

The BL Interview

'Global herbal trade potential waiting to be tapped'

Vinson Kurian



Medicinal plants can be a good source of income for farmers as there has been a resurgence of interest in traditional and alternative healthcare systems, most of which rely on herbs for medicine.

The world herbal trade has grown to \$120 billion and is expected to reach \$7 trillion by 2050, says Shaheen Majeed, member of the Board of Directors of the Sami Group, and Marketing Director, Sabinsa Corporation, New Jersey. He is also the son of Muhammed Majeed, Founder and Chairman, Sami Labs.

Shaheen Majeed told *BusinessLine* in an e-mailed interview that India's share in the world trade is comparatively low even though it has a rich tradition of herbal medicine. Hence, this is a tremendous opportunity that is waiting to be tapped. Contract farming, he said, reduces the risk farmers face from market volatility. From pharma companies' point of view, it provides greater control over quality and quantity. Contract farming provides 30 per cent of the raw materials for Sami Labs, says Majeed. Excerpts:

Do you think the pharma industry has developed the intellect for contract farming?

Contract farming has been in existence in many parts of the world as a means of organising and bringing uniformity in the agricultural production of large- and small-scale farmers.

Many countries continue to adopt it as changes in food habits, expansion of world trade, and year-round availability of fresh produce provide good drive as well as examples of what works and what doesn't.

In India, too, contract farming has existed for many years for both subsistence crops such as wheat, potato and tomato and commercial crops such as sugarcane, tea, coffee and cotton.

While contract farming has seen great success for some particular crops/commodities, it is still at a nascent stage for medicinal herbs as farmers, who don't necessarily know how demand for traditional Indian herbs is growing worldwide and don't have direct access to those markets, feel that it is a huge risk.



Debt, price fluctuations and weather variabilities deter them further from taking the risk to move to untried crops. Ultimately, a manufacturer who needs to secure steady supplies is at the mercy of traders.

Through contract cultivation, pharma companies can ensure a steady supply of herbs of top quality and consistency.

Sami Labs currently works with 6,000 farmers across 40,000-50,000 acres of land and is expanding cultivation programmes into various regions to minimise potential disruptions. Contract farming now provides 30 per cent of the company's raw material supply.

The fall in collection of wild herbs threatens the industry. Will contract farming set right the situation?

Sourcing the best raw materials is one of the biggest problems the pharma industry faces today. Medicinal plants can be a good source of income for farmers as there has been a resurgence of interest in traditional and alternative healthcare systems, most of which rely on herbs for medicine.

The world herbal trade has grown to \$120 billion and is expected to reach \$7 trillion by 2050.

However, India's share in the world trade currently is comparatively low, even though we have a rich tradition of herbal medicine. Hence, this is a tremendous opportunity that is waiting to be tapped.

The government's National Agricultural Policy has recognised contract farming as an important component of agri-business and its significance for small farmers as it allows accelerated transfer of technology, faster inflow of capital, and assurance of a market for the crop.

Contract farming reduces the risk the farmers face from market pressures such as price fluctuations, production costs and lower transaction costs. From the pharma companies' point of view, contract farming provides greater control over quality and quantity.

Companies can help farmers maintain high-quality control and consistency of produce while providing them technical expertise, ensuring insurance coverage for the crops, facilitating loans and buyback agreements. Medicinal plants and aromatic plants are the best alternative to the present agricultural system.

Additionally, throughout the world, 'wildcrafting,' or collection of herbs grown in the wild, carries an inherent risk of over-harvesting; thus cultivation is also a means of protecting our traditional herbs.

Lower alkaloid content has been an issue associated with raw material available in the open market...

Different herbs have an adaptation to different environmental and physical conditions that determine the herb's potential to produce any secondary metabolite, including alkaloids.

The total alkaloid content of a herb or plant varies depending on the species, environmental conditions, place of cultivation, time/season of the year and the stage of growth and harvest.

Essentially, the alkaloid content of the plant depends on the adaptability of that crop to that particular farm or environment.

Does Sami Labs support tissue culture of medicinal plants in its contract farms?

Sami Labs supports tissue culture of medicinal plants by micro-propagating the clones of elite plants with significant bio-activity. Through various tissue culture techniques, we also work on selecting high yielding lines for propagation.

