

## GeoSpark Logger ~ Drill Log

**Project:**

**KZK**

**Hole Number:**

**K16-343**

Prospect:	Krakatoa	Hole Type:	DD	Survey Type:	RTK DGPS	Logged By:	Alicia Vainio	
Grid:	NAD83_Z9	Hole Diameter:	75.7	Survey By:	Challenger_Survey	Date Logging Start:	5/15/2016	
UTM Easting	414973.5903	Core Size:	NQ3	Azimuth:	32.02	Date Logging Complete:	5/23/2016	
UTM Northing:	6815004.7144	Casing Pulled?:	Yes	Dip:	-75	Drill Company:	Hytech	
UTM Elev. (m):	1385.719	Casing Depth (m):	27	Length (m):	62.7	Drill Rig:	Tech 5000	
Local Easting:		Stored?:	Yes	Claims Title		Drill Started:	5/13/2016	
Local Northing:		Cemented?:	Yes	Core Storage Loc.:	KZK Camp	Drill Completed:	5/14/2016	
Local Elev. (m):				Hole Completed?:	Abandoned	Purpose:	Resource Definition	
Comments:							Parent Hole:	

K16-343 was intended to be a resource infill hole, replacing K16-342 but was abandoned at 62.7m due to unacceptable hole deviation. The hole collared into bedrock at 28m; RHYvl, RHYc, and MDSc continued to a depth of 55.4m. OI mineralization occurred from 55.4-57.9m. The OI was characterized with disseminated-patchy pyrite +/- sphalerite, chalcopyrite, and galena within a brecciated RHY unit with strong biotite, albite, and sericite alteration. OB was encountered from 57.9-59.7m; it was composed of massive pyrite +/- sphalerite, galena, and chalcopyrite. The hole was abandoned at 62.7m, within the mafic sill footwall.

### Downhole Surveys:

Depth (m)	Dip	Measured Azimuth	Correction Factor	Corrected Azimuth	Survey Type	Survey By	Survey Date	Mag Field	Accept Values?	Comments
0	-75	30.62	1.4	32.02	APS	Dillon Hume	5/13/2016		<input checked="" type="checkbox"/>	Rig aligned to true north (measured azimuth). Grid convergence of 1.4 deg applied to correct to UTM azimuth.
36	-76.6	12.4	22.1	34.5	ReflexEZS	Hytech	5/14/2016	5758	<input checked="" type="checkbox"/>	Measured azimuth relative to magnetic north. Grid declination of 22.1 deg applied to correct to UTM azimuth.
58.3	-77.1	16.8	22.1	38.9	ReflexEZS	Hytech	5/14/2016	5738	<input checked="" type="checkbox"/>	Measured azimuth relative to magnetic north. Grid declination of 22.1 deg applied to correct to UTM azimuth.
62.7	-77.1	17.3	22.1	39.4	ReflexEZS	Hytech	5/14/2016	5743	<input checked="" type="checkbox"/>	Measured azimuth relative to magnetic north. Grid declination of 22.1 deg applied to correct to UTM azimuth.

From (m)	To (m)	Rocktype & Description	From (m)	To (m)	Width	Sample	Au ppm	Ag ppm	Cu %	Pb %	Zn %
<b>0.00</b>	<b>28.00</b>	<b>OVBN Overburden</b>									
<b>28.00</b>	<b>32.80</b>	<b>RHYvl Lapilli tuff</b>									
<<Min: 28 - 33.35 0.5% Min: Pyrite>>											
<<Min: 28 - 36.4 2% Min: Pyrrhotite>>											
<<Alt: 28 - 36.4 Weak-Moderate Muscovite>>											
<<Alt: 28 - 57.9 Trace Calcite>>											
<<Struc: 32.07 - 32.08 dominant foliation>>											
<b>32.80</b>	<b>36.40</b>	<b>RHYc Rhyolite coherent volcanics</b>									

