
Exploration Update - Berkshire Valley Ni-Cu-PGE Project

Key Points:

- **Reverse Circulation (RC) drilling program has been completed over previously announced sulphide occurrences and coincident Ni-Cu-PGE geochemical anomalies along the Eastern Trend;**
- **The Moving Loop Electromagnetic (MLTEM) survey has been completed over the Eastern Trend and over a new area in the far north of the Project;**
- **Multi-element analytical results including those for platinum and palladium from the reconnaissance aircore drilling completed before Christmas are still to be received.**

Todd River Resources Limited (**ASX: TRT**) (**Todd River** or the **Company**) provides the following update following the conclusion of its most recent phase of field work at its 100% owned **Berkshire Valley Ni-Cu-PGE Project** in Western Australia (Figure 1).

The work program which commenced in early January 2022 concentrated on both deeper RC drilling of areas that intersected sulphides in shallow reconnaissance aircore drilling and/or where highly anomalous coincident Ni-Cu-PGE soil geochemistry had been identified and broad coverage MLTEM over prospective intrusions (*see ASX announcement 7 January 2022*).

RC drilling at the Mako prospect intersected a mafic intrusion comprised mostly of massive amphibolite with small intervals of serpentinitised ultramafics. The intrusion is estimated to be at least 150m thick, dipping moderately (45°) to the west. The hanging wall contact of the mafic intrusion with granitic gneiss is likely faulted, with the fault dipping shallowly (about 30°) to the west. The intrusion is also in contact with granitic gneiss at the footwall contact, with it dipping more steeply (45-60°) to the west. The shallow faulted hanging wall contact indicates the intrusion may get thicker with depth to the west.

All drillholes at Mako intersected sulphides within the amphibolite, from trace to strongly disseminated (up to 15% sulphides) in intervals up to 60m thick, but predominantly trace with the best quantities of sulphides in the north with less towards the south. Visual logging of the sulphides indicate they are predominately pyrite and pyrrhotite, with trace chalcopyrite observed in some intervals. Sulphide mineralisation is commonly associated with silica +/- sericite +/- epidote alteration. In total thirteen RC holes were drilled into for approximately 2,000m. Table 1 shows the drill collar information for all RC holes drilled during this program and Table 2 describes the visual sulphides recorded in the geological logging.



Table 1 – RC drill hole collar information

Hole ID	Prospect	AMG_East	AMG_North	Collar_Azi	Collar_dip	Depth
BVRC0003	Mako	424574	6632541	90	-70	178
BVRC0004	Mako	424498	6632537	90	-70	184
BVRC0005	Mako	424660	6632541	90	-70	112
BVRC0006	Mako	424650	6632222	90	-70	100
BVRC0007	Mako	424584	6632217	90	-70	140
BVRC0008	Mako	424505	6632221	90	-70	184
BVRC0009	Mako	424440	6631577	90	-70	106
BVRC0010	Mako	424360	6631625	90	-70	160
BVRC0011	Mako	424281	6631603	90	-70	166
BVRC0012	Mako	424141	6631275	90	-70	154
BVRC0013	Mako	424061	6631266	90	-70	154
BVRC0014	Mako	423980	6630947	90	-70	154
BVRC0015	Mako	423897	6630946	90	-70	160
BVRC0016	Catapult	421332	6633722	110	-60	148
BVRC0017	Catapult	421255	6633728	110	-60	154
BVRC0018	Catapult	421186	6633729	110	-60	118
BVRC0019	Yetna	419095	6629500	95	-60	166

Table 2 – Sulphide minerals logged in drill holes BVRC0003-BVRC0016 at the Berkshire Valley Project*

