	<2	<0.01	<0.5	1	176	5	1.55	<10	<1	<0.01	<10	0.01	15	5
PKY302B	<5	<0.2	0.1	2	40	<0.5	<2	<0.01	<0.5	<1	152	1	0.65	<10	<1	<0.01	<10	<0.01	10	2
PKY302C	<5	<0.2	0.25	8	20	<0.5	<2	<0.01	<0.5	<1	96	29	3.57	<10	<1	<0.01	<10	<0.01	15	3
PKY303	90	0.4	0.69	12	40	<0.5	<2	<0.01	<0.5	17	23	40	4.33	<10	<1	<0.01	<10	<0.01	15	2
PKY304	<5	<0.2	0.67	12	50	<0.5	<2	<0.01	<0.5	13	13	46	1.92	<10	<1	0.19	<10	0.01	40	3
PKY305	5	<0.2	0.34	4	50	<0.5	<2	<0.01	<0.5	10	69	6	2.13	<10	<1	0.04	<10	<0.01	5	<1
PKY306	<5	<0.2	1.65	<2	160	<0.5	<2	0.35	<0.5	15	24	26	2.97	<10	<1	0.14	30	1.35	1055	3
PKY308	<5	<0.2	2.12	<2	100	<0.5	<2	2.22	<0.5	11	23	31	2.27	<10	<1	0.12	20	1.33	425	2
PKY309	25	0.2	0.33	4	40	<0.5	<2	0.01	<0.5	1	74	5	0.15	<10	<1	<0.01	<10	<0.01	25	3
PSM275	5	1.8	0.57	10	160	<0.5	<2	0.15	<0.5	3	86	145	0.55	<10	<1	0.12	<10	0.28	75	1
PSM276	10	0.4	0.64	42	160	<0.5	<2	0.09	<0.5	14	37	33	1.92	<10	1	0.21	<10	0.09	175	1
PSM277	95	0.2	0.17	106	30	<0.5	2	<0.01	<0.5	8	125	175	3.98	<10	<1	0.06	<10	<0.01	10	1
PSM279	<5	<0.2	2.04	<2	370	<0.5	<2	0.13	<0.5	7	44	19	4.68	<10	<1	0.01	30	0.11	175	<1
PSM280	<5	<0.2	0.12	24	90	<0.5	<2	<0.01	<0.5	8	86	10	2	<10	<1	<0.01	<10	<0.01	500	3
PTH317	20	<0.2	0.05	10	100	<0.5	<2	0.03	<0.5	<1	204	106	0.43	<10	<1	<0.01	<10	0.01	35	5
PTH318	40	<0.2	0.35	2	160	<0.5	<2	0.01	<0.5	20	45	142	1.73	<10	<1	0.01	<10	<0.01	10	5
PTH319	<5	<0.2	2.07	<2	50	<0.5	<2	0.02	<0.5	12	32	74	4.46	<10	<1	0.28	<10	1.21	405	4
PTH320	10	<0.2	0.48	<2	40	<0.5	<2	0.04	<0.5	16	72	47	3.13	<10	<1	0.22	<10	0.04	15	15
PTH321	275	0.6	0.42	<2	50	<0.5	<2	<0.01	<0.5	3	54	718	1.23	<10	<1	0.16	<10	<0.01	5	1
PTH322	250	0.6	0.47	<2	50	<0.5	<2	<0.01	<0.5	1	131	727	0.62	<10	<1	0.18	10	<0.01	10	2
PTH324	45	<0.2	1.38	<2	390	1	<2	0.01	<0.5	9	34	860	1.58	<10	<1	0.11	<10	0.03	15	18
PTH325	180	0.6	0.28	2	110	<0.5	<2	<0.01	<0.5	4	223	868	0.61	<10	<1	0.01	<10	<0.01	20	34
PTH326	215	0.6	0.75	<2	280	<0.5	<2	0.01	<0.5	1	181	527	0.54	<10	<1	0.03	<10	<0.01	10	19
PTH329	<5	<0.2	0.05	<2	10	<0.5	<2	<0.01	<0.5	<1	187	7	0.25	<10	<1	<0.01	<10	<0.01	10	<1
PTH330	25	0.8	0.04	4	10	<0.5	<2	<0.01	<0.5	1	223	19	0.36	<10	<1	<0.01	<10	<0.01	20	29
PTH331	<5	<0.2	2.01	<2	220	<0.5	<2	1.49	<0.5	13	53	18	2.63	<10	<1	0.12	10	1.33	540	3
PTH332	<5	<0.2	1.52	<2	160	<0.5	<2	1.95	<0.5	10	30	20	2.71	<10	<1	0.18	10	0.63	335	2
PTH334	<5	<0.2	0.03	<2	10	4	2	>15.00	<0.5	<1	13	<1	1.94	<10	1	<0.01	<10	0.68	3510	<1
PTH335	<5	0.2	0.45	10	60	<0.5	<2	0.54	<0.5	8	23	110	1.66	<10	<1	0.19	<10	0.03	85	1
PTH336	20	0.8	0.2	4	80	<0.5	<2	0.05	29.5	5	144	577	2.25	<10	<1	0.06	<10	0.03	30	8
PTH337	<5	<0.2	0.02	<2	<10	2.5	2	>15.00	<0.5	<1	7	3	0.78	<10	<1	<0.01	<10	0.77	850	<1
PTH338	535	4.4	0.27	164	60	<0.5	<2	0.57	<0.5	1	49	226	>15.00	<10	<1	0.12	<10	0.02	50	66
PTH339	90	6.2	0.08	6070	50	<0.5	16	0.06	<0.5	3	91	724	5.54	<10	<1	0.04	<10	<0.01	15	2
PTH340	20	1.4	0.24	280	270	<0.5	<2	0.02	<0.5	<1	101	59	1.63	<10	3	0.14	<10	0.01	15	14
PTH341	5	0.2	0.12	1080	80	<0.5	<2	0.02	<0.5	<1	86	65	1.13	<10	<1	0.04	<10	<0.01	5	10
PTH344	20	<0.2	0.29	6	40	<0.5	2	13.85	<0.5	6	22	51	3.3	<10	<1	0.07	20	5.82	5280	1
PTH345	165	3.2	0.43	102	110	<0.5	<2	0.19	<0.5	1	43	24	6.83	<10	<1	0.28	<10	0.09	90	3
PTH346	60	0.6	0.06	1430	<10	<0.5	<2	0.04	<0.5	19	123	40	2.83	<10	28	0.03	<10	0.01	20	4
PTH347	<5	<0.2	0.6	54	50	<0.5	<2	0.03	<0.5	10	31	28	0.8	<10	<1	0.27	10	0.01	5	1
PTH348	160	0.8	0.31	>10000	10	<0.5	<2	0.03	0.5	10	125	33	10.15	<10	69	0.17	<10	0.01	20	54
PTH349	<5	<0.2	0.51	156	80	<0.5	<2	0.06	<0.5	14	22	31	3.52	<10	3	0.17	<10	0.03	5	4
PTH350	<10	<0.2	0.17	372	50	<0.5	<2	0.08	<0.5	2	85	9	3.32	<10	4	0.14	<10	<0.01	15	7
PTH351	5	<0.2	1.09	20	70	<0.5	<2	0.42	<0.5	6	32	9	2.19	<10	<1	0.06	10	0.24	155	<1
PTH354	<5	<0.2	7.34	<2	70	<0.5	<2	0.01	<0.5	18	19	59	3.35	10	<1	0.06	<10	0.07	105	3

Geochemical grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Ga_ppm	Hg_ppm	K_%	La_ppm	Mg_%	Mn_ppm	Mo_ppm
PTH359	830	1.6	0.44	2500	80	<0.5	<2	0.09	<0.5	10	47	22	2.43	<10	<1	0.19	<10	0.01	5	<1
PTH360	590	2	0.26	746	40	<0.5	<2	0.06	<0.5	16	46	20	4.03	<10	<1	0.16	<10	0.01	5	1
PTH362	825	6	0.35	690	110	<0.5	<2	<0.01	<0.5	16	64	34	1.97	<10	1	0.2	<10	<0.01	5	7
PTH363	20	<0.2	0.01	6	<10	<0.5	<2	<0.01	<0.5	<1	162	<1	0.62	<10	<1	<0.01	<10	<0.01	20	<1
PTH364	40	2	0.14	68	120	<0.5	<2	0.68	<0.5	6	295	28	2.01	<10	<1	0.03	<10	0.04	30	3
<u>Tuba</u>																				
PSM272	210	10.4	0.34	112	10	<0.5	<2	<0.01	<0.5	<1	98	81	4.04	<10	<1	0.12	<10	0.08	20	12

