

7: TAHMOOR COAL PTY LTD - GROUP MEMBER

Name	TAHMOOR COAL PTY LTD
Australian Business Number (ABN)	97076663968
Australian Company Number (ACN)	076663968
Australian Registered Body Number (ARBN)	-
Trading Name	-
Street address line 1	c/o GFG Alliance Australia
Street address line 2	Level 27
Street address line 3	8 Chifley Square
Street city/suburb	Sydney
Street state	New South Wales
Street postcode	2000
Street country	AUSTRALIA

The following tables summarise total greenhouse gas emissions and energy data for all facilities that were under the operational control of this group member during the reporting period.

GREENHOUSE GAS EMISSIONS (t CO₂-e)

Scope 1	Scope 2	Total of Scope 1 and Scope 2
964,050	91,255	1,055,305

ENERGY PRODUCED AND ENERGY CONSUMED (GJ)

Energy Consumed Total	Energy Consumed Net	Energy Produced
1,635,523	1,635,523	52,678,929

GREENHOUSE GAS SCOPE 1 EMISSIONS BY GAS (t CO₂-e)

Carbon Dioxide CO ₂	Methane CH ₄	Nitrous Oxide N ₂ O	Perfluorocarbons PFCs	Hydro Fluoro Carbons HFCs	Sulphur Hexafluoride SF ₆	Total
171,272	792,522	251	-	-	5	964,050

8: TAHMOOR COAL MINE - FACILITY

Name	TAHMOOR COAL MINE
Facility Street Address	Remembrance Drive TAHMOOR New South Wales 2573 AUSTRALIA
Geographic Coordinates	Latitude 34.250S / Longitude 150.576E
Facility location	-
Activity location	New South Wales
Location description	-
Activity description	-
ANZSIC Code	060 - Coal mining
Operational Control	TAHMOOR COAL PTY LTD
Number of Days with Operational Control	Full Year
Operational Control Dates	01/07/2021 - 30/06/2022
Grid Connected Electricity Generator	No

The following tables summarise total greenhouse gas emissions from operation of this facility during the period that it was under the operational control of TAHMOOR COAL PTY LTD.

GREENHOUSE GAS EMISSIONS (t CO ₂ -e)		
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ENERGY PRODUCED AND ENERGY CONSUMED (GJ)		
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SCOPE 1 EMISSIONS					
EC = Energy Content Factor, Z = Energy Content, EF = Emission Factor					
Source Activity	Fuel / Criterion	Quantity	Energy Values (EC & Z)	Gas / Method	Scope 1 Emissions (t CO ₂ -e)
Source category: Fuel combustion Source of emissions: Stationary and Transport energy purposes (excluding electricity generation) Activity type: Emissions released from combustion of liquid fuels other than petroleum oils or greases - Stationary energy purposes	Fuel / Energy commodity: Diesel oil Fuel usage: combustion Criterion: A	1,551.475 kL	EC (GJ/Unit): 38.6 Z (GJ): 59,887	Gas: CO ₂ EF (kg CO₂-e / GJ): 69.9 Method: Method 1	4,186
				Gas: CH ₄ EF (kg CO₂-e / GJ): 0.1 Method: Method 1	6
				Gas: N ₂ O EF (kg CO₂-e / GJ): 0.2 Method: Method 1	12

