

22 March 2022

## **100% SUCCESS RATE FOR PHASE 4 TRANCHE 6 INFILL DRILL RESULTS**

- **Sixth and final Tranche of Phase 4 drilling results received with all 66 holes intersecting rare earth element (REE) mineralised clay above the Mineral Resource Estimate (MRE) cut-off grade, including the following outstanding near surface, thick REE grade bearing intervals:**
  - **RRMDD702 5.7 metres at 1,102 ppm TREO from 2.3 metres**
  - **RRMDD691 6.7 metres at 767 ppm TREO from 5.6 metres**
  - **RRMDD705 17.0 metres at 637 ppm TREO from 4.4 metres**
  - **RRMDD647 14.7 metres at 600 ppm TREO from 5.7 metres**
  - **RRMDD667 12.4 metres at 595 ppm TREO from 4.7 metres**
- **This completes an outstanding Phase 4 drill program with all 432 holes drilled delivering results confirming REE bearing clays above the current MRE cut-off grade**
- **The 100% success rate of Phase 4 drill program will now feed into the MRE update, which has commenced with expected delivery in Q2 2022**

Ionic Rare Earths Limited (“IonicRE” or “the Company”) (ASX: IXR) is pleased to announce the results of assays for Tranche Six (6) of the 8,220 metre Phase 4 drill program completed in October 2021 at the Makuutu Rare Earths Project (“Makuutu” or “the Project”) in Uganda.

The Phase 4 drilling has confirmed that Makuutu is a large scale, ionic adsorption clay (IAC) hosted rare earth element (REE) project, with extension potential identified east and to the northwest. The Project is well supported by existing infrastructure and is one of a few confirmed IAC deposits identified globally, outside of China.

Drill assay results have been received for the final 66 drill holes of the program making up the Tranche 6 submission. The results are for holes drilled within the existing inferred Mineral Resource Estimate (MRE) at the large resource area I, located within RL00234.

All 66 holes reported in this announcement have delivered clay and saprolite mineralisation intersections above the cut-off grade of 200 ppm Total Rare Earth Oxide less CeO<sub>2</sub> (TREO-CeO<sub>2</sub>)

and demonstrated mineralisation consistent with both the initial drilling phases (2019 and H1 2020) and the current MRE. The results add to the previous five tranches, which has now reported all 432 drill holes completed within the Phase 4 drill program returning clay and saprolite mineralisation intersections above the cut-off grade.

Area I shows a consistent REE mineralised profile, moderately lower grade than other areas of the project with a low degree of grade variability.

Ionic Rare Earths Managing Director Mr. Tim Harrison commented:

*“These latest tranche 6 drill assays complete what has been an extraordinary drill program where all 432 drill holes completed have returned REE bearing clays above the cut-off grade which is a clear reflection of the significant scale and continuity of the mineralised system at Makuutu.”*

*“With this batch, the Phase 4 drilling assay data have all been delivered, and the update MRE estimation has commenced. The Makuutu resource remains on course for a significant upgrade in confidence in the near term, with the MRE update advancing Makuutu another step closer to our goal of submitting a mining licence application later in 2022.”*

## **Tranche 6 Drilling Results**

Assay results have been received for 66 holes in the sixth and final tranche of assays from the Makuutu Phase 4 drill program. The aim of the program is to increase MRE confidence in the Central Zone plus areas F, G, H and I, as illustrated in Figure 1. In addition, exploration targets C, E and the area between the Central Zone and Central Zone East have been infill drilled to support resource estimation of these zones. This is expected to add to the overall scale of the MRE at Makuutu given TREO-CeO<sub>2</sub> grades and interval thicknesses delivered in these areas.

Figure 1 illustrates the drill status over the entire Makuutu Rare Earths Project area, including;

- 1) the hole locations relevant to this announcement, shown in red;
- 2) previously reported Phase 4 drill locations shown in black, and
- 3) Phase 1 and 2 drilling from 2019 and 2020 are shown in grey.

The drill results received in Tranche six (6) consist of 66 infill holes drilled within the inferred resource Area I, designed to increase the drill density to a 200-metre grid.

All drill holes were mineralised with hole locations shown in Figure 2, and intercepts above the MRE cutoff grade of 200ppm TREO-CeO<sub>2</sub> listed in Table 1. Area I is generally a lower grade area of the resource however it shows consistent clay thickness and grade distribution, with elevated insitu proportions of heavy rare earth elements (HREE). The infill drilling displays typical profile grade and thickness characteristics.

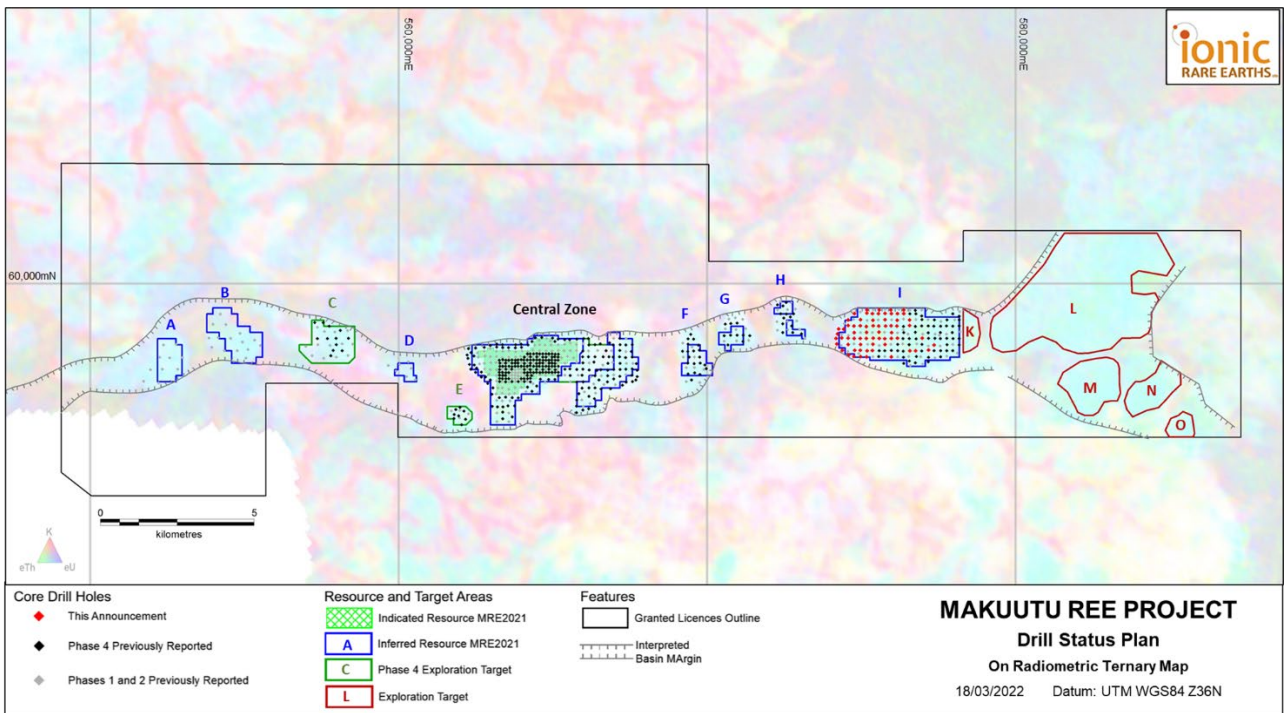


Figure 1: Phase 4 Drill Program status plan showing completed drill holes covering the Makuutu Rare Earths Project with the MRE and target areas.

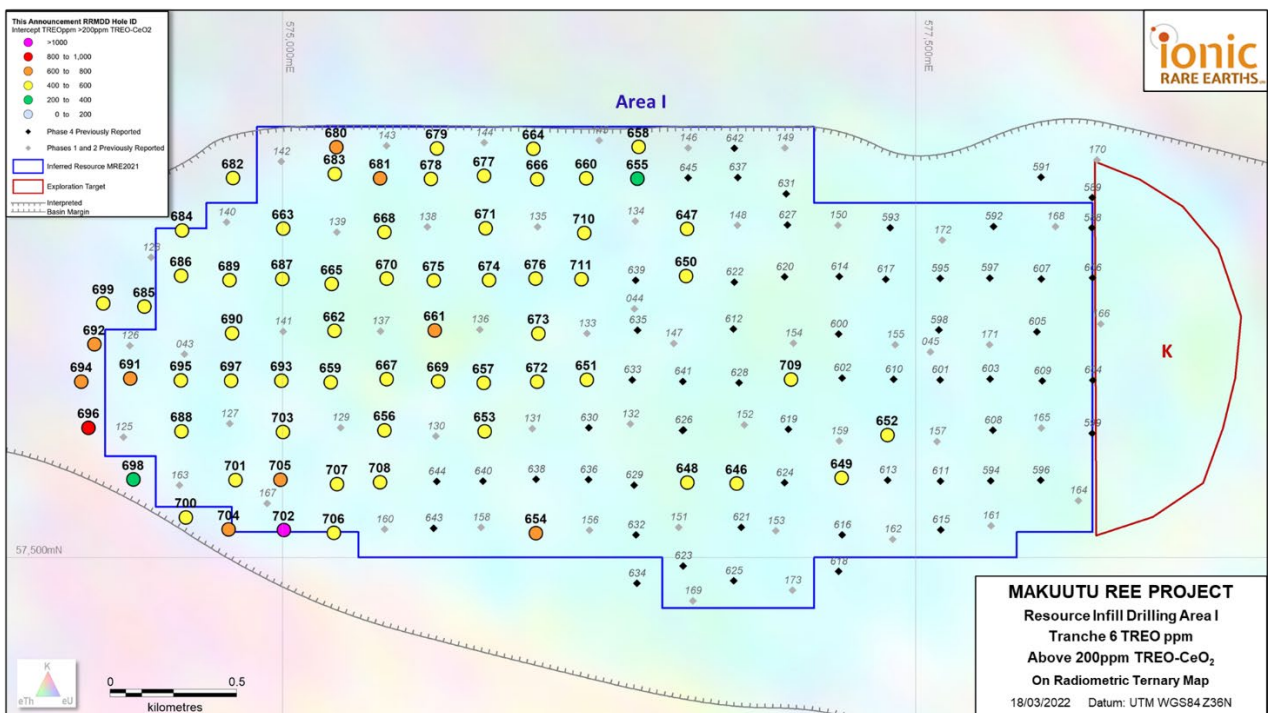


Figure 2: Area I drill plan with Tranche 6 infill drill holes showing hole locations by drill intercept TREO grade and RRMD drill hole ID. Previously reported holes shown in grey (Phase 1 and 2 drilling) and black (Phase 4 drilling).

**Table 1: Makuutu Area I Tranche 6 drilling results above MRE cut-off grade of 200ppm TREO-CeO<sub>2</sub>.**

Drill Hole ID	Depth From (metres)	Length (metres)	TREO (ppm)	TREO-CeO <sub>2</sub> (ppm)	HREO (ppm)	CREO (ppm)
RRMDD646	5.0	9.7	487	315	150	177
RRMDD647	5.7	14.7	600	362	143	187
RRMDD648	6.9	4.1	436	283	135	160
RRMDD649	3.1	15.6	423	261	101	133
RRMDD650	4.5	19.4	506	310	116	154
RRMDD651	4.2	6.3	598	389	185	218
RRMDD652	2.0	10.8	493	295	110	147
RRMDD653	6.0	9.8	534	340	145	182
RRMDD654	2.5	9.7	604	382	156	201
RRMDD655	3.4	8.0	560	367	166	203
and	13.6	2.6	354	214	85	109
RRMDD656	3.9	12.9	501	312	123	160
RRMDD657	4.7	7.8	574	371	165	202
RRMDD658	5.1	11.2	584	395	194	230
RRMDD659	2.9	10.0	569	362	150	193
RRMDD660	4.6	10.1	490	324	156	181
RRMDD661	8.1	5.4	632	420	184	231
RRMDD662	3.5	6.9	560	369	175	206
RRMDD663	4.8	6.8	550	351	160	194
RRMDD664	4.6	9.2	567	381	174	214
RRMDD665	4.1	6.5	592	378	157	200
RRMDD666	3.9	14.3	506	319	126	163
RRMDD667	2.6	12.4	595	387	160	202
RRMDD668	4.7	4.4	583	380	172	209
RRMDD669	5.0	13.0	546	343	130	173
RRMDD670	5.4	7.2	546	344	144	181
RRMDD671	4.4	10.7	534	333	130	169
RRMDD672	4.3	9.8	557	357	140	180
RRMDD673	5.2	7.9	568	346	135	176
RRMDD674	3.8	14.6	500	317	120	160
RRMDD675	5.3	10.6	567	372	148	193
RRMDD676	3.4	16.3	491	308	116	156
RRMDD677	4.0	16.4	530	341	136	177
RRMDD678	4.5	10.6	580	373	161	202
RRMDD679	4.8	10.5	480	314	135	170
RRMDD680	3.1	5.2	648	456	208	255
RRMDD681	4.6	6.4	753	476	189	248
RRMDD682	4.2	10.0	470	290	112	147
RRMDD683	5.4	9.7	507	328	139	176
RRMDD684	4.1	13.4	525	326	133	173
RRMDD685	2.8	13.0	532	350	135	180
RRMDD686	6.3	6.5	541	361	176	207
RRMDD687	7.2	7.4	585	401	178	224
RRMDD688	5.4	11.1	536	344	131	177
RRMDD689	5.5	9.9	571	370	164	203
RRMDD690	4.3	9.6	526	335	133	175
RRMDD691	5.6	6.7	767	556	266	317
RRMDD692	4.5	5.3	699	491	208	268
RRMDD693	4.9	12.6	514	325	135	171
RRMDD694	3.0	3.3	784	526	205	274
RRMDD695	6.7	9.2	552	347	124	173
RRMDD696	1.1	1.8	843	519	198	259
RRMDD697	5.6	10.3	512	323	134	171
RRMDD698	2.5	9.3	499	303	117	154
and	15.8	2.4	382	217	86	111
RRMDD699	4.9	11.3	491	311	124	161
RRMDD700	1.3	2.9	589	364	143	187
RRMDD701	4.1	12.0	591	367	146	189
RRMDD702	2.3	5.7	1102	828	370	464

RRMDD703	6.0	7.0	576	389	178	219
RRMDD704	2.8	6.2	682	439	180	232
RRMDD705	4.4	17.0	637	403	158	211
RRMDD706	3.7	11.5	538	354	155	192
RRMDD707	5.0	7.6	524	348	160	191
RRMDD708	5.0	10.3	542	357	148	186
RRMDD709	5.9	7.5	580	365	144	188
RRMDD710	4.9	15.5	523	321	129	163
RRMDD711	4.5	14.4	470	286	107	142

Note: Rounding may create arithmetic differences

TREO, HREO and CREO definitions provided within JORC Table 1.

## Phase 4 Drilling Program and MRE

The Phase 4 drill program totaled 8,220 metres of drilling (432 holes) with the objective of increasing the resource confidence to JORC Indicated status over most of the current resource. The drill program was the largest undertaken on the Project to date and will be followed by a MRE update currently anticipated to be finalised in Q2 2022.

All 432 holes have now been reported and resource modelling for the MRE update has commenced. All of the holes drilled in the Phase 4 drill program returned REE bearing clays above the current MRE cut-off grade, consisting of;

- Tranche 1 (ASX: 16 Sept 2021); All 50 holes reported in this announcement delivered clay and saprolite mineralisation intersections above the cut-off grade.
- Tranche 2 (ASX: 25 Nov 2021); All 60 holes reported in this announcement delivered clay and saprolite mineralisation intersections above the cut-off grade.
- Tranche 3 (ASX: 20 Dec 2021); All 71 holes reported in this announcement delivered clay and saprolite mineralisation intersections above the cut-off grade.
- Tranche 4 (ASX: 6 Jan 2022); All 75 holes reported in this announcement have delivered clay and saprolite mineralisation intersections above the cut-off grade.
- Tranche 5 (ASX: 7 Feb 2022); All 110 holes reported in this announcement have delivered clay and saprolite mineralisation intersections above the cut-off grade.
- Tranche 6 (this announcement); All 66 holes reported in this announcement have delivered clay and saprolite mineralisation intersections above the cut-off grade.

The Company now looks forward to the completion of the updated MRE estimate which will then be used as part of the Feasibility Study and Mining Licence Application (MLA) the company is planning on submitting before the end of October 2022.

**Table 2: Makuutu Rare Earths Project core hole details this Announcement (Datum UTM WGS84 Zone 36N).**

Drill Hole ID	UTM East (m.)	UTM North (m.)	Elevation (m.a.s.l.)	Drill Type	Hole Length EOH (m.)	Azimuth	Inclination
RRMDD646	576793	57795	1148	HQ3	16.8	0	-90
RRMDD647	576598	58800	1138	HQ3	24.1	0	-90
RRMDD648	576599	57799	1144	HQ3	15.0	0	-90
RRMDD649	577208	57817	1150	HQ3	21.7	0	-90
RRMDD650	576594	58614	1138	HQ3	27.5	0	-90

RRMDD651	576201	58205	1143	HQ3	12.0	0	-90
RRMDD652	577389	57987	1149	HQ3	14.1	0	-90
RRMDD653	575799	58001	1139	HQ3	18.0	0	-90
RRMDD654	576001	57600	1137	HQ3	16.0	0	-90
RRMDD655	576402	58999	1139	HQ3	21.1	0	-90
RRMDD656	575402	58005	1133	HQ3	19.6	0	-90
RRMDD657	575794	58192	1140	HQ3	13.5	0	-90
RRMDD658	576406	59124	1138	HQ3	22.8	0	-90
RRMDD659	575189	58195	1130	HQ3	15.1	0	-90
RRMDD660	576199	59001	1138	HQ3	18.3	0	-90
RRMDD661	575601	58400	1136	HQ3	16.1	0	-90
RRMDD662	575205	58398	1129	HQ3	11.0	0	-90
RRMDD663	575002	58802	1121	HQ3	17.0	0	-90
RRMDD664	575991	59117	1133	HQ3	16.9	0	-90
RRMDD665	575194	58583	1128	HQ3	15.0	0	-90
RRMDD666	576006	58997	1136	HQ3	22.1	0	-90
RRMDD667	575411	58207	1134	HQ3	15.8	0	-90
RRMDD668	575402	58788	1129	HQ3	13.6	0	-90
RRMDD669	575614	58199	1137	HQ3	22.7	0	-90
RRMDD670	575411	58604	1132	HQ3	18.0	0	-90
RRMDD671	575802	58803	1136	HQ3	19.4	0	-90
RRMDD672	576005	58197	1142	HQ3	15.4	0	-90
RRMDD673	576010	58388	1142	HQ3	15.0	0	-90
RRMDD674	575815	58598	1139	HQ3	22.5	0	-90
RRMDD675	575596	58597	1136	HQ3	20.4	0	-90
RRMDD676	575999	58604	1141	HQ3	22.2	0	-90
RRMDD677	575796	59010	1132	HQ3	25.0	0	-90
RRMDD678	575586	58998	1129	HQ3	17.4	0	-90
RRMDD679	575609	59118	1126	HQ3	19.6	0	-90
RRMDD680	575212	59124	1117	HQ3	12.1	0	-90
RRMDD681	575385	59001	1125	HQ3	15.7	0	-90
RRMDD682	574804	59001	1113	HQ3	18.0	0	-90
RRMDD683	575206	59018	1121	HQ3	16.9	0	-90
RRMDD684	574602	58795	1114	HQ3	17.5	0	-90
RRMDD685	574453	58494	1115	HQ3	21.2	0	-90
RRMDD686	574599	58615	1116	HQ3	17.4	0	-90
RRMDD687	574999	58604	1123	HQ3	19.3	0	-90
RRMDD688	574600	58001	1118	HQ3	19.4	0	-90
RRMDD689	574790	58598	1120	HQ3	18.6	0	-90
RRMDD690	574801	58389	1122	HQ3	17.0	0	-90
RRMDD691	574398	58210	1114	HQ3	16.8	0	-90
RRMDD692	574256	58345	1111	HQ3	15.0	0	-90
RRMDD693	574995	58201	1127	HQ3	22.0	0	-90
RRMDD694	574205	58198	1106	HQ3	9.0	0	-90
RRMDD695	574598	58203	1119	HQ3	18.0	0	-90
RRMDD696	574233	58016	1104	HQ3	6.0	0	-90
RRMDD697	574796	58202	1123	HQ3	18.4	0	-90
RRMDD698	574410	57811	1107	HQ3	21.0	0	-90
RRMDD699	574291	58506	1112	HQ3	17.1	0	-90
RRMDD700	574618	57662	1110	HQ3	6.8	0	-90
RRMDD701	574814	57809	1119	HQ3	17.9	0	-90
RRMDD702	575005	57611	1116	HQ3	8.0	0	-90
RRMDD703	575001	57999	1125	HQ3	15.2	0	-90
RRMDD704	574787	57614	1112	HQ3	9.0	0	-90
RRMDD705	574991	57811	1123	HQ3	23.2	0	-90
RRMDD706	575202	57600	1120	HQ3	18.0	0	-90
RRMDD707	575215	57793	1126	HQ3	15.1	0	-90
RRMDD708	575385	57801	1129	HQ3	19.2	0	-90

RRMDD709	577008	58207	1144	HQ3	15.5	0	-90
RRMDD710	576191	58784	1140	HQ3	26.4	0	-90
RRMDD711	576180	58602	1142	HQ3	21.5	0	-90

Authorised for release by the Board.

**For enquiries, contact:** Tim Harrison  
Managing Director  
+61 8 9481 2555

## Makuutu Mineral Resource Estimate

**Table 3: Makuutu Resource above 200ppm TREO-CeO<sub>2</sub> Cut-off Grade**

Resource Classification	Tonnes (millions)	TREO (ppm)	TREO-CeO <sub>2</sub> (ppm)	LREO (ppm)	HREO (ppm)	CREO (ppm)	Sc <sub>2</sub> O <sub>3</sub> (ppm)
Indicated Resource	66	820	570	590	230	300	30
Inferred Resource	248	610	410	450	160	210	30
<b>Total Resource</b>	<b>315</b>	<b>650</b>	<b>440</b>	<b>480</b>	<b>170</b>	<b>230</b>	<b>30</b>

Rounding has been applied to 1Mt and 10ppm which may influence averaging calculation.

All REO are tabulated in MRE announcement dated 3 March 2021 with formulas defining composition of Light Rare Earth Oxides (LREO), Heavy Rare Earth Oxides (HREO), Critical Rare Earth Oxides (CREO) and Total Rare Earth Oxides (TREO).

**Table 4: Mineral Resources by Area**

Classification	Indicated Resource			Inferred Resource			Total Resource		
	Tonnes (millions)	TREO (ppm)	TREO-CeO <sub>2</sub> (ppm)	Tonnes (millions)	TREO (ppm)	TREO-CeO <sub>2</sub> (ppm)	Tonnes (millions)	TREO (ppm)	TREO-CeO <sub>2</sub> (ppm)
<b>Central Zone</b>	66	820	570	51	730	500	118	780	540
<b>A</b>				12	570	390	12	570	390
<b>B</b>				25	410	280	25	410	280
<b>C</b>				-	-	-	-	-	-
<b>D</b>				6	560	400	6	560	400
<b>E</b>				-	-	-	-	-	-
<b>Central Zone East</b>				37	740	520	37	740	520
<b>F</b>				11	570	390	11	570	390
<b>G</b>				6	660	450	6	660	450
<b>H</b>				4	780	560	4	780	560
<b>I</b>				96	550	350	96	550	350
<b>Total Resource</b>	<b>66</b>	<b>820</b>	<b>570</b>	<b>248</b>	<b>610</b>	<b>410</b>	<b>315</b>	<b>650</b>	<b>440</b>

Rounding has been applied to 1Mt and 10ppm which may influence averaging calculations.

## About Makuutu Rare Earths Project

The Makuutu Rare Earths Project is an ionic adsorption clay (“IAC”) hosted rare earth element (“REE”) deposit located 120 km east of Kampala in Uganda and is well serviced by existing high quality infrastructure including roads, rail, power infrastructure and cell communications. The installed infrastructure is illustrated in Figure 3.

The deposit stretches 37 km in length and has demonstrated potential for a long life, low-cost capital source of critical and heavy rare earths. These IAC deposits are prevalent in southern China which have been the source of the world’s lowest cost critical and heavy REE production, however these deposits are gradually being exhausted and Makuutu represents one of only a handful of such deposits outside of southern China.

The Makuutu deposit is shallow, with less than 3 m of cover over a 9 m average thickness clay and saprolite zone which results in low-cost bulk mining methods with low strip ratio. A maximum thickness of 28.5 m has been identified at Makuutu. Processing is via simple acidified salt desorption heap leaching, breaking the chemical ionic bond which washes the rare earths (in a chemical form) from the ore into a pregnant leach solution (“PLS”). The PLS is concentrated up using membrane technology, from which the rare earths are precipitated as a mixed rare earth carbonate product; a product which attracts both a higher payability and achieves a high basket price due to the dominant high value critical and heavy rare earths which make up over 70% of the product basket.

The Project has the potential of generating a high margin product with an operation life exceeding 27 years. The Project is also prospective for a low-cost Scandium co-product.



Figure 3: Makuutu Rare Earths Project Location with major existing infrastructure.



## Existing Infrastructure

One of the Makuutu Rare Earths Project's competitive advantages is its proximity to existing infrastructure. The Makuutu site is approximately 10km from Highway 109 which is a sealed bitumen road connecting to Kampala, to Kenya and on to the Port of Mombasa. All weather access roads connecting the site to the adjacent sealed bitumen highway are already existing. A rail line lies within 10 kilometres north of the Makuutu site near the town of Iganga. There are four hydroelectric power plants located within 65 km of the project area, with total installed generating capacity of approximately 810 MW, providing an abundant supply of cheap power to the Project.

Water will be sourced at the project by harvesting water from the Makuutu site, given the Project location in a positive rainfall environment, and a net positive process water balance will require membrane processes to be used to process site discharge water for reagent recovery. Excess water management will be a key focus of the Project to ensure environmental standards are met and reagent consumption is minimised.

A workforce of semi-skilled and artisanal workers is available in nearby towns and population centres. The closest major population centre is Iganga, which has a population of 50,000. The town of Mayuge is approximately 10 km from the Project site and the intent is to source local operations staff from the immediate districts and train staff accordingly. The operation is to be staffed by a residential workforce. No fly in – fly out is envisaged, and the number of expatriate staff is intended to be low, and to be phased out over time. Industrial facilities are available in the city of Jinja, approximately 40 km from the Project area. Additional industrial facilities are available on the outskirts of Kampala.

## Competent Person Statements

*The information in this Report that relates to Exploration Results for the Makuutu Project is based on information compiled by Mr. Geoff Chapman, who is a Fellow of the Australian Institute of Mining and Metallurgy (AusIMM 111889). Mr. Chapman is a director of geological consultancy GJ Exploration Pty Ltd that is engaged by Ionic Rare Earths Limited. Mr. Chapman has sufficient experience 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 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves' (JORC Code). Mr. Chapman consents to the inclusion in this report of the matters based on the information in the form and context in which it appears.*

*Information in this report that relates to previously reported Exploration Targets and Exploration Results has been cross-referenced in this report to the date that it was originally reported to ASX. Ionic Rare Earths Limited confirms that it is not aware of any new information or data that materially affects information included in the relevant market announcements.*

*The information in this report that relates to Mineral Resources for the Makuutu Rare Earths deposit was first released to the ASX on 3 March 2021 and is available to view on [www.asx.com.au](http://www.asx.com.au). Ionic Rare Earths Limited confirms that it is not aware of any new information or data that materially affects information included in the relevant market announcement, and that all material assumptions and technical parameters underpinning the estimates in the announcement continue to apply and have not materially changed.*

*The information in this report that relates to Scoping Study results and production targets was first released to the ASX on 29 April 2021 and is available to view on [www.asx.com.au](http://www.asx.com.au). Ionic Rare Earths Limited confirms that it is not aware of any new information or data that materially affects information included in the relevant market*

*announcement, and that all material assumptions and technical parameters underpinning the estimates in the announcement continue to apply and have not materially changed.*

### **Forward Looking Statements**

*This announcement has been prepared by Ionic Rare Earths Limited and may include forward-looking statements. Forward-looking statements are only predictions and are subject to risks, uncertainties and assumptions which are outside the control of Ionic Rare Earths Limited. Actual values, results or events may be materially different to those expressed or implied in this document. Given these uncertainties, recipients are cautioned not to place reliance on forward looking statements. Any forward-looking statements in this document speak only at the date of issue of this document. Subject to any continuing obligations under applicable law and the ASX Listing Rules, Ionic Rare Earths Limited does not undertake any obligation to update or revise any information or any of the forward-looking statements in this document or any changes in events, conditions or circumstances on which any such forward looking statement is based.*

Appendix 1: Diamond Core Drilling Analytical Results RRMDD646 to RRMDD711 Including Highlighted Intersections >200 ppm TREO-CeO<sub>2</sub>.

(Note: Rounding will cause minor value differences)

