7-OR

10 Dec 2020

THOR MINING PLC

Registered Numbers: United Kingdom 05276 414 Australia 121 117 673

Registered Office: 58 Galway Avenue MARLESTON, SA, 5035 Australia

Ph: +61 8 7324 1935 Fx: +61 8 8351 5169

Email: corporate@thormining.com

Website: www.thormining.com

Twitter
@ThorMining

Enquiries:
Mick Billing
Executive Chairman
Thor Mining PLC
+61 8 7324 1935

Nominated Advisor Colin Aaronson Grant Thornton +44 (0) 20 7383 5100

AIM & ASX Listings: Shares: THR

Directors: Michael Billing Mark Potter Mark McGeough

Key Projects:

- Gold

 Ragged Range WA
- Copper Alford-east SA Kapunda SA
- Tungsten Molyhil NT Pilot Mountain USA

Alford-west SA

 Uranium / Vanadium Colorado / Utah USA Company Announcements Office ASX Securities Limited, 20, Bridge Street, Sydney, N.S.W. 2000

PILBARA GOLDFIELDS RAGGED RANGE PROJECT SIGNIFICANT MAGNETIC TARGETS IDENTIFIED

The directors of Thor Mining Plc ("Thor") (AIM, ASX: THR) are pleased to advise of the identification of a number of significant magnetic targets following the interpretation, of the Airborne magnetics survey flown in October 2020, at the 100% owned Ragged Range Project in Western Australia.

Key highlights

- Sterling Prospect, identified as the principle initial target, is approximately five kilometres long & between 300 and 500 metres in width;
- Anomalous stream sediment gold assays (up to 2.2g/t Au) clearly related to the structural contact of the Euro Basalt and younger Dalton Suite, at the Sterling Prospect. Gold present in streams confirms that gold mineralisation occurs very close to surface. (ASX/AIM: THR 1 December 2020);
- Three isolated, strong magnetic anomalies highlighted on Figure 3, have no simple geological explanation in the magnetics. These are priority targets for follow-up;
- The Ragged Range area is structurally complex with many phases of folding and shortening of the prospective Euro Basalt. This leads to the creation of space, significantly increasing the potential to host gold mineralisation.

Mick Billing, Executive Chairman of Thor Mining, commented:

"It is very exciting to see the interpretation of airborne magnetic data helping to explain the occurrence of, what appears to be, significant gold mineralisation at the Sterling Prospect, at Ragged Range."

"The Sterling Prospect appears to be a target of some substance, with a strike length of up to five kilometres, and multiple anomalous stream sediment gold assays. Next steps will consist of detailed soil sampling over this, with reconnaissance soil sampling over the other shallow magnetic anomalies."

"The simple thrust model for quartz-carbonate veins hosting significant gold mineralisation at the Sterling Prospect makes a compelling target for drilling early in 2021."

10 Dec 2020

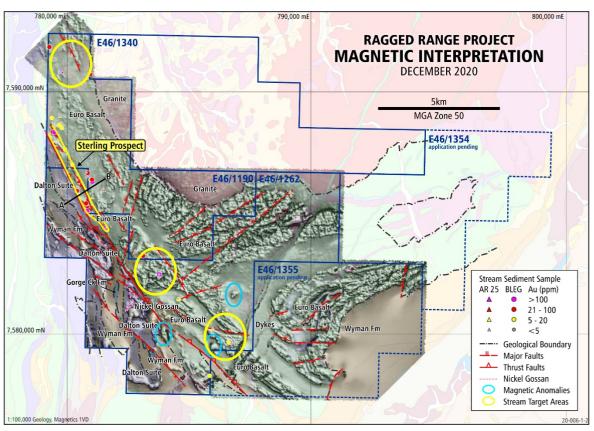


Figure 1: Ragged Range 1VD magnetics over Geology with stream anomalies

Ragged Range Project, located in the highly prospective Eastern Pilbara Craton, WA (Figure 2) is 100% owned by Thor Mining - E46/1190, E46/1262, E46/1355 (application), with the recent acquisition of additional tenure surrounding the gold anomalous zones, E46/1340 and E46/1354 (application).

