



# KAGARA LTD



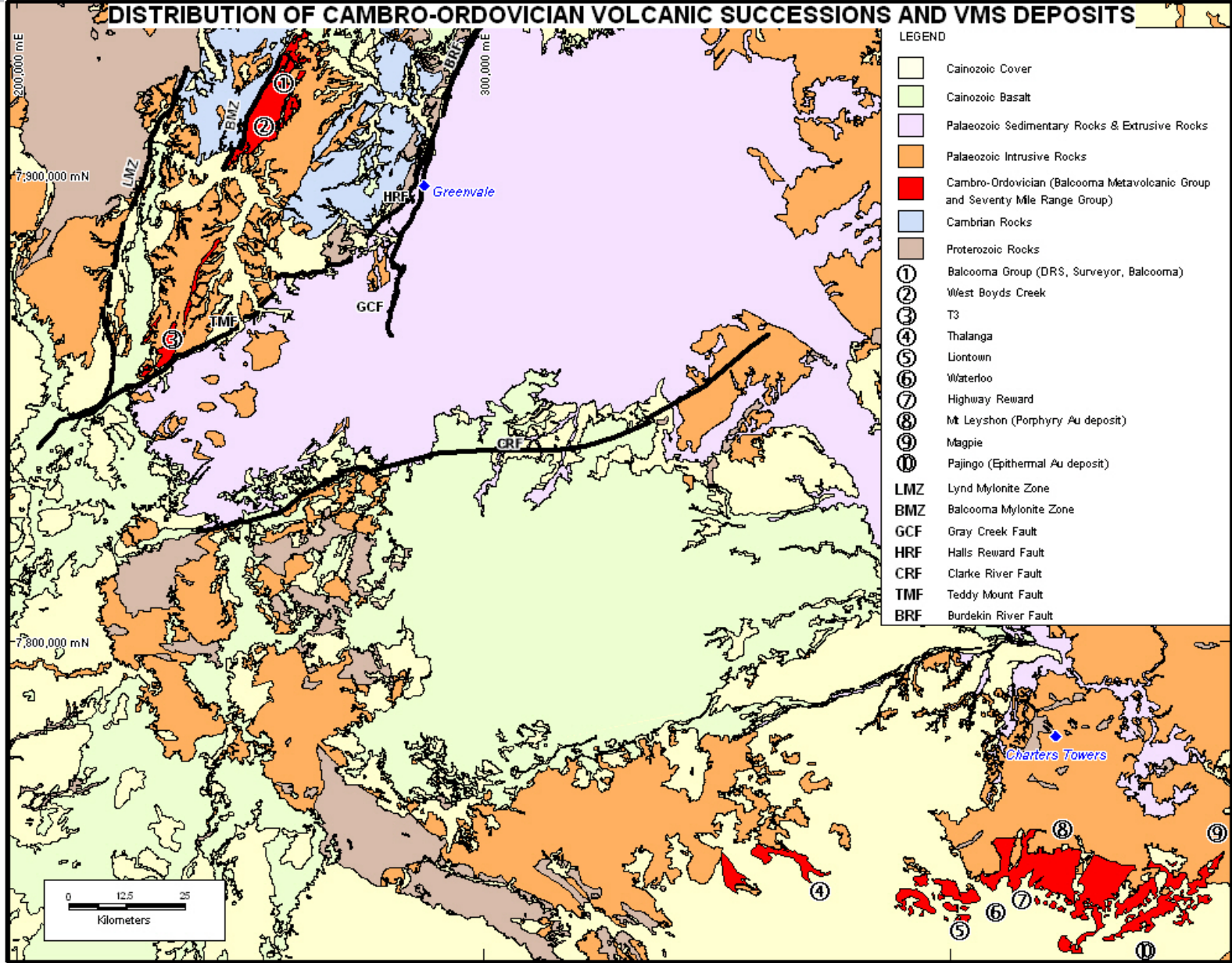
## The VMS Deposits of North Queensland

*Deposition, Deformation, Discovery, Development*





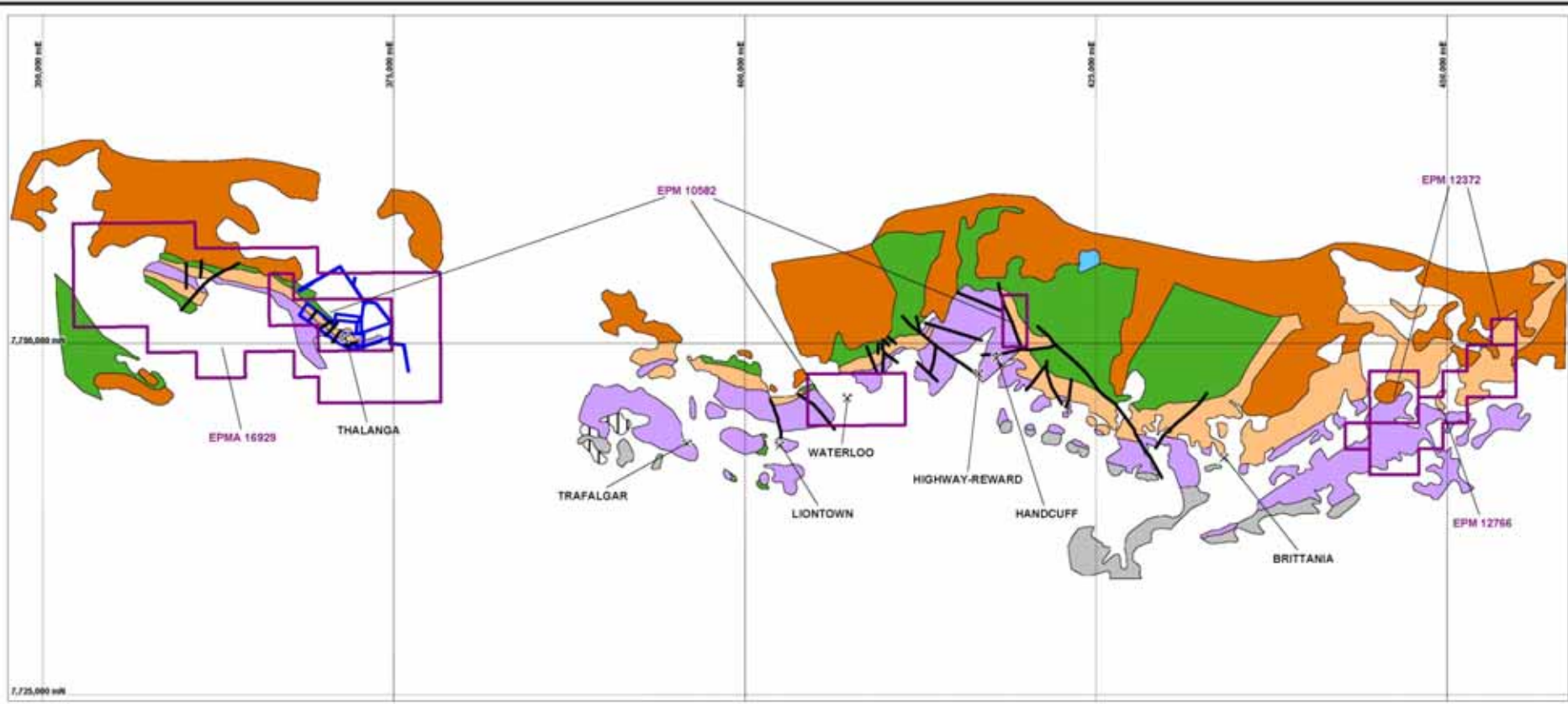
# DISTRIBUTION OF CAMBRO-ORDOVICIAN VOLCANIC SUCCESSIONS AND VMS DEPOSITS



# Principal NQ Cambro-Ordovician massive sulphide deposits



Deposit	Mt	Zn%	Cu%	Pb%	Ag g/t	Au g/t	Reference
Surveyor	0.634	15.8	0.7	5.8	115	0.8	Kagara 2003 Annual Report
DRS	1.56	7.8	1.5	2.3	69	0.7	Kagara 2006 Annual Report
Balcooma Polymetallic	1.26	8.7	0.9	3.7	40	0.39	Kagara 2004 and 2006 Annual Reports
Balcooma Copper	3.92		3.5		15	0.36	Kagara 2006 Annual Report
Thalanga	6.84	12.0	2.5	3.8	98	0.62	Gregory et al (1990)
Vomacka	0.87	5.1	1.8	1.5	45	0.5	Kagara 2008 Annual Report
West 45	0.53	7.2	0.5	3.0	48	0.26	Kagara 2008 Annual Report
Orient	0.27	12.8	0.9	3.0	59	0.2	Kagara 2008 Annual Report
Waterloo	0.48	13.5	2.4	1.9	67	1.42	Kagara Quarterly Report (Dec 2008)
Liontown	1.85	7.5	0.6	2.4	28	0.6	Liontown Resources web site (2009)
Magpie	0.25	15	2.0	2.0	30	1	Doyle (1997)
Highway Highway oxide	1.2 0.07		5.5		7	1.2 6.04	Doyle (1997)
Reward Reward oxide	0.5 0.1		8.4		18	1.48 6.49	Doyle (1997)



**GEOLOGY LEGEND**

**CARBONIFEROUS**

■ Mt Leysdon Complex : Felsic porphyric and breccia

**DEVONIAN**

□ Drummond Basin sediments & volcanics

**ORDOVICIAN - DEVONIAN**

■ Granitoids of the Isfwerth - Ravenswood batholith

**CAMBRIAN - ORDOVICIAN**

■ Rollston Range Formation - volcanic - derived siltstone, greywacke, minor dacitic rocks

■ Trooper Creek Formation - Rhyolitic, dacitic and andesitic volcanics and volcanicslastics; psammitic, pelitic and calcareous rocks, minor doleritic intrusives

■ Mt Windsor Formation - Rhyolitic volcanics and volcanicslastics, minor doleritic intrusives

**CAMBRIAN**

■ Puddler Creek Formation - Greywacke, siltstone, andesitic volcanics and dolerite intrusives

