



Food and Agriculture  
Organization of the  
United Nations

# Food Outlook

BIANNUAL REPORT ON GLOBAL FOOD MARKETS



November 2020

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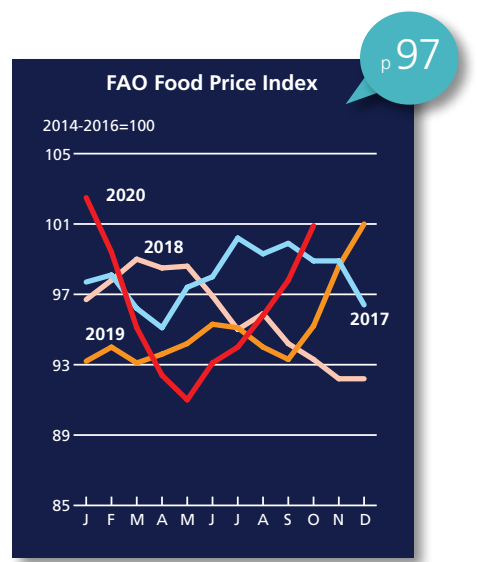
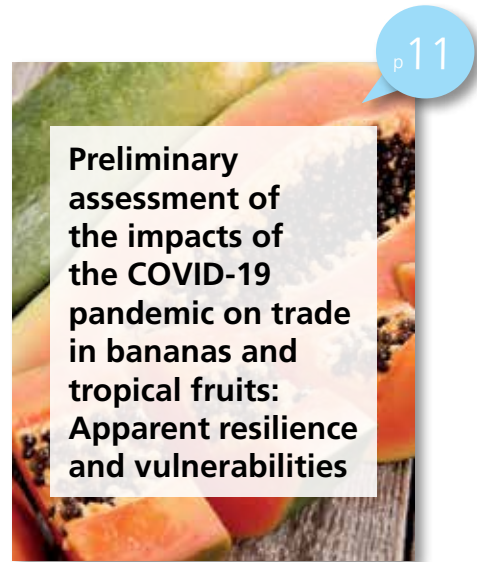
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Food Outlook is published twice a year, normally in June and November. The June report contains a more detailed market analysis while, as of 2018, the November report only provides summary market assessments (Markets at a Glance).



# MARKETS ATA GLANCE

# WHEAT

The global wheat supply and demand balance is expected to tighten in 2020/21, evidenced by much firmer international prices compared with the same period last year. The current forecast for world wheat production in 2020 stands marginally above the 2019 level and just short of the 2016 record output. Higher forecasts in several countries, especially Australia, the Russian Federation and India, will likely outweigh smaller crops expected in Argentina, Ukraine, the United States of America (USA) and, most notably, the European Union (EU).

Total wheat utilization is forecast to rise slightly in 2020/21, resting almost entirely on increases in food use, led by Asia and Africa. The reduced price competitiveness of wheat relative to other cereals is expected to keep feed and industrial uses of wheat in 2020/21 close to their 2019/20 levels in most countries, except for China and India, where some increases are likely.

By the close of seasons in 2021, global wheat inventories are forecast to reach 281 million tonnes, up 1.9 percent from 2020. However, this increase is largely the result of a sharp rise in China's stock levels to 139 million tonnes, accounting for nearly half of global stocks. Excluding China, global wheat inventories are anticipated to contract by 3.8 percent, weighed down by expected declines in several leading wheat exporters, particularly Argentina, the EU and the USA. Reflecting this development, the ratio of major exporters' stock-to-disappearance (defined as domestic utilization plus exports) – a measure of global market availabilities – is expected to decline from 15.2 percent in 2019/20 to 14.5 percent in 2020/21, the lowest level since 2007/08.

World wheat trade in 2020/21 (July/June) is forecast to reach a new record of 184.5 million tonnes. Expected increased purchases by China, the EU, Egypt, Pakistan and Morocco are seen sustaining world trade in 2020/21, offsetting smaller imports currently projected for several countries, including Algeria, Kenya and Turkey. Regarding exporters, higher production volumes in Australia, Canada and the Russian Federation are expected to boost wheat shipments from those origins, more than compensating for likely export reductions from the EU and Ukraine.

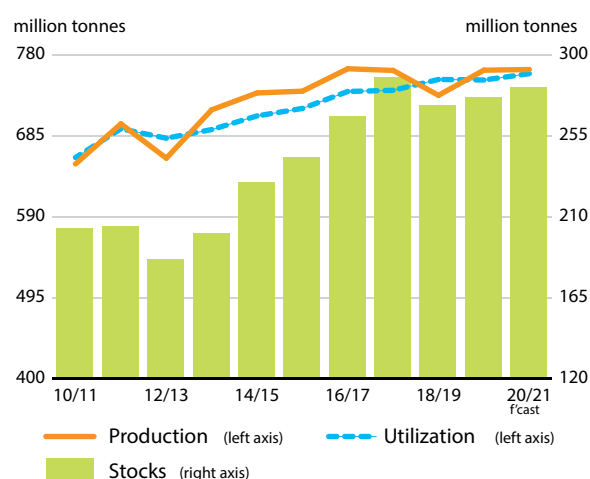
For additional analyses and updates, see:

FAO Cereal Supply and Demand Brief  
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 AMIS Market Monitor  
<http://www.amis-outlook.org/amis-monitoring>

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## Wheat production, utilization and stocks



## World wheat market at a glance

|                                                                      | 2018/19        | 2019/10<br>estim. | 2020/21<br>f'cast |       | Change:<br>2020/21<br>over<br>2019/20               |
|----------------------------------------------------------------------|----------------|-------------------|-------------------|-------|-----------------------------------------------------|
|                                                                      |                |                   | June              | Nov.  |                                                     |
|                                                                      | million tonnes |                   |                   |       | %                                                   |
| <b>WORLD BALANCE</b>                                                 |                |                   |                   |       |                                                     |
| <b>Production</b>                                                    | 732.4          | 761.9             | 758.3             | 762.7 | 0.1                                                 |
| <b>Trade<sup>1</sup></b>                                             | 168.3          | 184.0             | 177.5             | 184.5 | 0.3                                                 |
| <b>Total utilization</b>                                             | 751.0          | 750.5             | 754.3             | 758.0 | 1.0                                                 |
| Food                                                                 | 515.2          | 520.5             | 525.4             | 527.5 | 1.3                                                 |
| Feed                                                                 | 141.6          | 137.5             | 138.7             | 137.7 | 0.2                                                 |
| Other uses                                                           | 94.3           | 92.5              | 90.2              | 92.7  | 0.3                                                 |
| <b>Ending stocks<sup>2</sup></b>                                     | 271.3          | 275.8             | 280.3             | 281.0 | 1.9                                                 |
| <b>SUPPLY AND DEMAND INDICATORS</b>                                  |                |                   |                   |       |                                                     |
| <b>Per caput food consumption:</b>                                   |                |                   |                   |       |                                                     |
| World (kg/yr)                                                        | 67.5           | 67.5              | 67.4              | 67.7  | 0.3                                                 |
| LIFDC (kg/yr)                                                        | 49.6           | 49.8              | 49.6              | 49.8  | 0.0                                                 |
| <b>World stocks-to-use ratio (%)</b>                                 | 36.2           | 36.4              | 36.3              | 36.4  |                                                     |
| <b>Major exporters stocks-to-disappearance ratio<sup>3</sup> (%)</b> | 18.1           | 15.2              | 15.7              | 14.5  |                                                     |
| <b>FAO WHEAT PRICE INDEX<sup>4</sup></b><br>(2014–2016=100)          | 2018           | 2019              | 2020<br>Jan–Oct.  |       | % Change<br>Jan/Oct<br>2020 over<br>Jan/Oct<br>2019 |
|                                                                      | 99             | 95                | 99                |       | 3.6                                                 |

<sup>1</sup> Trade refers to exports based on a common July/June marketing season.

<sup>2</sup> May not equal the difference between supply (defined as production plus carryover stocks) due to differences in individual country marketing years.

<sup>3</sup> Major exporters include Argentina, Australia, Canada, the European Union, Kazakhstan, the Russian Federation, Ukraine and the United States of America.

<sup>4</sup> Derived from the International Grains Council (IGC) wheat index.

# COARSE GRAINS

The forecast for global coarse grains production in 2020 points to a 2.4 percent increase from 2019 to a record 1 478 millions tonnes. Maize production is seen to rise by 1.9 percent to an all-time high, pegged at 1 160 million tonnes, largely driven by expectations of strong production rebounds in the United States of America (USA) and South Africa, as well as record harvests in Argentina and Brazil. Barley output is also set to rise, while sorghum production is forecast to rebound from the decline in 2019.

Total coarse grain utilization is heading to a new peak in 2020/21, forecast at 2 745 million tonnes, up 2.6 percent from 2019/20, mostly on predicted higher feed and other non-food uses. Feed use of maize is seen rising by 1.6 percent, boosted by anticipated strong demand in Argentina, Brazil and China. Global feed use of barley is expected to expand by 3.6 percent, while strong growth in sorghum feed use in China, driven by high domestic maize prices, is expected to push up global sorghum feed use by almost 16 percent. Forecast growth of other non-food uses of coarse grains mostly reflects brisker demand for starch and maize-based ethanol.

Global inventories in 2020/21 will likely drop slightly, amounting to 0.2 percent below their opening levels. Offsetting expected buildups of global barley, rye, and oat stocks, a 2.5 percent drop in world maize stocks is forecast to result from anticipated sharp drawdowns of maize inventories in China and, to a lesser extent, the EU. Without China, world maize carryovers are set to stay close to their opening levels, with the major exporters' stocks-to-disappearance ratio (defined as domestic consumption plus exports) remaining steady.

World trade in coarse grains in 2020/21 (July/June) is forecast to rise 4.7 percent year-on-year. A foreseen significant increase in maize purchases by China, driven by stronger feed demand and soaring domestic prices, as well as larger imports by the EU following a reduced harvest, could boost maize trade by 3.7 percent. Likewise, an anticipated rise in sorghum imports by China is seen to lift global trade in sorghum, while expectations of higher barley import demand in the EU and Morocco should drive up world barley trade. Reflecting this robust demand and export pace, international export prices of all major coarse grains remain elevated.

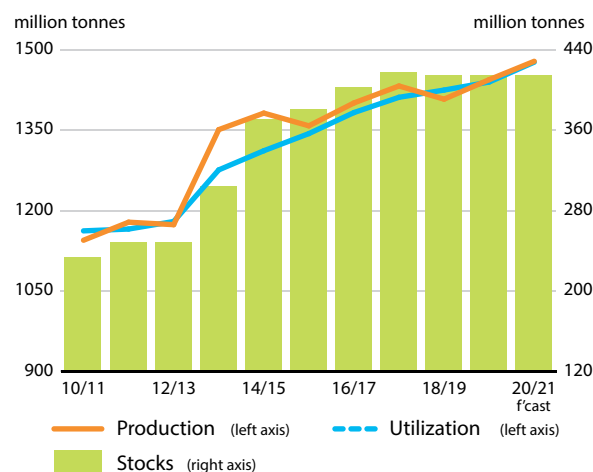
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<http://www.fao.org/giews/reports/crop-prospects>  
 AMIS Market Monitor  
<http://www.amis-outlook.org/amis-monitoring>

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## Coarse grain production, utilization and stocks



## World coarse grain market at a glance

|                                                                      | 2018/19        | 2019/10<br>estim. | 2020/21<br>f'cast |         | Change:<br>2020/21<br>over<br>2019/20               |
|----------------------------------------------------------------------|----------------|-------------------|-------------------|---------|-----------------------------------------------------|
|                                                                      |                |                   | June              | Nov.    |                                                     |
|                                                                      | million tonnes |                   |                   |         | %                                                   |
| <b>WORLD BALANCE</b>                                                 |                |                   |                   |         |                                                     |
| <b>Production</b>                                                    | 1 407.7        | 1 444.0           | 1 513.5           | 1 478.3 | 2.4                                                 |
| <b>Trade<sup>1</sup></b>                                             | 198.8          | 210.0             | 207.9             | 219.8   | 4.7                                                 |
| <b>Total utilization</b>                                             | 1 424.7        | 1 439.6           | 1 468.0           | 1 476.7 | 2.6                                                 |
| Food                                                                 | 217.8          | 219.4             | 222.4             | 222.8   | 1.5                                                 |
| Feed                                                                 | 802.5          | 832.7             | 843.7             | 852.3   | 2.3                                                 |
| Other uses                                                           | 404.4          | 387.5             | 401.9             | 401.7   | 3.6                                                 |
| <b>Ending stocks<sup>2</sup></b>                                     | 412.9          | 413.9             | 464.6             | 413.0   | -0.2                                                |
| <b>SUPPLY AND DEMAND INDICATORS</b>                                  |                |                   |                   |         |                                                     |
| <b>Per caput food consumption:</b>                                   |                |                   |                   |         |                                                     |
| World (kg/yr)                                                        | 28.5           | 28.4              | 28.5              | 28.6    | 0.5                                                 |
| LIFDC (kg/yr)                                                        | 38.1           | 37.7              | 38.0              | 38.0    | 0.7                                                 |
| <b>World stocks-to-use ratio (%)</b>                                 | 28.7           | 28.0              | 30.5              | 27.0    |                                                     |
| <b>Major exporters stocks-to-disappearance ratio<sup>3</sup> (%)</b> | 16.1           | 14.9              | 20.1              | 15.1    |                                                     |
| <b>FAO COARSE GRAIN PRICE INDEX (2014–2016=100)</b>                  | 2018           | 2019              | 2020<br>Jan–Oct.  |         | % Change<br>Jan/Oct<br>2020 over<br>Jan/Oct<br>2019 |
|                                                                      | 99             | 95                | 96                |         | 1.6                                                 |

<sup>1</sup> Trade refers to exports based on a common July/June marketing season.

<sup>2</sup> May not equal the difference between supply (defined as production plus opening stocks) and utilization due to differences in individual countries' marketing years

<sup>3</sup> Major exporters include Argentina, Australia, Brazil, Canada, the European Union, the Russian Federation, Ukraine and the United States of America.

With the main-crop harvests currently under way in the northern hemisphere, the latest figures confirm the overall positive expectations for this season. Despite the various challenges posed by the COVID-19 pandemic and some weather vagaries – in particular floods – world rice production is set to reach 508.7 million tonnes in 2020, up 1.5 percent from the 2019 reduced level and marking a new record. Asia is poised to lead this expected expansion, although a sizeable area-led rebound is also anticipated in the United States of America (USA), together with a partial upturn in Latin America and the Caribbean. On the other hand, floods, coupled with input constraints, may forestall growth in Africa, while limited water for irrigation has reduced crops in Europe and Oceania.

With ample supplies and efforts to ensure affordable access to rice by vulnerable groups fueling food use growth, world rice utilization in 2020/21 is forecast to expand at its fastest pace in seven years to reach 510.3 million tonnes.

Global rice inventories at the close of the 2020/21 marketing seasons are forecast at 182.0 million tonnes, fractionally below the 2019/20 estimate, which represented the second highest volume on record. While importers (chiefly China, followed by Indonesia) may further reduce their stockpiles, inventory build-ups in exporting countries, especially India, but also the USA and Thailand, are likely to counteract the falls.

After three years of no or negative growth, global trade in rice could expand by 6.3 percent in 2021 to 47.2 million tonnes, underpinned by a resurgence in African imports, in particular by Côte d'Ivoire, Nigeria and Senegal, coming in the wake of successive years of limited purchases and domestic output growth. India's export leadership in the rice world trade arena is expected to remain unrivaled in 2021, although most other exporters are also seen expanding shipments, except for Australia, the major South American suppliers, Myanmar and the USA.

Since reaching near six-year highs in May, international rice prices have come under downward pressure from a slow pace of nearby purchases and favourable crop prospects in major suppliers. Nevertheless, they remain above year-earlier levels, amid lingering support provided by a combination of seasonal tightness, currency movements and strong local demand in some exporting countries.

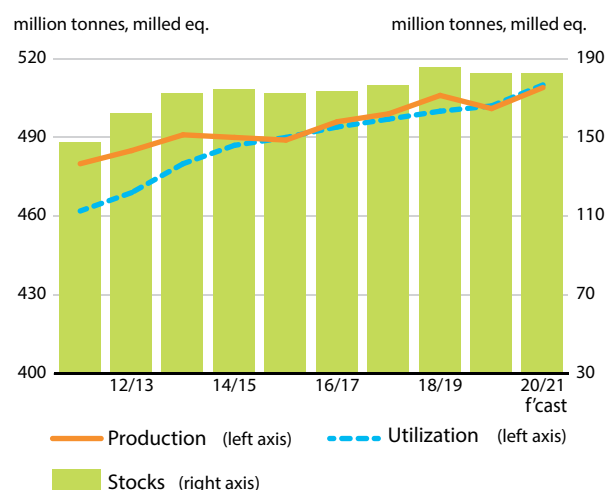
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AMIS Market Monitor  
<http://www.amis-outlook.org/amis-monitoring>  
 Cereal Supply and Demand Brief  
<http://www.fao.org/worldfoodsituation/csdb/>  
 FAO Rice Price Update  
<http://www.fao.org/economic/est/publications/rice-publications/the-fao-rice-price-update/en/>

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## Rice production, utilization and stocks



## World rice market at a glance

|                                                                      | 2018/19        | 2019/20<br>estim. | 2020/21<br>f'cast |       | Change:<br>2020/21<br>over<br>2019/20               |
|----------------------------------------------------------------------|----------------|-------------------|-------------------|-------|-----------------------------------------------------|
|                                                                      |                |                   | June              | Nov.  |                                                     |
|                                                                      | million tonnes |                   |                   |       | %                                                   |
| <b>WORLD BALANCE</b>                                                 |                |                   |                   |       |                                                     |
| <b>Production</b>                                                    | 506.3          | 501.1             | 508.7             | 508.7 | 1.5                                                 |
| <b>Trade<sup>1</sup></b>                                             | 44.2           | 44.4              | 47.6              | 47.2  | 6.3                                                 |
| <b>Total utilization</b>                                             | 499.8          | 502.5             | 510.0             | 510.3 | 1.5                                                 |
| Food                                                                 | 408.0          | 413.5             | 420.0             | 420.7 | 1.7                                                 |
| <b>Ending stocks<sup>2</sup></b>                                     | 184.8          | 182.4             | 182.0             | 182.0 | -0.2                                                |
| <b>SUPPLY AND DEMAND INDICATORS</b>                                  |                |                   |                   |       |                                                     |
| <b>Per caput food consumption:</b>                                   |                |                   |                   |       |                                                     |
| World (kg/yr)                                                        | 53.5           | 53.6              | 53.9              | 54.0  | 0.7                                                 |
| LIFDC (kg/yr)                                                        | 64.2           | 64.9              | 65.7              | 65.7  | 1.4                                                 |
| <b>World stocks-to-use ratio (%)</b>                                 | 36.8           | 35.7              | 35.3              | 35.3  |                                                     |
| <b>Major exporters stocks-to-disappearance ratio<sup>3</sup> (%)</b> | 22.6           | 24.7              | 25.1              | 26.0  |                                                     |
| <b>FAO RICE PRICE INDEX (2014–2016=100)</b>                          |                |                   |                   |       |                                                     |
|                                                                      | 2018           | 2019              | 2020<br>Jan–Oct.  |       | % Change<br>Jan–Oct<br>2020 over<br>Jan–Oct<br>2019 |
|                                                                      | 106            | 102               | 110               |       | 8.7                                                 |

<sup>1</sup> Calendar year exports (second year shown).

<sup>2</sup> May not equal the difference between supply (defined as production plus carryover stocks) and utilization due to differences in individual country marketing years.

<sup>3</sup> Major exporters include India, Pakistan, Thailand, United States of America and Viet Nam.

# OILCROPS

Preliminary forecasts for the 2020/21 season point towards a tightening supply-demand situation for oilseeds and their derived products.

After registering a marked decline in 2019/20, global oilseed production is forecast to climb to a new record in 2020/21, underpinned by a pronounced increase in soybean production. In the United States of America, soybean output is set to rebound strongly following a recovery in both area planted and yields, while in Brazil, unusually attractive production margins are anticipated to stimulate plantings. On the other hand, global sunflower seed output could fall to a three-year low owing to detrimental weather conditions in the Black Sea region, while global rapeseed production could remain depressed due to a third consecutive production decline in the European Union (EU). Regarding palm oil, global production is forecast to resume growing in 2020/21, after 2019/20's exceptional decrease caused by, inter alia, the aggravation of migrant labour shortages in the major producing countries in the wake of the COVID-19 pandemic.

On the demand side, in 2020/21, global oils/fats consumption is forecast to resume growing, following COVID-19-related stagnation in the food and non-food sectors in 2019/20. For meals/cakes, global utilization is expected to rise modestly for a second successive season, as world demand for feed continues to recover from the effects of African swine fever outbreaks in Asia. Amid the predicted slow growth in global consumption and likely declines in exportable supplies, world trade in oilcrop products is poised to grow at below average rates.

Based on current forecasts, global utilization of both oils and meals would slightly exceed world production, possibly triggering additional drawdowns in national inventories in 2020/21, while global stock-to-use ratios for oilcrop products would drop below the levels observed in 2019/20.

In line with tightening market fundamentals, international quotations for both oilseeds and derived products increased markedly in recent months. Looking forward, prices in the oilcrops complex are expected to be influenced by the further evolvement of the COVID-19 situation, as well as by weather conditions in South America and Southeast Asia (in particular regarding the imminent La Niña cycle), international trade policies, mineral oil prices and the direction of national biodiesel programmes.

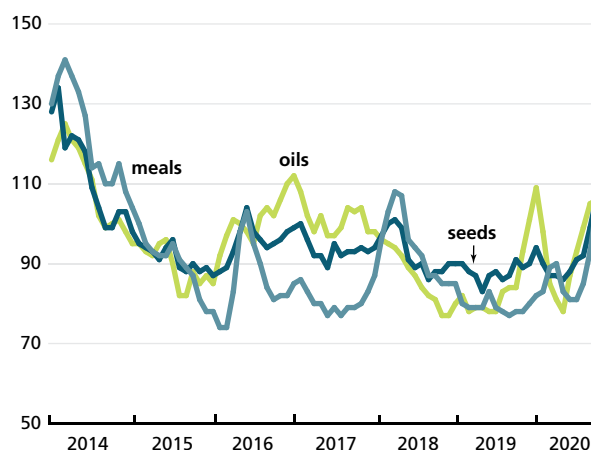
#### For additional analyses and updates, see:

Oilcrops Monthly Price and Policy Update  
<http://www.fao.org/economic/est/publications/oilcrops-publications/monthly-price-and-policy-update/>  
 AMIS Market Monitor  
<http://www.amis-outlook.org/amis-monitoring>

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## Monthly international price indices (2014–2016=100)



## World oilcrop and product market at a glance

|                                                   | 2018/19        | 2019/20<br>estim. | 2020/21<br>f'cast | Change:<br>2020/21<br>over<br>2019/20            |
|---------------------------------------------------|----------------|-------------------|-------------------|--------------------------------------------------|
|                                                   | million tonnes |                   | %                 |                                                  |
| <b>TOTAL OILCROPS</b>                             |                |                   |                   |                                                  |
| Production                                        | 611            | 587.3             | 613.3             | 4.4                                              |
| <b>OILS AND FATS</b>                              |                |                   |                   |                                                  |
| Production                                        | 241.7          | 235.1             | 243.3             | 3.5                                              |
| Supply                                            | 283.1          | 275.6             | 279.7             | 1.5                                              |
| Utilization                                       | 242.1          | 241.5             | 244.8             | 1.4                                              |
| Trade                                             | 132.2          | 135.1             | 136.3             | 0.9                                              |
| Global stocks-to-use ratio (%)                    | 16.7           | 15.1              | 14.1              |                                                  |
| Major exporters stocks-to-disappearance ratio (%) | 13.4           | 11.5              | 10.1              |                                                  |
| <b>MEALS AND CAKES</b>                            |                |                   |                   |                                                  |
| Production                                        | 158.3          | 150.0             | 158.7             | 5.8                                              |
| Supply                                            | 189.3          | 183.6             | 188.7             | 2.8                                              |
| Utilization                                       | 152.9          | 156.5             | 159.4             | 1.9                                              |
| Trade                                             | 98.8           | 104.5             | 104.9             | 0.4                                              |
| Global stocks-to-use ratio (%)                    | 22.0           | 19.2              | 18.2              |                                                  |
| Major exporters stocks-to-disappearance ratio (%) | 16.2           | 12.2              | 10.4              |                                                  |
| <b>FAO PRICE INDICES (2014–2016=100)</b>          |                |                   |                   |                                                  |
|                                                   | 2018           | 2019              | 2020<br>Jan–Oct.  | % Change<br>Jan/Oct 2020<br>over<br>Jan/Oct 2019 |
| Oilseeds                                          | 93             | 88                | 92                | 5.1                                              |
| Meals/cakes                                       | 94             | 80                | 87                | 9.5                                              |
| Vegetable oils                                    | 88             | 83                | 94                | 16.9                                             |

Note: For explanations on definitions and coverage kindly refer to previous issues of Food Outlook.



The first forecast for world sugar production in 2020/21 (October/September) points to a likely 1.5 percent recovery from the reduced outturn in 2019/20 to 172.4 million tonnes. Yet, production is foreseen to fall slightly short of global consumption, which is expected to rebound from the current season's COVID-19-related downturn. As a result, sugar inventories are anticipated to decline again in 2020/21.

The projected increase in production is largely driven by a near record output anticipated in India, the world's second largest sugar producer. Brazil's sugar production is expected to edge slightly higher than in 2019/20. By contrast, a second consecutive low output in 2020/21 is forecast in Thailand, the world's second largest exporter. Likewise, sugar output is forecast to be lower in the European Union, on the back of unfavourable weather conditions.

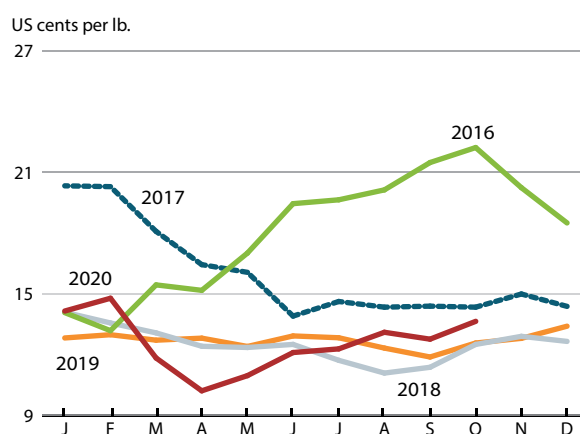
Global sugar consumption is set to rebound by 2.9 percent in 2020/21 after a decline in 2019/20, due to COVID-19-related lockdown and containment measures. The positive prospects are supported by the progressive relaxation of restrictive measures and expected resumption of economic growth in 2021. The main countries expected to drive the global increase in sugar consumption are India – the world's largest sugar consumer – and China. Growth is also foreseen to recover in the Near East and Africa. However, considerable uncertainty remains on the demand side. The overall extent of the global recovery in sugar consumption will depend on how the COVID-19 pandemic develops in the coming months, and particularly on whether or not further lockdown measures would be imposed.

The forecast for world sugar trade in 2020/21 (October/September) is pegged at 61.2 million tonnes, slightly up from the 2019/20 estimated volume. Large sales by Brazil and India, resting on bumper crops, are expected to outweigh an anticipated significant decline in exports by Thailand, following a second consecutive year of reduced crop, and the Russian Federation, where a sharp contraction in sowings is anticipated to curtail production in 2020/21 compared to the previous season. Conversely, strong import demand by China and Indonesia are expected to outweigh a likely decline in imports by the United States of America and India. After falling to multi-year lows in April, international prices of sugar increased sharply from May onwards, underpinned by stronger global demand for sugar, particularly from China, where the expiry of the safeguard duty on out-of-quota sugar imports spurred purchases.

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## International sugar prices



Source: Prices refer to the Sugar No. 11 contract traded at the New York Intercontinental Exchange (ICE)

## World sugar market at a glance

|                                              | 2018/19 | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | Change:<br>2020/21<br>over<br>2019/20              |
|----------------------------------------------|---------|--------------------------|--------------------------|----------------------------------------------------|
| <i>million tonnes</i>                        |         |                          |                          |                                                    |
| <b>WORLD BALANCE</b>                         |         |                          |                          | %                                                  |
| <b>Production</b>                            | 175.0   | 169.8                    | 172.4                    | 1.54                                               |
| <b>Trade*</b>                                | 58.0    | 60.5                     | 61.2                     | 1.18                                               |
| <b>Total utilization</b>                     | 169.3   | 168.8                    | 173.6                    | 2.87                                               |
| <b>Ending stocks</b>                         | 92.4    | 91.5                     | 89.0                     | -2.73                                              |
| <b>SUPPLY AND DEMAND INDICATORS</b>          |         |                          |                          |                                                    |
| <b>Per caput food consumption:</b>           |         |                          |                          |                                                    |
| World (kg/yr)                                | 22.2    | 21.9                     | 22.3                     | 1.55                                               |
| LIFDC (kg/yr)                                | 16.1    | 15.9                     | 16.1                     | 1.57                                               |
| <b>World stocks-to-use ratio (%)</b>         | 54.6    | 54.2                     | 51.3                     | -5.44                                              |
| <b>ISA DAILY PRICE AVERAGE (US cents/lb)</b> |         |                          |                          |                                                    |
|                                              | 2018    | 2019                     | 2020<br><i>Jan-Oct.</i>  | %Change<br>Jan/Oct<br>2020 over<br>Jan/Oct<br>2019 |
|                                              | 12.52   | 12.70                    | 12.59                    | -0.30                                              |

\* Trade figures refer to exports

# MEAT AND MEAT PRODUCTS

World meat production in 2020 is forecast at 337.3 million tonnes (carcass weight equivalent), down 0.5 percent year-on-year, a markedly less downbeat forecast than earlier anticipated, but still marking a second consecutive year of decline. An expected drop in pig meat production – mostly in Asia and especially in China – caused by the continued impact of the African swine fever disease, is responsible for much of the foreseen downturn in global meat production, along with likely declines in bovine meat output in India, Australia and Brazil, among others, caused by tight supplies. By contrast, poultry meat production is anticipated to expand, albeit at slightly over half the rate recorded last year, due to robust demand, mostly reflecting the deficit and high domestic prices of pig meat in China. Modest output growth is also predicted for ovine meat. The pace of production expansion across all meat sectors has been moderated by the pandemic-related disruptions to production processes and producers' output restraints to balance supply under uncertain demand, despite government stimulus packages targeting the industry.

World meat trade is forecast to grow to 37.6 million tonnes in 2020, up 3.9 percent year-on-year, a significantly lower growth rate than the 6.9 percent registered in 2019, reflecting import curtailments by many countries, consistent with the negative impacts of COVID-19 market disruptions to global meat trade and the deep global recession. By contrast, China's meat imports are forecast to expand by 44 percent, or more than 3 million tonnes, from 2019, absorbing around 30 percent of the world meat exports. Much of the expected rise in global meat imports is likely to be met by exports from Brazil, the United States of America, Canada, Mexico, the Russian Federation and the European Union.

Notwithstanding the significant rise in meat imports by China, a combination of COVID-19-related economic hardships, reduced demand from the food services sector, logistical bottlenecks and limited availability of foreign exchange in some meat importing countries has weakened global import demand, compared with export availabilities, causing international meat prices to fall this year. The sharpest drop has been registered for pig meat, followed by poultry, bovine and ovine meats. Given that COVID-19-related market disruptions are likely to persist, meat demand is expected to remain subdued in the coming months, keeping international meat prices under pressure.

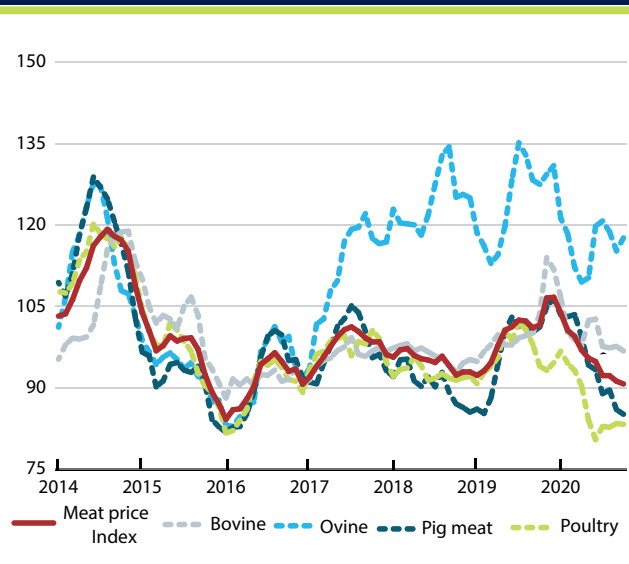
For additional analyses and updates, see:

Meat Market Review  
<http://www.fao.org/economic/est/est-commodities/meat/meat-and-meat-products-update/en/>

## Contact:

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## Monthly international price indices (2014–2016 = 100)



## World meat market at a glance

|                                             | 2018                                          | 2019<br>estim. | 2020<br>f'cast |              | Change:<br>2020<br>over<br>2019 |
|---------------------------------------------|-----------------------------------------------|----------------|----------------|--------------|---------------------------------|
|                                             |                                               |                | June           | Nov.         |                                 |
|                                             | million tonnes<br>(carcass weight equivalent) |                |                |              | %                               |
| <b>WORLD BALANCE</b>                        |                                               |                |                |              |                                 |
| <b>Production</b>                           | <b>342.2</b>                                  | <b>339.0</b>   | <b>333.0</b>   | <b>337.3</b> | <b>-0.5</b>                     |
| Bovine meat                                 | 71.6                                          | 72.8           | 72.0           | 71.9         | -1.2                            |
| Poultry meat                                | 127.3                                         | 133.6          | 136.8          | 137.1        | 2.6                             |
| Pig meat                                    | 120.9                                         | 109.8          | 101.0          | 105.3        | -4.0                            |
| Ovine meat                                  | 15.7                                          | 16.0           | 16.2           | 16.0         | 0.2                             |
| <b>Trade</b>                                | <b>33.8</b>                                   | <b>36.2</b>    | <b>37.0</b>    | <b>37.6</b>  | <b>3.9</b>                      |
| Bovine meat                                 | 10.5                                          | 11.2           | 11.1           | 11.0         | -1.7                            |
| Poultry meat                                | 13.5                                          | 13.9           | 13.8           | 14.1         | 1.1                             |
| Pig meat                                    | 8.4                                           | 9.5            | 10.6           | 11.1         | 15.9                            |
| Ovine meat                                  | 1.0                                           | 1.0            | 1.0            | 1.0          | -5.3                            |
| <b>SUPPLY AND DEMAND INDICATORS</b>         |                                               |                |                |              |                                 |
| <b>Per caput food consumption:</b>          |                                               |                |                |              |                                 |
| World (kg/year)                             | 44.6                                          | 43.6           | 42.4           | 43.1         | -1.3                            |
| <b>Trade - share of prod. (%)</b>           | <b>9.9</b>                                    | <b>10.7</b>    | <b>11.1</b>    | <b>11.1</b>  | <b>4.4</b>                      |
| <b>FAO MEAT PRICE INDEX (2014–2016=100)</b> | <b>2018</b>                                   | <b>2019</b>    | <b>2020</b>    |              | <b>%Change</b>                  |
|                                             |                                               |                | <i>Jan–Oct</i> |              | <b>Jan/Oct</b>                  |
|                                             |                                               |                |                |              | <b>2020 over</b>                |
|                                             |                                               |                |                |              | <b>Jan/Oct</b>                  |
|                                             |                                               |                |                |              | <b>2019</b>                     |
|                                             | 95                                            | 100            | 96             |              | -3.0                            |

# MILK AND MILK PRODUCTS

In spite of COVID-19-related market disruptions and contrary to earlier expectations, global milk production in 2020 is forecast to expand by 1.4 percent, year-on-year, and reach 860 million tonnes. The positive outlook reflects likely production increases in key milk producing countries, principally in India, sustained by favourable monsoons and the resilience of village cooperatives' network in collecting milk amidst logistical hurdles, and in the European Union and the United States of America, bolstered by yield improvements and government assistance, which kept producer margins stable. In addition, output is forecast to rise in China and the Russian Federation, driven by herd expansions in large-scale dairy farms, as well as in Oceania, as a result of favourable weather. By contrast, despite good weather, Brazil's output may decline owing to likely reduction of internal demand due to economic contractions.

World dairy trade in 2020 is forecast to grow to 78 million tonnes (milk equivalent), up 1.5 percent year-on-year, nearly equal the average growth rate for the preceding five years. The increase is largely attributable to persistently high import demand, sustained by China with the resurgence of economic activities, coupled with recent increases in import orders by Algeria, Saudi Arabia and Nigeria, reflecting a gradual recovery in petroleum prices. Australia, Colombia and the Russian Federation may also step-up imports in line with rising internal demand. By contrast, sharp declines in imports are anticipated in the Philippines, Mexico and Japan among others, consistent with market disruptions and economic downturns. High exportable surpluses have been the key price driver that fostered more shipments from the United States of America, Argentina, Belarus and the European Union, while accumulating stocks and economic downturns in importing countries may curb exports from New Zealand, India and Turkey.

International dairy prices, measured by the FAO Dairy Price Index, fell between February and May 2020, largely due to a slump in global import demand, caused by logistical bottlenecks, reduced food services sales and market uncertainty. However, prices began to increase since then, pushing the index for the first time in October slightly above the pre-pandemic level mostly underpinned by persistent import demand from China, the revival of imports in some oil-dependent countries and an increase in internal demand in Europe. In line with global demand and supply balances, SMP prices rose the most, followed by butter, whole milk powder and cheese.

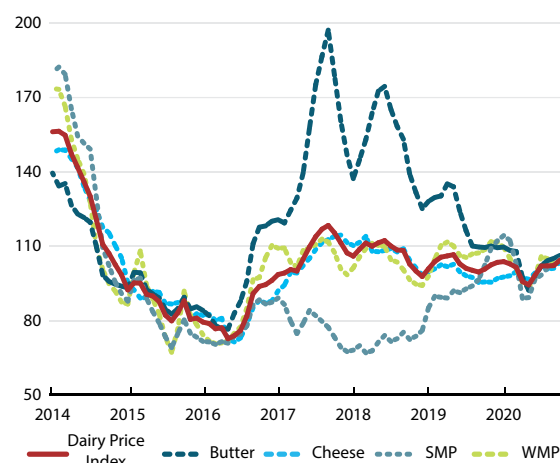
For additional analyses and updates, see:

Dairy Market Review  
<http://www.fao.org/economic/est/est-commodities/dairy/milk-and-milk-products/en/>

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## Monthly international price indices (2014–2016 = 100)



## World dairy market at a glance

|                                              | 2018                                      | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i>  |       | Change:<br>2020<br>over<br>2019                       |
|----------------------------------------------|-------------------------------------------|-----------------------|------------------------|-------|-------------------------------------------------------|
|                                              |                                           |                       | June                   | Nov.  |                                                       |
|                                              | <i>million tonnes<br/>milk equivalent</i> |                       |                        |       |                                                       |
| <b>WORLD BALANCE</b>                         |                                           |                       |                        |       |                                                       |
| <b>Total milk production</b>                 | 840.3                                     | 848.0                 | 858.9                  | 860.1 | 1.4                                                   |
| <b>Total trade</b>                           | 76.0                                      | 76.8                  | 73.6                   | 77.9  | 1.5                                                   |
| <b>SUPPLY AND DEMAND INDICATORS</b>          |                                           |                       |                        |       |                                                       |
| <b>Per caput food consumption:</b>           |                                           |                       |                        |       |                                                       |
| World (kg/year)                              | 111.3                                     | 111.2                 | 111.4                  | 111.5 | 0.3                                                   |
| <b>Trade - share of prod. (%)</b>            | 9.0                                       | 9.1                   | 8.6                    | 9.1   | 0.0                                                   |
| <b>FAO DAIRY PRICE INDEX (2014–2016=100)</b> | 2018                                      | 2019                  | 2020<br><i>Jan–Oct</i> |       | %Change<br>Jan/Oct<br>2020<br>over<br>Jan/Oct<br>2019 |
|                                              | 107                                       | 103                   | 101                    |       | -2.0                                                  |

# FISH AND FISHERY PRODUCTS

Global catches from wild fisheries are also expected to decline slightly in 2020, as there is an overall reduced fishing effort due to COVID-19-related restrictions on fishing vessel crews and poor market conditions. Fish supply, consumption and trade revenues are all expected to decline this year due to the impact of the pandemic containment measures on demand, logistics, prices, labour and business planning. Global aquaculture production is now expected to fall for the first time in many years, by some 1.3 percent. Sectors with longer production cycles, such as salmon, cannot adjust rapidly to the demand shifts, though shrimp and pangasius farmers have been able to quickly reduce their output significantly. Global catches from wild fisheries are also expected to decline slightly in 2020, as, overall, there is a reduced fishing effort due to COVID-19-related restrictions on fishing vessel crews and poor market conditions.

The market effects of the pandemic have brought about several far-reaching changes, many of which are likely to persist in the long term. Aggregate prices for 2020, as measured by the Fish Price Index, are down year-on-year for most traded species. The importance of retail sales has significantly increased at the expense of food services, as the hospitality sector has remained subdued. Consumers, who are trying to limit visits to grocery stores and concerned about future lockdowns, have shifted their seafood preferences towards preserved and prepared products, while demand for fresh fish has waned. The necessity of home cooking is a new focus for marketing campaigns and online distributors, while product innovations centred on convenience are proliferating. The economic downturn and rising unemployment are affecting household incomes, with demand for luxury products such as lobster weakening. At the same time, sales of canned tuna, sardines and mackerel have seen a boost.

The outlook for the next few months is continued uncertainty and a strong tendency towards risk aversion on the part of businesses and consumers alike. The recent uptick in cases in many countries underlines the continuing threat to market stability. On the positive side, product innovations, new distribution channels and the shortening of value chains that have coincided with this upheaval are likely to benefit the seafood industry for many years to come.

#### For additional analyses and updates, see:

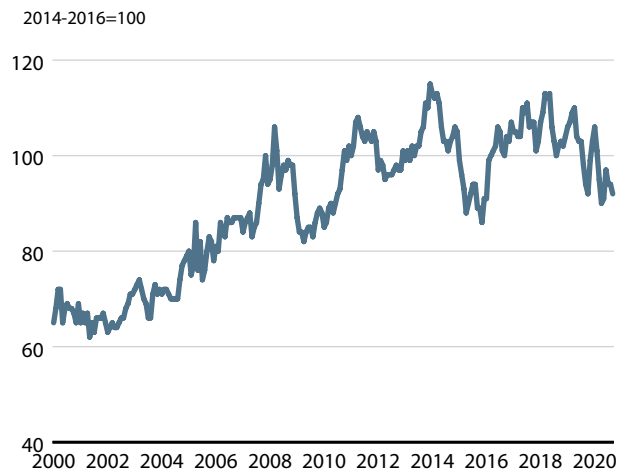
The GLOBEFISH market reports at

<http://www.fao.org/in-action/globefish/market-reports>

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## Fish price index (2014-2016 = 100)



Source of the raw data for the FAO Fish Price Index: EUMOFA, INFOFISH, INFOPECA, INFOYU, Statistics Norway.

## World fish market at a glance

|                                                 | 2018                                    | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> |              | Change:<br>2020<br>over<br>2019                     |
|-------------------------------------------------|-----------------------------------------|-----------------------|-----------------------|--------------|-----------------------------------------------------|
|                                                 |                                         |                       | June                  | Nov.         | %                                                   |
|                                                 | <i>million tonnes<br/>(live weight)</i> |                       |                       |              |                                                     |
| <b>WORLD BALANCE</b>                            |                                         |                       |                       |              |                                                     |
| <b>Production</b>                               | <b>178.5</b>                            | <b>175.9</b>          | <b>172.9</b>          | <b>174.2</b> | <b>-1.0</b>                                         |
| Capture fisheries                               | 96.4                                    | 91.8                  | 89.9                  | 91.2         | -0.7                                                |
| Aquaculture                                     | 82.1                                    | 84.1                  | 82.9                  | 83.0         | -1.3                                                |
| <b>Trade value<br/>(exports USD billion)</b>    | <b>165.4</b>                            | <b>161.3</b>          | <b>150.4</b>          | <b>152.2</b> | <b>-5.7</b>                                         |
| <b>Trade volume<br/>(live weight)</b>           | <b>66.9</b>                             | <b>66.0</b>           | <b>63.2</b>           | <b>63.4</b>  | <b>-3.9</b>                                         |
| <b>Total utilization</b>                        | <b>178.5</b>                            | <b>175.9</b>          | <b>172.9</b>          | <b>174.2</b> | <b>-1.0</b>                                         |
| Food                                            | 156.4                                   | 156.4                 | 154.2                 | 154.7        | -1.1                                                |
| Feed                                            | 18.2                                    | 15.5                  | 15.0                  | 15.7         | 1.3                                                 |
| Other uses                                      | 4.0                                     | 4.0                   | 3.7                   | 3.8          | -5.0                                                |
| <b>SUPPLY AND DEMAND INDICATORS</b>             |                                         |                       |                       |              |                                                     |
| <b>Per caput food consumption:</b>              |                                         |                       |                       |              |                                                     |
| Food fish (kg/yr)                               | 20.5                                    | 20.3                  | 19.8                  | 19.9         | -2.1                                                |
| From capture fisheries (kg/year)                | 9.7                                     | 9.4                   | 9.1                   | 9.2          | -1.9                                                |
| From aquaculture (kg/year)                      | 10.8                                    | 10.9                  | 10.6                  | 10.7         | -2.3                                                |
| <b>FAO FISH PRICE INDEX<br/>(2014-2016=100)</b> | <b>2018</b>                             | <b>2019</b>           | <b>2020</b>           |              | <b>% Change</b>                                     |
|                                                 |                                         |                       | <i>Jan-Sept</i>       |              | <b>Jan/Sept<br/>2020 over<br/>Jan/Sept<br/>2019</b> |
|                                                 | 106                                     | 102                   | 96                    |              | -7.8                                                |

Source of the raw data for the FAO Fish Price Index: EUMOFA, INFOFISH, INFOPECA, INFOYU, Statistics Norway.

\* Jan-Sep 2019 over Jan-Sep 2020, in percent



# COMMODITY FOCUS

# Preliminary assessment of the impacts of the COVID-19 pandemic on trade in bananas and tropical fruits

## Apparent resilience and vulnerabilities

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This article presents a preliminary assessment of the current market situation and potential implications of the COVID-19 pandemic for the production, trade and consumption of bananas and tropical fruits in 2020. At the time of writing, in October 2020, comprehensive preliminary monthly data on trade flows for key exporting and consuming countries were only available up to June/ July 2020.<sup>1</sup> Price data at various stages of the value chain, as well as market information from industry sources, were accessible for only a small number of countries up to September 2020. In view of these limitations, this assessment can only present partial insights into the impact of widely implemented disease mitigation measures and the resulting supply chain disruptions and economic repercussions, which continue to unfold and affect global markets. Food and Agriculture Organization of the United Nations (FAO) is closely monitoring market developments and the effects of COVID-19 on the global banana and tropical fruit sectors. Updates to the current situation and to the short- to medium-term outlook will be forthcoming.

### Global banana and tropical fruit markets under COVID-19

Amid an extraordinarily rapid decline in global economic activity and international transport, world supply and demand for bananas and tropical fruits have experienced COVID-19-related disruptions and contractions through several channels of transmission.<sup>2</sup> On the supply side, the adverse effects of the physical distancing measures have tended to be more immediate and pronounced for the relatively labour-intensive production and trade of tropical fruits – and to lesser extent bananas – than for most other food commodities, particularly staple foods. Given their high perishability, bananas and tropical fruits require timely

and well-coordinated harvesting and post-harvest handling, as well as uninterrupted cold chains. Furthermore, some tropical fruits rely on airfreight for export. Delays in supply chains are particularly troublesome for bananas and tropical fruits due to the occurrence of shrinkage in transport, which not only affects product quality, but also reduces the weight and value of shipments received by importing countries. In many producing countries, quarantine-related delays at ports and borders, as well as extreme shortages of reefer containers and airfreight belly-capacity, have slowed trade, while market closures have interrupted producers' access to local and national distribution outlets. Reports of produce remaining unsold and going to waste have been widespread, particularly for the less traded and more perishable mangoes and papayas, as well as for pineapples. With input factories and import routes disrupted, reduced availability and higher costs of key inputs for production and distribution have further jeopardized a smooth continuation of supply. Since expenditures on inputs can account for more than 30 percent of production costs, locally elevated prices of fertilizers and pesticides have additionally threatened sector profitability. Under these circumstances, the profitability of many farms and plantations has been severely affected, with industry sources reporting difficulties arising from cancelled orders, particularly for small- to medium-sized producers.

On the demand side, macroeconomic indicators point to a global recession in 2020, with adverse effects that would extend into 2021 and possibly beyond,<sup>3</sup> signalling global impacts on poverty, inequality and undernourishment.<sup>4</sup>

<sup>3</sup> Leading international agencies, including the International Monetary Fund (IMF), the World Bank, and the World Trade Organization, are predicting global recessions of varying degrees and outcomes in their assessments of the global economic impact of COVID-19.

<sup>4</sup> Analysis by the International Food Policy Research Institute, for example, finds that a 5 percent contraction in global gross domestic product (GDP) in 2020, as projected by the IMF, could result in a 20 percent increase in the number of extreme poor. Furthermore, scenario analysis conducted by FAO in June 2020 on the prevalence of undernourishment finds that a reduction in the growth rate of GDP of between 2 and 5 percentage points in all countries in 2020 could result in the number of undernourished increasing by 83 million to 132

<sup>1</sup> The typical reporting lag for monthly customs data is in the range of 40 days, but this can be substantially longer. In particular, the timely reporting of global customs data has been perceptibly impaired by the impacts of the pandemic in the first semester of 2020.

<sup>2</sup> These will be published in a forthcoming comprehensive FAO market brief on the impact of COVID-19 on fruits and vegetables.

Reduced consumer incomes threaten to result in reduced demand in the tropical fruits sector globally, given the high income elasticities of demand for the majority of these high-value commodities. Meanwhile, the closure of schools, canteens, restaurants, bars and hotels around the world has severely affected food consumption patterns. While precise figures are not currently available, away-from-home consumption of tropical fruits, especially avocados and pineapples, can account for a substantial share of total consumption in key import markets.<sup>5</sup> This is most notably the case in the United States of America and the European Union – globally the largest importers – where distributors reported difficulties in selling produce throughout the duration of lockdowns.<sup>6</sup> A similar situation was observed in the avocado market in China in the early phase of the pandemic.<sup>7</sup>

### Preliminary results for the first half of 2020 – Contrasting trade performances across commodities

Given the considerable uncertainty surrounding the effects, extent and duration of the pandemic, the impact of COVID-19 on global markets is difficult to gauge with precision at this stage. Accurate assessments are further hampered by the intricacies of global production and trade of bananas and tropical fruits, which are additionally prone to seasonal patterns of supply and demand, as well as to a multitude of disruptions, including adverse weather effects and changes in the policy environment. Common reporting lags in monthly trade data, which may reflect export volumes in one month and import volumes in a different month, and which seem to have been aggravated by COVID-19, add further to the difficulties. The following can therefore only provide a preliminary and indicative assessment of observed recent developments in world markets.

Provisional data and insights from industry sources on developments in the first seven months of 2020 indicate diverging trends in world banana and tropical fruit markets, which appear to have been exacerbated by seasonal and

weather-related supply fluctuations beyond the apparent impact of COVID-19.

### Banana and avocado supply chains show some resilience to the crisis

In the case of bananas and avocados, world exports during this period appear to have remained stronger than expected at the onset of the crisis, which suggests that their supply chains are more resilient than hitherto assumed. Industry sources indicate that many large-scale producers of bananas and avocados managed to keep a sufficient number of workers in plantations to avoid output disruptions, thereby limiting labour shortages. On the demand side, consumers seem to have generally maintained their demand for these fruits, possibly reflecting assumed or real health benefits. The various lockdowns implemented across the world may also have allowed more time to prepare dishes with fresh fruits at home.

According to preliminary data, world exports of bananas, excluding re-exports, during the period January–June 2020, registered an increase of 2.9 percent year-on-year, due to record supplies from Ecuador and a production recovery in Costa Rica, where the banana harvest had suffered weather-induced damage in 2019. Preliminary monthly data show that Ecuador exported 4.3 million tonnes in the first seven months of 2020, representing an 8.5 percent increase compared with the same period in 2019, while Costa Rica increased its exports by 25 percent, to 1.1 million tonnes. This suggests that global banana exports reached a new peak of 12.2 million tonnes for the period January to July 2020. At the time of writing, in October 2020, preliminary data on world imports of bananas, excluding European Union intra trade, were only available until June 2020. The data show that world imports of bananas increased by 1.2 percent compared with the same period in 2019, reaching approximately 9.8 million tonnes. Amid lockdown-induced panic buying in major import markets, bananas reportedly benefited from the fruit's convenience factor, perceived sanitary safety and longer shelf-life. As such, bananas were among the most popular fruit choices as part of consumers' efforts to increase their intake of fruits and vegetables, which was backed by relevant governmental campaigns in key import markets, particularly in the European Union. Net banana imports by the European Union, the largest importer globally, displayed a 5.6 percent increase between January and June 2020 compared with the same period of the previous year, as reported by the Statistical Office of the European Union (Table 1). Several other key importers, including the United States of America, the Russian Federation and Japan, similarly reported higher banana

million, with the majority of the increase coming from low-income countries: [www.fao.org/3/ca9692en/online/ca9692en.html#chapter-1\\_1](http://www.fao.org/3/ca9692en/online/ca9692en.html#chapter-1_1) Part 1, Box 3

<sup>5</sup> For example, in France, the largest avocado consuming country in the European Union, one-third of total avocado supply is reported to be consumed out of the home: [www.fruitrop.com/en/Articles-by-subject/Direct-from-the-markets/2020/The-impact-of-covid-19-measures-on-fruit-and-vegetables-distribution-in-France](http://www.fruitrop.com/en/Articles-by-subject/Direct-from-the-markets/2020/The-impact-of-covid-19-measures-on-fruit-and-vegetables-distribution-in-France)

<sup>6</sup> See for example: [www.agalert.com/story/?id=13971](http://www.agalert.com/story/?id=13971)

<sup>7</sup> See for example: [www.freshplaza.com/article/9208990/overview-global-avocado-market/China](http://www.freshplaza.com/article/9208990/overview-global-avocado-market/China). This article provides the following information: "China: Avocado market slowly picking up again [...] The avocado market has been very tough lately, as not many people are buying avocados at this time. A lot of them are normally used in restaurants and bars, but since they were closed, fewer avocados were purchased. As a result, sales were very slow, which makes things difficult for a product that doesn't have a very long shelf life."



purchases compared with the period January to June 2019. Double-digit import growth was also registered in several emerging importers, including Poland, Ukraine and Jordan, which notably increased their procurements from Ecuador.

Similarly, the effects of the pandemic on global supply chains for avocados appear to have been less severe than initially expected, as suggested by the available data and information. Provisional monthly data point to a global export total of 1.3 million tonnes in the first seven months of 2020, an increase of 6.9 percent compared with the same period in 2019, on the back of significantly higher supplies from Peru, Kenya and Colombia, three emerging avocado exporters. However, seasonally lower supplies in Mexico, the world's leading exporter of avocados, which registered a 1 percent decline in exports over this period, had a moderating effect on the growth of global shipments. COVID-19-related disruptions to harvesting activities and international transport routes limited further growth. Imports of avocados by the United States of America, the major global importer, accordingly declined by approximately 3.8 percent compared with the period January to June 2019, to 540 000 tonnes in 2020. Meanwhile, imports of avocados by the European Union reportedly increased by 12.6 percent (Table 1). Industry sources in both importing blocs reported strong demand for avocados in the retail channel, as consumers maintained or even increased their demand for nutrient-rich food items. However, the COVID-19-induced closures of the hospitality sector particularly affected imports of avocados by the United States of America, since a substantial share of this fruit is commonly consumed outside of home in this key market. In this difficult market situation, average wholesale prices of avocados in the United States of America fell by 5.2 percent between January and September 2020, compared with the 2019 full year average, and by 13.2 percent compared with the January–September 2019 period.

### Contracting demand for other major tropical fruits

In contrast with the comparatively positive global trade situation for bananas and avocados, the data available as of October 2020 suggest an overall decline in global import demand for most major tropical fruits, in response to COVID-19. Although reports from specialized fresh produce media suggest that supermarket sales of vitamin- and nutrient-rich fruits temporarily increased in key import markets at the onset of the health crisis and lockdowns, this situation did not last long due to the strong impacts of various logistical challenges on highly perishable fruits.

For example, global exports of pineapples, excluding

re-exports, reportedly fell to 1.7 million tonnes between January and July 2020, representing a 3.4 percent decline from the same period in 2019.<sup>8</sup> While Costa Rica, the main global exporter of pineapples, was able to increase shipments by 1.8 percent compared with the previous year, the Philippines experienced a 7.8 percent decline in pineapple exports on account of lower demand from China and South Korea, two major importers of Filipino pineapples. Both importing countries had introduced strict lockdowns early in the year, hampering import routes, as ports and warehouses operated at drastically reduced capacity.

Based on available data, global imports of pineapples amounted to approximately 1.46 million tonnes between January and June 2020, a fall of 10.3 percent compared with the same period in 2019. The two largest importers of pineapples globally, the United States of America and the European Union, acquired respectively 7.4 percent and 11.9 percent less of the fruit over this period than during January to June 2019 (Table 1 for European Union import data). In key import markets, demand for pineapples was substantially affected by the lockdown and closure of the hospitality sector. In the United States of America, for example, food service sales of pineapples account for some 60 percent of total sales.<sup>9</sup>

For the commodity group mango, mangosteen and guava, available data indicate a contraction in exports of 4.9 percent during January–July 2020 compared with the same period in 2019, to a total of 1.2 million tonnes. A significant reduction in shipments of mangosteen from Thailand to China, together with lower exports of mangoes from Mexico to the United States of America

**Table 1. European Union imports of bananas and tropical fruits in tonnes**

| January to June                               | 2018      | 2019      | 2020      | % 2019/20 |
|-----------------------------------------------|-----------|-----------|-----------|-----------|
| Bananas                                       | 2 666 849 | 2 592 654 | 2 738 268 | 5.6%      |
| Pineapples                                    | 470 893   | 456 500   | 402 171   | -11.9%    |
| Avocados                                      | 260 052   | 257 981   | 290 425   | 12.6%     |
| Mangoes, guavas and mangosteens <sup>10</sup> | 212 383   | 206 299   | 215 930   | 4.7%      |
| Papayas                                       | 18 838    | 18 429    | 17 519    | -4.9%     |

Source: Eurostat

<sup>8</sup> Due to the unavailability of monthly export data for Honduras and Ghana at the time of writing in October 2020, volumes from these two origins were excluded from the calculation.

<sup>9</sup> Estimate by the International Pineapple Organization.

<sup>10</sup> For the commodity cluster mango, mangosteen and guava (HS code 080450), reported shipments from Peru to the European Union were subtracted from total European Union imports due to a misallocation of data.

and from Brazil to the European Union, was at the core of this decline. In major import markets, a considerable share of mangoes is consumed out of home, rendering the widely implemented COVID-19-related containment measures particularly detrimental to this most traded fruit in this commodity group. Global trade in mangoes, mangosteens and guavas further displayed a higher susceptibility to the adverse effects of the pandemic as a result of their high perishability and sensitivity in transport, coupled with the fact that a high share of exports is transported by air freight. As regards imports, a conclusive assessment of developments in the first six months of 2020 is rendered difficult by a number of inconsistencies in preliminary monthly data for 2020. However, European Union import data for this period indicate a 4.7 percent increase compared with 2019 (Table 1), consistent with industry reports of higher supermarket sales of nutrient-rich mangoes in this trade bloc.

Global papaya trade similarly appears to have experienced a decline in import demand alongside supply disruptions between January and July 2020, as suggested by available data. Global exports reportedly fell by 1.1 percent compared with the period January–July 2019, to approximately 197 000 tonnes, on account of a 2.3 percent reduction in papaya shipments from Mexico, the world's largest exporter. This represents a strong decline compared with the 12 percent growth recorded for the period January–July 2019 relative to January–July 2018. Papayas are particularly vulnerable to disruptions in transport routes and supply chains, given their high degree of perishability. Accordingly, global imports of papayas reportedly dropped by 7.3 percent between January and June 2020, to approximately 160 000 tonnes. The two largest importers, the United States of America and the European Union, respectively imported 7.7 and 4.8 percent less papaya in the January–June 2020 period relative to the same period of the previous year.

### Potential implications

The value chains for bananas and avocados have so far proved resilient to the COVID-19 crisis. Producers were able to overcome the risk of labour shortages, while market operators managed to keep the supply chains functioning in spite of the constraints resulting from the measures taken by governments to contain the spread of the pandemic. However, the available data are too limited to draw definitive conclusions on the resilience of these industries, while the crisis is still evolving. In addition, supply chains of other tropical fruits have not shown the same resilience, partly due to the higher degree of perishability of these products and, in the cases of papayas and mangoes,

to the less integrated nature of their production and distribution processes.

