

# The latest insights in global dairy markets

Your regular global overview of the dairy industry along with trends in milk production, commodity prices and dairy trade



# Welcome back to Perspective!

This month Shelley McMillan, Trend and Innovation Consultant at Mintel, shares insight into the opportunity for dairy in the growing snack market.

#### Production, exports, imports and pricing

- Further decline in Australian production, EU production flat.
- New Zealand and EU exports up for the year, increase in US exports.
- Strong import growth in China, Latin America and Asia imports grew over the year.
- GDT Price Index stayed relatively stable in August with two small decreases. Decreased -1.6% at TE 193 and -0.4% at TE 194. WMP prices remained very stable, as did SMP, whilst AMF and butter decreased.
- WMP prices increased with Dutch Dairy Board (DDB) increasing significantly up +6.8%, SMP powder prices declined, butter price changes were mostly positive with DDB up +8.0% and cheese prices were mixed.

If you have any suggestions for topics you would like to read about in Perspective, or any other general feedback, we would love to hear from you. You can contact us at **nzmpbrand@fonterra.com** or through your account manager.

#### Kind regards,

The Perspective team

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# DAIRY OPPORTUNITIES IN SNACKING

Consumers today consider most foods could be a snack. Snacking has changed traditional eating patterns, as the standard three meals a day are increasingly complemented, or replaced with snacks. Indeed, research from Mintel reflects this decline in formality around eating occasions.



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Shelley McMillan is currently Trend and Innovation Consultant – ANZ at Mintel. She is responsible for creating insight reports that delve into product category trends, and customised consulting projects around clients' strategic innovation objectives. Over her career, she has worked at major FMCG companies across multiple markets including Australia, New Zealand and EMEA, and has experience in marketing, managing brand strategy and new product launches. She is also a qualified food technologist.

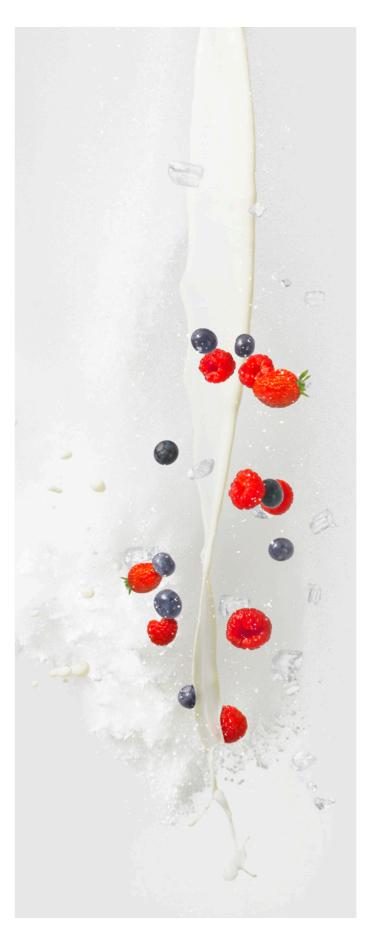
As many as 93% of UK consumers snack, close to one in three metropolitan Australians who snack, eat them instead of having a meal, and 55% of Americans say they snack two to three times per day.

Snacking is ingrained in many consumer lifestyles around the world and brands are swiftly innovating to appeal to these growing consumer preferences. Data from Mintel's Global New Products Database (GNPD) highlights that so far in 2017, 14% of food products launched globally have been snack products, up from 12% in 2013.

Consumers' snacking ethos has benefited from the broader movement towards quick, on-the-go consumption of all foods and beverages. As snacking becomes an almost ubiquitous part of a consumer's diet, 'snacks' will continue to move beyond classic snack categories. Today, trends — and the recent product launches — show that snacks can range from the small and indulgent to the large and nutritious, as well as everything else in between.

#### Snacks help manage hunger

Eating smaller, regular meals and snacks has become a popular approach to managing hunger. Highlighting the importance of the satiety of snacks, over one in four metropolitan Australian snackers look for snacks that keep them fuller for longer. This makes managing appetite the second most important factor, after low-reduced sugar content, when buying snacks. In China, 12% of consumers say they would use snacks to replace a meal but as many as 51% say they snack to satisfy hunger.



# So how can dairy further expand in the snacking space?

As convenience becomes more of a priority, and something consumers are willing to pay for, targeting the on-the-go eating occasion with portable and convenient food and drink options is an increasingly common tactic to fit with consumers' busy lifestyles.