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Ti_%	Tl_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
Bacon-Manito													
KY12	0.09	1	180	<2	<2	2	136	<0.01	<10	<10	23	<10	<2
KY15	0.16	1	180	<2	<2	1	146	<0.01	<10	<10	13	<10	<2
KY16	0.04	40	220	6	<2	14	48	0.19	<10	<10	168	<10	76
KY18	0.04	2	370	<2	<2	4	219	0.01	<10	<10	44	<10	10
KY20	0.08	3	190	2	<2	3	152	0.01	<10	<10	42	<10	6
KY22	0.39	18	1040	<2	<2	8	286	0.14	<10	<10	132	<10	62
KY23	0.01	25	640	4	<2	7	18	<0.01	<10	<10	47	<10	74
KY24	0.01	5	20	6	<2	3	15	<0.01	<10	<10	16	<10	14
KY26B	<0.01	5	150	2	<2	2	31	<0.01	<10	<10	22	<10	2
KY27	0.03	11	780	2	<2	7	80	0.01	<10	<10	43	<10	28
PBM001	0.04	1	660	30	10	<1	27	<0.01	<10	<10	3	<10	8
PBM005	0.03	10	560	90	2	1	46	<0.01	<10	<10	11	50	50
PBM006	0.21	14	1290	18	<2	7	421	0.1	<10	<10	134	<10	36
PBM007	0.1	6	800	16	<2	6	434	0.08	<10	<10	57	<10	152
PBM008	0.1	5	350	56	10	<1	29	0.03	<10	<10	7	<10	192
PBM009	0.01	2	50	10	<2	<1	73	<0.01	<10	<10	9	<10	10
PBM010	0.05	16	440	8	2	1	452	<0.01	<10	<10	9	<10	22
PBM011	0.01	1	320	<2	<2	<1	107	<0.01	<10	<10	4	<10	6
PBM012	0.03	30	1370	4	<2	5	296	0.04	<10	<10	66	<10	158
PKY201	<0.01	5	1650	2	<2	13	100	0.3	<10	<10	181	<10	64
PKY203	0.03	18	2180	10	<2	12	189	0.30	<10	<10	191	<10	74
PKY204	<0.01	5	150	2	<2	7	35	0.25	<10	<10	218	<10	30
PKY205	0.13	15	880	4	<2	8	139	<0.01	<10	<10	95	<10	52
PKY207	0.05	11	200	2	<2	<1	157	<0.01	<10	<10	18	<10	8
PKY208	<0.01	3	10	2	<2	<1	47	<0.01	<10	<10	3	<10	<2
PKY209	0.05	2	240	2	<2	<1	120	<0.01	<10	<10	37	<10	2
PKY211	0.02	1	380	20	<2	1	155	<0.01	<10	<10	25	<10	<2
PKY212	0.01	7	80	2	<2	4	51	<0.01	<10	<10	24	<10	12
PKY213	<0.01	6	250	10	<2	16	14	0.23	<10	<10	220	<10	76
PKY216	<0.01	5	420	4	<2	20	12	0.2	<10	<10	132	10	60
PKY217	0.05	<1	280	2	<2	2	208	0.03	<10	<10	36	<10	6
PKY218	0.1	1	310	<2	<2	5	282	<0.01	<10	<10	57	<10	2
PKY220	0.07	<1	130	<2	<2	1	123	0.01	<10	<10	24	<10	<2
PKY221	0.15	1	420	<2	<2	5	160	0.14	<10	<10	135	<10	40
PKY222	0.01	<1	80	2	<2	<1	66	0.01	<10	<10	11	<10	<2
PKY223	0.4	3	910	<2	<2	5	298	0.19	<10	<10	140	<10	62
PSM204	0.03	2	410	<2	<2	3	279	<0.01	<10	<10	60	<10	16
PSM205	0.01	4	530	<2	<2	9	209	<0.01	<10	<10	97	<10	34
PSM210	0.01	12	1220	<2	<2	6	94	<0.01	<10	<10	37	<10	34
PSM211	<0.01	5	180	2	2	12	20	0.21	<10	<10	181	<10	68
PSM212	<0.01	6	250	8	2	14	7	0.23	<10	<10	205	<10	78
PSM213	<0.01	9	270	8	2	20	10	0.27	<10	<10	199	<10	66
PSM216	0.01	7	360	<2	2	18	131	0.22	<10	<10	200	<10	72
PTH201	<0.01	1	130	8	<2	1	12	0.02	<10	<10	18	<10	4
PTH202	<0.01	2	340	<2	<2	<1	5	0.02	<10	<10	25	<10	4
PTH203	0.01	1	160	<2	<2	1	139	<0.01	<10	<10	39	<10	2
PTH204	0.01	2	280	<2	<2	3	113	<0.01	<10	<10	86	<10	20
PTH206	0.12	6	1240	<2	<2	4	148	0.17	<10	<10	134	<10	44
SM15	0.02	<1	40	<2	<2	1	21	<0.01	<10	<10	23	<10	<2
SM17	0.01	5	270	<2	<2	20	34	0.06	<10	<10	177	<10	112

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Ti_%	Ti_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
SM21	0.01	3	110	<2	<2	<1	79	<0.01	<10	<10	15	<10	<2
SM22a	0.12	<1	340	<2	<2	3	253	<0.01	<10	<10	29	<10	<2
SM23	0.13	6	130	<2	<2	<1	126	<0.01	<10	<10	23	<10	2
SM25	<0.01	1	90	<2	<2	7	76	<0.01	<10	<10	42	<10	4
TH08	0.01	<1	240	<2	<2	1	192	<0.01	<10	<10	21	<10	<2
TH10	<0.01	1	430	6	<2	1	172	<0.01	<10	<10	18	<10	4
TH11	0.16	<1	170	<2	<2	1	104	<0.01	<10	<10	39	<10	<2
TH12	<0.01	5	30	<2	<2	3	17	0.01	<10	<10	4	<10	<2
TH13	0.01	5	80	2	<2	<1	50	<0.01	<10	<10	9	<10	6
TH14	<0.01	2	<10	<2	<2	<1	2	<0.01	<10	<10	2	<10	<2
TH18	0.1	20	970	44	<2	5	965	0.01	<10	<10	59	<10	8
TH19	0.03	<1	210	2	<2	1	126	<0.01	<10	<10	34	<10	4
TH21	0.09	3	1020	<2	<2	2	207	<0.01	<10	<10	35	<10	2
TH22	0.05	6	340	2	<2	1	109	<0.01	<10	<10	18	<10	12
TH23	0.05	2	140	<2	<2	3	85	<0.01	<10	<10	26	<10	2
TH25	0.08	4	160	2	<2	1	103	<0.01	<10	<10	12	<10	6
<u>Tiw-Mt. Malinao</u>													
PKY259	0.05	4	230	<2	<2	2	131	<0.01	<10	<10	21	<10	4
PKY260	0.02	3	290	<2	<2	<1	261	<0.01	<10	<10	23	<10	4
PKY262	0.06	7	480	<2	<2	1	471	<0.01	<10	<10	22	<10	2
PKY263	0.06	4	150	<2	<2	<1	190	<0.01	<10	<10	17	<10	2
PKY264	0.03	4	130	<2	<2	<1	57	<0.01	<10	<10	19	<10	4
PKY265	0.01	4	180	<2	<2	1	159	<0.01	<10	<10	19	<10	4
PKY266	0.04	1	250	<2	<2	<1	264	<0.01	<10	<10	22	<10	<2
PKY267	0.13	16	800	<2	<2	11	110	0.01	<10	<10	88	<10	100
PKY269	0.01	6	80	<2	<2	3	134	<0.01	<10	<10	18	<10	6
PKY270	0.02	1	120	<2	<2	1	104	<0.01	<10	<10	23	<10	4
PKY274	0.01	10	290	4	<2	2	46	<0.01	<10	<10	14	<10	60
PKY275	0.06	12	1210	<2	<2	4	58	<0.01	<10	<10	44	<10	74
PKY276	0.24	8	1150	<2	<2	7	183	0.21	<10	<10	164	<10	70
PKY277	0.13	9	1230	<2	<2	6	189	0.1	<10	<10	121	<10	146
PKY279	0.01	5	660	<2	<2	7	111	0.07	<10	<10	104	<10	46
PKY280	<0.01	5	90	<2	<2	5	66	<0.01	<10	<10	33	<10	<2
PSM236	0.05	6	960	<2	<2	6	225	0.05	<10	<10	66	<10	16
PSM237	<0.01	3	220	2	<2	<1	11	<0.01	<10	<10	37	<10	8
PSM238a	0.1	6	1130	<2	<2	6	91	0.01	<10	<10	58	<10	62
PSM239	0.03	10	1050	<2	2	5	39	0.26	<10	<10	153	<10	56
PSM242	<0.01	<1	110	<2	<2	1	10	0.01	<10	<10	23	<10	6
PSM243	0.01	1	30	8	<2	<1	23	<0.01	<10	<10	3	<10	<2
PSM244	0.06	1	420	<2	<2	1	278	<0.01	<10	<10	23	<10	4
PSM245	0.13	6	500	<2	<2	3	232	<0.01	<10	<10	58	<10	8
PSM247	0.11	3	350	<2	<2	1	135	<0.01	<10	<10	24	<10	2
PSM248	0.05	14	110	<2	<2	1	107	<0.01	<10	<10	18	<10	8
PSM249	0.11	1	580	2	<2	<1	353	<0.01	<10	<10	24	<10	6
PSM250	0.07	3	300	2	<2	2	228	<0.01	<10	<10	17	<10	<2
PSM251	<0.01	18	80	<2	<2	2	71	<0.01	<10	<10	28	<10	18
PSM252	0.06	7	130	<2	<2	4	34	0.02	<10	<10	61	<10	26
PSM254	<0.01	1	360	<2	<2	<1	32	<0.01	<10	<10	19	<10	6
PSM256	<0.01	3	20	<2	<2	<1	7	<0.01	<10	<10	6	<10	<2
PSM257	<0.01	13	600	2	<2	<1	5	<0.01	<10	<10	9	<10	10
PSM261	<0.01	21	<10	12	<2	<1	11	0.01	<10	<10	3	<10	6

