
Port Stakeholder Working Group Minutes of Meeting

10am-11:30am, Friday 15 April 2016 - Port of Townsville Boardroom

Present	Organisation
David Donohue	Chair (QCCN)
Judy Newman, Ian Ferguson, Clive Berger,	Community Reps
Chris Wake	DEHP
Anne Williams	Glencore
Mark Daniell, Graeme Nielsen, Lucy Ball	South32 - Cannington
Elaine Glen	Sun Metals
Ranee Crosby, Sharon Hoops, Kim Gebers, Melinda Loudon	POTL
Charlie McColl	NQCC
David Wainwright	DSITI
Jade Bailye (for Juliette Sperber)	NSS
Damien Farrington	QLD Health
Melissa McKeown	TCC
Peta Connelly, Sonia Brown	TBSH
Apologies	
Gavin Hammond	TCC
James Hobbs	Community Rep
David Wainwright	DSITI
George Lukacs	QNI
Wendy Tubman	NQCC
Juliette Sperber	NSS
David Zammit	Glencore

1. Welcome, Introductions

David Donohue welcomed new regular attendees (Lucy Ball, South32) and noted the apologies and proxies for the meeting.

2. Minutes of previous meeting

Minutes of the March 2016 meeting were adopted.

3. Port Update

- The next community e-newsletter, which currently now has a subscription base of just over 5000, will be distributed this month (April 2016).
- The Port now has more than 5,000 followers on social media and is continuing with its community education series (such as Vessel of the Week).
- Sharon Hoops advised that the Port did not have any information about the liquefaction event on board a vessel carrying nickel ore (as raised in the January PSWG meeting). The ship never came to Townsville waters therefore there is no record of the ship's movements.
- The request for shipping data (by Clive Berger, requested the past two years of shipping movements) was addressed by POTL. Rane Crosby explained, as per previous explanations from EHP in PSWG meetings, that the data collected for the the EHP study during 2015 was obtained in a commercial-in-confidence environment. It has previously been acknowledged in PSWG meetings that the data available (prior to the Xact Monitoring coming online in December 2015) is not extensive enough to provide accurate reporting or information about correlating shipping movements and monitoring readings (previously data was only recorded every 6 days).

Chris Wake from EHP confirmed this statement – “with the historical data that is available it is not possible to correlate data to specific berth activity.”

David Donohue requested that this information be taken onboard and that the PSWG acknowledge that it now has access to reliable, highly detailed, near real-time data, and that from this meeting forward the Working Group will focus on the Xact Data monitoring results and any issues that arise from reports flowing from this data rather than continuing to debate the relative merits of historical reports based on less reliable data.

Charlie McColl suggested that it would be beneficial for the data that is utilised by the PSWG (such as shipping movements and air quality monitoring data) to be presented as one single document. David Donohue requested that POTL identify what level of data on shipping, product and general port activity was available and consider options for presenting this to the PSWG on a regular basis.

ACTION: Sharon Hoops will draft a Data Dashboard for presentation at the next PSWG for review and/or adoption – which will then be published monthly on the Port’s website.

4. EHP - Data Presentation Proposal

- Chris Wake from EHP tabled a draft one page “dashboard” report – proposing that from the May 2016 meeting; the report be circulated in the Agenda (one week prior) and that any queries arising from the data presented in the report be discussed at the meeting. This would enable time savings in the PSWG by allowing the group to review the data prior to the meeting. (See Appendix A)
- The one page report presents 12 month running average TSP and TSP Lead results and running 12 month average dust and lead deposition in air results.
- The monthly Air Quality Bulletins will still be published – however these are usually running about three months behind (ie. December’s report is published in March).
- The data on which the the one page report is based will remain available to PSWG members online, and publication of the report does not limit the amount of discussion or potential for questions from the PSWG.
- The PSWG agreed that the report would be helpful.
- Discussion on possible refinements and inclusions.

ACTION: Chris Wake to add to the one page report an explanation of the variations in x and y axis measures, as well as further explanation as to limit values (if a limit value does not exist, provide explanation as to why).

5. Community Reps vision of PSWG success

- The community reps tabled a document that had been generated following meetings external to the full PSWG. (See Appendix B)
- The PSWG agreed that there was no expectation of zero lead-in-air monitoring results and that determination of appropriate and sustainable performance targets required input from port users, regulators and POTL..
- In light of the proposed EHP and POTL “dashboards” ,the community reps resolved to review the draft materials and review their expectation of “what does success look like” after that meeting.