Further to the announcement of 6 October 2020, the high-resolution airborne magnetics survey was flown by MAGSPEC Airborne Surveys Pty Ltd on close spaced 40m traverses, totalling 3,088-line kilometres. The flight lines were oriented perpendicular (045°) to prospective stratigraphic and structural controls in the project area. The survey was flown over E46/1190, E26/1262 and E46/1355 with the recently purchased Greatland Gold PLC airborne magnetics data 'stitched' into the raw data set.

https://www.thormining.com/sites/thormining/media/pdf/asx-announcements/20201006-asx-mag-survey.pdf

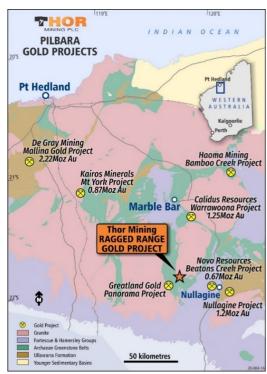


Figure 2: Project Location Map

7HOR

10 Dec 2020

Detailed Geological Interpretation

The following information is taken from the Geological Survey of Western Australia (GSWA), Split Rock 1:100,000 geology notes:

Corunna Downs Batholith Is a large granitoid body (Intruded around 3000Ma). *On the geological map (figures 1 & 4) it is coloured pink.*

Running NNE across the magnetic images are a series of dykes. These dykes are post Euro Basalt but pre the major thrust zone. They have a high K response suggesting they could be felsic rather than mafic. On the geological map they are coloured light green.

The **Gorge Creek Group** (~2950Ma) crops out in the centre of two narrow N/S striking synclines. It is a mixed sedimentary/banded iron-formation, unit. *On the geological map it is coloured blue*.

The **Dalton Suite** (3070-3060Ma) is an ultramafic unit with pyroxene-hornblende gabbro, metadunite, metaperidotite, serpentinite and minor komatiite. It has a very strong magnetic response, using all magnetic filters. *On the geological map it is coloured dark blue, dark green and purple.*

The Euro Basalt is overlain by the **Wyman Formation** (3325-3315Ma), a more felsic unit with felsic volcanics and interlayered sandstone, minor ironstone, chert and felsic schist. This unit has a uniform, low magnetic response in the 1VD. *On the geological map it is coloured light orange.*

The oldest unit on the map sheet is the prospective **Euro Basalt** (3335-3350Ma); predominantly a tholeiitic basalt with pillow lavas and minor komatiitic basalt, schist, chert and amphibolite. It has distinctive stippled magnetic response and major folds can be easily traced in the 1VD. *On the geological map it is coloured medium green.*

The initial airborne magnetic interpretation was completed using a 1st vertical derivative (1VD) of the data to enhance shallow, structural features. This was overlain on a simplified GSWA 1:100k geological map. Structural features such as an interpreted thrust, major faults and geological boundaries can then be interpreted and plotted. Other images using different geophysical filters along with the radiometric data were also investigated. Onto these images a thematic map of the stream sediment sample results has then been plotted to show the geological location of the anomalies.

Figure 3 is a simplified cross section (shown as A-B on Figure 1) that illustrates a simplified structural model for gold mineralisation at the Sterling Prospect. The Sterling Prospect is about five kilometres long and around 300m to 500m wide. Gold values increase upstream in both the BLEG and < 2mm, AR25 stream sediments, towards the contact. Interestingly, Thor reports no anomalous gold in streams to the west of this contact, in the ultramafic Dalton Suite. This model is preliminary, providing an explanation for the location of the stream sediment gold anomalies, close to the Euro Basalt and Dalton Suite contact. In the hanging wall (Eastern Side) of the thrust, space will be created during thrusting, allowing quartz veining to form, potentially with gold mineralisation. This preliminary model will certainly improve once drilling commences at the Sterling Prospect.



