

Monitoring the Impact of COVID-19 in Myanmar

Yangon peri-urban poultry farmers – August 2020 survey round

Peixun Fang, Ben Belton, Hnin Ei Win, and Xiaobo Zhang

Key findings

- The supply of broilers increased from early June to August, but still remained below the 2019 monthly average supply level. However, the supply of eggs further decreased from 4 percent below the 2019 monthly average supply level in early June to 15 percent below that level in August.
- Broiler prices decreased by 31 percent from 3,400 to 2,350 MMK/viss in August.
- Cash flow in August remained very poor for broiler farms and worsened further for layer farms.
- The PMI operational capacity indices for both broiler and layer farms increased in August, suggesting improvements in operational capacity – broiler farms reported receiving day-old chicks on time and at lower prices and layer farms obtained higher prices for their eggs.
- The PMI revenue indices for both broiler and layer farms increased considerably in August. Layer farms benefited from higher prices for eggs, even though the total quantity of eggs sold barely changed. Broiler farms sold on average slightly higher quantities and more farms made sales in August.
- Supply shortages of day-old-chicks eased significantly in August.
- Low market prices for broilers again became a problem for broiler farms.

Recommended actions

- All policy recommendations to support peri-urban poultry farmers stated in our first four policy notes still stand:
 - Prolonged or expanded income support to vulnerable households;
 - Participation in government credit guarantee schemes;
 - Temporary income support to poultry farms;
 - Temporary waiver of import ban on day-old-chicks until mid- or late September;
 - Tax exemptions or deferrals; and
 - Lifting restrictions on transportation of livestock and livestock products.

Introduction

Poultry farmers in Myanmar were interviewed by telephone in early June, late June, early July, and late July 2020 to determine how their businesses were being affected by COVID-19 related restrictions. The results of those surveys were published in Myanmar Strategy Support Program Policy Notes [11](#),¹ [13](#),² [19](#),³ and [21](#),⁴ respectively. To trace the continuing impact of the COVID-19 pandemic on their economic activities, a fifth phone survey of poultry farmers was done in August 2020. The fifth survey included 228 poultry farmers (163 broiler and 65 layer farms) in the Yangon peri-urban area (Ayeyarwady, Bago, and Yangon regions) who had been interviewed in the first four rounds of the survey.⁵ The same survey questionnaire was used. Because this survey round is about two months after the early June survey round, which is the length of a full broiler production cycle, we again asked questions in this round about the last complete broiler production cycle. This Policy Note reports on the results of this fifth survey round.

Though it seems that the poultry sector stabilized recently, COVID-19 has had a lasting impact of continuing mismatches in supply and demand, which intensifies commercial risks in an already volatile sector. Therefore, it is important to keep monitoring the sector and for government to provide timely support to help stabilize the supply of broiler and eggs and to mitigate the adverse implications for nutrition and food security that would arise due to reduced consumption of poultry and eggs.

This Policy Note seeks to help the Ministry of Agriculture, Livestock and Irrigation (MOALI) of the Government of Myanmar and agricultural sector stakeholders to: (1) understand the challenges that poultry farms have faced since the outbreak of COVID-19; (2) learn about the adaptations and changes poultry farms are making in response to those challenges; and (3) track input procurement and marketing activities, including quantities and prices.

Effects of COVID-19 on poultry farmers

Only a very small number of broiler or layer farms shut down or reopened in August (Figure 1). Unlike in June and July when many broiler farms reopened, very few temporarily closed broiler farms reopened in August. The price of broilers fell in August to below the average price of 2019, so it makes sense that temporarily closed farms did not reopen at this time considering the sluggish demand. Those farms that remain temporarily closed are probably those with limited resource to reopen quickly. While no broiler farms shut down in July, it was reported that some started closing in August probably due to the further significant fall in broiler prices. Overall, the number of broiler farms was stable, with the net shares of operational and closed broiler farms changing only marginally between late July and August (Table 1).

Similarly, only one layer farm permanently closed in August, so the share of layer farms in operation decreased slightly to 83 percent. Overall, the operational level of layer farms was stable in August.