Hole ID	From	To	Length	Sulphide Mineralisation Description
BVRC0003	64	65	1	2-5% disseminated Po-Py
	70	74	4	2-5% disseminated Po-Py
	96	98	2	2-5% disseminated and banded Po-Py
	98	99	1	2-5% disseminated and banded Po-Py
	105	109	4	2-5% disseminated Po-Py
	109	112	3	5-10% disseminated and banded Po-Py
	112	120	8	2-5% disseminated and banded Po-Py trace Cpy
	126	128	2	2-5% disseminated and banded Po-Py trace Cpy
	134	139	5	2-5% disseminated Po-Py
	140	154	14	2-5% disseminated Po-Py trace Cpy
BVRC0004	155	158	3	2-5% disseminated Po-Py trace Cpy
	158	161	3	5-10% disseminated Po-Py trace Cpy
	119	120	1	2-5% disseminated Po-Py
BVRC0005	132	140	8	2-5% disseminated Po-Py
	165	175	10	2-5% disseminated Po-Py trace Cpy
	33	35	2	5-10% disseminated Po-Py
BVRC0005	44	45	1	2-5% disseminated and banded Po-Py trace Cpy
	45	49	4	2-5% disseminated Po-Py trace Cpy
	49	50	1	10-15% disseminated Po-Py trace Cpy
	52	57	5	2-5% disseminated Po-Py trace Cpy



	73	75	2	2-5% disseminated and banded Po-Py
	80	89	9	2-5% disseminated Po-Py
	91	96	5	2-5% disseminated Po-Py
BVRC0006	25	28	3	2-5% disseminated and banded Po-Py
	40	48	8	2-5% disseminated Po-Py trace Cpy
	50	51	1	2-5% disseminated Po-Py
	59	61	2	2-5% disseminated Po-Py trace Cpy
	71	79	8	2-5% disseminated Po-Py trace Cpy
	79	82	3	2-5% disseminated Po-Py
BVRC0007	43	45	2	2-5% disseminated Po-Py
	51	53	2	5-10% disseminated Po-Py
	54	55	1	10-15% disseminated Po-Py
	55	61	6	2-5% disseminated Po-Py
	109	110	1	2-5% disseminated Po-Py
	113	116	3	5-10% disseminated Po-Py
BVRC0008	50	53	3	5-10% disseminated Po-Py
	53	58	5	2-5% disseminated Po-Py
	58	60	2	2-5% disseminated Po-Py
	60	62	2	2-5% disseminated Po-Py
	68	71	3	2-5% disseminated Po-Py
	89	91	2	2-5% disseminated Po-Py
	123	124	1	2-5% disseminated Po-Py
	168	169	1	2-5% disseminated Po-Py
	169	174	5	2-5% disseminated Po-Py
	174	178	4	2-5% disseminated Po-Py
BVRC0009	39	40	1	Trace Po-Py
BVRC0010	51	53	2	2-5% disseminated Po-Py
	53	55	2	5-10% disseminated Po-Py
BVRC0011	58	71	13	2-5% disseminated Po-Py
BVRC0012	67	154	87	Trace Po-Py
BVRC0013	122	127	5	5-10% disseminated Po-Py
	138	143	5	2-5% disseminated Po-Py
BVRC0014	51	52	1	2-5% disseminated Po-Py
	65	67	2	5-10% disseminated Po-Py
	79	80	1	2-5% disseminated Po-Py
	121	122	1	2-5% disseminated Po-Py
BVRC0015	151	154	3	2-5% disseminated Po-Py trace Cpy
BVRC0016	30	31	1	2-5% disseminated and banded Po-Py
	31	33	2	2-5% disseminated and banded Po-Py
	99	103	4	2-5% disseminated Po-Py



	103	109	6	2-5% disseminated Po-Py trace Cpy
Po = pyrrhotite, Py = pyrite, Cpy = Chalcopyrite				

**In relation to the disclosure of visual sulphide minerals, the Company cautions that visual estimates of sulphide content and mineralogy should never be considered a proxy or substitute for laboratory analysis. The Company will update the market when laboratory analytical results become available.*

Concurrently with the RC drilling, a MLTEM survey was completed over 2 parts of the Project, the Eastern Trend and a single intrusion at the northern end of the chain of intrusions. While the MLTEM data clearly showed the margins of the intrusion, there were no bedrock conductors identified in either survey.

Analytical results from the shallow reconnaissance drilling completed before the Christmas break and the recently completed RC drilling program are currently all at the laboratory. Whilst no results have been received to date, several submissions from the RC drilling have been prioritised by the laboratory to ensure results are received as soon as possible to allow for forward planning of follow up work prior to the 2022 grain crop being seeded in mid April.

Next Steps

Following the receipt and interpretation of multi-element analytical results additional work will be planned that will include drilling over the northern magnetic feature, which appears to be a mafic-ultramafic intrusion, as well as follow up work over the Eastern Trend where warranted. Additional land access negotiations are ongoing which are expected to open up additional areas for exploration.

