



## Hera Mine Community Consultative Committee Minutes

The meeting was held on 7 November 2019 at the Hera Mine Village, Burthong Road, Nymagee.

Meeting commenced at 11am following a site inspection.

### **Present at the Meeting:**

Garry West (Independent Chair)

Des (David) Hill (Community Representative)

Jo Bates (Community Representative)

Phil Harley (Community Representative)

Cr. Peter Maxwell (Cobar Shire Council Representative)

Don Cameron (Community Representative)

Dolly Betts (Community Representative)

Jonathon Thompson (Aurelia Metals Ltd, Representative, Group Manager, Environment)

Scott Ramsay (Aurelia Metals Ltd, Representative, General Manager, Hera Mine Project)

Liam Richards (Aurelia Metals Ltd, Representative, Environment and Social Responsibility Advisor, Here Mine Project)

### **1. Apologies**

Graeme Bourke (Bogan Shire Council Representative)

### **2. Pecuniary and other interests**

No new Declarations

### **3. Confirmation of Minutes**

Minutes from the CCC meeting of 1 August 2019 had been distributed via email and were accepted as a correct record following a correction to delete the recorded attendance of Jo Bates.

### **4. Business Arising from Previous Meeting**

Draft Cobar Shire VPA – agreement in principle; Aurelia to draft new version for review and exhibition by Cobar Shire Council. General discussion.

Draft Bogan Shire VPA – clarification re truck movements. Currently on exhibition by Bogan Shire Council.

### **5. Correspondence**

Ken Holmes, Lead Auditor (Barnett & May) re Independent Environmental Audit of the Hera Mine being conducted in accordance with the Conditions of Approval. Chair to respond on behalf of the CCC.

### **6. Company Report**

A presentation was provided detailing the environmental performance of the Hera Mine operations. (A copy will accompany the final minutes and be placed on the company website);

There were 3 recordable injuries in August. They were all low severity, all underground, but not systemic. The Total Recordable Injury Frequency Rate for Aurelia employees continues to trend down.

The Mod 5 Statement of Environmental Effects (SoEE) is waiting VPA agreements with Cobar and Bogan Shire Councils before the Department of Planning, Industry and Environment can further assess the application.

During the site inspection, the committee observed the new liner that has been installed at the process water settling ponds.

A number of contingencies are occurring to ensure water supply for the continued operations of the mine. Details are available in the presentation. The application to pump water from the old Nymagee workings is outstanding and could become critical as the drought continues.

Liam & Jonathon gave an overview of the environmental performance.

Blast vibrations have been well below the limit for all periods over the last quarter.

Elevated dust levels continue as a result of the ongoing drought.

Tailings Storage Facility and Process Water Dam Discharges have remained below the approved limits.

Concentrate Truck movements increased in September but remained below the approved limit.

Company representatives provided an overview of the ongoing exploration program and the challenges in the operations over the past 6 months.

The Complaint register details were reported. It was noted that the increase in complaints were the result of an ongoing dispute with a neighbouring landowner and the complaints are being investigated by the EPA. It is hoped this issue will be resolved in the near future.

## **7 Matters which the Community Representatives wish to raise with the Mine Operator**

NIL

## **8 Community Engagement Opportunities**

Community representatives thanked Aurelia Metals for their ongoing support of community projects, particularly noting the Flower Show, sporting activities and the upcoming Christmas Party. The attendance of Aurelia representatives at Progress Association meetings is appreciated.

## **9 General Business**

Meeting schedule for 2020 was noted: 5 March 2020; 4 June 2020; 3 August 2020 & 5 November 2020.

## **10 Next Meeting**

5 March 2020 commencing at 10.00am

Meeting Closed: 12.25pm

### **ACTION ITEMS**

NIL



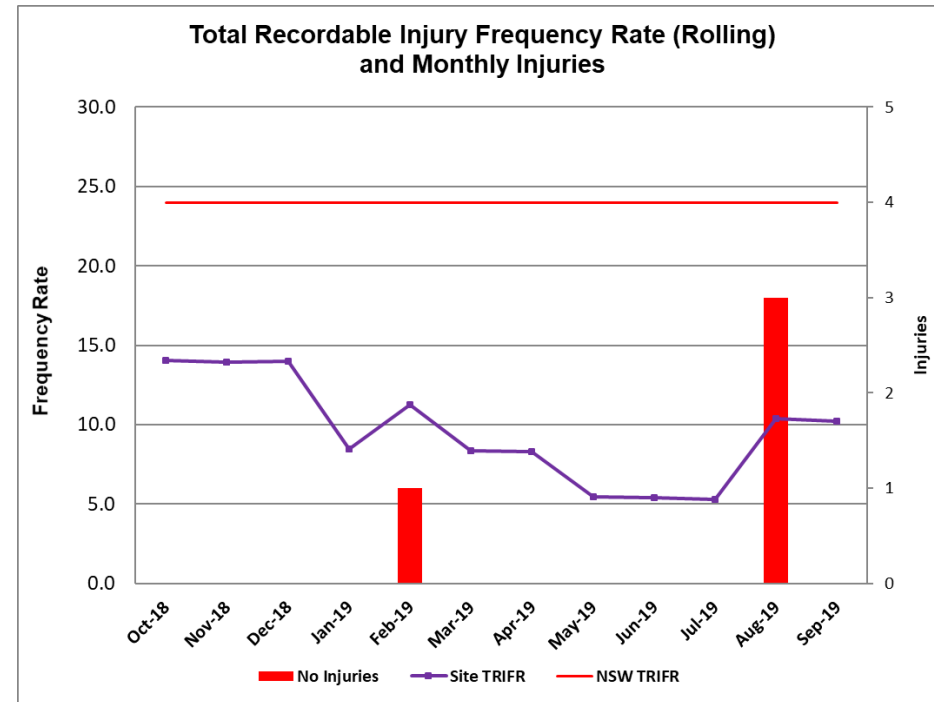
## **HERA PROJECT**

**CCC – November 2019**

# Safety is at the core of our business

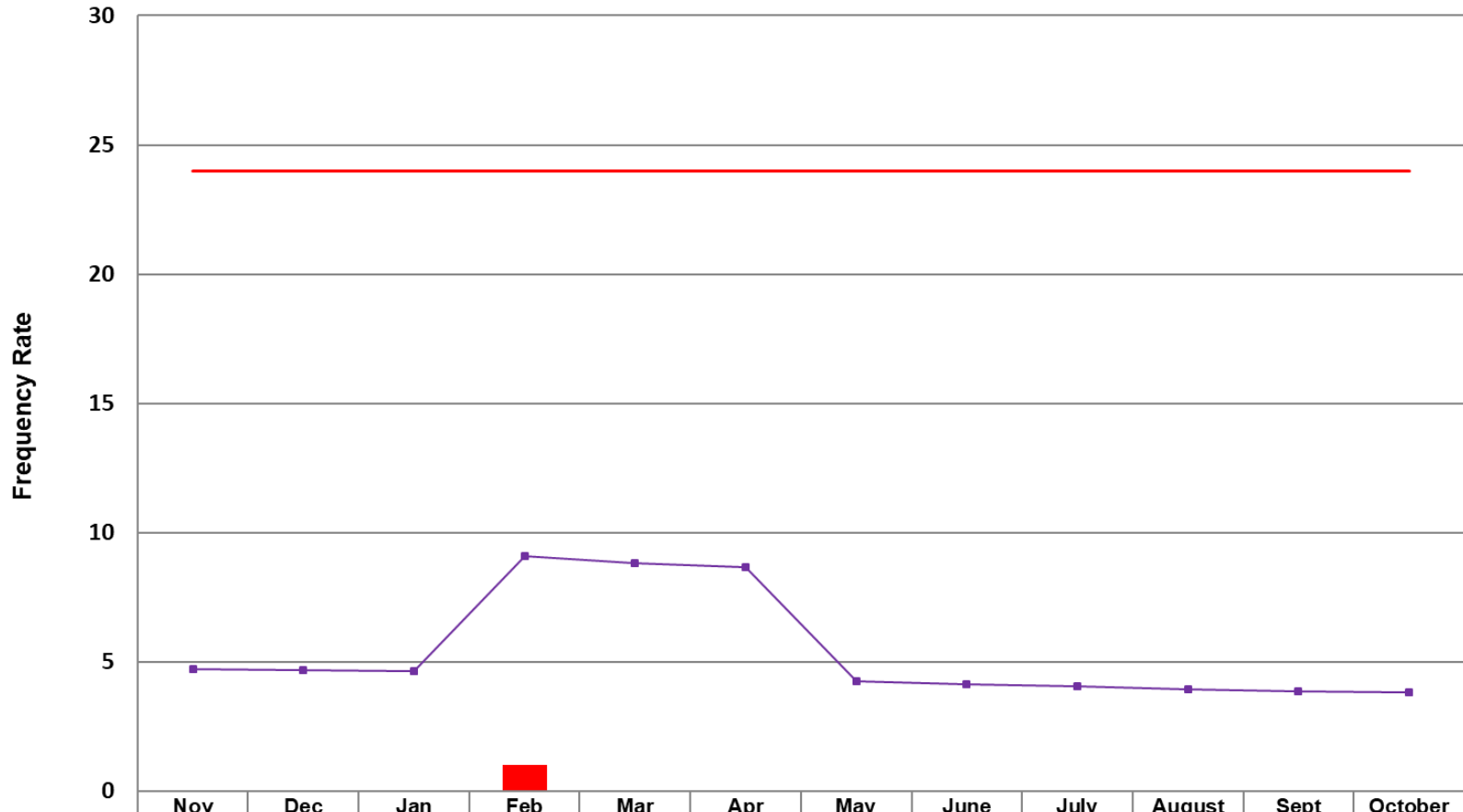
Continual improvement focus

- Although slip in Total Recordable Injury Frequency Rate (TRIFR), safety culture remains strong
- 3 Recordable injuries in August all occurred within 36 hours, all low severity, all underground, but not systematic
- Improved systems to review operational exposure to new state legislated focus area of dust / respirable silica



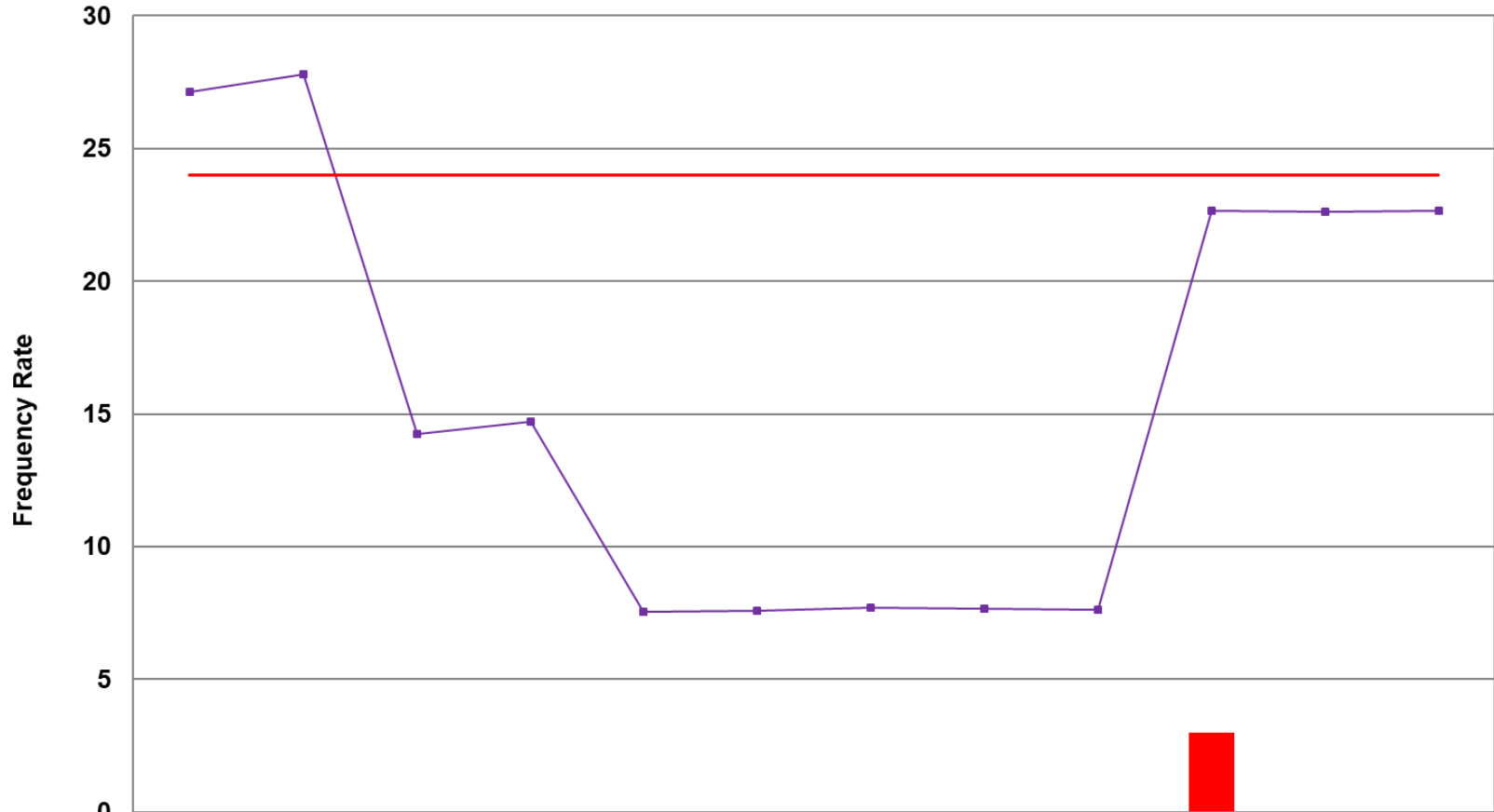


### Total Recordable Injury Frequency Rate (TRIFR) Aurelia



	Nov	Dec	Jan	Feb	Mar	Apr	May	June	July	August	Sept	October
Series2	0	0	0	1	0	0	0	0	0	0	0	0
Series1	4.7	4.7	4.6	9.1	8.8	8.6	4.2	4.1	4.0	4.0	3.9	3.8
Series4	24	24	24	24	24	24	24	24	24	24	24	24
Series3	21341	18785	18316	21989	22687	20842	21050	23692	23336	22787	23738	23650