¹ Fang, P., B. Belton, Hnin Ei Win, Khin Zin Win, and X. Zhang. 2020. *Monitoring the Impact of COVID-19 in Myanmar: Yangon peri-urban poultry farmers – early June 2020 survey round*. IFPRI Myanmar Strategy Support Program Policy Note 11. Yangon: International Food Policy Research Institute (IFPRI).

² Fang, P., B. Belton, Hnin Ei Win, and X. Zhang. 2020. *Monitoring the Impact of COVID-19 in Myanmar: Yangon peri-urban poultry farmers – late June 2020 survey round*. IFPRI Myanmar Strategy Support Program Policy Note 13. Yangon: International Food Policy Research Institute (IFPRI).

³ Fang, P., B. Belton, Hnin Ei Win, and X. Zhang. 2020. *Monitoring the Impact of COVID-19 in Myanmar: Yangon peri-urban poultry farmers – early July 2020 survey round*. IFPRI Myanmar Strategy Support Program Policy Note 19. Yangon: International Food Policy Research Institute (IFPRI).

⁴ Fang, P., B. Belton, Hnin Ei Win, and X. Zhang. 2020. *Monitoring the Impact of COVID-19 in Myanmar: Yangon peri-urban poultry farmers – late July 2020 survey round*. IFPRI Myanmar Strategy Support Program Policy Note 21. Yangon: International Food Policy Research Institute (IFPRI).

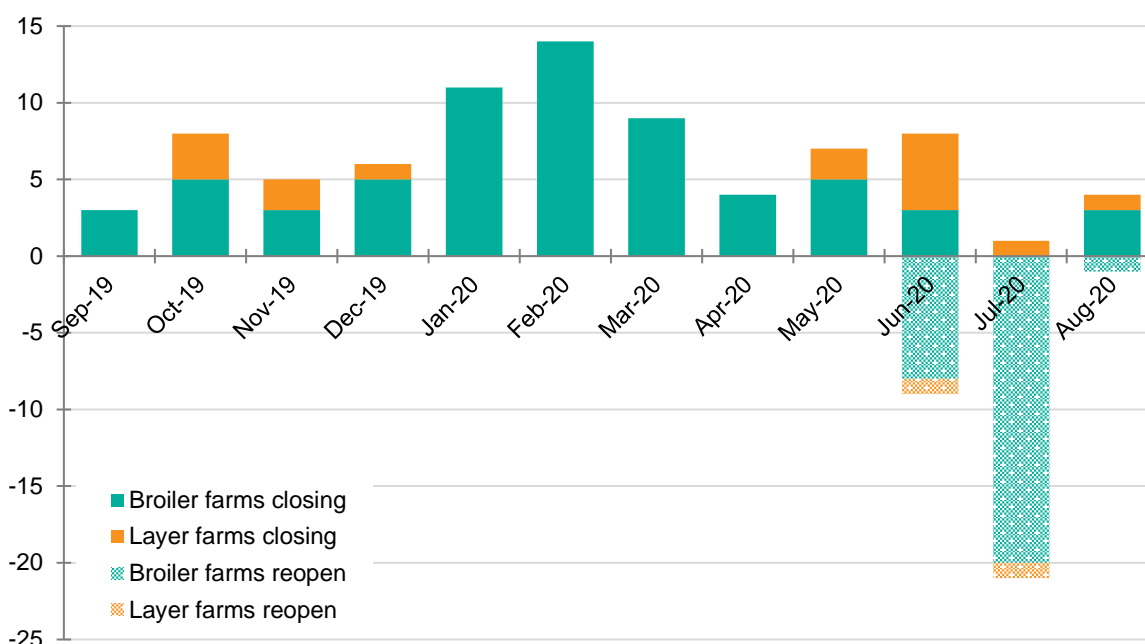
⁵ 228 out of the 235 farms from the fourth round were interviewed in the fifth round of the poultry farmers survey.

Table 1: Operational status of poultry farms, percent of farms surveyed

	Broiler farms					Layer farms				
	early June	late June	early July	late July	August	early June	late June	early July	late July	August
Still in operation	69	72	78	82	81	90	85	83	85	83
Temporarily closed	25	22	11	7	8	4	6	8	6	6
Completely closed	6	6	11	11	11	6	9	9	9	10

Source: 2020 Yangon peri-urban poultry farmer survey – first to fifth rounds.