Disruptions to trade and uncertainties in global markets can pose particular difficulties for those producing countries whose agricultural GDP relies heavily on the foreign exchange earnings generated by exports of bananas and tropical fruits. This is, for instance, the case for Ecuador and Guatemala, where bananas accounted, respectively, for some 42 percent and 17 percent of agricultural export revenues in 2018. The vulnerability of the banana and tropical fruit sector to the effects of the current crisis is further highlighted by the results of a comprehensive FAO study conducted in April 2020 on the channels of transmission to food and agriculture, which estimates the degree of exposure of countries to supply- and demand-side risks.<sup>11</sup> These risks are particularly pronounced in many major banana and tropical fruit exporting countries, where producer margins tend to be under significant pressure due to a number of factors, including highly competitive value chains, the intensifying market power of downstream actors, the occurrence of plant diseases, and adverse weather events.<sup>12</sup>

In view of the unprecedented magnitude of the COVID-19 pandemic, its uncertain duration and complex effects on economic growth and food security, it will be critical to develop policies aimed at providing financial support to producers so that they can remain operational, while protecting the health and safety of workers and minimizing disruptions to national and international transport routes. Such strategies will be essential to ensure that supply chains for bananas and tropical fruits continue to operate in a sustainable manner, for the benefit of producers, market operators and consumers alike. Ensuring that growth in trade of bananas and tropical fruits is inclusive and equitable and has the potential to generate substantial income gains to smallholder producers, as well as significant export earnings for many of the producing countries, will help to mitigate the damaging consequences of the COVID-19-related health and economic crises. Given that the negative economic repercussions of the pandemic's mitigation measures are likely to worsen as the virus continues to spread, consumers' ability to afford healthy diets will probably be affected in both producing and importing countries, contingent on people's access to

<sup>11</sup> Schmidhuber, J., Pound, J. & Qiao, B. 2020. *COVID-19: Channels of transmission to food and agriculture*. Rome, FAO.

<sup>12</sup> Comprehensive information on the global banana industry, as well as issues affecting the sector, can be found on the webpages of the FAO World Banana Forum: [www.fao.org/world-banana-forum/en/](http://www.fao.org/world-banana-forum/en/). A recent report on the impact of COVID-19 on the banana sector in Ecuador was published by Bloomberg: [www.bloomberg.com/news/features/2020-05-22/the-25-billion-banana-industry-is-being-ravaged-by-disease?srnd=premium-asia&sref=Mkhc1AWW](https://www.bloomberg.com/news/features/2020-05-22/the-25-billion-banana-industry-is-being-ravaged-by-disease?srnd=premium-asia&sref=Mkhc1AWW)

savings, credit and safety net programmes. The observed contraction in global import demand of several tropical fruits in the first six months of the year already points in this direction. Low- and middle-income countries, in particular low-income food-deficit countries, which may lack the capacity and funds to implement effective social protection programmes and economic stimuli, are especially at risk, alongside net food importing countries.

Rising inequality globally, including in high-income countries, is of further concern. Protecting consumers, particularly the most vulnerable, from nutritional

deterioration requires concerted action at national and global level, including, as already deployed in many instances, the suspension of bilateral loan repayments and collaboration with international creditors on the release of emergency funding. Strengthened availability, accessibility and affordability of nutrient-rich bananas and tropical fruits on a global scale can be conducive to improving the nutritional quality of diets. This nutritional dimension is especially important in light of the globally rising incidence of malnutrition in its various forms and the increasingly heightened importance of healthy immune systems.

SPECIAL  
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# Recent trends in food imports bills and export earnings: the COVID-19 challenge

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The onset of the COVID-19 pandemic triggered fears as to whether international markets would still have the capacity to meet demands from countries that depend on trade for ensuring the food security of their populations. Actual data available up to June 2020, however, suggest strong, albeit not complete, resilience of the global food markets to COVID-19 shocks. Tables 1 and 2 present these data at global level, for values (Table 1) and volumes at constant 2015 prices (Table 2), contrasted with the periods from H1-2017 to H1-2020. The commodities for which global trade underwent the highest contraction in H1-2020, compared with H1-2019 and H2-2019, can be regarded as highly income elastic, consisting of ‘beverages’ and ‘fish products’, and to some extent ‘livestock products’. These traded commodities could conceivably have been substituted with domestic products. COVID-19 has had an unarguable and profoundly negative impact on gross domestic product (GDP) in countries integrated with global markets. In June this year, the International Monetary Fund (IMF) downgraded global GDP growth in 2020 to almost -5 percent, compared with -3 percent in April 2020. In October, the IMF projected global growth in 2020 at -4.4 percent. While international prices have so far fallen in 2020 for all these high-value foodstuffs<sup>1</sup> lower incomes have rendered these particular products less affordable, offsetting the price effects and resulting in lower volumes transacted.

Assuming seasonal effects in patterns of international procurement, the world food import bill expanded by 0.5 percent in H1-2020 compared with H1-2019 while it contracted by 1.1 percent for the period H1-2020 compared with H2-2019. Purchases of staple foodstuffs, such as cereals, oilseeds and vegetable oils, sugar, and fruits and vegetables, which are less income elastic, recorded an increase in H1-2020 in both value and volume terms, despite generally higher prices for these products. Requiring suitable agro-ecological conditions, options for import substitution – i.e. replacing staple food crops through

domestic production – are limited, at least in the short term. Furthermore, a considerable amount of trade in these products (with the exception of fruits and vegetables) takes place in bulk shipments, in a highly capital-intensive setting, and trade logistics in many routes are highly automatized, with little human interaction. Against this backdrop, the global food import bill for the full calendar year of 2020 is expected to remain close to its 2019 level, potentially exceeding it slightly in view of firming prices for most food commodities in recent months.

## Decomposing sources of resilience

Among the economic groups presented, developing countries have shown by far the greatest resilience to COVID-19 in sustaining trade inflows. Indeed, for 7 of the 11 food groups, import volumes increased in H1-2020 compared with H1-2019 (Figure 4), and for meat, sugar and oilseeds, trade expanded in percentage terms by double-digit points. The global tendency for volumes of beverages and fish to decline is also shared by developing countries as a whole. The higher import demand by developing countries, relative to world levels, is a reflection of the currently projected 3.3 percent contraction in GDP<sup>2</sup>, which stands much lower than the world projected contraction, and underscores the generally low income elasticity of food demand.

Table 3 provides a ‘factor decomposition’ of the change in food import bills globally, and the dichotomy of developed and developing countries’ bills over the period H1-2019 to H1-2020. The absolute change of USD 3.33 billion (+0.5 percent) in the global food import bill is mostly driven by the effect of higher volumes imported, and the level of expansion is significantly limited by the sharp contractions in product inflows to developed countries. While GDP for this country group is forecast by the IMF to contract by 5.8 percent,<sup>3</sup> it is likely that supply chain

<sup>2</sup> <https://www.imf.org/en/Publications/WEO/Issues/2020/09/30/world-economic-outlook-october-2020>

<sup>3</sup> The IMF forecast is based on “advanced economies”, an aggregate which is

<sup>1</sup> See <https://www.imf.org/en/Research/commodity-prices>

disruptions due to COVID-19 have had a greater impact on trade than the influence (if any) of falling incomes. Furthermore, consumers in developed countries may be in a position to substitute imports with domestic food inventories, at least in the short run.

Table 3 also confirms the remarkable trade resilience of developing countries to COVID-19 shocks, in that volumes of many imported foodstuffs have increased considerably, offsetting the contractions registered in developed countries, and thus helping to stabilize changes in the global food import bill. A closer inspection of the table, as well as of Figure 4, reveals that meat, oilseeds and cereals have registered the most pronounced increases in absolute terms. Hitherto, and since the outbreak of COVID-19, these commodity flows have been altered by trade policy shifts and animal disease outbreaks, and were centred around the major international destination market of China. For instance, notwithstanding that domestic prices for grains and oilseeds in China are much higher than world prices, the Phase 1 trade deal between the United States and China stipulated that China will import more agricultural products from the United States in exchange for tariff concessions on Chinese imports.<sup>4</sup> China's rising demand for grains and oilseeds also led the country to source imports from other destinations, especially those situated in South America (namely Brazil and Argentina<sup>5</sup>) while an outbreak of African swine fever in China resulted in elevated imports of pig meat from non-affected countries (particularly the United States and the European Union).

Table 4 highlights the performance of the Americas in sustaining export quantities of many key food commodities during the COVID-19 pandemic, to the extent that export volumes of oilseeds, vegetable oils and livestock products have reached record, or near-record highs.

In summary, China maintained its role as the world's largest net importer of agricultural products<sup>6</sup> under COVID-19<sup>7</sup>. Its import growth was the main contributor to the remarkable trade resilience seen during the pandemic; it remains important to note that the unabated import growth was not caused by the outbreak of COVID-19 in China, but took place in spite of it, and despite the ensuing global health crisis. The causal factors behind China's import growth for food and agricultural products lie in the

almost identical to the categorization of "developed countries", except for the inclusion of the Republic of Korea, Singapore, Hong Kong, Taiwan and Macau, and the exclusion of the Russian Federation.

<sup>4</sup> [https://en.wikipedia.org/wiki/China%E2%80%93United\\_States\\_trade\\_war#2019](https://en.wikipedia.org/wiki/China%E2%80%93United_States_trade_war#2019).

<sup>5</sup> Both countries, in theory, benefitted from currency depreciation making exports more competitive.

<sup>6</sup> This is in spite of China's currency appreciating rendering imports more expensive.

<sup>7</sup> See [https://unctad.org/en/PublicationsLibrary/ser-rp-2020d3\\_en.pdf](https://unctad.org/en/PublicationsLibrary/ser-rp-2020d3_en.pdf)

outbreak of the ASF disease and subsequent restructuring of the country's agricultural sector; the causal factor for the shift in the composition of its trading partners toward suppliers from Latin America resulted from the US-China trade conflict, again a factor that emerged before the COVID-19 pandemic

## Agricultural export revenues

Agricultural exports constitute an important source of revenue for many countries.<sup>8</sup> This is particularly true for poorer nations, whose economies remain highly dependent on the agriculture sector for GDP growth and foreign exchange earnings, and which have not yet embraced wider economic diversification. Nevertheless, exports from developing countries as a whole have been instrumental in sustaining international trade in agriculture during the COVID-19 pandemic, and have far exceeded the performance of developed countries in meeting global import needs of agricultural products.

Table 5 shows both values and volumes of agricultural exports by developed and developing countries to help assess the underpinning trends at the world level. It can be seen that developed countries outperformed developing countries in terms of agricultural export activity. For instance, in 2019, the value of absolute export earnings by developed countries was some 61 percent higher. In many product groups, developed countries surpassed agricultural exports of developing countries, both in volumes and values, and especially for non-food items, as well as for beverages, cereals and livestock products. However, the most recent trends in the export of agricultural products by developing countries reveal their dynamism in their ability to cover shortfalls in many products exported typically by their developed country counterparts. Export revenues of developed countries fell over the periods H1-2020 compared with H1-2019, and H1-2020 versus H2-2019, while developing countries increased their export earnings by 4.6 and 3.4 percent, respectively, over the two periods. Again, changes in H1-2020 in comparison with H1-2019 are scrutinized, discounting the possibility of seasonal patterns in trade, especially in terms of volumes.

The increase of 4.6 percent in the revenues of developing countries are on the back of sharp rises in the export volumes of oilseeds, sugar and miscellaneous edible products, also exceeding the volumes exported by developed countries. In fact, developing country exports of coffee, tea, cocoa and spices, as well as meat and fruits and vegetables, registered a higher pace of growth than

<sup>8</sup> The definition of "agricultural" exports is derived from the World Trade Organization (WTO), which excludes fishery products.

those from developed countries. While, as mentioned earlier, increases in the growth rates of developing country exports of certain products, especially oilseeds and meat, are fundamentally unrelated to COVID-19, the same cannot

be said of other agricultural products, and is testament to the vivacity of developing countries in sustaining food and agricultural exports in the wake of the pandemic.

**Table 1. Recent trends in the World food import bill, products and total (USD billion, current)**

| Food Group                                           | H1-2017      | H2-2017      | H1-2018      | H2-2018      | H1-2019      | H2-2019      | H1-2020      | Change H1-2020 over H2-2019 (%) | Change H1-2020 over H1-2019 (%) |
|------------------------------------------------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|---------------------------------|---------------------------------|
| Fish, crustaceans, molluscs and preparations thereof | 68.0         | 79.2         | 76.3         | 80.6         | 75.0         | 78.7         | 67.1         | -14.7                           | -10.5                           |
| Animal and vegetable oils, fats and waxes            | 48.6         | 48.9         | 47.5         | 45.1         | 43.1         | 44.7         | 47.4         | 6.0                             | 9.9                             |
| Beverages                                            | 48.5         | 58.5         | 55.2         | 60.1         | 55.3         | 60.3         | 48.4         | -19.7                           | -12.4                           |
| Cereals and cereal preparations                      | 81.2         | 88.2         | 90.9         | 91.5         | 90.1         | 91.2         | 91.4         | 0.2                             | 1.5                             |
| Coffee, tea, cocoa, spices and manufactures thereof  | 52.9         | 55.6         | 54.0         | 54.8         | 52.6         | 54.9         | 52.5         | -4.4                            | -0.2                            |
| Dairy products and birds' eggs                       | 42.8         | 46.5         | 48.3         | 45.7         | 47.5         | 45.9         | 46.5         | 1.1                             | -2.3                            |
| Meat and meat preparations                           | 65.5         | 74.0         | 72.7         | 73.3         | 72.4         | 79.0         | 75.6         | -4.4                            | 4.5                             |
| Miscellaneous edible products and preparations       | 39.8         | 44.1         | 46.3         | 47.2         | 47.7         | 48.2         | 48.5         | 0.7                             | 1.6                             |
| Oilseeds and oleaginous fruits                       | 45.0         | 45.1         | 47.1         | 45.0         | 42.7         | 44.6         | 46.5         | 4.3                             | 9.0                             |
| Sugar, sugar preparations and honey                  | 25.7         | 26.7         | 23.3         | 22.8         | 21.0         | 22.5         | 22.4         | -0.7                            | 6.5                             |
| Vegetables and fruits                                | 133.8        | 130.7        | 146.0        | 129.5        | 143.0        | 131.4        | 147.5        | 12.2                            | 3.1                             |
| <b>6-MONTH TOTAL</b>                                 | <b>651.9</b> | <b>697.4</b> | <b>707.7</b> | <b>695.5</b> | <b>690.4</b> | <b>701.5</b> | <b>693.7</b> | <b>-1.1</b>                     | <b>0.5</b>                      |
| <b>ANNUAL TOTAL</b>                                  | <b>1,349</b> |              | <b>1,403</b> |              | <b>1,392</b> |              |              |                                 |                                 |

Source: Trade Data Monitor (TDM), authors' calculations. H1 and H2 refer, respectively, to the first and second half of the year in question.

**Table 2. Recent trends in the World food import volumes (USD billion, 2015 prices)**

| Food Group                                           | H1-2017      | H2-2017      | H1-2018      | H2-2018      | H1-2019      | H2-2019      | H1-2020      | Change H1-2020 over H2-2019 (%) | Change H1-2020 over H1-2019 (%) |
|------------------------------------------------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|---------------------------------|---------------------------------|
| Fish, crustaceans, molluscs and preparations thereof | 62.7         | 68.4         | 64.2         | 68.8         | 65.7         | 71.0         | 62.8         | -11.5                           | -4.4                            |
| Animal and vegetable oils, fats and waxes            | 47.0         | 45.8         | 45.3         | 46.0         | 46.3         | 48.0         | 47.7         | -0.5                            | 3.0                             |
| Beverages                                            | 48.6         | 54.5         | 51.2         | 58.4         | 54.0         | 56.8         | 47.6         | -16.2                           | -11.9                           |
| Cereals and cereal preparations                      | 88.6         | 90.0         | 90.0         | 90.5         | 88.9         | 88.6         | 92.7         | 4.7                             | 4.3                             |
| Coffee, tea, cocoa, spices and manufactures thereof  | 56.4         | 55.1         | 56.6         | 55.4         | 57.1         | 55.6         | 54.9         | -1.2                            | -3.9                            |
| Dairy products and birds' eggs                       | 42.7         | 40.0         | 41.4         | 40.6         | 44.3         | 43.0         | 43.3         | 0.8                             | -2.2                            |
| Meat and meat preparations                           | 67.4         | 71.3         | 69.2         | 71.1         | 70.8         | 74.7         | 71.8         | -3.8                            | 1.5                             |
| Miscellaneous edible products and preparations       | 38.8         | 40.6         | 42.2         | 40.8         | 43.9         | 43.8         | 45.0         | 2.6                             | 2.5                             |
| Oilseeds and oleaginous fruits                       | 49.1         | 47.9         | 52.5         | 51.1         | 50.2         | 52.3         | 55.8         | 6.6                             | 11.2                            |
| Sugar, sugar preparations and honey                  | 21.8         | 22.4         | 22.5         | 23.1         | 20.7         | 22.5         | 22.1         | -2.2                            | 6.5                             |
| Vegetables and fruits                                | 134.2        | 125.5        | 135.0        | 124.8        | 140.0        | 127.7        | 143.5        | 12.4                            | 2.5                             |
| <b>6-MONTH TOTAL</b>                                 | <b>657.2</b> | <b>661.5</b> | <b>670.0</b> | <b>670.6</b> | <b>681.9</b> | <b>684.0</b> | <b>687.2</b> | <b>0.5</b>                      | <b>0.8</b>                      |
| <b>ANNUAL TOTAL</b>                                  | <b>1,319</b> |              | <b>1,341</b> |              | <b>1,366</b> |              |              |                                 |                                 |

Source: Trade Data Monitor (TDM), authors' calculations. H1 and H2 refer, respectively, to the first and second half of the year in question.

**Table 3. Decomposing changes in food import bills (H1-2020 over H1-2019): price, volume and mixed effects in USD\***

| Food Group                                           | World        |               |              |                 | Developed Countries |               |              |                 | Developing Countries |               |              |                 |
|------------------------------------------------------|--------------|---------------|--------------|-----------------|---------------------|---------------|--------------|-----------------|----------------------|---------------|--------------|-----------------|
|                                                      | Price effect | Volume Effect | Mixed effect | Observed change | Price effect        | Volume Effect | Mixed effect | Observed change | Price effect         | Volume Effect | Mixed effect | Observed change |
| Animal and vegetable oils, fats and waxes            | 3.13         | 1.07          | 0.08         | 4.28            | 0.97                | 1.15          | 0.05         | 2.17            | 2.14                 | -0.02         | -0.01        | 2.11            |
| Beverages                                            | -0.07        | -6.79         | 0.03         | -6.83           | -0.08               | -4.20         | 0.03         | -4.25           | 0.00                 | -2.58         | 0.00         | -2.58           |
| Cereals and cereal preparations                      | -3.00        | 4.49          | -0.16        | 1.32            | -1.12               | 1.00          | -0.04        | -0.17           | -1.86                | 3.47          | -0.13        | 1.49            |
| Coffee, tea, cocoa, spices and manufactures thereof  | 2.12         | -2.12         | -0.12        | -0.12           | 1.79                | -1.95         | -0.13        | -0.29           | 0.33                 | -0.15         | -0.02        | 0.17            |
| Dairy products and birds' eggs                       | -0.04        | -1.03         | 0.00         | -1.07           | -0.39               | -0.96         | 0.02         | -1.33           | 0.34                 | -0.06         | -0.02        | 0.26            |
| Fish, crustaceans, molluscs and preparations thereof | -5.41        | -2.72         | 0.25         | -7.89           | -3.69               | -1.97         | 0.20         | -5.47           | -1.72                | -0.75         | 0.05         | -2.42           |
| Meat and meat preparations                           | 2.02         | 1.07          | 0.13         | 3.22            | 1.41                | -3.62         | -0.06        | -2.27           | 0.58                 | 4.72          | 0.18         | 5.49            |
| Miscellaneous edible products and preparations       | 0.77         | 0.04          | -0.03        | 0.78            | 0.28                | -0.41         | -0.01        | -0.15           | 0.44                 | 0.50          | -0.02        | 0.93            |
| Oilseeds and oleaginous fruits                       | -0.72        | 4.66          | -0.12        | 3.82            | -0.24               | 0.94          | -0.02        | 0.68            | -0.47                | 3.70          | -0.09        | 3.14            |
| Sugar, sugar preparations and honey                  | 0.02         | 1.38          | -0.04        | 1.37            | 0.03                | -0.21         | -0.02        | -0.19           | 0.02                 | 1.55          | -0.02        | 1.55            |
| Vegetables and fruits                                | 0.94         | 3.50          | 0.02         | 4.45            | 0.95                | 1.16          | 0.00         | 2.11            | 0.00                 | 2.35          | -0.01        | 2.34            |
| <b>TOTAL</b>                                         | <b>-0.27</b> | <b>3.55</b>   | <b>0.05</b>  | <b>3.33</b>     | <b>-0.10</b>        | <b>-9.07</b>  | <b>0.01</b>  | <b>-9.15</b>    | <b>-0.18</b>         | <b>12.73</b>  | <b>-0.06</b> | <b>12.48</b>    |

Source: TDM, authors' calculations.

$$\begin{aligned}
 * \Delta FIB_{USD} &= \Delta Q \cdot P_{USD,o} \quad (\text{volume effect}) \\
 &+ Q_o \cdot \Delta P_{USD} \quad (\text{price effect}) \\
 &+ [\Delta Q \cdot \Delta P_{USD}] \quad (\text{mixed effect})
 \end{aligned}$$

**Table 4. Recent trends in food export volumes from the Americas (USD billion, 2015 prices)**

| Food Group                                           | H1-2017 | H2-2017 | H1-2018 | H2-2018 | H1-2019 | H2-2019 | H1-2020 | Change H1-2020 over H2-2019 (%) | Change H1-2020 over H1-2019 (%) |
|------------------------------------------------------|---------|---------|---------|---------|---------|---------|---------|---------------------------------|---------------------------------|
| Fish, crustaceans, molluscs and preparations thereof | 12.8    | 15.0    | 13.6    | 14.9    | 13.9    | 15.5    | 13.6    | -12.3                           | -2.0                            |
| Animal and vegetable oils, fats and waxes            | 8.3     | 8.0     | 7.7     | 8.0     | 8.0     | 8.1     | 9.0     | 11.9                            | 13.4                            |
| Beverages                                            | 8.0     | 8.3     | 8.1     | 8.8     | 8.7     | 8.7     | 8.6     | -1.5                            | -1.1                            |
| Cereals and cereal preparations                      | 27.4    | 27.7    | 27.5    | 28.0    | 27.4    | 29.2    | 29.4    | 0.5                             | 7.2                             |
| Coffee, tea, cocoa, spices and manufactures thereof  | 12.3    | 11.0    | 10.7    | 10.7    | 11.5    | 10.8    | 11.3    | 4.7                             | -2.0                            |
| Dairy products and birds' eggs                       | 4.0     | 3.8     | 4.0     | 4.2     | 4.0     | 4.4     | 4.5     | 3.4                             | 12.5                            |
| Meat and meat preparations                           | 23.1    | 24.1    | 22.3    | 25.2    | 24.5    | 27.2    | 26.2    | -3.7                            | 7.0                             |
| Miscellaneous edible products and preparations       | 7.6     | 7.3     | 7.3     | 7.8     | 7.9     | 8.1     | 8.1     | 1.1                             | 2.8                             |
| Oilseeds and oleaginous fruits                       | 34.7    | 32.6    | 34.3    | 32.9    | 33.6    | 33.7    | 39.8    | 18.0                            | 18.4                            |
| Sugar, sugar preparations and honey                  | 9.9     | 9.2     | 7.7     | 7.2     | 7.1     | 7.3     | 7.9     | 7.8                             | 11.2                            |
| Vegetables and fruits                                | 38.9    | 35.6    | 38.3    | 35.5    | 41.5    | 37.5    | 40.8    | 8.7                             | -1.8                            |

Source: Trade Data Monitor (TDM), authors' calculations. H1 and H2 refer, respectively, to the first and second half of the year in question.



Table 5. Recent trends in agricultural exports: developed and developing countries

| Food Group                                          | Developed Countries |              |              |                                 |                                 | Developing Countries |              |              |                                 |                                 |
|-----------------------------------------------------|---------------------|--------------|--------------|---------------------------------|---------------------------------|----------------------|--------------|--------------|---------------------------------|---------------------------------|
|                                                     | H1-2019             | H2-2019      | H1-2020      | change H1-2020 over H2-2019 (%) | change H1-2020 over H1-2019 (%) | H1-2019              | H2-2019      | H1-2020      | change H1-2020 over H2-2019 (%) | change H1-2020 over H1-2019 (%) |
| Non-Food                                            | 95.7                | 90.2         | 93.2         | 3.4                             | -2.6                            | 48.6                 | 47.7         | 46.7         | -2.1                            | -3.8                            |
| Animal and vegetable oils, fats and waxes           | 16.6                | 16.9         | 18.7         | 10.6                            | 12.7                            | 26.0                 | 27.3         | 28.7         | 5.4                             | 10.4                            |
| Beverages                                           | 43.3                | 46.6         | 37.4         | -19.8                           | -13.7                           | 12.0                 | 12.7         | 10.3         | -18.7                           | -14.1                           |
| Cereals and cereal preparations                     | 55.8                | 54.8         | 58.8         | 7.3                             | 5.4                             | 32.8                 | 35.6         | 34.1         | -4.2                            | 3.9                             |
| Coffee, tea, cocoa, spices and manufactures thereof | 25.1                | 28.6         | 24.4         | -14.4                           | -2.8                            | 28.2                 | 27.4         | 28.8         | 5.2                             | 2.2                             |
| Dairy products and birds' eggs                      | 40.9                | 40.1         | 40.7         | 1.3                             | -0.5                            | 5.8                  | 5.7          | 5.4          | -5.0                            | -7.3                            |
| Meat and meat preparations                          | 54.6                | 59.1         | 55.5         | -6.2                            | 1.6                             | 19.6                 | 23.1         | 20.4         | -11.7                           | 3.9                             |
| Miscellaneous edible products and preparations      | 34.5                | 34.3         | 34.3         | 0.1                             | -0.7                            | 13.7                 | 13.7         | 14.2         | 3.1                             | 3.4                             |
| Oilseeds and oleaginous fruits                      | 17.1                | 20.9         | 16.9         | -18.8                           | -1.1                            | 23.9                 | 21.4         | 30.0         | 40.4                            | 25.6                            |
| Sugar, sugar preparations and honey                 | 8.5                 | 9.2          | 8.6          | -6.0                            | 1.3                             | 12.2                 | 12.7         | 13.5         | 5.9                             | 11.0                            |
| Vegetables and fruits                               | 72.0                | 67.6         | 72.4         | 7.2                             | 0.5                             | 64.4                 | 63.5         | 68.5         | 7.8                             | 6.2                             |
| <b>6-MONTH TOTAL</b>                                | <b>464.2</b>        | <b>468.2</b> | <b>461.0</b> | <b>-1.5</b>                     | <b>-0.7</b>                     | <b>287.3</b>         | <b>290.8</b> | <b>300.6</b> | <b>3.4</b>                      | <b>4.6</b>                      |
| <b>ANNUAL TOTAL</b>                                 | <b>932</b>          |              |              |                                 |                                 | <b>578</b>           |              |              |                                 |                                 |

| Food Group                                          | Developed Countries |              |              |                                 |                                 | Developing Countries |              |              |                                 |                                 |
|-----------------------------------------------------|---------------------|--------------|--------------|---------------------------------|---------------------------------|----------------------|--------------|--------------|---------------------------------|---------------------------------|
|                                                     | H1-2019             | H2-2019      | H1-2020      | change H1-2020 over H2-2019 (%) | change H1-2020 over H1-2019 (%) | H1-2019              | H2-2019      | H1-2020      | change H1-2020 over H2-2019 (%) | change H1-2020 over H1-2019 (%) |
| Non-Food                                            | 90.4                | 85.5         | 90.3         | 5.7                             | 0.0                             | 47.1                 | 47.1         | 47.1         | -0.2                            | -0.1                            |
| Animal and vegetable oils, fats and waxes           | 17.4                | 18.0         | 19.6         | 9.3                             | 13.1                            | 28.2                 | 29.3         | 28.6         | -2.4                            | 1.4                             |
| Beverages                                           | 41.8                | 43.1         | 37.8         | -12.5                           | -9.7                            | 11.6                 | 11.9         | 10.2         | -13.5                           | -11.5                           |
| Cereals and cereal preparations                     | 55.4                | 56.5         | 59.9         | 6.0                             | 8.1                             | 31.5                 | 35.1         | 33.8         | -3.9                            | 7.0                             |
| Coffee, tea, cocoa, spices and manufactures thereof | 26.2                | 28.3         | 25.6         | -9.3                            | -1.9                            | 29.4                 | 27.1         | 29.4         | 8.5                             | 0.1                             |
| Dairy products and birds' eggs                      | 38.3                | 37.0         | 37.7         | 1.7                             | -1.6                            | 5.5                  | 5.3          | 5.0          | -4.9                            | -8.5                            |
| Meat and meat preparations                          | 53.4                | 55.0         | 52.6         | -4.5                            | -1.6                            | 19.5                 | 22.1         | 20.1         | -9.0                            | 2.9                             |
| Miscellaneous edible products and preparations      | 31.1                | 31.2         | 31.3         | 0.2                             | 0.8                             | 12.5                 | 12.5         | 13.2         | 5.1                             | 5.8                             |
| Oilseeds and oleaginous fruits                      | 17.8                | 21.8         | 17.5         | -19.6                           | -1.5                            | 25.6                 | 22.7         | 33.0         | 45.4                            | 29.2                            |
| Sugar, sugar preparations and honey                 | 8.5                 | 9.1          | 8.5          | -7.1                            | -0.1                            | 12.5                 | 13.1         | 13.5         | 2.8                             | 7.8                             |
| Vegetables and fruits                               | 71.5                | 64.1         | 69.3         | 8.1                             | -3.1                            | 64.0                 | 60.1         | 64.9         | 8.0                             | 1.3                             |
| <b>6-MONTH TOTAL</b>                                | <b>451.6</b>        | <b>449.7</b> | <b>450.1</b> | <b>0.1</b>                      | <b>-0.3</b>                     | <b>287.3</b>         | <b>286.3</b> | <b>298.7</b> | <b>4.3</b>                      | <b>4.0</b>                      |
| <b>ANNUAL TOTAL</b>                                 | <b>901</b>          |              |              |                                 |                                 | <b>574</b>           |              |              |                                 |                                 |

Source: TDM, authors' calculation

Figure 1. Recent trends in the World food import bill, products and total (USD billion, current)

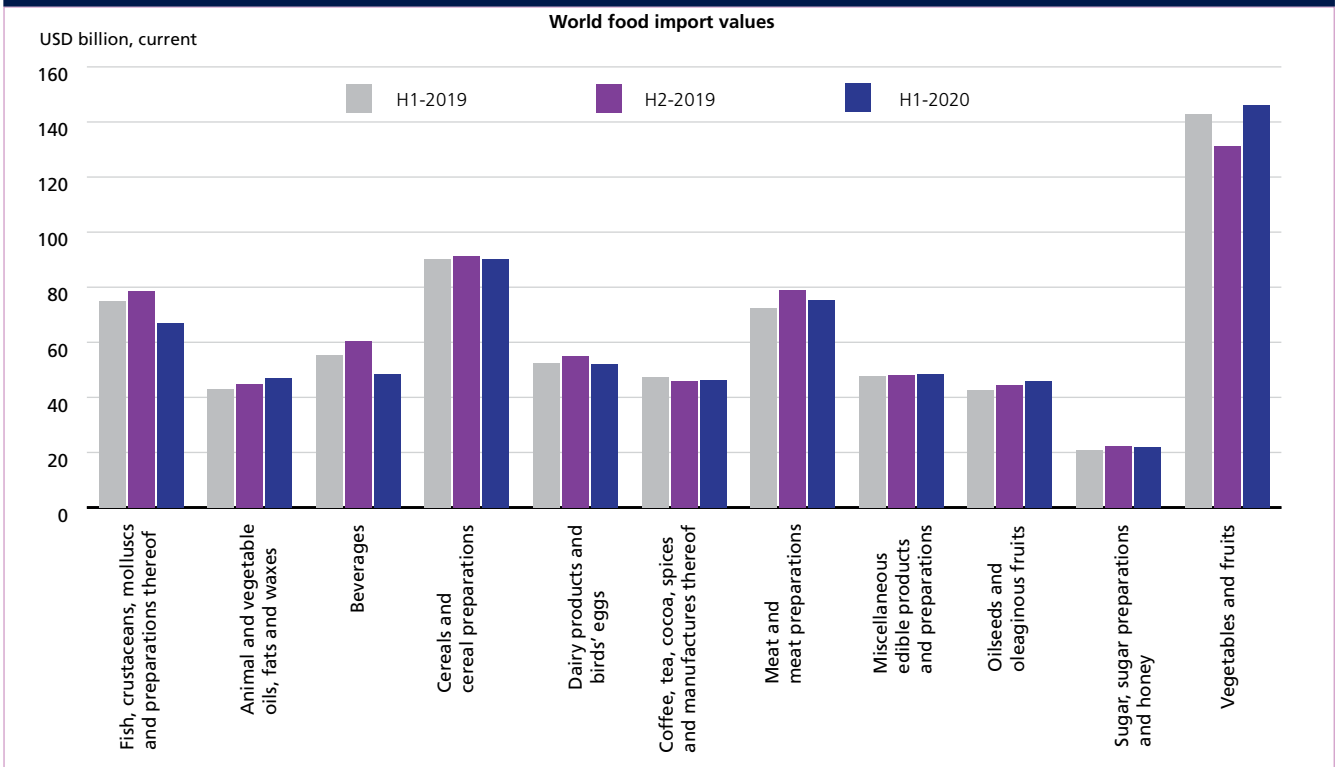


Figure 2. Recent trends in the world food import volumes (USD billion, 2015 constant prices)

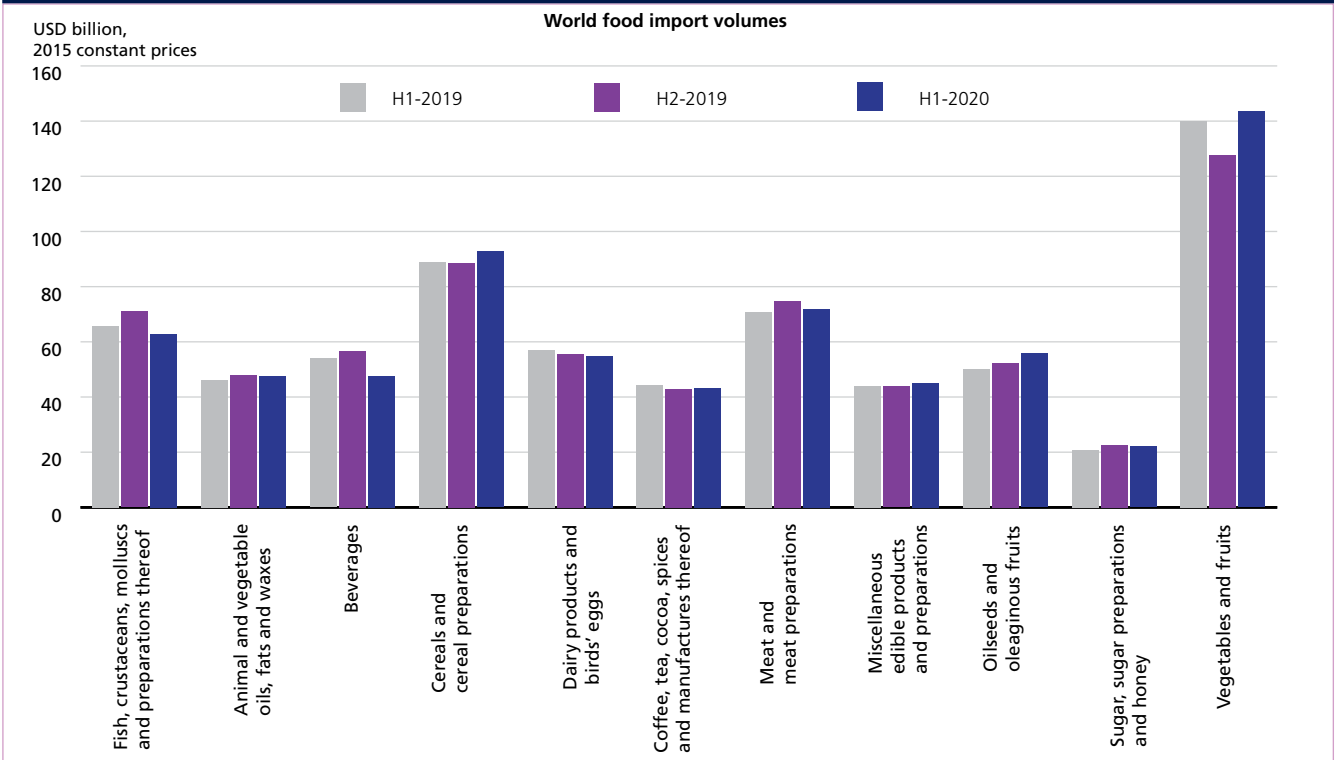


Figure 3. Recent trends in the developing countries' food import bill, products and total (USD billion, current)

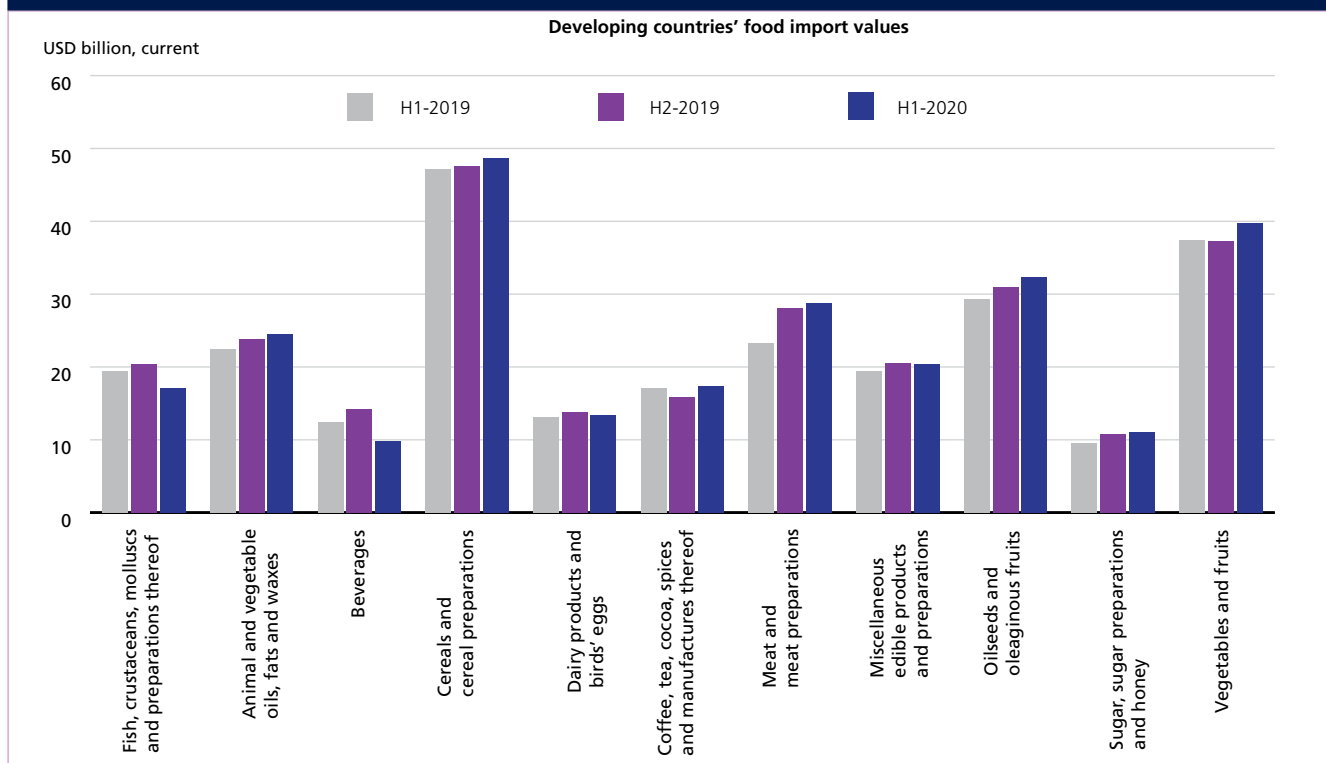
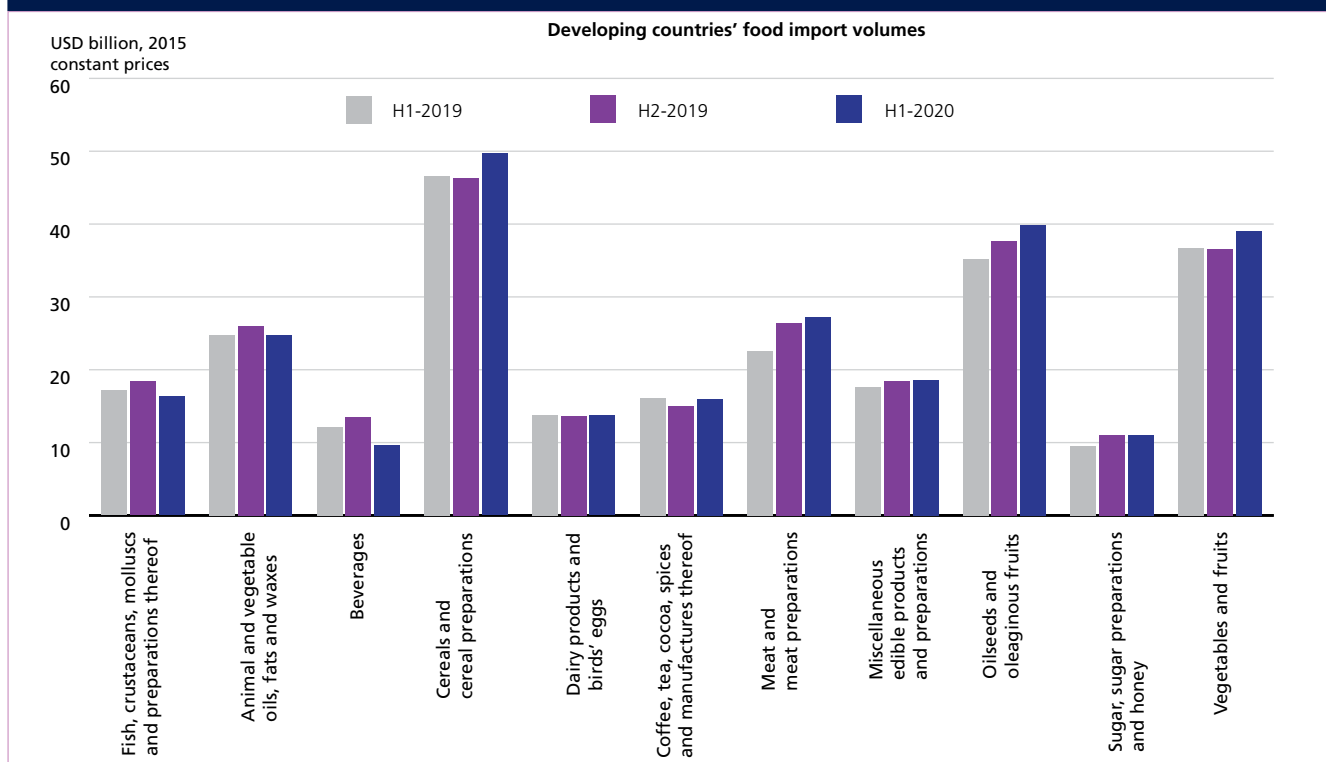


Figure 4. Recent trends in developing countries' food import volumes (USD billion, 2015 prices)



# MARKET POLICY DEVELOPMENTS

## GRAINS: MAJOR POLICY DEVELOPMENTS MID-MAY 2020 TO MID-OCTOBER 2020\*

| COUNTRY   | DATE   | COMMODITY       | POLICY INSTRUMENT              | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
|-----------|--------|-----------------|--------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Algeria   | Aug-20 | Wheat           | Government procurement         | Announced that the Government will no longer subsidize durum wheat for pasta or common wheat not destined for bread manufacturing. Starting from November 2020, millers and manufacturers will buy durum for pasta and couscous manufacture and bread wheat destined for other types of flour from OAIC at a non-subsidized price of DZD 2 280 per quintal (USD 178.1 per tonne) and DZD 1 285 per quintal (USD 100.3 per tonne), respectively.                                                                                                                                                                                                         |
|           | Aug-20 | Maize and Wheat | Value added tax                | In view of the economic effects of the COVID-19 pandemic, announced that several basic food products, including wheat and maize flour, will no longer benefit from value added tax exemption and will now be taxed at 5 percent.                                                                                                                                                                                                                                                                                                                                                                                                                        |
|           | Oct-20 | Wheat           | Production support             | Announced a plan to double annual wheat flour production from the current 600 000 tonnes to 1.2 million tonnes by 2021.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| Argentina | Jun-20 | Maize           | Government market intervention | Introduced new processing and labelling requirements for maize flour made for varieties that are grown and marketed in the country (G/TBT/N/ARG/393).                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
|           | Jun-20 | Grains          | Production support             | Launched the 'Programa de Asistencia Crítica y Directa para la Agricultura Familiar, Campesina e Indígena' initiative, with a total budget of approximately USD 420 000. This will provide smallholder producers affected by the COVID-19 pandemic with direct financial support.                                                                                                                                                                                                                                                                                                                                                                       |
|           | Oct-20 | Wheat           | GMO policy                     | Approved the growth and consumption of HB4 drought-resistant transgenic wheat. Argentina is the first country in the world to approve genetically modified (GM) wheat.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
|           | Oct-20 | Maize           | Biofuel                        | Adopted Resolution 4/2020, increasing the price of maize-based ethanol used in fuel blendings. The price increased from ARS 29.8 to ARS 32.7 (USD 0.39 to USD 0.42) per litre.                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
|           | Jun-20 | Wheat           | Import policy                  | Introduced a new sanitary and phytosanitary measure on imports of wheat ( <i>Triticum aestivum</i> ) produced in Lithuania, requiring imports to be free from soil and plant residue (G/SPS/N/BRA/1680).                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|           | Jun-20 | Wheat           | Import quota                   | Increased the volume of the duty-free wheat import quota for non-MERCOSUR countries from 750 000 tonnes to 1.2 million tonnes. The import quota will be valid until November 2020.                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
|           | Jul-20 | Maize           | Pesticide regulation           | Approved the use of dicamba-based herbicides, which are widely employed in the cultivation of genetically engineered maize.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
|           | Jul-20 | Grains          | Production support             | Presented the agricultural support programme for 2020/21, which includes a renewed focus on small- and medium-sized farms, new incentives for sustainable forms of production, and a further expansion in the federal crop insurance programme. Compared with 2019/20, the new programme features a higher total volume of farm loans and reduced average interest rates, while government expenditures for interest rate subsidies are set to increase by 15 percent.                                                                                                                                                                                  |
|           | Sep-20 | Maize           | Import tariff                  | Introduced a 20 percent tariff rate quota on US ethanol imports for the next 90 days.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
|           | Oct-20 | Maize           | Import tariff                  | Eliminated the 8 percent import tariffs for maize imports from non-MERCOSUR countries in order to maintain adequate supplies amid record domestic prices. Tariff-free maize imports will be valid from non-MERCOSUR countries until 31 March 2021.                                                                                                                                                                                                                                                                                                                                                                                                      |
| Canada    | Jul-20 | Wheat           | Trade agreement                | The United States-Mexico-Canada Agreement came into effect. Effective from 1 August 2020, farmers will be requested to complete the Declaration of Eligibility for Delivery of Grain. This new standardized requirement is mandatory for all grain of approved varieties delivered anywhere in Canada, regardless of whether the grain was grown in the United States or Canada. According to the agreement, requirements for official inspection certificates to indicate that grain grown in the United States is of foreign or mixed origin will no longer be requested. This means that Canadian and US wheat will be labelled "non-foreign wheat". |

| COUNTRY          | DATE   | COMMODITY          | POLICY INSTRUMENT              | DESCRIPTION                                                                                                                                                                                                                                                                                                                                 |
|------------------|--------|--------------------|--------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Chile            | Jun-20 | Wheat              | Import tariff                  | Decreased custom duties reductions on wheat and wheat flour import tariffs from USD 118.6 to USD 85.3 per tonne and from USD 185 to USD 133.1 per tonne, respectively.                                                                                                                                                                      |
|                  | Aug-20 | Wheat              | Import tariff                  | Established new discounts on customs duties on wheat and wheat flour for a two-month period, starting 16 August 2020. Discounts for wheat imports are set at USD 104.27 per tonne, while for wheat flour at USD 162.66 per tonne.                                                                                                           |
|                  | Jun-20 | Maize              | GMO policy                     | Renewed permits for five genetically modified maize varieties for another five years to be used in the livestock sector.                                                                                                                                                                                                                    |
| China (Mainland) | Jun-20 | Barley and Sorghum | Import tariff                  | Raised import tariffs on Australian barley and sorghum imports which previously had tariff exemptions under a free trade agreement signed in 2015. Barley and sorghum will face a 3 and 2 percent tariff, respectively, until the end of 2020.                                                                                              |
|                  | Jul-20 | Grains             | Production support             | Issued Key Policies to Strengthen Agriculture and Benefit Farmers, including continued subsidies for maize producers in Heilongjiang, Jilin, Liaoning and Inner Mongolia provinces. The move also includes monetary incentives for producing high-quality grain.                                                                            |
|                  | Jul-20 | Wheat              | Stocks release                 | Announced plans to sell wheat from public reserves to animal feed producers via state firms rather than through auctions. The measure aims to support this sector from recent high maize prices due to tightening supplies.                                                                                                                 |
|                  | Jul-20 | Wheat              | Government support             | Allocated CNY 330 million (USD 47 million) to a disaster relief fund to assist impacted agricultural sectors (including wheat) in southern provinces of Jiangsu, Anhui, Jiangxi, Hubei, Hunan, Guangxi and Sichuan.                                                                                                                         |
|                  | Jul-20 | Wheat              | Government support             | Allocated CNY 11.48 billion (USD 1.7 billion) to farm machinery subsidies to help 1.21 million rural households, prioritizing key staple crops, including wheat.                                                                                                                                                                            |
|                  | Sep-20 | Barley             | Import ban                     | Suspended barley imports from Australia's largest grain exporter, CBH Grain, after quarantine pests were found in barley exports from the company multiple times.                                                                                                                                                                           |
|                  | Sep-20 | Maize and wheat    | Import quota                   | Announced the 2021 tariff rate quotas (TRQ) for wheat and maize, which are at the same level as last year. The TRQ was set at 9.6 million tonnes for wheat, of which 90 percent is allocated to state firms, and at 7.2 million tonnes for maize, of which 60 percent is allocated to state firms.                                          |
|                  | Jul-20 | Wheat              | Government market intervention | Announced the provision of EGP 4 billion (USD 252 million) to the General Authority for Supply Commodities, the state grains authority, as part of funding to cover the costs of the food subsidy card system, breadmaking and distribution expenses, as well as the purchase of locally grown wheat, in response to the COVID-19 pandemic. |
|                  | Sep-20 | Wheat              | Futures market                 | Announced the creation of a commodities exchange for several products, including wheat. It will begin operations in the first half of 2021 and was established to provide protection for small-scale farmers and producers, and to make their stocks available to the wider market.                                                         |
|                  | Sep-20 | Wheat              | Food security                  | Adopted National Food Safety Authority Regulation No. 2/2020, which organizes the registration requirements and procedures, enforcement, technical and financial obligations of the Conformity Assessment Bodies required to conduct valid pre-shipment inspection. The regulation covers various products, including wheat.                |
| Egypt            | Oct-20 | Wheat              | Import policy                  | Announced that sellers of imported wheat will not be charged fees for sieving and fumigation services if dead insects are detected in their cargoes. The sieving fee was set at USD 2 per tonne and USD 50 cents per tonne for fumigation.                                                                                                  |
|                  | Jun-20 | Sorghum and rye    | Import duty                    | Reduced sorghum and rye import duties from EUR 10.4 (USD 12.3) to EUR 4.65 (USD 5.24) per tonne.                                                                                                                                                                                                                                            |
|                  | Jun-20 | Maize              | Import duty                    | Implemented regulation (EU) 2020/864, which reduced maize import duties by 55 percent to EUR 4.65 (USD 5.24) per tonne.                                                                                                                                                                                                                     |
|                  | Jun-20 | Grains             | Production support             | Increased support for farmers affected by COVID-19. Member States can pay up to EUR 7 000 (USD 8 176.8) to farmers and up to EUR 50 000 (USD 58 450.4) to small and medium enterprises active in the processing, marketing or development of agricultural products.                                                                         |
| European Union   | Jun-20 | Sorghum and rye    | Import duty                    | Reduced sorghum and rye import duties from EUR 10.4 (USD 12.3) to EUR 4.65 (USD 5.24) per tonne.                                                                                                                                                                                                                                            |
|                  | Jun-20 | Maize              | Import duty                    | Implemented regulation (EU) 2020/864, which reduced maize import duties by 55 percent to EUR 4.65 (USD 5.24) per tonne.                                                                                                                                                                                                                     |
|                  | Jun-20 | Grains             | Production support             | Increased support for farmers affected by COVID-19. Member States can pay up to EUR 7 000 (USD 8 176.8) to farmers and up to EUR 50 000 (USD 58 450.4) to small and medium enterprises active in the processing, marketing or development of agricultural products.                                                                         |

| COUNTRY        | DATE   | COMMODITY              | POLICY INSTRUMENT              | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
|----------------|--------|------------------------|--------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| European Union | Jul-20 | Maize, sorghum and rye | Import duty                    | Removed import duties on maize, sorghum and rye, previously set in June, effective from 3 July.                                                                                                                                                                                                                                                                                                                                                                                                                       |
|                | Aug-20 | Maize, sorghum and rye | Import duty                    | Set import duties on maize, rye and sorghum at EUR 5.48 (USD 6.47) per tonne.                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|                | Aug-20 | Maize, sorghum and rye | Import duty                    | Lowered import duties on maize, sorghum and rye, early implemented at the beginning of August, to EUR 0.26 (USD 0.31) per tonne.                                                                                                                                                                                                                                                                                                                                                                                      |
|                | Aug-20 | Maize, sorghum and rye | Import duty                    | Removed import duties on maize, sorghum and rye, effective from 27 August.                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| India          | Jun-20 | Maize                  | Procurement price              | Increased the minimum support price for maize by 5 percent to INR 1 850 per 100 kg (USD 245 per tonne).                                                                                                                                                                                                                                                                                                                                                                                                               |
|                | Jun-20 | Maize                  | Import policy                  | Authorized imports of 500 000 tonnes of non-genetically modified maize in 2020/21 at a concessional tariff of 15 percent, down from 60 percent. Imports are addressed to end-consumers in the poultry and starch supply sectors.                                                                                                                                                                                                                                                                                      |
|                | Jun-20 | Wheat                  | Government market intervention | Extended until end-November 2020 the national scheme providing 5 kg of food grains free of charge to 800 million individuals. The programme had initially been launched in April in response to COVID-19.                                                                                                                                                                                                                                                                                                             |
|                | Jul-20 | Coarse grains          | Procurement price              | Increased the minimum support prices (MSPs) of the mandated kharif crops for 2020/21. The MSP of maize increased by 5.1 percent, sorghum by 2.7 percent, and millet by 7.5 percent.                                                                                                                                                                                                                                                                                                                                   |
|                | Aug-20 | Maize and wheat        | GMO policy                     | Issued an interim order requiring traders to declare, from 1 January 2021, that imported crop products, including maize and wheat, are not genetically modified and are of non-GM origin. This directive does not apply to processed food products prepared with the concerned commodities, or to products imported for use as animal feed.                                                                                                                                                                           |
|                | Sep-20 | Sorghum                | Import policy                  | Capped the total benefit that can be granted to an Import Export Code (IEC) holder under the Merchandise Exports from India Scheme. The benefit has been capped at INR 2 crore (USD 273 860) per IEC holder for exports in the period 1 September 2020 to 31 December 2020.                                                                                                                                                                                                                                           |
|                | Sep-20 | Wheat                  | Government market intervention | Passed a series of market reforms and long-term measures to increase the competitiveness of the country's agriculture sector and enhance the income of farmers. Key innovations include: the freedom of farmers to market their products to other entities in addition to government; the right of farmers to practise contract farming and engage directly with processors, wholesalers, large retailers and exporters; and the removal of price and stockholding limits for strategic commodities, including wheat. |
| Indonesia      | Sep-20 | Barley and wheat       | Procurement price              | Increased the MSPs for wheat by 2.6 percent to INR 1 975 per quintal (USD 267.6 per tonne) and for barley by nearly 5 percent to INR 1 600 per quintal (USD 217 per tonne).                                                                                                                                                                                                                                                                                                                                           |
|                | Jun-20 | Grains                 | Export policy                  | Adopted strategic measures to facilitate and increase exports of processed food products. The measure aims to improve the country's trade balance in the second quarter of 2020 amid the COVID-19 pandemic.                                                                                                                                                                                                                                                                                                           |
|                | Jun-20 | Maize                  | Production support             | Announced plans to develop a farm estate of approximately 164 000 hectares on the island of Borneo to address food security concerns and reduce reliance on imports of staple foods, including maize.                                                                                                                                                                                                                                                                                                                 |
|                | Jul-20 | Grains                 | Bilateral agreement            | The Indonesia-Australia Comprehensive Economic Partnership Agreement entered into force. All tariffs levied on imports from Indonesia were eliminated. Some 500 000 tonnes of Australian feed grains (wheat, sorghum and barley) were granted duty-free access in Indonesia. This volume will be progressively increased over an 11-year implementation period.                                                                                                                                                       |

| COUNTRY    | DATE   | COMMODITY         | POLICY INSTRUMENT              | DESCRIPTION                                                                                                                                                                                                                                                                                                             |
|------------|--------|-------------------|--------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Italy      | May-20 | Grains            | Government market intervention | Established a financial support scheme for companies in the primary production of agricultural products, including cereals. The scheme has a total budget of EUR 12 million (USD 13.3 million) and its aim is to support companies operating in this sector following the outbreak of COVID-19.                         |
| Japan      | Sep-20 | Wheat             | Government procurement         | Announced that from October, the price of imported wheat for millers would decrease to JPY 49 210 (USD 471.25) per tonne, a drop of 4.3 percent.                                                                                                                                                                        |
| Kazakhstan | May-20 | Wheat             | Export ban                     | Announced that export restrictions on wheat and wheat flour introduced in the previous two months to ensure domestic supplies amid COVID-19 were to be lifted from 1 June 2020.                                                                                                                                         |
| Malawi     | Sep-20 | Maize             | Procurement price              | Raised the maize purchase price to MWK 215 per kg (USD 280 per tonne), 7.5 percent higher than the previous level set in early 2020, to support producers amid low prices following an above-average harvest.                                                                                                           |
| Mexico     | May-20 | Grains            | Government market intervention | Abolished the applicable tax relief for fuel used by agricultural industries. The tax credit was at 36.8 percent for diesel used in the agricultural industry.                                                                                                                                                          |
|            | Aug-20 | Grains            | Pesticide regulation           | Announced that use of glyphosate would be gradually phased out, starting in 2024.                                                                                                                                                                                                                                       |
| Morocco    | Jun-20 | Wheat             | Government market intervention | Announced several measures to help farmers market their produce. These include a fixed price for wheat at MAD 2 800 (USD 280) per tonne, a biweekly storage premium for grain traders and Moroccan agricultural cooperatives, and a subsidy for millers and wheat buyers at the rate of MAD 50 (USD 5) per tonne.       |
| Myanmar    | May-20 | Grains            | Production support             | Announced a loan of USD 1.25 billion for farmers, to support the production of several agricultural commodities, including cereals. The loan will be accessible at a 5 percent interest rate for farmers who have paid off their latest loans.                                                                          |
|            | Jul-20 | Maize             | Import ban                     | The central bank stopped access to foreign exchange for maize imports, to support domestic production.                                                                                                                                                                                                                  |
|            | Aug-20 | Wheat             | Production support             | Sealed an agreement with Turkish firm Milleral to build flour milling plants in the country, with a total milling capacity of 2 400 tonnes per day.                                                                                                                                                                     |
| Nigeria    | Sep-20 | Maize and sorghum | Stocks release                 | Approved the release of 30 000 tonnes of maize from national reserves and 4 000 tonnes of millet and sorghum from regional ECOWAS strategic stocks.                                                                                                                                                                     |
|            | Sep-20 | Maize             | Import quota                   | Approved emergency maize import quotas for four companies, totalling 262 000 tonnes until October.                                                                                                                                                                                                                      |
|            | Sep-20 | Wheat             | Production support             | As part of a support programme to farmers affected by the COVID-19 pandemic, 450 bags of improved wheat seeds will be distributed in Katsina State, as well as fertilizer, agrochemicals and spraying machines free of charge to 150 000 small-scale farmers.                                                           |
|            | May-20 | Grains            | Government market intervention | Approved subsidies and interest reductions on loans to several agricultural commodities, including cereals.                                                                                                                                                                                                             |
|            | Jun-20 | Wheat             | Import duty                    | Lifted the 60 percent regulatory duty on imports of wheat, in place since September 2016, and allowed the import of wheat through the private sector without any restrictions.                                                                                                                                          |
|            | Jun-20 | Wheat             | Export ban                     | Banned the export of wheat until further review.                                                                                                                                                                                                                                                                        |
| Pakistan   | Jul-20 | Wheat             | Stocks release                 | Approved the release of 900 000 tonnes of wheat to flour millers at PKR 1 475 per maund – approximately 40 kg – (USD 229 per tonne) and fixed the retail price of wheat flour at PKR 860 per 20 kg bag, (USD 267 per tonne) some 20 percent below the prevailing price in the market.                                   |
|            | Aug-20 | Wheat             | Import quota                   | Approved the importation of 200 000 tonnes of wheat by the public sector.                                                                                                                                                                                                                                               |
|            | Oct-20 | Wheat             | Import quota                   | Approved the importation of 640 000 tonnes of wheat at a cost of up to USD 248 per tonne. Specifically, the import of 340 000 tonnes was arranged through competitive bidding, while the remaining 300 000 tonnes were bought under a government-to-government deal with the Russian Federation at USD 282.5 per tonne. |
|            | Oct-20 | Wheat             | Procurement price              | Set the minimum support price for wheat at PKR 1 600 per 40 kg (USD 248.3 per tonne).                                                                                                                                                                                                                                   |
|            | Oct-20 | Wheat             | Import quota                   | Approved the importation of 320 000 tonnes of wheat from the Russian Federation.                                                                                                                                                                                                                                        |