### Total Recordable Injury Frequency Rate (TRIFR) Pybar



	Nov	Dec	Jan	Feb	Mar	Apr	May	June	July	August	Sept	October
Series2	0	0	0	0	0	0	0	0	0	3	0	0
Series1	27.1	27.8	14.2	14.7	7.6	7.6	7.7	7.7	7.6	22.7	22.6	22.7
Series4	24	24	24	24	24	24	24	24	24	24	24	24
Series3	11607	11048	11099	9871	10099	11383	9917	11484	11922	12562	10490	10944

## Community a critical stakeholder

- Positive and supportive relationship with the Nymagee community (e.g. water provision to mine from surrounding properties)
- Funding contributions to key local projects
- Hermidale Primary School 'Yarning Circle' – near complete
- Support for key local events (eg. Nymagee Flower Show)



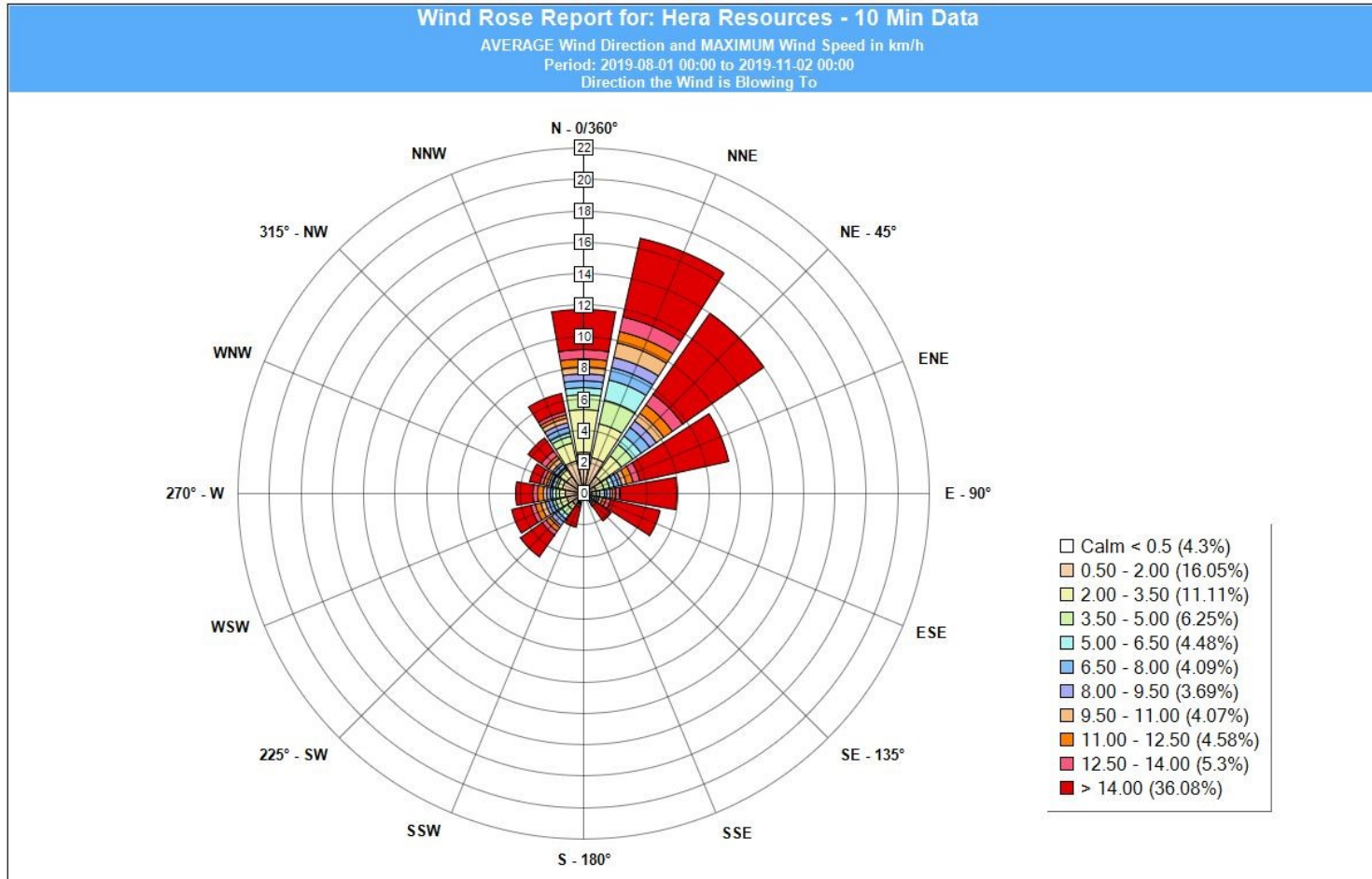
## Ensuring Water Supply – many contingencies

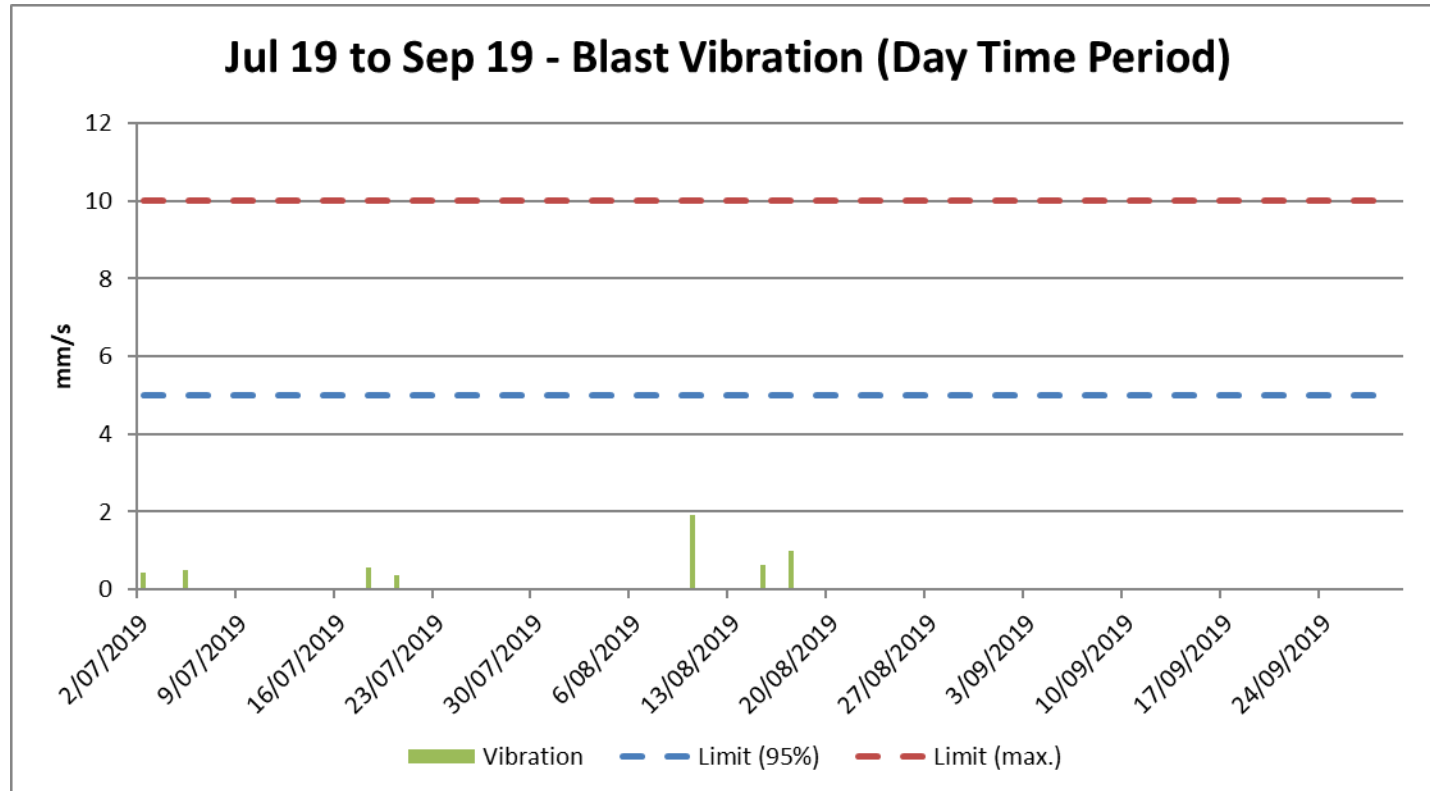
- Accelerating additional water bore testing on mine lease based on recent hydro report
- Installing upgraded pumping infrastructure to increase water from Nymagee mine - rely on permitting approval & water quality improvement system design
- Recycling underground water through onsite clarifier for redistribution across site
- Trucking potable water from Cobar & raw water from surrounding properties to protect/prolong on site bore performance (estimated \$1.8M p.a.)
- Use of molasses for dust suppression to conserve water (in lieu of other polymers or chemicals) – recognised by regulators
- Backup sources available if required from Canbelego (Mt Boppy Mine) and Hillston

### Current Scope of MOD5

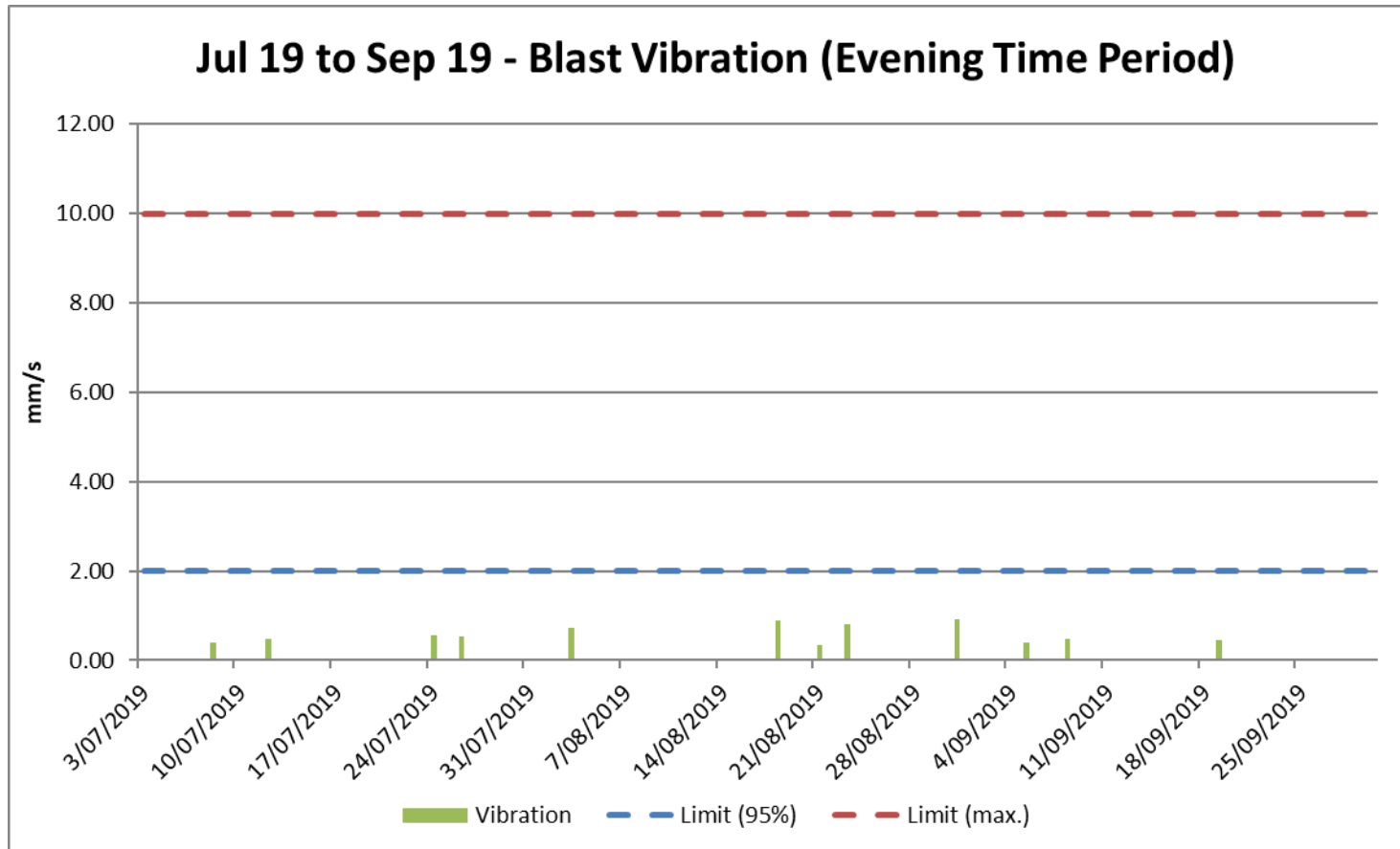
- All reports and information has been assessed and finalised
- VPA discussions between Hera and BSC and CSC have been finalised
- Nothing further has been received from DPIE at this stage. Approval should be through in November