10 Dec 2020

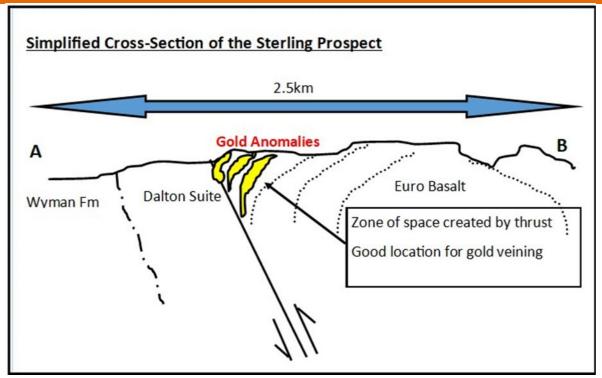


Figure 3: Sterling Prospect-Simplified Cross-section (vertical scale enhanced)

Three circles are shown covering magnetic anomalies seen in the 1VD magnetic image (Figure 1). These do not appear to have any reasonable geological explanation. They are also shown on Figure 4, an image that uses an Analytic Signal of the Vertical Integral (ASVI) filter. ASVI is a processing method for potential-field data, also called the total gradient method. It is used for defining the location and depth of edges of magnetic anomalies. In this image, the anomalies are quite distinct and will be investigated at the earliest opportunity.

The nickel gossan reported in ASX: (26 Aug 2020) and (6 Oct 2020), is located towards the base of the Dalton Suite, close to the Wyman Formation. Follow-up soil sampling will target the weak magnetic anomalies that extend beyond the outcropping gossan. https://www.thormining.com/sites/thormining/media/pdf/asx-announcements/20200826-pilbara-goldfields-encouraging-nickel-assay-results.pdf

 $\frac{https://www.thormining.com/sites/thormining/media/pdf/asx-announcements/20201006-asx-magsurvey.pdf}{}$

7HOR

10 Dec 2020

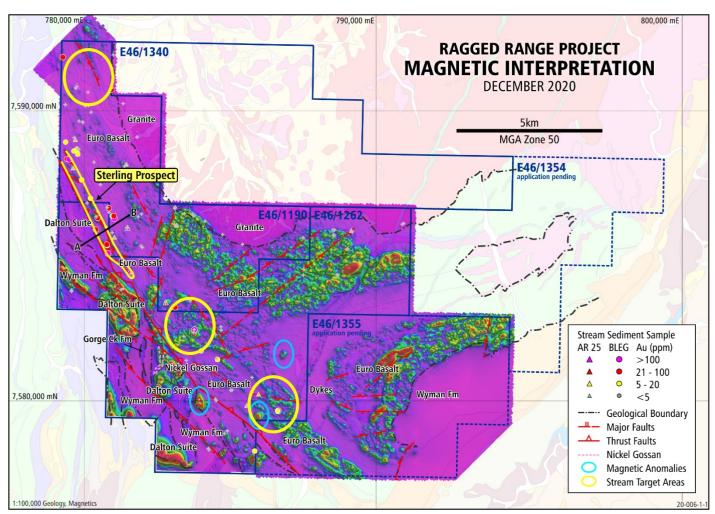


Figure 4: Analytical Signal of the Vertical Intergra I(ASVI) image over Geology

Authorised by Mick Billing, Chairman and Chief Executive officer. For further information, please contact:

THOR MINING PLC

Mick Billing, Executive Chairman +61 8 7324 1935

Updates on the Company's activities are regularly posted on Thor's website www.thormining.com, which includes a facility to register to receive these updates by email, and on the Company's twitter page @ThorMining.

Competent Persons Report

The information in this report that relates to exploration results is based on information compiled by Nicole Galloway Warland, who holds a BSc Applied Geology (Hons) and who is a Member of The Australian Institute of Geoscientists. Ms Galloway Warland is an employee of Thor Mining PLC. She has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which she 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'. Nicole



10 Dec 2020

Galloway Warland consents to the inclusion in the report of the matters based on her information in the form and context in which it appears.

The information in this report that relates to the airborne magnetic interpretation is based on information compiled by Mark McGeough, who holds a BSc Geology/Geography (Dual Hons) and who is a Fellow of The Australasian Institute of Mining and Metallurgy. Mark McGeough is a director of Thor Mining PLC. He has sufficient experience which is relevant to the interpretation of this 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'. Mark McGeough consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

Geophysical data processing and filters were generated by consultant geophysicist Riaan Mouton, Applied Scientific Services and Technology Pty Ltd.