| COUNTRY            | DATE   | COMMODITY               | POLICY INSTRUMENT              | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
|--------------------|--------|-------------------------|--------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Philippines        | Sep-20 | Grains                  | Government market intervention | Approved a stimulus package, Bayanihan to Recover as One Act (Republic Act No. 11494), which aims to ease the economic hardship caused to businesses as a result of the COVID-19 pandemic. Direct cash subsidies, zero-interest loans, and other forms of assistance will be provided to qualified farmers under the farmers' registry and farmers' cooperatives and associations, and an initial capital injection of PHP 39.4 billion (USD 891.1 million) has been provided. In addition, the Act allows a one-time 60-day grace period for paying loans, including credit card payments. |
|                    | Sep-20 | Grains                  | Production support             | Established a loan interest subsidy of PHP 24 billion (USD 402.7 million) to agriculture-fishery enterprises in order to ensure food security and continuous productivity in these sectors, including the grain sector, so as to curtail the economic repercussions of COVID-19.                                                                                                                                                                                                                                                                                                            |
|                    | Sep-20 | Wheat                   | Import duty                    | Extended for three years the anti-dumping duty imposed on Turkish wheat flour imports, which was in place from January 2015 to January 2020. The anti-dumping duty ranges from 2.87 to 29.57 percent.                                                                                                                                                                                                                                                                                                                                                                                       |
| Poland             | Jun-20 | Grains                  | Government market intervention | Established a financial aid scheme in the form of an interest rate subsidy for farmers in order to counter the liquidity shortage faced following the outbreak of COVID-19. The scheme has a total budget of PLN 40 million (USD 10.1 million) and will be in force until 31 December 2020.                                                                                                                                                                                                                                                                                                 |
| Russian Federation | Aug-20 | Wheat                   | Government market intervention | Approved a measure subsidizing transport carriers transiting through the country. Subsidies will vary from RUB 25 000 to RUB 77 000 (USD 314.2–USD 967.9), depending on the type and destination of the transit cargo. The measure aims to increase the demand for freight transportation and improve the transit links between Europe and Asia.                                                                                                                                                                                                                                            |
| Rwanda             | Sep-20 | Maize                   | Import subsidy                 | Reduced the subsidy rate for imported maize seeds in order to support domestic use of locally produced seeds. Locally produced seeds are subsidized by 79 percent, while the subsidy for imported seeds was reduced to 40 per cent.                                                                                                                                                                                                                                                                                                                                                         |
| Saudi Arabia       | May-20 | Maize                   | Government market intervention | Approved loans worth SAR 333 million (USD 88.6 million) to finance 12 new projects focused on supporting the agricultural activities of the private sector affected by the COVID-19 pandemic. The loans are operational loans and will finance imports of agricultural and food products, including maize.                                                                                                                                                                                                                                                                                  |
|                    | Jul-20 | Grains                  | Value added tax                | Effective 1 July 2020, increased value added tax from 5 percent to 15 percent to counter the economic implications of COVID-19.                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
|                    | Jul-20 | Wheat                   | Government market intervention | Privatized two of its four flour milling companies for USD 740.5 million, opening the way for wheat to be directly purchased from the global market.                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|                    | Jul-20 | Wheat                   | Import policy                  | Liberalized wheat imports for flour mills. This measure is part of the liberalization of the country's grains sector and, from now on, private companies can also import wheat directly from global markets.                                                                                                                                                                                                                                                                                                                                                                                |
| Spain              | Aug-20 | Barley, maize and wheat | Government market intervention | Announced a SAR 412 million (USD 110 million) partnership between the National Shipping Company of Saudi Arabia and the Saudi Agricultural and Livestock Investment Company for the construction of a grain handling port on the Red Sea. The aim is to allow rapid handling of grains, support trade among the Black Sea, Europe, South America and Red Sea regions, and to provide an annual handling capacity at the port of around 3 million tonnes by the end of 2022.                                                                                                                 |
|                    | Jun-20 | Grains                  | Government market intervention | Signed a loan with the European Investment Bank of EUR 100 million (USD 113 million) for agricultural SMEs and mid-caps, in order to improve competitiveness and access to finance following the outbreak of COVID-19.                                                                                                                                                                                                                                                                                                                                                                      |
| Sri Lanka          | May-20 | Maize                   | Import duty                    | Increased the Special Commodity Levy on imports of several goods, including maize. The levy on maize was increased from LKR 10 to LKR per kg (USD 161 to 188 per tonne) and will be effective for 6 months.                                                                                                                                                                                                                                                                                                                                                                                 |

| COUNTRY                  | DATE   | COMMODITY               | POLICY INSTRUMENT              | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
|--------------------------|--------|-------------------------|--------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| South Africa             | Aug-20 | Grains                  | Government market intervention | Extended the validity period of the COVID-19 Disaster Agricultural Support Fund Voucher to 30 September 2020, as supply chain disruptions continued affecting the availability of agricultural production inputs.                                                                                                                                                                                                                                                |
|                          | Sep-20 | Wheat                   | Import duty                    | Increased the import duties on wheat and wheat flour from 51.66 cents per kg (USD 31 per tonne) to 83.21 cents per kg (USD 50 per tonne), and from 77.49 cents per kg (USD 47 per tonne) to 124.81 cents per kg (USD 75 per tonne), respectively.                                                                                                                                                                                                                |
| Sudan                    | Jun-20 | Wheat                   | Government market intervention | Announced the creation of a USD 2 billion fund to support the trading of key commodities amid foreign exchange shortages. Funding will target key commodities, including wheat.                                                                                                                                                                                                                                                                                  |
|                          | Oct-20 | Wheat                   | Government intervention        | As part of humanitarian aid, took delivery of 68 800 tonnes of wheat, shipped from the United Arab Emirates.                                                                                                                                                                                                                                                                                                                                                     |
| Syrian Arab Republic     | May-20 | Wheat                   | Procurement price              | Raised the 2020 purchasing price of wheat from SYP 225 to SYP 400 per kg (from USD 450 to USD 800 per tonne) to support farmers' incomes and increase stocks of domestically procured wheat.                                                                                                                                                                                                                                                                     |
|                          | Jun-20 | Grains                  | Production support             | Introduced measures worth THB 300 billion (USD 9.6 billion) to help 300 000 farmers affected by the COVID-19 pandemic.                                                                                                                                                                                                                                                                                                                                           |
| Thailand                 | Jul-20 | Grains                  | Import policy                  | Announced the new list of Controlled Commodities and Services to include Distiller's Dried Grains with Soluble. This will allow the Government to restrict imports of feed grains if imports are adversely affecting domestic maize prices.                                                                                                                                                                                                                      |
|                          | Sep-20 | Maize                   | Procurement price              | Announced the 2020 maize purchase price, which was increased from TRY 1 150 (USD 164.9) per tonne to TRY 1 324 (USD 189.9) per tonne.                                                                                                                                                                                                                                                                                                                            |
| Turkey                   | Oct-20 | Barley, maize and wheat | Import duty                    | Suspended import duties on wheat, maize and barley until the end of 2021. The import duty on wheat was 45 percent, maize 25 percent, and barley 35 percent.                                                                                                                                                                                                                                                                                                      |
|                          | May-20 | Wheat                   | Export quota                   | Announced that wheat exports will continue, even though the 20.2 million tonnes maximum volume for the 2019/20 marketing year (July/June), agreed with traders on 30 March 2020, has been reached.                                                                                                                                                                                                                                                               |
| Ukraine                  | Jul-20 | Grains                  | Stocks policy                  | Received a working capital loan worth EUR 7 million (USD 8.3 million) from the European Bank for Reconstruction and Development. The loan will be invested in the country's farming and grain storage operations, which have been affected by the COVID-19 pandemic.                                                                                                                                                                                             |
|                          | Aug-20 | Wheat and rye           | Export quota                   | Set the wheat and rye export caps at 17.5 million tonnes and 1 million tonnes, respectively, for the 2020/21 (July/June) marketing year.                                                                                                                                                                                                                                                                                                                         |
| United States of America | May-20 | Grains                  | Government market intervention | Published the Coronavirus Food Assistance Programme (CFAP), which allocates USD 16 billion in direct payments. Through this programme, several non-specialty crops, including barley, canola, maize, millet, oats, sorghum and wheat, are eligible for payments. Based on 50 percent of 2019 total production or the inventory held on 15 January 2020, whichever is the lowest, producers will receive a specific commodity's applicable payment rate per unit. |
|                          | Aug-20 | Grains                  | Government market intervention | Announced the extension of the CFAP application deadline to 11 September 2020.                                                                                                                                                                                                                                                                                                                                                                                   |
|                          | Aug-20 | Maize                   | Stocks policy                  | Approved a Federal Disaster Declaration following the impact of a derecho storm, which damaged a large part of Iowa's maize crops, as well as infrastructure and storage facilities.                                                                                                                                                                                                                                                                             |
| Viet Nam                 | Sep-20 | Maize and wheat         | Government market intervention | Announced additional financial assistance of up to USD 14 billion as part of the extended Coronavirus Food Assistance Programme (CFAP2) launched in May 2020. The package is for agricultural producers who continue to face market disruptions and associated costs due to the COVID-19 outbreak. Eligible crops include wheat and maize.                                                                                                                       |
|                          | May-20 | Wheat                   | Trade policy                   | Issued Decree 57/2020/ND-CP to revise the Most-Favoured-Nation tariff rates on a number of agricultural products, including wheat. The decree entered into force on 10 July 2020.                                                                                                                                                                                                                                                                                |
|                          | Jun-20 | Maize                   | Trade agreement                | Ratified the EU-Viet Nam Free Trade Agreement, which states that maize imports from the EU will be duty-free within an annual quantity of 5 000 tonnes.                                                                                                                                                                                                                                                                                                          |

| COUNTRY  | DATE   | COMMODITY       | POLICY INSTRUMENT | DESCRIPTION                                                                                                                                                                                           |
|----------|--------|-----------------|-------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Zambia   | Sep-20 | Maize           | Export ban        | Temporarily banned maize exports, as well as maize meal exports, until the country secures 1 million tonnes of grains in its Food Reserve Agency for national needs.                                  |
| Zimbabwe | May-20 | Maize and wheat | Import tariff     | Temporarily removed import tariffs on wheat flour and maize meal to support domestic supplies, amid an expected second consecutive below-average harvest in 2020 due to widespread rainfall deficits. |

\* A collection of major grain policy developments starting in July 2010 is available at:  
<http://www.fao.org/economic/est/est-commodities/commodity-policy-archive/en/2groupANDcommodity=grains>

## RICE: MAJOR POLICY DEVELOPMENTS MID-MAY 2020 TO MID-OCTOBER 2020\*

| COUNTRY          | DATE             | POLICY INSTRUMENT                            | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|------------------|------------------|----------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Bangladesh       | Sep-20           | Price controls                               | Effective 30 September 2020, fixed wholesale prices of fine (miniket) rice at BDT 51.5 per kg (USD 597 per tonne) and at BDT 45 per kg (USD 522 per tonne) in the case of medium-quality rice, in an effort to avert further increases in consumer prices.                                                                                                                                                                                                                                                                                          |
|                  | Sep-20           | Government procurement, purchasing prices    | Decided to extend the 2020 Boro procurement drive by two weeks to 15 September 2020, keeping purchasing prices unvaried at BDT 36 per kg of parboiled rice (USD 417 per tonne), BDT 35 per kg (USD 406 per tonne) of white rice and BDT 26 per kg of paddy (USD 301 per tonne).                                                                                                                                                                                                                                                                     |
|                  | Jun-20           | Minimum support prices                       | Set minimum support prices (MSPs) for the 2021/22 season (2020/21 season for Brazil), effective from February 2021 to January 2022. The MSP for fine long grain paddy was raised by 1.39 percent to BRL 804 (USD 144) per tonne for the Southern region (except Paraná), while it was raised by 6.31 percent for all other regions to BRL 843 (USD 151) per tonne. The MSPs for long grain paddy were left unvaried at BRL 411 (USD 74) per tonne for the Southern region (except Paraná), and at BRL 448 (USD 81) per tonne for all other regions. |
| Brazil           | Sep-20           | Import tariff, import quota                  | Decided to open a duty-free import quota for 400 000 tonnes of non-parboiled paddy or semi-wholly milled rice originated outside the MERCOSUR area or from countries not party to a trade agreement with Brazil. The quota will be valid until 31 December 2020.                                                                                                                                                                                                                                                                                    |
|                  | May-20 to Oct-20 | Stock release                                | Sold 7.6 million tonnes of paddy from government reserves through 31 auctions held between 22 May and 16 October 2020, which offered a total of 56.3 million tonnes of paddy for sale.                                                                                                                                                                                                                                                                                                                                                              |
| China (mainland) | Sep-20           | Import quota                                 | Announced that the 2021 tariff-rate import quota for rice would remain unchanged at 5.32 million tonnes.                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| Colombia         | Aug-20           | Support prices, warehouse receipts programme | Allotted COP 29 billion (USD 7.5 million) to implement the storage incentive programme for 2020 second semester crops. The scheme will cover up to 250 000 tonnes of dry paddy, or its husked or milled rice equivalent, extending an outlay of COP 29 000 (USD 7.5) to cover the monthly cost of storing a tonne of paddy. Buyers must purchase wet paddy at reference prices ranging from COP 1 121 600 to 1 328 000 (USD 292 to 345) per tonne, depending on the various producing zones, in order to qualify for the incentive.                 |
| Côte d'Ivoire    | Sep-20           | Price controls                               | Extended the validity of the retail price caps set on various commodities, including rice, in late April for an additional three months.                                                                                                                                                                                                                                                                                                                                                                                                            |
| Egypt            | Sep-20           | Stock exchange                               | Launched the Egyptian Commodities Exchange Company, with EGP 91 (USD 5.8) million total capital. The exchange, for spot commodities, is expected to begin trading during the first semester of 2021, initially, in rice, wheat, oil and sugar.                                                                                                                                                                                                                                                                                                      |
| European Union   | Sep-20           | Import tariff                                | Raised tariffs on non-basmati husked rice imported outside of existing trade agreements, given that total imports of these classes during the 2019/20 marketing year (September–August) exceeded the 517 130 tonne threshold that triggers a higher import duty. Accordingly, import tariffs on these classes would pass from EUR 42.5 (USD 50) to EUR 65 (USD 77) per tonne, effective from 9 September 2020.                                                                                                                                      |
| Guinea           | Jun-20           | Import requirements, fees, strategic reserve | As part of the second phase of its economic response plan to the COVID-19 pandemic, announced that it would suspend Descriptive Import Application (Demande descriptive d'importation) fees for 25% broken rice, along with other food staples, effective from 1 June to 31 December 2020. Additionally, it planned to establish a strategic food reserve to meet contingencies, especially during the lean season.                                                                                                                                 |
| India            | Jun-20           | Food subsidies                               | Announced a five-month extension to the Pradhan Mantri Garib Kalyan Ann Yojana programme, originally scheduled to expire on 30 June 2020. As such, 800 million people will continue to be provided with a monthly ration of 5 kg of rice or wheat and 1 kg of pulses until the end of November 2020, free of costs, and on top of existing assistance under the public distribution system.                                                                                                                                                         |

| COUNTRY | DATE   | POLICY INSTRUMENT                          | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
|---------|--------|--------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| India   | Jun-20 | Minimum support prices                     | Raised minimum support prices for paddy by 2.9 percent for the 2020/21 season. Accordingly, these were set at INR 18 680 (USD 255) per tonne in the case of common paddy and at INR 18 880 (USD 258) per tonne in the case of Grade A paddy.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
|         | Jun-20 | Production and marketing                   | Approved the Farmers' Produce Trade and Commerce (Promotion and Facilitation) Ordinance, 2020, with a view to providing farmers and traders with freedom of choice in the sale/purchase of produce outside the premises of markets notified under state agricultural produce market legislation (i.e. Agricultural Produce Market Committees - APMC - market yards), facilitating inter- and intra-state trade and a framework for electronic trading. Produce covered under the ordinance included foodstuffs (such as rice), cattle fodder, raw cotton, cottonseed and raw jute, for which the charge of any market fee, cess or levy would remain prohibited when traded outside APMC yards. The ordinance was replaced by the Farmers' Produce Trade and Commerce (Promotion and Facilitation) Act, 2020, promulgated on 27 September 2020, with similar stipulations and with effect from 5 June 2020.                                                                                                                                                                                                                                                                                                  |
|         | Jun-20 | Stock limits                               | Approved the Essential Commodities (Amendment) Ordinance, 2020, amending the 1955 Essential Commodities Act, with immediate effect. Under the Ordinance, the supply of foodstuffs, including cereals, pulses, potato, onions, edible oilseeds and oils, may be regulated through stockholding limits by the central Government only under extraordinary circumstances, including war, famine, extraordinary price rise and grave natural calamities. Moreover, the imposition of stock limits based on price increases would only be permitted when retail prices rose, relative to levels registered in the preceding 12 months or 5-year average (whichever is lower), by 100 percent in the case of horticultural products and by 50 percent for non-perishable foods. Processors, exporters and other value chain actors will, however, be exempt from stockholding limits, provided that imposed stock limits do not exceed their overall ceiling of processing capacity, or demand for export, in the case of exporters. The ordinance was replaced by the Essential Commodities (Amendment) Act, 2020, issued on 27 September 2020, which contained similar provisions, with effect from 5 June 2020. |
|         | Jun-20 | Production and marketing, contract farming | Approved the Farmers (Empowerment and Protection) Agreement of Price Assurance and Farm Services Ordinance, 2020, with a view to providing a national framework for sales agreements between farmers of foodstuffs (including rice), cattle fodder, raw cotton, cottonseed and raw jute and agribusiness firms, processors, wholesalers, exporters or large retailers for farm services, for goods yet to be produced, at mutually agreed remunerative prices. The ordinance was replaced by the Farmers (Empowerment and Protection) Agreement of Price Assurance and Farm Services Act, 2020, promulgated on 27 September 2020, with similar provisions and with effect from 5 June 2020.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
|         | Sep-20 | Government procurement, support prices     | Declared that government procurement under minimum support prices would continue, as would APMC market yards established under state laws. The assertion came in the context of parliamentary discussions surrounding the 2020 Farmers' Produce Trade and Commerce (Promotion and Facilitation), the Farmers (Empowerment and Protection) Agreement of Price Assurance and Farm Services and the Essential Commodities (Amendment) bills submitted for parliamentary approval.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
|         | Aug-20 | Export requirements                        | Decided that Certificate of Inspections by the Export Inspection Council/ Export Inspection Agency would be required for exports of basmati and non-basmati rice to European countries (other than the European Union, Iceland, Liechtenstein, Norway and Switzerland) from 1 January 2021, instead of 1 July 2020, as established in January 2020.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
|         | Aug-20 | Trade agreement, export restrictions       | Decided that 102 872 tonnes of rice would be exported to the Maldives, along with other products, under a bilateral trade agreement between the two countries. This volume would be exempt from any existing or future export restriction/prohibition in 2020/21.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |

| COUNTRY                    | DATE   | POLICY INSTRUMENT                         | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|----------------------------|--------|-------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Indonesia                  | May-20 | Food subsidies                            | Began distributing 36 440 tonnes of rice, held by state-owned enterprise Bulog, to 1.4 million households in Jakarta, Bogor, Tangerang and Bekasi, in order to help them cope with the impact of the COVID-19 pandemic.                                                                                                                                                                                                                                                                                                    |
|                            | Jun-20 | Food subsidies                            | Launched the second phase of its rice assistance programme, distributing 25 kg of state-owned rice to 1.86 million households in Jakarta, Bogor, Tangerang and Bekasi.                                                                                                                                                                                                                                                                                                                                                     |
|                            | Sep-20 | Food subsidies                            | Launched the Rice Social Assistance programme to help vulnerable consumers during the COVID-19 pandemic. Under the programme, three monthly rations of 15 kg of rice each would be distributed to 10 million households nationwide.                                                                                                                                                                                                                                                                                        |
| Iran (Islamic Republic of) | Jun-20 | Import tariff                             | Decided to lower the import tariff on semi-milled rice from 10 to 4 percent, while for wholly milled rice the import duty was kept at the 10 percent rate established in March 2020.                                                                                                                                                                                                                                                                                                                                       |
| Kenya                      | Jun-20 | Import tariff                             | Renewed the exemption of the Common External Tariff (CET) of the East African Community on rice imports for an additional year. Thus, imports of paddy, husked, semi/wholly milled rice and broken rice will continue to accrue a 35 percent import tariff (or USD 200 per tonne, whichever is higher), rather than the 75 percent tariff (or USD 345 per tonne) that they would accrue under the CET.                                                                                                                     |
| Malaysia                   | Oct-20 | Production support                        | Announced that it would impose price ceilings and a coupon system for the purchase of rice seeds, further to appointing the National Farmers Organisation as the sole distributor of legitimate rice seed.                                                                                                                                                                                                                                                                                                                 |
| Mexico                     | Sep-20 | Import quota                              | Opened a duty-free import quota for 30 000 tonnes of paddy originated in any country and valid from 1 September to 31 December 2020. In addition, 75 000 tonnes of paddy would be similarly eligible to duty-free entry into the country from 1 January to 31 December 2021.                                                                                                                                                                                                                                               |
| Myanmar                    | Jul-20 | Support prices                            | Raised the floor price for monsoon and summer paddy harvested during the 2020/21 season to MMK 520 000 per 100 baskets (USD 189 per tonne), up 4 percent from levels set for the 2019/20 season.                                                                                                                                                                                                                                                                                                                           |
|                            | Oct-20 | Government procurement, purchasing prices | Announced plans to allocate MMK 20 billion (USD 15.2 million) to purchase paddy and rice harvested during the 2020 monsoon crop cycle. Purchases would be conducted through the Agricultural Products Management Committee and in line with the floor price of MMK 520 000 per 100 baskets (USD 189 per tonne) established for the season.                                                                                                                                                                                 |
|                            | Jul-20 | Stock release                             | In an effort to quell increases in domestic quotations, announced that supplies from state reserves would be released to retail shops at a price of MMK 465 (USD 354) per tonne for them to sell to consumers at a maximum of MMK 470–517 (USD 0.36–0.39) per kg, depending on the various regions.                                                                                                                                                                                                                        |
|                            | Jul-20 | Strategic reserve                         | Announced that it would temporarily suspend purchases of rice for the state reserve, after having bought sufficient volumes to meet its 50 000 tonne target. Amid plans to release state-owned supplies through retail shops, successive statements indicated that it intended to purchase a further 20 000 tonnes for the state reserve.                                                                                                                                                                                  |
|                            | Jun-20 | Export restrictions, export quota         | Extended the validity of rice export licences from 45 to 60 days, while also lifting requirements for exporters to ship 300–500 tonnes in order to qualify for permits. Rice exporters would also only be required to sell the equivalent of 5 percent of their shipments to the Government for its reserve, down from the previous 10 percent, with 150 000 tonnes envisaged to be shipped abroad in July and August 2020, and a further 100 000 tonnes in September 2020. The measures were applicable from 1 July 2020. |
| Nepal                      | Jun-20 | Minimum support prices                    | Raised the minimum support price for common paddy by 7.9 percent to NPR 28 850 (USD 243) per tonne and by 8.0 percent for Mota Dhan paddy to NPR 27 350 (USD 231 per tonne).                                                                                                                                                                                                                                                                                                                                               |

| COUNTRY           | DATE             | POLICY INSTRUMENT           | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
|-------------------|------------------|-----------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Philippines       | Aug-20           | Price controls              | Adjusted Suggested Retail Prices (SRPs) for imported rice, raising them by 2.0 and 2.4 percent for special and premium rice, respectively, to PHP 52 and 43 (USD 1.07 and 0.89) per kg. Conversely, the SRP was lowered by 5.0 percent for well milled rice to PHP 38 (USD 0.78) kg. In the case of local rice, SRPs were left unvaried at PHP 53, 45 and 40 (USD 1.09, 0.93 and 0.83) per kg for special, premium and well milled rice, respectively.                                                                                                                                                                                                                                                                                                                                                                                                        |
|                   | May-20 to Jun-20 | Import quota, import tender | Invited exporters to submit bids for the supply of 300 000 tonnes of 25% broken rice, on a government-to-government basis, by 8 June 2020. Out of this volume, half had to be delivered no later than 22 June 2020, with the balance arriving by 22 July 2020. The imports would go towards ensuring a sufficient buffer stock during the lean months, in light of export restrictions put in place by some rice exporters. The tender was cancelled in June, with officials citing expectations of comfortable rice inventories going forward following the repeal of rice export restrictions by Viet Nam as rationale.                                                                                                                                                                                                                                     |
|                   | Jun-20           | Import requirements         | Decided that applicants of Sanitary and Phytosanitary Import Clearance (SPSIC) for rice would need to submit payment certification of consignments, as well as a list of distribution points/warehouses for their deliveries. These requirements would come in addition to previously applicable rules rendering the submission of proforma/commercial invoices, GMO/non-GMO and analyses of heavy metals certification requisite for SPSIC applications. Furthermore, it issued a reminder to applicants indicating that a low fulfillment of SPSIC licences for rice could be grounds for application rejections and for their having their status as importers suspended. The measure, which took immediate effect, was intended to address the low fulfillment of SPSIC applications and to ensure sufficient rice supplies during the COVID-19 pandemic. |
|                   | Oct-20           | Import modalities           | Appealed to traders to refrain from importing rice during October and November, so as not to put additional downward pressure on producer prices at harvest time.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| Republic of Korea | Sep-20           | Government procurement      | Announced that the Government would purchase 340 000 tonnes of rice from the 2020 harvest from 14 September to 31 December 2020, in order to refurbish state reserves and stabilize local prices. An additional 10 000 tonnes would be purchased as the country's contribution to the Association of Southeast Asian Nations Plus Three Emergency Rice Reserve.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| Rwanda            | Jun-20           | Import tariff               | Renewed the exemption of the Common External Tariff (CET) of the East African Community on imports of semi/wholly milled rice. Accordingly, semi/wholly milled rice will continue to attract an import duty of 45 percent (or USD 345 per tonne, whichever is higher) for an additional year, instead of the 75 percent import tariff (or USD 345 per metric tonne) that it accrues under the CET.                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| Sri Lanka         | May-20           | Price controls              | Adjusted the maximum retail prices (MRPs) on rice set on 10 April 2020, with immediate effect. In the case of Keeri Samba, these were lowered by 4.0 percent to LKR 120 (USD 0.65) per kg, while for steamed and raw Samba (white/red, excepting Suduru Samba) MRPs were raised by 8.9 percent to LKR 98 (USD 0.53) per kg. For steamed Nadu rice (white/red, excepting Mottaikarupan and Attakari) and for white/red raw rice, ceilings of LKR 96 and 93 (USD 0.52 and 0.5) per kg were set, up 6.7 and 9.4 percent from April levels, respectively.                                                                                                                                                                                                                                                                                                         |
|                   | Jul-20           | Feed use ban                | Prohibited the sale, storage, transport, distribution and purchase of domestic rice and paddy for the direct manufacture of animal feed or as an ingredient for animal feed production, with immediate effect.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |

| COUNTRY                                              | DATE             | POLICY INSTRUMENT                                  | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
|------------------------------------------------------|------------------|----------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Sri Lanka                                            | Jul-20           | Government procurement, support prices             | Approved the government purchase programme for the 2020 Yala crop. Under the drive, producers would receive a uniform certified price of LKR 50 per kg (USD 269 per tonne) of Samba or Nadu paddy sold to the Paddy Marketing Board. This compares with the LKR 41 and 43 per kg (USD 221–231 per tonne) respectively paid for Nadu and Samba paddy during the 2019 Yala purchase drive.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|                                                      | Sep-20           | Strategic reserve                                  | Approved a working capital plan to finance the acquisition and storage of 25 000 tonnes of rice by Lanka Sathosa from October 2020 to January 2021.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
|                                                      | May-20 to Jul-20 | Finance and credit facilities, import restrictions | Amended the import control regulations issued on 16 April 2020 various times, initially specifying that the import suspension of husked/semi-wholly milled and broken rice, along with other products, under Letters of Credits, Documents against Acceptance, Documents against Payment, Advance payments, or a combination of these, would be applicable to goods loaded at point of origin at a date not exceeding 90 days from 16 April 2020. Successively and with exceptions stipulated, the terms of the import suspension were rendered effective for products loaded from 17 July 2020 and until further notice, in addition to semi-wholly milled basmati rice being added to the schedule of products that may be imported on a minimum 90-day deferred payment basis.                                                                                                                                                                                                                                                                                                                |
| Thailand                                             | Jul-20           | Production support, support prices                 | Decided that the 2020/21 round of the Rice Price Guarantee Programme would be implemented between 1 September 2020 and 31 May 2021, keeping guaranteed prices for the 2020/21 crop unchanged from the previous season. As such, these would remain set at THB 15 000 (USD 481) per tonne of Hom Mali paddy for a maximum of 14 tonnes or 40 rai cultivated (6.4 ha) per farming household; at THB 14 000 (USD 449) per tonne of provincial fragrant paddy for up to 16 tonnes or 40 rai; at THB 11 000 (USD 352) per tonne of Pathum Thani fragrant for up to 25 tonnes or 40 rai; at THB 12 000 (USD 384) per tonne of glutinous paddy for a maximum of 16 tonnes or 40 rai; and at THB 10 000 (USD 320) per tonne of white paddy for up to 30 tonnes or 40 rai cultivated per farming household. On the other hand, direct outlays destined to help producers cover production costs would be doubled to THB 1 000 per rai (USD 200 per ha) for up to 20 rai (3.2 ha) cultivated.                                                                                                              |
| Turkey                                               | Sep-20           | Government procurement                             | Set government purchasing prices for the 2020 season, ranging from TRY 3 200 to 4 500 (USD 404–567) per tonne. In the case of Osmaniç paddy with a 60 percent milling yield, the government purchase price was set at TRY 3 600 (USD 454) per tonne, up 18 percent from its year-earlier level.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
| United Kingdom of Great Britain and Northern Ireland | May-20           | Import tariff                                      | Announced the UK Global Tariff (UKGT), the country's tariff schedule that will replace the Common External Tariff of the European Union, following the end of the Brexit transition period, on 31 December 2020. The UKGT is to apply to imports of goods not covered by a tariff suspension or originated in countries not party to a trade agreement with the United Kingdom of Great Britain and Northern Ireland or part of the Generalised Scheme of Preferences (GSP). According to the UKGT, as of 1 January 2021, paddy for sowing is to accrue a tariff of 6 percent, while an import duty of GBP 176 (USD 228) per tonne will be applicable for all other paddy. In the case of husked, semi-wholly milled rice and broken rice, duties of GBP 25, 121 and 54 (USD 32, 157 and 70) per tonne will apply, respectively. The announcement followed guidance issued on 30 January 2020 indicating that, from 1 January 2021, the UK Generalised Scheme of Preferences would extend the same preferential market access as the GSP of the European Union to eligible developing countries. |



| COUNTRY                                  | DATE   | POLICY INSTRUMENT | DESCRIPTION                                                                                                                                                                                                                                                                                                          |
|------------------------------------------|--------|-------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Venezuela<br>(Bolivarian<br>Republic of) | May-20 | Import tariff     | Removed semi/wholly milled rice (whether packaged, parboiled or otherwise) from the list of goods eligible for import tariff, customs fee and value added tax exemptions, further to making these classes subject to a 20 percent ad-valorem import tariff for a period of three months, effective from 28 May 2020. |
|                                          | Jun-20 | Import tariff     | Renewed the import tariff, customs fee and value added tax suspension on non-parboiled paddy (except for sowing) until 31 December 2020.                                                                                                                                                                             |
|                                          | Oct-20 | Import tariff     | Issued statements indicating that it would impose import tariffs of up to 20 percent on rice in all its forms (i.e. whether paddy, white, packaged or otherwise), along with its by-products, until 31 January 2021.                                                                                                 |

\* The full collection starting in January 2011 is available at:  
<http://www.fao.org/economic/est/est%20commodities/commodity/%20policy%20archive/en/?groupANDcommodity=rice>.

## OILCROPS: MAJOR POLICY DEVELOPMENTS MID-MAY 2020 TO MID-OCTOBER 2020\*

| COUNTRY          | DATE             | POLICY INSTRUMENT                    | PRODUCT                              | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
|------------------|------------------|--------------------------------------|--------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Argentina        | May-20           | Market regulation                    | Grains, oilseeds                     | Restricted access to public soft loans for agricultural enterprises holding on to more than 5 percent of their harvest, in a bid to stimulate farmers to accelerate new crop sales.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
|                  | Oct-20           | Export taxation                      | Soybeans, soyoil, soymeal            | Reduced – as of 5 October 2020 – the export taxes for soybeans and derived products through the last quarter of 2020, in a bid to accelerate the pace of exports and increase foreign exchange earnings. While the export tax on soybeans was cut by 3 points to 30 percent, the duty on soyoil and meal was lowered by 5 points to 28 percent – which reintroduces a tax differential between primary and derived products. At the same time, the duty for soyoil-based biodiesel was reduced by 4 points to 26 percent. During the forthcoming 3-month period, the tax rates will be raised incrementally, returning to 33 percent, 31 percent and 29 percent for soybeans, soyoil/meal and biodiesel, respectively, by January 2021. At the same time, the Government launched a tax reduction scheme for small-scale soybean growers, with compensation payments based on the size of production and farm location. |
| Brazil           | Jun-20 to Oct-20 | Bioenergy policies                   | Biodiesel                            | Between June and October 2020, concerned about possible shortfalls in biodiesel supplies stemming from reduced domestic soybean availabilities, the country's regulatory agency for petroleum, biofuel and gas (ANP) intermittently reduced the mandatory admixture rate of biodiesel in transport diesel from its statutory level of 12 percent to 10 percent. On 7 October, the agency approved a reduction in the blending rate from 12 percent to 11 percent from 1 November through December 2020.                                                                                                                                                                                                                                                                                                                                                                                                                 |
|                  | Jul-20           | Pesticide regulation                 | Dicamba                              | Approved the use of dicamba-based herbicides, which are widely employed in the cultivation of genetically engineered soybean and maize.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
|                  | Jul-20           | Production support                   | Agricultural products                | Presented the agricultural support programme for 2020/21, highlighting the package's renewed focus on small- and medium-sized farms, fresh incentives for sustainable forms of production, and a further expansion in the federal crop insurance programme. Compared with 2019/20, the new programme features a higher total volume of farm loans and reduced average interest rates, while government outlays for interest rate subsidies are set to increase by 15 percent.                                                                                                                                                                                                                                                                                                                                                                                                                                           |
|                  | Sep-20           | Bioenergy policies                   | Biodiesel                            | Revealed plans to deregulate the country's biodiesel market from January 2022, moving from the current system of regular procurement auctions to a regime where contracts would be freely negotiated between producers and distributors. The requirement that biodiesel producers source part of their feedstock from small-scale farmers would remain in place.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|                  | Oct-20           | Import policy                        | Soybeans                             | Announced that Brazil's tariffs on soybeans, soyoil and soymeal imported from countries outside the Mercosur trade bloc would be suspended until 15 January 2021. Intended to help reduce domestic food prices, the measure is expected to facilitate imports by Brazil's crushing, animal feed and biodiesel industries, which are faced with exceptionally high commodity prices.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| Canada           | Jun-20           | Production support                   | Rapeseed                             | Allocated public funds to a company conducting research on the production of food-grade protein powders from rapeseed.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
|                  | Jul-20           | Seed/GMO policies                    | GM rapeseed                          | Approved the cultivation of a genetically modified (GM) rapeseed rich in omega-3 fatty acids, determining that the oil and meal derived from the seed were safe for human/animal consumption.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| China (mainland) | May-20           | Agricultural policy                  | Agricultural products                | Announced that in 2020 it would develop and implement a response plan to ensure domestic food security amid the COVID-19 crisis, as well as set out a plan to secure the country's food supplies in the medium-to-long term.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
|                  | May-20           | Market regulation (COVID-19-related) | Grains, oilseeds, livestock products | Urged state-owned and private trading firms and food processors to step up the procurement of basic foodstuffs, in a bid to secure domestic supplies during the coronavirus pandemic.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |

| COUNTRY                                 | DATE             | POLICY INSTRUMENT                           | PRODUCT                                       | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                  |
|-----------------------------------------|------------------|---------------------------------------------|-----------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| China (mainland)                        | Jun-20           | Seed/GMO policies                           | Soybeans                                      | Issued biosafety certificates – limited to animal feed uses – for two new imported soybean varieties and renewed the permit for one previously approved soybean variety.                                                                                                                                                                                                                                                                     |
|                                         | Jun-20           | Import policy (COVID-19-related)            | Agricultural products                         | Required exporters supplying food products to China to officially certify that their produce was not contaminated with coronavirus.                                                                                                                                                                                                                                                                                                          |
|                                         | Jun-20 to Oct-20 | Market regulation                           | Soybeans, soyoil, rapeseed oil, sunflower oil | Held several national auctions from state reserves covering soybeans and, to a lesser extent, soyoil, rapeseed oil and sunflower-seed oil. In the case of soybeans, total volumes sold by mid-October 2020 significantly exceeded total 2019 sales.                                                                                                                                                                                          |
| China (mainland)/Myanmar                | Jul-20           | Bilateral, sector-specific trade initiative | Soybeans                                      | Complementing past efforts to diversify the country's feed ingredient imports, Chinese officials initiated talks with counterparts in Myanmar regarding import procedures and food safety requirements for soybeans.                                                                                                                                                                                                                         |
| China (mainland)/European Union         | Jul-20           | Bilateral, sector-specific trade agreement  | Soybeans                                      | Signed an agreement on the mutual protection of geographical indications for a range of agricultural products, including soybean from Muling county in China's northeastern Heilongjiang province.                                                                                                                                                                                                                                           |
| China (mainland)                        | Jul-20 to Aug-20 | Health policies (COVID-19)                  | Agricultural cargoes, incl. soybeans          | Detained incoming vessels whose crew members were infected with COVID-19, preventing cargoes from being unloaded and requesting ship owners to either replace or quarantine concerned crews.                                                                                                                                                                                                                                                 |
| Côte d'Ivoire                           | May-20           | Production support (COVID-19-related)       | Oil palm                                      | Added the country's oil-palm sector to a list of agricultural industries earmarked for public assistance, to help it recover from the effects of the coronavirus pandemic.                                                                                                                                                                                                                                                                   |
| Eurasian Economic Union                 | Jun-20           | Export policy (COVID-19-related)            | Sunflower seed, sunflower oil, soybeans       | Eased the export restrictions for sunflower-seed oil and soybeans introduced in April 2020 to secure the custom union's supplies and stabilize consumer prices during the COVID-19 emergency, while retaining the export ban for sunflower seed.                                                                                                                                                                                             |
| European Union                          | Jul-20           | Market regulation                           | Olive oil                                     | Considered allowing olive oil producing Member States to regulate production and supply through measures that improve the operation of the market, in a bid to address economic hardships arising from excess supplies and protracted low market prices of olive oil.                                                                                                                                                                        |
|                                         | Aug-20           | Food standards                              | Rapeseed meal                                 | Determined that – upon removal of anti-nutrients present in rapeseed – food-grade rapeseed meal could be safe for human consumption. The meal's commercialization still requires formal approval by the European Commission and Member States.                                                                                                                                                                                               |
|                                         | Aug-20           | Pest control measures                       | Olive trees                                   | Eased certain regulations concerning the control of olive tree disease <i>Xylella fastidiosa</i> . Under the amended rules, the area around infected plants where trees must be uprooted has been reduced, as has the buffer zone applied for preventive measures. Conversely, strict requirements regarding surveillance activities, contingency plans, high-risk product movement within the EU and third country imports remain in place. |
| European Union/United States of America | Aug-20           | Seed/GMO policies                           | Rapeseed                                      | Issued a positive safety assessment for a newly developed GM herbicide-tolerant rapeseed. The variety's release remains contingent on approval by the European Commission and Member States.                                                                                                                                                                                                                                                 |
| European Union/Viet Nam                 | Aug-20           | Trade disputes                              | Biodiesel                                     | The European Commission decided to re-examine and possibly extend (beyond the expiry date of 16 September 2020) the anti-dumping/subsidy duties applied to biodiesel imported from the US. The review must be completed within 15 months, during which time the duties will remain in place.                                                                                                                                                 |
| European Union                          | Sep-20           | Seed/GMO policies                           | Soybeans                                      | Under a Free Trade Agreement between the European Union and Viet Nam, the bloc's oilseed and oilseed product exports to Viet Nam were liberalized on 1 August 2020, while Viet Nam's tariffs on EU olive oil imports will be phased out over a three-year period.<br>Authorized the use of three new herbicide-resistant GM soybean varieties for food and feed use for a period of 10 years.                                                |

| COUNTRY                      | DATE   | POLICY INSTRUMENT                      | PRODUCT                          | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
|------------------------------|--------|----------------------------------------|----------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Fiji                         | May-20 | Production support                     | Coconut                          | Allocated fresh funds to the country's coconut development programmes, earmarking in particular the rehabilitation and rejuvenation of existing plantations.                                                                                                                                                                                                                                                                                                                                                                                                   |
| France                       | Sep-20 | Agricultural policy (COVID-19-related) | Protein crops (incl. soybeans)   | Announced – as part of a larger economic recovery plan to overcome the COVID-19 crisis – the allocation of EUR 100 million to develop France's production of plant-based proteins, thereby reducing the nation's dependence on imported vegetable proteins intended for animal husbandry – in particular soybeans and soymeal.                                                                                                                                                                                                                                 |
|                              | Sep-20 | Pesticide regulation                   | Glyphosate                       | Confirmed that certain uses of glyphosate – a controversial herbicide widely used in the cultivation of arable and perennial crops, including soybeans – would be banned from 2021 onwards.                                                                                                                                                                                                                                                                                                                                                                    |
| Ghana                        | Sep-20 | Sector development measures            | Palm oil                         | Partnered with an international civil society organization to promote high food safety and quality standards among the country's artisanal palm oil producers, with a view to positioning them to expand their market base.                                                                                                                                                                                                                                                                                                                                    |
|                              | May-20 | Import policy                          | Palm oil                         | Suspended a number of palm oil import licences, with a view to protecting the country's vegetable oil refining industry from sharply rising imports of refined palm oil.                                                                                                                                                                                                                                                                                                                                                                                       |
|                              | Jun-20 | Sector development measures            | Oil palm                         | Promoted the development of the oil-palm industry in Telangana state, securing Malaysia's expert assistance regarding the transfer of relevant technologies in oil-palm cultivation and palm oil processing.                                                                                                                                                                                                                                                                                                                                                   |
|                              | Jun-20 | Production support                     | Oilseeds                         | Raised the minimum support prices of Kharif crops – including soybeans, groundnut sunflower seed, sesame seed and niger seed – for marketing year 2020/21.                                                                                                                                                                                                                                                                                                                                                                                                     |
|                              | Jul-20 | Agricultural relief measures           | Coconut                          | Authorized compensation payments for coconut farmers affected by Cyclone Nisarga.                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
|                              | Jul-20 | Food standards/health policies         | Edible oils                      | Requested state governments to ensure strict compliance with existing food standards, wherein the reuse of tin and plastic containers for edible oils and fats is restricted to prevent contamination with hazardous materials.                                                                                                                                                                                                                                                                                                                                |
| India                        | Aug-20 | Seed/GMO policies                      | Maize, wheat, rice, soybeans     | Issued an interim order requiring traders to prove, from 1 January 2021 onwards, that major imported crop products – including soybeans – are of non-GM origin. It subsequently clarified that the directive would not apply to processed food products prepared with the commodities concerned, nor to products imported for use as animal feed.                                                                                                                                                                                                              |
|                              | Sep-20 | Agricultural policy                    | Agricultural products            | Passed a series of market reforms and long-term measures to increase the competitiveness of the country's agriculture sector and enhance the income of farmers. Key innovations include: the freedom of farmers to market their produce at other outlets in addition to government-regulated local wholesale markets; the right of farmers to practise contract farming and engage directly with processors, wholesalers, large-scale retailers and exporters; and the removal of price and stockholding limits for strategic commodities, including oilseeds. |
|                              | Sep-20 | Production support                     | Oilseeds                         | Raised the minimum support prices of Rabi crops – including rapeseed/mustard seed, safflower seed, soybeans, groundnut, sunflower seed, sesame seed and niger seed – for marketing season 2021/22.                                                                                                                                                                                                                                                                                                                                                             |
| Indonesia/<br>European Union | Jul-20 | Trade disputes                         | Palm oil, palm oil-based biofuel | At the request of Indonesia, the World Trade Organization (WTO) established a panel to review certain measures taken by the EU on palm oil (in particular the commodity's classification as a biofuel feedstock with high environmental footprint), citing potential inconsistencies with international trade rules. Eighteen countries, including Malaysia and other producers and exporters of palm oil and palm oil-based fuel, reserved their third-party rights to participate in the proceedings.                                                        |

| COUNTRY   | DATE             | POLICY INSTRUMENT                          | PRODUCT                   | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|-----------|------------------|--------------------------------------------|---------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Indonesia | Jul-20 to Aug-20 | Export policy                              | Palm oil                  | Kept the variable export tax for palm oil suspended until September 2020, in line with the commodity's persistently low market price. In October, triggered by a rebound in prices, export taxation was reintroduced at a rate of USD 3 per tonne. By contrast, the palm oil export levy continued to be collected throughout the period, including an increase in the rate from USD 50 per tonne to USD 55 per tonne in June 2020, introduced to source additional funds for the support of domestic biodiesel production. Reportedly, in October, the Government considered turning the fixed levy into a variable one linked to the price of palm oil, with every USD 25 rise in price triggering a USD 5 increase in the levy. |
|           | Jul-20 to Aug-20 | Bioenergy policies                         | Biodiesel                 | Stated that policies to further raise domestic biodiesel consumption were on track, with mandatory sales of B40 – i.e. diesel blends containing 40 percent of palm oil-based biofuel – scheduled to start in July 2021. Reportedly, as distinct from the currently available B30 blends, which contain 30 percent of fatty-acid-methyl-ester (FAME), B40 biodiesel would combine 30 percent of FAME with 10 percent of 'renewable diesel' derived from palm oil using hydro-treatment – a formula preferred for its higher cetane value that makes it more suitable for vehicle engines.                                                                                                                                           |
| Italy     | Aug-20           | Agricultural relief measures               | <i>Xylella fastidiosa</i> | Allocated funds to assist olive farmers in Apulia and other regions affected by the outbreak of the <i>xylella fastidiosa</i> disease.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
|           | Sep-20           | Agricultural support measures              | Olive oil                 | Offered guaranteed loans to associations of olive oil and table olive producers to support operations through the 2020/21 season and contain the market imbalances caused by the COVID-19 crisis, unfavourable weather conditions and the spread of <i>xylella fastidiosa</i> .                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| Malaysia  | Jun-20           | Market promotion                           | Palm oil                  | Encouraged local palm oil traders to set up joint ventures in Myanmar in a bid to raise Malaysia's share in that country's vegetable oil market – concentrating on partnerships in the consumer and hotel-restaurant-café sectors and on investments in storage and processing facilities.                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|           | Jun-20           | Export taxation (COVID-19-related)         | Palm oil                  | Suspended the country's export tax on palm oil, following protracted weakness in the commodity's market price. The suspension, which would last until December 2020, was aimed at aiding the sector's recovery from the COVID-19 crisis by facilitating palm oil exports.                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
|           | Jul-20           | Market promotion                           | Palm oil                  | Announced new initiatives to counter growing criticism, in a number of importing countries, of allegedly unsustainable production practices used in the oil palm sector. With a view to safeguarding the industry's interests, the Government will focus on the following measures: promoting the nutritional benefits of palm oil internationally; sponsoring scientific studies on the product's properties; supporting R&D activities to create new value-added products; strengthening selected export markets; and pursuing regional trade consultations and bilateral free trade agreements.                                                                                                                                 |
|           | Jul-20           | Trade disputes                             | Biodiesel                 | Formally requested WTO dispute consultations with the EU regarding certain measures adopted by the bloc in the renewable energy sector – notably the classification of palm oil as a biofuel feedstock with high environmental footprint.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| Malaysia  | Aug-20           | Product standards (sustainable production) | Palm oil                  | Reported that the majority of the country's oil-palm plantations and palm oil mills had achieved mandatory Malaysian Sustainable Palm Oil (MSPO) certification. Moreover, nearly all the country's organized smallholders had been certified, while the training of independent smallholders in implementing best agricultural practices for eventual admission to MSPO group-certification schemes continued.                                                                                                                                                                                                                                                                                                                     |
|           | Sep-20           | Bioenergy policies                         | Biodiesel                 | Announced that the nationwide rollout of the country's B20 biodiesel scheme – which requires the blending of regular transport diesel with 20 percent of palm oil-based diesel – would be resumed in September 2020 (after the programme's temporary suspension caused by the outbreak of COVID-19). While B20 biodiesel is already available in Sarawak state, sales in Sabah state and Peninsular Malaysia are set to begin on 1 January and 15 June 2021, respectively.                                                                                                                                                                                                                                                         |

| COUNTRY                                              | DATE   | POLICY INSTRUMENT                                  | PRODUCT                          | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                 |
|------------------------------------------------------|--------|----------------------------------------------------|----------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Mexico                                               | Aug-20 | Pesticide regulation                               | Glyphosate                       | Announced that the use of glyphosate – a herbicide widely used in soybean cultivation – would be gradually phased out by late 2024 due to safety concerns.                                                                                                                                                                                                  |
| Mozambique                                           | Jun-20 | Sector development measures                        | Soybeans, sunflower seed, sesame | Expanded the remit of the country's Cotton Institute to include oilseeds, reflecting renewed efforts to promote the nation's production, marketing, processing and exportation of oilseeds – notably soybeans, sunflower seed and sesame.                                                                                                                   |
| Pakistan                                             | Jul-20 | Market regulation                                  | Cooking oil, ghee                | Considered taking action against domestic cooking oil and ghee producers who – contrary to previous agreements – failed to lower the retail price of these essential commodities.                                                                                                                                                                           |
| Philippines                                          | Jul-20 | Agricultural support measures                      | Coconut palm                     | Launched a pilot project replacing traditional coconut trees with high-yielding hybrids said to bear fruit in less than four years and to produce up to three times more than local varieties.                                                                                                                                                              |
| Spain                                                | May-20 | Market regulation                                  | Olive oil                        | Called for an extension of the European Union's 2019/20 olive oil storage aid programme, with a view to further sustaining prices and facilitating the sector's recovery prior to the start of the new marketing season.                                                                                                                                    |
| Tanzania                                             | Sep-20 | Sector development measures                        | Oil palm                         | Allocated public funds to the country's Agricultural Research Institute to accelerate production of improved oil-palm seedlings and foster awareness of best cultivation practices among oil-palm growers.                                                                                                                                                  |
| Thailand                                             | May-20 | Market regulation                                  | Palm oil                         | Engaged with the country's palm oil trade to explore the possibilities of applying blockchain technologies along the palm oil supply chain, with a view to: stabilizing farmgate prices of fresh fruit branches; simplifying palm oil trade by curbing the role of middlemen; and preventing smuggling.                                                     |
| Thailand                                             | Aug-20 | Bioenergy policies                                 | Biodiesel                        | Confirmed that B10 (i.e. transport diesel including 10 percent of palm oil-based biodiesel) would become the country's primary diesel, effective 1 October 2020, while voluntary sales of B7 and B20 blends would also be allowed. To encourage the use of higher blends, the pump prices of B10 and B20 would continue to be subsidized by the Government. |
| Thailand                                             | Sep-20 | Market regulation                                  | Biodiesel                        | Authorized the provision of temporary support payments to exporters of palm oil and ordered state-owned energy companies to purchase palm oil for energy generation, in a bid to expedite the absorption of surplus supplies and raise domestic prices of palm oil.                                                                                         |
| Ukraine                                              | May-20 | Export policy                                      | Soybeans, rapeseed               | Reinstated VAT export refunds for soybeans and rapeseed for all types of exporter, including trading companies, crushers and farmers.                                                                                                                                                                                                                       |
| United Kingdom of Great Britain and Northern Ireland | Aug-20 | Environmental policies (production sustainability) | Soybeans, palm oil               | Invited comments from local and international stakeholders about a proposed policy that would prohibit large businesses from using commodities grown on illegally deforested land. Concerned commodities would include soybeans and palm oil.                                                                                                               |
| United States of America                             | Jun-20 | Bioenergy policies                                 | Biodiesel                        | Approved a six-year extension of the state of Iowa's Fuel Tax Differential, which lowers the tax burden for diesel blends containing at least 11 percent of soyoil-based biodiesel.                                                                                                                                                                         |
| United States of America                             | Jun-20 | Pesticide regulation                               | Dicamba                          | Saw a federal Court of Appeals interdict sales of dicamba, a herbicide widely used in the cultivation of GM soybeans and cotton, stating that environmental and other risks arising from the chemical's use had been underestimated.                                                                                                                        |
| United States of America                             | Aug-20 | Agricultural relief measures                       | Maize, soybeans                  | Allocated public funds to farmers impacted by a derecho windstorm that damaged farmland across the country's Midwest, including a substantial part of the maize and soybean crops, infrastructure and storage facilities in Iowa state.                                                                                                                     |

| COUNTRY                     | DATE   | POLICY INSTRUMENT                               | PRODUCT                               | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
|-----------------------------|--------|-------------------------------------------------|---------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| United States of America    | Sep-20 | Agricultural relief measures (COVID-19-related) | Agriculture and aquaculture products  | Announced additional financial assistance of up to USD 14 billion for farmers who continue to face market disruptions and associated costs due to the COVID-19 pandemic. The package follows a first relief programme launched in May 2020. Eligible row crops include the following oilseeds: soybean, sunflower seed, rapeseed/mustard seed, groundnut, safflower and sesame. Payments would be calculated based on crop yields and the impact of COVID-19 on relevant commodity prices, with per farm disbursements subject to specific upper limits. In the case of soybeans, farmers are set to receive USD 0.31 per bushel (USD 11.40 per tonne), with government outlays amounting to almost USD 1.4 billion (based on prevailing official harvest projections). |
|                             | Sep-20 | Import measures                                 | Palm oil                              | Issued a ban on imports of palm oil products from a particular supplier over allegations of multiple instances of forced labour in the company's supply chain.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| Viet Nam                    | May-20 | Pesticide regulation                            | Glyphosate                            | Extended the authorization of herbicide products containing glyphosate until end-June 2021, hence postponing a ban that was scheduled to take effect on 10 June 2020.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| Viet Nam/<br>European Union | Aug-20 | Comprehensive trade agreement                   | Oilseeds, oilseed products, olive oil | Under a Free Trade Agreement between Viet Nam and the European Union, Viet Nam's imports of EU oilseeds and oilseed products have been liberalized from 1 August 2020, while the country's tariffs on EU olive oil imports would be phased out over a three-year period.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |

\* A detailed description of major policy developments from January 2011 onwards is available at: <http://www.fao.org/economic/est-commodities/commodity-policy-archive/en/?group=Oilseeds,%20oil%20and%20meals>

## MEAT: MAJOR POLICY DEVELOPMENTS MID-MAY 2020 TO MID-OCTOBER 2020\*

| COUNTRY   | DATE   | PRODUCT      | POLICY INSTRUMENT  | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
|-----------|--------|--------------|--------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Australia | Jun-20 | All          | Government support | Extended the Drought Community Support Initiative programme until the end of 2020 (Round 2 of AUD 148.5 million, around USD 102.5 million) to support drought-affected farm households.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|           | Jul-20 | All          | Government support | Extended the Farm Household Allowance Relief Payment for 3 months. The extension was expected to provide up to AUD 2.1 million (around USD 1.5 million) to eligible farmers and their families experiencing financial hardship, regardless of the cause and without limiting payment to those impacted by COVID-19.                                                                                                                                                                                                                                                                                                                                                                            |
|           | Jul-20 | All          | Trade agreement    | Started benefiting from reduced tariffs to export frozen bovine and sheep meat to Indonesia as agreed in the Indonesia-Australia Comprehensive Economic Partnership Agreement, which entered into force on 5 July 2020. The agreement allows tariffs to be reduced from 5 to 2.5 percent for frozen bovine and sheep meats and for 575 000 cattle to be exported duty free in year one.                                                                                                                                                                                                                                                                                                        |
|           | Sep-20 | Pig meat     | Trade agreement    | Agreed with Singapore on a pre-emptive zoning arrangement that will allow pig meat trade to continue from non-affected Australian states or territories if African swine Fever is detected in domestic pigs.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
|           | Jun-20 | All          | Market access      | Announced that South Africa has granted approval for more meat plants for supplying meat, bringing the list of establishments to over 700 with approvals in 24 countries, including in the Philippines, Thailand and Viet Nam during the previous months.                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| Brazil    | Jul-20 | Pig meat     | Market access      | Announced that Myanmar has approved pig meat imports, reflecting a reduction in that country's domestic pig meat production as a result of the spread of the ASF virus.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|           | Aug-20 | Bovine meat  | Market access      | Announced that Mexico has authorized seven establishments to export fresh bovine meat for processing, but not for direct consumption, as the two countries have not yet agreed to a model veterinary certificate for that purpose.                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| Canada    | Jun-20 | All          | Government support | Launched the 2020 Canada-Alberta Fed Cattle Feed Cost Offset initiative. This programme helps to cover the increased costs of feeding market-ready cattle and hogs due to COVID-19-related processing delays, while redirecting surplus pig meat products to help those in need.                                                                                                                                                                                                                                                                                                                                                                                                               |
|           | Sep-20 | All          | Government support | Announced temporary flexibility in enforcing some Canadian labelling and packaging regulations for prepackaged meat products, in response to industry challenges caused by the COVID-19 pandemic, until 31 December 2020 for both food service packaged products and prepackaged meat products. Label requirements associated with food safety are mandatory and businesses must continue to ensure that traceability documentation is maintained.                                                                                                                                                                                                                                             |
|           | Oct-20 | All          | Government support | Announced the Emergency On-Farm Support Fund, which provides a CAD 35 million investment (USD 26.5 million) to improve health and safety on farms and in employee living quarters to prevent and respond to the spread of COVID-19. The fund will provide support to farmers for direct infrastructural improvements to living quarters and work stations, temporary or emergency housing (on- or off-farm), as well as personal protective equipment, sanitary stations, and other measures to safeguard the health and safety of Canadian and temporary foreign workers against COVID-19. Eligible activities can be retroactive to 15 March 2020 and must be completed by 26 February 2021. |
|           | May-20 | Poultry meat | Export ban         | Suspended poultry meat exports to the European Union after European inspectors found some shortcomings in Chile's animal production control systems in March this year. The suspension is expected to be repealed after remedial measures are implemented.                                                                                                                                                                                                                                                                                                                                                                                                                                     |
|           | May-20 | Bovine meat  | Import ban         | Suspended imports of bovine meat from Ireland, on a temporary basis, following the confirmation of a case of 'atypical' bovine spongiform encephalopathy (BSE) in a 14-year-old cow. Under the existing protocols, detection of an atypical case does not affect the country's risk status or the progress towards negligible risk status.                                                                                                                                                                                                                                                                                                                                                     |



| COUNTRY          | DATE   | PRODUCT      | POLICY INSTRUMENT  | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
|------------------|--------|--------------|--------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| China (Mainland) | Jul-20 | All          | Market access      | Approved imports of bovine, pig and poultry meats from 15 US meat processing and cold storage facilities. The measure provided some relief to US exporters, given the suspensions of import shipments by China due to concerns over COVID-19.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|                  | Aug-20 | Bovine meat  | Import ban         | Suspended bovine meat imports from Australia, effective 27 August, after finding traces of the banned antibiotic chloramphenicol in a shipment, and requested the supplier to temporarily halt shipments.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
|                  | Sep-20 | Poultry meat | Import policy      | Suspended poultry imports from four Russian regions, namely Kurgan, Omsk, Tyumen and Vladimir, following outbreaks of highly pathogenic avian influenza (HPAI). However, China lifted the earlier ban from the Kursk region. Meanwhile, eight Russian plants were cleared to start exporting frozen poultry meat from 11 September.                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
|                  | Oct-20 | All          | Import ban         | Requested foreign meat suppliers to suspend cold-chain food product exports, including meat, when COVID-19 cases are detected among plant workers. Under the rules, the first two positive findings of COVID-19 cases among plant workers lead to one week-long suspensions, but the next two would trigger suspensions lasting one month. During the past few months, almost 50 establishments have had to temporarily halt shipments to China under this rule, although exports from 18 of these have since resumed. Plants involved are from the following countries: Argentina, Australia, Brazil, Canada, Denmark, France, Germany, Ireland, Italy, the Netherlands, Panama, Spain, the United Kingdom of Great Britain and Northern Ireland, the United States of America and Uruguay. |
| Colombia         | Jun-20 | All          | Government support | Promoted a programme 'Support for the transportation of perishable agricultural and livestock products for marketing in zones different from the production municipality' to support the livestock sector.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| Egypt            | Jul-20 | Poultry meat | Market access      | Authorized imports of thermo-processed poultry meat from Brazil.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| European Union** |        |              |                    | Announced the Farm to Fork Strategy and the Biodiversity Strategy for 2030 as roadmaps for enhancing food and agricultural sustainability by 2030 under the Green Deal. The strategies aim to allow Member States to tailor their new Common Agricultural Policy (CAP) programmes through a system of conditions to be met by farmers receiving area- and animal-based CAP payments. They target a 50 percent reduction in pesticide use, a 20 percent reduction in fertilizer use, a 50 percent reduction in nutrient leakage to groundwater, 25 percent of agricultural land being used for organic farming, 10 percent of land being set aside for environmental areas, and an increase in nature conservation areas by 30 percent.                                                       |
|                  | Jun-20 | All          | Government support | Adopted a regulation, as an exceptional measure, which allows Member States to pay up to EUR 7 000 (USD 7 881) to farmers and up to EUR 50 000 (USD 56 295) to small and medium enterprises active in processing, marketing or development of agricultural products or cotton, except fishery products.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
|                  | Jul-20 | All          | Government support | Approved a EUR 1.8 billion (USD 2.07 billion) support package, combining a new multiannual financial framework 2021–2027 proposal valued at EUR 1.07 trillion (USD 1.23 trillion) with a specific recovery effort titled the Next Generation EU proposal valued at EUR 750 billion (USD 861 billion). The package aims to rebuild the EU after the COVID-19 pandemic and support investment in green and digital transitions. The proposal includes allocations for the new CAP and Fisheries policy (Pillar I) and for rural development (Pillar II), covering the period from 2021–2027.                                                                                                                                                                                                   |
| Germany          | Sep-20 | Pig meat     | Export ban         | Was banned from exporting pig meat by ten countries, namely Argentina, Brazil, China (Mainland), Japan, the Republic of Korea, Mexico, the Philippines, Singapore, South Africa and Ukraine, following the detection of ASF among wild boars in the country.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| India            | Jul-20 | All          | Import policy      | Unveiled a new regulation where Animal Quarantine and Certification Services officials are required to occasionally inspect the sealed samples of goods arriving at customs for physical identification purposes. This aims to facilitate and promote an early clearance of imported livestock products, especially those under the 'no testing category', as the policy will eliminate the need to collect samples.                                                                                                                                                                                                                                                                                                                                                                         |
| Japan            | Aug-20 | Poultry meat | Import ban         | Suspended imports of live poultry and poultry meat from Australia following a case of HPAI outbreak on a farm in the Australian state of Victoria.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |

| COUNTRY              | DATE   | PRODUCT      | POLICY INSTRUMENT | DESCRIPTION                                                                                                                                                                                                                                                                                   |
|----------------------|--------|--------------|-------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Japan                | Aug-20 | Bovine meat  | Market access     | Allowed imports of cattle of any age from France. Earlier, imports had been limited to meat of animals under 30 months, a requirement introduced two decades ago due to concerns over BSE. Similar authorizations were earlier approved for Canada, Ireland and the United States of America. |
| Malaysia             | Jul-20 | Bovine meat  | Market access     | Allowed imports of bovine meat from Argentina after one decade under a new agreement on a model veterinary certificate.                                                                                                                                                                       |
| Mexico               | May-20 | Pig meat     | Market access     | Obtained approval to export pig meat from five processing plants and five cold stores to Ireland.                                                                                                                                                                                             |
|                      | May-20 | Bovine meat  | Market access     | Approved imports of Spanish bovine meat after finalizing a model veterinary certificate.                                                                                                                                                                                                      |
| Philippines          | Aug-20 | Poultry meat | Import ban        | Announced a ban on Australian poultry meat imports due to concerns over HPAI.                                                                                                                                                                                                                 |
|                      | Sep-20 | Poultry meat | Import ban lifted | Lifted a ban on poultry meat imports from Brazil due to concerns over COVID-19 among plant workers. Only meat plants with no cases of the virus among workers will be allowed to supply. The ban was previously imposed in August due to traces of COVID-19 found in some shipments.          |
| Poland               | Aug-20 | Poultry meat | Export ban lifted | Regained access to a number of countries, which had previously banned Polish poultry meat imports, including Armenia, Belarus, Hong Kong SAR, Japan and Singapore, due to concerns over the spread of avian flu.                                                                              |
| Serbia               | Oct-20 | Pig meat     | Import ban lifted | Allowed imports of pig meat from parts of Poland that remain free of ASF.                                                                                                                                                                                                                     |
| Singapore            | Jul-20 | Pig meat     | Market access     | Approved pig meat imports from Ukraine.                                                                                                                                                                                                                                                       |
|                      | Oct-20 | Bovine meat  | Import ban lifted | Reopened its market to bovine meat from Germany. Imports of German bovine meat were suspended by Singapore in 2000 following the detection of BSE.                                                                                                                                            |
| South Africa         | Sep-20 | Poultry meat | Import ban lifted | Lifted a five-month ban on US poultry meat stemming from an outbreak of HPAI in the state of South Carolina.                                                                                                                                                                                  |
| United Arab Emirates | Jun-20 | Bovine meat  | Import ban lifted | Lifted a ban on US live cattle that was imposed in 2003 after the detection of BSE in a cow from Washington State.                                                                                                                                                                            |

| COUNTRY  | DATE   | PRODUCT  | POLICY INSTRUMENT  | DESCRIPTION                                                                                                                                                                                                                                               |
|----------|--------|----------|--------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Viet Nam | Jun-20 | All      | Market access      | Authorized imports from five Brazilian meat plants with a view to covering shortfalls in domestic production due to the spread of ASF among its pig population.                                                                                           |
|          | Jun-20 | Pig meat | Import tariff      | Reduced Most Favoured Nation tariffs from 25 to 22 percent for a list of products, including fresh or chilled pig meat, and made a temporary reduction for frozen pig meat from 15 to 10 percent. Tariff reductions will be valid until 31 December 2020. |
|          | Jul-20 | Pig meat | Government support | Launched the National Plan on ASF Prevention and Control 2020-2025, which set a target to have no ASF outbreaks in more than 90 percent of communes and wards by 2022 and no ASF outbreaks nationwide by 2025.                                            |

