

COVID-19 Lockdown: Impact on agriculture

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Lack of preparation by the Central government for dealing with the COVID-19 pandemic has dealt a massive blow to India's economy and has caused enormous hardships to working people of the country. The informal economy, of which agriculture and the rest of the rural economy are a part, has been hit the hardest by this. The suffering of people and the crisis of the economy have been aggravated because of a stubborn refusal by the Central government to acknowledge that there is a crisis, take responsibility for its mismanagement, and provide relief to the people.

In this series of three articles, we provide a summary of various ways in which agriculture and the rural economy of India have been impacted by the COVID-19 lockdown. We also dissect the major announcements of the government related to agriculture and the rural economy, and show that major claims that have been made by the government are likely to be false and have been used to mislead people to believe that the government is providing support to farmers. In reality, despite almost two months having passed since the lockdown was first imposed, the Central government has provided nothing by way of support to farmers. On the contrary, newer and newer challenges have confronted the farmers as the cropping cycle progressed from March through May.

These articles use whatever secondary data have become available on different aspects of the rural economy. Along with this, they use insights from a large number of village reports that have been prepared by research scholars who were already conducting field-based studies of villages in different parts of India. These studies have been published as a series titled [India's Villages during the COVID-19 Pandemic](#). We also use information from various media reports.

This article deals with problems related to agricultural production, marketing and public procurement. We also discuss problems for producers of perishable commodities such as milk, vegetables, fruits and poultry. We also examine the announcements that have been made by the government so far and show that the government has provided no additional relief so far to deal with various problems that the lockdown has created. In fact, its refusal to acknowledge the seriousness of the crisis has resulted in worsening of distress and emergence of new challenges as the agricultural seasons have moved forward.

The remaining two articles will deal with the situation in respect of rural employment and the status of the public distribution system.

Harvesting of Rabi Crops

End of March and April is the time for harvesting of the Rabi crops. Wheat is the second most important crop (after rice) in the country with about 30 million hectares of land sown with it in the Rabi season. Gram (chickpea), sown on about 9 million hectares of land in the Rabi season, is the most important pulse crop of the country. Mustard, sown in the Rabi season on over 6 million hectares, is the second most

important oilseed crop (after Soybean). Along with these, a large number of other crops, including various fruits and vegetables, are produced in this season. The most important among these was potato, which was harvested in February-March, with the largest share of production in Uttar Pradesh, West Bengal, Bihar and Gujarat.

Harvesting of wheat was already underway in Central and Eastern India when the lockdown was announced. Mustard was being harvested in Western India. Thanks to a prolonged winter, harvesting of wheat in north-western India, the most important wheat producing region of the country, was to start only around the middle of April.

Harvesting of wheat is mechanised to a significant degree in northern, western and central India. Combine harvesters, mostly owned by people in Punjab, start the harvesting season in central India and move northwards as the season progresses, and finish the season in Punjab, where harvesting usually takes place around middle of April. Even for combine harvesters owned by farmers in other States, the drivers and mechanics come from Punjab every year. Combine harvesters were needed immediately in States such as Madhya Pradesh, Chhattisgarh and Uttar Pradesh. Since the government took weeks to wake up to this need, most of the harvesting in these States was done manually by farmers themselves or by using whatever labour was locally available. Even when the crop is harvested manually, threshing machines are needed to separate the grain. Harvesting and post-harvest work such as threshing, winnowing, loading and storage also require a number of workers to assemble together. With the lockdown in place, most farmers were able carry out these tasks only at a snail's pace. The implementation of the lockdown was also most draconian in the first few weeks, with no clarity about exemption to agricultural work, and local police kept disrupting the work.

Impact on Perishables

The impact on producers of perishables — vegetables, fruits, milk, eggs and poultry — has been even more stark than on the producers of grain. The problem in respect of these has been manifold.

First, with sudden loss of employment and incomes, there was a significant reduction in demand for these commodities. Closure of sweet shops, tea-shops and restaurants also dealt a blow to the demand for these commodities, in particular, of milk. The Finance Minister, in her press briefing on May 15, admitted that the demand for milk had fallen by 20-25 per cent. This led cooperatives and private dairies to reduce the quantity of milk they purchase from farmers. Daily sale of milk by Amul, one of the largest dairy cooperatives, declined by 30 per cent ([Economic Times, 2020](#)). The fall is likely to have been even higher for other cooperatives, private dairies and informal suppliers of milk. The MD of Amul reported that “the private or small players or ice-cream makers who were buying milk from the farmers have stopped doing so because they do not know what to do with the milk.” Some of the early studies in the India's Villages during the COVID-19 Pandemic series reported that even cooperative dairies were not procuring milk in the villages (see, for example, [Siwach, 2020](#)).

