

Imperative for generating enabling environment for promotion

of direct marketing in light of recent farm reform law in Indian Agriculture

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Indian Agricultural Marketing is marred by long inefficient supply chain that increased the price spread between producer and consumer and have serious ramification for income realisation of farmers and affects economic growth also. In this scenario, deregulating the market structure and bringing in more competition will help in optimising the spread between price paid by consumer and received by producer.

Keywords: Agricultural marketing, Consumer, Direct marketing, Primary producers

DIRECT marketing is usually defined as a transaction between producer to the consumer without the involvement of middlemen or traders where farmers/producers get maximum share in consumers rupee paid at the market. However, it is debatable if intermediaries can be completely eliminated from the marketing chain. Intermediaries too play a role in supply chain as they facilitate in expanding the market access for the farmer who own small farms and may not find it feasible to go to a more distant market place to sell its produce. As per a primary data based study conducted in Bihar, Odisha and Punjab, it was found that many small intermediaries buy from farmers in a few villages in close proximity and each of them serves as a small aggregator who then pass it on to larger intermediaries who in turn sell it to processors. Hence, it is necessary to redefine direct marketing as an act of reducing the inefficiencies in marketing chain such that the share of each intermediary is commensurate with the service

rendered by them in creating the market for the underlying product. Direct marketing as a concept is very good but entire marketing work cannot be handled by the primary producers and there is a need for intermediaries to add value at different stages of the supply chain especially when the production and consumption centres are geographically far from each other. In other words, each entity should get their share in proportion to their contribution and the price spread between producer and consumer is optimised. It is the monopoly or oligopoly of a few agencies which lead to supernormal profits to intermediaries and therefore, competition especially involving more institutional players should be encouraged in the marketing space so that the intermediaries earn normal profits.

Existing models for direct marketing

Direct marketing is not a new phenomenon to Indian marketing landscape and there have been many successful interventions in

agricultural marketing. These initiatives range from elimination of intermediaries like Rythu Bazaar, e-Choupal to the initiatives that reduce the number of intermediaries like FPO, e-NAM, etc.

Rythu bazaar: Farmers' market known as Rythu Bazaar (RB) in Telangana and Andhra Pradesh (AP) is a novel and direct marketing model, designed to sell on a daily basis, fresh fruits and vegetables to the urban consumers, exclusively by the small and marginal farmers (SMF) coming from the hinterland villages. Both producers and consumers are benefitted from Rythu bazaars as producer's share in consumer's rupee is more by 15 to 40% as compared to other markets and consumers get fresh vegetables, fruits and food items at 25-30% lesser prices than the prevailing prices in nearby markets. Further, marketing costs are at minimum level as middlemen are completely eliminated from marketing activities in Rythu bazaars.

Similar models also exist in other states like Uzhavar Sandhai in the

state of Tamil Nadu, Apni Mandi in Punjab, Krushak Bazaar in Odisha and Shetkari Markets in Maharashtra.

e-Choupal Initiative: The e-Choupal initiative launched in June 2000 by ITC, is the largest private sector initiative amongst all internet-based interventions in rural India, covering over 40 lakh farmers and a large range of crops spread over 35,000 villages across 10 states. The e-Choupal network has successfully set up integrated rural hubs called Choupal Sagars that serve as procurement centres, warehouses as well as rural retail outlets. Engagement with the rural consumers is facilitated at marketing platforms, called Choupal Haats that have been built along the lines of village fairs. Backed by intensive research and knowledge, this initiative provides agri-extension services which are qualitatively superior and involve pro-active handholding of farmers to ensure productivity gains.

ITC has rolled out e-Choupal 4.0, a new platform that delivers information on crop monitoring, crop advisory and electronic marketing place for farm inputs, helps in remote sensing for addressing crop stress and with the help of start-ups, does rapid quality testing.