\* A collection of major meat policy developments starting in January 2011 is available at:

<http://www.fao.org/economic/est/est-commodities/commodity-policy-archive/en/?groupANDcommodity=Meat>

\*\* From 31 January 2020: EU-27

## DAIRY: MAJOR POLICY DEVELOPMENTS MID-MAY 2020 TO MID-OCTOBER 2020\*

| COUNTRY   | DATE   | PRODUCT        | POLICY INSTRUMENT         | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
|-----------|--------|----------------|---------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Argentina | Oct-20 | Dairy products | State market intervention | Allowed the prices of most dairy products to rise by 2 percent under the new provisions gazetted under Disposition 14/2020. This aims to sustain farm profitability margins in view of faster increases in costs of labour and other inputs compared with slowly rising farmgate milk prices. Some major dairy processors are seeking to maintain profitability by introducing new product lines unaffected by the price freezes and limited at-home delivery of milk.                                                                                                                                                                                                                                                                                                                                 |
|           | Oct-20 | Dairy products | Market access             | Regained market access to the Republic of Korea with the acceptance of a new health certificate. With implementation of the Special Law for the Control of the safety of Imported Food in 2016, the Republic of Korea had ceased importing dairy products from Argentina. Based on the new agreement, Argentina will be able to restart exporting dairy products for human consumption, including butter, fluid milk (cow's milk), whey, cheese and cream.                                                                                                                                                                                                                                                                                                                                             |
| Australia | Jun-20 | Dairy products | Government support        | Extended the Drought Community Support Initiative programme until the end of 2020 (Round 2 of AUD 148.5 million, around USD 102.5 million) to support drought-affected farming households.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
|           | Jul-20 | Dairy products | Government support        | Extended the Farm Household Allowance Relief Payment for 3 months. The extension would provide up to AUD 2.1 million (around USD 1.5 million) to eligible farmers and their families experiencing financial hardship, regardless of the cause and without limiting payment to those impacted by COVID-19.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
|           | Jul-20 | Dairy products | Trade agreement           | Started benefiting from a zero percent import tariff for its dairy products in Indonesia, with exceptions for certain dairy products, whose tariffs will also be eliminated completely by 2033, as agreed under the Indonesia-Australia Comprehensive Economic Partnership Agreement, which entered into force on 5 July 2020. The agreement eliminates tariffs on dairy products, building on the ASEAN-Australia-New Zealand Free Trade Agreement.                                                                                                                                                                                                                                                                                                                                                   |
|           | Aug-20 | Dairy products | Trade agreement           | Signed an agricultural cooperation agreement with China within the Belt & Road Initiative, which foresees the development of mutually beneficial cooperation, consisting of market access to China for dairy products.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| Canada    | Jul-20 | Dairy products | Trade agreement           | Provided new tariff rate quotas exclusively for the United States under the United States-Mexico-Canada trade agreement (USMCA), which entered into force on 1 July 2020. The USMCA will create new market access opportunities for US exports to Canada for dairy, poultry and eggs, and in exchange, market access for Canadian exports of dairy and other products to the United States. In addition, Canada will eliminate milk price classes 6 and 7, and ensure that the price for skim milk solids used to produce non-fat dry milk, milk protein concentrates and infant formula is set no lower than a level based on the US price for non-fat dry milk. Canada has also committed to adopting measures designed to limit the impact of any surplus skim milk production on external markets. |
|           |        |                |                           | Announced the Emergency On-Farm Support Fund, which provides a CAD 35 million investment (USD 26.5 million) to improve health and safety on farms and in employee living quarters, so as to prevent and respond to the spread of COVID-19. The fund will provide support to farmers for direct infrastructure improvements to living quarters and work stations, temporary or emergency housing (on- or off-farm), as well as personal protective equipment, sanitary stations, and other measures to safeguard the health and safety of Canadian and temporary foreign workers against COVID-19. Eligible activities can be retroactive to 15 March 2020 and must be completed by 26 February 2021.                                                                                                   |
|           | Oct-20 | Dairy products | Government support        |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |

| COUNTRY           | DATE   | PRODUCT        | POLICY INSTRUMENT  | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
|-------------------|--------|----------------|--------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| China (Mainland)  | May-20 | Dairy products | Market access      | Opened access to 54 Turkish dairy companies to supply dairy products, under a mutually agreed veterinary certificate that was published by the General Customs Administration of China.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|                   | May-20 | Dairy products | Import policy      | Published a temporary standard for natural lactose, vitamins and mineral in milk that results from ultrafiltration, called permeate powder for human consumption, creating guidelines to import the commodity for the first time.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
|                   | Sep-20 | Dairy products | Import tariff      | Announced the extension of Section 301 tariff exclusions for US products on the First Exclusion List for another year. The products subject to this tariff exclusion include whey for feed use and alfalfa. The extension is valid until 17 September 2021.                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| Colombia          | Jun-20 | Dairy products | Government support | Promoted a programme 'Support for the transportation of perishable agricultural and livestock products for marketing in zones different from the production municipality' to support the livestock sector.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| European Union ** | May-20 | Dairy products | Government support | Announced the Farm to Fork Strategy and the Biodiversity Strategy for 2030 as roadmaps for enhancing food and agricultural sustainability by 2030 under the Green Deal. The strategies aim to allow Member States to tailor their new Common Agricultural Policy (CAP) programmes through a system of conditions to be met by farmers receiving area- and animal-based CAP payments. They target a 50 percent reduction in pesticide use, a 20 percent reduction in fertilizer use, a 50 percent reduction in nutrient leakage to groundwater, 25 percent of agricultural land being used for organic farming, 10 percent of land being set aside for environmental areas, and an increase in nature conservation areas by 30 percent. |
|                   | Jun-20 | Dairy products | Government support | Adopted a regulation, as an exceptional measure, which allows Member States to pay up to EUR 7 000 (USD 7 881) to farmers and up to EUR 50 000 (USD 56 295) to small and medium enterprises active in processing, marketing or development of agricultural products or cotton, except fishery products.                                                                                                                                                                                                                                                                                                                                                                                                                                |
|                   | Jul-20 | Dairy products | Government support | Approved a EUR 1.8 billion (USD 2.1 billion) support package, combining a new multiannual financial framework 2021–2027 proposal valued at EUR 1.07 trillion (USD 1.23 trillion) with a specific recovery effort titled the Next Generation EU proposal valued at EUR 750 billion (USD 861 billion). The package aims to rebuild the EU after the COVID-19 pandemic and support investment in green and digital transitions. The proposal includes allocations for the new CAP and Fisheries policy (Pillar I) and for rural development (Pillar II), covering the period from 2021–2027.                                                                                                                                              |
|                   | Sep-20 | Cheese         | Trade agreement    | Signed an agreement with China to protect 100 European Geographical Indications (GIs) in China, along with the same number of Chinese GIs on the EU's single market. European GIs to be recognized in China include cheeses such as Feta, Danish Blue and Italian Taleggio.                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
|                   | May-20 | Dairy products | Government support | Set up an INR 1 trillion (USD 13.3 billion) fund for agricultural infrastructure, which will focus on agriculture, dairy, animal husbandry and other related activities, including projects to improve the efficiency of aggregation points for farm products such as agricultural cooperatives, farmer producer organizations and agricultural entrepreneurs and start-ups. Projects to improve cold-chain and post-harvest management are likely to benefit the dairy sector.                                                                                                                                                                                                                                                        |

| COUNTRY  | DATE   | PRODUCT        | POLICY INSTRUMENT  | DESCRIPTION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
|----------|--------|----------------|--------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Japan    | May-20 | Milk powder    | Import quota       | Revised down its allocated yearly skim milk powder (SMP) import quota from 4 000 tonnes to 750 tonnes as a result of increasing domestic production of SMP in view of low demand for fresh milk during the COVID-19 pandemic.                                                                                                                                                                                                                                                                                                           |
|          | Sep-20 | Butter         | Import policy      | Announced reductions in planned imports of butter to 14 000 metric tonnes for Japanese fiscal year 2020, reflecting a 30 percent decrease from the previously announced volume of 20 000 metric tonnes, over concerns on growing butter stocks.                                                                                                                                                                                                                                                                                         |
|          | Oct-20 | Cheese         | Trade agreement    | Signed a trade deal with the United Kingdom of Great Britain and Northern Ireland (UK), preserving most of the benefits of the existing EU-Japan free trade agreement. Among selected features of the agreement that have been announced so far, UK exporters have given access to any of the EU-Japan tariff rate quotas which EU exporters do not use in any given year. In addition, the trade agreement recognized over 70 UK food and drink products as Geographical Indications in Japan, including Yorkshire Wensleydale cheese. |
| Malaysia | Jun-20 | Dairy products | Government support | Launched the National Dairy Industry Development Programme with the aim of increasing the country's milk self-sufficiency level to 100 percent in five years.                                                                                                                                                                                                                                                                                                                                                                           |
| Ukraine  | Oct-20 | Dairy products | Trade agreement    | Signed an agreement with the UK, which will allow businesses to continue trading as they do now after the end of the Transition Period and deliver the same level of liberalization in trade that businesses currently enjoy under the existing EU-Ukraine Association Agreement. In principle, the agreement will be applicable to trade in dairy products.                                                                                                                                                                            |
| Viet Nam | Jul-20 | Dairy products | Import tariff      | Announced a decree revising Most Favoured Nation tariffs on imports of a number of agricultural products, including dairy products and ingredients such as skim milk powder, whole milk powder, cheese, milk albumin and protein isolate.                                                                                                                                                                                                                                                                                               |

\* A collection of major dairy policy developments, starting in January 2012, is available at: <http://www.fao.org/economic/est-commodities/commodity-policy-archive/en/?group=ANDcommodity=Milk%20and%20dairy%20products>

\*\*From 31 January 2020: EU-27



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### GENERAL

- FAO estimates and forecasts are based on official and unofficial sources.
- Unless otherwise stated, all charts and tables refer to FAO data as source.
- Estimates of world imports and exports may not always match, mainly because shipments and deliveries do not necessarily occur in the same marketing year.
- Tonnes refer to metric tonnes.
- All totals are computed from unrounded data.
- Regional totals may include estimates for countries not listed. The countries shown in the tables were chosen based on their importance of either production or trade in each region.
- Estimates for China also include those for the Taiwan Province of China, Hong Kong SAR and Macao SAR, unless otherwise stated.
- Up to 2019/20 the European Union includes 28 member states. From 2020/21 the European Union includes 27 member states.
- ‘-’ means nil or negligible.
- Cereals include wheat, rice and coarse grains. Coarse grains include maize, barley, sorghum, millet, rye, oats and NES (not elsewhere specified).

#### Production

- **Cereals:** Data refer to the calendar year in which the whole harvest or bulk of harvest takes place.

#### Utilization

- **Cereals:** Data are on individual

country's marketing year basis.

#### Trade

- Trade between **European Union** member states is excluded, unless otherwise stated.
- **Wheat:** Trade data include wheat flour in wheat grain equivalent. The time reference period is July/June, unless otherwise stated.
- **Coarse grains:** The time reference period is July/June, unless otherwise stated.
- **Rice, dairy and meat products:** The time reference period is January/December.
- **Oilseeds, oils/fats and meals:** The time reference period is October/September, unless otherwise stated.

#### Stocks

- **Cereals:** Data refer to carry-overs at the close of national crop seasons ending in the year shown.

#### Price indices

- The FAO price indices are calculated using the Laspeyres formula; the weights used are based on the average export value of each commodity for the 2014–2016 period.

### COUNTRY CLASSIFICATION

In the presentation of statistical material, references are made to special country groupings: Low-Income Food-Deficit Countries (LIFDCs), Least Developed Countries (LDCs). The LIFDCs include 51 countries that are net importers of basic foodstuffs

with per caput income below the level used by the World Bank to determine eligibility for International Development Aid (IDA) assistance (i.e. USD 1 945 in 2011). The LDCs group currently includes 47 countries with low income as well as weak human resources and low level of economic diversification. The list is reviewed every three years by the Economic and Social Council of the United Nations.

### DISCLAIMER

The designations employed and the presentation of material in this publication do not imply the expression of any opinion whatsoever on the part of the Food and Agriculture Organization of the United Nations concerning the legal status of any country, territory, city or area or of its authorities or concerning the delimitation of its frontiers or boundaries.

## APPENDIX TABLE 1(A): CEREAL STATISTICS

|                                            | Production            |                       |                       | Imports                |                          |                          | Exports                |                          |                          |
|--------------------------------------------|-----------------------|-----------------------|-----------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                            | 2016-2018<br>average  | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                            | <i>million tonnes</i> |                       |                       |                        |                          |                          |                        |                          |                          |
| <b>ASIA</b>                                | <b>1 182.7</b>        | <b>1 196.4</b>        | <b>1 215.3</b>        | <b>209.0</b>           | <b>221.0</b>             | <b>224.3</b>             | <b>62.5</b>            | <b>55.8</b>              | <b>61.2</b>              |
| Bangladesh                                 | 39.5                  | 41.5                  | 41.9                  | 8.5                    | 8.2                      | 8.3                      | -                      | 0.1                      | 0.1                      |
| China                                      | 548.7                 | 548.3                 | 549.9                 | 30.0                   | 29.1                     | 35.4                     | 2.5                    | 3.4                      | 3.5                      |
| India                                      | 254.7                 | 266.0                 | 275.9                 | 2.7                    | 0.7                      | 0.6                      | 12.8                   | 13.2                     | 15.0                     |
| Indonesia                                  | 58.3                  | 57.5                  | 57.8                  | 12.6                   | 12.2                     | 12.2                     | 0.2                    | 0.1                      | 0.1                      |
| Iran (Islamic Republic of)                 | 20.8                  | 20.6                  | 20.4                  | 12.6                   | 15.2                     | 16.7                     | 0.3                    | 0.1                      | 0.1                      |
| Iraq                                       | 3.5                   | 6.6                   | 7.2                   | 4.6                    | 4.0                      | 3.3                      | -                      | -                        | -                        |
| Japan                                      | 8.6                   | 8.6                   | 8.7                   | 24.0                   | 24.3                     | 24.2                     | 0.3                    | 0.3                      | 0.3                      |
| Kazakhstan                                 | 19.7                  | 16.9                  | 18.8                  | 0.4                    | 1.0                      | 0.1                      | 9.6                    | 7.8                      | 8.6                      |
| Myanmar                                    | 18.4                  | 18.2                  | 18.2                  | 0.5                    | 0.6                      | 0.6                      | 4.1                    | 4.6                      | 3.8                      |
| Pakistan                                   | 39.6                  | 39.8                  | 40.5                  | 0.2                    | 0.2                      | 1.7                      | 4.9                    | 4.2                      | 4.7                      |
| Philippines                                | 20.0                  | 20.4                  | 20.6                  | 8.9                    | 9.5                      | 9.8                      | 0.1                    | -                        | -                        |
| Republic of Korea                          | 4.2                   | 4.0                   | 3.9                   | 14.5                   | 16.1                     | 16.3                     | 0.1                    | 0.1                      | 0.1                      |
| Saudi Arabia                               | 0.5                   | 0.5                   | 0.8                   | 15.8                   | 15.6                     | 16.2                     | -                      | -                        | -                        |
| Thailand                                   | 26.4                  | 23.1                  | 24.6                  | 4.0                    | 6.2                      | 5.5                      | 10.5                   | 6.1                      | 7.3                      |
| Turkey                                     | 34.9                  | 33.9                  | 36.2                  | 9.5                    | 17.0                     | 11.5                     | 5.7                    | 4.9                      | 6.1                      |
| Viet Nam                                   | 33.2                  | 33.0                  | 32.8                  | 14.5                   | 15.2                     | 15.5                     | 7.1                    | 7.1                      | 7.4                      |
| <b>AFRICA</b>                              | <b>187.9</b>          | <b>190.8</b>          | <b>193.9</b>          | <b>92.2</b>            | <b>96.8</b>              | <b>101.1</b>             | <b>6.7</b>             | <b>5.9</b>               | <b>7.0</b>               |
| Algeria                                    | 4.3                   | 6.1                   | 5.6                   | 13.0                   | 13.1                     | 12.6                     | -                      | -                        | -                        |
| Egypt                                      | 22.0                  | 22.1                  | 22.1                  | 21.7                   | 24.0                     | 24.2                     | 0.2                    | -                        | -                        |
| Ethiopia                                   | 26.6                  | 29.6                  | 29.5                  | 1.8                    | 1.9                      | 2.0                      | 1.1                    | 1.3                      | 1.3                      |
| Morocco                                    | 7.9                   | 5.4                   | 3.3                   | 7.1                    | 9.1                      | 11.7                     | 0.1                    | 0.1                      | -                        |
| Nigeria                                    | 24.2                  | 26.5                  | 25.0                  | 8.0                    | 7.0                      | 7.4                      | 0.7                    | 0.7                      | 0.7                      |
| South Africa                               | 15.3                  | 13.9                  | 18.6                  | 3.3                    | 3.6                      | 2.8                      | 1.8                    | 1.5                      | 2.6                      |
| Sudan                                      | 7.6                   | 5.9                   | 6.8                   | 2.8                    | 2.9                      | 2.9                      | 0.3                    | 0.2                      | 0.2                      |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>44.0</b>           | <b>42.4</b>           | <b>43.6</b>           | <b>34.4</b>            | <b>37.4</b>              | <b>38.1</b>              | <b>2.4</b>             | <b>2.4</b>               | <b>1.7</b>               |
| Mexico                                     | 37.2                  | 36.1                  | 37.0                  | 21.9                   | 23.7                     | 24.6                     | 2.2                    | 2.2                      | 1.5                      |
| <b>SOUTH AMERICA</b>                       | <b>195.7</b>          | <b>228.3</b>          | <b>232.4</b>          | <b>32.7</b>            | <b>35.1</b>              | <b>34.3</b>              | <b>71.7</b>            | <b>100.5</b>             | <b>96.3</b>              |
| Argentina                                  | 71.1                  | 83.8                  | 84.1                  | 0.1                    | 0.1                      | 0.1                      | 41.8                   | 55.7                     | 51.4                     |
| Brazil                                     | 97.0                  | 116.1                 | 120.9                 | 10.3                   | 9.9                      | 9.9                      | 24.9                   | 38.8                     | 39.0                     |
| Chile                                      | 3.5                   | 3.1                   | 3.0                   | 3.3                    | 3.9                      | 4.0                      | 0.1                    | -                        | 0.1                      |
| Colombia                                   | 3.3                   | 3.4                   | 3.5                   | 7.4                    | 8.9                      | 8.3                      | -                      | -                        | -                        |
| Peru                                       | 4.2                   | 4.2                   | 4.2                   | 5.9                    | 6.6                      | 6.2                      | 0.1                    | 0.1                      | 0.1                      |
| Venezuela (Bolivarian Republic of)         | 1.5                   | 1.2                   | 0.9                   | 3.3                    | 3.4                      | 3.4                      | -                      | -                        | -                        |
| <b>NORTHERN AMERICA</b>                    | <b>507.2</b>          | <b>479.3</b>          | <b>509.2</b>          | <b>10.0</b>            | <b>10.0</b>              | <b>9.5</b>               | <b>121.8</b>           | <b>104.6</b>             | <b>125.6</b>             |
| Canada                                     | 58.0                  | 61.1                  | 63.7                  | 2.3                    | 2.8                      | 2.2                      | 27.8                   | 28.2                     | 30.2                     |
| United States of America                   | 449.2                 | 418.2                 | 445.5                 | 7.7                    | 7.2                      | 7.3                      | 94.0                   | 76.5                     | 95.3                     |
| <b>EUROPE</b>                              | <b>510.3</b>          | <b>541.9</b>          | <b>511.6</b>          | <b>31.5</b>            | <b>31.6</b>              | <b>42.1</b>              | <b>125.5</b>           | <b>155.5</b>             | <b>135.6</b>             |
| European Union                             | 301.6                 | 324.1                 | 275.5                 | 26.9                   | 26.6                     | 32.1                     | 32.3                   | 51.3                     | 35.8                     |
| Russian Federation                         | 119.3                 | 117.5                 | 125.3                 | 0.8                    | 0.6                      | 0.6                      | 44.2                   | 43.1                     | 47.9                     |
| Ukraine                                    | 65.2                  | 74.7                  | 68.5                  | 0.2                    | 0.2                      | 0.2                      | 44.8                   | 56.7                     | 47.2                     |
| <b>OCEANIA</b>                             | <b>39.0</b>           | <b>27.9</b>           | <b>43.6</b>           | <b>1.9</b>             | <b>2.2</b>               | <b>2.1</b>               | <b>23.5</b>            | <b>13.5</b>              | <b>24.1</b>              |
| Australia                                  | 37.9                  | 26.8                  | 42.6                  | 0.3                    | 0.5                      | 0.3                      | 23.5                   | 13.5                     | 24.1                     |
| <b>WORLD</b>                               | <b>2 666.8</b>        | <b>2 707.0</b>        | <b>2 749.7</b>        | <b>411.7</b>           | <b>434.2</b>             | <b>451.5</b>             | <b>414.1</b>           | <b>438.3</b>             | <b>451.5</b>             |
| LIFDC                                      | 465.1                 | 486.5                 | 497.4                 | 74.1                   | 72.2                     | 74.4                     | 24.3                   | 24.5                     | 26.6                     |
| LDC                                        | 180.6                 | 184.8                 | 188.4                 | 40.5                   | 40.0                     | 41.6                     | 10.3                   | 9.9                      | 9.4                      |

## APPENDIX TABLE 1(B): CEREAL STATISTICS

|                                            | Total Utilization      |                   |                   | Stocks ending in     |                |                | Per caput food use     |                   |                   |
|--------------------------------------------|------------------------|-------------------|-------------------|----------------------|----------------|----------------|------------------------|-------------------|-------------------|
|                                            | 16/17-18/19<br>average | 2019/20<br>estim. | 2020/21<br>f'cast | 2017-2019<br>average | 2020<br>estim. | 2021<br>f'cast | 16/17-18/19<br>average | 2019/20<br>estim. | 2020/21<br>f'cast |
|                                            | million tonnes         |                   |                   |                      |                |                | Kg/year                |                   |                   |
| <b>ASIA</b>                                | <b>1 316.9</b>         | <b>1 339.2</b>    | <b>1 376.8</b>    | <b>566.8</b>         | <b>594.0</b>   | <b>596.6</b>   | <b>156.9</b>           | <b>157.5</b>      | <b>158.7</b>      |
| Bangladesh                                 | 47.5                   | 50.0              | 50.7              | 8.8                  | 8.3            | 8.0            | 216.7                  | 220.3             | 221.1             |
| China                                      | 562.2                  | 561.9             | 582.5             | 418.6                | 436.1          | 434.6          | 153.6                  | 153.4             | 153.8             |
| India                                      | 241.7                  | 248.2             | 259.0             | 42.5                 | 56.3           | 59.8           | 146.7                  | 147.5             | 150.6             |
| Indonesia                                  | 70.7                   | 72.6              | 71.6              | 10.3                 | 9.0            | 7.7            | 182.3                  | 181.3             | 180.6             |
| Iran (Islamic Republic of)                 | 33.4                   | 34.9              | 35.4              | 10.4                 | 9.7            | 11.5           | 204.3                  | 205.2             | 205.4             |
| Iraq                                       | 8.4                    | 9.9               | 10.1              | 0.5                  | 1.0            | 1.4            | 191.6                  | 193.6             | 193.4             |
| Japan                                      | 32.4                   | 32.7              | 32.4              | 6.6                  | 6.8            | 6.8            | 93.5                   | 93.0              | 94.2              |
| Kazakhstan                                 | 10.4                   | 9.9               | 10.3              | 4.1                  | 3.9            | 4.0            | 157.9                  | 157.2             | 157.3             |
| Myanmar                                    | 15.1                   | 14.6              | 15.0              | 3.5                  | 3.2            | 3.0            | 198.5                  | 197.7             | 198.1             |
| Pakistan                                   | 35.7                   | 36.6              | 37.8              | 4.7                  | 2.4            | 2.3            | 140.2                  | 140.2             | 140.1             |
| Philippines                                | 28.4                   | 30.3              | 30.3              | 4.2                  | 4.0            | 4.1            | 158.1                  | 164.7             | 165.1             |
| Republic of Korea                          | 19.1                   | 19.1              | 19.3              | 3.7                  | 2.6            | 3.0            | 127.0                  | 124.9             | 123.3             |
| Saudi Arabia                               | 17.0                   | 16.2              | 16.9              | 6.3                  | 5.1            | 5.1            | 140.4                  | 136.7             | 137.2             |
| Thailand                                   | 21.2                   | 22.0              | 23.1              | 8.5                  | 8.6            | 8.8            | 117.9                  | 118.8             | 119.9             |
| Turkey                                     | 39.0                   | 42.3              | 41.9              | 6.6                  | 9.9            | 9.5            | 237.8                  | 240.5             | 241.6             |
| Viet Nam                                   | 40.7                   | 41.5              | 41.0              | 6.0                  | 5.0            | 5.1            | 178.9                  | 176.3             | 178.1             |
| <b>AFRICA</b>                              | <b>270.3</b>           | <b>284.1</b>      | <b>286.6</b>      | <b>59.5</b>          | <b>57.8</b>    | <b>58.1</b>    | <b>152.2</b>           | <b>153.4</b>      | <b>151.6</b>      |
| Algeria                                    | 17.0                   | 18.9              | 19.0              | 5.8                  | 6.9            | 6.0            | 227.1                  | 226.2             | 226.3             |
| Egypt                                      | 44.3                   | 45.6              | 46.0              | 6.6                  | 6.0            | 6.3            | 276.7                  | 275.1             | 275.2             |
| Ethiopia                                   | 26.6                   | 29.3              | 30.0              | 5.6                  | 7.2            | 7.3            | 188.2                  | 197.9             | 198.8             |
| Morocco                                    | 15.3                   | 15.8              | 15.9              | 6.6                  | 5.8            | 4.8            | 238.3                  | 239.4             | 239.7             |
| Nigeria                                    | 30.7                   | 32.9              | 31.7              | 3.1                  | 3.1            | 3.1            | 127.9                  | 129.6             | 125.2             |
| South Africa                               | 16.8                   | 16.9              | 17.3              | 3.5                  | 2.6            | 3.9            | 163.5                  | 162.6             | 160.9             |
| Sudan                                      | 9.1                    | 9.1               | 9.4               | 3.4                  | 2.6            | 2.3            | 179.7                  | 183.1             | 181.0             |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>75.6</b>            | <b>79.1</b>       | <b>80.2</b>       | <b>10.1</b>          | <b>9.7</b>     | <b>9.4</b>     | <b>161.6</b>           | <b>162.8</b>      | <b>163.4</b>      |
| Mexico                                     | 56.4                   | 59.1              | 59.9              | 7.2                  | 7.3            | 7.3            | 193.1                  | 194.2             | 194.5             |
| <b>SOUTH AMERICA</b>                       | <b>156.3</b>           | <b>163.6</b>      | <b>173.7</b>      | <b>37.9</b>          | <b>39.3</b>    | <b>35.7</b>    | <b>117.1</b>           | <b>115.4</b>      | <b>116.0</b>      |
| Argentina                                  | 30.0                   | 30.6              | 34.4              | 10.9                 | 12.8           | 9.6            | 136.0                  | 136.0             | 136.0             |
| Brazil                                     | 81.8                   | 85.5              | 91.8              | 16.5                 | 16.5           | 17.2           | 114.0                  | 110.5             | 111.3             |
| Chile                                      | 6.8                    | 7.0               | 6.9               | 1.8                  | 1.4            | 1.3            | 142.8                  | 142.3             | 141.5             |
| Colombia                                   | 10.7                   | 11.7              | 12.1              | 1.2                  | 1.0            | 1.0            | 87.7                   | 89.6              | 92.4              |
| Peru                                       | 9.9                    | 10.7              | 10.7              | 1.0                  | 0.9            | 0.7            | 154.6                  | 157.1             | 155.6             |
| Venezuela (Bolivarian Republic of)         | 4.9                    | 4.6               | 4.4               | 0.8                  | 0.7            | 0.6            | 114.2                  | 110.3             | 110.7             |
| <b>NORTHERN AMERICA</b>                    | <b>392.9</b>           | <b>388.7</b>      | <b>391.0</b>      | <b>102.9</b>         | <b>91.8</b>    | <b>93.9</b>    | <b>110.0</b>           | <b>110.2</b>      | <b>110.3</b>      |
| Canada                                     | 32.8                   | 34.4              | 34.8              | 10.9                 | 9.2            | 10.2           | 95.9                   | 96.2              | 96.2              |
| United States of America                   | 360.0                  | 354.2             | 356.1             | 92.0                 | 82.6           | 83.7           | 111.6                  | 111.8             | 111.9             |
| <b>EUROPE</b>                              | <b>415.5</b>           | <b>420.1</b>      | <b>418.5</b>      | <b>76.4</b>          | <b>71.8</b>    | <b>70.5</b>    | <b>132.9</b>           | <b>132.0</b>      | <b>134.2</b>      |
| European Union                             | 296.0                  | 299.4             | 272.9             | 41.6                 | 44.8           | 38.5           | 133.4                  | 132.0             | 137.4             |
| Russian Federation                         | 74.9                   | 76.8              | 77.5              | 19.1                 | 12.4           | 12.9           | 126.3                  | 126.4             | 126.5             |
| Ukraine                                    | 21.5                   | 20.7              | 20.4              | 7.9                  | 4.8            | 5.9            | 144.3                  | 145.0             | 145.0             |
| <b>OCEANIA</b>                             | <b>17.8</b>            | <b>17.9</b>       | <b>18.2</b>       | <b>9.1</b>           | <b>7.6</b>     | <b>11.7</b>    | <b>95.6</b>            | <b>96.4</b>       | <b>96.4</b>       |
| Australia                                  | 15.1                   | 15.1              | 15.4              | 8.5                  | 7.1            | 11.2           | 103.8                  | 104.2             | 104.1             |
| <b>WORLD</b>                               | <b>2 645.3</b>         | <b>2 692.6</b>    | <b>2 745.0</b>    | <b>862.8</b>         | <b>872.1</b>   | <b>876.0</b>   | <b>149.1</b>           | <b>149.6</b>      | <b>150.3</b>      |
| LIFDC                                      | 509.1                  | 528.1             | 543.1             | 98.0                 | 110.5          | 113.5          | 151.1                  | 152.4             | 153.5             |
| LDC                                        | 208.5                  | 216.2             | 220.5             | 44.8                 | 43.1           | 42.5           | 157.2                  | 158.0             | 156.9             |

## APPENDIX TABLE 2(A): WHEAT STATISTICS

|                                                         | Production            |                       |                       | Imports                |                          |                          | Exports                |                          |                          |
|---------------------------------------------------------|-----------------------|-----------------------|-----------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                                         | 2016-2018<br>average  | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                                         | <i>million tonnes</i> |                       |                       |                        |                          |                          |                        |                          |                          |
| <b>ASIA</b>                                             | <b>330.0</b>          | <b>336.6</b>          | <b>344.2</b>          | <b>88.2</b>            | <b>93.1</b>              | <b>91.6</b>              | <b>17.2</b>            | <b>14.0</b>              | <b>16.1</b>              |
| Bangladesh                                              | 1.2                   | 1.0                   | 1.2                   | 5.7                    | 6.4                      | 6.4                      | -                      | -                        | -                        |
| China                                                   | 133.0                 | 133.6                 | 134.0                 | 5.6                    | 7.1                      | 8.9                      | 0.4                    | 0.4                      | 0.3                      |
| China (mainland)                                        | 133.0                 | 133.6                 | 134.0                 | 3.7                    | 5.2                      | 7.0                      | 0.3                    | 0.4                      | 0.2                      |
| Taiwan Province of China                                | -                     | -                     | -                     | 1.4                    | 1.4                      | 1.4                      | -                      | -                        | -                        |
| India                                                   | 96.9                  | 103.6                 | 107.6                 | 3.7                    | -                        | -                        | 0.5                    | 0.6                      | 1.0                      |
| Indonesia                                               | -                     | -                     | -                     | 10.8                   | 10.8                     | 10.8                     | 0.1                    | 0.1                      | 0.1                      |
| Iran (Islamic Republic of)                              | 14.4                  | 14.5                  | 14.0                  | 0.6                    | 1.0                      | 2.5                      | 0.3                    | -                        | -                        |
| Iraq                                                    | 2.8                   | 4.3                   | 5.0                   | 3.2                    | 2.7                      | 2.0                      | -                      | -                        | -                        |
| Japan                                                   | 0.8                   | 1.0                   | 1.0                   | 5.6                    | 5.6                      | 5.6                      | 0.2                    | 0.2                      | 0.2                      |
| Kazakhstan                                              | 14.6                  | 11.5                  | 13.0                  | 0.3                    | 1.0                      | 0.1                      | 8.2                    | 6.3                      | 7.0                      |
| Pakistan                                                | 25.8                  | 25.2                  | 25.4                  | -                      | -                        | 1.5                      | 0.8                    | 0.1                      | 0.1                      |
| Philippines                                             | -                     | -                     | -                     | 6.2                    | 6.2                      | 6.2                      | 0.1                    | -                        | -                        |
| Republic of Korea                                       | -                     | -                     | -                     | 4.1                    | 3.8                      | 3.8                      | -                      | -                        | -                        |
| Saudi Arabia                                            | 0.6                   | 0.2                   | 0.5                   | 3.3                    | 3.4                      | 3.2                      | -                      | -                        | -                        |
| Thailand                                                | -                     | -                     | -                     | 3.3                    | 3.5                      | 3.1                      | -                      | -                        | -                        |
| Turkey                                                  | 20.7                  | 19.0                  | 20.5                  | 5.8                    | 11.5                     | 7.5                      | 4.8                    | 4.4                      | 5.5                      |
| <b>AFRICA</b>                                           | <b>26.6</b>           | <b>27.0</b>           | <b>25.4</b>           | <b>49.4</b>            | <b>51.0</b>              | <b>52.1</b>              | <b>0.8</b>             | <b>0.9</b>               | <b>0.8</b>               |
| Algeria                                                 | 2.9                   | 4.0                   | 3.8                   | 8.1                    | 7.1                      | 6.5                      | -                      | -                        | -                        |
| Egypt                                                   | 8.8                   | 9.0                   | 9.0                   | 12.0                   | 13.0                     | 13.5                     | -                      | -                        | -                        |
| Ethiopia                                                | 4.6                   | 5.3                   | 5.3                   | 1.3                    | 1.3                      | 1.3                      | -                      | -                        | -                        |
| Morocco                                                 | 5.7                   | 4.1                   | 2.6                   | 4.4                    | 4.9                      | 6.5                      | 0.1                    | 0.1                      | -                        |
| Nigeria                                                 | 0.1                   | 0.1                   | 0.1                   | 5.1                    | 4.8                      | 4.8                      | 0.4                    | 0.4                      | 0.4                      |
| South Africa                                            | 1.8                   | 1.5                   | 2.0                   | 1.5                    | 2.0                      | 1.6                      | 0.1                    | 0.1                      | 0.1                      |
| Tunisia                                                 | 1.0                   | 1.5                   | 1.0                   | 2.0                    | 2.0                      | 2.2                      | 0.1                    | -                        | -                        |
| <b>CENTRAL AMERICA &amp; THE<br/>CARIBBEAN</b>          | <b>3.4</b>            | <b>3.2</b>            | <b>3.0</b>            | <b>9.1</b>             | <b>9.5</b>               | <b>9.6</b>               | <b>1.0</b>             | <b>1.2</b>               | <b>0.6</b>               |
| Cuba                                                    | -                     | -                     | -                     | 0.8                    | 0.7                      | 0.6                      | -                      | -                        | -                        |
| Mexico                                                  | 3.4                   | 3.2                   | 3.0                   | 5.1                    | 5.3                      | 5.4                      | 0.8                    | 1.1                      | 0.5                      |
| <b>SOUTH AMERICA</b>                                    | <b>27.8</b>           | <b>28.6</b>           | <b>28.4</b>           | <b>15.4</b>            | <b>15.9</b>              | <b>15.4</b>              | <b>14.0</b>            | <b>14.5</b>              | <b>15.3</b>              |
| Argentina                                               | 18.8                  | 19.8                  | 18.0                  | -                      | -                        | -                        | 12.7                   | 13.6                     | 14.0                     |
| Brazil                                                  | 5.5                   | 5.2                   | 6.8                   | 7.2                    | 7.1                      | 7.0                      | 0.5                    | 0.4                      | 0.4                      |
| Chile                                                   | 1.4                   | 1.2                   | 1.2                   | 1.3                    | 1.1                      | 1.2                      | -                      | -                        | -                        |
| Colombia                                                | -                     | -                     | -                     | 1.9                    | 2.1                      | 1.9                      | -                      | -                        | -                        |
| Peru                                                    | 0.2                   | 0.2                   | 0.2                   | 2.0                    | 2.1                      | 2.0                      | -                      | -                        | -                        |
| Venezuela (Bolivarian Republic of)                      | -                     | -                     | -                     | 1.3                    | 1.4                      | 1.4                      | -                      | -                        | -                        |
| <b>NORTHERN AMERICA</b>                                 | <b>85.4</b>           | <b>84.9</b>           | <b>83.8</b>           | <b>3.8</b>             | <b>3.0</b>               | <b>3.5</b>               | <b>48.1</b>            | <b>49.7</b>              | <b>51.5</b>              |
| Canada                                                  | 31.6                  | 32.3                  | 34.1                  | 0.1                    | 0.1                      | 0.1                      | 21.9                   | 23.4                     | 25.0                     |
| United States of America                                | 53.8                  | 52.6                  | 49.7                  | 3.7                    | 2.9                      | 3.4                      | 26.2                   | 26.3                     | 26.5                     |
| <b>EUROPE</b>                                           | <b>255.4</b>          | <b>266.0</b>          | <b>248.5</b>          | <b>7.8</b>             | <b>6.6</b>               | <b>11.4</b>              | <b>77.5</b>            | <b>93.5</b>              | <b>81.0</b>              |
| European Union                                          | 144.9                 | 155.7                 | 123.7                 | 5.3                    | 4.3                      | 6.3                      | 23.8                   | 37.3                     | 25.5                     |
| Russian Federation                                      | 77.1                  | 74.5                  | 82.0                  | 0.4                    | 0.3                      | 0.3                      | 34.7                   | 34.1                     | 38.0                     |
| Ukraine                                                 | 25.6                  | 28.3                  | 25.5                  | -                      | -                        | -                        | 17.3                   | 21.0                     | 16.5                     |
| United Kingdom of Great Britain<br>and Northern Ireland | -                     | -                     | 10.1                  | -                      | -                        | 2.5                      | -                      | -                        | 0.1                      |
| <b>OCEANIA</b>                                          | <b>23.9</b>           | <b>15.6</b>           | <b>29.3</b>           | <b>0.9</b>             | <b>1.1</b>               | <b>1.0</b>               | <b>15.8</b>            | <b>10.1</b>              | <b>19.1</b>              |
| Australia                                               | 23.4                  | 15.2                  | 28.9                  | 0.2                    | 0.2                      | 0.1                      | 15.8                   | 10.1                     | 19.1                     |
| <b>WORLD</b>                                            | <b>752.5</b>          | <b>761.9</b>          | <b>762.7</b>          | <b>174.7</b>           | <b>180.2</b>             | <b>184.5</b>             | <b>174.3</b>           | <b>184.0</b>             | <b>184.5</b>             |
| LIFDC                                                   | 119.3                 | 129.1                 | 133.1                 | 40.1                   | 37.4                     | 36.9                     | 1.4                    | 1.5                      | 1.9                      |
| LDC                                                     | 13.2                  | 15.0                  | 14.8                  | 23.4                   | 23.8                     | 24.0                     | 0.1                    | 0.1                      | 0.1                      |

## APPENDIX TABLE 2(B): WHEAT STATISTICS

|                                                      | Total Utilization      |                   |                   | Stocks ending in     |                |                | Per caput food use     |                   |                   |
|------------------------------------------------------|------------------------|-------------------|-------------------|----------------------|----------------|----------------|------------------------|-------------------|-------------------|
|                                                      | 16/17-18/19<br>average | 2019/20<br>estim. | 2020/21<br>f'cast | 2017-2019<br>average | 2020<br>estim. | 2021<br>f'cast | 16/17-18/19<br>average | 2019/20<br>estim. | 2020/21<br>f'cast |
|                                                      | million tonnes         |                   |                   |                      |                |                | Kg/year                |                   |                   |
| <b>ASIA</b>                                          | <b>390.7</b>           | <b>399.4</b>      | <b>409.6</b>      | <b>169.9</b>         | <b>190.4</b>   | <b>200.7</b>   | <b>65.9</b>            | <b>66.5</b>       | <b>66.8</b>       |
| Bangladesh                                           | 6.8                    | 7.6               | 7.8               | 2.1                  | 1.5            | 1.4            | 32.6                   | 35.4              | 35.6              |
| China                                                | 125.9                  | 127.3             | 131.8             | 108.1                | 128.2          | 139.1          | 64.6                   | 64.5              | 64.9              |
| China (mainland)                                     | 124.0                  | 125.5             | 129.9             | 107.6                | 127.7          | 138.6          | 64.9                   | 64.9              | 65.2              |
| Taiwan Province of China                             | 1.4                    | 1.4               | 1.4               | 0.4                  | 0.4            | 0.4            | 45.6                   | 45.6              | 45.6              |
| India                                                | 99.0                   | 101.8             | 105.7             | 17.0                 | 20.8           | 22.0           | 59.9                   | 60.4              | 60.7              |
| Indonesia                                            | 10.6                   | 11.1              | 11.1              | 1.2                  | 1.1            | 1.0            | 25.8                   | 26.2              | 26.4              |
| Iran (Islamic Republic of)                           | 15.3                   | 15.6              | 15.8              | 7.5                  | 6.0            | 6.6            | 168.2                  | 168.8             | 169.1             |
| Iraq                                                 | 6.2                    | 6.5               | 6.6               | 0.4                  | 0.7            | 1.0            | 152.0                  | 153.1             | 152.9             |
| Japan                                                | 6.3                    | 6.2               | 6.4               | 1.5                  | 1.3            | 1.2            | 40.5                   | 39.9              | 41.5              |
| Kazakhstan                                           | 6.7                    | 6.2               | 6.2               | 3.7                  | 3.4            | 3.3            | 143.3                  | 142.6             | 142.6             |
| Pakistan                                             | 25.7                   | 26.1              | 26.8              | 3.1                  | 1.0            | 0.8            | 118.1                  | 118.0             | 117.9             |
| Philippines                                          | 6.0                    | 6.3               | 6.2               | 1.0                  | 0.9            | 0.9            | 23.6                   | 24.3              | 24.2              |
| Republic of Korea                                    | 3.9                    | 3.8               | 3.8               | 1.0                  | 1.1            | 1.1            | 47.7                   | 47.7              | 47.7              |
| Saudi Arabia                                         | 3.6                    | 3.6               | 3.7               | 3.1                  | 3.0            | 3.0            | 98.3                   | 98.0              | 97.9              |
| Thailand                                             | 3.2                    | 3.4               | 3.3               | 1.7                  | 1.8            | 1.6            | 16.5                   | 16.3              | 16.7              |
| Turkey                                               | 21.8                   | 23.7              | 23.2              | 4.5                  | 6.7            | 6.0            | 209.0                  | 212.2             | 213.4             |
| <b>AFRICA</b>                                        | <b>75.1</b>            | <b>77.6</b>       | <b>77.7</b>       | <b>20.7</b>          | <b>18.2</b>    | <b>16.8</b>    | <b>50.9</b>            | <b>50.6</b>       | <b>50.2</b>       |
| Algeria                                              | 10.8                   | 11.0              | 11.0              | 4.1                  | 4.6            | 3.9            | 208.9                  | 208.6             | 208.9             |
| Egypt                                                | 21.4                   | 22.0              | 22.3              | 4.1                  | 3.6            | 3.7            | 188.4                  | 189.0             | 189.0             |
| Ethiopia                                             | 6.1                    | 6.6               | 6.6               | 0.9                  | 0.8            | 0.8            | 46.1                   | 48.8              | 47.8              |
| Morocco                                              | 10.2                   | 10.4              | 9.8               | 5.4                  | 4.1            | 3.3            | 206.8                  | 207.0             | 207.1             |
| Nigeria                                              | 4.1                    | 4.3               | 4.3               | 0.2                  | 0.2            | 0.2            | 20.1                   | 20.2              | 19.7              |
| South Africa                                         | 3.2                    | 3.4               | 3.4               | 0.5                  | 0.4            | 0.6            | 56.2                   | 56.2              | 56.0              |
| Tunisia                                              | 3.0                    | 3.3               | 3.2               | 0.5                  | 0.6            | 0.6            | 211.2                  | 211.2             | 211.1             |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b>           | <b>11.4</b>            | <b>11.9</b>       | <b>12.0</b>       | <b>2.0</b>           | <b>1.7</b>     | <b>1.7</b>     | <b>45.1</b>            | <b>45.7</b>       | <b>45.7</b>       |
| Cuba                                                 | 0.8                    | 0.7               | 0.7               | 0.1                  | -              | -              | 56.5                   | 56.9              | 56.2              |
| Mexico                                               | 7.5                    | 7.8               | 7.8               | 1.1                  | 1.0            | 1.2            | 50.5                   | 51.0              | 50.8              |
| <b>SOUTH AMERICA</b>                                 | <b>28.7</b>            | <b>29.6</b>       | <b>29.9</b>       | <b>6.6</b>           | <b>7.5</b>     | <b>6.7</b>     | <b>60.3</b>            | <b>61.0</b>       | <b>61.1</b>       |
| Argentina                                            | 5.9                    | 6.6               | 6.2               | 1.9                  | 3.0            | 1.4            | 118.5                  | 118.7             | 118.6             |
| Brazil                                               | 11.8                   | 12.0              | 12.5              | 2.3                  | 1.8            | 2.4            | 53.8                   | 54.0              | 54.3              |
| Chile                                                | 2.8                    | 2.4               | 2.4               | 1.0                  | 0.7            | 0.7            | 106.7                  | 105.8             | 105.1             |
| Colombia                                             | 2.0                    | 1.9               | 2.0               | 0.3                  | 0.1            | 0.2            | 34.3                   | 34.8              | 36.4              |
| Peru                                                 | 2.2                    | 2.3               | 2.3               | 0.3                  | 0.2            | 0.2            | 65.3                   | 66.6              | 64.8              |
| Venezuela (Bolivarian Republic of)                   | 1.3                    | 1.4               | 1.4               | 0.1                  | 0.1            | 0.1            | 43.9                   | 48.4              | 48.6              |
| <b>NORTHERN AMERICA</b>                              | <b>39.7</b>            | <b>39.4</b>       | <b>39.4</b>       | <b>36.9</b>          | <b>33.0</b>    | <b>29.9</b>    | <b>82.5</b>            | <b>82.3</b>       | <b>82.3</b>       |
| Canada                                               | 9.3                    | 8.9               | 8.9               | 6.4                  | 5.0            | 5.9            | 81.0                   | 80.9              | 80.8              |
| United States of America                             | 30.4                   | 30.6              | 30.5              | 30.5                 | 28.0           | 24.0           | 82.6                   | 82.5              | 82.5              |
| <b>EUROPE</b>                                        | <b>186.9</b>           | <b>183.0</b>      | <b>180.3</b>      | <b>33.1</b>          | <b>22.9</b>    | <b>20.5</b>    | <b>107.3</b>           | <b>106.1</b>      | <b>107.2</b>      |
| European Union                                       | 127.1                  | 122.7             | 105.7             | 15.7                 | 13.6           | 9.0            | 109.0                  | 107.2             | 110.7             |
| Russian Federation                                   | 42.5                   | 43.2              | 43.7              | 13.0                 | 6.5            | 7.1            | 100.0                  | 100.0             | 100.0             |
| Ukraine                                              | 9.0                    | 8.7               | 8.5               | 2.3                  | 0.7            | 1.2            | 112.6                  | 112.7             | 112.7             |
| United Kingdom of Great Britain and Northern Ireland | -                      | -                 | 14.0              | -                    | -              | 1.0            | -                      | -                 | 95.9              |
| <b>OCEANIA</b>                                       | <b>9.7</b>             | <b>9.5</b>        | <b>9.2</b>        | <b>5.3</b>           | <b>2.1</b>     | <b>4.7</b>     | <b>69.2</b>            | <b>69.2</b>       | <b>69.1</b>       |
| Australia                                            | 8.4                    | 8.2               | 7.9               | 5.0                  | 1.7            | 4.3            | 83.4                   | 83.7              | 83.5              |
| <b>WORLD</b>                                         | <b>742.1</b>           | <b>750.5</b>      | <b>758.0</b>      | <b>274.4</b>         | <b>275.8</b>   | <b>281.0</b>   | <b>67.4</b>            | <b>67.5</b>       | <b>67.7</b>       |
| LIFDC                                                | 158.5                  | 162.8             | 168.0             | 32.4                 | 33.1           | 33.1           | 49.5                   | 49.8              | 49.8              |
| LDC                                                  | 36.7                   | 38.5              | 39.0              | 10.2                 | 8.0            | 7.3            | 31.5                   | 32.0              | 31.8              |

## APPENDIX TABLE 3(A): COARSE GRAIN STATISTICS

|                                                      | Production            |                       |                       | Imports                |                          |                          | Exports                |                          |                          |
|------------------------------------------------------|-----------------------|-----------------------|-----------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                                      | 2016-2018<br>average  | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                                      | <i>million tonnes</i> |                       |                       |                        |                          |                          |                        |                          |                          |
| <b>ASIA</b>                                          | <b>402.7</b>          | <b>408.7</b>          | <b>414.6</b>          | <b>99.4</b>            | <b>109.1</b>             | <b>113.2</b>             | <b>6.2</b>             | <b>5.6</b>               | <b>5.6</b>               |
| China                                                | 269.2                 | 269.9                 | 270.4                 | 19.2                   | 18.9                     | 23.4                     | 0.1                    | 0.1                      | 0.1                      |
| China (mainland)                                     | 269.0                 | 269.7                 | 270.2                 | 14.7                   | 14.1                     | 18.2                     | 0.1                    | 0.1                      | 0.1                      |
| Taiwan Province of China                             | 0.2                   | 0.2                   | 0.2                   | 4.4                    | 4.8                      | 5.1                      | -                      | -                        | -                        |
| India                                                | 44.8                  | 44.0                  | 46.8                  | 0.3                    | 0.7                      | 0.6                      | 0.9                    | 0.5                      | 0.6                      |
| Indonesia                                            | 20.9                  | 22.6                  | 22.5                  | 0.8                    | 0.9                      | 0.9                      | 0.2                    | -                        | -                        |
| Iran (Islamic Republic of)                           | 4.5                   | 4.1                   | 4.3                   | 10.8                   | 13.0                     | 13.0                     | -                      | -                        | -                        |
| Japan                                                | 0.2                   | 0.2                   | 0.2                   | 17.8                   | 18.0                     | 17.8                     | -                      | -                        | -                        |
| Malaysia                                             | 0.1                   | 0.1                   | 0.1                   | 3.8                    | 4.0                      | 4.1                      | -                      | -                        | -                        |
| Pakistan                                             | 6.6                   | 7.2                   | 7.4                   | 0.2                    | 0.2                      | 0.2                      | -                      | -                        | -                        |
| Philippines                                          | 7.6                   | 8.0                   | 8.1                   | 0.7                    | 0.4                      | 0.5                      | -                      | -                        | -                        |
| Republic of Korea                                    | 0.2                   | 0.2                   | 0.2                   | 10.0                   | 11.8                     | 12.1                     | -                      | -                        | -                        |
| Saudi Arabia                                         | 0.3                   | 0.3                   | 0.3                   | 11.2                   | 10.8                     | 11.6                     | -                      | -                        | -                        |
| Thailand                                             | 5.0                   | 4.4                   | 5.2                   | 0.3                    | 2.3                      | 2.1                      | 0.4                    | 0.1                      | 0.1                      |
| Turkey                                               | 13.6                  | 14.3                  | 15.1                  | 3.5                    | 5.3                      | 3.7                      | 0.8                    | 0.5                      | 0.6                      |
| Viet Nam                                             | 5.1                   | 4.8                   | 4.6                   | 9.3                    | 11.5                     | 11.4                     | 0.2                    | 0.3                      | 0.3                      |
| <b>AFRICA</b>                                        | <b>138.7</b>          | <b>139.7</b>          | <b>144.4</b>          | <b>26.1</b>            | <b>30.2</b>              | <b>31.2</b>              | <b>5.3</b>             | <b>4.7</b>               | <b>5.8</b>               |
| Algeria                                              | 1.4                   | 2.1                   | 1.8                   | 4.8                    | 5.9                      | 5.9                      | -                      | -                        | -                        |
| Egypt                                                | 8.9                   | 8.5                   | 8.6                   | 9.3                    | 10.7                     | 10.6                     | -                      | -                        | -                        |
| Ethiopia                                             | 21.8                  | 24.2                  | 24.1                  | -                      | -                        | -                        | 1.1                    | 1.3                      | 1.3                      |
| Morocco                                              | 2.1                   | 1.2                   | 0.7                   | 2.7                    | 4.2                      | 5.1                      | -                      | -                        | -                        |
| Nigeria                                              | 19.3                  | 21.4                  | 20.1                  | 0.5                    | 0.4                      | 0.4                      | 0.2                    | 0.2                      | 0.2                      |
| South Africa                                         | 13.5                  | 12.3                  | 16.6                  | 0.9                    | 0.7                      | 0.2                      | 1.7                    | 1.4                      | 2.5                      |
| Sudan                                                | 7.0                   | 5.2                   | 6.1                   | 0.2                    | 0.3                      | 0.3                      | 0.3                    | 0.2                      | 0.2                      |
| United Republic of Tanzania                          | 7.4                   | 6.8                   | 7.4                   | -                      | -                        | -                        | 0.4                    | 0.3                      | 0.3                      |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b>           | <b>38.6</b>           | <b>37.3</b>           | <b>38.7</b>           | <b>22.8</b>            | <b>25.3</b>              | <b>25.9</b>              | <b>1.4</b>             | <b>1.1</b>               | <b>1.0</b>               |
| Mexico                                               | 33.6                  | 32.6                  | 33.8                  | 16.1                   | 17.6                     | 18.5                     | 1.3                    | 1.1                      | 1.0                      |
| <b>SOUTH AMERICA</b>                                 | <b>151.3</b>          | <b>184.2</b>          | <b>187.5</b>          | <b>15.5</b>            | <b>17.3</b>              | <b>17.0</b>              | <b>54.3</b>            | <b>82.0</b>              | <b>77.6</b>              |
| Argentina                                            | 51.4                  | 63.3                  | 65.3                  | 0.1                    | 0.1                      | 0.1                      | 28.7                   | 41.8                     | 37.0                     |
| Brazil                                               | 83.5                  | 103.8                 | 106.5                 | 2.4                    | 2.0                      | 2.2                      | 23.6                   | 37.3                     | 37.8                     |
| Chile                                                | 2.0                   | 1.8                   | 1.6                   | 1.9                    | 2.6                      | 2.6                      | 0.1                    | -                        | -                        |
| Colombia                                             | 1.5                   | 1.6                   | 1.5                   | 5.4                    | 6.6                      | 6.2                      | -                      | -                        | -                        |
| Peru                                                 | 1.8                   | 1.8                   | 1.7                   | 3.6                    | 4.1                      | 3.9                      | -                      | -                        | -                        |
| Venezuela (Bolivarian Republic of)                   | 1.3                   | 1.1                   | 0.8                   | 1.5                    | 1.5                      | 1.5                      | -                      | -                        | -                        |
| <b>NORTHERN AMERICA</b>                              | <b>415.2</b>          | <b>388.5</b>          | <b>418.2</b>          | <b>4.8</b>             | <b>5.4</b>               | <b>4.5</b>               | <b>70.6</b>            | <b>51.9</b>              | <b>70.9</b>              |
| Canada                                               | 26.5                  | 28.7                  | 29.6                  | 1.8                    | 2.3                      | 1.8                      | 5.9                    | 4.8                      | 5.2                      |
| United States of America                             | 388.7                 | 359.8                 | 388.6                 | 3.0                    | 3.2                      | 2.7                      | 64.7                   | 47.1                     | 65.7                     |
| <b>EUROPE</b>                                        | <b>252.3</b>          | <b>273.3</b>          | <b>260.6</b>          | <b>21.1</b>            | <b>21.9</b>              | <b>27.6</b>              | <b>47.5</b>            | <b>61.4</b>              | <b>54.0</b>              |
| European Union                                       | 155.0                 | 166.6                 | 150.1                 | 19.6                   | 20.4                     | 23.9                     | 8.2                    | 13.5                     | 9.8                      |
| Russian Federation                                   | 41.4                  | 42.3                  | 42.6                  | 0.2                    | 0.1                      | 0.1                      | 9.4                    | 8.9                      | 9.7                      |
| Serbia                                               | 6.7                   | 7.9                   | 6.8                   | 0.1                    | 0.1                      | 0.1                      | 2.0                    | 2.7                      | 2.1                      |
| Ukraine                                              | 39.5                  | 46.4                  | 42.9                  | 0.1                    | 0.1                      | 0.1                      | 27.5                   | 35.7                     | 30.7                     |
| United Kingdom of Great Britain and Northern Ireland | -                     | -                     | 9.6                   | -                      | -                        | 2.3                      | -                      | -                        | 1.4                      |
| <b>OCEANIA</b>                                       | <b>14.7</b>           | <b>12.2</b>           | <b>14.3</b>           | <b>0.3</b>             | <b>0.3</b>               | <b>0.3</b>               | <b>7.6</b>             | <b>3.3</b>               | <b>4.9</b>               |
| Australia                                            | 14.1                  | 11.6                  | 13.6                  | -                      | -                        | -                        | 7.6                    | 3.3                      | 4.9                      |
| <b>WORLD</b>                                         | <b>1 413.5</b>        | <b>1 444.0</b>        | <b>1 478.3</b>        | <b>190.0</b>           | <b>209.6</b>             | <b>219.8</b>             | <b>192.8</b>           | <b>210.0</b>             | <b>219.8</b>             |
| LIFDC                                                | 149.8                 | 152.9                 | 156.9                 | 17.7                   | 20.3                     | 20.7                     | 4.2                    | 3.7                      | 3.8                      |
| LDC                                                  | 92.3                  | 92.8                  | 96.1                  | 4.8                    | 5.1                      | 5.2                      | 5.3                    | 5.3                      | 5.1                      |

