Abstract

Contract Farming can be understood as a firm lending “inputs” — such as seed, fertilizer, credit or extension — to a farmer in exchange for exclusive purchasing rights over the specified crop. It is a form of vertical integration within agricultural commodity chains so that the firm has greater control over the production process and final product. It is a system of production and supply of agricultural/horticultural produce under forward contracts between producers/suppliers and buyers. The essence of such an arrangement is the commitment of the producer to provide an agricultural commodity of a certain type, at a time and a price, and in a quantity required by a known and committed buyer. After the opening up of the Indian economy and entry of many domestic and multinational players into agribusiness sector, contract farming has now become a dominant and growing mode of raw material production and procurement through a co-ordination between the processors, marketers and the exporters. The Agricultural Produce Marketing (Regulation) [APMC] Act as circulated by the Central Government to the States in 2003 has a positive impact on development of Contract Farming agriculture model in this region. The socioeconomic consequences of Contract Farming are attracting considerable attention in public policy debates today. This paper is an empirical study on the progress, problems and prospects of Contract Farming in India.

1. Prelude

The commercialization and globalization of agriculture has brought about opportunities for better incomes for rural households in developing countries through new possibilities to supply higher-value products such as meat and milk products in markets of the growing urban centres in the developing countries themselves. Accompanying this phenomenon is the increasing demand for particular product characteristics, such as quality, food safety, as well as concern over production
processes, for which product and process standards and certification mechanisms are increasingly coming into play. To gain access to these high(er)-end markets, rural smallholder livestock keepers need to gain the capacity to produce at such standards, as well as the necessary market institutions to guarantee the acceptability of their products. The inability to do so due to market failures or/and failures in the provision of public goods, ‘mis’- configuration of supply chains and the accompanying developments in product and process standards, impose barriers on rural smallholders, and constrain their access to the very markets in which the demand for meat and milk products are rapidly expanding. Within this context, contract farming has, in recent years, been presented as a potentially effective market-oriented institution to bridge the gap between the rural smallholder producer’s resources, assets, and capacities on the one hand, and the increasingly strict demands of the consumers on the other.

2. Objectives and methodology of the Study
The present study has been taken with an overall objective of highlighting the progress of Contract farming in the context of globalisation and liberalisation in Indian agriculture sector. To be specific, the main objectives of the study are:

- To explain the conceptual aspect of Contract Farming with its various types.
- To analyse the difference between various types of farming.
- To describe progress of Contract Farming in India.
- To highlight the advantages and problems of Contract Farming to the farmers as well as to the sponsors.
- To examine the prospect of Contract Farming in India.

Accordingly, the reminder of the paper is organised as under. Section three discuss on the conceptual issues on Contract Farming along with its various types and difference between various types of farming. Section four elaborates the progress of Contract Farming in India. Section five explains the advantages and problems of the same. Section six examines the prospects of Contract Farming in India. Section seven recommends some of the measures that can improve the prospect of Contract Farming in India; the last section i.e. section eight is devoted for concluding observations.

The study is basically exploratory in nature and depends exclusively on secondary data. Secondary data are collected from various reports published by GOI, RBI, NABARD, KPMG, Price Water house and other research papers on Contract Farming.

