

ANNUAL REPORT ON EXPLORATION TO 31 JANUARY 2021

EXPLORATION LICENCE: 24 / 2015

SINGLE TREE PLAIN – BRIDPORT

Compiled by			
Company:	Integrated Land Management & Planning		
Address:	PO Box 1441 Lindisfarne TAS 7015		
Contact:	Barry Williams	Phone:	0437 394 492

Compiled for	Austrak Quarries Tas 5 Pty Ltd		
Company:	Austrak Quarries Tas 5 Pty Ltd		
Address:	Level 25, 35 Collins Street MELBOURNE Vic 3000		
Contact:	Nicholas Assetta	Phone:	

Date:	11 January 2022		
Coordinate datum:	GDA94		

Issue	Date	Recipient	Organisation
Revision 0	11 January 2022	Nicholas Assetta	Austrak Quarries Tas 5 Pty Ltd
Revision 1			Mineral Resource Tasmania
Revision 2			



1 ABSTRACT:

This report provides an overview of the work carried out by Austrak Quarries Tas 5 Pty Ltd on Exploration Licence 24 / 2015 for the period between issue of the licence, 31 January 2017 and the forthcoming anniversary, 31 January 2022.

1.1 OBJECTIVE

The exploration objective is to confirm the dune system located adjacent to and north of an existing productive mining lease held by the Licensee is similar in origin and physical characteristics.

1.2 METHODOLOGY

Work undertaken to date concentrated on proving the feasibility of accessing the dune systems, ecological studies and direct representative sampling of accessible sand sampling sites.

Sand samples have been bagged and stored at the Licence Holder's facility at Badger Head, until they could be relocated to Victoria for analysis. Particle size distribution and shape analysis was undertaken by a registered laboratory.

Future exploration will incorporate;

- Interpretation of the results for suitability for use as construction sand;
- A LiDAR drone survey over the prospective areas to calculate volumes;
- Compilation of the results of the exploration work in a final report showing suitability or otherwise of the resource for construction sand.

1.3 RESULTS

Composite samples were prepared from each of 12 sites on exposed dune sand expressions across exploration areas sandy Point 1 and Sandy Point 2.

Attachment 1 is a report prepared by a laboratory showing the preliminary results of the laboratory analysis for particle size distribution (PSD) for 6 of the representative samples.

1.4 RECOMMENDATIONS

It is recommended that the interpretation of the laboratory analysis is considered along with the estimated volumes provided by the LiDAR survey to provide a realistic volume of resource available within the prospective areas.

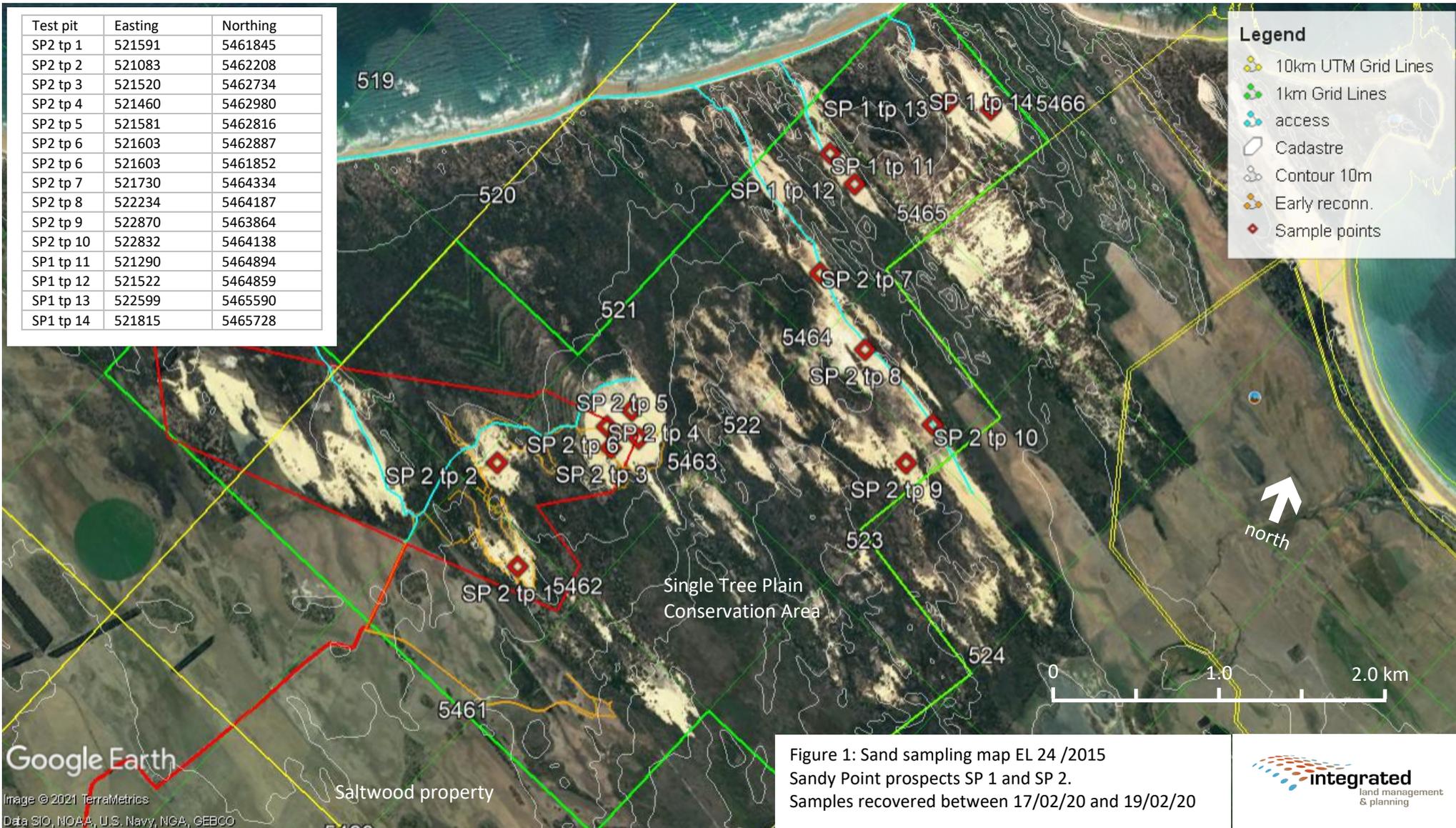
The spatial arrangement of the more prospective volumes of sand should be considered against the feasibility of extracting the product and finding a viable route to market. Land tenure, natural and cultural values, biosecurity and land owner agreements will be taken into consideration in this feasibility study.