6. Port user presentations

- Townsville Bulk Storage and Handling (TBSH) presented an overview of their operation as well as the environmental improvement initiatives that have been facilitated over the previous 12 months (Appendix C).
- South32 also presented an overview of their operation and environmental improvement initiatives over the previous 12 months. South32 reminded the group that tours of the facility are welcome. (Appendix D)

7. Regulator Reports (by exception)

- No further data or reports were tabled at the meeting.

8. General Business

- TCC query on cleaning of public facilities – no update was available and the question again taken under notice – added to May 2016 meeting agenda.
- Comprehensive public statement/ report was discussed with David Donohue advising that discussions with Queensland Health had significantly advanced understanding of the links between environmental lead and lead in blood.
 - David Donohue tabled the draft statement from Queensland Health which explains their expectation of safe levels of lead in air. (Appendix E).
 - Discussion led by Damien Farrington on some of the wording with a view to adding clarity.

ACTION: The PSWG resolved to review the statement after a round of revision with a view to publishing the statement as part of the Data Dashboard following the May 2016 meeting.

- Other
 - Charlie McColl asked if it would be possible for some surface testing to be carried out by one of the regulators?

ACTION: David Donohue to forward this question to Gavin Hammond (TCC) for a response at the next PSWG.

- Judy Newman asked if a new site for the North Ward monitor had been located as yet?

ACTION: Chris Wake to provide an update on site selection at May 2016 meeting.

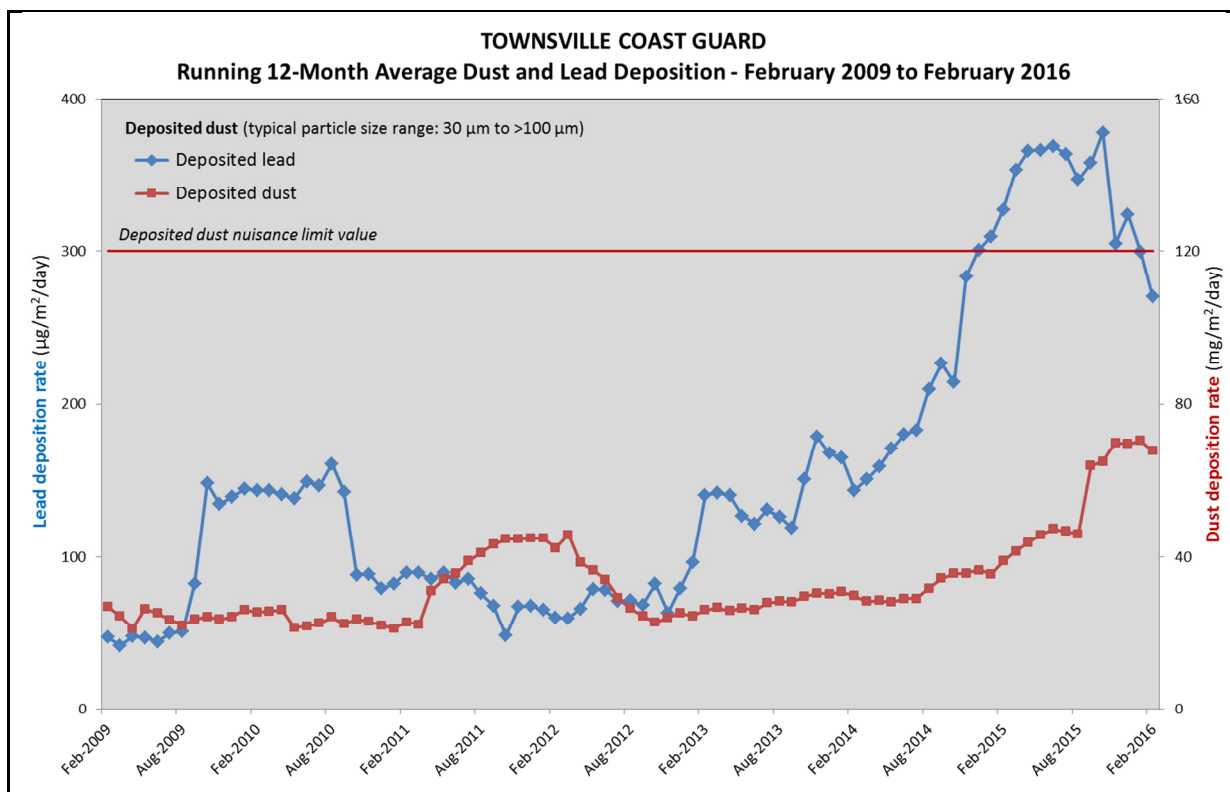
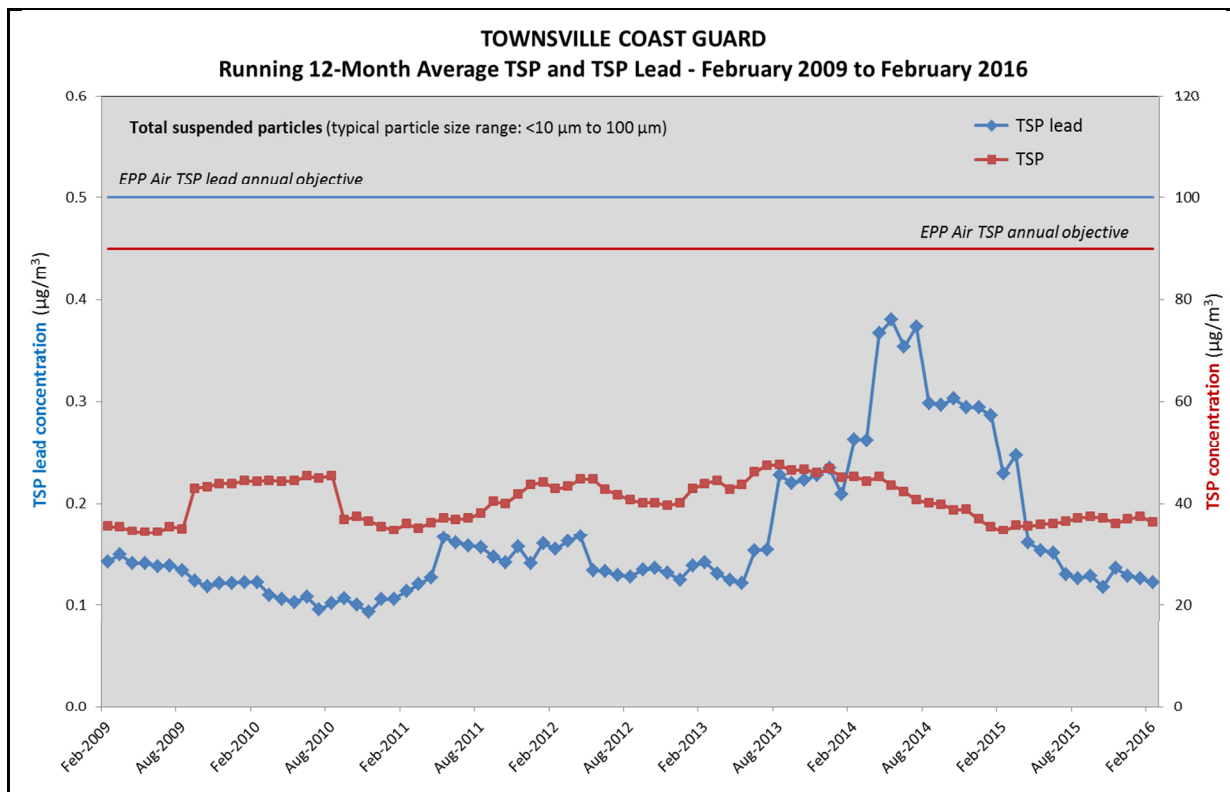
9. Meeting Close