3. Contract Farming: Definition and its various types
Contract Farming can be defined as a system for the production and supply of land based and allied produce by farmers/primary producers under advance contracts, the essence of such arrangements being a commitment to provide an agricultural commodity of a type, at a specified time, price, and in specified quantity to a known buyer (Singh, 2005). Contract farming is an agreement that involves producers/farmers, intermediaries, processing and or marketing firms, to provide the farm produce at predetermined prices and quality, at specified places, after a specified duration. The contracts could be of three types namely: (i) procurement contracts under which only sale and purchase conditions are specified; (ii) partial contracts wherein only some of the inputs are supplied by the contracting firm and produce is bought at pre-agreed prices; and (iii) total contracts under which the contracting firm supplies and manages all the inputs on the farm and the farmer becomes just a supplier of land and labour. Contract Farming is known by different variants like
centralised model which is a company farmer arrangement; outgrower scheme which is run by the government/ public sector/joint venture; nucleus-outgrower scheme involving both captive farming and Contract Farming by the contracting agency; multi-partite arrangement involving many types of agencies; intermediary model where middlemen are involved between the company and the farmer; and satellite farming referring to any of the above models (Singh, 2005). Eaton and Shepherd identify five different contract farming models. Under the centralized model a company provides support to smallholder production, purchases the crop, and then processes it, directly controlling its quality. This model is used for crops such as tobacco, cotton, sugar cane, banana, tea, and rubber. Under the Nucleus Estate model, the company also manages a plantation in order to supplement smallholder production and provide minimum throughput for the processing plant. This approach is mostly used for tree crops such as oil palm and rubber. The Multipartite model usually involves a partnership between government bodies, private companies and farmers. At a lower level of sophistication, the Intermediary model can involve subcontracting by companies to intermediaries who have their own personal arrangements with farmers. Finally, the Informal model involves small and medium enterprises who make simple contracts with farmers on a seasonal basis. Although these are usually just seasonal arrangements they are often repeated annually and usually depend for their success on the proximity of the buyer to the seller. In this respect difference between various types of farming are given in table 3.1.

<table>
<thead>
<tr>
<th>Sl. no.</th>
<th>Items</th>
<th>Private Farming</th>
<th>Co-operative Farming</th>
<th>Contract Farming</th>
<th>Corporate Farming</th>
</tr>
</thead>
<tbody>
<tr>
<td>01</td>
<td>Ownership</td>
<td>Held by Private farmer</td>
<td>Held by Private farmer</td>
<td>Held by Farmer</td>
<td>Held by the Company</td>
</tr>
<tr>
<td>02</td>
<td>Risk Sharing</td>
<td>Entirely born by the farmer</td>
<td>Collectively born by the group of farmers</td>
<td>Mostly by farmer as most contracts are one sided.</td>
<td>Entirely by the company.</td>
</tr>
<tr>
<td>03</td>
<td>Ease of credit</td>
<td>Difficult among the four alternatives.</td>
<td>Slightly easier than private farming.</td>
<td>Easier as contract can be showed as collateral.</td>
<td>Easier for the company as banks see lesser risk.</td>
</tr>
<tr>
<td>04</td>
<td>Capital</td>
<td>Invested completely by the farmer.</td>
<td>Invested by the group of farmers collectively.</td>
<td>Invested by the farmer and firm according to the contract terms.</td>
<td>Entirely invested by the contracting Firm.</td>
</tr>
<tr>
<td>05</td>
<td>Farm-firm flow</td>
<td>Many intermediaries</td>
<td>Same as private farming but comparatively better bargaining power due to cohesiveness.</td>
<td>Very less or no middlemen between farmers and firm.</td>
<td>No intermediaries as firm directly take the produce.</td>
</tr>
<tr>
<td>06</td>
<td>Access to the market</td>
<td>Difficult and uncertain to get a reliable route.</td>
<td>Better than private farming due to more bargaining power</td>
<td>Reliable access, assuming no default by the firm.</td>
<td>Fool proof access as farming is done by the firm itself.</td>
</tr>
<tr>
<td>07</td>
<td>Use of Technology</td>
<td>Comparatively unsophisticated.</td>
<td>Scope of new technology due to collective funds.</td>
<td>Access to new technology inputs from the firms.</td>
<td>Application of Latest technologies for higher productivity.</td>
</tr>
<tr>
<td>08</td>
<td>Role of the Government</td>
<td>Regularities for credit / seed inputs, sale in mandis.</td>
<td>Regularities for credit / seed inputs, sale in mandis.</td>
<td>In facilitating contracts, contract laws, credit issuing.</td>
<td>Leasing laws and facilitating firms’ entry.</td>
</tr>
<tr>
<td>----</td>
<td>------------------------</td>
<td>---------------------------------------------------</td>
<td>---------------------------------------------------</td>
<td>---------------------------------------------------</td>
<td>---------------------------------------------------</td>
</tr>
<tr>
<td>09</td>
<td>Sustainability of the farming</td>
<td>Hard for marginal farmer to remain profitable.</td>
<td>Comparatively better than private farmer, with collective resources.</td>
<td>Short term in nature, affected by government policies</td>
<td>Long term in nature, affected by government policies.</td>
</tr>
<tr>
<td>10</td>
<td>Social effects</td>
<td>No dramatic changes from the status quo of the society.</td>
<td>Unity, self sufficiency among the farmer community.</td>
<td>Skewed contracts leading towards arm twisting of small farmers and Corporate might end up dictating what to grow and what to eat.</td>
<td>Indiscriminate corporate farming leads to the suppression of smaller players / farmers in the market.</td>
</tr>
<tr>
<td>11</td>
<td>Economic effects</td>
<td>Marginal farmers entrapped in vicious debt circle.</td>
<td>Scope for greater earning and a lot of bargaining power.</td>
<td>Farmers become too dependent due to market imperfection arising as because one-sided contract.</td>
<td>Good use of waste/ unutilized lands and Concentration on power to few MNCs if used indiscriminately.</td>
</tr>
<tr>
<td>12</td>
<td>Tenancy law</td>
<td>Affect the leasing</td>
<td>Affect the leasing</td>
<td>Affect farmer leases</td>
<td>Affect the firm.</td>
</tr>
<tr>
<td>13</td>
<td>Environmental impact</td>
<td>Judicious use of land can improve fertility of land.</td>
<td>Judicious use of land can improve fertility of land.</td>
<td>Fertility of lands might be squeezed out due to myopic view of firms.</td>
<td>Fertility of land may be maintained, due to long term orientation of the firm.</td>
</tr>
<tr>
<td>14</td>
<td>Involvement of the Politics</td>
<td>Have become a tool for votes, affected by the wavering decisions of various governments.</td>
<td>Welcomed by all the sections of the society.</td>
<td>Government facing opposition for APMC model act, brought out for helping contracts.</td>
<td>Might face a lot of opposition for implementation.</td>
</tr>
</tbody>
</table>


