

Expansion of exploration land in IRG Prospective Lachlan Fold Belt

21 September 2020



Highlights

- Applications lodged for 4 new Exploration Licences in Lachlan Fold Belt
- Extensions of existing tenements holding Harry Smith and Yalgogrin gold prospects and Bygoo tin prospect
- Additional 1,180 square kilometres more than doubles footprint in region
- Prospective for Intrusion-Related Gold Systems (“IRGS”)
- Historic drilling at the Kildary gold field returned best results of 2m at 10.6 g/t Au from 26m in KDRC04 and 2m at 13.7 g/t Au from 40m depth in KDRC10
- Strengthens IRGS prospective portfolio of Harry Smith, Yalgogrin, Hortons and Chillagoe

Lachlan Fold Belt Tenement Applications

Thomson Resources Ltd (“**Thomson**” or “**Company**”, ASX:TMZ), is pleased to advise that it has submitted applications for 4 new Exploration Licences in the Lachlan Fold Belt in New South Wales. The Applications, once granted, will add an additional 1,180 km² to the existing 764 km² of exploration licences already held by the Company in the Lachlan Fold Belt, more than doubling of its existing holding in the region.

The 4 Applications (**ELAs**), each covering 100 units or 295 km², are:

ELA 6130 Grellman – southeast and adjacent Yalgogrin
ELA 6131 Four Mile – southeast and adjacent to Harry Smith
ELA 6132 Buggajool – south end of the Yalgogrin granite
ELA 6133 Kildary – north of and adjacent to Bygoo

(see Figure 1 for location of the ELAs in relation to Thomson’s existing tenements).

Thomson’s Chairman, David Williams, said:

“These 4 Applications continue to build the Company’s IRG prospective portfolio of gold projects – Lachlan Fold Belt, Hortons gold project (New England Fold Belt) and Chillagoe. The work Thomson has undertaken at Harry Smith and Yalgogrin and our growing knowledge of Hortons and Chillagoe has encouraged us to build on our IRG prospective portfolio.

Whilst Thomson continues to evaluate the acquisition of new projects, these ELAs demonstrates that there is plenty of good ground out there for us to pick up and we will continue to do so where they enhance our projects.”