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Ti_%	Ti_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
PSM263	0.02	2	140	<2	<2	1	61	<0.01	<10	<10	14	<10	8
PSM264	0.02	15	70	<2	<2	<1	80	<0.01	<10	<10	11	<10	22
PSM265	0.09	2	130	<2	<2	1	131	<0.01	<10	<10	29	<10	2
PSM266	0.05	1	170	<2	<2	1	182	<0.01	<10	<10	78	<10	<2
PTH263	<0.01	3	20	<2	<2	<1	7	<0.01	<10	<10	4	<10	2
PTH264	0.17	3	800	<2	2	3	140	0.11	<10	<10	82	<10	28
PTH265	0.03	2	<10	<2	<2	<1	32	<0.01	<10	<10	2	<10	<2
PTH266	<0.01	2	<10	<2	<2	<1	56	<0.01	<10	<10	1	<10	<2
PTH269	<0.01	2	30	4	<2	<1	6	<0.01	<10	<10	1	<10	<2
PTH271	<0.01	2	<10	<2	<2	<1	18	<0.01	<10	<10	<1	<10	<2
PTH272	<0.01	5	950	8	<2	4	121	<0.01	<10	<10	35	<10	58
PTH273	0.07	1	1150	<2	2	7	85	0.02	<10	<10	106	<10	66
PTH274a	0.02	3	700	8	<2	<1	24	<0.01	<10	<10	35	<10	14
PTH274b	0.03	1	1280	6	<2	1	32	<0.01	<10	<10	35	<10	38
PTH274c	0.03	2	1160	4	2	4	78	0.02	<10	<10	84	<10	70
PTH275	<0.01	4	110	6	<2	1	23	<0.01	<10	<10	20	<10	18
PTH276	0.01	2	410	8	<2	<1	11	<0.01	<10	<10	6	<10	6
PTH277a	<0.01	3	320	86	<2	1	26	<0.01	<10	<10	21	<10	70
PTH277b	<0.01	<1	250	64	<2	1	176	<0.01	<10	<10	28	<10	44
PTH278	0.18	8	1140	6	<2	10	165	0.11	<10	<10	149	<10	68
PTH279	0.03	9	1310	8	<2	10	96	<0.01	<10	<10	82	<10	68
PTH280	<0.01	1	260	22	<2	1	8	0.02	<10	<10	32	<10	16
PTH281	0.03	6	1110	6	<2	7	105	0.11	<10	<10	60	<10	62
PTH282	<0.01	2	10	14	<2	<1	24	<0.01	<10	<10	3	<10	6
PTH290	0.02	<1	400	6	<2	<1	211	<0.01	<10	<10	6	<10	2
PTH291	<0.01	5	30	10	<2	12	34	0.15	<10	<10	68	<10	34
PTH295	<0.01	10	230	8	<2	22	19	0.32	<10	<10	243	<10	62
PTH297	0.07	4	600	6	<2	7	101	0.11	<10	<10	87	<10	16
PTH301	0.01	4	60	2	<2	2	57	0.01	<10	<10	19	<10	8
PTH304	<0.01	24	20	10	<2	<1	6	0.01	<10	<10	15	<10	14
PTH305	0.05	1	500	2	4	1	334	<0.01	<10	<10	25	<10	76
PTH306	0.24	11	410	6	<2	12	183	0.13	<10	<10	152	<10	88
PTH307	0.11	9	320	<2	2	10	87	0.03	<10	<10	76	<10	28
PTH308	<0.01	1	10	8	<2	<1	4	<0.01	<10	<10	3	<10	2
PTH309	<0.01	<1	140	10	<2	1	153	<0.01	<10	<10	25	<10	2
SM27	0.01	1	10	<2	10	<1	9	<0.01	<10	<10	3	<10	<2
SM29	0.26	28	610	<2	<2	6	566	0.17	<10	<10	50	<10	76
SM30	0.05	24	2110	674	2	8	80	<0.01	<10	<10	30	<10	722
SM31	0.03	5	1140	14	<2	1	890	<0.01	<10	<10	13	<10	10
SM32	0.03	5	440	2	<2	<1	1430	<0.01	<10	<10	20	<10	44
SM34	0.06	5	1320	2	<2	1	78	0.04	<10	<10	13	<10	22
SM35	0.03	<1	50	<2	<2	<1	27	<0.01	<10	<10	8	<10	<2
SM70c	0.01	<1	290	10	<2	<1	44	<0.01	<10	<10	2	<10	6
SM71b	0.06	1	150	<2	<2	<1	421	<0.01	<10	<10	39	<10	10
Pio Duran													
KY06	0.29	13	190	<2	<2	6	48	0.13	<10	<10	72	<10	20
KY08	0.28	10	200	<2	<2	8	21	0.08	<10	<10	65	<10	46
KY28A	0.05	12	760	<2	<2	6	58	0.11	<10	<10	84	<10	58
KY29	0.08	5	590	<2	<2	3	31	0.07	<10	<10	68	<10	54
SM05	0.01	20	<10	<2	<2	<1	142	<0.01	<10	<10	3	<10	6

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Ti_%	Tl_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
<u>Gate Mountains</u>													
KY31	0.02	4	840	<2	2	3	49	<0.01	<10	<10	5	<10	10
KY33	0.01	10	50	<2	<2	8	31	0.01	<10	<10	171	<10	124
KY35	0.01	18	1580	10	<2	<1	12	<0.01	<10	<10	13	<10	40
KY36	0.09	10	10	<2	<2	3	10	<0.01	<10	<10	19	<10	8
KY37	0.09	<1	560	6	<2	1	88	<0.01	<10	<10	10	<10	2
KY39	0.15	5	1000	2	<2	6	79	0.17	<10	<10	123	<10	38
KY40	0.04	9	90	<2	<2	<1	49	<0.01	<10	<10	8	<10	6
KY41	0.03	8	30	8	<2	25	72	0.1	<10	<10	184	<10	58
KY42	0.05	4	80	<2	<2	<1	86	<0.01	<10	<10	12	<10	4
KY43	0.05	8	140	<2	<2	<1	108	<0.01	<10	<10	12	<10	<2
KY44	<0.01	12	550	<2	<2	<1	22	<0.01	<10	<10	10	<10	30
KY45	0.47	9	1130	<2	<2	12	438	0.07	<10	<10	156	<10	42
KY46	<0.01	4	2120	6	<2	3	73	<0.01	<10	<10	19	<10	26
KY47	0.01	11	1120	2	<2	11	63	<0.01	<10	<10	40	<10	32
KY48	0.02	15	1270	2	2	5	111	<0.01	<10	<10	13	<10	14
PKY224	0.04	1	400	2	<2	<1	271	<0.01	<10	<10	18	<10	4
PKY228	0.03	11	310	8	<2	21	261	0.1	<10	<10	82	<10	64
PKY231	0.1	<1	470	2	<2	<1	498	<0.01	<10	<10	8	<10	<2
PKY232	0.11	<1	130	2	<2	<1	140	<0.01	<10	<10	6	<10	<2
PKY233	0.05	9	140	2	<2	<1	78	<0.01	<10	<10	13	<10	<2
PKY234	0.11	9	890	2	<2	10	102	<0.01	<10	<10	106	<10	58
PKY235	0.04	4	700	6	<2	3	11	<0.01	<10	<10	30	<10	46
PKY236	0.46	5	700	<2	<2	9	217	0.07	<10	<10	99	<10	50
PKY237	0.04	6	680	24	<2	2	17	<0.01	<10	<10	9	<10	14
PKY238	0.04	1	80	<2	<2	<1	35	<0.01	<10	<10	6	<10	<2
PKY240	0.02	6	50	<2	<2	<1	21	<0.01	<10	<10	5	<10	4
PKY242	0.03	4	880	6	<2	<1	22	<0.01	<10	<10	21	<10	36
PKY243	0.02	1	110	2	<2	<1	127	<0.01	<10	<10	5	<10	2
PKY244	0.01	3	140	4	<2	<1	7	<0.01	<10	<10	5	<10	36
PKY245	0.04	4	1330	2	<2	1	52	<0.01	<10	<10	10	<10	40
PKY247	0.01	14	170	<2	<2	18	79	0.07	<10	<10	93	<10	80
PKY248	<0.01	4	100	<2	<2	1	11	<0.01	<10	<10	11	<10	48
PKY249	<0.01	9	4050	<2	<2	<1	40	<0.01	<10	<10	45	<10	50
PKY250	<0.01	7	950	<2	<2	1	11	<0.01	<10	<10	26	<10	14
PKY251	<0.01	13	860	<2	<2	1	8	<0.01	<10	<10	74	<10	164
PKY252	0.03	1	450	8	<2	1	320	<0.01	<10	<10	41	<10	12
PKY253	<0.01	4	590	<2	<2	<1	8	<0.01	<10	<10	11	<10	10
PKY254	0.03	4	50	<2	<2	<1	33	<0.01	<10	<10	6	<10	6
PKY255	<0.01	1	190	4	<2	14	101	0.08	<10	<10	129	<10	72
PKY257	<0.01	<1	270	2	2	14	64	0.18	<10	<10	152	<10	50
PSM219	0.01	10	1140	2	2	13	31	0.19	<10	<10	193	<10	110
PSM220	<0.01	1	290	10	<2	14	29	0.32	<10	<10	169	<10	80
PSM222	0.02	7	270	4	<2	15	56	0.18	<10	<10	144	<10	58
PSM225	<0.01	5	10	<2	<2	<1	4	<0.01	<10	<10	6	<10	2
PSM226	<0.01	5	60	36	<2	<1	33	<0.01	<10	<10	16	<10	28
PSM227a	<0.01	4	20	<2	<2	<1	3	<0.01	<10	<10	1	<10	2
PSM227b	0.01	3	970	4	2	5	114	<0.01	<10	<10	103	<10	38
PSM228	<0.01	7	10	<2	<2	<1	3	<0.01	<10	<10	4	<10	<2
PSM231	<0.01	6	10	<2	<2	<1	4	<0.01	<10	<10	2	<10	<2
PSM232	0.03	30	550	<2	2	10	106	0.09	<10	<10	142	<10	44