The out-of-home market for dairy products is a growing opportunity. Mintel research found that yoghurt, a popular dairy option, was eaten by over four in 10 metropolitan Australians as a snack in 2016. However, out-of-home consumption of yoghurt was low; just 18% of city-dwelling Australian snackers ate yoghurt at work or their place of study, while none consumed it when on-the-go. This contrasts with considerable European demand for on-thego yoghurt. For example, 42% of Spanish consumers and 40% of Polish consumers agree that yoghurt is a good option for snacking on-the-go, and in Italy, this number is a little less at 35%. Despite this obvious potential, the development of on-the-go yoghurts remains nascent. In 2016, less than 2% of yoghurt launches were explicitly positioned as suitable for on-the-go consumption. This reflects the challenge that most dairy products have due to their chilled storage requirements.

#### Flexible packaging suits those on-the-go

Gearing dairy products to on-the-go consumption lends itself to more flexible, pouch packaging that does not require a spoon, and single serves that can be consumed in one sitting. Resealable packaging can also increase portability and help reduce waste at the same time. Matching milk and yoghurt products to on-the-go eating occasions, including breakfast and refuelling after working out, will help grow a consumer dairy base in the on-the-go snacking space.

#### New 'snack meals' hit market

Globally, we have also seen a new wave of nutrient-dense cheese products that cross the lines between 'snacks' and 'meals' coming to the market, targeting young, health-seeking snackers. These chilled or shelf-stable snacks combine cheese with nuts, dried fruit, edamame beans and pretzels, as well as sweeter options such as dark chocolate-covered coffee beans and mini flapjacks.



#### **Sugar scrutiny**

More and more consumers around the world are keeping health and wellness on their radars, with many re-evaluating their dietary and lifestyle choices. Sugar, in particular refined and added sugars, continue to be scrutinised. Mintel findings show that refined sugar was the top ingredient avoided by some 47% of metropolitan Australians in their daily diet in 2016, while 62% of UK consumers say they are concerned about the amount of sugar in food and non-alcoholic drinks. On the other hand, over half of consumers in Poland, Spain and Italy say they are interested in yoghurt and yoghurt drinks sweetened with natural sugar alternatives, such as stevia.

#### Changing perceptions towards dairy fats

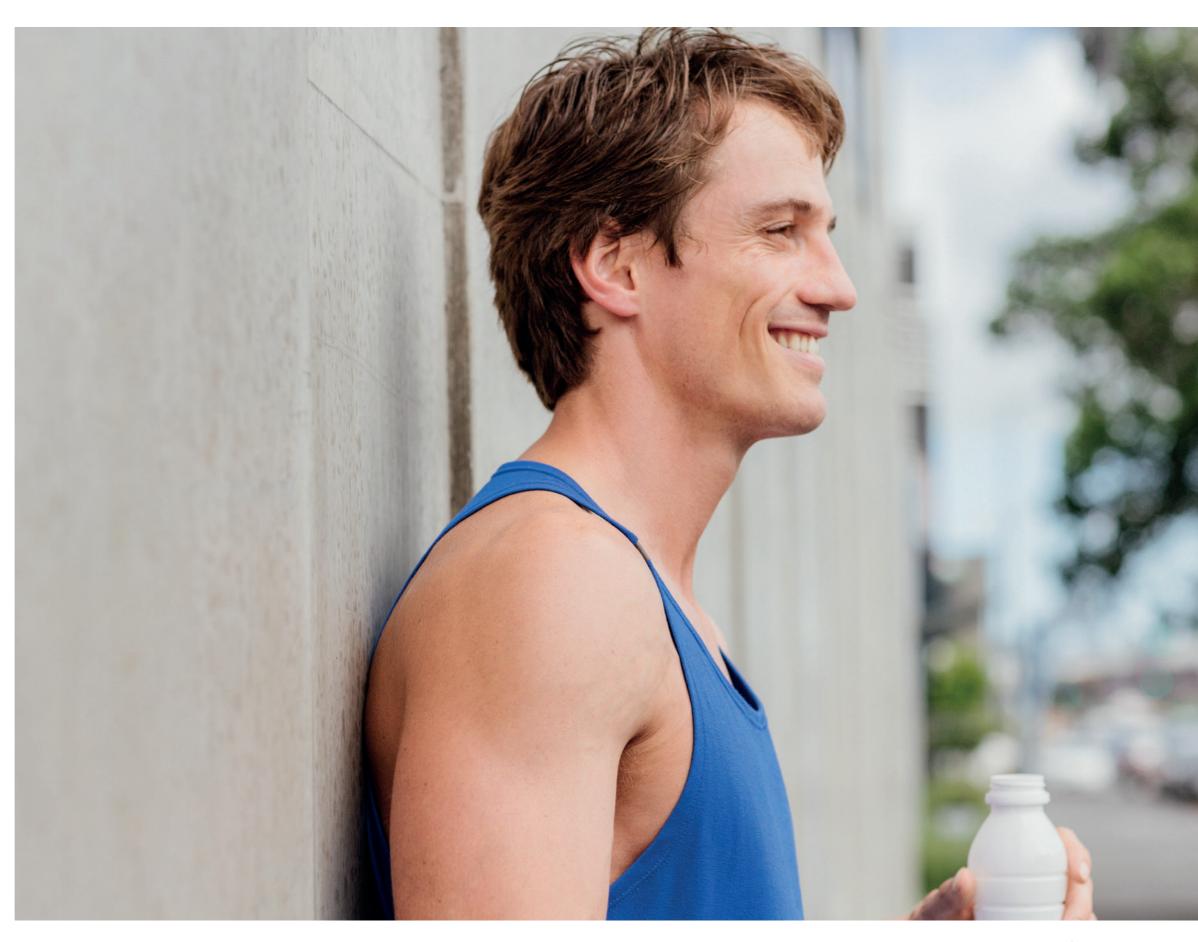
Consumers' evolving attitudes to fat are also important for the dairy industry. Indeed, as many as 85% of US consumers who eat natural cheese view this as a healthy snack option. With a re-evaluation of the risks posed by saturated fats, traditional full-fat dairy products have started to be re-introduced in place of lower fat variants that may have added or higher sugar contents.