## APPENDIX TABLE 3(B): COARSE GRAIN STATISTICS

|                                                      | Total Utilization      |                   |                   | Stocks ending in     |                |                | Per caput food use     |                   |                   |
|------------------------------------------------------|------------------------|-------------------|-------------------|----------------------|----------------|----------------|------------------------|-------------------|-------------------|
|                                                      | 16/17-18/19<br>average | 2019/20<br>estim. | 2020/21<br>f'cast | 2017-2019<br>average | 2020<br>estim. | 2021<br>f'cast | 16/17-18/19<br>average | 2019/20<br>estim. | 2020/21<br>f'cast |
|                                                      | million tonnes         |                   |                   |                      |                |                | Kg/year                |                   |                   |
| <b>ASIA</b>                                          | <b>497.5</b>           | <b>506.6</b>      | <b>528.0</b>      | <b>230.4</b>         | <b>230.5</b>   | <b>223.5</b>   | <b>14.7</b>            | <b>14.3</b>       | <b>14.6</b>       |
| China                                                | 289.1                  | 287.0             | 302.1             | 206.6                | 204.2          | 194.9          | 13.0                   | 13.0              | 12.9              |
| China (mainland)                                     | 284.5                  | 281.7             | 296.7             | 206.2                | 203.7          | 194.3          | 13.1                   | 13.2              | 13.1              |
| Taiwan Province of China                             | 4.5                    | 5.3               | 5.3               | 0.4                  | 0.5            | 0.5            | 7.0                    | 6.9               | 6.9               |
| India                                                | 44.5                   | 43.7              | 46.9              | 2.2                  | 2.8            | 2.6            | 18.6                   | 17.3              | 18.6              |
| Indonesia                                            | 21.5                   | 24.0              | 23.6              | 1.9                  | 1.9            | 1.9            | 29.1                   | 29.5              | 29.3              |
| Iran (Islamic Republic of)                           | 14.9                   | 16.0              | 16.2              | 2.2                  | 3.1            | 4.1            | 1.3                    | 1.2               | 1.2               |
| Japan                                                | 17.8                   | 18.5              | 18.0              | 2.0                  | 2.3            | 2.3            | 3.3                    | 3.3               | 3.3               |
| Malaysia                                             | 3.8                    | 4.1               | 4.2               | 0.2                  | 0.2            | 0.2            | 1.9                    | 2.0               | 2.0               |
| Pakistan                                             | 7.0                    | 7.3               | 7.6               | 1.1                  | 0.8            | 0.8            | 9.8                    | 10.0              | 9.8               |
| Philippines                                          | 8.2                    | 8.5               | 8.6               | 0.9                  | 1.0            | 1.0            | 18.6                   | 18.9              | 18.8              |
| Republic of Korea                                    | 10.4                   | 11.2              | 11.6              | 1.1                  | 0.6            | 1.0            | 4.3                    | 4.4               | 4.4               |
| Saudi Arabia                                         | 12.1                   | 11.3              | 11.9              | 2.9                  | 2.0            | 1.9            | 2.9                    | 2.8               | 2.8               |
| Thailand                                             | 5.0                    | 6.6               | 7.2               | 0.7                  | 0.8            | 0.8            | 2.7                    | 2.7               | 2.7               |
| Turkey                                               | 16.5                   | 17.8              | 17.9              | 2.0                  | 3.1            | 3.4            | 19.6                   | 19.3              | 19.1              |
| Viet Nam                                             | 14.3                   | 16.2              | 15.9              | 1.3                  | 0.8            | 0.7            | 7.9                    | 8.3               | 8.4               |
| <b>AFRICA</b>                                        | <b>156.4</b>           | <b>166.6</b>      | <b>167.9</b>      | <b>32.5</b>          | <b>35.1</b>    | <b>36.8</b>    | <b>74.3</b>            | <b>76.2</b>       | <b>74.4</b>       |
| Algeria                                              | 6.1                    | 7.8               | 7.9               | 1.8                  | 2.3            | 2.1            | 15.5                   | 14.9              | 14.6              |
| Egypt                                                | 18.3                   | 18.9              | 18.9              | 1.6                  | 1.7            | 2.0            | 45.4                   | 44.8              | 44.4              |
| Ethiopia                                             | 19.9                   | 22.0              | 22.6              | 4.6                  | 6.3            | 6.4            | 137.3                  | 143.1             | 144.4             |
| Morocco                                              | 5.0                    | 5.4               | 6.0               | 1.2                  | 1.6            | 1.5            | 30.1                   | 30.2              | 30.0              |
| Nigeria                                              | 19.3                   | 21.5              | 20.3              | 1.9                  | 2.5            | 2.5            | 74.2                   | 78.7              | 74.8              |
| South Africa                                         | 12.6                   | 12.5              | 13.0              | 2.8                  | 2.0            | 3.3            | 91.6                   | 91.3              | 90.3              |
| Sudan                                                | 6.2                    | 6.1               | 6.3               | 1.7                  | 1.5            | 1.5            | 111.2                  | 114.5             | 112.6             |
| United Republic of Tanzania                          | 7.0                    | 7.1               | 7.2               | 1.5                  | 0.9            | 0.8            | 90.7                   | 90.2              | 90.6              |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b>           | <b>60.0</b>            | <b>62.8</b>       | <b>63.8</b>       | <b>7.6</b>           | <b>7.4</b>     | <b>7.1</b>     | <b>98.1</b>            | <b>98.6</b>       | <b>98.7</b>       |
| Mexico                                               | 48.1                   | 50.5              | 51.1              | 6.0                  | 6.2            | 6.0            | 136.0                  | 136.4             | 136.5             |
| <b>SOUTH AMERICA</b>                                 | <b>112.5</b>           | <b>119.6</b>      | <b>129.1</b>      | <b>29.1</b>          | <b>29.8</b>    | <b>27.2</b>    | <b>24.7</b>            | <b>24.1</b>       | <b>24.0</b>       |
| Argentina                                            | 23.5                   | 23.5              | 27.7              | 8.8                  | 9.6            | 8.1            | 7.3                    | 7.3               | 7.3               |
| Brazil                                               | 62.2                   | 66.4              | 72.1              | 13.7                 | 14.4           | 14.4           | 25.8                   | 25.8              | 25.8              |
| Chile                                                | 3.8                    | 4.3               | 4.3               | 0.7                  | 0.6            | 0.6            | 24.7                   | 24.4              | 24.2              |
| Colombia                                             | 6.9                    | 7.9               | 8.0               | 0.5                  | 0.4            | 0.3            | 18.9                   | 18.8              | 18.7              |
| Peru                                                 | 5.3                    | 5.9               | 6.0               | 0.3                  | 0.4            | 0.2            | 21.9                   | 22.5              | 22.6              |
| Venezuela (Bolivarian Republic of)                   | 3.0                    | 2.6               | 2.4               | 0.6                  | 0.5            | 0.4            | 51.5                   | 42.6              | 42.7              |
| <b>NORTHERN AMERICA</b>                              | <b>348.4</b>           | <b>344.3</b>      | <b>346.6</b>      | <b>64.7</b>          | <b>57.7</b>    | <b>62.3</b>    | <b>18.0</b>            | <b>18.0</b>       | <b>18.0</b>       |
| Canada                                               | 23.1                   | 25.2              | 25.6              | 4.5                  | 4.0            | 4.2            | 4.6                    | 4.6               | 4.5               |
| United States of America                             | 325.3                  | 319.1             | 321.0             | 60.2                 | 53.7           | 58.1           | 19.5                   | 19.5              | 19.5              |
| <b>EUROPE</b>                                        | <b>224.1</b>           | <b>232.2</b>      | <b>233.3</b>      | <b>42.7</b>          | <b>48.0</b>    | <b>49.2</b>    | <b>20.3</b>            | <b>20.3</b>       | <b>21.3</b>       |
| European Union                                       | 165.5                  | 172.9             | 164.0             | 25.4                 | 30.5           | 28.9           | 18.8                   | 18.8              | 20.7              |
| Russian Federation                                   | 31.6                   | 32.8              | 33.0              | 6.0                  | 5.8            | 5.7            | 21.3                   | 21.3              | 21.3              |
| Serbia                                               | 4.8                    | 4.8               | 4.8               | 0.6                  | 1.1            | 1.0            | 22.2                   | 22.6              | 20.6              |
| Ukraine                                              | 12.3                   | 11.8              | 11.7              | 5.6                  | 4.1            | 4.7            | 29.0                   | 29.1              | 29.0              |
| United Kingdom of Great Britain and Northern Ireland | -                      | -                 | 9.8               | -                    | -              | 2.6            | -                      | -                 | 18.1              |
| <b>OCEANIA</b>                                       | <b>7.2</b>             | <b>7.5</b>        | <b>8.1</b>        | <b>3.5</b>           | <b>5.3</b>     | <b>6.8</b>     | <b>8.0</b>             | <b>7.8</b>        | <b>7.7</b>        |
| Australia                                            | 6.4                    | 6.5               | 7.1               | 3.3                  | 5.2            | 6.7            | 9.5                    | 9.3               | 9.2               |
| <b>WORLD</b>                                         | <b>1 406.1</b>         | <b>1 439.6</b>    | <b>1 476.7</b>    | <b>410.3</b>         | <b>413.9</b>   | <b>413.0</b>   | <b>28.1</b>            | <b>28.4</b>       | <b>28.6</b>       |
| LIFDC                                                | 161.0                  | 168.5             | 173.2             | 27.4                 | 30.8           | 31.2           | 37.4                   | 37.7              | 38.0              |
| LDC                                                  | 89.5                   | 93.4              | 95.6              | 19.3                 | 20.4           | 20.9           | 60.3                   | 61.1              | 60.3              |

## APPENDIX TABLE 4(A): MAIZE STATISTICS

|                                            | Production            |                       |                       | Imports                |                          |                          | Exports                |                          |                          |
|--------------------------------------------|-----------------------|-----------------------|-----------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                            | 2016-2018<br>average  | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                            | <i>million tonnes</i> |                       |                       |                        |                          |                          |                        |                          |                          |
| <b>ASIA</b>                                | <b>355.3</b>          | <b>360.1</b>          | <b>360.8</b>          | <b>71.8</b>            | <b>83.7</b>              | <b>85.2</b>              | <b>4.5</b>             | <b>4.1</b>               | <b>3.7</b>               |
| China                                      | 260.1                 | 260.9                 | 261.2                 | 7.8                    | 10.1                     | 12.3                     | 0.1                    | -                        | -                        |
| China (mainland)                           | 260.0                 | 260.8                 | 261.0                 | 3.4                    | 5.3                      | 7.2                      | 0.1                    | -                        | -                        |
| Taiwan Province of China                   | 0.2                   | 0.2                   | 0.2                   | 4.3                    | 4.7                      | 5.0                      | -                      | -                        | -                        |
| India                                      | 27.5                  | 28.6                  | 28.0                  | 0.2                    | 0.4                      | 0.3                      | 0.7                    | 0.4                      | 0.4                      |
| Indonesia                                  | 20.9                  | 22.6                  | 22.5                  | 0.7                    | 0.8                      | 0.8                      | 0.2                    | -                        | -                        |
| Iran (Islamic Republic of)                 | 1.2                   | 1.1                   | 1.3                   | 8.5                    | 9.8                      | 9.5                      | -                      | -                        | -                        |
| Japan                                      | -                     | -                     | -                     | 15.9                   | 16.3                     | 16.0                     | -                      | -                        | -                        |
| Malaysia                                   | 0.1                   | 0.1                   | 0.1                   | 3.7                    | 4.0                      | 4.1                      | -                      | -                        | -                        |
| Pakistan                                   | 6.1                   | 6.7                   | 6.9                   | -                      | -                        | -                        | -                      | -                        | -                        |
| Philippines                                | 7.6                   | 8.0                   | 8.1                   | 0.6                    | 0.4                      | 0.5                      | -                      | -                        | -                        |
| Republic of Korea                          | 0.1                   | 0.1                   | 0.1                   | 9.9                    | 11.7                     | 12.0                     | -                      | -                        | -                        |
| Thailand                                   | 4.8                   | 4.2                   | 5.0                   | 0.2                    | 1.8                      | 1.2                      | 0.4                    | 0.1                      | 0.1                      |
| Turkey                                     | 6.0                   | 6.0                   | 6.0                   | 3.0                    | 4.3                      | 3.5                      | 0.6                    | 0.5                      | 0.5                      |
| Viet Nam                                   | 5.1                   | 4.8                   | 4.6                   | 9.2                    | 11.4                     | 11.3                     | 0.2                    | 0.3                      | 0.3                      |
| <b>AFRICA</b>                              | <b>82.9</b>           | <b>82.9</b>           | <b>88.5</b>           | <b>22.2</b>            | <b>25.6</b>              | <b>25.9</b>              | <b>3.9</b>             | <b>3.5</b>               | <b>4.7</b>               |
| Algeria                                    | -                     | -                     | -                     | 4.3                    | 5.3                      | 5.3                      | -                      | -                        | -                        |
| Egypt                                      | 7.9                   | 7.4                   | 7.5                   | 9.3                    | 10.6                     | 10.5                     | -                      | -                        | -                        |
| Ethiopia                                   | 8.6                   | 9.6                   | 9.6                   | -                      | -                        | -                        | 0.7                    | 0.8                      | 0.8                      |
| Kenya                                      | 3.5                   | 3.4                   | 3.7                   | 1.0                    | 1.2                      | 1.2                      | -                      | -                        | -                        |
| Morocco                                    | 0.1                   | -                     | -                     | 2.3                    | 3.1                      | 3.5                      | -                      | -                        | -                        |
| Nigeria                                    | 11.2                  | 12.7                  | 12.0                  | 0.4                    | 0.4                      | 0.4                      | 0.2                    | 0.2                      | 0.2                      |
| South Africa                               | 13.0                  | 11.8                  | 16.0                  | 1.1                    | 0.6                      | -                        | 1.7                    | 1.4                      | 2.5                      |
| United Republic of Tanzania                | 6.4                   | 5.7                   | 6.3                   | -                      | -                        | -                        | 0.4                    | 0.3                      | 0.3                      |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>32.4</b>           | <b>31.6</b>           | <b>32.0</b>           | <b>22.2</b>            | <b>24.3</b>              | <b>25.5</b>              | <b>1.3</b>             | <b>1.1</b>               | <b>1.0</b>               |
| Mexico                                     | 27.7                  | 27.2                  | 27.4                  | 15.5                   | 16.6                     | 18.0                     | 1.3                    | 1.1                      | 1.0                      |
| <b>SOUTH AMERICA</b>                       | <b>138.3</b>          | <b>171.1</b>          | <b>173.6</b>          | <b>14.0</b>            | <b>16.1</b>              | <b>15.7</b>              | <b>50.9</b>            | <b>79.3</b>              | <b>74.4</b>              |
| Argentina                                  | 44.3                  | 57.0                  | 58.5                  | -                      | -                        | -                        | 25.6                   | 39.1                     | 34.0                     |
| Brazil                                     | 80.6                  | 100.0                 | 102.5                 | 1.7                    | 1.5                      | 1.6                      | 23.5                   | 37.3                     | 37.8                     |
| Chile                                      | 1.1                   | 1.0                   | 0.8                   | 1.8                    | 2.6                      | 2.6                      | -                      | -                        | -                        |
| Colombia                                   | 1.5                   | 1.6                   | 1.4                   | 5.0                    | 6.2                      | 5.9                      | -                      | -                        | -                        |
| Peru                                       | 1.5                   | 1.5                   | 1.5                   | 3.4                    | 4.0                      | 3.8                      | -                      | -                        | -                        |
| Venezuela (Bolivarian Republic of)         | 1.3                   | 1.1                   | 0.8                   | 1.5                    | 1.5                      | 1.5                      | -                      | -                        | -                        |
| <b>NORTHERN AMERICA</b>                    | <b>387.3</b>          | <b>359.4</b>          | <b>388.0</b>          | <b>2.7</b>             | <b>3.3</b>               | <b>2.3</b>               | <b>61.6</b>            | <b>42.7</b>              | <b>60.6</b>              |
| Canada                                     | 14.0                  | 13.4                  | 14.0                  | 1.7                    | 2.2                      | 1.7                      | 2.0                    | 0.6                      | 1.1                      |
| United States of America                   | 373.4                 | 346.0                 | 373.9                 | 1.1                    | 1.1                      | 0.6                      | 59.7                   | 42.1                     | 59.5                     |
| <b>EUROPE</b>                              | <b>119.1</b>          | <b>132.7</b>          | <b>117.1</b>          | <b>19.4</b>            | <b>20.5</b>              | <b>25.0</b>              | <b>32.4</b>            | <b>42.6</b>              | <b>35.4</b>              |
| European Union                             | 65.8                  | 70.3                  | 60.4                  | 18.5                   | 19.5                     | 22.0                     | 2.7                    | 4.9                      | 3.0                      |
| Russian Federation                         | 13.3                  | 14.3                  | 14.0                  | 0.1                    | -                        | -                        | 4.7                    | 4.2                      | 4.0                      |
| Serbia                                     | 6.1                   | 7.3                   | 6.2                   | -                      | -                        | -                        | 1.9                    | 2.6                      | 2.0                      |
| Ukraine                                    | 29.5                  | 35.9                  | 33.0                  | 0.1                    | -                        | -                        | 22.8                   | 30.4                     | 26.0                     |
| <b>OCEANIA</b>                             | <b>0.6</b>            | <b>0.5</b>            | <b>0.4</b>            | <b>0.2</b>             | <b>0.2</b>               | <b>0.2</b>               | <b>0.1</b>             | -                        | -                        |
| <b>WORLD</b>                               | <b>1 116.1</b>        | <b>1 138.2</b>        | <b>1 160.3</b>        | <b>152.5</b>           | <b>173.6</b>             | <b>179.8</b>             | <b>154.7</b>           | <b>173.4</b>             | <b>179.8</b>             |
| LIFDC                                      | 87.7                  | 91.2                  | 90.8                  | 15.8                   | 18.7                     | 19.1                     | 2.8                    | 2.6                      | 2.6                      |
| LDC                                        | 50.9                  | 51.3                  | 53.9                  | 4.1                    | 4.2                      | 4.3                      | 4.1                    | 4.3                      | 4.1                      |



## APPENDIX TABLE 4(B): MAIZE STATISTICS

|                                            | Total Utilization      |                          |                          | Stocks ending in     |                       |                       | Per caput food use     |                          |                          |
|--------------------------------------------|------------------------|--------------------------|--------------------------|----------------------|-----------------------|-----------------------|------------------------|--------------------------|--------------------------|
|                                            | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2017-2019<br>average | 2020<br><i>estim.</i> | 2021<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                            | <i>million tonnes</i>  |                          |                          |                      |                       |                       | <i>Kg/year</i>         |                          |                          |
| <b>ASIA</b>                                | <b>423.1</b>           | <b>436.8</b>             | <b>450.1</b>             | <b>220.6</b>         | <b>218.9</b>          | <b>210.7</b>          | <b>9.3</b>             | <b>9.4</b>               | <b>9.4</b>               |
| China                                      | 268.6                  | 270.5                    | 282.1                    | 204.7                | 201.4                 | 192.6                 | 9.8                    | 9.8                      | 9.8                      |
| China (mainland)                           | 264.0                  | 265.3                    | 276.8                    | 204.3                | 200.9                 | 192.0                 | 9.9                    | 10.0                     | 9.9                      |
| Taiwan Province of China                   | 4.4                    | 5.2                      | 5.2                      | 0.4                  | 0.5                   | 0.5                   | 5.5                    | 5.5                      | 5.5                      |
| India                                      | 26.5                   | 27.9                     | 28.3                     | 1.7                  | 2.7                   | 2.2                   | 6.3                    | 6.4                      | 6.4                      |
| Indonesia                                  | 21.5                   | 23.9                     | 23.5                     | 1.9                  | 1.9                   | 1.9                   | 28.8                   | 29.2                     | 29.1                     |
| Iran (Islamic Republic of)                 | 9.4                    | 10.2                     | 10.2                     | 1.3                  | 1.9                   | 2.4                   | 0.9                    | 0.9                      | 0.9                      |
| Japan                                      | 15.7                   | 16.5                     | 16.0                     | 1.7                  | 2.0                   | 2.0                   | 0.8                    | 0.8                      | 0.8                      |
| Malaysia                                   | 3.8                    | 4.1                      | 4.2                      | 0.2                  | 0.2                   | 0.2                   | 1.9                    | 2.0                      | 2.0                      |
| Pakistan                                   | 6.3                    | 6.6                      | 6.9                      | 1.1                  | 0.8                   | 0.8                   | 7.9                    | 8.1                      | 7.9                      |
| Philippines                                | 8.1                    | 8.5                      | 8.6                      | 0.9                  | 1.0                   | 1.0                   | 18.6                   | 18.8                     | 18.7                     |
| Republic of Korea                          | 10.2                   | 10.9                     | 11.3                     | 1.1                  | 0.5                   | 0.9                   | 2.0                    | 2.0                      | 2.0                      |
| Thailand                                   | 4.7                    | 5.8                      | 6.1                      | 0.7                  | 0.8                   | 0.8                   | 1.2                    | 1.2                      | 1.2                      |
| Turkey                                     | 8.4                    | 9.0                      | 9.0                      | 1.0                  | 1.5                   | 1.5                   | 16.0                   | 15.8                     | 15.7                     |
| Viet Nam                                   | 14.2                   | 16.1                     | 15.8                     | 1.3                  | 0.8                   | 0.7                   | 7.8                    | 8.3                      | 8.4                      |
| <b>AFRICA</b>                              | <b>99.3</b>            | <b>106.2</b>             | <b>107.7</b>             | <b>20.1</b>          | <b>20.9</b>           | <b>22.8</b>           | <b>41.5</b>            | <b>42.9</b>              | <b>42.3</b>              |
| Algeria                                    | 4.3                    | 5.2                      | 5.4                      | 1.2                  | 1.3                   | 1.2                   | 3.4                    | 3.3                      | 3.2                      |
| Egypt                                      | 17.2                   | 17.8                     | 17.8                     | 1.5                  | 1.6                   | 1.8                   | 42.4                   | 41.8                     | 41.5                     |
| Ethiopia                                   | 7.6                    | 8.4                      | 8.7                      | 0.9                  | 1.6                   | 1.7                   | 45.3                   | 48.1                     | 48.9                     |
| Kenya                                      | 4.6                    | 4.7                      | 5.0                      | 0.5                  | 0.4                   | 0.4                   | 81.5                   | 82.5                     | 82.8                     |
| Morocco                                    | 2.3                    | 2.9                      | 3.4                      | 0.8                  | 1.2                   | 1.4                   | 10.3                   | 10.4                     | 10.4                     |
| Nigeria                                    | 11.2                   | 12.9                     | 12.2                     | 1.4                  | 2.0                   | 2.0                   | 35.4                   | 39.6                     | 39.5                     |
| South Africa                               | 12.0                   | 11.8                     | 12.2                     | 2.6                  | 1.8                   | 3.0                   | 88.9                   | 88.6                     | 87.7                     |
| United Republic of Tanzania                | 6.0                    | 6.0                      | 6.1                      | 1.4                  | 0.7                   | 0.6                   | 73.1                   | 73.5                     | 73.8                     |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>53.3</b>            | <b>55.9</b>              | <b>56.7</b>              | <b>7.1</b>           | <b>6.8</b>            | <b>6.5</b>            | <b>97.3</b>            | <b>97.8</b>              | <b>97.9</b>              |
| Mexico                                     | 41.7                   | 43.9                     | 44.4                     | 5.6                  | 5.6                   | 5.4                   | 135.5                  | 136.0                    | 136.1                    |
| <b>SOUTH AMERICA</b>                       | <b>101.1</b>           | <b>107.8</b>             | <b>117.0</b>             | <b>27.5</b>          | <b>28.4</b>           | <b>25.9</b>           | <b>23.0</b>            | <b>22.4</b>              | <b>22.3</b>              |
| Argentina                                  | 19.3                   | 19.8                     | 24.0                     | 8.0                  | 9.0                   | 7.5                   | 7.1                    | 7.1                      | 7.1                      |
| Brazil                                     | 58.6                   | 62.0                     | 67.5                     | 13.3                 | 14.0                  | 14.0                  | 24.3                   | 24.4                     | 24.4                     |
| Chile                                      | 2.9                    | 3.4                      | 3.4                      | 0.6                  | 0.6                   | 0.5                   | 20.8                   | 20.5                     | 20.3                     |
| Colombia                                   | 6.5                    | 7.5                      | 7.6                      | 0.5                  | 0.4                   | 0.3                   | 18.1                   | 18.3                     | 18.3                     |
| Peru                                       | 4.9                    | 5.5                      | 5.5                      | 0.3                  | 0.4                   | 0.2                   | 15.3                   | 16.0                     | 15.8                     |
| Venezuela (Bolivarian Republic of)         | 3.0                    | 2.6                      | 2.4                      | 0.6                  | 0.5                   | 0.4                   | 51.0                   | 42.1                     | 42.2                     |
| <b>NORTHERN AMERICA</b>                    | <b>326.8</b>           | <b>321.8</b>             | <b>325.9</b>             | <b>58.7</b>          | <b>53.2</b>           | <b>57.3</b>           | <b>14.8</b>            | <b>14.8</b>              | <b>14.8</b>              |
| Canada                                     | 14.0                   | 14.2                     | 14.7                     | 2.3                  | 2.6                   | 2.3                   | 3.2                    | 3.1                      | 3.1                      |
| United States of America                   | 312.7                  | 307.6                    | 311.2                    | 56.4                 | 50.7                  | 55.0                  | 16.1                   | 16.1                     | 16.2                     |
| <b>EUROPE</b>                              | <b>102.5</b>           | <b>113.9</b>             | <b>110.6</b>             | <b>24.1</b>          | <b>26.4</b>           | <b>22.4</b>           | <b>8.1</b>             | <b>8.1</b>               | <b>8.6</b>               |
| European Union                             | 79.0                   | 88.9                     | 83.6                     | 15.2                 | 16.0                  | 11.5                  | 9.5                    | 9.5                      | 10.5                     |
| Russian Federation                         | 8.3                    | 10.0                     | 10.0                     | 1.5                  | 1.8                   | 1.8                   | 1.4                    | 1.4                      | 1.4                      |
| Serbia                                     | 4.3                    | 4.3                      | 4.3                      | 0.6                  | 0.9                   | 0.8                   | 20.5                   | 21.0                     | 19.0                     |
| Ukraine                                    | 7.1                    | 6.7                      | 6.6                      | 3.8                  | 2.2                   | 2.6                   | 11.3                   | 11.3                     | 11.3                     |
| <b>OCEANIA</b>                             | <b>0.7</b>             | <b>0.6</b>               | <b>0.5</b>               | <b>0.1</b>           | <b>0.1</b>            | <b>0.1</b>            | <b>2.3</b>             | <b>2.2</b>               | <b>2.2</b>               |
| <b>WORLD</b>                               | <b>1 106.7</b>         | <b>1 143.1</b>           | <b>1 168.5</b>           | <b>358.3</b>         | <b>354.8</b>          | <b>345.8</b>          | <b>18.0</b>            | <b>18.4</b>              | <b>18.4</b>              |
| LIFDC                                      | 99.3                   | 106.8                    | 108.0                    | 15.4                 | 16.8                  | 16.1                  | 18.1                   | 18.8                     | 18.6                     |
| LDC                                        | 49.9                   | 52.0                     | 53.7                     | 9.1                  | 8.9                   | 9.2                   | 29.1                   | 29.5                     | 29.2                     |

## APPENDIX TABLE 5(A): BARLEY STATISTICS

|                                                         | Production            |                       |                       | Imports                |                          |                          | Exports                |                          |                          |
|---------------------------------------------------------|-----------------------|-----------------------|-----------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                                         | 2016-2018<br>average  | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                                         | <i>million tonnes</i> |                       |                       |                        |                          |                          |                        |                          |                          |
| <b>ASIA</b>                                             | <b>19.9</b>           | <b>23.2</b>           | <b>24.4</b>           | <b>22.3</b>            | <b>20.9</b>              | <b>21.2</b>              | <b>1.5</b>             | <b>1.3</b>               | <b>1.6</b>               |
| China                                                   | 1.1                   | 1.0                   | 0.9                   | 7.2                    | 5.3                      | 5.3                      | -                      | -                        | -                        |
| India                                                   | 1.6                   | 1.6                   | 1.7                   | 0.2                    | 0.3                      | 0.2                      | -                      | -                        | -                        |
| Iran (Islamic Republic of)                              | 3.2                   | 3.0                   | 3.0                   | 2.3                    | 3.2                      | 3.5                      | -                      | -                        | -                        |
| Iraq                                                    | 0.3                   | 1.5                   | 1.5                   | -                      | -                        | -                        | -                      | -                        | -                        |
| Japan                                                   | 0.2                   | 0.2                   | 0.2                   | 1.2                    | 1.1                      | 1.2                      | -                      | -                        | -                        |
| Kazakhstan                                              | 3.5                   | 3.8                   | 4.1                   | -                      | -                        | -                        | 1.3                    | 1.3                      | 1.5                      |
| Saudi Arabia                                            | -                     | -                     | -                     | 7.4                    | 6.7                      | 7.0                      | -                      | -                        | -                        |
| Syrian Arab Republic                                    | 0.6                   | 2.0                   | 2.3                   | 0.5                    | -                        | -                        | -                      | -                        | -                        |
| Turkey                                                  | 6.9                   | 7.6                   | 8.3                   | 0.5                    | 0.9                      | 0.2                      | 0.1                    | -                        | 0.1                      |
| <b>AFRICA</b>                                           | <b>6.3</b>            | <b>7.2</b>            | <b>5.9</b>            | <b>2.7</b>             | <b>3.4</b>               | <b>4.1</b>               | -                      | -                        | -                        |
| Algeria                                                 | 1.3                   | 2.0                   | 1.7                   | 0.5                    | 0.6                      | 0.6                      | -                      | -                        | -                        |
| Ethiopia                                                | 2.0                   | 2.4                   | 2.3                   | -                      | -                        | -                        | -                      | -                        | -                        |
| Libya                                                   | 0.1                   | 0.1                   | 0.1                   | 1.2                    | 1.0                      | 1.0                      | -                      | -                        | -                        |
| Morocco                                                 | 2.0                   | 1.2                   | 0.6                   | 0.4                    | 1.1                      | 1.6                      | -                      | -                        | -                        |
| Tunisia                                                 | 0.4                   | 0.9                   | 0.5                   | 0.6                    | 0.6                      | 0.7                      | -                      | -                        | -                        |
| <b>CENTRAL AMERICA &amp; THE<br/>CARIBBEAN</b>          | <b>1.0</b>            | <b>1.0</b>            | <b>0.8</b>            | -                      | -                        | <b>0.1</b>               | -                      | -                        | -                        |
| Mexico                                                  | 1.0                   | 1.0                   | 0.8                   | -                      | -                        | 0.1                      | -                      | -                        | -                        |
| <b>SOUTH AMERICA</b>                                    | <b>5.3</b>            | <b>5.3</b>            | <b>5.5</b>            | <b>1.2</b>             | <b>1.1</b>               | <b>1.0</b>               | <b>2.9</b>             | <b>2.3</b>               | <b>2.6</b>               |
| Argentina                                               | 4.0                   | 3.8                   | 4.0                   | -                      | -                        | -                        | 2.8                    | 2.3                      | 2.5                      |
| <b>NORTHERN AMERICA</b>                                 | <b>12.0</b>           | <b>14.1</b>           | <b>13.9</b>           | <b>0.2</b>             | <b>0.2</b>               | <b>0.2</b>               | <b>2.0</b>             | <b>2.2</b>               | <b>2.1</b>               |
| Canada                                                  | 8.4                   | 10.4                  | 10.3                  | 0.1                    | 0.1                      | -                        | 1.9                    | 2.1                      | 2.0                      |
| United States of America                                | 3.6                   | 3.8                   | 3.6                   | 0.2                    | 0.2                      | 0.2                      | 0.1                    | 0.1                      | 0.1                      |
| <b>EUROPE</b>                                           | <b>88.0</b>           | <b>95.6</b>           | <b>94.6</b>           | <b>0.7</b>             | <b>1.0</b>               | <b>1.9</b>               | <b>14.2</b>            | <b>17.7</b>              | <b>17.7</b>              |
| Belarus                                                 | 1.2                   | 1.1                   | 1.2                   | 0.2                    | 0.2                      | 0.2                      | -                      | -                        | -                        |
| European Union                                          | 58.4                  | 63.6                  | 55.4                  | 0.3                    | 0.6                      | 1.5                      | 5.2                    | 8.1                      | 6.5                      |
| Russian Federation                                      | 18.5                  | 20.5                  | 20.0                  | 0.2                    | -                        | -                        | 4.4                    | 4.5                      | 5.5                      |
| Ukraine                                                 | 8.3                   | 8.9                   | 8.2                   | -                      | -                        | -                        | 4.5                    | 5.0                      | 4.5                      |
| United Kingdom of Great Britain<br>and Northern Ireland | -                     | -                     | 8.4                   | -                      | -                        | -                        | -                      | -                        | 1.2                      |
| <b>OCEANIA</b>                                          | <b>10.9</b>           | <b>9.4</b>            | <b>11.6</b>           | -                      | -                        | -                        | <b>6.7</b>             | <b>3.0</b>               | <b>4.5</b>               |
| Australia                                               | 10.5                  | 9.0                   | 11.2                  | -                      | -                        | -                        | 6.7                    | 3.0                      | 4.5                      |
| <b>WORLD</b>                                            | <b>143.4</b>          | <b>155.8</b>          | <b>156.8</b>          | <b>27.2</b>            | <b>26.5</b>              | <b>28.5</b>              | <b>27.3</b>            | <b>26.5</b>              | <b>28.5</b>              |
| LIFDC                                                   | 5.3                   | 7.2                   | 7.4                   | 0.9                    | 0.5                      | 0.5                      | -                      | -                        | -                        |
| LDC                                                     | 2.3                   | 2.6                   | 2.6                   | -                      | -                        | -                        | -                      | -                        | -                        |

## APPENDIX TABLE 5(B): BARLEY STATISTICS

|                                                      | Total Utilization      |                          |                          | Stocks ending in     |                       |                       | Per caput food use          |                          |                          |
|------------------------------------------------------|------------------------|--------------------------|--------------------------|----------------------|-----------------------|-----------------------|-----------------------------|--------------------------|--------------------------|
|                                                      | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2017-2019<br>average | 2020<br><i>estim.</i> | 2021<br><i>f'cast</i> | 16/17-18/19<br>average      | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                                      | <i>million tonnes</i>  |                          |                          |                      |                       |                       | <i>(..... Kg/year.....)</i> |                          |                          |
| <b>ASIA</b>                                          | <b>41.5</b>            | <b>40.6</b>              | <b>42.3</b>              | <b>7.4</b>           | <b>8.5</b>            | <b>9.9</b>            | <b>0.7</b>                  | <b>0.6</b>               | <b>0.6</b>               |
| China                                                | 8.7                    | 6.0                      | 6.0                      | 0.6                  | 0.4                   | 0.3                   | 0.1                         | 0.1                      | 0.1                      |
| India                                                | 1.8                    | 1.8                      | 1.9                      | -                    | -                     | -                     | 1.2                         | 1.1                      | 1.1                      |
| Iran (Islamic Republic of)                           | 5.4                    | 5.8                      | 6.0                      | 0.9                  | 1.2                   | 1.7                   | 0.3                         | 0.3                      | 0.3                      |
| Iraq                                                 | 0.3                    | 1.4                      | 1.5                      | -                    | 0.2                   | 0.2                   | 3.5                         | 3.6                      | 3.5                      |
| Japan                                                | 1.4                    | 1.3                      | 1.4                      | 0.2                  | 0.2                   | 0.2                   | 2.4                         | 2.4                      | 2.4                      |
| Kazakhstan                                           | 2.2                    | 2.3                      | 2.5                      | 0.2                  | 0.3                   | 0.4                   | 1.1                         | 1.1                      | 1.1                      |
| Saudi Arabia                                         | 8.1                    | 7.1                      | 7.2                      | 2.6                  | 1.7                   | 1.5                   | 0.8                         | 0.8                      | 0.8                      |
| Syrian Arab Republic                                 | 1.1                    | 1.4                      | 1.8                      | 0.4                  | 1.1                   | 1.6                   | 16.3                        | 16.4                     | 16.0                     |
| Turkey                                               | 7.3                    | 8.0                      | 8.1                      | 1.0                  | 1.5                   | 1.8                   | 1.0                         | 1.0                      | 1.0                      |
| <b>AFRICA</b>                                        | <b>9.2</b>             | <b>10.5</b>              | <b>10.5</b>              | <b>1.6</b>           | <b>2.1</b>            | <b>1.7</b>            | <b>2.6</b>                  | <b>2.7</b>               | <b>2.6</b>               |
| Algeria                                              | 1.7                    | 2.5                      | 2.4                      | 0.5                  | 0.9                   | 0.8                   | 12.1                        | 11.6                     | 11.4                     |
| Ethiopia                                             | 2.0                    | 2.3                      | 2.3                      | 0.1                  | -                     | -                     | 17.1                        | 17.9                     | 17.2                     |
| Libya                                                | 1.3                    | 1.1                      | 1.1                      | -                    | -                     | -                     | 13.0                        | 12.7                     | 12.5                     |
| Morocco                                              | 2.6                    | 2.5                      | 2.5                      | 0.4                  | 0.4                   | 0.2                   | 19.7                        | 19.6                     | 19.5                     |
| Tunisia                                              | 1.0                    | 1.4                      | 1.3                      | 0.4                  | 0.5                   | 0.4                   | 7.9                         | 7.7                      | 7.6                      |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b>           | <b>1.0</b>             | <b>1.0</b>               | <b>0.9</b>               | <b>0.1</b>           | <b>0.1</b>            | <b>0.1</b>            | -                           | -                        | -                        |
| Mexico                                               | 1.0                    | 1.0                      | 0.9                      | 0.1                  | 0.1                   | 0.1                   | -                           | -                        | -                        |
| <b>SOUTH AMERICA</b>                                 | <b>3.8</b>             | <b>4.0</b>               | <b>3.9</b>               | <b>0.6</b>           | <b>0.6</b>            | <b>0.6</b>            | <b>0.5</b>                  | <b>0.5</b>               | <b>0.5</b>               |
| Argentina                                            | 1.3                    | 1.4                      | 1.3                      | 0.4                  | 0.5                   | 0.5                   | -                           | -                        | -                        |
| <b>NORTHERN AMERICA</b>                              | <b>10.5</b>            | <b>12.0</b>              | <b>11.6</b>              | <b>3.5</b>           | <b>2.7</b>            | <b>2.8</b>            | <b>0.5</b>                  | <b>0.5</b>               | <b>0.5</b>               |
| Canada                                               | 6.7                    | 8.1                      | 8.0                      | 1.4                  | 1.0                   | 1.1                   | 0.3                         | 0.3                      | 0.3                      |
| United States of America                             | 3.8                    | 3.9                      | 3.7                      | 2.1                  | 1.7                   | 1.7                   | 0.6                         | 0.6                      | 0.6                      |
| <b>EUROPE</b>                                        | <b>74.5</b>            | <b>75.1</b>              | <b>78.8</b>              | <b>11.0</b>          | <b>14.8</b>           | <b>14.9</b>           | <b>1.1</b>                  | <b>1.1</b>               | <b>1.2</b>               |
| Belarus                                              | 1.5                    | 1.4                      | 1.4                      | 0.8                  | 0.5                   | 0.4                   | -                           | -                        | -                        |
| European Union                                       | 53.4                   | 54.0                     | 50.9                     | 6.7                  | 9.6                   | 8.0                   | 0.7                         | 0.7                      | 0.8                      |
| Russian Federation                                   | 14.4                   | 14.5                     | 14.7                     | 2.0                  | 2.7                   | 2.6                   | 1.8                         | 1.8                      | 1.8                      |
| Ukraine                                              | 3.8                    | 3.8                      | 3.7                      | 1.2                  | 1.5                   | 1.5                   | 2.7                         | 2.6                      | 2.6                      |
| United Kingdom of Great Britain and Northern Ireland | -                      | -                        | 6.7                      | -                    | -                     | 1.9                   | -                           | -                        | 1.5                      |
| <b>OCEANIA</b>                                       | <b>4.2</b>             | <b>4.8</b>               | <b>5.4</b>               | <b>2.4</b>           | <b>4.2</b>            | <b>5.9</b>            | <b>0.1</b>                  | <b>0.1</b>               | <b>0.1</b>               |
| Australia                                            | 3.8                    | 4.4                      | 5.0                      | 2.4                  | 4.2                   | 5.9                   | 0.2                         | 0.2                      | 0.2                      |
| <b>WORLD</b>                                         | <b>144.7</b>           | <b>148.0</b>             | <b>153.3</b>             | <b>26.6</b>          | <b>33.1</b>           | <b>35.9</b>           | <b>1.0</b>                  | <b>1.0</b>               | <b>1.0</b>               |
| LIFDC                                                | 6.2                    | 6.7                      | 7.2                      | 1.2                  | 2.2                   | 2.9                   | 1.5                         | 1.5                      | 1.5                      |
| LDC                                                  | 2.3                    | 2.6                      | 2.6                      | 0.1                  | 0.1                   | 0.1                   | 1.9                         | 2.0                      | 2.0                      |

## APPENDIX TABLE 6(A): SORGHUM STATISTICS

|                                                | Production            |                       |                       | Imports                |                          |                          | Exports                |                          |                          |
|------------------------------------------------|-----------------------|-----------------------|-----------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                                | 2016-2018<br>average  | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                                | <i>million tonnes</i> |                       |                       |                        |                          |                          |                        |                          |                          |
| <b>ASIA</b>                                    | <b>8.2</b>            | <b>7.5</b>            | <b>8.9</b>            | <b>4.5</b>             | <b>3.8</b>               | <b>6.0</b>               | <b>0.1</b>             | <b>0.1</b>               | <b>0.1</b>               |
| China                                          | 2.8                   | 3.1                   | 3.3                   | 3.9                    | 3.2                      | 5.4                      | -                      | -                        | -                        |
| India                                          | 4.5                   | 3.5                   | 4.7                   | -                      | -                        | -                        | 0.1                    | -                        | 0.1                      |
| Japan                                          | -                     | -                     | -                     | 0.6                    | 0.4                      | 0.5                      | -                      | -                        | -                        |
| <b>AFRICA</b>                                  | <b>28.6</b>           | <b>28.3</b>           | <b>28.3</b>           | <b>0.9</b>             | <b>1.0</b>               | <b>1.0</b>               | <b>0.9</b>             | <b>0.7</b>               | <b>0.7</b>               |
| Burkina Faso                                   | 1.7                   | 1.9                   | 1.6                   | -                      | -                        | -                        | -                      | -                        | -                        |
| Ethiopia                                       | 5.0                   | 5.3                   | 5.3                   | -                      | -                        | -                        | 0.4                    | 0.5                      | 0.5                      |
| Nigeria                                        | 6.5                   | 6.7                   | 6.4                   | -                      | -                        | -                        | -                      | -                        | -                        |
| Sudan                                          | 5.3                   | 4.0                   | 4.7                   | 0.2                    | 0.3                      | 0.3                      | 0.3                    | -                        | -                        |
| <b>CENTRAL AMERICA &amp; THE<br/>CARIBBEAN</b> | <b>5.1</b>            | <b>4.7</b>            | <b>5.8</b>            | <b>0.4</b>             | <b>0.9</b>               | <b>0.2</b>               | -                      | -                        | -                        |
| Mexico                                         | 4.8                   | 4.4                   | 5.5                   | 0.4                    | 0.9                      | 0.2                      | -                      | -                        | -                        |
| <b>SOUTH AMERICA</b>                           | <b>5.2</b>            | <b>5.0</b>            | <b>5.6</b>            | <b>0.1</b>             | -                        | <b>0.1</b>               | <b>0.3</b>             | <b>0.4</b>               | <b>0.5</b>               |
| Argentina                                      | 2.4                   | 1.6                   | 1.8                   | -                      | -                        | -                        | 0.3                    | 0.3                      | 0.5                      |
| Brazil                                         | 1.7                   | 2.2                   | 2.5                   | -                      | -                        | -                        | -                      | -                        | -                        |
| Venezuela (Bolivarian Republic of)             | -                     | -                     | -                     | -                      | -                        | -                        | -                      | -                        | -                        |
| <b>NORTHERN AMERICA</b>                        | <b>10.2</b>           | <b>8.7</b>            | <b>9.4</b>            | <b>0.1</b>             | -                        | -                        | <b>4.8</b>             | <b>4.8</b>               | <b>6.0</b>               |
| United States of America                       | 10.2                  | 8.7                   | 9.4                   | 0.1                    | -                        | -                        | 4.8                    | 4.8                      | 6.0                      |
| <b>EUROPE</b>                                  | <b>1.1</b>            | <b>1.3</b>            | <b>1.5</b>            | <b>0.5</b>             | <b>0.1</b>               | <b>0.1</b>               | <b>0.1</b>             | <b>0.2</b>               | <b>0.1</b>               |
| European Union                                 | 0.7                   | 1.0                   | 1.3                   | 0.5                    | 0.1                      | 0.1                      | -                      | -                        | -                        |
| <b>OCEANIA</b>                                 | <b>1.4</b>            | <b>1.2</b>            | <b>0.3</b>            | <b>0.1</b>             | -                        | -                        | <b>0.4</b>             | <b>0.1</b>               | <b>0.1</b>               |
| Australia                                      | 1.4                   | 1.2                   | 0.3                   | -                      | -                        | -                        | 0.4                    | 0.1                      | 0.1                      |
| <b>WORLD</b>                                   | <b>59.9</b>           | <b>56.7</b>           | <b>59.9</b>           | <b>6.5</b>             | <b>5.8</b>               | <b>7.5</b>               | <b>6.8</b>             | <b>6.2</b>               | <b>7.5</b>               |
| LIFDC                                          | 26.0                  | 24.5                  | 25.9                  | 0.8                    | 0.9                      | 0.9                      | 0.9                    | 0.7                      | 0.8                      |
| LDC                                            | 20.2                  | 19.8                  | 20.0                  | 0.6                    | 0.7                      | 0.7                      | 0.8                    | 0.7                      | 0.6                      |

APPENDIX TABLE 7(A): OTHER COARSE GRAIN STATISTICS: MILLET - RYE  
- OATS AND OTHER GRAINS

|                                 | Production            |                       |                       | Imports                |                          |                          | Exports                |                          |                          |
|---------------------------------|-----------------------|-----------------------|-----------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                 | 2016-2018<br>average  | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                 | <i>million tonnes</i> |                       |                       |                        |                          |                          |                        |                          |                          |
| ASIA                            | 19.2                  | 17.9                  | 20.5                  | 0.8                    | 0.7                      | 0.8                      | 0.2                    | 0.2                      | 0.3                      |
| AFRICA                          | 20.9                  | 21.3                  | 21.7                  | 0.2                    | 0.2                      | 0.2                      | 0.4                    | 0.5                      | 0.4                      |
| CENTRAL AMERICA & THE CARIBBEAN | 0.1                   | -                     | 0.1                   | 0.2                    | 0.1                      | 0.2                      | -                      | -                        | -                        |
| SOUTH AMERICA                   | 2.5                   | 2.8                   | 2.8                   | 0.2                    | 0.1                      | 0.2                      | 0.1                    | -                        | 0.1                      |
| NORTHERN AMERICA                | 5.6                   | 6.3                   | 6.9                   | 1.8                    | 1.9                      | 2.0                      | 2.1                    | 2.2                      | 2.2                      |
| EUROPE                          | 44.1                  | 43.7                  | 47.4                  | 0.5                    | 0.3                      | 0.6                      | 0.8                    | 0.9                      | 0.8                      |
| OCEANIA                         | 1.8                   | 1.1                   | 2.0                   | -                      | 0.1                      | 0.1                      | 0.4                    | 0.2                      | 0.3                      |
| <b>WORLD</b>                    | <b>94.1</b>           | <b>93.3</b>           | <b>101.3</b>          | <b>3.8</b>             | <b>3.7</b>               | <b>4.0</b>               | <b>3.9</b>             | <b>3.9</b>               | <b>4.0</b>               |

## APPENDIX TABLE 6(B): SORGHUM STATISTICS

|                                            | Total Utilization      |                          |                          | Stocks ending in     |                       |                       | Per caput food use          |                          |                          |
|--------------------------------------------|------------------------|--------------------------|--------------------------|----------------------|-----------------------|-----------------------|-----------------------------|--------------------------|--------------------------|
|                                            | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2017-2019<br>average | 2020<br><i>estim.</i> | 2021<br><i>f'cast</i> | 16/17-18/19<br>average      | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                            | <i>million tonnes</i>  |                          |                          |                      |                       |                       | <i>(..... Kg/year.....)</i> |                          |                          |
| <b>ASIA</b>                                | <b>12.5</b>            | <b>10.4</b>              | <b>14.8</b>              | <b>1.0</b>           | <b>2.2</b>            | <b>1.9</b>            | <b>1.2</b>                  | <b>1.0</b>               | <b>1.2</b>               |
| China                                      | 6.3                    | 5.4                      | 8.7                      | 0.7                  | 1.9                   | 1.6                   | 0.4                         | 0.5                      | 0.5                      |
| India                                      | 4.5                    | 3.5                      | 4.6                      | 0.1                  | -                     | -                     | 3.3                         | 2.6                      | 3.3                      |
| Japan                                      | 0.6                    | 0.5                      | 0.5                      | 0.1                  | 0.1                   | 0.1                   | -                           | -                        | -                        |
| <b>AFRICA</b>                              | <b>28.4</b>            | <b>29.1</b>              | <b>28.6</b>              | <b>4.0</b>           | <b>3.5</b>            | <b>3.4</b>            | <b>18.2</b>                 | <b>18.3</b>              | <b>17.3</b>              |
| Burkina Faso                               | 1.6                    | 1.8                      | 1.5                      | 0.4                  | 0.5                   | 0.5                   | 77.1                        | 85.8                     | 68.7                     |
| Ethiopia                                   | 4.5                    | 4.7                      | 4.8                      | 0.7                  | 0.8                   | 0.8                   | 31.9                        | 31.9                     | 31.5                     |
| Nigeria                                    | 6.5                    | 6.6                      | 6.3                      | 0.1                  | -                     | -                     | 31.9                        | 31.0                     | 28.8                     |
| Sudan                                      | 5.0                    | 4.8                      | 5.0                      | 0.8                  | 0.1                   | 0.1                   | 94.3                        | 96.0                     | 94.2                     |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>5.5</b>             | <b>5.7</b>               | <b>6.0</b>               | <b>0.4</b>           | <b>0.5</b>            | <b>0.6</b>            | <b>0.5</b>                  | <b>0.5</b>               | <b>0.5</b>               |
| Mexico                                     | 5.1                    | 5.4                      | 5.6                      | 0.3                  | 0.4                   | 0.5                   | -                           | -                        | -                        |
| <b>SOUTH AMERICA</b>                       | <b>5.1</b>             | <b>4.9</b>               | <b>5.3</b>               | <b>0.8</b>           | <b>0.6</b>            | <b>0.5</b>            | <b>0.0</b>                  | <b>0.0</b>               | <b>0.0</b>               |
| Argentina                                  | 2.2                    | 1.4                      | 1.5                      | 0.3                  | 0.1                   | 0.1                   | -                           | -                        | -                        |
| Brazil                                     | 1.7                    | 2.2                      | 2.5                      | 0.2                  | 0.2                   | 0.2                   | -                           | -                        | -                        |
| Venezuela (Bolivarian Republic of)         | 0.1                    | -                        | -                        | -                    | -                     | -                     | -                           | -                        | -                        |
| <b>NORTHERN AMERICA</b>                    | <b>5.5</b>             | <b>4.4</b>               | <b>2.8</b>               | <b>1.1</b>           | <b>0.8</b>            | <b>0.8</b>            | <b>0.1</b>                  | <b>0.1</b>               | <b>0.1</b>               |
| United States of America                   | 5.5                    | 4.4                      | 2.8                      | 1.1                  | 0.7                   | 0.8                   | 0.1                         | 0.1                      | 0.1                      |
| <b>EUROPE</b>                              | <b>1.3</b>             | <b>0.9</b>               | <b>0.9</b>               | <b>0.4</b>           | <b>1.0</b>            | <b>1.7</b>            | <b>0.2</b>                  | <b>0.2</b>               | <b>0.2</b>               |
| European Union                             | 1.0                    | 0.7                      | 0.7                      | 0.4                  | 1.0                   | 1.7                   | 0.3                         | 0.3                      | 0.3                      |
| <b>OCEANIA</b>                             | <b>0.9</b>             | <b>0.9</b>               | <b>0.6</b>               | <b>0.8</b>           | <b>0.9</b>            | <b>0.5</b>            | <b>0.2</b>                  | <b>0.2</b>               | <b>0.2</b>               |
| Australia                                  | 0.8                    | 0.9                      | 0.6                      | 0.8                  | 0.8                   | 0.5                   | -                           | -                        | -                        |
| <b>WORLD</b>                               | <b>59.2</b>            | <b>56.3</b>              | <b>59.0</b>              | <b>8.6</b>           | <b>9.4</b>            | <b>9.4</b>            | <b>3.8</b>                  | <b>3.7</b>               | <b>3.7</b>               |
| LIFDC                                      | 25.7                   | 25.3                     | 26.1                     | 4.1                  | 3.4                   | 3.4                   | 8.2                         | 8.0                      | 8.1                      |
| LDC                                        | 19.8                   | 20.3                     | 20.1                     | 3.8                  | 3.3                   | 3.2                   | 15.3                        | 15.6                     | 14.9                     |

## APPENDIX TABLE 7(B): OTHER COARSE GRAIN STATISTICS: MILLET - RYE - OATS AND OTHER GRAINS

|                                 | Total Utilization     |                          |                          | Stocks ending in     |                       |                       | Per caput food use          |                          |                          |
|---------------------------------|-----------------------|--------------------------|--------------------------|----------------------|-----------------------|-----------------------|-----------------------------|--------------------------|--------------------------|
|                                 | 18/19<br>average      | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2017-2019<br>average | 2020<br><i>estim.</i> | 2021<br><i>f'cast</i> | 16/17-18/19<br>average      | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                 | <i>million tonnes</i> |                          |                          |                      |                       |                       | <i>(..... Kg/year.....)</i> |                          |                          |
| ASIA                            | 20.5                  | 18.8                     | 20.8                     | 1.4                  | 0.9                   | 1.0                   | 3.4                         | 3.3                      | 3.4                      |
| AFRICA                          | 19.4                  | 20.8                     | 21.1                     | 6.8                  | 8.6                   | 8.9                   | 12.0                        | 12.3                     | 12.2                     |
| CENTRAL AMERICA & THE CARIBBEAN | 0.3                   | 0.2                      | 0.2                      | -                    | -                     | -0.1                  | 0.2                         | 0.3                      | 0.3                      |
| SOUTH AMERICA                   | 2.5                   | 2.9                      | 2.9                      | 0.2                  | 0.2                   | 0.2                   | 1.2                         | 1.2                      | 1.2                      |
| NORTHERN AMERICA                | 5.6                   | 6.1                      | 6.3                      | 1.4                  | 1.0                   | 1.4                   | 2.6                         | 2.6                      | 2.6                      |
| EUROPE                          | 45.7                  | 42.3                     | 43.0                     | 7.1                  | 5.8                   | 10.2                  | 10.9                        | 10.9                     | 11.3                     |
| OCEANIA                         | 1.5                   | 1.2                      | 1.6                      | 0.2                  | 0.1                   | 0.3                   | 5.4                         | 5.3                      | 5.2                      |
| <b>WORLD</b>                    | <b>95.6</b>           | <b>92.2</b>              | <b>95.9</b>              | <b>16.8</b>          | <b>16.6</b>           | <b>21.9</b>           | <b>5.3</b>                  | <b>5.3</b>               | <b>5.5</b>               |

## APPENDIX TABLE 8(A): RICE STATISTICS

|                                                      | Production                               |                       |                       | Imports              |                       |                       | Exports              |                       |                       |
|------------------------------------------------------|------------------------------------------|-----------------------|-----------------------|----------------------|-----------------------|-----------------------|----------------------|-----------------------|-----------------------|
|                                                      | 2016-2018<br>average                     | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2017-2019<br>average | 2020<br><i>estim.</i> | 2021<br><i>f'cast</i> | 2017-2019<br>average | 2020<br><i>estim.</i> | 2021<br><i>f'cast</i> |
|                                                      | <i>million tonnes, milled equivalent</i> |                       |                       |                      |                       |                       |                      |                       |                       |
| <b>ASIA</b>                                          | <b>450.0</b>                             | <b>451.2</b>          | <b>456.5</b>          | <b>21.4</b>          | <b>18.8</b>           | <b>19.4</b>           | <b>39.1</b>          | <b>36.2</b>           | <b>39.5</b>           |
| Bangladesh                                           | 35.3                                     | 36.9                  | 36.8                  | 1.4                  | 0.3                   | 0.4                   | -                    | -                     | -                     |
| China                                                | 146.5                                    | 144.9                 | 145.5                 | 5.2                  | 3.2                   | 3.0                   | 2.0                  | 2.9                   | 3.2                   |
| China (mainland)                                     | 145.2                                    | 143.6                 | 144.2                 | 4.8                  | 2.7                   | 2.6                   | 2.0                  | 2.7                   | 3.1                   |
| Taiwan Province of China                             | 1.3                                      | 1.3                   | 1.3                   | 0.1                  | 0.1                   | 0.1                   | 0.1                  | 0.2                   | 0.1                   |
| India                                                | 113.0                                    | 118.4                 | 121.5                 | -                    | -                     | -                     | 11.5                 | 12.2                  | 13.4                  |
| Indonesia                                            | 37.5                                     | 35.0                  | 35.3                  | 1.0                  | 0.4                   | 0.5                   | -                    | -                     | -                     |
| Iran (Islamic Republic of)                           | 1.9                                      | 2.0                   | 2.1                   | 1.4                  | 1.2                   | 1.2                   | -                    | -                     | -                     |
| Iraq                                                 | 0.2                                      | 0.3                   | 0.4                   | 1.2                  | 1.0                   | 1.1                   | -                    | -                     | -                     |
| Japan                                                | 7.5                                      | 7.4                   | 7.4                   | 0.7                  | 0.7                   | 0.7                   | 0.1                  | -                     | -                     |
| Malaysia                                             | 1.7                                      | 1.7                   | 1.7                   | 1.1                  | 1.3                   | 1.3                   | -                    | -                     | -                     |
| Myanmar                                              | 15.7                                     | 15.2                  | 15.1                  | -                    | -                     | -                     | 2.7                  | 2.6                   | 2.2                   |
| Pakistan                                             | 7.2                                      | 7.4                   | 7.7                   | -                    | -                     | -                     | 4.1                  | 4.1                   | 4.6                   |
| Philippines                                          | 12.3                                     | 12.4                  | 12.5                  | 2.1                  | 2.9                   | 3.1                   | -                    | -                     | -                     |
| Republic of Korea                                    | 4.0                                      | 3.7                   | 3.6                   | 0.4                  | 0.5                   | 0.4                   | 0.1                  | 0.1                   | -                     |
| Saudi Arabia                                         | -                                        | -                     | -                     | 1.2                  | 1.4                   | 1.4                   | -                    | -                     | -                     |
| Sri Lanka                                            | 2.4                                      | 3.1                   | 3.4                   | 0.5                  | -                     | 0.1                   | -                    | -                     | -                     |
| Thailand                                             | 21.4                                     | 18.7                  | 19.4                  | 0.3                  | 0.4                   | 0.3                   | 10.1                 | 6.0                   | 7.1                   |
| Viet Nam                                             | 28.2                                     | 28.2                  | 28.2                  | 0.6                  | 0.4                   | 0.5                   | 6.8                  | 6.7                   | 7.1                   |
| <b>AFRICA</b>                                        | <b>22.8</b>                              | <b>24.1</b>           | <b>24.1</b>           | <b>16.7</b>          | <b>15.6</b>           | <b>17.8</b>           | <b>0.6</b>           | <b>0.4</b>            | <b>0.4</b>            |
| Cote D'ivoire                                        | 1.2                                      | 1.1                   | 1.2                   | 1.5                  | 1.1                   | 1.5                   | -                    | -                     | -                     |
| Egypt                                                | 4.3                                      | 4.6                   | 4.5                   | 0.3                  | 0.3                   | 0.1                   | 0.2                  | -                     | -                     |
| Madagascar                                           | 2.3                                      | 2.6                   | 2.5                   | 0.5                  | 0.4                   | 0.4                   | -                    | -                     | -                     |
| Nigeria                                              | 4.8                                      | 5.1                   | 4.8                   | 2.5                  | 1.8                   | 2.2                   | -                    | -                     | -                     |
| Senegal                                              | 0.7                                      | 0.8                   | 0.9                   | 1.3                  | 1.3                   | 1.5                   | -                    | -                     | -                     |
| South Africa                                         | -                                        | -                     | -                     | 0.9                  | 0.9                   | 1.0                   | -                    | -                     | -                     |
| United Republic of Tanzania                          | 2.0                                      | 2.0                   | 2.3                   | 0.2                  | 0.2                   | 0.3                   | 0.2                  | 0.3                   | 0.2                   |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b>           | <b>1.9</b>                               | <b>1.9</b>            | <b>1.9</b>            | <b>2.5</b>           | <b>2.6</b>            | <b>2.5</b>            | <b>0.1</b>           | <b>0.1</b>            | <b>-</b>              |
| Cuba                                                 | 0.3                                      | 0.3                   | 0.2                   | 0.5                  | 0.6                   | 0.5                   | -                    | -                     | -                     |
| Mexico                                               | 0.2                                      | 0.2                   | 0.2                   | 0.8                  | 0.8                   | 0.8                   | 0.1                  | -                     | -                     |
| <b>SOUTH AMERICA</b>                                 | <b>16.5</b>                              | <b>15.5</b>           | <b>16.5</b>           | <b>1.9</b>           | <b>1.9</b>            | <b>2.0</b>            | <b>3.4</b>           | <b>3.9</b>            | <b>3.5</b>            |
| Argentina                                            | 0.9                                      | 0.8                   | 0.8                   | -                    | -                     | -                     | 0.4                  | 0.4                   | 0.4                   |
| Brazil                                               | 7.9                                      | 7.1                   | 7.6                   | 0.7                  | 0.7                   | 0.8                   | 0.9                  | 1.2                   | 0.8                   |
| Peru                                                 | 2.2                                      | 2.2                   | 2.3                   | 0.3                  | 0.3                   | 0.3                   | 0.1                  | 0.1                   | 0.1                   |
| Uruguay                                              | 0.9                                      | 0.8                   | 0.8                   | -                    | -                     | -                     | 0.9                  | 0.8                   | 0.8                   |
| <b>NORTHERN AMERICA</b>                              | <b>6.6</b>                               | <b>5.9</b>            | <b>7.2</b>            | <b>1.3</b>           | <b>1.6</b>            | <b>1.6</b>            | <b>3.1</b>           | <b>3.1</b>            | <b>3.1</b>            |
| Canada                                               | -                                        | -                     | -                     | 0.4                  | 0.4                   | 0.4                   | -                    | -                     | -                     |
| United States of America                             | 6.6                                      | 5.9                   | 7.2                   | 0.9                  | 1.2                   | 1.2                   | 3.1                  | 3.1                   | 3.1                   |
| <b>EUROPE</b>                                        | <b>2.5</b>                               | <b>2.5</b>            | <b>2.5</b>            | <b>2.6</b>           | <b>3.1</b>            | <b>3.1</b>            | <b>0.5</b>           | <b>0.6</b>            | <b>0.6</b>            |
| European Union                                       | 1.7                                      | 1.7                   | 1.8                   | 2.0                  | 1.9                   | 1.9                   | 0.3                  | 0.5                   | 0.5                   |
| Russian Federation                                   | 0.7                                      | 0.7                   | 0.7                   | 0.2                  | 0.2                   | 0.2                   | 0.1                  | 0.1                   | 0.1                   |
| United Kingdom of Great Britain and Northern Ireland | -                                        | -                     | -                     | -                    | 0.6                   | 0.6                   | -                    | -                     | -                     |
| <b>OCEANIA</b>                                       | <b>0.4</b>                               | <b>0.1</b>            | <b>-</b>              | <b>0.7</b>           | <b>0.8</b>            | <b>0.8</b>            | <b>0.2</b>           | <b>0.1</b>            | <b>0.1</b>            |
| Australia                                            | 0.4                                      | -                     | -                     | 0.2                  | 0.3                   | 0.2                   | 0.2                  | 0.1                   | -                     |
| <b>WORLD</b>                                         | <b>500.7</b>                             | <b>501.1</b>          | <b>508.7</b>          | <b>47.0</b>          | <b>44.4</b>           | <b>47.2</b>           | <b>47.0</b>          | <b>44.4</b>           | <b>47.2</b>           |
| LIFDC                                                | 196.0                                    | 204.5                 | 207.4                 | 16.2                 | 14.5                  | 16.9                  | 18.7                 | 19.2                  | 20.9                  |
| LDC                                                  | 75.1                                     | 77.1                  | 77.5                  | 12.2                 | 11.1                  | 12.5                  | 4.8                  | 4.5                   | 4.3                   |