Nerramyne Copper Project

As discussed in *ASX announcement released on 13 July 2021*, the Nerramyne Project covers an 8-10 kilometre wide, 45 kilometre long position along the margin of the Yilgarn Craton where the craton is juxtaposed against the Narryer terrane. A portion of the project area is covered by wind-blown sands and alluvial sediments which potentially mask any surface expression of mineralisation and render simple soil geochemistry unreliable.

The Company has identified at least five magnetic features totalling an area of 40 square kilometres that are interpreted to be mafic/ultramafic intrusive bodies (Figures 3 and 4). Geochemical anomalism in the regional GSWA sampling appears to be associated with these magnetic features, supporting the mafic/ultramafic interpretation.

Towards the end of the March Quarter 2022, the Company will fly a SkyTEM survey over 4 separate areas of the project (Figure 3) to test for the presence of bedrock conductors associated with prospective intrusions. Following the completion of the geophysics, drilling of either bedrock conductors (should any be identified) or geochemical targets will be scheduled with WA state government co-funding under their Exploration Incentive Scheme contributing to the cost of the drilling.

Release authorised by the Board of Todd River Resources

Enquiries: Will Dix + 61 (0) 8 6166 0255

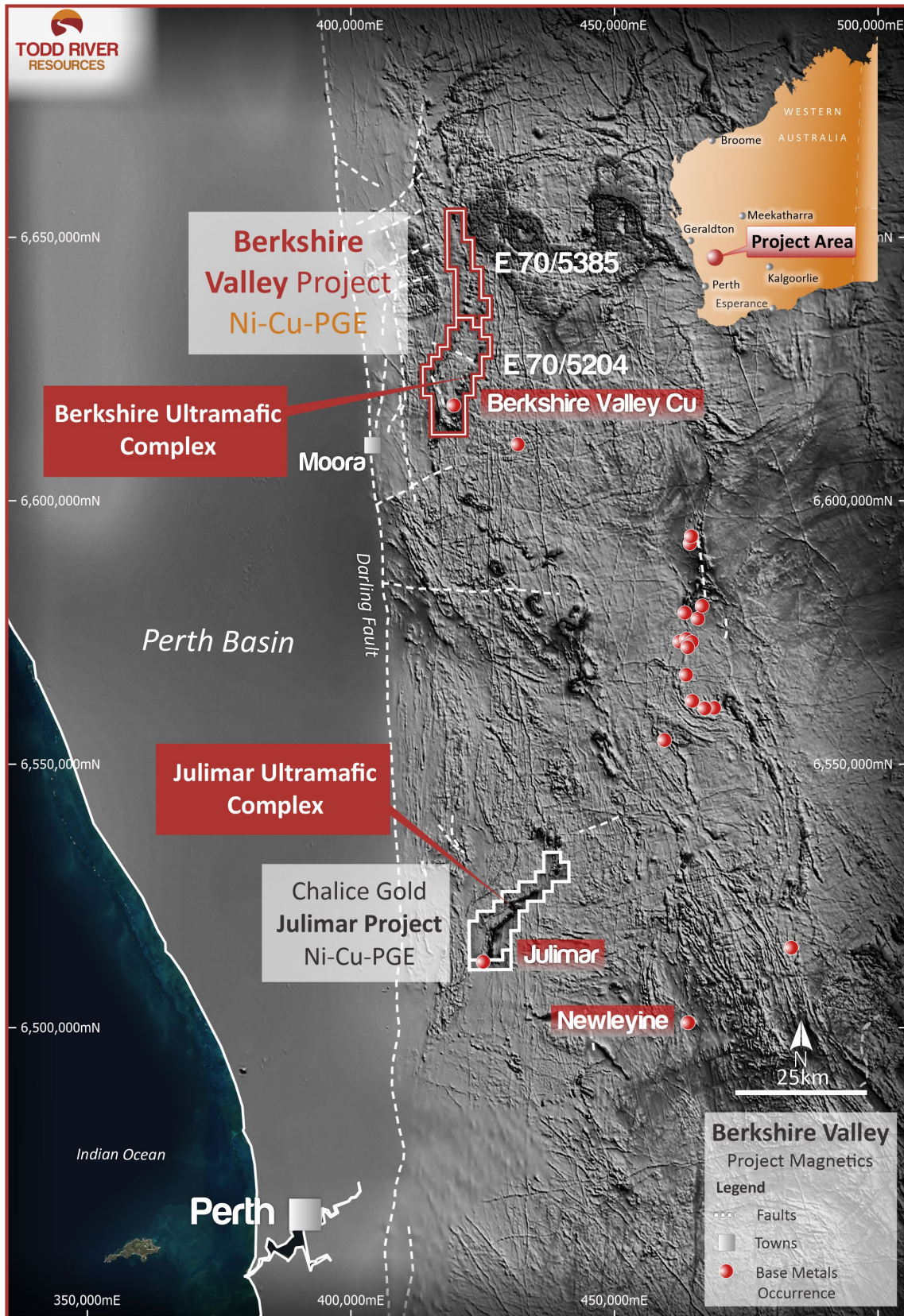


Figure 1 – Berkshire Valley Project Location Map

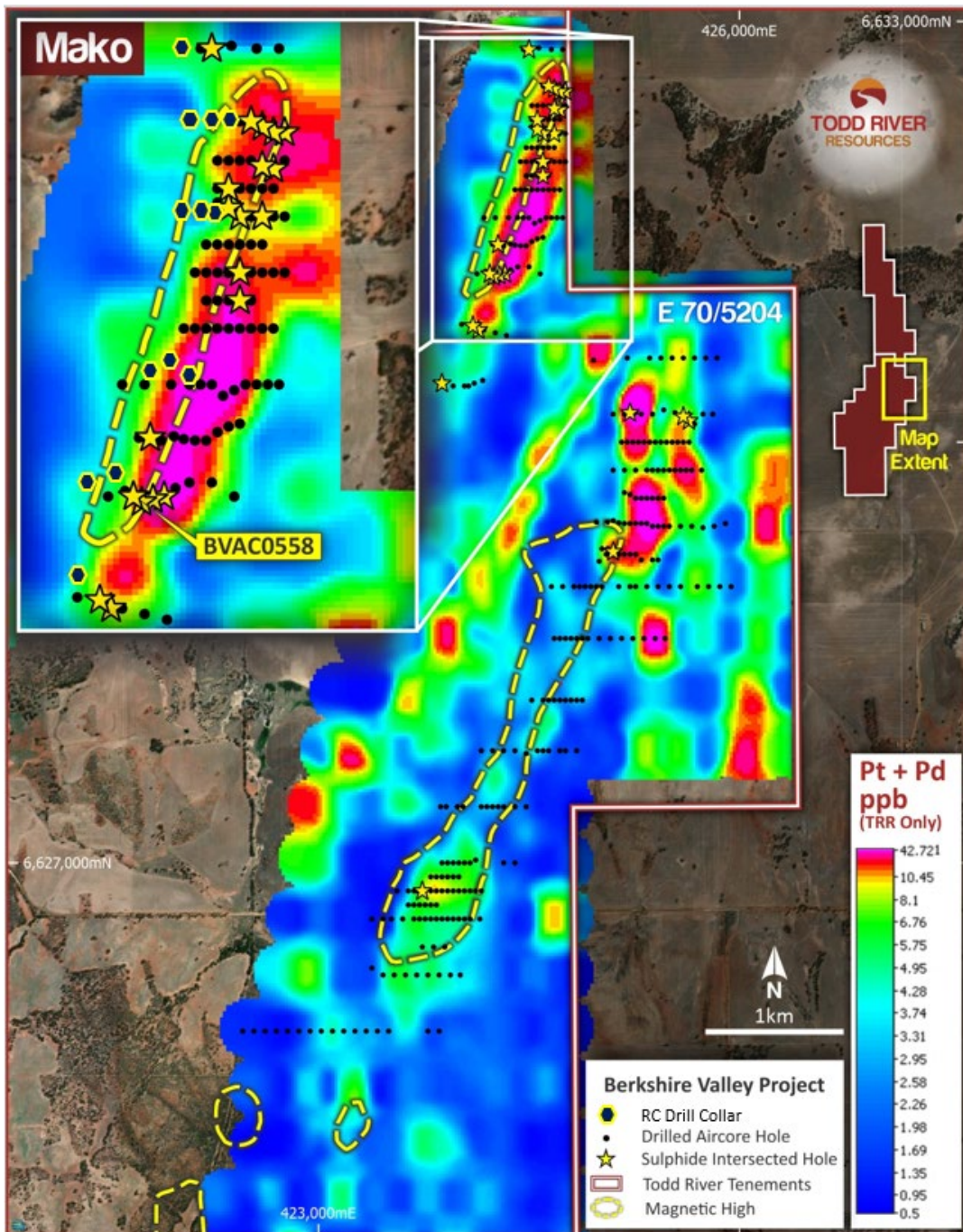


Figure 2 – Berkshire Valley Project showing the location of recently drilled RC holes as well as aircore holes and highlighting those that intersected sulphides over Pt+Pd geochemistry.