<p>Source category: Fuel combustion</p> <p>Source of emissions: Stationary and Transport energy purposes (excluding electricity generation)</p> <p>Activity type: Emissions released from combustion of liquid fuels other than petroleum oils or greases - Transport energy purposes</p>	<p>Fuel / Energy commodity: Gasoline (other than for use as fuel in an aircraft) - Transport post-2004</p> <p>Fuel usage: combustion</p> <p>Criterion: A</p>	<p>0.648 KL</p>	<p>EC (GJ/Unit): 34.2</p> <p>Z (GJ): 22</p>	<p>Gas: CO2</p> <p>EF (kg CO2-e / GJ): 67.4</p> <p>Method: Method 1</p>	1
				<p>Gas: CH4</p> <p>EF (kg CO2-e / GJ): 0.02</p> <p>Method: Method 2</p>	0
				<p>Gas: N2O</p> <p>EF (kg CO2-e / GJ): 0.2</p> <p>Method: Method 2</p>	0
<p>Source category: Fuel combustion</p> <p>Source of emissions: Stationary and Transport energy purposes (excluding electricity generation)</p> <p>Activity type: Emissions released from combustion of liquid fuels other than petroleum oils or greases - Transport energy purposes</p>	<p>Fuel / Energy commodity: Diesel oil - Transport post-2004</p> <p>Fuel usage: combustion</p> <p>Criterion: A</p>	<p>2.863 KL</p>	<p>EC (GJ/Unit): 38.6</p> <p>Z (GJ): 111</p>	<p>Gas: CO2</p> <p>EF (kg CO2-e / GJ): 69.9</p> <p>Method: Method 1</p>	8
				<p>Gas: CH4</p> <p>EF (kg CO2-e / GJ): 0.01</p> <p>Method: Method 2</p>	0
				<p>Gas: N2O</p> <p>EF (kg CO2-e / GJ): 0.5</p> <p>Method: Method 2</p>	0
<p>Source category: Fuel combustion</p> <p>Source of emissions: Stationary and Transport energy purposes (excluding electricity generation)</p> <p>Activity type: Emissions released from combustion of petroleum based oils or greases</p>	<p>Fuel / Energy commodity: Petroleum based oils (other than petroleum based oil used as fuel)</p> <p>Fuel usage: combustion</p> <p>Criterion: A</p>	<p>158.135 KL</p>	<p>EC (GJ/Unit): 38.8</p> <p>Z (GJ): 6,136</p>	<p>Gas: CO2</p> <p>EF (kg CO2-e / GJ): 13.9</p> <p>Method: Method 1</p>	85

Source category: Fuel combustion Source of emissions: Stationary and Transport energy purposes (excluding electricity generation) Activity type: Emissions released from combustion of petroleum based oils or greases	Fuel / Energy commodity: Petroleum based greases Fuel usage: combustion Criterion: A	5.11 kL	EC (GJ/Unit): 38.8 Z (GJ): 198	Gas: CO2 EF (kg CO2-e / GJ): 3.5 Method: Method 1	1
Source Total			66,354		4,299
Source category: Fugitive emissions Source of emissions: Underground mines Activity type: Emissions released from coal mine waste gas flared	Fuel / Energy commodity: Coal mine waste gas that is captured for combustion Fuel usage: combustion	30,592,185 m3	EC (GJ/Unit): 0.0377 Z (GJ): 1,153,325	Gas: CO2 EF (kg CO2-e / GJ): 49.12525 Method: Method 2	55,939
				Gas: CH4 EF (kg CO2-e / GJ): 4.6 Method: Method 2	3,666
				Gas: N2O EF (kg CO2-e / GJ): 0.3 Method: Method 2	239
Source category: Fugitive emissions Source of emissions: Underground mines Activity type: Fugitive emissions from extraction of coal	-	-	-	Gas: CO2 EF (kg CO2-e / GJ): - Method: Method 4	111,052
				Gas: CH4 EF (kg CO2-e / GJ): - Method: Method 4	745,186
Source category: Fugitive emissions Source of emissions: Underground mines Activity type: Fugitive emissions from post mining activities	-	-	-	Gas: CH4 EF (kg CO2-e / GJ): 0.019 Method: Method 1	43,664
Source Total			1,153,325		959,746

Source category: Industrial processes	-	557.75 tonnes	-	Gas: SF6	5
Source of emissions: Emissions of hydrofluorocarbons and sulphur hexafluoride gases				EF (kg CO2-e / GJ): -	
Activity type: Emissions of sulphur hexafluoride gases from gas insulated switchgear and circuit breaker applications				Method: Method 1	
Source Total			-		5
Total			1,219,679		964,050

