

Impact of entry of Brazilian product into the Indonesian market

MLA wants to understand the potential impact of Brazilian beef entering the Indonesian market. Currently, the market is regulated to address the following objectives:

- maintain and support producer prices while improving local production and productivity
- stabilise and manage retail beef prices, especially in wet markets, during high-demand periods of the year around festival dates.

To simulate the impact of another competitor in this market, the analysis is based on the following scenario and judgements:

- the Indonesian government will manage both the volume and the retail price of Brazilian beef as they do for Indian product, which is purchased by state-owned-enterprises for distribution nationally.
- consumer tolerance levels for retail beef prices in the wet market as of July 2019 was between 110 000 to 120 000 IDR per kilogram or \$A11.30 to 12.30 per kilogram.
 - In the modern retail sector, the government would be looking at retailers making available a meat product SKU at not more than IDR 80 000 per kg. The retailers can, however, sell other SKUs above the IDR 80 000 per kilogram (\$A 8.20 per kilogram).
 - Brazil is claiming that they can match the Indian carabeef prices and it assumed that it would be sold at similar price point to carabeef in the wet market environment.
- The tentative volumes for Brazilian beef is up to 50 000 tonnes to start with but for this to potentially increase further in coming years, to about 100 000 tonnes product weight annually.
 - Carabeef meat import allocation is around 100 000 tonnes product weight per year now (India shipped 32 000 tonnes to Indonesia between Jan-Apr 2019).

Price analysis

Using data supplied by MLA, basic comparisons were made to assess if these assumptions were justified.

Table 1 below shows that Brazilian CIF prices in the region are comparable to those received by Indian frozen boneless product on average, noting that Brazil exports:

- relatively low-quality frozen beef to the Philippines for processing
- frozen product to Malaysia which could be different specification to that required by Indonesia.

1 CIF prices of Indian and Brazilian product^a

Calendar year	Malaysia	Philippines	Indonesia	Average
	US\$/kg	US\$/kg	US\$/kg	US\$/kg
India				
2018	3.31	2.70	3.56	3.27
2019	2.80	2.61	3.32	2.90

Calendar year	Malaysia	Philippines	Indonesia	Average
Brazil				
2018	4.07	2.96	na	3.16
2019	3.62	2.66	na	2.81
	Rupiah/kg	Rupiah/kg	Rupiah/kg	Rupiah/kg
India				
2018	47 045	38 447	50 690	46 511
2019	39 677	36 975	46 974	41 016
Brazil				
2018	57 853	42 130	na	44 961
2019	51 337	37 720	na	39 868

^a Weighted average of monthly prices rather for each calendar year (not simple arithmetic averages). The Rupiah to US\$ exchange used were 14231 for 2018 and 14164 for 2019.

Source: MLA supplied trade data.

Table 2 shows how landed prices of Indian product from table 1 line-up with equivalent Indian export fob values. It is common that fob prices may be *higher* than equivalent cif prices (that is, they are not internally consistent). This could come about due to:

- the use of average exchange rates and forward selling
- timing differences and inaccuracies in reporting at either end.

2 Comparing Indian product prices to the region

	Indian fob return ex-Mumbai		Indian landed price
	Rupees/kg	US\$/kg	US\$/kg
Indonesia			
2018	242	3.54	3.27
2019	242	3.46	2.90
Malaysia			
2018	216	3.15	3.31
2019	212	3.04	2.80
Philippines			
2018	186	2.72	2.70
2019	174	2.50	2.61

^a The Rupees to US\$ exchange used were 68.4 for 2018 and 69.8 for 2019.

Source: APEDA data and MLA supplied trade data.

Even given these constraints, anecdotal evidence is that the freight from Mumbai to Malaysia/Jakarta is modest. Therefore, it would reasonable to expect that Brazilian product to have a higher transport component (and therefore lower fob return) unless this product is jumping off shipments already made to Singapore and Malaysia.

What was simulated

The basis of the simulation is that Brazilian product is imported by Indonesian authorities to stabilise retail prices (and limit future price increases) just as they have used Indian carabeef. To that end, it has been assumed that:

- Brazilian exporters match Indian landed prices for frozen boneless product (which appears feasible)
- There is a similar distribution mark-up to Indian product to achieve a similar retail price outcome
- for India: imports will be 100 kt product weight for 2019 and then the same allowance for 2020
- for Brazil: the first year of imports is assumed to be 2019 with 50 kt product followed by 100kt product weight in 2020.

In the case of Australian live cattle exports, the policy environment is dynamic. Despite the policy uncertainty, feeder and slaughter exports were up 23 per cent year-on-year as of June 2019 and 13 per cent on a calendar year-to-date.

Beyond 2020, to illustrate possible medium-term outcomes, it has been assumed that the Indonesian authorities would need to increase imports from Brazil and India at an average rate of 4 per cent each year to, at minimum, to stabilise retail beef prices.