The Finance Minister lied about extra purchases to the tune of 110 crore litres of milk by dairy cooperatives to help dairy farmers. Dairy cooperatives did not increase their procurement of milk during the period of the lockdown significantly. The extra procurement of milk is not over and above the usual level of procurement. This milk

became extra because the sales fell drastically because of the lockdown. While the dairy cooperatives procured (as per the Finance Minister's claim) an average of 560 lakh litres, they managed to sell only 360 lakh litres per day. The difference between 560 lakh litres of procurement and 360 lakh litres of sale amounts to 110 crore litres of milk over about 50 days. The dairy cooperatives did not spend any extra resources to procure milk from farmers because private dairies had stopped buying milk during the lockdown. They procured more or less what they used to. The unsold milk remains with dairy cooperatives, is converted into skimmed milk powder and will be used later. The central government has not given a penny to dairy cooperatives to compensate them either for their losses or for the losses of dairy farmers.

Similarly, the sales of fruits and vegetables has contracted very significantly because of the decline in demand. Mango is harvested in different parts of the country between April and July. Litchi is harvested in eastern India in May. This is also the season for harvesting of melons and watermelons in different parts of the country. Producers of all these fruits have incurred massive losses because of a collapse of both export and domestic demand.

Secondly, the sudden announcement of lockdown resulted in a disruption of supply chains and, particularly in the first few weeks, the farmers were unable to take their produce to the wholesale markets and haats, traders were unable to go to villages to buy the produce, and producers were forced into distress sales to whoever they could sell their produce to within the villages. The Finance Minister herself admitted that "the milk was being thrown on the street". MD of Amul reported that the price of milk had fallen by Rs. 5-9 per litre (Economic Times, 2020).

Data from Mandis show that the arrivals of potato between March 25th and May 3rd was 54 per cent less than the arrivals during the same period last year. The shortfall was 70 per cent in case of onions, 22 per cent in case of tomato and 25 per cent in case of cauliflower. A substantial part of this production of perishable crops, which did not find its way to the markets, would have been destroyed.

While the retail prices have not fallen because of collapse of demand — if at all, the retail prices increased, marginally to significantly for different commodities and in different areas — the farmgate prices saw a significant decline for commodities like milk and vegetables. There have been reports of farmers having to dump their produce and to plough back standing crops because the market prices did not cover even the cost of harvesting. There have also been reports of farmers committing suicides because of inability to sell their produce (Indian Express, 2020).

Thirdly, since early February, there were rumours about spread of Coronavirus through meat and eggs resulting in a collapse of demand. Massive losses were incurred by poultry farmers as they were forced to sell eggs and poultry for a pittance. In particular, many small poultry producers, who have limited capital and infrastructure, were forced to shut down their poultry farms because of inability to bear the losses.

Fourthly, the lockdown also resulted in disruption in supply of inputs for these crops. In particular, in the first few weeks, producers of vegetables and fruits were unable to get fertilizers and pesticides for their crops. Dairy farmers were unable to buy cattle feed. Delays in harvesting of rabi crops resulted in a disruption in the supply of

fodder. A study from Gijhi village of Haryana shows that farmers in the village grow maize and bajra for green fodder after the harvesting of the wheat and before the sowing of the kharif paddy ([Anju, 2020](#)). The delay in the harvesting and sale of the wheat crop has led to a delay in the sowing of these interim crops. A report based on interviews with input dealers found that, in Fatehabad (Haryana), Patiala (Punjab) and Bulandshahr (Uttar Pradesh), dealers were unable to provide seeds of jowar to farmers ([Bansal P, 2020](#)). If farmers are unable to grow these crops before it is time for them to start preparing the land for paddy, they are likely to face a shortage of fodder for their livestock in the coming months. These disruptions in access to input will have repercussions on yields of these crops and livestock not only during the lockdown but also in the coming months.

Crop Losses

All of this meant that farmers had to go through a lot of trouble, and incur additional costs, for harvesting their crops. Their problems were compounded because of risk of losing the crop. A mature crop, if not safely stored, can be spoilt because of pests and diseases. The storage capacity at the farm-level is limited and often not good enough for prolonged storage. This is particularly a problem for poor and middle peasants and for producers of perishable crops. While perishable crops such as potato and tomato need cold-storage, even grain is at risk of being spoilt. This problem has been compounded because of several spells of rain and hailstorm across large parts of India through the months of March and April. Between March 1 and April 29, about 59 per cent of the area of the country had large excess (more than 60 per cent) of rainfall (Figure 1). The excess moisture at this stage of the crop is likely to have resulted in considerable losses to all crops including wheat.

