

ASX Announcement

21 February 2022



Great Western
EXPLORATION

Thunder Assay Results Received

Summary

- Assay results have now been received from the maiden RC drill programme at the Thunder Copper-Gold Target, located 45km west northwest of Wiluna, WA
- Drilling at Thunder intersected a mix of weathered and fresh shales and siltstones with broad zones of disseminated sulphides
- Minor zones of shallow anomalous copper and silver only have been reported
- Drill planning for an RC programme at the Yandal West Project to test all six priority one VMS or sulphide associated lode gold targets is now well progressed, with drilling planned for the first half of CY2022

Thunder Copper-Gold Target (100% Great Western)

Assay results have now been received from Great Western's (ASX: GTE) ("Great Western" or "the Company") maiden RC drilling programme undertaken at the Thunder Copper-Gold Target in December 2021.

The Thunder Gold Target is located within the southern portion of the Yerrida Basin and is approximately 45km west northwest of Wiluna (Figure 1).

The drilling at Thunder intersected broad zones of hematite and silica pyrite alteration ("alteration") within a package of shales and siltstones.

The drilling did not intersect ore grade material, only minor anomalous copper and silver at shallow depths (<50m) associated with a sequence of partially oxidised and altered black shales and siltstones. The minor anomalous silver (Ag) and copper (Cu) includes 1m @ 2.4g/t Ag from 23m and 1m @ 0.19% Cu from 40m in GTHR001, 2m @ 5.15g/t Ag from 10m in GTHR0006 and 1m @ 2.6g/t Ag from 13m in GTHR010 (see Appendix 2).



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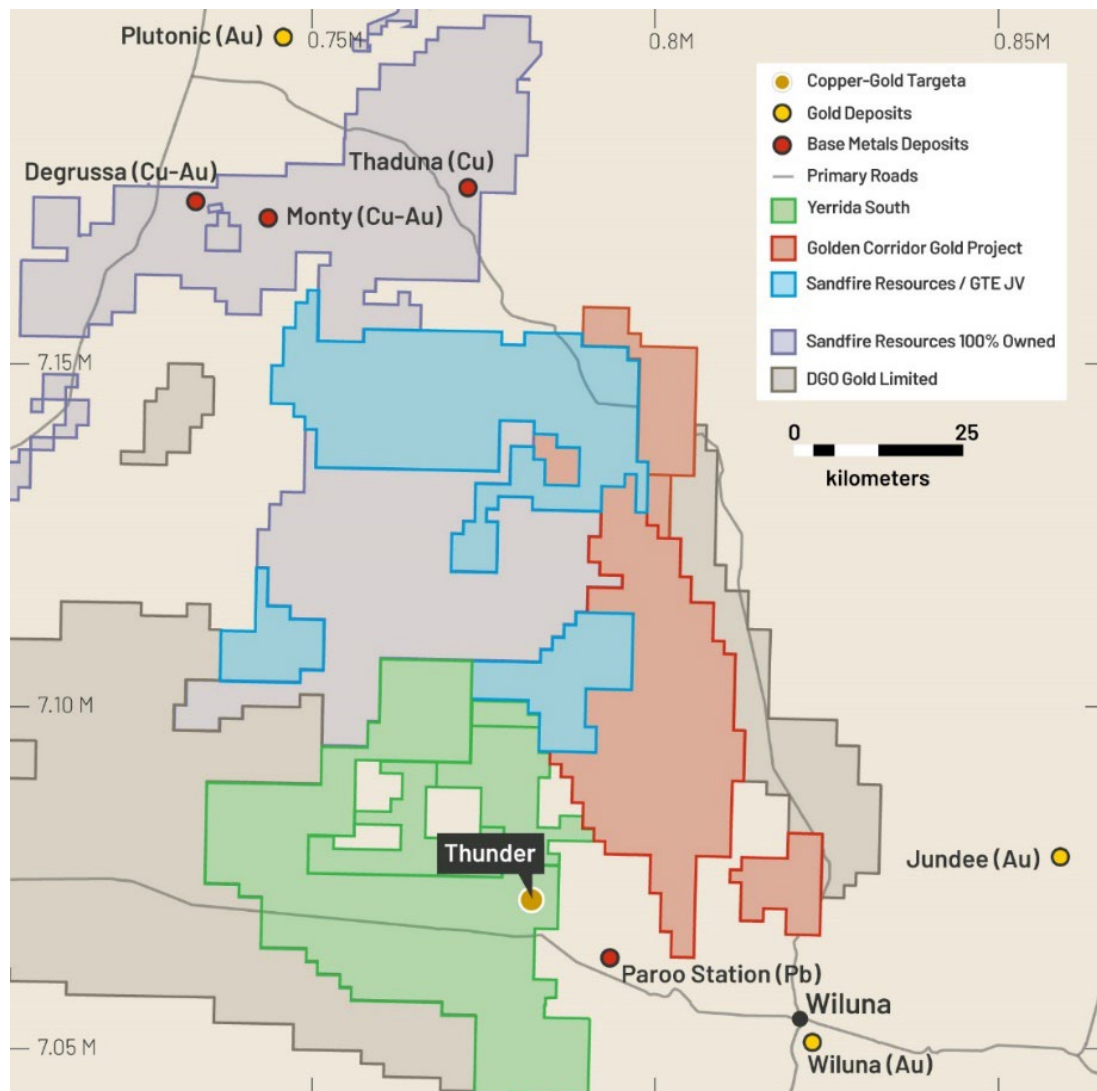