Abhinav Farmers' Club: Abhinav Farmers' Club, is a cooperative of about 850 farmers (mostly small and marginal) in Maharashtra. They have adopted frontier technologies and directly connect with markets (especially big retailers, e-retailers, hotels, etc). They produce flowers, Indian and exotic vegetables, fruits, milk, and dairy products. The members of the club do not rely on MSPs and APMC markets. This club has been successful in increasing the bargaining power of farmers and eliminating the intermediaries.

e-NAM: e-National Agriculture Market (NAM) is envisaged as a pan-India electronic trading portal which seeks to network the existing APMC and other market yards to create a unified national market for agricultural commodities. e-NAM has created a national network of

physical mandis which can be accessed online. It seeks to leverage the physical infrastructure of the mandis through an online trading portal, enabling buyers situated even outside the State to participate in trading at the local level. Currently, around 1000 APMC mandis have been integrated to e-NAM portal.

Karnataka had implemented the Uniform Market Portal in 2014, enabling trade across taluka APMC limits without APMC fees. An analysis by researchers at the MIT Sloan School of Management has shown that prices of many agricultural goods increased by 3.5 to 5.1%. Significantly, profit margins of small farmers increased by more than 36%.

Contract farming: Contract farming has been prevalent in various parts of the country for commercial crops like sugarcane, cotton, tea and coffee, etc. There is also a need to promote contract farming in high value crops with single registration at State level. Nestle, has been enjoying a very successful partnership with farmers in the Moga district of Punjab in the dairy (milk) sector since 1961. More than one hundred thousand farmers supply milk to Nestle in Moga in the partnership mode. This model has been implemented in different parts of the country for different commodities, for example, by Pepsico for potato in Punjab.

Organised retail: Organised retail chains serve as an effective channel to link farmers with markets, thereby reducing the number of intermediaries in the supply chain. These retail chain may also source the output from many small aggregators or traders with a similar impact of reducing the number of intermediaries' levels in the supply chain. In Haryana, fruits and vegetables are procured through farmers' marketing associations (FMA) at the upstream level of the chain, which are sold through Safal outlets spread across National Capital Region (NCR) at downstream. An analysis showcased that for every additional 1 acre, the income increases by 3-4% for FMA farmers compared to non-FMA farmers.

Aggregation model: Farmer Producers' Organizations (FPOs) have emerged as an effective mechanism to transform small holding-based agriculture into a viable agri-business enterprise and to increase the net income of farmers, particularly the small and marginal ones. NABARD has been promoting and handholding FPOs under two funds namely, Producers' Organization Development and Upliftment Corpus (PRODUCE) Fund and Producer Organisation Development Fund (PODF) and have sanctioned around 5000 FPO (as on 31st March 2021). Small and marginal farmers comprise around 83% of the total membership of these FPOs while 46% members are women.

In a multi-state study on Farmer Producer Organisations (FPOs) conducted by NABARD in four states of Kerala, Madhya Pradesh (MP), Odisha and Rajasthan, farmers reported receiving a higher average price for their produce after obtaining membership to FPOs. For instance, farmers in Madhya Pradesh reported an increase in average (per quintal) price by nearly 7.5% in the *kharif* (2019) season and 12.5% in the *rabi* (2018) season, while in Kerala, average price was reported to have increased by nearly 45%. This model has provided the small farmer with much needed bargaining power and linkage to the wholesale market, thereby reducing the number of intermediaries.

Developing PACS as Multi-Service Centres: The concept of PACS as Multi-Service Centres for their members was envisioned by NABARD in 2011-12. PACS were conceived to play an important role in providing all the facilities required by the farmers including direct purchase of agricultural produce. NABARD is aiming to transform 35,000 PACs into Multi Service Centers (MSC) in a phased manner spanning over 3 years starting from 2020-21 in order to develop PACs as 'One Stop Shop' to support farmers on post-harvest and marketing activities. The idea is not only to make PACS more sustainable but also make it more sensitive to the needs of

farmers in terms of purchase of their output and supply of inputs at reasonable prices. Towards this end, it was considered essential that the PACS should purchase agricultural produce and provide additional services like offering agriculture implements on hiring basis, enable collective purchase of inputs and maintain good quality storage facilities as per Warehousing Development and Regulatory Authority (WDRA) norms, etc.