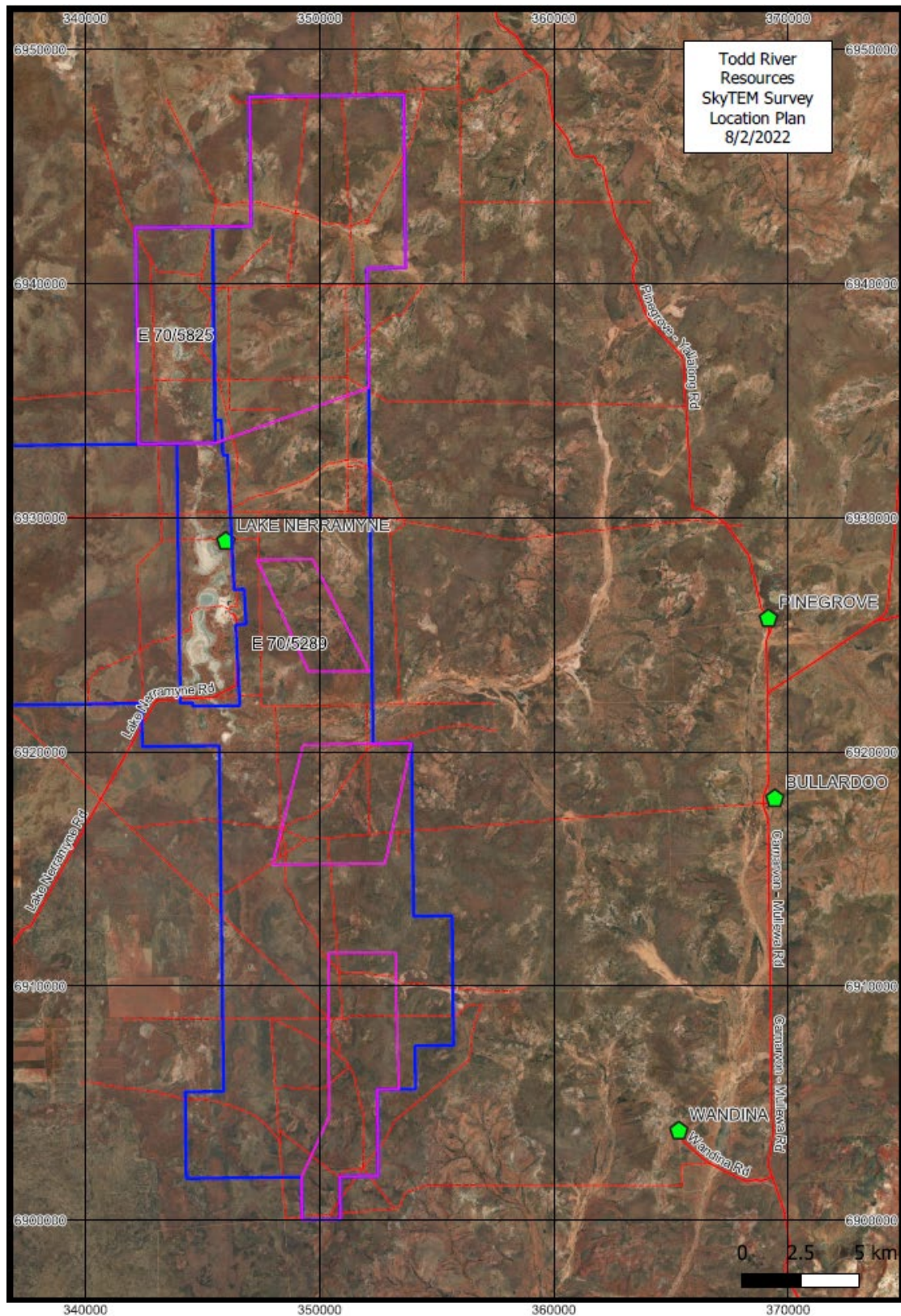


Figure 3 – Areas of planned SkyTEM Survey at the Nerramyne Project



About Todd River Resources

Todd River Resources (ASX: TRT) is an Australian-based resources company that has base and precious metal projects in Western Australia and the Northern Territory. The Company has a base metal resource at its Mt Hardy Project and several exciting Ni-Cu-PGE and base metal projects in Western Australia including Berkshire Valley in the south west Yilgarn.

With a strong management team and tight capital structure, Todd River is well placed to pursue additional base metal opportunities across its extensive exploration portfolio that also includes the large applications in the Bangemall Region of Western Australia.

Forward Looking Statements

This announcement includes forward-looking statements. These statements relate to the Company's expectations, beliefs, intentions or strategies regarding the future. These statements can be identified by the use of words like "will", "progress", "anticipate", "intend", "expect", "may", "seek", "towards", "enable" and similar words or expressions containing same.

The forward-looking statements reflect the Company's views and assumptions with respect to future events as of the date of this announcement and are subject to a variety of unpredictable risks, uncertainties, and other unknowns. Actual and future results and trends could differ materially from those set forth in such statements due to various factors, many of which are beyond our ability to control or predict. Given these uncertainties, no one should place undue reliance on any forward looking statements attributable to the Company, or any of its affiliates or persons acting on its behalf. The Company does not undertake any obligation to update or revise any forward-looking statements, whether as a result of new information, future events or otherwise. Neither the Company nor any other person, gives any representation, warranty, assurance, nor will guarantee that the occurrence of the events expressed or implied in any forward-looking statement will actually occur. To the maximum extent permitted by law, the Company and each of its advisors, affiliates, related bodies corporate, directors, officers, partners, employees and agents disclaim any responsibility for the accuracy or completeness of any forward-looking statements whether as a result of new information, future events or results or otherwise.

Competent Person Statement

The information in this report that relates to Exploration Results is based on information compiled by William Dix, who is a full time employee of Todd River Resources. Mr Dix is a member of the Australian Institute of Mining and Metallurgy. Mr Dix has sufficient experience of relevance to the style of mineralization and the types of deposits under consideration, and to the activities undertaken, to qualify as a Competent Person as defined in the 2012 Edition of the Joint Ore Reserves Committee (JORC) Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Mr Dix consents to the inclusion in this report of the matters based on information in the form and context in which it appears.