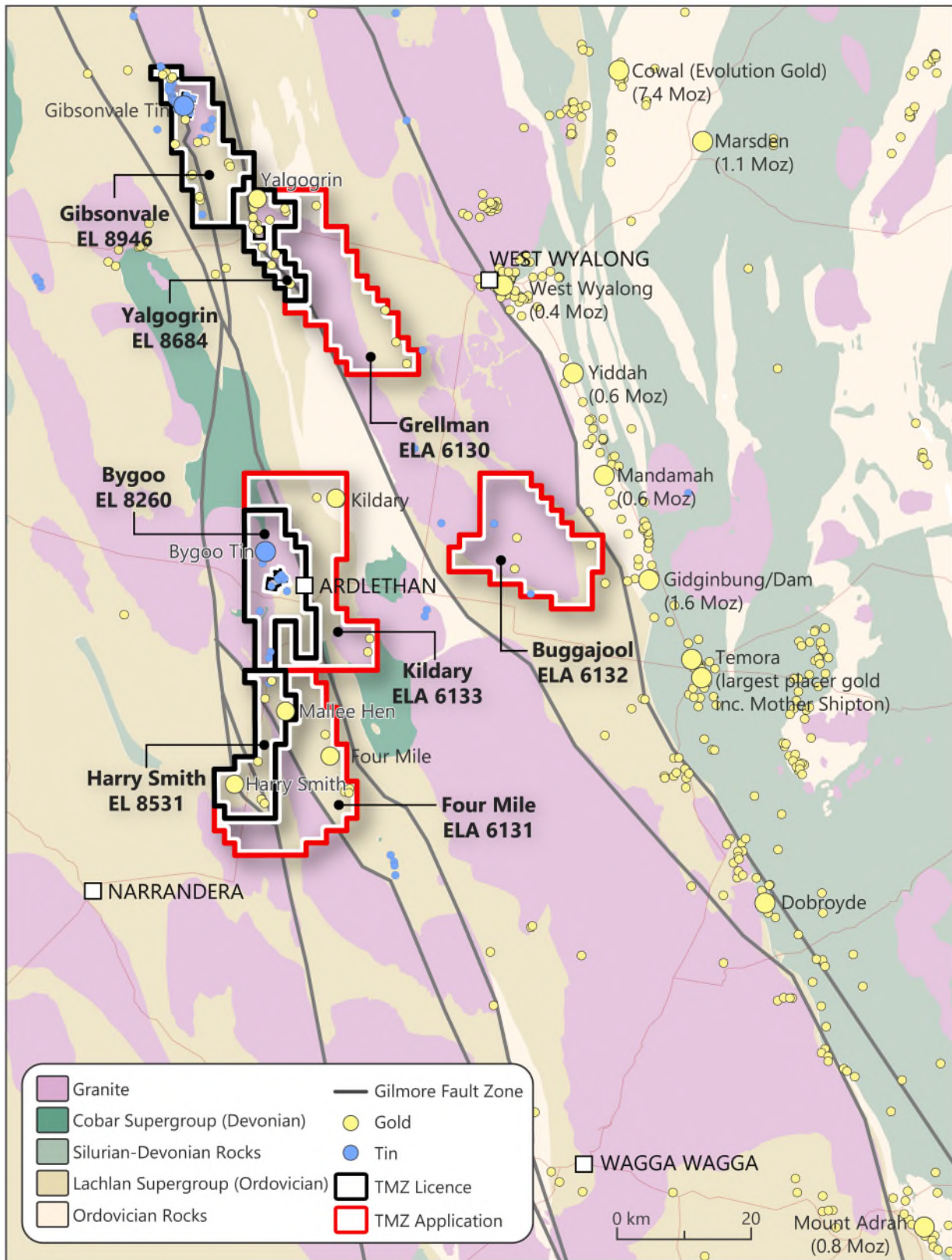


Figure 1 – Location of ELAs

The ELAs cover a number of known gold occurrences and trends currently being explored by the Company in the Lachlan Fold Belt. Thomson has had recent success in drilling neglected historic gold prospects in the region such as at the Harry Smith gold prospect which contains a best intercept of **9m at 9.2 g/t Au** from 38m in HSRC009, within a broader zone of **17m at 5.2 g/t Au** (see ASX Release dated 16 January 2019) and at the Yalgogrin gold project which contains a best intercept of **5m at 10.3 g/t Au** from 92m depth in TGRC06 (see ASX Release dated 18 August 2020).

ELA 6130 Grellman – contains five known gold occurrences and covers the continuation of the Yalgogrin granite southeast within the Gilmore Fault Zone. Three of the gold occurrences feature historic prospecting shafts, while one is an isolated rock sample of 4.8 g/t Au collected in a regional survey. No drilling has been reported from any of these areas. In addition, limited soil and rock chip sampling by Shell Minerals in 1997 outlined a 2km gold anomaly up to 0.6 g/t Au 6km northeast of Tallimba. Again, no follow up drilling was reported.

ELA 6131 Four Mile – contains several groups of historic gold workings including the Four Mile and Pikes prospects. No drilling of these has been reported. The ELA covers the continuation of the Grong Grong granite southeast of Harry Smith and also brings in the Ganmain granite to the east.

ELA 6132 Buggajool – this area contains several known gold, tin and tungsten occurrences and brings in the south end of the Yalgogrin granite. Two areas of historic workings for gold are at Buggajool and Valley View, from which a 9 g/t Au gold sample is reported in the NSW mineral occurrence database. The only reported drilling in the ELA area was 2km east of the Buggajool prospect and actually had minor gold – 2m at 0.4 g/t Au from 2m depth - and at the Mirrool tin mine area. Both drilling programs carried out for tin-tungsten exploration (Open File Report R00011754). The gold was associated with anomalous tungsten (0.03%) in a greisenised granite.

ELA 6133 Kildary – contains the extensive Kildary gold field. The gold field is alongside a strong magnetic anomaly, also running NW-SE. Limited drilling (10 holes) of the 2km line of workings returned significant results from hole KDRC04 with 2m at 10.6 g/t Au from 26m and 2m at 13.7 g/t Au from hole KDRC10 at 40m depth (Open File Report R00020084). The magnetic anomaly is interpreted as a hornfels related to a blind intrusive body into the Ordovician sediments of the area. No exploration has been undertaken in the past to assess the wider potential of the carapace zone at the top of the intrusive or for breccia and fracture hosted mineralisation in the immediate region about the intrusive. The ELA area covers the north end of the Ardlethan granite, adjacent to Thomson's Bygoon Tin EL 8260.