Next meeting to be held Friday 27 May at 10am in the **Engineering Meeting Room** at the Port.

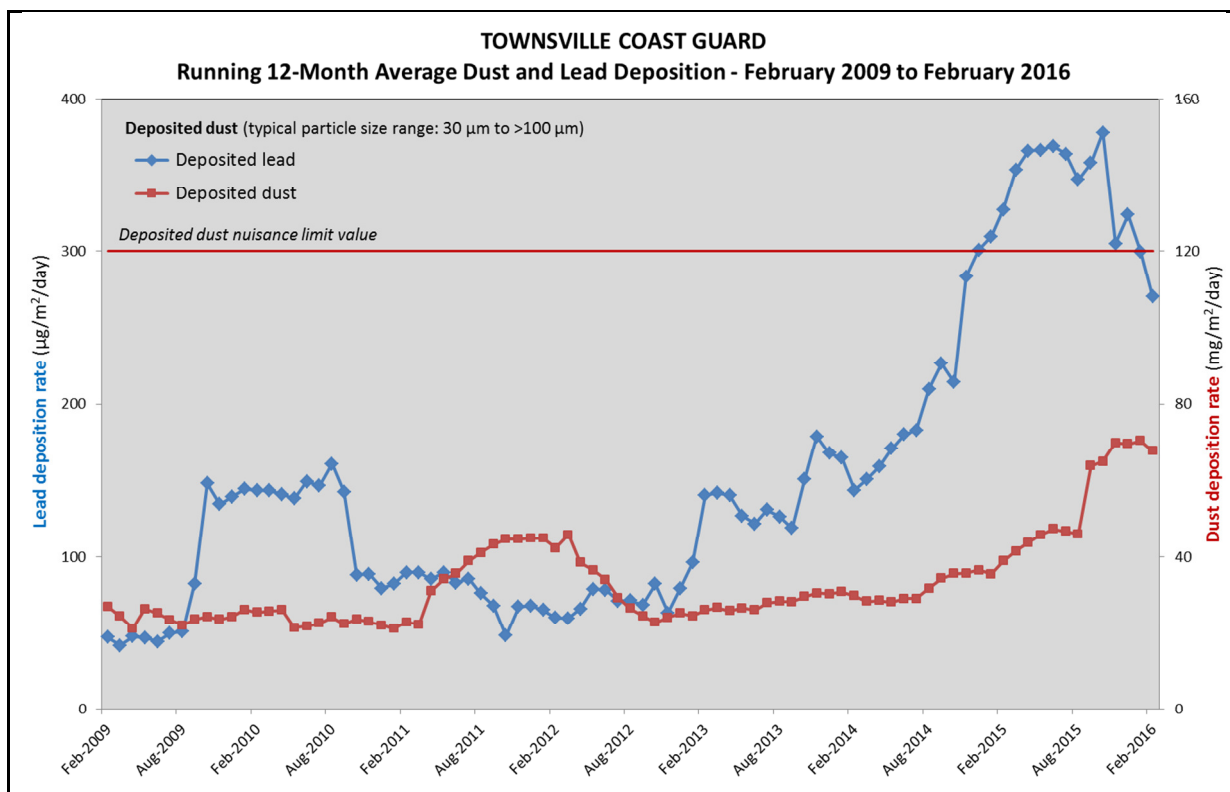
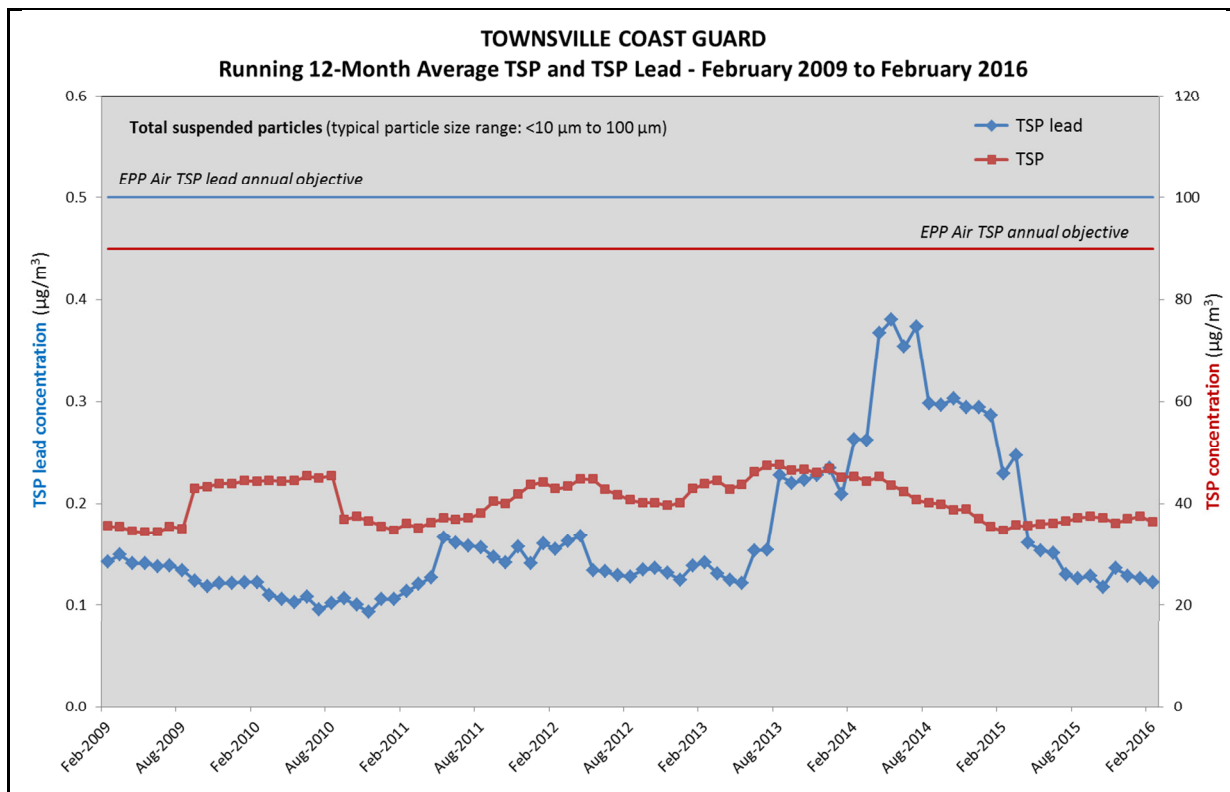
David Donohue, Chair