Figure 1: Broiler and layer poultry farms closed and reopened by month, September 2019 to August 2020, number



Source: 2020 Yangon peri-urban poultry farmer survey – first to fifth rounds.

Note: Our survey started in June, so we do not have data regarding farms reopening before June. However, farms were unlikely to reopen before June the demand for poultry products was very low at that time.

The **supply of broilers increased from June to August**, but **still remained lower than the 2019 monthly average level** (26 percent below the 2019 average level in August, as compared to 53 percent below in June). On the other hand, the **supply of eggs decreased between June and August**, falling from 4 percent below the 2019 monthly average level in early June to 15 percent below in August (Table 2).

Table 2: Percentage supply change of broilers and eggs among surveyed farms in early June and August 2020 relative to 2019 monthly average supply levels

	Early June	August
Broiler supply change from...		
Operational farms	-27	-9
Permanently closed farms	-5	-11
Temporarily closed farms	-21	-6
Total change	-53	-26
Egg supply change from...		
Operational farms	7	9
Permanently closed farms	-9	-19
Temporarily closed farms	-3	-5
Total change	-4	-15

Source: 2020 Yangon peri-urban poultry farmer survey – first and fifth rounds.

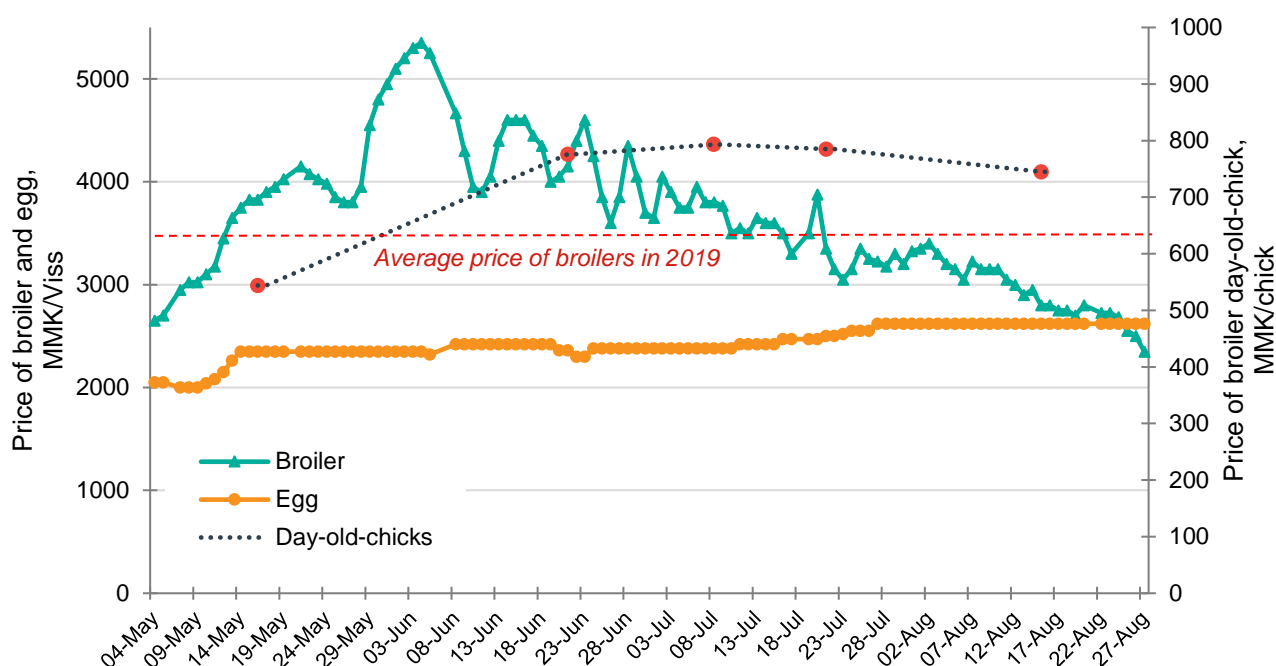
Changes in supply are estimated based on changes in the length of production cycles, changes in the chicken population raised, and the share of surveyed farms in operation. Supply changes due to farms closing are estimated based on the share of farms closed and the size of those farms.

