

Stratford Coal CCC Meeting

Presentation –
Company Report &
Overview of Activities

November 2019

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Environment & Community Superintendent

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1. Progress at the Mine

Mining 3rd Quarter 2019

- Waste BCM 1,880,000 BCM
- Stratford ROM Coal 522,600 tonnes (Includes Codam)
- Total CHPP product 232,500 tonnes

- Mining in BRN continued during the quarter. Dayshift only.
- Mining in Avon North continued during the quarter. Day and evening shift.
- Construction works for Stratford East commenced during August 2019.
- No mining activities at Duralie. Rehabilitation work only

2. Environmental Reporting & Regulators

Management Area	Project	Status
Reporting	<ul style="list-style-type: none"> NPI & NGER Reporting EPL 5161 Annual Return 2019 Stratford Mining Complex Annual Review 2019 	<ul style="list-style-type: none"> The 2019 NPI and NGER reports have been prepared and lodged with the relevant government departments. The Environment Protection Licence 5161 Annual Return 2019 was lodged with the EPA in August 2019. The Annual Return is available on the EPA's public register. Next report due March 2020.
Regulator	<ul style="list-style-type: none"> Resources Regulator Site Visit Environmental Management Plans Mining Operations Plan & Rehabilitation Management Plan 	<ul style="list-style-type: none"> The Resources Regulator conducted a site visit on 27 August 2019 for the purpose of filming a short video on rehabilitation best practice in the mining industry. The film is currently being prepared. No change No change

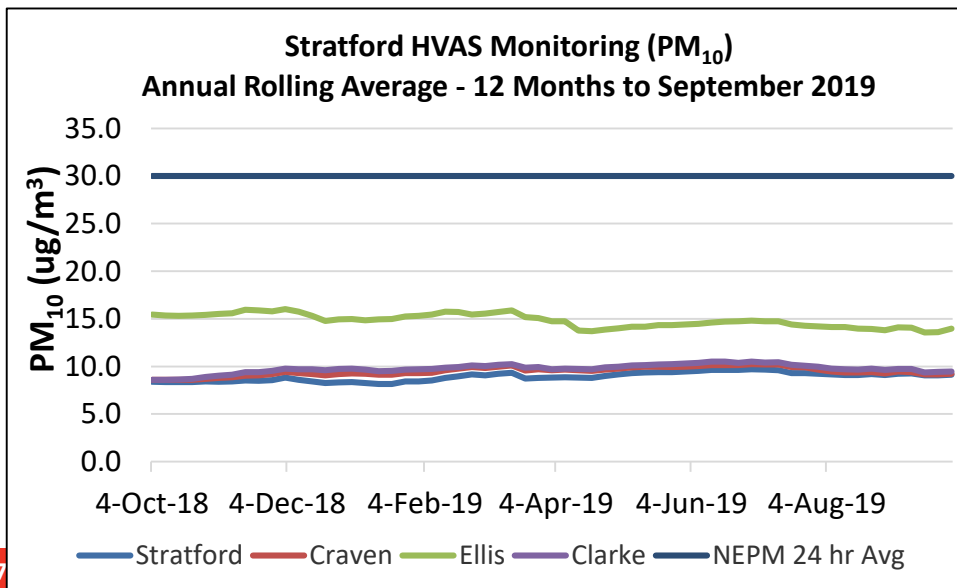
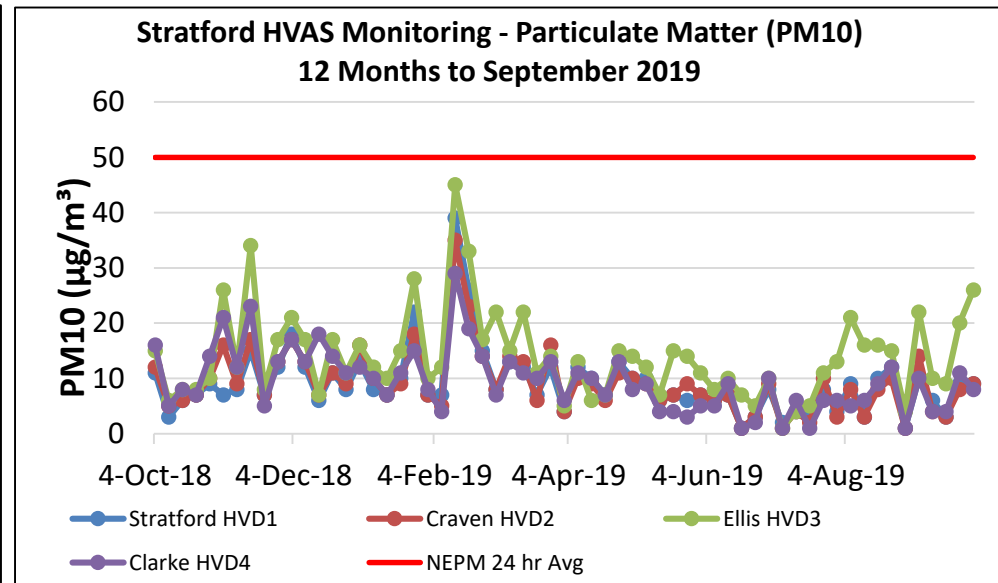
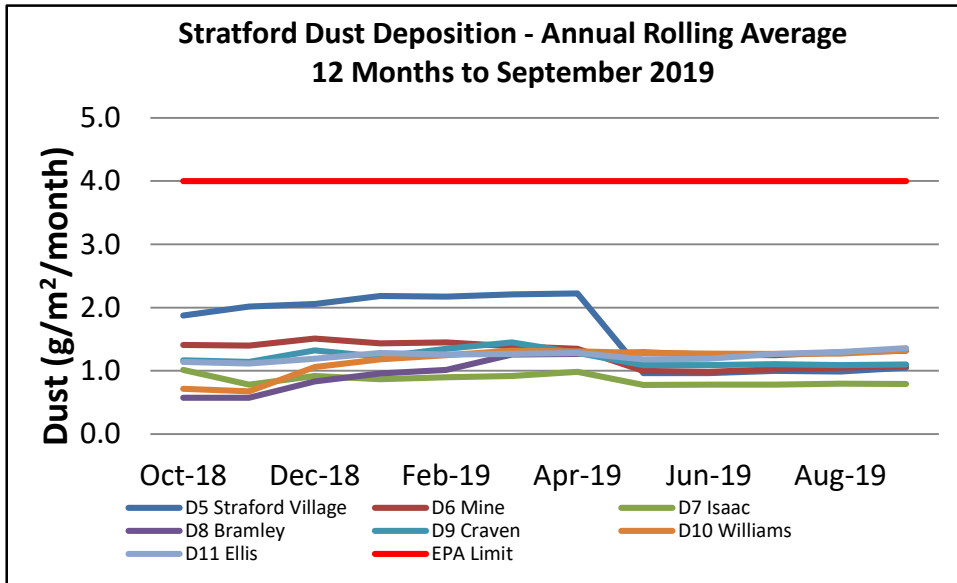
3. Environmental Management Plans & Monitoring