Figure 1: Location of the Thunder Copper-Gold Target.

Yandal West Project (GTE 100% E53/1369, GTE 80% E53/1612 & E53/1816)

The Yandal West Project is located within the world class Yandal greenstone belt, approximately 55km north of the Bronzewing gold deposit and 60km south of the Jundee gold mine, GTE 100% (E53/1369) and GTE 80% (E53/1612 & E53/1816).

During the December 2021 Quarter, six high priority EM anomalies were defined by Great Western and its consultants Newexco from the Xcite™ helicopter time-domain electromagnetic (HTDEM) survey (refer Great Western announcement dated 25 October 2021²).

The high priority EM anomalies (See **Figure 2**) have a geophysical signature that is consistent with an accumulation of sulphides. The anomalies sit within a regional volcanic succession that includes basalts, high mg basalts, ultramafics, felsic volcanics and cherts, proximal to HFSE granites, are shallow (<55m below surface), and are both conspicuous and discrete.

The six high priority EM anomalies are very exciting potential VMS or sulphide associated lode gold targets, which are drill ready.

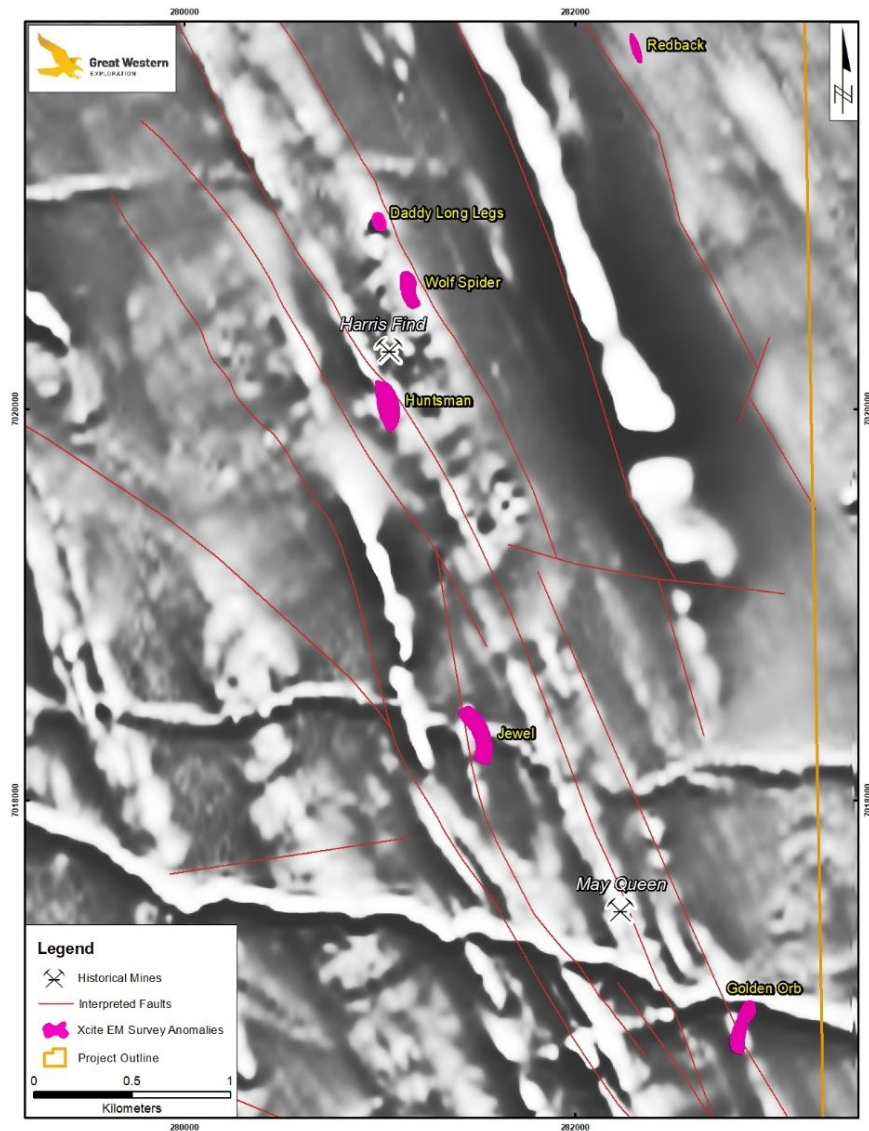


Figure 2: Location of Six High Priority EM anomalies and Historic Gold Mines over TMI 1st VD at the Yandal West Project.

Drill planning for an RC programme at the Yandal West Project to test all six priority one targets is now well progressed, with drilling planned for the first half of CY2022.

Great Western is also progressing a number of field work programmes across areas of the Company's substantial tenure in Western Australia that the Company is confident will result in a greater understanding of a number of areas of interest, enhanced prospects, and drill ready targets. This work includes:

- Soil and lag sampling at a number of areas considered prospective for copper, nickel and/or gold;
- Ground and airborne geophysical surveys across numerous projects; and
- A geophysical review of existing data and a targeting report is underway by Great Western's consultants Newexco across a number of the Company's Project areas.

2022 will be a busy year of drilling for Great Western and the Company looks forward to updating shareholders as activities progress.

The Company remains well funded to progress its exploration efforts.

Authorised for release by the board of directors of Great Western Exploration Limited.

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Competent Person Statement

The information in this report that relates to Exploration Results, Mineral Resources or Ore Reserves is based on information compiled by Mr. Thomas Ridges who is a member of the Australian Institute of Mining and Metallurgy. Mr. Thomas Ridges is an employee of Great Western Exploration Limited and 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. Ridges consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