Why Marketing Reforms in Agriculture?

In its journey of 75 years, India has become self-reliant in food production and has also become a top producer of cereals (wheat and rice), pulses, fruits, vegetables, milk, meat and marine fish. The pandemic, COVID-19 in the year 2020-21, has made economy to shrink by 7.3%. During such times, agriculture has emerged as the silver lining with agri-GDP growing by 3.63% providing the cushion to the economic shock induced by COVID. However, Indian farmers are still caught in the cortex of low and fluctuating returns. Gap between farmers' income and a non-agricultural workers' income increased from ₹ 8,500 in 1983-84 to ₹ 1.68 lakh in 2011-12 (Table 1).

The paradigm shift from production to the welfare of farmer requires special emphasis on post production marketing linkages. Agriculture sector needs streamlined supply chain in the form of well-functioning marketing infrastructure

Table 1. Disparity in agriculture and non-agriculture income

Year	Farm income per cultivator (₹)	Income per non-agriculture worker (₹)	Gap between Farm income and non-agriculture worker income (₹)
1983-84	4,286	12,786	8,500
1987-88	5,653	18,036	12,383
1993-94	12,365	37,763	25,398
1999-00	24,188	78,565	54,377
2004-05	26,146	1,06,688	80,542
2011-12	78,264	2,46,514	1,68,250

Source: Report of the Dalwai Committee on Doubling Farmers' Income, 2017.

to make "Farm to Fork" model a reality.

Agricultural marketing in India has been facilitated through a network of regulated markets established under the APMC Act. The objective of such a network was to ensure regulation of marketing practices and protect the farmers from the exploitation of intermediaries. However, over a period, market regulation has taken the form of restrictive and monopolistic trade and the balance of power in transactions has moved in favour of middle men and traders. As a result, the prices realized by the farmers still remain low (Fig. 1). In fact, failure of agricultural marketing system in India is mainly attributed to excessive state intervention. As per the Shankerlal Guru Committee, 2001, the regulated agricultural market has restricted marketing in India.

The National Commission on Farmers had suggested that the density of APMCs in the country is poor and an agricultural market

should be located within radius of 5 km from the farmer's residence i.e. one market for 78 sq.km. However, no state came close to this benchmark density. Punjab has the best density with one market for every 119 sq.km (Fig. 2).

Farmers base their sowing decisions on prices witnessed in the previous marketing period.

So, if the farmer observes a higher price for a specific crop in period 't-1', then there will be higher sowing of it in period 't'. However, if the production of the crop exceeds market demand, prices fall in period 't', signalling farmers to produce (sow) less of the commodity in period 't+1'. This pattern is termed as a cobweb phenomenon which occurs in markets where there is a time-lag between demand and supply decisions. The same was observed in case of pulses, which demonstrated that the price cycles have been generally triggered by positive (excess production) and negative (under production) supply shocks.