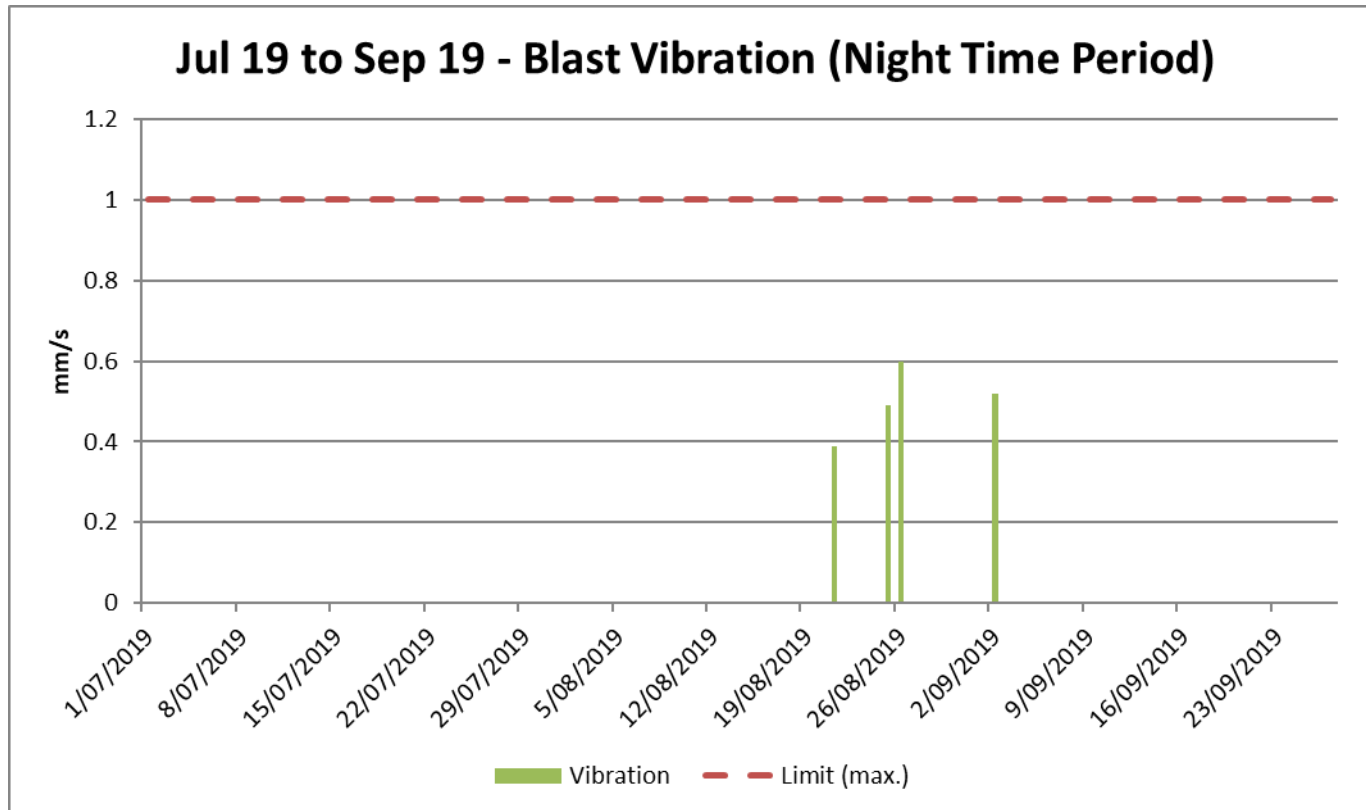




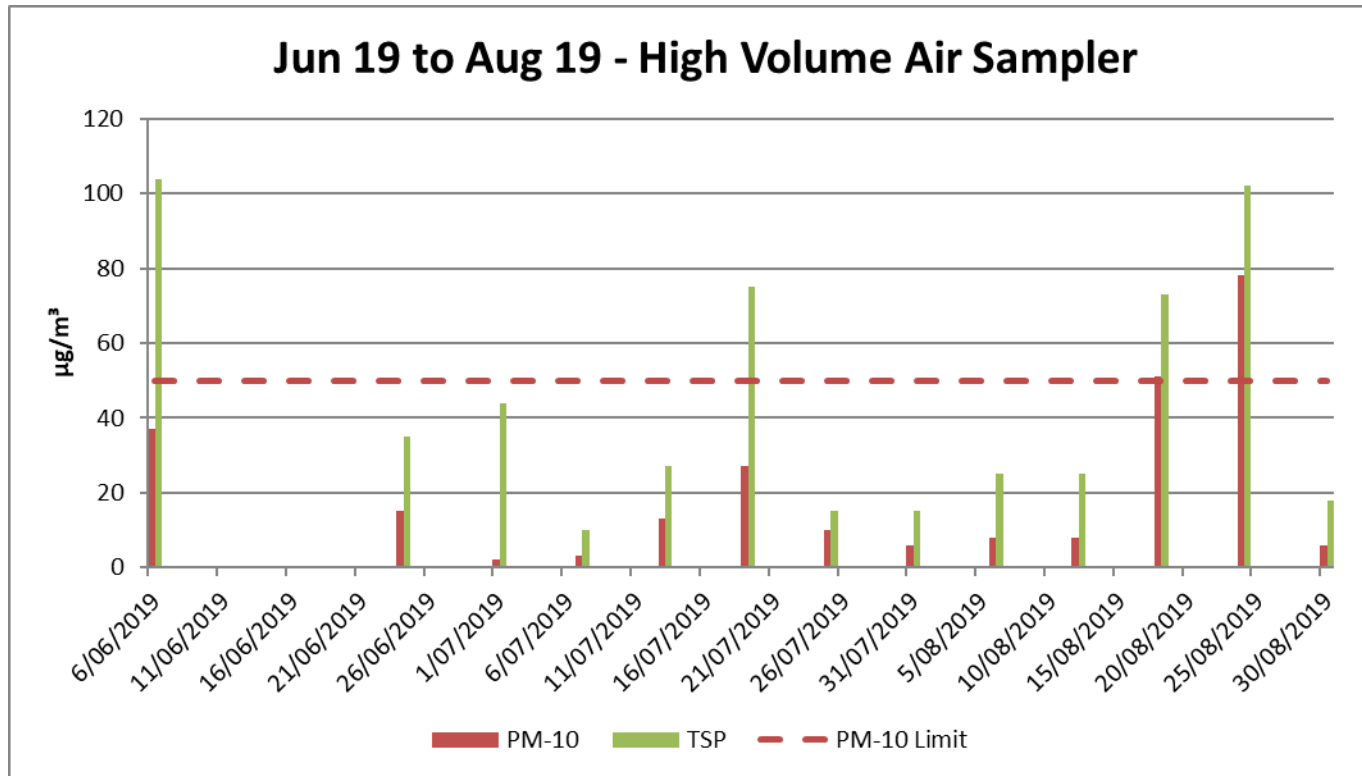
Day time period = 7am to 6pm Monday to Saturday



Evening time period = 6pm to 10pm Monday to Saturday

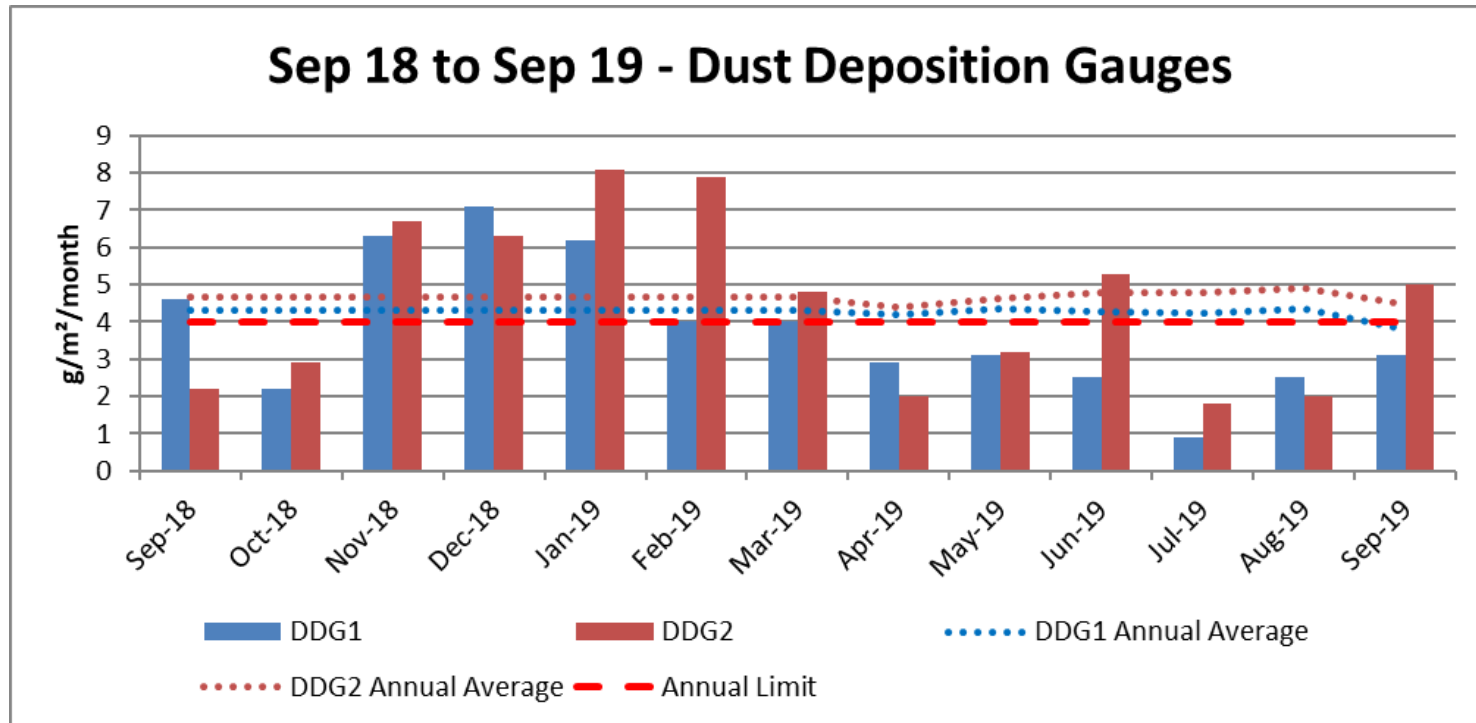


Night time period = 10pm to 7am Monday to Saturday, all day Sunday and Public Holidays