In contract farming for medicinal plants, we follow a series of steps.

Firstly, we identify high yielding varieties. After selecting the right plants, we multiply the yields through tissue culture technology and undertake field trials before supplying the plant to contract farmers for large-scale cultivation.

Some of the plants that have been cultivated through tissue culture are *Coleus forskohlii*, *Curcuma longa*, *Allium sativum*, *Olea europaea* and *Melissa officianalis*. We also develop techniques for secondary metabolite production through callus culture.

We have been successful in enriching amino acids and essential minerals in medicinal plants through proprietary hydroponic techniques.

Tissue culture helps to raise the profile of medicinal plants and since we pick high yielding varieties, it increases and maintains the quality of the produce and its output as well.

Some manufacturers have reneged on prices fixed as part of a buy-back arrangement...

Sami Labs provides a firm buy-back guarantee to the farmers, and the price depends on the quality of the yield.

We also provide them crop insurance, bank finance and a fair price for the produce.

What is your take on non-availability of workers, delays in payments, high rejection rates, low contract prices, labour issues and pests and disease?

Non-availability of workers and labour issues: Contract farming is often viewed as being beneficial for companies by enabling them to obtain cheap labour and to transfer the risks to growers.

However, the reality is that harvesting of the contracted crop may clash with the harvest of food crops, resulting in labour resources being scarce. This leads farmers to employ sophisticated machines, resulting in a loss of local employment.

High rejection rate, low contract price and delay in payments: Inefficient management of contract farming can have a major impact on the production at various levels.

For example, if the field staff fail to measure the fields after transplantation, it could lead to overplanting.

On the other hand, companies could also have unrealistic expectations of yields from contract farming. If there is a sudden change in government policy or transportation problems, then it may lead to farmers getting a lower profit or margin.

Sometimes, quality standards are manipulated to reduce purchases, leading to increase in company-farmer confrontation. Most of the time, farmers do not have methods to dispute the quality irregularities.

Problems also arise when farmers believe that the company is unwilling to share any of the risk, even if they are partly responsible for the losses.

A major reason for low contract price is the quality of the crop.

Inadequate field trials and wrong forecasts of market size can also have a major impact on the contract price. One way of dealing with this would be to have forums where farmers can raise their grievances and have the assurance that it will be addressed.

Regular interaction between farmers and the industry leads to better relations with increased trust.

Pests and diseases: Procuring herbal raw materials is becoming more and more expensive every day. Environmental pollution is causing us to spend a lot more on removing contaminants from such materials.

Hence, in our contract farms, we make sure that all our pesticides are eco-friendly.

We encourage farmers to use safer methods of cultivation even though the yield is 5-10 per cent lower.

We believe that it is important to preserve our natural resources and not add toxins to the environment.

There are reports that companies prefer large and medium farmers...

The system is not perfect, I admit. But, farming medicinal plants can provide livelihood and health security to a large segment of the Indian population — and that includes small, medium and large-scale farmers.

Agri-businesses such as ours have often found that small-scale farmers and their families are likely to produce higher quality products than farmers who need to supervise hired labour. Not just the corporates, the Government of India also recognises the relative importance of contract farming for small farmers.

In order to promote the same, the National Bank for Agriculture and Rural Development has developed a special refinance package for contract farming arrangements (within and outside AEZs) aimed at promoting increased production of commercial crops and creation of marketing avenues for farmers.

Has the APMC Act come in the way of implementing contract farming in States?

I wouldn't say that. The government's intention is to bring transparency to the sector by providing a legal framework, and we welcome that.

For contract farming to be truly successful, the whole ecosystem needs to function in sync.

In fact, the Model Agricultural Produce Marketing (Regulation) Act allows and strongly advocates for contract farming, with provisions to tackle disputes between farmers and the companies; protect rights of farmers over such contracts; recording of contract farming agreements and registration of contract farming companies.

However, States like Punjab have introduced a new Act. The State government controls purchase, sale, storage and processing of agri products, preventing farmers from selling their produce to whomever and wherever they want.

The Act does not spell out the many aspects of contract farming, which can be problematic for farmers.

Another major difference is that the Act does not protect farmers' interest in case the buyers default on payment. Gujarat and Haryana guarantee to take 5 per cent and 15 per cent respectively of the produce.