ASX / Media Announcement
26 May 2021

Vital intersects broad high grade REO in near surface drilling at Tardiff Zone

Highlights

- **Large intersections of total rare earth oxides (TREO) grades above 2% TREO intersected at Tardiff Zone 1 with all holes hitting mineralisation**
- **Thicknesses in excess of 60m in width and with grades up to 13.8% intersected, demonstrating the world class potential of the Nechalacho rare earth deposit**
- **Best results from Zone 1 include:**
  - **31.8m at 4.35% TREO from 11.5m including 6.9m at 13.78% TREO**
  - **60.9m at 1.92% TREO from 11.4m**
  - **40m at 2.54% TREO from 16m**
  - **25.8m at 2.56% TREO from 15.3m**
  - **13m at 3.12% TREO from 36m including 4m at 7.06% TREO**
- **High value Nd/Pr content of rare earths estimated at an impressive level of 24.2% TREO**
- **Zone 1 remains open in all directions with highest grade hits on southern margins of current drilling**
- **All intersections under shallow cover (10m) and contained within 75m of surface**
- **Mineralisation appears to be associated with bastnasite with metallurgical test work underway**
- **Results will form part of new resource upgrade to be part of Stage 2 Expansion Plans at Nechalacho**

Vital Metals Ltd (ASX:VML) is pleased to announce it has received outstanding first pass assay results from the Tardiff Zone 1 within its 100%-owned Nechalacho Rare Earth Project, Northwest Territories, Canada.

The Nechalacho rare earth project consists of two distinct deposits which will be developed over two stages. The North T deposit hosts a high grade resource of **101,000 tonnes at 9.01% LREO** [1] in the measured and indicated JORC 2012 categories, making it one of the highest grade rare earth deposits in the world. Development of this deposit in currently underway under Stage 1. The second deposit, the Upper Zone, boasts an impressive light rare earth oxides (LREO) resource of **94.7**

[1] ASX Announcement 15 April 2020: Substantial Increase in Resource Size and Grade at North-T Zone Nechalacho

million tonnes at 1.46% TREO [2] in the measured, indicated and inferred JORC 2012 categories and will be the focus expanded operations. The Tardiff Zone 1 is a higher-grade bastnasite rich area within this resource targeted by the 2021 drilling program to upgrade the resource so that mining and processing studies can be carried out.

Vital Metals Managing Director Geoff Atkins said: *"The first results of this drilling program have exceeded our expectations of the higher grade bastnasite dominated rare earth zones in the Tardiff Zone.*

The scale of the Tardiff sets the foundations for expansion of works at Nechalacho into stage 2 of our plans. With mining activities currently underway at Stage 1, the results of this drilling program confirm the enormous potential for Tardiff Zone 1 to be the foundation of our Stage 2 expansion plans. The potential of this deposit is particularly exciting with the deposit remaining open in all directions, with the drilling program's highest grade and largest intercepts being located along an open boundary. Further with intercept grades that would be the envy of rare earth projects around the world, these results confirm the status of Nechalacho amongst the world's rare earth deposits."

Figure 1 - Drill rig on Tardiff 1 target at Nechalacho

Vitals First Pass Drilling Exceeds Expectations

Vital Metals' Nechalacho Rare Earth Project is currently being developed in several stages across its several deposits. Stage 1 is currently underway with the initial development of North T Zone. Vital Metals then plans to expand with the development of Stage 2 which involves the development of the Upper Zone. The Upper Zone boasts a world class resource of 94.7mt at 1.46% TREO [2].

[2] ASX Announcement 13 December 2019: Vital Announces JORC 2012 Compliant Resources for the Nechalacho Rare Earth Deposit