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD646	0.0	2.0	2.0	163.0	334.1	31.5	103.5	15.8	2.4	10.5	1.6	9.3	1.6	5.0	0.7	5.4	0.8	40.3	725.3	Hardcap		
RRMDD646	2.0	4.0	2.0	210.5	561.4	52.1	203.5	37.8	5.9	26.7	3.8	21.2	3.5	9.9	1.3	9.0	1.3	79.0	1226.9	Hardcap		
RRMDD646	4.0	5.0	1.0	104.6	253.1	27.2	105.6	21.5	3.8	17.8	2.8	16.3	3.0	8.4	1.2	8.1	1.1	82.7	657.0	Transition		
RRMDD646	5.0	5.7	0.8	107.3	259.2	31.3	124.2	25.9	4.9	22.6	3.5	19.7	3.6	9.1	1.2	7.7	1.0	89.8	710.9	Clay		
RRMDD646	5.7	6.5	0.8	93.0	220.5	26.8	112.1	24.5	4.9	22.0	3.4	19.0	3.4	8.6	1.1	6.9	1.0	88.5	635.7	Clay		
RRMDD646	6.5	7.3	0.9	57.0	141.3	15.7	63.2	14.4	2.9	14.6	2.3	14.1	2.7	7.3	1.0	6.5	0.9	79.6	423.7	Clay		
RRMDD646	7.3	8.2	0.9	57.5	135.1	15.1	58.9	12.9	2.8	13.5	2.2	14.0	2.9	7.7	1.1	6.6	1.0	85.7	416.8	Clay		
RRMDD646	8.2	9.0	0.9	71.0	165.8	18.5	70.1	13.9	3.0	14.1	2.3	14.9	3.3	9.1	1.2	7.8	1.1	108.1	504.2	Clay		
RRMDD646	9.0	9.9	0.9	64.4	145.6	15.8	57.0	11.1	2.4	10.0	1.6	10.5	2.5	7.6	1.1	7.4	1.1	97.5	435.7	Clay		
RRMDD646	9.9	10.7	0.9	74.2	163.4	17.8	62.8	11.9	2.5	10.2	1.6	9.7	2.2	6.9	1.0	6.7	1.0	87.8	459.8	Clay		
RRMDD646	10.7	11.5	0.7	63.0	143.7	15.7	57.2	11.3	2.4	9.4	1.5	9.1	2.2	7.2	1.1	7.5	1.2	101.3	433.8	Clay		
RRMDD646	11.5	12.2	0.7	73.9	168.3	18.4	68.5	13.5	2.8	11.5	1.7	10.4	2.3	7.2	1.1	7.0	1.1	115.2	502.9	Upper Saprolite		
RRMDD646	12.2	12.9	0.7	95.5	218.7	22.7	80.2	14.6	2.7	11.2	1.7	9.9	2.1	6.2	0.9	5.9	0.9	107.9	581.3	Upper Saprolite		
RRMDD646	12.9	13.8	0.9	74.0	167.1	17.6	62.1	11.7	2.4	9.1	1.4	7.8	1.6	4.4	0.7	4.4	0.6	56.4	421.1	Upper Saprolite		
RRMDD646	13.8	14.7	0.9	68.0	151.7	16.0	58.3	10.9	2.2	8.3	1.2	7.3	1.4	4.1	0.6	4.0	0.6	46.2	380.8	Lower Saprolite	9.7	487
RRMDD646	14.7	15.8	1.1	81.9	189.8	19.3	67.4	12.2	2.4	9.5	1.4	7.6	1.5	4.0	0.6	4.0	0.6	50.3	452.4	Saprock		
RRMDD646	15.8	16.8	1.1	75.1	177.5	17.5	62.2	11.3	2.1	8.5	1.2	6.8	1.3	3.6	0.5	3.4	0.5	43.3	414.8	Saprock		
RRMDD647	0.0	1.5	1.5	109.2	218.0	18.9	62.4	11.5	1.9	8.2	1.3	8.1	1.6	5.0	0.7	5.2	0.8	40.9	493.7	Hardcap		
RRMDD647	1.5	3.1	1.6	111.4	545.4	22.3	78.8	13.5	2.1	9.4	1.5	8.8	1.6	5.2	0.8	5.2	0.8	45.1	851.9	Hardcap		
RRMDD647	3.1	4.6	1.5	111.8	544.2	23.8	85.7	14.9	2.4	10.4	1.6	9.6	1.8	5.6	0.8	5.5	0.9	49.5	868.4	Transition		
RRMDD647	4.6	5.7	1.1	127.8	235.9	24.9	81.2	13.1	2.2	9.5	1.5	8.6	1.7	4.9	0.7	5.0	0.7	50.8	568.5	Transition		
RRMDD647	5.7	6.6	0.9	147.8	238.9	32.3	105.9	18.7	3.3	13.0	1.9	10.4	1.9	5.2	0.8	4.9	0.7	55.7	641.3	Mottled		
RRMDD647	6.6	7.5	0.9	86.4	182.4	20.5	71.9	13.2	2.4	9.8	1.5	8.4	1.7	4.8	0.7	4.9	0.7	50.4	459.7	Mottled		
RRMDD647	7.5	8.3	0.8	118.5	226.6	29.1	105.0	20.2	4.0	16.8	2.6	14.5	2.8	7.6	1.1	7.0	1.0	86.4	643.1	Mottled		
RRMDD647	8.3	9.1	0.8	119.0	269.0	29.4	106.6	20.0	3.8	16.1	2.4	13.1	2.5	6.8	0.9	6.0	0.9	78.0	674.5	Mottled		
RRMDD647	9.1	10.1	1.0	102.4	234.0	26.8	104.5	20.5	4.2	18.6	2.9	17.3	3.6	10.2	1.4	9.0	1.3	121.9	678.6	Clay		
RRMDD647	10.1	11.1	1.0	106.0	253.1	27.4	102.9	18.9	3.6	16.0	2.4	15.0	3.4	9.8	1.5	9.2	1.3	125.1	695.7	Clay		
RRMDD647	11.1	12.0	1.0	84.2	207.0	22.0	83.4	15.2	3.0	13.5	2.0	12.9	3.0	8.9	1.3	8.1	1.2	119.6	585.4	Clay		
RRMDD647	12.0	12.8	0.8	122.0	291.1	29.1	104.3	17.6	3.1	14.2	2.1	12.6	2.8	8.3	1.2	7.6	1.1	120.1	737.3	Clay		
RRMDD647	12.8	13.6	0.8	113.8	273.9	27.1	96.3	16.8	3.1	13.1	2.0	11.5	2.5	7.4	1.1	6.8	1.0	113.3	689.7	Clay		
RRMDD647	13.6	14.6	1.0	88.0	213.1	20.5	73.4	13.3	2.5	9.8	1.5	8.7	1.9	5.7	0.9	5.4	0.9	83.9	529.5	Clay		
RRMDD647	14.6	15.7	1.0	105.1	258.0	24.9	87.6	15.8	3.1	12.0	1.7	9.9	1.9	5.6	0.8	5.2	0.8	73.7	606.0	Upper Saprolite		
RRMDD647	15.7	16.6	0.9	75.1	180.0	17.5	61.7	11.4	2.2	8.3	1.3	7.4	1.5	4.4	0.7	4.5	0.6	49.0	425.4	Upper Saprolite		
RRMDD647	16.6	17.6	0.9	105.4	255.5	24.4	85.0	15.2	2.9	11.3	1.6	9.1	1.7	4.8	0.7	4.5	0.6	57.9	580.7	Upper Saprolite		
RRMDD647	17.6	18.5	0.9	101.0	245.7	23.6	82.6	15.2	3.0	11.1	1.6	8.8	1.7	4.6	0.7	4.4	0.6	56.4	560.9	Upper Saprolite		
RRMDD647	18.5	19.5	0.9	103.8	244.5	24.6	84.7	15.1	2.8	11.2	1.6	9.2	1.8	5.2	0.7	4.8	0.7	56.5	567.3	Lower Saprolite		
RRMDD647	19.5	20.4	0.9	105.8	240.2	25.3	88.9	15.8	3.1	11.7	1.8	9.5	1.8	4.9	0.7	4.5	0.7	54.2	568.8	Lower Saprolite	14.7	600
RRMDD647	20.4	21.3	0.9	59.3	129.0	14.6	52.0	10.0	2.1	7.8	1.2	6.9	1.4	4.0	0.6	3.7	0.6	43.7	337.0	Saprock		
RRMDD647	21.3	22.3	0.9	54.7	118.4	13.4	48.3	9.1	2.0	7.3	1.1	6.5	1.3	3.6	0.5	3.4	0.5	40.0	310.1	Saprock		
RRMDD647	22.3	23.2	0.9	59.9	127.1	14.7	51.7	10.0	2.2	8.0	1.2	6.9	1.3	3.8	0.6	3.5	0.6	40.9	332.4	Saprock		
RRMDD647	23.2	24.1	0.9	66.1	140.7	16.1	57.6	11.1	2.2	8.8	1.4	7.7	1.5	4.4	0.6	4.1	0.6	49.5	372.6	Saprock		
RRMDD648	0.0	2.0	2.0	90.3	316.9	18.3	62.4	11.3	1.7	7.9	1.2	7.8	1.5	4.6	0.7	4.7	0.7	40.0	570.1	Hardcap		
RRMDD648	2.0	4.0	2.0	90.8	316.9	18.8	65.8	12.2	1.9	8.7	1.4	8.9	1.7	5.3	0.8	5.5	0.8	42.8	582.4	Hardcap		
RRMDD648	4.0	6.0	2.0	125.5	227.3	29.5	102.9	16.9	2.4	10.9	1.6	10.3	1.9	6.1	0.9	6.7	1.0	49.0	592.8	Hardcap		
RRMDD648	6.0	6.9	0.9	102.7	245.1	29.7	120.1	23.1	4.4	20.8	3.2	18.2	3.5	9.0	1.1	6.8	0.9	99.8	688.6	Transition		
RRMDD648	6.9	7.8	0.9	56.9	130.8	14.7	53.9	10.7	2.2	9.6	1.5	8.9	1.9	5.6	0.8	5.2	0.8	65.0	368.6	Clay		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD648	7.8	8.7	0.9	72.7	166.4	18.8	68.5	13.5	2.8	11.5	1.8	11.2	2.7	8.5	1.3	8.2	1.3	115.7	504.8	Clay	4.1	436
RRMDD648	8.7	9.7	0.9	81.0	179.3	20.5	74.6	14.0	2.9	11.1	1.7	10.4	2.3	7.0	1.1	7.0	1.1	113.0	527.3	Clay		
RRMDD648	9.7	10.3	0.7	57.3	124.1	14.7	52.8	10.1	2.2	7.9	1.2	7.3	1.5	4.3	0.7	4.3	0.7	53.8	342.9	Upper Saprolite		
RRMDD648	10.3	11.0	0.7	68.5	155.4	17.2	61.9	11.6	2.4	9.2	1.4	7.8	1.5	4.2	0.6	3.8	0.6	49.8	395.9	Lower Saprolite		
RRMDD648	11.0	11.7	0.7	74.2	162.1	17.8	63.8	11.7	2.3	9.2	1.4	7.8	1.6	4.6	0.7	4.2	0.7	50.0	412.0	Saprock		
RRMDD648	11.7	12.5	0.7	96.8	209.4	23.2	80.6	14.1	2.6	10.8	1.6	8.7	1.7	4.7	0.7	4.2	0.6	51.8	511.6	Saprock		
RRMDD648	12.5	13.3	0.9	73.2	161.5	17.9	62.6	11.6	2.3	9.0	1.4	7.6	1.4	4.1	0.6	3.7	0.6	45.5	403.0	Saprock		
RRMDD648	13.3	14.2	0.9	61.7	132.1	14.8	53.1	9.6	1.9	7.6	1.1	6.8	1.4	3.7	0.5	3.7	0.5	42.0	340.6	Saprock		
RRMDD648	14.2	15.0	0.8	85.6	185.5	20.6	71.5	12.9	2.4	9.5	1.4	7.9	1.4	4.0	0.5	3.6	0.5	45.0	452.5	Saprock		
RRMDD649	0.0	1.2	1.2	99.3	378.3	18.5	61.6	10.4	1.7	7.1	1.1	7.2	1.3	4.4	0.7	4.6	0.7	38.5	635.4	Hardcap	15.6	423
RRMDD649	1.2	2.4	1.2	102.9	496.3	18.8	61.2	10.5	1.6	7.6	1.3	6.9	1.3	4.0	0.6	4.5	0.6	38.4	756.3	Hardcap		
RRMDD649	2.4	3.1	0.7	186.5	261.6	42.6	140.6	23.5	3.9	16.4	2.4	13.1	2.4	6.5	0.9	5.8	0.9	74.3	781.5	Transition		
RRMDD649	3.1	4.2	1.0	137.8	238.3	35.3	121.3	21.0	3.7	15.2	2.2	12.2	2.1	5.5	0.8	4.8	0.7	60.4	661.3	Clay		
RRMDD649	4.2	5.2	1.0	91.2	195.3	24.6	90.7	17.5	3.5	13.4	2.1	11.2	2.0	5.4	0.8	4.7	0.7	58.7	521.7	Clay		
RRMDD649	5.2	6.1	0.9	80.2	173.2	20.8	76.0	14.4	3.0	11.6	1.7	9.7	1.8	5.1	0.7	4.6	0.7	54.9	458.3	Clay		
RRMDD649	6.1	7.0	0.9	91.8	205.1	22.8	82.1	15.5	3.1	12.7	1.9	11.0	2.2	5.9	0.8	5.2	0.8	68.8	529.9	Clay		
RRMDD649	7.0	7.8	0.9	88.2	201.5	21.7	77.2	14.3	2.8	11.2	1.7	9.5	1.9	5.4	0.8	5.1	0.8	63.2	505.2	Clay		
RRMDD649	7.8	8.7	0.9	46.2	107.2	11.8	43.0	8.3	1.9	6.6	1.0	6.0	1.1	3.4	0.5	3.3	0.5	35.8	276.9	Clay		
RRMDD649	8.7	9.6	0.9	75.6	170.1	18.5	65.7	12.5	2.5	9.8	1.5	9.0	1.9	5.5	0.9	5.4	0.9	61.5	441.2	Clay		
RRMDD649	9.6	10.4	0.8	73.5	165.2	18.1	65.3	11.8	2.3	9.1	1.4	8.1	1.6	4.7	0.7	4.3	0.6	52.3	419.1	Clay		
RRMDD649	10.4	11.3	0.8	57.3	132.1	14.6	51.8	10.3	2.3	8.4	1.4	8.2	1.7	4.8	0.7	4.4	0.7	49.3	347.9	Clay		
RRMDD649	11.3	12.1	0.8	51.8	120.3	13.2	48.1	9.3	2.0	7.4	1.2	6.9	1.3	3.8	0.6	3.8	0.6	40.0	310.1	Clay		
RRMDD649	12.1	13.0	0.9	62.3	139.4	15.8	56.5	10.9	2.3	8.5	1.3	7.4	1.4	4.1	0.6	3.9	0.6	44.2	359.3	Clay		
RRMDD649	13.0	14.0	0.9	67.2	146.2	16.8	59.8	11.4	2.4	9.2	1.4	8.0	1.6	4.6	0.7	4.4	0.6	50.5	384.9	Clay		
RRMDD649	14.0	14.9	0.9	72.0	160.3	17.6	62.6	11.8	2.5	9.7	1.4	8.3	1.6	4.6	0.7	4.3	0.6	50.4	408.5	Clay		
RRMDD649	14.9	15.8	0.9	70.8	157.8	17.7	63.1	12.1	2.6	9.9	1.4	8.0	1.5	4.3	0.6	4.1	0.6	46.5	401.1	Clay		
RRMDD649	15.8	16.7	0.9	67.8	146.8	16.6	58.7	11.1	2.4	9.0	1.4	8.3	1.7	4.9	0.7	4.5	0.7	53.0	387.4	Clay		
RRMDD649	16.7	17.5	0.8	57.8	125.9	14.0	49.0	9.5	2.1	8.2	1.3	7.7	1.6	4.5	0.7	4.2	0.7	47.4	334.5	Clay		
RRMDD649	17.5	18.3	0.8	71.7	157.2	17.2	61.6	11.5	2.3	9.5	1.5	8.8	1.9	5.4	0.8	5.0	0.8	60.7	415.9	Upper Saprolite		
RRMDD649	18.3	18.8	0.5	62.3	133.3	14.7	52.6	9.6	1.9	8.2	1.2	7.5	1.6	4.8	0.7	4.4	0.7	50.4	354.1	Lower Saprolite		
RRMDD649	18.8	19.7	1.0	92.8	208.2	21.4	75.1	13.7	2.5	10.8	1.5	8.6	1.6	4.5	0.6	3.8	0.6	48.8	494.5	Saprock		
RRMDD649	19.7	20.7	1.0	88.3	203.9	20.7	72.9	13.2	2.4	10.5	1.6	8.6	1.7	4.8	0.7	4.3	0.7	52.1	486.2	Saprock		
RRMDD649	20.7	21.7	1.0	82.1	192.2	19.2	65.8	11.9	2.0	9.2	1.4	7.7	1.5	4.3	0.6	3.8	0.6	46.1	448.5	Saprock		
RRMDD650	0.0	1.5	1.5	128.4	359.9	20.8	62.9	10.2	1.8	7.6	1.3	7.9	1.5	4.9	0.7	4.6	0.6	40.1	653.3	Hardcap	15.6	423
RRMDD650	1.5	3.0	1.5	140.1	616.7	28.8	99.4	16.4	2.4	10.2	1.6	9.5	1.8	5.5	0.8	5.7	0.9	45.6	985.3	Hardcap		
RRMDD650	3.0	4.5	1.5	137.8	734.6	29.5	106.6	18.8	2.8	12.3	2.0	11.7	2.2	6.8	1.0	6.8	1.0	56.0	1129.8	Hardcap		
RRMDD650	4.5	5.5	1.0	135.5	231.6	27.8	92.3	15.7	2.8	12.7	1.9	11.2	2.2	6.3	0.9	6.1	0.9	65.1	612.9	Clay		
RRMDD650	5.5	6.5	1.0	200.5	249.4	41.2	135.9	22.1	3.9	16.4	2.4	12.9	2.4	6.7	0.9	5.8	0.9	70.9	772.2	Clay		
RRMDD650	6.5	7.3	0.9	138.4	280.1	34.4	119.6	21.3	3.8	17.3	2.5	14.3	2.7	7.0	1.0	6.3	0.9	71.5	721.1	Clay		
RRMDD650	7.3	8.2	0.9	116.3	248.1	28.6	103.1	18.9	3.6	16.8	2.5	14.9	3.0	8.4	1.2	7.4	1.1	87.5	661.4	Clay		
RRMDD650	8.2	9.0	0.9	81.7	168.3	21.6	84.8	16.7	3.2	16.0	2.4	15.5	3.5	10.3	1.5	9.2	1.5	124.5	560.9	Clay		
RRMDD650	9.0	9.9	0.9	80.9	180.0	20.2	75.0	13.6	2.5	12.3	1.9	11.8	2.8	8.7	1.3	7.8	1.3	112.6	532.5	Clay		
RRMDD650	9.9	10.7	0.8	75.3	164.6	17.9	64.7	12.0	2.4	10.2	1.5	8.7	1.8	5.2	0.8	4.6	0.7	71.4	441.8	Clay		
RRMDD650	10.7	11.6	1.0	82.3	189.8	19.4	69.2	13.0	2.4	11.0	1.6	9.5	1.9	5.4	0.8	5.0	0.8	59.8	472.0	Clay		
RRMDD650	11.6	12.6	1.0	81.6	182.4	19.0	66.5	12.3	2.4	10.2	1.6	8.7	1.6	4.7	0.7	4.1	0.6	49.9	446.4	Clay		
RRMDD650	12.6	13.6	1.0	78.9	172.0	19.0	67.1	12.6	2.3	9.7	1.4	8.1	1.6	4.6	0.7	4.3	0.7	50.4	433.4	Clay		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval			
																					Length (m)	TREO ppm		
RRMDD650	13.6	14.5	1.0	81.4	179.3	19.0	68.5	12.9	2.4	9.8	1.5	8.1	1.7	4.4	0.7	4.2	0.6	49.4	443.7	Clay	19.4	506		
RRMDD650	14.5	15.5	1.0	84.3	189.8	20.2	71.4	14.0	2.5	10.7	1.6	8.8	1.7	4.8	0.7	4.1	0.6	53.7	469.0	Clay				
RRMDD650	15.5	16.5	1.0	79.8	182.4	18.8	67.1	12.6	2.2	9.7	1.4	8.2	1.7	4.6	0.7	4.2	0.6	49.5	443.5	Clay				
RRMDD650	16.5	17.4	1.0	76.6	175.7	18.3	64.9	12.3	2.2	9.1	1.4	8.2	1.6	4.5	0.7	4.3	0.7	49.4	429.9	Clay				
RRMDD650	17.4	18.4	1.0	75.6	172.6	18.2	64.6	11.9	2.4	9.5	1.4	7.9	1.6	4.3	0.8	4.1	0.6	48.1	423.8	Upper Saprolite				
RRMDD650	18.4	19.4	1.0	83.4	194.7	19.6	70.1	13.0	2.3	9.8	1.5	7.8	1.6	4.2	0.6	3.8	0.6	46.6	459.6	Upper Saprolite				
RRMDD650	19.4	20.2	0.8	84.0	195.3	20.0	70.7	13.3	2.4	9.6	1.5	8.1	1.6	4.4	0.6	4.0	0.6	49.0	465.0	Upper Saprolite				
RRMDD650	20.2	21.0	0.8	85.5	197.8	20.4	72.2	13.7	2.5	10.0	1.6	8.7	1.7	4.6	0.7	4.3	0.6	51.6	475.7	Upper Saprolite				
RRMDD650	21.0	21.8	0.8	82.9	194.7	19.6	70.3	13.0	2.4	10.0	1.5	8.4	1.7	4.9	0.7	4.3	0.6	53.3	468.4	Upper Saprolite				
RRMDD650	21.8	22.7	0.8	79.4	183.6	19.0	68.1	12.8	2.4	9.6	1.4	7.7	1.5	3.9	0.6	3.8	0.6	45.3	439.7	Lower Saprolite				
RRMDD650	22.7	23.3	0.6	88.4	205.1	21.0	74.9	14.0	2.5	10.3	1.5	8.5	1.7	4.4	0.6	4.1	0.6	51.7	489.5	Lower Saprolite				
RRMDD650	23.3	23.9	0.6	81.3	188.6	19.8	70.2	13.4	2.5	10.0	1.5	8.2	1.6	4.4	0.7	4.1	0.6	49.8	456.6	Lower Saprolite				
RRMDD650	23.9	24.5	0.7	91.9	217.4	21.9	77.3	14.3	2.6	10.8	1.6	8.8	1.7	4.7	0.7	4.5	0.6	53.6	512.4	Saprock				
RRMDD650	24.5	25.5	1.0	89.5	203.9	21.4	75.7	14.2	2.6	10.2	1.5	8.2	1.5	4.2	0.6	3.6	0.6	47.6	485.4	Saprock				
RRMDD650	25.5	26.5	1.0	79.4	184.9	19.1	68.7	13.3	2.4	9.9	1.5	8.2	1.6	4.4	0.7	4.1	0.6	51.0	449.8	Saprock				
RRMDD650	26.5	27.5	1.0	66.8	152.9	16.4	59.3	11.1	2.2	8.5	1.3	7.0	1.4	3.7	0.5	3.6	0.5	41.5	376.7	Saprock				
RRMDD651	0.0	1.8	1.8	84.1	441.0	15.3	52.4	9.7	1.5	7.2	1.2	7.1	1.3	4.3	0.6	4.6	0.7	36.1	667.0	Hardcap	6.3	598		
RRMDD651	1.8	3.5	1.8	126.1	917.6	26.8	94.2	17.0	2.6	11.3	1.9	11.4	2.0	6.6	0.9	6.7	1.0	50.4	1276.5	Hardcap				
RRMDD651	3.5	4.2	0.7	124.3	353.8	27.2	95.4	18.0	3.1	15.5	2.5	14.5	2.9	8.1	1.2	7.6	1.1	76.3	751.5	Transition				
RRMDD651	4.2	5.0	0.8	92.5	192.2	25.5	98.4	19.0	3.6	17.9	2.8	15.6	3.0	7.7	1.0	6.2	0.9	80.0	566.4	Clay				
RRMDD651	5.0	5.8	0.8	82.4	173.2	20.8	79.3	15.1	3.0	14.9	2.4	13.9	2.8	7.4	1.1	6.4	1.0	80.3	504.0	Clay				
RRMDD651	5.8	6.4	0.5	124.9	283.8	31.5	118.4	23.5	4.6	23.6	3.6	21.4	4.1	10.2	1.3	7.7	1.2	114.5	774.4	Pallid				
RRMDD651	6.4	6.9	0.5	97.0	215.6	23.3	85.5	16.5	3.3	15.7	2.4	15.0	3.2	8.9	1.3	7.4	1.1	97.3	593.3	Pallid				
RRMDD651	6.9	7.8	0.9	93.2	207.0	22.5	81.3	15.2	3.0	14.8	2.2	13.6	3.0	8.2	1.2	6.9	1.0	90.5	563.6	Clay				
RRMDD651	7.8	8.6	0.9	97.0	220.5	24.0	87.2	16.3	3.4	15.5	2.4	15.2	3.6	10.9	1.6	10.1	1.6	139.7	649.0	Clay				
RRMDD651	8.6	9.5	0.9	80.6	187.9	20.5	74.9	13.3	2.7	12.5	2.0	13.5	3.5	11.8	1.8	11.2	2.0	180.3	618.4	Clay				
RRMDD651	9.5	10.5	1.0	95.2	219.3	22.3	79.2	14.8	2.8	12.5	1.9	11.3	2.4	6.6	0.9	5.8	0.9	98.0	574.0	Upper Saprolite				
RRMDD651	10.5	11.3	0.8	88.8	199.6	20.4	71.4	12.8	2.4	10.4	1.5	8.6	1.7	4.8	0.7	4.3	0.6	53.1	481.1	Saprock				
RRMDD651	11.3	12.0	0.8	78.3	174.4	18.2	64.5	11.8	2.2	9.5	1.4	7.7	1.5	4.3	0.6	3.8	0.6	47.5	426.4	Saprock				
RRMDD652	0.0	2.0	2.0	127.2	256.7	26.9	95.6	16.4	2.5	11.2	1.6	9.2	1.7	5.2	0.7	5.2	0.8	46.0	607.0	Transition			10.8	493
RRMDD652	2.0	2.9	0.9	108.8	221.7	26.6	95.3	17.9	3.0	13.3	2.1	11.1	2.1	5.7	0.8	4.9	0.8	61.3	575.4	Clay				
RRMDD652	2.9	3.8	0.9	109.2	237.1	25.9	91.4	17.2	3.1	13.1	2.0	10.5	2.1	5.8	0.9	5.2	0.8	63.5	587.8	Clay				
RRMDD652	3.8	4.8	1.0	106.0	243.8	25.3	89.8	16.7	3.0	12.7	1.9	10.7	2.2	6.3	0.9	5.8	0.9	73.1	599.2	Clay				
RRMDD652	4.8	5.8	1.0	95.9	216.8	22.9	82.6	16.3	2.9	13.0	2.0	11.4	2.4	6.3	0.9	6.1	0.9	76.7	557.2	Clay				
RRMDD652	5.8	6.9	1.0	88.0	201.5	20.9	73.9	13.9	2.5	10.7	1.7	9.1	1.9	5.3	0.8	4.9	0.8	64.4	500.3	Clay				
RRMDD652	6.9	7.7	0.9	82.8	191.0	19.7	71.3	13.8	2.6	11.0	1.7	9.7	2.0	5.4	0.8	5.2	0.8	63.7	481.5	Clay				
RRMDD652	7.7	8.6	0.9	75.5	173.2	18.1	63.9	11.8	2.3	9.7	1.5	8.1	1.7	4.5	0.7	4.5	0.7	55.4	431.5	Clay				
RRMDD652	8.6	9.4	0.9	76.1	172.0	18.2	65.0	12.6	2.4	9.7	1.5	8.1	1.6	4.3	0.6	4.1	0.6	50.3	427.0	Clay				
RRMDD652	9.4	10.3	0.9	72.1	162.8	16.9	61.4	11.2	2.2	8.9	1.4	7.2	1.4	4.0	0.6	3.8	0.6	45.5	399.9	Clay				
RRMDD652	10.3	11.1	0.9	81.6	188.6	19.5	69.1	12.9	2.4	10.2	1.5	8.2	1.6	4.3	0.6	4.0	0.6	48.4	453.3	Clay				
RRMDD652	11.1	11.9	0.8	92.1	208.2	21.4	75.3	13.7	2.5	10.5	1.5	8.2	1.6	4.2	0.6	3.9	0.5	48.1	492.5	Upper Saprolite				
RRMDD652	11.9	12.8	0.9	65.2	149.9	16.7	58.6	11.5	2.2	9.2	1.2	8.0	1.4	4.2	0.6	3.9	0.6	43.7	376.8	Lower Saprolite				
RRMDD652	12.8	13.5	0.6	60.6	138.2	15.5	54.1	11.1	2.1	8.2	1.1	6.9	1.3	4.2	0.6	3.6	0.5	40.1	348.1	Saprock				
RRMDD652	13.5	14.1	0.6	72.7	166.4	17.4	63.2	11.3	2.3	8.9	1.3	7.3	1.4	4.0	0.6	3.9	0.6	45.1	406.3	Saprock				
RRMDD653	0.0	2.0	2.0	96.8	906.6	17.6	60.2	10.9	1.7	7.6	1.3	7.9	1.5	5.0	0.7	4.7	0.7	39.1	1162.2	Hardcap				
RRMDD653	2.0	4.0	2.0	132.5	689.1	25.1	84.0	14.2	2.0	9.2	1.5	8.8	1.6	5.3	0.8	5.6	0.9	43.4	1024.0	Transition				

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD653	4.0	6.0	2.0	131.4	412.7	28.4	101.9	17.0	2.5	11.2	1.7	10.5	1.9	5.9	0.9	6.1	0.9	55.7	788.8	Transition		
RRMDD653	6.0	7.0	1.0	139.6	223.0	34.1	120.7	20.6	3.8	16.6	2.5	13.7	2.6	7.1	1.1	6.6	1.0	75.1	667.8	Clay		
RRMDD653	7.0	8.0	1.0	108.0	220.5	28.8	106.8	19.8	3.9	17.2	2.6	14.5	2.7	7.0	1.0	6.5	0.9	77.6	617.8	Clay		
RRMDD653	8.0	9.0	1.0	98.9	215.6	25.0	92.8	17.7	3.5	17.1	2.6	14.9	3.0	7.9	1.1	6.8	1.0	88.6	596.6	Clay		
RRMDD653	9.0	9.7	0.8	82.2	192.9	20.5	78.5	15.6	3.1	14.7	2.3	13.3	2.9	8.6	1.3	7.9	1.2	103.5	548.5	Clay		
RRMDD653	9.7	10.5	0.8	82.8	195.9	20.5	76.0	14.3	2.9	13.0	2.0	12.4	2.9	8.5	1.3	7.8	1.2	104.5	546.0	Clay		
RRMDD653	10.5	11.3	0.8	81.6	191.0	20.7	77.3	14.2	3.0	13.1	2.1	13.1	3.4	11.0	1.7	11.3	1.8	166.4	611.6	Clay		
RRMDD653	11.3	12.2	0.9	83.0	190.4	20.1	73.9	13.0	2.6	10.6	1.6	9.5	2.3	7.3	1.1	7.2	1.2	120.6	544.5	Clay		
RRMDD653	12.2	13.1	0.9	82.4	192.2	19.8	69.9	12.5	2.6	9.9	1.5	8.5	1.6	4.7	0.7	4.5	0.6	52.7	464.1	Upper Saprolite		
RRMDD653	13.1	14.0	0.9	81.3	184.9	19.6	71.3	12.9	2.6	10.3	1.5	8.2	1.6	4.5	0.7	4.3	0.6	50.3	454.6	Upper Saprolite		
RRMDD653	14.0	14.9	0.9	66.6	151.1	15.7	55.9	10.3	2.0	8.1	1.2	7.2	1.5	4.4	0.7	4.2	0.6	47.5	377.0	Lower Saprolite		
RRMDD653	14.9	15.8	1.0	77.2	172.0	18.5	66.4	11.9	2.4	9.7	1.4	7.6	1.5	4.2	0.6	3.8	0.6	46.7	424.6	Lower Saprolite	9.8	534
RRMDD653	15.8	16.9	1.1	63.6	143.7	15.5	55.2	10.0	2.1	8.3	1.2	6.9	1.4	3.9	0.6	4.0	0.6	44.7	361.7	Saprock		
RRMDD653	16.9	18.0	1.1	67.7	151.7	16.5	59.3	10.5	2.3	8.6	1.2	6.9	1.3	3.9	0.6	3.6	0.5	42.2	376.8	Saprock		
RRMDD654	0.0	1.2	1.2	92.3	870.9	17.3	57.4	10.5	1.6	6.8	1.2	7.0	1.3	4.0	0.6	4.5	0.7	32.1	1108.0	Hardcap		
RRMDD654	1.2	2.5	1.2	134.9	477.8	28.5	104.9	18.1	2.6	11.2	1.7	10.2	1.9	5.9	0.8	5.7	0.8	52.1	857.2	Transition		
RRMDD654	2.5	3.4	1.0	121.4	161.5	26.8	90.2	15.2	2.6	11.1	1.6	9.3	1.8	5.2	0.8	5.3	0.8	52.7	506.3	Clay		
RRMDD654	3.4	4.4	1.0	126.7	202.1	30.2	103.2	17.6	3.1	13.2	1.9	10.3	2.0	5.6	0.8	5.4	0.8	57.4	580.2	Clay		
RRMDD654	4.4	5.2	0.8	114.3	250.6	30.6	115.8	23.1	4.7	20.3	3.1	16.6	3.2	8.7	1.2	7.5	1.1	92.1	692.8	Clay		
RRMDD654	5.2	5.9	0.8	111.7	244.5	29.8	119.6	23.8	4.6	21.4	3.4	19.7	4.0	11.2	1.6	10.2	1.4	125.1	732.0	Clay		
RRMDD654	5.9	6.7	0.8	96.4	226.6	25.6	98.3	18.0	3.6	16.7	2.6	15.5	3.3	9.6	1.4	9.0	1.3	111.0	638.9	Clay		
RRMDD654	6.7	7.7	1.0	100.6	227.3	29.8	120.7	20.7	4.1	22.1	3.3	21.1	5.4	16.6	2.5	15.1	2.4	231.1	822.8	Clay		
RRMDD654	7.7	8.6	0.9	99.0	238.9	24.6	87.9	15.0	2.8	12.0	1.8	10.4	2.3	6.8	1.0	6.3	1.0	93.1	602.9	Clay		
RRMDD654	8.6	9.6	1.0	80.5	187.9	19.0	67.9	11.8	2.3	9.1	1.3	7.3	1.4	4.0	0.6	4.1	0.6	44.8	442.8	Clay		
RRMDD654	9.6	10.5	0.9	86.4	208.2	20.8	75.2	12.9	2.5	10.9	1.6	8.8	1.9	5.4	0.8	5.0	0.8	60.4	501.7	Upper Saprolite		
RRMDD654	10.5	11.3	0.8	106.3	258.0	24.8	87.5	15.2	2.8	11.5	1.6	8.7	1.6	4.2	0.6	3.7	0.6	49.5	576.5	Lower Saprolite		
RRMDD654	11.3	12.1	0.8	107.5	259.2	25.4	89.1	15.4	3.0	12.2	1.7	9.1	1.6	4.0	0.6	3.5	0.6	48.9	581.8	Lower Saprolite	9.7	604
RRMDD654	12.1	12.9	0.8	79.2	192.9	18.7	68.8	12.2	2.4	9.5	1.3	7.3	1.5	4.2	0.6	4.1	0.6	44.2	447.5	Saprock		
RRMDD654	12.9	13.8	0.9	83.7	204.5	19.9	69.9	12.2	2.3	9.1	1.3	7.4	1.5	4.3	0.7	4.3	0.6	48.4	470.2	Saprock		
RRMDD654	13.8	14.9	1.1	87.6	214.4	20.9	74.2	12.6	2.5	10.0	1.4	7.6	1.5	4.3	0.6	3.7	0.6	47.7	489.4	Saprock		
RRMDD654	14.9	16.0	1.1	84.2	198.4	19.6	70.2	12.0	2.5	9.8	1.4	7.5	1.5	4.4	0.7	4.0	0.6	47.1	463.7	Saprock		
RRMDD655	0.0	1.7	1.7	99.0	294.8	21.0	73.6	13.4	2.1	9.7	1.5	9.4	1.8	5.6	0.8	5.8	0.9	50.8	590.2	Hardcap		
RRMDD655	1.7	3.4	1.7	174.2	772.7	34.7	115.9	19.4	2.7	12.3	2.0	12.0	2.3	6.7	1.0	7.1	1.1	57.5	1221.5	Hardcap		
RRMDD655	3.4	4.3	0.9	141.9	335.4	33.8	115.4	20.1	3.8	16.1	2.5	13.5	2.5	6.8	1.0	6.3	0.9	67.1	767.0	Mottled		
RRMDD655	4.3	5.2	0.9	97.8	188.6	25.3	92.3	18.1	3.4	15.4	2.3	13.1	2.6	7.0	1.1	6.5	0.9	74.0	548.4	Mottled		
RRMDD655	5.2	6.2	0.9	115.3	218.7	33.5	130.6	25.2	4.8	22.9	3.5	20.1	4.2	11.3	1.7	10.5	1.5	128.3	731.9	Mottled		
RRMDD655	6.2	7.1	0.9	94.2	196.5	26.5	104.3	21.1	4.2	21.5	3.4	20.3	4.6	12.9	1.8	11.5	1.7	160.6	685.0	Mottled		
RRMDD655	7.1	7.9	0.9	74.6	166.4	21.3	85.1	16.1	3.2	15.7	2.4	15.0	3.4	9.8	1.5	8.8	1.4	126.0	550.6	Clay		
RRMDD655	7.9	8.8	0.9	72.8	162.8	19.8	77.1	13.7	2.7	13.5	1.9	11.8	2.8	8.3	1.2	7.2	1.1	121.1	518.0	Upper Saprolite		
RRMDD655	8.8	9.7	0.9	70.0	157.2	17.5	63.5	11.9	2.4	10.3	1.5	9.0	2.0	5.6	0.8	5.1	0.8	87.8	445.3	Upper Saprolite		
RRMDD655	9.7	10.5	0.8	66.1	149.9	16.0	57.7	10.9	2.3	9.2	1.4	7.7	1.6	4.4	0.6	4.0	0.6	50.9	383.4	Upper Saprolite		
RRMDD655	10.5	11.3	0.8	63.2	143.7	15.4	54.4	10.1	2.2	8.0	1.3	6.9	1.3	3.8	0.6	3.7	0.5	43.9	359.0	Upper Saprolite		
RRMDD655	11.3	12.3	1.0	55.7	122.8	13.5	46.4	8.7	1.7	6.3	1.0	5.3	1.1	3.1	0.5	3.2	0.5	33.7	303.4	Upper Saprolite	8.0	560
RRMDD655	12.3	13.0	0.6	36.6	73.6	8.3	27.6	4.8	1.0	3.7	0.6	3.3	0.7	2.0	0.3	2.3	0.4	20.6	185.9	Upper Saprolite		
RRMDD655	13.0	13.6	0.6	42.5	87.3	10.7	36.6	5.8	1.1	4.1	0.6	3.1	0.6	1.7	0.3	1.8	0.3	17.7	214.2	Upper Saprolite		
RRMDD655	13.6	14.5	0.9	63.3	145.6	15.4	56.5	10.7	2.2	8.5	1.3	7.3	1.5	4.1	0.6	4.0	0.6	46.9	368.4	Upper Saprolite		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval			
																					Length (m)	TREO ppm		
RRMDD655	14.5	15.3	0.8	59.1	137.6	14.4	51.4	10.3	2.2	8.6	1.3	7.0	1.4	4.0	0.6	3.7	0.5	43.6	345.6	Lower Saprolite	2.6	354		
RRMDD655	15.3	16.2	0.8	59.9	138.8	14.7	52.4	10.2	2.2	8.3	1.3	7.0	1.4	4.0	0.6	3.9	0.6	43.3	348.6	Lower Saprolite				
RRMDD655	16.2	17.0	0.8	62.7	145.6	15.3	54.6	10.7	2.1	8.0	1.2	6.9	1.4	3.9	0.5	3.7	0.5	41.8	358.6	Saprock				
RRMDD655	17.0	18.0	1.0	49.6	116.0	12.3	44.2	8.4	1.8	6.4	1.0	5.5	1.1	3.1	0.5	3.0	0.5	35.9	289.3	Saprock				
RRMDD655	18.0	19.0	1.0	55.7	129.0	13.7	49.1	9.2	1.8	7.0	1.1	5.9	1.2	3.4	0.5	3.4	0.5	37.8	319.3	Saprock				
RRMDD655	19.0	20.1	1.0	60.0	138.8	14.9	53.2	9.9	2.0	7.9	1.1	6.1	1.2	3.3	0.5	3.2	0.5	37.1	339.7	Saprock				
RRMDD655	20.1	21.1	1.0	49.3	112.0	11.9	43.3	8.2	1.6	6.3	0.9	5.2	1.1	2.8	0.4	2.9	0.4	31.9	278.3	Saprock				
RRMDD656	0.0	2.0	2.0	87.7	280.1	17.9	62.4	12.3	2.1	10.0	1.7	9.9	2.0	6.1	0.9	5.9	0.9	55.1	555.2	Hardcap				
RRMDD656	2.0	3.9	2.0	143.1	368.5	27.3	88.1	14.8	2.2	10.3	1.7	9.6	1.8	5.6	0.8	5.7	0.8	50.5	730.9	Transition				
RRMDD656	3.9	4.7	0.8	140.1	197.8	31.1	103.8	17.3	3.0	13.2	2.0	11.1	2.2	6.1	0.9	5.9	0.9	62.2	597.6	Clay				
RRMDD656	4.7	5.5	0.8	129.0	229.1	32.7	116.3	21.4	4.1	17.4	2.7	14.5	2.6	6.9	1.0	6.1	0.9	74.5	659.3	Clay				
RRMDD656	5.5	6.2	0.8	93.7	177.5	23.2	84.3	16.4	3.3	14.3	2.3	12.9	2.5	6.9	1.0	6.2	0.9	70.0	515.4	Clay				
RRMDD656	6.2	7.2	1.0	89.5	198.4	22.3	81.3	15.4	3.0	13.8	2.1	12.1	2.4	6.5	0.9	6.0	0.9	70.9	525.3	Clay				
RRMDD656	7.2	8.1	1.0	102.7	230.9	25.0	94.0	17.5	3.5	16.0	2.4	14.3	3.1	8.7	1.3	8.4	1.3	108.1	637.2	Clay				
RRMDD656	8.1	9.1	0.9	79.6	179.3	20.5	77.8	14.4	2.9	13.4	2.0	12.5	3.2	10.0	1.6	9.9	1.7	155.6	584.4	Clay				
RRMDD656	9.1	10.0	0.9	75.6	168.9	17.9	64.6	11.7	2.4	9.5	1.5	8.3	1.7	4.9	0.7	4.5	0.7	60.3	433.4	Clay				
RRMDD656	10.0	11.0	0.9	70.7	157.8	17.4	61.5	11.1	2.4	9.0	1.3	7.2	1.4	3.8	0.6	3.6	0.5	43.2	391.5	Clay				
RRMDD656	11.0	11.9	0.9	77.5	173.8	19.0	68.5	12.9	2.7	10.3	1.6	8.4	1.7	4.3	0.7	4.1	0.6	50.5	436.6	Clay				
RRMDD656	11.9	12.8	0.9	78.6	179.3	19.2	69.2	12.2	2.5	9.9	1.5	8.4	1.7	4.6	0.7	4.3	0.6	49.4	442.2	Clay				
RRMDD656	12.8	13.8	0.9	87.7	202.1	21.2	75.3	13.2	2.5	10.8	1.6	8.6	1.6	4.4	0.7	4.1	0.6	51.2	485.7	Clay				
RRMDD656	13.8	14.8	1.0	84.0	190.4	20.7	71.9	12.9	2.6	10.1	1.5	8.0	1.5	4.2	0.6	4.0	0.6	47.1	460.0	Upper Saprolite				
RRMDD656	14.8	15.9	1.0	82.0	188.6	20.1	70.7	12.9	2.7	10.3	1.5	8.4	1.7	4.6	0.7	4.1	0.6	50.9	459.7	Upper Saprolite				
RRMDD656	15.9	16.8	0.9	75.5	182.4	19.2	68.4	11.8	2.6	10.0	1.6	8.5	1.7	4.6	0.7	4.3	0.6	51.8	443.7	Lower Saprolite				
RRMDD656	16.8	17.7	0.9	59.8	141.3	15.1	53.3	9.6	2.1	8.2	1.3	7.2	1.5	4.0	0.6	4.0	0.6	43.6	352.0	Saprock				
RRMDD656	17.7	18.7	0.9	68.7	156.6	17.2	60.5	10.7	2.3	8.9	1.4	7.4	1.5	3.9	0.6	3.7	0.6	46.0	390.0	Saprock				
RRMDD656	18.7	19.6	0.9	59.8	133.3	15.2	54.0	9.7	2.1	8.0	1.2	6.6	1.3	3.7	0.6	3.6	0.6	41.8	341.3	Saprock				
RRMDD657	0.0	1.7	1.7	75.2	162.1	14.4	48.2	8.8	1.5	7.1	1.2	7.8	1.6	4.9	0.8	5.0	0.7	41.7	380.8	Hardcap				
RRMDD657	1.7	3.5	1.7	91.6	479.1	17.3	57.6	11.1	1.8	8.4	1.6	8.7	1.7	5.2	0.8	5.9	0.8	41.0	732.6	Hardcap				
RRMDD657	3.5	4.1	0.6	209.3	277.6	49.3	172.6	28.3	4.9	20.5	3.1	16.8	3.2	8.8	1.3	8.3	1.2	86.9	892.1	Transition				
RRMDD657	4.1	4.7	0.6	202.9	250.6	51.6	190.1	33.2	5.6	22.9	3.3	17.4	3.2	8.4	1.2	7.5	1.1	86.4	885.5	Transition				
RRMDD657	4.7	5.5	0.8	97.9	199.6	28.0	110.7	21.9	4.4	19.9	3.0	17.0	3.2	8.5	1.2	7.4	1.1	88.1	612.1	Clay				
RRMDD657	5.5	6.2	0.8	128.4	265.3	35.9	147.0	29.5	6.0	27.8	4.3	23.0	4.1	9.9	1.3	7.5	1.1	100.1	790.9	Clay				
RRMDD657	6.2	7.0	0.8	112.7	237.1	29.7	116.4	23.2	4.7	22.8	3.5	19.3	3.7	9.5	1.3	7.6	1.1	96.9	689.5	Clay				
RRMDD657	7.0	7.8	0.7	81.5	183.0	20.4	76.2	14.8	3.0	14.2	2.4	14.0	2.9	7.6	1.1	6.5	1.0	75.4	504.0	Clay				
RRMDD657	7.8	8.5	0.7	74.2	167.1	17.7	65.4	13.2	2.8	12.4	2.0	11.8	2.6	7.1	1.1	6.7	1.0	77.0	461.8	Clay				
RRMDD657	8.5	9.2	0.7	96.1	213.1	23.0	84.0	15.7	3.3	15.6	2.5	15.4	3.8	11.7	1.8	11.4	1.8	152.4	651.4	Clay				
RRMDD657	9.2	10.2	0.9	81.5	183.0	19.7	72.9	13.3	2.5	11.6	1.9	11.1	2.8	9.1	1.4	8.8	1.5	156.8	578.0	Upper Saprolite				
RRMDD657	10.2	11.1	0.9	89.3	199.0	21.3	75.2	13.2	2.5	10.7	1.6	9.1	1.9	5.2	0.8	5.0	0.8	62.2	497.8	Upper Saprolite				
RRMDD657	11.1	11.8	0.7	90.4	200.2	21.6	76.2	13.6	2.6	11.0	1.7	8.9	1.7	4.7	0.7	4.2	0.6	53.7	491.8	Lower Saprolite				
RRMDD657	11.8	12.5	0.7	82.9	181.2	19.1	66.7	12.0	2.3	10.2	1.6	9.0	1.9	5.2	0.8	5.0	0.7	58.8	457.4	Lower Saprolite				
RRMDD657	12.5	13.5	1.0	88.3	193.5	20.7	73.0	12.8	2.5	10.2	1.6	8.7	1.7	4.8	0.7	4.4	0.7	51.7	475.1	Saprock				
RRMDD658	0.0	1.7	1.7	57.8	165.8	11.9	42.8	8.3	1.4	6.0	1.0	6.8	1.3	4.0	0.6	4.4	0.7	32.9	345.6	Hardcap			7.8	574
RRMDD658	1.7	3.4	1.7	67.6	361.1	16.1	59.4	12.9	2.3	9.3	1.6	10.4	1.9	6.1	0.9	6.6	1.0	44.8	602.1	Hardcap				
RRMDD658	3.4	5.1	1.7	82.7	680.5	19.0	70.2	15.0	2.7	11.3	2.2	12.3	2.4	7.3	1.1	7.9	1.0	50.8	966.5	Transition				
RRMDD658	5.1	6.1	0.9	107.4	240.8	30.3	111.4	20.6	4.0	15.6	2.2	11.5	2.1	5.4	0.8	4.9	0.7	53.0	610.7	Clay				
RRMDD658	6.1	7.0	0.9	139.0	258.0	50.6	212.3	41.9	8.3	39.1	6.0	35.7	8.0	22.3	3.1	18.7	2.8	299.7	1145.5	Clay				