India has a stockpile for large

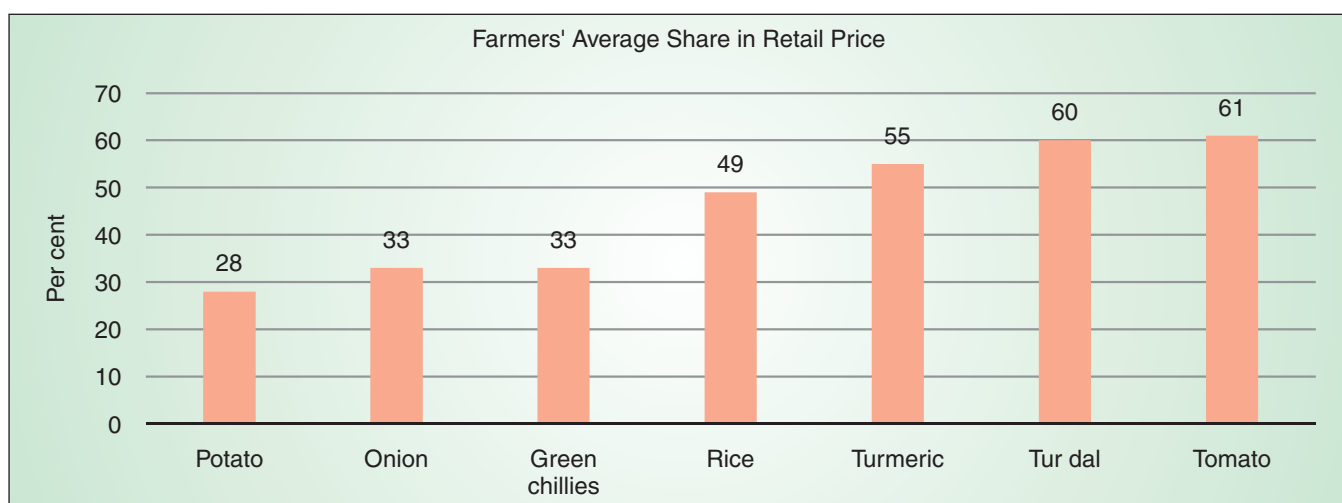


Fig. 1. Farmers' average share (%) in retail price.

Source: Supply Chain Dynamics and Food Inflation in India, RBI monthly bulletin, October 2019

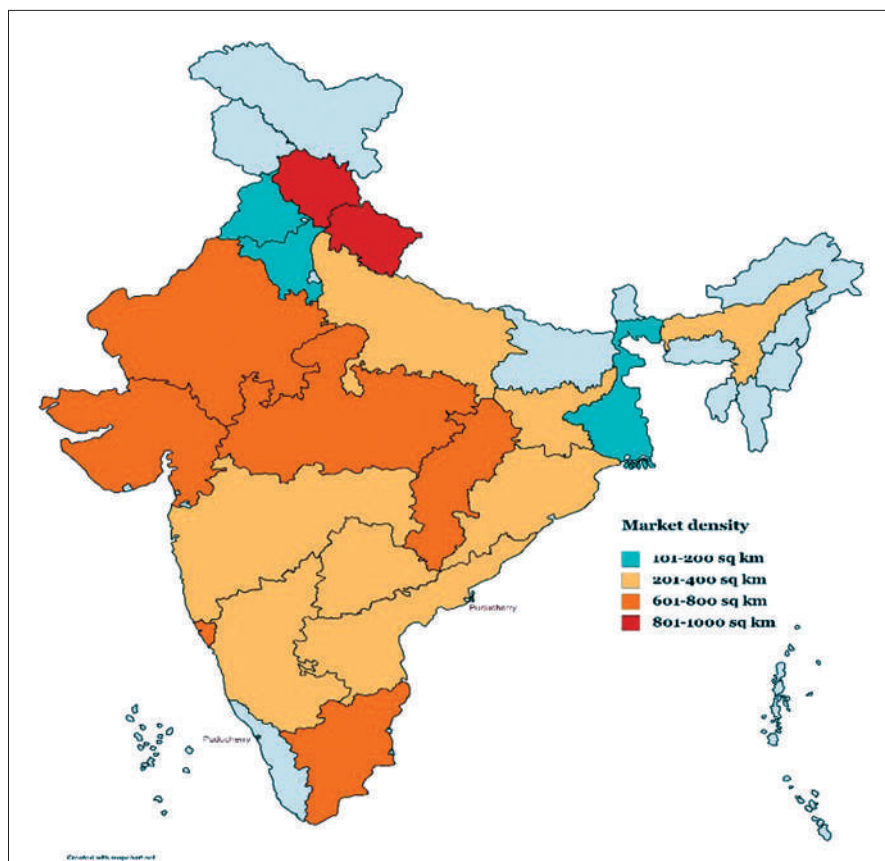


Fig. 2. State-wise market density (sq. km).

surplus of some commodities and at the same time importing huge quantities of edible oil and pulses. The mismatch in supply and demand of agricultural commodities is attributed not only to agro-climatic zones of the country but also to the distorting marketing options available to each crop. The reasons are the poor state of market facility, post-harvest infrastructure, logistics and high risks in returns from oilseeds and pulses (Working Paper 1/2020, Ramesh Chand, NITI Aayog). Agricultural segments like dairy, where there is direct selling between producer and consumer, has showcased remarkable growth in production over past 5 years (from 146.3 million tonnes in 2014-15 to 198.4 million tonnes in 2019-20) (Economic Survey 2020-21).