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Ti_%	Tl_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
PSM233	<0.01	1	40	<2	<2	7	26	0.04	<10	<10	89	<10	8
PSM234	0.01	<1	550	6	<2	3	60	0.01	<10	<10	123	<10	12
PSM235	<0.01	<1	160	<2	<2	7	147	0.01	<10	<10	18	<10	4
PTH211	0.05	4	420	<2	<2	9	87	0.13	<10	<10	87	<10	70
PTH212	0.13	5	90	<2	2	10	172	0.16	<10	<10	100	<10	72
PTH214	<0.01	1	80	<2	<2	9	22	0.03	<10	<10	153	<10	18
PTH215a	<0.01	15	130	2	<2	11	99	0.01	<10	<10	68	<10	16
PTH215b	<0.01	6	210	6	<2	11	164	0.01	<10	<10	70	<10	10
PTH217	0.04	6	60	6	2	11	92	0.18	<10	<10	88	<10	84
PTH218	0.08	<1	270	4	<2	<1	163	<0.01	<10	<10	11	<10	<2
PTH219	<0.01	3	4640	6	<2	20	88	0.04	<10	<10	1115	<10	46
PTH220	0.21	5	780	2	<2	11	140	0.05	<10	<10	118	<10	66
PTH221	0.02	<1	190	2	<2	<1	32	<0.01	<10	<10	10	<10	2
PTH222	0.03	1	380	<2	<2	<1	79	<0.01	<10	<10	33	<10	2
PTH223	0.04	<1	370	2	<2	<1	205	<0.01	<10	<10	12	<10	4
PTH224	0.03	<1	510	4	<2	5	56	<0.01	<10	<10	45	<10	84
PTH225	0.06	<1	350	16	<2	<1	15	<0.01	<10	<10	14	<10	8
PTH226a	0.04	6	840	8	<2	4	11	<0.01	<10	<10	51	<10	52
PTH226b	0.05	3	920	<2	<2	7	11	<0.01	<10	<10	134	<10	78
PTH227	0.04	<1	470	8	<2	2	110	<0.01	<10	<10	18	<10	4
PTH228	0.07	4	120	2	<2	1	57	<0.01	<10	<10	9	<10	<2
PTH229	0.06	2	490	2	<2	1	38	<0.01	<10	<10	16	<10	8
PTH230	0.04	1	50	6	<2	1	25	<0.01	<10	<10	13	<10	2
PTH231	0.06	1	270	8	<2	<1	122	<0.01	<10	<10	24	<10	6
PTH232	0.31	3	610	4	2	4	135	0.21	<10	<10	143	<10	46
PTH233	0.05	1	110	6	<2	<1	58	<0.01	<10	<10	4	<10	4
PTH234	0.01	3	180	<2	<2	1	75	<0.01	<10	<10	10	<10	24
PTH235	0.02	<1	130	4	<2	1	23	<0.01	<10	<10	11	<10	10
PTH236	0.01	1	1210	14	2	1	113	<0.01	<10	<10	18	<10	4
PTH238	0.01	14	920	<2	<2	10	21	<0.01	<10	<10	138	<10	168
PTH239	0.01	6	80	6	2	13	12	0.07	<10	<10	185	<10	74
PTH240	<0.01	5	130	10	<2	2	6	<0.01	<10	<10	29	<10	10
PTH242	0.01	2	90	10	2	5	71	0.1	<10	<10	100	<10	42
PTH243	0.07	2	720	6	2	5	144	0.08	<10	<10	107	<10	56
PTH244	0.05	1	700	6	<2	6	70	0.06	<10	<10	70	<10	38
PTH245	0.13	3	710	6	2	7	151	0.09	<10	<10	95	<10	58
PTH245	<0.01	1	40	<2	<2	<1	8	<0.01	<10	<10	20	10	6
PTH248	0.03	1	150	4	<2	<1	117	<0.01	<10	<10	12	<10	2
PTH249	0.02	1	1790	2	<2	6	71	0.06	<10	<10	120	<10	76
PTH251	0.03	1	220	2	<2	<1	90	<0.01	<10	<10	8	<10	2
PTH255	0.04	<1	650	26	<2	<1	21	<0.01	<10	<10	1	<10	18
PTH257	0.05	<1	1260	6	<2	1	86	<0.01	<10	<10	18	<10	32
PTH258	0.14	<1	160	2	<2	1	109	<0.01	<10	<10	15	<10	<2
PTH259	0.08	<1	310	6	<2	<1	221	<0.01	<10	<10	27	<10	2
PTH260	0.05	<1	590	14	<2	2	132	<0.01	<10	<10	72	<10	24
SM50	0.2	1	130	4	<2	12	585	0.01	<10	<10	88	<10	34
SM53	0.02	3	440	12	2	7	84	0.01	<10	<10	155	<10	38
SM55	0.01	1	50	12	<2	<1	25	<0.01	<10	<10	7	<10	<2
SM60	<0.01	2	<10	<2	<2	<1	3	<0.01	<10	<10	2	<10	<2
SM61	0.05	1	80	<2	<2	1	95	<0.01	<10	<10	12	<10	<2
SM65	0.27	<1	360	<2	<2	<1	511	<0.01	<10	<10	13	<10	<2
SM66	0.14	<1	140	<2	<2	1	109	<0.01	<10	<10	27	<10	6