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD658	7.0	7.9	0.9	104.4	226.0	37.5	175.0	36.4	7.8	42.2	6.7	40.9	9.1	24.5	3.3	19.0	2.7	334.0	1069.3	Clay	11.2	584
RRMDD658	7.9	8.8	0.9	78.9	184.3	24.5	102.3	21.5	4.4	22.9	3.9	25.2	6.3	18.6	2.7	16.0	2.5	274.3	788.2	Clay		
RRMDD658	8.8	9.8	0.9	78.9	178.7	20.3	78.3	14.8	2.9	13.2	1.8	10.6	2.3	6.1	0.9	5.4	0.8	85.8	500.9	Clay		
RRMDD658	9.8	10.8	1.0	73.7	165.8	17.5	63.0	12.0	2.5	10.3	1.5	8.8	1.9	5.3	0.8	4.9	0.7	74.0	442.5	Clay		
RRMDD658	10.8	11.8	1.0	72.0	171.4	17.5	60.8	11.5	2.2	8.8	1.3	7.1	1.4	3.9	0.6	4.0	0.6	47.4	410.5	Upper Saprolite		
RRMDD658	11.8	12.8	1.0	74.7	176.3	18.1	64.0	11.9	2.4	9.6	1.4	7.6	1.5	4.1	0.6	3.8	0.6	50.7	427.2	Lower Saprolite		
RRMDD658	12.8	13.9	1.0	71.2	163.4	17.1	60.2	11.7	2.4	9.0	1.3	8.2	1.7	4.7	0.7	4.3	0.6	54.4	410.7	Lower Saprolite		
RRMDD658	13.9	14.9	1.1	78.0	178.7	18.7	66.5	12.8	2.5	10.1	1.5	8.0	1.6	4.3	0.6	4.0	0.6	52.4	440.5	Lower Saprolite		
RRMDD658	14.9	15.6	0.7	70.5	164.6	16.9	59.8	10.8	2.4	9.0	1.4	7.2	1.4	3.9	0.6	3.9	0.6	40.5	393.4	Lower Saprolite		
RRMDD658	15.6	16.4	0.7	70.5	163.4	16.6	59.0	10.7	2.2	8.7	1.3	7.1	1.4	3.9	0.6	3.8	0.6	39.2	389.1	Lower Saprolite		
RRMDD658	16.4	17.1	0.8	78.1	183.0	18.5	65.9	11.9	2.4	9.8	1.4	7.6	1.5	4.1	0.6	3.9	0.6	44.6	434.1	Saprock		
RRMDD658	17.1	18.1	1.0	80.5	186.1	19.1	67.5	12.3	2.5	10.1	1.6	9.0	1.8	4.8	0.7	4.7	0.7	56.0	457.5	Saprock		
RRMDD658	18.1	19.1	1.0	76.8	173.8	17.9	63.7	11.4	2.4	9.3	1.4	7.7	1.5	4.1	0.6	4.0	0.6	44.7	419.9	Saprock		
RRMDD658	19.1	20.0	0.9	73.2	168.3	17.5	61.6	11.3	2.3	8.8	1.3	7.1	1.4	3.6	0.5	3.5	0.5	39.1	400.0	Saprock		
RRMDD658	20.0	20.9	0.9	72.5	171.4	17.3	61.0	11.2	2.2	9.3	1.4	7.9	1.6	4.4	0.7	4.1	0.6	49.0	414.7	Saprock		
RRMDD658	20.9	21.9	0.9	76.0	182.4	18.2	64.3	11.3	2.4	9.4	1.4	7.6	1.5	4.0	0.6	3.7	0.6	43.3	426.7	Saprock		
RRMDD658	21.9	22.8	0.9	70.4	164.6	16.9	59.5	10.8	2.2	8.9	1.3	7.5	1.5	4.1	0.6	3.7	0.6	44.6	397.1	Saprock		
RRMDD659	0.0	1.4	1.4	75.2	197.8	13.4	44.7	7.9	1.3	6.3	1.1	6.2	1.3	4.0	0.6	4.3	0.6	34.5	399.1	Hardcap		
RRMDD659	1.4	2.9	1.4	103.0	485.2	19.0	62.8	11.5	1.8	7.5	1.3	7.7	1.5	4.6	0.7	4.9	0.7	37.3	749.3	Hardcap		
RRMDD659	2.9	3.6	0.7	164.2	294.8	52.4	201.2	36.6	6.9	30.9	4.6	24.0	4.1	9.8	1.3	8.0	1.1	102.4	942.5	Clay		
RRMDD659	3.6	4.3	0.7	136.0	258.0	41.0	155.7	28.3	5.6	25.6	4.0	21.3	3.7	9.3	1.2	7.5	1.1	91.7	790.0	Clay		
RRMDD659	4.3	5.0	0.7	103.2	217.4	28.5	110.9	21.6	4.5	21.9	3.5	19.2	3.6	9.2	1.2	7.4	1.1	95.1	648.4	Clay		
RRMDD659	5.0	5.8	0.9	94.9	213.7	24.2	92.8	17.7	3.6	18.6	2.9	17.4	3.7	10.2	1.4	8.4	1.2	110.5	621.3	Clay		
RRMDD659	5.8	6.7	0.9	90.8	208.8	23.8	86.9	15.4	3.1	14.6	2.3	14.3	3.6	11.0	1.7	10.2	1.6	146.0	634.2	Clay		
RRMDD659	6.7	7.6	0.9	91.7	208.2	21.6	79.1	14.1	2.9	12.2	1.8	11.4	2.9	9.3	1.4	9.2	1.6	156.2	623.5	Clay		
RRMDD659	7.6	8.5	1.0	80.7	184.3	19.4	69.4	12.3	2.5	9.8	1.5	7.6	1.5	4.0	0.6	3.7	0.6	53.2	451.1	Clay		
RRMDD659	8.5	9.5	1.0	81.6	187.9	19.5	69.4	12.3	2.5	10.3	1.5	8.9	1.8	4.9	0.7	4.5	0.7	55.4	462.0	Upper Saprolite		
RRMDD659	9.5	10.4	1.0	87.4	200.8	20.9	75.3	13.1	2.5	10.4	1.6	8.8	1.8	5.0	0.7	4.6	0.7	57.3	491.0	Upper Saprolite		
RRMDD659	10.4	11.2	0.8	91.8	209.4	22.3	76.9	13.9	2.7	11.4	1.6	8.9	1.7	4.3	0.6	3.9	0.6	48.5	498.6	Lower Saprolite		
RRMDD659	11.2	12.0	0.8	74.5	166.4	18.1	64.2	11.8	2.3	9.6	1.4	7.6	1.5	4.1	0.6	3.7	0.6	46.6	413.0	Lower Saprolite		
RRMDD659	12.0	12.9	0.9	70.6	159.1	17.3	61.1	10.7	2.2	8.9	1.3	7.2	1.4	3.9	0.6	3.8	0.6	43.9	392.6	Lower Saprolite		
RRMDD659	12.9	13.7	0.9	69.3	157.2	17.0	60.3	10.8	2.3	9.0	1.3	7.4	1.5	4.2	0.6	3.9	0.6	46.0	391.4	Saprock		
RRMDD659	13.7	14.4	0.7	69.0	155.4	16.9	59.6	11.4	2.4	9.5	1.4	8.0	1.6	4.3	0.6	4.0	0.6	49.9	394.6	Saprock		
RRMDD659	14.4	15.1	0.7	74.2	167.7	18.1	63.7	11.4	2.3	8.8	1.3	7.0	1.3	3.6	0.5	3.3	0.5	41.4	405.1	Saprock		
RRMDD660	0.0	1.5	1.5	94.5	184.9	21.2	71.5	14.8	2.4	11.7	2.0	11.6	2.4	6.8	1.0	6.6	1.0	67.6	500.0	Soil		
RRMDD660	1.5	3.1	1.5	85.6	191.6	16.5	51.3	9.8	1.5	7.1	1.2	7.3	1.5	4.3	0.7	4.3	0.7	38.7	422.1	Hardcap		
RRMDD660	3.1	4.6	1.5	181.2	541.7	31.7	92.8	16.9	2.7	11.9	2.0	11.2	2.2	6.0	0.9	6.0	0.9	56.6	964.6	Transition		
RRMDD660	4.6	5.4	0.8	134.9	181.2	28.8	94.1	15.7	2.9	12.7	2.0	11.1	2.2	6.3	0.9	6.1	0.9	64.8	564.4	Clay		
RRMDD660	5.4	6.2	0.8	78.2	146.8	17.7	62.9	11.1	2.2	9.8	1.6	9.1	1.9	5.2	0.8	5.1	0.8	52.2	405.4	Clay		
RRMDD660	6.2	7.1	0.8	70.0	160.9	17.0	60.7	11.5	2.3	10.5	1.7	9.8	2.0	5.6	0.8	5.5	0.8	54.9	414.0	Clay		
RRMDD660	7.1	7.9	0.8	75.6	168.3	18.0	65.6	12.8	2.6	11.9	1.8	10.5	2.1	6.0	0.9	5.7	0.8	62.5	445.2	Clay		
RRMDD660	7.9	8.7	0.8	86.2	186.1	21.6	80.5	16.0	3.7	19.5	3.4	24.0	6.2	19.6	3.0	18.4	3.0	308.6	799.9	Clay		
RRMDD660	8.7	9.5	0.8	80.6	175.0	19.8	73.5	14.8	3.1	15.7	2.5	15.1	3.5	10.4	1.6	9.6	1.5	128.3	554.9	Clay		
RRMDD660	9.5	10.4	0.8	74.0	162.8	18.7	71.3	14.3	3.1	15.2	2.4	15.1	3.7	11.1	1.6	9.9	1.6	160.6	565.4	Clay		
RRMDD660	10.4	11.4	1.1	76.0	167.7	18.0	67.2	12.5	2.6	11.8	1.8	10.1	2.4	6.8	1.0	6.2	1.0	109.1	494.1	Clay		
RRMDD660	11.4	12.3	0.9	72.8	159.1	17.2	62.4	11.7	2.4	9.9	1.5	8.1	1.7	4.7	0.7	4.5	0.7	57.9	415.2	Upper Saprolite		



Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD660	12.3	13.3	0.9	70.8	155.4	16.7	60.0	11.1	2.2	9.1	1.4	7.6	1.5	4.2	0.7	4.2	0.7	50.7	396.3	Upper Saprolite	10.1	490
RRMDD660	13.3	14.2	0.9	76.3	169.5	18.1	64.7	11.8	2.5	9.9	1.5	7.8	1.5	4.0	0.6	4.1	0.6	46.7	419.7	Upper Saprolite		
RRMDD660	14.2	14.7	0.6	72.2	159.7	16.9	61.0	11.4	2.3	9.3	1.4	8.0	1.6	4.3	0.6	4.1	0.6	50.0	403.5	Lower Saprolite		
RRMDD660	14.7	15.3	0.6	74.5	159.1	17.3	61.2	11.4	2.4	9.2	1.4	7.8	1.5	4.2	0.6	4.2	0.6	47.6	403.0	Saprock		
RRMDD660	15.3	16.3	1.0	74.4	159.7	17.2	61.7	11.6	2.4	9.4	1.4	7.7	1.5	4.1	0.6	4.1	0.6	47.6	404.0	Saprock		
RRMDD660	16.3	17.3	1.0	65.1	140.0	15.4	54.8	10.2	2.1	8.9	1.4	7.6	1.6	4.6	0.7	4.6	0.7	56.3	374.2	Saprock		
RRMDD660	17.3	18.3	1.0	73.4	161.5	17.1	60.8	11.0	2.2	8.8	1.2	6.9	1.3	3.7	0.5	3.5	0.5	40.8	393.3	Saprock		
RRMDD661	0.0	1.7	1.7	97.7	363.6	17.5	54.4	9.9	1.6	7.6	1.3	7.9	1.6	4.8	0.7	4.9	0.8	43.7	617.8	Hardcap		
RRMDD661	1.7	3.4	1.7	111.5	556.5	20.7	65.0	11.8	1.9	8.9	1.5	8.9	1.7	5.2	0.8	5.3	0.8	47.0	847.5	Hardcap		
RRMDD661	3.4	5.1	1.7	102.2	480.3	21.3	70.2	13.9	2.3	10.2	1.8	10.2	2.1	6.1	0.9	6.0	0.9	53.0	781.2	Hardcap		
RRMDD661	5.1	6.8	1.7	79.9	232.8	17.5	57.6	11.5	1.8	8.7	1.6	8.8	1.8	5.2	0.8	5.3	0.8	47.0	481.1	Hardcap		
RRMDD661	6.8	8.1	1.3	155.4	309.6	31.9	92.5	15.5	2.5	11.6	1.9	11.6	2.3	6.8	1.0	6.8	1.0	61.2	711.6	Transition		
RRMDD661	8.1	9.1	0.9	164.8	269.0	48.2	178.5	29.6	5.1	20.5	3.1	16.1	2.8	7.2	1.1	6.7	0.9	74.3	827.9	Clay		
RRMDD661	9.1	10.0	0.9	110.8	222.3	30.1	117.8	24.5	4.6	20.8	3.2	16.6	3.0	7.5	1.1	6.8	1.0	78.9	648.7	Clay		
RRMDD661	10.0	10.9	0.9	94.6	210.1	24.0	95.1	19.8	3.8	18.9	2.9	16.2	3.1	8.0	1.2	7.2	1.0	85.2	591.2	Clay		
RRMDD661	10.9	11.6	0.8	93.5	210.7	25.0	103.8	19.7	4.0	22.0	3.5	23.0	5.8	18.4	2.8	17.4	2.7	240.6	792.9	Clay		
RRMDD661	11.6	12.4	0.7	81.9	187.3	20.2	75.3	13.1	2.5	11.6	1.7	10.2	2.4	7.1	1.1	6.2	1.0	132.1	553.7	Upper Saprolite		
RRMDD661	12.4	12.9	0.6	76.0	172.0	17.8	65.6	12.3	2.5	10.4	1.6	9.0	1.8	5.2	0.8	4.7	0.7	66.5	446.9	Lower Saprolite		
RRMDD661	12.9	13.5	0.6	77.1	175.7	18.2	66.3	12.2	2.4	9.9	1.4	8.1	1.6	4.5	0.7	4.5	0.6	54.1	437.3	Lower Saprolite		
RRMDD661	13.5	14.4	0.9	75.8	172.0	17.9	64.5	11.9	2.4	9.6	1.4	7.6	1.5	4.4	0.7	4.1	0.6	51.4	425.8	Saprock		
RRMDD661	14.4	15.2	0.9	74.2	168.9	17.5	61.8	11.2	2.3	8.8	1.3	6.7	1.3	3.5	0.5	3.3	0.5	40.9	402.7	Saprock		
RRMDD661	15.2	16.1	0.9	69.3	160.3	16.4	58.1	10.8	2.2	8.7	1.3	7.2	1.4	3.8	0.6	3.7	0.6	45.5	390.0	Saprock		
RRMDD662	0.0	1.4	1.4	93.5	164.6	18.8	60.7	12.0	2.0	9.5	1.6	9.6	2.0	5.7	0.8	5.6	0.9	56.3	443.5	Soil		
RRMDD662	1.4	2.7	1.4	157.2	395.5	31.1	92.8	16.8	2.5	11.2	2.0	11.4	2.2	6.2	0.9	6.1	1.0	59.7	796.6	Hardcap		
RRMDD662	2.7	3.5	0.8	224.6	314.5	61.3	211.7	35.3	5.7	24.2	3.8	20.5	3.5	9.9	1.5	9.3	1.3	100.1	1026.9	Transition		
RRMDD662	3.5	4.3	0.8	120.8	231.6	36.1	151.0	32.6	6.1	29.0	4.3	23.5	3.9	10.4	1.4	8.4	1.2	99.6	759.9	Clay		
RRMDD662	4.3	5.2	0.8	96.8	201.5	26.8	107.1	24.0	4.7	25.7	3.8	22.2	4.2	10.7	1.4	8.0	1.2	114.5	652.4	Clay		
RRMDD662	5.2	6.0	0.8	92.5	211.3	22.8	80.0	15.9	3.1	15.3	2.3	14.3	3.2	8.7	1.2	7.0	1.0	92.4	571.1	Clay		
RRMDD662	6.0	6.8	0.8	80.2	186.1	19.3	70.8	13.9	2.7	11.5	1.8	10.8	2.3	8.0	1.3	8.0	1.2	88.1	506.0	Clay		
RRMDD662	6.8	7.6	0.8	75.5	169.5	18.6	70.2	14.0	2.7	12.8	2.0	13.8	3.8	15.8	2.6	17.0	3.2	261.6	683.1	Clay		
RRMDD662	7.6	8.6	1.0	83.2	195.3	20.4	72.8	13.9	2.6	11.1	1.7	9.6	1.9	6.5	1.0	6.0	0.9	89.3	516.1	Upper Saprolite		
RRMDD662	8.6	9.5	0.9	80.9	175.0	18.7	67.3	12.6	2.3	10.0	1.5	8.2	1.4	4.1	0.6	3.7	0.6	46.2	433.3	Lower Saprolite		
RRMDD662	9.5	10.4	0.9	70.0	157.8	17.0	58.9	11.8	2.3	9.1	1.4	7.5	1.3	4.0	0.6	3.9	0.6	43.8	390.0	Lower Saprolite		
RRMDD662	10.4	11.0	0.6	68.5	154.8	16.6	59.6	11.7	2.1	8.3	1.3	7.1	1.3	4.0	0.6	3.9	0.6	44.7	385.1	Saprock		
RRMDD663	0.0	2.0	2.0	87.1	659.7	17.5	54.9	11.1	1.7	8.2	1.5	8.4	1.6	4.8	0.7	5.1	0.7	42.2	905.2	Hardcap		
RRMDD663	2.0	3.9	2.0	117.9	708.8	23.3	73.6	14.1	2.1	9.3	1.7	9.3	1.8	5.2	0.8	5.4	0.8	45.1	1019.1	Hardcap		
RRMDD663	3.9	4.8	0.9	101.6	154.2	22.5	78.1	13.7	2.5	10.5	1.6	9.0	1.7	4.8	0.8	4.9	0.7	50.2	456.9	Transition		
RRMDD663	4.8	5.7	0.9	100.6	219.3	25.6	102.9	21.7	4.4	20.1	3.2	17.8	3.5	9.3	1.4	8.3	1.2	104.1	643.3	Clay		
RRMDD663	5.7	6.7	1.0	65.6	140.0	16.8	66.7	13.7	2.8	13.7	2.1	12.7	2.8	7.9	1.3	8.1	1.2	89.1	444.5	Clay		
RRMDD663	6.7	7.6	0.9	90.9	207.0	23.9	93.8	17.2	3.3	16.7	2.6	16.0	3.7	10.8	1.6	10.0	1.5	146.0	645.0	Clay		
RRMDD663	7.6	8.4	0.9	83.6	191.0	21.4	84.1	13.9	2.7	13.2	2.0	12.2	3.2	9.8	1.5	9.3	1.5	170.8	620.4	Clay		
RRMDD663	8.4	9.3	0.9	102.5	240.8	24.3	86.2	15.0	3.0	12.5	1.8	10.0	2.0	5.6	0.8	5.1	0.8	92.2	602.6	Clay		
RRMDD663	9.3	10.2	0.9	97.1	227.3	22.9	80.1	14.1	2.8	11.2	1.6	9.1	1.8	4.9	0.7	4.7	0.7	57.5	536.6	Upper Saprolite		
RRMDD663	10.2	10.9	0.7	85.1	191.6	19.6	70.0	12.6	2.4	9.5	1.4	7.2	1.3	3.5	0.5	3.6	0.5	42.7	451.6	Lower Saprolite		
RRMDD663	10.9	11.6	0.7	76.7	176.9	18.2	66.7	12.5	2.5	9.6	1.4	7.6	1.6	4.2	0.7	4.3	0.6	49.7	433.2	Lower Saprolite		
RRMDD663	11.6	12.4	0.8	91.9	214.4	21.5	77.6	13.7	2.6	10.6	1.6	8.0	1.5	4.2	0.6	3.9	0.6	49.3	502.0	Saprock		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD663	12.4	13.3	0.8	102.4	229.1	23.9	86.2	14.7	2.7	10.9	1.6	8.8	1.7	4.6	0.6	4.0	0.6	49.5	541.3	Saprock		
RRMDD663	13.3	14.1	0.8	91.1	205.8	21.4	78.0	13.9	2.6	9.9	1.5	8.3	1.6	4.3	0.6	4.0	0.6	47.9	491.5	Saprock		
RRMDD663	14.1	15.1	1.0	80.8	183.0	19.1	68.9	12.3	2.4	9.3	1.4	8.1	1.6	4.3	0.6	4.1	0.6	49.8	446.3	Saprock		
RRMDD663	15.1	16.0	1.0	67.2	151.1	16.4	59.1	10.6	2.2	8.2	1.2	6.6	1.3	3.4	0.5	3.3	0.5	37.8	369.5	Saprock		
RRMDD663	16.0	17.0	1.0	71.0	156.0	16.9	61.6	11.1	2.3	8.6	1.2	7.1	1.4	3.9	0.6	3.4	0.5	42.5	388.0	Saprock		
RRMDD664	0.0	1.5	1.5	66.6	133.3	13.3	41.9	7.9	1.3	5.9	1.0	6.0	1.3	3.4	0.5	3.5	0.5	35.0	321.5	Hardcap		
RRMDD664	1.5	3.1	1.5	92.3	289.9	17.8	55.4	10.1	1.7	7.3	1.2	7.2	1.5	4.3	0.7	4.3	0.7	39.6	534.0	Hardcap		
RRMDD664	3.1	4.6	1.5	98.5	495.0	19.8	63.7	11.9	2.0	8.5	1.5	8.4	1.6	4.9	0.7	4.8	0.7	44.3	766.4	Hardcap		
RRMDD664	4.6	5.5	0.9	143.7	270.2	51.6	225.7	37.0	6.1	24.3	3.4	18.0	2.9	6.8	0.9	5.5	0.8	68.2	865.1	Clay		
RRMDD664	5.5	6.4	0.9	93.1	191.0	25.3	106.4	20.9	4.1	18.3	2.8	15.0	2.6	6.4	0.9	5.3	0.8	64.9	557.6	Clay		
RRMDD664	6.4	7.3	0.9	90.2	189.8	22.2	86.4	18.4	3.7	17.1	2.6	15.1	2.7	6.8	0.9	5.8	0.9	72.0	534.7	Clay		
RRMDD664	7.3	8.2	0.9	74.5	154.2	18.2	73.6	15.7	3.2	15.7	2.4	14.3	2.8	7.4	1.0	6.4	0.9	76.8	467.1	Clay		
RRMDD664	8.2	9.1	0.9	76.2	161.5	19.0	79.9	18.6	3.9	20.2	3.3	21.5	4.6	12.9	1.9	12.0	1.7	137.1	574.4	Clay		
RRMDD664	9.1	10.0	0.9	74.0	156.0	18.2	74.6	15.9	3.2	16.8	2.7	17.3	3.7	10.6	1.5	9.4	1.4	113.3	518.8	Clay		
RRMDD664	10.0	10.9	0.9	88.4	193.5	22.9	98.3	19.5	3.9	21.9	3.4	22.7	5.7	17.2	2.5	15.0	2.4	239.4	756.8	Clay		
RRMDD664	10.9	11.6	0.7	79.0	174.4	18.9	71.6	12.5	2.5	10.6	1.6	9.6	2.2	6.5	0.9	5.4	0.9	120.1	516.7	Clay		
RRMDD664	11.6	12.4	0.7	82.9	185.5	19.3	70.9	13.3	2.5	9.9	1.6	9.5	1.9	5.3	0.8	4.9	0.8	62.4	471.4	Clay		
RRMDD664	12.4	13.1	0.7	81.9	185.5	19.6	69.3	12.5	2.4	9.5	1.4	7.5	1.4	3.9	0.6	3.6	0.6	42.2	441.7	Upper Saprolite		
RRMDD664	13.1	13.8	0.7	80.2	183.0	18.5	68.0	12.3	2.5	9.9	1.6	9.8	2.1	5.8	0.8	5.2	0.7	64.4	464.9	Lower Saprolite	9.2	567
RRMDD664	13.8	14.5	0.6	70.1	162.8	16.9	61.6	11.8	2.2	9.0	1.4	7.7	1.3	4.0	0.6	3.6	0.6	40.9	394.3	Saprock		
RRMDD664	14.5	15.1	0.7	61.5	142.5	14.8	53.0	10.2	2.0	8.1	1.2	7.4	1.4	4.1	0.6	3.9	0.6	42.0	353.2	Saprock		
RRMDD664	15.1	16.0	0.9	62.0	143.7	15.0	54.0	10.7	2.1	8.6	1.3	7.7	1.4	4.3	0.7	3.9	0.6	45.6	361.8	Saprock		
RRMDD664	16.0	16.9	0.9	64.9	149.3	15.6	55.9	10.8	2.2	8.5	1.3	7.5	1.4	4.3	0.6	4.0	0.6	43.4	370.2	Saprock		
RRMDD665	0.0	2.1	2.1	103.4	320.6	19.8	63.3	11.8	1.9	8.7	1.5	9.1	1.8	5.3	0.8	5.3	0.8	51.7	605.9	Hardcap		
RRMDD665	2.1	4.1	2.1	81.0	468.0	16.7	54.1	10.3	1.8	7.9	1.4	8.0	1.6	4.7	0.7	4.7	0.7	41.3	703.0	Transition		
RRMDD665	4.1	5.0	0.9	136.0	242.6	36.6	135.9	27.8	4.6	20.9	3.2	18.4	3.2	8.6	1.1	7.6	1.0	85.1	732.7	Clay		
RRMDD665	5.0	5.9	0.9	104.4	218.7	28.2	108.5	23.7	4.2	20.1	3.0	18.0	3.3	9.2	1.2	7.8	1.1	91.1	642.1	Clay		
RRMDD665	5.9	6.9	0.9	120.8	271.5	31.3	116.6	22.6	3.9	18.5	2.9	16.8	3.1	8.6	1.1	7.1	1.0	88.0	713.7	Clay		
RRMDD665	6.9	7.8	0.9	93.9	216.2	23.9	84.9	14.8	2.6	11.3	1.8	10.7	2.2	6.4	0.9	6.2	0.9	71.5	548.2	Clay		
RRMDD665	7.8	8.5	0.7	71.4	163.4	18.1	67.8	13.0	2.4	10.7	1.6	10.7	2.5	7.9	1.1	7.9	1.2	99.6	479.3	Clay		
RRMDD665	8.5	9.3	0.7	80.7	187.3	20.8	75.6	14.7	2.6	11.4	1.8	11.1	2.5	8.5	1.2	8.0	1.2	123.8	551.3	Upper Saprolite		
RRMDD665	9.3	10.0	0.7	68.6	155.4	17.6	63.1	11.9	2.3	9.0	1.3	8.2	1.6	5.0	0.7	4.9	0.8	71.0	421.4	Lower Saprolite		
RRMDD665	10.0	10.6	0.6	106.5	240.2	26.2	92.1	17.2	3.1	12.1	1.7	9.8	1.8	5.0	0.7	4.7	0.7	55.4	577.0	Lower Saprolite	6.5	592
RRMDD665	10.6	11.2	0.6	62.6	131.4	15.1	51.3	8.7	1.5	6.0	0.9	5.1	1.0	2.7	0.4	2.8	0.4	30.2	320.1	Saprock		
RRMDD665	11.2	12.2	0.9	73.8	167.7	18.7	65.9	12.9	2.3	9.7	1.5	8.5	1.6	4.9	0.6	4.4	0.6	51.0	424.2	Saprock		
RRMDD665	12.2	13.1	0.9	72.4	161.5	17.5	61.2	11.9	2.1	9.5	1.5	8.4	1.7	5.1	0.7	4.7	0.6	56.8	415.7	Saprock		
RRMDD665	13.1	14.1	0.9	70.6	154.8	16.7	59.1	10.6	2.0	8.3	1.2	6.6	1.2	3.5	0.5	3.6	0.5	38.7	378.0	Saprock		
RRMDD665	14.1	15.0	0.9	71.7	157.8	17.5	60.9	11.5	2.0	8.4	1.3	7.6	1.5	4.3	0.6	4.2	0.6	46.7	396.5	Saprock		
RRMDD666	0.0	1.4	1.4	96.9	213.7	19.6	65.8	12.3	1.9	9.6	1.5	8.4	1.7	5.1	0.8	4.9	0.7	45.7	488.4	Hardcap		
RRMDD666	1.4	2.8	1.4	102.0	429.9	20.1	64.7	11.9	1.9	8.5	1.4	7.8	1.5	4.5	0.7	4.6	0.7	42.5	703.0	Hardcap		
RRMDD666	2.8	3.9	1.1	144.3	355.0	30.4	100.5	17.8	2.8	12.3	2.0	11.3	2.1	6.8	0.9	6.5	1.0	63.4	757.2	Transition		
RRMDD666	3.9	4.9	1.0	158.9	270.2	36.0	119.0	20.1	3.3	13.7	2.2	11.5	2.0	5.7	0.8	5.4	0.8	57.7	707.3	Clay		
RRMDD666	4.9	5.9	1.0	201.1	351.3	51.6	180.2	32.2	5.1	22.1	3.4	18.5	3.2	8.9	1.2	7.9	1.1	93.1	981.1	Clay		
RRMDD666	5.9	6.9	1.0	135.5	288.7	35.5	131.2	25.2	4.6	21.3	3.4	19.8	3.6	10.4	1.3	8.8	1.3	108.1	798.6	Clay		
RRMDD666	6.9	7.9	1.0	96.6	222.3	24.1	86.0	16.6	3.1	13.8	2.1	13.0	2.5	7.4	1.0	6.4	1.0	78.6	574.4	Clay		
RRMDD666	7.9	8.9	1.0	72.6	157.2	19.1	73.2	14.6	2.9	13.6	2.3	14.7	3.3	10.7	1.6	10.4	1.5	128.3	526.1	Clay		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD666	8.9	9.9	1.0	67.1	137.0	15.9	57.9	10.9	2.3	9.3	1.4	8.9	1.9	6.2	0.8	5.6	0.9	85.7	411.7	Clay	14.3	506
RRMDD666	9.9	10.9	1.0	54.5	115.0	13.2	46.5	8.7	1.8	7.1	1.1	6.2	1.3	3.5	0.5	3.5	0.5	50.2	313.7	Clay		
RRMDD666	10.9	11.8	0.9	62.6	139.4	15.2	54.1	10.6	1.9	8.3	1.4	7.8	1.5	4.5	0.6	4.2	0.6	46.6	359.3	Clay		
RRMDD666	11.8	12.6	0.9	80.9	176.9	19.5	67.9	13.0	2.4	10.5	1.7	9.4	1.8	5.2	0.7	5.0	0.7	59.6	455.1	Clay		
RRMDD666	12.6	13.5	0.9	69.4	152.3	16.6	58.2	11.9	2.1	8.8	1.4	8.0	1.5	4.2	0.6	4.1	0.6	47.0	386.5	Clay		
RRMDD666	13.5	14.2	0.8	67.6	146.8	16.3	57.9	11.7	2.2	9.4	1.5	9.7	1.9	6.2	0.9	5.9	0.9	68.3	407.1	Upper Saprolite		
RRMDD666	14.2	15.0	0.8	74.0	161.5	17.8	62.6	12.5	2.3	9.3	1.3	7.8	1.4	4.0	0.6	3.9	0.5	43.4	402.9	Upper Saprolite		
RRMDD666	15.0	15.7	0.7	75.4	170.7	18.0	63.0	12.1	2.3	9.6	1.4	8.5	1.6	4.9	0.7	4.4	0.6	53.1	426.5	Upper Saprolite		
RRMDD666	15.7	16.5	0.8	72.6	158.5	17.3	61.2	11.8	2.2	9.0	1.5	8.1	1.5	4.4	0.6	4.1	0.6	46.6	400.0	Lower Saprolite		
RRMDD666	16.5	17.3	0.8	67.6	148.0	16.2	57.0	11.2	2.1	8.6	1.3	7.4	1.3	3.9	0.5	3.7	0.5	41.4	370.7	Lower Saprolite		
RRMDD666	17.3	18.1	0.8	59.3	127.8	14.1	51.3	10.0	1.9	8.2	1.4	8.4	1.7	5.7	0.8	5.3	0.7	61.2	357.9	Lower Saprolite		
RRMDD666	18.1	19.1	1.0	69.1	154.2	16.6	57.6	11.2	2.1	8.5	1.3	7.9	1.5	4.6	0.6	4.0	0.6	49.3	388.9	Saprock		
RRMDD666	19.1	20.1	1.0	64.7	143.7	15.8	56.6	11.2	2.0	8.7	1.2	6.9	1.3	3.5	0.5	3.7	0.6	39.4	359.7	Saprock		
RRMDD666	20.1	21.1	1.0	65.4	141.3	15.5	55.3	10.6	1.9	8.5	1.2	7.2	1.3	3.8	0.5	3.7	0.5	41.5	358.3	Saprock		
RRMDD666	21.1	22.1	1.0	74.5	160.9	17.7	62.3	12.1	2.3	10.1	1.4	7.9	1.5	4.3	0.6	4.1	0.6	45.6	405.9	Saprock		
RRMDD667	0.0	1.3	1.3	130.2	555.2	23.3	69.4	12.8	2.0	9.2	1.6	9.3	1.8	5.2	0.8	5.6	0.8	43.9	871.2	Hardcap	12.4	595
RRMDD667	1.3	2.6	1.3	173.6	389.4	37.0	120.1	20.2	3.1	14.0	2.3	12.4	2.4	6.7	1.0	6.3	1.0	65.7	855.2	Transition		
RRMDD667	2.6	3.3	0.7	207.6	319.4	50.5	179.0	31.8	5.1	23.0	3.2	17.9	3.2	8.9	1.2	8.1	1.2	86.7	946.8	Clay		
RRMDD667	3.3	3.9	0.7	162.4	221.7	39.0	134.7	24.5	4.0	18.7	2.6	14.3	2.5	6.7	1.0	6.3	0.9	69.3	708.8	Clay		
RRMDD667	3.9	4.7	0.8	166.0	235.9	43.3	148.1	27.6	4.7	21.8	2.9	16.6	2.7	7.3	1.0	6.8	0.9	71.0	756.6	Clay		
RRMDD667	4.7	5.5	0.8	140.7	246.9	36.6	132.4	25.0	4.3	20.1	2.8	16.2	2.7	7.2	0.9	6.5	0.9	71.9	715.3	Clay		
RRMDD667	5.5	6.2	0.7	111.8	218.7	29.1	110.6	22.3	4.2	20.6	3.0	16.9	3.0	8.4	1.1	6.9	0.9	78.2	635.7	Clay		
RRMDD667	6.2	6.9	0.7	97.7	201.5	24.2	89.2	18.1	3.3	17.5	2.6	14.1	2.6	7.6	1.0	6.4	0.8	73.5	560.1	Clay		
RRMDD667	6.9	7.6	0.7	93.7	200.8	22.7	85.8	17.5	3.3	17.2	2.6	15.6	3.0	8.8	1.1	7.3	1.0	85.3	565.8	Clay		
RRMDD667	7.6	8.6	1.0	99.1	228.5	24.5	94.8	18.4	3.4	18.0	2.8	17.7	4.1	13.1	1.8	11.8	1.7	143.5	683.2	Clay		
RRMDD667	8.6	9.5	1.0	95.1	211.9	24.4	93.4	17.6	3.3	18.4	2.7	18.9	4.8	16.3	2.3	14.7	2.2	209.5	735.7	Clay		
RRMDD667	9.5	10.5	1.0	80.6	184.3	19.6	71.6	13.0	2.4	11.5	1.7	10.1	2.3	8.3	1.1	7.1	1.1	140.3	555.1	Clay		
RRMDD667	10.5	11.3	0.9	85.4	195.3	20.3	72.8	13.6	2.6	11.5	1.7	9.6	1.9	5.5	0.8	5.1	0.7	59.9	486.6	Upper Saprolite		
RRMDD667	11.3	12.2	0.9	78.2	178.1	18.6	67.8	12.6	2.4	10.5	1.6	8.4	1.7	5.3	0.7	4.5	0.7	52.7	443.7	Upper Saprolite		
RRMDD667	12.2	13.0	0.9	72.2	165.2	17.2	61.9	11.8	2.3	10.3	1.5	8.7	1.7	5.2	0.7	4.5	0.6	51.8	415.5	Upper Saprolite		
RRMDD667	13.0	14.0	1.0	77.1	176.3	18.2	65.8	11.9	2.2	9.6	1.4	8.4	1.7	5.1	0.8	4.7	0.7	53.3	437.0	Lower Saprolite		
RRMDD667	14.0	15.0	1.0	78.6	180.0	18.7	67.3	12.1	2.4	10.5	1.5	7.9	1.5	4.2	0.5	3.7	0.5	43.7	433.0	Lower Saprolite		
RRMDD667	15.0	15.8	0.8	66.5	151.7	15.9	58.1	10.9	2.0	8.9	1.2	7.0	1.3	3.8	0.5	3.5	0.5	37.8	369.8	Saprock		
RRMDD668	0.0	1.6	1.6	83.5	232.2	16.1	50.9	9.4	1.5	7.0	1.1	6.9	1.4	4.0	0.7	4.1	0.6	38.2	457.6	Hardcap	4.4	583
RRMDD668	1.6	3.2	1.6	72.7	332.9	15.8	52.0	10.5	1.6	7.5	1.3	7.5	1.5	4.4	0.7	4.3	0.7	41.0	554.3	Hardcap		
RRMDD668	3.2	4.7	1.6	72.7	469.2	16.3	54.2	10.9	1.8	8.4	1.5	8.2	1.7	4.8	0.8	4.9	0.7	45.0	701.0	Hardcap		
RRMDD668	4.7	5.6	0.9	117.9	242.0	33.2	137.6	28.5	5.3	27.7	4.1	23.1	4.3	11.6	1.4	8.7	1.0	114.8	761.2	Pallid		
RRMDD668	5.6	6.3	0.7	80.5	172.0	20.1	76.5	14.4	2.7	13.0	2.0	11.6	2.4	6.8	1.0	6.0	0.8	67.7	477.5	Clay		
RRMDD668	6.3	7.0	0.7	86.9	192.9	21.1	77.0	14.4	2.7	12.9	2.0	11.4	2.4	7.3	1.1	6.8	1.0	80.3	520.0	Clay		
RRMDD668	7.0	7.6	0.6	88.2	200.2	22.9	87.4	16.8	3.1	15.6	2.5	15.4	4.0	13.4	2.1	13.2	2.1	191.1	678.0	Clay		
RRMDD668	7.6	8.2	0.6	84.8	190.4	20.7	73.2	13.6	2.5	10.8	1.7	9.3	2.0	6.0	0.9	5.2	0.8	93.6	515.6	Clay		
RRMDD668	8.2	9.1	0.9	89.3	207.0	21.6	77.8	14.4	2.7	10.9	1.7	8.7	1.8	5.0	0.7	4.6	0.7	57.1	504.0	Lower Saprolite		
RRMDD668	9.1	10.0	0.9	83.7	189.2	19.9	72.1	13.5	2.5	10.3	1.6	8.5	1.6	4.9	0.7	4.5	0.6	51.9	465.5	Saprock		
RRMDD668	10.0	10.9	0.9	71.4	160.3	17.0	62.8	11.4	2.2	8.9	1.4	7.1	1.4	3.8	0.6	3.7	0.6	41.1	393.6	Saprock		
RRMDD668	10.9	11.8	0.9	85.8	202.7	20.4	73.9	13.5	2.4	10.6	1.6	8.0	1.5	4.3	0.6	3.8	0.6	46.6	476.5	Saprock		
RRMDD668	11.8	12.7	0.9	81.7	188.6	19.6	69.3	12.9	2.2	9.6	1.4	7.5	1.5	4.1	0.6	4.0	0.6	43.2	446.8	Saprock		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD668	12.7	13.6	0.9	84.1	194.7	20.1	70.1	13.3	2.4	9.9	1.5	7.9	1.6	4.5	0.7	4.1	0.6	47.7	463.2	Saprock		
RRMDD669	0.0	1.7	1.7	126.1	735.8	20.4	62.2	11.6	1.9	9.2	1.6	8.8	1.7	5.2	0.8	5.6	0.9	45.2	1037.0	Hardcap		
RRMDD669	1.7	3.3	1.7	141.3	454.5	25.4	78.8	14.3	2.3	11.3	1.8	10.6	2.1	6.3	1.0	6.5	1.0	54.5	811.8	Transition		
RRMDD669	3.3	5.0	1.7	127.2	466.8	26.2	87.1	16.0	2.5	12.3	1.9	11.0	2.2	6.4	1.0	6.3	1.0	61.0	828.9	Transition		
RRMDD669	5.0	6.0	1.0	138.4	221.7	28.2	97.3	17.0	2.7	12.3	1.9	10.7	2.1	6.2	0.9	6.0	0.9	59.3	605.5	Clay		
RRMDD669	6.0	6.8	0.8	191.8	283.8	51.2	187.2	34.9	5.6	23.9	3.4	16.0	2.8	7.1	1.0	6.1	0.9	69.0	884.5	Clay		
RRMDD669	6.8	7.6	0.8	109.9	197.2	29.2	107.5	21.7	3.9	17.3	2.6	13.6	2.5	6.6	0.9	5.7	0.8	63.6	583.1	Clay		
RRMDD669	7.6	8.5	0.8	98.0	180.0	24.6	89.5	16.8	3.0	13.7	2.1	11.6	2.2	6.1	0.9	5.6	0.8	60.3	515.3	Clay		
RRMDD669	8.5	9.3	0.8	94.4	200.8	23.9	87.1	17.3	3.2	14.9	2.3	12.7	2.4	6.6	0.9	5.7	0.8	66.4	539.6	Clay		
RRMDD669	9.3	10.1	0.8	98.6	213.1	23.3	83.7	16.5	3.0	13.4	2.1	11.5	2.4	6.6	0.9	6.1	0.8	70.5	552.6	Clay		
RRMDD669	10.1	11.0	0.9	101.4	217.4	24.1	87.2	17.1	3.1	14.4	2.2	12.7	2.8	8.5	1.3	7.9	1.2	93.1	594.6	Clay		
RRMDD669	11.0	11.9	0.9	93.9	206.4	23.6	87.4	16.5	3.0	13.8	2.2	12.7	3.0	9.9	1.5	9.8	1.6	135.9	621.1	Clay		
RRMDD669	11.9	12.8	0.9	88.3	193.5	21.1	73.7	13.2	2.5	10.8	1.6	10.0	1.8	5.8	0.8	5.4	0.8	81.5	510.8	Clay		
RRMDD669	12.8	13.7	0.9	90.0	197.8	21.6	76.0	13.2	2.4	10.6	1.5	9.7	2.0	5.6	0.8	5.2	0.7	60.3	497.4	Clay		
RRMDD669	13.7	14.8	1.0	88.0	199.6	21.1	76.0	13.3	2.5	10.6	1.6	9.5	1.8	5.4	0.7	4.7	0.7	57.1	492.6	Upper Saprolite		
RRMDD669	14.8	15.8	1.0	86.6	199.6	21.1	74.1	13.5	2.4	11.0	1.6	9.2	1.7	4.9	0.6	4.4	0.7	52.8	484.0	Upper Saprolite		
RRMDD669	15.8	16.8	1.0	76.7	176.3	18.7	66.8	12.2	2.3	10.0	1.4	8.8	1.7	5.1	0.6	4.5	0.7	54.1	440.0	Upper Saprolite		
RRMDD669	16.8	17.4	0.6	77.6	177.5	18.6	65.8	12.0	2.2	9.7	1.3	7.8	1.5	4.3	0.6	3.9	0.6	45.7	429.3	Lower Saprolite		
RRMDD669	17.4	18.0	0.6	73.4	168.3	17.8	62.1	11.9	2.2	9.7	1.4	8.7	1.6	4.9	0.6	4.2	0.6	51.9	419.5	Lower Saprolite	13.0	546
RRMDD669	18.0	18.9	0.9	67.1	152.9	16.1	57.2	10.4	2.0	8.7	1.2	7.6	1.4	4.2	0.6	4.0	0.5	44.6	378.5	Saprock		
RRMDD669	18.9	19.9	0.9	73.8	169.5	17.9	63.5	11.6	2.1	8.9	1.3	7.5	1.5	4.2	0.6	3.8	0.5	45.6	412.4	Saprock		
RRMDD669	19.9	20.8	0.9	71.4	160.9	17.3	60.0	10.8	2.2	8.6	1.3	7.2	1.4	3.9	0.5	3.6	0.5	42.0	391.7	Saprock		
RRMDD669	20.8	21.8	0.9	77.8	178.7	18.8	65.9	11.8	2.2	9.0	1.4	7.7	1.6	4.4	0.6	4.2	0.6	48.1	432.9	Saprock		
RRMDD669	21.8	22.7	0.9	74.8	168.3	18.3	62.8	11.8	2.2	10.0	1.3	7.9	1.5	4.0	0.5	3.6	0.5	42.4	409.9	Saprock		
RRMDD670	0.0	1.6	1.6	74.0	272.7	13.7	41.9	8.2	1.3	5.9	1.1	6.3	1.3	3.9	0.6	4.2	0.6	33.7	469.3	Hardcap		
RRMDD670	1.6	3.2	1.6	87.8	632.6	17.5	57.3	11.1	1.9	8.3	1.5	8.1	1.7	5.0	0.8	4.9	0.7	45.2	884.4	Hardcap		
RRMDD670	3.2	4.9	1.6	99.8	507.3	20.5	65.3	12.2	2.0	9.3	1.5	8.6	1.7	5.0	0.7	4.8	0.8	49.0	788.6	Hardcap		
RRMDD670	4.9	5.4	0.5	179.4	275.2	48.8	180.8	28.3	4.5	19.7	2.8	16.3	3.0	8.5	1.2	7.9	1.1	87.1	864.5	Transition		
RRMDD670	5.4	6.1	0.8	119.6	231.6	34.4	141.1	29.7	5.5	25.0	3.4	18.9	3.4	9.1	1.2	7.9	1.1	89.9	721.6	Clay		
RRMDD670	6.1	7.1	0.9	97.1	203.3	25.1	95.5	19.5	3.8	18.6	2.6	15.6	2.8	7.7	1.0	6.5	0.9	76.4	576.6	Clay		
RRMDD670	7.1	8.0	0.9	96.2	221.1	23.8	85.7	16.5	3.1	14.7	2.3	13.8	2.6	7.8	1.0	6.4	0.9	77.2	573.0	Clay		
RRMDD670	8.0	8.9	0.9	103.9	230.3	25.7	93.7	17.2	3.5	16.0	2.4	15.3	3.5	11.5	1.6	11.0	1.6	142.2	679.4	Clay		
RRMDD670	8.9	9.6	0.7	93.1	217.4	23.0	81.8	13.9	2.5	11.8	1.7	10.6	2.1	6.9	1.0	6.9	1.1	92.8	566.5	Clay		
RRMDD670	9.6	10.1	0.4	78.0	177.5	19.1	68.0	11.8	2.3	10.5	1.4	8.4	1.5	4.8	0.7	4.3	0.6	50.5	439.6	Upper Saprolite		
RRMDD670	10.1	11.7	1.6	77.1	177.5	18.9	67.1	12.8	2.5	10.2	1.6	9.3	1.7	5.1	0.7	4.7	0.7	54.4	444.2	Upper Saprolite		
RRMDD670	11.7	12.6	0.9	72.5	165.8	18.2	63.6	11.6	2.3	9.2	1.3	8.1	1.5	4.7	0.6	4.3	0.6	48.3	412.6	Lower Saprolite	7.2	546
RRMDD670	12.6	13.4	0.9	62.4	131.4	15.2	54.4	9.6	2.0	8.5	1.2	7.7	1.5	4.4	0.6	4.3	0.6	49.9	353.9	Saprock		
RRMDD670	13.4	14.3	0.9	74.2	164.0	18.2	64.7	11.8	2.4	9.8	1.3	7.7	1.3	3.9	0.5	3.4	0.5	40.6	404.5	Saprock		
RRMDD670	14.3	15.2	0.9	67.1	152.3	16.4	58.7	10.9	2.2	9.3	1.3	7.4	1.5	4.1	0.6	3.9	0.5	45.2	381.5	Saprock		
RRMDD670	15.2	16.2	0.9	75.6	166.4	18.2	65.1	11.7	2.2	9.3	1.3	7.7	1.4	4.3	0.5	3.9	0.6	45.2	413.4	Saprock		
RRMDD670	16.2	17.1	0.9	64.2	140.0	15.5	53.8	9.5	2.0	8.4	1.1	6.7	1.3	3.9	0.5	3.8	0.5	39.1	350.3	Saprock		
RRMDD670	17.1	18.0	0.9	77.5	168.3	17.9	65.1	11.7	2.2	9.5	1.3	7.8	1.5	4.6	0.6	4.2	0.6	48.1	421.0	Saprock		
RRMDD671	0.0	1.5	1.5	140.7	432.4	26.6	83.7	15.5	2.4	11.6	1.9	11.2	2.1	6.2	1.0	6.4	0.9	56.0	798.8	Hardcap		
RRMDD671	1.5	2.9	1.5	251.0	843.9	44.0	140.6	23.5	3.5	15.5	2.4	12.7	2.3	6.4	0.9	5.9	0.9	51.7	1405.2	Hardcap		
RRMDD671	2.9	4.4	1.5	139.6	701.4	28.5	94.4	17.0	2.6	12.3	2.0	11.1	2.0	6.2	0.9	6.2	0.9	54.0	1079.0	Transition		
RRMDD671	4.4	5.2	0.9	130.8	205.8	30.3	103.9	17.3	3.1	13.8	2.0	12.2	2.1	6.7	0.9	6.2	0.9	64.5	600.5	Clay		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD671	5.2	6.1	0.9	109.9	178.1	28.6	101.2	18.4	3.5	15.3	2.2	12.8	2.2	6.5	0.9	5.5	0.8	64.6	550.6	Clay	10.7	534
RRMDD671	6.1	7.0	0.9	104.1	186.7	26.3	94.8	17.7	3.3	15.4	2.3	12.7	2.4	7.2	0.9	5.7	0.8	71.6	552.1	Clay		
RRMDD671	7.0	7.9	0.9	99.0	206.4	24.8	88.8	16.3	3.2	15.0	2.2	12.5	2.4	7.4	0.9	6.3	0.9	78.7	564.7	Clay		
RRMDD671	7.9	8.8	0.9	88.4	190.4	21.2	75.9	13.9	2.7	12.8	1.9	11.1	2.3	7.1	1.0	6.1	0.9	77.3	513.1	Clay		
RRMDD671	8.8	9.7	0.9	78.5	169.5	18.3	65.1	11.9	2.5	10.5	1.6	9.0	2.0	6.4	0.9	5.8	0.8	73.7	456.4	Clay		
RRMDD671	9.7	10.6	0.9	97.8	224.2	23.9	86.0	15.7	3.0	13.1	2.0	12.1	2.8	9.2	1.3	8.4	1.4	127.6	628.4	Upper Saprolite		
RRMDD671	10.6	11.5	0.9	107.2	242.0	25.0	87.8	15.5	3.1	13.3	1.8	10.1	2.1	6.4	0.9	5.6	0.9	91.2	612.8	Upper Saprolite		
RRMDD671	11.5	12.4	0.9	91.0	210.1	21.6	73.8	13.5	2.6	10.6	1.5	8.3	1.7	4.9	0.6	4.5	0.6	55.7	501.2	Upper Saprolite		
RRMDD671	12.4	13.3	0.9	93.9	217.4	22.1	76.7	14.2	2.8	11.4	1.5	8.7	1.7	5.2	0.7	4.5	0.6	55.9	517.5	Upper Saprolite		
RRMDD671	13.3	14.2	0.9	78.0	175.7	18.2	64.9	11.5	2.4	9.8	1.4	7.4	1.4	4.2	0.6	3.8	0.6	45.5	425.2	Lower Saprolite		
RRMDD671	14.2	15.1	0.9	91.0	209.4	21.5	74.1	13.3	2.5	10.1	1.4	8.0	1.6	4.6	0.7	4.0	0.6	50.4	493.4	Lower Saprolite		
RRMDD671	15.1	16.0	0.9	93.6	216.2	22.2	78.1	14.2	2.7	10.6	1.5	8.4	1.6	4.7	0.6	4.1	0.6	51.8	511.0	Saprock		
RRMDD671	16.0	16.7	0.7	82.7	184.3	19.6	68.8	12.2	2.4	9.5	1.3	7.3	1.3	3.8	0.5	3.5	0.5	42.8	440.5	Saprock		
RRMDD671	16.7	17.5	0.7	77.3	179.3	18.6	64.3	11.2	2.4	9.7	1.3	7.6	1.5	4.2	0.7	4.0	0.6	50.3	433.1	Saprock		
RRMDD671	17.5	18.4	1.0	91.7	208.8	21.3	72.7	12.7	2.5	10.2	1.5	7.6	1.6	4.1	0.6	3.9	0.6	46.7	486.5	Saprock		
RRMDD671	18.4	19.4	1.0	88.1	202.7	21.0	72.0	13.1	2.5	10.3	1.5	8.1	1.5	4.6	0.7	4.1	0.6	49.7	480.3	Saprock		
RRMDD672	0.0	1.4	1.4	97.2	396.8	16.9	53.0	9.9	1.7	7.9	1.4	7.7	1.5	4.5	0.7	4.5	0.7	41.3	645.4	Hardcap		
RRMDD672	1.4	2.8	1.4	99.0	588.4	18.8	61.8	11.5	1.8	8.7	1.5	8.4	1.6	5.0	0.8	5.4	0.8	43.4	857.0	Hardcap		
RRMDD672	2.8	4.3	1.4	145.4	391.9	27.4	90.5	16.5	2.6	12.7	2.0	11.3	2.3	6.6	1.0	6.6	1.0	63.4	781.2	Transition		
RRMDD672	4.3	5.1	0.8	191.2	220.5	41.0	129.5	21.1	3.8	16.4	2.4	13.4	2.5	7.6	1.0	6.6	1.0	76.7	734.5	Clay		
RRMDD672	5.1	5.9	0.8	147.8	228.5	38.7	129.5	22.1	4.1	18.3	2.5	13.1	2.5	7.1	1.0	6.0	0.9	74.3	696.4	Clay		
RRMDD672	5.9	6.7	0.8	99.9	182.4	25.7	89.9	16.9	3.2	14.5	2.1	12.0	2.3	6.7	0.9	5.9	0.9	69.3	532.6	Clay		
RRMDD672	6.7	7.7	1.0	98.4	210.1	24.9	93.8	19.1	3.9	18.6	2.7	15.2	3.0	8.5	1.1	7.3	1.0	92.2	599.7	Clay		
RRMDD672	7.7	8.7	1.0	93.7	204.5	22.8	82.1	15.4	3.2	14.6	2.2	12.4	2.5	7.2	1.0	6.3	1.0	79.2	548.0	Clay		
RRMDD672	8.7	9.7	1.0	76.2	165.2	18.2	64.0	12.5	2.7	11.4	1.7	9.6	1.9	6.4	0.9	5.6	0.9	75.4	452.7	Clay		
RRMDD672	9.7	10.4	0.6	83.4	181.8	19.9	71.7	13.2	2.7	12.4	1.8	10.6	2.5	8.0	1.2	7.5	1.2	103.0	520.8	Clay		
RRMDD672	10.4	11.0	0.6	88.4	193.5	21.5	75.3	13.5	2.7	12.8	1.9	11.4	2.5	8.0	1.2	7.6	1.2	115.2	556.8	Clay		
RRMDD672	11.0	12.0	1.0	87.0	192.2	20.5	72.1	13.3	2.6	11.3	1.6	9.4	1.8	5.4	0.7	4.9	0.7	67.8	491.4	Upper Saprolite		
RRMDD672	12.0	13.0	1.0	100.9	220.5	23.7	81.6	14.3	2.8	12.2	1.8	9.3	1.9	5.4	0.7	4.8	0.7	63.4	544.0	Lower Saprolite		
RRMDD672	13.0	14.0	1.0	91.8	199.0	21.3	72.3	13.1	2.4	10.7	1.5	8.7	1.7	4.9	0.6	4.0	0.6	53.3	485.9	Lower Saprolite		
RRMDD672	14.0	14.7	0.7	76.9	168.9	18.1	63.5	11.7	2.3	9.6	1.4	8.0	1.5	4.4	0.6	3.9	0.6	50.5	421.9	Saprock		
RRMDD672	14.7	15.4	0.7	89.6	194.7	20.4	69.1	12.3	2.4	10.5	1.5	7.9	1.5	4.6	0.6	4.1	0.6	50.5	470.4	Saprock		
RRMDD673	0.0	1.7	1.7	200.0	464.3	37.5	113.6	19.0	2.9	12.2	2.0	10.3	1.9	5.1	0.8	4.9	0.7	47.7	922.7	Hardcap		
RRMDD673	1.7	3.4	1.7	192.9	670.7	38.8	121.3	21.0	3.3	13.7	2.3	12.2	2.3	6.1	0.9	6.0	0.9	54.7	1147.1	Hardcap		
RRMDD673	3.4	5.2	1.7	127.2	344.0	26.6	87.1	15.8	2.6	11.7	1.9	11.0	2.2	6.3	1.0	6.2	0.9	61.8	706.4	Transition		
RRMDD673	5.2	6.2	1.0	115.6	249.4	29.6	111.2	22.4	4.0	19.0	2.9	15.4	2.8	7.6	1.0	6.0	0.9	77.3	665.0	Pallid		
RRMDD673	6.2	7.2	1.0	112.8	246.9	27.1	96.6	17.2	3.1	13.9	2.2	11.8	2.3	6.8	1.0	5.8	0.8	70.2	618.5	Clay		
RRMDD673	7.2	8.1	0.9	110.1	240.2	27.8	101.0	19.4	3.5	16.1	2.6	14.8	3.3	10.2	1.6	9.8	1.4	122.8	684.5	Clay		
RRMDD673	8.1	8.9	0.9	102.0	226.0	24.8	89.8	16.5	2.9	13.3	2.0	11.1	2.5	8.1	1.2	7.4	1.2	104.4	613.2	Upper Saprolite		
RRMDD673	8.9	9.8	0.9	102.2	227.3	24.1	85.4	15.4	2.7	12.0	1.9	9.9	2.0	6.3	0.9	5.7	0.8	70.7	567.2	Upper Saprolite		
RRMDD673	9.8	10.6	0.9	93.8	210.7	22.2	79.2	14.8	2.6	11.3	1.7	9.0	1.7	4.9	0.7	4.5	0.7	53.0	510.7	Upper Saprolite		
RRMDD673	10.6	11.4	0.8	92.4	210.1	21.8	78.6	15.0	2.6	11.6	1.8	9.7	1.9	5.4	0.8	4.9	0.7	58.8	516.2	Upper Saprolite		
RRMDD673	11.4	12.2	0.8	80.7	181.8	19.0	67.5	12.9	2.4	9.8	1.5	8.2	1.5	4.4	0.7	4.3	0.6	47.1	442.4	Upper Saprolite		
RRMDD673	12.2	13.1	0.8	82.0	187.3	19.5	69.3	12.6	2.2	9.8	1.5	8.1	1.6	4.8	0.7	4.4	0.6	49.0	453.6	Upper Saprolite		
RRMDD673	13.1	14.0	1.0	68.7	155.4	16.5	59.0	10.9	2.0	8.2	1.3	7.2	1.4	4.2	0.6	4.1	0.5	44.8	384.9	Saprock		
RRMDD673	14.0	15.0	1.0	73.2	167.1	17.6	64.6	12.0	2.3	9.3	1.4	7.2	1.4	3.8	0.6	3.5	0.5	41.9	406.4	Saprock		