TABLE OF CONTENTS

1	Abstract:.....	2
1.1	Objective.....	2
1.2	Methodology.....	2
1.3	Results.....	2
1.4	Recommendations.....	2
	Tables.....	3
	Figure 1 - Sand sampling map.....	4
2	Introduction:.....	5
3	Review of previous work.....	6
3.1	Previous licence.....	6
3.2	During the life of this licence.....	6
4	Exploration work the previous period.....	7
5	Exploration work this period.....	8
6	Discussion of results.....	8
7	Future exploration work.....	8
8	Environmental management.....	9
9	Expenditure.....	9

TABLES

Table 1: Tenement details.....	5
Table 2: Expenditure 2021 period.....	9
Table 3: Expenditure 2022 period.....	10



Contacts:

Conservation Area: Parks & Wildlife Service, mobile: 0427 560 451

Saltwood property: Andrew McCarthy, mobile: 0418 317 060

Access:

Phytophthora cinnimomi management area - Adopt hygiene protocol

South prospect SP 2; north from ML sand recovery area, along fence, wet 30 m, push through low *Acacia longifolia* scrub, track through coastal grass and herb-field.

Use quad to access sampling points if possible, if not set up for helicopter recovery.

Contacts:

Conservation Area: Parks & Wildlife Service, mobile: 0427 560 451

Saltwood property: Andrew McCarthy, mobile: 0418 317 060

Access:

Phytophthora cinnimomi management area - Adopt hygiene protocol

North prospect SP 2 and SP1 south and north; follow track from sand recovery area to beach. Work will occur within shorebird breeding season, keep quadbikes on tideline at low tide.

Use quad to access sampling points if possible, if not set up for helicopter recovery.

2 INTRODUCTION:

TABLE 1: TENEMENT DETAILS

Exploration Licence	24 / 2015
Name	Single Tree Plain
Location	10 km west of Bridport
Reporting period	31/01/2021 to 31/01/2022
Licence holder	Austrak Quarries Tas 5 Pty Ltd; An application to transfer the licence from Kassem Holding Pty Limited has been submitted and confirmation of the current tenement status sought from Mineral Resources Tasmania.

Exploration licence 24 / 2015 covers a total of 11 square kilometre blocks covering obvious surface expressions of aeolian dune sand directly inland from Noland Bay in north eastern Tasmania. The exploration licence was applied for on the 21 November 2015 and granted for a period of five years on 31 January 2017.