Food processing holds the key in increasing the income of farmers. Diversification to non-food grain crop has long been held as means to realise a higher value for their produce. Farmers can find buyers (enterprises/cooperatives/ FPOs) who can process their produce and market it to the population at large in

a form that can be stored longer while retaining its nutritional value.

Investment and capital formation in agriculture holds the key for its progress, however, its growth rate has fallen from 10% per year during 2002-03 to 2011-12 to 2% in the following decade. The private corporate sector has been avoiding the sector and constitutes less than 2% of the total investments in agriculture and less than 0.5% of the total annual investments of the corporate sector in the Indian economy (Working Paper 1/2020, Ramesh Chand, NITI Aayog). This cries for measures to create enabling environment for reviving private investments to modernise the sector.

Recent farm reforms

Against the points presented in earlier section, GoI introduced three path breaking reform acts, namely:

- i. Farmers' Produce Trade and Commerce (Promotion and Facilitation) Act 2020.
- ii. Farmers' Empowerment and Protection Agreement on Price Assurance and Farm Services Act 2020.

iii. Essential Commodities (Amendment) Act, 2020.

The first law, which amends APMC regulation, removes the most important impediment in smooth marketing: Only traders registered in APMCs can buy farmers' produce. This leads to rent seeking on the part of buyers who extract a greater share of value as they are price makers while farmers are price takers. This situation is further aggravated as farmers are restricted to selling within the taluka boundaries or limits of the APMC, and if they have to sell in other APMC, they have to pay the APMC tax.

The Farmers' Produce Trade and Commerce (Promotion and Facilitation) Bill 2020 confines the authority of the APMC to levy fees and give trader licences within the boundary of the market yard. Farmers will continue to have the option to sell in APMCs but any private market/non-APMCs registered trader can also set up an agricultural market and compete with APMCs to buy the same produce.

The second act is intended to ensure that there is an assured price to be paid to farmers as agreed between them and the sponsor, prior to production on mutually agreed terms and conditions. As per the Act, production of desired quality produce will be undertaken by farmers and not by the sponsor. This will help in reducing the volatility in price realisation by farmer.

The stock limits prescribed under the Essential Commodities Act, 1955 do not enable the processors to procure in bulk for their complete processing requirements. This restricts large-scale processing units which can run throughout the non-harvest season. The Essential Commodities (Amendment) Act, 2020 will enable the expansion of agro-processing and supply chains.

Enabling environment for direct marketing

The present direct marketing models have proved to be beneficial to the farmers and increased their share in a rupee spent by a consumer, however, they need to be implemented on a scale to prove

beneficial to a larger number of farmers. It is imperative to give much needed policy direction to these models for their success at All India level. Some of the measures/initiatives towards this end are given here.

New Institutional innovations:

There is a need to promote innovative arrangements of private enterprises teaming-up in the supply chain with producer collectives (formal or otherwise) and develop sustainable business models as business partners. One such model is lead farmer model based on master weaver concept in handloom industry. This model was also proposed by Report of the Working Group on 'Agricultural Marketing Infrastructure, Secondary Agriculture and Policy Required for Internal and External Trade'. Typically, private enterprise develops and promotes a 'lead farmer' model of organization, through which they identify and build the capacity of farmers who can meet their quality and volume needs in a consistent fashion.