From (m)	To (m)	Rocktype & Description	From (m)	To (m)	Width	Sample	Au ppm	Ag ppm	Cu %	Pb %	Zn %
<<Min: 33.35 - 36.4 5% Min: Pyrite>> <b>36.40 39.00 MDSc Carbonaceous dominant mudstone</b> 36.4 - 39: FLT gouge (?) washed away from 37.1 to 39m. <<Min: 36.4 - 39 1% Min: Pyrite>> <<Struc: 37.1 - 39 Weak Fault>> FLT gouge, mostly washed away.											
			45.00	46.50	1.50	B00292024	0.011	1.4	-0.01	-0.01	0.03
<b>39.00 55.40 RHYc Rhyolite coherent volcanics</b> 39 - 55.4: Silicic banding and localized curdy texture. <<Min: 39 - 55.4 1% Min: Pyrite>> <<Alt: 39 - 42.5 Weak-Moderate Muscovite>> <<Alt: 42.5 - 55.4 Moderate Muscovite>> <<Struc: 41.7 - 41.71 dominant foliation>> <<Struc: 49.65 - 49.66 dominant foliation>> <<Struc: 50.1 - 52.1 Weak Fault>> Brittle RHY, with tight foliation compared to the surrounding RHY. The foliation cleavage has strong sericitic alteration. The start of the unit is FLT gouge; approx 0.9m has washed away.											
			46.50	48.00	1.50	B00292025	0.006	0.7	-0.01	-0.01	-0.01
			48.00	49.50	1.50	B00292026	0.008	0.9	-0.01	-0.01	0.01
			49.50	51.00	1.50	B00292027	0.022	0.8	-0.01	-0.01	0.02
			51.00	52.40	1.40	B00292028	0.013	1	-0.01	-0.01	0.03
			52.40	53.90	1.50	B00292029	0.022	0.9	-0.01	-0.01	0.02
			53.90	55.40	1.50	B00292031	0.038	6.3	0.01	-0.01	0.02
<b>55.40 57.90 OI Heavily disseminated sulphides in host schist</b> 55.4 - 57.9: Brecciated, fractured, and sheared OI. Biotite (disseminated), albite, and sericite alteration are strong; muscovite is visible on sheared planes. Sulphides occur within fractures, and along clasts. Pyrite (+/- sphalerite, chalcopyrite, and galena) is both disseminated and patchy throughout the unit.											
			55.40	56.90	1.50	B00292032	0.537	68.3	0.35	0.43	1.14
<<Min: 55.4 - 57.9 0.1% Min: Sphalerite>> OI consists of disseminated-patchy pyrite, along with traces of chalcopyrite, sphalerite, and galena. Sulphides infill fractures, and surround brecciated clasts. <<Min: 55.4 - 57.9 8% Min: Pyrite>> OI consists of disseminated-patchy pyrite, along with traces of chalcopyrite, sphalerite, and galena. Sulphides infill fractures, and surround brecciated clasts. <<Min: 55.4 - 57.9 0.1% Min: Galena>> OI consists of disseminated-patchy pyrite, along with traces of chalcopyrite, sphalerite, and galena. Sulphides infill fractures, and surround brecciated clasts. <<Min: 55.4 - 57.9 0.5% Min: Chalcopyrite>> OI consists of disseminated-patchy pyrite, along with traces of chalcopyrite, sphalerite, and galena. Sulphides infill fractures, and surround brecciated clasts. <<Alt: 55.4 - 57.9 Strong Muscovite>> Brecciated zone with patchy, yellow-green sericite alteration, and disseminated biotite alteration. Closer to the bottom of the zone, clasts are pervasively albite-altered. Disseminated-patchy pyrite occurs throughout the zone (OI mineralization). <<Alt: 55.4 - 57.9 Moderate-Strong Biotite>> Brecciated zone with patchy, yellow-green sericite alteration, and disseminated biotite alteration. Closer to the bottom of the zone, clasts are pervasively albite-altered. Disseminated-patchy pyrite occurs throughout the zone (OI mineralization).											
			56.90	57.90	1.00	B00292033	0.328	62.2	0.35	0.42	0.78