#### Emerging focus on gut health

Consumers are starting to recognise the importance of gut health and its contribution to overall health. This should encourage the use and promotion of ingredients in dairy products that build or maintain a healthy gut. Additionally, more consumers are embracing active lifestyles and are on the lookout for food and drink products to complement their health and wellness routines. This has put an increased emphasis on energy and performance linked claims across a wide range of food and drink products, not just traditional sports nutrition products — an area of opportunity for dairy.

#### The rise of "free-from"

Finally, the health halo that surrounds consumers today has given rise to the free-form — including dairy-free segment in the market. Dairy-free alternatives are finding a particularly strong audience among Millennials and this highlights the importance for the dairy industry to focus on adding value to dairy products, creating new flavours or formats for dairy, or improving consumers' perceptions about dairy while satisfying their growing food and beverage demands.



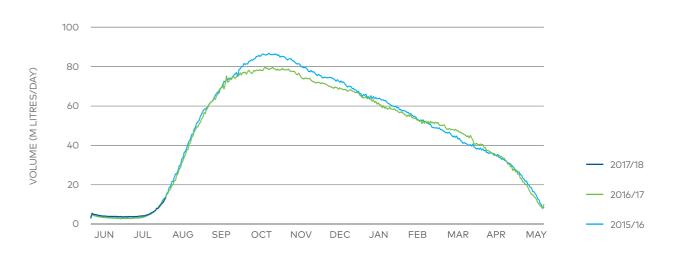




# **FURTHER DECLINE IN AUSTRALIAN PRODUCTION, EU PRODUCTION FLAT**

To view a summary of year-on-year changes in production **click here** 

#### FONTERRA NEW ZEALAND MILK COLLECTION 2016/2017 SEASON



#### **New Zealand**

**Production change** for the 12 months to June 2017

For the 12 months to June, milk production was down -1% compared to the same period the previous year.

Total New Zealand milk production in June was up +21% compared to the same month last year.

In New Zealand, volumes are typically low at this time of year due to seasonality of supply. Volumes will start to build over the coming months.

#### **Australia**

**Production change** for the 12 months to May 2017

Production for the 12 months to May was down -8% compared to the same period last year. Wet conditions in winter and spring heavily impacted volumes, though late seasonal recovery was seen in some regions.

Australia production in May decreased -3% compared to the same month last year.

#### **European Union**

**Production change** for the 12 months to May 2017

Production for the 12 months to May was down -2% compared to the same period last year.

EU production in May was flat compared to the same month last year.

Ireland, Spain and Poland were up +7%, +4% and +3% respectively, while the two biggest producers in Europe, Germany and France, were down -2% and -3% respectively. This is largely due to continued adverse weather conditions.

#### **United States**



Production change for the 12 months to June 2017

Milk production for the 12 months to June increased by almost +2% compared to the same period the previous year.

increased +2% compared to

the same month last year.

Monthly volumes have been

+2% for each of the past 12

increasing at a rate of around

US production in June

months.

New Zealand collections in July reached 17 million kgMS, +5% up on the same month last season. Although collections through early July were higher, they have now eased as incentives to boost winter production finish. Conditions are currently challenging on-farm after continued wet weather through July. Spring calving is now underway and farmers will be hoping for drier weather as the season

#### **New Zealand Collection**

Increase for the season from 1 June to 31 July

Fonterra's milk collection across New Zealand for the two months to 31 July reached 29 million kgMS, +10% ahead of the same period last season, but generally in line with more normal production levels.