Cooperative farming: This is a kind of pooling, member producers of any cooperative society voluntarily do to market farm produce collectively. Small and marginal farmers, who do not have resources to directly market their produce, get benefit being owner, operator, and sharer of the profit by enjoying economies of scale and bargaining power. Sugarcane Cooperative Marketing, MAHAGRAPES, AMUL, SUDHA, etc. are some bright examples of successful cooperative societies. There is a need to promote similar models for other agricultural commodities assuring guaranteed prices for farmers and quality products to consumer.

Leveraging technology: Indian agricultural supply chain seems to be caught in this time warp where there is lack of modern channel of price dissemination with the farmers. In this context, it is important to leverage technologies like Agristack (a collection of technology-based interventions in agriculture). This promises to play an important role in providing real time information to farmers regarding price prevalent in nearby markets and reliable

forecasting models based on market arrival to forecast future prices. It is of utmost importance to develop market intelligence system and tools that cater to the needs of resource-poor farmers and have the potential to address issues of information asymmetry.

Commodity exchange for market integration: Unlike in an APMC market, the farmer sets the price on the spot exchange and is not a price taker. Most importantly, it brings more competition to the otherwise restricted agri-marketing space. Future market allows the farmer and other participant to hedge the risk by taking an offsetting position on futures exchanges. It is important to integrate small farmers into the world of commodity exchange. This can be achieved by facilitating the integration of FPOs/ FPCs with these exchanges. Handholding of the FPOs will enable to take benefit of these commodity exchanges and provide much needed hedging of their price risk.

Enabling aggregation: The median paid-up capital (equity contribution by farmer shareholders) of 6,926 'active' FPOs was just ₹ 1.1 lakh. This limits the ability of FPOs to raise term loans and arrange working capital for business. In this context, the guidelines of the new central scheme to promote 10,000 FPOs (between 2019-20 and 2023-24) has sought to address these hurdles. The government will bear the management costs of running an FPO (for the first five years), including the cost of registration, plus a matching equity grant of ₹ 2000 per member (with a limit of ₹ 15 lakh per FPO) and an increased credit guarantee facility for loans up to ₹ 2 crore.

Rural haats/marts: Rural haat and rural marts play a very important role in direct marketing of products of farmers, artisan, craftsmen, SHG members, etc. That's the reason NABARD has been providing grant assistance for upgradation of infrastructure like raised platforms, pathways, over-head sheds, facilities for drinking water, sanitation and toilets in existing Rural haats. A study conducted recently to assess the

socio-economic impact of infrastructure created under NABARD supported Rural haats and marts in Jharkhand revealed an increase in the number of sellers from the nearby villages, increase in market space, product heterogeneity, and increased availability of various agricultural and non-agricultural products. The study also highlighted that there was a positive change in the income level of the sample buyers and sellers. Therefore, there is a need to provide continued support to these rural haats to build up the much needed infrastructure to help primary producers and other beneficiaries realise higher value for their produce.

Role of Agri start-ups

Today, there is an urgent need to bolster agricultural extension and accelerate the technological transmission from lab to land. It is here, that agri-startups are bound to play a crucial role in the future. Agritech Startups are providing relevant and innovative solutions to a number of challenges being faced across the agricultural value chain. These start-ups have become the link between the farmers, input dealers, wholesalers, retailers and consumers connecting each of them to each other and providing strong marketing linkages and quality produce on time. The start-up ecosystem has been bringing to the ready access of farming community, several innovative products including online marketing of farmers produce, precision agriculture solutions for crop and animal husbandry, traceability solutions, storage solutions, online financing, innovative field level cold storages, irrigation control, customised mechanisation solutions on rent, rapid quality assessment and grading, third party logistic solutions, etc. Therefore, there is a need to nurture and promote a greater number of technologies based agri-startups in future.

Agriculture in India still provides livelihood directly or indirectly to almost half of population. Indian agriculture has come a long way from being dependent on food grain imports to being a net exporter of a

good number of agri-commodities. However, Indian farmers continue to remain in the vicious cycle of indebtedness and debt trap. Focus has already shifted to farmer-oriented policies from production-oriented outlook as evidenced in GoP's resolve to double the farmers' income. This requires special attention to the marketing system in the country to make farming more remunerative for farmers.