4. Progress of Contract Farming in India

Contract Farming was introduced for the first time in Taiwan in 1895 by the Japanese Government. In India, Contract Farming has its historical roots during the time when the Europeans first introduced indigo and opium cultivation in the Bengal Region, under the East India company rule. ITC’s contracts with the farmers of Andhra Pradesh for growing Virginia tobacco during the 1920s, Contract Farming by PepsiCo for the cultivation of vegetables particularly tomatoes and potatoes in Hosiarpur Taluk of Rajasthan in 1927, emergence of seed companies during the 1960s, the green revolution during the 1970s and finally the tomato farming contracts by PepsiCo in Punjab during the 1990s can be quoted as some of the milestones in the emergence of Contract Farming in India. Several cash crops like tea, coffee, rubber, indigo etc are introduced in various
parts of the country, mostly through a central expatriate-owned estate surrounded by small outgrower’s model. Since the Green Revolution, the Central Government started the largest Contract Farming model, through which it subsidized fertilizers, provided new hybrid variety seeds, provided training and also guaranteed the procurement by State agencies with a minimum support price. The Model Agricultural Produce Marketing (Regulation) Act circulated by the Central Government to the States in 2003 for implementing marketing reforms has provisions for the registration of Contract Farming sponsors and recording of Contract Farming agreements with the Agricultural Produce Marketing Committee (APMC) or a prescribed authority under the Act, protection of title or rights of the farmers over the land under such contracts, dispute settlement mechanism and a model draft agreement suggesting various terms and conditions. To help States in the formulation of rules in this regard, the Ministry of Agriculture has also circulated a set of Model APMC Rules to them for adoption. By now, relevant provisions have been made by several state governments in their respective APMC Acts for providing a legal framework to Contract Farming.

In India, Contract Farming by the corporate sector has so far been more of a case of buy back and input supply, except for some exceptions in states like Punjab, where the state is actively involved in some of the contracts. Some of the Contract Farming initiatives by the corporate sector in India are given in table 4.1.