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Tl_%	Tl_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
TH26	0.03	3	440	<2	2	2	146	<0.01	<10	<10	14	<10	6
TH28	<0.01	5	30	10	<2	<1	54	<0.01	<10	<10	6	<10	<2
TH29	0.14	1	400	2	2	3	205	<0.01	<10	<10	51	<10	10
TH34	0.08	3	1730	<2	<2	9	34	0.04	<10	<10	78	<10	24
TH37	<0.01	7	50	<2	2	<1	7	<0.01	<10	<10	5	<10	<2
TH38	0.07	1	930	12	<2	16	483	0.23	<10	<10	212	<10	68
TH39	0.02	2	390	16	<2	18	170	0.17	<10	<10	171	<10	90
TH42	<0.01	10	190	10	<2	15	5	0.21	<10	<10	156	<10	56
TH46	0.1	<1	250	<2	<2	1	258	<0.01	<10	<10	18	<10	<2
TH48	<0.01	6	80	<2	2	<1	10	<0.01	<10	<10	6	<10	6
TH49	<0.01	2	50	<2	<2	<1	1	<0.01	<10	<10	3	<10	8
TH51	0.06	5	30	2	<2	3	22	0.01	<10	<10	14	<10	14
TH55	<0.01	4	110	16	<2	<1	16	<0.01	<10	<10	3	<10	10
<u>Irosin South</u>													
SM38	0.03	<1	90	<2	<2	<1	26	<0.01	<10	<10	20	<10	<2
SM41	<0.01	7	80	2	<2	<1	28	<0.01	<10	<10	6	<10	10
SM42	0.03	1	70	<2	<2	<1	40	<0.01	<10	<10	20	<10	2
SM44	<0.01	14	40	2	<2	<1	17	<0.01	<10	<10	8	10	2
SM47	0.02	<1	210	<2	2	<1	79	<0.01	<10	<10	18	<10	2
<u>Bacolodo</u>													
SM67	0.2	5	1290	10	6	4	127	0.06	<10	<10	51	<10	64
<u>Siruma Peninsula</u>													
TH71	0.01	4	30	<2	<2	6	1	<0.01	<10	<10	56	<10	6
TH72	0.1	53	320	<2	<2	7	71	0.27	<10	<10	75	<10	34
TH74	0.06	3	<10	<2	<2	1	1	<0.01	<10	<10	30	<10	<2
TH75	<0.01	7	10	4	<2	<1	7	<0.01	<10	<10	5	<10	10
TH77	<0.01	11	<10	<2	<2	<1	1	<0.01	<10	<10	6	<10	<2
TH78	0.01	78	30	8	<2	15	7	0.03	<10	<10	105	<10	42
TH81	0.03	15	<10	<2	<2	2	21	<0.01	<10	<10	9	<10	10
TH84	0.14	8	540	<2	<2	3	47	<0.01	<10	<10	15	<10	70
<u>Tamban-Olas</u>													
TH87	0.02	12	110	<2	<2	3	37	0.07	<10	<10	59	<10	20
TH89	0.03	12	<10	<2	<2	1	216	<0.01	<10	<10	11	<10	8
<u>Western Goa</u>													
KY67C	0.03	11	100	<2	<2	4	10	<0.01	<10	<10	8	<10	76
<u>Pasacao</u>													
KY57B	0.48	19	1560	6	<2	5	53	<0.01	<10	<10	40	<10	18
KY57C	0.11	9	360	2	<2	12	112	<0.01	<10	<10	98	<10	60
KY57D	0.04	14	130	<2	<2	3	96	<0.01	<10	<10	33	<10	44
KY59A	0.01	516	<10	26	4	3	37	<0.01	<10	<10	10	<10	28
KY59D	0.03	638	<10	<2	<2	5	291	<0.01	<10	<10	15	<10	18
KY60B	0.1	849	<10	<2	<2	9	58	<0.01	<10	<10	23	<10	22
KY61	0.08	834	<10	<2	<2	7	575	<0.01	<10	<10	29	<10	44
SM74	0.03	29	390	2	<2	11	82	<0.01	<10	<10	82	<10	54
SM75	0.03	41	380	<2	<2	7	125	<0.01	<10	<10	34	<10	24
<u>Balatan</u>													
KY65C	0.09	42	1110	6	<2	9	48	0.11	<10	<10	73	<10	74

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Ti_%	Ti_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
SM80	0.01	1	<10	<2	<2	<1	741	<0.01	<10	<10	<1	<10	2
SM81	0.04	28	200	<2	<2	7	84	0.15	<10	<10	92	<10	44
SM82	0.03	6	280	<2	<2	7	51	0.06	<10	<10	76	<10	38
SM86	0.01	3	<10	<2	<2	<1	834	<0.01	<10	<10	<1	<10	<2
SM87	0.01	<1	300	6	<2	1	26	<0.01	<10	<10	16	<10	6
SM89	<0.01	27	10	<2	4	<1	3	<0.01	<10	<10	<1	<10	14
SM91	<0.01	3	<10	<2	<2	<1	4	<0.01	<10	<10	1	<10	<2
Calabanga-Tinembac													
TH57	0.06	<1	40	<2	<2	<1	51	<0.01	<10	<10	5	<10	<2
TH58	0.1	1	50	<2	<2	<1	84	<0.01	<10	<10	14	<10	2
TH60	0.04	<1	60	<2	<2	<1	95	<0.01	<10	<10	6	<10	<2
TH65	0.02	<1	50	<2	<2	<1	58	<0.01	<10	<10	14	<10	<2
TH66	0.07	3	90	<2	<2	1	85	0.01	<10	<10	14	<10	6
TH68	0.08	<1	90	<2	<2	<1	98	<0.01	<10	<10	7	<10	<2
Paracale													
PKY340C	<0.01	653	<10	62	<2	7	2	0.01	<10	<10	32	<10	62
PTH375	<0.01	5	40	914	<2	1	3	<0.01	<10	<10	19	<10	6
PTH376	<0.01	50	<10	88	<2	<1	1	<0.01	<10	<10	2	<10	534
Larap-Exciban													
PKY326	<0.01	13	920	4	2	1	38	<0.01	<10	<10	6	610	20
PKY327A	<0.01	9	410	<2	<2	1	14	<0.01	<10	<10	6	<10	16
PKY329	<0.01	7	250	46	<2	<1	95	<0.01	<10	<10	12	<10	32
PKY330	<0.01	7	1310	76	<2	3	43	<0.01	<10	<10	27	<10	134
PKY333	<0.01	4	100	52	<2	<1	1	<0.01	<10	<10	1	<10	12
PKY334	<0.01	3	1780	1045	<2	<1	11	<0.01	<10	<10	14	70	42
PKY336	<0.01	4	20	38	<2	<1	1	<0.01	<10	<10	1	<10	40
PKY337	<0.01	4	190	154	<2	3	4	<0.01	<10	<10	10	<10	36
PKY338	<0.01	6	810	18	<2	1	8	<0.01	<10	<10	6	<10	10
PKY339	<0.01	68	Intf*	22	<2	29	22	0.01	<10	<10	115	<10	38
PSM290	<0.01	6	260	252	<2	<1	13	<0.01	<10	<10	19	<10	470
PSM293	0.09	6	2020	<2	<2	2	144	0.13	<10	<10	54	<10	20
PSM294	0.04	8	1060	<2	<2	6	47	0.15	<10	<10	102	<10	58
PSM295	<0.01	3	270	<2	8	1	32	<0.01	<10	<10	53	<10	302
PSM296a	0.06	2	510	<2	<2	1	45	0.06	<10	<10	47	<10	28
PSM296b	0.04	1	60	<2	<2	<1	9	0.01	<10	<10	7	<10	6
PSM297	<0.01	1	220	<2	<2	<1	66	<0.01	<10	<10	6	<10	6
PSM298	<0.01	1	100	<2	<2	1	7	<0.01	<10	<10	153	60	24
PSM299a	<0.01	1	100	2	<2	5	37	0.03	<10	<10	118	<10	8
PTH385	<0.01	7	920	6	<2	7	5	0.1	<10	<10	88	<10	22
PTH390	<0.01	3	90	1350	<2	<1	18	<0.01	<10	<10	7	<10	618
PTH391	<0.01	11	110	6	<2	4	16	0.03	<10	<10	50	<10	8
PTH393	<0.01	4	<10	8	<2	<1	1	<0.01	<10	<10	4	<10	2
PTH396	<0.01	5	30	<2	<2	<1	21	<0.01	<10	<10	5	<10	2
TH100	<0.01	10	160	420	<2	2	13	<0.01	<10	<10	12	<10	92
TH111	0.13	30	950	<2	<2	12	27	0.15	<10	<10	121	<10	62
TH112	0.03	1	570	10	<2	5	14	0.05	<10	<10	27	<10	18
TH113	0.05	2	970	2	<2	6	19	0.05	<10	<10	45	<10	24
TH99	0.21	151	Intf*	<2	<2	50	13	0.04	<10	<10	165	<10	20
Mt. Baqacay													