**Geology**

— Faults

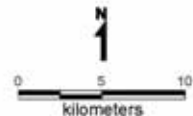
**Tenure**

Kagara Ltd

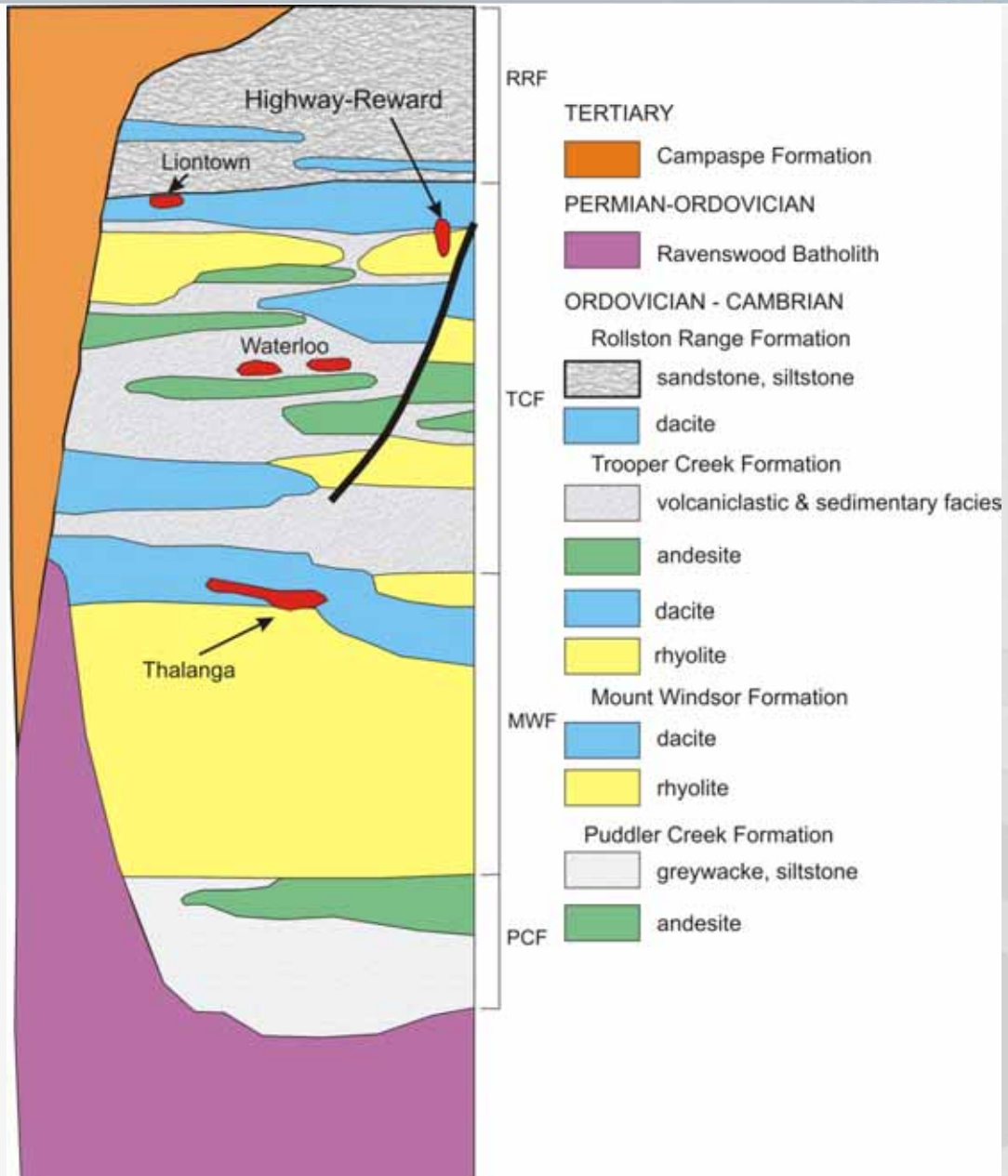
■ Mining Leases

■ Exploration Permits

NB. Geology from RGC Exploration map 1996



<b>KAGARA LIMITED</b>	
Thalanga Tenements Mount Windsor Geology	
Workspace: tha032	Date: 10/12/08
Drawn by: KM	Scale: 1 : 250 000
Datum: GDA94 - MGA Zone 55	





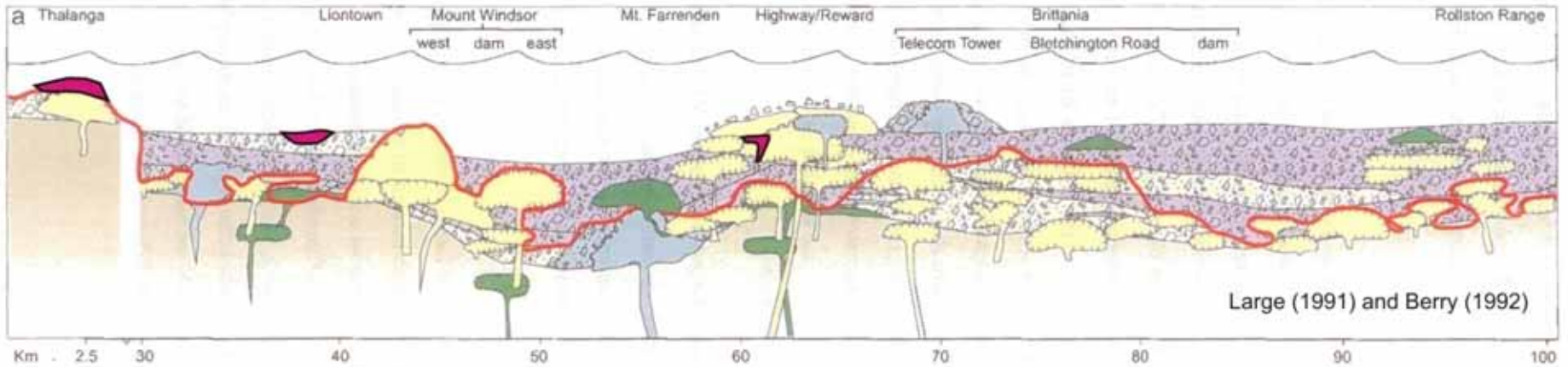
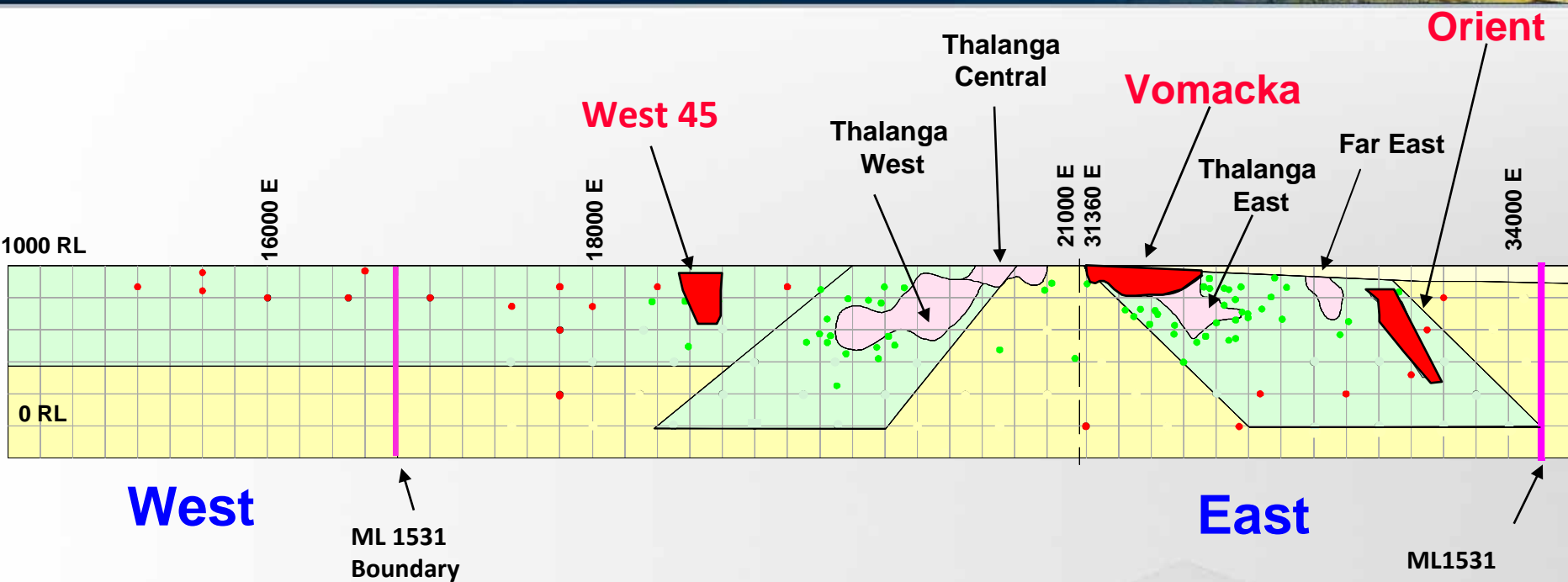


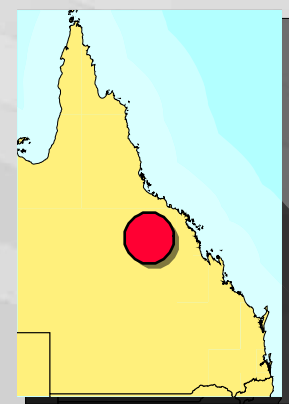
Figure from Simpson (2001)

# THALANGA SCHEMATIC LONG SECTION



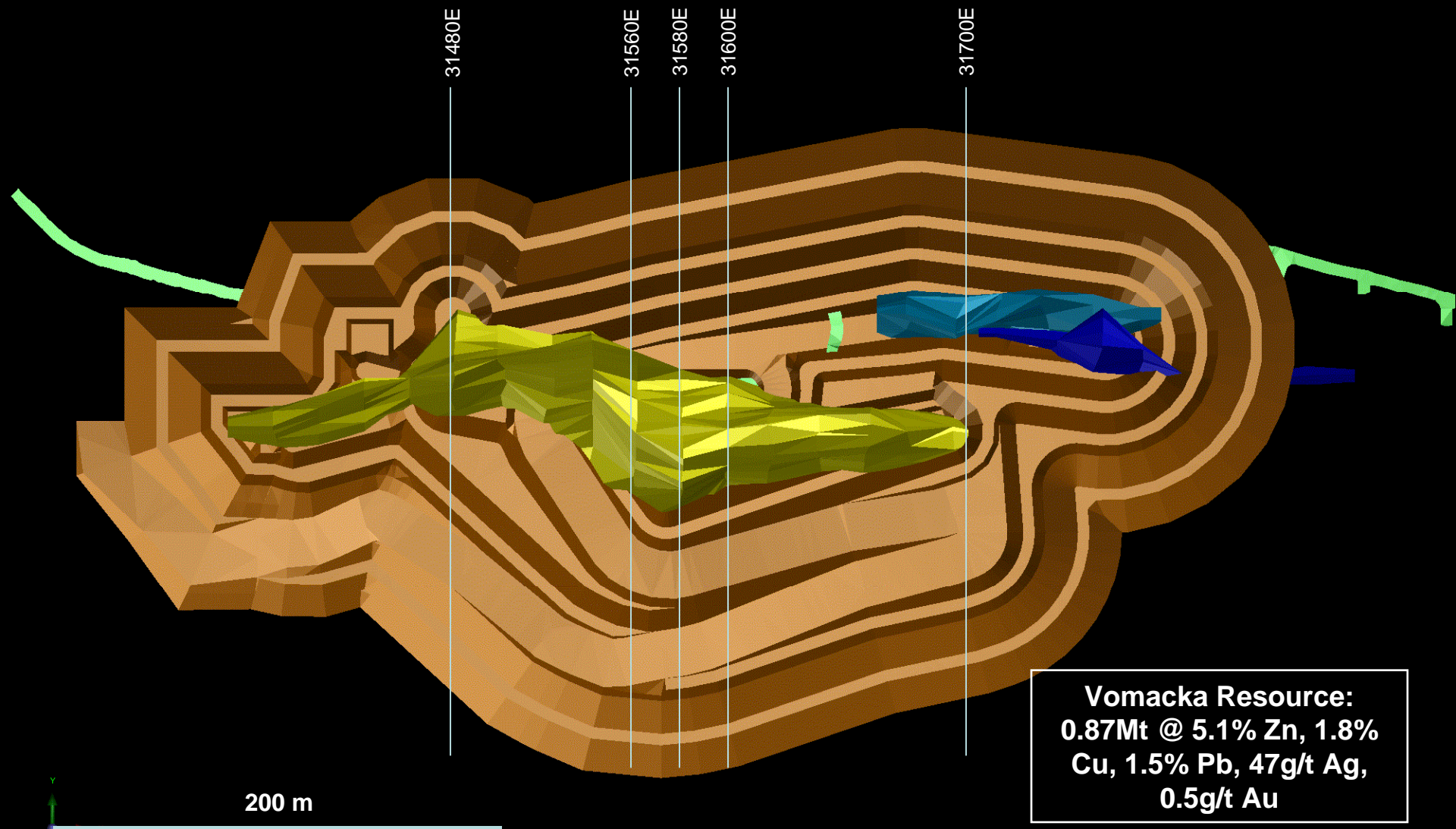
	<b>Kagara Deposits</b>		<b>Completed drill holes</b>
	<b>RGC Mined Areas &amp; Remnants</b>		<b>Unmineralised Ore Horizon Intercept</b>
	<b>Priority 1</b>	} <b>Exploration Targets</b>	
	<b>Priority 2</b>		

Deposit	Mt	Zn%	Cu%	Pb%	Ag g/t	Au g/t
Vomacka	0.87	5.1	1.8	1.5	45	0.5
West 45	0.53	7.2	0.5	3.0	48	0.26
Orient	0.27	12.8	0.9	3.0	59	0.2