About Thor Mining PLC

Thor Mining PLC (AIM, ASX: THR) is a resources company quoted on the AIM Market of the London Stock Exchange and on ASX in Australia.

At the 100% owned Ragged Range Project in the Pilbara region of Western Australia, Thor has exciting early-stage results for which gold and nickel drilling is being planned."

Thor also holds a 30% interest in Australian copper development company EnviroCopper Limited, which in turn holds rights to earn up to a 75% interest in the mineral rights and claims over the resource on the portion of the historic Kapunda copper mine in South Australia recoverable by way of in situ recovery. EnviroCopper also holds rights to earn a 75% interest in portion of the Alford West copper project also in South Australia, and is also considered amenable to recovery by way of in situ recovery.

Thor is earning an 80% interest in the Alford East copper project, on South Australia's Yorke Peninsula, where significant historical copper mineralisation is considered amenable to insitu recovery production.

Thor holds 100% of the advanced Molyhil tungsten project in the Northern Territory of Australia, for which an updated feasibility study in August 2018¹ suggested attractive returns.

Adjacent Molyhil, at Bonya, Thor holds a 40% interest in deposits of tungsten, copper, and vanadium, including Inferred resource estimates for the Bonya copper deposit, and the White Violet and Samarkand tungsten deposits².

Thor holds 100% of the Pilot Mountain tungsten project in Nevada USA which has a JORC 2012 Indicated and Inferred Resources Estimate³ on 2 of the 4 known deposits.

Thor holds mineral claims in the US states of Colorado and Utah with historical high grade uranium and vanadium drilling and production results.

Notes

- ¹ Refer ASX and AIM announcement of 23 August 2018
- ² Refer ASX and AIM announcement of 26 November 2018, and 29 January 2020
- ³ Refer AIM announcement of 13 December 2018 and ASX announcement of 14 December 2018
- ⁴ Refer AIM announcement of 10 February 2016 and ASX announcement of 12 February 2018
- ⁵ Refer ASX and AIM announcement of 15 August 2019

10 Dec 2020



1 JORC Code, 2012 Edition – Table 1 report template

Section 1 Sampling Techniques and Data

Criteria	JORC Code explanation	Commentary
Sampling techniques	 Nature and quality of sampling (eg cut channels, random chips, or specific specialised industry standard measurement tools appropriate to the minerals under investigation, such as down hole gamma sondes, or handheld XRF instruments, etc). These examples should not be taken as limiting the broad meaning of sampling. Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used. Aspects of the determination of mineralisation that are Material to the Public Report. In cases where 'industry standard' work has been done this would be relatively simple (eg 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (eg submarine nodules) may warrant disclosure of detailed information. 	Airborne magnetics survey flown by Magpsec Airborne Surveys 40m x40m traverse line spacing oriented at 045°, totalling 3,088-line kilometres. Survey Instruments: Magnetometers: Model/type- G-823A caesium Gammas-Ray Spectrometer RSI RS-500 gamma-ray spectrometer with 2x RSX-4 detector packs Altimeters Bendix/King KRA 405 radar altimeters. Reinshaw ILM-500R laser altimeter Magnetic Base Station GEM GSM-19 Overhauser & Scintrex Envi-Mag proton precession base station
Drilling techniques	 Drill type (eg core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (eg core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc). 	Not applicable
Drill sample recovery	 Method of recording and assessing core and chip sample recoveries and results assessed. Measures taken to maximise sample recovery and ensure representative nature of the samples. Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material. 	Not applicable
Logging	 Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies. Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography. The total length and percentage of the relevant intersections logged. 	No logging was undertaken



10 Dec 2020

Sub-	
sampling	
techniques	
and sample	
preparation	

- If core, whether cut or sawn and whether quarter, half or all core taken.
- If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.
 For all sample types, the nature, quality and appropriateness of the sample preparation technique.
- Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.
- Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling.
- Whether sample sizes are appropriate to the grain size of the material being sampled.

High speed digital data acquisition system; sample rate up to 20hz 40m traverse spacing is appropriate for close spaced high-resolution data MapInfo images created by Riaan Mouton Director of ASST Australia

Quality of assay data and laboratory tests

- The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.
- For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc.
- Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established.