Table 4.1: State wise Contract Farming initiatives by private companies in India

<table>
<thead>
<tr>
<th>State</th>
<th>Company</th>
<th>Crop</th>
<th>Area (ha)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Karnataka</td>
<td>Himalaya Health Care Ltd.</td>
<td>Ashwagandha</td>
<td>700</td>
</tr>
<tr>
<td></td>
<td>Mysore S N C oil Co.</td>
<td>Dhavana</td>
<td>400-500</td>
</tr>
<tr>
<td></td>
<td>AVT Naturals Products Ltd.</td>
<td>Marigold and Caprica Chilli</td>
<td>4000</td>
</tr>
<tr>
<td></td>
<td>Natural Remedies Pvt. Ltd.</td>
<td>Coleus</td>
<td>150</td>
</tr>
<tr>
<td></td>
<td>20 Pvt. Companies</td>
<td>Gherkins</td>
<td>8000</td>
</tr>
<tr>
<td>Maharashtra</td>
<td>Tinna Oil and Chemicals Ltd.</td>
<td>Soyabean</td>
<td>154,800</td>
</tr>
<tr>
<td></td>
<td>ION Exchange Enviro Farms Ltd.</td>
<td>Several fruits, vegetables, cereals and pulses</td>
<td>19</td>
</tr>
<tr>
<td>Madhyapradesh</td>
<td>Cargil India Ltd.</td>
<td>Wheat, Maize and Soybean</td>
<td>17000</td>
</tr>
<tr>
<td></td>
<td>Hindustan Lever Ltd.</td>
<td>Wheat</td>
<td>15000</td>
</tr>
<tr>
<td></td>
<td>ION Exchange Enviro Farms Ltd.</td>
<td>Several fruits, vegetables, cereals and pulses</td>
<td>12098</td>
</tr>
<tr>
<td></td>
<td>ITC</td>
<td>Soybean</td>
<td>1200</td>
</tr>
<tr>
<td>Punjab</td>
<td>NIJER Agro Food Ltd.</td>
<td>Tomato and chilli</td>
<td>250</td>
</tr>
<tr>
<td></td>
<td>United Breweries Ltd.</td>
<td>Barley</td>
<td>2270</td>
</tr>
<tr>
<td></td>
<td>Satnam Overseas, Sukhjit Starch</td>
<td>Basmati, Maize</td>
<td>4000</td>
</tr>
<tr>
<td></td>
<td>Satnam Overseas, Amira Indian Foods Ltd.</td>
<td>Basmati</td>
<td>14700</td>
</tr>
<tr>
<td></td>
<td>PepsiCo India Ltd.</td>
<td>Basmati, groundnut, potato and chilli</td>
<td>6000 (around)</td>
</tr>
<tr>
<td></td>
<td>Nestle India Ltd.</td>
<td>Milk</td>
<td>65000000 kg. / day</td>
</tr>
<tr>
<td>Tamil Nadu</td>
<td>Super Spinning 570 mills</td>
<td>cotton</td>
<td>570</td>
</tr>
<tr>
<td></td>
<td>Bhuvi Care Pvt. Ltd.</td>
<td>Maize</td>
<td>800</td>
</tr>
<tr>
<td></td>
<td>Bhuvi Care Pvt. Ltd.</td>
<td>Paddy</td>
<td>200</td>
</tr>
<tr>
<td></td>
<td>Appachi Company</td>
<td>Cotton</td>
<td>260</td>
</tr>
</tbody>
</table>

Source: “Nature and Scope of Contract Farming in India” by H.S. Satish (2012)
5. Advantages and Problems of Contract Farming

5.1. Advantages of Contract Farming

5.1.1. Advantages for the farmers

The main benefit of a contractual agreement for farmers is that the sponsor will normally undertake to purchase all produce grown, within specified quality and quantity parameters. Contracts can also provide farmers an opportunity to access a wide range of managerial, technical and extension services that otherwise may be unattainable. Farmers can use the contract agreement as collateral to arrange credit with a commercial bank in order to fund inputs. Thus, possible advantages of Contract Farming for farmers are given below:

i. **Provision for better inputs and production services**: For ensuring a proper crop husbandry practices in order to achieve projected yields in required qualities many contractual arrangements involve considerable production support in addition to the supply of basic inputs such as seed and fertilizer. Sponsors may also provide land preparation, field cultivation and harvesting as well as free training and extension.