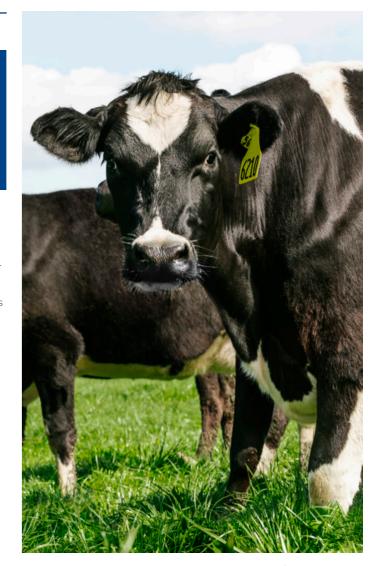
progresses.

#### **Australian Collection**

Increase for the season from 1 July to 31 July

Fonterra's milk collection across Australia in July, the first month of the 2017/18 season, reached 8 million kgMS, +2 million kgMS higher than July last season.

In July, more than 50 farmers moved supply to Fonterra from other milk processors. This combined with a milder winter than last year has resulted in a significant lift in milk volumes, although it is still early in the season.



Sources: Data from Global Trade Information Services and from government and industry websites, including USDA, Eurostat, High Ground Dairy, Dairy Australia and Dairy Companies Association of New Zealand





# **NEW ZEALAND AND EU EXPORTS UP FOR THE YEAR, INCREASE IN US EXPORTS**

To view a summary of year-on-year changes in exports click here

# STRONG IMPORT GROWTH IN CHINA, LATIN AMERICA AND ASIA IMPORTS GREW OVER THE YEAR

To view a summary of year-on-year changes in imports **click here** 

#### **New Zealand**

**Export change for** the 12 months to May 2017

For the 12 months to May, exports were up +2%, or +64,000 MT compared to the same period the previous

WMP and SMP, which make up 54% of New Zealand exports, were both flat. Fluid and fresh dairy and cheese were up +67,000 MT and +16,000 MT respectively, a combined increase of +16%. This was partially offset by declines in AMF and casein. down a combined -11%.

Total New Zealand dairy exports in May increased +1% compared to the same month last year. Combined growth of +14% in WMP and cheese was offset by declines in AMF and SMP, down -40% and -14% respectively.

#### Australia

Export change for the 12 months to May 2017

Exports for the 12 months to May were down -4%, or -31,000 MT, on the previous comparable period.

SMP exports continued to decline, down -25%. This was partially offset by increases in fluid and fresh dairy, up +8%.

Australia dairy exports in May decreased -6% or -4,000 MT compared to the same month the previous year.

Increases were seen across the two largest export categories, fluid and fresh dairy and cheese, up a combined +7,300 MT. This was offset by declines in most other categories, particularly whey powder, WMP and SMP, down a combined -8,000 MT compared to the same month last year

#### **European Union**

**Export change for** the 12 months to April 2017

Exports increased +2% or +104,000 MT for the 12 months to April compared to the same period the previous year. Growth continues to be driven by cheese and infant formula, up a combined +10% or 122,000 MT.

EU dairy exports in April decreased -3% or -14,000 MT compared to the same month

Fluid and fresh dairy, the largest export category, was down -19% or -26,000 MT. Growth in other key categories such as SMP and cheese reduced the overall impact of this decline

#### **United States**

Export change for the 12 months to May 2017

For the 12 months to May. exports increased across all of the major exporting products except lactose which was flat.

US dairy exports increased

+15% or +26,000 MT in May, compared to the same month last year. Production volumes continue to increase at a rate of around +2% MOM. Growth was driven by SMP, cheese and whey powder, three of the largest US export categories, up +32%, +47% and +17% respectively

#### China

Import change for 12 months to June 2017

Imports for the 12 months to June were up +8%, or +170,000 MT, compared to the same period last year. Whey powder, infant formula and cheese. three of the larger import categories were up a combined +19% or +140,000 MT.

China dairy imports were up +27% or +52,000 MT in June compared to the same month last year. Growth was seen across all categories except for lactose.

#### Middle East & Africa Asia (excluding China)

Import change for 12 months to April 2017

Imports for the 12 months to April were down -4%, or -145,000 MT, compared to the same period the previous year. Declines were seen across all major categories except SMP, which was up +4%.

Middle East and Africa

dairy imports decreased -11%, or -37,000 MT, in April compared to the same month the previous year. This is largely due to fluid and fresh dairy, butter and infant formula, down a combined -27,000 MT.

Import change for 12 months to April 2017

For the 12 months to April, imports were up +12%, or +468,000 MT. compared to the same period last year. Increases were seen across all major import categories.

WMP, cheese and lactose were up +18%, +14% and +19% respectively, while SMP and infant formula were down a combined -10%

Asia (excluding China)<sup>1</sup> dairy imports increased +5%, or +17,000 MT, in April compared to the same month last year.