																				>200ppm TREO-CeO <sub>2</sub> Interval		
Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	Length (m)	TREO ppm
RRMDD674	0.0	1.9	1.9	164.2	490.1	31.5	105.9	19.4	3.0	14.3	2.3	12.7	2.4	7.0	1.0	6.5	1.0	61.3	922.8	Hardcap		
RRMDD674	1.9	3.8	1.9	205.2	570.0	39.0	125.4	23.1	3.6	17.7	2.7	15.7	2.9	8.3	1.3	8.1	1.2	78.4	1102.6	Transition		
RRMDD674	3.8	4.5	0.7	150.7	239.5	33.8	114.2	19.1	3.5	16.3	2.4	12.6	2.5	7.4	1.0	6.6	0.9	78.9	689.5	Clay		
RRMDD674	4.5	5.2	0.7	143.1	184.3	33.5	111.5	18.5	3.5	15.7	2.3	12.6	2.5	7.3	1.0	6.2	0.9	79.0	621.7	Clay		
RRMDD674	5.2	5.9	0.7	126.7	173.2	29.0	95.5	16.4	3.1	13.5	2.0	10.9	2.2	6.4	0.9	5.6	0.8	66.2	552.4	Clay		
RRMDD674	5.9	6.7	0.8	116.6	194.1	30.0	115.2	21.5	3.6	16.7	2.3	13.1	2.4	6.8	0.8	5.6	0.8	69.2	598.6	Clay		
RRMDD674	6.7	7.5	0.8	87.0	162.1	21.9	84.0	15.6	2.9	13.2	2.0	11.4	2.1	6.2	0.8	5.8	0.8	65.4	481.1	Clay		
RRMDD674	7.5	8.5	1.0	86.8	184.9	22.0	87.1	17.6	3.3	15.0	2.2	13.4	2.5	7.1	1.0	6.1	0.9	78.0	527.8	Clay		
RRMDD674	8.5	9.3	0.8	79.5	172.0	18.9	72.7	12.8	2.4	10.5	1.6	9.8	1.9	5.9	0.8	5.2	0.8	61.1	455.8	Clay		
RRMDD674	9.3	9.9	0.6	75.5	173.8	17.9	71.6	13.6	2.6	11.2	1.6	10.3	2.1	6.7	1.0	6.5	1.0	74.9	470.3	Clay		
RRMDD674	9.9	10.5	0.6	98.6	218.0	23.8	92.7	17.2	3.0	14.8	2.0	12.7	2.6	8.1	1.1	7.3	1.1	101.1	604.3	Clay		
RRMDD674	10.5	11.4	0.9	90.9	199.0	21.7	83.3	14.8	2.7	11.8	1.7	10.2	2.0	6.3	0.9	6.0	0.9	82.5	534.7	Clay		
RRMDD674	11.4	12.3	0.9	102.5	225.4	23.6	90.7	16.3	2.8	12.2	1.7	10.1	1.9	5.1	0.7	5.0	0.7	60.4	559.2	Upper Saprolite		
RRMDD674	12.3	13.2	0.9	79.0	177.5	18.8	70.8	13.4	2.3	10.8	1.5	8.7	1.6	4.9	0.7	4.9	0.7	50.9	446.7	Upper Saprolite		
RRMDD674	13.2	14.1	0.9	70.8	161.5	17.1	64.4	12.2	2.4	9.4	1.3	7.4	1.6	4.6	0.6	4.2	0.6	45.7	403.8	Upper Saprolite		
RRMDD674	14.1	14.9	0.9	74.9	164.6	17.8	67.1	12.4	2.4	9.5	1.4	8.1	1.6	4.6	0.6	4.4	0.6	48.9	418.8	Upper Saprolite		
RRMDD674	14.9	15.8	0.9	71.3	152.9	17.0	65.1	12.1	2.2	9.7	1.3	7.7	1.5	4.4	0.6	4.3	0.6	48.0	398.7	Upper Saprolite		
RRMDD674	15.8	16.7	0.9	79.4	174.4	19.0	71.6	13.4	2.7	10.8	1.5	8.7	1.6	4.8	0.6	4.5	0.6	47.1	440.7	Lower Saprolite		
RRMDD674	16.7	17.6	0.9	76.7	167.7	17.8	67.9	13.3	2.4	10.0	1.5	8.4	1.5	4.5	0.6	4.2	0.6	48.4	425.5	Lower Saprolite		
RRMDD674	17.6	18.4	0.9	88.9	190.4	20.4	76.2	14.2	2.4	11.1	1.5	8.7	1.7	4.6	0.7	4.1	0.6	51.9	477.4	Lower Saprolite	14.6	500
RRMDD674	18.4	19.3	0.9	71.1	151.1	16.4	62.8	11.4	2.1	8.7	1.3	7.2	1.4	3.8	0.6	3.7	0.6	41.9	383.9	Saprock		
RRMDD674	19.3	20.2	0.9	67.3	143.1	15.8	58.6	11.3	2.0	9.3	1.3	8.0	1.4	4.5	0.6	4.3	0.7	47.6	375.7	Saprock		
RRMDD674	20.2	21.3	1.2	90.4	194.1	20.8	75.6	13.7	2.4	11.1	1.5	8.4	1.6	4.3	0.6	4.1	0.6	48.1	477.2	Saprock		
RRMDD674	21.3	22.5	1.2	100.2	230.9	23.8	79.9	13.7	2.5	10.2	1.5	8.1	1.6	4.3	0.6	3.9	0.6	47.1	528.8	Saprock		
RRMDD675	0.0	1.8	1.8	83.6	223.6	15.8	51.7	9.6	1.6	7.7	1.2	7.5	1.5	4.5	0.7	4.6	0.7	40.3	454.5	Hardcap		
RRMDD675	1.8	3.5	1.8	173.0	340.3	36.0	115.9	19.3	2.9	13.0	2.0	11.1	2.0	5.7	0.9	5.8	0.9	49.9	778.7	Hardcap		
RRMDD675	3.5	5.3	1.8	186.5	276.4	41.8	148.1	27.3	4.3	19.6	2.8	15.8	2.9	8.4	1.3	8.3	1.2	77.5	822.2	Transition		
RRMDD675	5.3	6.1	0.8	198.8	260.4	45.9	172.0	31.7	5.0	23.5	3.5	19.7	3.6	10.5	1.4	9.4	1.3	111.6	898.4	Clay		
RRMDD675	6.1	6.9	0.8	168.9	199.6	38.5	145.2	27.7	4.2	21.1	3.1	17.2	3.3	9.7	1.3	8.9	1.3	103.5	753.5	Clay		
RRMDD675	6.9	7.6	0.8	141.9	205.8	35.9	138.2	25.2	4.5	21.4	3.0	17.7	3.3	9.1	1.2	7.9	1.1	95.1	711.3	Clay		
RRMDD675	7.6	8.4	0.8	96.1	194.1	24.4	100.3	21.9	4.4	21.9	3.3	19.7	3.8	10.6	1.4	8.5	1.2	109.7	621.3	Clay		
RRMDD675	8.4	9.3	0.9	84.2	175.0	20.2	76.7	14.7	2.6	12.5	1.9	11.4	2.3	6.6	0.9	6.1	0.8	74.5	490.6	Clay		
RRMDD675	9.3	10.3	0.9	81.9	183.6	19.5	75.3	14.3	2.7	11.7	1.7	10.7	2.2	6.7	0.9	6.4	0.9	74.9	493.5	Clay		
RRMDD675	10.3	11.3	1.1	100.3	221.7	24.3	93.4	17.5	3.4	15.0	2.1	13.3	2.9	9.0	1.3	8.6	1.3	120.8	634.8	Clay		
RRMDD675	11.3	12.2	0.9	89.8	192.9	20.8	77.6	14.6	2.5	11.3	1.7	9.7	1.9	5.9	0.8	5.6	0.8	79.2	515.1	Upper Saprolite		
RRMDD675	12.2	13.1	0.9	100.9	230.3	23.7	87.0	15.0	2.6	11.9	1.7	9.4	1.8	5.4	0.7	4.6	0.7	53.8	549.5	Upper Saprolite		
RRMDD675	13.1	14.1	0.9	70.1	155.4	16.7	63.3	11.9	2.1	8.8	1.3	7.2	1.4	4.1	0.6	3.7	0.6	43.3	390.6	Lower Saprolite		
RRMDD675	14.1	15.0	0.9	76.3	171.4	18.1	67.9	13.1	2.4	9.9	1.4	8.8	1.6	5.0	0.7	4.6	0.7	54.2	436.1	Lower Saprolite		
RRMDD675	15.0	15.9	1.0	73.2	163.4	17.6	67.0	12.2	2.5	9.9	1.4	8.3	1.7	4.6	0.6	4.3	0.7	51.7	419.0	Lower Saprolite		
RRMDD675	15.9	16.9	1.0	75.9	162.1	18.0	68.7	12.4	2.4	9.5	1.3	7.1	1.4	4.2	0.6	3.6	0.6	39.2	407.0	Saprock	10.6	567
RRMDD675	16.9	17.9	1.0	75.1	169.5	18.5	71.4	13.2	2.6	10.1	1.4	8.1	1.5	4.5	0.6	4.4	0.6	46.4	427.9	Saprock		
RRMDD675	17.9	18.8	0.9	75.5	164.0	17.5	65.3	12.6	2.3	9.9	1.4	8.0	1.6	4.3	0.6	4.1	0.6	48.4	416.1	Saprock		
RRMDD675	18.8	19.7	0.9	83.3	178.1	19.1	72.2	12.9	2.4	10.4	1.4	7.8	1.5	4.0	0.6	4.1	0.6	47.0	445.3	Saprock		
RRMDD675	19.7	20.4	0.7	69.3	150.5	16.0	59.4	11.1	2.1	8.8	1.3	6.9	1.3	3.8	0.6	3.6	0.5	41.5	376.7	Saprock		
RRMDD676	0.0	1.7	1.7	125.5	314.5	20.7	63.2	11.3	1.8	8.8	1.4	8.6	1.6	4.9	0.8	5.4	0.8	43.9	613.2	Hardcap		
RRMDD676	1.7	3.4	1.7	129.6	450.8	24.9	80.8	15.0	2.4	11.1	1.8	10.2	2.0	5.8	0.9	6.2	0.9	55.1	797.5	Transition		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD676	3.4	4.1	0.8	149.5	217.4	30.4	108.6	18.3	2.9	13.8	2.0	11.4	2.2	6.5	0.9	6.0	0.9	67.7	638.6	Clay		
RRMDD676	4.1	4.9	0.8	140.1	188.6	31.9	112.4	18.7	3.4	15.2	2.2	11.8	2.3	6.3	0.9	6.3	0.8	68.6	609.5	Clay		
RRMDD676	4.9	5.6	0.8	111.9	172.0	26.8	96.9	16.8	2.9	13.3	1.9	10.8	2.0	5.7	0.8	5.5	0.8	60.3	528.4	Clay		
RRMDD676	5.6	6.3	0.7	95.5	175.0	24.3	95.8	17.3	3.1	13.4	2.0	11.3	2.1	6.2	0.8	5.2	0.7	63.5	516.3	Clay		
RRMDD676	6.3	7.3	1.0	84.2	170.7	21.8	86.0	16.2	3.3	14.0	2.0	11.9	2.2	6.4	0.8	5.5	0.7	66.2	491.9	Clay		
RRMDD676	7.3	8.3	1.0	93.2	202.7	23.4	92.3	18.0	3.3	15.6	2.3	13.3	2.5	7.0	0.9	6.1	0.8	77.1	558.5	Clay		
RRMDD676	8.3	9.1	0.8	94.6	209.4	22.6	87.5	16.5	3.1	14.6	2.1	12.3	2.6	7.4	1.0	6.9	1.0	82.9	564.5	Clay		
RRMDD676	9.1	9.8	0.8	87.7	197.2	20.8	79.5	14.5	2.8	11.6	1.6	9.5	1.8	6.1	0.8	5.2	0.8	65.4	505.4	Clay		
RRMDD676	9.8	10.6	0.8	85.1	188.6	20.2	78.4	14.0	2.6	11.2	1.7	9.6	2.1	6.4	0.9	6.2	1.0	78.9	506.8	Clay		
RRMDD676	10.6	11.4	0.8	86.7	195.3	20.9	79.3	14.3	2.6	11.5	1.6	9.5	2.0	6.1	0.9	5.7	0.9	75.6	512.7	Clay		
RRMDD676	11.4	12.1	0.7	104.6	243.2	25.1	93.9	16.6	3.1	13.6	1.8	10.5	2.0	5.7	0.8	5.1	0.7	67.7	594.6	Clay		
RRMDD676	12.1	12.8	0.7	74.0	174.4	18.3	69.6	13.6	2.7	11.8	1.6	9.1	1.7	5.1	0.7	4.6	0.7	54.4	442.3	Clay		
RRMDD676	12.8	13.6	0.7	65.7	153.6	16.1	61.1	10.9	2.1	8.9	1.2	7.5	1.4	4.3	0.6	3.9	0.6	45.2	383.0	Upper Saprolite		
RRMDD676	13.6	14.3	0.7	75.9	170.1	17.8	68.0	12.8	2.5	10.7	1.5	9.0	1.8	5.0	0.7	4.6	0.7	54.2	435.3	Upper Saprolite		
RRMDD676	14.3	15.0	0.7	72.9	164.0	17.6	68.9	12.9	2.6	10.2	1.4	7.7	1.5	4.4	0.6	4.3	0.6	47.5	417.2	Upper Saprolite		
RRMDD676	15.0	15.9	0.9	59.5	118.5	14.0	56.6	10.6	2.1	8.9	1.2	7.7	1.6	5.2	0.7	4.9	0.6	53.3	345.5	Lower Saprolite		
RRMDD676	15.9	16.9	1.0	76.5	169.5	18.7	70.5	13.6	2.6	10.4	1.4	8.6	1.5	4.2	0.6	3.9	0.5	45.2	427.7	Lower Saprolite		
RRMDD676	16.9	17.9	1.0	72.8	161.5	17.3	63.1	11.4	2.2	9.4	1.3	7.7	1.6	4.4	0.7	4.6	0.6	49.7	408.3	Lower Saprolite		
RRMDD676	17.9	19.0	1.0	98.2	211.9	22.8	84.6	15.1	2.6	11.9	1.6	9.3	1.8	5.3	0.7	4.7	0.7	57.9	529.0	Lower Saprolite		
RRMDD676	19.0	19.7	0.7	79.3	170.1	18.3	70.0	12.5	2.4	9.9	1.4	7.8	1.4	4.4	0.5	3.9	0.6	45.5	428.0	Lower Saprolite		
RRMDD676	19.7	20.4	0.7	63.4	137.6	15.2	57.0	10.6	2.0	8.3	1.2	6.9	1.4	4.2	0.6	4.0	0.6	43.2	356.2	Saprock	16.3	491
RRMDD676	20.4	21.3	0.9	87.0	189.2	20.2	74.4	13.4	2.4	10.0	1.4	8.0	1.5	4.5	0.6	3.6	0.6	46.9	463.7	Saprock		
RRMDD676	21.3	22.2	0.9	77.5	171.4	18.2	68.1	12.2	2.2	9.4	1.3	7.5	1.3	4.2	0.5	3.9	0.5	44.3	422.7	Saprock		
RRMDD677	0.0	2.0	2.0	133.7	502.4	23.2	71.2	13.4	2.1	9.8	1.6	9.3	1.8	5.3	0.8	5.6	0.9	48.4	829.4	Hardcap		
RRMDD677	2.0	4.0	2.0	148.4	681.8	29.5	95.9	17.5	2.8	12.6	2.1	12.1	2.3	6.8	1.1	7.0	1.0	57.9	1078.6	Transition		
RRMDD677	4.0	5.0	1.0	160.1	243.2	32.1	112.1	18.8	3.1	13.9	2.1	11.6	2.1	6.5	0.9	6.3	0.9	64.6	678.5	Clay		
RRMDD677	5.0	6.1	1.0	168.3	251.8	37.7	133.0	21.1	3.7	16.4	2.3	13.3	2.4	6.9	1.0	6.7	1.0	72.4	737.9	Clay		
RRMDD677	6.1	7.1	1.0	166.5	275.2	42.0	159.8	28.4	5.2	24.3	3.6	19.7	3.7	9.9	1.3	8.2	1.1	101.6	850.6	Clay		
RRMDD677	7.1	8.0	1.0	122.0	240.2	33.1	135.9	25.4	4.9	23.6	3.6	21.6	4.0	12.0	1.6	10.2	1.4	126.5	765.9	Clay		
RRMDD677	8.0	9.0	1.0	133.1	270.2	35.4	145.8	29.1	5.2	26.3	3.9	23.9	4.5	12.8	1.6	10.6	1.4	128.9	832.8	Clay		
RRMDD677	9.0	9.9	0.9	104.3	243.8	26.6	95.2	17.5	3.5	15.7	2.4	14.1	3.1	8.7	1.2	7.8	1.1	95.6	640.6	Clay		
RRMDD677	9.9	10.7	0.9	64.5	143.7	17.3	71.2	13.5	2.8	13.3	2.0	12.9	3.2	10.7	1.6	10.1	1.5	146.0	514.3	Upper Saprolite		
RRMDD677	10.7	11.6	0.9	61.3	137.6	15.3	58.4	10.6	2.3	9.5	1.4	8.2	1.7	5.6	0.8	5.1	0.7	86.9	405.4	Upper Saprolite		
RRMDD677	11.6	12.6	1.0	68.6	159.1	16.4	62.5	11.3	2.2	9.4	1.3	7.8	1.5	4.8	0.7	4.5	0.6	50.8	401.6	Upper Saprolite		
RRMDD677	12.6	13.6	1.1	69.2	165.2	16.8	63.0	11.7	2.3	9.6	1.4	8.4	1.6	4.7	0.7	4.7	0.6	50.4	410.2	Upper Saprolite		
RRMDD677	13.6	14.7	1.0	70.6	156.6	17.0	64.6	11.8	2.2	9.9	1.5	8.6	1.6	4.9	0.7	4.5	0.6	52.1	407.4	Upper Saprolite		
RRMDD677	14.7	15.5	0.8	71.9	159.1	17.3	65.0	11.8	2.3	9.9	1.5	8.6	1.6	4.7	0.7	4.3	0.6	50.5	409.7	Upper Saprolite		
RRMDD677	15.5	16.3	0.8	68.6	149.3	16.4	61.8	11.2	2.2	9.5	1.4	8.0	1.5	4.6	0.6	4.2	0.6	47.0	386.8	Upper Saprolite		
RRMDD677	16.3	17.1	0.8	72.4	156.6	17.1	65.4	11.8	2.2	9.4	1.4	8.0	1.5	4.2	0.6	4.0	0.6	47.2	402.6	Upper Saprolite		
RRMDD677	17.1	17.9	0.8	68.0	148.6	16.3	60.3	11.2	2.2	9.5	1.4	8.7	1.8	5.4	0.8	5.4	0.8	58.9	399.3	Upper Saprolite		
RRMDD677	17.9	18.7	0.9	70.0	156.0	16.7	62.3	11.5	2.2	9.5	1.5	8.2	1.4	4.5	0.6	4.0	0.5	46.6	395.4	Lower Saprolite		
RRMDD677	18.7	19.6	0.8	67.1	147.4	15.9	60.5	11.4	2.0	8.7	1.2	6.7	1.2	3.5	0.5	3.5	0.5	37.1	367.2	Lower Saprolite		
RRMDD677	19.6	20.4	0.8	63.0	138.2	15.2	57.4	10.6	2.0	8.5	1.3	7.9	1.6	5.0	0.7	5.3	0.7	55.7	373.3	Lower Saprolite	16.4	530
RRMDD677	20.4	21.3	0.9	65.6	146.8	15.7	59.0	11.1	2.1	8.8	1.2	6.6	1.1	3.4	0.5	3.3	0.5	35.3	360.9	Saprock		
RRMDD677	21.3	22.1	0.9	66.7	148.0	16.1	60.5	11.3	2.1	8.6	1.3	8.0	1.6	4.6	0.6	4.4	0.6	49.9	384.3	Saprock		
RRMDD677	22.1	23.1	1.0	67.4	148.0	15.9	59.6	10.7	2.1	9.0	1.3	7.5	1.4	3.9	0.6	4.0	0.6	43.9	376.0	Saprock		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD677	23.1	24.0	1.0	69.4	150.5	16.3	61.5	11.1	2.1	8.9	1.3	7.4	1.4	4.2	0.6	4.0	0.5	43.6	382.6	Saprock		
RRMDD677	24.0	25.0	1.0	67.3	146.2	15.9	61.4	11.4	2.1	9.4	1.4	9.0	1.9	5.6	0.8	5.6	0.8	63.4	402.1	Saprock		
RRMDD678	0.0	1.5	1.5	153.1	513.5	28.6	92.1	17.0	2.4	11.9	1.8	11.8	2.1	6.7	1.0	7.0	0.9	57.5	907.4	Hardcap		
RRMDD678	1.5	3.0	1.5	204.7	966.8	42.5	138.2	24.6	3.5	15.6	2.4	14.5	2.6	7.9	1.1	7.8	1.1	64.5	1497.6	Hardcap		
RRMDD678	3.0	4.5	1.5	141.9	346.4	29.2	98.2	18.0	2.8	13.3	1.9	11.3	2.1	6.3	0.9	6.1	0.9	57.0	736.3	Transition		
RRMDD678	4.5	5.3	0.8	115.4	202.1	27.8	101.2	17.9	3.1	14.5	2.1	12.1	2.1	6.3	0.9	6.3	0.9	63.9	576.7	Clay		
RRMDD678	5.3	6.0	0.8	126.1	218.7	31.8	119.0	21.0	3.8	18.0	2.5	15.0	2.6	7.7	1.1	7.2	1.0	75.6	651.1	Clay		
RRMDD678	6.0	6.8	0.8	134.3	277.6	34.7	134.1	25.3	4.9	22.7	3.3	19.2	3.5	9.9	1.3	8.4	1.2	98.8	779.1	Clay		
RRMDD678	6.8	7.6	0.8	100.4	218.0	25.9	103.3	19.7	3.6	18.4	2.8	18.0	3.6	11.7	1.6	10.7	1.5	121.3	660.6	Clay		
RRMDD678	7.6	8.4	0.8	127.8	286.2	31.8	124.2	22.5	4.0	21.3	3.0	21.0	4.6	14.3	2.0	13.4	1.9	178.4	856.4	Clay		
RRMDD678	8.4	9.3	0.8	105.2	245.7	25.7	97.5	17.0	3.0	14.0	2.0	12.6	2.8	9.1	1.3	8.9	1.4	161.3	707.4	Clay		
RRMDD678	9.3	10.3	1.0	126.1	297.3	31.5	122.5	20.8	3.6	18.3	2.6	17.2	4.1	13.6	1.9	12.4	1.9	198.7	872.4	Clay		
RRMDD678	10.3	10.8	0.6	73.3	160.9	17.9	67.9	11.7	2.2	8.6	1.2	6.8	1.3	4.1	0.6	4.1	0.6	42.3	403.3	Clay		
RRMDD678	10.8	11.4	0.6	108.2	249.4	25.9	95.3	15.9	3.0	12.3	1.7	9.8	1.7	4.8	0.6	4.1	0.6	51.7	585.0	Clay		
RRMDD678	11.4	12.3	0.9	63.2	140.7	15.6	58.9	11.1	2.3	9.2	1.4	8.3	1.6	5.1	0.7	4.6	0.7	53.1	376.3	Upper Saprolite		
RRMDD678	12.3	13.2	0.9	61.8	136.4	15.2	58.6	10.7	2.2	8.4	1.3	7.7	1.3	3.8	0.5	3.7	0.6	41.3	353.4	Upper Saprolite		
RRMDD678	13.2	14.1	0.9	51.8	113.0	12.5	47.1	9.0	1.7	6.8	1.0	5.9	1.1	3.3	0.5	3.3	0.5	35.0	292.5	Upper Saprolite		
RRMDD678	14.1	14.8	0.7	73.4	168.9	17.9	68.0	12.2	2.4	9.9	1.4	8.6	1.6	4.7	0.7	4.5	0.6	51.4	426.2	Lower Saprolite		
RRMDD678	14.8	15.1	0.3	71.2	153.6	16.9	64.3	11.1	1.9	8.9	1.4	8.2	1.5	4.4	0.6	4.5	0.6	48.1	397.2	Lower Saprolite	10.6	580
RRMDD678	15.1	16.2	1.2	69.0	156.0	16.9	63.9	12.2	2.2	9.1	1.4	8.1	1.6	4.6	0.6	4.3	0.6	48.6	399.0	Saprock		
RRMDD678	16.2	17.4	1.2	68.5	147.4	16.3	61.4	10.9	2.0	8.9	1.3	7.8	1.4	4.3	0.6	4.2	0.6	45.0	380.6	Saprock		
RRMDD679	0.0	2.0	2.0	95.1	405.4	16.4	52.1	9.9	1.6	7.3	1.3	7.0	1.4	4.2	0.6	4.5	0.6	35.9	643.5	Hardcap		
RRMDD679	2.0	4.0	2.0	129.6	886.9	24.3	77.9	14.8	2.2	10.6	1.8	9.8	1.9	5.6	0.9	6.1	0.9	47.1	1220.5	Hardcap		
RRMDD679	4.0	4.8	0.9	190.6	238.3	45.8	164.5	25.9	4.2	16.9	2.4	12.8	2.3	6.3	0.9	6.1	0.8	61.6	779.3	Hardcap		
RRMDD679	4.8	5.7	0.9	119.0	207.6	30.9	114.4	20.8	3.6	15.8	2.3	12.8	2.3	6.7	1.0	6.3	0.8	68.1	612.5	Clay		
RRMDD679	5.7	6.6	0.9	117.9	213.7	33.3	125.4	22.7	3.8	17.2	2.6	14.7	2.5	7.3	0.9	6.7	0.9	70.5	640.2	Clay		
RRMDD679	6.6	7.5	0.9	94.9	195.9	26.6	108.0	21.2	4.0	19.0	3.0	18.1	3.5	10.1	1.3	9.0	1.2	112.1	628.1	Clay		
RRMDD679	7.5	8.4	0.9	69.2	146.8	17.7	75.1	15.9	3.0	16.5	2.5	15.6	3.2	9.8	1.3	8.4	1.2	98.8	485.0	Clay		
RRMDD679	8.4	9.1	0.7	63.4	136.4	16.9	74.3	15.0	3.0	17.8	2.8	18.6	4.3	13.4	1.8	11.5	1.7	158.1	539.0	Upper Saprolite		
RRMDD679	9.1	9.8	0.7	56.5	121.1	13.9	57.3	9.8	1.9	10.7	1.6	10.3	2.5	8.5	1.1	6.7	1.1	134.0	436.9	Upper Saprolite		
RRMDD679	9.8	10.5	0.7	58.8	129.0	14.1	54.4	9.3	1.7	8.2	1.1	6.9	1.5	4.7	0.6	3.9	0.6	90.8	385.6	Upper Saprolite		
RRMDD679	10.5	11.5	1.0	75.5	167.1	18.0	67.1	11.8	2.2	9.6	1.4	8.0	1.5	4.4	0.6	4.1	0.6	47.1	419.0	Upper Saprolite		
RRMDD679	11.5	12.5	1.0	71.1	153.6	17.7	65.0	11.5	2.1	8.4	1.3	6.9	1.3	4.1	0.5	3.7	0.5	42.0	389.7	Lower Saprolite		
RRMDD679	12.5	13.5	1.0	68.1	152.9	17.1	61.9	11.7	2.1	8.7	1.2	6.9	1.3	4.1	0.6	3.9	0.5	42.8	384.0	Lower Saprolite		
RRMDD679	13.5	14.5	1.0	74.7	168.3	18.8	67.7	12.6	2.3	9.2	1.3	7.5	1.4	4.0	0.6	3.9	0.6	43.7	416.5	Lower Saprolite		
RRMDD679	14.5	15.3	0.8	76.8	177.5	19.3	70.6	13.7	2.5	9.5	1.5	8.2	1.5	4.5	0.6	4.2	0.6	48.6	439.7	Lower Saprolite	10.5	480
RRMDD679	15.3	16.1	0.8	66.5	155.4	17.2	62.1	11.3	2.2	8.2	1.3	7.0	1.2	3.3	0.5	3.2	0.5	36.6	376.6	Saprock		
RRMDD679	16.1	17.0	0.9	60.3	138.2	15.3	56.5	10.7	2.3	8.8	1.2	7.3	1.5	4.3	0.6	4.0	0.6	46.9	358.3	Saprock		
RRMDD679	17.0	17.9	0.9	59.9	137.0	15.3	56.8	10.6	2.2	8.2	1.3	7.1	1.5	4.4	0.6	3.9	0.6	42.4	351.7	Fresh Rock		
RRMDD679	17.9	18.7	0.9	57.9	133.9	14.7	54.2	10.8	2.3	8.1	1.3	7.3	1.3	3.9	0.5	3.4	0.5	39.7	339.8	Fresh Rock		
RRMDD679	18.7	19.6	0.9	60.3	136.4	15.2	55.1	10.5	2.1	8.0	1.2	7.3	1.3	4.0	0.5	3.8	0.5	41.1	347.3	Fresh Rock		
RRMDD680	0.0	1.5	1.5	75.3	301.0	14.0	45.7	8.8	1.5	7.3	1.2	7.1	1.4	4.3	0.7	4.5	0.7	38.9	512.4	Hardcap		
RRMDD680	1.5	3.1	1.5	119.6	959.4	22.0	71.3	13.7	2.1	9.7	1.7	9.4	1.8	5.3	0.8	5.7	0.8	43.6	1266.8	Hardcap		
RRMDD680	3.1	4.1	1.0	133.1	182.4	32.3	113.8	21.2	3.6	15.6	2.4	13.0	2.2	6.7	0.9	6.0	0.9	63.2	597.4	Clay		
RRMDD680	4.1	5.1	1.0	114.5	199.0	31.1	116.6	24.0	4.3	18.8	2.9	16.8	3.2	9.0	1.2	8.1	1.2	90.0	640.7	Clay		
RRMDD680	5.1	5.9	0.8	99.1	179.3	27.8	106.1	22.4	4.2	18.1	2.8	16.1	2.9	8.1	1.1	7.5	1.0	82.9	579.5	Clay		



Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD680	5.9	6.7	0.8	89.6	178.7	28.9	121.3	26.1	5.1	24.2	3.9	24.0	4.7	14.6	1.9	13.2	1.8	147.3	685.4	Clay		
RRMDD680	6.7	7.5	0.8	106.6	224.8	33.3	137.1	22.2	4.5	23.9	3.6	24.0	5.7	18.0	2.4	15.1	2.3	269.2	892.6	Upper Saprolite		
RRMDD680	7.5	8.3	0.8	82.8	189.2	21.4	77.9	13.8	2.7	11.3	1.7	10.0	2.1	6.1	0.8	5.7	0.8	84.3	510.6	Upper Saprolite	5.2	648
RRMDD680	8.3	9.4	1.1	66.4	153.6	17.2	63.3	12.1	2.4	9.2	1.4	8.0	1.5	4.2	0.6	4.1	0.6	46.0	390.4	Saprock		
RRMDD680	9.4	10.3	0.9	62.7	143.7	16.0	58.8	11.1	2.2	8.1	1.4	7.6	1.5	4.6	0.6	3.9	0.6	47.0	369.9	Saprock		
RRMDD680	10.3	11.2	0.9	60.0	138.2	15.5	55.1	11.0	2.2	8.6	1.3	7.1	1.4	4.1	0.6	3.9	0.5	40.8	350.1	Saprock		
RRMDD680	11.2	12.1	0.9	57.5	130.8	14.7	54.5	9.8	2.2	8.0	1.2	6.7	1.2	3.6	0.5	3.4	0.5	37.3	331.8	Saprock		
RRMDD681	0.0	1.5	1.5	91.8	388.2	19.2	65.8	12.8	2.1	10.2	1.6	9.9	1.9	5.9	0.9	6.0	0.9	51.6	668.6	Hardcap		
RRMDD681	1.5	3.1	1.5	105.8	581.0	19.7	64.2	12.9	2.1	9.4	1.5	9.3	1.8	5.6	0.8	5.8	0.8	40.8	861.2	Hardcap		
RRMDD681	3.1	4.6	1.5	172.4	561.4	32.3	102.4	18.1	2.9	13.5	2.1	12.3	2.3	7.4	1.1	7.7	1.0	59.9	996.8	Transition		
RRMDD681	4.6	5.4	0.8	190.6	304.6	49.3	171.5	29.8	5.0	20.7	3.1	15.7	2.8	7.5	1.1	6.9	1.0	71.6	881.2	Clay		
RRMDD681	5.4	6.3	0.8	157.7	301.0	44.6	160.4	29.2	5.1	21.6	3.3	17.0	3.2	7.8	1.1	7.1	1.0	78.1	838.2	Clay		
RRMDD681	6.3	7.1	0.8	126.7	264.1	33.8	122.5	22.6	4.3	18.5	2.8	15.1	2.8	6.9	1.0	6.2	0.9	69.2	697.4	Clay		
RRMDD681	7.1	7.9	0.8	121.4	270.2	32.5	116.6	21.4	4.3	19.0	2.9	16.4	3.2	8.1	1.1	7.2	1.0	81.8	706.9	Clay		
RRMDD681	7.9	8.7	0.8	125.5	299.7	31.7	113.8	20.6	3.9	18.6	2.9	17.9	4.3	12.4	1.8	11.2	1.7	164.5	830.4	Clay		
RRMDD681	8.7	9.5	0.8	124.3	296.0	30.4	109.8	20.7	3.9	19.4	3.0	19.1	5.1	15.4	2.3	14.3	2.2	206.4	872.3	Upper Saprolite		
RRMDD681	9.5	10.2	0.8	87.5	199.0	21.3	74.2	13.2	2.6	10.7	1.6	8.9	2.2	7.1	1.1	6.9	1.1	99.3	536.7	Upper Saprolite		
RRMDD681	10.2	11.0	0.8	115.1	275.2	27.8	94.0	16.8	3.1	12.6	1.8	9.7	2.0	5.1	0.7	4.7	0.7	74.9	644.1	Upper Saprolite	6.4	753
RRMDD681	11.0	11.8	0.8	67.9	150.5	16.6	57.6	10.5	2.3	8.7	1.3	7.7	1.6	4.7	0.7	4.5	0.6	50.8	386.0	Saprock		
RRMDD681	11.8	12.7	0.8	63.9	141.3	15.6	55.9	10.4	2.3	8.6	1.4	7.8	1.6	4.5	0.6	3.9	0.6	48.1	366.4	Saprock		
RRMDD681	12.7	13.4	0.8	58.6	127.8	14.2	50.7	9.1	2.0	7.8	1.2	6.6	1.3	3.5	0.5	3.2	0.5	38.1	325.2	Saprock		
RRMDD681	13.4	14.2	0.8	51.5	109.0	12.4	44.4	8.0	1.9	6.9	1.0	5.6	1.2	3.6	0.5	3.3	0.6	35.8	285.9	Saprock		
RRMDD681	14.2	14.9	0.8	62.7	143.7	15.2	53.5	9.7	2.0	8.2	1.3	7.5	1.5	4.3	0.6	3.8	0.6	48.8	363.4	Saprock		
RRMDD681	14.9	15.7	0.8	73.3	150.5	16.4	59.6	10.7	2.1	8.6	1.3	7.6	1.5	4.3	0.6	3.9	0.6	48.1	389.1	Saprock		
RRMDD682	0.0	2.1	2.1	87.6	687.9	16.9	55.4	10.3	1.6	7.7	1.2	7.6	1.5	4.5	0.7	4.8	0.7	40.8	929.2	Hardcap		
RRMDD682	2.1	4.2	2.1	136.6	528.2	28.9	93.8	16.5	2.6	11.6	1.7	10.6	2.0	6.0	0.8	6.2	0.8	51.8	898.1	Transition		
RRMDD682	4.2	5.2	1.0	110.4	179.3	25.1	83.6	13.6	2.5	10.2	1.5	8.3	1.7	4.8	0.7	4.7	0.7	48.3	495.4	Clay		
RRMDD682	5.2	6.2	1.0	101.9	160.3	24.4	81.9	14.2	2.6	11.0	1.7	9.8	2.0	5.6	0.8	5.5	0.8	56.0	478.6	Clay		
RRMDD682	6.2	7.1	1.0	66.0	129.0	17.0	61.0	11.8	2.4	10.5	1.6	9.5	2.1	6.0	0.9	6.0	0.9	63.9	388.6	Clay		
RRMDD682	7.1	8.3	1.2	93.0	205.1	24.0	87.1	14.7	3.0	14.3	2.1	12.2	2.9	8.5	1.2	7.7	1.2	118.0	595.0	Clay		
RRMDD682	8.3	8.9	0.6	110.7	259.2	26.3	91.4	15.5	2.9	12.9	1.8	10.2	2.3	6.4	0.9	5.6	0.9	107.2	654.4	Clay		
RRMDD682	8.9	9.5	0.6	86.2	200.2	20.7	71.0	12.6	2.4	9.7	1.5	7.9	1.7	4.8	0.7	4.4	0.7	60.8	485.3	Clay		
RRMDD682	9.5	10.4	0.9	71.7	168.9	17.8	61.8	11.3	2.2	9.0	1.4	7.7	1.6	4.4	0.7	4.1	0.6	48.1	411.3	Upper Saprolite		
RRMDD682	10.4	11.3	0.9	78.9	188.6	19.1	66.3	12.0	2.3	9.2	1.4	7.3	1.5	4.0	0.6	3.7	0.6	42.7	438.2	Lower Saprolite		
RRMDD682	11.3	12.2	0.9	72.8	172.6	17.9	61.7	11.8	2.2	9.0	1.4	7.8	1.7	4.5	0.7	4.6	0.7	50.5	419.9	Lower Saprolite		
RRMDD682	12.2	13.2	1.0	74.8	173.2	18.2	62.9	11.9	2.3	9.2	1.4	7.7	1.6	4.6	0.6	4.2	0.6	48.6	421.9	Lower Saprolite		
RRMDD682	13.2	14.2	1.0	78.5	176.3	19.2	65.6	11.9	2.2	9.4	1.4	7.7	1.6	4.1	0.6	3.9	0.6	46.5	429.4	Lower Saprolite	10.0	470
RRMDD682	14.2	15.3	1.1	77.2	164.0	18.2	63.1	11.4	2.2	9.0	1.4	7.5	1.5	4.0	0.6	3.8	0.6	45.0	409.4	Saprock		
RRMDD682	15.3	16.2	0.9	71.4	152.9	17.3	59.5	10.8	2.1	8.8	1.4	7.7	1.6	4.1	0.6	3.9	0.6	49.1	391.8	Saprock		
RRMDD682	16.2	17.1	0.9	71.7	152.9	17.2	57.7	10.8	2.1	8.6	1.3	7.1	1.5	4.4	0.7	4.4	0.6	48.3	389.5	Saprock		
RRMDD682	17.1	18.0	0.9	78.2	171.4	18.7	64.7	11.5	2.3	9.0	1.4	7.8	1.6	4.3	0.6	4.0	0.6	46.7	422.7	Saprock		
RRMDD683	0.0	1.8	1.8	89.8	519.6	16.2	53.0	11.1	1.7	8.3	1.4	8.6	1.8	5.4	0.8	5.6	0.8	42.2	766.1	Hardcap		
RRMDD683	1.8	3.6	1.8	110.6	857.4	20.7	65.4	12.5	1.9	9.0	1.4	8.6	1.7	5.6	0.8	5.7	0.8	41.7	1143.8	Hardcap		
RRMDD683	3.6	5.4	1.8	113.2	678.1	24.1	79.9	14.6	2.2	10.7	1.6	9.6	1.9	5.6	0.8	5.8	0.8	50.9	999.8	Hardcap		
RRMDD683	5.4	6.1	0.8	134.3	215.6	29.7	100.1	15.7	2.7	11.5	1.7	9.3	1.9	5.2	0.8	5.1	0.8	52.4	586.8	Clay		
RRMDD683	6.1	7.2	1.0	149.5	259.2	35.8	128.3	21.7	3.8	17.8	2.5	14.1	2.5	6.5	0.9	6.5	1.0	68.2	718.2	Clay		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD683	7.2	8.2	1.0	71.4	144.3	18.5	73.1	13.8	2.8	13.0	1.9	11.4	2.2	6.2	0.9	6.3	0.9	63.7	430.4	Clay		
RRMDD683	8.2	9.2	1.0	64.2	138.2	17.9	78.3	15.8	3.0	16.4	2.4	15.2	3.2	10.0	1.3	8.8	1.3	99.9	475.8	Clay		
RRMDD683	9.2	10.2	1.0	91.1	203.9	24.5	100.3	17.4	3.2	19.2	2.7	17.8	4.0	12.6	1.8	11.3	1.7	158.7	670.4	Clay		
RRMDD683	10.2	11.1	1.0	74.4	173.2	19.3	75.8	12.3	2.6	12.3	1.7	10.9	2.5	8.4	1.1	7.1	1.1	137.1	539.9	Clay		
RRMDD683	11.1	12.1	1.0	66.4	160.3	16.2	62.4	10.7	2.2	9.9	1.5	8.5	1.7	4.9	0.7	5.0	0.7	55.5	406.5	Upper Saprolite		
RRMDD683	12.1	13.1	1.0	76.3	176.9	18.7	69.8	12.3	2.5	10.4	1.5	8.0	1.5	4.0	0.5	3.9	0.6	42.3	429.2	Upper Saprolite		
RRMDD683	13.1	14.1	1.0	71.2	164.6	17.0	66.3	11.3	2.2	10.2	1.5	8.6	1.8	5.8	0.8	5.0	0.8	60.3	427.4	Lower Saprolite		
RRMDD683	14.1	15.1	1.0	69.3	161.5	16.9	63.5	11.4	2.2	9.6	1.4	8.0	1.5	4.4	0.6	4.2	0.6	44.6	399.7	Lower Saprolite	9.7	507
RRMDD683	15.1	16.1	1.1	62.7	147.4	15.2	56.8	10.6	2.0	8.7	1.3	7.6	1.5	4.3	0.6	4.4	0.6	46.4	370.0	Saprock		
RRMDD683	16.1	16.9	0.8	52.8	123.5	13.0	50.2	9.0	1.7	7.8	1.1	6.6	1.4	4.2	0.6	4.0	0.6	44.2	320.6	Saprock		
RRMDD684	0.0	2.0	2.0	68.7	402.9	13.3	43.6	8.6	1.3	6.8	1.0	7.0	1.4	4.0	0.6	4.5	0.6	34.4	599.0	Hardcap		
RRMDD684	2.0	4.1	2.0	111.5	713.7	23.2	78.0	15.6	2.2	10.4	1.7	10.4	1.9	6.3	0.9	6.4	0.9	50.4	1033.6	Transition		
RRMDD684	4.1	5.1	1.1	105.3	224.2	29.7	125.4	24.7	4.6	24.6	3.6	20.8	3.9	10.3	1.4	9.1	1.3	107.8	696.8	Clay		
RRMDD684	5.1	6.0	0.8	86.8	193.5	23.4	98.0	16.5	3.1	18.3	2.6	16.9	3.8	12.1	1.6	10.8	1.6	139.1	627.9	Clay		
RRMDD684	6.0	6.8	0.8	84.4	194.1	22.5	94.9	17.0	3.0	17.9	2.5	17.1	4.0	12.1	1.7	11.2	1.7	160.0	644.1	Clay		
RRMDD684	6.8	7.3	0.6	84.8	200.2	22.5	92.5	15.5	2.8	15.6	2.3	15.1	3.7	12.4	1.7	11.0	1.7	180.3	662.2	Clay		
RRMDD684	7.3	7.9	0.6	105.1	243.8	25.6	98.4	16.5	2.9	15.4	2.1	12.9	3.0	9.2	1.2	8.4	1.3	138.4	684.3	Clay		
RRMDD684	7.9	8.9	0.9	74.9	173.2	18.8	70.8	11.8	2.3	10.0	1.4	8.2	1.7	5.1	0.7	4.7	0.8	67.1	451.6	Clay		
RRMDD684	8.9	9.6	0.7	125.5	277.6	29.5	108.2	17.7	3.1	14.5	2.0	11.1	2.1	5.7	0.7	4.9	0.7	62.9	666.2	Clay		
RRMDD684	9.6	10.3	0.7	115.6	254.3	27.9	102.6	16.6	2.7	12.7	1.8	9.6	1.9	5.4	0.8	5.5	0.8	58.8	617.0	Clay		
RRMDD684	10.3	11.1	0.8	90.0	200.8	21.6	78.7	12.5	2.2	10.4	1.4	8.0	1.5	4.2	0.5	4.0	0.6	44.2	481.0	Upper Saprolite		
RRMDD684	11.1	11.9	0.8	71.8	145.6	16.9	62.4	10.0	1.5	7.2	1.0	5.2	0.9	2.8	0.4	2.8	0.5	29.5	358.4	Upper Saprolite		
RRMDD684	11.9	12.7	0.8	94.8	216.2	22.7	85.4	14.4	2.7	11.8	1.6	9.5	1.8	5.0	0.7	4.7	0.7	53.7	525.5	Upper Saprolite		
RRMDD684	12.7	13.5	0.8	58.3	123.5	14.1	52.1	8.4	1.6	7.1	0.9	5.3	1.0	3.2	0.4	3.2	0.5	32.1	311.8	Upper Saprolite		
RRMDD684	13.5	14.5	1.0	98.2	230.3	22.8	81.5	14.3	2.9	11.2	1.6	8.6	1.7	4.6	0.7	4.1	0.6	50.9	534.0	Upper Saprolite		
RRMDD684	14.5	15.5	1.0	82.2	194.1	19.3	69.2	12.5	2.5	9.9	1.4	8.0	1.6	4.6	0.7	4.5	0.7	50.5	461.8	Upper Saprolite		
RRMDD684	15.5	16.5	1.0	66.0	139.4	15.3	55.1	9.8	2.0	7.5	1.1	5.8	1.2	3.2	0.5	3.2	0.5	34.4	344.9	Lower Saprolite		
RRMDD684	16.5	17.5	1.0	82.4	191.0	19.0	66.5	11.8	2.4	9.5	1.4	7.9	1.6	4.4	0.7	4.1	0.6	49.4	452.7	Lower Saprolite	13.4	525
RRMDD685	0.0	1.4	1.4	75.3	536.8	13.9	45.3	8.8	1.4	6.8	1.2	6.7	1.3	4.1	0.6	4.5	0.6	35.0	742.4	Hardcap		
RRMDD685	1.4	2.8	1.4	117.9	686.7	23.9	79.1	14.7	2.3	11.1	1.8	10.0	1.9	6.0	0.9	5.7	0.9	53.3	1016.1	Hardcap		
RRMDD685	2.8	3.6	0.8	179.4	250.6	36.1	116.2	19.0	3.1	12.9	2.0	10.7	1.9	6.0	0.8	5.6	0.8	58.2	703.2	Clay		
RRMDD685	3.6	4.5	0.8	141.3	169.5	32.0	108.6	19.5	3.6	14.9	2.2	12.7	2.2	6.5	0.8	6.1	0.9	65.9	587.0	Clay		
RRMDD685	4.5	5.3	0.8	144.8	191.0	34.0	115.1	20.7	3.8	15.8	2.4	13.0	2.3	6.8	0.9	6.2	0.8	69.2	626.9	Clay		
RRMDD685	5.3	6.0	0.7	116.6	197.8	31.9	118.4	23.1	4.5	19.2	2.8	16.6	3.0	9.0	1.2	7.8	1.1	94.5	647.4	Clay		
RRMDD685	6.0	6.7	0.7	116.8	202.1	36.0	143.5	27.3	5.2	24.4	3.7	23.1	4.5	13.9	1.8	12.0	1.7	156.8	772.7	Clay		
RRMDD685	6.7	7.4	0.7	120.8	209.4	34.7	135.9	25.0	4.8	22.9	3.5	20.9	4.1	12.4	1.6	10.3	1.5	141.6	749.5	Clay		
RRMDD685	7.4	7.8	0.4	86.9	153.6	27.7	111.4	19.0	3.7	18.3	2.8	17.3	3.8	12.2	1.6	10.1	1.6	137.8	607.7	Clay		
RRMDD685	7.8	8.6	0.8	100.4	195.9	25.7	96.9	16.3	3.0	14.3	2.0	12.8	2.7	8.9	1.2	7.5	1.1	126.9	615.7	Clay		
RRMDD685	8.6	9.5	0.9	88.2	195.9	22.1	80.2	14.8	2.7	11.9	1.7	9.6	1.8	5.1	0.7	4.8	0.7	58.3	498.6	Clay		
RRMDD685	9.5	10.4	0.9	72.2	161.5	18.1	64.9	12.1	2.5	9.7	1.5	8.4	1.5	4.7	0.6	4.3	0.6	50.4	413.1	Clay		
RRMDD685	10.4	11.2	0.9	74.4	171.4	18.8	68.8	12.2	2.5	9.6	1.4	8.1	1.4	4.4	0.6	4.3	0.6	46.7	425.2	Clay		
RRMDD685	11.2	12.1	0.9	69.2	154.2	17.1	64.6	12.0	2.2	8.9	1.3	7.4	1.4	4.1	0.6	3.9	0.6	42.4	389.8	Upper Saprolite		
RRMDD685	12.1	13.0	0.9	74.4	165.8	18.2	67.8	12.4	2.1	9.6	1.4	7.9	1.5	4.6	0.7	4.7	0.6	46.0	417.6	Upper Saprolite		
RRMDD685	13.0	13.9	0.9	78.6	172.0	19.2	71.3	12.6	2.3	10.3	1.4	8.1	1.5	4.2	0.6	4.1	0.6	44.6	431.2	Upper Saprolite		
RRMDD685	13.9	14.8	0.9	71.0	154.8	17.3	64.0	11.5	2.2	9.0	1.4	8.1	1.6	5.0	0.7	5.0	0.8	49.0	401.2	Lower Saprolite		
RRMDD685	14.8	15.8	0.9	72.6	164.0	17.8	65.3	11.5	2.1	9.1	1.4	7.9	1.5	4.4	0.6	4.2	0.6	46.1	409.1	Lower Saprolite	13.0	532