Results discussion

Results are summarised in a spreadsheet that is available upon request to MLA. The summary page:

- identifies baseline and the results: the change from baseline;
- focuses on 2019, 2020 and 2021 through to 2025
- identifies model outcomes for both Australia and Indonesia.

There are some key mechanisms to be mindful of:

- the impacts of additional Brazilian and Indian product are shared between Indonesian consumers and competing suppliers to the market
 - Given that per person consumption of beef is low and the market is nowhere near saturation, consumers freely purchase the additional product at the lower price. In 2019 and 2020, total beef consumption increases by 11.3 and 19.3 per cent (see embolden numbers in the results).
 - As a result of the increase, the impact on other suppliers is relatively modest with consumption of Indonesian native and lot-fed beef declining by -0.4 and -0.9 per cent for 2019 and 2020 (also see embolden numbers in the results).
 - Australian and NZ boxed product takes the largest adjustment, Australian product declines by 10 kt cwe or 12.7 per cent, even though competition between these products is limited in wet markets.
- a mild reduction in demand for both Australian boxed and lot-fed cattle in Indonesia, with higher quantities of boxed product from India and Brazil, results in a loss of market share of 4.6 and 7.4 percentage points for 2019 and 2020
- the overall growth in consumption, however, means that Australian boxed and lot-fed cattle exports to Indonesia will continue to grow from current levels
 - See box 3 below which explains how the model's structure contributes to this outcome.

3 Details on the demand-side Global Meat Industries (GMI) structure

To clarify why Australian boxed falls by a greater degree than lot-fed/Australian live cattle exports, it is necessary to understand the structure of the GMI/IF model used for all 24 importing regions. This structure is a simplification of reality but should be informed about how the market is operating.

At a highest-level, the decisions to source beef starts with aggregate demand across retail, food service and processing sectors which depends on population, income and relative retail prices with other meats. How this demand is comprised depends on a nested approach.

- The wholesale level makes this decision by substitution between three beef sources: local native production, local lot-fed production and imported boxed beef.
 - The ability to substitute between each of these sources is determined by price elasticities. These elasticities reflect that imported boxed product from all suppliers is a stronger substitute for product from Australian lot-fed cattle relative to product for local domestic cattle.
- At the next decision-level, imports of boxed beef are then allocated between supplying countries (Australia, New Zealand, India and Brazil) based on relative prices).
 - To simulate the impact of Brazilian product, the local price of that product is lowered by the reduction of the tariff equivalent (of the FMD ban that was sufficiently high to keep Brazilian product out of the Indonesian market).
 - Currently, the scope for substitution between product by supplying countries is high, reflecting that decisions are largely based on price rather than quality or any specification.

The other driver of results is the diversion of Australian boxed product and live cattle to other export markets in response to lower returns. This in turn depends on the responsiveness of supply of Australian boxed product, and the responsiveness of the lot-fed sector which in turn depends on the supply elasticity of northern feeder cattle into the Indonesian market.

- The supply of Australian boxed product will be highly sensitive to prices as there are a number of alternative equivalent markets for which Australia already has access.
- However, Australian live exporters have fewer options for the diversion of product. That is, the scope to divert northern feeders to Vietnam (in the GMI/IF 'other countries' group) and Malaysia. The results show that this diversion is significant. Of the reduction in demand of 5 000 head from Indonesia in 2020, 3 400 head or 70 per cent are diverted to the 'other countries' group.
- This answers the question concerning the relatively modest impact on feeder prices. The question then is how realistic this is. Given the cattle types, Vietnam would be the likely candidate. In 2018, live exports were around 201 000 head to Vietnam. An additional 3 400 head is equivalent to a 1.7 per cent increase.

Bottom line

The bottom line is that the entry of Brazilian product into the Indonesia market negatively impacts Australian producers, but less than expected as a result of product substitution between competing suppliers and product diversion to other markets.

- Critically, the results for the Australian market share outcome and price impact depends on the ability of the Indonesian market to absorb the additional supply from Brazil (and India).
 - If their market was saturated, the impacts on Australian product would be significantly higher.
 - Therefore, it comes down to the assumption of the increase in total consumption of beef.
- The other assumption is Australia's ability to divert live cattle exports to alternative markets, particularly Vietnam.
 - Naturally, these outcomes are linked. If demand for Australian live cattle falls more than shown here, then diversion of those cattle becomes more difficult with a greater impact on Australian prices.

For outcomes for the national industry for 2019 and 2020:

- Industry gross value of production (GVP) is expected to be 0.21 to 0.33 per cent lower compared to the baseline without Brazilian entry
- Industry net income, or a measure of profitability, would be around 1 per cent lower than otherwise the case.