- a) Air Quality Management
- b) Blast Management
- c) Noise Management
- d) Water Management
- e) Rehabilitation Management
- f) Biodiversity Management

3a. Air Quality Management

Management Area	Project	Status
Air quality monitoring	<ul style="list-style-type: none">Real-time air quality monitoring	<ul style="list-style-type: none">The real-time air quality TEOM monitors in Stratford and Craven villages continue to operate.SCPL has established alarming and a response protocol for the real-time dust monitoring system.General ambient PM10 dust levels have been elevated due to ongoing drought conditions. Elevated PM10 levels have also been recorded from smoke during recent bushfires.

3a. Air Quality Management



- All sites below DP&E limit. Typically low results during winter and higher during spring/summer.
- Flat trend over previous 12 months.
- HVAS results provide more reliable data compared to dust deposition results and should be referred to when interpreting dust emissions.

3b. Blast Management

Management Area	Project	Status
Blasting	<ul style="list-style-type: none">• Blast Monitoring• Blast Results	<ul style="list-style-type: none">• Blasting activities continued in both the Avon North and BRN open cuts.• No blasts exceeded 115dB(L) or 5mm/s during the quarter. For the annual reporting period no blasts have exceed 115dB(L) or 5mm/s.• No blasts recorded any levels of fume during the quarter.
	<ul style="list-style-type: none">• Blasting Preparations	<ul style="list-style-type: none">• A Road Closure management plan has been prepared and approved by MidCoast Council for road closures during blasting along Wenham Cox Rd. The road closure plan will be updated prior to blast activities in the Roseville Pit.• Blast notifications have continued.
Building Inspections	<ul style="list-style-type: none">• Baseline condition inspections	<ul style="list-style-type: none">• No further building inspections have been required.