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD685	15.8	16.6	0.8	78.7	178.7	19.1	70.5	12.1	2.2	10.3	1.5	8.1	1.6	4.6	0.7	4.3	0.6	47.7	440.8	Saprock		
RRMDD685	16.6	17.4	0.8	76.9	176.3	18.4	68.5	11.9	2.2	10.2	1.5	7.9	1.4	4.0	0.6	3.7	0.6	42.9	426.9	Fresh Rock		
RRMDD685	17.4	18.1	0.7	72.7	165.8	17.6	63.7	10.9	2.1	9.2	1.3	7.5	1.4	4.2	0.6	4.1	0.6	42.4	404.3	Fresh Rock		
RRMDD685	18.1	18.8	0.7	42.2	93.8	10.4	39.4	7.6	1.4	6.0	0.9	5.7	1.1	3.3	0.5	3.4	0.5	35.7	251.9	Fresh Rock		
RRMDD685	18.8	20.0	1.2	70.7	160.3	17.3	63.0	11.5	2.0	8.9	1.2	7.1	1.3	3.9	0.5	3.4	0.5	38.7	390.5	Fresh Rock		
RRMDD685	20.0	21.2	1.2	67.3	156.0	16.4	60.9	10.8	1.9	8.4	1.2	6.6	1.2	3.4	0.5	3.1	0.5	35.9	374.2	Fresh Rock		
RRMDD686	0.0	1.8	1.8	79.2	347.6	14.1	44.7	8.7	1.3	6.8	1.1	7.1	1.4	4.5	0.7	4.7	0.7	39.0	561.4	Hardcap		
RRMDD686	1.8	3.6	1.8	106.3	689.1	21.4	70.1	13.1	1.9	9.0	1.4	8.9	1.7	5.4	0.8	5.4	0.7	43.0	978.4	Hardcap		
RRMDD686	3.6	5.4	1.8	98.9	513.5	21.0	69.2	12.8	1.9	9.2	1.4	8.8	1.6	4.8	0.8	5.2	0.7	45.6	795.4	Hardcap		
RRMDD686	5.4	6.3	0.9	102.6	253.1	21.5	72.7	12.1	2.1	9.3	1.4	8.1	1.6	4.6	0.7	4.7	0.7	45.2	540.5	Transition		
RRMDD686	6.3	7.2	0.9	90.8	184.3	23.9	93.1	18.8	3.8	17.9	2.7	14.8	3.0	8.1	1.1	7.3	1.0	87.9	558.3	Clay		
RRMDD686	7.2	8.1	1.0	102.2	228.5	28.9	119.0	22.7	4.5	23.2	3.6	21.6	4.9	14.4	2.1	12.9	1.9	168.9	759.1	Clay		
RRMDD686	8.1	9.1	0.9	73.7	160.9	20.8	84.6	15.4	3.1	15.6	2.4	15.3	3.8	11.9	1.8	11.0	1.7	151.8	573.7	Clay		
RRMDD686	9.1	10.0	0.9	87.7	201.5	23.4	90.5	14.8	2.8	14.4	2.2	13.7	3.7	11.5	1.7	10.6	1.7	189.9	670.2	Clay		
RRMDD686	10.0	11.0	0.9	79.4	177.5	18.5	66.7	12.1	2.5	10.0	1.5	8.5	1.6	4.6	0.7	4.4	0.6	56.9	445.7	Clay		
RRMDD686	11.0	11.9	0.9	73.1	156.6	17.0	59.8	11.2	2.2	9.3	1.4	7.7	1.6	4.3	0.7	4.4	0.6	48.3	398.3	Lower Saprolite		
RRMDD686	11.9	12.8	0.9	67.6	150.5	15.9	57.3	10.8	2.1	8.3	1.3	7.2	1.4	3.9	0.6	3.8	0.5	44.2	375.4	Lower Saprolite	6.5	541
RRMDD686	12.8	13.7	0.9	74.5	170.7	17.8	63.1	11.3	2.4	9.4	1.4	7.9	1.6	4.5	0.7	4.4	0.7	49.4	419.9	Saprock		
RRMDD686	13.7	14.5	0.9	78.8	184.3	18.5	66.3	12.2	2.4	9.4	1.4	7.4	1.4	3.7	0.5	3.6	0.5	40.5	430.8	Saprock		
RRMDD686	14.5	15.5	1.0	64.0	144.3	15.0	53.9	10.0	2.0	7.9	1.2	7.2	1.5	4.3	0.6	4.2	0.6	45.7	362.5	Saprock		
RRMDD686	15.5	16.4	1.0	67.7	154.2	16.3	58.4	10.9	2.2	9.1	1.3	7.1	1.4	3.7	0.6	3.6	0.5	39.5	376.4	Saprock		
RRMDD686	16.4	17.4	1.0	72.0	165.8	17.1	62.2	11.6	2.2	9.3	1.4	7.2	1.3	3.7	0.5	3.5	0.5	40.6	398.8	Saprock		
RRMDD687	0.0	1.8	1.8	106.8	197.8	19.5	62.4	11.5	1.7	9.4	1.6	9.2	1.8	5.8	0.9	5.9	0.9	55.4	490.7	Hardcap		
RRMDD687	1.8	3.6	1.8	94.8	347.6	17.1	53.9	10.0	1.6	8.2	1.3	7.8	1.6	5.0	0.8	5.5	0.8	43.2	599.1	Hardcap		
RRMDD687	3.6	5.4	1.8	118.5	406.6	20.0	59.8	10.9	1.8	8.8	1.5	9.2	1.8	5.6	0.9	6.3	0.9	47.1	699.6	Hardcap		
RRMDD687	5.4	7.2	1.8	102.4	373.4	19.4	58.8	10.9	1.6	7.9	1.2	7.9	1.6	4.9	0.7	5.3	0.8	38.7	635.5	Hardcap		
RRMDD687	7.2	8.0	0.8	95.1	208.2	24.9	89.0	16.4	2.9	13.4	2.0	12.0	2.2	7.0	1.0	7.3	1.1	57.9	540.4	Clay		
RRMDD687	8.0	8.7	0.7	143.1	185.5	40.6	151.0	26.4	4.7	22.4	3.2	19.1	3.8	10.9	1.6	9.5	1.5	123.2	746.7	Clay		
RRMDD687	8.7	9.5	0.8	89.7	181.2	30.2	134.7	29.8	5.5	26.7	4.0	24.2	4.4	12.7	1.7	11.6	1.6	126.2	684.2	Clay		
RRMDD687	9.5	10.3	0.9	89.5	183.0	35.0	170.3	35.8	6.6	35.7	5.3	33.6	6.6	19.8	2.6	17.0	2.4	214.6	858.1	Clay		
RRMDD687	10.3	11.2	0.9	81.7	174.4	23.8	101.0	17.5	3.2	17.4	2.4	15.6	3.4	10.3	1.4	8.8	1.3	144.1	606.2	Clay		
RRMDD687	11.2	12.0	0.8	75.6	164.6	19.0	72.6	12.6	2.4	11.0	1.5	8.9	1.8	5.1	0.7	4.8	0.7	77.7	458.9	Clay		
RRMDD687	12.0	12.8	0.8	86.8	188.6	21.0	77.8	13.5	2.4	10.6	1.5	8.6	1.6	4.4	0.6	4.1	0.6	50.7	472.8	Clay		
RRMDD687	12.8	13.5	0.7	89.0	194.7	21.3	79.3	13.9	2.5	10.7	1.5	8.9	1.6	4.5	0.6	3.8	0.6	48.9	481.7	Upper Saprolite		
RRMDD687	13.5	14.1	0.7	73.7	159.1	17.4	63.7	11.1	1.9	8.2	1.2	6.7	1.2	3.4	0.5	3.3	0.5	37.1	389.0	Upper Saprolite		
RRMDD687	14.1	14.6	0.4	100.0	221.7	23.7	87.1	15.0	2.4	10.9	1.5	8.1	1.4	4.0	0.6	3.7	0.5	43.9	524.6	Lower Saprolite	7.4	585
RRMDD687	14.6	15.5	0.9	71.4	160.3	17.4	58.8	10.4	1.9	8.0	1.2	7.0	1.6	4.7	0.7	4.2	0.6	49.8	398.0	Saprock		
RRMDD687	15.5	16.5	0.9	72.8	163.4	17.5	65.1	11.6	1.9	8.8	1.3	7.3	1.3	4.1	0.5	3.8	0.5	42.2	402.2	Saprock		
RRMDD687	16.5	17.4	0.9	71.8	162.1	17.3	64.7	11.7	2.2	9.5	1.3	7.9	1.4	4.2	0.6	4.0	0.6	44.2	403.6	Saprock		
RRMDD687	17.4	18.4	0.9	67.6	152.9	16.1	61.1	11.1	1.9	8.6	1.2	7.4	1.4	4.1	0.5	3.9	0.5	43.4	381.7	Saprock		
RRMDD687	18.4	19.3	0.9	73.3	164.0	17.4	63.9	10.8	2.1	8.9	1.3	7.7	1.5	4.5	0.6	4.1	0.6	47.5	408.3	Saprock		
RRMDD688	0.0	1.8	1.8	90.9	358.7	16.3	52.5	10.1	1.6	7.8	1.3	7.6	1.5	4.4	0.7	4.8	0.7	39.2	598.1	Hardcap		
RRMDD688	1.8	3.6	1.8	107.7	539.3	22.8	76.3	14.0	2.2	10.4	1.7	9.2	1.8	5.4	0.8	5.6	0.8	45.2	843.2	Hardcap		
RRMDD688	3.6	5.4	1.8	102.9	534.4	21.5	72.4	13.0	1.9	10.0	1.6	9.1	1.8	5.4	0.9	5.7	0.8	49.7	831.0	Transition		
RRMDD688	5.4	6.3	1.0	140.1	199.0	26.3	81.5	12.1	1.9	9.3	1.5	8.9	1.7	5.5	0.9	5.9	0.9	52.8	548.4	Mottled		
RRMDD688	6.3	7.3	1.0	120.8	169.5	23.5	74.4	11.5	1.8	7.9	1.3	8.3	1.6	5.3	0.8	5.7	0.9	48.9	482.3	Mottled		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD688	7.3	8.2	1.0	89.6	136.4	18.7	59.3	9.3	1.5	7.1	1.2	7.3	1.5	4.8	0.8	5.3	0.8	44.4	387.9	Mottled	11.1	536
RRMDD688	8.2	9.2	1.0	106.7	161.5	19.9	61.8	9.0	1.6	7.9	1.3	8.4	1.8	5.9	0.9	6.4	1.0	58.3	452.5	Mottled		
RRMDD688	9.2	9.8	0.6	61.0	156.0	17.6	67.8	13.0	2.3	11.2	1.7	10.5	2.0	6.0	1.0	6.1	1.0	63.5	420.5	Clay		
RRMDD688	9.8	10.5	0.6	82.9	195.9	34.7	149.9	30.1	5.1	20.8	2.9	15.0	2.5	7.5	1.1	6.7	1.0	78.0	634.1	Clay		
RRMDD688	10.5	11.3	0.8	101.9	271.5	30.0	120.1	22.8	3.9	17.0	2.6	12.7	2.3	6.7	0.9	6.3	1.0	70.2	669.9	Clay		
RRMDD688	11.3	12.1	0.8	77.9	218.0	26.0	111.6	21.8	3.9	18.3	2.6	14.2	2.6	7.3	1.0	6.8	1.0	77.1	590.1	Clay		
RRMDD688	12.1	13.0	0.8	89.8	211.9	32.0	143.5	30.7	5.9	30.9	4.8	25.5	4.7	13.7	1.9	12.6	1.8	147.3	757.0	Upper Sapolite		
RRMDD688	13.0	13.8	0.8	123.1	273.9	40.5	177.9	36.4	6.4	29.3	4.2	20.8	3.6	9.8	1.4	8.5	1.2	103.9	841.0	Upper Sapolite		
RRMDD688	13.8	14.7	0.9	57.7	141.9	15.0	59.0	11.4	2.3	10.6	1.5	9.1	1.7	4.9	0.7	5.2	0.8	49.0	370.9	Lower Sapolite		
RRMDD688	14.7	15.6	0.9	80.0	194.7	21.1	79.4	12.8	2.1	9.1	1.3	6.7	1.3	3.4	0.5	3.2	0.5	36.8	453.0	Lower Sapolite		
RRMDD688	15.6	16.5	0.9	79.2	180.6	19.5	71.9	12.1	2.1	8.8	1.2	7.2	1.3	4.2	0.6	3.8	0.6	42.5	435.6	Lower Sapolite		
RRMDD688	16.5	17.4	0.9	87.3	205.8	22.5	84.8	14.8	2.5	11.1	1.5	7.7	1.4	4.3	0.6	3.9	0.6	44.8	493.5	Saprock		
RRMDD688	17.4	18.4	0.9	91.4	202.7	22.5	80.7	14.1	2.4	11.0	1.4	7.6	1.4	4.0	0.6	4.0	0.6	41.5	486.1	Saprock		
RRMDD688	18.4	19.4	1.0	62.4	141.9	15.3	56.6	9.2	1.6	7.3	1.1	6.3	1.2	3.8	0.5	3.6	0.6	36.4	347.8	Saprock		
RRMDD689	0.0	1.8	1.8	83.0	815.7	15.8	53.2	10.0	1.6	7.5	1.3	8.0	1.6	5.0	0.7	5.0	0.7	40.3	1049.3	Hardcap		
RRMDD689	1.8	3.6	1.8	130.2	1277.5	25.3	79.5	14.7	2.2	10.3	1.7	10.2	2.0	6.0	0.9	6.0	0.8	48.4	1615.7	Hardcap		
RRMDD689	3.6	5.5	1.8	198.8	593.3	35.6	109.5	19.2	2.9	12.6	1.9	11.9	2.2	6.5	0.9	6.7	0.9	57.8	1060.7	Transition		
RRMDD689	5.5	6.5	1.0	117.3	259.2	31.4	110.9	18.9	3.5	15.0	2.3	12.3	2.4	6.4	1.0	6.7	0.9	59.3	647.5	Clay		
RRMDD689	6.5	7.5	1.0	105.2	191.6	29.4	116.3	24.6	5.0	22.8	3.6	19.6	3.8	10.4	1.5	9.4	1.3	107.7	652.1	Clay		
RRMDD689	7.5	8.4	0.9	100.2	227.9	27.5	112.4	23.4	4.7	23.1	3.6	21.3	4.4	12.1	1.8	10.9	1.6	125.0	699.7	Clay		
RRMDD689	8.4	9.2	0.9	83.9	181.8	25.5	109.9	21.8	4.4	23.9	3.8	23.5	5.3	15.6	2.2	13.4	2.0	178.4	695.4	Clay		
RRMDD689	9.2	10.1	0.9	94.8	204.5	26.2	106.6	18.1	3.5	18.7	2.9	17.9	4.5	13.8	1.9	11.4	1.8	189.9	716.5	Clay		
RRMDD689	10.1	10.8	0.7	104.7	232.2	25.5	93.3	15.2	2.9	13.4	2.0	11.3	2.7	8.1	1.1	6.4	1.1	150.5	670.3	Clay		
RRMDD689	10.8	11.5	0.7	81.4	176.3	19.5	69.9	11.8	2.3	9.8	1.5	7.7	1.6	4.4	0.6	3.9	0.6	64.8	456.1	Clay		
RRMDD689	11.5	12.4	0.9	89.3	197.8	21.1	72.9	12.5	2.2	9.4	1.4	7.7	1.7	5.0	0.7	4.6	0.7	54.1	481.0	Upper Sapolite		
RRMDD689	12.4	13.3	0.9	97.8	226.0	23.2	81.9	13.9	2.6	10.7	1.6	8.2	1.5	4.2	0.5	3.5	0.5	45.6	521.7	Upper Sapolite		
RRMDD689	13.3	14.3	1.1	72.1	161.5	17.3	60.7	10.3	2.0	8.4	1.2	6.9	1.5	4.3	0.6	3.9	0.6	45.8	397.0	Lower Sapolite		
RRMDD689	14.3	15.4	1.1	70.4	158.5	17.2	59.7	11.0	2.1	8.6	1.3	7.3	1.5	4.2	0.6	3.7	0.6	44.7	391.2	Lower Sapolite		
RRMDD689	15.4	16.5	1.1	74.0	165.8	17.7	62.8	10.8	2.1	8.6	1.3	7.4	1.5	4.1	0.6	3.7	0.6	45.6	406.5	Saprock		
RRMDD689	16.5	17.5	1.1	67.4	149.3	16.2	57.6	10.6	2.0	8.6	1.3	7.1	1.4	4.1	0.6	3.7	0.6	44.1	374.5	Saprock		
RRMDD689	17.5	18.6	1.1	70.6	155.4	16.8	58.4	10.4	1.9	8.4	1.3	7.3	1.5	4.5	0.7	3.9	0.6	45.2	386.8	Saprock		
RRMDD690	0.0	1.4	1.4	110.5	309.6	18.5	56.1	10.0	1.6	7.0	1.1	7.0	1.3	4.2	0.6	4.5	0.6	36.3	568.7	Hardcap		
RRMDD690	1.4	2.9	1.4	87.8	385.7	16.6	53.9	9.6	1.5	6.2	1.0	6.4	1.2	3.7	0.5	4.1	0.6	32.5	611.4	Hardcap		
RRMDD690	2.9	4.3	1.4	98.3	531.9	20.8	69.5	13.3	1.9	9.5	1.5	9.1	1.7	5.5	0.8	5.6	0.8	47.6	817.9	Transition		
RRMDD690	4.3	5.1	0.9	102.9	166.4	21.6	71.0	12.1	2.1	9.3	1.4	8.0	1.7	4.7	0.8	4.8	0.8	49.8	457.4	Clay		
RRMDD690	5.1	6.0	0.9	120.2	184.3	28.3	97.7	17.0	3.1	14.2	2.2	11.7	2.3	6.5	0.9	5.8	0.9	65.9	561.0	Clay		
RRMDD690	6.0	7.0	1.0	93.5	176.3	25.4	97.7	18.8	3.6	16.9	2.6	14.7	3.0	8.3	1.2	7.3	1.1	88.4	558.9	Clay		
RRMDD690	7.0	8.0	1.0	108.0	230.3	27.8	102.9	17.7	3.3	16.2	2.5	14.2	3.1	8.7	1.2	7.4	1.1	102.0	646.5	Clay		
RRMDD690	8.0	8.9	0.9	107.2	251.8	27.5	101.1	15.2	2.7	12.9	2.0	11.8	2.7	8.0	1.2	7.4	1.1	103.1	655.8	Clay		
RRMDD690	8.9	10.0	1.1	109.5	235.2	28.8	102.6	15.6	3.0	13.5	1.9	10.5	2.4	7.3	1.1	6.3	1.0	114.8	653.6	Clay		
RRMDD690	10.0	10.6	0.6	68.3	152.9	17.2	60.5	10.6	2.1	8.5	1.3	7.6	1.8	5.4	0.8	4.8	0.8	79.1	421.6	Clay		
RRMDD690	10.6	11.3	0.6	81.0	183.0	19.8	71.0	12.7	2.6	10.5	1.6	9.0	1.8	5.2	0.7	4.4	0.7	63.2	467.3	Upper Sapolite		
RRMDD690	11.3	12.1	0.9	71.3	160.9	17.7	63.6	11.4	2.4	9.4	1.4	8.1	1.6	4.8	0.7	4.4	0.6	52.2	410.5	Upper Sapolite		
RRMDD690	12.1	13.0	0.9	74.1	157.8	18.4	66.6	11.7	2.4	9.7	1.4	7.5	1.5	4.1	0.6	3.8	0.5	45.7	405.8	Upper Sapolite		
RRMDD690	13.0	13.8	0.9	78.3	176.3	19.8	70.7	12.6	2.7	10.1	1.5	8.1	1.6	4.4	0.6	3.9	0.6	46.0	437.2	Lower Sapolite		
RRMDD690	13.8	14.7	0.9	68.0	152.3	16.5	58.9	10.7	2.2	8.6	1.4	7.3	1.5	4.3	0.6	3.8	0.6	48.1	385.0	Saprock		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD690	14.7	15.9	1.1	69.9	152.3	16.9	58.9	10.4	2.0	8.5	1.3	6.9	1.4	4.0	0.6	3.5	0.6	42.9	380.1	Saprock		
RRMDD690	15.9	17.0	1.1	64.4	141.9	15.4	55.3	9.7	2.0	7.9	1.2	6.6	1.3	3.5	0.5	3.3	0.5	40.5	354.0	Saprock		
RRMDD691	0.0	1.6	1.6	74.9	422.6	13.4	41.2	7.7	1.1	5.7	0.9	5.7	1.1	3.6	0.5	4.2	0.6	32.4	615.7	Hardcap		
RRMDD691	1.6	3.2	1.6	99.6	604.4	17.3	52.7	9.7	1.5	6.5	1.0	6.3	1.2	3.8	0.6	4.4	0.6	32.0	841.6	Hardcap		
RRMDD691	3.2	4.8	1.6	116.6	551.6	20.5	63.2	11.0	1.7	7.5	1.2	7.5	1.4	4.4	0.7	4.8	0.7	36.8	829.6	Hardcap		
RRMDD691	4.8	5.6	0.9	141.3	226.0	27.4	87.9	13.5	2.2	9.2	1.4	7.6	1.6	4.5	0.7	4.7	0.8	47.1	575.8	Transition		
RRMDD691	5.6	6.5	0.8	161.3	213.7	35.4	115.4	16.6	2.7	10.2	1.5	7.7	1.5	4.2	0.7	4.4	0.7	40.3	616.1	Clay		
RRMDD691	6.5	7.3	0.9	182.4	237.7	42.6	142.3	20.2	3.3	12.5	1.8	9.7	1.9	5.1	0.8	5.1	0.8	49.7	715.8	Clay		
RRMDD691	7.3	8.3	1.0	151.3	258.0	44.6	170.9	28.4	5.4	24.4	3.9	22.2	4.6	12.9	1.9	11.8	1.8	142.9	885.0	Clay		
RRMDD691	8.3	9.3	1.0	99.7	201.5	30.3	131.8	28.6	5.9	27.9	4.6	26.9	5.9	16.5	2.4	15.2	2.4	187.9	787.5	Clay		
RRMDD691	9.3	10.3	1.0	98.5	194.7	29.5	127.7	27.3	5.6	26.7	4.2	24.4	5.2	14.1	2.1	12.9	2.0	176.5	751.5	Clay		
RRMDD691	10.3	11.3	1.0	92.3	187.9	30.9	151.6	37.2	8.0	42.6	6.8	39.7	8.5	23.1	3.4	20.0	3.1	295.9	951.2	Upper Saprolite		
RRMDD691	11.3	12.3	1.0	87.4	191.0	23.8	95.2	19.0	3.9	19.8	3.0	17.8	4.0	11.1	1.6	9.6	1.6	142.2	631.0	Lower Saprolite	6.7	767
RRMDD691	12.3	13.3	1.0	79.6	173.2	21.0	87.4	17.7	3.7	18.9	2.9	16.3	3.6	10.0	1.5	9.0	1.5	128.3	574.5	Saprock		
RRMDD691	13.3	14.0	0.7	51.1	109.7	11.6	41.9	7.4	1.5	6.0	1.0	5.3	1.2	3.5	0.6	3.7	0.6	38.1	283.1	Saprock		
RRMDD691	14.0	14.9	0.9	70.6	162.8	17.2	61.9	11.0	2.2	9.1	1.4	8.4	1.8	5.4	0.8	5.2	0.8	58.8	417.5	Saprock		
RRMDD691	14.9	15.9	0.9	61.8	138.8	14.9	54.8	11.2	2.4	11.0	2.0	12.9	2.9	8.8	1.4	8.9	1.3	92.3	425.5	Saprock		
RRMDD691	15.9	16.8	0.9	59.0	139.4	14.7	53.2	9.4	1.9	8.0	1.3	7.9	1.8	5.3	0.8	5.1	0.8	58.2	366.6	Saprock		
RRMDD692	0.0	1.5	1.5	87.3	506.1	15.5	48.3	9.0	1.4	6.4	1.0	6.1	1.2	3.8	0.6	4.0	0.6	33.3	724.6	Hardcap		
RRMDD692	1.5	3.0	1.5	102.7	485.2	18.6	58.4	10.7	1.6	7.8	1.2	7.3	1.4	4.4	0.7	4.7	0.7	37.1	742.7	Hardcap		
RRMDD692	3.0	4.5	1.5	144.8	487.7	26.0	80.2	13.5	2.1	9.3	1.4	8.2	1.6	4.9	0.7	5.2	0.6	42.3	828.4	Transition		
RRMDD692	4.5	5.2	0.7	201.7	215.6	40.7	132.4	19.4	3.2	13.3	2.0	10.3	2.0	5.5	0.8	5.5	0.8	57.3	710.3	Clay		
RRMDD692	5.2	5.8	0.6	158.3	174.4	35.5	119.6	18.7	3.2	13.0	1.9	10.0	1.9	5.1	0.8	5.0	0.7	52.3	600.5	Clay		
RRMDD692	5.8	6.5	0.7	162.4	286.2	51.2	215.8	36.6	6.5	28.2	4.2	22.6	4.4	11.5	1.6	9.3	1.4	154.3	996.3	Clay		
RRMDD692	6.5	7.1	0.6	115.2	220.5	33.3	133.6	27.5	5.2	28.4	4.5	27.9	6.2	18.3	2.5	15.8	2.2	224.8	865.7	Clay		
RRMDD692	7.1	7.7	0.6	91.9	186.1	29.1	121.9	22.5	4.1	19.3	2.8	16.9	3.4	9.2	1.2	8.1	1.1	97.5	615.3	Clay		
RRMDD692	7.7	8.3	0.6	87.7	184.9	28.5	122.5	22.9	4.3	21.2	3.0	17.8	3.7	10.7	1.4	9.4	1.3	116.8	636.2	Upper Saprolite		
RRMDD692	8.3	9.1	0.7	91.2	196.5	23.2	87.1	16.9	3.4	19.1	2.9	18.8	4.3	13.3	1.8	10.9	1.6	179.7	670.8	Lower Saprolite		
RRMDD692	9.1	9.8	0.7	90.1	204.5	22.2	77.3	13.6	2.6	10.6	1.6	9.0	1.9	5.2	0.7	4.5	0.7	71.0	515.5	Lower Saprolite	5.3	699
RRMDD692	9.8	10.5	0.7	74.7	173.2	18.8	64.3	11.2	2.2	8.8	1.3	7.4	1.5	4.3	0.6	3.8	0.6	48.9	421.4	Saprock		
RRMDD692	10.5	11.3	0.8	84.2	191.6	20.5	71.9	12.8	2.4	9.6	1.4	7.9	1.5	4.2	0.6	3.8	0.5	45.0	457.8	Saprock		
RRMDD692	11.3	12.1	0.8	79.8	180.6	19.1	67.3	12.2	2.3	9.6	1.4	8.3	1.7	4.8	0.6	4.4	0.6	51.6	444.2	Saprock		
RRMDD692	12.1	12.9	0.8	71.2	160.9	17.4	60.7	10.8	2.1	8.8	1.3	6.8	1.4	4.0	0.5	3.6	0.5	42.7	392.5	Saprock		
RRMDD692	12.9	13.8	0.8	81.0	187.3	20.0	68.1	11.7	2.2	8.9	1.3	7.4	1.4	4.0	0.6	3.5	0.5	44.1	442.0	Saprock		
RRMDD692	13.8	15.0	1.3	66.8	152.3	16.6	56.7	10.4	2.0	8.1	1.1	6.4	1.3	3.4	0.5	3.2	0.5	36.8	366.2	Saprock		
RRMDD693	0.0	1.6	1.6	109.7	530.7	19.1	61.4	11.8	1.9	9.1	1.5	9.1	1.7	5.5	0.8	6.0	0.8	42.7	811.7	Hardcap		
RRMDD693	1.6	3.3	1.6	195.9	527.0	37.1	110.5	18.2	2.7	11.6	1.7	10.3	1.9	5.7	0.9	5.8	0.8	45.5	975.5	Hardcap		
RRMDD693	3.3	4.9	1.6	137.2	399.2	29.1	98.6	16.6	2.7	12.2	1.9	10.7	2.2	6.3	0.9	6.1	0.9	56.6	781.1	Transition		
RRMDD693	4.9	5.9	1.0	123.1	192.2	30.1	101.0	18.1	3.4	14.6	2.2	12.4	2.2	6.4	0.9	5.9	0.8	64.4	577.8	Clay		
RRMDD693	5.9	6.8	1.0	120.8	228.5	32.4	114.5	21.6	4.1	17.9	2.7	15.3	2.8	7.7	1.0	6.5	0.9	79.5	656.4	Clay		
RRMDD693	6.8	7.8	1.0	75.4	161.5	20.1	77.9	15.3	3.1	14.6	2.2	13.1	2.7	8.1	1.1	7.2	1.0	85.5	488.7	Clay		
RRMDD693	7.8	8.7	0.9	99.0	216.8	26.1	98.8	17.7	3.7	17.4	2.7	17.0	4.0	12.0	1.7	11.1	1.6	142.2	671.8	Clay		
RRMDD693	8.7	9.3	0.6	85.4	199.6	24.4	92.5	16.4	3.3	16.2	2.5	17.5	4.5	15.1	2.2	14.8	2.2	196.2	692.8	Clay		
RRMDD693	9.3	9.9	0.6	73.3	164.0	20.0	75.2	12.9	2.7	11.4	1.8	11.3	3.0	10.3	1.5	9.5	1.5	189.9	588.2	Clay		
RRMDD693	9.9	11.0	1.1	65.0	148.0	17.0	57.7	10.4	2.2	8.4	1.3	7.2	1.5	4.2	0.6	4.1	0.5	46.7	374.7	Clay		
RRMDD693	11.0	11.8	0.8	73.3	164.6	18.4	65.2	12.1	2.5	9.8	1.5	8.3	1.5	4.7	0.6	4.1	0.6	46.5	413.6	Clay		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD693	11.8	12.7	0.9	78.6	173.2	19.3	66.7	11.9	2.5	9.5	1.3	7.4	1.5	4.2	0.6	4.1	0.6	43.8	425.2	Clay	12.6	514
RRMDD693	12.7	13.5	0.8	87.3	195.9	21.6	75.3	13.3	2.7	11.0	1.6	8.7	1.7	4.7	0.7	4.3	0.6	50.4	479.9	Upper Saprolite		
RRMDD693	13.5	14.5	1.0	90.2	207.0	22.7	78.5	13.9	2.8	11.3	1.6	9.1	1.8	5.2	0.7	4.7	0.6	53.1	503.1	Lower Saprolite		
RRMDD693	14.5	15.6	1.0	81.7	183.0	20.4	70.5	12.8	2.5	10.1	1.5	8.0	1.5	4.3	0.6	4.1	0.5	44.2	445.7	Lower Saprolite		
RRMDD693	15.6	16.6	1.0	91.2	211.3	22.8	79.2	14.3	2.7	11.5	1.7	9.7	1.9	5.3	0.8	4.7	0.7	58.8	516.5	Lower Saprolite		
RRMDD693	16.6	17.5	0.9	78.6	187.9	20.1	69.9	12.3	2.4	9.6	1.4	7.7	1.5	4.5	0.6	4.0	0.6	44.4	445.5	Lower Saprolite		
RRMDD693	17.5	18.4	0.9	59.3	139.4	15.1	54.7	10.0	2.2	8.2	1.2	7.3	1.5	4.2	0.6	4.3	0.6	43.2	351.9	Saprock		
RRMDD693	18.4	19.3	0.9	63.9	148.0	16.4	56.8	10.7	2.2	8.8	1.3	8.0	1.6	4.5	0.6	4.4	0.6	46.5	374.4	Saprock		
RRMDD693	19.3	20.2	0.9	64.4	137.0	15.8	56.8	10.2	2.1	8.6	1.2	6.7	1.4	3.9	0.5	3.6	0.5	40.1	352.8	Saprock		
RRMDD693	20.2	21.1	0.9	62.3	137.6	15.6	54.2	9.9	2.1	8.6	1.3	7.7	1.5	4.6	0.6	4.2	0.6	46.2	357.0	Saprock		
RRMDD693	21.1	22.0	0.9	76.1	163.4	18.4	64.3	11.2	2.1	9.0	1.4	7.6	1.6	4.3	0.6	4.4	0.6	47.9	412.9	Saprock		
RRMDD694	0.0	1.5	1.5	57.8	105.6	11.2	36.6	6.7	1.1	5.8	1.0	6.3	1.3	4.3	0.7	4.6	0.7	39.5	283.1	Hardcap		
RRMDD694	1.5	3.0	1.5	48.2	93.4	9.4	31.4	5.8	1.0	4.8	0.9	5.6	1.2	3.8	0.6	4.1	0.6	30.7	241.4	Hardcap		
RRMDD694	3.0	4.1	1.1	233.4	361.1	62.7	236.8	42.2	6.8	35.5	5.0	28.5	5.4	15.7	2.0	12.6	1.8	172.7	1222.3	Clay		
RRMDD694	4.1	5.2	1.1	110.8	216.2	26.7	102.2	19.5	4.0	18.2	2.7	14.6	2.9	8.1	1.1	7.5	1.1	106.4	642.0	Upper Saprolite		
RRMDD694	5.2	6.3	1.1	86.6	192.2	20.4	73.6	12.9	2.3	10.0	1.4	7.7	1.5	4.5	0.6	4.1	0.6	48.1	466.4	Upper Saprolite		
RRMDD694	6.3	7.2	0.9	65.9	143.7	15.2	55.5	10.1	2.0	8.2	1.2	6.5	1.2	3.5	0.5	3.4	0.5	40.1	357.6	Saprock		
RRMDD694	7.2	8.1	0.9	88.2	195.3	20.1	72.3	12.0	2.4	9.0	1.2	6.4	1.2	3.3	0.5	3.4	0.5	37.3	453.3	Saprock		
RRMDD694	8.1	9.0	0.9	72.9	143.7	16.2	59.4	10.7	2.2	9.2	1.4	7.6	1.4	4.1	0.6	4.3	0.6	43.7	378.1	Saprock		
RRMDD695	0.0	1.7	1.7	100.9	547.9	19.8	62.3	10.1	1.6	7.5	1.2	7.2	1.4	4.3	0.6	4.3	0.6	39.4	809.1	Hardcap		
RRMDD695	1.7	3.3	1.7	96.8	447.1	17.7	55.6	9.2	1.4	6.3	1.1	5.9	1.2	3.7	0.6	3.9	0.6	32.4	683.6	Hardcap		
RRMDD695	3.3	5.0	1.7	102.5	474.2	22.1	72.8	12.6	2.0	9.2	1.5	8.6	1.7	5.4	0.8	5.4	0.8	45.5	764.9	Transition		
RRMDD695	5.0	6.7	1.7	101.1	367.3	20.6	67.8	11.5	1.8	8.2	1.3	7.4	1.5	4.8	0.7	4.8	0.7	42.2	641.5	Transition		
RRMDD695	6.7	7.2	0.5	134.9	225.4	30.2	104.3	16.5	2.8	11.2	1.6	8.9	1.7	5.1	0.7	5.0	0.7	45.7	594.8	Clay		
RRMDD695	7.2	8.0	0.8	129.0	187.3	30.4	103.9	16.6	2.8	11.2	1.5	8.2	1.5	4.2	0.6	4.2	0.6	42.3	544.6	Clay		
RRMDD695	8.0	8.8	0.8	127.2	206.4	31.8	111.4	18.6	3.3	11.9	1.6	7.9	1.3	3.6	0.5	3.5	0.5	36.3	565.9	Clay		
RRMDD695	8.8	9.5	0.8	113.3	195.3	28.4	97.3	15.8	2.9	10.8	1.4	8.1	1.4	3.6	0.6	3.8	0.6	37.1	520.3	Clay		
RRMDD695	9.5	10.4	0.9	133.1	275.2	33.5	123.1	21.4	4.1	17.1	2.3	12.2	2.2	5.5	0.7	4.8	0.7	58.4	694.2	Clay		
RRMDD695	10.4	11.3	0.9	100.4	208.2	27.2	100.2	18.0	3.5	14.9	2.2	12.9	2.5	6.9	1.0	6.6	0.9	75.6	581.0	Clay		
RRMDD695	11.3	12.1	0.9	107.2	227.3	26.7	102.6	19.1	3.7	17.1	2.6	15.3	3.2	8.7	1.2	8.2	1.2	99.7	643.7	Clay		
RRMDD695	12.1	13.0	0.9	89.3	200.8	21.7	79.4	15.1	3.0	14.5	2.2	13.1	2.8	8.3	1.2	7.9	1.2	101.2	561.7	Clay		
RRMDD695	13.0	13.6	0.6	83.3	186.7	20.5	73.5	13.0	2.4	11.5	1.8	10.5	2.4	7.1	1.0	6.8	1.0	91.8	513.4	Upper Saprolite		
RRMDD695	13.6	14.2	0.6	84.6	192.2	20.9	76.6	13.7	2.5	11.5	1.6	9.1	2.0	5.7	0.8	5.3	0.8	75.9	503.4	Upper Saprolite		
RRMDD695	14.2	15.1	0.8	77.3	174.4	18.8	67.3	11.9	2.4	10.2	1.5	8.4	1.7	4.6	0.7	4.6	0.7	58.7	443.1	Lower Saprolite		
RRMDD695	15.1	15.9	0.8	79.3	180.0	18.9	68.1	12.2	2.3	9.9	1.4	8.5	1.7	4.6	0.7	4.4	0.7	48.3	440.9	Lower Saprolite		
RRMDD695	15.9	17.0	1.1	62.6	138.8	14.7	52.7	9.7	2.0	8.2	1.2	7.3	1.5	4.2	0.6	4.2	0.6	42.7	351.1	Saprock		
RRMDD695	17.0	18.0	1.1	69.3	155.4	16.4	58.3	10.6	2.0	8.2	1.2	6.9	1.3	3.8	0.5	3.7	0.5	38.7	376.9	Saprock		
RRMDD696	0.0	1.1	1.1	39.4	72.2	8.0	27.2	4.9	0.8	4.6	0.8	5.4	1.2	3.8	0.6	4.4	0.6	36.2	210.0	Soil		
RRMDD696	1.1	2.0	0.8	122.0	218.0	25.0	85.5	14.4	2.3	12.3	1.9	11.6	2.4	7.0	1.0	6.6	0.9	77.0	587.9	Clay		
RRMDD696	2.0	3.0	1.0	196.4	411.5	42.0	156.9	26.3	4.6	24.7	3.5	19.3	3.9	11.2	1.6	10.0	1.4	142.9	1056.3	Lower Saprolite		
RRMDD696	3.0	4.0	1.0	131.4	231.6	26.6	98.4	16.8	3.1	15.4	2.0	10.6	2.2	6.2	0.8	5.5	0.8	95.6	646.9	Saprock		
RRMDD696	4.0	5.0	1.0	94.1	211.9	21.5	77.6	13.2	2.3	9.9	1.3	7.2	1.4	3.9	0.6	4.1	0.6	47.0	496.6	Saprock		
RRMDD696	5.0	6.0	1.0	107.1	253.1	24.3	86.8	14.7	2.6	11.5	1.6	8.5	1.6	4.5	0.6	4.5	0.6	51.3	573.3	Saprock		
RRMDD697	0.0	1.9	1.9	99.0	366.1	17.2	53.3	9.4	1.5	7.4	1.3	7.6	1.5	4.7	0.7	4.9	0.7	41.8	617.0	Hardcap		
RRMDD697	1.9	3.8	1.9	99.3	657.2	18.3	58.0	9.9	1.5	6.8	1.1	6.7	1.3	4.2	0.6	4.2	0.6	33.8	903.5	Hardcap		
RRMDD697	3.8	5.6	1.9	104.3	621.6	22.4	74.9	12.7	2.1	9.4	1.5	8.8	1.7	5.3	0.8	5.3	0.8	44.6	916.1	Hardcap		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD697	5.6	6.4	0.8	119.0	282.5	30.2	107.1	19.4	3.8	16.0	2.4	14.2	2.8	7.5	1.1	7.4	1.0	75.8	690.4	Clay		
RRMDD697	6.4	7.2	0.8	134.3	255.5	34.7	126.6	24.6	4.7	22.1	3.2	19.7	4.0	10.7	1.5	9.6	1.4	126.0	778.5	Clay		
RRMDD697	7.2	8.1	0.9	123.1	254.3	32.9	117.8	19.0	3.4	15.7	2.2	13.5	2.9	7.9	1.1	7.2	1.0	94.7	696.8	Clay		
RRMDD697	8.1	9.0	0.9	97.1	211.3	26.0	95.9	16.2	3.2	14.8	2.1	13.1	2.9	8.6	1.2	7.5	1.1	107.1	608.0	Clay		
RRMDD697	9.0	9.9	0.9	68.5	157.2	18.8	74.4	13.9	3.0	13.1	1.9	12.0	3.0	9.0	1.3	8.5	1.3	133.3	519.4	Clay		
RRMDD697	9.9	10.5	0.6	76.8	174.4	19.8	73.1	13.3	2.8	11.4	1.7	10.2	2.3	6.8	0.9	6.1	1.0	104.0	504.7	Clay		
RRMDD697	10.5	11.1	0.6	67.8	160.3	16.9	61.5	10.9	2.1	8.2	1.2	7.3	1.5	4.4	0.6	4.3	0.6	48.9	396.6	Upper Saprolite		
RRMDD697	11.1	12.0	0.9	75.1	167.1	18.7	68.0	12.3	2.5	10.2	1.5	8.4	1.7	4.5	0.7	4.4	0.7	49.5	425.2	Upper Saprolite		
RRMDD697	12.0	13.0	0.9	69.1	157.8	17.6	63.9	11.3	2.4	8.9	1.3	7.4	1.4	4.1	0.6	3.9	0.6	42.5	392.9	Upper Saprolite		
RRMDD697	13.0	13.9	1.0	73.9	165.2	18.1	63.8	11.8	2.3	9.6	1.4	8.3	1.8	5.0	0.7	4.8	0.7	53.6	421.1	Upper Saprolite		
RRMDD697	13.9	14.9	1.0	72.2	152.3	17.6	63.9	11.9	2.1	9.2	1.3	7.4	1.4	4.1	0.5	3.6	0.5	39.1	387.2	Lower Saprolite		
RRMDD697	14.9	15.9	1.0	67.2	144.3	16.8	61.6	11.6	2.2	9.1	1.3	7.7	1.5	4.4	0.6	4.0	0.6	44.6	377.5	Lower Saprolite	10.3	512
RRMDD697	15.9	16.6	0.7	86.6	181.8	20.7	73.8	13.9	2.3	10.2	1.5	8.7	1.6	4.8	0.6	4.2	0.6	46.9	458.1	Saprock		
RRMDD697	16.6	17.3	0.7	66.5	140.7	16.0	58.0	10.6	1.9	8.3	1.1	6.4	1.2	3.2	0.5	2.9	0.4	32.6	350.3	Saprock		
RRMDD697	17.3	18.4	1.1	78.7	172.0	19.1	68.7	12.7	2.1	9.4	1.3	7.6	1.4	4.2	0.5	3.7	0.5	41.3	423.2	Saprock		
RRMDD698	0.0	1.5	1.5	42.8	89.6	9.1	30.8	6.2	1.0	5.6	1.0	6.8	1.4	4.8	0.7	5.2	0.8	43.0	248.8	Soil		
RRMDD698	1.5	2.5	1.0	49.6	119.8	12.6	45.3	8.7	1.5	7.0	1.1	6.7	1.4	4.4	0.6	4.2	0.6	39.9	303.2	Clay		
RRMDD698	2.5	3.4	1.0	88.3	207.6	23.3	85.4	15.8	2.7	11.5	1.7	9.9	2.0	5.7	0.8	5.6	0.8	57.9	518.8	Clay		
RRMDD698	3.4	4.4	1.0	87.6	189.8	21.1	77.1	13.5	2.6	11.5	1.8	9.8	2.0	5.9	0.8	5.7	0.8	59.8	489.8	Clay		
RRMDD698	4.4	5.3	1.0	123.1	269.0	31.4	114.7	20.6	3.7	15.9	2.4	12.8	2.5	6.7	1.0	6.0	0.8	72.4	683.0	Clay		
RRMDD698	5.3	6.3	0.9	141.3	315.7	35.4	134.1	26.1	4.8	22.6	3.5	20.4	4.1	11.3	1.5	10.1	1.4	120.6	853.1	Upper Saprolite		
RRMDD698	6.3	7.2	0.9	101.3	218.0	22.8	86.8	15.8	3.1	15.7	2.3	13.2	2.8	7.9	1.0	6.6	0.9	94.7	592.9	Upper Saprolite		
RRMDD698	7.2	8.1	0.9	73.3	154.8	15.8	57.6	9.8	1.9	9.0	1.2	7.0	1.5	4.2	0.6	3.7	0.5	57.5	398.5	Lower Saprolite		
RRMDD698	8.1	9.0	0.9	70.1	157.8	15.6	55.1	9.3	1.7	7.1	1.0	5.7	1.2	3.4	0.5	3.3	0.4	39.5	371.8	Lower Saprolite		
RRMDD698	9.0	9.9	0.9	67.1	157.8	16.0	57.2	9.8	1.9	7.9	1.2	6.7	1.3	3.7	0.5	3.6	0.5	41.9	377.1	Lower Saprolite		
RRMDD698	9.9	10.8	0.9	53.6	116.1	12.0	42.6	7.6	1.4	6.3	0.9	5.1	1.1	3.1	0.4	2.9	0.4	32.3	285.9	Lower Saprolite		
RRMDD698	10.8	11.7	0.9	69.8	168.9	16.1	60.2	11.2	2.2	9.8	1.4	7.7	1.5	4.1	0.5	3.3	0.5	48.0	405.2	Lower Saprolite	9.3	499
RRMDD698	11.7	12.7	0.9	54.7	122.6	13.0	45.8	7.8	1.4	5.7	0.8	4.6	0.9	2.5	0.4	2.4	0.4	26.4	289.4	Lower Saprolite		
RRMDD698	12.7	13.8	1.2	29.1	60.3	7.0	24.7	4.2	0.8	3.1	0.4	2.5	0.5	1.6	0.2	1.7	0.3	15.0	151.3	Lower Saprolite		
RRMDD698	13.8	15.0	1.2	7.6	12.9	1.7	5.9	1.1	0.2	0.9	0.1	0.8	0.2	0.6	0.1	0.7	0.1	5.8	38.8	Lower Saprolite		
RRMDD698	15.0	15.8	0.8	32.1	83.8	7.8	27.6	5.0	0.9	3.8	0.6	3.1	0.6	1.8	0.3	1.9	0.3	18.0	187.6	Lower Saprolite		
RRMDD698	15.8	16.6	0.8	65.6	186.7	16.1	59.4	10.7	2.0	8.6	1.3	7.0	1.3	3.6	0.5	3.5	0.5	37.3	404.2	Lower Saprolite		
RRMDD698	16.6	17.4	0.8	59.1	153.6	14.0	51.0	9.4	1.8	7.6	1.2	7.4	1.6	4.5	0.6	3.7	0.5	44.3	360.4	Lower Saprolite		
RRMDD698	17.4	18.3	0.8	58.6	154.8	14.7	54.0	10.3	2.1	9.4	1.5	8.9	1.9	5.1	0.7	4.6	0.6	53.5	380.7	Lower Saprolite	2.4	382
RRMDD698	18.3	18.9	0.7	62.0	197.8	16.1	60.5	11.9	2.4	10.6	1.8	10.4	2.1	5.8	0.7	4.5	0.6	59.4	446.6	Saprock		
RRMDD698	18.9	19.6	0.7	54.3	141.3	13.8	50.9	9.2	2.0	7.8	1.2	7.1	1.4	3.7	0.5	3.2	0.5	40.3	336.9	Saprock		
RRMDD698	19.6	20.3	0.7	51.4	122.0	12.6	45.1	8.5	1.8	7.1	1.1	6.2	1.3	3.6	0.5	3.4	0.5	38.0	303.0	Saprock		
RRMDD698	20.3	21.0	0.7	54.7	125.3	13.2	49.0	9.0	1.9	7.4	1.1	6.3	1.3	3.6	0.5	3.3	0.5	37.3	314.3	Saprock		
RRMDD699	0.0	1.6	1.6	105.2	616.7	18.0	55.6	9.8	1.6	7.1	1.2	7.2	1.4	4.6	0.7	4.7	0.6	37.7	872.2	Hardcap		
RRMDD699	1.6	3.2	1.6	120.8	705.1	22.2	69.3	11.8	1.9	9.1	1.4	8.3	1.7	5.2	0.8	5.7	0.8	45.6	1009.7	Hardcap		
RRMDD699	3.2	4.9	1.6	111.8	557.7	23.1	74.8	13.0	2.0	8.9	1.5	8.7	1.7	5.4	0.8	5.4	0.7	44.1	859.4	Hardcap		
RRMDD699	4.9	5.7	0.9	106.3	159.1	23.4	83.2	15.9	2.9	13.0	1.9	10.7	2.1	5.9	0.9	5.9	0.8	60.6	492.4	Clay		
RRMDD699	5.7	6.6	0.9	87.7	142.5	21.6	81.4	16.2	3.1	14.2	2.1	12.2	2.4	6.7	0.9	6.2	0.9	72.1	470.4	Clay		
RRMDD699	6.6	7.5	0.9	112.2	193.5	27.8	109.4	21.2	4.0	19.5	3.0	16.6	3.3	9.5	1.2	8.4	1.1	105.0	635.8	Clay		
RRMDD699	7.5	8.4	0.9	95.0	190.4	26.5	106.0	19.3	3.6	18.7	2.8	16.6	3.7	11.0	1.6	10.1	1.4	133.3	640.1	Clay		
RRMDD699	8.4	9.2	0.9	103.7	217.4	25.6	96.1	15.2	2.8	13.5	1.9	11.3	2.8	8.2	1.1	7.4	1.1	135.2	643.5	Clay		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD699	9.2	10.1	0.8	81.9	178.1	18.7	68.1	11.8	2.2	9.9	1.5	8.3	1.7	4.7	0.7	4.7	0.6	62.4	455.4	Clay		
RRMDD699	10.1	10.9	0.8	76.1	166.4	17.5	62.6	10.7	2.3	9.0	1.4	7.7	1.6	4.6	0.6	4.5	0.6	49.3	415.0	Clay		
RRMDD699	10.9	11.8	0.8	73.3	162.1	16.9	61.5	11.4	2.2	8.9	1.4	7.3	1.5	4.5	0.6	4.4	0.6	48.0	404.7	Clay		
RRMDD699	11.8	12.6	0.8	87.5	197.8	20.2	71.5	12.8	2.4	9.9	1.5	7.9	1.5	4.2	0.6	3.7	0.5	45.2	467.0	Upper Saprolite		
RRMDD699	12.6	13.5	0.9	77.8	175.0	17.9	65.2	11.5	2.3	9.1	1.3	7.5	1.5	4.2	0.6	4.1	0.6	47.6	426.4	Upper Saprolite		
RRMDD699	13.5	14.3	0.8	78.7	176.9	18.4	65.8	11.5	2.2	8.7	1.3	7.0	1.4	3.7	0.5	3.7	0.5	44.1	424.3	Upper Saprolite		
RRMDD699	14.3	15.1	0.9	80.3	181.8	18.6	67.4	12.0	2.3	9.5	1.4	7.5	1.4	4.2	0.6	4.0	0.5	44.6	436.2	Lower Saprolite		
RRMDD699	15.1	16.1	1.0	83.9	191.0	19.4	69.5	12.5	2.4	10.0	1.4	7.6	1.5	4.1	0.6	3.9	0.6	47.1	455.4	Lower Saprolite	11.3	491
RRMDD699	16.1	17.1	1.0	62.0	140.0	14.5	53.4	9.6	1.8	7.0	1.0	5.3	1.1	3.1	0.4	3.0	0.4	34.2	337.0	Saprock		
RRMDD700	0.0	1.3	1.3	52.4	95.9	10.3	34.4	6.3	0.9	5.5	1.0	6.3	1.3	4.4	0.7	4.5	0.6	40.8	265.3	Watercourse		
RRMDD700	1.3	2.6	1.3	119.0	243.2	29.0	102.5	18.0	2.9	14.8	2.2	13.0	2.6	7.8	1.1	6.8	1.0	77.5	641.3	Clay		
RRMDD700	2.6	3.4	0.8	120.8	277.6	29.1	112.6	20.2	3.6	18.6	2.7	16.9	3.3	9.4	1.2	8.0	1.1	112.0	737.1	Upper Saprolite		
RRMDD700	3.4	4.2	0.8	64.0	143.1	15.1	54.4	9.5	1.9	8.0	1.2	7.2	1.4	4.2	0.6	3.5	0.5	43.9	358.6	Lower Saprolite	2.9	589
RRMDD700	4.2	5.0	0.8	55.1	130.8	13.8	49.7	9.0	1.8	7.1	1.1	6.4	1.2	3.3	0.5	3.0	0.4	35.4	318.7	Lower Saprolite		
RRMDD700	5.0	5.9	0.9	62.3	141.3	15.0	56.2	10.2	2.1	8.8	1.3	7.5	1.5	4.2	0.6	3.9	0.6	45.6	361.0	Saprock		
RRMDD700	5.9	6.8	0.9	58.4	136.4	14.4	52.6	9.6	2.0	7.9	1.2	6.8	1.3	3.7	0.5	3.4	0.5	40.5	339.3	Saprock		
RRMDD701	0.0	2.1	2.1	96.1	210.1	16.7	51.9	9.1	1.4	7.0	1.1	6.7	1.4	4.3	0.7	4.4	0.6	38.9	450.1	Hardcap		
RRMDD701	2.1	4.1	2.1	142.5	458.2	29.4	96.0	15.1	2.4	10.1	1.5	8.3	1.6	4.6	0.6	4.4	0.6	40.6	815.9	Hardcap		
RRMDD701	4.1	4.7	0.6	120.2	334.1	25.7	92.3	14.3	2.3	9.5	1.4	8.0	1.6	4.7	0.8	5.1	0.8	45.0	665.6	Clay		
RRMDD701	4.7	5.3	0.6	132.5	372.2	27.9	96.8	15.1	2.4	9.7	1.5	8.0	1.6	4.8	0.7	4.8	0.8	46.1	724.8	Clay		
RRMDD701	5.3	6.2	0.9	140.7	243.8	30.2	106.3	17.3	2.7	11.1	1.5	8.1	1.6	4.7	0.7	4.9	0.8	45.3	619.8	Clay		
RRMDD701	6.2	7.0	0.9	150.1	265.3	35.3	126.0	21.7	3.5	13.3	1.7	8.6	1.6	4.6	0.7	4.8	0.7	45.3	683.2	Clay		
RRMDD701	7.0	7.9	0.9	140.1	245.7	34.0	121.3	21.5	3.7	14.6	1.9	10.1	1.8	5.0	0.8	5.1	0.8	48.0	654.4	Clay		
RRMDD701	7.9	8.8	0.9	131.9	267.8	34.7	128.3	23.2	4.2	17.2	2.2	11.3	2.0	5.2	0.8	5.2	0.8	49.3	684.1	Clay		
RRMDD701	8.8	9.8	0.9	106.4	248.1	29.8	117.8	25.0	5.1	22.7	3.0	14.6	2.5	6.4	1.0	6.0	0.9	60.2	649.6	Clay		
RRMDD701	9.8	10.5	0.7	94.9	213.7	25.5	99.6	19.2	3.9	18.2	2.6	13.8	2.6	6.7	1.0	6.4	0.9	69.3	578.3	Clay		
RRMDD701	10.5	11.2	0.7	64.0	137.6	15.0	56.5	11.2	2.4	11.9	2.0	12.7	2.7	7.8	1.2	7.5	1.1	83.3	416.8	Clay		
RRMDD701	11.2	12.1	1.0	62.4	140.7	15.0	56.0	11.7	2.5	14.8	2.6	16.4	3.6	10.2	1.5	9.7	1.4	112.1	460.4	Upper Saprolite		
RRMDD701	12.1	13.1	0.9	90.1	208.2	22.2	82.9	16.9	3.5	19.5	3.3	20.8	4.7	13.3	1.8	11.6	1.8	159.4	659.8	Upper Saprolite		
RRMDD701	13.1	14.1	1.0	64.4	149.9	15.7	57.4	11.1	2.3	10.9	1.8	10.7	2.4	7.1	1.0	6.3	0.9	78.1	420.0	Upper Saprolite		
RRMDD701	14.1	15.0	0.9	85.1	205.8	21.0	77.3	15.3	3.0	15.8	2.4	15.5	3.8	11.7	1.6	9.8	1.5	185.4	655.1	Upper Saprolite		
RRMDD701	15.0	16.1	1.1	86.8	192.2	20.5	73.4	13.1	2.4	10.1	1.4	7.9	1.6	4.3	0.6	4.2	0.6	54.6	473.8	Upper Saprolite	12.0	591
RRMDD701	16.1	17.0	0.9	82.3	188.6	19.5	69.6	12.3	2.2	9.6	1.4	7.6	1.5	4.3	0.6	4.0	0.6	45.1	449.2	Saprock		
RRMDD701	17.0	17.9	0.9	82.8	189.8	19.8	72.4	12.5	2.5	10.1	1.4	7.7	1.5	4.3	0.6	4.2	0.6	45.2	455.4	Saprock		
RRMDD702	0.0	1.4	1.4	74.1	394.3	13.8	45.7	8.0	1.4	6.4	1.1	6.5	1.4	4.3	0.6	4.3	0.6	37.5	600.0	Soil		
RRMDD702	1.4	2.3	0.9	76.9	641.2	16.6	57.6	10.7	1.8	8.5	1.4	8.4	1.7	5.2	0.8	5.5	0.7	43.0	880.3	Hardcap		
RRMDD702	2.3	3.3	1.0	161.8	146.8	22.7	70.0	10.1	1.7	7.8	1.2	7.8	1.5	4.8	0.7	5.0	0.8	44.2	486.8	Mottled		
RRMDD702	3.3	4.3	1.0	149.5	145.0	23.6	76.4	11.4	2.0	9.0	1.4	8.4	1.6	5.0	0.8	5.3	0.8	49.0	489.3	Mottled		
RRMDD702	4.3	5.3	1.0	153.1	277.6	60.4	244.9	44.9	7.6	37.0	5.4	32.3	6.3	18.6	2.5	15.3	2.1	212.7	1120.7	Pallid		
RRMDD702	5.3	6.2	1.0	236.9	447.1	94.0	375.6	67.3	11.6	49.3	7.1	38.3	6.7	18.3	2.4	15.0	2.0	189.2	1560.8	Pallid		
RRMDD702	6.2	7.0	0.8	306.1	479.1	102.6	443.2	87.1	16.8	88.4	13.3	79.5	14.7	39.7	5.3	34.5	4.6	368.3	2083.2	Upper Saprolite		
RRMDD702	7.0	8.0	1.0	145.4	195.9	32.1	137.6	26.0	5.9	41.3	6.1	40.7	9.2	27.8	3.7	21.7	3.3	378.4	1075.2	Lower Saprolite	5.7	1102
RRMDD703	0.0	2.0	2.0	164.8	606.8	26.8	75.6	11.2	1.7	7.7	1.3	7.4	1.4	4.4	0.7	4.6	0.6	36.7	951.8	Hardcap		
RRMDD703	2.0	4.0	2.0	119.0	987.6	24.1	79.0	13.6	2.2	9.8	1.6	9.3	1.9	5.8	0.9	5.9	0.8	47.0	1308.5	Hardcap		
RRMDD703	4.0	6.0	2.0	104.1	608.1	22.0	73.2	12.4	2.0	9.2	1.5	8.4	1.7	5.1	0.8	5.2	0.7	42.0	896.6	Transition		
RRMDD703	6.0	6.9	0.9	103.8	157.8	26.3	97.2	19.9	3.7	16.3	2.4	13.0	2.5	7.0	0.9	6.0	0.9	70.5	528.1	Clay		



Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD703	6.9	7.8	0.9	110.6	210.1	29.0	113.6	22.9	4.4	19.2	2.7	15.4	2.8	7.8	1.0	6.8	1.0	76.1	623.2	Clay	7.0	576
RRMDD703	7.8	8.6	0.9	83.6	194.7	23.9	92.1	18.3	3.5	15.2	2.3	13.7	2.6	7.4	1.0	7.0	1.0	74.4	540.8	Clay		
RRMDD703	8.6	9.6	1.0	89.1	189.8	29.7	135.9	25.5	4.9	26.7	3.9	25.9	5.8	18.0	2.5	15.8	2.3	227.3	803.3	Clay		
RRMDD703	9.6	10.6	1.0	98.0	199.6	26.6	104.9	17.0	3.2	16.7	2.4	15.4	3.6	11.1	1.5	9.1	1.4	168.3	678.5	Clay		
RRMDD703	10.6	11.4	0.8	69.8	157.2	17.5	64.3	11.8	2.3	9.5	1.4	8.2	1.7	5.2	0.7	4.7	0.7	71.0	426.0	Upper Saprolite		
RRMDD703	11.4	12.2	0.8	70.8	162.1	17.6	61.9	11.8	2.1	8.7	1.3	7.4	1.4	4.3	0.6	3.8	0.5	44.8	399.3	Upper Saprolite		
RRMDD703	12.2	13.0	0.8	96.2	221.1	23.3	83.4	15.0	2.6	11.2	1.6	8.9	1.7	5.0	0.7	4.6	0.6	53.5	529.4	Upper Saprolite		
RRMDD703	13.0	14.1	1.1	80.2	186.1	19.8	71.7	13.0	2.3	9.9	1.4	8.1	1.5	4.4	0.6	4.1	0.6	48.3	452.2	Saprock		
RRMDD703	14.1	15.2	1.1	68.8	160.3	17.4	62.8	11.5	2.3	8.9	1.3	7.4	1.4	4.1	0.6	4.0	0.6	44.8	396.2	Saprock		
RRMDD704	0.0	1.4	1.4	63.2	120.3	11.9	39.3	7.3	1.2	6.1	1.0	6.1	1.3	4.2	0.6	4.3	0.6	35.9	303.3	Soil		
RRMDD704	1.4	2.8	1.4	52.8	143.7	10.0	33.4	6.1	1.0	4.8	0.9	5.6	1.1	3.5	0.5	4.0	0.5	30.4	298.3	Hardcap		
RRMDD704	2.8	3.8	1.0	133.1	228.5	30.6	107.2	17.6	2.9	14.1	2.2	12.9	2.5	7.4	1.1	7.0	1.0	76.2	644.1	Clay		
RRMDD704	3.8	4.7	1.0	163.0	330.4	45.7	162.1	29.3	4.9	24.3	3.9	24.1	4.8	13.8	1.9	11.9	1.6	142.9	964.7	Clay		
RRMDD704	4.7	5.4	0.6	233.4	517.2	68.9	261.3	47.1	8.2	40.3	6.2	37.0	7.0	20.2	2.8	18.0	2.4	207.0	1476.9	Clay		
RRMDD704	5.4	6.4	1.0	117.9	240.8	28.5	113.0	20.1	3.8	21.0	3.0	18.4	3.7	11.2	1.5	9.1	1.3	141.6	734.9	Upper Saprolite		
RRMDD704	6.4	7.5	1.1	64.4	145.0	15.3	56.9	9.9	1.9	7.9	1.2	7.1	1.3	3.7	0.5	3.5	0.5	43.3	362.4	Lower Saprolite		
RRMDD704	7.5	8.2	0.8	63.4	149.9	16.4	60.7	11.5	2.4	9.5	1.4	8.3	1.6	4.7	0.7	4.0	0.5	48.8	383.7	Lower Saprolite		
RRMDD704	8.2	9.0	0.8	65.9	152.3	16.1	60.7	11.0	2.2	8.9	1.3	7.7	1.5	4.3	0.6	3.6	0.5	44.3	380.8	Lower Saprolite		
RRMDD705	0.0	1.9	1.9	78.3	673.2	14.9	48.4	8.8	1.5	6.7	1.2	7.0	1.4	4.5	0.7	4.5	0.6	34.7	886.4	Hardcap		
RRMDD705	1.9	3.9	1.9	106.1	598.2	22.2	73.6	12.7	2.0	9.5	1.5	8.6	1.7	5.1	0.8	5.1	0.7	45.2	892.9	Hardcap		
RRMDD705	3.9	4.4	0.6	147.2	196.5	32.5	110.3	17.4	2.9	12.5	1.9	10.9	2.0	5.4	0.8	5.5	0.8	56.1	602.8	Transition		
RRMDD705	4.4	5.2	0.8	184.1	251.8	47.5	172.6	28.8	5.0	22.2	3.1	16.9	2.9	7.7	1.0	6.7	0.9	78.0	829.2	Clay		
RRMDD705	5.2	5.9	0.8	175.3	276.4	46.8	170.9	29.6	5.1	21.5	3.1	17.2	2.8	7.1	1.0	6.1	0.9	70.5	834.1	Clay		
RRMDD705	5.9	6.7	0.8	158.9	271.5	42.2	158.0	27.5	4.8	21.6	3.1	17.1	2.7	7.3	1.0	6.4	0.9	73.7	796.7	Clay		
RRMDD705	6.7	7.7	1.0	144.8	276.4	39.4	152.8	26.6	5.0	22.1	3.2	17.3	2.9	7.6	1.0	6.4	0.9	74.0	780.5	Clay		
RRMDD705	7.7	8.6	0.9	117.9	239.5	33.1	124.2	22.7	4.2	19.3	2.7	15.9	2.6	7.0	0.9	6.0	0.9	69.3	666.3	Clay		
RRMDD705	8.6	9.6	1.0	112.4	249.4	30.9	117.8	20.8	3.8	17.3	2.4	13.9	2.4	6.4	0.8	5.4	0.8	62.9	647.2	Clay		
RRMDD705	9.6	10.5	0.9	86.8	195.3	22.5	87.5	15.4	2.9	13.8	2.0	11.8	2.4	7.0	1.0	6.5	0.9	75.6	531.3	Clay		
RRMDD705	10.5	11.4	0.9	93.1	203.3	23.3	91.8	16.1	2.9	13.8	2.0	12.2	2.5	7.7	1.1	6.9	1.0	82.3	560.0	Clay		
RRMDD705	11.4	12.3	0.9	87.4	202.1	22.2	82.2	13.5	2.5	11.9	1.8	11.5	2.4	6.8	1.0	6.5	0.9	78.5	531.2	Clay		
RRMDD705	12.3	13.1	0.9	122.0	285.0	30.0	112.0	18.8	3.4	16.0	2.3	14.0	2.7	8.2	1.1	6.8	1.0	89.7	712.9	Clay		
RRMDD705	13.1	14.0	0.9	105.9	245.7	27.3	98.1	17.8	3.3	15.4	2.3	13.8	3.0	8.8	1.2	8.2	1.2	98.3	650.2	Clay		
RRMDD705	14.0	14.9	0.9	95.8	217.4	24.0	87.7	17.0	3.1	14.2	2.1	14.0	3.0	9.7	1.2	8.5	1.3	106.3	605.4	Clay		
RRMDD705	14.9	15.8	0.9	86.9	197.8	21.4	82.3	16.1	3.1	14.6	2.3	14.3	3.3	10.6	1.5	9.9	1.5	121.5	587.0	Clay		
RRMDD705	15.8	16.5	0.7	103.6	253.1	26.9	99.7	19.2	3.5	15.9	2.3	15.1	3.1	9.8	1.4	9.0	1.3	118.0	682.0	Upper Saprolite		
RRMDD705	16.5	17.2	0.7	94.4	216.2	23.3	88.8	16.0	3.0	13.7	2.2	14.5	3.4	11.0	1.5	10.3	1.6	141.0	640.8	Upper Saprolite		
RRMDD705	17.2	18.1	0.9	87.5	203.9	22.3	82.0	16.1	2.9	13.3	2.0	12.0	2.6	8.4	1.2	7.8	1.1	115.9	579.0	Upper Saprolite		
RRMDD705	18.1	19.0	0.9	105.7	250.6	26.1	93.0	16.7	3.1	13.3	1.9	10.9	2.2	6.8	0.9	6.0	0.9	94.0	631.9	Upper Saprolite		
RRMDD705	19.0	19.9	0.9	85.0	205.1	21.0	75.9	14.0	2.5	10.8	1.6	9.4	1.8	5.5	0.8	5.2	0.8	60.2	499.6	Upper Saprolite		
RRMDD705	19.9	20.8	0.9	90.7	211.9	22.7	79.9	14.1	2.6	10.1	1.4	8.1	1.5	4.4	0.7	4.5	0.7	47.5	500.6	Upper Saprolite		
RRMDD705	20.8	21.5	0.6	94.1	219.3	22.0	78.0	14.4	2.6	10.8	1.6	9.1	1.7	4.9	0.7	4.3	0.6	53.6	517.8	Lower Saprolite		
RRMDD705	21.5	22.1	0.7	78.2	184.3	18.9	67.0	11.5	2.0	9.0	1.3	7.7	1.5	4.7	0.7	4.4	0.6	49.3	441.0	Saprock		
RRMDD705	22.1	23.2	1.1	86.7	209.4	21.6	75.5	13.4	2.4	9.8	1.4	8.3	1.6	4.8	0.7	4.7	0.7	51.6	492.5	Saprock		
RRMDD706	0.0	1.8	1.8	62.2	207.0	11.4	37.0	6.5	1.1	5.3	0.9	5.2	1.0	3.5	0.5	3.7	0.5	28.7	374.4	Hardcap		
RRMDD706	1.8	3.7	1.8	102.6	245.7	18.8	60.7	10.3	1.6	8.1	1.3	7.5	1.5	4.7	0.7	4.8	0.7	40.0	508.8	Transition		
RRMDD706	3.7	4.7	1.0	205.2	319.4	58.7	207.0	33.6	5.4	23.3	3.3	17.4	3.0	7.7	1.1	6.8	1.0	77.3	970.3	Clay		

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval		
																					Length (m)	TREO ppm	
RRMDD706	4.7	5.7	1.0	130.8	287.4	40.8	166.2	30.8	5.6	27.2	28.7	4.0	21.8	3.8	9.5	1.3	8.1	1.1	96.1	834.7	Clay	11.5	538
RRMDD706	5.7	6.6	0.9	81.6	177.5	20.7	80.1	15.6	3.0	14.7	2.1	12.2	2.4	6.6	0.9	6.0	0.9	71.2	495.7	Clay			
RRMDD706	6.6	7.3	0.7	125.5	294.8	32.3	122.5	22.6	4.3	21.1	3.1	17.6	3.4	8.9	1.2	7.4	1.1	99.4	765.0	Clay			
RRMDD706	7.3	8.2	1.0	67.2	146.8	15.8	58.6	11.5	2.5	11.6	1.7	10.4	2.2	6.2	0.8	5.3	0.8	67.2	408.5	Clay			
RRMDD706	8.2	9.2	0.9	64.7	141.9	15.7	59.0	12.1	2.7	12.7	1.9	11.5	2.7	7.9	1.1	7.4	1.1	92.1	434.5	Clay			
RRMDD706	9.2	10.1	0.9	60.4	133.3	15.5	62.8	13.6	3.1	15.5	2.4	15.9	3.9	11.9	1.8	11.4	1.8	146.0	499.3	Clay			
RRMDD706	10.1	11.0	0.9	54.3	117.4	13.4	50.7	10.1	2.2	10.0	1.5	9.0	2.1	6.8	1.0	6.4	1.0	87.5	373.5	Upper Saprolite			
RRMDD706	11.0	11.8	0.8	52.0	111.9	12.5	46.8	8.6	1.8	8.1	1.2	7.5	1.9	5.5	0.8	5.5	0.9	77.5	342.4	Upper Saprolite			
RRMDD706	11.8	12.7	0.9	75.2	172.0	18.0	65.9	12.2	2.4	11.8	1.8	11.1	2.6	8.3	1.2	7.4	1.2	134.6	525.8	Lower Saprolite			
RRMDD706	12.7	13.5	0.8	75.9	165.8	18.5	65.9	12.5	2.6	11.4	1.8	10.6	2.2	6.3	0.8	5.4	0.8	92.2	472.9	Lower Saprolite			
RRMDD706	13.5	14.3	0.9	75.5	165.2	18.3	64.5	11.8	2.5	10.1	1.5	8.5	1.7	4.9	0.7	4.3	0.6	53.2	423.4	Lower Saprolite			
RRMDD706	14.3	15.2	0.8	71.3	150.5	16.5	56.3	10.4	2.0	8.4	1.2	7.0	1.3	3.9	0.6	3.6	0.5	42.2	375.9	Lower Saprolite			
RRMDD706	15.2	16.0	0.9	71.8	165.2	16.9	58.1	10.4	2.1	8.8	1.4	8.2	1.6	4.7	0.7	4.3	0.7	51.0	405.7	Saprock			
RRMDD706	16.0	17.0	1.0	71.8	173.2	17.5	59.8	11.1	2.1	9.3	1.4	7.4	1.4	4.1	0.6	3.7	0.6	42.0	406.1	Saprock			
RRMDD706	17.0	18.0	1.0	74.4	183.6	17.8	61.2	11.3	2.1	9.3	1.4	8.2	1.6	4.8	0.7	4.1	0.6	54.9	436.1	Saprock			
RRMDD707	0.0	1.7	1.7	103.4	250.6	19.6	62.1	10.9	1.8	8.6	1.4	8.0	1.6	5.1	0.7	4.9	0.7	41.9	521.3	Hardcap	7.6	524	
RRMDD707	1.7	3.3	1.7	126.7	404.1	22.2	67.4	11.9	1.9	8.5	1.5	8.4	1.6	5.2	0.8	5.7	0.8	38.9	705.6	Transition			
RRMDD707	3.3	5.0	1.7	175.3	426.3	34.9	112.0	17.2	2.8	13.0	1.9	10.5	2.0	6.0	0.9	5.7	0.8	50.2	859.5	Transition			
RRMDD707	5.0	5.8	0.8	142.5	179.3	34.1	112.2	18.9	3.3	14.3	2.2	11.5	2.1	5.9	0.8	5.2	0.8	58.2	591.3	Clay			
RRMDD707	5.8	6.7	0.8	90.3	168.9	23.4	82.9	16.6	3.3	15.3	2.5	13.9	2.6	7.4	1.0	6.5	1.0	73.3	508.9	Clay			
RRMDD707	6.7	7.5	0.8	87.4	169.5	22.5	85.3	17.6	3.6	18.2	2.8	16.5	3.2	9.5	1.2	7.6	1.1	100.8	547.0	Clay			
RRMDD707	7.5	8.2	0.7	72.8	156.6	19.7	76.0	14.8	3.1	15.3	2.4	15.6	3.3	10.0	1.3	8.1	1.2	112.0	512.4	Upper Saprolite			
RRMDD707	8.2	8.8	0.7	82.1	182.4	22.1	85.7	16.2	3.2	16.7	2.7	17.3	3.9	11.8	1.6	9.9	1.5	144.8	602.0	Upper Saprolite			
RRMDD707	8.8	9.6	0.7	82.2	198.4	22.7	84.8	14.8	3.0	16.0	2.5	16.2	4.1	12.9	1.8	11.2	1.8	177.2	649.6	Upper Saprolite			
RRMDD707	9.6	10.3	0.7	85.6	198.4	20.8	72.8	12.9	2.6	11.5	1.7	10.3	2.3	7.2	1.0	6.2	1.0	115.7	550.1	Upper Saprolite			
RRMDD707	10.3	11.0	0.7	76.7	171.4	18.3	63.9	11.9	2.4	10.3	1.6	9.1	1.9	5.7	0.8	4.9	0.7	79.2	458.7	Upper Saprolite			
RRMDD707	11.0	11.8	0.8	68.3	154.8	16.9	57.6	10.9	2.2	9.3	1.4	8.5	1.7	5.0	0.7	4.3	0.6	55.4	397.6	Upper Saprolite			
RRMDD707	11.8	12.6	0.8	78.0	178.7	18.8	64.9	11.7	2.3	9.3	1.4	8.2	1.6	4.6	0.6	3.9	0.6	48.5	433.2	Lower Saprolite			
RRMDD707	12.6	13.6	1.0	88.2	210.7	21.1	71.6	12.8	2.5	10.6	1.5	8.6	1.6	4.7	0.6	3.9	0.6	50.4	489.5	Lower Saprolite			
RRMDD707	13.6	14.4	0.8	77.9	183.0	18.9	64.5	11.7	2.2	9.3	1.4	7.9	1.5	4.3	0.6	3.7	0.5	47.0	434.3	Saprock			
RRMDD707	14.4	15.1	0.8	66.5	151.7	15.9	54.4	10.0	2.0	8.4	1.2	6.6	1.3	4.0	0.5	3.5	0.5	40.0	366.6	Saprock			
RRMDD708	0.0	1.7	1.7	78.1	513.5	15.5	51.4	9.5	1.6	7.7	1.3	7.2	1.5	4.8	0.7	4.9	0.6	38.9	737.2	Hardcap	10.3	542	
RRMDD708	1.7	3.3	1.7	84.0	512.2	15.9	53.1	9.5	1.5	7.8	1.2	7.2	1.5	4.7	0.7	4.9	0.7	39.5	744.4	Hardcap			
RRMDD708	3.3	5.0	1.7	96.4	584.7	21.0	72.7	12.7	2.0	9.9	1.6	9.2	1.8	5.5	0.8	5.4	0.8	49.3	873.7	Hardcap			
RRMDD708	5.0	5.7	0.7	156.6	250.6	37.8	127.1	20.6	3.6	15.4	2.3	12.9	2.4	6.9	1.0	6.3	0.9	67.1	711.6	Clay			
RRMDD708	5.7	6.6	1.0	129.6	152.9	30.1	99.1	16.9	3.2	13.4	2.0	10.8	2.0	5.6	0.8	5.0	0.7	59.2	531.3	Clay			
RRMDD708	6.6	7.6	0.9	135.5	195.9	32.6	107.0	19.1	3.5	15.4	2.3	12.7	2.3	6.4	0.8	5.4	0.9	65.7	605.4	Clay			
RRMDD708	7.6	8.5	1.0	96.2	163.4	23.5	80.7	15.1	3.0	13.6	2.1	11.8	2.2	6.3	0.9	5.4	0.8	63.2	488.2	Clay			
RRMDD708	8.5	9.5	1.0	98.5	207.0	25.1	92.1	18.2	3.6	16.8	2.6	14.7	2.7	7.5	1.0	6.1	0.9	78.6	575.6	Clay			
RRMDD708	9.5	10.4	0.9	100.6	238.9	25.7	94.8	19.7	3.9	19.3	3.0	18.4	3.7	10.4	1.4	8.6	1.3	105.0	654.8	Clay			
RRMDD708	10.4	11.4	1.0	73.8	157.8	21.1	84.0	18.0	3.6	19.7	3.2	21.1	4.8	14.5	2.0	12.5	1.9	151.8	589.8	Clay			
RRMDD708	11.4	12.3	0.9	92.3	197.2	25.6	95.3	14.8	2.9	14.8	2.2	14.2	3.4	10.9	1.5	9.0	1.5	160.6	646.2	Upper Saprolite			
RRMDD708	12.3	13.1	0.8	64.2	145.6	15.7	55.6	10.5	2.1	8.3	1.3	7.4	1.4	4.2	0.6	3.7	0.6	46.9	368.0	Upper Saprolite			
RRMDD708	13.1	13.9	0.8	80.3	178.7	19.0	65.4	12.0	2.4	10.2	1.6	8.8	1.7	5.1	0.7	4.3	0.7	56.9	447.8	Upper Saprolite			
RRMDD708	13.9	14.6	0.7	74.9	166.4	18.1	61.9	11.3	2.2	9.3	1.4	8.0	1.5	4.4	0.6	3.8	0.6	46.4	411.1	Upper Saprolite			
RRMDD708	14.6	15.3	0.7	75.9	169.5	18.3	63.2	11.6	2.4	9.6	1.5	8.0	1.4	4.0	0.5	3.5	0.5	42.9	412.9	Lower Saprolite			

Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	>200ppm TREO-CeO <sub>2</sub> Interval	
																					Length (m)	TREO ppm
RRMDD708	15.3	16.3	1.0	62.4	136.4	14.9	53.0	9.8	1.9	8.1	1.2	7.2	1.5	4.3	0.6	3.9	0.6	45.6	351.4	Saprock		
RRMDD708	16.3	17.3	1.0	64.0	143.7	15.5	54.0	10.1	2.0	8.1	1.3	7.2	1.4	4.0	0.5	3.4	0.5	42.5	358.3	Saprock		
RRMDD708	17.3	18.2	1.0	71.8	159.1	17.4	61.9	11.4	2.2	9.1	1.4	7.6	1.5	4.3	0.6	3.5	0.5	45.1	397.4	Saprock		
RRMDD708	18.2	19.2	1.0	71.2	162.8	17.2	59.6	10.7	2.1	8.8	1.4	7.5	1.4	4.1	0.5	3.7	0.5	44.1	395.4	Saprock		
RRMDD709	0.0	2.0	2.0	93.1	357.5	19.8	64.9	12.0	2.0	9.9	1.7	10.1	2.1	6.5	1.0	6.5	0.9	56.3	644.0	Hardcap		
RRMDD709	2.0	3.9	2.0	106.1	637.5	20.1	65.8	11.5	1.9	8.8	1.5	8.8	1.8	5.6	0.8	5.6	0.8	48.0	924.5	Hardcap		
RRMDD709	3.9	5.9	2.0	153.1	511.0	29.1	95.9	16.6	2.7	13.4	2.2	12.1	2.4	7.5	1.1	7.0	1.0	66.7	921.8	Transition		
RRMDD709	5.9	6.6	0.7	172.4	273.9	36.1	122.5	21.0	3.4	16.0	2.5	14.6	2.8	8.6	1.2	8.0	1.2	92.4	776.6	Clay		
RRMDD709	6.6	7.3	0.7	176.5	248.1	43.3	144.6	24.5	3.9	18.3	2.8	16.2	3.1	8.9	1.2	8.2	1.2	99.6	800.2	Clay		
RRMDD709	7.3	8.2	0.8	99.9	197.8	26.1	95.8	17.7	3.3	15.3	2.3	13.7	2.7	8.2	1.1	7.2	1.0	87.9	579.8	Clay		
RRMDD709	8.2	9.2	1.0	86.2	197.2	21.0	79.3	15.0	2.9	12.7	1.8	11.5	2.5	7.6	1.0	6.7	0.9	88.6	534.9	Clay		
RRMDD709	9.2	10.1	1.0	83.9	187.9	19.6	69.9	12.8	2.4	9.8	1.4	8.6	1.7	5.4	0.8	5.3	0.8	62.2	472.5	Clay		
RRMDD709	10.1	11.1	1.0	92.2	218.7	23.5	85.4	15.8	3.1	12.9	1.9	11.6	2.5	7.8	1.1	8.1	1.3	100.4	586.3	Clay		
RRMDD709	11.1	12.1	1.0	85.1	202.7	21.0	78.4	14.3	2.7	11.7	1.7	10.1	2.1	6.4	0.9	5.8	0.8	85.5	529.1	Clay		
RRMDD709	12.1	12.5	0.4	84.6	198.4	20.7	76.3	14.0	2.6	10.8	1.6	8.7	1.5	4.7	0.6	4.2	0.6	50.8	479.9	Upper Saprolite		
RRMDD709	12.5	13.4	0.9	91.0	216.8	21.6	74.1	13.0	2.6	10.6	1.6	8.7	1.7	4.5	0.7	4.0	0.6	51.9	503.5	Lower Saprolite	7.5	580
RRMDD709	13.4	14.3	0.9	70.6	159.1	17.1	59.3	10.8	2.3	9.0	1.3	7.5	1.4	4.1	0.6	3.9	0.6	43.9	391.3	Saprock		
RRMDD709	14.3	15.2	0.9	63.0	143.7	15.3	53.9	9.6	2.0	7.9	1.2	6.7	1.3	3.8	0.5	3.5	0.5	40.3	353.4	Saprock		
RRMDD709	15.2	15.5	0.3	79.5	187.9	19.2	66.7	12.2	2.4	9.3	1.4	7.8	1.6	4.5	0.7	4.4	0.6	50.8	449.0	Saprock		
RRMDD710	0.0	1.8	1.8	134.9	428.7	24.8	77.9	13.0	2.2	10.2	1.7	10.2	1.9	6.1	0.9	6.3	0.9	49.8	769.4	Hardcap		
RRMDD710	1.8	3.6	1.8	148.9	522.1	29.5	94.8	16.5	2.6	12.4	2.0	11.3	2.2	6.7	1.0	7.0	0.9	52.6	910.4	Hardcap		
RRMDD710	3.6	4.9	1.3	144.8	236.5	34.3	115.7	19.8	3.8	16.4	2.5	13.5	2.6	7.4	1.1	6.7	1.0	77.0	683.0	Transition		
RRMDD710	4.9	5.9	1.0	130.8	213.7	36.9	131.8	24.4	4.8	20.0	3.0	16.3	2.9	7.2	1.1	6.1	0.9	79.0	678.9	Clay		
RRMDD710	5.9	6.9	1.0	106.1	215.0	29.7	113.0	22.4	4.5	20.3	3.1	17.2	3.2	8.1	1.1	6.8	1.0	90.8	642.4	Clay		
RRMDD710	6.9	7.9	1.0	100.9	230.3	26.3	101.2	19.8	4.0	19.1	2.9	17.2	3.4	9.2	1.3	7.6	1.1	105.9	650.4	Clay		
RRMDD710	7.9	8.8	1.0	98.6	226.0	24.3	86.2	17.9	3.4	16.5	2.3	14.2	3.0	9.2	1.3	7.8	1.1	105.3	617.1	Clay		
RRMDD710	8.8	9.8	1.0	77.4	173.2	18.7	63.6	13.0	2.5	11.4	1.6	9.5	2.0	6.4	0.9	6.2	0.9	78.1	465.5	Clay		
RRMDD710	9.8	10.8	1.0	99.0	230.9	23.7	79.2	15.5	2.9	13.1	1.9	11.0	2.4	7.2	1.1	7.0	1.1	99.1	595.0	Clay		
RRMDD710	10.8	11.8	1.0	91.4	207.6	21.1	72.8	14.6	2.6	11.1	1.6	9.0	1.8	5.2	0.8	5.0	0.8	71.2	516.4	Clay		
RRMDD710	11.8	12.7	0.9	87.7	202.7	20.5	69.5	14.0	2.6	11.2	1.6	8.7	1.6	4.9	0.7	4.7	0.7	62.0	493.1	Clay		
RRMDD710	12.7	13.6	0.9	90.7	210.7	21.3	72.7	14.3	2.5	11.0	1.5	8.8	1.7	4.7	0.7	4.4	0.6	53.8	499.3	Upper Saprolite		
RRMDD710	13.6	14.5	0.9	90.7	207.0	21.0	71.2	14.1	2.7	11.4	1.5	8.4	1.6	4.7	0.7	4.3	0.6	52.2	492.1	Upper Saprolite		
RRMDD710	14.5	15.4	0.9	80.5	184.3	18.9	63.2	12.3	2.3	9.8	1.3	8.1	1.6	4.8	0.7	4.5	0.7	50.7	443.6	Upper Saprolite		
RRMDD710	15.4	16.2	0.9	92.4	210.7	21.5	73.6	14.1	2.5	10.8	1.5	8.3	1.6	4.6	0.7	4.1	0.6	49.9	496.8	Upper Saprolite		
RRMDD710	16.2	17.1	0.9	80.9	187.3	19.3	64.4	12.9	2.5	10.6	1.5	8.7	1.7	5.1	0.7	4.7	0.7	55.1	456.1	Upper Saprolite		
RRMDD710	17.1	17.8	0.7	89.6	205.1	21.6	72.3	13.8	2.6	11.2	1.5	8.4	1.7	4.4	0.6	4.1	0.6	52.7	490.3	Upper Saprolite		
RRMDD710	17.8	18.5	0.7	63.6	140.0	14.8	50.2	10.1	2.0	8.5	1.2	6.4	1.2	3.6	0.5	3.6	0.5	39.1	345.4	Lower Saprolite		
RRMDD710	18.5	19.4	0.9	86.6	197.8	20.5	68.6	13.9	2.7	11.0	1.6	8.8	1.7	4.9	0.7	4.3	0.6	53.8	477.3	Lower Saprolite		
RRMDD710	19.4	20.4	0.9	77.8	177.5	18.3	62.5	12.8	2.5	9.9	1.4	8.6	1.7	5.3	0.8	5.3	0.8	58.7	443.8	Lower Saprolite	15.5	523
RRMDD710	20.4	21.3	0.9	81.4	184.9	19.1	64.6	12.8	2.5	10.2	1.4	7.9	1.4	4.1	0.6	3.7	0.5	47.1	442.2	Saprock		
RRMDD710	21.3	22.2	0.9	81.7	186.1	19.3	64.6	12.6	2.4	9.9	1.4	7.5	1.4	4.0	0.6	3.8	0.5	44.3	440.1	Saprock		
RRMDD710	22.2	23.1	0.9	86.0	191.0	19.8	65.9	13.0	2.5	9.9	1.4	7.4	1.3	3.9	0.5	3.7	0.5	42.0	448.8	Saprock		
RRMDD710	23.1	24.0	0.9	94.1	221.7	21.7	71.6	14.1	2.5	10.8	1.5	8.2	1.6	4.6	0.6	4.1	0.6	49.8	507.4	Saprock		
RRMDD710	24.0	24.8	0.8	86.4	200.8	20.0	67.5	12.9	2.4	10.2	1.4	7.4	1.4	4.0	0.6	3.7	0.5	44.6	464.0	Saprock		
RRMDD710	24.8	25.6	0.8	74.0	168.3	17.4	58.6	11.6	2.3	9.4	1.3	7.2	1.4	4.3	0.6	4.4	0.6	47.2	408.6	Saprock		
RRMDD710	25.6	26.4	0.8	83.3	191.0	19.1	64.3	12.5	2.2	9.5	1.3	7.2	1.4	4.0	0.6	3.8	0.5	45.1	445.8	Saprock		