Appendix 1. Drill Plan

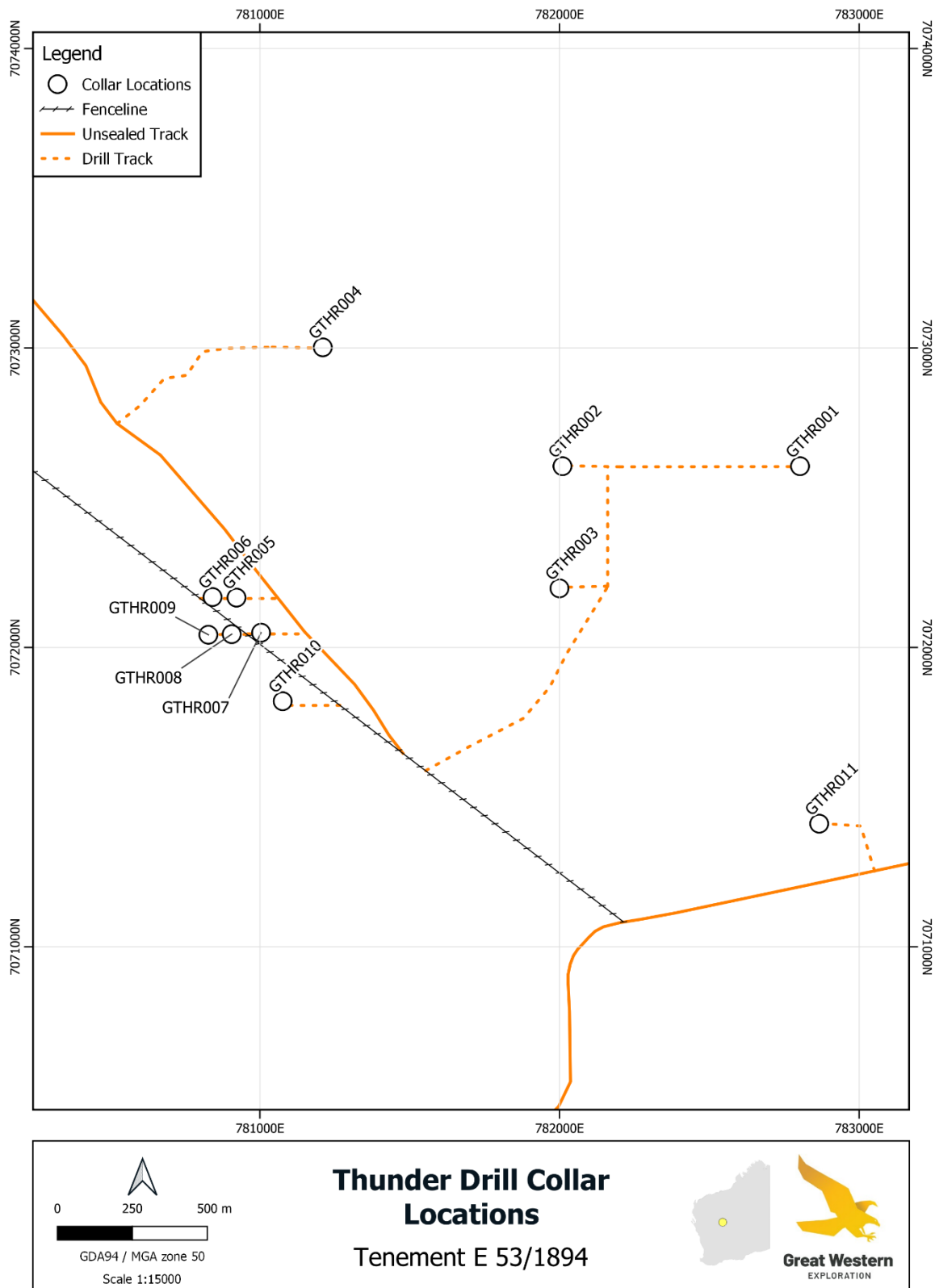


Figure 4. Drill Hole Locations – Thunder RC Drilling.

Appendix 2. Drill Results Summary Table

Hole ID	Easting (MGAZ50)	Northing (MGAZ50)	Elevation RL	Hole Depth (m)	Azimuth (degrees)	Dip (degrees)	from depth (m)	to depth (m)	interval length (m)	Anomalous Results				Comments
										Ag (ppm)	Au (ppm)	Co (ppm)	Cu (%)	
GTHR001	782803	7072605	539.8	120	90	-60	23	24	1	2.4	BD	16	0.02	Heavily oxidised black shale at base of saprolite.
							40	41	1	0.2	0.02	<1	0.19	Black shale moderate-strong iron oxide alteration at weathering boundary.
GTHR002	782010	7072605	536.4	120	90	-60								No significant intercepts
GTHR003	782000	7072197	533.9	120	90	-60								No significant intercepts
GTHR004	781210	7073002	537.0	120	90	-60								No significant intercepts
GTHR005	780922	7072166	530.6	102	90	-60								No significant intercepts
GTHR006	780842	7072168	530.3	180	90	-60	10	12	2	5.15	BD	9	0.01	Heavily oxidised black shale at base of saprolite.
GTHR007	781004	7072049	530.5	108	90	-60								No significant intercepts
GTHR008	780906	7072044	530.1	120	90	-60								No significant intercepts
GTHR009	780828	7072042	529.9	180	90	-60								No significant intercepts
GTHR010	781076	7071820	529.6	162	90	-60	13	14	1	2.6	0.05	1	0.02	Heavily oxidised black shale at base of saprolite.
GTHR011	782867	7071411	530.9	120	90	-60								No significant intercepts

*BD – Below detection limit

Appendix 3.