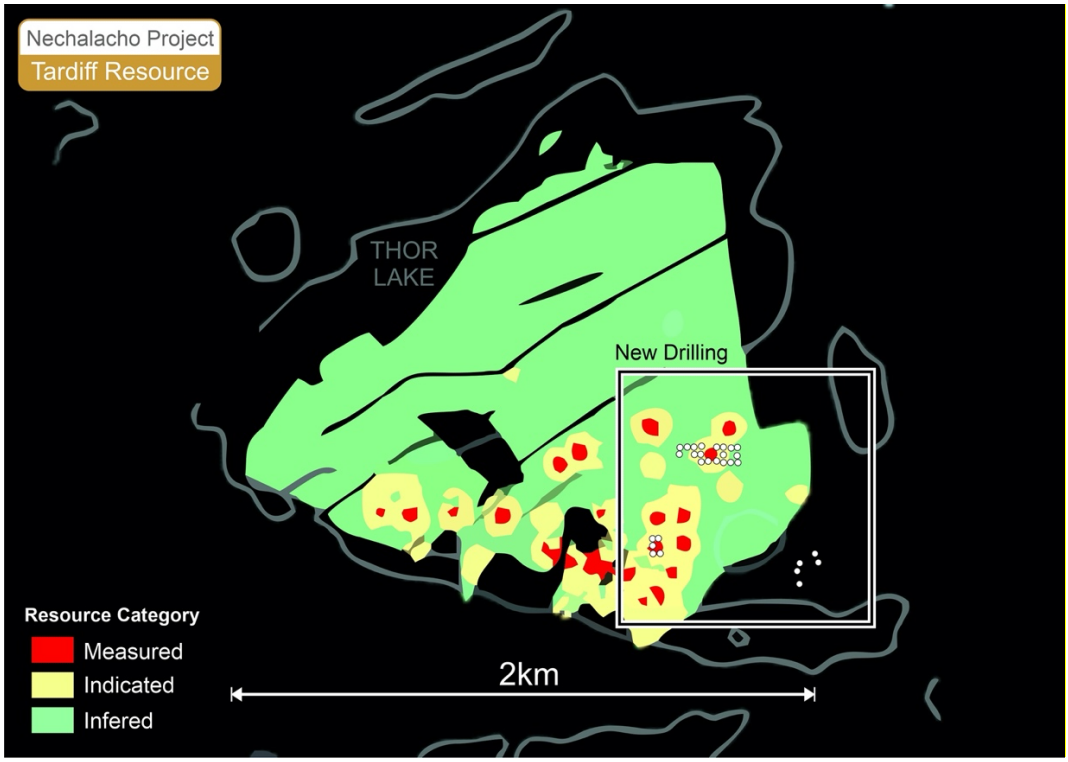

Figure 2 – Nechalcacho Upper Zone

Vital Metal's drilling program was targeted at 3 high-grade REO zones previously identified in wide spaced historic drilling by Avalon Materials Inc. These zones are known as Tardiff Zones 1, 2 and 3.

Tardiff Zones 1 and 3 were drilled on a close spacing (25m x 25m) to enable their resource confidence levels to be upgraded so mining and processing studies can be carried out on these zones. The drilling at Tardiff Zone 2 was designed to get a better understanding of high grade REO mineralisation that is not currently in the resource estimation released in 2019. All drill holes were drilled to a maximum depth of 72m vertical.

