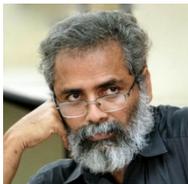


## **COMBATING COVID-19 AND ITS IMPACT ON AGRICULTURE IN KERALA: SIGNIFICANCE OF GOVERNMENT SUPPORT AND COMMUNITY ACTION**



*Kerala's experience with mitigating the impact of COVID-19 reveals the importance of State support, community action, and effective governance focusing on equity. In this blog, Dr Jiju P Alex illustrates the role of the State in addressing the challenges of COVID-19 and discusses the role of Extension and Advisory Services in supporting farmers to tide over this crisis.*

### **CONTEXT**

Many a time, crises open up unforeseen opportunities for evolving and testing alternatives. The Covid-19 pandemic is such a historical event, which is, incidentally, trying the mettle of our systems, organisations and even the collective wisdom of humankind as a whole. The ways by which countries struggle to contain the disease and its impact on its people are going to be test cases of historic importance, that will go on to help us design strategies to establish enduring and resilient communities. Though it is definite that every segment of the economy would be affected, the rural and urban poor and peasants would be affected most severely.

Covid-19 has had tremendous impact on farmers in scheduling harvest, procurement, transportation and marketing, initially. However, conditions were relaxed later to facilitate a hassle-free harvest and transportation. Lack of labourers for these operations has been reported from across India, particularly from places where manual harvesting is predominant. In Kerala State (India), extension support to farmers has been reoriented to deal with the unprecedented



**People waiting to buy vegetables while maintaining social distance at Trivandrum**

situation carefully even as agricultural operations are being undertaken minimally. One pertinent lesson from the experience of Kerala is the need to strengthen public sector institutions with more resources and professional capabilities to serve the people better, and along with that a greater thrust on equity in providing basic services to all citizens.

## COMBATING COVID-19 IN KERALA: PRECAUTIONS AND ACTIONS

### Breaking the chain of infection

Kerala is the first State in India to report the presence of Covid-19 when a few students who returned from Wuhan province in China was diagnosed with the disease. Firmly grounded on the experiences of handling the deadly Nipah virus attack during 2018, the medical contingent of the State could track every one of them, quarantine them well in time, and treat them successfully in a span of two to three weeks. However, the disease which had spread across the world in the mean time again entered the State through non-resident Keralites who had returned from Europe and the Middle East. In spite of the remarkable caution exercised by the State machinery, some of them disobeyed the instructions to remain isolated, and went around and spread the disease in some pockets of Kerala State. This issue was resolved by an innovative method – of publishing the route map of the infected persons in media – so that the general public who might have come into contact with them either directly or indirectly would be alerted and report it to the health centres. The system also meant to track all possible contacts of the infected persons in the course of their travel. There has also been a huge mobilisation of volunteers, neighbourhood groups, and service personnel to help identify suspected cases and keep them in quarantine.

### Mitigating the impact of lockdown

Kerala had declared lockdown from 23<sup>rd</sup> March 2020 with severe restrictions on movement and social gathering of people. With declaration of the lockdown, the State also declared a revival package of INR 20,000 crore to be distributed through various welfare schemes, and initiated a slew of mitigation measures. The package includes INR 500 crore to strengthen the healthcare sector during this crisis, INR 2,000 crore for loans and free rations, INR 2,000 crore for creating jobs in rural areas, INR 1,000



*A community kitchen at Trivandrum*

crore for families with financial difficulties, and INR 1,320 crore for paying two months' pensions in advance. The result of this package began to show up immediately – with free provision of food grains,

pulses and sugar to all households; multiple community kitchens in all the 941 Grama Panchayats of the State to feed the poor and destitute; and creation of an army of temporarily recruited volunteers, namely a Rapid Response Team at the local level to monitor people under quarantine and provide them with essential commodities and medicines at their door steps. Along with this a large network of Asha workers, Anganwadi workers and *Kudumbasree* members were also deployed to facilitate this mission. A big contingent of 626 medical councillors have also been deployed along with 24X7 Disha call centres – a tele counselling service to counsel quarantined families on responsible behaviour and to improve their mental health.