1 Includes estimate for Indonesia (April) and Macad (October-April)

#### **Latin America**

Import change for 12 months to April 2017

Imports for the 12 months to April were up +10% or +179,000 MT, compared to the same period the previous year. Growth was driven by increased imports of cheese and WMP, up a combined +21% or +116,000 MT.

Latin America<sup>1</sup> dairy import volumes decreased -10%, or -17,000 MT, in April compared to the same month last year. WMP and fluid and fresh dairy, which were down a combined -29% or -17,000 MT, led this decline

1 Excludes Nicaraqua

Russia

Import change for 12 months to June 2017

Imports to Russia are -2% for the 12 months to June 2017 compared to the same period the previous year.

Russia import volumes -18% for June compared to the same month the previous

Sources: Data from Global Trade Information Services, US Dairy Export Council, EU Milk Market Observatory, Dairy Australia, High Ground Dairy and Eucolait

Source: Data from Global Trade Information Services; EU Milk Market Observatory; FAO; Highground Trading Group





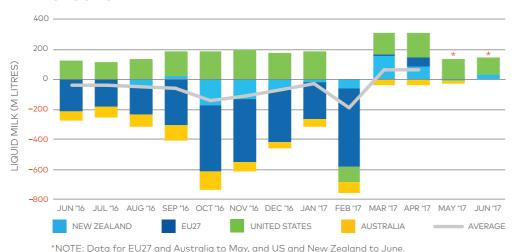
#### **Global Dairy** Market

The charts on the right illustrate the year-on-year changes in production, exports and imports for a range of countries that are important players in global dairy trade.

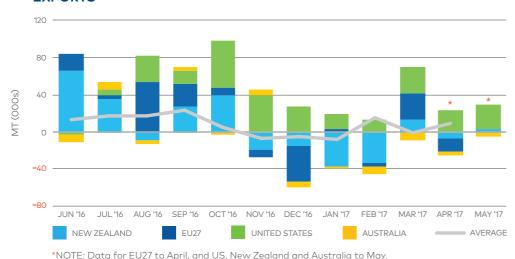
Where countries are not shown, this is likely due to data not yet being available at time of publication.

For further information click here

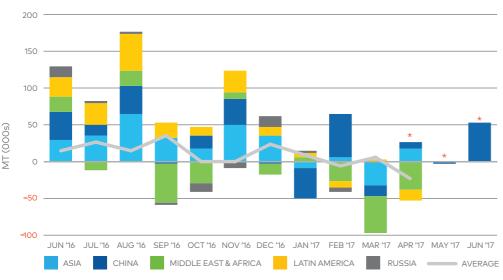
#### **PRODUCTION**



#### **EXPORTS**



#### **IMPORTS**



\*NOTE: Data for Asia, Middle East and Africa and Latin America to April, Russia to May, China to June.

## **Food Price**

FAO Food Price Index averaged 179.1 points in July 2017, increasing for the third month in a row and +10.2% above year ago level. The Dairy Price Index averaged 216.6 points in July 2017, up +7.6 points from June, but still -21% below peak reached in February 2014. Prices of butter, cheese and WMP increased but SMP declined. Butter prices reached a new high with tight supply.

Source: FAO



## **Economic**

Composite leading indicators (CLIs) continue to point to stable growth momentum in Japan, Canada and the euro area as a whole. Stable growth is also now expected in US and Italy but UK continues to show signs of easing. Growth looks to be gaining momentum in Germany, France, China and Brazil. India growth is stable while Russia looks to be easing.

Source: OECD



## Consumer

The Economist Intelligence Unit (EIU) global growth forecast for 2017 is 2.8%. EIU changed forecast for business cycle downturn in US predicting a downturn early 2020 as opposed to early 2019 as originally forecast. This means 2019 growth will be quicker at 2.2% and 2020 will be slower at around 0.8%. EIU revised up their forecast for growth in the euro zone in 2017 from 1.9% to 2%. EIU expects an earlier than calculated demise for the Venezuela government led by Nicolás Maduro, with a debt default likely in later in 2018 or in 2019.

Source: Economist Intelligence Unit

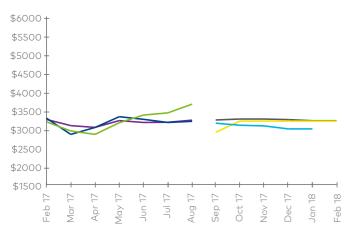


## Weather

In EU, warm weather conditions hampered pasture growth and cow comfort during July, which led to weak levels of production. In South Australia, much needed rainfall helped to stabilise crop conditions, however increasing dryness in southern West Australia is slowing the wheat and hay crop conditions. In New Zealand the beginning of July saw early calves arriving in very wet conditions, soil moisture is currently above average which could hamper production. ENSO remained neutral across the tropical pacific during July 2017.

