17 May 2019

Refining NZ Operational Update for March/April 2019

HIGHLIGHTS

Continued strong operational performance with high hydrocracker throughput and good operational availability that led to refinery throughput of 7.31 million barrels.

The Company earned NZD 50.1 million in Processing Fees for March/April.

Refining NZ's Gross Refining Margin (GRM) was USD 6.63 per barrel, a strong uplift over the Singapore Dubai complex margin.

Global refining margins recovered somewhat from the lows experienced during the January/February period although margins were constrained by the rise in crude oil prices.

Volumes of products delivered through the refinery to Auckland pipeline remained strong.

Outstanding process and personal safety performance was achieved:
- No Tier 1 or Tier 2 process safety events in the March/April period; and
- No recordable or lost time injuries since November 2018.

Overall operating and capital costs have been controlled tightly versus budget, despite pressure from higher electricity prices.

COMMENTARY

Refining - Margins and throughput

Sustained good hydrocracker throughput and excellent plant uptime combined with refinery throughput of 7.31 million barrels and a Gross Refinery Margin of USD 6.63 per barrel has seen the Company earn NZD 50.1 million in Processing Fees for March/April.

The refinery achieved excellent Operational Availability of 99.9% during the March/April period.

Global refining margins recovered somewhat from the lows experienced during the January/February period although margins were constrained by the rise in crude oil prices caused by geopolitical issues. Gasoline margins improved due to large stock draws in the USA and unplanned outages in Asia while lower Chinese diesel demand and increased diesel export quotas softened diesel margins. Asian fuel oil margins came under pressure due to high inflows from outside the region.

The Singapore Dubai complex margin for the March/April period was USD 0.75 per barrel, impacted by the factors above and also by low naphtha margins. Refining NZ's March/April uplift over the Singapore Dubai complex margin was strong at USD 5.88 per barrel enabled by stable refinery operation, a balanced product slate and locational advantage.

The average exchange rate for the March/April period was USD/NZD 0.68.

Refinery throughput in the March/April period was healthy at 7.31 million barrels. This was impacted slightly by the natural gas supply shortfall resulting from on-going maintenance on the Pohokura offshore gas field facilities. The field operator now plans to complete the required maintenance and restore supply by the end of May.

Refining NZ built its natural gas portfolio on the spot market and, as spot market prices were higher than Refining NZ's term gas contract, this had a negative impact on GRM of USD 0.11 per barrel for March/April. However, this remained preferential to firing more valuable liquid fuels.

Distribution – Refinery to Auckland Pipeline

Pipeline operational availability was high and volumes of products delivered through the pipeline remained strong.

Health, safety and environment

Process and personal safety performance were outstanding with no Tier 1 or Tier 2 process safety events in the March/April period and no recordable or lost time injuries since November 2018.

Costs

Overall operating and capital costs have been tightly controlled versus budget despite ongoing pressure from higher electricity prices.

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OPERATIONAL DATA

		Mar/Apr 2019	Mar/Apr 2018	YTD 2019	FY 2018
Health, Safety & Environment					
LTI	#	0	1	0	5
LTIF	#/200,000hrs	-	-	0.41	0.48
TRC	#	0	1	0	8
TRCF	#/200,000hrs	-	-	0.61	0.76
Tier I Process Safety Events	#	0	0	0	2
Tier II Process Safety Events	#	0	1	0	3
Releases outside of consent	#	0	0	0	5
Refining					
Brent Crude Oil Price	US$/bbl	68.7	68.9	65.2	71.2
Exchange Rate	US$/NZ$	0.68	0.73	0.68	0.69
Operational availability	%	99.9	98.7	99.9	90.7
Refining throughput	Mbbl	7.31	7.00	14.28	40.44
Gross Refining Margin	US$/bbl	6.63	6.82	5.78	6.31
Gross Refining Margin (excluding Fee Floor/Margin Cap)	US$M	48.5	47.5	82.5	255
Processing Fee (after Fee Floor/Margin Cap)	US$M	34.0	33.2	57.8	178.6
Processing fee (after Fee Floor/Margin Cap)	NZ$M	50.1	45.8	85.1	258.7
Distribution					
RAP throughput	Mbbl	3.5	3.6	7.0	21.0

Notes:

1. The information provided in this announcement excludes revenue from distribution or other activities.
2. The Processing Fee results reported in this announcement are subject to change due to post announcement price updates and independent audit.
3. A five year history of Throughput, Margins and Processing Fees is attached below.
4. Refer to the explanatory notes/glossary for a definition of terms.