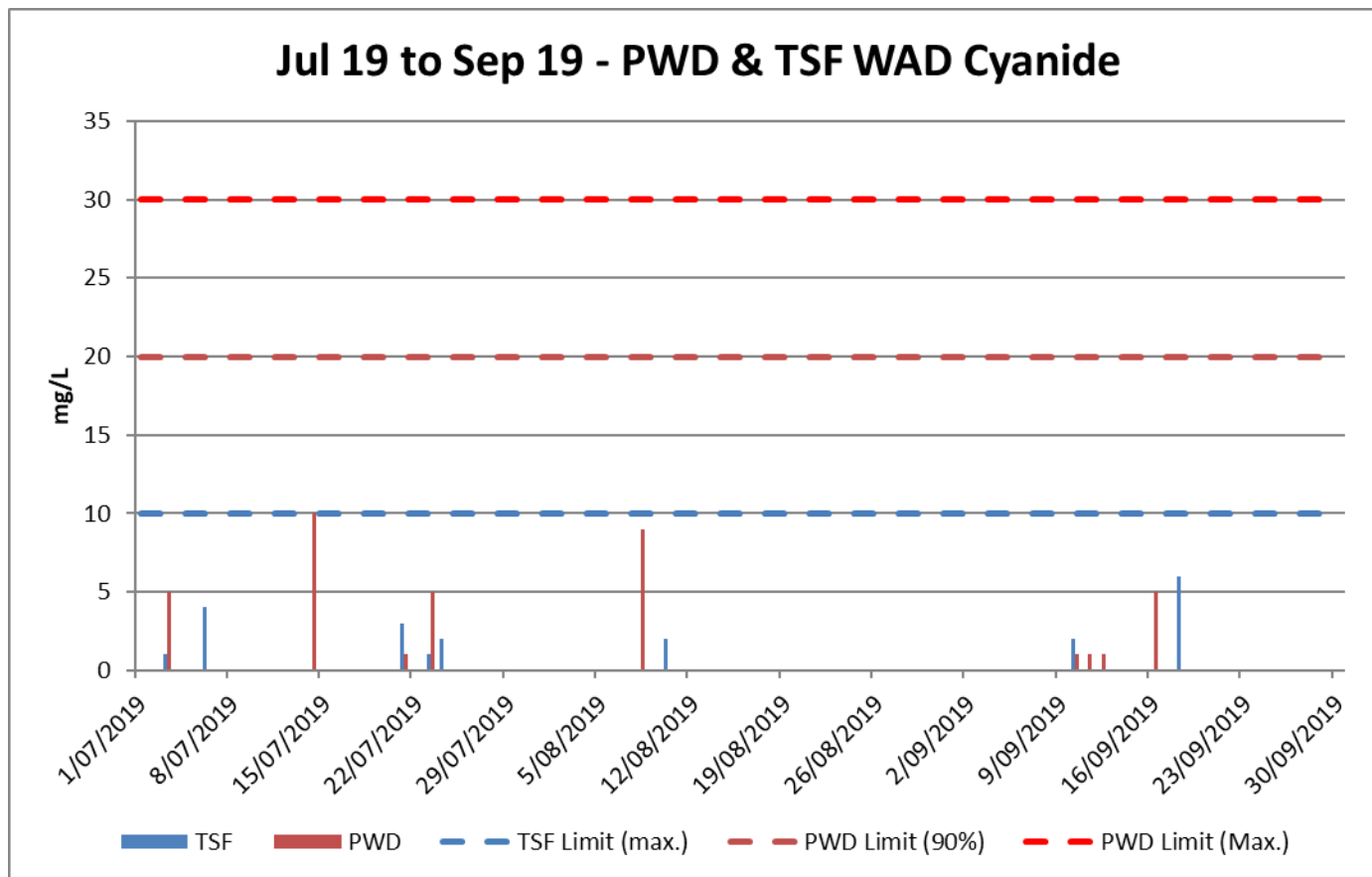


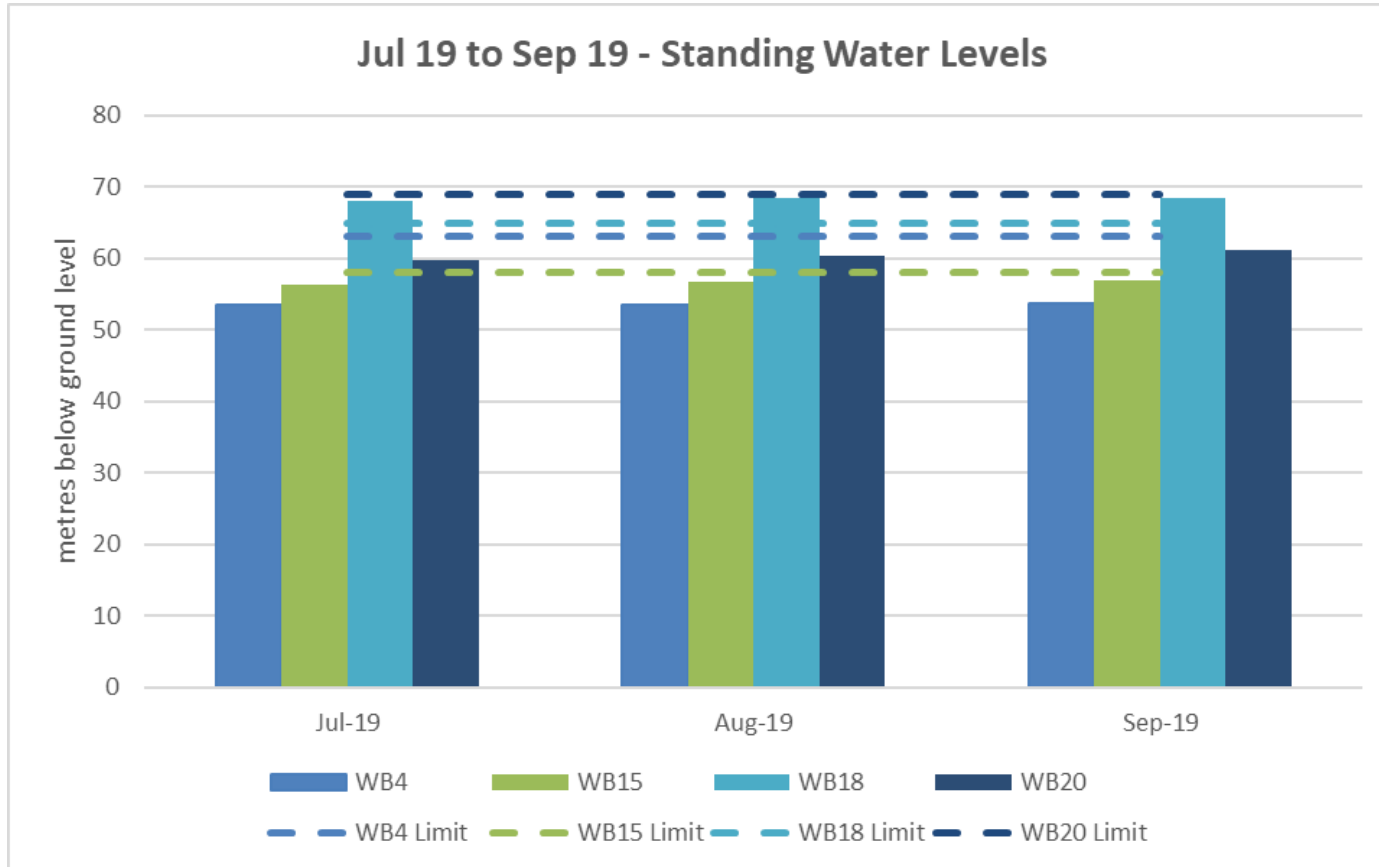
Elevated dust levels continue as a result of the ongoing drought. EPA, Resources Regulator and DPE have been updated on dust status.