3b. Blast Management

Location	Date	Time	Isaac (B1) 7432		Ex-Judge (B2) 7441		Atkins (B6) 7434		Clarke (B5) (Mine-owned) 7433		Overpressure Site Exceedance ¹	Overpressure "Cumulative Exceedance" ¹	Monitored Blasts ¹	Fume Rating
			mm/s	dBL	mm/s	dBL	mm/s	dBL	mm/s	dBL				
		24hr												
Avon North	Wednesday, 3 July 2019	12:12:00	<0.24	<114	<0.24	<114	<0.24	<114	1.12	112.8	0.0%	0	1	Nil
Avon North	Tuesday, 9 July 2019	12:14:00	<0.24	<114	<0.24	<114	<0.24	<114	0.49	103.0	0.0%	0	2	Nil
Avon North	Friday, 12 July 2019	12:11:00	<0.24	<114	<0.24	<114	<0.24	<114	0.61	111.6	0.0%	0	3	Nil
BRN	Wednesday, 17 July 2019	12:50:00	<0.24	<114	<0.24	<114	<0.24	<114	<0.24	<114	0.0%	0	4	Nil
Avon North	Friday, 19 July 2019	12:15:00	<0.24	<114	<0.24	<114	<0.24	<114	0.71	106.8	0.0%	0	5	Nil
BRN	Wednesday, 24 July 2019	12:41:00	<0.24	<114	<0.24	<114	<0.24	<114	0.31	93.5	0.0%	0	6	Nil
Avon North	Friday, 26 July 2019	12:40:00	<0.24	<114	<0.24	<114	<0.24	<114	1.86	110.0	0.0%	0	7	Nil
BRN	Wednesday, 31 July 2019	12:37:00	<0.24	<114	<0.24	<114	0.35	103.2	0.31	97.6	0.0%	0	8	Nil
Avon North	Friday, 2 August 2019	12:42:00	<0.24	<114	<0.24	<114	0.27	101.9	1.63	108.3	0.0%	0	9	Nil
BRN	Tuesday, 6 August 2019	12:39:00	<0.24	<114	0.26	95.6	0.51	101.9	0.29	95.1	0.0%	0	10	Nil
Avon North	Friday, 9 August 2019	9:35:00	<0.24	<114	<0.24	<114	<0.24	<114	1.31	108.8	0.0%	0	11	Nil
BRN	Wednesday, 14 August 2019	12:38:00	<0.24	<114	<0.24	<114	0.42	99.1	0.41	96.4	0.0%	0	12	Nil
Avon North	Friday, 16 August 2019	12:42:00	0.29	82.1	0.29	84.3	0.37	102.4	1.1	118.6	0.0%	0	13	Nil
BRN	Tuesday, 20 August 2019	14:34:00	<0.24	<114	<0.24	<114	0.37	102.4	0.43	101.9	0.0%	0	14	Nil
Avon North	Friday, 23 August 2019	12:38:00	<0.24	<114	<0.24	<114	<0.24	<114	1.61	106.2	0.0%	0	15	Nil
BRN	Wednesday, 28 August 2019	12:43:00	<0.24	<114	0.25	94.6	<0.24	<114	0.35	94.3	0.0%	0	16	Nil
Avon North	Friday, 30 August 2019	12:44:00	<0.24	<114	<0.24	<114	<0.24	<114	0.72	112.7	0.0%	0	17	Nil
Avon North	Tuesday, 3 September 2019	12:37:00	0.23	93.4	<0.24	<114	<0.24	<114	1.04	109.8	0.0%	0	18	Nil
Avon North	Thursday, 12 September 2019	10:47:00	<0.24	<114	<0.24	<114	<0.24	<114	0.56	107.8	0.0%	0	19	Nil
Avon North	Friday, 20 September 2019	12:45:00	0.29	90.5	0.3	85.1	<0.24	<114	1.47	110.2	0.0%	0	20	Nil
Avon North	Friday, 27 September 2019	12:34:00	0.46	86.0	0.65	85.1	0.61	99.9	2.79	111.3	0.0%	0	21	Nil
Avon North	Friday, 4 October 2019	12:34:00	0.28	97.3	<0.24	<114	0.25	95.1	1.77	107.6	0.0%	0	22	Nil

• Note: Blast Compliance: No more than 5% of total blasts for annual monitoring period to exceed an overpressure of 115 dBL or ground vibration of 5 mm/s. No blast is to exceed an overpressure of 120 dBL or ground vibration of 10 mm/s.