In India, the mandi system remains central to agricultural marketing system for several crops, however, there is emergence of different models of direct marketing with strong ties to processing industries in different parts of the country. Though these models still cover only niche space in agricultural marketing, they have been changing the landscape of agri-marketing in India and carries potential to be

scaled up for benefit of a greater number of farmers. It is important to note that for the commodities traded in mandis, a significant proportion of transactions now seem to take place outside, reportedly between 50% and 75% for turmeric and copra. In this scenario, it would be important for the state to facilitate trade beyond mandis also which is precisely the motive of recent farm reforms.

It is important to understand that the aim is not to eliminate the intermediaries from supply chain but to deregulate and regulate the market in a way that optimises the price spread in the supply chain. The basic tenet underlying each of the farm laws is the attempt to introduce more competition to the marketing landscape of agriculture. It is important to note that there is no one size fit all, many different models for marketing must co-exist. It is

essential for creating market for different crops with different requirements like paddy, tur daal (direct market not viable) which necessarily requires primary processing while wheat and moong daal do not require the same.

Measures such as promoting aggregate models, credit facilitation for FPOs, market information system, institutional innovations hold the key to promote direct marketing. If an overhaul in agricultural marketing is the goal, the efforts also require coordinated effort by all the stakeholders and embrace the new technology.

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Structural transformation, regional disparity and institutional reforms in agriculture

Promoting agricultural exports could help to increase farmers' income. Using Social Accounting Matrix (SAM) framework, impact of export promotion policies on national output and employment were estimated. Three different scenarios were developed. The first scenario considered the case of increasing export of processed foods by 10%, the second considered the same extent of rise in food grains and oilseeds, and the third considered the case of fruits and vegetables. Two different SAM matrices corresponding to the years 2007–08 and 2012–13 were considered for simulation. Results indicated export promotion in processed foods will contribute higher to the GDP than other food groups in the contemporary economy. While it was estimated to contribute 0.04% additional GDP with 2007–08 base, contribution tripled in 2012–13 base to 0.11%. Export promotion of food grains and oilseeds was estimated to contribute half of the contribution of processed foods, while fruits and vegetables had the least impact. Similar was the impact on employment generation. While processed foods created an additional employment by 0.07%, contribution from food grains was 0.03%, and from fruits and vegetables it was just 0.01%. Promoting the export of processed foods rather than unprocessed foods would contribute more to economic growth. From consumption perspective, it was also found that share of the farm sector in total demand has declined from 12% in 2007–08 to 9.5% in 2012–13, and share of capital with respect to labor has increased from 50-66%. Demand for rural labor as well had declined from 58-53% during the study period.

Improving irrigation is an effective way of rising productivity. At this front, the impact of governance in irrigation sector on agricultural productivity was analysed. The Irrigation Governance Index (IGI) was constructed using 14 indicators, ranging from receipts from public irrigation, electricity charges in agriculture, revenue and capital expenditure on public irrigation, irrigation potential created under the Accelerated Irrigation Benefit Programme (AIBP), net area irrigated by public canals and tanks, stages of groundwater development as per the usage/extraction of water etc. The performance in public irrigation system was captured through the gap between irrigation potential created and potential utilized, and the role of irrigation governance (IGI), rainfall and proportion of area under non-food crops were studied using panel regression. The results revealed that an improvement in irrigation governance leads to a reduction in the gap between the irrigation potential created and utilized. On farmers' perception on risk-taking, insurance uptake and governing factors, field survey was conducted in different districts of Uttar Pradesh. About 400 farmers were surveyed for this purpose. Risk preference attitude was perceived to be influenced by raising more income and profits. Around 40% of farmers reported profit-making as the key driver of risk taking. Equally, the other 40% farmers reported risk-taking as a way of experimenting with new methods. On existing insurance schemes, they opined that premium rates are relatively higher, and delay in compensation payments are much frequent. Both these factors contributed 54% of farmers' response as major dissatisfaction factors.

(Source: ICAR Annual Report, 2020)