In early June, the decrease in broiler supply mainly came from operational farms and temporarily closed farms. Since then, operational broiler farms improved their operational capacity – the average production cycle decreased from 51 days in early June to 46 days in August and the gap between cycles decreased from 28 to 18 days. The average number of broilers raised per cycle per farm also increased – it was 20 percent lower in June 2020 compared to the 2019 average, but was only 9 percent lower in August. Moreover, a large share of farms that were temporarily closed have reopened over the past two months, which also contributed to an easing of the broiler supply shortage. In consequence, the supply of broilers has increased since June, even though supply in August remained lower than the average supply in 2019.

In contrast, the supply of eggs has decreased from 4 percent below average supply levels in 2019 in early June to 15 percent below in August. This is mainly caused by many layer farms having permanently shut down, particularly in June (Figure 1).

With the recovery of broiler supply and continued low broiler demand, the **price of broilers continued to gradually decrease in August** (Figure 2). Prices in August have fallen below the 2019 average. Additionally, though the importation of day-old-chicks allowed by the Myanmar government stabilized the price of broiler day-old-chicks, the price is still much higher than that of 2019, when it was about 650 MMK/chick (based on breeder farms data). With the relatively lower price of broilers and higher price of day-old-chicks and other inputs, it will be difficult for some broiler farms to survive.

Figure 2: Daily farmgate prices of broiler chickens and chicken eggs and price of broiler day-old-chicks, May to August 2020



Source: Authors' compilation based on the daily broiler and egg price posted on Facebook by Myanmar Livestock Federation. The price of day-old-chicks is based on the Yangon peri-urban poultry farmer survey (five rounds).

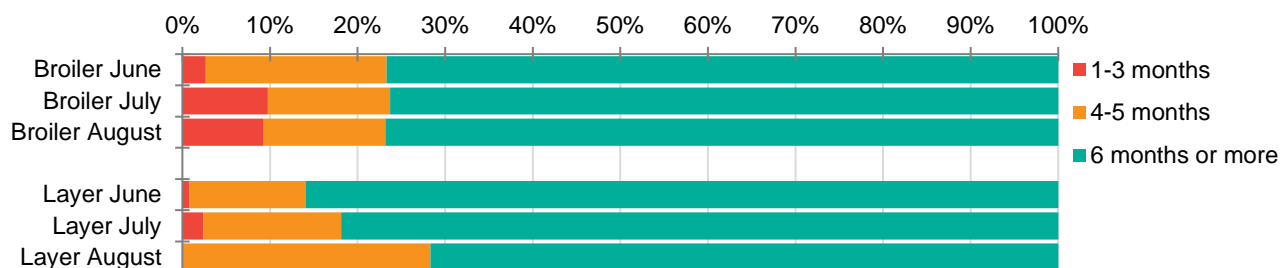
Note: We did not present the price of layer day-old-chicks here because there are very few observations.

Viss' is a traditional unit of mass in Myanmar equivalent to 1.63 kg. In early 2020, MMK 1,375 ≈ USD 1.00.

As the supply of eggs in August remained similar to that in July and demand continues to be sluggish, the **price of eggs remained constant in August** at 2,620 MMK/Viss.

Cash flow for broiler farms in August is still as poor as in July, and it continued to worsen for layer farms. Nine percent of broiler farms reported that they could not maintain operations on their current cash flow for longer than three months, while 14 percent reported that they could not do so for longer than five months (Figure 3). With the lower price of day-old-chicks in August, much fewer broiler farms reported the high price of day-old-chicks as a major business challenge. This should have eased cash constraints for some broiler farmers. However, the further price drop of broilers hurt the cash flow of broiler farms in August, which again made low market price of broilers the most significant challenge.