• Note: Where no trigger is recorded the results indicate <0.22mm/s and <110.0dBL corresponding to the blast monitor settings.

• Note: Blast results for Clarke are extrapolated to the next nearest non-mined owned residence.



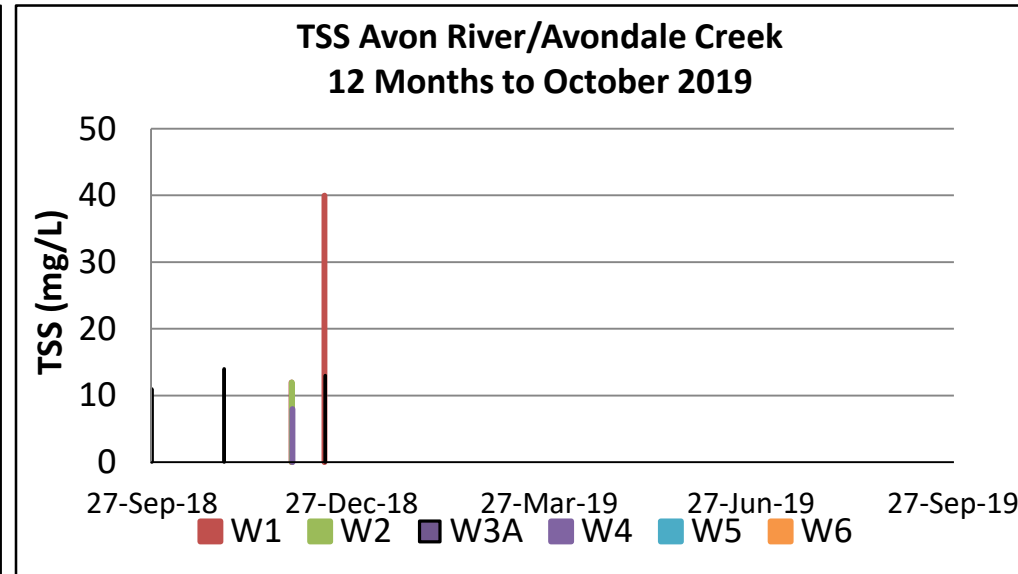
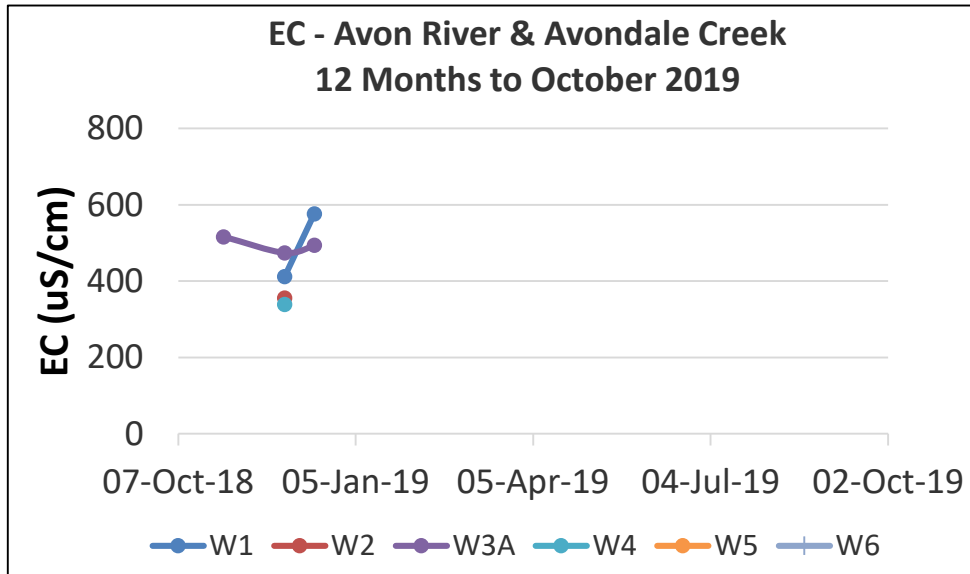
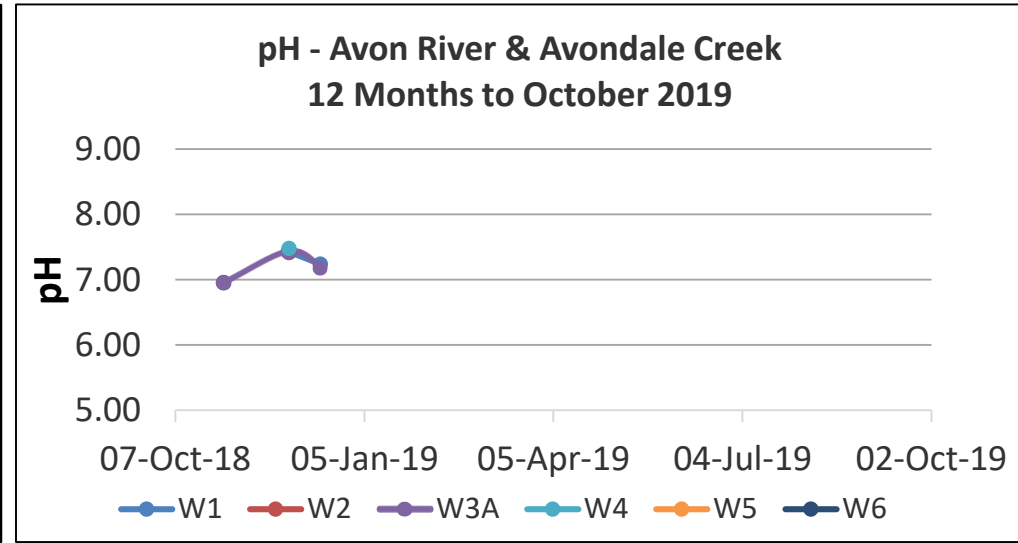
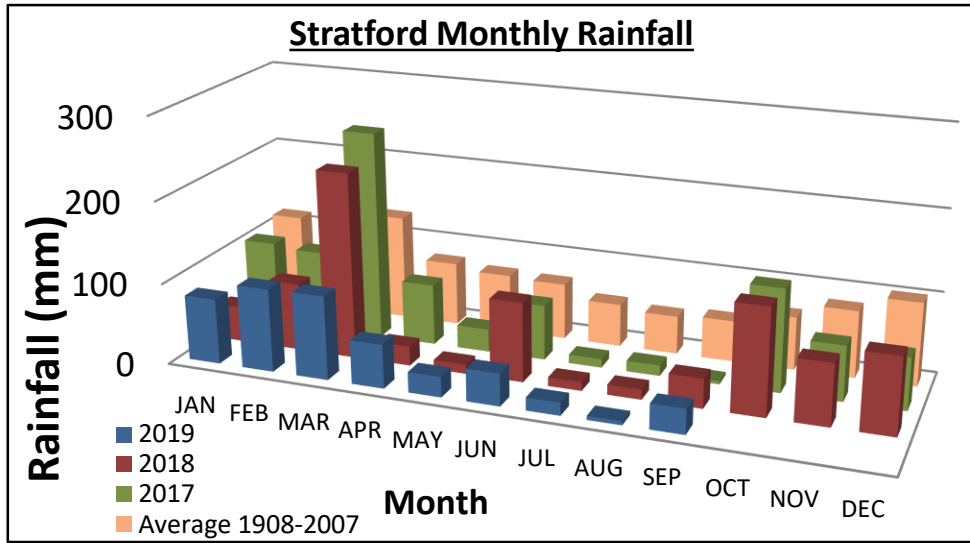
3c. Noise Management

Management Area	Project	Status
Monitoring	<ul style="list-style-type: none">• Monthly Noise Survey	<ul style="list-style-type: none">• Monthly attended noise monitoring was undertaken during Q3 2019.• No non-compliant results were recorded during the surveys. Reports will be made available on the Stratford Coal website. The next monitoring is scheduled in November 2019.
Real-Time Noise	<ul style="list-style-type: none">• Real-Time Noise System	<ul style="list-style-type: none">• Real-time noise monitors continue to operate near Stratford village, Craven Village and the Clarke property.• The integrated real-time noise management system is operational. The system analyses monitoring data from the noise units, the weather station and the inversion towers and records times when either the noise criteria is likely to be exceeded or when noise enhancing weather conditions are present. The system will then provide alarms to staff to implement additional noise mitigation measures where required.