Magnetometers:

- Model/type- G-823A caesium vapour magnetometer.
- Resolution 0.001nT
- Sensitivity 0.01nT
- Sample Rate 20Hz (3.5m)
- Compensation 3-axis fluxgate

Gammas-Ray Spectrometer

 RSI RS-500 gamma-ray spectrometer with 2x RSX-4 detector packs

Altimeters

- Bendix/King KRA 405 radar altimeters.
- Reinshaw ILM-500R laser altimeter

Magnetic Base Station

- GEM GSM-19 Overhauser & Scintrex Envi-Mag proton precession base station
- GEMGSM-19 sampling at 1sec was all for all correction

Verification of sampling and assaying

- The verification of significant intersections by either independent or alternative company personnel.
- The use of twinned holes.
- Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.
- Discuss any adjustment to assay data.

All data electronically stored with peer review of QAQC and data processing. Field checks at the end of each flight with pilot monitoring equipment in air.



10 Dec 2020

Location of data points	 Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation. Specification of the grid system used. Quality and adequacy of topographic control. 	High speed data acquisition system sampling up to 20Hz, Integrated Novatel OEM 719 DGPS receiver: L1/L2 + GLONASS Multi Frequency 555-channel GPS accuracy test performed every 5minutes whilst aircraft static. All readings (X,Y,Z) with 2meters
Data spacing and distribution	 Data spacing for reporting of Exploration Results. Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied. Whether sample compositing has been applied. 	Flight lines were on 40m spaced traverses at 045degrees across E46/1190, E46/1262 and E46/1355. Sensor height 40m, with a total of 3088line kms
Orientation of data in relation to geological structure	 Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type. If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material. 	Flight lines were oriented NE- SW (045degrees), perpendicular to know geological contacts and structures.
Sample security	The measures taken to ensure sample security.	Survey data was transferred from acquisition system to infield data processing computer at the end of each flight. Verified data uploaded to MAGSPEC for processing and peer review.
Audits or reviews	The results of any audits or reviews of sampling technique and data.	Data collection, processing, QAQC and modelling protocols align with industry best practice. Raw data was peer reviewed prior to processing and filters applied.

Section 2 Reporting of Exploration Results

1.1

Criteria	JORC Code explanation	Commentary
Mineral tenement and land tenure status	 Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings. The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area. 	Airborne magnetics data was collected on E46/1190, E46/1262 & E46/1355, in Western Australia held 100% by Thor Mining PLC.



10 Dec 2020

Exploration done by other parties	 Acknowledgment and appraisal of exploration by other parties. 	Magnetic data purchased from Greatlands PLC over small section of tenure was stitched into processed data. Great southern have undertaken stream sediment programs over tenure.
Geology	Deposit type, geological setting and style of mineralisation.	Archaean greenstone-granite terrain. Exploring for Archaean lode gold and shear hosted gold style mineralization plus VHMS copper-base metal mineralization.
Drill hole Information	 A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes: easting and northing of the drill hole collar elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar dip and azimuth of the hole down hole length and interception depth hole length. If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from the understanding of the report, the Competent Person should clearly explain why this is the case. 	No drilling has been undertaken or reported
Data aggregation methods	 In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut-off grades are usually Material and should be stated. Where aggregate intercepts incorporate short lengths of high grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail. The assumptions used for any reporting of metal equivalent values should be clearly stated. 	Only airborne magnetics data is reported. There has been no data aggregation. Standard geophysical filters applied to data.
Relationship between mineralisation widths and intercept lengths	 These relationships are particularly important in the reporting of Exploration Results. If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported. If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (eg 'down hole length, true width not known'). 	No drilling has been undertaken or reported
Diagrams	 Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported These should include, but not be limited to a plan view of drill hole collar locations and appropriate sectional views. 	Interpretation is overlain on magnetic images with simplified WAGS 1:100k Geology below. Stream sediment samples are thematically plotted



10 Dec 2020

Balanced reporting	 Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results. 	All results have been reported
Other substantive exploration data	Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances.	All data have been reported
Further work	 The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step- out drilling). Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive. 	Follow up stream sediment and/or soil geochemistry surveys in conjunction with geological mapping and rock chip sampling programs will be undertaken to locate the source of any gold mineralisation and to delineate drill targets.