

Greatland Pty Ltd

Drill Hole Cover Sheet

Hole	FTD023	Date	Oct-06
Section No	445975mE	Geologist	G. McLean
Tenement No	EL26/2004		
Project	Fire Tower		
Prospect	Fire Tower		

Collar Details

Locational Accuracy	+/- 0.1m	Grid Name	
AMG Zone	AGD66	Grid Easting	
AMG Easting	445975.3	Grid Northing	
AMG Northing	5405109.3	Grid Azimuth	
AMG Azimuth	180	Grid RL	
AMG RL	632.7		
Inclination	-70		
Total Depth	46.2m		

Drilling Company	Boart Longyear		
Rig Type	Onram 1000 (diesel pack)		
Drill Type	diamond	Drill diameter	NQ2
Start Date	11/10/2006	Finish Date	16/10/2006

Reason for Drilling	Infill drilling, best available orientation as dictated by topography
Reason for Termination	Drilled too acute to ore zone(?), terminated at design depth.
Summary	<p>0-0.9m: pad fill, no recovery. 0.9-14m: Grey, intensely silica-feldspar altered siltstone(?), gradational alteration to below.</p> <p>14.0-38.7m: Cream, silica-feldspar bleached, slumped(?) laminated siltstone. BOCO<1m BOPO =23.5m</p> <p>38.7-46.2m Cream-green sericite altered mg. quartz-lithic volcanigenic sandstone, overprinted by tension gash chloritic (+/-cpy) veins</p> <p>Pyrite veins are brittle shear controlled. Py, galena and cpy all have separate habits. No SWL ultra violet response (W only @2-3m).</p> <p>Sulphide content generally decrease from collar down but not directly in proportion to Au grade. Elevated As, Zn in top 10m.</p> <p>All hole shows brittle-ductile deformation during and possibly after alteration.</p>
Water level	
Water Flow	Full return all hole.
Gear remaining in hole	3m HQ collar casing. Difficult to collar through pad fill.
Downhole surveys	Survey method Reflex Instrument digital multi-shot (corrected for 14 degree mag deviation)

Depth	Azimuth	Inclination	Depth	Azimuth	Inclination
46	185.5	-70.1			

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Drill Hole Cover Sheet

Hole	FTD024
Section No	445975mE
Tenement No	EL26/2004
Project	Fire Tower
Prospect	Fire Tower

Date	Oct-06
Geologist	G. McLean

Collar Details

Locational Accuracy	+/- 0.1m
AMG Zone	AGD66
AMG Easting	445975.6
AMG Northing	5405113.5
AMG Azimuth	0
AMG RL	633.8

Grid Name	
Grid Easting	
Grid Northing	3.0m north of FTD023, same pad
Grid Azimuth	
Grid RL	

Inclination	-30
Total Depth	52.4

Drilling Company	Boart Longyear		
Rig Type	Onram 1000 (diesel pack)		
Drill Type	diamond	Drill diameter	NQ2
Start Date	17/10/2006	Finish Date	19/10/2006

Reason for Drilling: Infill drilling. Same pad as FTD023 and FTD025.

Reason for Termination: Reached design depth.

Summary: 0-21.38m: Grey, mottled feldspar altered laminated siltstone (0-5.5m intense alt. & weak Au). Oxidised Au veins straddling contact (Cggbs).
 21.38-38.6m: Green-cream altered, vol'genic lithic sandstone, Au thruout (Cggmi). 38.6-48.4m: Beige laminated siltstone, younging down hole.
 38.6-38.9m: crush breccia. 38.9-48.4m: laminated siltstone. 48.4-49m: puggy fault rubble.
 49-52.3m: Vol'genic "greywacke" sandstone, nil alteration (Cggci).
 Pyrite veins are more brittle shear controlled of hydraulic/replacement of other holes?
 Py common 0-22m (low grade Au), with 16.3-16.5m massive (remobilised?) py as bx matrix-nil Au. Rubbly oxidised zones 30-33m have Au.

Water level:

Water Flow: Return all hole.

Gear remaining in hole: 1.5m HQ collar casing

Downhole surveys: Survey method: Reflex Instrument digital multi-shot (corrected for 14 degree mag deviation)

Depth	Azimuth	Inclination	Depth	Azimuth	Inclination
52	2	-30.5			

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Drill Hole Cover Sheet

Hole	FTD025	Date	Oct-06
Section No	445975mE	Geologist	
Tenement No	EL26/2004		
Project	Fire Tower		
Prospect	Fire Tower		

Collar Details

Locational Accuracy	+/- 0.1m	Grid Name	
AMG Zone	AGD66	Grid Easting	
AMG Easting	445975.6	Grid Northing	3.0m north of FTD023, same pad
AMG Northing	5405112.8	Grid Azimuth	
AMG Azimuth	0	Grid RL	
AMG RL	633.5		