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Ti_%	Ti_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
PKY310	<0.01	24	560	2	<2	26	2	0.01	<10	<10	358	<10	28
PKY313	<0.01	5	60	<2	<2	1	1	<0.01	<10	<10	47	<10	2
PKY314	<0.01	88	1560	10	6	42	1	<0.01	<10	<10	593	<10	226
PKY316	<0.01	1390	<10	<2	<2	20	16	0.03	<10	<10	120	<10	50
PKY317	<0.01	1785	10	<2	2	6	9	<0.01	<10	<10	11	<10	32
PKY318	0.13	155	<10	<2	<2	4	143	<0.01	<10	<10	15	<10	10
PKY321	<0.01	33	<10	26	<2	<1	1	<0.01	<10	<10	2	<10	8
PKY322	<0.01	13	<10	98	<2	2	1	<0.01	<10	<10	2	<10	2
PSM281	<0.01	8	1450	<2	<2	<1	21	<0.01	<10	<10	7	<10	2
PSM282	0.04	7	1250	<2	<2	1	68	<0.01	<10	<10	42	<10	58
PSM283	<0.01	1	260	<2	<2	1	4	<0.01	<10	<10	13	<10	2
PTH371	<0.01	13	60	254	32	<1	5	<0.01	<10	<10	8	<10	1040
PTH372	<0.01	6	730	1630	20	<1	8	<0.01	<10	<10	13	<10	38
PTH373	<0.01	5	570	30	4	17	2	<0.01	<10	<10	97	<10	32
TH91	0.01	2	160	4	<2	<1	17	<0.01	<10	<10	16	<10	2
TH94	0.01	8	930	<2	<2	2	24	<0.01	<10	<10	40	<10	52
TH95	<0.01	9	810	2	<2	1	11	<0.01	<10	<10	43	<10	38
Bulala													
KY68B	<0.01	6	10	2	<2	<1	11	<0.01	<10	<10	7	<10	6
KY72	<0.01	1	170	6	<2	2	20	<0.01	<10	<10	26	<10	<2
KY74	<0.01	4	40	4	<2	<1	2	<0.01	<10	<10	30	<10	6
Mt. Culasi													
SM93	<0.01	1	20	4	<2	<1	5	<0.01	<10	<10	1	<10	<2
SM94	<0.01	9	30	144	4	<1	8	<0.01	<10	<10	4	<10	8
Mt. Labo													
SM100	0.05	7	60	12	<2	2	34	<0.01	<10	<10	15	<10	50
SM101	0.04	7	80	2	<2	1	22	<0.01	<10	<10	12	<10	10
SM102	0.05	2	300	48	<2	1	188	<0.01	<10	<10	31	<10	16
SM103	0.11	2	110	12	<2	7	186	0.01	<10	<10	31	<10	24
Eastern Caramoan													
PKY282	<0.01	4	10	<2	<2	<1	1	<0.01	<10	<10	6	<10	2
PPRS29A	<0.01	25	1090	12	<2	5	4	0.08	<10	<10	73	<10	54
PPRS29C	<0.01	27	<10	130	8	<1	<1	<0.01	30	<10	<1	<10	80
PPRS29D	<0.01	38	880	6	<2	21	1	0.05	<10	<10	267	<10	64
PPRS30A	<0.01	4	40	<2	<2	1	<1	0.02	<10	<10	11	<10	6
PPRS30B	0.01	2	100	12	<2	6	40	0.06	<10	<10	70	<10	138
PPRS30C	<0.01	4	<10	<2	<2	1	1	0.02	<10	<10	8	<10	12
PPRS32	0.06	10	Intf*	<2	2	1	5	0.09	<10	10	9	<10	72
PSM268	<0.01	9	900	6	2	5	3	0.37	<10	<10	97	<10	740
PTH310	0.01	<1	Intf*	2	<2	2	12	0.05	<10	<10	19	<10	10
Kilbay													
PKY286	0.01	5	160	298	8	<1	12	<0.01	<10	<10	16	<10	12
PKY287	<0.01	27	980	40	<2	2	10	<0.01	<10	<10	15	<10	76
PKY288	<0.01	5	40	12	24	<1	25	<0.01	<10	<10	6	<10	8
PKY289	0.01	6	160	8	<2	1	11	<0.01	<10	<10	16	<10	14
PKY290	<0.01	7	90	10	<2	<1	41	<0.01	<10	<10	1	<10	2
PKY291	<0.01	44	40	10	<2	1	4	<0.01	<10	<10	6	<10	14
PKY292	<0.01	6	160	42	26	<1	58	<0.01	<10	<10	22	<10	20

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Ti_%	Ti_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
PKY293	<0.01	2	520	14	<2	1	30	<0.01	<10	<10	7	<10	6
PKY294	<0.01	18	200	2	<2	<1	29	<0.01	<10	<10	3	<10	18
PKY295	0.02	31	690	2	<2	3	255	<0.01	<10	<10	39	<10	58
PKY296	<0.01	57	100	<2	<2	5	74	0.02	<10	<10	42	<10	18
PKY298	0.01	75	30	8	2	6	19	0.04	<10	<10	309	<10	56
PKY299	<0.01	9	1220	6	<2	1	23	<0.01	<10	<10	91	<10	34
PKY300	0.03	15	1090	2	<2	4	53	<0.01	<10	<10	58	<10	54
PKY301	0.05	38	910	6	<2	5	57	<0.01	<10	<10	62	<10	64
PKY302A	<0.01	11	60	<2	<2	<1	67	<0.01	<10	<10	5	<10	4
PKY302B	<0.01	3	20	<2	<2	<1	29	<0.01	<10	<10	3	<10	2
PKY302C	<0.01	3	90	2	<2	<1	135	<0.01	<10	<10	11	<10	22
PKY303	<0.01	94	<10	16	<2	<1	11	<0.01	<10	<10	4	<10	26
PKY304	<0.01	20	40	<2	<2	1	26	<0.01	<10	<10	10	<10	20
PKY305	0.04	16	110	2	<2	<1	135	<0.01	<10	<10	3	<10	2
PKY306	0.03	13	1000	<2	<2	4	36	<0.01	<10	<10	67	<10	50
PKY308	0.02	21	710	2	<2	3	101	<0.01	<10	<10	30	<10	42
PKY309	<0.01	3	40	6	<2	<1	29	<0.01	<10	<10	1	<10	<2
PSM275	0.01	6	260	<2	<2	<1	20	<0.01	<10	<10	9	<10	10
PSM276	0.01	13	110	2	<2	2	33	<0.01	<10	<10	19	<10	66
PSM277	0.01	16	10	<2	<2	<1	43	<0.01	<10	<10	2	<10	2
PSM279	<0.01	13	360	30	<2	9	188	0.04	<10	<10	107	<10	10
PSM280	<0.01	6	220	34	<2	<1	2	<0.01	<10	<10	19	<10	10
PTH317	<0.01	3	10	10	<2	<1	3	<0.01	<10	<10	1	<10	4
PTH318	<0.01	22	10	10	<2	1	21	<0.01	<10	<10	14	<10	8
PTH319	0.01	16	480	12	2	4	7	<0.01	<10	<10	34	<10	96
PTH320	0.01	25	50	10	<2	<1	17	<0.01	<10	<10	10	<10	6
PTH321	<0.01	5	10	16	<2	1	9	<0.01	<10	<10	10	<10	6
PTH322	0.01	4	10	18	<2	4	11	<0.01	<10	<10	10	<10	4
PTH324	<0.01	11	630	32	<2	5	25	<0.01	<10	<10	28	<10	20
PTH325	<0.01	5	750	12	<2	3	38	<0.01	<10	<10	17	<10	28
PTH326	<0.01	5	3260	26	<2	5	91	<0.01	<10	<10	20	<10	74
PTH329	<0.01	1	50	14	<2	<1	8	<0.01	<10	<10	1	<10	<2
PTH330	<0.01	5	10	10	<2	<1	10	<0.01	<10	<10	1	<10	16
PTH331	0.04	22	860	<2	<2	3	80	<0.01	<10	<10	48	<10	42
PTH332	0.04	17	930	2	<2	2	121	<0.01	<10	<10	23	<10	42
PTH334	0.01	<1	240	8	2	<1	2000	<0.01	<10	10	<1	<10	8
PTH335	0.01	17	180	18	2	<1	42	<0.01	<10	<10	3	<10	18
PTH336	0.01	69	100	1060	2	<1	18	<0.01	<10	<10	1	<10	2310
PTH337	<0.01	<1	150	10	<2	<1	2020	<0.01	<10	10	<1	<10	10
PTH338	<0.01	3	170	86	6	<1	31	<0.01	<10	<10	15	<10	104
PTH339	<0.01	5	30	12	24	<1	14	<0.01	<10	<10	1	<10	2
PTH340	<0.01	3	160	224	2	<1	27	<0.01	<10	<10	5	<10	50
PTH341	<0.01	2	310	1020	<2	<1	275	<0.01	<10	<10	3	<10	6
PTH344	<0.01	9	190	16	2	1	333	<0.01	<10	<10	13	<10	138
PTH345	0.01	1	700	226	6	<1	22	<0.01	<10	<10	26	<10	16
PTH346	<0.01	23	60	18	350	<1	12	<0.01	50	<10	1	<10	36
PTH347	0.01	10	660	22	12	<1	13	<0.01	<10	<10	4	<10	88
PTH348	0.01	63	110	38	94	<1	15	<0.01	140	<10	1	<10	688
PTH349	0.11	25	190	14	12	<1	162	<0.01	<10	<10	4	<10	22
PTH350	0.08	6	290	6	22	<1	33	<0.01	<10	<10	2	<10	50
PTH351	0.04	13	750	4	<2	5	75	0.06	<10	<10	35	<10	24
PTH354	0.01	38	180	4	<2	7	12	0.05	<10	<10	65	<10	14

Geochemical grade assay result

sample	Na_%	Ni_ppm	P_ppm	Pb_ppm	Sb_ppm	Sc_ppm	Sr_ppm	Ti_%	Ti_ppm	U_ppm	V_ppm	W_ppm	Zn_ppm
PTH359	0.01	26	250	2	16	1	31	<0.01	<10	<10	11	<10	20
PTH360	<0.01	28	500	6	18	1	22	<0.01	<10	<10	12	<10	26
PTH362	<0.01	24	80	6	8	<1	28	<0.01	<10	<10	28	<10	44
PTH363	<0.01	4	<10	4	<2	<1	1	<0.01	<10	<10	2	<10	<2
PTH364	<0.01	14	50	2	2	<1	22	<0.01	<10	<10	6	<10	4
<u>Tuba</u>													
PSM272	0.01	5	40	10	4	<1	14	<0.01	<10	<10	9	<10	8