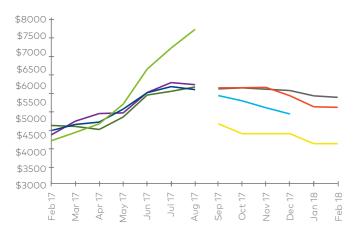
Sources: World Agricultural Weather Highlights USDA oCOE; Dairy Australia Production Inputs Monitor

### **WMP**



- WMP prices all increased in July. Dutch Dairy Board (DDB) prices rose by +6.8% to USD 3654/MT, USDA Oceania up +1.8% to USD 3225/MT, and GDT up by +1.0% to USD 3194/MT.
- Average futures and forecasts for six month period August to January 2018 stayed relatively flat. NZX Futures average price from September to January 2018 lifted by +0.7% to USD 3233/ MT and average forecasts Rabobank Oceania increased +1.6% to USD 3150/MT. Informa Oceania average prices were slightly down by -0.8% to USD 3057/MT.

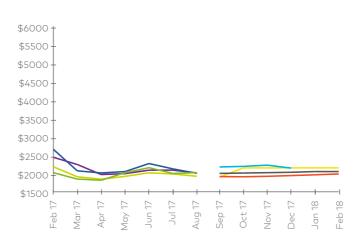
### **Butter**



- In July 2017, butter price fluctuations were mostly positive. DDB pricing rose by +8.0% to USD 7642/MT and CME Spot up by +2.3% to USD 5906/MT. GDT down by -1.5% to USD 5826/MT and USDA Oceania also slightly down by -1.0% to USD 5975/MT.
- Forecast and futures mostly decreased the average price from August to January 2018. NZX Futures down by -3.6% to an average price of USD 5768/MT, Rabobank Oceania down by -2.2% to USD 4450/MT, and Informa Oceania down to -1.5% to 5379/MT. CME Futures stayed flat at +0.2% to USD 5651/MT.

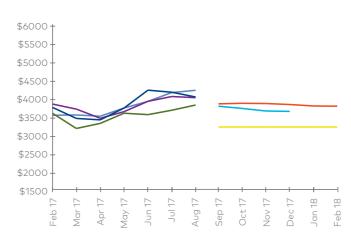


#### **SMP**



- SMP prices continued to decline in August with the exception of DDB up by +1.1% to USD 2020/MT. GDT decreased -5.7% to USD 2001/MT, USDA Oceania down by -3.6% to USD 2013/MT and USDA NASS down -3.1% to USD 1923/MT.
- Changes to futures and forecast were mixed for the next six months average pricing. CME Futures down -6.3% to an average price of USD 1938/MT and NZX Futures decreased by -1.7% to USD 2027/MT. Rabobank Oceania and Informa Oceania increased their forecasts +2.0% and +0.9% respectively.

## Cheese



- Cheddar cheese prices are mixed. CME Spot price rose by +3.9% to USD 3799/MT and EU Commission up by +1.5% to USD 4200/MT. GDT down by -3.1% to USD 4018/MT and USDA Oceania slightly down by -0.8% to USD 4000/MT.
- Futures and forecasts stayed relatively flat for the average prices for the next six months. CME Futures increased +2.5% to an average price of USD 3812/MT and Rabobank stayed flat. Informa Oceania decreased -1.0% to an average USD 3684/MT.



#### **TRADING EVENT 194**

**WMP** 

\$3,143

**SMP** 

\$1,968

**AMF** 

\$6,199

**Butter** 

\$5,735

Cheddar

\$4,005

Rennet Casein

\$6,255

Lactose

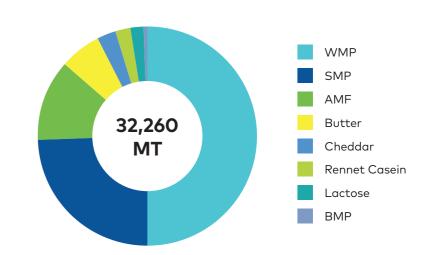
\$747

**BMP** 

Not offered at this event

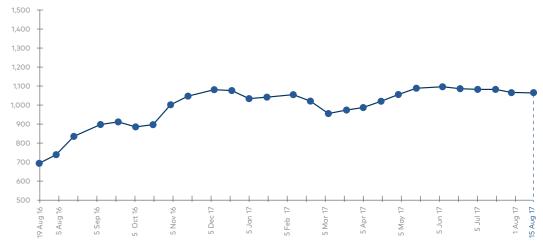
#### **GDT SALES BY PRODUCT**

#### **TRADING EVENT 194**



#### **GDT PRICE INDEX**

GDT Price Index stayed relatively stable in August with two small decreases. Decreased -1.6% at TE 193 and -0.4% at TE 194. WMP prices remained very stable, as did SMP, whilst AMF and butter decreased. For more details visit https://www. globaldairytrade.info/en/ product-results/



Data reflective as retrieved on 16 August 2017





## **USDA, DAIRY OUTLOOK**

## Published 16 August 2017

#### Recent developments in Dairy Markets

USDA reported June 2017 milk production of 18.0 billion pounds, +1.6% higher than June 2016. Milk cow numbers increased to 9.4 million head, up +4.000 compared to previous month. In June milk per cow averaged 64.0 pounds per day, +0.7% higher than June 2016. However, YOY growth for milk per cow is slowing. USDA commented on international production outlook this month predicting a modest production growth of +0.9% in 2017.