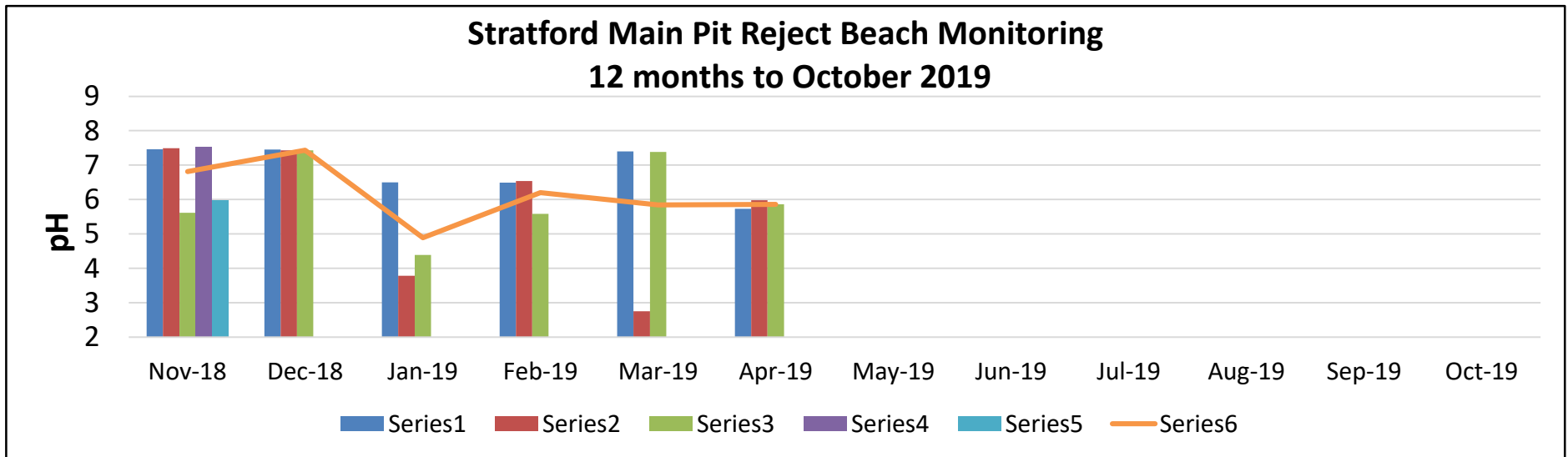
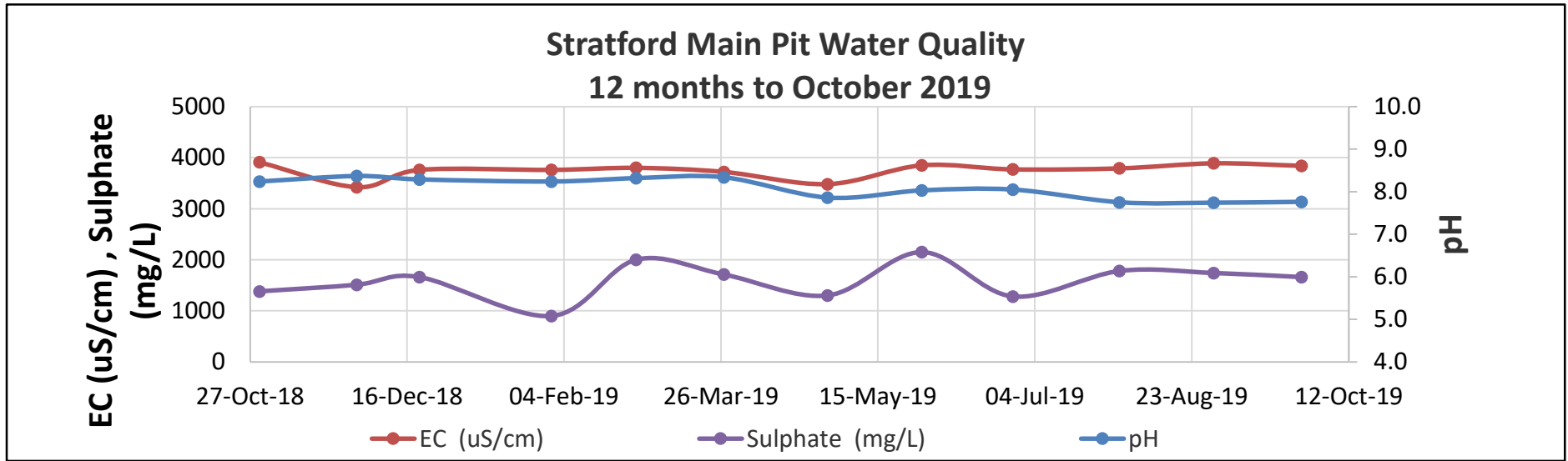
3d. Water Management