Inclination	-50
Total Depth	61.3

Drilling Company	Boart Longyear		
Rig Type	Onram 1000 (diesel pack)		
Drill Type	diamond	Drill diameter	NQ2
Start Date	20/10/2006	Finish Date	24/10/2006

Reason for Drilling	Infill drilling. Same pad as, and between FTD023 and FTD024.
Reason for Termination	Reached design depth.
Summary	0-13.05m: Grey, feldspar altered laminated siltstone (Cggs). 13.05-24.0m: Light green, altered f.g sandstone. (Cggs?) 24.0-30.0m: Interbedded sandstone as above and black shale (Cggs). 30.0-52.4m: light green altered, mg. vol'genic lithic sandstone (Cggs) 47.25-48.0m rubbly, puggy fault. 52.4-53.8m: fault crush. 52.4-61.3m: Vol'genic "greywacke" sandstone, nil alteration (Cggs). massive pyrite @ 43-43.2m. Au thruout 30-51m but limited pyrite occurrences.
Water level	
Water Flow	Return all hole.
Gear remaining in hole	1.5m HQ collar casing
Downhole surveys	Survey method Reflex Instrument digital multi-shot (corrected for 14 degree mag deviation)

Depth	Azimuth	Inclination	Depth	Azimuth	Inclination
61	2	-47.1			

FTD025

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Geological Log

Project			East			Azimuth			Logged by			massive												
Fire Tower			North			Inclination			Drilled By			hatch												
Fire Tower			North			Inclination			Drill Type			stipple												
AGD66			RL			Total Depth			Drill Date			swiggle												
Proj.			AMG																					
From	To	Colour Weath ering	Structu re type 1	Structu re type 2	Angle CA	Graphic structure	Log grain size	Description	Sil	Ser	Py	CO3	W	V	S	P	Vein Qtz %	Mineralization Assemblage	%	V	S	P		
0	1							0-0-0.15m no recovery																
1	2							0.15-13.05m Green-grey, weathered, strongly altered, laminated siltstone and lesser fg-mig. sandstone										py					tr x	
2	3		ox veins															py					1 x	
3	4							Pyrite typically as 1-3mm shear focussed-replacement pyrite-only veinlets at 10-20°C A with local Kspars selvages, only weakly oxidised.										py					tr x	
4	5							very little carbonate veining										py					tr x	
5	6																	py					tr x	
6	7																	py					2 x	
7	8																	py					tr x	
8	9																	py					tr x	
9	10																							
10	11							Bedding laminations become distinctive oscillatory near base										(cpy) py					tr x	
11	12																							
12	13							conformable contact,										py					tr x	
13	14							13.05-24.0m Light green, altered fg. sandstone, mod well sorted																
14	15							Commonly oxidised around fractures near upper contact.										py					tr x	
15	16							Becomes more uniform, less fractured, near base with only spidery carbonate veinlets															tr	
16	17																							
17	18																							
18	19																							
19	20																	py					tr x	
20	21																						tr	
21	22																							
22	23																							
23	24																							
24	25							24.2-24.5m Fe oxide coated brittle shear zone shear foliation @ 25-30°C A Margined by re-cemented carbonate hydraulic breccia															py	tr x
25	26							24.0-30.0m Inter bedded sandstone as above																
26	27							and black shale, both heavily carbonate spider veined, with carbonate - feldspar?																
27	28							hydraulic breccia replacement matrix but only traces of pyrite, more																
28	29							Common in shaley units, oxidised near contact.										(asp) py					tr x	
29	30							30.0 - 52.4m lt green, altered quartz-																
30	31							lithic med. grained volcanogenic sandstone.																
31	32																							
32	33							32.35-32.5m Brittle(ductile) shear zone broken zone @ 25°C A																tr

zone @ 25°C A

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Drill Hole Cover Sheet

Hole	FTD026	Date	Oct-06
Section No	445950mE	Geologist	D. Evans
Tenement No	EL26/2004		
Project	Fire Tower		
Prospect	Fire Tower		

Collar Details

Locational Accuracy	+/- 0.1m	Grid Name	
AMG Zone	AGD66	Grid Easting	
AMG Easting	445947.3	Grid Northing	
AMG Northing	5405118.2	Grid Azimuth	
AMG Azimuth	3	Grid RL	
AMG RL	630.6		

Inclination	-50
Total Depth	83.3

Drilling Company	Boart Longyear		
Rig Type	Onram 1000 (diesel pack)		
Drill Type	diamond	Drill diameter	NQ2
Start Date	25/10/2006	Finish Date	1/11/2006