## APPENDIX TABLE 8(B): RICE STATISTICS

|                                                      | Total Utilization                        |                          |                          | Stocks ending in     |                       |                       | Per caput food use     |                          |                          |
|------------------------------------------------------|------------------------------------------|--------------------------|--------------------------|----------------------|-----------------------|-----------------------|------------------------|--------------------------|--------------------------|
|                                                      | 16/17-18/19<br>average                   | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2017-2019<br>average | 2020<br><i>estim.</i> | 2021<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                                                      | <i>million tonnes, milled equivalent</i> |                          |                          |                      |                       |                       | <i>Kg/year</i>         |                          |                          |
| <b>ASIA</b>                                          | <b>428.8</b>                             | <b>433.2</b>             | <b>439.2</b>             | <b>166.6</b>         | <b>173.2</b>          | <b>172.3</b>          | <b>76.3</b>            | <b>76.7</b>              | <b>77.2</b>              |
| Bangladesh                                           | 36.5                                     | 37.3                     | 37.7                     | 6.4                  | 6.5                   | 6.3                   | 179.9                  | 180.7                    | 181.3                    |
| China                                                | 147.2                                    | 147.5                    | 148.6                    | 103.8                | 103.7                 | 100.6                 | 76.0                   | 75.9                     | 75.9                     |
| China (mainland)                                     | 145.6                                    | 145.8                    | 146.9                    | 103.5                | 103.4                 | 100.3                 | 76.6                   | 76.6                     | 76.6                     |
| Taiwan Province of China                             | 1.3                                      | 1.3                      | 1.3                      | 0.3                  | 0.3                   | 0.3                   | 48.1                   | 48.1                     | 48.2                     |
| India                                                | 98.2                                     | 102.7                    | 106.4                    | 23.4                 | 32.7                  | 35.2                  | 68.2                   | 69.8                     | 71.3                     |
| Indonesia                                            | 38.5                                     | 37.5                     | 36.9                     | 7.2                  | 6.0                   | 4.8                   | 127.4                  | 125.6                    | 124.9                    |
| Iran (Islamic Republic of)                           | 3.2                                      | 3.3                      | 3.3                      | 0.7                  | 0.7                   | 0.7                   | 34.8                   | 35.1                     | 35.1                     |
| Iraq                                                 | 1.3                                      | 1.4                      | 1.4                      | 0.1                  | -                     | 0.1                   | 33.6                   | 34.5                     | 34.7                     |
| Japan                                                | 8.2                                      | 7.9                      | 8.0                      | 3.1                  | 3.2                   | 3.3                   | 49.7                   | 49.7                     | 49.4                     |
| Malaysia                                             | 2.8                                      | 2.8                      | 2.9                      | 0.4                  | 0.2                   | 0.3                   | 81.6                   | 81.9                     | 81.5                     |
| Myanmar                                              | 13.3                                     | 12.9                     | 13.0                     | 3.2                  | 3.0                   | 2.8                   | 180.9                  | 179.5                    | 179.7                    |
| Pakistan                                             | 3.1                                      | 3.2                      | 3.4                      | 0.5                  | 0.6                   | 0.7                   | 12.2                   | 12.2                     | 12.3                     |
| Philippines                                          | 14.2                                     | 15.4                     | 15.5                     | 2.3                  | 2.1                   | 2.2                   | 115.9                  | 121.5                    | 122.1                    |
| Republic of Korea                                    | 4.8                                      | 4.2                      | 4.0                      | 1.6                  | 0.9                   | 0.9                   | 75.0                   | 72.8                     | 71.3                     |
| Saudi Arabia                                         | 1.3                                      | 1.2                      | 1.3                      | 0.3                  | 0.2                   | 0.2                   | 39.2                   | 35.9                     | 36.5                     |
| Sri Lanka                                            | 2.9                                      | 3.0                      | 3.2                      | 0.4                  | 0.4                   | 0.6                   | 121.3                  | 123.4                    | 126.5                    |
| Thailand                                             | 12.9                                     | 12.1                     | 12.6                     | 6.2                  | 6.0                   | 6.4                   | 98.8                   | 99.8                     | 100.5                    |
| Viet Nam                                             | 22.0                                     | 22.0                     | 21.7                     | 3.6                  | 3.4                   | 3.6                   | 154.1                  | 151.1                    | 153.0                    |
| <b>AFRICA</b>                                        | <b>38.8</b>                              | <b>39.9</b>              | <b>41.0</b>              | <b>6.3</b>           | <b>4.4</b>            | <b>4.5</b>            | <b>27.0</b>            | <b>26.7</b>              | <b>27.0</b>              |
| Cote D'ivoire                                        | 2.7                                      | 2.6                      | 2.6                      | 0.6                  | 0.2                   | 0.3                   | 90.2                   | 88.5                     | 88.5                     |
| Egypt                                                | 4.7                                      | 4.7                      | 4.7                      | 1.0                  | 0.7                   | 0.6                   | 42.9                   | 41.4                     | 41.8                     |
| Madagascar                                           | 2.8                                      | 3.0                      | 3.0                      | 0.3                  | 0.3                   | 0.2                   | 98.3                   | 97.8                     | 97.8                     |
| Nigeria                                              | 7.4                                      | 7.1                      | 7.2                      | 1.0                  | 0.4                   | 0.4                   | 33.6                   | 30.7                     | 30.7                     |
| Senegal                                              | 2.0                                      | 2.1                      | 2.3                      | 0.4                  | 0.2                   | 0.4                   | 120.5                  | 122.6                    | 125.4                    |
| South Africa                                         | 0.9                                      | 0.9                      | 0.9                      | 0.1                  | 0.1                   | 0.1                   | 15.6                   | 15.2                     | 14.7                     |
| United Republic of Tanzania                          | 2.0                                      | 2.1                      | 2.2                      | 0.4                  | 0.2                   | 0.3                   | 29.5                   | 30.8                     | 31.1                     |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b>           | <b>4.2</b>                               | <b>4.3</b>               | <b>4.5</b>               | <b>0.6</b>           | <b>0.6</b>            | <b>0.6</b>            | <b>18.4</b>            | <b>18.6</b>              | <b>18.9</b>              |
| Cuba                                                 | 0.8                                      | 0.8                      | 0.8                      | 0.1                  | -                     | -                     | 68.3                   | 65.3                     | 65.5                     |
| Mexico                                               | 0.8                                      | 0.9                      | 0.9                      | 0.1                  | 0.1                   | 0.1                   | 6.7                    | 6.9                      | 7.2                      |
| <b>SOUTH AMERICA</b>                                 | <b>15.2</b>                              | <b>14.3</b>              | <b>14.7</b>              | <b>2.3</b>           | <b>2.0</b>            | <b>1.9</b>            | <b>32.0</b>            | <b>30.4</b>              | <b>30.8</b>              |
| Argentina                                            | 0.5                                      | 0.5                      | 0.5                      | 0.2                  | 0.2                   | 0.1                   | 10.3                   | 10.0                     | 10.1                     |
| Brazil                                               | 7.9                                      | 7.0                      | 7.2                      | 0.4                  | 0.3                   | 0.4                   | 34.4                   | 30.6                     | 31.1                     |
| Peru                                                 | 2.4                                      | 2.5                      | 2.5                      | 0.3                  | 0.3                   | 0.3                   | 67.4                   | 67.9                     | 68.3                     |
| Uruguay                                              | 0.1                                      | 0.1                      | 0.1                      | 0.1                  | -                     | -                     | 11.0                   | 10.7                     | 10.9                     |
| <b>NORTHERN AMERICA</b>                              | <b>4.8</b>                               | <b>5.0</b>               | <b>5.0</b>               | <b>1.3</b>           | <b>1.1</b>            | <b>1.7</b>            | <b>9.6</b>             | <b>9.9</b>               | <b>10.0</b>              |
| Canada                                               | 0.4                                      | 0.4                      | 0.4                      | -                    | 0.2                   | 0.2                   | 10.3                   | 10.7                     | 10.9                     |
| United States of America                             | 4.4                                      | 4.6                      | 4.6                      | 1.3                  | 0.9                   | 1.5                   | 9.5                    | 9.8                      | 9.9                      |
| <b>EUROPE</b>                                        | <b>4.6</b>                               | <b>4.9</b>               | <b>4.9</b>               | <b>0.7</b>           | <b>0.9</b>            | <b>0.8</b>            | <b>5.3</b>             | <b>5.6</b>               | <b>5.7</b>               |
| European Union                                       | 3.4                                      | 3.7                      | 3.1                      | 0.5                  | 0.7                   | 0.6                   | 5.6                    | 6.0                      | 6.1                      |
| Russian Federation                                   | 0.8                                      | 0.8                      | 0.8                      | 0.1                  | 0.1                   | 0.1                   | 4.9                    | 5.1                      | 5.2                      |
| United Kingdom of Great Britain and Northern Ireland | -                                        | -                        | 0.6                      | -                    | -                     | 0.1                   | -                      | -                        | 6.5                      |
| <b>OCEANIA</b>                                       | <b>0.8</b>                               | <b>0.9</b>               | <b>0.9</b>               | <b>0.4</b>           | <b>0.3</b>            | <b>0.2</b>            | <b>18.4</b>            | <b>19.4</b>              | <b>19.6</b>              |
| Australia                                            | 0.3                                      | 0.3                      | 0.3                      | 0.3                  | 0.2                   | 0.1                   | 10.9                   | 11.2                     | 11.3                     |
| <b>WORLD</b>                                         | <b>497.1</b>                             | <b>502.5</b>             | <b>510.3</b>             | <b>178.1</b>         | <b>182.4</b>          | <b>182.0</b>          | <b>53.5</b>            | <b>53.6</b>              | <b>54.0</b>              |
| LIFDC                                                | 189.6                                    | 196.9                    | 201.9                    | 38.2                 | 46.6                  | 49.2                  | 64.2                   | 64.9                     | 65.7                     |
| LDC                                                  | 82.3                                     | 84.3                     | 85.9                     | 15.3                 | 14.6                  | 14.4                  | 65.4                   | 64.9                     | 64.9                     |

## APPENDIX TABLE 9: CEREAL SUPPLY AND UTILIZATION IN SELECTED EXPORTERS (million tonnes)

|                     | Wheat <sup>1</sup>                        |                          |                          | Coarse Grains <sup>2</sup>      |                          |                          | Rice (milled basis)                       |                          |                          |
|---------------------|-------------------------------------------|--------------------------|--------------------------|---------------------------------|--------------------------|--------------------------|-------------------------------------------|--------------------------|--------------------------|
|                     | 2018/19                                   | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2018/19                         | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2018/19                                   | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
|                     | <b>UNITED STATES of AMERICA (Jun/May)</b> |                          |                          | <b>UNITED STATES of AMERICA</b> |                          |                          | <b>UNITED STATES of AMERICA (Aug/Jul)</b> |                          |                          |
| Opening Stocks      | 29.9                                      | 29.4                     | 28.0                     | 57.9                            | 60.5                     | 53.7                     | 0.9                                       | 1.4                      | 0.9                      |
| Production          | 51.3                                      | 52.6                     | 49.7                     | 378.3                           | 359.8                    | 388.6                    | 7.1                                       | 5.9                      | 7.2                      |
| Imports             | 3.7                                       | 2.9                      | 3.4                      | 2.7                             | 3.1                      | 2.7                      | 0.9                                       | 1.2                      | 1.2                      |
| <b>Total Supply</b> | <b>84.9</b>                               | <b>84.9</b>              | <b>81.1</b>              | <b>438.9</b>                    | <b>423.4</b>             | <b>445.0</b>             | <b>8.9</b>                                | <b>8.5</b>               | <b>9.3</b>               |
| Domestic use        | 30.0                                      | 30.6                     | 30.5                     | 323.4                           | 319.1                    | 321.0                    | 4.6                                       | 4.6                      | 4.6                      |
| Exports             | 25.5                                      | 26.3                     | 26.5                     | 55.1                            | 50.6                     | 65.9                     | 3.0                                       | 3.0                      | 3.1                      |
| Closing stocks      | 29.4                                      | 28.0                     | 24.0                     | 60.5                            | 53.7                     | 58.1                     | 1.4                                       | 0.9                      | 1.5                      |
|                     | <b>CANADA (August/July)</b>               |                          |                          | <b>CANADA</b>                   |                          |                          | <b>THAILAND (Aug/July)</b>                |                          |                          |
| Opening Stocks      | 6.5                                       | 5.9                      | 5.0                      | 4.6                             | 3.3                      | 4.0                      | 5.3                                       | 5.0                      | 6.0                      |
| Production          | 32.2                                      | 32.3                     | 34.1                     | 26.3                            | 28.7                     | 29.6                     | 21.4                                      | 18.7                     | 19.4                     |
| Imports             | 0.1                                       | 0.1                      | 0.1                      | 2.9                             | 2.2                      | 1.5                      | 0.3                                       | 0.4                      | 0.2                      |
| <b>Total Supply</b> | <b>38.8</b>                               | <b>38.3</b>              | <b>39.2</b>              | <b>33.8</b>                     | <b>34.2</b>              | <b>35.1</b>              | <b>27.0</b>                               | <b>24.1</b>              | <b>25.6</b>              |
| Domestic use        | 8.6                                       | 8.9                      | 8.9                      | 24.3                            | 25.2                     | 25.6                     | 12.2                                      | 12.1                     | 12.6                     |
| Exports             | 24.3                                      | 24.5                     | 24.5                     | 6.1                             | 5.0                      | 5.3                      | 9.9                                       | 6.1                      | 6.7                      |
| Closing stocks      | 5.9                                       | 5.0                      | 5.9                      | 3.3                             | 4.0                      | 4.2                      | 5.0                                       | 6.0                      | 6.4                      |
|                     | <b>ARGENTINA (Dec./Nov.)</b>              |                          |                          | <b>ARGENTINA</b>                |                          |                          | <b>INDIA (Oct./Sept.)</b>                 |                          |                          |
| Opening Stocks      | 1.6                                       | 2.8                      | 3.0                      | 10.6                            | 9.9                      | 9.6                      | 21.8                                      | 28.8                     | 32.7                     |
| Production          | 19.5                                      | 19.8                     | 18.0                     | 50.8                            | 63.3                     | 65.3                     | 116.5                                     | 118.4                    | 121.5                    |
| Imports             | 0.0                                       | 0.0                      | 0.0                      | 0.1                             | 0.1                      | 0.1                      | 0.0                                       | 0.0                      | 0.0                      |
| <b>Total Supply</b> | <b>21.1</b>                               | <b>22.6</b>              | <b>21.0</b>              | <b>61.5</b>                     | <b>73.3</b>              | <b>75.0</b>              | <b>138.3</b>                              | <b>147.2</b>             | <b>154.2</b>             |
| Domestic use        | 6.3                                       | 6.6                      | 6.2                      | 25.9                            | 23.5                     | 27.7                     | 99.0                                      | 102.7                    | 106.4                    |
| Exports             | 11.9                                      | 13.0                     | 13.4                     | 25.7                            | 40.1                     | 39.1                     | 10.4                                      | 11.9                     | 12.6                     |
| Closing stocks      | 2.8                                       | 3.0                      | 1.4                      | 9.9                             | 9.6                      | 8.1                      | 28.8                                      | 32.7                     | 35.2                     |
|                     | <b>AUSTRALIA (Oct./Sept.)</b>             |                          |                          | <b>AUSTRALIA</b>                |                          |                          | <b>PAKISTAN (Sept./Aug.)</b>              |                          |                          |
| Opening Stocks      | 4.4                                       | 4.6                      | 1.7                      | 2.6                             | 4.0                      | 5.2                      | 0.6                                       | 0.4                      | 0.6                      |
| Production          | 17.6                                      | 15.2                     | 28.9                     | 11.9                            | 11.6                     | 13.6                     | 7.2                                       | 7.4                      | 7.7                      |
| Imports             | 0.3                                       | 0.3                      | 0.1                      | 0.0                             | 0.0                      | 0.0                      | 0.0                                       | 0.0                      | 0.0                      |
| <b>Total Supply</b> | <b>22.3</b>                               | <b>20.1</b>              | <b>30.7</b>              | <b>14.5</b>                     | <b>15.6</b>              | <b>18.8</b>              | <b>7.8</b>                                | <b>7.8</b>               | <b>8.3</b>               |
| Domestic use        | 8.8                                       | 8.2                      | 7.9                      | 6.0                             | 6.5                      | 7.1                      | 3.0                                       | 3.2                      | 3.4                      |
| Exports             | 9.0                                       | 10.0                     | 18.5                     | 4.6                             | 3.9                      | 4.9                      | 4.4                                       | 4.1                      | 4.3                      |
| Closing stocks      | 4.6                                       | 1.7                      | 4.3                      | 4.0                             | 5.2                      | 6.7                      | 0.4                                       | 0.6                      | 0.7                      |
|                     | <b>EUROPEAN UNION (July/June)</b>         |                          |                          | <b>EUROPEAN UNION</b>           |                          |                          | <b>VIET NAM (Jan./Dec.)</b>               |                          |                          |
| Opening Stocks      | 20.2                                      | 13.9                     | 11.2                     | 24.5                            | 29.9                     | 28.7                     | 3.6                                       | 3.8                      | 3.4                      |
| Production          | 138.1                                     | 155.7                    | 123.7                    | 154.4                           | 166.6                    | 150.1                    | 28.6                                      | 28.2                     | 28.2                     |
| Imports             | 5.4                                       | 4.3                      | 6.3                      | 26.8                            | 20.4                     | 23.9                     | 0.6                                       | 0.5                      | 0.4                      |
| <b>Total Supply</b> | <b>163.7</b>                              | <b>173.9</b>             | <b>141.2</b>             | <b>205.7</b>                    | <b>216.9</b>             | <b>202.7</b>             | <b>32.8</b>                               | <b>32.5</b>              | <b>32.0</b>              |
| Domestic use        | 127.2                                     | 122.7                    | 105.7                    | 167.8                           | 172.9                    | 164.0                    | 22.1                                      | 22.0                     | 21.7                     |
| Exports             | 22.6                                      | 37.5                     | 25.5                     | 8.0                             | 13.5                     | 9.8                      | 6.8                                       | 7.2                      | 6.7                      |
| Closing stocks      | 13.9                                      | 13.6                     | 9.0                      | 29.9                            | 30.5                     | 28.9                     | 3.8                                       | 3.4                      | 3.6                      |
|                     | <b>TOTAL OF ABOVE</b>                     |                          |                          | <b>TOTAL OF ABOVE</b>           |                          |                          | <b>TOTAL OF ABOVE</b>                     |                          |                          |
| Opening Stocks      | 62.6                                      | 56.6                     | 48.9                     | 100.2                           | 107.6                    | 101.2                    | 32.2                                      | 39.4                     | 43.6                     |
| Production          | 258.7                                     | 275.6                    | 254.4                    | 621.7                           | 630.0                    | 647.2                    | 180.8                                     | 178.6                    | 184.0                    |
| Imports             | 9.5                                       | 7.6                      | 9.9                      | 32.5                            | 25.8                     | 28.2                     | 1.8                                       | 2.1                      | 1.8                      |
| <b>Total Supply</b> | <b>330.8</b>                              | <b>339.8</b>             | <b>313.2</b>             | <b>754.4</b>                    | <b>763.4</b>             | <b>776.6</b>             | <b>214.8</b>                              | <b>220.1</b>             | <b>229.4</b>             |
| Domestic use        | 180.9                                     | 177.0                    | 159.2                    | 547.4                           | 547.2                    | 545.4                    | 140.9                                     | 144.6                    | 148.7                    |
| Exports             | 93.3                                      | 111.3                    | 108.4                    | 99.5                            | 113.1                    | 125.0                    | 34.5                                      | 32.3                     | 33.4                     |
| Closing stocks      | 56.6                                      | 51.3                     | 44.6                     | 107.6                           | 103.0                    | 106.0                    | 39.4                                      | 43.6                     | 47.4                     |

<sup>1</sup> Trade data include wheat flour in wheat grain equivalent. For the EU semolina is also included

<sup>2</sup> **Argentina** (December/November) for rye, barley and oats, (March/February) for maize and sorghum. **Australia** (November/October) for rye, barley and oats, (March/February) for maize and sorghum. **Canada** (August/July), **EU** (July/June), **United States** (June/May) for rye, barley and oats, (September/August) for maize and sorghum



## APPENDIX TABLE 10: TOTAL OILCROPS STATISTICS (million tonnes)

|                                                | Production <sup>1</sup> |                          |                          | Imports                |                          |                          | Exports                |                          |                          |
|------------------------------------------------|-------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                                | 16/17-18/19<br>average  | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
| <b>ASIA</b>                                    | <b>139.8</b>            | <b>143.8</b>             | <b>148.5</b>             | <b>129.8</b>           | <b>141.0</b>             | <b>141.9</b>             | <b>3.8</b>             | <b>3.7</b>               | <b>4.0</b>               |
| China                                          | 59.9                    | 64.2                     | 65.3                     | 98.2                   | 105.6                    | 107.3                    | 0.9                    | 1.1                      | 1.2                      |
| China (mainland)                               | 59.8                    | 64.1                     | 65.3                     | 95.5                   | 102.9                    | 104.5                    | 0.9                    | 1.1                      | 1.1                      |
| Taiwan Province of China                       | 0.1                     | 0.1                      | 0.1                      | 2.6                    | 2.7                      | 2.7                      | -                      | -                        | -                        |
| India                                          | 40.4                    | 40.8                     | 42.9                     | 0.3                    | 0.6                      | 0.2                      | 1.3                    | 1.2                      | 1.5                      |
| Indonesia                                      | 12.6                    | 12.8                     | 13.8                     | 2.8                    | 3.1                      | 3.2                      | 0.1                    | 0.1                      | 0.1                      |
| Iran (Islamic Republic of)                     | 0.8                     | 0.9                      | 0.9                      | 2.4                    | 2.4                      | 2.4                      | 0.1                    | 0.1                      | -                        |
| Japan                                          | 0.3                     | 0.2                      | 0.2                      | 6.0                    | 6.0                      | 6.1                      | -                      | -                        | -                        |
| Malaysia                                       | 5.1                     | 5.0                      | 5.1                      | 0.9                    | 1.1                      | 1.0                      | -                      | -                        | -                        |
| Pakistan                                       | 4.2                     | 3.7                      | 3.8                      | 3.0                    | 3.2                      | 3.1                      | -                      | -                        | -                        |
| Republic of Korea                              | 0.2                     | 0.2                      | 0.2                      | 1.6                    | 1.6                      | 1.6                      | -                      | -                        | -                        |
| Thailand                                       | 1.1                     | 1.2                      | 1.2                      | 2.9                    | 4.0                      | 4.0                      | -                      | -                        | -                        |
| Turkey                                         | 3.5                     | 3.5                      | 3.2                      | 3.5                    | 4.3                      | 3.9                      | 0.3                    | 0.1                      | -                        |
| <b>AFRICA</b>                                  | <b>20.8</b>             | <b>20.9</b>              | <b>21.0</b>              | <b>4.9</b>             | <b>6.5</b>               | <b>6.7</b>               | <b>0.9</b>             | <b>1.0</b>               | <b>0.9</b>               |
| Nigeria                                        | 4.6                     | 4.7                      | 4.8                      | 0.1                    | 0.1                      | 0.1                      | 0.1                    | 0.1                      | 0.1                      |
| <b>CENTRAL AMERICA &amp; THE<br/>CARIBBEAN</b> | <b>2.1</b>              | <b>2.0</b>               | <b>2.0</b>               | <b>7.8</b>             | <b>8.7</b>               | <b>8.7</b>               | <b>0.2</b>             | <b>0.2</b>               | <b>0.2</b>               |
| Mexico                                         | 1.4                     | 1.3                      | 1.3                      | 7.0                    | 7.8                      | 7.8                      | -                      | -                        | -                        |
| <b>SOUTH AMERICA</b>                           | <b>195.1</b>            | <b>203.5</b>             | <b>210.5</b>             | <b>6.0</b>             | <b>7.2</b>               | <b>6.2</b>               | <b>86.6</b>            | <b>113.0</b>             | <b>101.2</b>             |
| Argentina                                      | 54.6                    | 54.9                     | 55.7                     | 4.3                    | 4.9                      | 4.5                      | 6.8                    | 10.9                     | 8.7                      |
| Brazil                                         | 123.7                   | 131.1                    | 137.0                    | 0.2                    | 0.8                      | 0.2                      | 71.7                   | 93.1                     | 83.5                     |
| Paraguay                                       | 9.9                     | 10.9                     | 10.6                     | -                      | -                        | -                        | 5.6                    | 6.2                      | 6.2                      |
| Uruguay                                        | 3.0                     | 2.4                      | 2.8                      | -                      | -                        | -                        | 2.4                    | 2.5                      | 2.5                      |
| <b>NORTHERN AMERICA</b>                        | <b>159.2</b>            | <b>134.5</b>             | <b>153.9</b>             | <b>2.5</b>             | <b>1.9</b>               | <b>2.0</b>               | <b>72.7</b>            | <b>64.0</b>              | <b>75.7</b>              |
| Canada                                         | 28.9                    | 26.9                     | 26.8                     | 1.0                    | 0.6                      | 0.7                      | 16.3                   | 14.7                     | 15.3                     |
| United States of America                       | 130.3                   | 107.5                    | 127.2                    | 1.5                    | 1.3                      | 1.3                      | 56.4                   | 49.2                     | 60.4                     |
| <b>EUROPE</b>                                  | <b>74.9</b>             | <b>79.5</b>              | <b>72.8</b>              | <b>24.1</b>            | <b>27.9</b>              | <b>27.2</b>              | <b>8.2</b>             | <b>10.0</b>              | <b>8.3</b>               |
| European Union                                 | 33.8                    | 30.7                     | 29.2                     | 20.8                   | 24.6                     | 22.5                     | 1.1                    | 0.9                      | 1.1                      |
| Russian Federation                             | 17.4                    | 22.2                     | 19.6                     | 2.3                    | 2.2                      | 2.8                      | 1.5                    | 2.9                      | 2.1                      |
| Ukraine                                        | 21.1                    | 23.7                     | 20.0                     | -                      | -                        | -                        | 5.0                    | 5.5                      | 4.1                      |
| <b>OCEANIA</b>                                 | <b>5.3</b>              | <b>3.1</b>               | <b>4.5</b>               | <b>-</b>               | <b>-</b>                 | <b>-</b>                 | <b>2.9</b>             | <b>1.7</b>               | <b>2.6</b>               |
| Australia                                      | 4.8                     | 2.6                      | 4.1                      | -                      | -                        | -                        | 2.7                    | 1.6                      | 2.4                      |
| <b>WORLD</b>                                   | <b>597.1</b>            | <b>587.3</b>             | <b>613.3</b>             | <b>175.1</b>           | <b>193.2</b>             | <b>192.7</b>             | <b>175.3</b>           | <b>193.5</b>             | <b>192.7</b>             |
| LIFDC                                          | 57.7                    | 57.9                     | 59.9                     | 4.4                    | 5.1                      | 4.7                      | 2.2                    | 2.1                      | 2.4                      |
| LDC                                            | 13.8                    | 14.0                     | 13.9                     | 1.5                    | 1.9                      | 1.9                      | 0.7                    | 0.8                      | 0.7                      |

<sup>1</sup> The split years bring together northern hemisphere annual crops harvested in the latter part of the first year shown, with southern hemisphere annual crops harvested in the early part of the second year shown; for tree crops which are produced throughout the year, calendar year production for the second year shown is used.

APPENDIX TABLE 11: TOTAL OILS AND FATS STATISTICS<sup>1</sup> (million tonnes)

|                                            | Imports                |                          |                          | Exports                |                          |                          | Utilization            |                          |                          |
|--------------------------------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                            | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
| <b>ASIA</b>                                | <b>50.6</b>            | <b>53.7</b>              | <b>54.7</b>              | <b>54.3</b>            | <b>54.4</b>              | <b>56.9</b>              | <b>122.9</b>           | <b>129.7</b>             | <b>133.4</b>             |
| Bangladesh                                 | 2.5                    | 2.3                      | 2.5                      | -                      | -                        | -                        | 2.9                    | 2.8                      | 3.0                      |
| China                                      | 10.9                   | 14.4                     | 14.1                     | 0.6                    | 0.6                      | 0.7                      | 42.5                   | 44.6                     | 45.4                     |
| China (mainland)                           | 9.9                    | 13.4                     | 13.1                     | 0.3                    | 0.3                      | 0.4                      | 41.2                   | 43.2                     | 44.0                     |
| Taiwan Province of China                   | 0.5                    | 0.5                      | 0.5                      | -                      | -                        | -                        | 1.0                    | 1.0                      | 1.0                      |
| India                                      | 15.5                   | 14.8                     | 15.7                     | 0.2                    | 0.3                      | 0.2                      | 25.7                   | 25.5                     | 26.8                     |
| Indonesia                                  | 0.1                    | 0.1                      | 0.1                      | 31.2                   | 30.7                     | 33.0                     | 14.4                   | 17.9                     | 18.9                     |
| Iran (Islamic Republic of)                 | 1.5                    | 1.1                      | 1.2                      | 0.1                    | -                        | -                        | 2.2                    | 2.2                      | 2.2                      |
| Japan                                      | 1.4                    | 1.4                      | 1.4                      | -                      | -                        | -                        | 3.3                    | 3.4                      | 3.4                      |
| Malaysia                                   | 1.6                    | 1.7                      | 1.9                      | 18.3                   | 18.5                     | 18.4                     | 5.1                    | 5.3                      | 5.4                      |
| Pakistan                                   | 3.4                    | 3.5                      | 3.6                      | 0.1                    | 0.1                      | 0.1                      | 5.3                    | 5.4                      | 5.6                      |
| Philippines                                | 1.3                    | 1.2                      | 1.4                      | 1.0                    | 1.0                      | 1.0                      | 2.2                    | 2.2                      | 2.4                      |
| Republic of Korea                          | 1.3                    | 1.5                      | 1.5                      | -                      | -                        | -                        | 1.7                    | 1.9                      | 1.9                      |
| Singapore                                  | 1.0                    | 0.9                      | 1.0                      | 0.2                    | 0.2                      | 0.3                      | 0.7                    | 0.7                      | 0.8                      |
| Turkey                                     | 1.8                    | 1.9                      | 1.8                      | 0.6                    | 0.7                      | 0.9                      | 3.3                    | 3.4                      | 3.3                      |
| <b>AFRICA</b>                              | <b>12.0</b>            | <b>11.9</b>              | <b>12.1</b>              | <b>1.9</b>             | <b>2.2</b>               | <b>2.1</b>               | <b>19.3</b>            | <b>19.9</b>              | <b>20.4</b>              |
| Algeria                                    | 0.9                    | 1.0                      | 1.0                      | 0.1                    | -                        | 0.1                      | 1.0                    | 1.1                      | 1.1                      |
| Egypt                                      | 2.1                    | 1.9                      | 2.0                      | 0.2                    | 0.2                      | 0.2                      | 2.7                    | 2.8                      | 2.9                      |
| Nigeria                                    | 1.5                    | 1.4                      | 1.6                      | 0.1                    | 0.2                      | 0.1                      | 3.3                    | 3.5                      | 3.7                      |
| South Africa                               | 0.9                    | 0.9                      | 0.9                      | -                      | -                        | -                        | 1.5                    | 1.6                      | 1.5                      |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>2.6</b>             | <b>2.7</b>               | <b>2.6</b>               | <b>1.6</b>             | <b>1.7</b>               | <b>1.8</b>               | <b>5.5</b>             | <b>5.8</b>               | <b>5.8</b>               |
| Mexico                                     | 1.5                    | 1.6                      | 1.6                      | -                      | -                        | -                        | 3.7                    | 3.9                      | 4.0                      |
| <b>SOUTH AMERICA</b>                       | <b>3.2</b>             | <b>3.2</b>               | <b>3.3</b>               | <b>10.2</b>            | <b>10.7</b>              | <b>10.9</b>              | <b>18.5</b>            | <b>19.3</b>              | <b>19.5</b>              |
| Argentina                                  | -                      | 0.1                      | 0.1                      | 6.1                    | 6.6                      | 6.6                      | 3.9                    | 3.8                      | 3.7                      |
| Brazil                                     | 0.6                    | 0.6                      | 0.6                      | 1.6                    | 1.7                      | 1.6                      | 9.6                    | 10.4                     | 10.6                     |
| Paraguay                                   | -                      | -                        | -                        | 0.7                    | 0.7                      | 0.7                      | 0.1                    | 0.1                      | 0.1                      |
| Uruguay                                    | 0.1                    | 0.1                      | 0.1                      | -                      | -                        | -                        | 0.1                    | 0.1                      | 0.1                      |
| <b>NORTHERN AMERICA</b>                    | <b>5.6</b>             | <b>5.7</b>               | <b>5.8</b>               | <b>7.4</b>             | <b>8.0</b>               | <b>7.8</b>               | <b>22.3</b>            | <b>23.0</b>              | <b>23.3</b>              |
| Canada                                     | 0.4                    | 0.4                      | 0.5                      | 3.9                    | 4.2                      | 4.3                      | 1.5                    | 1.8                      | 1.9                      |
| United States of America                   | 5.1                    | 5.3                      | 5.3                      | 3.5                    | 3.8                      | 3.6                      | 20.7                   | 21.1                     | 21.5                     |
| <b>EUROPE</b>                              | <b>16.2</b>            | <b>17.1</b>              | <b>17.2</b>              | <b>13.4</b>            | <b>16.1</b>              | <b>14.9</b>              | <b>41.0</b>            | <b>42.4</b>              | <b>41.1</b>              |
| European Union                             | 13.2                   | 14.0                     | 13.7                     | 3.2                    | 3.5                      | 3.6                      | 33.9                   | 35.3                     | 33.6                     |
| Russian Federation                         | 1.5                    | 1.6                      | 1.6                      | 3.5                    | 4.9                      | 4.5                      | 4.5                    | 4.5                      | 4.5                      |
| Ukraine                                    | 0.3                    | 0.3                      | 0.3                      | 6.1                    | 7.1                      | 6.2                      | 0.9                    | 1.0                      | 0.9                      |
| <b>OCEANIA</b>                             | <b>0.7</b>             | <b>0.8</b>               | <b>0.8</b>               | <b>2.0</b>             | <b>1.9</b>               | <b>2.0</b>               | <b>1.3</b>             | <b>1.4</b>               | <b>1.4</b>               |
| Australia                                  | 0.6                    | 0.6                      | 0.6                      | 0.7                    | 0.7                      | 0.7                      | 1.0                    | 1.0                      | 1.0                      |
| <b>WORLD</b>                               | <b>90.8</b>            | <b>95.0</b>              | <b>96.5</b>              | <b>90.8</b>            | <b>95.0</b>              | <b>96.4</b>              | <b>230.9</b>           | <b>241.5</b>             | <b>244.8</b>             |
| LIFDC                                      | 25.9                   | 25.4                     | 26.4                     | 1.7                    | 1.9                      | 1.8                      | 41.6                   | 41.6                     | 43.2                     |
| LDC                                        | 8.5                    | 8.4                      | 8.6                      | 0.7                    | 0.8                      | 0.8                      | 12.1                   | 12.2                     | 12.3                     |

<sup>1</sup> Includes oils and fats of vegetable, marine and animal origin.

## APPENDIX TABLE 12: TOTAL MEALS AND CAKES STATISTICS<sup>1</sup> (million tonnes)

|                                            | Imports                |                          |                          | Exports                |                          |                          | Utilization            |                          |                          |
|--------------------------------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|------------------------|--------------------------|--------------------------|
|                                            | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 16/17-18/19<br>average | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
| <b>ASIA</b>                                | <b>40.5</b>            | <b>43.1</b>              | <b>44.3</b>              | <b>14.5</b>            | <b>14.6</b>              | <b>15.5</b>              | <b>176.1</b>           | <b>183.2</b>             | <b>188.5</b>             |
| China                                      | 4.6                    | 6.2                      | 6.4                      | 1.6                    | 1.6                      | 1.8                      | 97.5                   | 101.5                    | 104.3                    |
| China (mainland)                           | 4.1                    | 5.7                      | 5.9                      | 1.5                    | 1.6                      | 1.8                      | 94.8                   | 98.8                     | 101.6                    |
| Taiwan Province of China                   | 0.5                    | 0.5                      | 0.5                      | -                      | -                        | -                        | 2.6                    | 2.6                      | 2.6                      |
| India                                      | 0.5                    | 0.7                      | 0.6                      | 3.1                    | 2.9                      | 3.5                      | 15.7                   | 16.2                     | 16.6                     |
| Indonesia                                  | 4.6                    | 5.0                      | 5.2                      | 5.1                    | 5.4                      | 5.5                      | 5.2                    | 5.4                      | 5.6                      |
| Iran (Islamic Republic of)                 | 2.2                    | 1.4                      | 1.7                      | 0.1                    | -                        | -                        | 4.3                    | 4.0                      | 4.3                      |
| Japan                                      | 2.2                    | 2.3                      | 2.3                      | -                      | -                        | -                        | 6.5                    | 6.6                      | 6.7                      |
| Malaysia                                   | 1.6                    | 1.5                      | 1.6                      | 2.6                    | 2.5                      | 2.6                      | 2.4                    | 2.6                      | 2.6                      |
| Pakistan                                   | 0.6                    | 0.5                      | 0.5                      | 0.1                    | 0.1                      | 0.1                      | 4.5                    | 4.2                      | 4.3                      |
| Philippines                                | 2.9                    | 3.0                      | 3.1                      | 0.4                    | 0.3                      | 0.3                      | 3.7                    | 3.8                      | 4.0                      |
| Republic of Korea                          | 3.4                    | 3.6                      | 3.7                      | 0.1                    | 0.1                      | 0.1                      | 4.6                    | 4.9                      | 5.0                      |
| Saudi Arabia                               | 1.6                    | 1.8                      | 1.8                      | -                      | -                        | -                        | 2.1                    | 2.3                      | 2.4                      |
| Thailand                                   | 3.6                    | 3.5                      | 3.8                      | 0.1                    | 0.2                      | 0.2                      | 6.7                    | 7.3                      | 7.7                      |
| Turkey                                     | 2.3                    | 2.5                      | 2.3                      | 0.1                    | 0.2                      | 0.1                      | 6.3                    | 6.9                      | 6.7                      |
| Viet Nam                                   | 6.1                    | 6.1                      | 6.4                      | 0.3                    | 0.3                      | 0.3                      | 7.8                    | 7.9                      | 8.2                      |
| <b>AFRICA</b>                              | <b>5.2</b>             | <b>4.5</b>               | <b>4.9</b>               | <b>1.2</b>             | <b>1.2</b>               | <b>1.2</b>               | <b>14.3</b>            | <b>15.1</b>              | <b>15.9</b>              |
| Egypt                                      | 0.9                    | 0.4                      | 0.5                      | -                      | -                        | -                        | 3.5                    | 4.0                      | 4.2                      |
| South Africa                               | 0.7                    | 0.7                      | 0.8                      | 0.1                    | 0.1                      | 0.1                      | 2.0                    | 2.3                      | 2.3                      |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>4.2</b>             | <b>4.2</b>               | <b>4.2</b>               | <b>0.2</b>             | <b>0.2</b>               | <b>0.2</b>               | <b>10.7</b>            | <b>11.2</b>              | <b>11.2</b>              |
| Mexico                                     | 2.2                    | 2.3                      | 2.3                      | 0.1                    | 0.1                      | 0.1                      | 8.0                    | 8.4                      | 8.5                      |
| <b>SOUTH AMERICA</b>                       | <b>5.4</b>             | <b>5.8</b>               | <b>5.9</b>               | <b>51.1</b>            | <b>50.7</b>              | <b>52.5</b>              | <b>33.7</b>            | <b>34.7</b>              | <b>36.5</b>              |
| Argentina                                  | -                      | -                        | -                        | 30.0                   | 28.2                     | 29.7                     | 7.0                    | 7.4                      | 7.9                      |
| Bolivia                                    | -                      | -                        | -                        | 1.7                    | 1.7                      | 1.8                      | 0.4                    | 0.4                      | 0.4                      |
| Brazil                                     | -                      | -                        | -                        | 15.5                   | 17.3                     | 17.0                     | 18.6                   | 18.7                     | 19.7                     |
| Chile                                      | 1.1                    | 1.1                      | 1.2                      | 0.2                    | 0.2                      | 0.3                      | 1.4                    | 1.4                      | 1.5                      |
| Paraguay                                   | -                      | -                        | -                        | 2.4                    | 2.2                      | 2.4                      | 0.5                    | 0.5                      | 0.6                      |
| Peru                                       | 1.3                    | 1.5                      | 1.6                      | 1.0                    | 0.9                      | 1.1                      | 1.8                    | 1.9                      | 2.0                      |
| Uruguay                                    | 0.2                    | 0.2                      | 0.2                      | -                      | -                        | -                        | 0.2                    | 0.3                      | 0.2                      |
| Venezuela (Bolivarian Republic of)         | 0.7                    | 0.7                      | 0.7                      | -                      | -                        | -                        | 0.9                    | 0.9                      | 0.9                      |
| <b>NORTHERN AMERICA</b>                    | <b>5.1</b>             | <b>5.5</b>               | <b>5.2</b>               | <b>17.9</b>            | <b>19.0</b>              | <b>18.7</b>              | <b>40.7</b>            | <b>44.0</b>              | <b>44.2</b>              |
| Canada                                     | 1.0                    | 1.2                      | 1.2                      | 5.5                    | 5.8                      | 5.8                      | 2.7                    | 3.4                      | 3.3                      |
| United States of America                   | 4.1                    | 4.3                      | 4.1                      | 12.4                   | 13.1                     | 12.9                     | 38.0                   | 40.6                     | 41.0                     |
| <b>EUROPE</b>                              | <b>30.2</b>            | <b>29.5</b>              | <b>29.7</b>              | <b>9.3</b>             | <b>10.5</b>              | <b>9.6</b>               | <b>71.3</b>            | <b>73.0</b>              | <b>70.9</b>              |
| European Union                             | 27.8                   | 27.3                     | 27.4                     | 1.5                    | 1.5                      | 1.4                      | 59.1                   | 59.8                     | 58.1                     |
| Russian Federation                         | 0.3                    | -                        | 0.2                      | 2.2                    | 2.8                      | 2.4                      | 7.0                    | 7.6                      | 7.7                      |
| Ukraine                                    | -                      | -                        | -                        | 5.0                    | 5.7                      | 5.2                      | 1.9                    | 2.1                      | 1.8                      |
| <b>OCEANIA</b>                             | <b>3.6</b>             | <b>3.7</b>               | <b>3.8</b>               | <b>0.3</b>             | <b>0.2</b>               | <b>0.2</b>               | <b>4.4</b>             | <b>4.4</b>               | <b>4.6</b>               |
| Australia                                  | 1.2                    | 1.5                      | 1.5                      | 0.1                    | 0.1                      | 0.1                      | 2.0                    | 2.1                      | 2.2                      |
| <b>WORLD</b>                               | <b>94.3</b>            | <b>96.3</b>              | <b>98.0</b>              | <b>94.3</b>            | <b>96.3</b>              | <b>98.0</b>              | <b>351.1</b>           | <b>365.7</b>             | <b>371.8</b>             |
| LIFDC                                      | 8.8                    | 9.1                      | 9.4                      | 4.1                    | 3.9                      | 4.6                      | 31.4                   | 32.4                     | 33.5                     |
| LDC                                        | 1.1                    | 1.2                      | 1.2                      | 0.6                    | 0.6                      | 0.6                      | 5.8                    | 6.2                      | 6.7                      |

<sup>1</sup> Expressed in product weight; includes meals and cakes derived from oilcrops as well as fish meal and other meals from animal origin.

## APPENDIX TABLE 13: SUGAR STATISTICS

(million tonnes - raw value)

|                                                      | Production               |                          | Imports                  |                          | Exports                  |                          | Utilization              |                          |
|------------------------------------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|
|                                                      | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> | 2019/20<br><i>estim.</i> | 2020/21<br><i>f'cast</i> |
| <b>ASIA</b>                                          | <b>62.5</b>              | <b>65.5</b>              | <b>35.1</b>              | <b>35.5</b>              | <b>18.4</b>              | <b>16.2</b>              | <b>84.7</b>              | <b>87.5</b>              |
| China                                                | 10.4                     | 10.7                     | 7.0                      | 7.3                      | 0.2                      | 0.2                      | 17.8                     | 18.6                     |
| India                                                | 27.2                     | 30.0                     | 1.6                      | 1.3                      | 5.8                      | 5.9                      | 24.9                     | 25.8                     |
| Indonesia                                            | 2.1                      | 2.0                      | 5.2                      | 5.7                      | -                        | -                        | 7.2                      | 7.5                      |
| Japan                                                | 0.8                      | 0.8                      | 1.4                      | 1.5                      | -                        | -                        | 2.2                      | 2.2                      |
| Malaysia                                             | -                        | -                        | 1.9                      | 2.1                      | 0.1                      | 0.1                      | 1.8                      | 1.9                      |
| Pakistan                                             | 5.2                      | 5.4                      | 0.4                      | 0.4                      | 0.4                      | 0.4                      | 5.4                      | 5.6                      |
| Philippines                                          | 2.1                      | 2.2                      | 0.1                      | -                        | 0.1                      | 0.1                      | 1.9                      | 2.0                      |
| Republic of Korea                                    | -                        | -                        | 1.7                      | 2.0                      | 0.3                      | 0.3                      | 1.6                      | 1.6                      |
| Thailand                                             | 8.3                      | 7.9                      | -                        | -                        | 8.6                      | 6.7                      | 3.0                      | 3.1                      |
| Turkey                                               | 2.5                      | 2.5                      | 0.6                      | 0.7                      | 0.1                      | 0.1                      | 2.8                      | 2.9                      |
| Viet Nam                                             | 1.0                      | 1.0                      | 0.4                      | 0.4                      | 0.3                      | 0.1                      | 1.4                      | 1.4                      |
| <b>AFRICA</b>                                        | <b>11.8</b>              | <b>12.2</b>              | <b>13.6</b>              | <b>14.5</b>              | <b>4.5</b>               | <b>4.3</b>               | <b>19.8</b>              | <b>20.8</b>              |
| Algeria                                              | -                        | -                        | 2.3                      | 2.5                      | 0.5                      | 0.6                      | 1.8                      | 1.9                      |
| Egypt                                                | 2.9                      | 3.0                      | 1.2                      | 1.2                      | 0.2                      | 0.2                      | 3.1                      | 3.2                      |
| Eswatini                                             | 0.8                      | 0.8                      | -                        | -                        | 0.7                      | 0.7                      | 0.1                      | 0.1                      |
| Ethiopia                                             | 0.5                      | 0.5                      | 0.3                      | 0.4                      | 0.1                      | 0.1                      | 0.7                      | 0.7                      |
| Kenya                                                | 0.4                      | 0.5                      | 0.7                      | 0.7                      | -                        | -                        | 1.1                      | 1.1                      |
| Mauritius                                            | 0.3                      | 0.3                      | -                        | -                        | 0.3                      | 0.3                      | -                        | -                        |
| Morocco                                              | 0.5                      | 0.6                      | 1.0                      | 1.0                      | 0.4                      | 0.2                      | 1.1                      | 1.3                      |
| Mozambique                                           | 0.5                      | 0.5                      | -                        | -                        | 0.2                      | 0.2                      | 0.2                      | 0.2                      |
| South Africa                                         | 2.2                      | 2.3                      | 0.5                      | 0.6                      | 1.2                      | 1.1                      | 1.4                      | 1.5                      |
| Sudan                                                | 0.7                      | 0.7                      | 1.5                      | 1.8                      | 0.1                      | 0.2                      | 2.0                      | 2.1                      |
| United Republic of Tanzania                          | 0.4                      | 0.4                      | 0.2                      | 0.3                      | -                        | -                        | 0.5                      | 0.6                      |
| Zambia                                               | 0.4                      | 0.4                      | -                        | -                        | 0.2                      | 0.2                      | 0.2                      | 0.2                      |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b>           | <b>12.7</b>              | <b>13.5</b>              | <b>0.4</b>               | <b>0.4</b>               | <b>5.5</b>               | <b>6.2</b>               | <b>7.6</b>               | <b>7.7</b>               |
| Cuba                                                 | 1.2                      | 1.3                      | -                        | -                        | 0.7                      | 0.9                      | 0.5                      | 0.5                      |
| Dominican Republic                                   | 0.6                      | 0.5                      | -                        | -                        | 0.2                      | 0.2                      | 0.4                      | 0.4                      |
| Guatemala                                            | 2.8                      | 2.9                      | -                        | -                        | 1.9                      | 2.0                      | 0.9                      | 0.9                      |
| Mexico                                               | 5.3                      | 5.8                      | -                        | -                        | 1.2                      | 1.5                      | 4.1                      | 4.1                      |
| <b>SOUTH AMERICA</b>                                 | <b>44.5</b>              | <b>44.9</b>              | <b>1.4</b>               | <b>1.5</b>               | <b>25.5</b>              | <b>28.1</b>              | <b>16.9</b>              | <b>17.3</b>              |
| Argentina                                            | 1.6                      | 2.0                      | -                        | -                        | 0.4                      | 0.8                      | 1.2                      | 1.2                      |
| Brazil                                               | 37.4                     | 37.5                     | -                        | -                        | 24.0                     | 26.2                     | 10.1                     | 10.2                     |
| Colombia                                             | 2.3                      | 2.4                      | 0.2                      | 0.2                      | 0.7                      | 0.7                      | 1.6                      | 1.7                      |
| Peru                                                 | 1.3                      | 1.3                      | 0.2                      | 0.3                      | 0.1                      | 0.1                      | 1.4                      | 1.6                      |
| Venezuela (Bolivarian Republic of)                   | 0.3                      | 0.3                      | 0.3                      | 0.2                      | -                        | -                        | 0.5                      | 0.5                      |
| <b>NORTHERN AMERICA</b>                              | <b>6.7</b>               | <b>7.9</b>               | <b>4.3</b>               | <b>3.5</b>               | <b>0.1</b>               | <b>0.1</b>               | <b>11.5</b>              | <b>11.6</b>              |
| Canada                                               | 0.1                      | 0.1                      | 1.2                      | 1.2                      | 0.1                      | 0.1                      | 1.3                      | 1.3                      |
| United States of America                             | 6.7                      | 7.7                      | 3.0                      | 2.3                      | -                        | -                        | 10.3                     | 10.3                     |
| <b>EUROPE</b>                                        | <b>27.2</b>              | <b>24.2</b>              | <b>3.3</b>               | <b>3.7</b>               | <b>2.5</b>               | <b>2.3</b>               | <b>27.0</b>              | <b>27.3</b>              |
| European Union                                       | 16.6                     | 14.8                     | 2.3                      | 1.9                      | 0.8                      | 1.0                      | 18.5                     | 16.7                     |
| Russian Federation                                   | 7.9                      | 5.5                      | 0.2                      | 0.2                      | 1.1                      | 0.3                      | 6.1                      | 6.1                      |
| Ukraine                                              | 1.5                      | 1.4                      | -                        | 0.1                      | 0.2                      | 0.2                      | 1.4                      | 1.3                      |
| United Kingdom of Great Britain and Northern Ireland | -                        | 1.2                      | -                        | 1.0                      | -                        | 0.4                      | -                        | 1.8                      |
| <b>OCEANIA</b>                                       | <b>4.5</b>               | <b>4.2</b>               | <b>0.6</b>               | <b>0.6</b>               | <b>4.0</b>               | <b>3.9</b>               | <b>1.3</b>               | <b>1.4</b>               |
| Australia                                            | 4.3                      | 4.0                      | 0.2                      | 0.2                      | 3.8                      | 3.8                      | 1.0                      | 1.0                      |
| Fiji                                                 | 0.2                      | 0.2                      | -                        | -                        | 0.1                      | 0.2                      | -                        | -                        |
| <b>WORLD</b>                                         | <b>169.8</b>             | <b>172.4</b>             | <b>58.6</b>              | <b>59.5</b>              | <b>60.5</b>              | <b>61.2</b>              | <b>168.8</b>             | <b>173.6</b>             |
| LIFDC                                                | 38.9                     | 36.8                     | 10.0                     | 9.2                      | 6.4                      | 5.8                      | 42.4                     | 42.9                     |
| LDC                                                  | 33.9                     | 36.8                     | 12.9                     | 13.2                     | 7.6                      | 7.6                      | 41.4                     | 42.8                     |

## APPENDIX TABLE 14: TOTAL MEAT STATISTICS<sup>1</sup> (thousand tonnes - carcass weight equivalent)

|                                            | Production            |                       | Imports               |                       | Exports               |                       | Utilization           |                       |
|--------------------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
|                                            | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> |
| <b>ASIA</b>                                | <b>136 513</b>        | <b>133 919</b>        | <b>19 592</b>         | <b>22 165</b>         | <b>4 734</b>          | <b>4 322</b>          | <b>151 303</b>        | <b>151 694</b>        |
| China                                      | 80 383                | 78 736                | 7 496                 | 10 815                | 603                   | 523                   | 87 275                | 89 029                |
| India                                      | 7 726                 | 6 965                 | 2                     | 2                     | 1 451                 | 1 066                 | 6 277                 | 5 901                 |
| Indonesia                                  | 3 660                 | 3 597                 | 259                   | 203                   | 6                     | 6                     | 3 913                 | 3 795                 |
| Iran (Islamic Republic of)                 | 3 142                 | 3 160                 | 151                   | 41                    | 53                    | 48                    | 3 240                 | 3 154                 |
| Japan                                      | 4 059                 | 4 131                 | 3 726                 | 3 631                 | 18                    | 18                    | 7 709                 | 7 728                 |
| Malaysia                                   | 2 255                 | 2 267                 | 321                   | 289                   | 70                    | 73                    | 2 506                 | 2 483                 |
| Pakistan                                   | 3 999                 | 4 107                 | 2                     | 2                     | 76                    | 76                    | 3 926                 | 4 033                 |
| Philippines                                | 3 694                 | 3 210                 | 624                   | 597                   | 7                     | 8                     | 4 311                 | 3 799                 |
| Republic of Korea                          | 2 577                 | 2 632                 | 1 490                 | 1 325                 | 59                    | 63                    | 3 949                 | 3 852                 |
| Saudi Arabia                               | 836                   | 939                   | 827                   | 759                   | 87                    | 73                    | 1 576                 | 1 625                 |
| Singapore                                  | 124                   | 126                   | 362                   | 396                   | 35                    | 42                    | 451                   | 480                   |
| Thailand                                   | 3 002                 | 2 989                 | 29                    | 33                    | 1 371                 | 1 362                 | 1 709                 | 1 649                 |
| Turkey                                     | 3 687                 | 3 762                 | 8                     | 7                     | 535                   | 597                   | 3 161                 | 3 172                 |
| Viet Nam                                   | 4 849                 | 4 745                 | 979                   | 878                   | 55                    | 54                    | 5 773                 | 5 569                 |
| <b>AFRICA</b>                              | <b>20 431</b>         | <b>20 655</b>         | <b>2 974</b>          | <b>2 790</b>          | <b>277</b>            | <b>279</b>            | <b>23 129</b>         | <b>23 167</b>         |
| Algeria                                    | 808                   | 801                   | 68                    | 53                    | 2                     | 2                     | 875                   | 853                   |
| Angola                                     | 261                   | 259                   | 518                   | 430                   | -                     | -                     | 779                   | 689                   |
| Egypt                                      | 2 210                 | 2 211                 | 353                   | 293                   | 4                     | 4                     | 2 558                 | 2 500                 |
| Nigeria                                    | 1 449                 | 1 419                 | 3                     | 3                     | 1                     | 1                     | 1 451                 | 1 421                 |
| South Africa                               | 3 234                 | 3 314                 | 600                   | 478                   | 135                   | 152                   | 3 699                 | 3 640                 |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>10 449</b>         | <b>10 718</b>         | <b>3 601</b>          | <b>3 451</b>          | <b>845</b>            | <b>1 007</b>          | <b>13 206</b>         | <b>13 162</b>         |
| Cuba                                       | 352                   | 352                   | 368                   | 327                   | -                     | -                     | 719                   | 680                   |
| Mexico                                     | 7 308                 | 7 547                 | 2 288                 | 2 208                 | 575                   | 715                   | 9 020                 | 9 040                 |
| <b>SOUTH AMERICA</b>                       | <b>47 147</b>         | <b>47 449</b>         | <b>1 238</b>          | <b>1 085</b>          | <b>9 814</b>          | <b>10 674</b>         | <b>38 572</b>         | <b>37 859</b>         |
| Argentina                                  | 6 115                 | 6 226                 | 63                    | 44                    | 1 072                 | 1 146                 | 5 105                 | 5 124                 |
| Brazil                                     | 30 244                | 30 464                | 54                    | 54                    | 7 493                 | 8 207                 | 22 805                | 22 311                |
| Chile                                      | 1 517                 | 1 574                 | 607                   | 530                   | 432                   | 515                   | 1 693                 | 1 588                 |
| Colombia                                   | 2 805                 | 2 738                 | 268                   | 209                   | 25                    | 37                    | 3 048                 | 2 910                 |
| Uruguay                                    | 627                   | 578                   | 103                   | 108                   | 438                   | 402                   | 292                   | 283                   |
| <b>NORTHERN AMERICA</b>                    | <b>53 316</b>         | <b>53 956</b>         | <b>2 885</b>          | <b>3 072</b>          | <b>9 946</b>          | <b>10 637</b>         | <b>46 179</b>         | <b>46 465</b>         |
| Canada                                     | 5 092                 | 5 137                 | 731                   | 817                   | 1 991                 | 2 191                 | 3 826                 | 3 779                 |
| United States of America                   | 48 223                | 48 818                | 2 141                 | 2 241                 | 7 955                 | 8 446                 | 42 339                | 42 671                |
| <b>EUROPE</b>                              | <b>64 276</b>         | <b>64 155</b>         | <b>2 940</b>          | <b>2 654</b>          | <b>7 265</b>          | <b>7 612</b>          | <b>59 943</b>         | <b>59 191</b>         |
| Belarus                                    | 1 197                 | 1 223                 | 63                    | 68                    | 412                   | 484                   | 848                   | 807                   |
| European Union <sup>2</sup>                | 47 939                | 47 452                | 1 405                 | 1 289                 | 5 907                 | 6 039                 | 43 437                | 42 702                |
| Russian Federation                         | 10 877                | 11 171                | 778                   | 638                   | 387                   | 521                   | 11 261                | 11 283                |
| Ukraine                                    | 2 518                 | 2 551                 | 171                   | 152                   | 464                   | 474                   | 2 225                 | 2 229                 |
| <b>OCEANIA</b>                             | <b>6 891</b>          | <b>6 493</b>          | <b>566</b>            | <b>499</b>            | <b>3 314</b>          | <b>3 059</b>          | <b>4 143</b>          | <b>3 934</b>          |
| Australia                                  | 4 851                 | 4 472                 | 297                   | 238                   | 2 277                 | 2 032                 | 2 871                 | 2 678                 |
| New Zealand                                | 1 459                 | 1 439                 | 86                    | 80                    | 1 033                 | 1 023                 | 511                   | 496                   |
| <b>WORLD</b>                               | <b>339 023</b>        | <b>337 345</b>        | <b>33 797</b>         | <b>35 716</b>         | <b>36 195</b>         | <b>37 589</b>         | <b>336 474</b>        | <b>335 471</b>        |
| LIFDC                                      | 27 074                | 26 403                | 2 460                 | 2 453                 | 1 721                 | 1 344                 | 27 814                | 27 513                |
| LDC                                        | 14 269                | 14 330                | 1 606                 | 1 521                 | 51                    | 50                    | 15 824                | 15 801                |

<sup>1</sup> Including "other meat".