From (m)	To (m)	Rocktype & Description	From (m)	To (m)	Width	Sample	Au ppm	Ag ppm	Cu %	Pb %	Zn %
<p>&lt;&lt;Alt: 57.13 - 57.9 Strong Albite&gt;&gt; Brecciated zone with patchy, yellow-green sericite alteration, and disseminated biotite alteration. Closer to the bottom of the zone, clasts are pervasively albite-altered. Disseminated-patchy pyrite occurs throughout the zone (OI mineralization).</p> <p>&lt;&lt;Struc: 55.4 - 57.9 Moderate Fault&gt;&gt; Mineralized FLT BRX with a fine-grained sericitic matrix, and biotite-albite altered clasts.</p>											
<b>57.90</b>	<b>59.70</b>	<b>OB</b>	<b>Wispy laminar, fine buckshot textured, massive sulphide with lesser magnetite</b>		0.90	B00292034	2.53	260	1.01	2.85	9.17
<p>57.9 - 59.7: Massive pyrite +/- sphalerite and chalcopyrite. Calcite-filling is common within fractures. A white, disseminated gangue mineral (barite?) occurs near the bottom.</p>											
<p>&lt;&lt;Min: 57.9 - 59.7 3% Min: Sphalerite&gt;&gt; Massive pyrite with disseminated sphalerite, chalcopyrite, and galena.</p> <p>&lt;&lt;Min: 57.9 - 59.7 90% Min: Pyrite&gt;&gt; Massive pyrite with disseminated sphalerite, chalcopyrite, and galena.</p> <p>&lt;&lt;Min: 57.9 - 59.7 0.5% Min: Galena&gt;&gt; Massive pyrite with disseminated sphalerite, chalcopyrite, and galena.</p> <p>&lt;&lt;Min: 57.9 - 59.7 0.5% Min: Chalcopyrite&gt;&gt; Massive pyrite with disseminated sphalerite, chalcopyrite, and galena.</p> <p>&lt;&lt;Alt: 57.9 - 59.7 Trace Muscovite&gt;&gt;</p> <p>&lt;&lt;Alt: 57.9 - 59.7 Weak Calcite&gt;&gt; Calcite stringers.</p>			58.80	59.70	0.90	B00292035	1.63	262	1.02	2.5	5.53
<b>59.70</b>	<b>62.70</b>	<b>MAFi</b>	<b>Mafic Intrusions (primarily footwall mafic intrusion)</b>		1.00	B00292036	0.009	1.3	0.01	-0.01	0.05
<p>59.7 - 62.7: Bleached contact.</p>											
<p>&lt;&lt;Min: 59.7 - 62.7 0.5% Min: Pyrite&gt;&gt;</p> <p>&lt;&lt;Min: 59.7 - 62.7 0.5% Min: Pyrrhotite&gt;&gt;</p> <p>&lt;&lt;Alt: 59.7 - 60.69 Weak-Moderate Muscovite&gt;&gt;</p> <p>&lt;&lt;Alt: 59.7 - 60.69 Weak Chlorite&gt;&gt; Bleached MAFi zone.</p> <p>&lt;&lt;Alt: 60.69 - 62.7 Strong Chlorite&gt;&gt;</p> <p>&lt;&lt;Alt: 60.69 - 62.7 Moderate Calcite&gt;&gt;</p> <p>&lt;&lt;Alt: 60.69 - 62.7 Moderate Biotite&gt;&gt;</p> <p>&lt;&lt;Vein: 62.18 - 62.24 100% Quartz-Chlorite-Tourmaline 45 deg. &gt;&gt; Massive quartz vein with patchy calcite, chlorite, and tourmaline.</p>			60.70	61.70	1.00	B00292037	-0.005	0.8	-0.01	-0.01	0.03
			61.70	62.70	1.00	B00292038	-0.005	1.8	0.01	0.02	0.04
<b>End of Hole @ 62.7</b>											