Reason for Drilling	Infill drilling, difficult access on spur point. Same pad as FTD027
Reason for Termination	Reached design depth.
Summary	<p>0-42.1m: Green-cream, altered, foliated, mg. pumiceous lithic vol'genic sandstone. 42.1-45.2m as above but conglomeratic.</p> <p>45.2-46.3m: broken zone (fault?). 46.3-58.1m: Black, shaley siltstone with py-scheelite veins. 58.1m: fault contact.</p> <p>58.1-64.1m: fg. Shaley sandstone (Cggsi?).</p> <p>64.1-83.3m: Laminated 'wacke' siltstone (Cqgsi). Distinctive cq. Quartz crystal sandstone interbeds 79.1-79.3m-similar to the 'dykes(?)' in FTC</p> <p>Sheared massive py-cpy-sph-gal at 57.7-58.1m is same zone as at 91-94m in FTD008 (probable fault shear). Core loss in same position FTD00;</p> <p>Isolated alteration increases 73-75m and 77-82.2m, incl. 2cm py-cpy vein @ 80.2m.</p>
Water level	
Water Flow	Return all hole.
Gear remaining in hole	3m HQ collar casing
Downhole surveys	Survey method Reflex Instrument digital multi-shot (corrected for 14 degree mag deviation)

Depth	Azimuth	Inclination	Depth	Azimuth	Inclination
20.00	3.00	-50			
80.00	4.50	-49.8			

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HoleID		Geological Log										Logged by		massive								
FD026		Project		East		Azimuth		Boart Longyear		DAE		hatch		pervasive								
Fire Tower		Fire Tower		North		Inclination		NQ2 Diamond		Drill Type		stipple		disseminated								
AGD66		AGD66		RL		Total Depth				Drill Date		swiggle		narrow vein								
		Proj.		AMG																		
From	To	Colour Weath ering	Struc ture type 1	Struc ture type 2	Angle, CA	Graphic structure	Log grainsize	Description					Alteration					Mineralization				
								Sil.	Ser.	Py	CO3	W	K-spar	Vein Qtz %	Mineralization Assemblage			%	V	S	P	
0	1	HW						0-1.55M: VERY STRONGLY WEATHERED, RELATIVELY SOFT, COLOUR MOTTLED RED YELLOW-BROWN TO PINK-RED. DECOMPOSED FINE-GRAINED QZ - PHYRIC VOLCANICLASTIC.										COMMON FE OXIDES PARTIALLY TO COMPLETELY REPLACING.				
1	2	MW						1.55-19.4M: STRONGLY TO MODERATELY WEATHERED, PARTIALLY OXIDISED BROKEN VEINED, FRACTURED, MOTTLED, BROWN, YELLOW-BROWN, PINK-RED TO LOCALLY FRESH LIGHT GREEN-CREAM, SILICIFIED, DEVITRIFIED, SELICITE ± K SPAR ALTERED FINE TO VERY FINE-GRAINED QZ - PHYRIC VOLCANOGENIC SILTSTONE TO SANDSTONE; POSSIBLY ALTERED RHYOLITE TUFF; 1-2MM QUARTZ EYES AND RARE LARGER LITHIC SILTY CLASTS IN ALTERED, DEVITRIFIED FINE TO ULTRA FINE-GRAINED SELICITE GRANOMASS; MINOR K SPAR AS VEINS AND MICROVEINS, AND LOCALLY AS TEXTURALLY DESTRUCTIVE ALTERATION; SELICITE-SILICA ALTERATION ALSO COMMONLY TEXTURALLY DESTRUCTIVE.										COMMON FE OXIDES PARTIALLY REPLACING AND AS STAINING, ALSO IN OXIDIZED VEINS AND SELVEDGES.				
2	3																					
3	4		3.10M OXIDISED QZ VEIN		15°																	
4	5																					
5	6		6.6-6.8M FE OXIDE VEIN/HYD, BRECCIA		53°													6.6-6.8M: TRACE PY. IN HYD. BRECCIA				
6	7																					
7	8																					
8	9																					
9	10																					
10	11																					
11	12		11.9M LOST WATER RETURN																			
12	13		2 VOLC. BRECCIA																			
13	14	MW																				
14	15	MW																				
15	16	MW																				
16	17	MW																				
17	18	SW	FR. THIN K SPAR CARB. VEINS		35°													RARE TRACES OF PY. AS MINUTE BLEBS IN K-SPAR/CARBONATE MICROVEINS.				
18	19	SW																				
19	20	SW																				
20	21																					
21	22		21.5M MODERATE FOLIATION		10°																	
22	23	FR																				
23	24		W. WEAK FOLIATION		0°																	
24	25																					
25	26		25-4cm K SPAR MICROVEINS		15°																	
26	27		SCHHEELITE K SPAR VEIN		65°													26.3m 2-3cm VEIN WITH UVFL SCHHEELITE				
27	28	MW																26.9m TRACE PY. MICROVEINS.				
28	29	FR																				
29	30	SW																				
30	31	FR																				
31	32	FR	VERY WEAK FOLIATION		0°																	
32	33	(FR)																				