Appendix 12



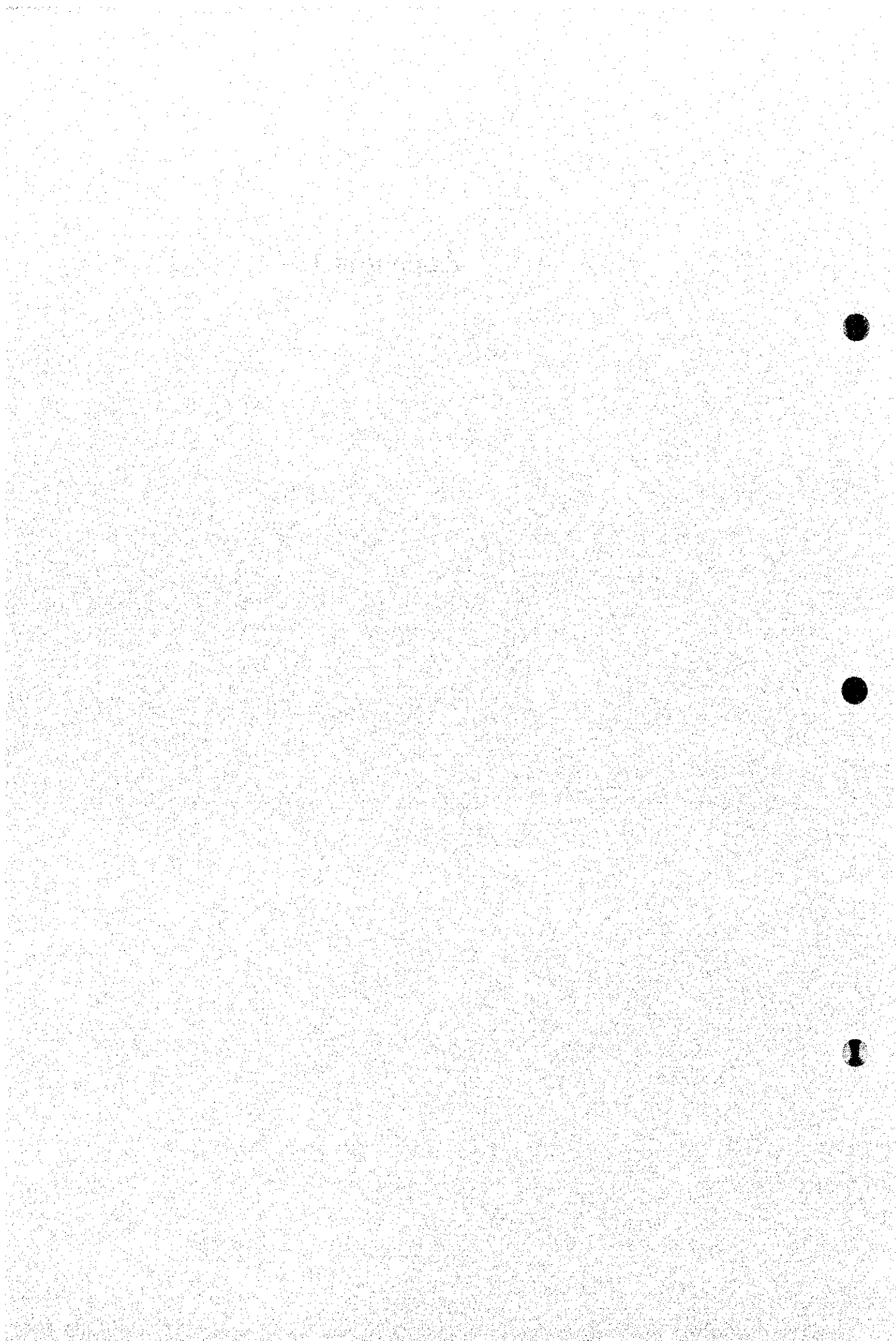
Ore grade assay result

sample	Au_ppb	Ag_ppm	Al_%	As_ppm	Ba_ppm	Be_ppm	Bi_ppm	Ca_%	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_%	Hg_ppm	K_%	Mg_%	Mn_ppm	MO_ppm	Na_%	Ni_ppm	
Bacon-Manito																					
KY26A	25	<1	1.29	<10	80	<5	<10	0.09	<5	<5	30	20	2.22	<10	0.15	<0.01	<10	<5	0.27	-	
KY13	<5	<1	0.46	<10	60	<5	<10	0.05	<5	<5	30	25	3.63	<10	0.13	<0.01	<10	<5	0.10	-	
KY14	<5	<1	0.75	<10	260	<5	<10	0.08	<5	<5	20	50	2.53	<10	0.13	0.01	50	<5	0.06	-	
KY21	<5	<1	0.61	<10	20	<5	<10	0.04	<5	<5	40	15	1.67	<10	0.07	<0.01	40	<5	0.09	-	
KY11A	<5	<1	0.77	<10	60	<5	<10	0.10	<5	<5	40	45	0.29	<10	0.14	0.01	170	<5	0.08	-	
Pio Duran																					
SM07	10	4	1.09	<10	<20	<5	<10	0.72	35	5	120	14,500	3.31	<10	<0.01	0.79	260	<5	0.02	-	
KY05	<5	<1	0.70	10	40	<5	<10	0.17	<5	<5	70	30	0.46	<10	0.10	0.18	160	<5	0.10	-	
KY28B	640	6	2.08	<10	20	<5	<10	0.58	<5	20	40	13,900	4.25	<10	0.15	1.89	490	<5	0.08	-	
KY30A	10	<1	4.79	10	40	<5	<10	6.23	<5	5	60	230	2.64	<10	0.02	1.04	560	5	0.04	-	
Gate Mountains																					
KY34	<5	<1	0.88	<10	40	<5	<10	0.10	<5	<5	60	35	2.56	<10	0.12	0.01	10	10	0.18	-	
Western Goa																					
KY66A	<5	<1	0.02	<10	20	<5	<10	0.07	<5	<5	380	5	0.63	<10	0.01	0.19	50	<5	0.05	-	
KY66B	60	<1	0.06	<10	20	<5	<10	0.06	<5	5	200	25	0.87	<10	0.04	0.05	440	5	0.03	-	
KY67A	<5	<1	0.59	<10	60	<5	<10	0.07	<5	5	100	395	1.45	<10	0.22	0.08	220	<5	0.09	-	
Pasacao																					
KY58C	10	<1	0.27	180	280	<5	<10	12.15	<5	50	830	10	3.95	<10	0.03	7.10	1,000	<5	0.05	-	
KY58B	10	<1	0.38	1,080	3,920	<5	<10	0.11	<5	50	710	20	1.42	<10	0.04	0.26	90	<5	0.05	-	
KY59C	10	<1	0.15	600	1,540	<5	<10	1.49	<5	35	430	10	1.31	<10	0.04	0.97	410	<5	0.03	-	
KY60A	<5	<1	0.12	<10	100	<5	<10	1.87	<5	30	270	5	2.33	<10	0.01	7.55	430	<5	0.12	-	
KY58A	35	<1	0.17	230	13,640	<5	<10	0.11	<5	15	380	80	0.82	<10	0.04	0.06	20	<5	0.05	-	
Balatan																					
SM78	210	<1	0.40	<10	<20	<5	<10	0.13	<5	<5	130	3,970	0.97	<10	0.05	0.15	70	<5	0.12	-	
Paracale																					
KY77a	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	missing	-
KY77c	35	65	0.06	10	<20	<5	600	0.04	<5	25	460	250	6.35	<10	0.02	0.01	50	<5	0.04	-	
KY78a1	57,190	48	0.21	<10	<20	<5	60	0.04	<5	5	460	140	1.84	<10	0.11	0.01	50	<5	0.05	-	
PKY340A	510	8	3.90	-	<100	<10	<20	1.95	10	10	980	780	1.00	-	1.80	1.00	650	<10	0.05	150	
Larap-Exciban																					
PSM289	415	34	0.20	-	<100	<10	<20	0.25	550	<10	10	12,940	29.30	-	<0.10	0.30	75,100	<10	<0.05	<10	
PSM287	25	<1	1.30	-	<100	<10	<20	0.30	<10	<10	10	630	>30.00	-	<0.10	<0.05	140	<10	0.15	70	
Mt. Bagacay																					
PSM286	<5	<1	0.20	-	<100	<10	<20	0.25	<10	<10	40	70	>30.00	-	<0.10	0.15	440	<10	0.05	<10	
Tuba																					
PSM270	25	<1	7.10	-	<100	<10	<20	0.10	<10	<10	720	30	2.30	-	2.70	<0.05	20	<10	0.20	130	
PSM271	20	<1	6.05	-	<100	<10	<20	<0.05	<10	<10	140	20	2.65	-	2.20	<0.05	10	<10	0.15	<10	
PSM273	75	1	4.45	-	<100	<10	<20	0.05	<10	<10	1,120	50	3.95	-	1.60	<0.05	20	<10	0.10	130	
PSM274	<5	<1	8.70	-	300	<10	<20	0.05	<10	<10	230	50	4.05	-	2.30	1.90	390	<10	0.20	170	