ii. **Easy access to Credit**: With the collapse or restructuring of many agricultural development banks, the majority of small holder producers experience difficulties in obtaining credit for production inputs. Contract farming usually allows farmers access to some form of credit to finance production inputs. Arrangements can also be made with commercial banks or government agencies through crop liens that are guaranteed by the sponsor, i.e. where the contract serves as collateral.

iii. **Application of better technology**: New production techniques are often necessary to increase productivity as well as to ensure that the commodity meets market demands. However, small scale farmers are frequently reluctant to adopt new technologies because of the possible risks and costs involved. Private agribusiness will usually offer technology more diligently than government agricultural extension services because it has a direct economic interest in improving farmers’ production.

iv. **Improvement in skills of the farmers**: The skills the farmer learns through contract farming may include record keeping, the efficient use of farm resources, improved methods of applying chemicals and fertilizers, knowledge of the importance of quality and the characteristics and demands of export markets. Farmers can gain experience in carrying out field activities following a strict timetable imposed by the extension service. In addition, spill over effects from contract farming activities could lead to investment in market infrastructure and human capital, thus improving the productivity of other farm activities. Farmers often apply techniques introduced by management (ridging, fertilizing, transplanting, pest control, etc.) to other cash and subsistence crops.

v. **Guaranteed Pricing System**: The returns farmers receive for their crops on the open market depend on the prevailing market prices as well as on their ability to negotiate with buyers. This can create considerable uncertainty which, to a certain extent, contract farming can overcome. Frequently, sponsors indicate in advance the price(s) to be paid and these are specified in the agreement. Thus Contract Farming ensures guaranteed and fixed pricing structures.

vi. **Easy access to reliable market**: Farmers will not cultivate unless they know they can sell their crop, and traders or processors will not invest in ventures unless they are assured that the required commodities can be consistently produced. Contract farming offers a potential...
solution to this situation by providing market guarantees to the farmers and assuring supply to the purchasers. Even where there are existing outlets for the same crops, contract farming can offer significant advantages to farmers. They do not have to search for and negotiate with local and international buyers, and project sponsors usually organize transport for their crops, normally from the farm gate.

5.1.2. Advantages for the Sponsors
The possible advantages for the sponsors are as follows –

i. **Political Acceptability:** Contract farming, particularly when the farmer is not a tenant of the sponsor, is less likely to be subject to political criticism. It can be more politically expedient for a sponsor to involve smallholder farmers in production rather than to operate plantations. In recent years, many African governments have promoted contract farming as an alternative to private, corporate and state owned plantations.

ii. **Overcoming barriers on land restrictions:** The majority of the world’s plantations were established in the colonial era when land was relatively abundant and the colonial powers had little conscience about either simply annexing it or paying landowners least compensation. However, in present days most large tracts of suitable land are either traditionally owned, costly to purchase or unavailable for commercial development. Contract farming, therefore, offers access to crop production farm land that would not otherwise be available to a company, with the additional advantage that it does not have to purchase it.

iii. **Production consistency and shared risk:** Working with contracted farmers facilitates sponsors to share the risk of production failure due to poor weather, disease, etc. The farmer takes the risk of loss of production while the company absorbs losses associated with reduced or nonexistent throughput for the processing facility. Where production problems are widespread and no fault of the farmers, sponsors will often defer repayment of production advances to the following season. Both estate and contract farming methods of obtaining raw materials are considerably more reliable than making purchases on the open market.

iv. **Quality assurance:** A steady markets for fresh and processed agricultural produce require reliable quality standards. Moreover, these markets are moving increasingly to a situation where the supplier must also conform to regulatory controls regarding production techniques, particularly the use of pesticides. Both estate and contracted crop production require close supervision to control and maintain product quality, especially when farmers are new with innovative harvesting and grading methods.