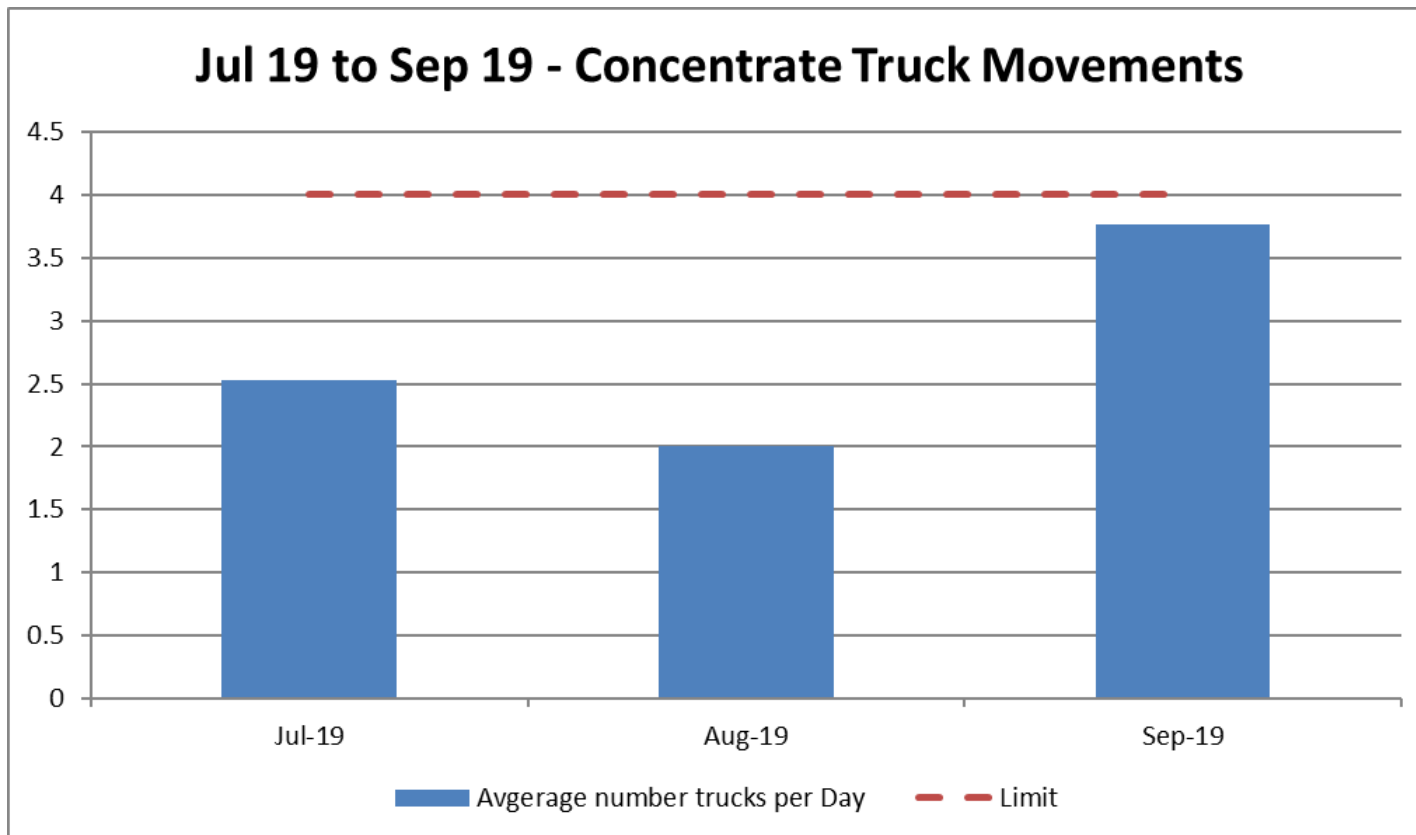


### Tailings Storage Facility and Process Water Dam Discharges



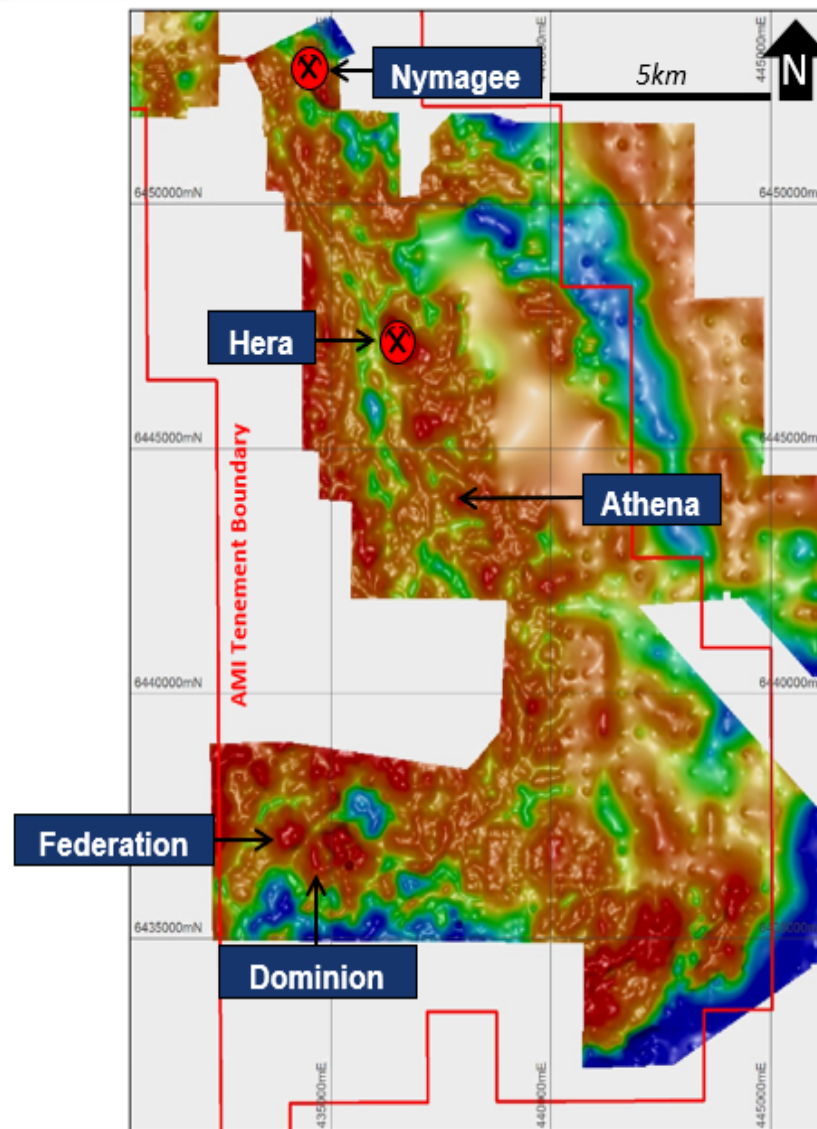


### Concentrate Truck Movements



## Extending Hera's mine life

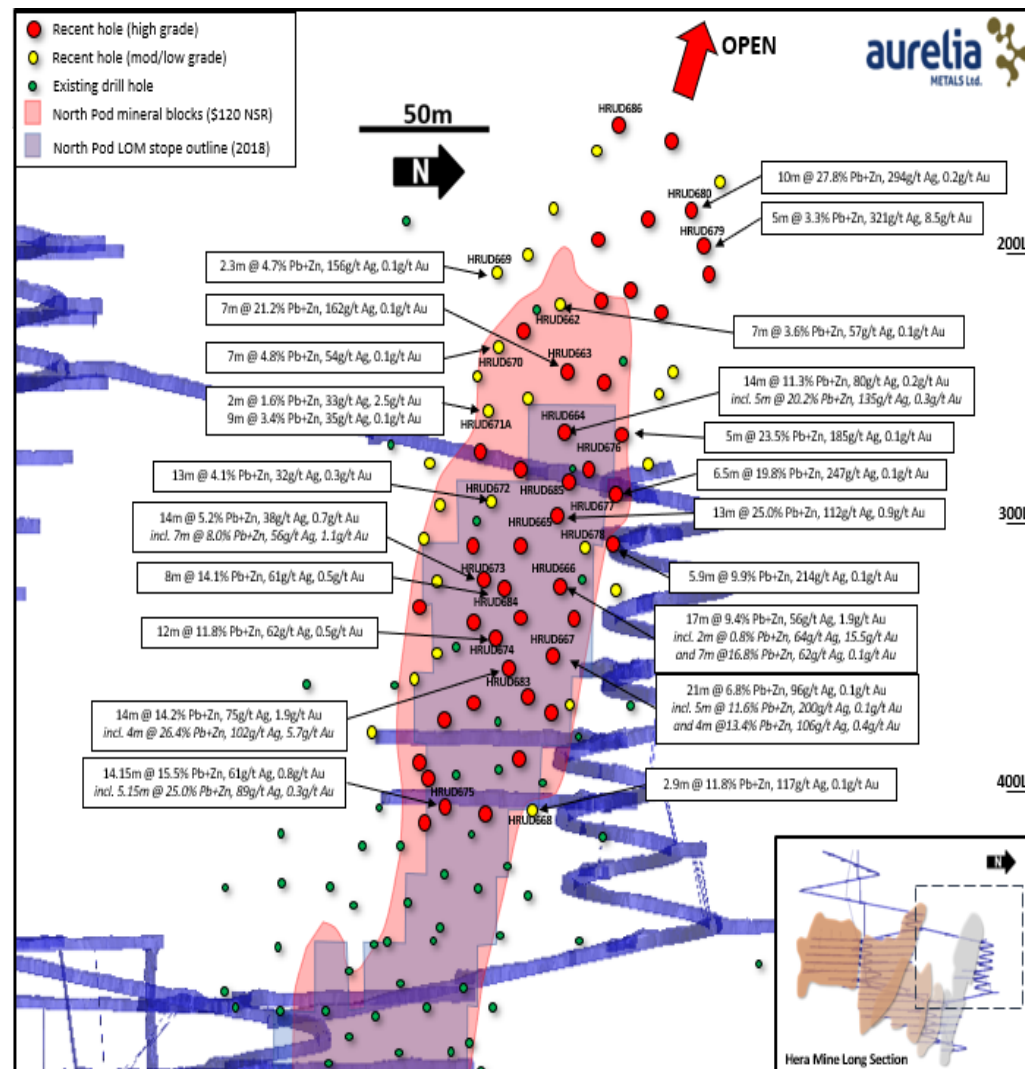
- Multiple priority exploration targets South of Hera
- Geophysical and geochemical anomalism identified
- Large scale regional IP survey currently underway
- Mineralised intercepts from drilling at Athena, Federation and Dominion





## Extending Hera's mine life

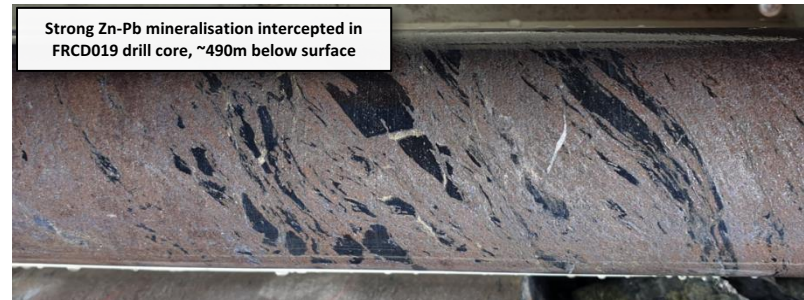
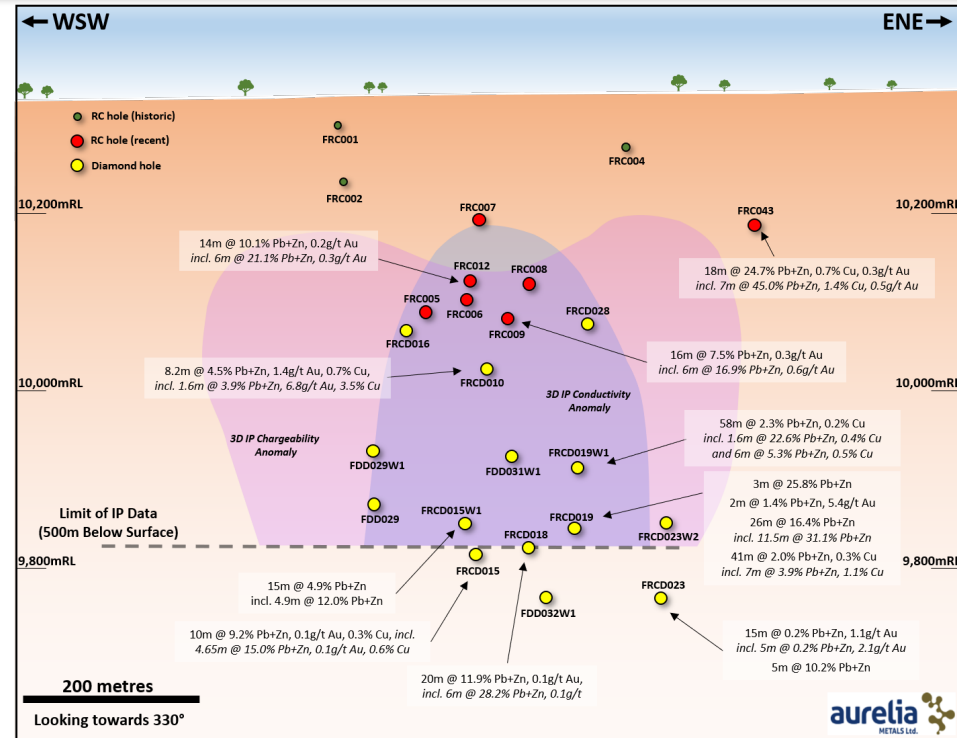
- High grade Pb-Zn-Au-Ag mineralisation
- Highest tonnage ore source at Hera
- 2018/19 drilling extends lode up-dip, including:
  - 7m at 45.1% Pb+Zn, 229g/t Ag & 0.3g/t Au
  - 6.4m at 43.6% Pb+Zn, 263g/t Ag & 0.3g/t Au
  - 14m at 18.3% Pb+Zn, 188g/t Ag & 0.8g/t Au
- Open up-dip
- Further underground drilling planned



# Federation discovery

Accelerating evaluation work

- Very recently discovered (April 2019)
- 10km south-southwest of Hera
- Multiple high grade intercepts include:
  - 18m at 24.7% Pb+Zn, 0.3g/t Au, *incl. 7m at 45.0% Pb+Zn & 0.5g/t Au*
  - 26m at 16.4% Pb+Zn, 0.1g/t Au, *incl. 11.5m at 31.1% Pb+Zn & 0.1g/t Au*
  - 20m at 11.9% Pb+Zn, 0.1g/t Au, *incl. 6m at 28.2% Pb+Zn & 0.1g/t Au*
  - 5m at 22.6% Pb+Zn & 3.1g/t Au
- Emerging gold potential
- Potential ore source for the Hera processing plant



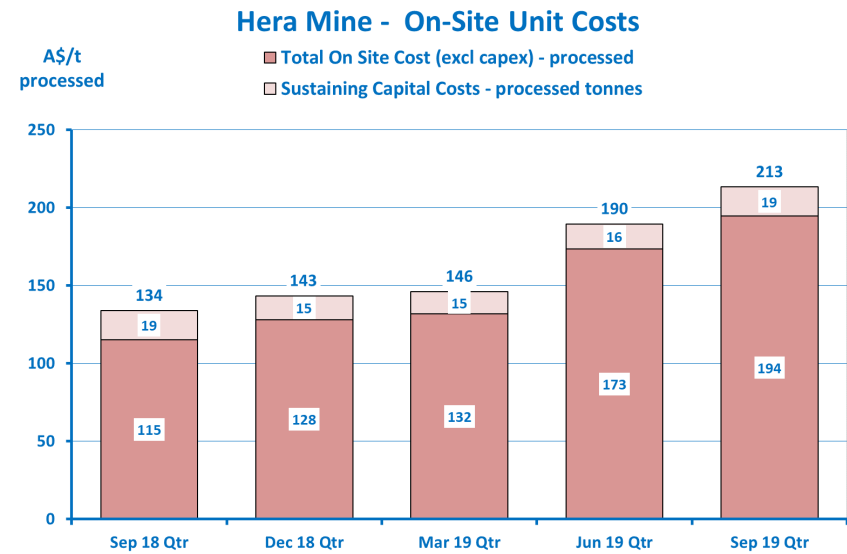
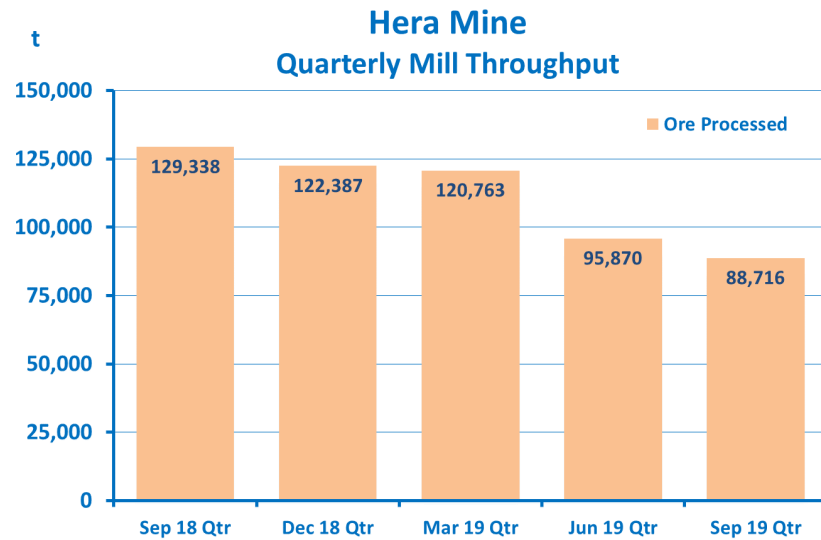
# Hera Processing Performance