# VOMACKA ORE LENSES & DESIGNED OPEN PIT



# SECTION 31580E

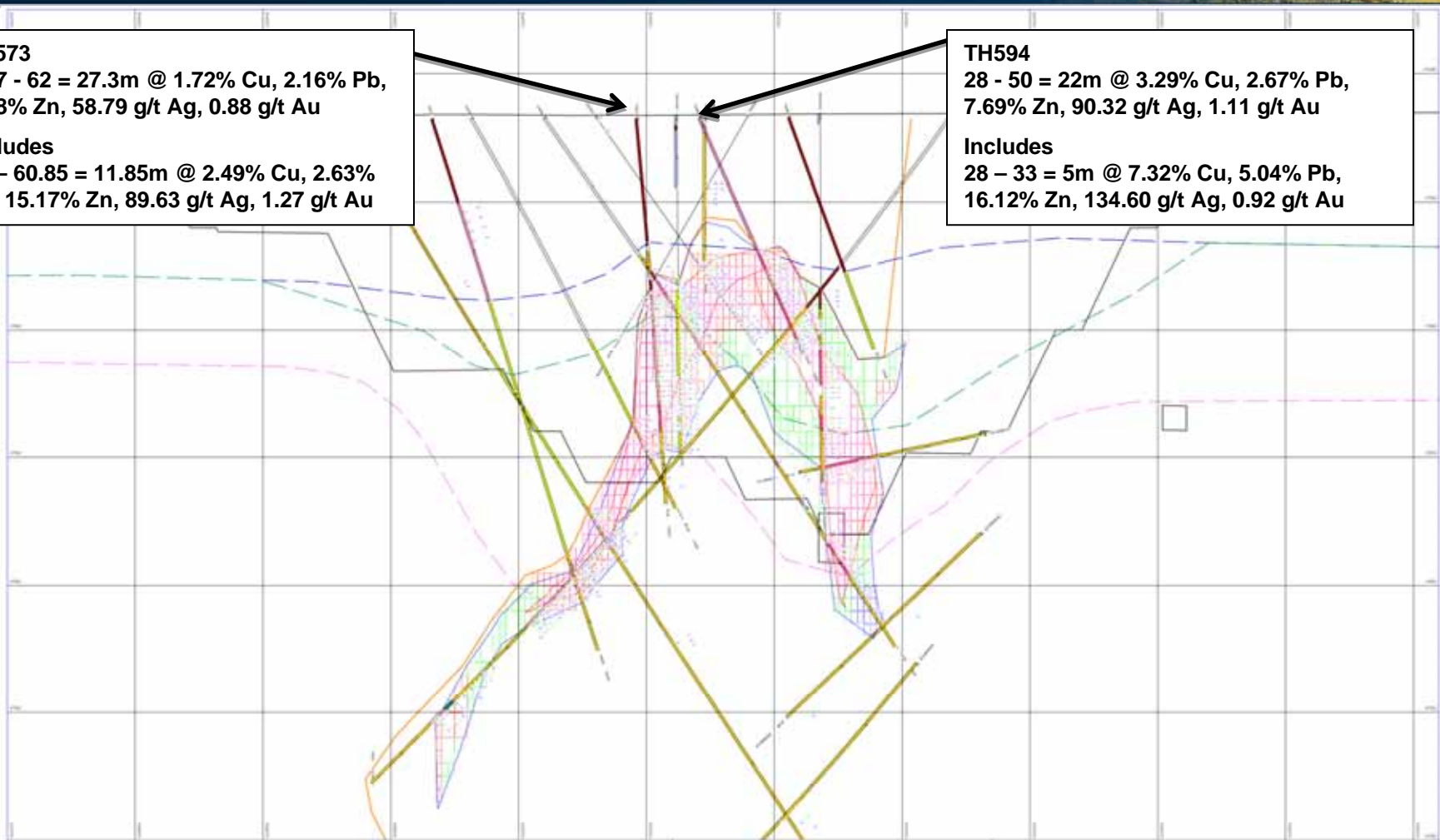


**TH573**  
 34.7 - 62 = 27.3m @ 1.72% Cu, 2.16% Pb,  
 8.88% Zn, 58.79 g/t Ag, 0.88 g/t Au

**Includes**  
 49 - 60.85 = 11.85m @ 2.49% Cu, 2.63%  
 Pb, 15.17% Zn, 89.63 g/t Ag, 1.27 g/t Au

**TH594**  
 28 - 50 = 22m @ 3.29% Cu, 2.67% Pb,  
 7.69% Zn, 90.32 g/t Ag, 1.11 g/t Au

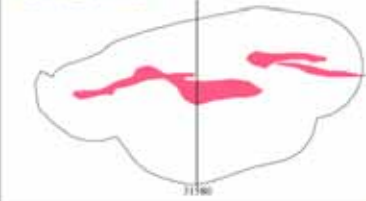
**Includes**  
 28 - 33 = 5m @ 7.32% Cu, 5.04% Pb,  
 16.12% Zn, 134.60 g/t Ag, 0.92 g/t Au



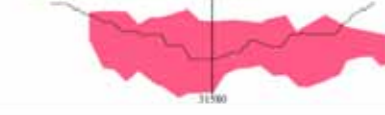
## LEGEND

Geological Features	Structures	Other Features	Drill Hole Data
<ul style="list-style-type: none"> <li>Quartzite</li> <li>Schist</li> <li>Gneiss</li> <li>Chert</li> </ul>	<ul style="list-style-type: none"> <li>Normal Fault</li> <li>Thrust Fault</li> <li>Strike Slip</li> </ul>	<ul style="list-style-type: none"> <li>Line of Discontinuity (Fault)</li> <li>Line of Transition</li> <li>Line of Discontinuity</li> <li>Proposed Pit Design</li> <li>Old Boundary</li> </ul>	<ul style="list-style-type: none"> <li>Drill Hole</li> <li>Drill Hole</li> <li>Drill Hole</li> <li>Drill Hole</li> </ul>

## PLAN LOCATION

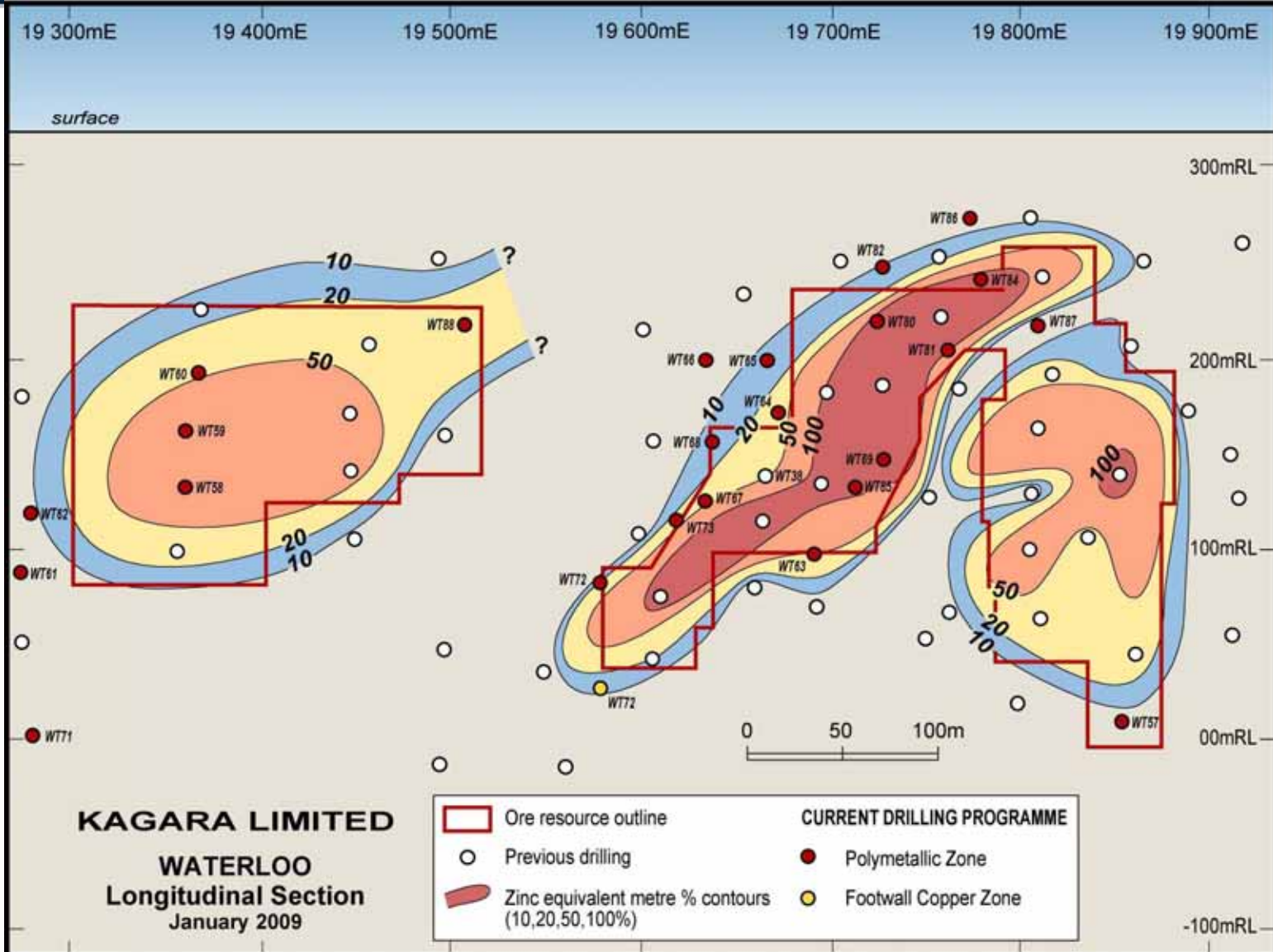


## LONG SECTION LOCATION



**KAGARA LTD VOMACKA PROJECT**  
**DRILL HOLE/MODEL SECTION 31580E +/- 10m**  
 DATE: 02-May-13 SCALE: 1:250





**KAGARA LIMITED**  
**WATERLOO**  
**Longitudinal Section**  
 January 2009

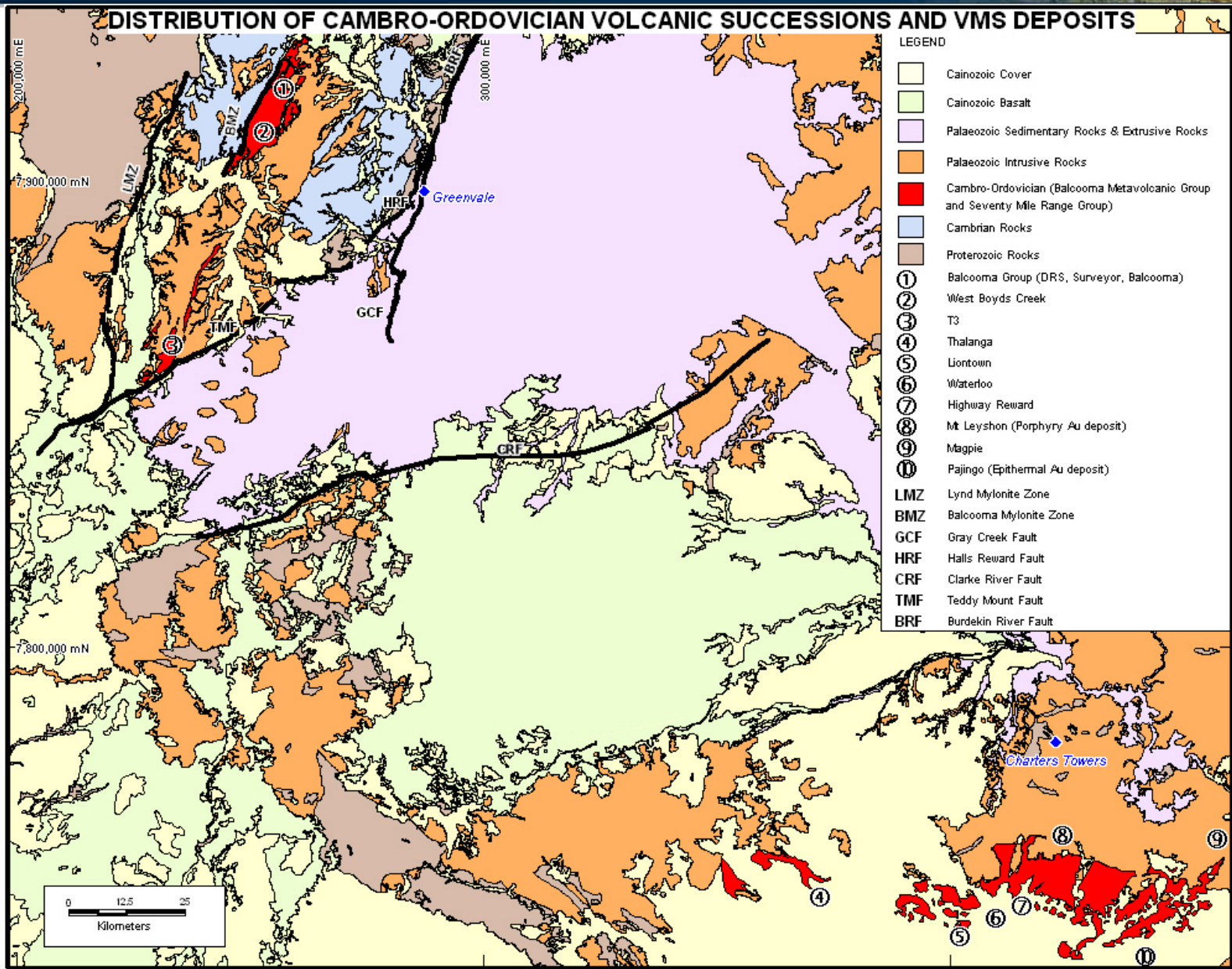
	Ore resource outline		Polymetallic Zone
	Previous drilling		Footwall Copper Zone
	Zinc equivalent metre % contours (10,20,50,100%)		