																				>200ppm TREO-CeO <sub>2</sub> Interval		
Hole ID	From m	To m	Int. m	La <sub>2</sub> O <sub>3</sub> ppm	CeO <sub>2</sub> ppm	Pr <sub>2</sub> O <sub>3</sub> ppm	Nd <sub>2</sub> O <sub>3</sub> ppm	Sm <sub>2</sub> O <sub>3</sub> ppm	Eu <sub>2</sub> O <sub>3</sub> ppm	Gd <sub>2</sub> O <sub>3</sub> ppm	Tb <sub>2</sub> O <sub>3</sub> ppm	Dy <sub>2</sub> O <sub>3</sub> ppm	Ho <sub>2</sub> O <sub>3</sub> ppm	Er <sub>2</sub> O <sub>3</sub> ppm	Tm <sub>2</sub> O <sub>3</sub> ppm	Yb <sub>2</sub> O <sub>3</sub> ppm	Lu <sub>2</sub> O <sub>3</sub> ppm	Y <sub>2</sub> O <sub>3</sub> ppm	TREO ppm	Regolith Zone	Length (m)	TREO ppm
RRMDD711	0.0	1.5	1.5	148.4	273.9	28.6	93.0	16.1	2.5	12.6	2.0	11.4	2.1	6.7	0.9	6.4	0.9	55.6	661.0	Hardcap		
RRMDD711	1.5	3.0	1.5	147.2	480.3	27.5	88.4	15.3	2.5	11.6	1.9	10.3	1.9	5.8	0.9	5.9	0.8	47.5	847.9	Hardcap		
RRMDD711	3.0	4.5	1.5	119.6	485.2	25.3	85.3	15.1	2.4	11.5	1.8	10.3	2.0	6.4	0.9	6.2	0.9	55.7	828.5	Transition		
RRMDD711	4.5	5.4	0.9	113.3	179.3	23.7	79.2	13.2	2.3	10.6	1.6	9.0	1.8	5.4	0.8	5.4	0.8	54.6	501.3	Clay		
RRMDD711	5.4	6.1	0.8	89.6	173.8	21.6	73.6	12.9	2.4	9.9	1.5	8.4	1.6	4.6	0.7	4.6	0.7	49.0	454.9	Clay		
RRMDD711	6.1	6.9	0.8	89.0	180.6	22.7	80.0	14.6	2.8	11.6	1.7	9.0	1.7	4.6	0.7	4.2	0.7	49.5	473.4	Clay		
RRMDD711	6.9	7.6	0.8	82.8	156.0	20.7	75.0	14.0	2.7	11.5	1.7	9.3	1.8	5.1	0.7	4.6	0.7	52.3	439.0	Clay		
RRMDD711	7.6	8.4	0.8	96.3	210.1	24.5	91.7	18.3	3.6	15.7	2.3	13.1	2.5	6.3	0.9	5.4	0.8	68.8	560.3	Clay		
RRMDD711	8.4	9.3	0.8	82.8	183.0	20.2	73.1	13.9	2.7	11.9	1.7	10.1	2.1	5.8	0.8	5.6	0.8	63.4	478.0	Clay		
RRMDD711	9.3	10.1	0.8	115.4	275.2	28.5	101.1	18.4	3.6	15.7	2.3	13.1	2.6	7.1	1.0	6.2	0.9	84.4	675.5	Clay		
RRMDD711	10.1	10.9	0.8	96.3	226.0	23.6	85.0	15.3	2.8	12.3	1.8	10.5	2.1	6.3	0.9	6.1	1.0	78.6	568.7	Clay		
RRMDD711	10.9	11.7	0.8	94.3	221.7	22.6	80.7	14.3	2.7	11.5	1.7	9.8	1.9	5.7	0.9	5.5	0.8	71.7	545.9	Clay		
RRMDD711	11.7	12.7	0.9	75.3	172.6	18.0	63.6	11.2	2.2	8.7	1.3	7.6	1.5	4.4	0.7	4.5	0.7	50.8	423.1	Upper Saprolite		
RRMDD711	12.7	13.6	0.9	71.9	164.6	17.3	62.8	11.7	2.3	9.3	1.4	8.0	1.6	4.3	0.7	4.4	0.6	48.8	409.5	Upper Saprolite		
RRMDD711	13.6	14.6	1.0	70.7	159.1	17.2	62.5	11.7	2.3	9.3	1.3	7.9	1.5	4.4	0.6	4.1	0.6	47.7	401.1	Upper Saprolite		
RRMDD711	14.6	15.5	0.9	72.9	158.5	17.6	63.1	11.5	2.4	9.2	1.4	7.6	1.5	4.4	0.7	4.2	0.6	45.6	401.1	Upper Saprolite		
RRMDD711	15.5	16.3	0.8	73.7	165.2	17.9	63.7	11.8	2.3	9.2	1.4	7.8	1.5	4.2	0.6	3.8	0.6	45.7	409.3	Upper Saprolite		
RRMDD711	16.3	17.1	0.8	76.5	169.5	18.1	63.7	11.6	2.4	9.5	1.4	8.0	1.7	4.9	0.7	4.8	0.7	53.6	427.1	Upper Saprolite		
RRMDD711	17.1	18.0	0.9	88.7	203.9	20.9	73.8	13.0	2.5	10.4	1.5	8.2	1.5	4.2	0.6	3.8	0.6	46.9	480.5	Lower Saprolite		
RRMDD711	18.0	18.9	0.9	68.3	150.5	16.4	57.5	11.1	2.1	9.0	1.3	7.6	1.4	4.2	0.6	4.0	0.6	46.4	381.1	Lower Saprolite	14.4	470
RRMDD711	18.9	19.8	0.9	89.6	199.6	20.7	72.0	12.9	2.3	10.4	1.5	8.5	1.7	4.7	0.7	4.5	0.7	51.8	481.4	Saprock		
RRMDD711	19.8	20.6	0.9	76.5	168.9	18.1	64.4	11.2	2.1	9.1	1.3	7.2	1.4	3.8	0.5	3.6	0.5	42.8	411.5	Saprock		
RRMDD711	20.6	21.5	0.9	99.5	230.9	23.1	79.0	13.5	2.2	10.2	1.5	8.4	1.6	4.3	0.7	4.1	0.6	49.9	529.5	Saprock		

# JORC Code, 2012 Edition – Table 1 report

## Section 1 Sampling Techniques and Data

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

Criteria	JORC Code explanation	Commentary
<b>Sampling techniques</b>	<ul style="list-style-type: none"> <li>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.</li> <li>Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.</li> <li>Aspects of the determination of mineralisation that are Material to the Public Report.</li> <li>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.</li> </ul>	<p><b>Diamond Core Drilling</b></p> <p>Drill core was collected from a core barrel and placed in appropriately marked core trays. Down hole core run depths were measured and marked with core blocks. Core was measured for core loss and core photography and geological logging completed.</p> <p>Sample lengths were determined by geological boundaries with a maximum sample length of 1 metre applied in clay zones and up to 2 metres in laterite zones where core recovery was occasionally low.</p> <p>Where the core contained continuous lengths of soft clay a carving knife was used to cut the core. When the core was too hard to knife cut it was cut using an electric core saw.</p> <p>Using either method core was initial cut in half then one half was further cut in half to give quarter core.</p> <p>Quarter core was submitted to ALS for chemical analysis using industry standard sample preparation and analytical techniques.</p> <p>Half core was collected for metallurgical testwork.</p>
<b>Drilling techniques</b>	<ul style="list-style-type: none"> <li>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).</li> </ul>	<p><b>Diamond Core Drilling</b></p> <p>Core size was HQ triple tube.</p> <p>The core was not oriented (vertical)</p>
<b>Drill sample recovery</b>	<ul style="list-style-type: none"> <li>Method of recording and assessing core and chip sample recoveries and results assessed.</li> <li>Measures taken to maximise sample recovery and ensure representative nature of the samples.</li> <li>Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to</li> </ul>	<p><b>Diamond Drilling</b></p> <p>Core recovery was calculated by measuring actual core length versus drillers core run lengths. Core recovery ranged from 25% to 100% and averaged 95.6%. Core loss is most common in the hardcap and transition regolith types which are not reported as resource or in exploration results.</p>

Criteria	JORC Code explanation	Commentary
	<i>preferential loss/gain of fine/coarse material.</i>	No relationship exists between core recovery and grade.
<b>Logging</b>	<ul style="list-style-type: none"> <li>• <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></li> <li>• <i>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</i></li> <li>• <i>The total length and percentage of the relevant intersections logged.</i></li> </ul>	<p>All (100%) drill core has been geologically logged and core photographs taken.</p> <p>Logging is qualitative with description of colour, weathering status, alteration, major and minor rock types, texture, grain size, regolith zone, presence of kaolinite, hematite, veins and alteration and comments added where further observation is made.</p> <p>Additional non-geological qualitative logging includes comments for sample recovery, humidity, and hardness for each logged interval.</p>
<b>Sub-sampling techniques and sample preparation</b>	<ul style="list-style-type: none"> <li>• <i>If core, whether cut or sawn and whether quarter, half or all core taken.</i></li> <li>• <i>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.</i></li> <li>• <i>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</i></li> <li>• <i>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</i></li> <li>• <i>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.</i></li> <li>• <i>Whether sample sizes are appropriate to the grain size of the material being sampled.</i></li> </ul>	<p><b>Diamond Drill Core</b></p> <p>Where the core contained continuous lengths of soft clay a carving knife was used to cut the core. When the core was too hard to knife cut it was cut using an electric core saw.</p> <p>Sample lengths were determined by geological boundaries with a maximum sample length of 1 metre applied in clay zones and up to 2 metres in laterite zones where core recovery was occasionally low.</p> <p>Samples were collected from core trays by hand and placed in individually numbered bags. These bags were dispatched to ALS for analysis with no further field preparation.</p> <p>Sample weights were recorded prior to sample dispatch. Sample mass is considered appropriate for the grain size of the material being sampled that is generally very fine grained and uniform.</p> <p>Field duplicate sampling was conducted at a ratio of 1:25 samples. Duplicates were created by lengthways halving the ¼ core primary sample into 2 identical portions. Duplicate samples were allocated separate sample numbers and submitted with the same analytical batch as the primary sample.</p>
<b>Quality of assay data and laboratory tests</b>	<ul style="list-style-type: none"> <li>• <i>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</i></li> <li>• <i>For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the</i></li> </ul>	<p><b>Assay and Laboratory Procedures – All Samples</b></p> <p>Samples were dispatched by air freight direct to ALS laboratory Perth Australia. The preparation and analysis protocol used is as follows:</p>

Criteria	JORC Code explanation	Commentary																																																				
	<p><i>analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc.</i></p> <ul style="list-style-type: none"> <li><i>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.</i></li> </ul>	<table border="1" data-bbox="1108 256 1966 826"> <thead> <tr> <th data-bbox="1108 256 1536 304">ALS Code</th> <th data-bbox="1536 256 1966 304">Description</th> </tr> </thead> <tbody> <tr> <td data-bbox="1108 304 1536 352">WEI-21</td> <td data-bbox="1536 304 1966 352">Received sample weight</td> </tr> <tr> <td data-bbox="1108 352 1536 400">LOG-22</td> <td data-bbox="1536 352 1966 400">Sample Login w/o Barcode</td> </tr> <tr> <td data-bbox="1108 400 1536 448">DRY-21</td> <td data-bbox="1536 400 1966 448">High temperature drying</td> </tr> <tr> <td data-bbox="1108 448 1536 496">CRU-21</td> <td data-bbox="1536 448 1966 496">Crush entire sample</td> </tr> <tr> <td data-bbox="1108 496 1536 544">CRU-31</td> <td data-bbox="1536 496 1966 544">Fine crushing – 70% &lt;2mm</td> </tr> <tr> <td data-bbox="1108 544 1536 624">SPL-22Y</td> <td data-bbox="1536 544 1966 624">Split sample – Boyd Rotary Splitter</td> </tr> <tr> <td data-bbox="1108 624 1536 703">PUL-31h</td> <td data-bbox="1536 624 1966 703">Pulverise 750g to 85% passing 75 micron</td> </tr> <tr> <td data-bbox="1108 703 1536 751">CRU-QC</td> <td data-bbox="1536 703 1966 751">Crushing QC Test</td> </tr> <tr> <td data-bbox="1108 751 1536 826">PUL-QC</td> <td data-bbox="1536 751 1966 826">Pulverising QC test</td> </tr> </tbody> </table> <p data-bbox="1108 874 2116 970">The assay technique used for REE was Lithium Borate Fusion ICP-MS (ALS code ME-MS81). This is a recognised industry standard analysis technique for REE suite and associated elements. Elements analysed at ppm levels:</p> <table border="1" data-bbox="1294 986 1944 1189"> <tbody> <tr> <td data-bbox="1294 986 1375 1034">Ba</td> <td data-bbox="1375 986 1456 1034">Ce</td> <td data-bbox="1456 986 1536 1034">Cr</td> <td data-bbox="1536 986 1617 1034">Cs</td> <td data-bbox="1617 986 1697 1034">Dy</td> <td data-bbox="1697 986 1778 1034">Er</td> <td data-bbox="1778 986 1859 1034">Eu</td> <td data-bbox="1859 986 1944 1034">Ga</td> </tr> <tr> <td data-bbox="1294 1034 1375 1082">Gd</td> <td data-bbox="1375 1034 1456 1082">Hf</td> <td data-bbox="1456 1034 1536 1082">Ho</td> <td data-bbox="1536 1034 1617 1082">La</td> <td data-bbox="1617 1034 1697 1082">Lu</td> <td data-bbox="1697 1034 1778 1082">Nb</td> <td data-bbox="1778 1034 1859 1082">Nd</td> <td data-bbox="1859 1034 1944 1082">Pr</td> </tr> <tr> <td data-bbox="1294 1082 1375 1129">Rb</td> <td data-bbox="1375 1082 1456 1129">Sm</td> <td data-bbox="1456 1082 1536 1129">Sn</td> <td data-bbox="1536 1082 1617 1129">Sr</td> <td data-bbox="1617 1082 1697 1129">Ta</td> <td data-bbox="1697 1082 1778 1129">Tb</td> <td data-bbox="1778 1082 1859 1129">Th</td> <td data-bbox="1859 1082 1944 1129">Tm</td> </tr> <tr> <td data-bbox="1294 1129 1375 1189">U</td> <td data-bbox="1375 1129 1456 1189">V</td> <td data-bbox="1456 1129 1536 1189">W</td> <td data-bbox="1536 1129 1617 1189">Y</td> <td data-bbox="1617 1129 1697 1189">Yb</td> <td data-bbox="1697 1129 1778 1189">Zr</td> <td data-bbox="1778 1129 1859 1189"></td> <td data-bbox="1859 1129 1944 1189"></td> </tr> </tbody> </table> <p data-bbox="1108 1236 2072 1305">Analysis for scandium (Sc) was by Lithium Borate Fusion ICP-AES (ALS code Sc-ICP06).</p>	ALS Code	Description	WEI-21	Received sample weight	LOG-22	Sample Login w/o Barcode	DRY-21	High temperature drying	CRU-21	Crush entire sample	CRU-31	Fine crushing – 70% <2mm	SPL-22Y	Split sample – Boyd Rotary Splitter	PUL-31h	Pulverise 750g to 85% passing 75 micron	CRU-QC	Crushing QC Test	PUL-QC	Pulverising QC test	Ba	Ce	Cr	Cs	Dy	Er	Eu	Ga	Gd	Hf	Ho	La	Lu	Nb	Nd	Pr	Rb	Sm	Sn	Sr	Ta	Tb	Th	Tm	U	V	W	Y	Yb	Zr		
ALS Code	Description																																																					
WEI-21	Received sample weight																																																					
LOG-22	Sample Login w/o Barcode																																																					
DRY-21	High temperature drying																																																					
CRU-21	Crush entire sample																																																					
CRU-31	Fine crushing – 70% <2mm																																																					
SPL-22Y	Split sample – Boyd Rotary Splitter																																																					
PUL-31h	Pulverise 750g to 85% passing 75 micron																																																					
CRU-QC	Crushing QC Test																																																					
PUL-QC	Pulverising QC test																																																					
Ba	Ce	Cr	Cs	Dy	Er	Eu	Ga																																															
Gd	Hf	Ho	La	Lu	Nb	Nd	Pr																																															
Rb	Sm	Sn	Sr	Ta	Tb	Th	Tm																																															
U	V	W	Y	Yb	Zr																																																	

Criteria	JORC Code explanation	Commentary
		<p>The sample preparation and assay techniques used are industry standard and provide a total analysis.</p> <p>All laboratories used are ISO 17025 accredited</p> <p><b>QAQC</b></p> <p><u>Diamond Drill Core Samples</u></p> <ul style="list-style-type: none"> <li>Analytical Standards CRM AMIS0275 and AMIS0276 and a specific Makuutu CRM MUIACREI01 were included in sample batches at a ratio of 1:25 to drill samples submitted. This is an acceptable ratio.</li> </ul> <p>The assay results for the standards were consistent with the certified levels of accuracy and precision and no bias is evident.</p> <ul style="list-style-type: none"> <li>Blanks CRM blanks AMIS0681 and OREAS22e were included in sample batches at a ratio of 1:25 to drill samples submitted for analysis. This is an acceptable ratio.</li> </ul> <p>Both CRM blanks contain some REE, with elements critical elements Ce, Nd, Dy and Y present in small quantities. The analysis results were consistent with the certified values for the blanks. No laboratory contamination or bias is evident from these results.</p> <ul style="list-style-type: none"> <li>Duplicates Field duplicate sampling was conducted at a ratio of 1:25 samples. Duplicates were created by lengthways halving the ¼ core primary sample into 2 identical portions. Duplicate samples were allocated separate sample numbers and submitted with the same analytical batch as the primary sample. Variability between duplicate results is considered acceptable and no sampling bias is evident.</li> </ul> <p>Laboratory inserted standards, blanks and duplicates were analysed as per industry standard practice. There is no evidence of bias from these results.</p>
<b>Verification of sampling and assaying</b>	<ul style="list-style-type: none"> <li>The verification of significant intersections by either independent or alternative company personnel.</li> <li>The use of twinned holes.</li> <li>Documentation of primary data, data entry procedures, data</li> </ul>	<p>No independent verification of significant intersection undertaken.</p> <p>No twinning of diamond core drill holes was undertaken.</p>



Criteria	JORC Code explanation	Commentary																											
	<p><i>verification, data storage (physical and electronic) protocols.</i></p> <ul style="list-style-type: none"> <li><i>Discuss any adjustment to assay data.</i></li> </ul>	<p>Sampling protocols for diamond core sampling and QAQC were documented and held on site by the responsible geologist. No procedures for data storage and management have been compiled as yet.</p> <p>Data were collected in the field by hand and entered into Excel spreadsheet. Data are then compiled with assay results compiled and stored in Access database. Data verification is conducted on data entry including hole depths, sample intervals and sample numbers. Sample numbers from assay data are verified by algorithm in spreadsheet prior to entry into the database.</p> <p>Assay data was received in digital format from the laboratory and merged with the sampling data into an Excel spreadsheet format for QAQC analysis and review against field data. Once finalised and validated data is stored in a protected Access database.</p> <p>Data validation of assay data and sampling data have been conducted to ensure data entry is correct.</p> <p>All assay data is received from the laboratory in element form is unadjusted for data entry.</p> <p>Conversion of elemental analysis (REE) to stoichiometric oxide (REO) was undertaken by spreadsheet using defined conversion factors.(Source: <a href="https://www.jcu.edu.au/advanced-analytical-centre/services-and-resources/resources-and-extras/element-to-stoichiometric-oxide-conversion-factors">https://www.jcu.edu.au/advanced-analytical-centre/services-and-resources/resources-and-extras/element-to-stoichiometric-oxide-conversion-factors</a> )</p> <table border="1" data-bbox="1294 1023 1948 1347"> <thead> <tr> <th>Element ppm</th> <th>Conversion Factor</th> <th>Oxide Form</th> </tr> </thead> <tbody> <tr> <td>Ce</td> <td>1.2284</td> <td>CeO<sub>2</sub></td> </tr> <tr> <td>Dy</td> <td>1.1477</td> <td>Dy<sub>2</sub>O<sub>3</sub></td> </tr> <tr> <td>Er</td> <td>1.1435</td> <td>Er<sub>2</sub>O<sub>3</sub></td> </tr> <tr> <td>Eu</td> <td>1.1579</td> <td>Eu<sub>2</sub>O<sub>3</sub></td> </tr> <tr> <td>Gd</td> <td>1.1526</td> <td>Gd<sub>2</sub>O<sub>3</sub></td> </tr> <tr> <td>Ho</td> <td>1.1455</td> <td>Ho<sub>2</sub>O<sub>3</sub></td> </tr> <tr> <td>La</td> <td>1.1728</td> <td>La<sub>2</sub>O<sub>3</sub></td> </tr> <tr> <td>Lu</td> <td>1.1371</td> <td>Lu<sub>2</sub>O<sub>3</sub></td> </tr> </tbody> </table>	Element ppm	Conversion Factor	Oxide Form	Ce	1.2284	CeO <sub>2</sub>	Dy	1.1477	Dy <sub>2</sub> O <sub>3</sub>	Er	1.1435	Er <sub>2</sub> O <sub>3</sub>	Eu	1.1579	Eu <sub>2</sub> O <sub>3</sub>	Gd	1.1526	Gd <sub>2</sub> O <sub>3</sub>	Ho	1.1455	Ho <sub>2</sub> O <sub>3</sub>	La	1.1728	La <sub>2</sub> O <sub>3</sub>	Lu	1.1371	Lu <sub>2</sub> O <sub>3</sub>
Element ppm	Conversion Factor	Oxide Form																											
Ce	1.2284	CeO <sub>2</sub>																											
Dy	1.1477	Dy <sub>2</sub> O <sub>3</sub>																											
Er	1.1435	Er <sub>2</sub> O <sub>3</sub>																											
Eu	1.1579	Eu <sub>2</sub> O <sub>3</sub>																											
Gd	1.1526	Gd <sub>2</sub> O <sub>3</sub>																											
Ho	1.1455	Ho <sub>2</sub> O <sub>3</sub>																											
La	1.1728	La <sub>2</sub> O <sub>3</sub>																											
Lu	1.1371	Lu <sub>2</sub> O <sub>3</sub>																											

Nd	1.1664	Nd <sub>2</sub> O <sub>3</sub>
Pr	1.2082	Pr <sub>6</sub> O <sub>11</sub>
Sm	1.1596	Sm <sub>2</sub> O <sub>3</sub>
Tb	1.1762	Tb <sub>4</sub> O <sub>7</sub>
Tm	1.1421	Tm <sub>2</sub> O <sub>3</sub>
Y	1.2699	Y <sub>2</sub> O <sub>3</sub>
Yb	1.1387	Yb <sub>2</sub> O <sub>3</sub>
Sc	1.5338	Sc <sub>2</sub> O <sub>3</sub>

Rare earth oxide is the industry accepted form for reporting rare earths. The following calculations are used for compiling REO into their reporting and evaluation groups:

Note that Y<sub>2</sub>O<sub>3</sub> is included in the TREO, HREO and CREO calculation.

TREO (Total Rare Earth Oxide) = La<sub>2</sub>O<sub>3</sub> + CeO<sub>2</sub> + Pr<sub>6</sub>O<sub>11</sub> + Nd<sub>2</sub>O<sub>3</sub> + Sm<sub>2</sub>O<sub>3</sub> + Eu<sub>2</sub>O<sub>3</sub> + Gd<sub>2</sub>O<sub>3</sub> + Tb<sub>4</sub>O<sub>7</sub> + Dy<sub>2</sub>O<sub>3</sub> + Ho<sub>2</sub>O<sub>3</sub> + Er<sub>2</sub>O<sub>3</sub> + Tm<sub>2</sub>O<sub>3</sub> + Yb<sub>2</sub>O<sub>3</sub> + Y<sub>2</sub>O<sub>3</sub> + Lu<sub>2</sub>O<sub>3</sub>.

HREO (Heavy Rare Earth Oxide) = Sm<sub>2</sub>O<sub>3</sub> + Eu<sub>2</sub>O<sub>3</sub> + Gd<sub>2</sub>O<sub>3</sub> + Tb<sub>4</sub>O<sub>7</sub> + Dy<sub>2</sub>O<sub>3</sub> + Ho<sub>2</sub>O<sub>3</sub> + Er<sub>2</sub>O<sub>3</sub> + Tm<sub>2</sub>O<sub>3</sub> + Yb<sub>2</sub>O<sub>3</sub>, + Y<sub>2</sub>O<sub>3</sub> + Lu<sub>2</sub>O<sub>3</sub>

CREO (Critical Rare Earth Oxide) = Nd<sub>2</sub>O<sub>3</sub> + Eu<sub>2</sub>O<sub>3</sub> + Tb<sub>4</sub>O<sub>7</sub> + Dy<sub>2</sub>O<sub>3</sub> + Y<sub>2</sub>O<sub>3</sub>

(From U.S. Department of Energy, Critical Materials Strategy, December 2011)

LREO (Light Rare Earth Oxide) = La<sub>2</sub>O<sub>3</sub> + CeO<sub>2</sub> + Pr<sub>6</sub>O<sub>11</sub> + Nd<sub>2</sub>O<sub>3</sub>

NdPr = Nd<sub>2</sub>O<sub>3</sub> + Pr<sub>6</sub>O<sub>11</sub>

HREO% of TREO = HREO/TREO x 100

In elemental form the classifications are:

Note that Y is included in the TREE, HREE and CREE calculation.

TREE: La+Ce+Pr+Nd+Sm+Eu+Gd+Tb+Dy+Ho+Er+Tm+Yb+Lu+Y

HREE: Sm+Eu+Gd+Tb+Dy+Ho+Er+Tm+Yb+Y+Lu

CREE: Nd+Eu+Tb+Dy+Y

Criteria	JORC Code explanation	Commentary
		LREE: La+Ce+Pr+Nd
<b>Location of data points</b>	<ul style="list-style-type: none"> <li>• 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.</li> <li>• Specification of the grid system used.</li> <li>• Quality and adequacy of topographic control.</li> </ul>	<p>Drill hole collar locations for all holes were surveyed by professional surveyors using DGPS. The general accuracy for x,y and z is <math>\pm 0.5\text{m}</math>.</p> <p>Datum WGS84 Zone 36 North was used for location data collection and storage. This is the appropriate datum for the project area. No grid transformations were applied to the data.</p> <p>No downhole surveys were conducted. As all holes were vertical and shallow, the rig setup was checked using a spirit level for horizontal and vertical orientation Any deviation will be insignificant given the short lengths of the holes</p> <p>Detailed topographic data was not sourced or used.</p>
<b>Data spacing and distribution</b>	<ul style="list-style-type: none"> <li>• Data spacing for reporting of Exploration Results.</li> <li>• 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.</li> <li>• Whether sample compositing has been applied.</li> </ul>	<p>Drilling relating to this report was conducted on a nominal 200m x 200m grid spacing.</p> <p>Resource estimates have been made on the deposit and announce to the ASX and detail on classification and drill quality and spacing are made in the Table 1 related to the corresponding resource announcements.</p>
<b>Orientation of data in relation to geological structure</b>	<ul style="list-style-type: none"> <li>• Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.</li> <li>• 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.</li> </ul>	<p>The Makuutu mineralisation is interpreted to be in a flat lying weathered profile including cover soil, lateritic caprock, clays transitioning to saprolite and saprock. Below the saprock are fresh shales, siltstones and mudstones. Pit mapping and diamond drilling indicate the mineralised regolith to be generally horizontal</p> <p>All drill holes are vertical which is appropriate for horizontal bedding and regolith profile.</p>
<b>Sample security</b>	<ul style="list-style-type: none"> <li>• The measures taken to ensure sample security.</li> </ul>	<p>After collection, the samples were transported by Company representatives to Entebbe airport and dispatched via airfreight to Perth Australia. Samples were received by Australian customs authorities in Perth within 48 hours of dispatch and were still contained in the sealed shipment bags.</p> <p>Samples were subsequently transported from Australian customs to ALS Perth via road freight and inspected on arrival by a Company representative.</p>

Criteria	JORC Code explanation	Commentary
<b>Audits or reviews</b>	<ul style="list-style-type: none"> <li>The results of any audits or reviews of sampling techniques and data.</li> </ul>	No audits or reviews have been undertaken

## Section 2 Reporting of Exploration Results

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

Criteria	JORC Code explanation	Commentary
<b>Mineral tenement and land tenure status</b>	<ul style="list-style-type: none"> <li>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.</li> <li>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.</li> </ul>	<p>The Makuutu Project is located in the Republic of Uganda. The mineral tenements comprise two (3) granted Retention Licences (RL1693, RL00007 and RL00234), three (3) Exploration Licences (EL00147, EL00148 and EL00257 )</p> <p>All granted licences are in good standing with no known impediments.</p> <p>The Makuutu Rare Earths Project is 100% owned by Rwenzori Rare Metals Limited (“RRM”), a Ugandan registered company. IonicRE currently has earned a 51% shareholding in RRM and may increase its shareholding to 60% by meeting further commitments as follows:</p> <ol style="list-style-type: none"> <li>1. IonicRE to fund to completion of a Bankable Feasibility Study (BFS) to earn an additional 9% interest for a cumulative 60% interest in RRM.</li> <li>2. Milestone payments, payable in cash or IonicRE shares at the election of the Vendor, as follows: <ol style="list-style-type: none"> <li>a. US\$375,000 on production of 10 kg of mixed rare-earth product from pilot or demonstration plant activities; and</li> <li>b. US\$375,000 on conversion of existing licences to mining licences.</li> </ol> </li> </ol> <p>At any time should IonicRE not continue to invest in the project and project development ceases for at least two months RRM has the right to return the capital sunk by IonicRE and reclaim all interest earned by IonicRE.</p>
<b>Exploration done by other parties</b>	<ul style="list-style-type: none"> <li>Acknowledgment and appraisal of exploration by other parties.</li> </ul>	<p>Previous exploration includes:</p> <p>1980: Country wide airborne geophysical survey identifying uranium anomalies in the Project area.</p>

Criteria	JORC Code explanation	Commentary
		<p>1990s: French BRGM and Ugandan DGSM undertook geochemical and geological survey over South-Eastern Uganda including the Project area. Anomalous Au, Zn, Cu, Sn, Nb and V identified.</p> <p>2006-2009: Country wide high resolution airborne magnetic and radiometric survey identified U anomalism in the Project area.</p> <p>2009: Finland GTK reprocessed radiometric data and refined the Project anomalies.</p> <p>2011: Kweri Ltd undertook field verification of radiometric anomalies including scout sampling of existing community pits. Samples showed an enrichment of REE and Sc.</p> <p>2011: The GTK conducted a ground gravity traverse which indicated a gravity low in the area.</p> <p>2011: Kweri Ltd conducted ground radiometric survey and evaluated historic groundwater borehole logs.</p> <p>2012: Kweri Ltd and Berkley Reef Ltd conducted prospect wide pit excavation and sampling of 48 pits and a ground gravity traverse. Pit samples showed enrichment of REE weathered profile.</p> <p>2012 Kweri Ltd. Sent Five (5) samples to Toronto Aqueous Research Laboratory for REE leach testwork.</p> <p>2016 – 2017: Rwenzori Rare Metals conduct excavation of 11 pits, ground gravity survey, RAB drilling (109 drill holes) and one (1) diamond drill hole.</p> <p>The historic exploration has been conducted to a professional standard and is appropriate for the exploration stage of the prospect.</p>
<b>Geology</b>	<ul style="list-style-type: none"> <li>• <i>Deposit type, geological setting and style of mineralisation.</i></li> </ul>	<p>The Makuutu deposit is interpreted to be an ionic adsorption REE clay-type deposits similar to those in south China, Madagascar and Brazil.</p> <p>The mineralisation is contained within the tropical lateritic weathering profile of a basin filled with sedimentary rocks including shales, mudstones and sandstones potentially derived from the surrounding granitic rocks. These granitic rocks are considered the original source of the REE which were then accumulated in the</p>

Criteria	JORC Code explanation	Commentary
		<p>sediments of the basin as the granites have degraded. These sediments then form the protolith that was subjected to prolonged tropical weathering.</p> <p>The weathering developed a lateritic regolith with a surface indurated hardcap, followed downward by clay rich zones that grade down through saprolite and saprock to unweathered sediments. The thickness of the regolith is between 10 and 20 metres from surface.</p> <p>The REE mineralisation is concentrated in the weathered profile where it has dissolved from its primary mineral form, such as monazite and xenotime, then adsorbed on to fine particles of aluminosilicate clays (e.g. kaolinite, illite, smectite). This adsorbed REE is the target for extraction and production of REO.</p>
<b>Drill hole Information</b>	<ul style="list-style-type: none"> <li>• <i>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:</i> <ul style="list-style-type: none"> <li>○ <i>easting and northing of the drill hole collar</i></li> <li>○ <i>elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar</i></li> <li>○ <i>dip and azimuth of the hole</i></li> <li>○ <i>down hole length and interception depth</i></li> <li>○ <i>hole length.</i></li> </ul> </li> <li>• <i>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.</i></li> </ul>	<p>The material information for drill holes relating to this announcement are contained in Table 3.</p>
<b>Data aggregation methods</b>	<ul style="list-style-type: none"> <li>• <i>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.</i></li> </ul>	<p>A lower cut-off of 200 ppm TREO-CeO<sub>2</sub> was used for data aggregation of significant intervals with a maximum of 2 metres of internal dilution and no top-cuts applied. This lower cut-off is consistent with the marginal cut-off grade estimated and applied in the resource statements on the Makuutu Project</p>

Criteria	JORC Code explanation	Commentary
	<ul style="list-style-type: none"> <li>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.</li> <li>The assumptions used for any reporting of metal equivalent values should be clearly stated.</li> </ul>	<p>Significant intervals were tabulated downhole for reporting. All individual samples were included in length weighted averaging over the entire tabulated range.</p> <p>No metal equivalents values are used.</p>
<b>Relationship between mineralisation widths and intercept lengths</b>	<ul style="list-style-type: none"> <li>These relationships are particularly important in the reporting of Exploration Results.</li> <li>If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.</li> <li>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').</li> </ul>	<p>Down hole lengths are considered true widths.</p> <p>The mineralisation is interpreted to be horizontal, flat lying sediments and weathering profile, with the vertical drilling perpendicular to mineralisation.</p>
<b>Diagrams</b>	<ul style="list-style-type: none"> <li>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.</li> </ul>	<p>Refer to diagrams in body of text.</p>
<b>Balanced reporting</b>	<ul style="list-style-type: none"> <li>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.</li> </ul>	<p>This report contains all drilling results that are consistent with the JORC guidelines. Where data may have been excluded, it is considered not material.</p>
<b>Other substantive exploration data</b>	<ul style="list-style-type: none"> <li>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.</li> </ul>	<p>Metallurgical leach testing was previously conducted on samples derived from exploration pits, RAB drilling, and one 8.5 tonne bulk pit sample.</p> <p>In 2012, 5 pit samples were sent to the Toronto Aqueous Research Laboratory at the University of Toronto for leachability tests</p> <p>In 2017, 2 pit samples were sent to SGS Laboratory Toronto for leachability tests.</p>

Criteria	JORC Code explanation	Commentary
		<p>2017/18, 29 samples were collected from 7 RAB drill holes. 20 of these were consigned to SGS Canada and 4 to Aqueous Process Research (APR) in Ontario Canada. The remaining 5 samples were consigned to Bio Lantanidos in Chile.</p> <p>2018/19, 8.5 tonne bulk sample was consigned to Mintek, South Africa, to evaluate using Resin-in-leach (RIL) technology for the recovery of REE.</p> <p>2019: 118 samples from 31 holes from the 2019 diamond drilling program had preliminary variation testwork conducted TREE-Ce extraction ranged from 3% to 75%.</p> <p>2020: Testing of composite samples with lower extractions from the 2019 variation testing using increasing rates of acid addition and leach time. Significant increases in extractions were achieved.</p> <p>2020: Testing of composited samples from two exploration holes east of the Makuutu Central Zone provided an average extraction of TREE-Ce recovery of 41% @ pH1</p> <p>Testing of samples from the project is ongoing.</p>
<p><b>Further work</b></p>	<ul style="list-style-type: none"> <li>• <i>The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling).</i></li> <li>• <i>Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.</i></li> </ul>	<p>Future work programs are intended to further evaluate the economic opportunity of the project including extraction recovery maximisation, resource definition and estimation on the known areas of mineralisation.</p>