Wholesale prices reported from the week ending July 1st to the week ending August 5<sup>th</sup> in USDA National Dairy Products Sales Report were mixed again. Butter increased by +7.3 cents. Cheddar cheese prices increased, while NFDM and dry whey decreased.

Exports in the first half of 2017 have been significantly higher than the previous year due to increasing demand and decline in the US dollar. Generally, dairy exports decline from May to June, accordingly NDM/SMP exports decreased from 129 to 100 million. However, butterfat exports rose substantially, with about 64% going to Canada in June. Among butterfat products, butter has experienced the most notable price movement in Europe with an average export price of \$3.27 per pound, an increase from \$1.54 in July 2016. Tight world supply and high demand for butterfat content have increased butter prices, consequently with higher global production of butterfat, more skim solids become available for SMP putting downward pressure on SMP prices.

#### Dairy forecasts for 2017

USDA raised milk cow forecast numbers to 9.4 million head, +5,000 more cows than July's forecast. Yet, milk per cow forecast was lowered -75 pounds to 22,945 pounds due to slow yield growth in recent months. Milk production forecast has been lowered by -0.6 billion pounds to 215.7

Domestic use forecast for 2017 on a skim-solids basis are unchanged at 179.9 billion. On a milk-fat basis it has been lowered -0.6 billion pounds to 211.9 billion.

Export forecast for 2017 on a skim-solids basis has been lowered -0.5 billion pounds to 40.7 billion. With higher expected demand of butterfat the milk-fat basis export forecast has been raised +0.2 billion pounds to 9.3 billion.

Import forecast for 2017 is unchanged, skim-solids forecasted at 6.3 billion pounds for the year and milk-fat basis imports are at 6.0 billion pounds.

#### Dairy forecasts for 2018

Milk cow forecast numbers for 2018 have increased to 9.455 million, +20,000 more head. Milk per cow has been lowered by -145 pounds to 23,295 pounds per head based on slow growth in recent months. Milk production forecast is -0.9 billion pounds lower at 220.3 billion.

Domestic use forecast on a skim-solids basis is forecast -1.1 billion pounds lower than previous forecast at 184.4 billion. On a milk-fat basis domestic use forecast is down -1.3 billion pounds to 216.2 billion.

Export forecast on a skim-solids basis is up +0.2 billion pounds to 42.1 billion. On a milk-fat basis forecast exports are +0.1 billion pounds to 9.2 billion pounds.

Import forecast on a skim-solids basis is the same as last month at 6.4 billion pounds. On a milk-fat basis forecast has been lowered by -0.1 billion pounds to 5.8 billion pounds.

# **BLIMLING, FORECAST UPDATE**

## Published 1 August 2017

Blimling's August Forecast Update focuses on the unexpected increase in dairy demand in China. In June, combined WMP/SMP imports rose by +53% from 2016, the largest volume increase since January 2016.

Blimling suggests this unanticipated volume increase is mainly due to the low milk production in China and high demand for imported dairy products, which are comparatively inexpensive. Additionally, the growing consumer appetite for value-added dairy is pushing up cheese imports, which registered a +30% increase in June YTD. Another factor to consider is the slightly better than forecasted GDP performance up +6.9%, which supports the dairy product consumption growth. However, the high level of household debt that hit 45% in the first guarter is an important factor to bear in mind for future imports demand.

In the cheese market, high export demand and low seasonal production could maintain upward price movements while heading into the holiday season. However, ample barrel supply will likely weigh down prices.

Butter prices will likely strengthen before the holiday season. However, sustained sell-side pressure may limit the momentum.

Global oversupply of NDM/SMP will continue to weigh down prices. Even though ageing stocks may begin losing relevance, there will be enough fresh production to sustain end user needs.

Dry whey prices are forecast to stay under pressure due to reduced export opportunities and weakening high protein returns push more dry whey into already saturated warehouses.

## INFORMA ECONOMICS, **GLOBAL DAIRY REPORT**

Published 20 August 2017

Strong demand and limited supply have driven prices higher globally. Informa notes the EU prices for butter and WMP are shifting higher than the US, mainly driven by lower than anticipated milk production in May and June, exports were still up by +12.3%.