Hera - Sep-19 - KPI Scorecard		Month Actual	Month Budget	YTD Actual	YTD Budget	Comment
Safety (TRIFR)	●	10.2	12	10.2	12	No recordable injuries - Aurelia TRIFR @ 3.9 & Pybar TRIFR @ 22.6; 1 reportable incident to NSW inspectorate when rock fell from LH shoulder of supported 510FWS drive 13/9; NSW Inspectorate audit of GCMP 3/9
Total Lateral development (m)	●	95	151	401	452	Below budget following decision to prioritise groundsupport rehab in stope access drives for 9 days of month with no dev m's achieved; 60m operating dev in 385NP & 35m capital dev, including North Pod decline breakthru
Total Ore Mined	●	29,031	38,801	95,580	118,114	Below budget with backfilling priorities for 14 days of month in 560NP/485MN stopes & 4 days no ore sources; 75% ore source from stopes (ie. mainly 560NP) & 25% ore from development (ie. mainly 385NP)
Process throughput (t)	●	30,986	36,207	88,716	116,579	Below budget with 4 days production equivalent lost in unplanned downtime & remainder lost from high Pb/Zn feed grades slowing throughput rate to avg 45tphr in first 2 weeks of month; avg 62tphr for last 5 days
Gold grade processed (g/t)	●	3.83	2.59	4.15	2.41	Above budget with all 3 x UG stope sources mined, particularly 560NP (49% of feed), overperforming for gold; high variation in Au grades with half the month avg 1.85g/t & other half reaching peaks of up to 10g/t Au
Gold recovery (%)	●	89.8%	93.0%	88.7%	93.0%	Below budget with half month avg Au grade 1.85g/t @ 80.3% recovery & remaining month's performance increasing to overall 89.8% recovery; Au deportment change with less soluble Au reporting to leach
Gold production (oz.)	●	3,429	2,804	10,535	8,417	Above budget with average Au feed grade above budget
Pb+Zn grade processed (%)	●	7.3%	7.7%	6.8%	7.0%	Below budget with varying Pb/Zn feed grades for first 2 weeks of 8-10%Pb/Zn & decreasing in last half of month; ROM stockpile at ~13kt to start month; 385NP ore dev significantly overperformed this month (23% of feed)
Conc production (dmt)	●	3,983	4,351	10,336	12,577	Below budget with variable feed grades, first 2 weeks of month production at ~140dmt/day & last half of month at ~85dmt/day; some carry over from previous month with high stockpiles leading to reconciliation issues in Aug
Conc grade (%)	●	52.9%	58.0%	53.0%	58.0%	Below budget with conc grade very dependent on variable Pb/Zn feed grades; majority of month conc grade avg >55%, but in last week of month, when Pb/Zn grades dropped, conc grade avg 50%
Recovery - Lead	●	93%	90%	90%	90%	Separate operation of Rougher & Cleaner floats - Rougher floats to deliver recovery & cleaner cells to deliver the conc grade
Recovery - Zinc	●	95%	90%	91%	90%	Separate operation of Rougher & Cleaner floats - Rougher floats to deliver recovery & cleaner cells to deliver the conc grade
Production - Contained Metal - Lead	●	850	1,006	2,276	2,792	Below budget as a function of actual (ie. 5.7%) as opposed to reconciled Pb/Zn feed grade
Production - Contained Metal - Zinc	●	1,257	1,518	3,201	4,503	Below budget as a function of actual (ie. 5.7%) as opposed to reconciled Pb/Zn feed grade
Silica in conc (%)	●	5.9%	3.0%	6.3%	3.0%	Above budget following carry over of concentrate stockpiles being trucked in Sept versus previous month; Actual SiO2 levels for conc produced in Sept is avg 4.75%Si; silica depressant use & change in float strategy
Gold losses to Conc (g/t)	●	1.28	0.75	1.68	0.78	Improvement on previous months, with focus on reducing cleaner grind size to improve liberation for Knelson capture & leaching, however Au deportment changes recognised with less soluble Au reporting to leach
Total onsite cost (opex+capex) (\$/t)	●	203	157	213	144	Unit Cost \$46/t or 29% unfav to budget. Tonnes processed 14% unfav with costs 10% unfav. Unfav variance were Processing \$26.4/t, Mining \$16.2/t, Admin \$1.7/t & Sustaining capex \$1.4/t
Notional cash flow (after growth capital)	●	4,252	2,824	10,814	8,543	\$1.4m fav to budget with Gold dore revenue \$3.0m & Growth capex \$0.5m fav, offset by unfav Concentrate revenue \$1.5m, Processing expense \$0.4m & mining expense \$0.2m.
<b>Highlights</b>	Successful breakthrough of North Pod Incline/Decline on 10/9 with all associated infrastructure setup completed in month; Annual UG Ventilation external review completed 11/9 & quarterly external UG Geotechnical review completed 25/9; Main process water dam cleaning & relining completed 20/9 after 5 weeks in response to EPA notice; Continued exploration programs at Athena, Zeus, Federation, Dominion NE & recommenced UG exploration drilling to Western Pb/Zn target; Ground gravity geophysical survey to fill in data gap over Four Corners property continued; Organising arbitrator for exploration land access with J.Dunne through Crown Lands & liaising with Dunne's lawyer; finalising VPA documents with both Cobar & Bogan shires in effort to finalise MOD5 approval from DPE next month.					
<b>Key Issues</b>	<ul style="list-style-type: none"> <li><b>Sites Water Supply</b> - current mine lease bores are providing intermittent water, potentially risking processing &amp; mining operations - short term controls include more water from underground &amp; trucking from Cobar &amp; surrounding properties when required, long term controls are completing historical Nymagee mine dewatering council approvals &amp; associated infrastructure/line upgrades (incl quality), &amp; planning additional water production bores on mine lease &amp; surrounding properties (eg. Harley's, Burcher's, Harris); backup water supplies sourced from Mt Boppy (Canbelligo), Hillston &amp; Condoibolin, but costly &amp; longer trucking times; Nymagee upgrade water pipeline arrived on site, to commence installing next month.</li> <li><b>Site Cost Management</b> - Recommended weekly cost reviews to raise awareness of issue with all department heads; several big \$ unbudgeted items completed in Sept qtr (eg. PWD rehab, bulk conc rehandling on site); improve management on ongoing big \$ unbudgeted items while investigating replacement alternatives (eg. trucking potable water from Cobar, UG rehab groundsupport); review contractor manning requirements &amp; costs; increase throughput rates to impact positively on unit costs.</li> <li><b>UG Groundsupport Rehab</b> - ongoing slow squeezing ground conditions in ore drives open for ~2 years requiring rehab slowing stope ore sources, with 485MN, 510FWS, 535FWS, 535NP &amp; 560FWD ore drives all requiring rehab of shotcrete &amp; cables in most instances, when original groundsupport installed was split sets &amp; mesh (eg. shoulder failure in 510FWS)</li> <li><b>Au Rougher Tail Solid Losses</b> - Contributed 5.09% of total 10.23% Au losses this month - daily grind size checks to floats (target &lt;180um) &amp; leach (target 30-40um); Primary Cyclone upgrade project - slight configuration change planned to be implemented by processing in coming months.</li> </ul>					

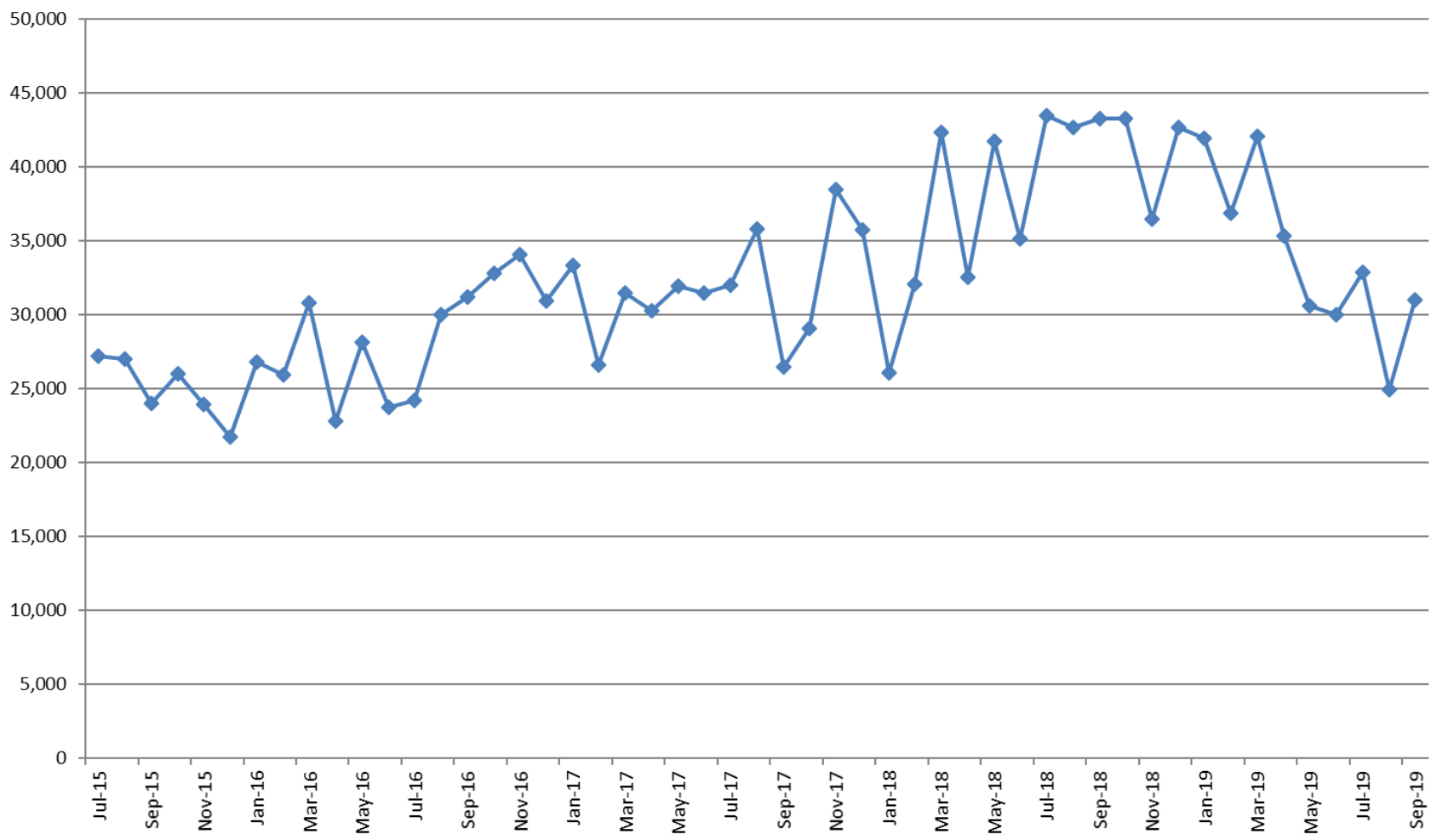
Note: Green traffic light=>100% target, Amber=100-97% target, Red=<97% below target

# Challenging 6 months

- Despite slow start, due to high base metal feed grades, still targeting 480ktpa mill throughput
- Learning how to maintain plant throughput with high Pb/Zn grade
- Change in maintenance strategy being moderated to assess risk (eg. 9 days equivalent lost)
- September 2019 quarter costs impacted by torn PWD liner repairs, trucking of water, concentrate drying, and rehab of underground stopes (3 of 4 unbudgeted items now complete)



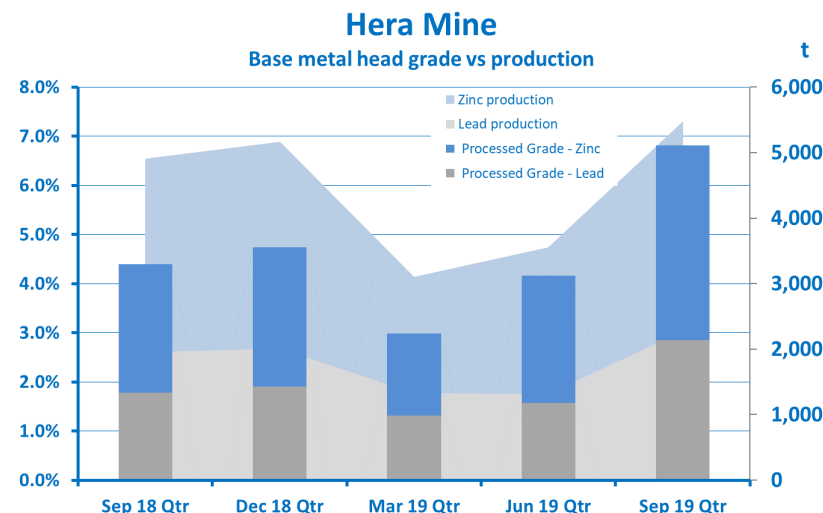
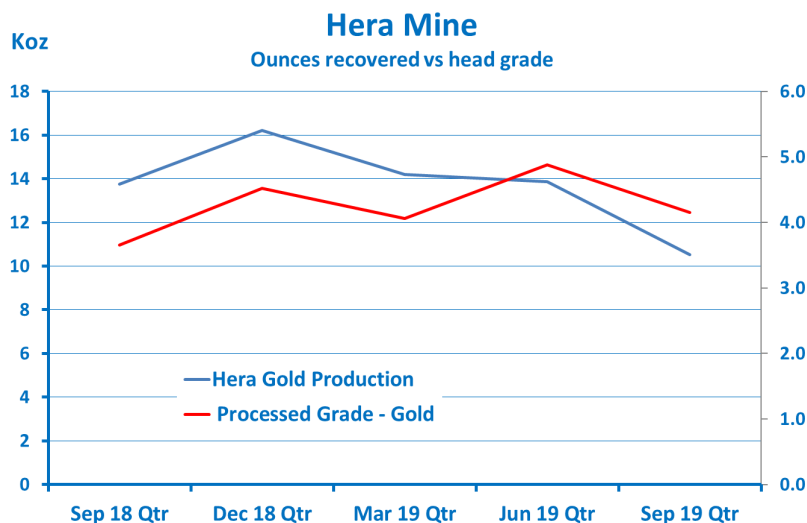
### Mill Monthly Throughput