Foreseeing a growing demand for medical supplies at a time of crisis, a team of officials were entrusted to procure the necessary medical supplies, such as masks, sanitizers and personal protection equipment gear. Along with volunteer organizations and companies, even prisoners in certain districts were trained and engaged to produce masks and sanitizers, clearly showing enormous community participation. The Kerala Government also launched a mobile application, called GoK Direct, for users to get information and updates on Covid-19. This initiative from the Kerala Startup Mission and the Information & Public Relations Department has been a huge success in disseminating information and alerts in real time without internet. Earlier, under the 'Break the Chain' campaign, the government had installed water taps along with hand sanitizers at public places prompting people to follow hygienic practices. There is also extensive gathering of information on suspected and quarantined cases on a daily basis to find out whether they are doing well and whether they require any support, counselling, or other material.

People of the State are apprised of the status of Covid infection and the slew of mitigation measures adopted by the State Government every day through detailed press meets by the Chief Minister. This has effectively prevented fake campaigns and irresponsible misinformation. While a task force of doctors, civil servants, technocrats and other experts monitor the containment activities closely, such mechanisms work at the district level as well as at the Gram Panchayat level. [This vigilant monitoring system is centred around the large network of around 6691 health institutions in the public sector](#), which includes 568 well-equipped Primary Health Centres at the village level and around 104 referral hospitals at the block and district levels. Preparations for accommodating suspects under isolation in case of severe community spread has been made by renovating defunct hospitals and identifying vacant hostels and guest houses.

## **EXTENSION SUPPORT TO MITIGATE IMPACT OF COVID-19 LOCKDOWN**

Farmers in the country, including those in Kerala, have suffered considerable distress on account of disruptions in harvest, procurement and marketing caused by the lockdown. However, the decision of the State and Central governments to permit movement of vehicles and harvesters for farm-related operations by observing adequate social distancing measures have eased these concerns to a great extent.

The Department of Agriculture and associated agencies, such as the [Vegetables and Fruit Promotion Council](#) (VFPC) and [Horticorp](#), have made extensive arrangements to procure vegetables and fruits from village level Eco Shops and existing cluster markets. The Department of Agriculture has operationalised 302 markets across the State and VFPC has activated 50 markets.

Later, producers were linked to online home delivery agencies – Bigkart and Swiggy – to distribute fruits and vegetables to customers in cities and suburban centres. One instance shows how market glut of pineapple is being addressed through a slew of innovative measures, such as Pineapple Challenge for urban households, which exhort buying of pineapple to help farmers, for which delivery is arranged by volunteers and agencies.

Early harvest of mangoes by the farmers of the mango growing tract in Palakkad district was facilitated by employing transportation to major outlets. Transportation of fruits to other States which was hindered by a neighbouring State was rechannelled through the RO-RO (Roll on Roll off) facility of the Southern Railways.

Snap melon, a particular melon variety which is mostly consumed as juice in Thrissur district of the State, which could not be sold out by farmers due to the lockdown is being procured and distributed among residential colonies and flats at attractive prices. This is done by engaging the volunteers and marketing personnel of the Department of Agriculture through WhatsApp communication among producers groups and department officials. Daily transactions through this network comes to an average of 2-3 tonnes.

Being a consumer State which depends on other States for about 80 per cent of food grains, 60 per cent of vegetables, and almost the entire amount of pulses required annually, Kerala has been desperately trying to expand its area under agriculture. The State has been emphasising the need to accomplish as much food self-sufficiency as possible by growing vegetables domestically.



*Distribution of vegetable seedlings at Malappuram and Thrissur*

The Covid-19 lockdown has paved the way towards creating awareness on the importance of small-scale farming, urban agriculture and nutri-farming in homesteads among a large population who had not considered these options so far. The Chief Minister's request to devote free time during the lockdown to attempt small scale agriculture in homesteads and available spaces, received substantial response from across the State. Taking advantage of this opportunity, the Department of Agriculture declared its new scheme to distribute 50 lakh vegetable seed packets to households in all the Grama Panchayats across the State through the volunteers of the Rapid Response Team.