In her press briefing on May 15, the Finance Minister announced that claims of Rs. 6,400 crores have been paid through PM Fasal Bima Yojana (PMFBY) during the period of the lockdown. This is a misleading claim for various reasons. First, this figure refers to claims for the previous year for which payments were pending. Secondly, under the PMFBY, farmers contribute the major part of the premium. Table 1 shows the wide range, from 15 per cent to 80 per cent, of the farmer's share in premium paid for crop insurance under PMFBY. In most cases, farmer's contribution exceeds the contribution of the central government as the government's share is equally divided between the Centre and the State governments. Given this, counting the claims paid under PMFBY as relief provided by the Central government is absurd. Thirdly, under PMFBY, insurance coverage is provided primarily by private insurance companies. The payment of claims being reported are data provided by private insurance companies that have an incentive to over-report payment of claims. There is no way of independently verifying whether these claims were actually paid as no information is available on who received these claims. It is quite possible therefore that the claim of transfer of Rs. 6400 crores as insurance claims (even if it is for past losses) is actually an overstatement.

In the economic package that has been announced by the Finance Minister so far, nothing has been mentioned about compensating farmers for losses that have occurred due to the lockdown.

Table 1: Farmer's contribution in total premium in PM Fasal Bima Yojana, 2019-20 (per cent)

| Crop | Farmer's share in the premium (District and State in parentheses) |
|---------|--|
| Wheat | 50 (Amethi, UP), 33 (Hoshangabad, MP), 60 (Kurukshetra, HAR) |
| Mustard | 38 (Alwar, RAJ), 55 (Jhajjar, HAR), 27 (Balaghat, MP) |
| Cotton | 33 (Amravati, MAH), 62 (Sriganganagar, RAJ), 42 (Anantapur, AP), 27 (Khandwa, MP), 33 (Surendranagar, GUJ) |
| Gram | 15 (Bhind, MP), 27 (Gondiya, MAH), 15 (Barmer, RAJ), 60 (Adilabad, TEL) |
| Paddy | 33 (Azamgarh, UP), 25 (Thanjavur, TN), 66 (Kamrup, ASM), 80 (Nalgonda, TEL), 54 (Karnal, HAR) |

Source: Computed using the Insurance Premium Calculator on the website of the PMFBY (<https://pmfby.gov.in/>)

Agricultural Marketing

A large number of agricultural mandis shut down when the lockdown was first announced. A detailed study of 1331 mandis across the country has shown that during the first 21 days of the lockdown, the number of mandis that were operational fell very significantly (Rawal and Verma, 2020). For example, the number of mandis in which wheat was traded fell by 62 per cent over the last year and the number of mandis in which mustard seed was traded fell by 70 per cent over the last year. As a result, the total market arrivals of wheat during the first phase of the lockdown was only 6 per cent of the quantity of arrivals in the same period last year. The situation was found to be equally bad in case of gram and mustard seed ([Rawal and Verma, 2020](#)).

Although the number of mandis that were operational has increased after the first phase of the lockdown, the resumption of operations has been very slow. An updated analysis of data from mandis showed that, even if one takes the entire period of first two phases of the lockdown, the total arrival of wheat in the mandis was only 30 per cent of the arrivals in the same period last year.

The functioning of mandis has been marred by complicated procedures imposed in the name of enforcing social distances. In most States, no more than 30-50 farmers are being allowed to sell their crops in a day. As a result of restrictions on the number of farmers who were allowed into the mandis on any day, there were often long queues of farmers, with tractor-loads of grain, waiting outside the mandi gates for hours and days. In many States, farmers are required to do an online registration and are given a particular date for taking their produce to the mandis. Clearly, the fact that many farmers do not have access to the internet, and do not know how to use the internet, is not something that concerns our policy makers.

Lack of proper infrastructure and facilities in the mandis has also created the problem that Coronavirus infections have been spreading among traders, workers and retailers who work in the mandis. Several mandis have been identified as superspreaders of

Coronavirus. There are many reports of closing down of mandis because of Coronavirus infections. This has become a major cause of disruptions in sale of produce in the mandis in the recent weeks.