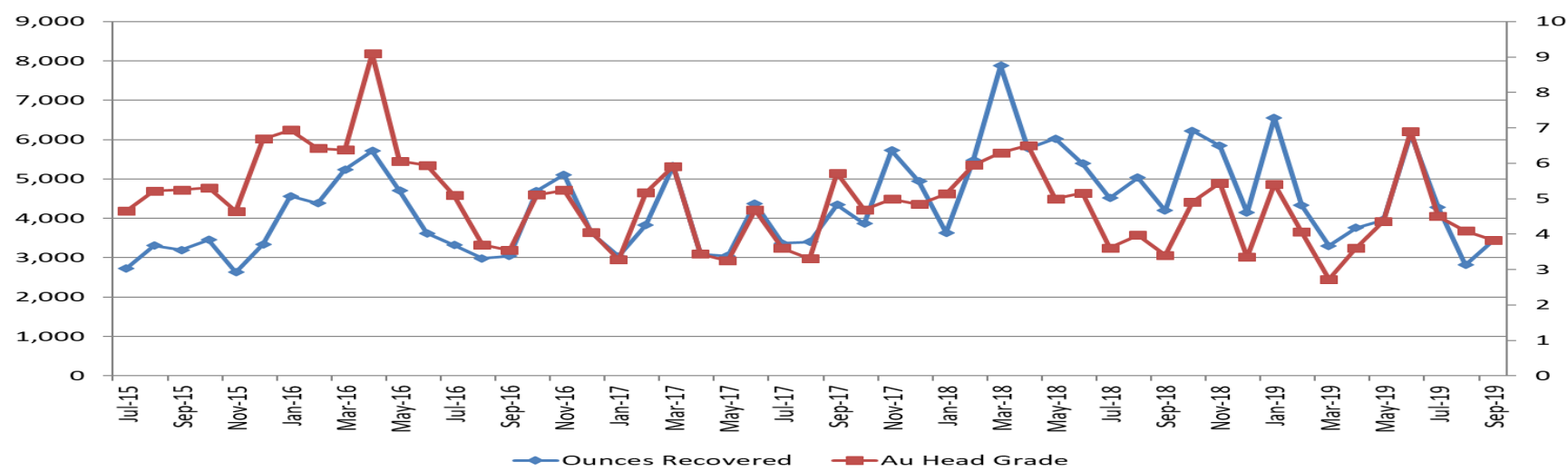
# Pb/Zn efficiency gains

- Increased Pb/Zn concentrate production offsets lower Au production from lower throughput
- North Pod mining set to improve base metals production relative to FY19 with North Pod decline broken through providing access to third mining front (ie. 2<sup>nd</sup> in North Pod)
- Bulk concentrate filter press optimisation aligned to meet increased base metal production