Seeds have been procured on a war footing from the farms of the Agriculture Department and other agencies, KVKs, and research centres of the State's Agricultural University. Information support required by the new farming enthusiasts is provided through 60 spot videos that explain the production techniques of major vegetables in the State, which is accessed from the web sites of Kerala Agricultural University ([www.kau.in](http://www.kau.in)), Farm Information Bureau, and the [FB page of the Directorate of Extension](#) of Kerala Agricultural University.

Bolstering these initiatives, a State wide helpline network with 30 helpline numbers has also been made functional to answer queries and provide advisories on cultivation of vegetables, homestead farming, hydroponics, aquaponics, terrace cultivation and vertical farming, during the lockdown period. The helplines manned by the scientists of KVKs and research stations of the agricultural university are able to address around 1500 questions per day on almost everything about small scale agriculture from 7am till 7pm every day. The mobile app on cultivation practices of crops in Kerala is

also extensively used by people. The new lease of interest created among the general public can be sustained even after the lockdown period, if the channels of communication work promptly.

### Emerging Challenges

Though these efforts are laudable, these interventions are not adequate to address the issues that are emerging from every nook and corner of the State. As days go by, serious problems which require massive interventions are reported by farmers. Severe shortage of labourers for harvesting operations in paddy and vegetables, and planting of tubers are widely reported. As transportation of harvesters from neighbouring States has been blocked, harvesting will be delayed inordinately. Lower demand for produce has really hit the sector as the floating population in urban centres have receded and food outlets have been closed down. Price fluctuation is also reported widely. There is a likely surge in market glut for many of the products in the coming week as harvesting of vegetables are delayed as much as possible by farmers.



*Distribution of millets grains to tribal communities in Palakkad*

### CONCLUSIONS

As stated earlier, Covid-19 is an unprecedented phenomenon that has affected all of humanity. However, it has also tested our resilience and the need to look at our systems more critically. In this process, it has also shed light on the inadequacies of our extension delivery systems and how best it could be made responsive to exigent conditions. Covid-19 has advocated the need to invest much more in the social security sector by governments so as to provide the poor and less endowed with necessary health care and livelihood security. The Kerala experience in dealing with the pandemic and the lockdown has also vindicated its decade-old decision to share financial resources equitably by investing more in education, health, social capital mobilisation, democratic decentralisation, etc. In fact, these interventions have started paying off effectively in building awareness, providing basic necessities, and deploying human and financial resources at the grassroots level during such crises.

However, there are no reasons to be complacent about other sectors as they are proving to be more vulnerable to such unforeseen disasters. For instance, the fact of the State's excessive dependence

on migrant labourers will emerge as a serious issue in the post-Covid phase. There will be severe scarcity of human resources to assist agricultural operations, construction, and hospitality sectors. Inadequate agricultural production is going to be another cause of worry as the State has to depend on external sources for most of its food needs. This will force the State to focus on enhancement of domestic production for nutritional security. Intensification of agriculture in homesteads with due focus on poultry and fisheries will be another offshoot of this crisis.

Establishing systems of value chain management to reach out to all categories of people will be another challenge. In this process, new linkages will have to be devised to make the network of cooperatives and private entrepreneurs work in tandem. Resumption of full-fledged farming operations and revival of agri-based enterprises is going to be another immediate priority. If the current measures that have been drawn up in the context of this pandemic are formalised and followed up, a more effective delivery system may evolve.

Extension Advisory Services in the State will have to draw lessons from this disastrous phase and reorient itself to serve a much larger clientele. This will also open up important propositions for extensionists to ponder upon after the pandemic recedes, particularly on the impact of a pandemic-led lockdown on agriculture and how to manage it skilfully. Certainly these experiences are going to change the course of our road map towards building resilient communities.

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