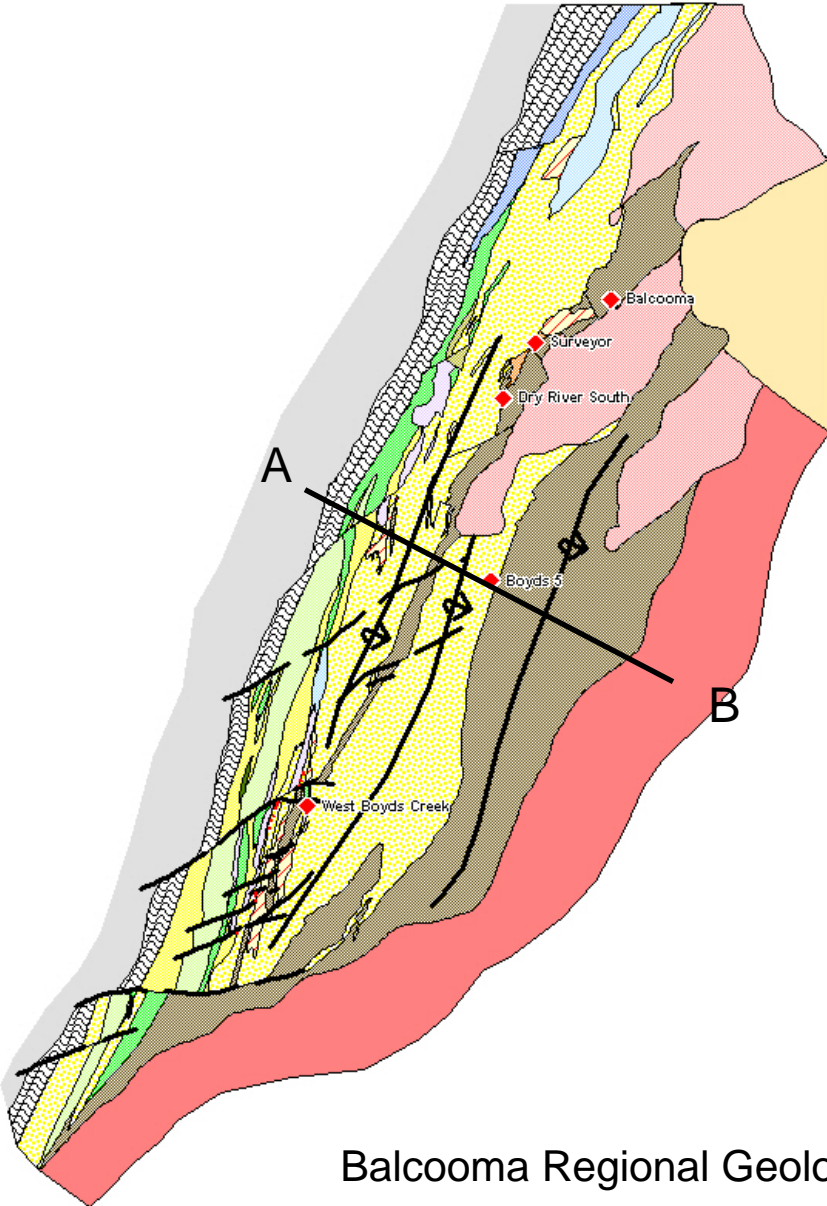
Hole ID	Easting	Northing	Dip	Az	From Metres	To Metres	Int. Metres	Cu %	Pb %	Zn %	Ag g/t	Au g/t
WT84	19770.00	19960.00	-64	172	81.70	97.05	15.35	4.6	2.2	20.8	117	2.30
including					81.70	90.40	8.70	7.8	3.6	34.7	188	3.71