Intrusion Related Gold Systems

Thomson's gold projects are all considered prospective for the Intrusion Related Gold (**IRG**) deposit type as described from Alaska, the Yukon in Canada and from Queensland e.g. Kidston. These deposits are typically located either within or adjacent to granitoid intrusions, generally within their thermal aureoles, and are often associated with tin-tungsten belts. Like other belts worldwide, exploration in the Wagga Tin Belt in NSW has previously been focussed on tin and tungsten exploration, not gold.

Intrusion related gold deposits are most commonly of sheeted vein type, although greisen, disseminated and breccia deposits are also described. Gold may also be concentrated outboard with respect to the intrusions, but essentially within their thermal aureole, where deposits may be of skarn, disseminated replacement or vein types (see Figure 2).

IRG deposits often have a great vertical extent, but limited horizontal footprint, requiring targeted exploration rather than regional widely spaced surveys (see Figure 3). The mineralisation is often associated with pyrrhotite, particularly where the intrusion takes place into sulphur bearing host rocks (as IRG deposits themselves are low in sulphur). This can give a distinctive magmatic signature with a circular magnetic "aureole" around the intrusion. High resolution magnetic surveys are a useful exploration tool.

IRG deposits can be quite significant when found such as with the recent discovery of the Hemi IRG deposit by De Grey Mining Limited (see DEG Investor Presentation of 10 September 2020).