HISTORICAL INFORMATION - REFINING

		2015	2016	2017	2018	2019
Jan/Feb	Barrels 000's	7,056	6,826	7,160	7,011	6,963
	RNZ USD GRM per barrel [1)]	9.91	7.96	6.58	7.54	4.88
	Singapore Dubai Complex GRM	5.40	4.95	3.42	3.37	-0.32
	Uplift vs. Singapore Dubai Complex [3)]	4.51	3.01	3.16	4.17	5.20
	NZD Processing Fee (million) [2)]	59.6	57.0	45.9	50.8	34.9
Mar/Apr	Barrels 000's	7,411	7,471	5,140	6,958	7,312
	RNZ USD GRM per barrel [1)]	8.77	1.84	9.35	6.82	6.63
	Singapore Dubai Complex GRM	4.82	3.18	3.02	3.75	0.75
	Uplift vs. Singapore Dubai Complex [3)]	3.95	-1.34	6.33	3.07	5.88
	NZD Processing Fee (million) [2)]	62.3	14.8	48.1	45.8	50.1
May/Jun	Barrels 000's	6,416	6,837	7,755	3,910	
	RNZ USD GRM per barrel [1)]	8.55	6.26	7.63	0.18	
	Singapore Dubai Complex GRM	4.24	2.13	2.90	2.02	
	Uplift vs. Singapore Dubai Complex [3)]	4.31	4.13	4.73	-1.84	
	NZD Processing Fee (million) [2); 5)]	48.9	43.3	58.4	0.7	
Jul/Aug	Barrels 000's	7,519	6,833	7,511	7,615	
	RNZ USD GRM per barrel [1)]	7.66	6.20	8.87	6.86	
	Singapore Dubai Complex GRM	2.52	1.86	4.70	2.57	
	Uplift vs. Singapore Dubai Complex [3)]	5.14	4.34	4.17	4.29	
	NZD Processing Fee (million) [2)]	63.5	41.3	63.6	54.3	
Sept/Oct	Barrels 000's	7,221	7,251	6,816	7,639	
	RNZ USD GRM per barrel [1)]	9.47	7.49	9.31	7.09	
	Singapore Dubai Complex GRM	5.12	3.18	4.73	2.47	
	Uplift vs. Singapore Dubai Complex [3)]	4.35	4.31	4.58	4.62	
	NZD Processing Fee (million) [2)]	71.8	52.5	62.2	57.8	
Nov/Dec	Barrels 000's	7,017	7,447	7,342	7,307	
	RNZ USD GRM per barrel [1)]	10.82	9.20	6.83	6.53	
	Singapore Dubai Complex GRM	6.37	4.19	3.67	1.80	
	Uplift vs. Singapore Dubai Complex [3)]	4.45	5.01	3.16	4.73	
	NZD Processing Fee (million) [2)]	73.0	67.6	50.7	49.2	
Total	**Barrels 000's**	**42,639**	**42,665**	**41,724**	**40,440**	**14,275**
	USD GRM per barrel [1)]	**9.20**	**6.47**	**8.02**	**6.31**	**5.78**
	NZD Processing Fee (million) [2)]	**379.2**	**276.6**	**328.9**	**258.7**	**85.1**
	YTD Cap adjustment	**14.4**				
	NZD Processing Fee (million) [1)]					

1) Excludes Fee Floor/Cap adjustment
2) Includes Fee Floor/Cap adjustment
3) RNZ uplift vs. Singapore Dubai Complex GRM is in USD per barrel

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EXPLANATORY NOTES/GLOSSARY

LTI (Lost time injuries) and LTIF (Lost time injury frequency)

Lost time injuries refer to fatalities, permanent disabilities or time lost from work.

