



2009 shutdown in full swing

Anglesea's 2009 maintenance shutdown involves many peripheral environmental activities

alcoa anglesea

environment report

april



australia's aluminium

air

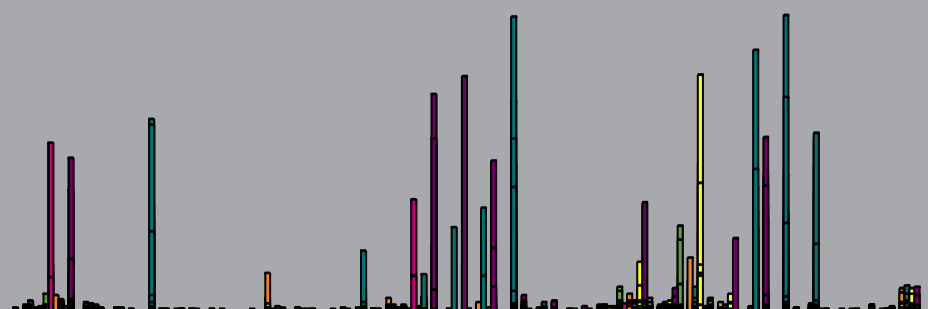
Air Monitoring	Average	Maximum
Stack Monitors		
Opacity g/m ³ 10-minute average	0.075	0.216
Stack SO ₂ kg/min 1-hour average Licence limit 100kg/min	58.73	78.12

Ambient Monitors	Average	Maximum
SO ₂ 1 hour ppb		
Community Centre	0	34
Primary School	0	67
Mt Ingoldsby	1	21
Scout Camp	4	118
Camp Wilkin	1	94
Camp Road	2	94

Ambient Monitors																														
SO ₂ Maximum 1 hour averages (ppb)																														
Date	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
Community Centre	1	7	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	10	5	34	5	0	0	0	0	0	2
Primary School	0	67	0	0	0	0	0	0	0	0	0	0	44	0	0	0	0	0	0	3	0	0	0	0	0	0	0	0	0	
Mt Ingoldsby	2	6	3	1	0	0	0	0	15	1	0	1	5	1	1	3	0	1	0	2	6	2	21	3	1	0	3	1	2	9
Scout Camp	4	4	3	1	77	0	0	0	1	1	0	24	2	14	33	41	117	4	1	2	4	3	9	2	104	118	71	0	0	10
Camp Wilkin	1	2	2	0	0	0	0	0	2	0	0	0	1	0	0	1	0	0	0	2	19	4	94	7	0	0	1	1	1	9
Camp Road	2	61	1	1	0	0	1	0	1	1	1	1	2	87	8	94	25	4	0	2	43	9	1	2	69	50	1	0	0	9

EPA Air Quality Objective
200

Alcoa Local Standard
170



water



Water Storage

Barwon Water storage levels for the Geelong system at 18.7% capacity. Stage 4 restrictions apply with a Winter exemption to permit limited residential garden watering.

Water Discharge	April	Total
ML		
Ashponds (SP1)	126.3	537.2
Mine (SP4)	0	0

Water Monitoring 16/04/2009	SP1 Ashpond		SP4 Mine		SP3 Final	
	EPA limit	Lab Result	EPA limit	Lab Result	EPA limit	Lab Result
pH	4-10	8.0	3-9	no	5-9	7.3
Susp. Solids	100	< 4	100	discharge	30	< 4
Colour	50	4	50	at	50	4
Aluminium	10	0.17	10	time	5.5	0.12
Iron	10	0.16	20	of	4.0	0.10
Zinc	0.4	0.29	2.0	sampling	0.30	0.016

WATER WATER USAGE PER MONTH (ML)

Date	JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEPT	OCT	NOV	DEC	TOTAL
Town Water	2.5	1.0	1.5	1.5									6.5
Bore Water	288	270	281	237									1076
Mine Water	46	53	54	65									218



2009 shutdown underway



Alcoa Anglesea's 2009 maintenance shutdown began on Tuesday April 27 and is currently in full swing. The purpose of the 25 day shutdown is to complete maintenance tasks that cannot be completed when the plant is online. Whilst the major focus is on maintenance activities, environmental issues have not taken a back seat.

With up to 250 contractors on site on any one day, waste volumes and waste segregation have the potential to be a large issue. Targeted waste audits are being conducted by the site Environmental Scientist. To date 46 waste audits have been conducted with 7 environmental near misses raised due to incorrect waste segregation.

The volume of waste to landfill generated during a shutdown year is substantially greater than a normal operating year. Waste audits are part of the site's waste minimisation activities to ensure that all possible wastes are appropriately recycled and that minimal non-recyclable waste is sent to landfill.

A daily newsletter has been developed for the shutdown. In addition to safety information, the newsletter includes environmental statistics such as the number of waste audits conducted, the number of environmental near misses and the number of environmental incident reports generated.

One page lessons on spills, correct waste segregation and waste disposal have also been generated during the shutdown and included with the daily newsletter for distribution to the site.

There has been one environmental incident during the shutdown. This involved a spill of 5-10 litres of diesel from a contractors vehicle. The spill entered the ash ponds through the stormwater system, however was treated with Comprox successfully.

Thank you to everyone for their diligence and hard work in remembering to consider the environment whilst conducting these crucial maintenance tasks.