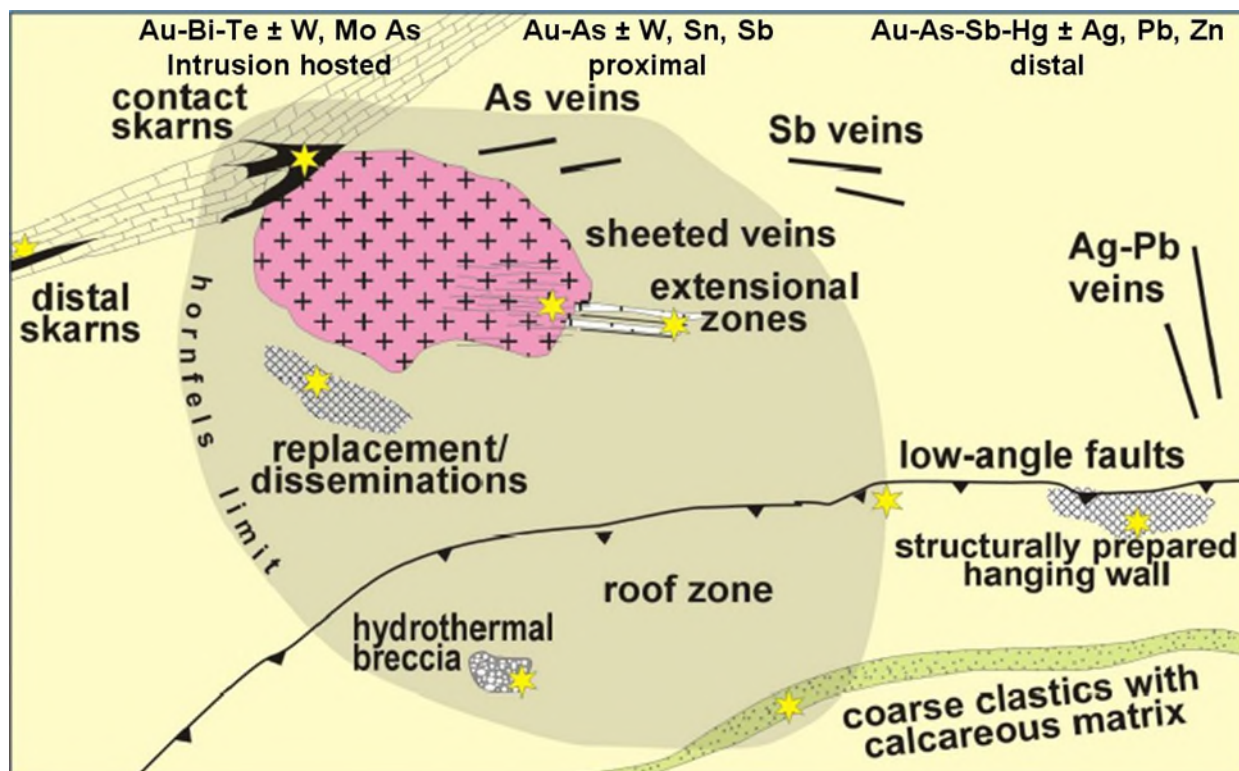


Figure 2 – Intrusion Related Gold Deposit types

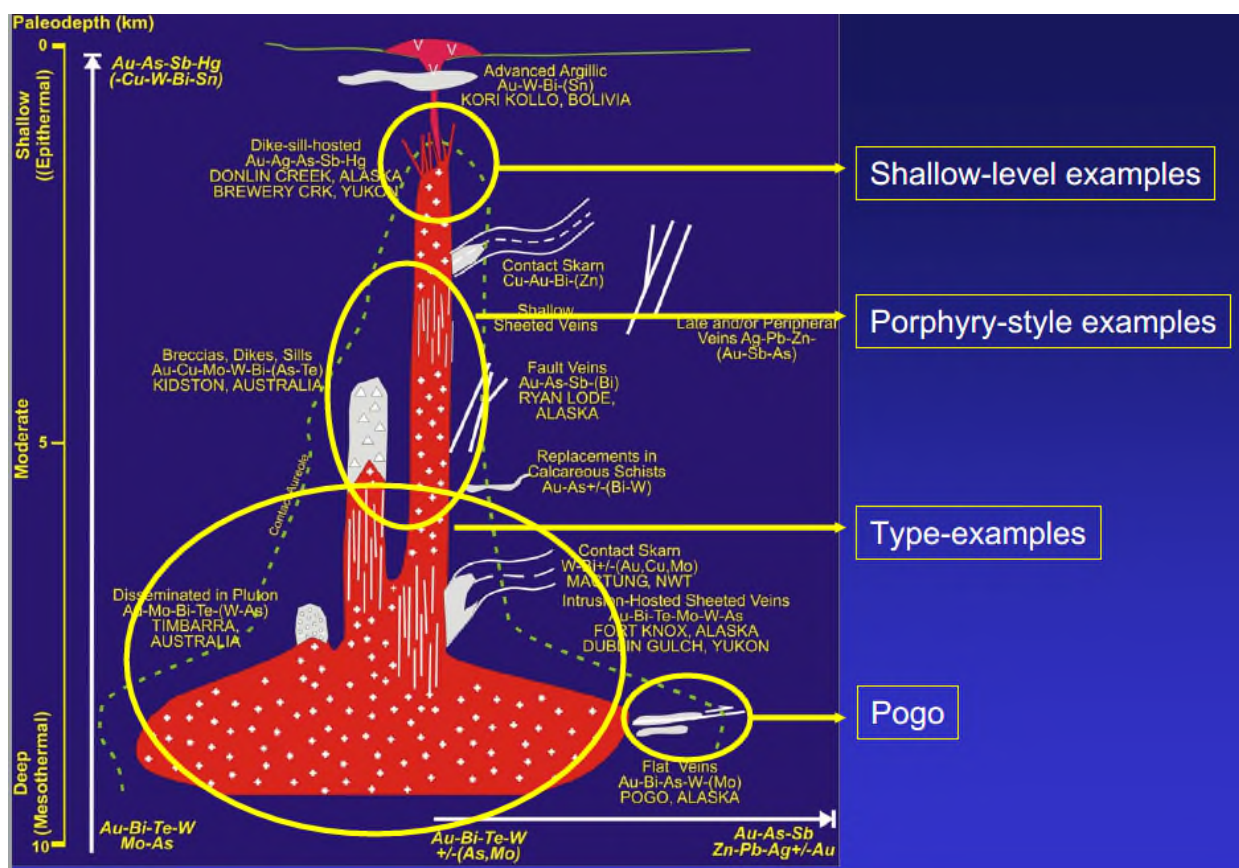


Figure 3 – Geological Exploration Model for IRGS

(Source: Dr Tim Baker, SE Europe Geoscience Foundation Shortcourse presentation on IRGS Deposits 2005)

Annual General Meeting

This year's Annual General Meeting of the Company will be held at 11.00am (Sydney time) on Monday 26 October 2020 as a virtual meeting, in accordance with the *Corporations (Coronavirus Economic Response) Determination (No. 1) 2020, (Cth)*. There will not be a physical meeting held. In accordance with ASX Listing Rule 3.13.1 and clause 7.4 of the Company's Constitution, Thomson advises that any nominations from persons wishing to be considered for election as a director must be received at the Company's registered office no later than 5.00pm on 26 September 2020. The Notice of Meeting and other information regarding the meeting will be issued shortly.