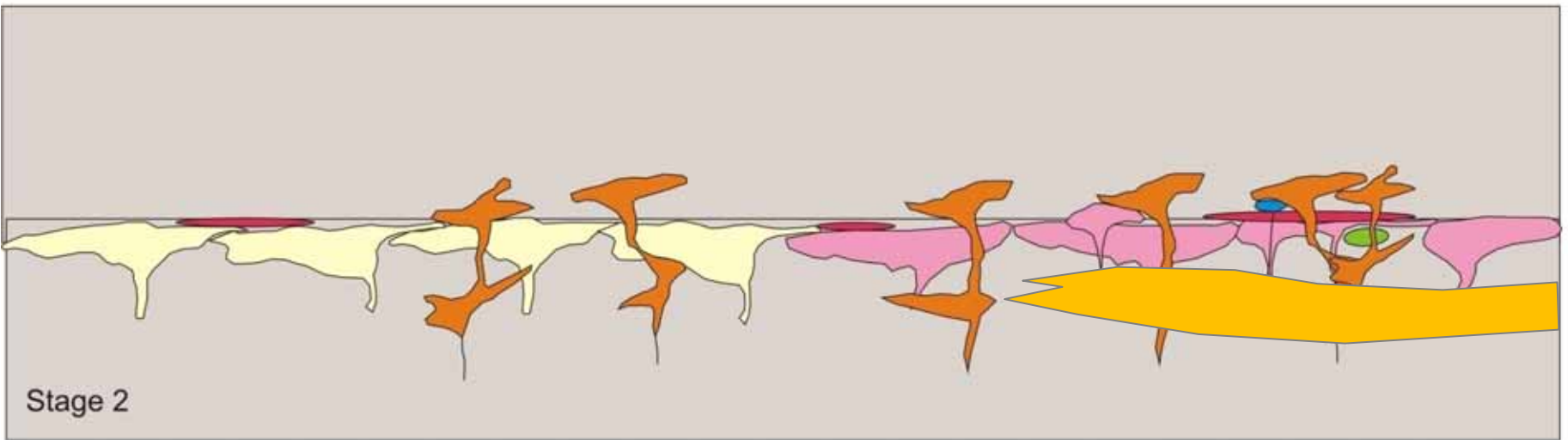


# DISTRIBUTION OF CAMBRO-ORDOVICIAN VOLCANIC SUCCESSIONS AND VMS DEPOSITS





Balcooma Regional Geology



Balcooma Metavolcanic Belt - predeformation









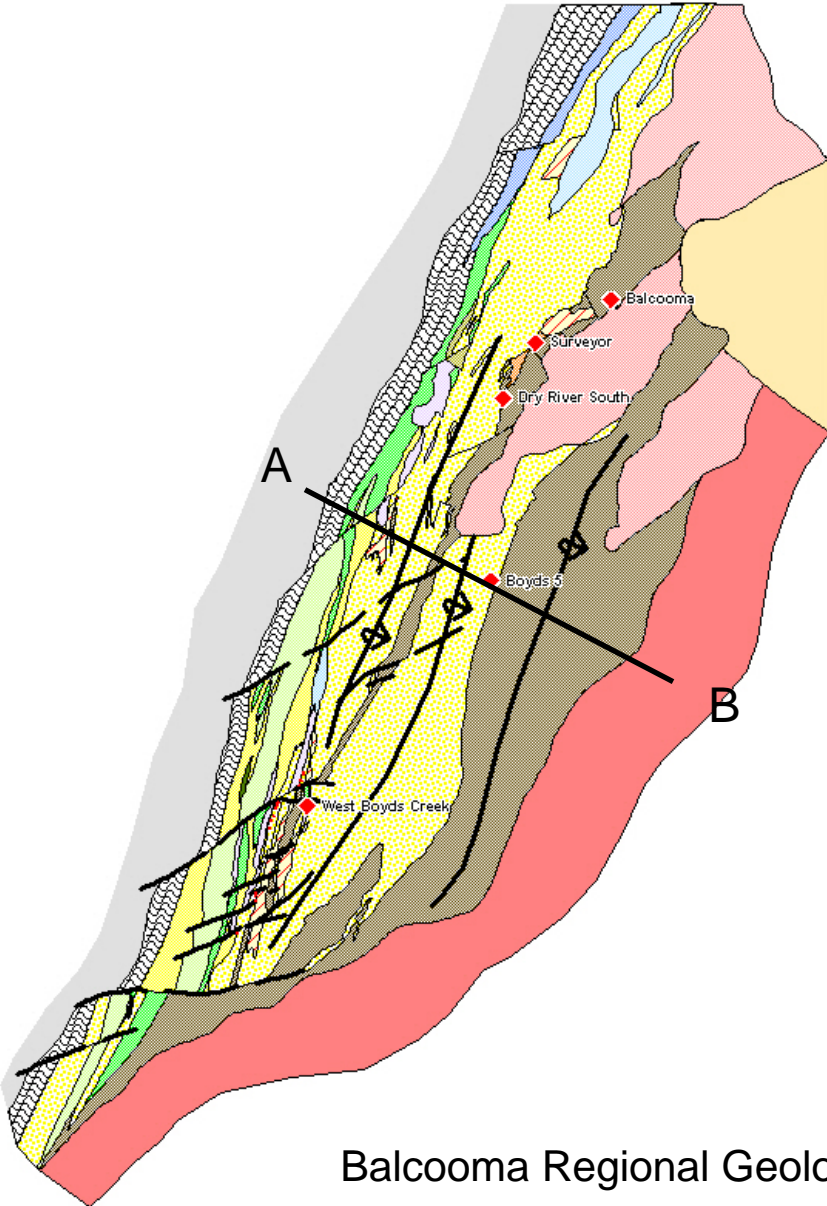
434

S15

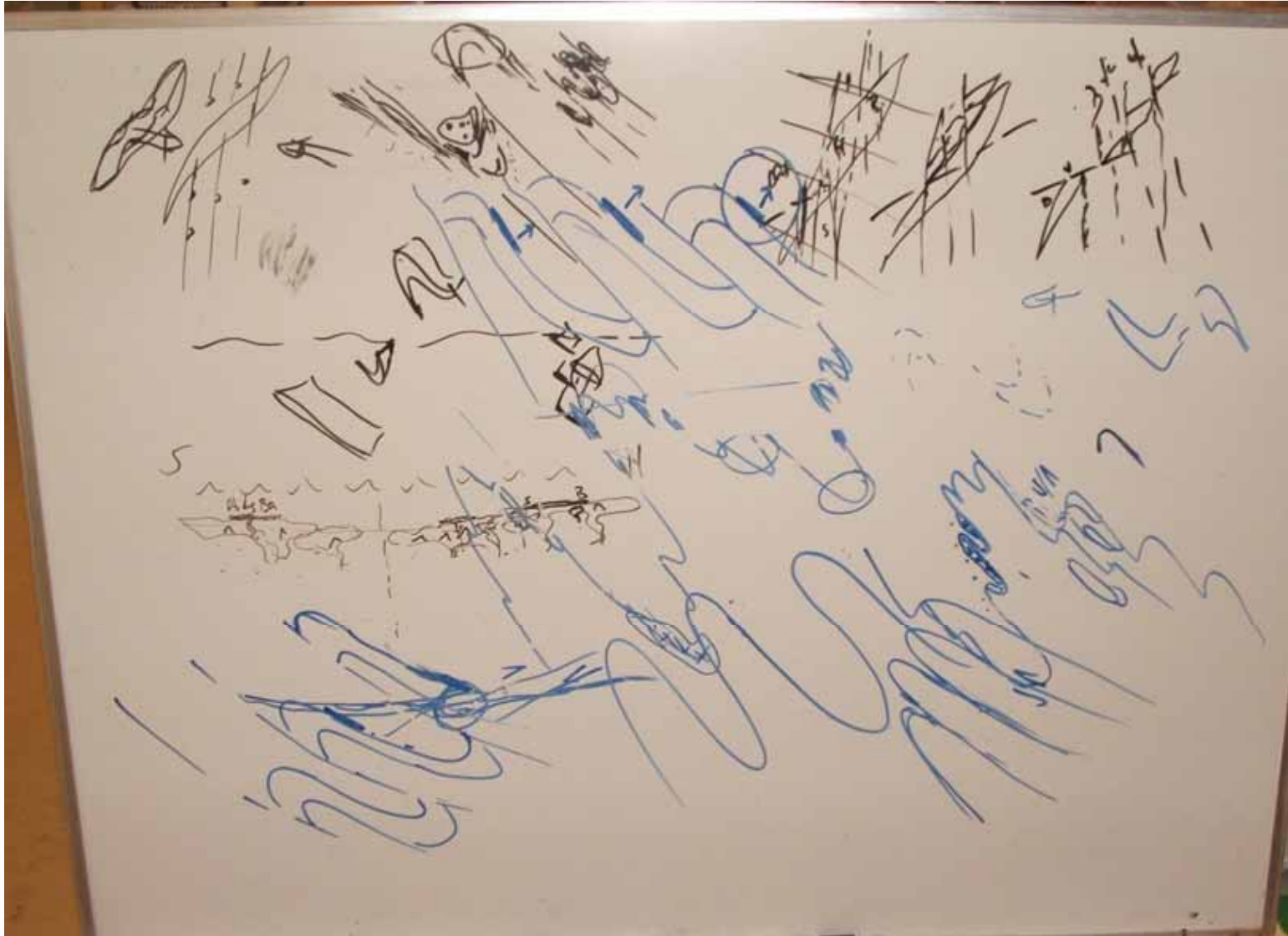




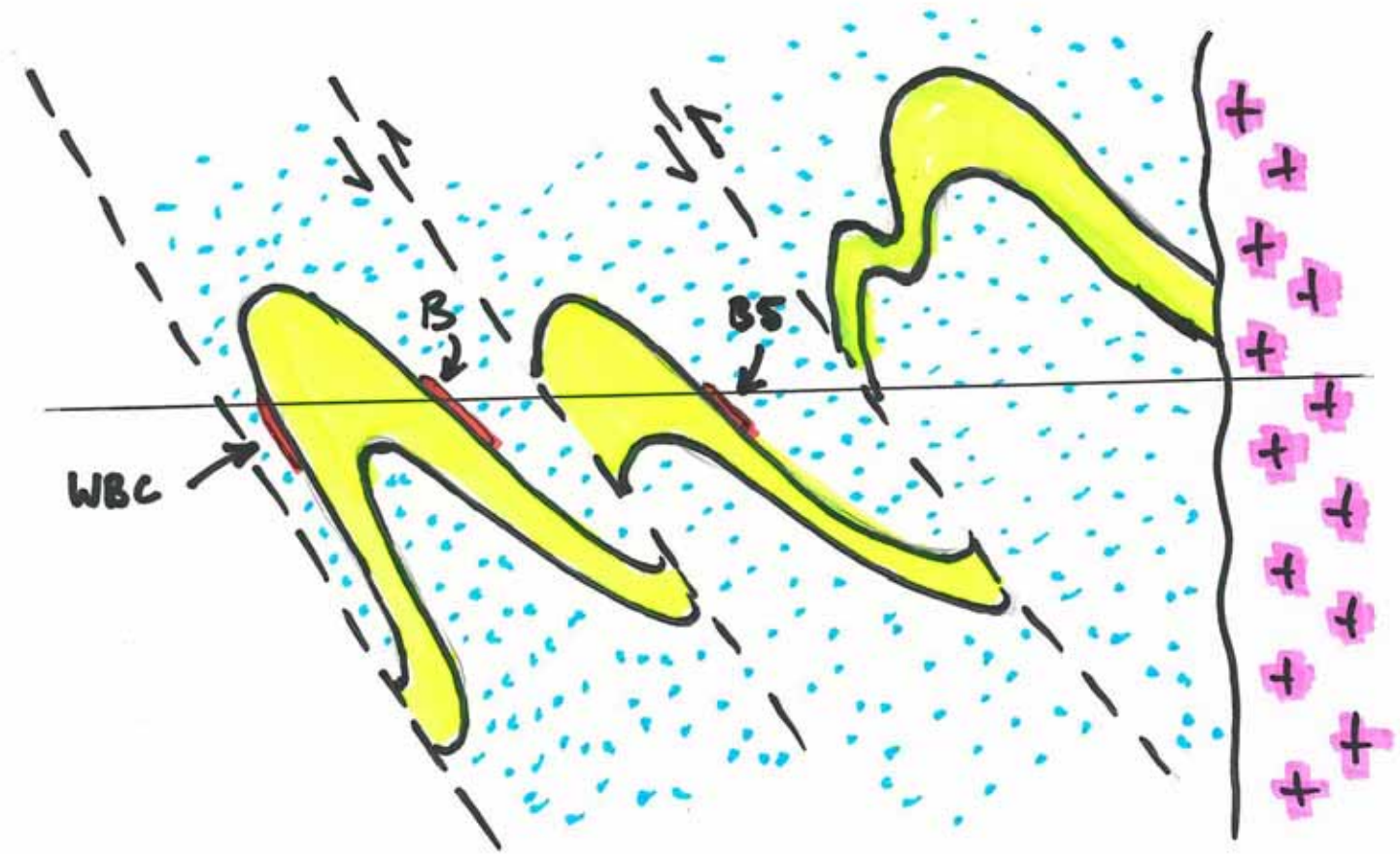