The exploration licence area covers land on the perimeter of mining lease number 2015 P/M which is held by Austrak Quarries Tas 5 Pty Ltd. An application to transfer the licence from Kassem Holding Pty Limited has been submitted and confirmation of the current tenement status sought from Mineral Resources Tasmania.

The original licence application area covered private freehold land owned by Clovelly Pty Ltd which was subsequently excised as a result of a request by the landowner.

The mining lease 2015 P/M provides access to aeolian dunes which have migrated onto agricultural land owned and worked by Saltwood Pty. Ltd. The extractive operation conducted on the mining lease extracts and screens the sand threatening to overwhelm productive farmland and sells it into the marketplace as construction sand for concrete and asphalt.

The objective of the exploration work for EL 24 / 2015 is to investigate a similar expression of dune sand adjacent to the Saltwood extractive operation and confirm similar processes were responsible for the dunes and that the sand has similar properties. The sand deposit could then be a source of construction sand for the Tasmanian market and if quantities were proven a potential resource for an export market.

3 REVIEW OF PREVIOUS WORK

3.1 PREVIOUS LICENCE

Work previously undertaken on EL 16/2011 excluded much of the area considered here, concentrating instead on the private freehold portions of the dune field. This investigation assessed the northern portion of the prospective area as unproductive due to the sterilisation of the crown land portion by request from Mineral Resources Tasmania (MRT) and hence necessitating the construction of substantial road infrastructure to cart the sand to market. This work concentrated on the southern portion of the prospective area which was eventually developed as Mining Lease 2015 P/M.

3.2 DURING THE LIFE OF THIS LICENCE

The following is a brief timeline of the submission of work programs for EL 24/2015.

After researching existing literature, the Licensee submitted a work program for approval late in September 2017:

- 13 October 2017, MRT advised that the work program was not approved and an alternative method to access the sampling sites was required before approval would be granted. MRT also advised that a 'Grant of Approval' was required from Parks and Wildlife Service before any vehicles were allowed to access the conservation areas.
- December 2017, MRT advised approval for sampling activities at a nearby exploration licence EL 7/2016 was contingent on a successful program on EL 24/2015. MRT again requested more information on access techniques to allow sampling without damage to any vegetation.
- 16 February 2018, MRT advised approval for sampling already exists conditional on no damage to any vegetation for the purpose of gaining access to the sampling sites. Information on access was acknowledged but rejected and more detail was requested.
- 14 August 2019, MRT advised that revised work programs had been received and were under consideration.
- 5 September 2019, MRT advised the revised works programs to include limited track work were being considered.
- 30 September 2019, work programs revised to exclude any clearing of vegetation and the collection of the samples by helicopter were submitted.
- 18 October 2019, MRT advised the revised work program for EL 24/2015 would not be approved as the exploration licence annual reports for the for the previous year's work were outstanding.
- 28 January 2020, MRT approved revised work program for EL 24/2015.
- Limited sampling on sites on the existing mining lease on the boundary of the exploration licence area Sandy Point 2.
- Particle size distribution (PSD) analysis on samples taken on boundary of licence.
- Evaluation of PSD tests to determine suitability for sand for concrete.

- Desk top ecological critical constraints assessment for the EL area: - Ecological Consulting Options Tasmania.
- Desk top mapping study to predict the most prospective site for potential future mining lease applications: - Integrated Land Management & Planning.
- Consideration of access routes through private and public land and research of individuals, companies and agencies to contact to negotiate access: - Integrated Land Management & Planning.
- Consideration of prospective sites, proposed bulk sampling locations and access routes for Aboriginal cultural heritage: - Aboriginal Heritage Tasmania.
- Evaluation of desk top mapping for prospectively, ecological assessment, landowner consent to traverse land and preliminary contact with interested parties: - Kassem Holdings Pty. Limited.
- Reconnaissance field survey and ground truthing of proposed access routes and prospective sites: - Integrated Land Management & Planning.

4 EXPLORATION WORK THE PREVIOUS PERIOD

The following exploration work has been undertaken during the 2020 – 21 period:

On-ground field sampling of naked dune sand was undertaken on 17/02/20, 18/02/20 and 19/02/20. The field work was planned in with Mineral Resources Tasmania and Parks and Wildlife Service. Access to the dune system was gained through the Saltwood property with the permission of the landowner Andrew McArthy.

The work program relied on using existing recreational tracks to navigate to each exposed dune. Most of the track originated from the beach which is a designated 4WD right of way. Long distances were involved and to ensure the least damage occurred as a result of the sampling a quad bike was needed. None were available for hire, so a suitable side x side (quad) was hired from a friend of the author.