Figure 3: Expectations on ability to maintain operations with current cash flow, percent of farms surveyed

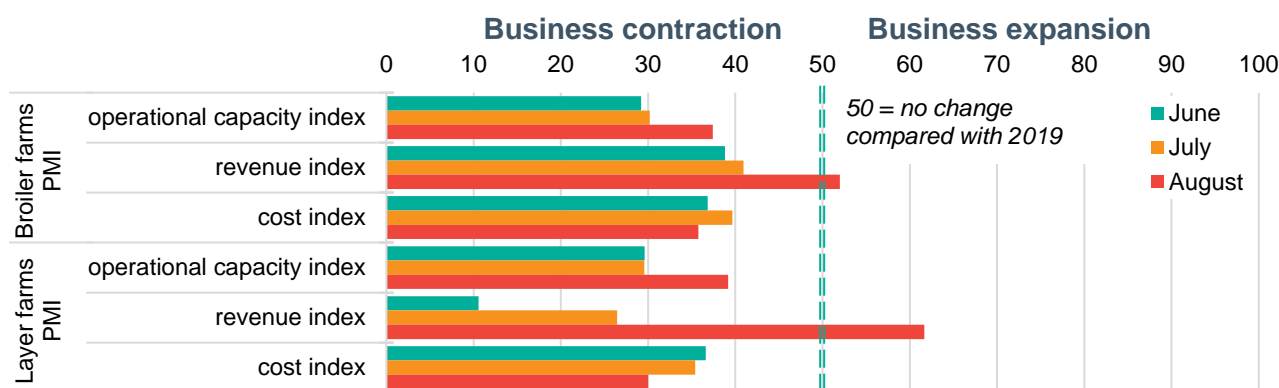


Source: 2020 Yangon peri-urban poultry farmer survey – first to fifth rounds.

More layer farms are facing cash constraint problems in August. The share of layer farms reporting that they could not maintain operations on their current cash flow for longer than five months increased from 18 to 28 percent. However, unlike broiler farms, no layer farms are experiencing extreme cash constraints, i.e., anticipate that they could not maintain operations on current cash flow for longer than three months. Though the price of eggs has been increasing in recent months, layer farms suffer from sluggish demand and price increases for feed.

To illustrate the business operations of poultry farms in 2020 compared to 2019, we derived the Purchasing Managers' Indices (PMI) for operational capacity, operating cost, and revenue.⁶

Figure 4: Purchasing Managers' Indices (PMI) of poultry farms in 2020 compared with 2019



Source: 2020 Yangon peri-urban poultry farmer survey – first to fifth rounds.

- The PMI operational capacity indices for broiler and layer farms both increased significantly in August, but are still below 50 (Figure 4). This suggests that the operational capacity of both broiler and layer farms improved between July and August but remains lower than the 2019

⁶ The Purchasing Managers' Index (PMI) is an index of the prevailing direction of economic trends in the manufacturing and service sectors. It consists of a diffusion index that summarizes whether market conditions, as viewed by purchasing managers, are expanding, staying the same, or contracting. An index reading of 50 means that the variable is unchanged. An index above 50 signals growth or expansion, while below 50 indicates decline or contraction.

average. Fewer broiler farms suffered from the day-old-chicks shortage, which contributed to their improvement in operational capacity. Additionally, price increases for eggs helped the operations of layer farms.