Management Area	Project	Status
Site Water Management	<ul style="list-style-type: none"> Stratford East Erosion and sediment control 	<ul style="list-style-type: none"> Dewatering infrastructure has been established for Stratford East. Erosion and sediment control infrastructure will be constructed for the Stratford East pit during Q4 2019.
Water management Structures	<ul style="list-style-type: none"> Main Pit Flood Bund Stratford East clean water drain Stratford East PAF Cell 	<ul style="list-style-type: none"> The Main Pit Flood Bund construction was completed in August 2019. The flood bund design is based on the updated flood model for the Avondale Creek catchment. The Stratford East clean water drain construction commenced in September 2019. A design is currently being prepared for the Stratford East PAF Cell. The PAF Cell is required to be approved by the EPA.
Surface Water Monitoring	<ul style="list-style-type: none"> Routine monitoring Aquatic Ecology - Macroinvertebrates 	<ul style="list-style-type: none"> Sporadic and low rainfall conditions persisted through winter/spring 2019. Routine water sampling continued. All results consistent with the SCM Environmental Assessment predictions. Generally “no flow” conditions have persisted across all sites since December 2018. Macroinvertebrates monitoring was undertaken in October 2019. The monitoring continues to indicate negligible impacts associated with mining activities. The results reflected the extended drought conditions.
Groundwater Monitoring	<ul style="list-style-type: none"> Routine monitoring 	<ul style="list-style-type: none"> Routine groundwater sampling continued. All results consistent with the SCM Environmental Assessment predictions.

3d. Water Management



3d. Water Management



*Reject Beach monitoring has been ceased due to inundation with water.
i.e. no exposed reject material.

3e. Rehabilitation Management

Management Area	Project	Status
Rehabilitated Waste Emplacements	<ul style="list-style-type: none">• Avon North waste emplacement• BRN waste emplacement	<ul style="list-style-type: none">• Bulk shaping of the Avon North waste emplacement has continued focusing on areas with offsite visual impact. Topsoil spreading will commence during November 2019 and will be followed by ground preparation and seeding.• Planning for the BRN waste emplacement rehabilitation has commenced. Bulk shaping of the northern facing batters will be undertaken in Q4 2019. Topsoil spreading and seeding will be undertaken in 2020
Monitoring	<ul style="list-style-type: none">• Vegetation Monitoring - Ecosystem Function Analysis	<ul style="list-style-type: none">• Rehabilitation monitoring incorporating landscape function analysis and vegetation dynamics was undertaken during May 2019. The final report is currently being prepared and a summary will be included in the Annual Review.



3f. Biodiversity Management

Management Area	Project	Status
Mining Lease Areas	<ul style="list-style-type: none"> Habitat Assessments Vegetation Clearance Heritage Sites 	<ul style="list-style-type: none"> Habitat assessments have been undertaken in the Stratford East and Avon North proposed mining areas in advance of clearing. Clearing permits were prepared in preparation for works in Stratford East. The clearing permits address the management of vegetation, fauna, heritage sites and topsoil. Vegetation clearance for Stratford East Stage 1 commenced in September 2019 The next stages of clearing for Avon North will be undertaken during Q1 2020 Prior to clearing in Stratford East, a previously identified scarred tree (ST-2) was required to be relocated in accordance with the HMP. The scarred tree relocation was undertaken in September 2019 in consultation with Forster Lands Council and an archaeologist. The scarred tree was relocated in the local area to a secure site that will not be impacted by future works.