5.2. Problems of Contract Farming

5.2.1. Problems faced by the farmers
The potential problems as confronted by the farmers due to Contract Farming are given below

i. **Possibility of greater risk:** Farmers who were entering into a new contract farming venture should be prepare themselves to assess the prospect of higher returns against the possibility of greater risk. Such risk is more expected when the agribusiness venture is introducing a new crop to the area. There may be production risks, particularly where prior field tests are inadequate, resulting in lower-than-expected yields for the farmers. Market
risks may occur when the company’s forecasts of market size or price levels are not accurate.

ii. **Outdated technology and crop incongruity:** The introduction of a new crop to be grown under conditions meticulously controlled by the sponsor can cause disruption to the existing farming system. Again, the introduction of sophisticated machines (e.g. for transplanting) may result in a loss of local employment and overcapitalization of the contracted farmer. Furthermore, in field activities such as transplanting and weed control, mechanical methods may produce less effective results than do traditional cultivation methods. Therefore, Field extension services must always ensure that the contracted crop fits in with the farmer’s total cropping regime, particularly in the areas of pest control and field rotation practices.

iii. **Manoeuvring in quotas and quality specifications:** Incompetent management can lead towards production exceeding original targets. For example, failures of field staff to determine fields following transplanting can result in gross over planting. Sponsors may also have unrealistic expectations of the market for their product or the market may crumple unexpectedly owing to transport problems, civil unrest, change in government policy or the arrival of competitors. In some situations management may be tempted to manipulate quality standards in order to reduce purchases for honouring the contract. Such practices may cause sponsor-farmer confrontation, especially if farmers have no method to dispute grading irregularities. Therefore, all contract farming ventures should have forums where farmers can raise concerns and grievances relating to such issues.

iv. **Corruption:** Problems occurs when staff responsible for issuing contracts and buying crops taking undue advantages of their position. Such practices result in a collapse of trust and communication between the contracted parties and soon undermine any contract. In a large contract, the sponsors can themselves be dishonest or corrupt. Governments have sometimes fallen victim to dubious or “fly-by-night” companies who have seen the opportunity for a quick profit. Therefore, in every case farmers who make investments in production and primary processing facilities run the risk of losing everything.

5.2.2. Problems faced by the Sponsors

The possible problems as confronted by the Contract Farming Developers are outlined below –

i. **Limitation on land availability:** Farmers should have a suitable cultivable land on which they are to cultivate contracted crops. But problems can arise when farmers have minimal or no security of tenure as there is a possibility of drainage in sponsor’s investment as a result of farmer - landlord disputes. Difficulties may also arise when sponsors lease land to farmers. Some contract farming ventures are dominated by customary land usage arrangements negotiated by landless farmers with traditional landowners. While such a situation allows the poorest cultivator to take part in contract farming ventures, discrete management measures need to be applied to ensure that landless farmers are not exploited by their landlords. Before signing a contract, the sponsor must ensure that access to land is secured, at least for the term of the agreement.

ii. **Social and Cultural constraints:** Promoting Contract Farming is a cultural, customary beliefs and religious issues. In communities where custom and tradition play an important role, difficulties may arise when innovative farming is introduced. Therefore, before introducing new cropping practices, sponsors must consider the social attitudes and the
traditional farming procedures of the community and decide how a new crop can be introduced.

iii. **Farmers disgruntlement:** Sometimes, situations may crop up which may lead towards farmer discontent; e.g. biased buying, late payments, incompetent extension services, poor agronomic counsel, undependable transportation for crops, a mid-season change in pricing or management’s impoliteness to farmers will all normally aggravate the relationship between sponsors and the farmers. If not readily addressed, such circumstances will cause antagonism towards the sponsors that may result in farmers withdrawing from projects.

iv. **Below quality agro-inputs:** Sometimes farmers are forced to use inputs supplied under contract for the purposes other than those they were intended for. They may choose to utilise the inputs on their other cash and subsistence crops or even to sell them. As a result contracted crop’s yields were reduced and the quality are affected. Improved monitoring by extension staff, farmer training and the issuing of realistic quantities of inputs can resolve the matter successfully. Majority of farmers conform to the agreement when they have information that the contract has the advantages of technical inputs, cash advances and a guaranteed market. However, until a project is very poorly managed, input diversion is usually an infuriation rather a serious problem.