<sup>2</sup> Including data for the United Kingdom of Great Britain and Northern Ireland in all meat categories.

## APPENDIX TABLE 15: BOVINE MEAT STATISTICS (thousand tonnes - carcass weight equivalent)

|                                            | Production            |                       | Imports               |                       | Exports               |                       | Utilization           |                       |
|--------------------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
|                                            | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> |
| <b>ASIA</b>                                | <b>18 893</b>         | <b>18 606</b>         | <b>6 579</b>          | <b>6 610</b>          | <b>1 790</b>          | <b>1 412</b>          | <b>23 680</b>         | <b>23 794</b>         |
| China                                      | 6 685                 | 6 795                 | 2 726                 | 3 271                 | 65                    | 58                    | 9 346                 | 10 007                |
| India                                      | 2 629                 | 2 247                 | -                     | -                     | 1 429                 | 1 052                 | 1 200                 | 1 196                 |
| Indonesia                                  | 565                   | 563                   | 254                   | 198                   | 1                     | 1                     | 819                   | 761                   |
| Iran (Islamic Republic of)                 | 484                   | 458                   | 128                   | 34                    | 3                     | 4                     | 608                   | 488                   |
| Japan                                      | 471                   | 475                   | 857                   | 853                   | 6                     | 5                     | 1 323                 | 1 313                 |
| Malaysia                                   | 52                    | 52                    | 190                   | 162                   | 9                     | 8                     | 233                   | 206                   |
| Pakistan                                   | 1 955                 | 1 955                 | 1                     | 1                     | 64                    | 64                    | 1 892                 | 1 892                 |
| Philippines                                | 309                   | 277                   | 167                   | 155                   | 3                     | 5                     | 473                   | 428                   |
| Republic of Korea                          | 286                   | 291                   | 561                   | 541                   | 4                     | 4                     | 840                   | 829                   |
| <b>AFRICA</b>                              | <b>7 195</b>          | <b>7 192</b>          | <b>646</b>            | <b>547</b>            | <b>89</b>             | <b>99</b>             | <b>7 751</b>          | <b>7 640</b>          |
| Algeria                                    | 150                   | 140                   | 66                    | 51                    | -                     | -                     | 216                   | 191                   |
| Angola                                     | 100                   | 95                    | 125                   | 102                   | -                     | -                     | 225                   | 197                   |
| Egypt                                      | 737                   | 725                   | 290                   | 231                   | 1                     | 1                     | 1 026                 | 955                   |
| South Africa                               | 995                   | 927                   | 20                    | 7                     | 49                    | 65                    | 966                   | 869                   |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>2 808</b>          | <b>2 862</b>          | <b>419</b>            | <b>356</b>            | <b>536</b>            | <b>606</b>            | <b>2 692</b>          | <b>2 612</b>          |
| Mexico                                     | 2 027                 | 2 082                 | 223                   | 168                   | 317                   | 364                   | 1 933                 | 1 886                 |
| <b>SOUTH AMERICA</b>                       | <b>16 460</b>         | <b>16 316</b>         | <b>463</b>            | <b>430</b>            | <b>3 848</b>          | <b>4 189</b>          | <b>13 075</b>         | <b>12 556</b>         |
| Argentina                                  | 3 137                 | 3 194                 | 16                    | 15                    | 776                   | 835                   | 2 377                 | 2 374                 |
| Brazil                                     | 10 200                | 10 070                | 42                    | 45                    | 2 279                 | 2 561                 | 7 962                 | 7 554                 |
| Chile                                      | 212                   | 223                   | 333                   | 287                   | 23                    | 34                    | 522                   | 476                   |
| Colombia                                   | 765                   | 725                   | 7                     | 6                     | 24                    | 36                    | 748                   | 696                   |
| Uruguay                                    | 556                   | 508                   | 42                    | 51                    | 417                   | 383                   | 182                   | 177                   |
| <b>NORTHERN AMERICA</b>                    | <b>13 683</b>         | <b>13 639</b>         | <b>1 565</b>          | <b>1 735</b>          | <b>1 943</b>          | <b>1 854</b>          | <b>13 325</b>         | <b>13 505</b>         |
| Canada                                     | 1 342                 | 1 310                 | 232                   | 273                   | 516                   | 488                   | 1 067                 | 1 093                 |
| United States of America                   | 12 341                | 12 329                | 1 331                 | 1 459                 | 1 428                 | 1 366                 | 12 255                | 12 409                |
| <b>EUROPE</b>                              | <b>10 592</b>         | <b>10 484</b>         | <b>890</b>            | <b>802</b>            | <b>750</b>            | <b>803</b>            | <b>10 732</b>         | <b>10 483</b>         |
| European Union                             | 7 886                 | 7 771                 | 318                   | 282                   | 429                   | 438                   | 7 775                 | 7 615                 |
| Russian Federation                         | 1 629                 | 1 639                 | 406                   | 364                   | 49                    | 65                    | 1 986                 | 1 938                 |
| Ukraine                                    | 362                   | 350                   | 4                     | 6                     | 42                    | 34                    | 323                   | 322                   |
| <b>OCEANIA</b>                             | <b>3 164</b>          | <b>2 793</b>          | <b>52</b>             | <b>54</b>             | <b>2 272</b>          | <b>2 075</b>          | <b>944</b>            | <b>772</b>            |
| Australia                                  | 2 432                 | 2 085                 | 14                    | 15                    | 1 672                 | 1 485                 | 774                   | 615                   |
| New Zealand                                | 718                   | 694                   | 14                    | 14                    | 597                   | 587                   | 135                   | 121                   |
| <b>WORLD</b>                               | <b>72 796</b>         | <b>71 894</b>         | <b>10 616</b>         | <b>10 533</b>         | <b>11 228</b>         | <b>11 039</b>         | <b>72 199</b>         | <b>71 362</b>         |
| LIFDC                                      | 9 301                 | 9 027                 | 735                   | 533                   | 1 593                 | 1 229                 | 8 443                 | 8 330                 |
| LDC                                        | 4 852                 | 4 890                 | 228                   | 206                   | 12                    | 12                    | 5 068                 | 5 084                 |

## APPENDIX TABLE 16: OVINE MEAT STATISTICS (thousand tonnes - carcass weight equivalent)

|                                                | Production            |                       | Imports               |                       | Exports               |                       | Utilization           |                       |
|------------------------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
|                                                | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> |
| <b>ASIA</b>                                    | <b>9 441</b>          | <b>9 520</b>          | <b>713</b>            | <b>672</b>            | <b>35</b>             | <b>27</b>             | <b>10 119</b>         | <b>10 165</b>         |
| Bangladesh                                     | 230                   | 232                   | -                     | -                     | -                     | -                     | 230                   | 232                   |
| China                                          | 4 877                 | 4 938                 | 417                   | 401                   | -                     | -                     | 5 293                 | 5 339                 |
| India                                          | 731                   | 728                   | -                     | -                     | 16                    | 9                     | 715                   | 719                   |
| Iran (Islamic Republic of)                     | 415                   | 416                   | 23                    | 7                     | -                     | -                     | 438                   | 423                   |
| Pakistan                                       | 521                   | 523                   | -                     | -                     | 6                     | 6                     | 515                   | 517                   |
| Saudi Arabia                                   | 123                   | 125                   | 23                    | 24                    | 1                     | 1                     | 145                   | 149                   |
| Turkey                                         | 434                   | 436                   | -                     | -                     | -                     | -                     | 434                   | 436                   |
| <b>AFRICA</b>                                  | <b>3 476</b>          | <b>3 538</b>          | <b>18</b>             | <b>17</b>             | <b>29</b>             | <b>30</b>             | <b>3 465</b>          | <b>3 525</b>          |
| Algeria                                        | 346                   | 347                   | -                     | -                     | -                     | -                     | 346                   | 347                   |
| Nigeria                                        | 388                   | 386                   | -                     | -                     | -                     | -                     | 389                   | 386                   |
| South Africa                                   | 163                   | 165                   | 4                     | 3                     | 1                     | 2                     | 166                   | 166                   |
| <b>CENTRAL AMERICA &amp; THE<br/>CARIBBEAN</b> | <b>132</b>            | <b>134</b>            | <b>16</b>             | <b>13</b>             | <b>1</b>              | <b>1</b>              | <b>147</b>            | <b>145</b>            |
| Mexico                                         | 104                   | 106                   | 7                     | 4                     | 1                     | 1                     | 110                   | 109                   |
| <b>SOUTH AMERICA</b>                           | <b>327</b>            | <b>334</b>            | <b>6</b>              | <b>4</b>              | <b>22</b>             | <b>20</b>             | <b>311</b>            | <b>317</b>            |
| Brazil                                         | 133                   | 135                   | 5                     | 3                     | -                     | -                     | 138                   | 138                   |
| <b>NORTHERN AMERICA</b>                        | <b>96</b>             | <b>91</b>             | <b>150</b>            | <b>151</b>            | <b>4</b>              | <b>6</b>              | <b>242</b>            | <b>236</b>            |
| United States of America                       | 80                    | 76                    | 127                   | 129                   | 4                     | 6                     | 203                   | 198                   |
| <b>EUROPE</b>                                  | <b>1 312</b>          | <b>1 279</b>          | <b>121</b>            | <b>114</b>            | <b>54</b>             | <b>57</b>             | <b>1 379</b>          | <b>1 336</b>          |
| European Union                                 | 945                   | 904                   | 112                   | 106                   | 33                    | 38                    | 1 023                 | 972                   |
| Russian Federation                             | 227                   | 229                   | 3                     | 2                     | 12                    | 11                    | 217                   | 219                   |
| <b>OCEANIA</b>                                 | <b>1 202</b>          | <b>1 130</b>          | <b>31</b>             | <b>28</b>             | <b>906</b>            | <b>853</b>            | <b>327</b>            | <b>305</b>            |
| Australia                                      | 754                   | 677                   | 1                     | 1                     | 515                   | 455                   | 240                   | 223                   |
| New Zealand                                    | 448                   | 452                   | 3                     | 4                     | 391                   | 397                   | 60                    | 58                    |
| <b>WORLD</b>                                   | <b>15 985</b>         | <b>16 025</b>         | <b>1 054</b>          | <b>999</b>            | <b>1 049</b>          | <b>994</b>            | <b>15 990</b>         | <b>16 028</b>         |
| LIFDC                                          | 3 917                 | 3 964                 | 6                     | 5                     | 42                    | 36                    | 3 880                 | 3 933                 |
| LDC                                            | 2 629                 | 2 680                 | 3                     | 3                     | 16                    | 15                    | 2 616                 | 2 669                 |

## APPENDIX TABLE 17: PIG MEAT STATISTICS (thousand tonnes - carcass weight equivalent)

|                                            | Production            |                       | Imports               |                       | Exports               |                       | Utilization           |                       |
|--------------------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
|                                            | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> |
| <b>ASIA</b>                                | <b>54 536</b>         | <b>49 348</b>         | <b>5 606</b>          | <b>7 752</b>          | <b>177</b>            | <b>180</b>            | <b>59 865</b>         | <b>56 896</b>         |
| China                                      | 43 445                | 38 865                | 2 886                 | 5 180                 | 83                    | 65                    | 46 248                | 43 980                |
| India                                      | 295                   | 293                   | 1                     | 1                     | 1                     | 1                     | 295                   | 294                   |
| Indonesia                                  | 325                   | 308                   | 1                     | 3                     | -                     | -                     | 326                   | 311                   |
| Japan                                      | 1 279                 | 1 285                 | 1 505                 | 1 435                 | 3                     | 3                     | 2 727                 | 2 721                 |
| Malaysia                                   | 185                   | 180                   | 26                    | 24                    | 5                     | 5                     | 206                   | 200                   |
| Philippines                                | 1 854                 | 1 479                 | 125                   | 86                    | 2                     | 2                     | 1 978                 | 1 564                 |
| Republic of Korea                          | 1 364                 | 1 396                 | 703                   | 575                   | 2                     | 3                     | 2 019                 | 1 940                 |
| Thailand                                   | 992                   | 1 005                 | 1                     | 1                     | 34                    | 56                    | 959                   | 950                   |
| Viet Nam                                   | 3 233                 | 3 042                 | 74                    | 152                   | 15                    | 12                    | 3 291                 | 3 182                 |
| <b>AFRICA</b>                              | <b>1 617</b>          | <b>1 598</b>          | <b>344</b>            | <b>319</b>            | <b>30</b>             | <b>29</b>             | <b>1 930</b>          | <b>1 887</b>          |
| Madagascar                                 | 64                    | 63                    | -                     | -                     | -                     | -                     | 64                    | 63                    |
| Nigeria                                    | 285                   | 256                   | 1                     | 2                     | -                     | -                     | 286                   | 258                   |
| South Africa                               | 280                   | 283                   | 36                    | 25                    | 26                    | 25                    | 291                   | 284                   |
| Uganda                                     | 129                   | 129                   | 1                     | 1                     | -                     | -                     | 129                   | 130                   |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>2 188</b>          | <b>2 253</b>          | <b>1 287</b>          | <b>1 252</b>          | <b>264</b>            | <b>354</b>            | <b>3 210</b>          | <b>3 152</b>          |
| Cuba                                       | 234                   | 235                   | 18                    | 14                    | -                     | -                     | 252                   | 250                   |
| Mexico                                     | 1 600                 | 1 658                 | 1 016                 | 987                   | 244                   | 334                   | 2 372                 | 2 311                 |
| <b>SOUTH AMERICA</b>                       | <b>6 425</b>          | <b>6 661</b>          | <b>393</b>            | <b>322</b>            | <b>1 188</b>          | <b>1 643</b>          | <b>5 630</b>          | <b>5 339</b>          |
| Argentina                                  | 630                   | 665                   | 40                    | 24                    | 9                     | 30                    | 661                   | 659                   |
| Brazil                                     | 4 000                 | 4 152                 | 3                     | 2                     | 950                   | 1 330                 | 3 052                 | 2 824                 |
| Chile                                      | 517                   | 541                   | 136                   | 127                   | 223                   | 278                   | 430                   | 390                   |
| Colombia                                   | 370                   | 391                   | 139                   | 97                    | -                     | -                     | 509                   | 487                   |
| <b>NORTHERN AMERICA</b>                    | <b>14 734</b>         | <b>15 090</b>         | <b>809</b>            | <b>799</b>            | <b>4 043</b>          | <b>4 730</b>          | <b>11 450</b>         | <b>11 234</b>         |
| Canada                                     | 2 191                 | 2 312                 | 278                   | 310                   | 1 295                 | 1 516                 | 1 163                 | 1 126                 |
| United States of America                   | 12 543                | 12 778                | 527                   | 485                   | 2 749                 | 3 214                 | 10 282                | 10 104                |
| <b>EUROPE</b>                              | <b>29 719</b>         | <b>29 842</b>         | <b>372</b>            | <b>275</b>            | <b>3 802</b>          | <b>4 084</b>          | <b>26 289</b>         | <b>26 033</b>         |
| Belarus                                    | 384                   | 389                   | 29                    | 31                    | 32                    | 30                    | 381                   | 390                   |
| European Union                             | 23 906                | 23 810                | 19                    | 20                    | 3 635                 | 3 857                 | 20 290                | 19 973                |
| Russian Federation                         | 3 945                 | 4 177                 | 125                   | 32                    | 97                    | 157                   | 3 974                 | 4 052                 |
| Serbia                                     | 307                   | 300                   | 46                    | 47                    | 20                    | 20                    | 332                   | 327                   |
| Ukraine                                    | 705                   | 691                   | 31                    | 30                    | 3                     | 4                     | 733                   | 717                   |
| <b>OCEANIA</b>                             | <b>541</b>            | <b>551</b>            | <b>362</b>            | <b>301</b>            | <b>36</b>             | <b>38</b>             | <b>867</b>            | <b>813</b>            |
| Australia                                  | 392                   | 404                   | 271                   | 216                   | 34                    | 35                    | 629                   | 585                   |
| Papua New Guinea                           | 81                    | 77                    | 7                     | 7                     | -                     | -                     | 88                    | 84                    |
| <b>WORLD</b>                               | <b>109 760</b>        | <b>105 343</b>        | <b>9 173</b>          | <b>11 019</b>         | <b>9 542</b>          | <b>11 058</b>         | <b>109 241</b>        | <b>105 355</b>        |
| LIFDC                                      | 4 673                 | 4 488                 | 250                   | 331                   | 18                    | 15                    | 4 904                 | 4 804                 |
| LDC                                        | 2 171                 | 2 101                 | 235                   | 221                   | 1                     | 1                     | 2 406                 | 2 321                 |



## APPENDIX TABLE 18: POULTRY MEAT STATISTICS (thousand tonnes - carcass weight equivalent)

|                                            | Production            |                       | Imports               |                       | Exports               |                       | Utilization           |                       |
|--------------------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
|                                            | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> |
| <b>ASIA</b>                                | <b>50 974</b>         | <b>53 730</b>         | <b>6 594</b>          | <b>7 061</b>          | <b>2 553</b>          | <b>2 535</b>          | <b>55 050</b>         | <b>58 222</b>         |
| China                                      | 23 550                | 26 280                | 1 415                 | 1 935                 | 441                   | 388                   | 24 524                | 27 826                |
| India                                      | 3 873                 | 3 496                 | -                     | 1                     | 6                     | 4                     | 3 868                 | 3 492                 |
| Indonesia                                  | 2 653                 | 2 611                 | -                     | -                     | 2                     | 2                     | 2 651                 | 2 609                 |
| Iran (Islamic Republic of)                 | 2 233                 | 2 276                 | 1                     | 1                     | 48                    | 42                    | 2 186                 | 2 234                 |
| Japan                                      | 2 302                 | 2 364                 | 1 331                 | 1 312                 | 10                    | 11                    | 3 620                 | 3 657                 |
| Kuwait                                     | 65                    | 68                    | 143                   | 148                   | 9                     | 10                    | 198                   | 207                   |
| Malaysia                                   | 2 015                 | 2 031                 | 73                    | 68                    | 56                    | 59                    | 2 032                 | 2 039                 |
| Republic of Korea                          | 920                   | 938                   | 204                   | 188                   | 52                    | 55                    | 1 062                 | 1 056                 |
| Saudi Arabia                               | 624                   | 726                   | 618                   | 554                   | 47                    | 34                    | 1 195                 | 1 246                 |
| Singapore                                  | 105                   | 106                   | 180                   | 204                   | 18                    | 25                    | 267                   | 285                   |
| Thailand                                   | 1 853                 | 1 825                 | 3                     | 2                     | 1 212                 | 1 194                 | 692                   | 622                   |
| Turkey                                     | 2 209                 | 2 273                 | 1                     | 3                     | 498                   | 557                   | 1 712                 | 1 719                 |
| <b>AFRICA</b>                              | <b>6 114</b>          | <b>6 273</b>          | <b>1 953</b>          | <b>1 892</b>          | <b>117</b>            | <b>112</b>            | <b>7 950</b>          | <b>8 053</b>          |
| Angola                                     | 28                    | 28                    | 255                   | 204                   | -                     | -                     | 283                   | 232                   |
| South Africa                               | 1 746                 | 1 889                 | 540                   | 442                   | 57                    | 57                    | 2 229                 | 2 275                 |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>5 215</b>          | <b>5 363</b>          | <b>1 844</b>          | <b>1 794</b>          | <b>41</b>             | <b>43</b>             | <b>7 019</b>          | <b>7 114</b>          |
| Cuba                                       | 25                    | 23                    | 295                   | 258                   | -                     | -                     | 320                   | 282                   |
| Mexico                                     | 3 488                 | 3 613                 | 1 040                 | 1 046                 | 11                    | 14                    | 4 517                 | 4 645                 |
| <b>SOUTH AMERICA</b>                       | <b>23 790</b>         | <b>23 993</b>         | <b>375</b>            | <b>328</b>            | <b>4 593</b>          | <b>4 664</b>          | <b>19 572</b>         | <b>19 656</b>         |
| Argentina                                  | 2 221                 | 2 241                 | 5                     | 4                     | 265                   | 263                   | 1 961                 | 1 982                 |
| Brazil                                     | 15 885                | 16 081                | 5                     | 3                     | 4 133                 | 4 188                 | 11 758                | 11 896                |
| Chile                                      | 765                   | 786                   | 139                   | 115                   | 180                   | 198                   | 724                   | 704                   |
| <b>NORTHERN AMERICA</b>                    | <b>24 478</b>         | <b>24 809</b>         | <b>350</b>            | <b>379</b>            | <b>3 934</b>          | <b>4 027</b>          | <b>20 848</b>         | <b>21 175</b>         |
| Canada                                     | 1 511                 | 1 467                 | 197                   | 212                   | 166                   | 174                   | 1 538                 | 1 503                 |
| United States of America                   | 22 967                | 23 342                | 147                   | 161                   | 3 769                 | 3 853                 | 19 304                | 19 666                |
| <b>EUROPE</b>                              | <b>21 521</b>         | <b>21 394</b>         | <b>1 299</b>          | <b>1 208</b>          | <b>2 619</b>          | <b>2 634</b>          | <b>20 195</b>         | <b>19 963</b>         |
| European Union                             | 14 637                | 14 403                | 718                   | 642                   | 1 773                 | 1 676                 | 13 582                | 13 370                |
| Russian Federation                         | 4 548                 | 4 575                 | 233                   | 231                   | 228                   | 286                   | 4 547                 | 4 516                 |
| Ukraine                                    | 1 416                 | 1 474                 | 136                   | 116                   | 417                   | 434                   | 1 135                 | 1 156                 |
| <b>OCEANIA</b>                             | <b>1 523</b>          | <b>1 557</b>          | <b>118</b>            | <b>114</b>            | <b>81</b>             | <b>76</b>             | <b>1 560</b>          | <b>1 595</b>          |
| Australia                                  | 1 250                 | 1 284                 | 11                    | 5                     | 49                    | 50                    | 1 212                 | 1 239                 |
| New Zealand                                | 223                   | 221                   | 1                     | 1                     | 31                    | 26                    | 193                   | 196                   |
| <b>WORLD</b>                               | <b>133 615</b>        | <b>137 118</b>        | <b>12 533</b>         | <b>12 777</b>         | <b>13 937</b>         | <b>14 091</b>         | <b>132 194</b>        | <b>135 779</b>        |
| LIFDC                                      | 7 271                 | 6 993                 | 1 460                 | 1 573                 | 56                    | 55                    | 8 675                 | 8 510                 |
| LDC                                        | 3 637                 | 3 665                 | 1 134                 | 1 085                 | 20                    | 20                    | 4 751                 | 4 730                 |

## APPENDIX TABLE 19: MILK AND MILK PRODUCTS STATISTICS (thousand tonnes - milk equivalent)

|                                                | Production           |                       |                       | Imports              |                       |                       | Exports              |                       |                       |
|------------------------------------------------|----------------------|-----------------------|-----------------------|----------------------|-----------------------|-----------------------|----------------------|-----------------------|-----------------------|
|                                                | 2016-2018<br>average | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2016-2018<br>average | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> | 2016-2018<br>average | 2019<br><i>estim.</i> | 2020<br><i>f'cast</i> |
| <b>ASIA</b>                                    | <b>334 869</b>       | <b>355 002</b>        | <b>361 986</b>        | <b>43 699</b>        | <b>46 964</b>         | <b>46 710</b>         | <b>7 467</b>         | <b>8 157</b>          | <b>7 426</b>          |
| China                                          | 32 663               | 33 048                | 34 124                | 12 078               | 15 724                | 16 675                | 42                   | 49                    | 44                    |
| India <sup>1</sup>                             | 176 445              | 191 000               | 195 000               | 115                  | 88                    | 132                   | 381                  | 437                   | 204                   |
| Indonesia                                      | 1 523                | 1 514                 | 1 516                 | 2 849                | 3 212                 | 3 099                 | 48                   | 51                    | 53                    |
| Iran (Islamic Republic of)                     | 7 373                | 7 610                 | 7 597                 | 341                  | 264                   | 115                   | 785                  | 713                   | 637                   |
| Japan                                          | 7 320                | 7 314                 | 7 390                 | 2 098                | 2 291                 | 2 185                 | 10                   | 10                    | 10                    |
| Malaysia                                       | 52                   | 52                    | 52                    | 2 268                | 2 432                 | 2 347                 | 656                  | 666                   | 576                   |
| Pakistan                                       | 44 358               | 47 297                | 48 558                | 579                  | 543                   | 418                   | 33                   | 34                    | 31                    |
| Philippines                                    | 18                   | 15                    | 16                    | 2 451                | 2 827                 | 2 259                 | 115                  | 100                   | 88                    |
| Republic of Korea                              | 2 058                | 2 036                 | 2 055                 | 1 178                | 1 328                 | 1 333                 | 29                   | 34                    | 37                    |
| Saudi Arabia                                   | 2 447                | 2 491                 | 2 502                 | 2 784                | 2 524                 | 2 682                 | 1 510                | 1 542                 | 1 590                 |
| Singapore                                      | -                    | -                     | -                     | 1 545                | 1 531                 | 1 497                 | 484                  | 455                   | 427                   |
| Thailand                                       | 802                  | 655                   | 656                   | 1 536                | 1 673                 | 1 658                 | 270                  | 293                   | 290                   |
| Turkey                                         | 20 437               | 21 530                | 21 933                | 180                  | 297                   | 190                   | 887                  | 1 060                 | 853                   |
| <b>AFRICA</b>                                  | <b>48 024</b>        | <b>46 820</b>         | <b>46 954</b>         | <b>9 770</b>         | <b>9 597</b>          | <b>10 265</b>         | <b>1 157</b>         | <b>1 181</b>          | <b>1 128</b>          |
| Algeria                                        | 3 439                | 3 145                 | 3 164                 | 3 401                | 3 116                 | 3 602                 | 1                    | 1                     | 1                     |
| Egypt                                          | 4 990                | 4 492                 | 4 533                 | 1 304                | 1 283                 | 1 216                 | 398                  | 508                   | 480                   |
| Kenya                                          | 4 990                | 5 016                 | 5 108                 | 145                  | 247                   | 188                   | 3                    | 1                     | 1                     |
| South Africa                                   | 3 648                | 3 779                 | 3 759                 | 303                  | 395                   | 428                   | 373                  | 367                   | 364                   |
| Tunisia                                        | 1 403                | 1 410                 | 1 429                 | 88                   | 137                   | 127                   | 65                   | 34                    | 30                    |
| <b>CENTRAL AMERICA &amp; THE<br/>CARIBBEAN</b> | <b>17 714</b>        | <b>18 961</b>         | <b>19 291</b>         | <b>6 144</b>         | <b>6 724</b>          | <b>6 611</b>          | <b>1 308</b>         | <b>834</b>            | <b>824</b>            |
| Costa Rica                                     | 1 148                | 1 168                 | 1 181                 | 59                   | 59                    | 62                    | 139                  | 151                   | 157                   |
| Mexico                                         | 12 014               | 13 266                | 13 571                | 3 947                | 4 356                 | 4 223                 | 809                  | 326                   | 318                   |
| <b>SOUTH AMERICA</b>                           | <b>61 615</b>        | <b>61 626</b>         | <b>61 524</b>         | <b>3 505</b>         | <b>2 633</b>          | <b>2 758</b>          | <b>3 830</b>         | <b>3 788</b>          | <b>4 452</b>          |
| Argentina                                      | 10 305               | 10 343                | 11 061                | 31                   | 37                    | 19                    | 1 711                | 1 708                 | 2 365                 |
| Brazil                                         | 33 875               | 34 897                | 33 954                | 1 273                | 941                   | 912                   | 131                  | 73                    | 81                    |
| Colombia                                       | 6 568                | 5 646                 | 5 580                 | 359                  | 453                   | 580                   | 23                   | 9                     | 8                     |
| Uruguay                                        | 2 083                | 2 168                 | 2 266                 | 30                   | 34                    | 29                    | 1 427                | 1 484                 | 1 467                 |
| <b>NORTHERN AMERICA</b>                        | <b>106 771</b>       | <b>108 561</b>        | <b>110 305</b>        | <b>2 674</b>         | <b>2 911</b>          | <b>2 969</b>          | <b>11 786</b>        | <b>11 733</b>         | <b>12 949</b>         |
| Canada                                         | 9 165                | 9 503                 | 9 511                 | 623                  | 803                   | 862                   | 945                  | 950                   | 1 102                 |
| United States of America                       | 97 605               | 99 057                | 100 793               | 2 034                | 2 092                 | 2 091                 | 10 840               | 10 781                | 11 846                |
| <b>EUROPE</b>                                  | <b>223 175</b>       | <b>226 332</b>        | <b>228 693</b>        | <b>6 397</b>         | <b>6 337</b>          | <b>6 556</b>          | <b>26 149</b>        | <b>28 000</b>         | <b>28 531</b>         |
| Belarus                                        | 7 269                | 7 394                 | 7 749                 | 90                   | 51                    | 55                    | 3 895                | 3 911                 | 4 275                 |
| European Union <sup>2</sup>                    | 165 234              | 167 811               | 169 824               | 1 200                | 1 041                 | 931                   | 19 918               | 22 080                | 22 371                |
| Russian Federation                             | 30 195               | 31 351                | 31 964                | 4 092                | 3 985                 | 4 068                 | 280                  | 249                   | 312                   |
| Ukraine                                        | 10 244               | 9 676                 | 9 026                 | 72                   | 166                   | 391                   | 750                  | 633                   | 492                   |
| <b>OCEANIA</b>                                 | <b>31 067</b>        | <b>30 689</b>         | <b>31 372</b>         | <b>1 578</b>         | <b>1 722</b>          | <b>1 826</b>          | <b>22 129</b>        | <b>23 068</b>         | <b>22 584</b>         |
| Australia                                      | 9 472                | 8 833                 | 9 239                 | 1 074                | 1 206                 | 1 335                 | 3 154                | 2 732                 | 2 612                 |
| New Zealand                                    | 21 527               | 21 787                | 22 064                | 287                  | 292                   | 265                   | 18 970               | 20 332                | 19 967                |
| <b>WORLD</b>                                   | <b>823 234</b>       | <b>847 992</b>        | <b>860 125</b>        | <b>75 879</b>        | <b>76 888</b>         | <b>77 694</b>         | <b>76 008</b>        | <b>76 761</b>         | <b>77 895</b>         |
| LIFDC                                          | 229 852              | 245 367               | 249 548               | 6 067                | 6 384                 | 6 380                 | 1 095                | 1 140                 | 863                   |
| LDC                                            | 34 252               | 33 643                | 33 613                | 3 978                | 4 079                 | 3 965                 | 221                  | 195                   | 188                   |

<sup>1</sup> For production, the annual dairy cycle starting in April is applied.

<sup>2</sup> Including data for the United Kingdom of Great Britain and Northern Ireland.

Note: Trade values that refer to milk equivalents were derived by applying the following weights: butter (6.60), cheese (4.40), skim/whole milk powder (7.60), whole condensed/evaporated milk (2.10), yoghurt (1.0), cream (3.60), casein (7.40), skim milk (0.70), liquid milk (1.0), whey dry (7.6). The conversion factors cited refer to the solids content method. Refer to IDF Bulletin No. 390 (March 2004).

## APPENDIX TABLE 20: FISH AND FISHERY PRODUCTS STATISTICS<sup>1</sup>

|                                            | Capture fisheries production                   |             | Aquaculture fisheries production |             | Exports            |               |               | Imports            |               |               |
|--------------------------------------------|------------------------------------------------|-------------|----------------------------------|-------------|--------------------|---------------|---------------|--------------------|---------------|---------------|
|                                            | 2017                                           | 2018        | 2017                             | 2018        | 2018               | 2019          | 2020          | 2018               | 2019          | 2020          |
|                                            | <i>Million tonnes (live weight equivalent)</i> |             |                                  |             | <i>USD billion</i> |               |               | <i>USD billion</i> |               |               |
|                                            |                                                |             |                                  |             |                    | <i>estim.</i> | <i>f'cast</i> |                    | <i>estim.</i> | <i>f'cast</i> |
| <b>ASIA<sup>2</sup></b>                    | <b>49.4</b>                                    | <b>49.6</b> | <b>70.7</b>                      | <b>72.8</b> | <b>61.7</b>        | <b>58.9</b>   | <b>55.7</b>   | <b>54.7</b>        | <b>57.3</b>   | <b>53.3</b>   |
| China                                      | 16.3                                           | 15.6        | 47.1                             | 47.8        | 24.4               | 22.6          | 20.8          | 20.0               | 23.3          | 21.5          |
| China, Hong Kong SAR                       | 0.1                                            | 0.1         | -                                | -           | 0.7                | 0.7           | 0.5           | 3.9                | 3.4           | 3.1           |
| Taiwan Province of China                   | 0.8                                            | 0.8         | 0.3                              | 0.3         | 2.0                | 1.9           | 1.7           | 1.6                | 1.7           | 1.7           |
| India                                      | 5.5                                            | 5.3         | 6.2                              | 7.1         | 6.9                | 6.9           | 6.2           | 0.1                | 0.2           | 0.2           |
| Indonesia                                  | 6.7                                            | 7.2         | 5.5                              | 5.4         | 4.5                | 4.5           | 4.7           | 0.4                | 0.4           | 0.4           |
| Japan                                      | 3.2                                            | 3.1         | 0.6                              | 0.6         | 2.3                | 2.2           | 2.1           | 15.4               | 15.1          | 13.8          |
| Republic of Korea                          | 1.4                                            | 1.3         | 0.6                              | 0.6         | 1.7                | 1.8           | 1.6           | 5.9                | 5.6           | 5.4           |
| Philippines                                | 1.9                                            | 2.0         | 0.8                              | 0.8         | 0.9                | 0.8           | 0.8           | 0.6                | 0.7           | 0.6           |
| Thailand                                   | 1.5                                            | 1.7         | 0.9                              | 0.9         | 6.0                | 5.8           | 5.8           | 3.9                | 3.7           | 3.4           |
| Viet Nam                                   | 3.3                                            | 3.3         | 3.8                              | 4.1         | 8.9                | 8.6           | 8.1           | 1.8                | 1.8           | 1.7           |
| <b>AFRICA</b>                              | <b>10.0</b>                                    | <b>10.1</b> | <b>2.1</b>                       | <b>2.2</b>  | <b>8.1</b>         | <b>7.9</b>    | <b>7.4</b>    | <b>5.7</b>         | <b>5.7</b>    | <b>5.2</b>    |
| Egypt                                      | 0.4                                            | 0.4         | 1.5                              | 1.6         | -                  | -             | -             | 0.9                | 1.0           | 0.9           |
| Morocco                                    | 1.4                                            | 1.4         | -                                | -           | 2.3                | 2.2           | 2.1           | 0.2                | 0.2           | 0.2           |
| Namibia                                    | 0.5                                            | 0.5         | -                                | -           | 0.8                | 0.7           | 0.7           | 0.1                | 0.1           | 0.1           |
| Nigeria                                    | 0.9                                            | 0.9         | 0.3                              | 0.3         | 0.1                | 0.1           | -             | 0.8                | 0.8           | 0.8           |
| Senegal                                    | 0.5                                            | 0.5         | -                                | -           | 0.5                | 0.6           | 0.5           | -                  | -             | -             |
| South Africa                               | 0.5                                            | 0.6         | -                                | -           | 0.7                | 0.6           | 0.6           | 0.5                | 0.5           | 0.4           |
| <b>CENTRAL AMERICA &amp; THE CARIBBEAN</b> | <b>2.3</b>                                     | <b>2.4</b>  | <b>0.4</b>                       | <b>0.4</b>  | <b>2.9</b>         | <b>2.7</b>    | <b>2.5</b>    | <b>2.0</b>         | <b>1.8</b>    | <b>1.7</b>    |
| Mexico                                     | 1.6                                            | 1.7         | 0.2                              | 0.2         | 1.5                | 1.4           | 1.3           | 0.9                | 0.8           | 0.7           |
| Panama                                     | 0.1                                            | 0.2         | -                                | -           | 0.2                | 0.2           | 0.1           | 0.1                | 0.1           | 0.1           |
| <b>SOUTH AMERICA</b>                       | <b>8.9</b>                                     | <b>12.1</b> | <b>2.5</b>                       | <b>2.7</b>  | <b>18.2</b>        | <b>18.5</b>   | <b>17.5</b>   | <b>3.1</b>         | <b>2.9</b>    | <b>2.6</b>    |
| Argentina                                  | 0.8                                            | 0.8         | -                                | -           | 2.1                | 1.8           | 1.7           | 0.2                | 0.2           | 0.1           |
| Brazil                                     | 0.7                                            | 0.7         | 0.6                              | 0.6         | 0.3                | 0.3           | 0.3           | 1.4                | 1.3           | 1.1           |
| Chile                                      | 1.9                                            | 2.1         | 1.2                              | 1.3         | 6.8                | 6.6           | 6.3           | 0.4                | 0.4           | 0.4           |
| Ecuador                                    | 0.6                                            | 0.6         | 0.5                              | 0.5         | 4.9                | 5.5           | 5.5           | 0.2                | 0.2           | 0.2           |
| Peru                                       | 4.2                                            | 7.2         | 0.1                              | 0.1         | 3.3                | 3.5           | 2.9           | 0.3                | 0.3           | 0.3           |
| <b>NORTHERN AMERICA</b>                    | <b>6.2</b>                                     | <b>5.9</b>  | <b>0.6</b>                       | <b>0.7</b>  | <b>12.0</b>        | <b>11.9</b>   | <b>10.9</b>   | <b>26.8</b>        | <b>26.4</b>   | <b>25.8</b>   |
| Canada                                     | 0.8                                            | 0.8         | 0.2                              | 0.2         | 5.4                | 5.7           | 5.2           | 3.0                | 3.2           | 3.1           |
| United States of America                   | 5.0                                            | 4.7         | 0.4                              | 0.5         | 6.0                | 5.6           | 5.1           | 23.7               | 23.2          | 22.7          |
| <b>EUROPE</b>                              | <b>14.8</b>                                    | <b>15.0</b> | <b>3.0</b>                       | <b>3.1</b>  | <b>59.2</b>        | <b>58.1</b>   | <b>55.1</b>   | <b>65.5</b>        | <b>63.4</b>   | <b>60.6</b>   |
| European Union <sup>2</sup>                | 4.9                                            | 4.7         | 1.1                              | 1.2         | 35.0               | 33.3          | 31.6          | 55.2               | 52.8          | 50.4          |
| of which extra-EU                          | -                                              | -           | -                                | -           | 8.0                | 7.6           | 7.3           | 30.3               | 29.3          | 27.8          |
| Iceland                                    | 1.2                                            | 1.3         | -                                | -           | 2.4                | 2.4           | 2.2           | 0.1                | 0.1           | 0.1           |
| Norway                                     | 2.4                                            | 2.5         | 1.3                              | 1.4         | 12.0               | 12.0          | 11.4          | 1.3                | 1.3           | 1.3           |
| Russian Federation                         | 4.9                                            | 5.1         | 0.2                              | 0.2         | 5.3                | 5.7           | 5.5           | 2.2                | 2.2           | 2.1           |
| <b>OCEANIA</b>                             | <b>1.4</b>                                     | <b>1.4</b>  | <b>0.2</b>                       | <b>0.2</b>  | <b>3.3</b>         | <b>3.4</b>    | <b>3.0</b>    | <b>2.0</b>         | <b>1.9</b>    | <b>1.8</b>    |
| Australia                                  | 0.2                                            | 0.2         | 0.1                              | 0.1         | 1.1                | 1.1           | 0.9           | 1.6                | 1.5           | 1.4           |
| New Zealand                                | 0.4                                            | 0.4         | 0.1                              | 0.1         | 1.2                | 1.3           | 1.1           | 0.2                | 0.2           | 0.2           |
| <b>WORLD<sup>3</sup></b>                   | <b>93.1</b>                                    | <b>96.4</b> | <b>79.5</b>                      | <b>82.1</b> | <b>165.4</b>       | <b>161.3</b>  | <b>152.2</b>  | <b>159.7</b>       | <b>159.4</b>  | <b>151.1</b>  |
| Excl. intra-EU                             | -                                              | -           | -                                | -           | 138.4              | 135.6         | 127.9         | 134.7              | 135.9         | 128.5         |
| LIFDC                                      | 16.4                                           | 16.5        | 12.8                             | 14.1        | 19.6               | 19.4          | 18.0          | 4.1                | 4.1           | 3.9           |
| LDC                                        | 10.0                                           | 10.0        | 4.0                              | 4.2         | 4.2                | 4.3           | 4.1           | 1.3                | 1.3           | 1.2           |

<sup>1</sup> Production and trade data exclude whales, seals, other aquatic mammals and aquatic plants. Trade data include fishmeal and fish oil

<sup>2</sup> EU-27. Including intra-trade. Cyprus is included in Asia as well as in the European Union

<sup>3</sup> For capture fisheries production, the aggregate includes also 13 323 tonnes in 2017 and 14 263 tonnes in 2018 of not identified countries these data are not included in any other aggregates. Totals may not match due to rounding

## APPENDIX TABLE 21: SELECTED INTERNATIONAL PRICES FOR WHEAT AND COARSE GRAINS

| Period                    | Wheat                                                  |                                          |                                     | Maize                           |                        | Barley               |                                      | Sorghum                         |
|---------------------------|--------------------------------------------------------|------------------------------------------|-------------------------------------|---------------------------------|------------------------|----------------------|--------------------------------------|---------------------------------|
|                           | US No. 2 Hard<br>Red Winter<br>Ord. Prot. <sup>1</sup> | US Soft Red<br>Winter No. 2 <sup>2</sup> | Argentina<br>Trigo Pan <sup>3</sup> | US No. 2<br>Yellow <sup>2</sup> | Argentina <sup>3</sup> | France feed<br>Rouen | Australia feed<br>Southern<br>States | US No. 2<br>Yellow <sup>2</sup> |
| ..... (USD/tonne) .....   |                                                        |                                          |                                     |                                 |                        |                      |                                      |                                 |
| <b>Annual (July/June)</b> |                                                        |                                          |                                     |                                 |                        |                      |                                      |                                 |
| 2009/10                   | 209                                                    | 185                                      | 224                                 | 160                             | 168                    | 146                  | 154                                  | 165                             |
| 2010/11                   | 316                                                    | 289                                      | 311                                 | 254                             | 260                    | 266                  | 248                                  | 248                             |
| 2011/12                   | 300                                                    | 259                                      | 264                                 | 281                             | 269                    | 270                  | 249                                  | 264                             |
| 2012/13                   | 348                                                    | 310                                      | 336                                 | 311                             | 277                    | 297                  | 298                                  | 281                             |
| 2013/14                   | 318                                                    | 265                                      | 335                                 | 216                             | 219                    | 243                  | 241                                  | 281                             |
| 2014/15                   | 266                                                    | 221                                      | 246                                 | 173                             | 177                    | 205                  | 243                                  | 210                             |
| 2015/16                   | 211                                                    | 194                                      | 208                                 | 166                             | 170                    | 174                  | 185                                  | 174                             |
| 2016/17                   | 197                                                    | 170                                      | 190                                 | 156                             | 172                    | 159                  | 162                                  | 151                             |
| 2017/18                   | 230                                                    | 188                                      | 203                                 | 159                             | 165                    | 193                  | 222                                  | 174                             |
| 2018/19                   | 232                                                    | 210                                      | 233                                 | 166                             | 166                    | 163                  | 265                                  | 163                             |
| 2019/20                   | 220                                                    | 219                                      | 231                                 | 163                             | 163                    | 163                  | 163                                  | 163                             |
| 2019 – October            | 212                                                    | 213                                      | 229                                 | 168                             | 157                    | 164                  | 221                                  | 164                             |
| 2019 – November           | 220                                                    | 225                                      | 198                                 | 167                             | 167                    | 162                  | 209                                  | 164                             |
| 2019 – December           | 225                                                    | 238                                      | 203                                 | 168                             | 173                    | 165                  | 217                                  | 158                             |
| 2020 – January            | 237                                                    | 249                                      | 226                                 | 172                             | 185                    | 167                  | 226                                  | 147                             |
| 2020 – February           | 230                                                    | 240                                      | 240                                 | 170                             | 179                    | 165                  | 217                                  | 149                             |
| 2020 – March              | 227                                                    | 230                                      | 243                                 | 162                             | 170                    | 165                  | 202                                  | 164                             |
| 2020 – April              | 232                                                    | 222                                      | 244                                 | 145                             | 155                    | 165                  | 217                                  | 162                             |
| 2020 – May                | 223                                                    | 211                                      | 239                                 | 144                             | 146                    | 176                  | 194                                  | 165                             |
| 2020 – June               | 216                                                    | 200                                      | 241                                 | 149                             | 149                    | 173                  | 192                                  | 167                             |
| 2020 – July               | 220                                                    | 210                                      | 244                                 | 151                             | 153                    | 180                  | 191                                  | 165                             |
| 2020 – August             | 221                                                    | 207                                      | 240                                 | 148                             | 163                    | 195                  | 192                                  | 165                             |
| 2020 – September          | 246                                                    | 220                                      | 246                                 | 166                             | 185                    | 217                  | 197                                  | 165                             |
| 2020 – October            | 273                                                    | 245                                      | 257                                 | 187                             | 217                    | 236                  | 209                                  | 176                             |

<sup>1</sup> Delivered United States f.o.b Gulf; <sup>2</sup> Delivered United States Gulf; <sup>3</sup> Up River f.o.b.  
Sources: International Grain Council and USDA.

## APPENDIX TABLE 22: TOTAL WHEAT AND MAIZE FUTURES PRICES

|                         | December |          | March    |          | May      |          | July      |           |
|-------------------------|----------|----------|----------|----------|----------|----------|-----------|-----------|
|                         | Dec 2020 | Dec 2019 | Mar 2020 | Mar 2019 | May 2020 | May 2019 | July 2021 | July 2020 |
| ..... (USD/tonne) ..... |          |          |          |          |          |          |           |           |
| <b>Wheat</b>            |          |          |          |          |          |          |           |           |
| September 25            | 200      | 175      | 203      | 178      | 204      | 180      | 204       | 181       |
| October 2               | 211      | 180      | 213      | 182      | 214      | 184      | 213       | 186       |
| October 9               | 219      | 184      | 220      | 186      | 220      | 188      | 218       | 190       |
| October 16              | 230      | 189      | 229      | 190      | 228      | 192      | 224       | 193       |
| October 23              | 232      | 191      | 232      | 193      | 232      | 195      | 227       | 196       |
| October 30              | 220      | 187      | 220      | 189      | 221      | 191      | 218       | 193       |
| <b>Maize</b>            |          |          |          |          |          |          |           |           |
| September 25            | 144      | 147      | 147      | 152      | 149      | 155      | 151       | 157       |
| October 2               | 149      | 153      | 153      | 157      | 155      | 159      | 157       | 160       |
| October 9               | 156      | 155      | 158      | 160      | 160      | 162      | 161       | 163       |
| October 16              | 158      | 154      | 160      | 159      | 161      | 161      | 161       | 163       |
| October 23              | 165      | 153      | 165      | 157      | 166      | 160      | 165       | 162       |
| October 30              | 157      | 154      | 159      | 157      | 160      | 160      | 160       | 162       |

Source: Chicago Board of Trade (CBOT)

## APPENDIX TABLE 23: SELECTED INTERNATIONAL PRICES FOR RICE AND PRICE INDICES

| Period                  | International prices      |                          |                            |                               | FAO indices                 |        |          |          |           |
|-------------------------|---------------------------|--------------------------|----------------------------|-------------------------------|-----------------------------|--------|----------|----------|-----------|
|                         | Thai 100% B <sup>1</sup>  | Thai broken <sup>2</sup> | US long grain <sup>3</sup> | Pakistan Basmati <sup>4</sup> | FAO All Rice Price Index    | Indica | Japonica | Aromatic | Glutinous |
| <b>Annual (Jan/Dec)</b> | .....(USD per tonne)..... |                          |                            |                               | ..... (2014-2016=100) ..... |        |          |          |           |
| 2013                    | 534                       | 483                      | 628                        | 1372                          | 118                         | 118    | 83       | 125      | 112       |
| 2014                    | 435                       | 322                      | 571                        | 1324                          | 112                         | 108    | 119      | 129      | 102       |
| 2015                    | 395                       | 327                      | 490                        | 849                           | 96                          | 97     | 102      | 94       | 96        |
| 2016                    | 407                       | 348                      | 438                        | 795                           | 91                          | 96     | 79       | 77       | 102       |
| 2017                    | 415                       | 334                      | 456                        | 1131                          | 99                          | 100    | 80       | 101      | 88        |
| 2018                    | 445                       | 365                      | 531                        | 1023                          | 106                         | 108    | 91       | 108      | 89        |
| 2019                    | 435                       | 385                      | 500                        | 982                           | 101                         | 101    | 80       | 106      | 124       |
| <b>Monthly</b>          |                           |                          |                            |                               |                             |        |          |          |           |
| 2019 – October          | 440                       | 398                      | 509                        | 989                           | 104                         | 102    | 80       | 110      | 154       |
| 2019 – November         | 439                       | 395                      | 511                        | 976                           | 102                         | 101    | 81       | 106      | 145       |
| 2019 – December         | 449                       | 394                      | 515                        | 943                           | 102                         | 101    | 83       | 103      | 141       |
| 2020 – January          | 468                       | 404                      | 533                        | 961                           | 103                         | 104    | 85       | 100      | 144       |
| 2020 – February         | 467                       | 414                      | 558                        | 988                           | 104                         | 106    | 86       | 97       | 137       |
| 2020 – March            | 509                       | 421                      | 581                        | 911                           | 106                         | 110    | 88       | 95       | 128       |
| 2020 – April            | 582                       | 442                      | 636                        | 999                           | 115                         | 119    | 93       | 100      | 132       |
| 2020 – May              | 535                       | 440                      | 646                        | 1047                          | 116                         | 120    | 94       | 104      | 134       |
| 2020 – June             | 536                       | 434                      | 646                        | 995                           | 114                         | 118    | 93       | 102      | 133       |
| 2020 – July             | 496                       | 422                      | 646                        | 986                           | 110                         | 115    | 93       | 95       | 126       |
| 2020 – August           | 521                       | 425                      | 615                        | 980                           | 113                         | 118    | 93       | 100      | 128       |
| 2020 – September        | 526                       | 428                      | 600                        | 975                           | 112                         | 116    | 90       | 98       | 123       |
| 2020 – October          | 492                       | 431                      | 580                        | 971                           | 109                         | 114    | 86       | 96       | 101       |

<sup>1</sup> White rice - 100% second grade - f.o.b. Bangkok - indicative traded prices.

<sup>2</sup> A1 super - f.o.b. Bangkok - indicative traded prices.

<sup>3</sup> US No.2 - 4% broken f.o.b.

<sup>4</sup> Up to May 2011: Basmati ordinary - f.o.b. Karachi; from June 2011 onwards: Super Kernel White Basmati Rice 2%.

Note: The FAO Rice Price Index is based on 21 rice export quotations. 'Quality' is defined by the percentage of broken kernels, with higher (lower) quality referring to rice with less (equal to or more) than 15 percent broken. The sub-index for Aromatic Rice follows movements in prices of Basmati and Fragrant rice.

Sources: FAO for indices. Rice prices: Creed Rice Market Report, Livericeindex.com, Thai Department of Foreign Trade (DFT), Viettraders and other public sources

## APPENDIX TABLE 24: SELECTED INTERNATIONAL PRICES FOR OILCROP PRODUCTS AND PRICE INDICES

| Period                      | International prices <sup>1</sup> |                          |                       |                           |                            | FAO indices <sup>8</sup>    |                |                |
|-----------------------------|-----------------------------------|--------------------------|-----------------------|---------------------------|----------------------------|-----------------------------|----------------|----------------|
|                             | Soybeans <sup>2</sup>             | Soybean oil <sup>3</sup> | Palm oil <sup>4</sup> | Soybean cake <sup>5</sup> | Rapeseed meal <sup>6</sup> | Oilseeds                    | Vegetable oils | Oilcakes/meals |
|                             | ..... (USD per tonne) .....       |                          |                       |                           |                            | ..... (2014-2016=100) ..... |                |                |
| <b>Annual (Oct/Sept)</b>    |                                   |                          |                       |                           |                            |                             |                |                |
| 2004/05                     | 275                               | 545                      | 419                   | 212                       | 130                        | 64                          | 65             | 51             |
| 2005/06                     | 259                               | 572                      | 451                   | 202                       | 130                        | 62                          | 67             | 49             |
| 2006/07                     | 335                               | 772                      | 684                   | 264                       | 184                        | 80                          | 93             | 66             |
| 2007/08                     | 549                               | 1325                     | 1050                  | 445                       | 296                        | 133                         | 153            | 109            |
| 2008/09                     | 437                               | 849                      | 682                   | 409                       | 206                        | 96                          | 90             | 89             |
| 2009/10                     | 429                               | 924                      | 806                   | 388                       | 220                        | 100                         | 109            | 92             |
| 2010/11                     | 549                               | 1308                     | 1147                  | 418                       | 279                        | 132                         | 159            | 102            |
| 2011/12                     | 562                               | 1235                     | 1051                  | 461                       | 295                        | 132                         | 143            | 111            |
| 2012/13                     | 563                               | 1099                     | 835                   | 539                       | 345                        | 131                         | 120            | 129            |
| 2013/14                     | 521                               | 949                      | 867                   | 534                       | 324                        | 120                         | 116            | 128            |
| 2014/15                     | 407                               | 777                      | 658                   | 406                       | 270                        | 95                          | 93             | 99             |
| 2015/16                     | 396                               | 773                      | 655                   | 351                       | 232                        | 93                          | 95             | 85             |
| 2016/17                     | 404                               | 806                      | 729                   | 336                       | 225                        | 95                          | 103            | 81             |
| 2017/18                     | 402                               | 820                      | 648                   | 381                       | 258                        | 94                          | 94             | 93             |
| 2018/19                     | 370                               | 744                      | 523                   | 328                       | 247                        | 88                          | 80             | 81             |
| 2019/20                     | 379                               | 783                      | 668                   | 338                       | 243                        | 90                          | 93             | 84             |
| <b>Monthly</b>              |                                   |                          |                       |                           |                            |                             |                |                |
| 2019 – January              | 381                               | 746                      | 534                   | 343                       | 273                        | 90                          | 80             | 85             |
| 2019 – February             | 380                               | 766                      | 558                   | 330                       | 263                        | 90                          | 82             | 80             |
| 2019 – March                | 371                               | 730                      | 527                   | 320                       | 248                        | 88                          | 78             | 79             |
| 2019 – April                | 365                               | 733                      | 534                   | 318                       | 244                        | 87                          | 79             | 79             |
| 2019 – May                  | 347                               | 738                      | 510                   | 320                       | 234                        | 83                          | 79             | 79             |
| 2019 – June                 | 369                               | 725                      | 505                   | 337                       | 236                        | 87                          | 78             | 83             |
| 2019 – July                 | 374                               | 738                      | 498                   | 322                       | 225                        | 88                          | 78             | 79             |
| 2019 – August               | 363                               | 775                      | 540                   | 315                       | 215                        | 86                          | 83             | 78             |
| 2019 – September            | 366                               | 765                      | 563                   | 315                       | 201                        | 87                          | 84             | 77             |
| 2019 – October              | 386                               | 765                      | 579                   | 319                       | 214                        | 91                          | 84             | 78             |
| 2019 – November             | 377                               | 771                      | 683                   | 318                       | 216                        | 89                          | 93             | 78             |
| 2019 – December             | 377                               | 814                      | 765                   | 324                       | 237                        | 90                          | 101            | 80             |
| 2020 – January              | 391                               | 872                      | 840                   | 332                       | 240                        | 94                          | 109            | 82             |
| 2020 – February             | 376                               | 801                      | 741                   | 334                       | 245                        | 90                          | 98             | 83             |
| 2020 – March                | 367                               | 722                      | 621                   | 364                       | 255                        | 87                          | 85             | 89             |
| 2020 – April                | 363                               | 675                      | 573                   | 363                       | 280                        | 87                          | 81             | 90             |
| 2020 – May                  | 361                               | 675                      | 531                   | 328                       | 262                        | 86                          | 78             | 83             |
| 2020 – June                 | 369                               | 741                      | 594                   | 325                       | 229                        | 88                          | 87             | 81             |
| 2020 – July                 | 383                               | 815                      | 659                   | 329                       | 227                        | 91                          | 93             | 81             |
| 2020 – August               | 387                               | 865                      | 707                   | 345                       | 245                        | 92                          | 99             | 85             |
| 2020 – September            | 418                               | 893                      | 740                   | 378                       | 270                        | 99                          | 105            | 93             |
| 2020 – October <sup>7</sup> | 452                               | 906                      | 758                   | 425                       | 294                        | 107                         | 106            | 105            |

<sup>1</sup> Spot prices for nearest forward shipment

<sup>2</sup> Soybeans: US, No.2 yellow, c.i.f. Rotterdam

<sup>3</sup> Soybean oil: Dutch, fob ex-mill

<sup>4</sup> Palm oil: Crude, c.i.f. Northwest Europe

<sup>5</sup> Soybean cake: Pellets, 44/45 percent, Argentina, c.i.f. Rotterdam

<sup>6</sup> Rapeseed meal: 34 percent, Hamburg, f.o.b. ex-mill

<sup>7</sup> The international prices shown represent averages for four out of five quotations for the month.

<sup>8</sup> The FAO indices are based on the international prices of five selected seeds, ten selected oils and five selected cakes and meals. The indices are calculated using the Laspeyres formula; the weights used are derived from the export values of each commodity for the 2014–2016 period.

Sources: FAO and Oil World.

## APPENDIX TABLE 25: SELECTED INTERNATIONAL PRICES FOR SUGAR AND SUGAR PRICE INDEX

| Annual (Jan/Dec) | I.S.A. daily price average <sup>1</sup> | FAO Sugar Price Index<br>(2014/16 = 100) |
|------------------|-----------------------------------------|------------------------------------------|
|                  | Raw sugar                               |                                          |
|                  | (US Cents/lb)                           | (2014/16=100)                            |
| 2009             | 18.1                                    | 112.2                                    |
| 2010             | 21.3                                    | 131.7                                    |
| 2011             | 26.0                                    | 160.9                                    |
| 2012             | 21.5                                    | 133.3                                    |
| 2013             | 17.7                                    | 109.5                                    |
| 2014             | 17.0                                    | 105.2                                    |
| 2015             | 13.4                                    | 83.2                                     |
| 2016             | 18.0                                    | 111.6                                    |
| 2017             | 16.0                                    | 99.1                                     |
| 2018             | 12.5                                    | 77.4                                     |
| 2019             | 12.6                                    | 78.6                                     |
| 2020             | 12.6                                    | 77.2                                     |
| <b>Monthly</b>   |                                         |                                          |
| 2018 - November  | 12.9                                    | 79.9                                     |
| 2018 - December  | 12.7                                    | 78.3                                     |
| 2019 - January   | 12.8                                    | 79.3                                     |
| 2019 - February  | 13.0                                    | 80.3                                     |
| 2019 - March     | 12.7                                    | 78.7                                     |
| 2019 - April     | 12.8                                    | 79.3                                     |
| 2019 - May       | 12.4                                    | 76.7                                     |
| 2019 - June      | 12.9                                    | 79.9                                     |
| 2019 - July      | 12.8                                    | 79.4                                     |
| 2019 - August    | 12.3                                    | 76.2                                     |
| 2019 - September | 11.9                                    | 73.5                                     |
| 2019 - October   | 12.6                                    | 77.8                                     |
| 2019 - November  | 12.8                                    | 79.2                                     |
| 2019 - December  | 12.7                                    | 83.0                                     |
| 2020 - January   | 14.2                                    | 87.5                                     |
| 2020 - February  | 14.8                                    | 91.4                                     |
| 2020 - March     | 11.8                                    | 73.9                                     |
| 2020 - April     | 10.2                                    | 63.2                                     |
| 2020 - May       | 11.0                                    | 67.8                                     |
| 2020 - June      | 12.1                                    | 74.9                                     |
| 2020 - July      | 12.3                                    | 76.0                                     |
| 2020 - August    | 13.1                                    | 81.1                                     |
| 2020 - September | 12.8                                    | 79.0                                     |
| 2020 - October   | 13.7                                    | 85.0                                     |

<sup>1</sup> International Sugar Agreement (ISA) prices: simple average of the closing quotes for the first three future positions of the New York Intercontinental Exchange (ICE) Sugar Contract No. 11.

Source: International Sugar Organization (ISO). FAO for the sugar index.