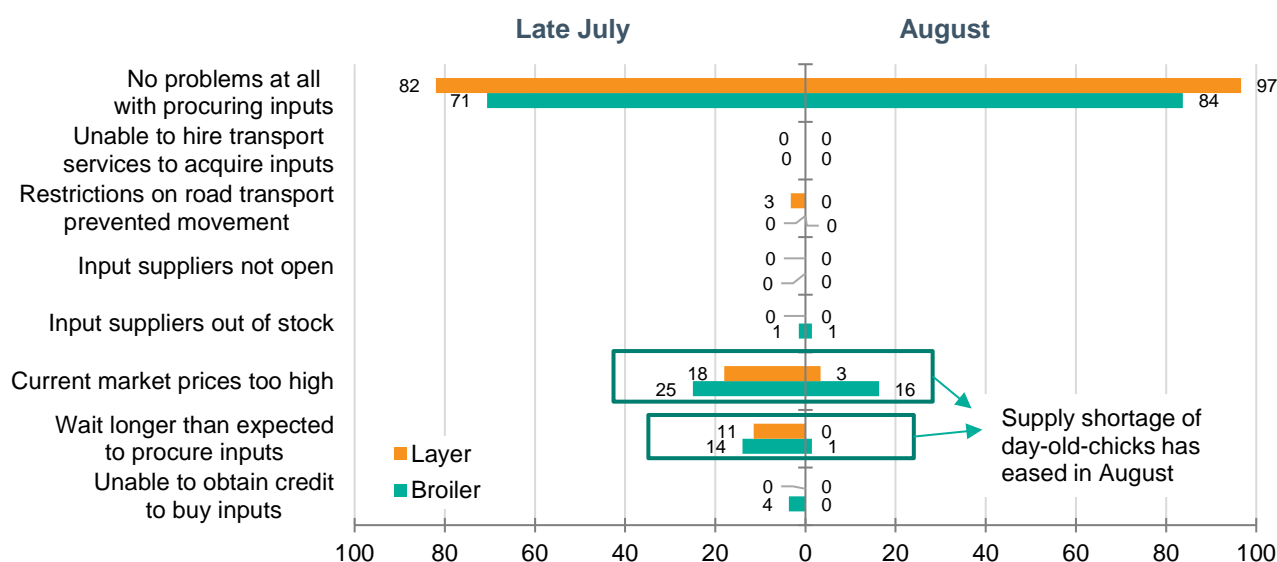
- The PMI revenue index for both broiler and layer farms increased considerably in August compared with July (Figure 4). The index for broiler farms is slightly higher than 50, which indicates that the revenue of those operational broiler farms reached the 2019 average level. Though broiler prices have been decreasing in August, more surveyed farms could make sales, and the total quantity of broilers sold slightly increased in August compared with July. Therefore, it makes sense that the overall PMI revenue index of broiler farms increased. However, it is important to note that the price of broilers decreased significantly after our survey period in August, which might result in the PMI revenue index again falling below 50.

The PMI revenue index for layer farms (62) surpassed that of broiler farms (52) in August. Layer farms likely benefited from the 10 percent increase in the price of eggs in August, even though the total quantity of eggs sold by the layer farms surveyed barely changed.

- The PMI cost index for both broiler and layer farms decreased in August, indicating cost increases in August relative to July. As the price of day-old-chicks gradually decreased, the increase in costs is likely due to recent higher prices for feed. As noted in the last policy note, the supply shortage driving these higher prices is likely to soon be corrected by feed producers.

Supply shortages of day-old-chicks have greatly eased in August. Thanks to the Myanmar government's policy of allowing importation of day-old-chicks since mid-May, the share of farms reporting shortages of day-old-chicks decreased considerably between late July and August (Figure 5). Almost all farms could receive day-old-chicks on time. However, sixteen percent of broiler farms still complained about high input prices. They mostly complained about the high price of feed and some still complained about the high prices of day-old-chicks. In general, supply of day-old-chicks is no longer a main constraint. This is also consistent with answers to the open-ended question, "what is the most important challenge facing your business": the share of broiler farms reporting supply shortage of day-old-chicks as the main challenge decreased from 24 to 9 percent between late July and August. Generally, broiler and layer farms did not experience significant challenges in accessing inputs in August.