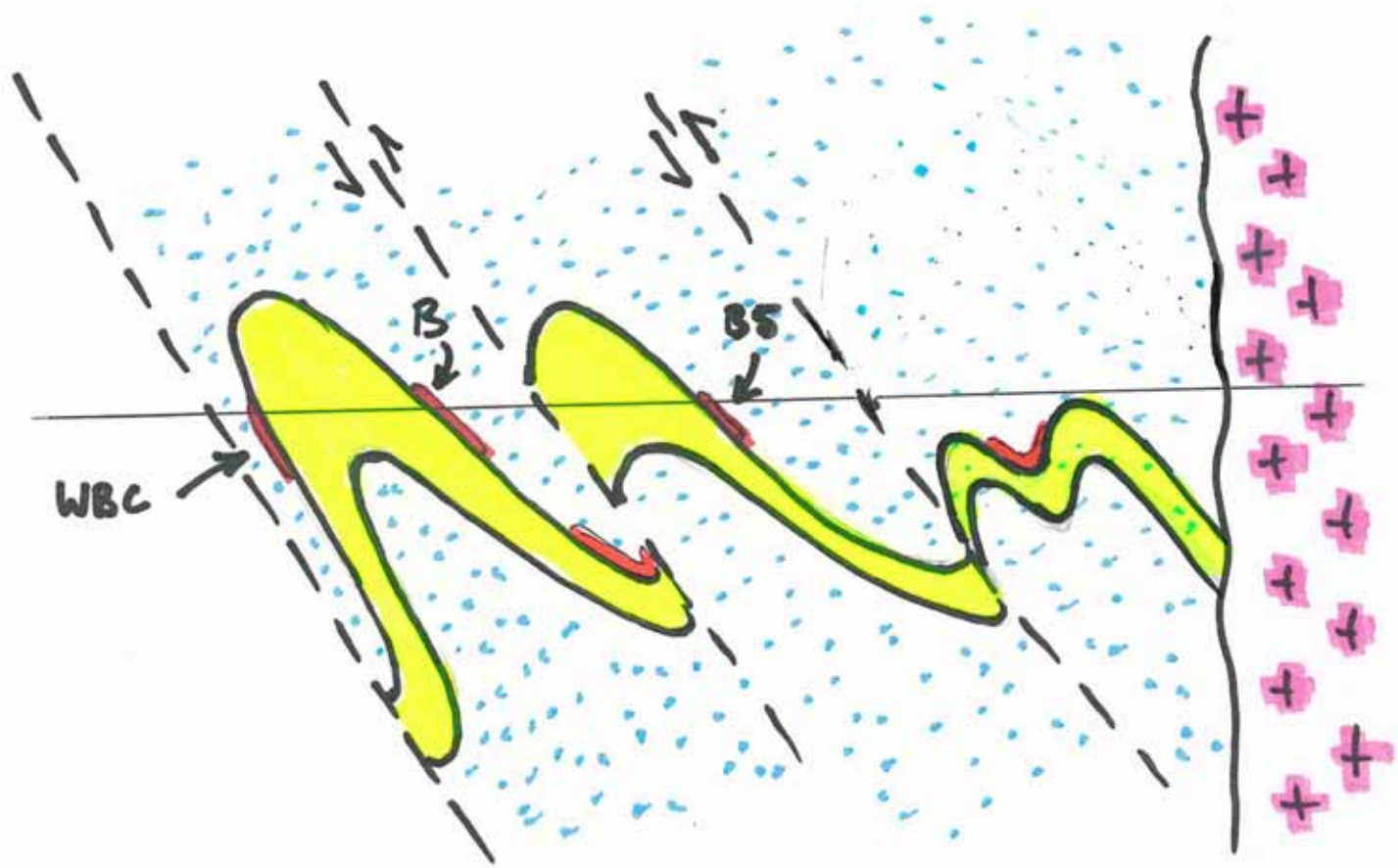


Balcooma Regional Geology

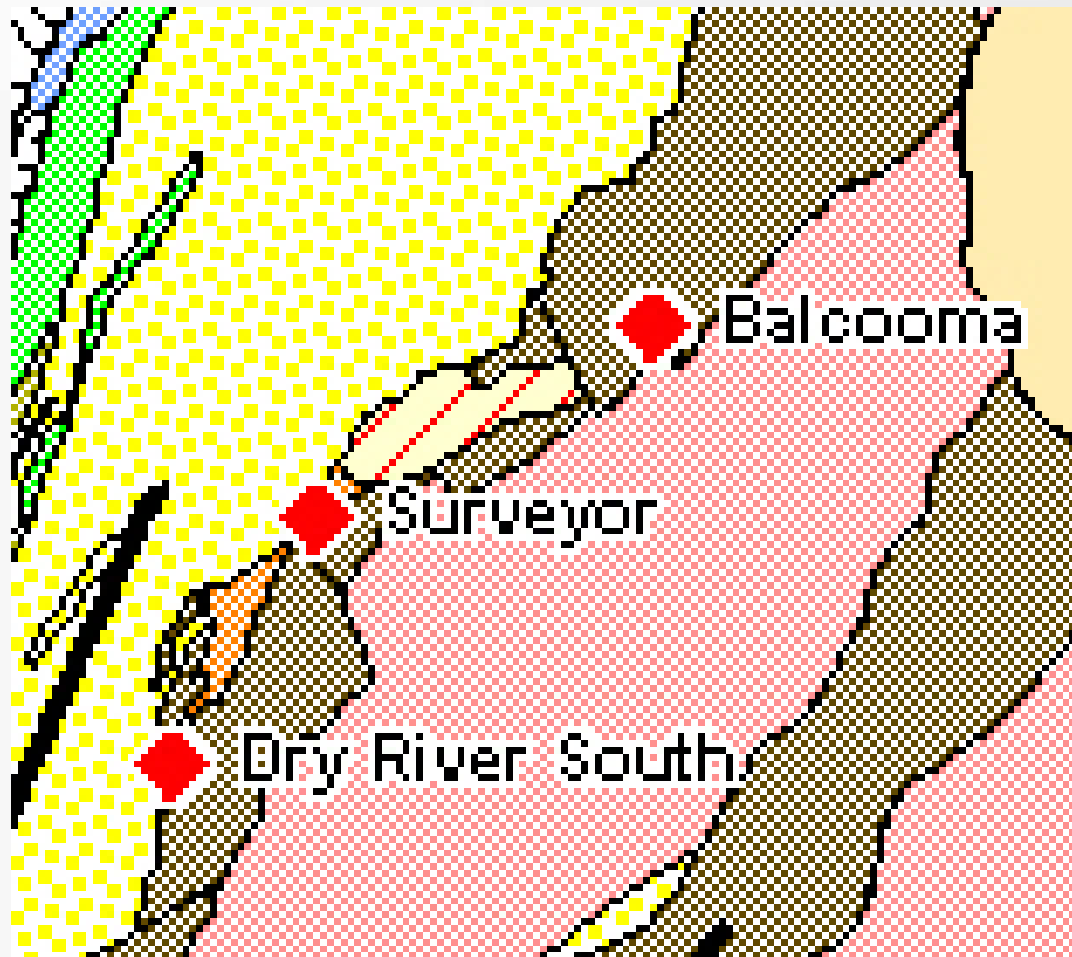




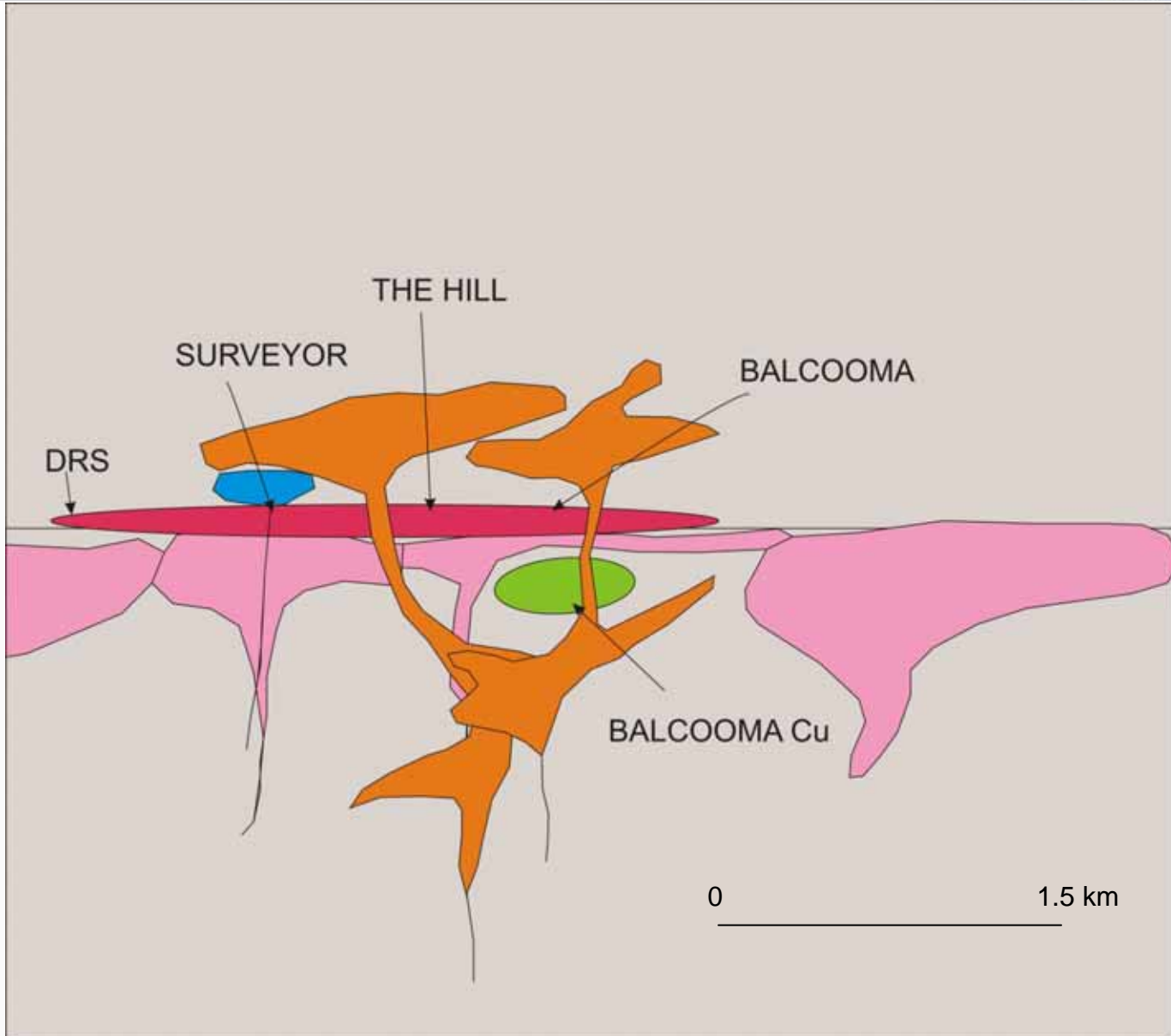




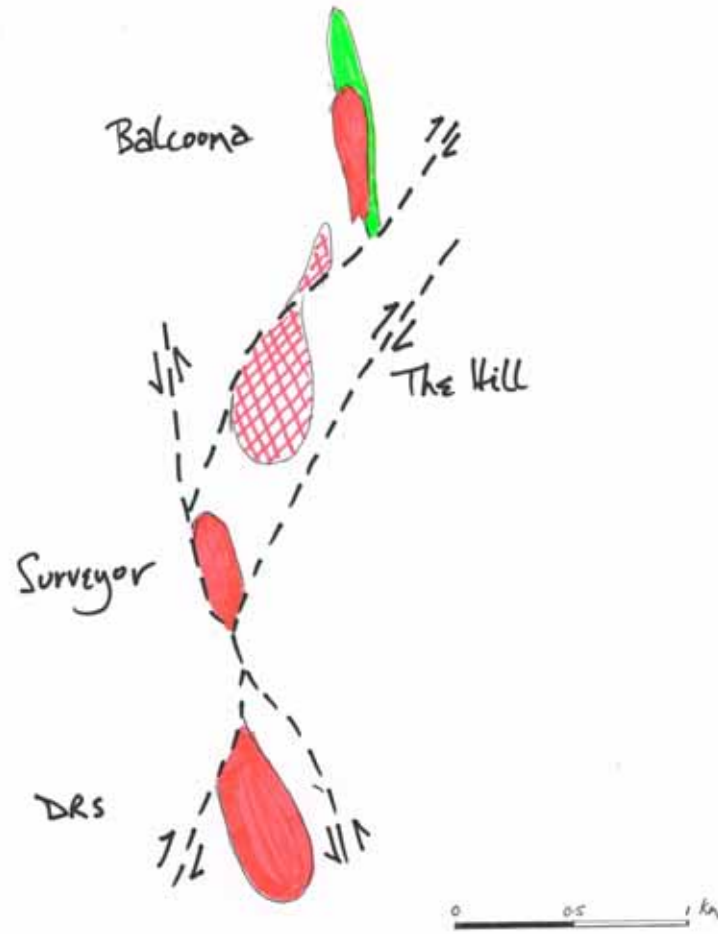




DRS to Balcooma



















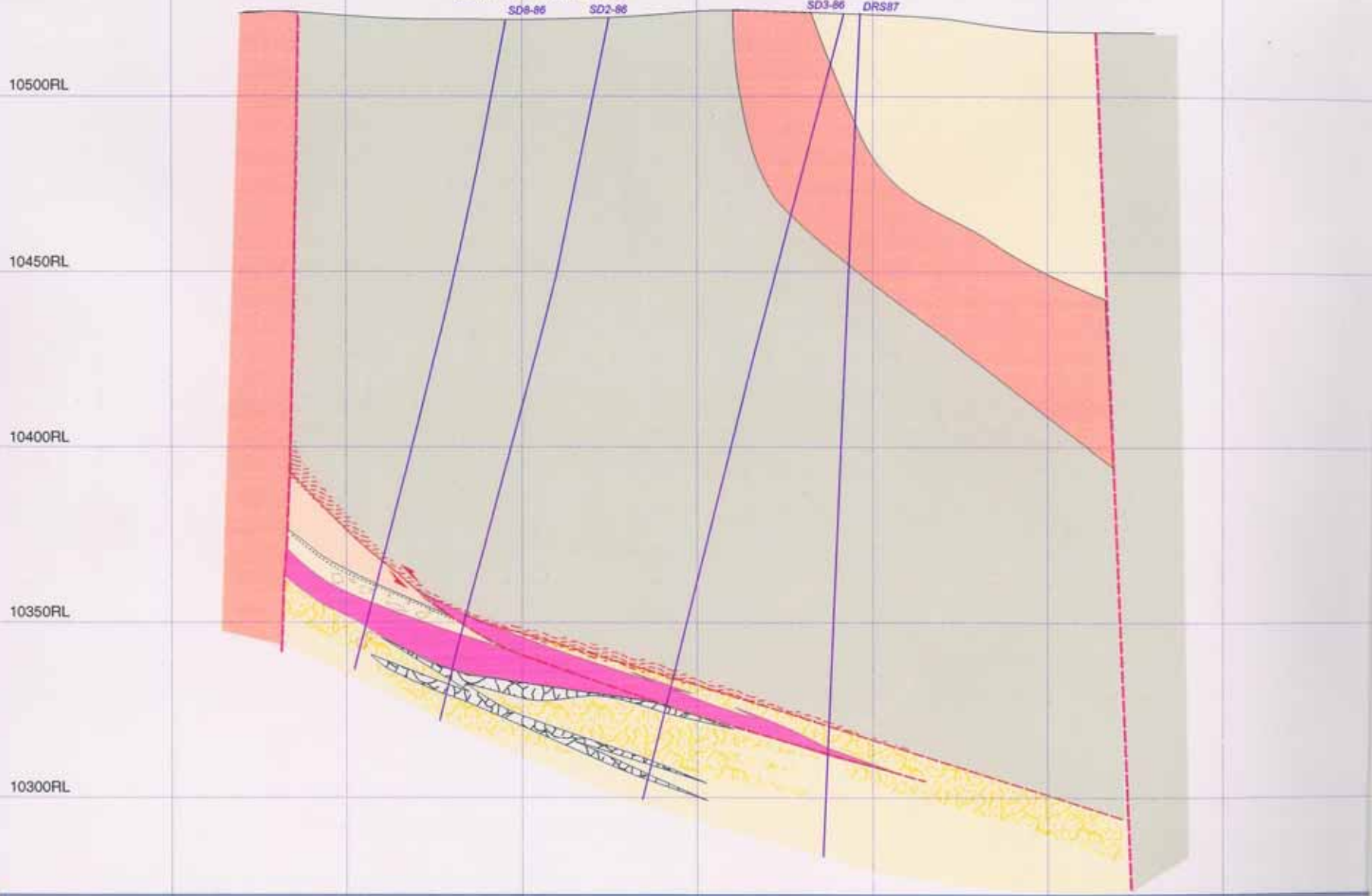






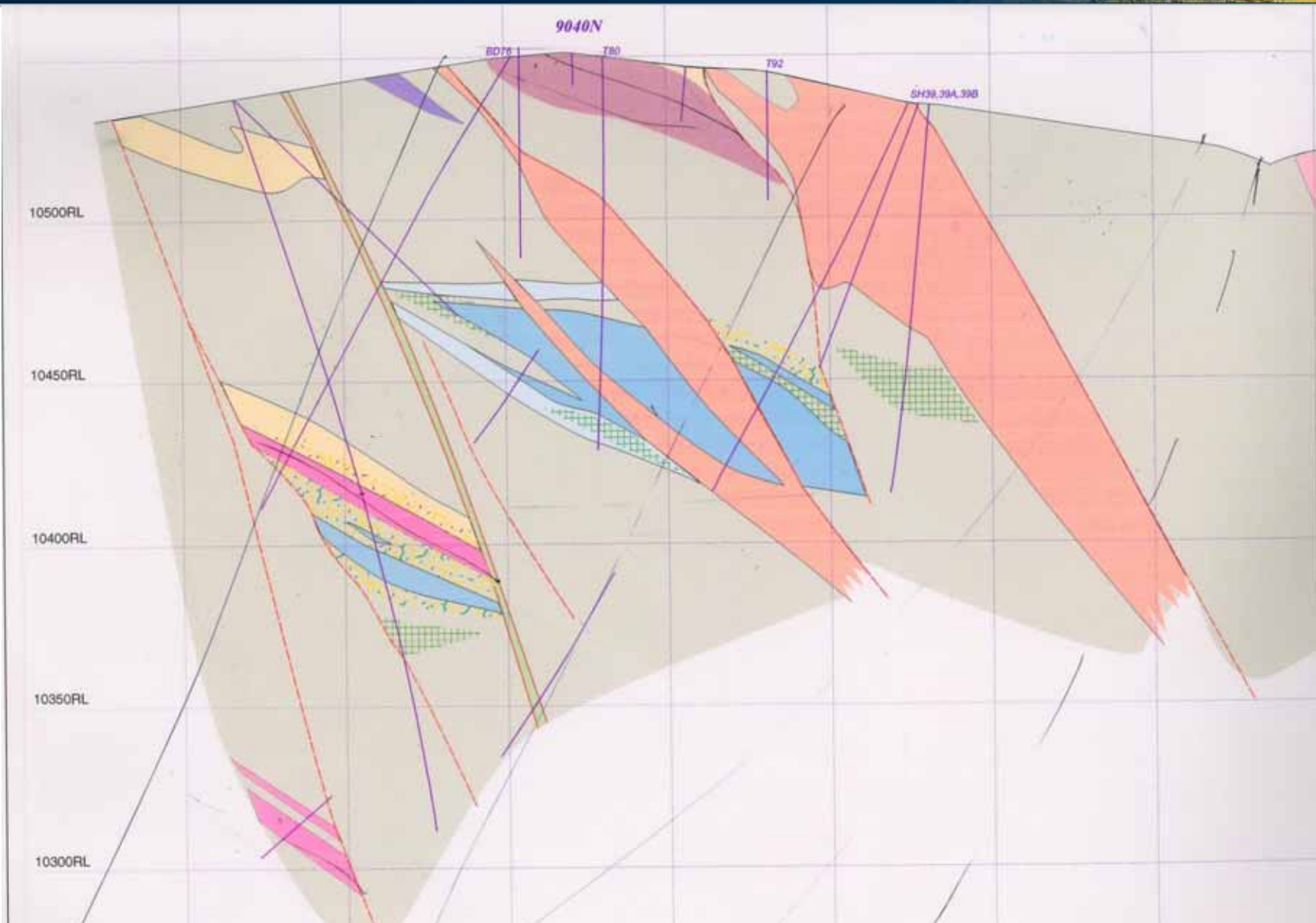