The quad was cleaned using a high-pressure hot wash with detergent in Bridport before being brought onto the Saltwood property. The quad and all equipment including boots was again cleaned before venturing onto the dunes. The most distant sites were accessed on 18/02 and the sand samples brought back to the Saltwood site.

No connection between the beach and the exposed dunes closest to the Saltwood site could be found. The quad was abandoned and the dunes were accessed on foot. It was not possible to bring the sand samples out on these sites so helicopter pick-up points were set up by placing the samples on the corners of a high visibility tarpaulin.

All equipment including the quad, boots, auger etc were cleaned with 'Phytoclean' before leaving the Saltwood property. The samples that were recovered were delivered to a drop off point at the Dilston MLA entrance. Each sample was double bagged with identifying tags and also marked on the bag. Samples were composites of 4 holes between 12 and 18 kgs. A report of the sampling work is included as Attachment 1.

5 EXPLORATION WORK THIS PERIOD

The results of the sand sampling undertaken previously on EL 24_2015 were encouraging enough for the license holder to apply for 2 mining leases within the broader EL area. These mining lease application areas have not been formally received and do not show on the Mineral Resources Tasmania database mapping.

An ecological assessment of the Sandy Point prospective area was conducted during this period. The field work occurred in November 2020 but the final report was not issued until March 2021.

Exploration work during the 2022 – 2023 period will entail:

- Interpretation of the laboratory analysis of the sand samples taken from the Sandy Point 1 and Sandy Point 2 sites.
- A LiDAR survey of the prospective areas of the exploration licence tenement.
- A feasibility study on potential extraction areas and access routes to exploit the sand taking into account land tenure, natural and cultural values, biosecurity and land owner agreements.
- Production of a final report compiling the information derived from this exploration program and the detailing the proposed arrangement for exploiting the sand resource at Sandy Point.

6 DISCUSSION OF RESULTS

The samples were taken to the Licensees facility at Badger Head in readiness to be taken to a laboratory for analysis. Once travel restriction between Victoria and Tasmania eased the samples were taken to a Laboratory in Victoria for analysis.

The laboratory analysis of PSD of 6 of the sand samples taken from Sandy Point 1 and 2 have only recently been supplied. There has not been time to interpret these results for this report. Interpretation of these and subsequent results will form part of the exploration work planned for 2022 – 2023.

7 FUTURE EXPLORATION WORK

The following work will take place commencing March – October 2022:

- The analysis of the sand samples from Sandy Point 1 and 2 will be evaluated.
- Full LIDAR survey of the prospective areas and surrounding land to produce accurate terrain models of the dunes systems and calculate the expected volume of the resource at each site.
- Prospective volumes of potential sand resource will be calculated.
- A feasibility study on the introducing extractive operations to the prospective areas and access arrangements will be prepared.

8 ENVIRONMENTAL MANAGEMENT

No on-ground works were undertaken during this period and previous works entailed no ground or vegetation disturbance. There have been no environmental management issues or

9 EXPENDITURE

TABLE 2: EXPENDITURE 2021 PERIOD

	Item	Activity	Amount
1.	Geoscience		
	Geology		0
	Geochemistry	Particle size distribution analysis (2021 period)	1 840
	Geophysics		0
	Remote sensing	Evaluating sites and preparing proposals	0
2.	Drilling & gridding		
	Gridding		0
	Drilling	On-ground exploration work program	0
3.	Land access		
	Land access	Negotiations with McCarthy & planning	1 000
4.	Rehabilitation		
	Works	Back filling holes covering tracks	0
5.	Feasibility studies		
	Site access	Negotiations with MRT, PWS, Council	3 500
	Critical constraints	Ecological assessment and report	6 000
6.	Other		
	Equipment	Phytoclean, cleaning equipment consumables vehicle hire	0
7.	Administration		
			2 500
8.	Total exploration costs (period 2021)		14 840

TABLE 3: EXPENDITURE 2022 PERIOD

	Item	Activity	Amount
1.	Geoscience		
	Geology		0
	Geochemistry	Particle size distribution analysis (40 tests) Evaluation of results and final report	25 760
	Geophysics		0
	Remote sensing	Remote survey including photogrammetry and classified LiDAR processing	12 100
2.	Drilling & gridding		
	Gridding		0
	Drilling		
3.	Land access		
	Land access		
	Ecological assessment		
	Helicopter assist	To recover composite samples from sites with no quad access	0
4.	Rehabilitation		
	Works	No disturbance	0
5.	Feasibility studies		
			8 000
6.	Other		
	Equipment		0
7.	Administration		
			2 800
8.	Total exploration costs (period 2022)		48 660