v. **Sale of crops by the farmers beyond contractual agreement:** The sale of produce by farmers to a third party, outside the terms of a contract, can cause major problem to the sponsors. However, extra-contractual sales are always possible when there is an alternative market. The outside buyers offered cash to farmers as opposed to the prolonged and difficult collection of payments negotiated through the cooperative. Sometimes the Sponsors may encourage extra-contractual practices as there are several companies working with the same crop (e.g. cotton in some southern African countries) and they could collaborate by establishing a register of contracted farmers. Managers must be aware of the situation when produce were sold outside the project and also when produce from outside being forced into the buying system. This happens when non-contracted farmers take advantage of higher prices paid by a well-known sponsor. Non-contracted crops are filtered into the buying system by outside farmers through friends and family who have crop contracts. Such practices make it difficult for the sponsor to regulate production targets, chemical residues and other quality aspects.

6. **Prospects of Contract Farming in India**

In our country Contract Farming has considerable potential where small and marginal farmers can no longer be competitive without access to modern technologies and support. The contractual agreement with the farmer provides access to production services and credit as well as knowledge of new technology. Pricing arrangements in Contract Farming can significantly reduce the risk and uncertainty of market place. Therefore, Contract farming is becoming an increasingly important aspect of agribusiness in India today. But there are few success stories on contract farming in this region viz. Pepsico India in respect of potato, tomato, groundnut and chili in Punjab, Safflower in Madhya Pradesh, oil palm in Andhra Pradesh, seed production contracts for hybrids seed companies (Monsanto India), Amul and NDDB for milk procurement, sugarcane cooperative in Maharashtra and prawn-acqua culture in Andhra Pradesh.

Several research Studies (Shojarani 2007, Kumar et al 2008, Swain et al 2012, Lavanya et al 2014) have highlighted a significant problem in some cases wherein both firms and farmers breached
contracts when market conditions provided arbitrage opportunities. Firms rejected more contracted produce on quality grounds when market prices dipped below contracted prices and farmers engaged in side-selling in open markets when market prices rose higher than contract prices. Again the sponsors prefer medium and large farmers because of transaction costs. They want farmers to dedicate a minimum acreage, say, five acres [one acre is 0.4 hectare] of land, to the contract crop. But in India, 85 per cent of the farmers are marginal or small, operating less than two acres and out of them 66 per cent operate less than one acre each. Therefore there is no possibility that they can provide land for contract crops individually; until and unless there is a collectivisation of small farmers. For instance, 10 to 15 farmers get together, form a group, and sign a group contract. It brings down the transaction costs, the farmers are better protected, and it is essentially a win-win situation for both the farmer and the corporate. It has been successful in Thailand. In fact, the Thai government planned it out and made it a part of the country’s national development plans. The present era of globalization and liberalisation has witnessed major changes in agriculture, the basis of Indian economy. These changes comprise cropping technology as well as cropping patterns. Export oriented products and processed food items occupy an imperative position in the market these days. Such value added agricultural product needs heavy dose of costly inputs, improved crop varieties, and advanced technology to comply with the quality standards set by international organizations like WTO. Contract farming proves to be beneficial to and fulfil the desired demand of both farmers and companies. In India since most of the farmers belong to small and marginal categories and also resource poor; at the same time the agro processing farms are lacking in possession of land for cultivation of high valued crops. Therefore companies can come forward with contracts in providing such costly inputs, improved crop varieties and advanced technology to the resource poor farmers. Hence, contract farming has attained a greater place in today’s agriculture of Indian economy and it continues to play a major role in commercializing it.