JORC Code, 2012 Edition (Table 1) – Thunder RC exploration drilling

Section 1 Sampling Techniques and Data

(Criteria in this section apply to all succeeding sections.)

Criteria	JORC Code explanation	Commentary
Sampling techniques	<ul style="list-style-type: none"> <i>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.</i> <i>Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.</i> <i>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.</i> 	<ul style="list-style-type: none"> Reverse circulation (RC) drilling was used to obtain 1 m samples from which geological logging and sampling was completed. The details of these drill holes are within Appendix 1. Collar locations were recorded with a handheld GPS (+/- 5m accuracy) by the site geologist. Downhole surveys were conducted using a North-seeking Reflex gyroscope, which is unaffected by country rock magnetism. Downhole surveys were taken every 10m. Sample duplicates were taken every metre and analysed at the discretion of the site geologist. Drillholes were sampled in their entirety either on a per metre basis, or as a 4m composite sample, at the discretion of the site geologist. Sample submission weights averaged 2.0 – 2.5 kg. These samples were delivered to the laboratory (ALS Perth) where they were dried, weighed, and pulverised to produce representative pulps from which a 30g charge was taken for fire assay, and 0.5g for aqua-regia analysis.
Drilling techniques	<ul style="list-style-type: none"> <i>Drill type (eg core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (eg core diameter, triple</i> 	<ul style="list-style-type: none"> Reverse circulation drillholes were completed at a standard RC drilling diameter of 5.5" using a face sampling bit. GTE contracted Hagstrom Drilling to complete the drill

Criteria	JORC Code explanation	Commentary
	<i>or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc).</i>	programme.
Drill sample recovery	<ul style="list-style-type: none"> • <i>Method of recording and assessing core and chip sample recoveries and results assessed.</i> • <i>Measures taken to maximise sample recovery and ensure representative nature of the samples.</i> • <i>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.</i> 	<ul style="list-style-type: none"> • Sample recovery, moisture and contamination was visually assessed on a per metre basis and recorded by the site geologist. • RC drilling was conducted to maximise sample recovery. Sample recovery was high. • There is no apparent relationship between sample recovery and grade bias.
Logging	<ul style="list-style-type: none"> • <i>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.</i> • <i>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</i> • <i>The total length and percentage of the relevant intersections logged.</i> 	<ul style="list-style-type: none"> • Each RC sample has been sieved (wet and dry), and regolith, lithology, structure, veining, alteration, and mineralisation recorded. Drillhole logging data has been recorded within a database by GTE. • Logging is qualitative. Chip-trays have been stored and photos taken for future reference. • All drillholes (100%) were geologically logged on site by a qualified geologist. Logging was on a 1m scale.
Sub-sampling techniques and sample preparation	<ul style="list-style-type: none"> • <i>If core, whether cut or sawn and whether quarter, half or all core taken.</i> • <i>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.</i> • <i>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</i> • <i>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</i> • <i>Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field</i> 	<ul style="list-style-type: none"> • Representative RC sub-samples were produced using a rig mounted cyclone and cone splitter. Samples were mostly dry. • The RC sampling performed is an appropriate method for gold and base metal exploration. • Before each drillhole the cyclone and cone splitter has been inspected for damage, cleanliness, and correct set-up. The cyclone was cleaned with compressed air between (6m) drill runs. • Duplicate samples were collected every metre from a second chute on the cone splitter but were not regularly assessed. The original and duplicate samples assessed show good repeatability. • Sample sizes averaged 2.0 – 2.5kg. This sample size is appropriate for the Proterozoic