Global demand for cheese has also supported price lifts in US and Oceania, likely driven by a slowdown in US cheddar production. Informa expects prices to face some pressure on the global cheese market later in the year.

Chinese imports have been stronger than predicted which has also supported gains, but increase in prices could slow down demand from smaller players.

Milk production in EU fell below year ago levels in May, being driven by the warm weather which affected the pasture conditions. US milk production was up +1.8%.

New Zealand production was strong in June and the current soil moisture is above average which could be favorable in the longer term.

Imports were up +10.9% in June, the strongest YOY growth in three years. Global imports have now topped the +4% level with the bulk of the recent increases coming from China where milk equivalent imports were up +32.5% in

Cheddar cheese prices hit a three year high in Oceania, mainly driven by the tight supply in Europe. On the butter market, the EU prices continue to increase at a strong premium, while Oceania and US process prices remain relatively steady. SMP prices slump, EU production was lower than expected in June which suggests that the drop was likely due to a pullback in demand.





## Fonterra draws the information in this update from a variety of principally external sources listed below. Also included are defined acronyms for better understanding.

AMF Anhydrous Milk Fat

**BMP** Butter Milk Powder

CME Chicago Mercantile Exchange

**EIU** Economist Intelligence Unit

**FAO** United Nations Food and Agriculture Organisation

Farmgate Milk Price The price for milk supplied in New Zealand to Fonterra by farmer shareholders

Fluid and Fresh Dairy The Fonterra grouping of fluid milk products (skim milk, whole milk and cream pasteurised or UHT processed), concentrated milk products (evaporated milk and sweetened condensed milk) and yoghurt

FTA Free Trade Agreement

GDI Global Dairy Intelligence group, Fonterra Cooperative Group Limited. GDI provides insights to Fonterra management based on a model of the global dairy market developed by GDI and populated with publicly available data. The model outputs referenced in this report do not reflect Fonterra's non-public production or sales data

**GDP** Gross Domestic Product

**GDT** Global Dairy Trade auction platform

**GDT Price Index** is an index that provides a measure of the weighted average percentage change in the movement in price of all products sold on GDT. This provides a simple measure of changes in dairy price between trading events

IMF International Monetary Fund

**Informa** Informa Economics Inc., Dairy Group, Global Dairy Market Report

LME Liquid Milk Equivalent

MAT Moving Annual Total (this is data averaged across the 12 month period)

**MEA** Middle East and Africa

NDM Non-fat Dry Milk

NZX NZ Stock Exchange

**OECD** Organisation for Economic Co-operation and Development

**Q[1]** [First] Quarter

**Reference Products** The dairy products used in the calculation of the Farmgate Milk Price, which are currently WMP, SMP, BMP, butter and AMF

**SEA** South East Asia

Season New Zealand: A period of 12 months to 31 May in each year. Australia: A period of 12 months to 30 June in each year.

**SMP** Skim Milk Powder

**TE** GDT Trading Event

**USDA NASS** US Department of Agriculture National Agricultural Statistics Service

USDA Oceania US Department of Agriculture Agricultural marketing service price series for specific products in the Oceania region

WMP Whole Milk Powder

YOY Year-on-year

YTD Year to date

## Tracking the global dairy market Production, **Export and Import charts**

The production, export and import charts illustrate year-on-year changes in production, exports and imports for a range of countries that are important players in global dairy trade.

The absolute size of the bars represents the change in production, exports or imports compared to the same month the previous year . The portion of the bar below zero represents a year-on-year decrease and the portion above the line shows the year increase for that country. Where countries are not shown this is likely due to the data not yet being available.

### Weather Source (Page reference - 13)

Comments on weather are obtained from various government weather sites as well as independent reports including Martell Crop Projections. Global milk production data is sourced from government and industry websites including US Department of Agriculture (USDA), EuroStat, Dairy Australia, Dairy Companies Association of New Zealand (DCANZ) and others.





Important note: The information and commentary contained in this 'Perspective from NZMP' is based on publicly available official government statistics; industry association reports; other published industry reports together with data and insights developed by Fonterra's Global Dairy Intelligence group ('GDI'). These sources are identified as appropriate in this 'Perspective from NZMP'. GDI insights and data are derived from a global dairy market model populated by publicly available data. The model inputs and outputs do not reflect Fonterra's non-public production, pricing or sales data. Fonterra Co-operative Group Limited and its group members involved in the manufacture or sale of NZMP branded products ('Fonterra') has provided this 'Perspective from NZMP' for informational purposes only. It does not constitute recommendations or advice for the purposes of making financial decisions regarding trading in dairy products or commodities, or dealing in financial instruments relating to dairy commodities. Although every effort is made to ensure the accuracy of reproducing and interpreting such information, no warranty or representation of such is made and Fonterra shall have no liability in respect of any reliance placed on such information in the formulation of any business decision.