Date

Townsville Coast Guard Station	Lead in TSP ($\mu\text{g}/\text{m}^3$)	Lead in Dust Deposition ($\mu\text{g}/\text{m}^2/\text{day}$)
Latest monthly value	0.03	112
Running 12 month average	0.12	270
% Lead in TSP / Deposited Dust	0.32%	0.40%



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PSWG Presentation

April 2016

Stockpile locations

All stockpiles associated with TBSH operations at the Port are now located at our Archer Street location.

50,000m² fenced site including a total of 12,000m² fully enclosed warehouse, hard stand area and quarantine approved wash bay.

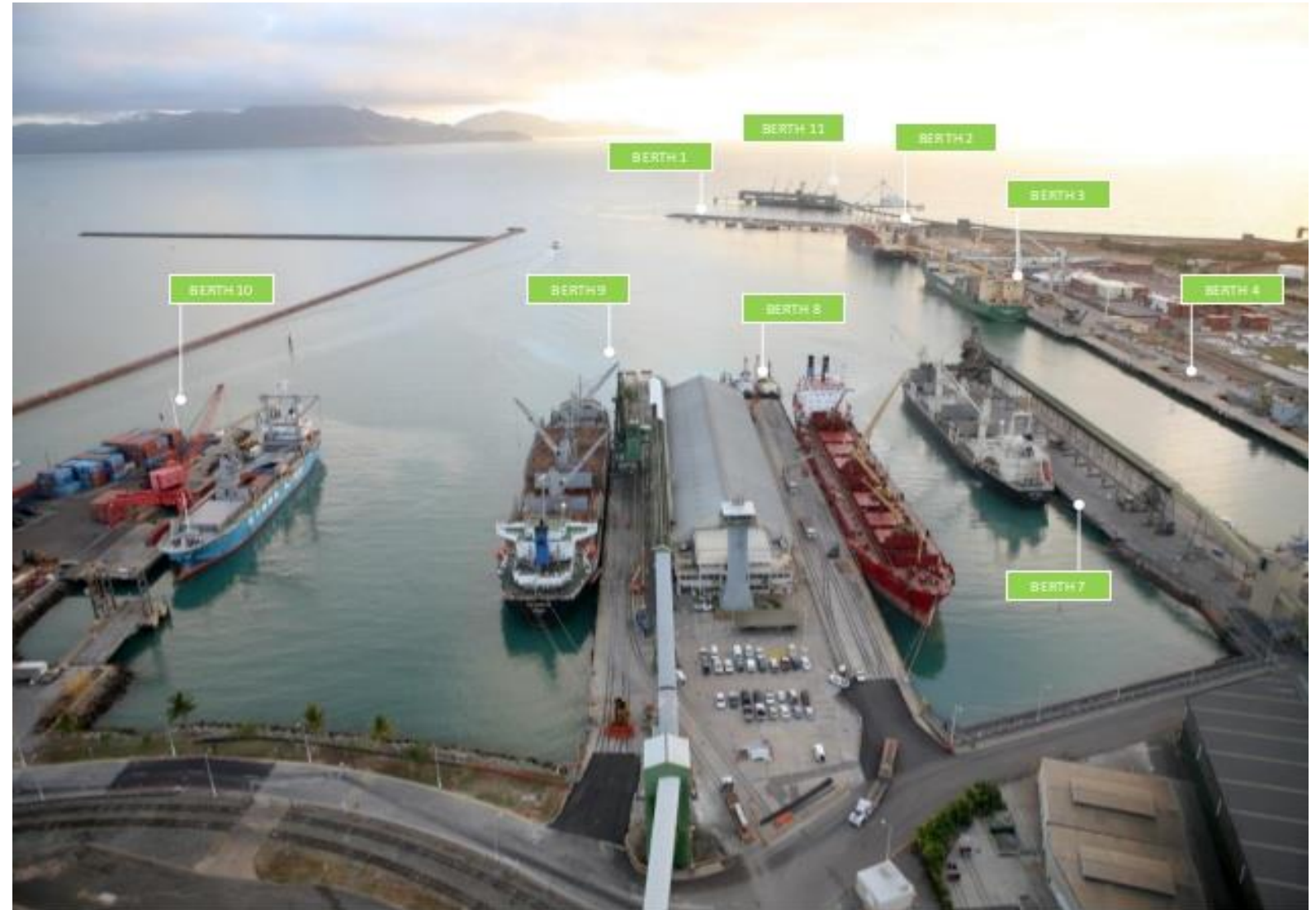


Operational Locations

TBSH currently operates at common user berths 4, 8, 9 and 10

Commodities include:

Copper, lead and zinc concentrate;
Fertiliser; Containers;
Bulka bags; Specialised project cargo; and
Vehicles/ Heavy Equipment.