Lost time injury frequency refers to the number of lost time injuries over a rolling 12-month period, per 200,000 hours worked.

TRC (Total recordable cases) and TRCF (Total recordable case frequency)

Total recordable cases refer to lost time injuries, medical treatment and restricted work cases.

Total recordable case frequency refers to the number of recordable injuries over a rolling 12-month period, per 200,000 hours worked.

Tier 1 Process Safety Event (API 754)

A tier 1 Process Safety Event (PSE) is an unplanned or uncontrolled release of any material, including non-toxic and non-flammable, from a process which results in one or more of the following: A LTI and/or fatality; a fire or explosion resulting in greater than or equal to $25,000 of direct cost to the company; a release of material greater than the threshold quantities given in Table 1 of API 754 in any one-hour period; an officially declared community evacuation or community shelter-in-place.

Tier 2 Process Safety Event (API 754)

A tier 2 Process Safety Event (PSE) is an unplanned or uncontrolled release of any material, including non-toxic and non-flammable, from a process which results in one or more of the following: A recordable injury; a fire or explosion resulting in greater than or equal to $2,500 of direct cost to the company; a release of material greater than the threshold quantities given in Table 2 of API 754 in any one-hour period.

Operational availability

Operational availability is the percent of time available for manufacturing after subtracting maintenance and regulatory/process downtimes.

Refining throughput

Refining throughput is the volume of feedstock intake, comprising crude oil, residues, natural gas and blendstock, measured in barrels. One barrel equates to approximately 159 litres.

Gross Refining Margin (excluding Fee Floor/Margin Cap)

The Gross Refining Margin is calculated in USD as the difference between the value of products and the cost of feedstock for each refining customer. The value of products use Singapore quoted prices adjusted for New Zealand quality and the cost of importing those products to New Zealand. Feedstocks are valued using the notional market values adjusted for the cost of getting the feedstock to the refinery. The Gross Refining Margin incorporates the cost of hydrocarbon used as fuel and incurred as process losses.

Typically, Refining NZ has an uplift over the Singapore complex margins of around USD 3.00 to 4.00 per barrel. The value of the uplift varies due to fluctuations in freight rates, product quality premium, crude market premium and operational performance. Product quality premium are the cost differentials between products made to New Zealand quality and products made to the quality that applies to quoted prices in Singapore. Crude market premium are the cost differences between the crude types actually processed at Refining NZ and Dubai (used as basis for the Singapore complex margins). Refining NZ's crude diet comprises of crudes that price off Dubai as well as crudes that price off different markers such as Brent. The fluctuations of these price markers relative to each other impact the uplift.

Margin Cap/Fee Floor Adjustment

The processing agreements with our customers contain both Floor and Margin Cap clauses, both effective over a full calendar year.

The Fee Floor is the minimum Processing Fee due, for a calendar year, up to a current maximum of NZD 137.5 million. If the year-to-date Processing Fee is below the pro-rata Fee Floor, then an interim pro-rata Fee Floor payment is made by the Customers. Should the Processing Fee exceed the Fee Floor in future months any pro-rata Fee Floor payments that have been made are repaid to the Customers.

The Margin Cap limits the Gross Refining Margin for each customer to a maximum of USD 9.00 per barrel over the calendar year. Should the Gross Refining Margin fall below the Cap in future months any pro-rata Cap reductions that have been made are repaid by the Customers.

The Cap and the Floor are subject to year-to-date adjustments.

Any balance remaining at the end of the year cannot be carried over to the next year.

Processing Fee (after Fee Floor/Margin Cap)

The Processing Fee is 70% of the Gross Refining Margin after any adjustment for the Margin Cap or Fee Floor. The Processing Fee is paid by our customers in NZD.

RAP throughput

RAP throughput is the volume of refined products, comprising gasoline, jet fuel and diesel that are delivered via the Refinery to Auckland Pipeline (RAP) to the Wiri oil terminal.