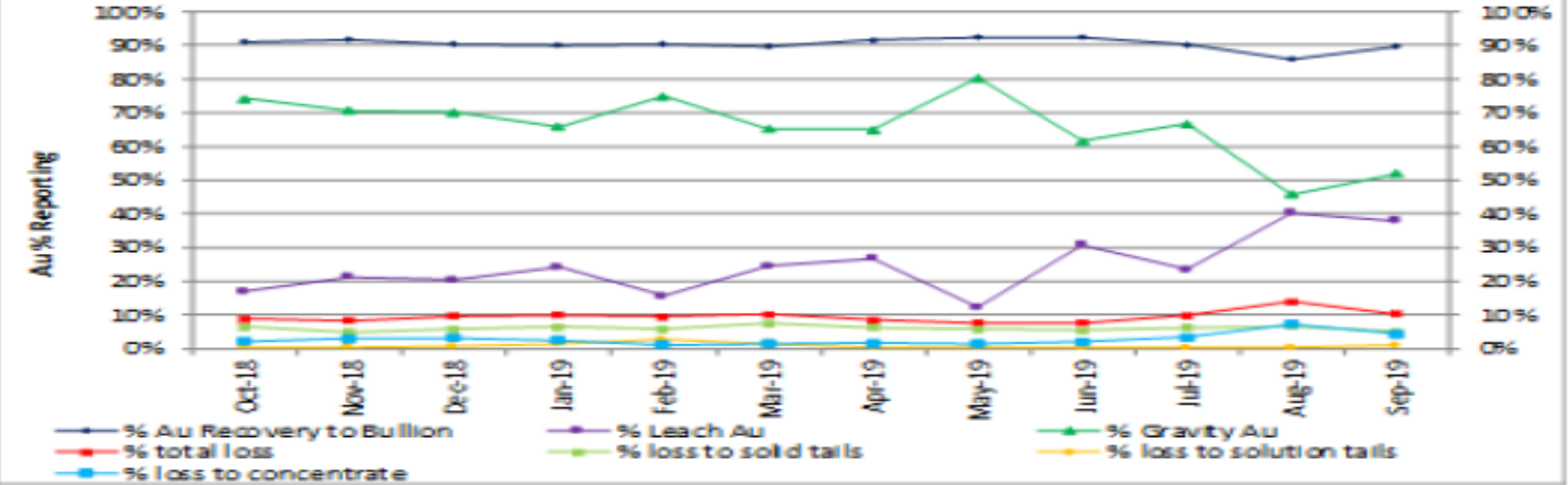


# Historical Gold Performance

### Ounces Recovered vs Head Grade

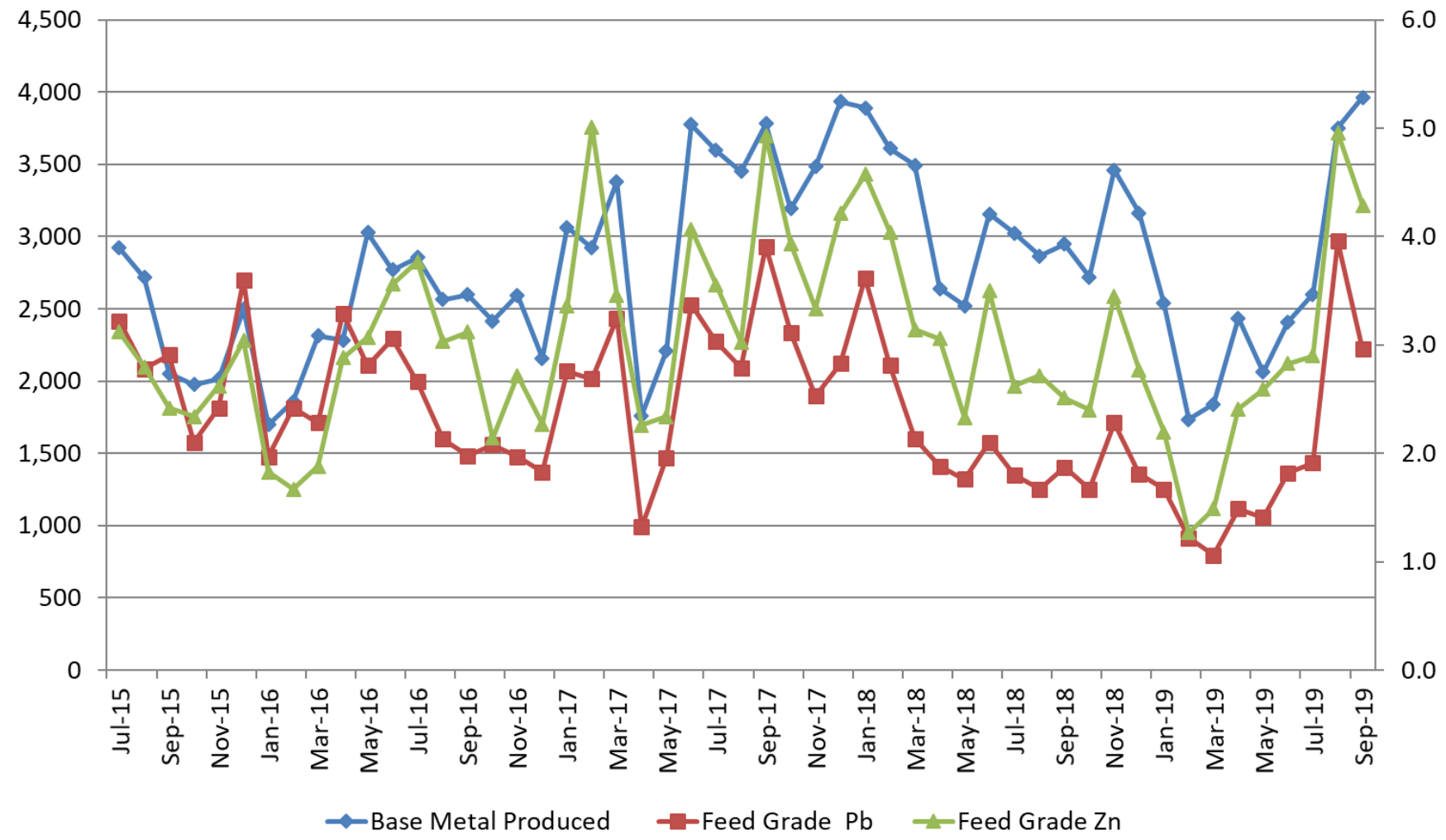


### Au % Reporting

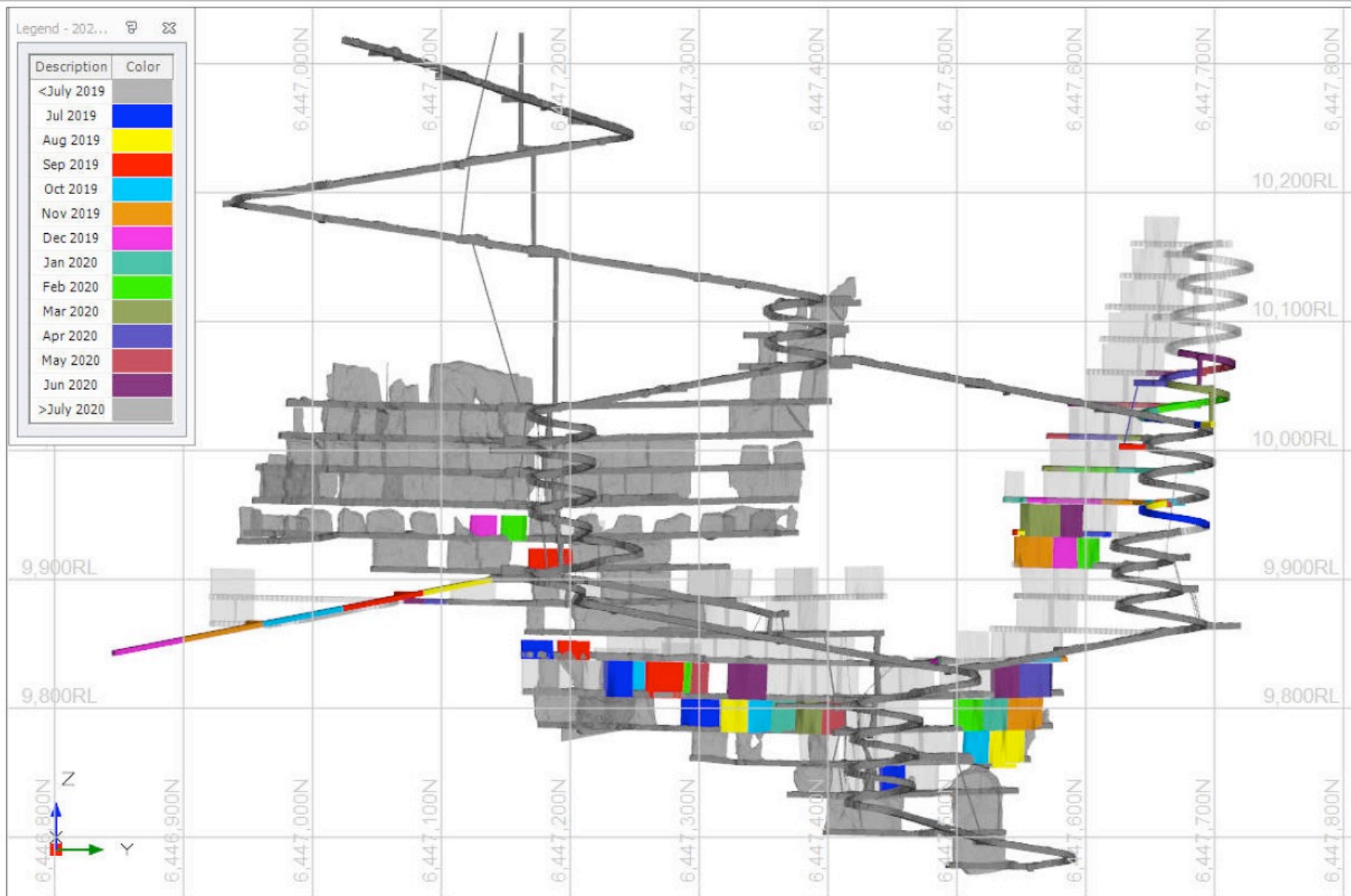


# Historical Base Metals Performance

## Base Metal Production vs Head Grade

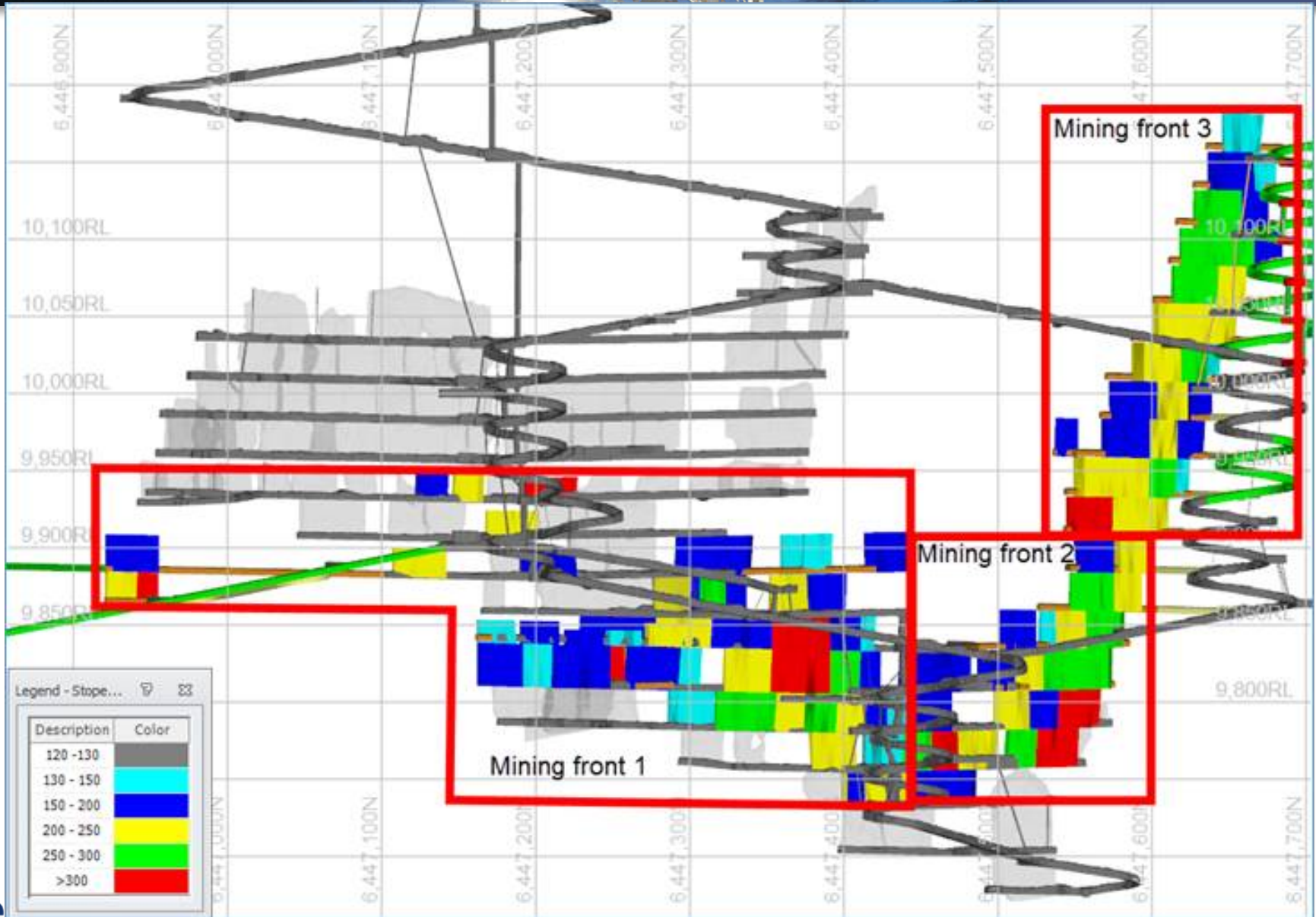


# FY20 Schedule Production





# Three active mining fronts

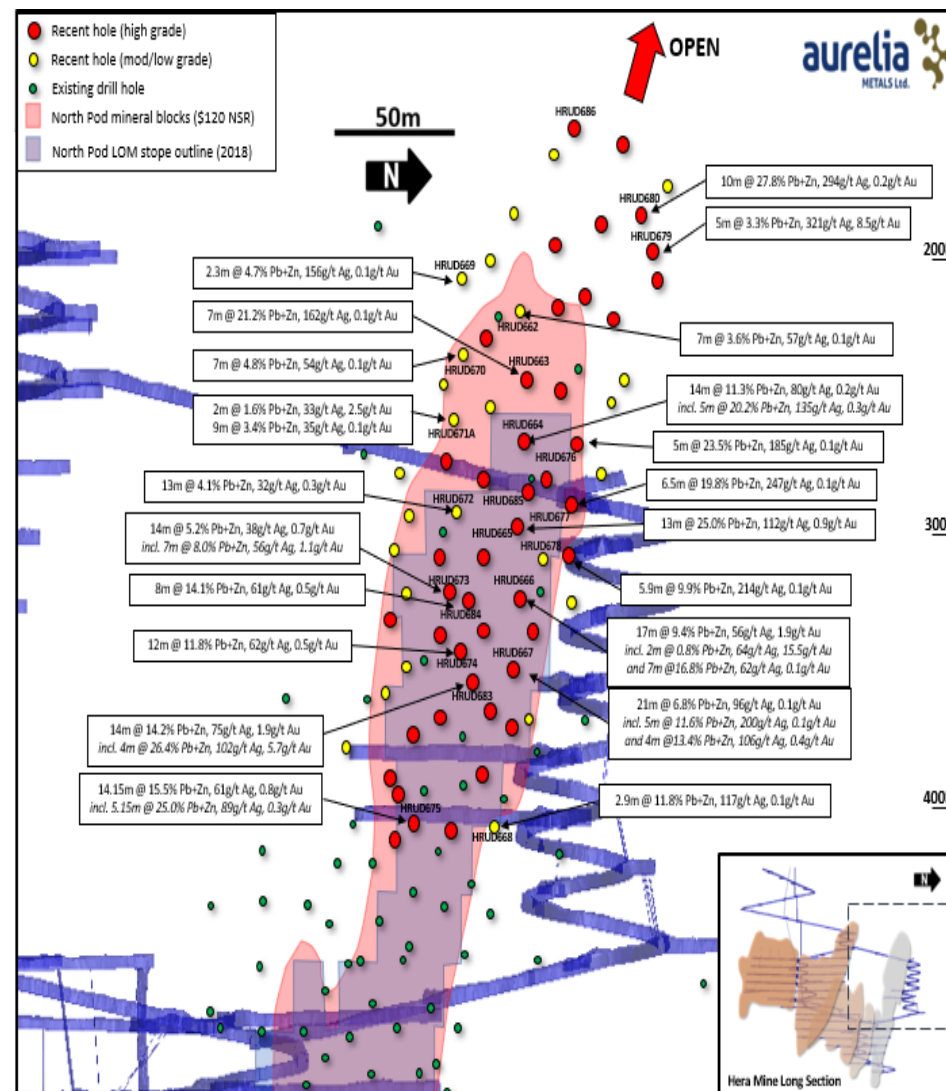




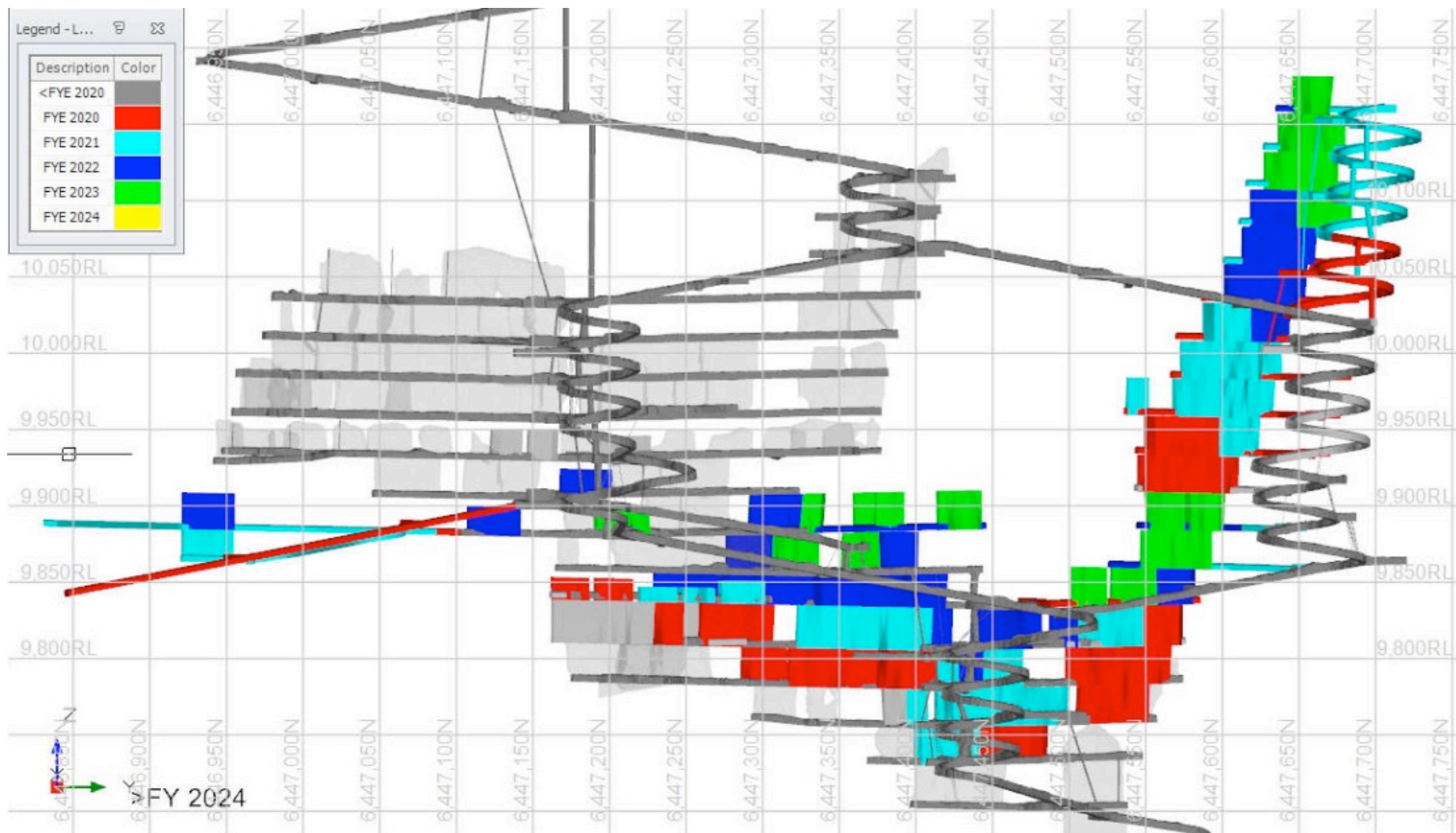
# Ready life extension

Forecast operating life expected to increase to 2023

- Strong drilling results during FY19 outside of Ore Reserve and Mining Inventory boundaries (eg Upper North Pod)
- Reduced cost structure and lower development requirements
- Development required to set up 3rd mining front in upper North Pod now complete (ie. 385NP & 410NP levels)
- Combination to drive forecast operating life extension until 2023



# Life of Mine – Four Years



- 23/09/2019 Heavy vehicle parking in village (NPA to mine & council)
- 1/10/2019 Alleged trespassing on property adjoining the mine
- 6/10/2019 Noise, dust, not receiving blasting notifications, exploration activity near adjoining boundary (EPA & DPIE), & company suing
- 1/11/2019 Dust, rubbish on adjoining property, truck numbers and speed through village
- 3/11/2019 Dust, noise, blast shook the house, too many water trucks and taking Nymagee water