The present crisis has been used by many BJP State governments to do away with the system of regulated mandis (where the produce is sold through mandated procedure including auctions) and allow private traders/corporates to purchase the produce directly from the farmers. It may be noted that the system of regulated mandis has been introduced in most States since the 1960s as a mechanism to prevent traders from using their monopoly control and power within the village to coerce farmers to sell the produce at low prices. Most States have State-level Acts through which these agricultural markets are established and regulated. While the malpractices in the system of auctions and collusion by traders and commission agents are not uncommon even in regulated mandis, the attempts to withdraw regulation of agricultural markets is akin to throwing the baby with the bathwater. Madhya Pradesh has used an ordinance to suspend the regulation of agricultural markets and allowed traders and the corporate buyers to freely negotiate prices with farmers in the villages and buy directly from them. Punjab and Uttar Pradesh have also amended their Acts on agricultural marketing to allow private traders to directly buy produce from farmers outside the mandis. In Uttar Pradesh, Uttarakhand, Telangana and Andhra Pradesh, private cold storages and warehouses have been deemed as Mandis so that traders can freely buy produce from there without any regulation. In Haryana, the government tried to bypass the system of regulated markets by creating a parallel system of payments directly to farmers, without routing it through the institutional structure of the Mandis. In Haryana and Punjab, state governments tried to open many procurement centres in villages, but this only had partial success because of lack of infrastructure or the labour with the required skills in these procurement centres.

Instead of providing relief to farmers and rural workers, the government is using this crisis as an opportunity to further dispossess the working people of their rights and resources. Liberalising land laws to make corporate land grab easier, handing over national assets and resources to big corporations, facilitating predatory capture of markets by big business while small enterprises are struggling in the crisis, and relaxations in laws that protect rights of workers are on top of the agenda of the state. As Amitabh Kant, CEO of Niti Aayog, recently expressed in an article, the government is seeing this as a “now or never” moment to implement “bold” reforms in “key areas” such as agriculture ([Kant,2020](#)).

The Finance Minister also underlined the plan to deregulate the agricultural marketing system through amendments to the APMC Acts and Essential Commodity Acts. She argued that these changes are being made to provide choice to sell the produce to a buyer of his/her choice. This is another lie being parroted. The fact is that, even under the present regulatory framework, the farmer has the freedom to sell the produce to a buyer of his/her choice. The APMC Acts, all the flaws in their implementation notwithstanding, have been designed so that the produce is auctioned and sold to the highest bidder. Although these auctions are not conducted in the most transparent manner and collusion by traders and commission agents is a major problem, bypassing the system of auctions altogether will only strengthen the monopoly power of corporate buyers, traders and commission agents. In fact, the objective of the reforms proposed by the Finance Minister is not to provide choice to farmers but to

provide a choice to these big buyers to buy the produce without having to go through these auctions. This choice is being provided to further the agenda of corporate penetration in agriculture through systems such as contract farming. It is a travesty that these reforms are being presented as changes being introduced in the interest of farmers.

Access to Agricultural Inputs

April and May are a relatively lean season for sales of agricultural inputs like fertilizers and pesticides. However, inputs are needed for summer crops and for fodder crops. In eastern States like West Bengal, Bihar and Assam, an irrigated crop of short-duration boro rice is sown in early March and harvested by end of May/early June. In Uttar Pradesh and Bihar, a short-duration crop of summer pulses is grown in between the Rabi harvest and Kharif sowing. Pesticides are also required to minimise losses of Rabi crops that have been harvested but cannot be sold because of slowing down of operations in mandis.

Disruptions in supply of fertilizers were particularly acute in the initial phase of the lockdown. Village assessment reports prepared during the first phase of the lockdown talked about problems farmers were having in obtaining agricultural inputs. For example, a report by Raya Das on three villages in West Bengal showed that agricultural input shops were closed, and there was no fresh supply due to the non-availability of transport. The lack of access to fertilizer and pesticide had affected mainly small farmers, who did not maintain a large stock of these and often obtain them on credit in exchange for sales agreements of their produce. Due to a shortage of agricultural inputs, farmers were allocating less land to Boro paddy cultivation. However, tenant farmers, working on land that had already been leased on fixed-rent contracts for the season, were most likely to face losses either from a reduction in cultivation of boro rice or low yield, if the supply of fertilizers continues to be disrupted. It was also noted in the study that the price of biochemical inputs on the black market had risen two to three rupees per kg ([Das, 2020](#)).

The demand for fertilizers would increase in June as farmers would need to obtain them for basal manuring in the kharif crop. They will also need plant protection chemicals such as fungicides and pesticides for the kharif crops. The problems in access to inputs will get compounded as the demand for agricultural inputs for the kharif season rises.

It must be mentioned that, thanks to neoliberal reforms over the last three decades, India has lost its self-reliance in production of fertilizers. Currently, about a quarter of urea and about two thirds of DAP are imported. The import dependence has increased significantly under the current government as fertilizer policies have disadvantaged both farmers and domestic production. Even the domestically produced fertilizers use raw material that has to be imported. Disruptions in global supply chains could result in shortages in fertilizer availability during the kharif season.