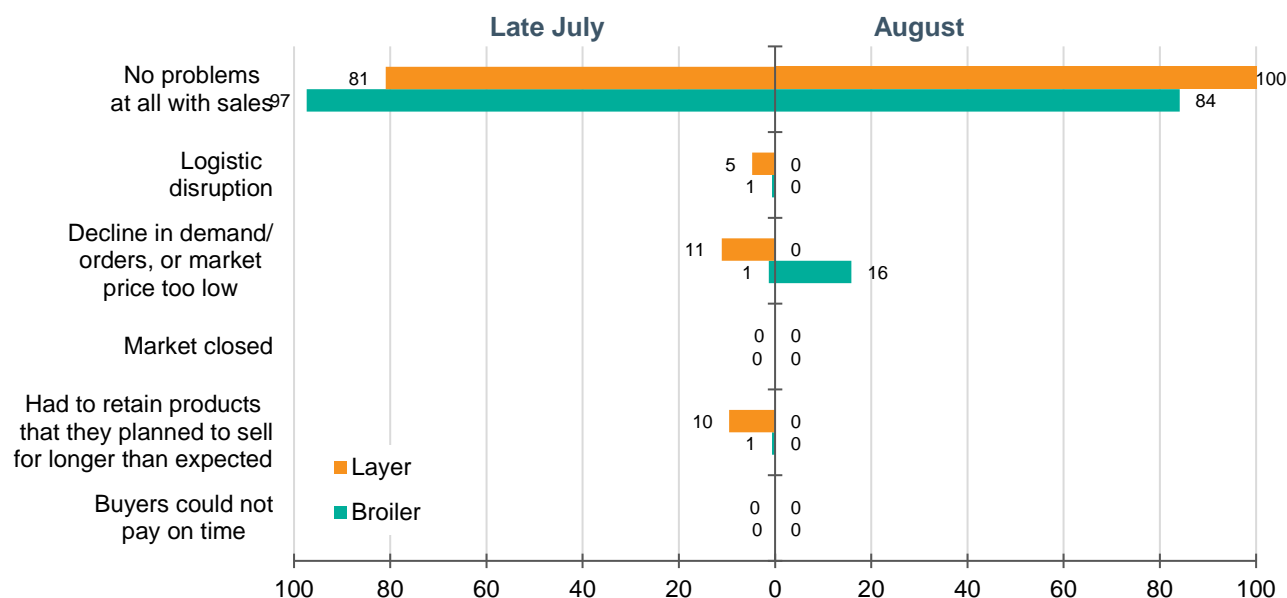
Figure 5: Problems related to accessing inputs for poultry farms, percent of farms surveyed



Source: 2020 Yangon peri-urban poultry farmer survey – first to fifth rounds.

All layer farms reported no problems in selling eggs and low market prices again became a problem for broiler farms. More than 10 percent of layer farms complained about the low price of eggs in July, but all of them were happy about the August price. On the other hand, while almost all broiler farms reported no problem selling broilers in late July, 16 percent of broiler farms reported low broiler price again being a problem for them in August (Figure 6).

Figure 6: Problems related to selling products for poultry farms, percent of farms surveyed



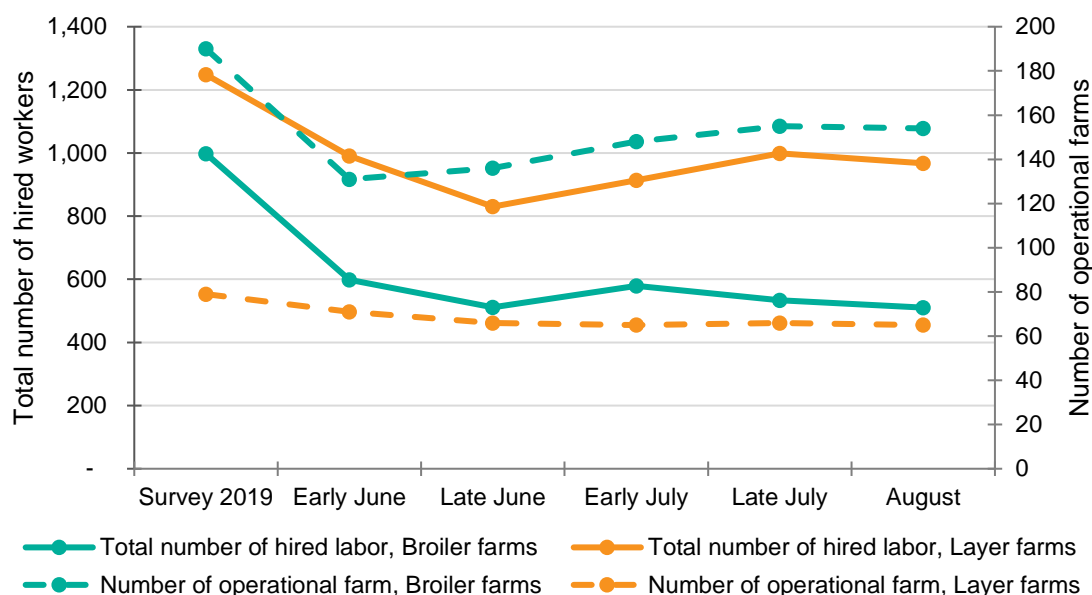
Source: 2020 Yangon peri-urban poultry farmer survey – first to fifth rounds.