Operations update

- 1 July 2015 to 15 April 2016 – Total of 20 days of concentrate stevedored at the Port.
- No exceedances of air quality limits recorded at Coastguard during these loading events.
- TBSH dust controls (rotainer sprinklers, mist curtains on hatch) are considered to effectively mitigate dust emissions.
- TBSH measured annual average lead level as at October 2015 of $0.04\mu\text{g}/\text{m}^3$
- TBSH measured annual average Total Suspended Particulates (TSP) $4.5\mu\text{g}/\text{m}^3$.
- Revised air quality monitoring program to include additional PM_{10} and TSP monitor at two (2) near field locations to concurrently monitor lead and zinc loading events.
- Invested in one new PM_{10} and one new TSP High Volume Samplers, total of 4 monitors utilised for near field monitoring of zinc and lead loading events.
- Recruited an in house environmental compliance officer to manage operational compliance, undertake air quality sampling and reporting.
- Working with EHP, POTL and Port Users towards reducing emissions to air when loading vessels
- Investigation of real time air quality monitors with a view to implement as a measure of the effectiveness of dust controls and facilitate quick intervention in the event of unplanned emissions.

Future Continuous Improvement

- Continue to work with POTL, EHP and other Port Users towards improving operations and reducing negative impacts to air quality.
- Further development of our air quality monitoring program to include implementation of real time air quality monitors.
- Timely reporting for environmental compliance including new internal reporting post loading event and review of operations based on air quality data.
- Review of EA conditions with regards to operations