7. Suggestion for Development of Contract Farming model of agriculture in India

Based on the above study, the following recommendations are made for an improved Contract Farming Model of agriculture in India -

i. Present provisions of institutional arrangement to record all contractual arrangements should be made effective. The Panchayat or Gram sabha, particularly in PESA areas or in case of Forest Right Holder communities, may be connected with this process. This will promote and strengthen confidence building between the parties and also help to solve any dispute arising out of violation of contract.

ii. There should be a contract farmers association or cooperatives at the plant level which will improve bargaining power of the farmers and the sponsors and promote equality of partnership. It will also minimise the role of middlemen or commission agents who are involved in marketing of the contract commodities on behalf of the company.

iii. The selection of appropriate plant genotype is one of the crucial factors for Contract Farming. Unless the plant material is of good quality and high yielding and also less prone to pests and diseases, the contract farmers may lose their confidence and discontinue the cultivation of contracted crop.

iv. Every contract farming agreement should have a provision for both forward and backward linkages. Unless both input supply and market for the produce are assured, small farmers are not encouraged to participate in contract farming.

v. Bank finance to small and marginal farmers should be on easy terms.
vi. A sustainable contract farming requires adequate infrastructure facilities e.g. roads, public transport, telephones, postal services, stable power and water supplies, cold storage facilities, etc. Therefore, it is the responsibility of the governments to provide the minimum necessary infrastructure facilities like roads, electricity, cold storage, and market yards.

vii. The contracts should be managed in clear and participatory manner so that there is greater social consensus in handling contract violation from either side without getting involved in costly and lengthy process of litigation. Also the terms of contract need to be more comprehensive and flexible.

viii. In many parts of the country, agricultural tenancy is legally banned, although concealed tenancy exists. Tenants who do not enjoy security of tenure are unable to participate in contract farming. Hence, legalisation of tenancy is a prerequisite for the tenant farmers who will enter into contract farming. Although different forms of land tenants including share-croppers can be adopted to maintain the contract farming but security of tenure is a must.

ix. As assured market of the farm motivates a farmer to enter into contract with a company, similarly market prospect for the processed products of the company should exist. Ultimately, it is the success of the company's product in national or international market, which decides whether contract farming for any particular crop or commodity would sustain.

x. The government must ensure that contract farming, which is generally a commodity specific and tends to promote monoculture, does not grow beyond certain limit which will destroy biodiversity and agricultural ecology.

xi. The Central Warehousing Corporation and the State Warehousing Corporations should develop commercially acceptable quality standards in respect of various commodities in order to ensure quality maintenance of the stored goods over a sufficiently longer period of time.

xii. Updated database of contract farmers along with other relevant details such as the area & crops under contract, contracting agency, etc. should be maintained at various state levels and should be available to the public through an website.

xiii. Agreements written in vernacular language should be given priority so that the local farmers can understand the terms of contract. To suite the other party, it can be made bilingual. Standard formats for farmer-friendly agreement should be designed and mandated by the governments.

xiv. Contract Farming in lands recognized under Forest Rights Act is a virtual control of a person or agency other than the right-holder himself/herself and this lead towards violation of the spirit & mandate of the Act; therefore governments should take protective measures in this context.

xv. Liability of the contractor for any environmental losses should be fixed by the government, and in case such losses occur, the penalty realized in a proportionately appropriate amount should be spent for restoring the concerned area, preferably through the local Palli sabha/Gram sabha.

8. Conclusion
Cooperative farming can help small and marginal farmers to achieve economies of scale by improving their bargaining power; however, it fails to arrest market access problem completely.
Whereas the Contract farming can be prove successful in mitigating the problem of access the market in a farming structure. It could be evaluated as a way of providing earlier access to credit, input, information and technology and product markets for the small scale farming structure. Contract farming might also be seen as a way or as a part of rural development and promoted to improve agricultural performance especially in Third World Countries. Corporate Farming can be very suitable for utilizing huge waste and unutilized cultivable lands in India. However, contracts are too one sided. Indiscriminate opening up of agricultural sector to corporate companies can impact the social and economic equilibrium of the economy of our country very badly. However, if the government takes proper care in regulating the terms of contract, in order not to make them too skewed, higher efficiencies and hence greater societal welfare can be attained. Therefore Government of India should take proper steps in making most of the Corporate Farming model that brings in technology, efficiency and sustainability in the farming sector of our country.

References