The total workers hired by the surveyed broiler farms decreased by almost half between September 2019 and June 2020 – from 998 to 511 (Figure 7).⁷ Reductions in the work force came from both closed and operational farms. The average number of workers hired by operational broiler farms decreased from 5.3 to 3.8 over the period. The total number of hired workers started increasing again in late June thanks to improved market conditions. However, this trend did not continue in August, because the broiler price dropped in July and August due to the sluggish demand and higher supply (Figure 2). Overall, Figure 7 shows that the work force on broiler farms has followed a pattern between a V-shape and a L-shape since September 2019.

On layer farms, the total number of workers also decreased until late June, gradually increasing since then. The increase is mainly because operational layer farms hired back workers – the average number of workers per farm increased from about 12 in June to 15 in August. However, the number of operational layer farms decreased somewhat between June and August, which has hurt the supply of eggs. Overall, as shown in Table 2, egg supply decreased over our survey period.

⁷ Broiler farms in Myanmar also suffered a salmonella outbreak in January 2020, which resulted in many farms shutting down. However, without COVID-19, the broiler market was expected to recover by March for the Thingyan holiday.

Figure 7: Hired workers and operational farms across different survey rounds in 2019 and 2020, total number



Source: 2019 baseline and 2020 Yangon peri-urban poultry farmer survey – first to fifth rounds.

Policy recommendations

Based on the analysis of the fifth survey round of poultry farms in the Yangon peri-urban area, all policy recommendations in our first four policy notes still stand – prolonged or expanded income support to vulnerable households; participation in government credit guarantee schemes; temporary income support to poultry farms; temporary waiver of the import ban on day-old-chicks until at least mid- or late September; tax exemptions or deferrals; and lifting restrictions on transportation of livestock and livestock products. The recommendations regarding income support to vulnerable households, credit and income support to poultry farms, temporary waiver for allowing the importation of day-old-chicks are further stressed in this report.

- Operational layer farms were faring better in August thanks to the higher price of eggs. However, these higher prices are probably due to a decrease in supply rather than changes in egg demand. Demand for egg remains sluggish. Prolonged or expanded income support to vulnerable households could bolster egg consumption and contribute to food and nutrition security, which will also help layer farms.
- Current credit/loan programs mostly target registered livestock farms and exclude unregistered ones. However, many small-scale poultry farms in Myanmar are unregistered. To stabilize supplies of broilers and eggs, credit/loan programs should be extended to unregistered farms to help them reopen or maintain operations.
- The Livestock, Breeding and Veterinary Department (LBVD) of MOALI normally holds meetings quarterly. Since the outbreak of COVID-19, LBVD has held monthly meetings with the Myanmar Livestock Federation and importers to discuss the importation of day-old-chicks. Swift action by LBVD played an important role in averting a serious crisis in broiler and egg supplies. Though the price of broiler day-old-chicks has started decreasing recently, it is important to continue government's policy of allowing the importation of day-old-chicks. This is essential for broiler farms to remain in operation and for the supply of broilers to stabilize at relatively lower prices. This policy contributes positively to the recovery of demand for broilers.

Analysis of data collected through the five survey rounds of poultry farmers around Yangon highlights several key indicators to monitor in future survey rounds. These include:

- Additional farm closures due to COVID-19 related shocks and whether temporarily closed farms reopen as demand for poultry products recovers;
- Changes in the number of chickens raised and restocked;
- Operational capacity, revenue, and costs compared to 2019 through the PMI indices;
- Changes in the number of regular workers hired;
- Problems related to selling products and accessing inputs, especially day-old-chicks; and
- Whether farms have attempted to apply for assistance and any problems they encountered in the process.

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