CANNINGTON PORT FACILITY PSWG UPDATE ON IMPROVEMENTS SINCE JUNE 2015

GRAEME NIELSEN, MARK DANIELL
15 APRIL 2016



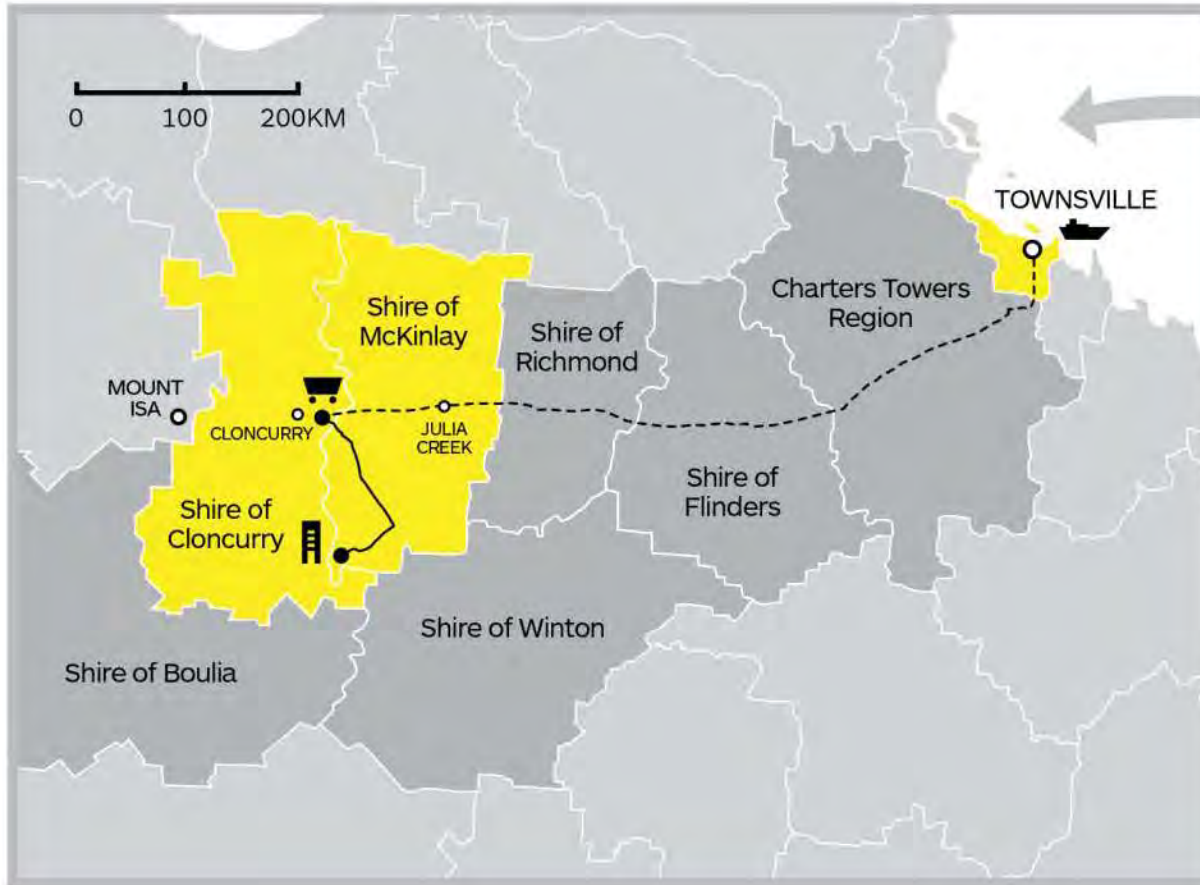
ABOUT CANNINGTON

- Owned and operated by South32;
- Commenced operations 1996;
- The world's lowest cost single mine silver producer;
- Two saleable products:
 - Lead / silver concentrate; and
 - Zinc concentrate.
- Approx 3.4M tonnes p/a ore mined;
- Producing approx 500,000 tonnes of concentrate.
- 97% FIFO, 800 person workforce;
- 70% of employees reside within Townsville region.



Cannington discovery drill hole, 1990

LOCATIONS



Cannington Mine
LAT. S21 53.00, LONG. E140 53.00



Yurbi Rail Loading Facility
LAT. S20 44.02, LONG. E140 38.31



Port of Townsville Facility
LAT. S19 15.00, LONG. E146 50.30

----- Railway line

— Road

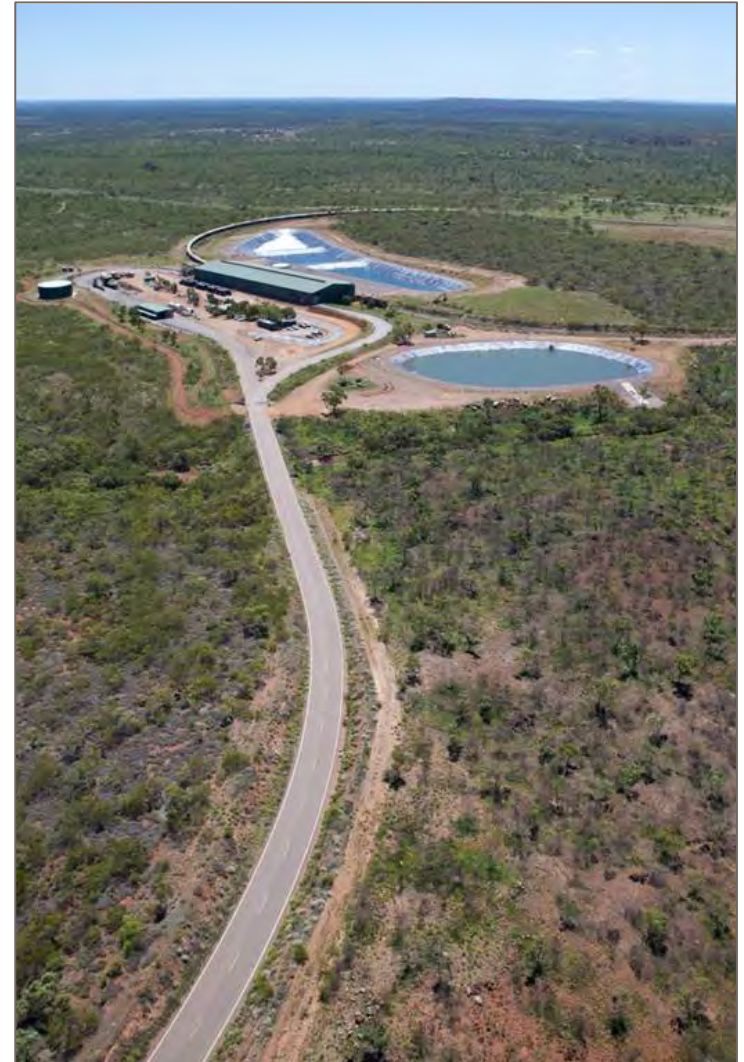
MINE SITE

- Located 80kms south of McKinlay;
- Underground mine;
- Surface processing plant including tailing storage facility;
- Fully serviced accommodation and sporting facilities.
- Flights from Townsville, Cairns, Brisbane.