Public Procurement

The government is claiming that public procurement is happening at a fast pace and has almost been completed. The Minister for Agriculture and Farmers' Welfare made these claims in a press briefing on April 29. In her press briefing on May 15, the

Finance Minister claimed that Rs. 74300 had been spent on purchases of grain by the government at the MSP. These claims, however, are far from true.

The data on procurement released by the Food Corporation of India show that, even until May 15, 2020, procurement was only 83 per cent of the total procurement last year (Table 2). Further, over 96 per cent of the wheat has been procured from just four States (Punjab, Madhya Pradesh, Haryana and Uttar Pradesh). In Haryana, the procurement until May 15 was only 61 per cent of the total quantity procured last year. In Uttar Pradesh, procurement until May 11 was less than one third of the total procurement last year. Also, 91 per cent of procurement has been done by State-level procurement agencies and the Food Corporation of India has procured only 9 per cent of the wheat procured until May 11.

If one takes the claim of the Finance Minister in her Press Briefing on May 15, this amounts to the government having procured 370 lakh tonnes of wheat. As per data that have since become available, government had actually procured only 283.63 lakh tonnes. This implies that the government had spent only Rs. 57674 crores on procurement at MSP until May 15, when the FM claimed that the government had spent Rs. 74300 crores on procurement at MSP.

The situation of procurement in respect of other crops is worse. Mustard seed procurement until May 12 was only about 3.8 lakh tonnes. This was about 35 per cent of procurement last year and less than 5 per cent of total production of mustard seeds. So far, gram procurement has been only about 4 lakh tonnes which is half of the procurement last year and less than 4 per cent of total production.

Table 2. Quantity of procurement of wheat, 2019 and 2020 (lakh metric tonnes)

| State | 2019 | | | 2020 (as on May 15) | | |
|------------|---------------------------|----------------|--------|---------------------------|----------------|--------|
| | Food Corporation of India | State agencies | Total | Food Corporation of India | State agencies | Total |
| Punjab | 15.72 | 113.40 | 129.12 | 13.54 | 107.12 | 120.66 |
| Haryana | 11.33 | 81.87 | 93.20 | 5.57 | 58.33 | 63.90 |
| UP | 1.09 | 35.91 | 37.00 | 0.57 | 13.53 | 14.10 |
| M.P. | 0.00 | 67.25 | 67.25 | 0.00 | 78.49 | 78.49 |
| Bihar | 0.00 | 0.03 | 0.03 | 0.00 | 0.03 | 0.03 |
| Rajasthan | 12.09 | 2.02 | 14.11 | 4.22 | 1.71 | 5.93 |
| Uttrakhand | 0.00 | 0.42 | 0.42 | 0.00 | 0.25 | 0.25 |
| Chandigarh | 0.13 | 0.00 | 0.13 | 0.11 | 0.00 | 0.11 |
| Gujarat | 0.00 | 0.05 | 0.05 | 0.00 | 0.14 | 0.14 |
| H.P. | 0.01 | 0.00 | 0.01 | 0.02 | 0.00 | 0.02 |
| Total | 40.37 | 300.95 | 341.32 | 24.03 | 259.60 | 283.63 |

Source: Food Corporation of India, <http://fci.gov.in/procurements.php?view=87>

Concluding Remarks

The COVID-19 lockdown was implemented without any preparation or planning, and has been implemented in a manner that completely lacks transparency. People are provided no clear perspective of how long is the lockdown going to continue, and what is the government doing to contain COVID-19 infections and alleviate people's suffering, while it extends the lockdown week after week, and month after month.

In the first part of the paper, we have discussed the impact on agriculture. Clearly, the disruptions caused by the lockdown have resulted in considerable additional economic burden on farmers because of higher costs, increased debt burden, inability to sell the produce at reasonable prices and crop losses. A large number of farmers, in particular, producers of pulses, oilseeds, vegetables and fruits, have been forced to sell their produce at low prices to local traders because of disruptions in functioning of the markets.

The government's response to this distress is nothing short of a mockery as it has merely announced payment of the already pending instalment of Rs. 2000 through PM-KISAN. As per the data released by the Finance Minister, even this has amounted to only Rs. 18700 crores. This would imply that only 9.35 crore farmers were provided this instalment rather than the 14 crores that were supposed to be covered in the scheme. As we have shown, the new announcements made by the Finance Minister in her press briefing on May 15 are nothing more than lies and window-dressing. So far, no additional support whatsoever has been provided to farmers by the Government to deal with the crisis in agriculture caused by this sudden lockdown.