Ore grade assay result

sample	Pb_ppm	Sr_ppm	Ti_%	V_ppm	Zn_ppm
Bacon-Manito					
KY26A	-	-	-	-	-
KY13	-	-	-	-	-
KY14	-	-	-	-	-
KY21	-	-	-	-	-
KY11A	-	-	-	-	-
Pio Duran					
SM07	-	-	-	-	-
KY05	-	-	-	-	-
KY28B	-	-	-	-	-
KY30A	-	-	-	-	-
Gate Mountains					
KY34	-	-	-	-	-
Western Goa					
KY66A	-	-	-	-	-
KY66B	-	-	-	-	-
KY67A	-	-	-	-	-
Pasacao					
KY58C	-	-	-	-	-
KY58B	-	-	-	-	-
KY59C	-	-	-	-	-
KY60A	-	-	-	-	-
KY58A	-	-	-	-	-
Balatan					
SM78	-	-	-	-	-
Paracale					
KY77a	-	-	-	-	-
KY77c	-	-	-	-	-
KY78a1	-	-	-	-	-
PKY340A	0.57	70	0.20	120	2,540
Larap-Exciban					
PSM289	6.43	10	<0.05	10	95,000
PSM287	0.00	30	0.05	120	40
Mt. Bagacay					
PSM286	0.00	10	<0.05	30	80
Tuba					
PSM270	0.00	10	0.25	120	<20
PSM271	0.00	60	0.05	90	<20
PSM273	0.01	110	0.15	50	<20
PSM274	0.00	10	0.30	130	20

Appendix 13



Fluid Inclusion Thermometrics

<u>regional area / locality</u>	<u>sample</u>	<u>Th avg dc</u>	<u>Th max dc</u>	<u>Th min dc</u>	<u>Th dev</u>	<u>NaCl avg wt%</u>	<u>boiling</u>	<u>note</u>
<u>Tiwi-Mt. Malinao</u>								
Inalait River	PTH263	206.5	237	181	15.8	0.2	f	many other single liquid phase inclusions are observed/necking down is also observed
Inalait River	PTH282	169.5	188	152	10.8	0.3	f	many other single liquid phase inclusions are observed/necking down is also observed
Lake Buhi	SM70c	154.0	168	141	7.9	0.2	f	suitable inclusions for observation are very few because of size
Lake Buhi	SM71b	309.9	334	288	12.5	0.4	f	some other gas phase inclusions are observed
Tiwi	SM30	237.4	251	223	7.3	2.1	t	size of vaper vary greatly and it suggests boilling has occurred.
Tiwi	SM31	262.0	288	241	10.6	0.9	f	many other single liquid phase inclusions are observed/necking down is also observed
Tiwi	SM32	237.4	258	208	15.0	0.9	t	size of vaper vary greatly and it suggests boilling has occurred
Tiwi	SM34	270.3	283	232	12.1	0.4	f	many other single liquid phase inclusions are observed
<u>Pio Duran</u>								
Pantao-Nagas-Cabarian	SM07	168.8	191	147	13.3	0.4	f	many other single liquid phase inclusions and secondary inclusions are observed/suitable inclusions for observation are few becouse of size
Pio Duran-Kapulaki	KY30a	220.0	242	193	14.2	2.5	t	size of vaper vary greatly and it suggests boilling has occurred
<u>Siruma Peninsula</u>								
Siruma	TH74	161.4	182	142	12.1	0.9	t	size of vaper vary greatly and it suggests boilling has occurred/many other secondary inclusions are observed
<u>Western Goa</u>								
Western Goa	KY66b	149.5	171	128	12.3	1.8	f	many other single liquid phase inclusions and secondary inclusions are observed

Fluid Inclusion Thermometrics

<u>regional area / locality</u>	<u>sample</u>	<u>Th avg dc</u>	<u>Th max dc</u>	<u>Th min dc</u>	<u>Th dev</u>	<u>NaCl avg wt%</u>	<u>boiling note</u>
<u>Pasacao</u>							
Eastern Pasacao	KY57c	198.0	234	168	19.6	0.4	f many other single liquid phase inclusions are observed/necking down is also observed
Eastern Pasacao	KY59c	234.1	251	208	11.8	1.3	f many other single liquid phase inclusions are observed/necking down is also observed
Eastern Pasacao	KY60a	187.0	202	161	13.0	3.6	f many other single liquid phase inclusions are observed/necking down is also observed
Western Pasacao	SM75	123.1	151	107	14.6	0.2	f many other single liquid phase inclusions are observed
<u>Balatan</u>							
Caorasan, Balatan	SM78	122.2	142	103	10.6	0.2	f many other liquid single phase inclusions are observed
<u>Paracale</u>							
Benget Mine	PTH381	278.0	324	253	19.2	6.3	f many other single liquid phase inclusions are observed/necking down is also observed
Mt. Bunutan	PTH376	230.1	242	211	7.8	7.3	t size of vapor varies greatly and it suggests boiling has occurred
Paracale	KY78a1	288.3	301	276	7.2	7.6	f many other single liquid phase inclusions and secondary inclusions are observed
Paracale	KY78b	289.5	324	258	18.5	0.1	t size of vapor vary greatly and it suggests boiling has occurred
Paracale	KY79	222.7	252	200	15.5	0.6	f many other secondary inclusions are observed
<u>Larap-Exciban</u>							
Bessemar Pit	TH105	205.0	217	181	10.3	22.6	t size of vapor vary greatly and it suggests boiling has occurred
Igang prospect	PTH391	237.4	281	217	19.5	4.9	f many other secondary inclusions are observed

Fluid Inclusion Thermometrics

regional area / locality	sample	Th avg dc	Th max dc	Th min dc	Th dev	NaCl avg wt%	boiling	note
Igang prospect	PTH393	218.5	237	185	13.2	4.2	t	size of vapor varies greatly and it suggests boiling has occurred
Larap-Exciban	PSM290	212.9	241	180	19.2	6.2	f	many other secondary inclusions are observed
Matalang	PTH387	327.3	355	283	18.9	6.3	f	many other single liquid phase inclusions are observed/necking down is also observed
Tumbaga prospect	PKY327A	298.6	319	295	5.3	6.3	t	size of vapor varies greatly and it suggests boiling has occurred
Tumbaga prospect	PKY329	223.6	240	199	12.4	0.5	f	size of inclusions are not large often enough to observe
Tumbaga prospect	PKY333	280.4	295	267	7.6	6.0	t	size of vapor varies greatly and it suggests boiling has occurred
<u>Mt. Bagacay</u>								
B. Mancasay	PKY313	361.4	372	349	6.0	13.3	t	size of vapor varies greatly and it suggests boiling has occurred
Manpungo	PKY321	307.8	331	282	14.4	2.9	f	many other single liquid phase inclusions are observed/necking down is also observed
Mt. Bagacay	PSM281	238.9	264	197	20.2	11.4	f	many other single liquid phase inclusions are observed/necking down is also observed
Mt. Bagacay	TH91	268.8	291	241	14.3	10.5	f	many other liquid single phase inclusions are observed/necking down is also observed
Mt. Bagacay	TH95	279.1	291	264	7.3	8.1	t	size of vapor vary greatly and it suggests boiling has occurred
Napangasan, Babel	PTH371	198.5	235	173	18.1	6.0	f	many other single liquid phase inclusions are observed
<u>Mt. Culasi</u>								
Mt. Culasi	SM93	124.0	142	107	9.3	0.2	f	many other liquid single phase inclusions are observed/suitable inclusions for observation are few because of size

Fluid Inclusion Thermometrics

<u>regional area</u> / locality	sample	Th avg dc	Th max dc	Th min dc	Th dev	NaCl avg wt%	boiling note
<u>Kilbay</u>							
Alawihaw creek	PTH334	126.7	145	104	10.8	0.1	f many other secondary inclusions are observed
Bacaco	PKY290	252.3	264	239	7.3	1.1	t size of vapor varies greatly and it suggests boiling has occurred
Bacaco	PKY294	260.3	269	250	4.7	0.1	f many other secondary inclusions are observed
Layaton River	PTH322	353.0	366	339	7.3	0.1	t size of vapor varies greatly and it suggests boiling has occurred
<u>Tuba</u>							
Mapulo	PSM272	253.7	273	226	12.2	2.5	f many other single liquid phase inclusions are observed/necking down is also observed

Homogenization temperature vs. Salinity (Average values from each specimen)