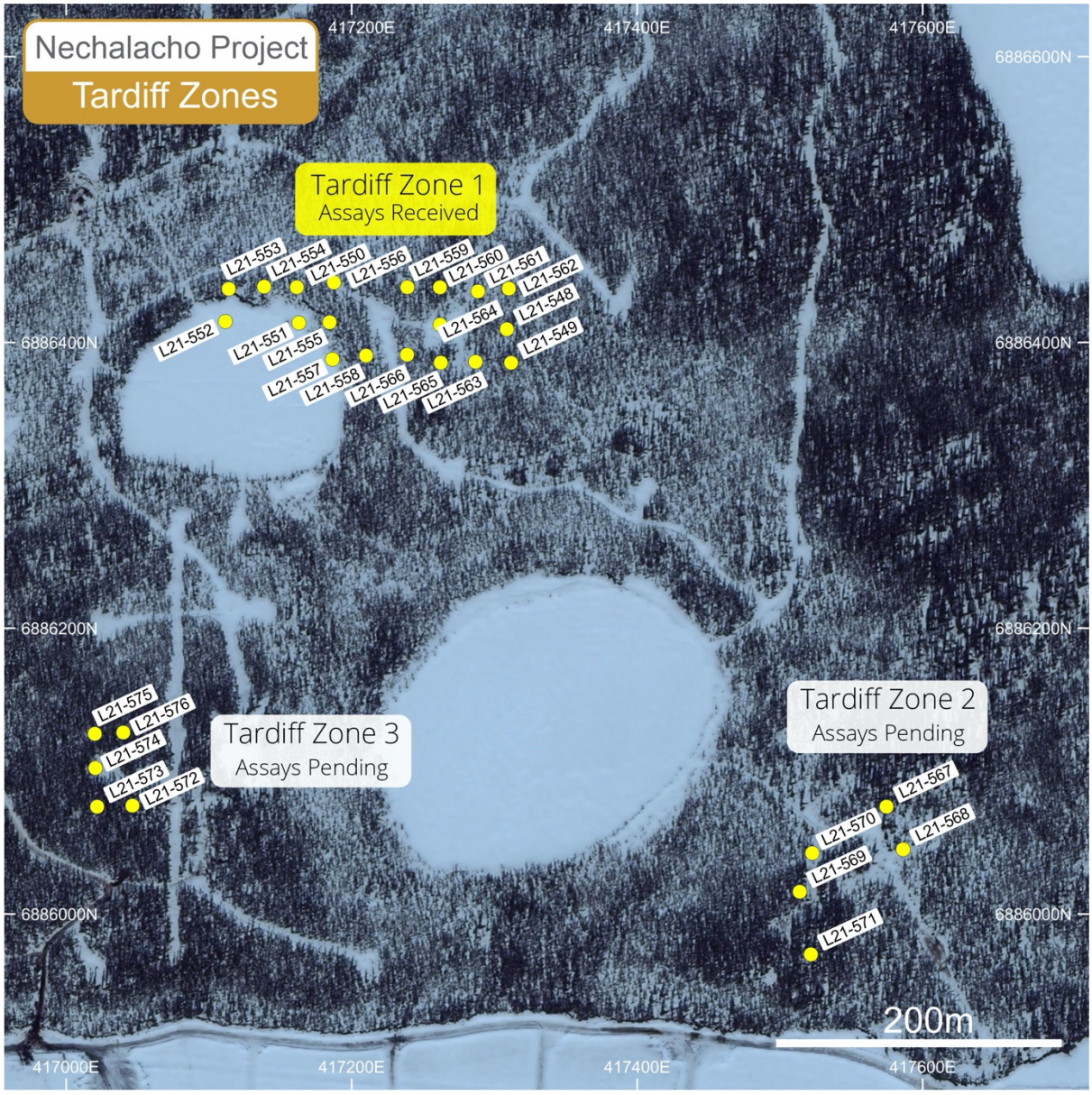

Figure 3 – Drilling program targeting Tardiff Zones 1, 2 and 3

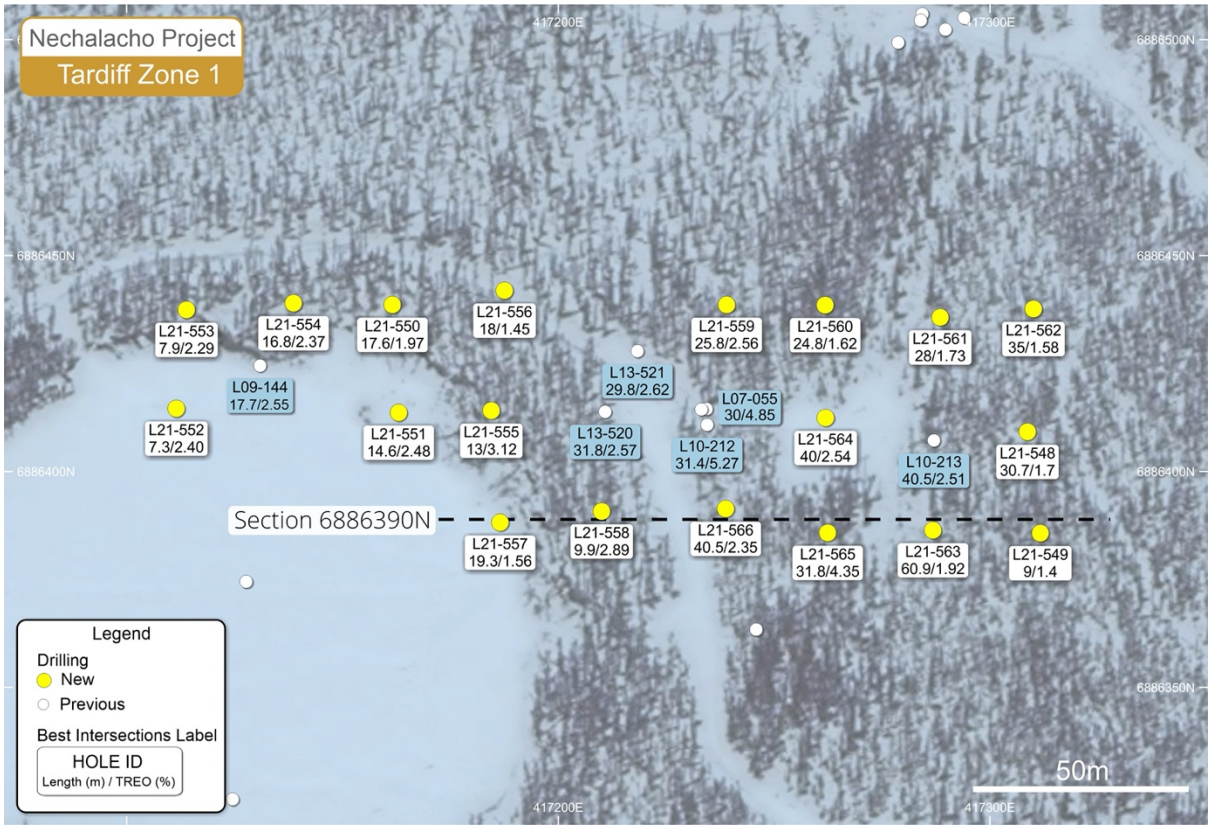

Figure 4 – Tardiff Zone 1 Drill Plan

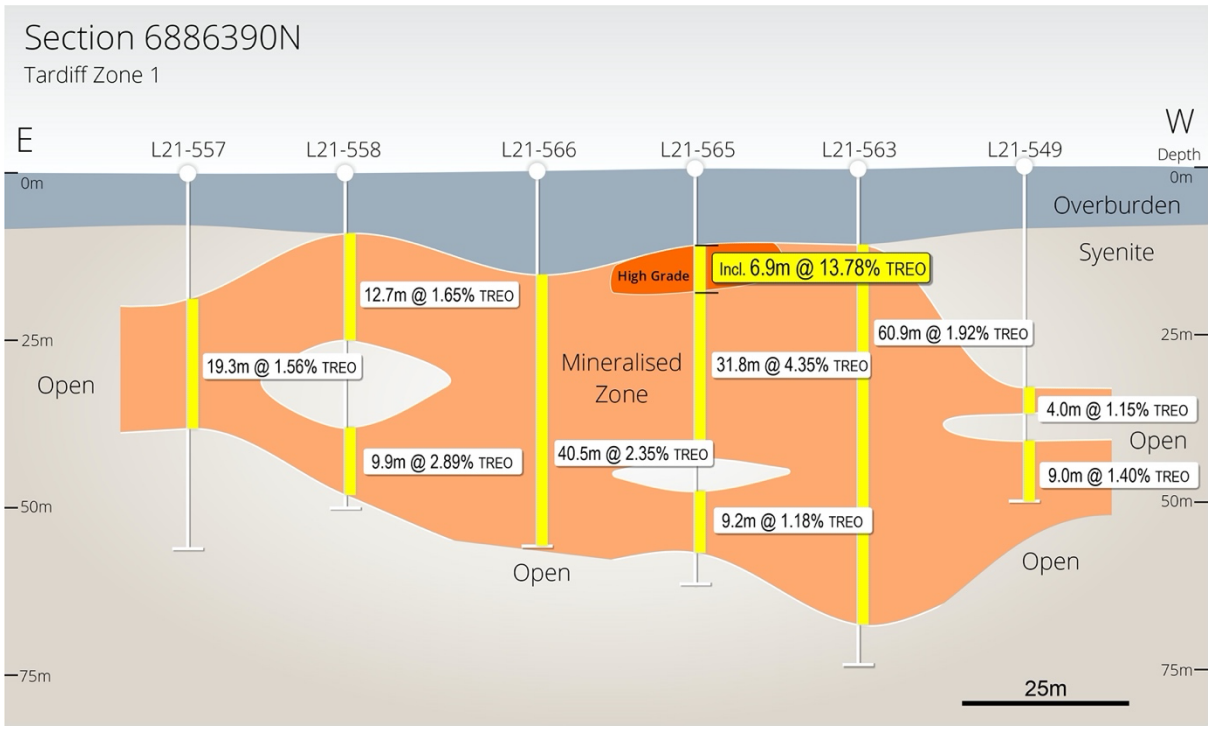

Figure 5 – Section along southern boundary at Tardiff 1. Tardiff 1 remains with holes 566 and 549 ending in mineralisation

The close spaced drilling at Zone 1 has defined a strong zone of higher grade REO mineralisation with wide intersections greater than 2% TREO. The higher grade mineralisation in Zone 1 has been drilled on a 25m grid over a distance of 300m x 100m is open in all directions. More importantly the highest grades have been intersected on the most northern and southern sections.

Historical drill holes are from drilling programs carried out by Avalon Materials Inc between 2007 and 2013 targeting the heavy rare earth rich Basal Zone (below the Vital Metals owned Upper Zone). The targeting of the Basal Zone resulted in very poor definition of the Upper Zone as many of the holes were drilled as fans from a single drill pad. The aim of the 2021 drilling program was to outlined the higher grade REO mineralisation where it can be categorised in Measured and Indicated categories. This will allow mining studies to be carried out on this higher-grade zone of REO mineralisation.