The following Tables are provided to ensure compliance with the JORC code (2012) edition requirements for the reporting of exploration results. **JORC Table One – Sampling Techniques and data**

Criteria	JORC Code explanation	Commentary
Sampling techniques	<p>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.</p> <p>Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.</p> <p>Aspects of the determination of mineralisation that are Material to the Public Report.</p>	<p>Aircore drilling –3m composite samples were collected with a bottom of hole 1m sample collected separately. Where sulphides were noted in the sample, individual 1m samples were collected.</p> <p>RC drilling produced a 1m bulk where a representative sample (nominally a 12.5% split) was collected using a cone splitter. Split samples were composited over 3m. Average sample submitted for analysis was between 2-3 kg while overall sample weights averaged closer to 7-8 kg</p>
Drilling techniques	<p>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).</p>	<p>Aircore drilling – 4.5inch aircore bit on 6m rod lengths with 5” hammer bit used on occasion</p> <p>RC drilling consisted of RC with face sampling bit (140 to 130 mm in diameter) ensuring minimal contamination during sample extraction</p>
Drill sample recovery	<p>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.</p>	<p>Aircore and RC – excellent recoveries, dry samples.</p>
Logging	<p>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.</p> <p>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</p> <p>The total length and percentage of the relevant intersections logged.</p>	<p>All aircore and RC holes were logged for lithology and minerals including sulphides by TRT geologists and recoded digitally. Information regarding the sulphide species observed in the drilling can be found in Table 2 in the body of this announcement.</p>
Sub-sampling techniques and sample preparation	<p>If core, whether cut or sawn and whether quarter, half or all core taken.</p> <p>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.</p> <p>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</p> <p>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</p> <p>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.</p>	<p>Aircore samples were collected with a scoop at a 45 degree angle through the sample pile to ensure a representative sample. Initially 3m composites were collected with a bottom of hole 1m sample collected separately</p> <p>RC drilling was sampled at 1 m intervals by a fixed cone splitter with a representative sample (nominally 12.5% of the total sample) taken. The representative sample was submitted to the laboratory,</p>



