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Agricultural Sector Reforms: Realities and Confusions

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ABSTRACT
Indian agriculture is the country's lifeblood and plays a critical part in the country's overall economic and social progress. Indian agriculture is a diverse and expansive industry with many different players. India's agricultural research system is among the world's largest and most intricate. About 27,500 scientists and more than a lakh support people are actively engaged in agricultural research in India, making it the largest research system in the world. The Imperial (now Indian) Council of Agricultural Research (ICAR) was established in 1929 at the recommendation of a Royal Commission on Agriculture, which itself was the culmination of a process that began in the 19th century. The Indian Council of Agricultural Research (ICAR) is the primary national organisation responsible for supporting, promoting, and coordinating India's agricultural research and education efforts within the current research system. This report attempts to track the evolution of India's agricultural research system from the colonial era to the present day.
KEYWORDS*: ICAR, Indian Agriculture, Colonial, Post colonial*

I. INTRODUCTION

The farming methods of yesteryear were friendlier to the environment, but they weren't nearly as productive as modern methods. Well, there wasn't as many of them, so that should be sufficient. That group of farmers was formerly worshipped as if they were divine. Only governments show any regard for farmers, and even then, only the farmers who live within their borders. If a farmer's family is struggling financially or if their crop failed, they are often treated with contempt. Parents who look down on farmers may discourage their children from pursuing agriculture as a profession, yet these individuals fail to see that human civilization would collapse without farmers. It's terrible that the pressures of modern society mean even farmers don't want their sons to follow in their footsteps. A large percentage of farmers these days no longer work on their farms but instead find employment in local manufacturing or service establishments. Some people have taken their own lives because they've seen their crops fail because of a lack of water. Some farmers with limited land conduct their own experiments and test out novel methods to maximize their crop yields. These farmers set up alternative water supplies and boost their income. These farmers are unselfish because they share information about their endeavors' in the public domain. The point is that not all of them are safe for the environment. If we dig further, we'll see that this helpless society is steadily discouraging farmers, and that farmers' circumstances are founded on experience and grit. It's unfortunate, too, that some American states behave like envious countries by sharing their water supplies for agricultural purposes. There are various cutting-edge methods that we use to improve crop yields in India. Either way, we must increase food yields to feed a rapidly expanding human population, thus efforts to do so are prioritized, regardless of their environmental impact. Because of the weaker crops and less fertile land produced by current farming methods, we've lost the character of bygone agricultural practices. Still, these methods of farming are essential because of the rapid urbanization that is transforming farmland into houses and factories. For a growing population, more farmland is needed, but instead we're shrinking it, and that's leading to the use of cutting-edge methods that aren't always thought through in terms of their impact on the environment. Also, if we put in more money, these farming methods will pay off much more. Even though some farmers' successful agricultural methods have been shared in newspapers and online to inspire other farmers to adopt them and boost their incomes, many rural areas still lack access to the internet, and many farmers still can't read. Therefore, there is a lack of consciousness. Our government needs to hire someone to teach inexperienced farmers on these rewarding methods. Even though some of our practices aren't quite eco-friendly, we keep on with them anyhow. Anything that is harmful to the environment may be advantageous in the short term, but in the long run it will only cause problems. Potential future harm may arise from this. Therefore, sustainable farming practices are the best option for the long run.

IMPORTANCE OF AGRICULTURE IN INDIAN ECONOMY

The agricultural industry in India is significant. Most Indian households rely heavily on income from farming. About sixteen percent (16%) of India's gross domestic product and ten percent (10%) of its exports come from the agricultural sector. India is the second largest country in terms of total arable land, with more than 60% of its land area being suitable for farming. Rice, wheat, potato, tomato, onion, mangoes, sugar cane, beans, cotton, etc. are all examples of economically valuable agricultural goods. Indian industry relies heavily on agriculture. However, as other industries have expanded, agriculture's once-dominant position in the country's economy has eroded. Despite this, agriculture is still crucial to India's economy as a whole. We can't survive without food. Our daily nutritional needs are met by agricultural products. Millets, cereals, pulses, etc. are only few of the food grains that are produced in significant quantities in India. The vast majority of the food stuffs manufactured are used for domestic use. Our farmers put in long hours so that over 1.21 billion people can eat. Commercial agriculture is not the only type of farming practiced; subsistence farming, which focuses on providing for the farmer's immediate family, is also common. Agriculture has always been seen as the most direct route to providing for one's family's nutritional needs. In India, farming is more of a way of life than an industry. There is an overabundance of food and agricultural products in India, thus they export them. Agricultural products like jute, tea, tobacco, coffee, spices, and sugar account for a significant component of India's export commerce. The result is a boost to the country's foreign currency reserves. When it comes to the export of agricultural products, India is placed #7. Nearly $39 billion was earned from India's agricultural exports in 2013. The vast majority of India's primary labourers are engaged in agriculture. In addition to men, many women in rural areas work in the agricultural sector. Over 56.6% of India's primary employees are involved in agriculture and related industries, per the 2001 census. An array of businesses relies on agricultural products including jute, cotton, sugar, tobacco, etc. Agricultural products are a major source of raw materials for these types of companies. The original intention behind India's "green revolution" was to place more value on agriculture. A massive boost in crop output occurred during the Green revolution era in the 1960s. Agricultural outputs have increased dramatically since HYV seeds and techniques were first introduced, especially for wheat. There was a big boost to the country's economy due to the land's enhanced productivity.
Agriculture in India, and its many problems:

India's economy, as was noted at the outset, is highly dependent on the agricultural sector. Agriculture has a direct impact on the national economy, the political structure of the country, and people's quality of life in all aspects. In any case, Indian farming is its own unique beast.

Subsistent in Character:
Despite eleven five-year plans, much of India's agriculture remains largely subsistence-level. Plants are grown primarily for personal use by the farmers and gardeners. Agriculture has become an agri-business or is market oriented only in the controlled irrigated regions, such as Punjab, Haryana, western Uttar Pradesh, and the Kaveri delta.

Mixed Cropping:

Mixed farming is typical in the country's rain-fed regions. In the kharif season, farmers combine millets, maize, and pulses, and in the rabi season, they do the same with wheat, gramme, and barley. Ten to sixteen different crops are seeded together in one field in the Jhuming (moving cultivation) regions. The goal of crop rotation is to maximize profit in agriculture. If the monsoon is successful, rice output will increase, but if it fails, less water-intensive crops like maize, millets, bajra, and pulses will still yield a plentiful crop. Subsistent farming practices, such as mixed cropping, are indicative of this.

High Percentage of the Reporting Area under Cultivation:
In India, about 55 per cent of the total reporting area is under cultivation of crops and pastures. This is much higher when compared with about 4 per cent in Canada, 12 per cent in China, 15 per cent in Japan, and 16 per cent in USA.

Primitive Technology:

Bullocks, male buffaloes, and camels are the most common draught animals used by farmers around the country, especially in the rain fed areas. Low draught animal health and productivity can significantly delay crucial agricultural tasks like planting, weeding, and harvesting. There is a lot of emphasis on laboratory work in Indian agriculture. Ploughing, levelling, seeding, weeding, spraying, sprinkling, harvesting, and threshing are all examples of agricultural tasks that are primarily performed by hand in India. Machines are still mostly used by the wealthy elite in the cities of Punjab and Haryana as well as the western part of Uttar Pradesh and the plains of Uttarakhand, Bihar, Madhya Pradesh, Gujarat, and Maharashtra.

Government Policy:

The agricultural sector in India was treated like a child after the First Five Year Plan. More attention has been paid to industrialization and urbanisation than to the agrarian community. While the country's total growth rate is over 9%, agriculture's growth rate is only 2.5%. (2010). Farmers aren't making a profit, so many of them are drowning in debt and, in certain regions, taking their own lives. This bleak scenario is due to decades of negligent land allocation decisions in the agricultural sector. However, the Eleventh Five-Year Plan places a heavy emphasis on rural and agricultural development with the goal of ending rural-urban disparity. Among the many proposed solutions to the unemployment crisis and the rural-urban migration problem is the creation of 580 lakh jobs. The government faces a formidable challenge in its efforts to enhance food production at home and investment in rural and agricultural infrastructure for the same without compromising its commitment to budgetary restraint or the management of inflation. Farmers' suffering was exacerbated by the widespread drought that hit India in 2009. This was a setback for the country's efforts to revive its economy.

Lack of Definite Agricultural Land Use Policy:

In the absence of a definite land use policy, the farmers grow crops according to their convenience. This sometimes leads to excess of production and sometimes scarcity. Many a times the farmers have to burn their sugarcane crop and often get less remunerative price of vegetables (onion, and other vegetables).

Land Tenancy:

Absentee landlords are a problem in many parts of the country, and farmers often lack legal protections for their work. Big farm house landlords are typically well-off city dwellers. The actual farmers (tillers and share croppers) who work the land owned by absentee landlords are not very invested in its improvement, management, or use, nor are they particularly enthusiastic about the prospect of agricultural modernization. Due to the tiller's lack of motivation under this arrangement, most crops have low yields per acre.