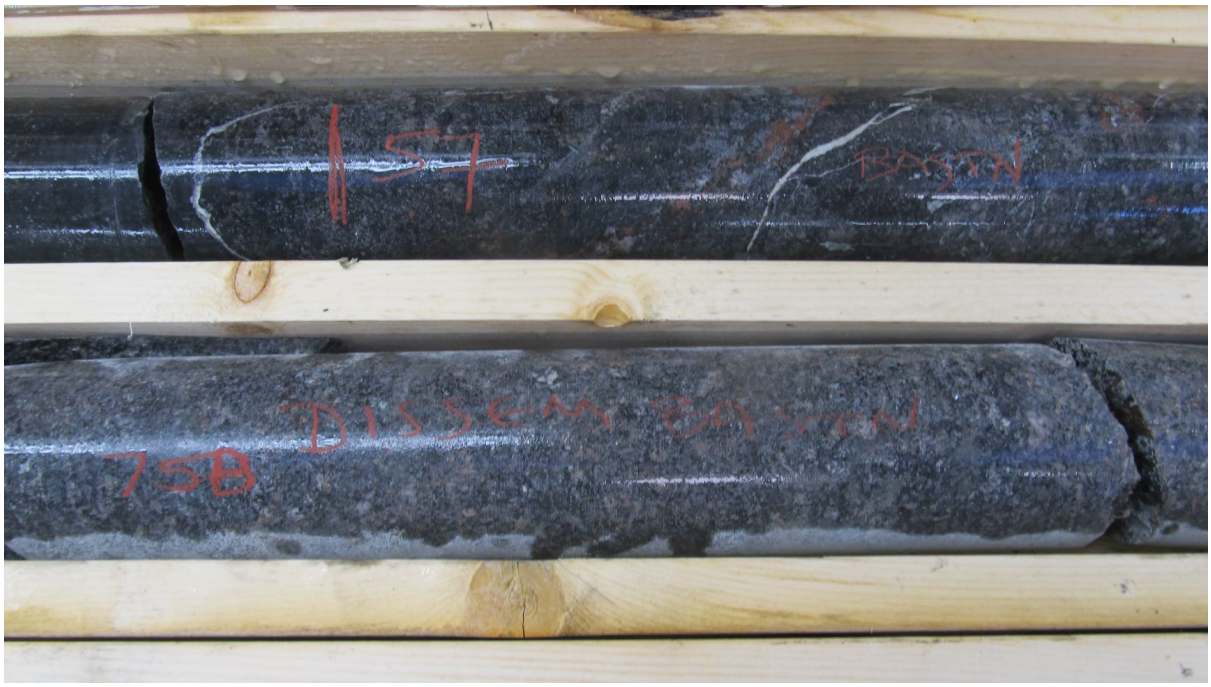

Figure 6 - Coarse bastnaesite in drill hole L21-548

Figure 7 - Massive bastnaesite in drill hole L21-565

A summary of significant intersections are shown in the following table.

Hole Name	From (m)	To (m)	Interval (m)	TREO Grade (%)
L21-551	35.75	50.3	**14.55**	**2.48**
L21-555	36.0	49.0	**13.0**	**3.12**
L21-559	15.3	41.1	**25.8**	**2.56**
L21-563	11.4	72.3	**60.9**	**1.92**
L21-564	16.0	56.0	**40.0**	**2.54**
L21-565	11.5	43.3	**31.8**	**4.35**
L21-566	15.5	56.0	**40.5**	**2.35**

Table 1: Selected high-grade intervals in the Bastnaesite Subzone

Appendix 3 has a complete list of significant TREO intersections.

Ongoing Programs

Vital Metals will now await the results from Tardiff Zones 2 and 3 before collating the results in an upgraded resource estimate.

Part of the samples will be used in ongoing metallurgical testwork which will feed into the Stage 2 expansion feasibility study.

ENDS

This announcement has been approved by the Board of Vital Metals.

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ABOUT VITAL METALS

Vital Metals Limited (ASX:VML) is an explorer and developer focussing on rare earths, technology metals and gold projects. Our projects are located across a range of jurisdictions in Canada, Africa and Germany.

Qualified/Competent Persons Statement

Nechalacho Rare Earth Project

The information in this report relating to Exploration Results at the Nechalacho Rare Earths Project is based on, and fairly represents, information and supporting documentation prepared for Vital Metals Limited by Mr Brendan Shand. Mr Shand is a Competent Person and a member of the Australasian Institute of Mining and Metallurgy and an employee of the Company. Mr Shand has sufficient experience that is relevant to the style of mineralisation and type of deposit under consideration and to the activity being undertaken to qualify as a Competent Person as defined in the 2012 Edition of the 'Australian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves'. Mr Shand consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

ASX Listing Rule Information

This announcement contains information relating to Mineral Resource Estimates extracted from ASX market announcements reported previously and published on the ASX platform on 13 December 2019 and 15 April 2020. 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 and that all material assumptions and technical parameters underpinning the estimates in the original market announcements continue to apply and have not materially changed.