## APPENDIX TABLE 26: SELECTED INTERNATIONAL PRICES FOR MILK PRODUCTS AND DAIRY PRICE INDEX

| Period                  | International prices        |                               |                                |                             | FAO dairy price index   |
|-------------------------|-----------------------------|-------------------------------|--------------------------------|-----------------------------|-------------------------|
|                         | Butter <sup>1</sup>         | Skim milk powder <sup>2</sup> | Whole milk powder <sup>3</sup> | Cheddar cheese <sup>4</sup> |                         |
| <b>Annual (Jan/Dec)</b> | ..... (USD per tonne) ..... |                               |                                |                             | ... (2014-2016=100) ... |
| 2009                    | 3 021                       | 2 391                         | 2 570                          | 3 292                       | 91                      |
| 2010                    | 4 268                       | 2 971                         | 3 499                          | 3 739                       | 112                     |
| 2011                    | 5 023                       | 3 408                         | 3 962                          | 4 380                       | 130                     |
| 2012                    | 3 740                       | 3 063                         | 3 336                          | 3 877                       | 112                     |
| 2013                    | 4 784                       | 4 148                         | 4 730                          | 4 563                       | 141                     |
| 2014                    | 4 278                       | 3 606                         | 3 854                          | 4 542                       | 130                     |
| 2015                    | 3 306                       | 2 089                         | 2 537                          | 3 076                       | 87                      |
| 2016                    | 3 473                       | 1 986                         | 2 481                          | 2 807                       | 83                      |
| 2017                    | 5 641                       | 2 011                         | 3 163                          | 3 664                       | 108                     |
| 2018                    | 5 587                       | 1 834                         | 3 060                          | 3 736                       | 107                     |
| 2019                    | 4 443                       | 2 440                         | 3 186                          | 3 435                       | 103                     |
| <b>Monthly</b>          |                             |                               |                                |                             |                         |
| 2019 – October          | 4 037                       | 2 621                         | 3 214                          | 3 321                       | 101                     |
| 2019 – November         | 4 058                       | 2 793                         | 3 308                          | 3 320                       | 102                     |
| 2019 – December         | 4 031                       | 2 873                         | 3 302                          | 3 369                       | 104                     |
| 2020 – January          | 4 043                       | 2 927                         | 3 241                          | 3 390                       | 104                     |
| 2020 – February         | 3 991                       | 2 877                         | 3 109                          | 3 410                       | 103                     |
| 2020 – March            | 3 977                       | 2 637                         | 2 990                          | 3 465                       | 102                     |
| 2020 – April            | 3 592                       | 2 279                         | 2 822                          | 3 381                       | 96                      |
| 2020 – May              | 3 403                       | 2 285                         | 2 759                          | 3 362                       | 94                      |
| 2020 – June             | 3 595                       | 2 473                         | 2 893                          | 3 447                       | 98                      |
| 2020 – July             | 3 766                       | 2 520                         | 3 128                          | 3 533                       | 102                     |
| 2020 – August           | 3 841                       | 2 592                         | 3 105                          | 3 503                       | 102                     |
| 2020 – September        | 3 873                       | 2 622                         | 3 043                          | 3 515                       | 102                     |
| 2020 – October          | 3 919                       | 2 682                         | 3 098                          | 3 602                       | 104                     |

<sup>1</sup> Butter - 82% butterfat - f.o.b. Oceania and EU; average indicative traded prices.

<sup>2</sup> Skim Milk Powder - 1.25% butterfat - f.o.b. Oceania and EU - averaged indicative traded prices.

<sup>3</sup> Whole Milk Powder - 26% butterfat - f.o.b. Oceania and EU - average indicative traded prices.

<sup>4</sup> Cheddar Cheese, 39% max. moisture, f.o.b. Oceania and EU, indicative traded prices

Note: The FAO Dairy Price Index is derived from a trade-weighted average of a selection of representative internationally-traded dairy products from the European Union and Oceania.



## APPENDIX TABLE 27: SELECTED INTERNATIONAL MEAT PRICES

| Period                  | Bovine meat prices          |                          |        | Ovine meat price |           | Pig meat prices          |        |         | Poultry meat prices      |        |
|-------------------------|-----------------------------|--------------------------|--------|------------------|-----------|--------------------------|--------|---------|--------------------------|--------|
|                         | Australia                   | United States of America | Brazil | New Zealand      | Australia | United States of America | Brazil | Germany | United States of America | Brazil |
| <b>Annual (Jan/Dec)</b> | ..... (USD per tonne) ..... |                          |        |                  |           |                          |        |         |                          |        |
| 2009                    | 2 562                       | 4 130                    | 3 257  | 3 495            | 3 396     | 2 548                    | 2 107  | 2 035   | 991                      | 1 473  |
| 2010                    | 3 272                       | 4 585                    | 4 093  | 3 673            | 4 352     | 2 851                    | 2 647  | 1 913   | 1 032                    | 1 671  |
| 2011                    | 3 944                       | 5 093                    | 5 078  | 5 531            | 5 547     | 3 036                    | 2 941  | 2 169   | 1 149                    | 1 977  |
| 2012                    | 4 176                       | 5 885                    | 4 765  | 4 656            | 4 486     | 2 952                    | 2 700  | 2 233   | 1 228                    | 1 889  |
| 2013                    | 4 009                       | 6 314                    | 4 527  | 4 130            | 4 132     | 2 981                    | 2 797  | 2 311   | 1 229                    | 1 972  |
| 2014                    | 5 016                       | 7 361                    | 4 712  | 4 701            | 4 686     | 3 233                    | 3 411  | 2 106   | 1 205                    | 1 886  |
| 2015                    | 4 699                       | 7 195                    | 4 320  | 3 643            | 4 042     | 2 669                    | 2 482  | 1 582   | 1 002                    | 1 604  |
| 2016                    | 4 171                       | 6 390                    | 4 053  | 3 578            | 3 978     | 2 648                    | 2 129  | 1 682   | 914                      | 1 501  |
| 2017                    | 4 463                       | 6 676                    | 4 196  | 4 488            | 4 710     | 2 687                    | 2 475  | 1 871   | 1 000                    | 1 631  |
| 2018                    | 4 198                       | 7 118                    | 4 045  | 5 244            | 4 979     | 2 587                    | 1 959  | 1 728   | 970                      | 1 537  |
| 2019                    | 4 873                       | 7 119                    | 4 119  | 5 127            | 5 097     | 2 626                    | 2 245  | 1 989   | 972                      | 1 618  |
| <b>Monthly</b>          |                             |                          |        |                  |           |                          |        |         |                          |        |
| 2019 – October          | 5 090                       | 6 945                    | 4 467  | 5 463            | 5 009     | 2 658                    | 2 364  | 2 104   | 945                      | 1 582  |
| 2019 – November         | 6 204                       | 7 032                    | 4 839  | 5 715            | 4 911     | 2 790                    | 2 405  | 2 161   | 901                      | 1 592  |
| 2019 – December         | 5 724                       | 7 059                    | 5 003  | 5 813            | 4 945     | 2 712                    | 2 597  | 2 269   | 923                      | 1 611  |
| 2020 – January          | 4 929                       | 7 220                    | 4 900  | 5 112            | 4 848     | 2 717                    | 2 572  | 2 113   | 991                      | 1 618  |
| 2020 – February         | 4 545                       | 7 011                    | 4 469  | 4 610            | 5 108     | 2 684                    | 2 465  | 2 152   | 1 009                    | 1 557  |
| 2020 – March            | 4 394                       | 7 010                    | 4 407  | 4 160            | 5 047     | 2 643                    | 2 463  | 2 210   | 978                      | 1 544  |
| 2020 – April            | 4 462                       | 6 792                    | 4 374  | 4 005            | 4 975     | 2 620                    | 2 448  | 2 026   | 984                      | 1 475  |
| 2020 – May              | 5 071                       | 6 837                    | 4 400  | 3 926            | 5 119     | 2 549                    | 2 372  | 1 845   | 973                      | 1 336  |
| 2020 – June             | 4 972                       | 7 082                    | 4 299  | 4 389            | 5 439     | 2 471                    | 2 159  | 1 927   | 941                      | 1 274  |
| 2020 – July             | 4 688                       | 6 790                    | 4 081  | 4 639            | 5 270     | 2 411                    | 2 123  | 1 766   | 950                      | 1 324  |
| 2020 – August           | 4 707                       | 6 795                    | 4 008  | 4 697            | 5 051     | 2 380                    | 2 236  | 1 802   | 935                      | 1 330  |
| 2020 – September        | 4 666                       | 6 804                    | 4 096  | 4 739            | 4 724     | 2 371                    | 2 315  | 1 608   | 932                      | 1 348  |
| 2020 – October          | 4 387                       | 6 833                    | 4 251  | 4 709            | 4 952     | 2 366                    | 2 396  | 1 550   | 933                      | 1 344  |

Notes:

### Bovine meat prices:

**Australia:** Cow 90CL export prices to the USA (FAS)

**United States of America:** Meat of bovine (Fresh, Chilled or Frozen), export unit value

**Brazil:** Meat of bovine (Fresh, Chilled or Frozen), export unit value

### Ovine meat prices:

**New Zealand:** Lamb 17.5kg NZ\$/kg

**Australia:** Medium trade lamb 18-20kg A\$/kg

### Pig meat prices:

**United States of America:** Meat of Swine (Fresh, Chilled or Frozen), export unit value

**Brazil:** Meat of Swine (Fresh, Chilled or Frozen), export unit value

**Germany:** Monthly market price for pig carcass grade E

### Poultry meat prices:

**United States of America:** Chicken Cuts and Edible Offal (Fresh, Chilled or Frozen), export unit value

**Brazil:** Meat and Edible Offal of Poultry (Fresh, Chilled or Frozen), export unit value

Prices for the two most recent months may be estimates and subject to revision.

## APPENDIX TABLE 28: SELECTED INTERNATIONAL MEAT PRICES AND FAO MEAT PRICE INDICES

FAO indices

| Period                  | Total meat                  | Poultry meat | Pig meat | Bovine meat | Ovine meat |
|-------------------------|-----------------------------|--------------|----------|-------------|------------|
| <b>Annual (Jan/Dec)</b> | ..... (2014-2016=100) ..... |              |          |             |            |
| 2009                    | 81                          | 90           | 97       | 62          | 84         |
| 2010                    | 91                          | 100          | 102      | 74          | 98         |
| 2011                    | 105                         | 117          | 112      | 88          | 135        |
| 2012                    | 105                         | 115          | 111      | 93          | 111        |
| 2013                    | 106                         | 118          | 113      | 93          | 101        |
| 2014                    | 112                         | 114          | 117      | 107         | 114        |
| 2015                    | 97                          | 96           | 92       | 102         | 94         |
| 2016                    | 91                          | 90           | 92       | 91          | 92         |
| 2017                    | 98                          | 98           | 98       | 96          | 112        |
| 2018                    | 95                          | 93           | 91       | 96          | 124        |
| 2019                    | 100                         | 96           | 98       | 101         | 124        |
| <b>Monthly</b>          |                             |              |          |             |            |
| 2019 – October          | 102                         | 94           | 101      | 104         | 127        |
| 2019 – November         | 107                         | 93           | 105      | 114         | 129        |
| 2019 – December         | 107                         | 95           | 107      | 112         | 131        |
| 2020 – January          | 104                         | 97           | 103      | 107         | 121        |
| 2020 – February         | 101                         | 95           | 103      | 100         | 118        |
| 2020 – March            | 99                          | 93           | 103      | 99          | 112        |
| 2020 – April            | 97                          | 90           | 99       | 98          | 109        |
| 2020 – May              | 95                          | 84           | 94       | 102         | 110        |
| 2020 – June             | 95                          | 80           | 93       | 103         | 120        |
| 2020 – July             | 92                          | 83           | 89       | 98          | 121        |
| 2020 – August           | 92                          | 83           | 90       | 97          | 119        |
| 2020 – September        | 91                          | 83           | 86       | 98          | 115        |
| 2020 – October          | 91                          | 83           | 85       | 97          | 118        |

Notes:

The **FAO Meat Price Indices** consist of 2 poultry meat product quotations (the average weighted by assumed fixed trade weights), 3 bovine meat product quotations (average weighted by assumed fixed trade weights), 3 pig meat product quotations (average weighted by assumed fixed trade weights), 2 ovine meat product quotation (average weighted by assumed fixed trade weights): the four meat group average prices are weighted by world average export trade shares for 2014/2016.

Prices for the two most recent months may be estimates and subject to revision.

## APPENDIX TABLE 29: FISH PRICE INDICES

| Period                  | Total                       | Aquaculture | Capture | Whitefish | Salmon | Shrimp | Pelagic<br>excl. tuna | Tuna |
|-------------------------|-----------------------------|-------------|---------|-----------|--------|--------|-----------------------|------|
| <b>Annual (Jan/Dec)</b> | ..... (2014-2016=100) ..... |             |         |           |        |        |                       |      |
| 2009                    | 85                          | 79          | 88      | 99        | 84     | 75     | 82                    | 86   |
| 2010                    | 93                          | 95          | 92      | 103       | 97     | 84     | 85                    | 87   |
| 2011                    | 104                         | 103         | 105     | 114       | 100    | 97     | 104                   | 105  |
| 2012                    | 97                          | 92          | 106     | 111       | 78     | 87     | 115                   | 119  |
| 2013                    | 104                         | 107         | 104     | 104       | 99     | 99     | 107                   | 119  |
| 2014                    | 107                         | 113         | 104     | 105       | 102    | 113    | 100                   | 108  |
| 2015                    | 92                          | 90          | 96      | 97        | 84     | 92     | 99                    | 91   |
| 2016                    | 102                         | 97          | 100     | 97        | 114    | 94     | 101                   | 101  |
| 2017                    | 106                         | 101         | 106     | 108       | 117    | 96     | 92                    | 112  |
| 2018                    | 106                         | 101         | 107     | 118       | 119    | 88     | 96                    | 105  |
| 2019                    | 102                         | 96          | 106     | 121       | 108    | 86     | 92                    | 100  |
| <b>Monthly</b>          |                             |             |         |           |        |        |                       |      |
| 2018 - January          | 107                         | 100         | 110     | 116       | 114    | 93     | 97                    | 110  |
| 2018 - February         | 109                         | 102         | 108     | 117       | 126    | 92     | 98                    | 105  |
| 2018 - March            | 113                         | 105         | 111     | 120       | 138    | 91     | 107                   | 102  |
| 2018 - April            | 112                         | 105         | 110     | 120       | 135    | 91     | 99                    | 108  |
| 2018 - May              | 113                         | 106         | 107     | 117       | 144    | 88     | 101                   | 106  |
| 2018 - June             | 106                         | 101         | 106     | 117       | 121    | 86     | 93                    | 107  |
| 2018 - July             | 103                         | 98          | 108     | 113       | 107    | 86     | 114                   | 103  |
| 2018 - August           | 100                         | 98          | 103     | 113       | 101    | 86     | 98                    | 104  |
| 2018 - September        | 102                         | 102         | 97      | 115       | 116    | 88     | 83                    | 98   |
| 2018 - October          | 103                         | 102         | 102     | 116       | 113    | 87     | 86                    | 107  |
| 2018 - November         | 102                         | 100         | 108     | 126       | 101    | 86     | 86                    | 109  |
| 2018 - December         | 104                         | 100         | 108     | 128       | 107    | 85     | 87                    | 105  |
| 2019 - January          | 106                         | 101         | 111     | 132       | 113    | 84     | 89                    | 109  |
| 2019 - February         | 107                         | 101         | 110     | 134       | 111    | 84     | 91                    | 110  |
| 2019 - March            | 109                         | 104         | 106     | 137       | 120    | 84     | 87                    | 106  |
| 2019 - April            | 110                         | 104         | 110     | 130       | 129    | 85     | 94                    | 105  |
| 2019 - May              | 104                         | 99          | 108     | 125       | 111    | 85     | 92                    | 104  |
| 2019 - June             | 103                         | 97          | 106     | 122       | 110    | 85     | 91                    | 99   |
| 2019 - July             | 103                         | 95          | 113     | 119       | 103    | 87     | 118                   | 100  |
| 2019 - August           | 98                          | 92          | 105     | 114       | 97     | 88     | 86                    | 100  |
| 2019 - September        | 94                          | 89          | 102     | 111       | 88     | 87     | 85                    | 96   |
| 2019 - October          | 92                          | 87          | 97      | 98        | 90     | 86     | 91                    | 96   |
| 2019 - November         | 99                          | 91          | 104     | 115       | 103    | 86     | 87                    | 96   |
| 2019 - December         | 103                         | 95          | 100     | 119       | 123    | 86     | 88                    | 82   |
| 2020 - January          | 106                         | 96          | 102     | 122       | 134    | 86     | 92                    | 80   |
| 2020 - February         | 101                         | 93          | 102     | 119       | 116    | 86     | 82                    | 89   |
| 2020 - March            | 95                          | 87          | 102     | 103       | 97     | 85     | 90                    | 97   |
| 2020 - April            | 90                          | 84          | 98      | 97        | 86     | 85     | 80                    | 101  |
| 2020 - May              | 91                          | 81          | 100     | 94        | 96     | 82     | 93                    | 97   |
| 2020 - June             | 97                          | 86          | 102     | 96        | 108    | 88     | 108                   | 90   |
| 2020 - July             | 94                          | 87          | 101     | 103       | 93     | 90     | 96                    | 91   |
| 2020 - August           | 94                          | 88          | 103     | 103       | 89     | 90     | 95                    | 99   |
| 2020 - September        | 92                          | 87          | 100     | 103       | 86     | 88     | 92                    | 93   |

Source of the raw data for the FAO Fish Price Index: EUMOFA, INFOFISH, INFOPECSA, INFOYU, Statistics Norway.  
Note: The table presents a new version of the FAO Fish Price Index rebased at 2014–2016.

## APPENDIX TABLE 30: SELECTED INTERNATIONAL COMMODITY PRICES

|                                     | Currency and unit | Effective date | Latest quotation | One month ago | One year ago | Average<br>2015-2019 |
|-------------------------------------|-------------------|----------------|------------------|---------------|--------------|----------------------|
| Sugar (ISA daily price)             | US cents per lb   | 13-10-20       | 13.60            | 12.21         | 12.57        | 14.53                |
| Coffee (ICO daily price)            | US cents per lb   | 13-10-20       | 106.65           | 116.97        | 97.35        | 117.64               |
| Cocoa (ICCO daily price)            | US cents per lb   | 13-10-20       | 102.15           | 109.66        | 110.46       | 115.13               |
| Tea (FAO Tea Composite Price)       | USD per kg        | 21-09-20       | 2.83             | 2.78          | 2.38         | 2.70                 |
| Cotton (COTLOOK A index)            | US cents per lb   | 30-09-20       | 70.81            | 69.94         | 73.88        | 79.50                |
| Jute "BTD"<br>(Fob Bangladesh Port) | USD per tonne     | 30-09-20       | 880.00           | 810.00        | 740.00       | 758.67               |



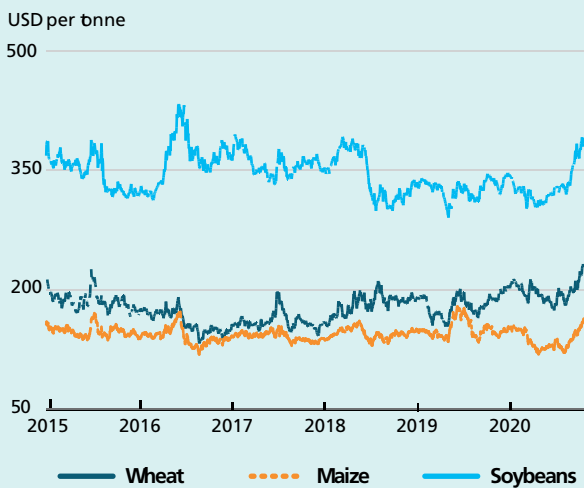
# MARKET INDICATORS

# Futures markets

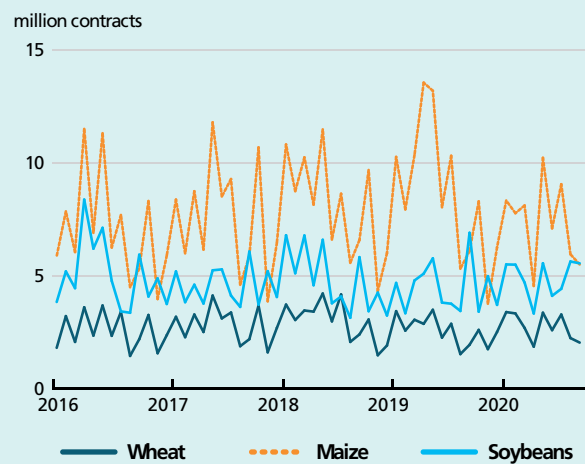
Futures prices for wheat, maize and soybeans made significant turnarounds from the first half of this year, with wheat and soybeans reaching multiyear highs. US Department of Agriculture (USDA) projections for smaller 2020/21 domestic crops and quarterly stocks, coupled with a record export sales pace for US maize and soybeans, reversed the unfavourable price environment driven by the COVID-19 pandemic and trade tensions to produce an optimistic outlook. In addition, small reductions in wheat production forecasts in various regions, together with La Niña-related predictions of a worsening drought across the US southern plains, helped to propel wheat prices to

their highest level since 2014. Developments in exogenous markets, such as foreign exchange and energy, had mixed effects on markets. The US dollar index declined by about 10 percent from the high level reached in March, helping to support most commodity prices. Conversely, crude prices, as tracked by the West Texas Intermediate contract which has hovered beneath the USD 40 per barrel mark since June, acted as a counterweight. Global equity and bond markets rebounded dramatically following the reopening of almost all major economies. On balance, the various trade winds helped to support agricultural prices.

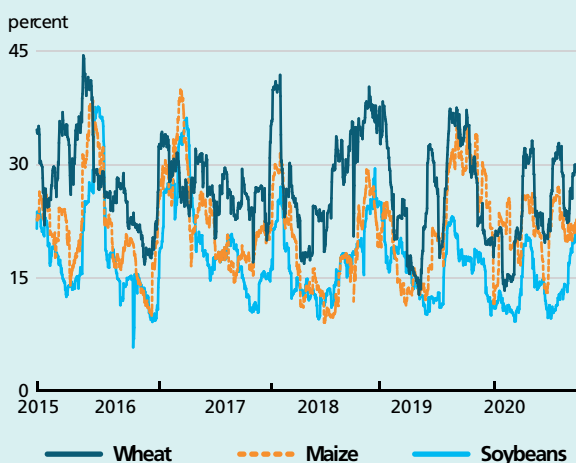
CME futures prices



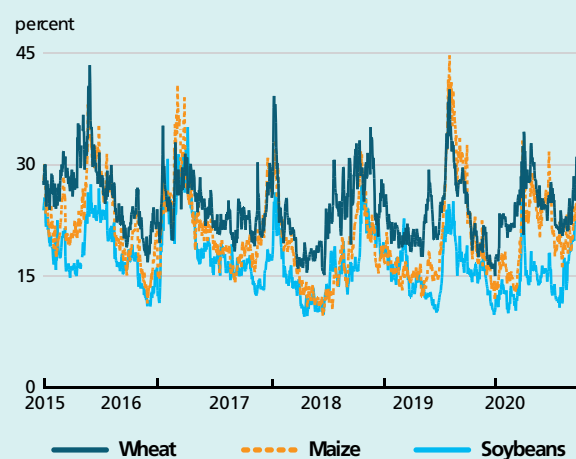
CME futures volumes



Historical volatility (30 days)



Implied volatility



## VOLUMES AND OPEN INTEREST

From June onwards, trade volumes followed a typical declining seasonal pattern for maize and wheat, while rising for soybeans as export sales of the oilseed reached historic levels. Volumes for all three commodities remained below the record years of 2018 for wheat and soybeans and 2019 for maize. Open interest – the number of outstanding matched purchases and sales for each commodity contract – was lower for all three commodities y/y, although it appeared to be on the rise in the case of soybeans, again probably due to robust export indications. Options trading, which showed significant increases over the past few years, reflected an impressive 30 percent gain to open interest totals for all three commodities, compared with futures alone. In general, relative to the pandemic-induced contraction experienced by the global economy, US grains and oilseeds futures trade remained surprisingly steady and responsive to fundamental developments, particularly expanded trade.

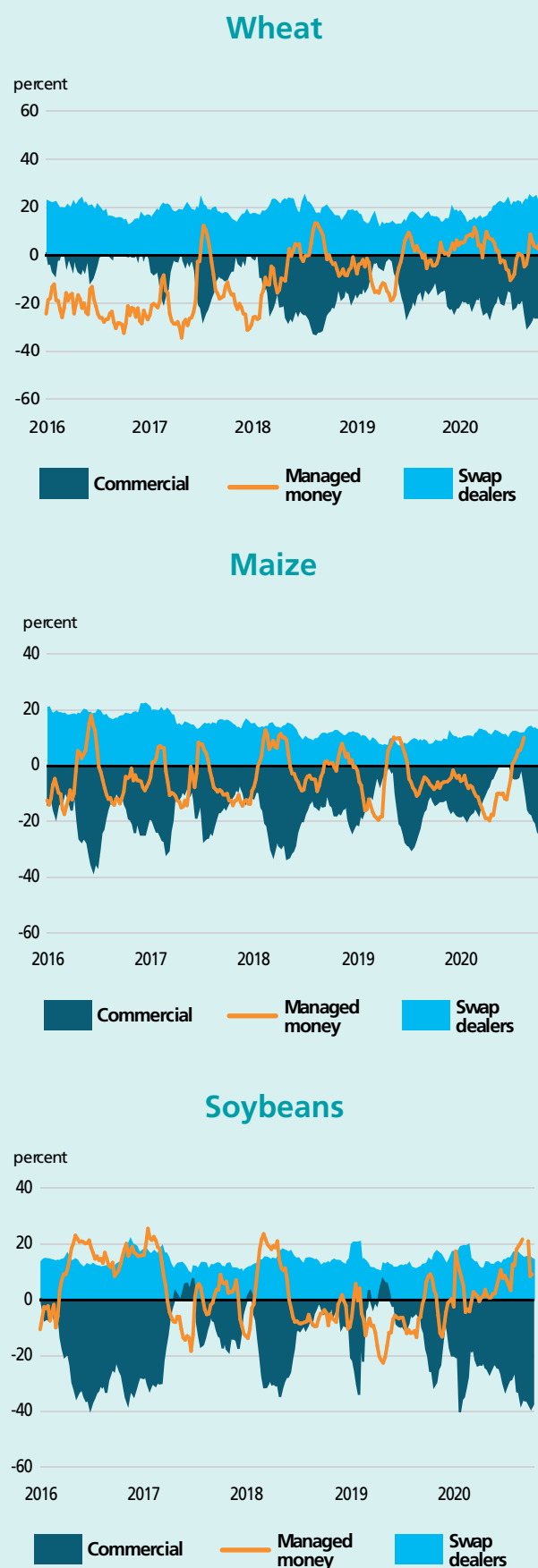
## VOLATILITY

Both implied and historical volatility levels for wheat, maize and soybeans exhibited discernible increases since June as fundamentals began to tighten and prices surged. Levels for soybeans which had dipped close to record low levels (historical volatility) of 11 nearly doubled, while the increases for wheat and maize were less pronounced. All three commodities exhibited levels within a normal range of historical volatility (based on 30 days) for the second half of the year, while displaying a small surge in implied volatility (calculated by the level of option premiums on underlying futures contracts) for the same period. In the energy sector, the Crude Oil Volatility Index, which spiked to a record level of 325 as West Texas Intermediate oil prices plummeted into negative values in April, regained a semblance of normality, trading at levels mostly between 35 and 50.

## FORWARD CURVES

Forward curves for wheat, maize and soybeans exhibited dramatic changes during the second half of the year, with all three transforming from contango (upward sloping) to backwardation (downward sloping) within the 2020/21 crop year. Decreases in stocks and crop sizes, a surge in US maize and soybean export demand and La Niña weather concerns combined to create much tighter balance sheets than once predicted. The loosening of economic restrictions, imposed to slow the spread of COVID-19, further underscored the tightening situation. The maize forward curve between the December 2020 and December 2021 contracts moved USD

CME net-length as % of open interests  
(Jan 2016 – Oct 2020)





25 per tonne, switching from contango to backwardation since August as the United States Department of Agriculture (USDA) significantly trimmed its record ending stock prediction. Similarly, the y/y soybean curve between November 2020 and November 2021 inverted from a small carry to USD 40 backwardation, to reflect an extremely low ending US stocks number in 2021. The wheat forward curve, typically in a steep contango configuration, moved about USD 11 per tonne between the December 2020 contract and the new crop month of July 2021, inverting slightly during October.

## INVESTMENT FLOWS

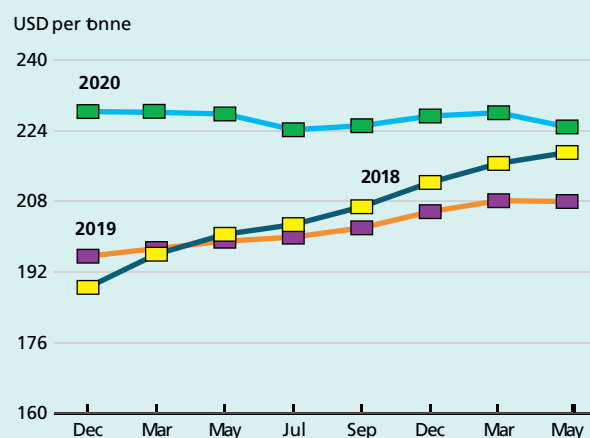
Managed money established bullish stances in all three commodities. It added to a small net long wheat position while reversing its bearish strategies in maize and soybeans to accumulate moderate to large net long positions, especially in soybeans. Commercials held standard short positions in all three to offset the wave of producer cash sales during harvest. As a result of movement in the forward curves, spread positioning (the equal holding of long and short contracts of two different maturities within one commodity futures contract) attracted considerable interest across multiple trading categories, especially when combined with options strategies, according to reports by the US Commodity Futures Trading Commission. Swaps dealers (dealers in passive fund investments) made incremental increases to their holdings of net long positions for all three commodities since the first half of the year, but their levels remained well off the highs of 30 to 40 percent of open interest attained in 2010. Following years of poor performance, agricultural money managers (as tracked by Barclay Hedge) showed a positive year-to-date return of 10 percent as of October 2020, their best performance since 2010. The Deutsche Bank Agricultural Index Fund – the largest passive agricultural fund tracking 10 futures markets, including wheat, maize and soybeans – rose from an all-time low in June of USD 13.50 to USD 14.90 in November.

**Ann Berg**

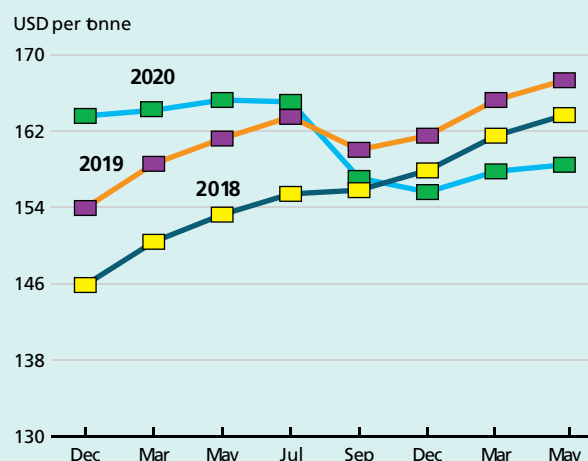
[a.e.berg@netzero.net](mailto:a.e.berg@netzero.net)

## Forward curves snapshots as of Oct 2018, 2019 and 2020

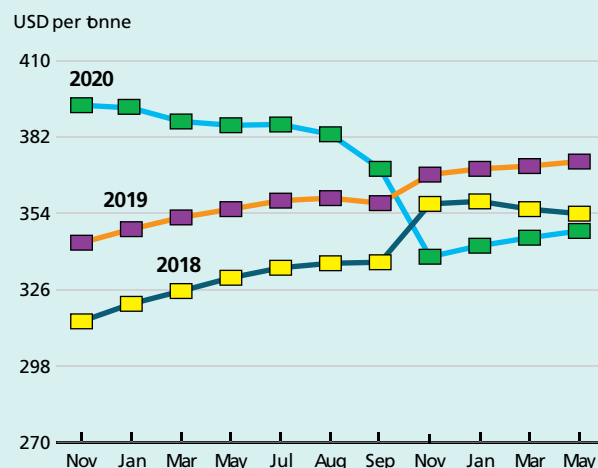
### Wheat



### Maize



### Soybeans



# Ocean freight rates

International Grains Council (IGC)

[www.igc.int](http://www.igc.int)

## OCEAN FREIGHT MARKET (MAY 2020 – OCTOBER 2020)

Markets for dry bulk carriers, which transport grains/oilseeds, sugar, minerals, metals and construction materials, staged a strong recovery during the past six months, although volatility was prevalent at times. Global grains and oilseeds flows were largely unaffected by measures aimed at containing the spread of coronavirus, with major dry bulk ports operating as normal, although some inland logistical bottlenecks were reported in the United States of America and Argentina.

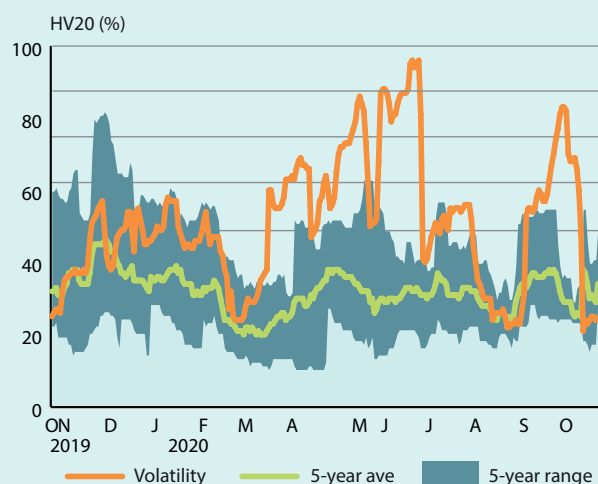
The Baltic Dry Index (BDI), which reflects movements in timecharter prices for main bulker categories, touched a near all-time low in mid-May on coronavirus-related uncertainty about trade prospects and negative sentiment in outside markets. However, values rebounded sharply thereafter on news of easing lockdowns in some countries and tentative signs of recovering economic activity. After a retreat during summer months, generally buoyant trade, linked to increasing activity in China, saw the BDI resume growth and reach a one-year peak in early-October. Still, disappointing demand amid mounting worries about surging COVID-19 cases and new restrictions in some regions pressed quotations across main routes more recently, dashing vessel owners' hopes for end-of-year upside. Despite recent declines, the Index more than doubled since late-April, but was down by around one-quarter y/y as at end-October.

### Summary of dry bulk freight markets

|                                                            | 30 Oct<br>2020 | Changes     |            |
|------------------------------------------------------------|----------------|-------------|------------|
|                                                            |                | 6 months    | y/y        |
|                                                            |                | %           |            |
| <b>Baltic Dry Index (BDI)*</b>                             | <b>1 283</b>   | <b>+102</b> | <b>-28</b> |
| <i>Sub-indices:</i>                                        |                |             |            |
| Capesize                                                   | <b>1 875</b>   | <b>+109</b> | <b>-39</b> |
| Panamax                                                    | <b>1 289</b>   | <b>+81</b>  | <b>-18</b> |
| Supramax                                                   | <b>949</b>     | <b>+131</b> | <b>-16</b> |
| <i>Baltic Handysize Index<br/>(BHS)**</i>                  | <b>591</b>     | <b>+148</b> | <b>-2</b>  |
| <b>IGC Grains and Oilseeds<br/>Freight Index (GOFI)***</b> | <b>112</b>     | <b>+55</b>  | <b>-11</b> |

Source: Baltic Exchange, IGC. \* 4 January 1985 = 1000. \*\* 23 May 2006 = 1000. \*\*\* 1 January 2013 = 100.

### Volatility in Baltic Dry Index (HV20) 30 October 2019 – 30 October 2020



Note: Historical volatility, as measured by the standard deviation (%) of daily quotation movements over a 20-day window (HV20).

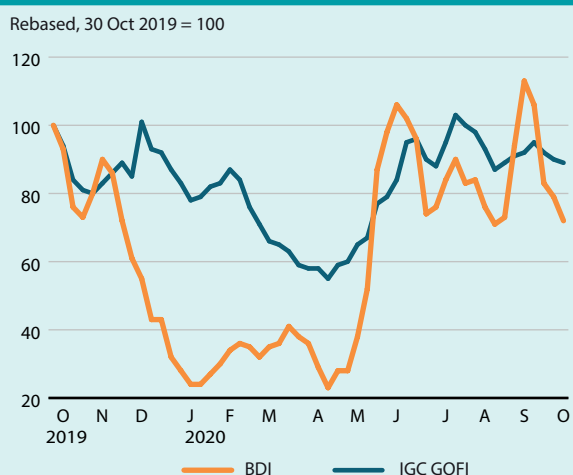
Source: Baltic Exchange, IGC calculations

While some forecasts indicate the potential for a recovery in the world economy in the year ahead, this has become less certain in recent weeks as a strong escalation in the pandemic and associated containment measures curb economic activity. Nonetheless, global consumption of grains and oilseeds looks likely to expand in the next twelve months, potentially bolstering import demand in some regions and propping up seaborne volumes.

Voyage freight rates (which include fuel costs) across key exporters of grains and oilseeds also strengthened markedly during the period, although overall upside was contained by softer bunker prices. The IGC Grains and Oilseeds Freight Index (GOFI) – a trade-weighted measure for nominal transportation costs on around 300 selected routes – rose by a net 55 percent over the past six months on increases across all underlying origins.

Rates for **Capesize** bulkers – ships mainly hauling iron ore and coal – were particularly volatile throughout the period, the sub-Index growing more than twofold since late-April. Amid surplus tonnage capacity in main areas, values initially dipped to the negative territory in May, for the second time ever, but posted spectacular advances thereafter on increasing iron ore trading, rising to a nine-month high in early-July and breaking the record for the largest daily increase. The market lacked a clear direction

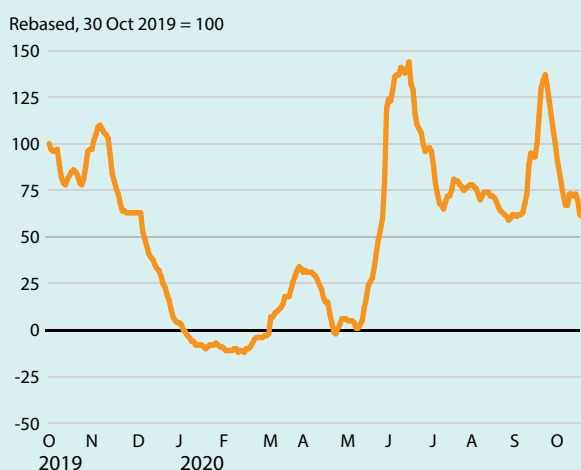
### BDI and IGC GOFI 30 October 2019 – 30 October 2020



Note: IGC Grains and Oilseeds Freight Index, constructed based on nominal freight rates on major grains/oilseeds routes using trade-weighted approach. Source: Baltic Exchange, IGC

in the following several weeks owing to variable fixing volumes at key origins, including Australia, Brazil and the northern Atlantic, but earnings spiked again in early-October on renewed iron ore purchases by China. Yet, with demand falling short of expectations after China's Golden Week holidays and, with softer sentiment prevailing in Europe and South America, the market mostly eased in recent weeks.

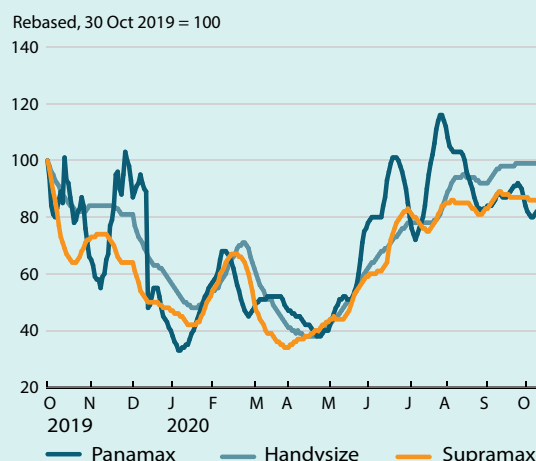
### Baltic Capesize Index 30 October 2019 – 30 October 2020



Source: Baltic Exchange

Average **Panamax** quotations firmed by a net 81 percent in the six months to end-October. Steep advances in the earlier half of the period were chiefly tied to an upbeat sentiment in South America, where record soyabean exports were reported from Brazil. Also linked to

### Grains and oilseeds carrying sectors: Panamax and Supramax sub-Indices and Handysize Index 30 October 2019 – 30 October 2020



Source: Baltic Exchange

signs of improving supply and demand fundamentals at the US Gulf and in Europe, the corresponding Baltic sub-Index approached a ten-month high by mid-July. While increased vessel availability in Europe, coupled with generally softer demand for coal dispatches, contributed to a downturn in the latter half of the month, fresh maize and soyabeans business in the Atlantic underpinned more recently, as did an upturn in minerals enquiries in the Baltic Sea area, lifting the sub-Index to a new multi-month peak in August.

Even though activity out of South America and the US Gulf remained brisk, with the vessel line-up in the latter area reaching an eight-year peak, the market cooled in the period since as more tonnage ballasting from Asia appeared in the Atlantic. Spillover from Capesize losses and heightened worries about prospects for Australia-China coal trade applied pressure on earnings recently, albeit a pick-up in mineral loadings out of Indonesia and new enquiries in the northern Pacific offered late support.

Highlighting firm demand for oilseed runs from Brazil to China, nominal Panamax journey rates from Santos to Dalian rose by 54 percent during the past six months, to around USD 37 tonnes. Accelerating dispatches from the US Gulf reportedly restrained nearby elevation capacity at local export terminals, with delivery costs for 66,000t cargos to China assessed up by 42 percent over the same period, at USD 42 tonnes.

**Supramax** and **Handysize** segments, representing smaller vessel classes, witnessed larger gains compared to the rest of the dry bulk complex. With corresponding Baltic Indices mostly trending higher since mid-May, average earnings rallied by 131 percent and 148 percent, respectively. Good fixing activity in Asia and the Indian Ocean, including for coal deliveries from Indonesia, initially

underpinned rates, while growing enquiries for grains and oilseeds-related journeys at major origins, including the US Gulf, South America and the Black Sea region, featured as the market driver from June onwards. Nominal HSS (heavy grains, soyabeans and sorghum) voyage freight costs for Supramax trips from the Russian Federation (Novorossiysk) to Egypt (Alexandria) – a major global destination for grains – strengthened by USD 8 tonnes since April, to around USD16 tonnes, while similar deliveries from Argentina were estimated to be up by USD 10 tonnes, at USD 24 tonnes.

### Summary of freight rates on selected routes

| USD/t                                       | Cargo / Discharge | 30 Oct 2020 | Changes  |       |
|---------------------------------------------|-------------------|-------------|----------|-------|
|                                             |                   |             | 6 months | y/y % |
| <b>US (Gulf) to:</b>                        |                   |             |          |       |
| China (Dalian)                              | 66,000 / 8,000    | 42          | 42       | -5    |
| EU (Rotterdam)                              | 66,000 / 10,000   | 21          | 78       | -1    |
| Japan (Yokohama)                            | 66,000 / 8,000    | 41          | 40       | -4    |
| <b>Canada (St. Lawrence) to:</b>            |                   |             |          |       |
| China (Dalian)                              | 66,000 / 8,000    | 40          | 53       | -5    |
| EU (Rotterdam)                              | 66,000 / 10,000   | 15          | 93       | -1    |
| Japan (Yokohama)                            | 66,000 / 8,000    | 39          | 44       | -4    |
| <b>Argentina (Up river) to:</b>             |                   |             |          |       |
| Algeria (Belaja)                            | 25,500 / 2,500    | 27          | 51       | -16   |
| Egypt (Alexandria)                          | 49,000 / 6,000    | 24          | 68       | -8    |
| EU (Rotterdam)                              | 66,000 / 10,000   | 25          | 85       | -1    |
| <b>Brazil (Santos) to:</b>                  |                   |             |          |       |
| China (Dalian)                              | 66,000 / 8,000    | 37          | 54       | -5    |
| EU (Rotterdam)                              | 66,000 / 10,000   | 20          | 103      | 0     |
| South Korea (Inchon)                        | 66,000 / 7,250    | 19          | 75       | -20   |
| <b>EU (France, Rouen) to:</b>               |                   |             |          |       |
| Algeria (Belaja)                            | 25,500 / 2,500    | 19          | 67       | 3     |
| Egypt (Alexandria)                          | 49,000 / 6,000    | 16          | 100      | 1     |
| Morocco (Casablanca)                        | 25,500 / 3,000    | 17          | 63       | 4     |
| <b>Russia Federation (Novorossiysk) to:</b> |                   |             |          |       |
| Egypt (Alexandria)                          | 49,000 / 6,000    | 16          | 115      | 3     |
| Morocco (Casablanca)                        | 25,500 / 3,000    | 20          | 80       | -2    |
| Tunisia (Bizerte)                           | 25,500 / 2,500    | 31          | 91       | -2    |
| <b>Australia (Kwinana) to:</b>              |                   |             |          |       |
| China (Dalian)                              | 66,000 / 8,000    | 15          | 52       | -13   |
| Indonesia (Jakarta)                         | 49,000 / 8,000    | 13          | 53       | -20   |
| South Korea (Inchon)                        | 66,000 / 7,250    | 16          | 54       | -12   |

Note: Nominal ocean freight rates for HSS (heavy grains, soyabeans, sorghum) cargoes. Values do not represent market fixtures.

Source: IGC

# FAO Food Price Index

## FAO Food Price Index continued its upward trend in October

The **FAO Food Price Index**<sup>1</sup> (FFPI) averaged 100.9 points in October 2020, up 3.0 points (3.1 percent) from September and 5.7 points (6.0 percent) higher than its value a year ago. The October value, the highest since January 2020, represented the fifth consecutive monthly increase. Much firmer prices of sugar, dairy, cereals and vegetable oils were behind the latest rise in the FFPI, while the meat sub-index fell slightly for the second consecutive month.

The **FAO Cereal Price Index** averaged 111.6 points in October, up 7.5 points (7.2 percent) from September and as much as 15.8 points (16.5 percent) above its value in the corresponding month last year. The October rise marked the fourth month of consecutive increase. Wheat export prices rose further in October, reflecting strong global demand amidst shrinking export availabilities, poor growing conditions in Argentina and continued dry weather adversely affecting winter wheat conditions in parts of Europe, northern America and the Black sea region. International maize prices also rallied to over six-year highs, largely underpinned by a fast pace in purchases by China and higher than earlier anticipated drawdown of stocks in the United States of America as well as sharp declines in export supplies in Brazil and Ukraine. Feed barley and sorghum prices also increased in October, supported by strong demand and spill-over from rising maize and wheat prices. By contrast, international rice prices fell to seven-month lows, as main-crop harvests got underway in Asia, intensifying efforts to attract buyers.

The **FAO Vegetable Oil Price Index** averaged 106.4 points in October, up 1.8 points (1.8 percent) month-on-month and posting a nine-month high. The continued strength of the index largely reflected firmer palm and soy oil prices, while those of rapeseed oil declined moderately. International palm oil quotations rose for a fifth consecutive month, underpinned by below-potential production prospects in leading producing countries and robust global import demand. In the meantime,

soybean values were supported by continued supply tightness in South America. By contrast, after rising five months in succession, international rapeseed oil values decreased in October, amid increased uncertainty regarding demand in the EU following the recent deterioration of the COVID-19 situation across the region.

The **FAO Dairy Price Index** averaged 104.4 points in October, up 2.2 points (2.2 percent) from September, marking the fifth consecutive monthly increase and lifting the index 3.6 points (3.5 percent) above its value in the corresponding month last year. In October, price quotations for all dairy products represented in the index rose, with cheese rising the most, followed by skim milk powder, whole milk powder and butter. Price increases in October reflected some degree of market tightening for near-term deliveries, underpinned by robust import demand from Asian and Middle Eastern markets amidst expectations for less export availabilities from Oceania later this year when production will be declining seasonally. In addition, increases in internal demand for future deliveries in Europe, where production is nearing its seasonal low, also contributed to spot market tightening and price strengthening.

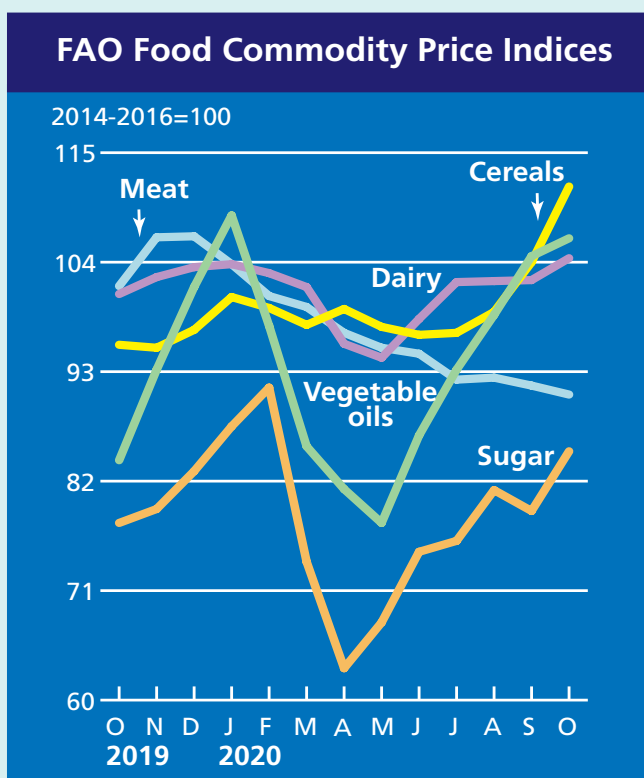
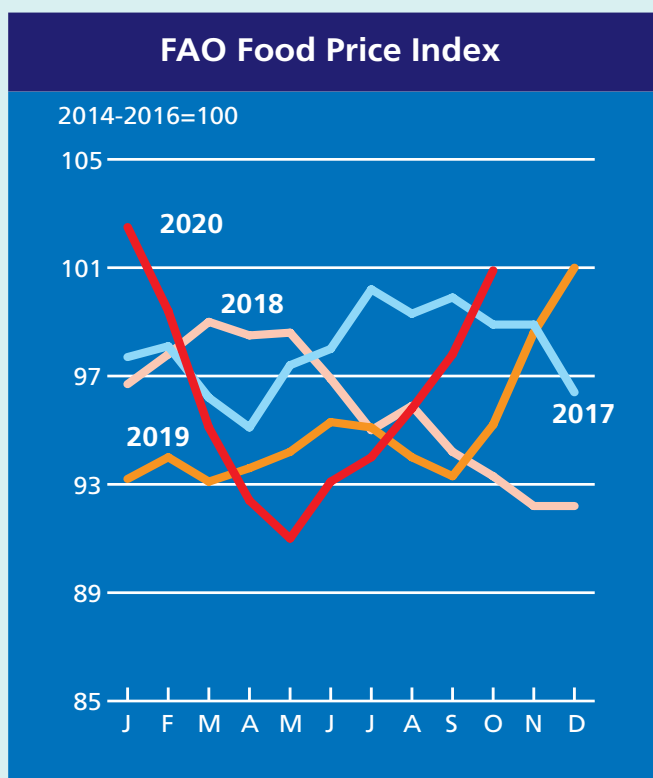
The **FAO Meat Price Index**<sup>2</sup> averaged 90.7 points in October, down slightly (0.5 points or 0.5 percent) from September, marking the ninth monthly decline since January, and standing 10.9 points (10.7 percent) lower than its value a year ago. Pig meat prices dropped, as a fall in the quotations of German products, reflecting continued influence of the import restrictions imposed by China on Germany, outweighed an increase in those from Brazil due to robust import demand. Meanwhile, bovine meat prices declined due to weak demand in the United States of America, coupled with rising shipments from South America, although supplies from Australia drifted lower due to rising demand for cattle for herd rebuilding. Poultry meat prices also fell slightly because of reduced orders from China and Saudi Arabia. By contrast, prices of ovine meat rose on steady internal demand and low export supplies, especially in Australia.

<sup>1</sup> All changes referred to in this section, in absolute or percentage terms, are calculated based on unrounded figures.

<sup>2</sup> Unlike for other commodity groups, most prices utilized in the calculation of the FAO Meat Price Index are not available when the FAO Food Price Index is computed and published; therefore, the value of the Meat Price Index for the most recent months is derived from a mixture of projected and observed prices. This can, at times, require significant revisions in the final value of the FAO Meat Price Index which could in turn influence the value of the FAO Food Price Index.

The **FAO Sugar Price Index** averaged 85.0 points in October, up 6.0 points (7.6 percent) from September and 7.2 points (9.3 percent) from last year. This increase reflected mostly the prospects of a lower sugar output in both Brazil and India, the two largest sugar producing countries, due to below average rainfalls. Sugar prices were also supported by developments in Thailand, where sugar output is seen lower by almost

5 percent from last year as a result of protracted dry conditions. Additional upward pressure was provided by fund buying, as evidenced by the weekly Commitment of Traders (COT) report. Furthermore, sugar prices displayed high volatility, driven also by uncertainties in crude oil market and movements in the Brazilian Real against the United States Dollar.



## FAO Food Price Indices

|      |           | Food Price Index <sup>1</sup> | Meat <sup>2</sup> | Dairy <sup>3</sup> | Cereals <sup>4</sup> | Vegetable Oils <sup>5</sup> | Sugar <sup>6</sup> |
|------|-----------|-------------------------------|-------------------|--------------------|----------------------|-----------------------------|--------------------|
| 2002 |           | 89.6                          | 89.9              | 80.9               | 93.7                 | 87.4                        | 97.8               |
| 2003 |           | 97.7                          | 95.9              | 95.6               | 99.2                 | 100.6                       | 100.6              |
| 2004 |           | 112.7                         | 114.2             | 123.5              | 107.1                | 111.9                       | 101.7              |
| 2005 |           | 118.0                         | 123.7             | 135.2              | 101.3                | 102.7                       | 140.3              |
| 2006 |           | 127.2                         | 120.9             | 129.7              | 118.9                | 112.7                       | 209.6              |
| 2007 |           | 161.4                         | 130.8             | 219.1              | 163.4                | 172.0                       | 143.0              |
| 2008 |           | 201.4                         | 160.7             | 223.1              | 232.1                | 227.1                       | 181.6              |
| 2009 |           | 160.3                         | 141.3             | 148.6              | 170.2                | 152.8                       | 257.3              |
| 2010 |           | 188.0                         | 158.3             | 206.6              | 179.2                | 197.4                       | 302.0              |
| 2011 |           | 229.9                         | 183.3             | 229.5              | 240.9                | 254.5                       | 368.9              |
| 2012 |           | 213.3                         | 182.0             | 193.6              | 236.1                | 223.9                       | 305.7              |
| 2013 |           | 209.8                         | 184.1             | 242.7              | 219.3                | 193.0                       | 251.0              |
| 2014 |           | 201.8                         | 198.3             | 224.1              | 191.9                | 181.1                       | 241.2              |
| 2015 |           | 164.0                         | 168.1             | 160.3              | 162.4                | 147.0                       | 190.7              |
| 2016 |           | 161.5                         | 156.2             | 153.8              | 146.9                | 163.8                       | 256.0              |
| 2017 |           | 174.6                         | 170.1             | 202.2              | 151.6                | 168.8                       | 227.3              |
| 2018 |           | 168.4                         | 166.3             | 192.9              | 165.3                | 144.0                       | 177.5              |
| 2019 |           | 95.0                          | 100.0             | 102.8              | 96.4                 | 83.3                        | 78.6               |
| 2019 | October   | 95.2                          | 101.6             | 100.8              | 95.7                 | 84.1                        | 77.8               |
|      | November  | 98.6                          | 106.5             | 102.5              | 95.4                 | 93.2                        | 79.2               |
|      | December  | 101.0                         | 106.6             | 103.5              | 97.2                 | 101.5                       | 83.0               |
| 2020 | January   | 102.5                         | 103.8             | 103.8              | 100.5                | 108.7                       | 87.5               |
|      | February  | 99.4                          | 100.6             | 102.9              | 99.4                 | 97.6                        | 91.4               |
|      | March     | 95.1                          | 99.5              | 101.5              | 97.7                 | 85.5                        | 73.9               |
|      | April     | 92.4                          | 96.9              | 95.8               | 99.3                 | 81.2                        | 63.2               |
|      | May       | 91.0                          | 95.4              | 94.4               | 97.5                 | 77.8                        | 67.8               |
|      | June      | 93.1                          | 94.8              | 98.3               | 96.7                 | 86.6                        | 74.9               |
|      | July      | 94.0                          | 92.2              | 102.0              | 96.9                 | 93.2                        | 76.0               |
|      | August    | 95.8                          | 92.2              | 102.1              | 99.0                 | 98.7                        | 81.1               |
|      | September | 97.8                          | 91.2              | 102.2              | 104.0                | 104.6                       | 79.0               |
|      | October   | 100.9                         | 90.7              | 104.4              | 111.6                | 106.4                       | 85.0               |

**1 Food Price Index:** Consists of the average of 5 commodity group price indices mentioned above, weighted with the average export shares of each of the groups for 2014-2016: in total 95 price quotations considered by FAO commodity specialists as representing the international prices of the food commodities are included in the overall index. Each sub-index is a weighted average of the price relatives of the commodities included in the group, with the base period price consisting of the averages for the years 2014-2016.

**2 Meat Price Index:** Based on 35 average export unit values/market prices of four meat types (bovine, pig, poultry and ovine) from 10 representative markets. Within each meat type, export unit values/prices are weighted by the trade shares of their respective markets, while the meat types are weighted by their average global export trade shares for 2014-2016. Quotations for the two most recent months may consist of estimates and be subject to revision..

**3 Dairy Price Index:** Computed using 8 price quotations of four dairy products (butter, cheese, SMP and WMP) from two representative markets. Within each dairy product, prices are weighted by the trade shares of their respective markets, while the dairy products are weighted by their average export shares for 2014-2016.

**4 Cereals Price Index:** Compiled using the International Grains Council (IGC) wheat price index (an average of 10 different wheat price quotations), the IGC maize price index (an average of 4 different maize price quotations), the IGC barley price index (an average of 5 different barley price quotations), 1 sorghum export quotation and the FAO All Rice Price Index. The FAO All Rice Price Index is based on 21 rice export quotations, combined into four groups consisting of Indica, Aromatic, Japonica and Glutinous rice varieties. Within each varietal group, a simple average of the relative prices of appropriate quotations is calculated; then the average relative prices of each of the four rice varieties are combined by weighting them with their (fixed) trade shares for 2014-2016. The Cereal Price Index combines the relative prices of sorghum, the IGC wheat, maize and barley price indices (re-based to 2014-2016) and the FAO All Rice Price Index by weighing each commodity with its average export trade share for 2014-2016. .

**5 Vegetable Oils Price Index:** Consists of an average of 10 different oils, weighted with average export trade shares of each oil product for 2014-2016.

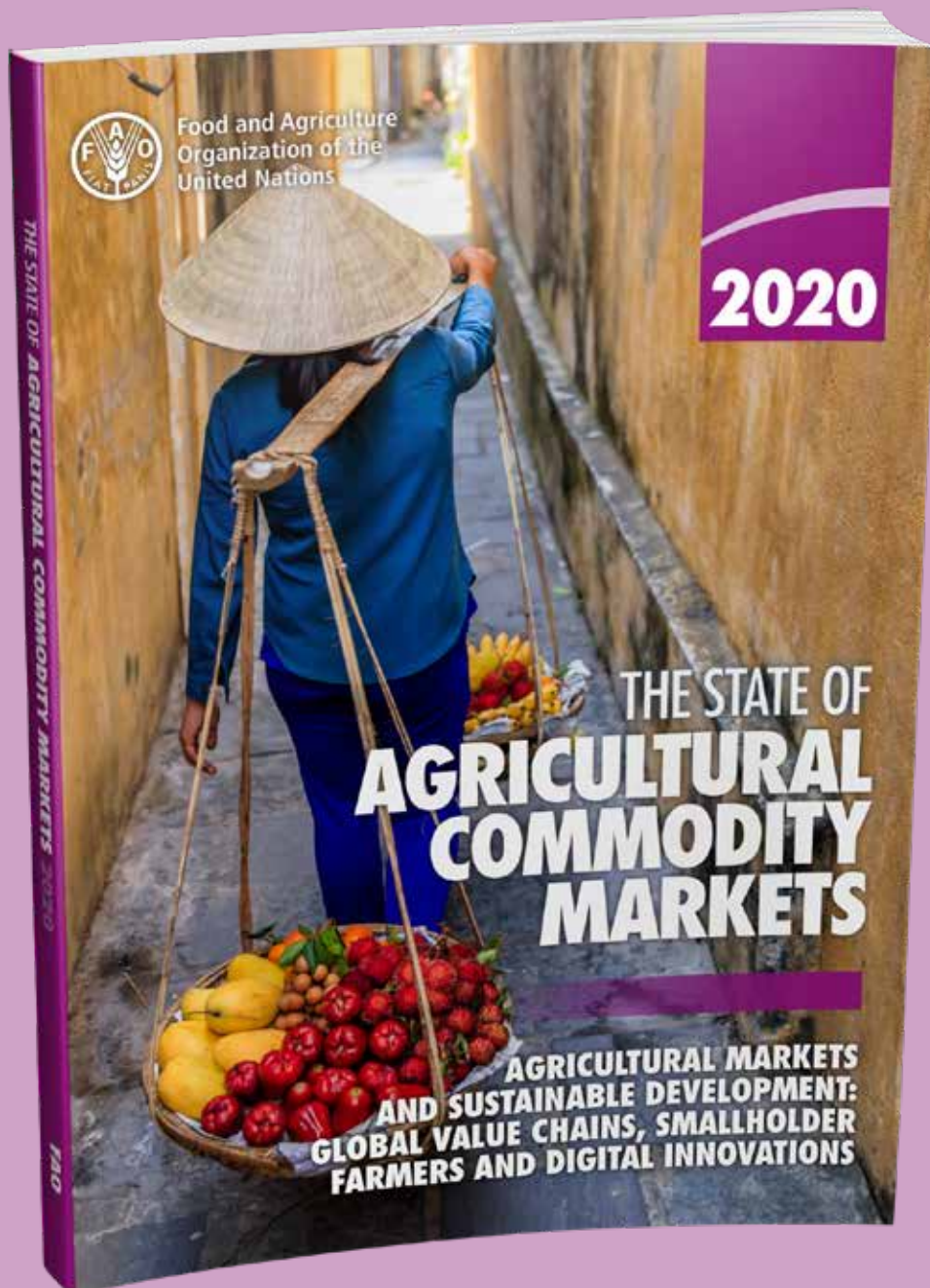
**6 Sugar Price Index:** Index form of the International Sugar Agreement prices with 2014-2016 as base.





**NEW RELEASE**

**THE STATE OF  
AGRICULTURAL COMMODITY MARKETS  
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