This announcement was authorised for issue by the Board.

Thomson Resources Ltd

Eoin Rothery

Executive Director

Competent Person

The information in this report that relates to Exploration Targets, Exploration Results, Mineral Resources or Ore Reserves is based on information compiled by Eoin Rothery, (MSc), who is a member of the Australian Institute of Geoscientists. Mr Rothery is a full-time employee of Thomson Resources Ltd. Mr Rothery has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves". Mr Rothery consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

This report contains information extracted from previous ASX releases which are referenced in the report and which are available on the company's website. The Company confirms that it is not aware of any new information or data that materially affects the information included in the original market announcements. The Company confirms that the form and context in which the Competent Person's findings are presented have not been materially modified from the original market announcement.



Figure 3 - Thomson Resources' projects in NSW

Harry Smith Gold Project

The Harry Smith Gold Project was granted to Thomson Resources in 2016 and lies 30km south of Ardlathan. Three distinct gold-bearing quartz reefs occur at the Harry Smith prospect and were worked historically from 1893 to 1942. Total recorded production was over 3,500 ounces of gold (Mines Record 2507). Thomson Resources has drilled 14 holes to date with significant gold intercepts on all three lodes including a strong high-grade hit on the Silver Spray lode (9m at 9.2 g/t Au from 38m in HSR009, within a broader zone of 17m at 5.2 g/t Au). [For further information and the detail of the above see Thomson Resources ASX Releases of 16 September 2016, 26 March 2018, 19 June 2018, 16 January 2019 and 29 January 2019].

Yalgogrin Gold Project

The Yalgogrin Gold Project was acquired by Thomson in October 2019. EL 8684, together with the recently granted EL 8946, covers the Yalgogrin Gold Field with multiple historic gold workings. Gold was first produced at Yalgogrin in 1893 and continued sporadically at multiple centres until 1954. Total historic production from the workings is estimated at more than 15,000 ounces at grades averaging over 1 ounce per ton. Multiple high-grade surface samples occur at and between historic workings and there has been little modern drill follow up (see Thomson's ASX release of 15 October 2019). Maiden drilling by Thomson in August 2020 intersected the first known high grade gold results below two sets of workings: 5m at 10.3 g/t Au below the Bursted Boulder shafts and pits and 2m at 7.5 g/t Au below Shellys (Thomson Resources ASX Release 18 September 2020).

Bygoo Tin Project

The Bygoo Tin Project was acquired by Thomson Resources in 2015 and lies on the 100% owned EL 8260. The EL surrounds the major tin deposit at Ardlathan which was mined until 1986, with over 31,500 tonnes of tin being produced (reference Paterson, R.G., 1990, Ardlathan tin deposits in the Australasian Institute of Mining and Metallurgy Monograph no. 14, pages 1357-1364). There are several early-twentieth century shallow tin workings scattered up to 10km north and south of Ardlathan, and few have been tested with modern exploration. Thomson has had immediate success in drilling near two of the historic workings, Bygoo North and South, which lie towards the northern end of the tin-bearing Ardlathan Granite.

At Bygoo North Thomson has intersected multiple high-grade tin intersections in a quartz-topaz-cassiterite greisen including 11m at 1.0% Sn (BNRC10), 35m at 2.1% Sn (BNRC11), 11m at 1.4% Sn (BNRC13), 11m at 2.1% Sn (BNRC20), 29m at 1.0% Sn (BNRC33) and 19m at 1.0% Sn (BNRC40). The greisens appear to be steep to vertical; about 5-10m wide in true width; strike east-west; and the tin intersections appear to have continuity within the greisen.