JORC Code, 2012 Edition – Table 1 report – Nechalacho Upper Zone

Section 1 Sampling Techniques and Data

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

	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.*	• Sampling of 2021 diamond drill core are half splits of drill core using a core splitter. • Samples were collected from the bastnaesite mineralisation with lengths ranging 0.5 to 2.7 metres. The typical sample length was between 1.0 and 2.0 metres. The sampling lengths were dictated by the lithology of the core. • All drill core samples were crushed to 90% <2 mm, then 1 kg was riffle split. The 1 kg splits from the samples were then pulverized to 85% <75 µm. • The samples were assayed using ICP-MS for the REE. • The accuracy of the assaying has been validated through a combination of using standards with a known grade and inserting field blanks. • The 6 Historic Avalon drill holes in the Tardiff Zone 1 were sampled and assayed using the same methods.
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).*	• HQ diameter core for the 2021 drill program • The Avalon drill holes in the Tardiff Zone 1 area were either PQ, NQ or HQ diameter core. The actual hole diameter for each individual hole was not in the database obtained by Cheetah from Avalon.
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.*	• Good core recovery was observed for the 2021 drill program. • The geological nature of the mineralization in the Upper Zone (coarse bastnaesite), in many cases, is such that the risk of biased sampling is somewhat reduced. • Avalon noted good core recovery in the 6 historic holes in the Tardiff Zone 1 area.
Logging	• *Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource*	• Geological drill logs completed by an experienced professional geoscientist were produced to a standard to support a mineral resource estimation.

	JORC Code explanation	Commentary
	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.*	• For the 2021 drill program, core photographs are available. For the historic Avalon drill holes photographs are not available. • All the half splits from the 2021 drilling program were retained with the drill core stored on site, as half core, and can be viewed. The core from the historic drilling is stored on site. • Total length of the logged core for the 2021 program is 1712 m and the core are 100% logged.
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.*	• Half core splits were sampled for the 2021 drill program and the historic Avalon drill holes. • For each sampled interval the entire interval was half split to ensure a representative sample of the interval. The sampled core was crushed before assaying to ensure the material from the entire interval was analysed during the assaying process. • Duplicates of both the coarse-crushed (<2 mm) rejects and of the assay pulps were analysed and showed good reproducibility of the REE assays, indicating that both materials are sufficiently homogeneous. • The core sample intervals honour the contacts of the mineralization zones, thus providing adequate sample coverage.
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.*	• The assay methods for the REE include lithium borate fusion followed by ICP-MS and are thus considered total. • External REE standards supplied by Avalon Advanced Materials Inc. and inserted in the field, and external REE standards inserted by the laboratory (ALS) were analysed with each batch of assays to ensure the assaying procedures gave accurate results. • Field blanks were inserted to monitor contamination; results were acceptable.
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.*	• The assay data was collated by Brendan Shand of Cheetah Resources. • The entire data set was downloaded from the ALS portal and converted to oxides. No assay data was manually inserted reducing the likelihood of human data entry errors. Assay data for rare earth elements was converted to rare earth oxides. • Geology tables distinguishing host rock syenite were created from the

	JORC Code explanation	Commentary
		original drill logs. • A review of data received from Avalon for the historic drill holes was carried out by Brendan Shand.
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.*	• All 2021 drill holes were surveyed at the time by a professional surveyor – Sub-Arctic Geometrics Ltd of Yellowknife who used local survey reference points to ensure accuracy. • The grid system used is UTM NAD83 Zone 12 N, currently the standard system used in the area. • All historic Avalon drill holes have been surveyed by professional surveyors.
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.*	• The drill hole spacing is approximately 25 by 25 m over the 3 Tardiff Zones • The drill hole spacing is considered to be adequate for the measured resource confidence category. • Sample compositing will be applied when using the data for resource estimation.
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.*	• All 2021 drill-holes were drilled at -90 to intersect the horizontally layered REO mineralisation at 90 degrees to achieve unbiassed sampling. All the historic Avalon drill holes in the Tardiff Zone 1 were angled and intersected the mineralisation at shallow angles resulting in no biased sampling.
Sample security	• *The measures taken to ensure sample security.*	• All assay samples were sealed using zip locks, and multiple samples were placed in rice bags sealed with zip locks. Independent lab verified sealed sample integrity upon receipt. • Analyses for elements such as rare earths, niobium and zircon are unlikely to be altered as a result of insecurity of samples such as contamination.
Audits or reviews	• *The results of any audits or reviews of sampling techniques and data.*	• As the drilling is only recent no audits have been carried out on the sampling techniques and data.