Criteria	JORC Code explanation	Commentary
	<p><i>duplicate/second-half sampling.</i></p> <ul style="list-style-type: none"> Whether sample sizes are appropriate to the grain size of the material being sampled. 	<p>gold and base metal mineralisation.</p>
Quality of assay data and laboratory tests	<ul style="list-style-type: none"> 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 (i.e. lack of bias) and precision have been established. 	<ul style="list-style-type: none"> Samples were assessed by ALS Perth (WA) using two analysis techniques <ul style="list-style-type: none"> ME-ICP41 multielement analysis: 0.5g analysed using Aqua Regia digestion with ICP-AES (inductively coupled plasma – atomic emission spectrometry). Aqua Regia Digest is industry standard but is not a full digest. Au-AA25 for Au: 30g sub-sample taken and analysed via fire assay with AAS (atomic absorption spectrometry) finish. <p>Al, Ca, Fe, K, Mg, Na, S & Ti were reported in percent (%) all other analytes reported in parts per million (ppm). The elements assayed were: Au, Ag, Al, As, B, Ba, Be, Bi, Ca, Cd, Co, Cr, Cu, Fe, Ga, Hg, K, La, Li, Mg, Mn, Mo, Na, Ni, P, Pb, S, Sb, Sc, Sr, Th, Ti, Tl, U, V, W & Zn.</p> <ul style="list-style-type: none"> No geophysical tools have been used. Field introduced standards have been used at a rate of 1:25. These are either CRMs or blanks. Acceptable levels of accuracy and precision has been demonstrated and no bias noted. Internal laboratory QAQC protocols have also been relied upon to assess the quality of the data. This has also been reviewed by GTE and deemed acceptable.
Verification of sampling and assaying	<ul style="list-style-type: none"> 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. 	<ul style="list-style-type: none"> Notable / anomalous intercepts are shown in Appendix 2. These results have been verified internally by alternative Company personnel. No twinned holes were completed. Data is backed up regularly in off-site secure servers. No adjustments have been made to assay data.
Location of data points	<ul style="list-style-type: none"> 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. 	<ul style="list-style-type: none"> Drill hole collars have been located using a handheld GPS with +/- 5m accuracy in plan. This accuracy is acceptable for exploration drilling. Downhole surveys have been conducted using a Reflex gyroscope. Grid: UTM, Datum: MGA94, Zone: 50S Drill hole collar elevations have been assigned using the GSA SRTM digital elevation data.

Criteria	JORC Code explanation	Commentary
Data spacing and distribution	<ul style="list-style-type: none"> • <i>Data spacing for reporting of Exploration Results.</i> • <i>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.</i> • <i>Whether sample compositing has been applied.</i> 	<ul style="list-style-type: none"> • Drilling has been completed on an 80m (E-W) x 120m (N-S) grid when targeting the MLEM geophysical target. Broad spaced reconnaissance exploration drilling targeting various geochemical anomalies is not on a specific grid. Exploration drill hole collar locations are shown in Appendix 1. • Drill spacing is for exploration purposes and not at a sufficient density for Resource Estimation or Ore Reserves Estimation. • Where required intervals have been composited into 4m samples by GTE field staff. These composites have been compiled using either 'spear' or 'scoop' sampling methods.
Orientation of data in relation to geological structure	<ul style="list-style-type: none"> • <i>Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.</i> • <i>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.</i> 	<ul style="list-style-type: none"> • Drilling has been completed perpendicular to the modelled MLEM target anomaly and mapped bedding to achieve unbiased sampling. • Minor mineralisation has been noted and appears associated with the stratigraphy and oxidisation/alteration. The drill orientation has therefore not introduced any sampling bias. The drill data density is not sufficient to determine any other geological structures.
Sample security	<ul style="list-style-type: none"> • <i>The measures taken to ensure sample security.</i> 	<ul style="list-style-type: none"> • GTE staff manage the chain-of-sample custody. Samples are securely packed on site and delivered to a commercial freight carrier to deliver to the laboratory (ALS Perth, WA) for analysis.
Audits or reviews	<ul style="list-style-type: none"> • <i>The results of any audits or reviews of sampling techniques and data.</i> 	<ul style="list-style-type: none"> • No specific external audits or reviews have been undertaken on the drill data. • The drill data has been reviewed internally by the Senior Exploration Geologist.

Section 2 Reporting of Exploration Results

(Criteria listed in the preceding section also apply to this section.)