RAIL LOADING FACILITY

- Located 20kms east of Cloncurry (Yurbi);
- Road transport from mine via road trains with fully enclosed trailers;
- Approx 15 trucks per day (24 hours), operated by Linfox Transport;
- Approx 4 trains per week (enclosed/lidded wagons);
- Rail transport to Port of Townsville or Sun Metals Corporation refinery, Townsville



PORT FACILITY

- Located at the Port of Townsville;
- Unloading trains, storage and ship loading;
- Approx 30 ships loaded per year;
- Lead / silver concentrate exported primarily to Japan, Korea, Europe.
- Purpose built facility for bulk minerals handling.



PRODUCTS

SILVER

(Extracted from lead concentrate)



LEAD

(Concentrate)



ZINC

(Concentrate)



CANNINGTON

- Owner and operator of Berth 11 and landside facility



STORMWATER MANAGEMENT

Prior:

- Traffic areas sealed and drained
- Onsite collection of all water (infrastructure and ground) via contoured drainage;
- Water storage and treatment plants;
- Sampling and external laboratory analysis;
- Able to release if meets release limits.

New or in progress:

- Segregation of water classes
- Use poorest quality water for concentrate moisture control



FUGITIVE EMISSIONS CONTROLS – TRAIN UNLOADING

Prior:

- Increased product moisture from site;
- Covered wagons, lids on/off/on within rotary tipper;
- Localised, high volume dust extraction;
- Enclosed shed.

New or in progress:

- Brush seals to replace flaps at rail doors
- Remove ridge vent
- Upgrade 'air wash' of wagons and lids in shed after unloading and lid back on wagon



FUGITIVE EMISSIONS CONTROLS – CONCENTRATE STORAGE & HANDLING

(Storage shed and conveyors)

Prior:

- Fully enclosed;
- High volume dust extraction and baghouse (shed);
- Dust extraction and baghouse (transfer towers);
- Moisture addition (manual, limited control).

New or in progress:

- Upgraded moisture content determination and water addition to target moisture content in shed (semi-automated, better control)



FUGITIVE EMISSIONS CONTROLS - SHIPLOADING

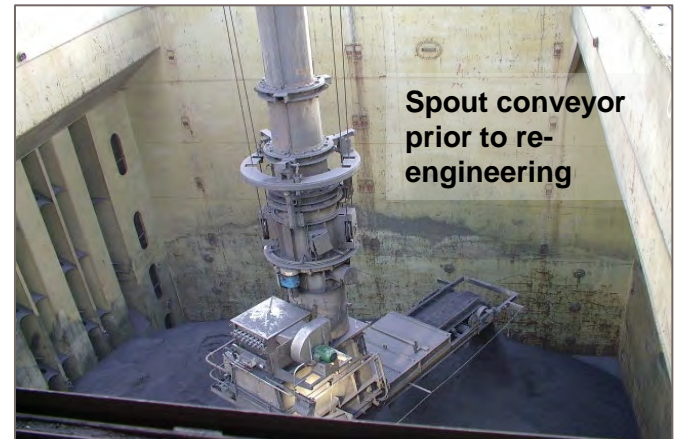
(Berth 11 & Shiploader)

Prior:

- Wharf conveyor and brush seal shutter system;
- Enclosed tail-end and upgraded underpan;
- Post-loading clean-down procedures;
- Storm water capture under parked shiploader;
- Spout conveyor covers;
- Self imposed high wind speed & low moisture content limits;

New or in progress:

- Spout conveyor – re-engineer





Advice to PSWG from Queensland Health on blood lead levels in Townsville

April 2016

Environmental limits for lead are set using a number of possible criteria including potential health effects.

Blood lead level within the Australian population have been decreasing over time as the use of lead – particularly in petrol and paint - has been phased out. The most recent NHMRC guidance document suggests that a blood lead level of less than 5 µg/dL is what should be expected in the general population.

Elevated blood lead levels are notified to Queensland Health for investigation. Previously this level was 10 µg/dL but since the beginning of 2016 has been reduced to 5 µg/dL. This is not an indication of a safe blood level, but is a trigger level that requires investigation into what in the individual's environment is contributing to the level.

Based on studies recognised by the World Health Organisation into the relationship between lengthy exposure to ambient air lead levels and increases in blood lead levels, the current 12 month rolling average for measurements (as at March 2016) at the Townsville Coast Guard Site could be expected to add between 0.36 µg/dL and 0.6 µg/dL to a person's total blood lead level. This increment is only about 10% of the level that would require further investigation. Along with other normal exposure, this would not be expected to exceed that level, is well within the expected community range, and below the level that would trigger further investigation.

The highest rolling annual average in recent years (recorded in May 2014 at the Townsville Coast Guard Site) yields a predicted result of between 1.14 µg/dL and 1.9 µg/dL, still well under the level which should trigger concern.