6380N (Surveyor Grid)

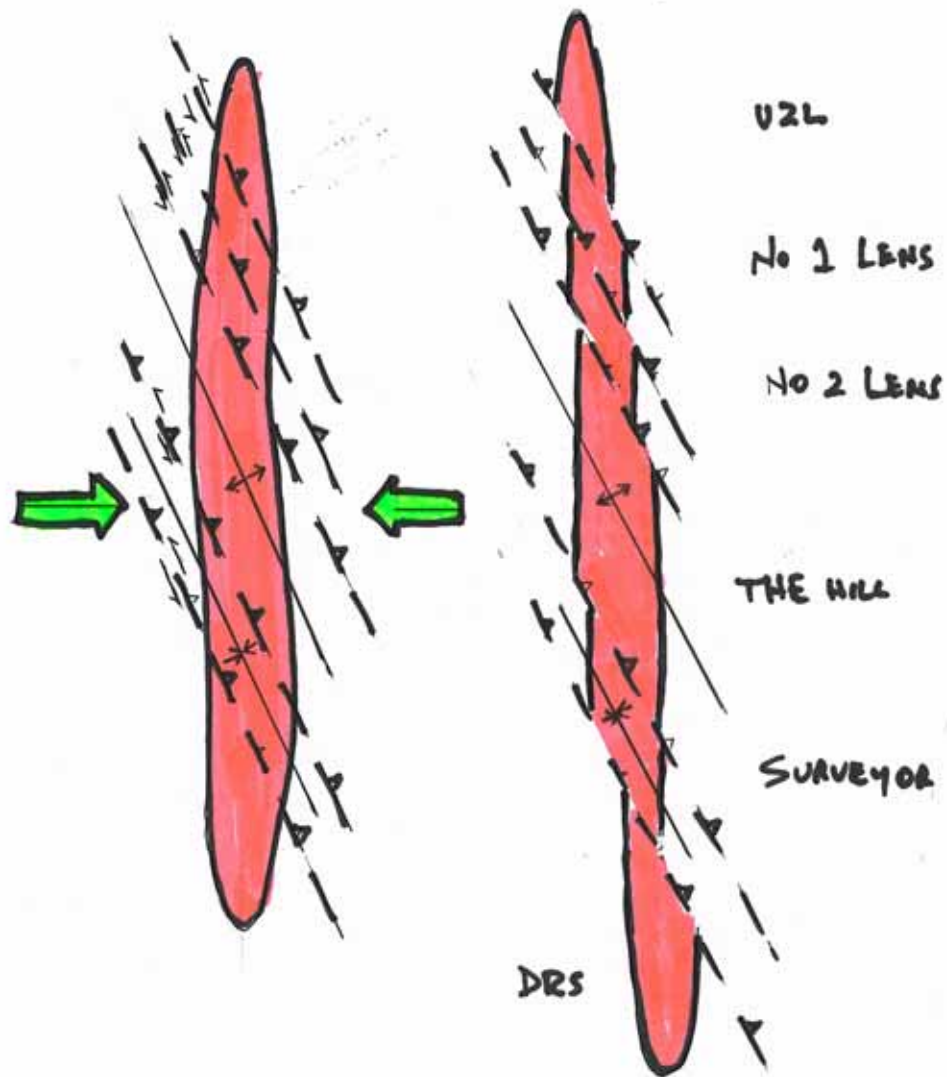


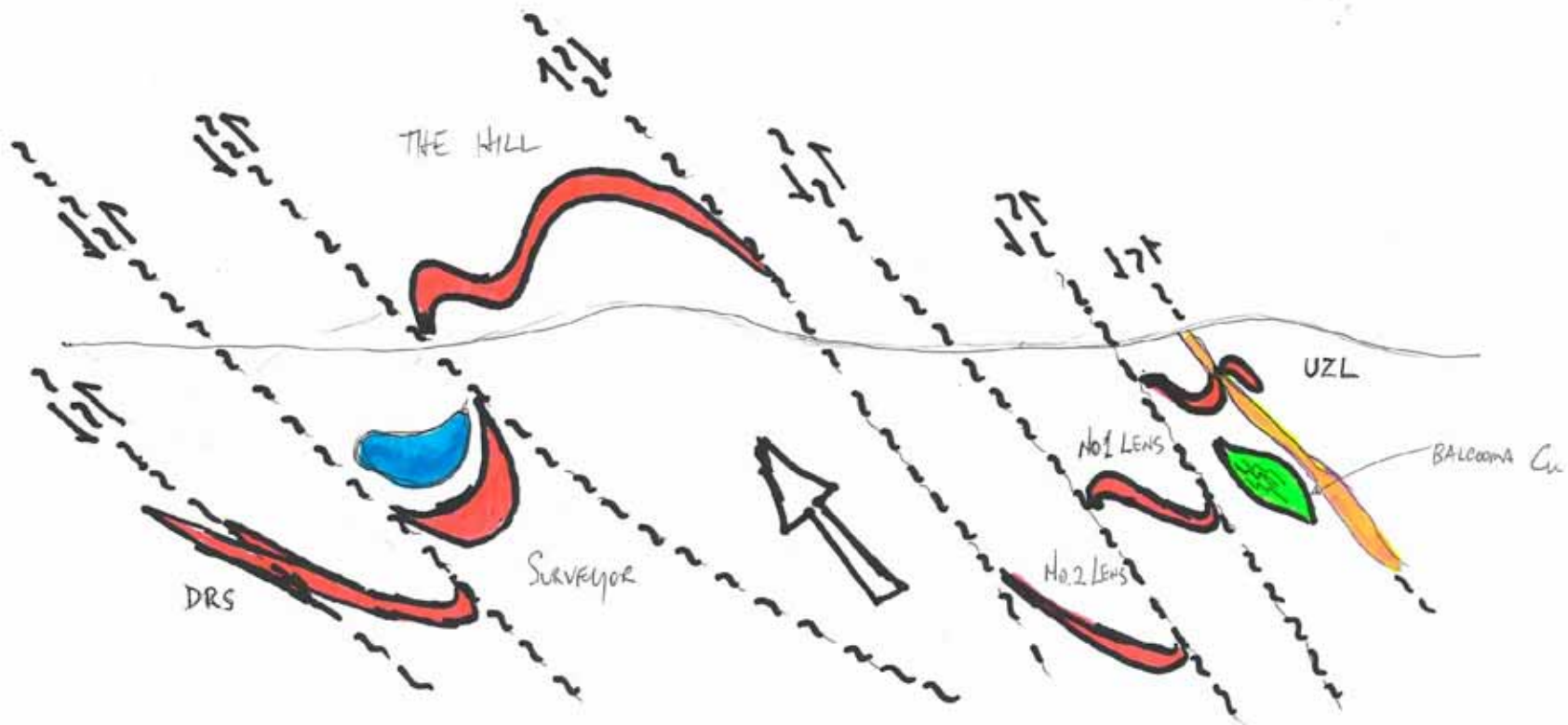
DRY RIVER SOUTH





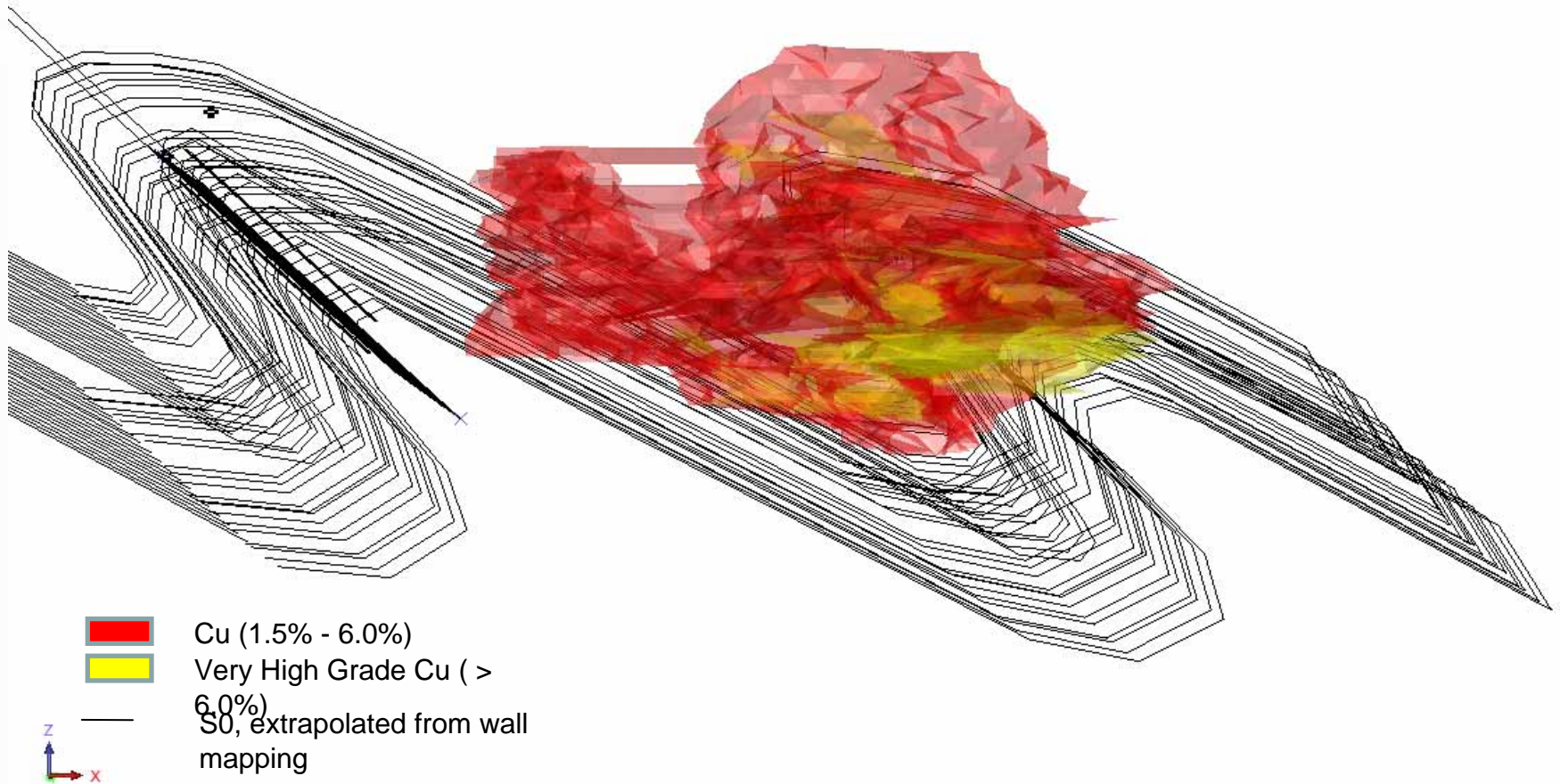








Cross Section, Balcooma Main Copper lens , modelled from grade control data collected from blast hole sampling, with interpreted bedding planes to illustrate major folding