Criteria	JORC Code explanation	Commentary
Mineral tenement and land tenure status	<ul style="list-style-type: none"> 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. 	<ul style="list-style-type: none"> Exploration lease E 53/1894 is located 40km west of Wiluna WA. GTE has 100% ownership of the lease. The drilling area is within the Wiluna People's Native Title Claim with whom GTE have an executed Regional Land Access Agreement. The tenement is in good standing.
Exploration done by other parties	<ul style="list-style-type: none"> Acknowledgment and appraisal of exploration by other parties. 	<ul style="list-style-type: none"> Previous exploration within the drilling area is limited. <ul style="list-style-type: none"> 2011: MMI sampling by Emergent Resources Limited was reported in WAMEX reports A91893 & A91898 and details of this historical work was disclosed in Company (GTE.ASX) announcements dated 30/11/2020 – <i>Large Scale Copper-Gold Targets identified at Copper Ridge</i>, and 15/01/2021 - <i>Quarterly Activities Report for the Quarter ended 31 December 2020</i>. Ultrafine+ soil sampling completed by GTE and announced to the market dated 18/05/2021 - <i>New Copper-Gold Target Defined</i>. MLEM survey completed by GTE and announced to the market date 28/07/2021 - <i>Large, Strong EM Anomaly Enhances Prospectivity of Thunder</i>. Large area of historic gold scrapings near to Thunder Target which is thought to be for gold prospecting. There is no public record to confirm this.
Geology	<ul style="list-style-type: none"> Deposit type, geological setting and style of mineralisation. 	<ul style="list-style-type: none"> Supergene Ag/Cu enrichment is noted near to the base of oxidation. Relatively low-level metal anomalism throughout the drill area is related to elevated sulphides within bedding. This suggests some potential for sedimentary-hosted stratiform copper style mineralisation regionally.
Drill hole Information	<ul style="list-style-type: none"> 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: 	<ul style="list-style-type: none"> See Appendix 2 for drill hole details. All drillholes have been included. All material information has been disclosed.

Criteria	JORC Code explanation	Commentary
	<ul style="list-style-type: none"> • 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. 	
Data aggregation methods	<ul style="list-style-type: none"> • 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. 	<ul style="list-style-type: none"> • No weighted averaging techniques used. Material/anomalous results defined as: Au≥0.5ppm, Ag≥2ppm, Co≥350ppm, Cu≥1500ppm or Ni≥800ppm and highlighted in Appendix 2. • Reported intercepts do not incorporate shorter intercepts. • Cu has been converted to percent (%) from ppm in the results table. This was completed by dividing the ppm results by 10,000 within Microsoft excel. • Metal equivalents have not been reported.
Relationship between mineralisation widths and intercept lengths	<ul style="list-style-type: none"> • 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'). 	<ul style="list-style-type: none"> • The Thunder drillholes are drilled -60 degrees to the east. Surface geology mapping from limited outcrop has stratigraphy variably dipping to the west. • Mineralisation is understood to be strata-bound, and where moderately dipping intercepts are close to true width. Where stratigraphy is at a lower angle the intercepts are not considered a true width. • Downhole lengths are reported as the geology is not well enough understood to determine true widths.
Diagrams	<ul style="list-style-type: none"> • Appropriate maps and sections (with scales) 	<ul style="list-style-type: none"> • See Appendix 1 for drill collar locations and Appendix 2 for drill collar co-ordinate and

Criteria	JORC Code explanation	Commentary
	<i>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.</i>	anomalous results. Drill sections are not published as drill holes are too far apart to be meaningful.
Balanced reporting	<ul style="list-style-type: none"> 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. 	<ul style="list-style-type: none"> See Appendix 2 for reportable intercepts. Only intervals with Au \geq 0.5ppm, or Cu \geq 1500ppm, or Ag \geq 2ppm, or Co \geq 350ppm, or Ni \geq 800ppm have been deemed anomalous are published on the Appendix 2 table and within the text of the document in Table 1.
Other substantive exploration data	<ul style="list-style-type: none"> 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. 	<ul style="list-style-type: none"> This drilling was targeting surface geochemistry and MLEM targets previously made public in the following ASX announcements: <ul style="list-style-type: none"> 18/05/2021 - New Copper-Gold Target Defined. 28/07/2021 - Large, Strong EM Anomaly Enhances Prospectivity of Thunder.
Further work	<ul style="list-style-type: none"> 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. 	<ul style="list-style-type: none"> Further work at Thunder may include field mapping, and/or broad scale AC/RC drilling. See main body of announcement for further regional exploration work.