REALITIES

State intervention and support in agriculture is inevitable; the farmer is always right; agricultural GDP is roughly one-fourth its impact on politics; farming is a low-yield business (about 60% of Indian families depend on farming, about 45% of labour depends on it, but the sector only contributes 15% of the GDP); the food and nutrition debate in India is out of date;

In our country, the government strictly regulates how land can be used. In most of their country, farmers are prohibited from selling or developing their land for residential, commercial, or institutional uses. To change into any of those, "they have to go through the government, urban planning authority, etc.," Gupta added.

If 60% of Indians or Indian families rely on agriculture for their livelihood, then that sector may account for 15% of India's GDP. Nonetheless, every member of that household can cast a ballot. Sixty percent of India's electorate is so reliant on a meager 15 percent of the country's GDP. In other words, if agriculture contributes 1x to national GDP, it contributes 4x to political GDP.

II. CONFUSION

Since almost all arable land is already farmed, increasing agricultural productivity per unit of land must serve as the primary driver of agricultural growth. Irrigation water demands are rising at the same time that the availability of water for other uses, such as industry and cities, is decreasing. Increasing yields, diversifying to higher-value crops, and building value chains to cut marketing costs are only some of the techniques that will need to be exploited to enhance production.

Developing a plan to alleviate poverty in rural areas that takes into account a wide range of sectors beyond farming The poor, the landless, the women, the scheduled castes, and the tribes must all gain from rural development. And there are significant regional differences; most of India's impoverished live in rain-fed areas in the Eastern Indo-Gangetic plains. It has proven difficult to communicate with such communities. There has been improvement; the percentage of the rural population that falls into the poverty category decreased from almost 40% in the early 1990s to below 30% by the middle of the 2000s (about a 1% annual decrease). However, this decline needs to be accelerated. As a result, the Government and the World Bank have made poverty reduction a priority in their rural development initiatives.

Achieving food self-sufficiency and avoiding starvation were made possible by India's Green Revolution in the 1970s, which saw a dramatic increase in food-grain output. As a result of agricultural intensification in the 1970s and 1980s, there was a rise in the demand for rural labour, which led to higher rural salaries and, together with falling food prices, a decrease in rural poverty. However, agricultural growth slowed to an average of approximately 3.5% per year in the 1990s and 2000s, and cereal yields have increased by only 1.4% per year in the 2000s. Concerns about the deceleration of agricultural growth have grown significantly.

India's rice output is roughly half of that of Vietnam and Indonesia and a third of that of China. The same holds true for the vast majority of other farm products.

To move the sector away from the current policy and institutional regime that appears to be no longer viable and to lay the groundwork for a much more productive, internationally competitive, and diversified agricultural sector, policymakers will need to initiate and/or conclude policy actions and public programmes.

III. CONCLUSION

Deficits in both knowledge and infrastructure, especially in rural regions, are major factors contributing to the current difficulties in Indian agriculture. There is a substantial increase in the price of farming due to issues with irrigation systems, market systems, and transportation networks. Additionally, there is an absence of distribution systems. The agricultural sector is the target of a number of improvement plans. Unfortunately, we lack the necessary delivery methods to effectively facilitate local improvements in productivity, cost, and price realisation. Poor government assistance also contributes to this problem. Therefore, corporate farming may be the answer to India's agricultural industry, but it would require careful consideration and the development of new policies to ensure that neither corporations nor farmers suffer financial losses. As a combined topic, the relationship between the federal and state levels of government also needs to be clarified. Governments should take preventative measures after eminent specialists have completed their studies in this area. The Indian agricultural sector is in dire need of fresh approaches to revitalize it. Farming is arduous and exhausting job without the use of machinery. Most farm kids have given up the agricultural life and opted for other careers as a result. When farmers sell their land to developers, they often receive a higher price. This has increased the pressure on farmland, necessitating the development of technology to boost productivity so that India's future population of a billion plus can be fed on ever-decreasing farmland. Despite being a major exporter of food, India's farms are among the least productive in the world, producing on average just 33% as much as the greatest farms in the world. It's important to boost this so that farmers may earn more money from their property with less effort.

REFERENCES

[1]. Deepak Kumar (2000). Science and the Raj. Oxford University Press.
[2]. Roy Macload and Deepak Kumar (1995). Technology and the Raj. Sage Publication India Pvt Ltd.
[3]. Singh, B.D. (2001). Organisation for Crop Improvement in India. In: Plant Breeding: Principles and Methods. Kalyani Publishers, Ludhiana. Pp 801-830.
[4]. http://www.icar.org.in/
[5]. http://planningcommission.nic.in/plans/planrel/fiveyr/welcome.html