	Whether sample sizes are appropriate to the grain size of the material being sampled.	
Quality of assay data and laboratory tests	<p>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</p> <p>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.</p> <p>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.</p>	Aircore and RC samples have been sent to Intertek Genalysis for multi-element assay by aqua regia and fire assay
Verification of sampling and assaying	<p>The verification of significant intersections by either independent or alternative company personnel.</p> <p>The use of twinned holes.</p> <p>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</p> <p>Discuss any adjustment to assay data.</p>	Certified standards, field duplicates and blanks and inserted every 25 samples to test for laboratory accuracy and precision.
Locations of data points	<p>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.</p> <p>Specification of the grid system used.</p> <p>Quality and adequacy of topographic control.</p>	All drillholes have accompanying collar and survey files and were located with GPS – the project falls in projection zone 50. Table 1 within the body of the announcement contains collar details
Data spacing and distribution	<p>Data spacing for reporting of Exploration Results.</p> <p>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.</p> <p>Whether sample compositing has been applied.</p>	<p>Various spacing but generally 400 x 80m or 40m and 200m x 40m over high priority anomalies for aircore</p> <p>For RC holes they are single holes designed to specifically test a defined target</p>
Orientation of data in relation to geological structure	<p>Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.</p> <p>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.</p>	Aircore samples are largely of weathered material with some fresh chips taken from the end of hole no drill core collected. RC samples are both weathered and fresh
Sample security	The measures taken to ensure sample security.	Aircore and RC Samples were delivered on pallets or in bulka bags by freight
Audits or reviews	The results of any audits or reviews of sampling techniques and data.	No sampling audits have been conducted

Section 2 Reporting of Exploration Results

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,	The Berkshire valley Project is located on tenements E70/5204(Moonknight Pty



	<p>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.</p>	<p>Ltd) and E70/5385 (Marlee Base Metals Pty Ltd)</p> <p>Both tenements are in good standing and are not subject to any joint ventures</p>
Exploration done by other parties	Acknowledgment and appraisal of exploration by other parties.	<p>All significant previous work is outlined in WAMEX open file reports.</p> <p>TRT has accessed and reviewed all of this work and compiled our own database on the project from the available open file data. The WAMEX reports used for the purpose of this work include:</p> <p>A088939 A076527 A085553 A079982</p> <p>All of these reports are compiled by IGO Limited and contain comprehensive written descriptions of their work and associated .txt files of all drilling and sampling completed.</p> <p>The documents appear correct and the geo-spatial data recorded matches with images produced when verified independently</p>
Geology	Deposit type, geological setting and style of mineralisation.	All holes logged and data entered into a database
Drill hole Information	<p>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:</p> <ul style="list-style-type: none"> o Easting and northing of the drill collar o Elevation of RL (Reduced Level – elevation above sea level in metres) of the drill collar o Dip and azimuth of the hole o Down hole length and interception depth o Hole length 	N/A
Data aggregation methods	<p>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.</p> <p>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.</p> <p>The assumptions used for any reporting of metal equivalent values should be clearly stated.</p>	<p>All samples through the weathered profile were collected as 3m composites (to coincide with the length of a drill rod).</p> <p>A separate 1m end of hole sample was also collected.</p> <p>RC samples were collected as 3m composites</p>
Relationship between mineralisation widths and intercept lengths	<p>These relationships are particularly important in the reporting of Exploration Results.</p> <p>If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.</p> <p>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').</p>	Sulphides were reported over several intervals in a number of holes which will be collated in full on the receipt of assay data
Diagrams	Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported These should	See Figure 2 in the document for aircore hole locations



	include, but not be limited to a plan view of drill hole collar locations and appropriate sectional views.	
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 aircore holes are shown on Figure 2.
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.	No substantial new information is available other than that reported above.
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.	Additional aircore and RC drilling is ongoing and geophysics is planned for early 2022