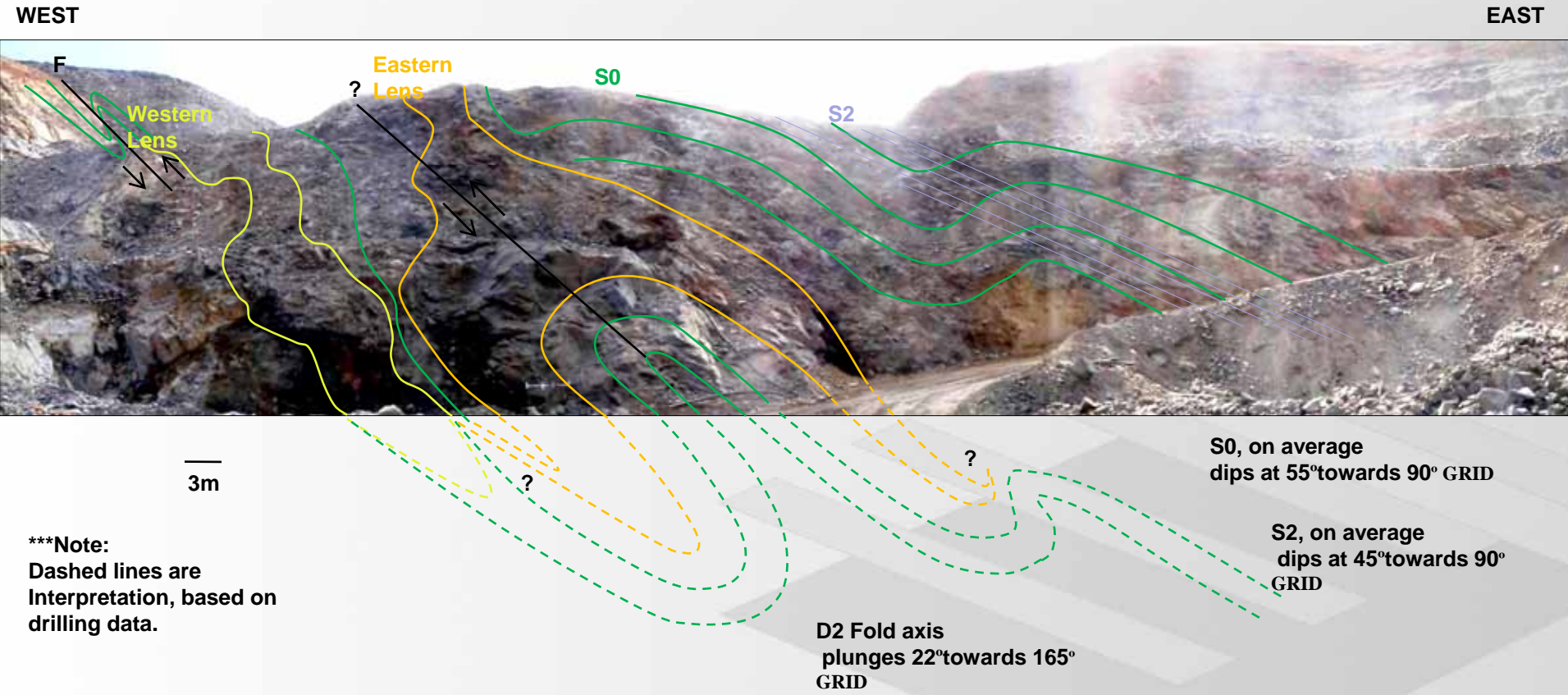


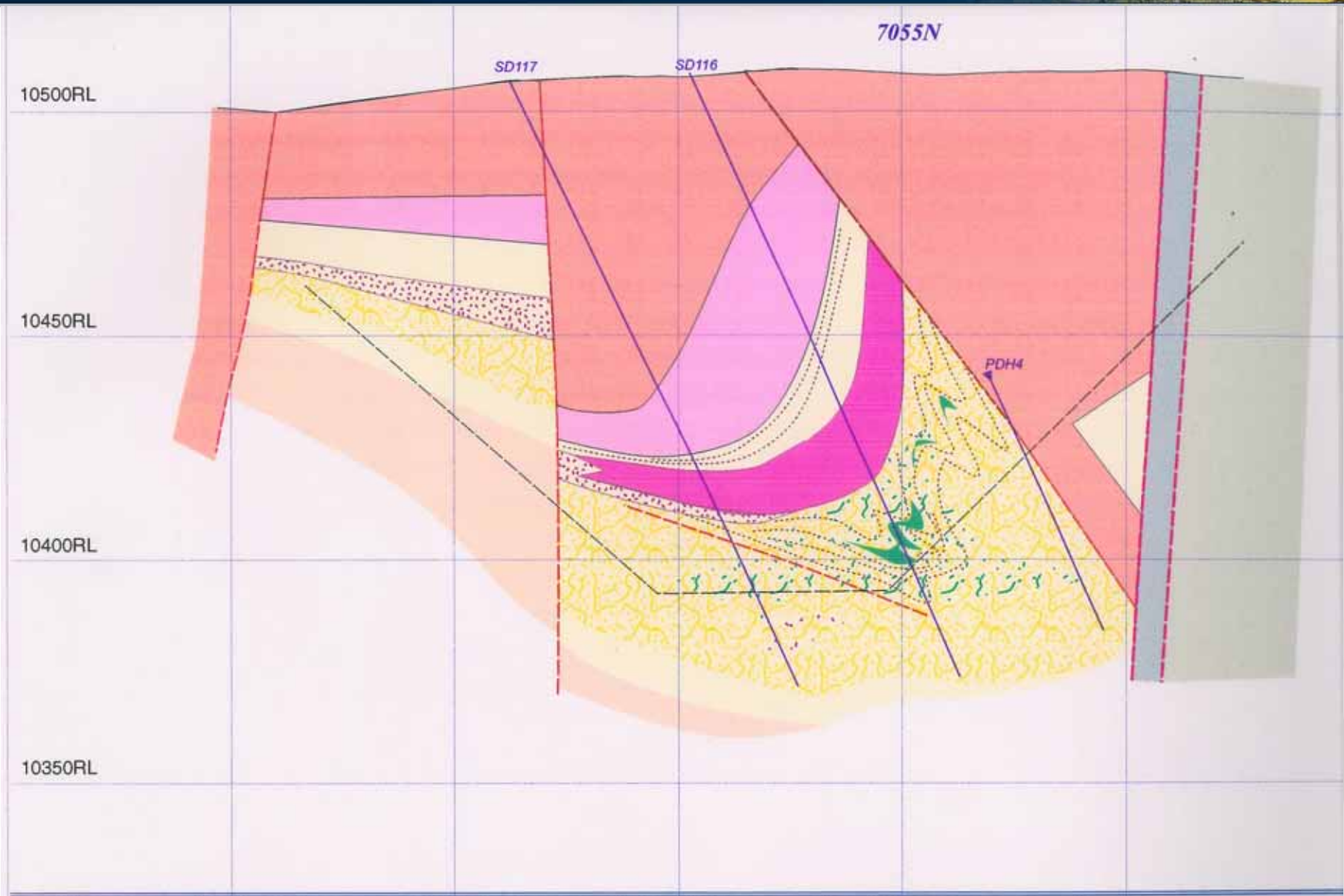
Cross section views demonstrate the tight folding of the massive sulphide lens and the consistent spatial relationship between the high grade regions and the folding. Cross section views once again illustrate the lack of high grade present within the western unfolded limb region.





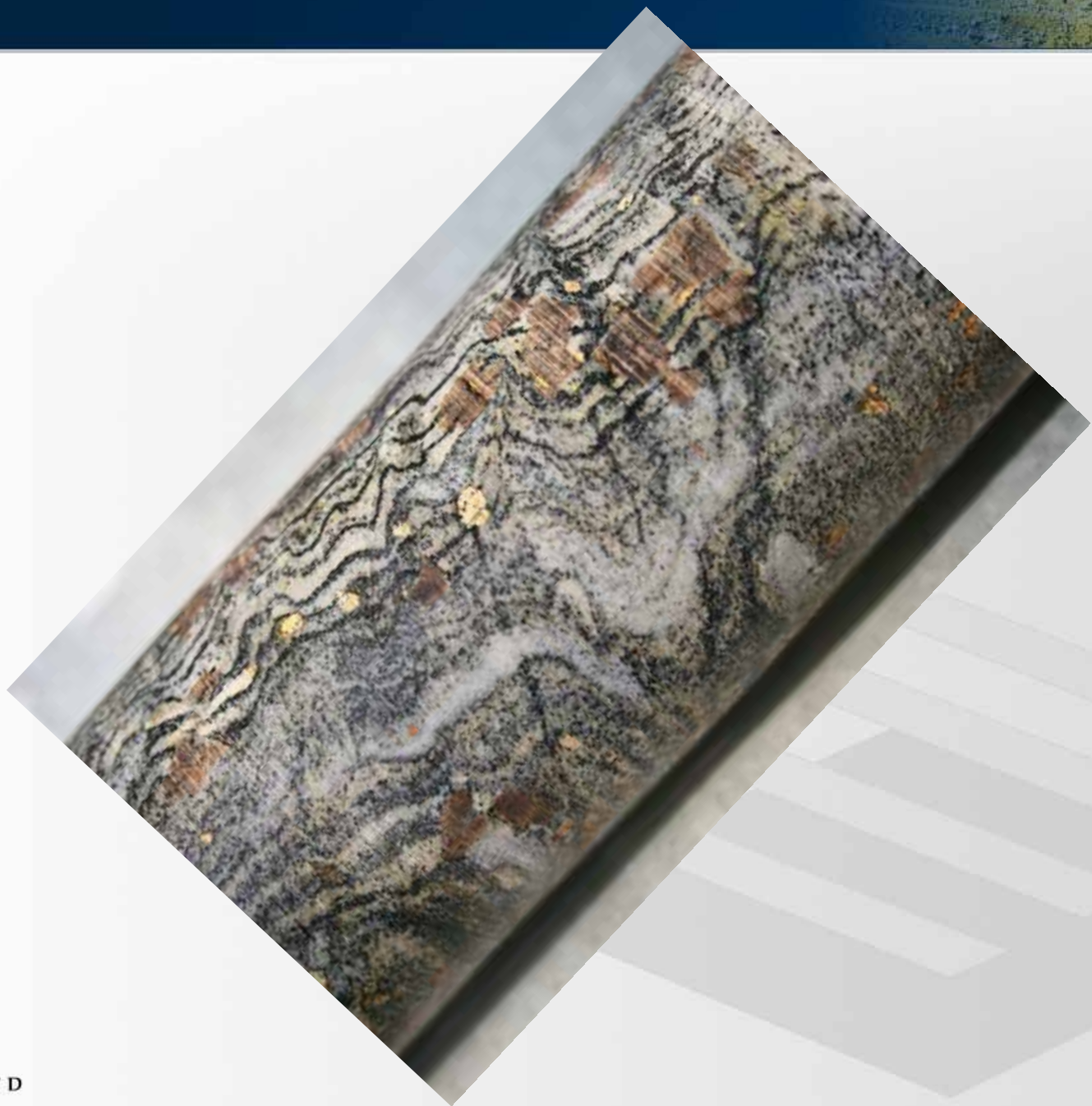
Cross Section, looking North through Balcooma Pit at 9125N  
Illustrating D2 folding of Cambrian/Ordovician host sediments and associated  
Massive Sulphide lenses.





SURVEYOR











**THANK YOU**