3f. Biodiversity Management

Management Area	Project	Status
Biodiversity Offset Area	<ul style="list-style-type: none"> Revegetation Works 	<ul style="list-style-type: none"> Planning for the tubestock planting in the biodiversity offset area for 2020 has commenced. Approximately 80 hectares along Glen Rd is proposed for planting. Native seed supply has been sourced and tubestock preparation will commence in October 2019.
Biodiversity Offset Area	<ul style="list-style-type: none"> Vegetation Monitoring Fauna Monitoring 	<ul style="list-style-type: none"> The first round of vegetation monitoring for the biodiversity offset area was undertaken in February 2019. This report will establish the baseline vegetation condition for the ongoing revegetation works in the offset area. A summary of the report will be included in the next Annual Review. Fauna monitoring in the Stratford biodiversity offset was undertaken during September to October 2019. The results will be included in the 2019 Annual Review.



Photo: Powerful Owl in the Avon North Biodiversity Area, Sep 2019.



Photo: Squirrel Glider in the Avon North Biodiversity Area, Sep 2019.



3f. Biodiversity Management

Management Area	Project	Status
Squirrel Glider Management	<ul style="list-style-type: none"> Squirrel Glider Colony & Home Range Surveys Nest box installations & monitoring Hollow Bearing Tree Census 	<ul style="list-style-type: none"> Squirrel Glider home range monitoring in the four colony locations was undertaken during March/April 2019 via a trapping and radio tracking program. 8 gliders from 4 colonies were tracked to determine their home ranges. The second round of radio tracking was completed in September 2019. These studies will guide the ongoing management of glider populations. During May 2019 30 Squirrel Glider boxes were installed surrounding the home ranges identified in the radio tracking program. Monitoring commenced in July 2019 and will be undertaken quarterly. A hollow bearing tree survey was undertaken in September 2019. The survey data will guide future habitat enhancement works.
Pest Control	<ul style="list-style-type: none"> Wild Dog control program 	<ul style="list-style-type: none"> Wild dog and fox trapping was recommenced in October 2019 covering all Stratford Coal owned properties including biodiversity offsets and Mining Leases.



Photo: Nest box in the biodiversity area, May 2019.

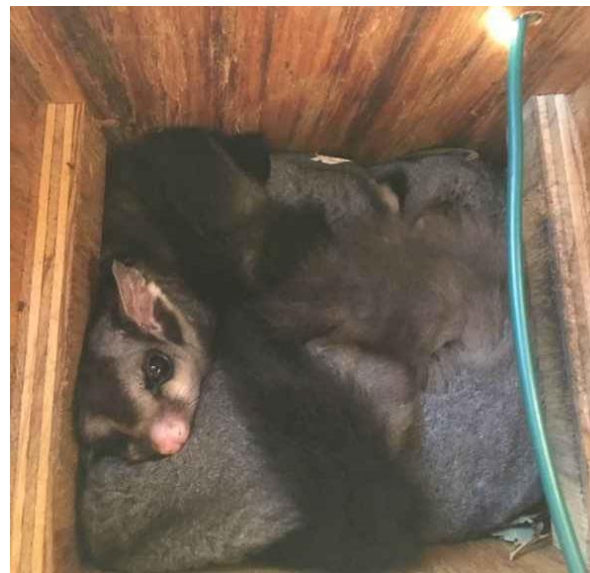


Photo: Squirrel Glider x 6, Jul 2019.



4. Community Complaints - Summary

Stratford Complaint Summary

Period: 1/07/2019 - 31/10/2019

Period: 3 Months

Total No. of Complaints: 0

Total No. of Complainants: 0

Date/Time of Complaint	Complainant Location	Method of Complaint	Nature of Complaint	Investigation/Outcome

5. Community Programs

Management Area	Project	Status
Support Programs	Stratford Coal Community Support Program	<ul style="list-style-type: none">• The application period for the 2020 Stratford Coal Community Support Program is currently open until the end of November 2019.• Applications are available on the Stratford Coal website.• Funding is expected to be announced in January 2020.
	<ul style="list-style-type: none">• Stratford Coal Education Support Fund	<ul style="list-style-type: none">• The Stratford Coal Education Support Fund will be running again during 2020 and applications are available from Gloucester High School or the MidCoast Council Gloucester office.• The Education Support Fund Committee have revised and formalised a written guideline for the program to ensure ongoing transparency and consistency in the implementation of the program.