MATTERS TO BE IDENTIFIED (MTBI) PER SOURCE

Source of Emissions	MTBI	Methods	Activity	Activity Value	Unit
Underground mines	the tonnes of coal mine waste gas (CO2-e) flared	Method 1	-	59844	tonnes (CO2-e)(flared)
Underground mines	the tonnes of raw coal produced	Method 4	Fugitive emissions from extraction of coal	2298116	tonnes
		Method 1	Fugitive emissions from post mining activities	2298116	tonnes
	the tonnes of carbon dioxide captured for energy production on site	Method 4	Fugitive emissions from extraction of coal	0	tonnes (CO2-e)
	the tonnes of methane (CO2-e) captured for energy production on site	Method 4	Fugitive emissions from extraction of coal	0	tonnes (CO2-e)
	the tonnes of carbon dioxide captured and transferred off site	Method 4	Fugitive emissions from extraction of coal	13135	tonnes (CO2-e)
	the tonnes of methane (CO2-e) captured and transferred off site	Method 4	Fugitive emissions from extraction of coal	280090	tonnes (CO2-e)
	the tonnes of carbon dioxide flared	Method 4	Fugitive emissions from extraction of coal	16786	tonnes (CO2-e)
	the tonnes of methane (CO2-e) flared	Method 4	Fugitive emissions from extraction of coal	409770	tonnes (CO2-e)
	whether the mine is a gassy mine or a non-gassy mine	Method 1	Fugitive emissions from post mining activities	Gassy	

SCOPE 2 EMISSIONS

Activity Type	Quantity	Units	Emission Factor (kg CO2-e / unit)	Scope 2 Emissions (t CO2-e)
Purchase and loss of electricity from main electricity grid in a State or Territory	115,512,171	kWh	0.79	91,255
Total				91,255

ENERGY CONSUMED BY MEANS OF COMBUSTION FOR TRANSPORT

Activity Type	Fuel / Energy Commodity	Fuel Usage	Criterion	Sub-criterion	Amount	Units	Energy Content Factor (GJ/Unit)	Energy Content (GJ)
Emissions released from combustion of liquid fuels other than petroleum oils or greases - Transport energy purposes	Gasoline (other than for use as fuel in an aircraft) - Transport post-2004	combustion	A	-	0.648	kL	34.2	22
Emissions released from combustion of liquid fuels other than petroleum oils or greases - Transport energy purposes	Diesel oil - Transport post-2004	combustion	A	-	2.863	kL	38.6	111
Total								133

ENERGY CONSUMED BY MEANS OF COMBUSTION FOR PURPOSES OTHER THAN PRODUCING ELECTRICITY, PRODUCING A CHEMICAL OR METAL PRODUCT OR FOR TRANSPORT

Activity Type	Fuel / Energy Commodity	Fuel Usage	Criterion	Sub-criterion	Amount	Units	Energy Content Factor (GJ/Unit)	Energy Content (GJ)
Emissions released from combustion of liquid fuels other than petroleum oils or greases - Stationary energy purposes	Diesel oil	combustion	A	-	1,551.475	kL	38.6	59,887
Emissions released from combustion of petroleum based oils or greases	Petroleum based oils (other than petroleum based oil used as fuel)	combustion	A	-	158.135	kL	38.8	6,136
Emissions released from combustion of petroleum based oils or greases	Petroleum based greases	combustion	A	-	5.11	kL	38.8	198
Emissions released from coal mine waste gas flared	Coal mine waste gas that is captured for combustion	combustion	-	-	30,592,185	m3	0.0377	1,153,325
Total								1,219,546

ENERGY CONSUMED BY MEANS OTHER THAN COMBUSTION

Activity Type	Fuel / Energy Commodity	Fuel Usage	Criterion	Sub-criterion	Amount	Units	Energy Content Factor (GJ/Unit)	Energy Content (GJ)
Purchase and loss of electricity from main electricity grid in a State or Territory	-	-	-	-	115,512,171	kWh	0.0036	415,844
Total								415,844

ENERGY PRODUCED

Activity Type	Fuel / Energy Commodity	Primary/Secondary	Amount	Units	Energy Content Factor	Converted Amount (GJ)
Energy content of fuel produced	Coking coal	Primary	1,690,121	tonnes	30	50,703,630
Energy content of fuel produced	Coal mine waste gas that is captured for combustion	Primary	30,592,185	m3	0.0377	1,153,325
Energy content of fuel produced	Coal mine waste gas that is captured for combustion	Primary	21,803,021.523	m3	0.0377	821,974
Total						52,678,929