Section 2 Reporting of Exploration Results

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

	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.*	• The Upper Zone is located on Mining Lease NT-3178 registered to Avalon Advanced Materials Inc. and expires 21 May 2027. On June 24, 2019, Avalon Advanced Materials Inc. announced that it has entered into a definitive agreement with Cheetah Resources Pty Ltd. to transfer ownership of the near-surface mineral resources on the Property, which includes the Upper Zone (see Avalon News Release NR 19-04). On October 30, 2019, it was announced that Avalon received the full payment from Cheetah Resources Pty Ltd. for the near-surface resources on the Nechalacho rare earth elements property at Thor Lake (see Avalon News Release NR 19-04). On February 6, 2020, the completion of a co-ownership agreement was announced, under which Cheetah Resources Pty Ltd. acquired ownership of the near-surface resources on the property, including the Upper Zone, and a jointly-owned special purpose vehicle to hold and manage the permits and authorizations to operate at the site was created (see Avalon News Release NR 20-01). • Operating licenses in the Northwest Territories are subject to the approvals by provincial and environmental regulators and require consultation with local communities.
Exploration done by other parties	• *Acknowledgment and appraisal of exploration by other parties.*	• The historic resource development drilling was carried out by Avalon Materials Inc with the bulk of this drilling carried out between 2007 and 2013. • The geologist who supervised the historic work, J.C. Pedersen, P. Geo, is an experienced geologist in the rare earths field and is well known as a reliable

	JORC Code explanation	Commentary
		geoscientist to the present parties. He also supervised the 2021 drilling program.
Geology	• *Deposit type, geological setting and style of mineralisation.*	• The Upper Zone is a polymetallic (REE, Nb, Zr) deposit hosted by the Thor Lake Syenite. It is a large layered magmatic deposit. • REO mineralization in the Lake Zone is layered in separate zones of light rare earths at the top of the deposit (Upper Zone) and a mixture of light and heavy REO mineralisation in the lower part of the deposit (Basal Zone).
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.*	• The historic data set for the Lake Zone includes 582 diamond drill holes with many of them in fans from the surface utilising a small number of drill pads to target the basal zone which begins approximately 80 metres below the surface. The historic drill hole data gave poor representation of the Upper Zone as the fans resulted in many holes close together in clusters and wide spaces between the clusters. • The historic drill holes ranged from 1.5 to 1070 m in length with the bulk of the drill holes between 150 and 300 m long for a total length of 120,062 m. • See the attached appendices for the details of each of the holes and the assay intervals in the 2021 drilling program. • See the attached appendices for the details of the 6 historic Avalon drill holes in the Tardiff Zone 1 area.
Data aggregation methods	• *In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (e.g. 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.*	• Where there was more than 1 assay for an interval a weighted average was used for the grade of the interval. The weighted average was calculated by using the following formula. Interval grade= (Sum of (Assay length X assay grade))/(total interval length) • No capping was applied as no outliers were observed.
Relationship between mineralisation widths and	• *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.*	• For the 2021 drilling the intervals reported closely approximate the true width of the mineralisation as most holes intersect at right angles to the dip of the mineralisation. Four of the 6 historic Avalon drill holes were angled and intersected the mineralisation at shallow angles to the dip of the

	JORC Code explanation	Commentary
intercept lengths	• *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').*	mineralisation. So the true width for these holes is slightly shorter than the down hole intervals. The other historic holes were vertical and the intersections are true width. • The sample intervals are suitable for the mineralisation. • The drill holes intersect the deposit at approximately right angles to the orientation of the orebody which is the ideal orientation. • The orientation of the holes to the mineralization is well established.
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.*	• See figures in this ASX release for maps and section.
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 intervals greater 2 metres in length and 1% TREO are reported Appendix 3.
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.*	• Not applicable. • Deleterious and contaminating materials are not present except for some thorium as is commonly present in rare earth deposits and well established with respect to levels.
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.*	• The higher-grade REO mineralisation is open to the north and south of the close spaced drilling. It is recommended a section of drillholes 25 metres to the north and another section of holes 25 metres to the south be drilled.