PLANT OF THE ANGLESEA HEATH

SWAMP GUM (*Eucalyptus ovata*)

Eucalyptus...from Greek, *eu*, well and *calyptos*, covered referring to the cap which covers the developing flowers
ovata...from *ovate* meaning ovately shaped referring to the shape of the leaves

Size: 8-30m H x 8-20m W

Form: fast growing upright tree with open canopy

Habitat: widespread in damp and valley sclerophyll forests, riparian and red gum woodland, grassy low open forest, swamp and riparian scrub.

Bark: dark, hard and rough to various heights, shed in ribbons from upper trunk and branches leaving smooth greyish surface.

Foliage: shiny broad-lanceolate to ovate leaves with distinctive wavy edges

Flowers: usually 7 diamond shaped buds in a cluster, followed by white to cream flowers
flowering time can vary usually March to June

EUCALYPTUS OVATA



RAINFALL (mm)

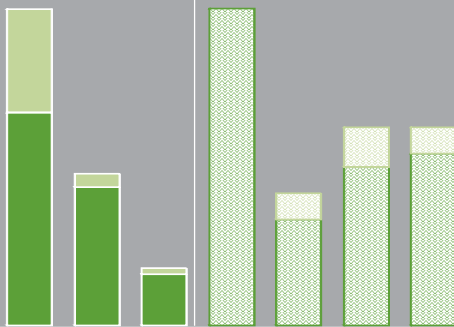
Month	JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEPT	OCT	NOV	DEC	TOTAL
2009 Rainfall	5.0	5.8	33.4	63.8									108.0
1968-2008 Average	43.9	42.5	40.4	40.4									178.4



WATER

TOWN WATER USE (ML)

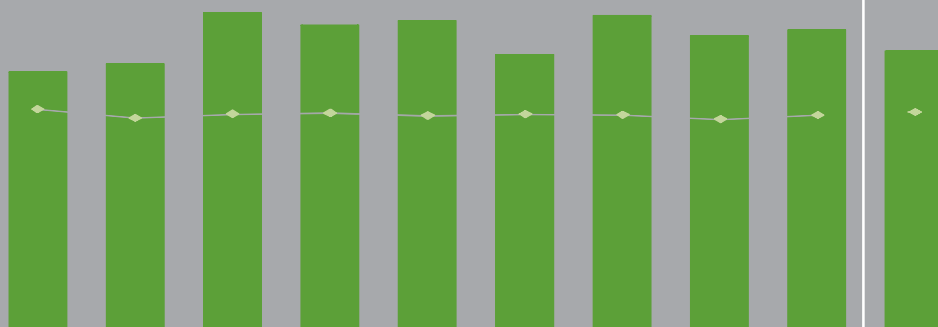
	2000	2008	2009	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
Process	23.9	15.5	5.8	2.5	0.8	1.2	1.3								
Amenity	11.6	1.5	0.7	0.0	0.2	0.3	0.2								



AIR

GREENHOUSE GAS (GHG) TOTAL (Mt) & GHG EMISSION EFFICIENCY (t/MWh)

	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
GHG Mt	1.23	1.27	1.50	1.45	1.47	1.31	1.49	1.40	1.42	1.32
◆ GHG t/MWh	1.24	1.19	1.21	1.21	1.20	1.21	1.20	1.18	1.20	1.22



environmental improvement

Environmental Management Targets	April	2009 Total	Forecast	2009 Target
Reportable Environmental Incidents	0	1	1	0
Env Near Miss vs Env Incident Run Rate (ratio)	4.3	2.5	2.5	2.5
Monthly EHS ASAT Audit Completion (%)	67	84	84	90

Air Emission Targets	April	2009 Total	Forecast	2009 Target
Ambient SO ₂ (no. readings > 200ppb)	0	2	2	0
Stack SO ₂ (no. hrs > 100kg/min)	0	0	0	0
SO ₂ Load Reductions (lost MWh)	2071	7531	22594	N/A
GHG Efficiency (t CO ₂ e/MWh)	1.21	1.22	1.22	1.20
Opacity (10 min av > 0.25g/m ³ normal operation)	0	0	0	0

Water Targets	April	2009 Total	Forecast	2009 Target
Town Water (ML)	1.5	6.5	14.5	14.1
Bore Water (ML)	237	1076	3228	4000

Waste Targets	April	2009 Total	Forecast	2009 Target
Waste to Landfill (t)	3.5	3.5	10.5	8.0
Solid Prescribed Waste to Landfill (t)	0.0	0.0	0.0	0.0

Mine Rehabilitation Targets	2009 Total	2009 Target
2009 Area to Clear (ha)	0.245	0.0
2009 Area to Rehabilitate (ha)	0.658	0.0

OUR ENVIRONMENT AND OUR EMPLOYEE

Hi Dave, I understand you are backfilling Anthea Doran's role during her maternity leave - what does the role involve? The role of Community Relations Officer incorporates community and stakeholder engagement, and local government and media relations. The CRO develops and implements programs designed to build and maintain the necessary relationships with internal and external stakeholders, particularly the Anglesea community.

Is Anthea returning to Anglesea? Yes, Anthea returns to the Anglesea CRO position three days a week in early July.

I understand you are now leaving Alcoa. Where are you off to and what does the new job entail? Sadly April 24th was my last day working with Alcoa Anglesea. Even though I have only been with Alcoa for 18 months, it has been a wonderful experience. However, I am very excited to be commencing a new position with Barwon Water. I will be the Education Officer and will be responsible for hosting tours of Barwon Water facilities, developing educational resources, undertaking community speaking engagements and developing education and community strategies.

Thanks for all your hard work, Dave. We will miss you!

...DAVE RYAN