At Bygoo South Thomson has intersected a sulphide-rich quartz topaz greisen with high-grade tin intersections including 8m at 1.3% Sn (BNRC21), 20m at 0.9% Sn (BNRC31) and 7m at 1.3% Sn (BNRC35). The orientation and geometry of this greisen is not yet clear. 20km south of Bygoo Thomson has intersected more tin at one of the old workings in the Bald Hill tin field with a best result of 15m at 0.4% Sn from 19m depth in hole BHRC01.

[For further information and the detail of the above see Thomson Resources ASX Releases of 21 November 2016, 28 June 2017, 16 October 2017, 5 April 2018, 5 July 2018 and 7 January 2019]

JORC Code, 2012 Edition – Table 1 report

Section 1 Sampling Techniques and Data

Criteria	Commentary
<i>Sampling techniques</i>	<p>All other company samples referred to are taken from Public Open File reports hosted by the Geological Survey of New South Wales at https://search.geoscience.nsw.gov.au/</p> <p>Samples taken by Thomson Resources are all from ASX releases by the Company and referred to in the text above</p>
<i>Drilling techniques</i>	<p>All other company samples referred to are taken from Public Open File reports hosted by the Geological Survey of New South Wales at https://search.geoscience.nsw.gov.au/</p> <p>Samples taken by Thomson Resources are all from ASX releases by the Company and referred to in the text above</p>
<i>Drill sample recovery</i>	Recoveries are unknown or as described in public reports (as above).
<i>Logging</i>	All holes were logged for geology.
<i>Sub-sampling techniques and sample preparation</i>	No sub-sampling was reported.
<i>Quality of assay data and laboratory tests</i>	<p>No analysis of quality control data has been carried out as this is early stage exploration drilling. Laboratory reports show regular repeats on gold assay pulps.</p> <p>In general, historic reports list laboratories such as ALS and Analabs; and indicate that gold assays are measured by Fire Assay techniques.</p>
<i>Verification of sampling and assaying</i>	No independent verification has been carried out.
<i>Location of data points</i>	Locations are generally as given in the Geological Survey of NSW Minview site. Historic data was generally taken on local grids and an error of +/- 50m is assumed.
<i>Data spacing and distribution</i>	The data spacing is irregular.
<i>Orientation of data in relation to structure</i>	Surface sampling only; for drill holes mentioned the spacing is so wide that the geometry is unknown; however, drill holes are targeted at a high angle to interpreted structure.
<i>Sample security</i>	No particular security measures were taken.
<i>Audits or reviews</i>	No independent audit or review undertaken as this was not thought to be required at this stage.

Section 2 Reporting of Exploration Results

Criteria	Commentary
Mineral tenement and land tenure status	All samples reported occur on new exploration licence applications by Thomson Resources; or on exploration licences held 100% by Thomson Resources
Exploration by other parties	Historic exploration is detailed in open file reports – particularly the reports listed in the text
Geology	Geology is described in the body of the release.
Drill hole Information	<p>There has been very limited drilling on the new exploration licence applications.</p> <p>ELA 6130 – no drilling.</p> <p>ELA 6131 – 54 shallow RAB or aircore holes chasing tin in cover; average depth 17m; no gold assays.</p> <p>ELA 6132 –</p> <ul style="list-style-type: none"> 252 shallow holes chasing tin near Ardlethan, no gold assays, average depth 22m; 24 holes at Glenhope, 7km SE of Ardlethan on a magnetic anomaly, average depth 32m, maximum 0.13 g/t Au and 14 RC holes in the area of the Kildary gold field 16km NE of Ardlethan, average depth 67m, maximum Au 2m at 13.7 g/t Au in hole KDRC10. <p>ELA 6133 - 15 shallow holes chasing tin-tungsten in cover; average depth 23m, maximum 0.4 g/t Au (along with 0.03% tungsten)</p>
Data aggregation methods	No aggregation is reported above.
Relationship between mineralisation widths and intercept lengths	All widths quoted are downhole widths. Holes were drilled mostly vertically or at 60 degrees at steep targets; for the latter true width is likely to be around half of the downhole width. However, no modelling of true width has taken place.
Diagrams	A geology / mineralisation map is presented as Figure 1.
Balanced reporting	All reported historic drilling and surface soil/rock chip sampling is noted in the body of the release
Other substantive exploration data	No other exploration data is considered substantive at this stage, however reviews are ongoing.
Further work	Thomson intends to carry out surface exploration and a basement drilling program.