Appendix 2: List of Drill Holes for the 2021 Upper Zone Drill Program

Hole_ID	Northing	Easting	Elevation	Length (m)	Azimuth	Dip
L21-548	6886409.18	417308.71	241.70	71	0	-90
L21-549	6886385.71	417311.70	241.52	50	0	-90
L21-550	6886438.61	417161.58	240.94	62	0	-90
L21-551	6886413.62	417163.04	240.50	59	0	-90
L21-552	6886414.57	417111.53	240.55	53	0	-90
L21-553	6886437.43	417113.88	241.46	53	0	-90
L21-554	6886438.98	417138.67	241.19	53	0	-90
L21-555	6886414.08	417184.51	240.47	56	0	-90
L21-556	6886441.90	417187.55	241.20	62	0	-90
L21-557	6886388.18	417186.54	240.43	56	0	-90
L21-558	6886390.75	417210.07	240.49	50	0	-90
L21-559	6886438.60	417239.03	241.41	56	0	-90
L21-560	6886438.52	417261.85	241.48	62	0	-90
L21-561	6886435.69	417288.51	241.36	72	0	-90
L21-562	6886437.65	417310.11	241.54	62	0	-90
L21-563	6886386.39	417286.82	241.12	74	0	-90
L21-564	6886412.41	417261.94	240.88	74	0	-90
L21-565	6886385.78	417262.43	241.18	62	0	-90
L21-566	6886391.36	417238.81	240.79	56	0	-90
L21-567	6886075.11	417574.72	240.35	50	0	-90
L21-568	6886045.17	417586.33	238.95	50	0	-90
L21-569	6886015.55	417513.91	240.75	50	0	-90
L21-570	6886042.55	417522.69	240.15	62	0	-90
L21-571	6885971.70	417521.74	240.95	62	0	-90

Hole_ID	Northing	Easting	Elevation	Length (m)	Azimuth	Dip
L21-572	6886075.81	417046.40	244.43	50	0	-90
L21-573	6886075.06	417021.67	244.36	62	0	-90
L21-574	6886102.07	417020.47	244.23	62	0	-90
L21-575	6886126.08	417020.03	243.63	62	0	-90
L21-576	6886127.00	417040.00	244.00	59	0	-90

Appendix 3: List of Drill Hole intercepts in Tardiff Zone 1

Hole_ID	From	To	Length	TREO%
L21-548	17	26.2	9.2	1.08
L21-548	29.35	60	30.65	1.70
L21-548	65.6	71	5.4	1.64
L21-549	33	37	4	1.15
L21-549	41	50	9	1.40
L21-550	11.4	15.9	4.5	2.33
L21-550	35	52.6	17.6	1.97
L21-551	8.7	15.8	7.1	1.28
L21-551	19	25	6	1.74
L21-551	19	25	6	1.65
L21-551	29	33	4	1.58
L21-551	35.75	50.3	14.55	2.48
L21-552	11.5	18.8	7.3	2.40
L21-552	21.6	27.6	6	1.80
L21-553	19	23	4	1.59
L21-553	28.7	41.5	12.8	1.40
L21-553	44	51.85	7.85	2.29
L21-554	36.25	53	16.75	2.37

Hole_ID	From	To	Length	TREO%
L21-555	10.1	31	20.9	1.83
L21-555	36	49	13	3.12
incl	36	40	4	7.06
L21-556	13.7	20	6.3	1.24
L21-556	28	34	6	1.53
L21-556	38	56	18	1.45
incl	22	32	10	4.35
L21-557	18.7	38	19.3	1.56
L21-558	12.25	25	12.75	1.65
L21-558	38	47.9	9.9	2.89
L21-559	15.3	41.1	25.8	2.56
L21-560	17.6	23	5.4	1.75
L21-560	27	51.8	24.8	1.62
L21-561	18.7	27	8.3	1.63
L21-561	33	61	28	1.73
L21-561	64	71	7	2.31
L21-562	27	62	35	1.58
incl	56	60	4	3.74
L21-563	11.4	72.3	60.9	1.92
incl	46.4	62.7	16.3	2.89
L21-564	16	56	40	2.54
incl	18	22	4	6.25
L21-565	11.5	43.3	31.8	4.35
incl	11.5	22	10.5	9.16
L21-565	48.2	57.4	9.2	1.18
L21-566	15.5	56	40.5	2.35

Appendix 4: List of historic Avalon Drill Holes in the Tardiff Zone 1 area

Hole_ID	Northing	Easting	Elevation	Length (m)	Azimuth	Dip
L07-055	6886414.46	417234.35	241.75	200.4	0	-90
L09-144	6886424.49	417130.92	240.59	200.25	0	-90
L10-212	6886410.8	417234.51	241.56	221	270	-75.2
L10-213	6886407.17	417287.04	241.12	227.4	0	-88.75
L13-520	6886413.81	417210.87	241.5	52.3	0	-89.48
L13-521	6886427.87	417218.35	241.46	50	315	-72

Appendix 5: List of historic Drill Hole intercepts in Tardiff Zone 1

Hole_ID	From	To	Length	TREO%
L07-055	17	47	30	4.85
L09-144	21.3	39	17.7	2.55
L09-144	41	45	4	1.51
L10-212	14	45.4	31.4	5.27
L10-213	15	24	9	1.74
L10-213	28	68.5	40.5	2.51
L13-520	12.2	44	31.8	2.57
L13-521	16	45.8	29.8	2.62