

INTERNATIONAL CENTRE, GOA

REPORT ON THE INTERACTIVE MEETING ON 7 JULY 2009

New Agricultural Options for Value Added Agriculture in Goa

Dr. V S Korikanthimath, Director, Indian Council of Agricultural Research (ICAR) Goa, in his power presentation pointed out that Goa is one of the States with most favourable climatic conditions and had considerable potential for value added agricultural development. Dr. Korikanthimath was speaking at The International Centre, Goa (ICG) interactive meeting on “*New Agricultural including Horticultural Options for Value Added Agriculture in Goa*”.

The programme organized by the ICG was chaired by Dr. V A Pai Panandiker, Vice-President, ICG and was attended by progressive farmers of Goa, the scientists from ICAR and State Government officials. It was essentially a follow up programme of the talk on “*The State and Potential of Indian Agriculture and Opportunities for Goa*” delivered by Prof. V. L. Chopra, an eminent agricultural scientist, former Director General of ICAR and Member Planning Commission in charge of Goa on 17th April 2009 at ICG.

Dr. Korikanthimath made a detailed presentation on the possible and viable new technological options in tune with the changing agricultural needs of Goa. Dr. Korikanthimath gave details of the agricultural status and land configuration of Goa, agro-climate of west coast, topography, soils, and weather. He stated that plantation crop cultivation is prominent in the hinterland and the valleys while coastal plains are used to grow rice – the staple food of Goa. Dr. Korikanthimath also made the SWOT analysis of development of agriculture in Goa.

Goa with favourable tropical climate, high rainfall, natural resource base for many types of agricultural activities, and great scope of eco-tourism in the hinterland of Goa constituted the strengths of Goa. The weaknesses of agriculture in Goa include the scarcity of labour and non-availability of critical agricultural and technological inputs. About 18,000 ha of Khazan lands and 2000 ha of mangroves needed to be preserved for ecological reasons as well as for food production. Liberalisation of the Indian economy provides tremendous export potential for agricultural products. Goa with relatively better air and sea links provide immense opportunities for agricultural exports. Promotion of agro-eco tourism can also boost the economy of Goa.

Dr. Korikantimath stated that Goan agriculture faces threats due to increased industrialization, increased intrusion of tourism and mining on agricultural land which have relegated the agricultural activities to third position. Consequently, people engaged in agriculture are declining steadily, and so is the investment and interest of the people in agriculture. This further leads to leaving fertile agricultural land fallow. Mining rejects also pose threats to both the rivers and agricultural land in the low lying areas apart from Goa’s ecosystem. This SWOT analysis is very important to reorient

priorities towards high value agricultural products, increased mechanization, and value addition to the agriculture.

According to Dr. Korikanthimath, prioritization has to be made for promotion of high value cash crops, horticultural crops, appropriate livestock and fish farming, integrated to suit the local agro-climatic conditions.

Intervening in the discussion, the Chairperson Dr. Pai Panandiker stated that for ensuring the viability and attractiveness of agriculture and related activities in Goa, thrust had to be made on the high value added agriculture which would enable considerable automation and thus avoid the problem of scarce and costly labour. He also mentioned about the highly organized, highly mechanized, high value added agriculture and water management in Israel which had been highly successful. Dr. Pai Panandiker suggested that the agriculture department can consider providing training to the young agricultural workers for the high value added agriculture modeled like the ITIs for industrial sector because high tech high value added agriculture was complex unlike the traditional agriculture.

While answering to one of the questions, Dr. Korikanthimath stated that water conservation is of immense importance especially because Goa receives upto 3200 mm rain every year but runs short of water during the summer. Dr. Pai Panandiker added that efficiency and productivity of water is as important as its conservation because large scale water shortages are almost inevitable with large global demand for food. Protection of Khazan land is also equally important to protect Goa's ecosystem and coastal erosion which was now clearly visible. Dr. Korikanthimath, while responding to another question advised that those medicinal and aromatic plants which have market value and suitable to Goan climate should be grown in Goa.

One of the participants suggested exposing the school children and youth to such valuable information on Goan agriculture. Dr. Pai Panandiker agreed. He also made a suggestion which was earlier made by Prof. Chopra at ICG, that one of the solutions to the problem of small holdings in Goa could be the "Federated Farming" which is already tried in Goa by a few farmers some of whom were present at the meeting. This is also one of the ways to take Goan agriculture to the next stage where new technology and newer types of organization would help.

On the issue of not getting appropriate price for the crop which results in dependence on government subsidy, Dr. Pai Panandiker by giving examples suggested that certain crops such as coconuts could be processed and sold instead of selling it as raw products. Having agro-industries, integrated farming and proper marketing and transportation system would collectively make agriculture especially horticulture and floriculture viable and even highly profitable. But Goa was yet to explore and exploit these options.

Dr. V A Pai Panandiker, in his closing remarks stated that optimisation of the capabilities and resources of Goa is very important be it in agriculture or in any other

field. Both mining as well as tourism were highly fragile. Mining will not exist for too long and if IPCC report is right about continued Global Warming, our beautiful beaches will also not exist after 25 years which will seriously affect tourism. However people will always require food with or without mining and tourism. The most important reason for Goa to move towards high value added agriculture is that it will sustain life and at the same time generate high income. There are certain crops which we cannot grow but the crops which we can grow should be grown with high tech options which are easy and even affordable such as new varieties of rice, cashews etc and drip fertigation.

Dr. Korikanthimath also spoke about management of natural resources, soil and water conservation, bio-engineering measures, multi-layer land use system, low cost water harvesting structures, rehabilitation of mines reject soils, coastal soil salinity management and performance of salinity tolerant rice in Khazan lands. While speaking on the issue of rice cultivation in coastal areas, Dr. Korikanthimath emphasized on the use of hybrid seeds which will give higher yields and returns. The same land after harvest can be used to grow other crops such as vegetables, groundnuts, cowpea, etc. The ICAR is also promoting integrated farming wherein different types of crops can be grown all round the year which would result in higher returns.

While speaking on horticulture, Dr. Korikanthimath stated that the horticulture crops occupy nearly 57-60 % of the total cultivated area in Goa. The important horticulture crops of Goa are the Plantation Crops which include Cashew, Coconut, Black Pepper, Arecanut, and Oil Palm. Different types of spices, Medicinal and Aroma plants, Fruit crops, vegetables, and flowers can also be grown in Goa.

Dr. Korikanthimath spoke in detail on growing Cashew, Coconut, Arecanut, Oil Palm, Spices, Kokum, medicinal plants, Mango, Banana, Pineapple, Papaya, and other unexplored and under-explored fruits. He also spoke about the variety of vegetables and flowers which can be grown in Goa. He mentioned about the facilities and activities of Post Harvest Training Unit at ICAR, and the Krishi Vikas Kendras.

Commenting on the animal husbandry of Goa, Dr. Korikanthimath stated that there is a wide scope for improving milk and other animal products. He spoke in detail on issues of raising cattle, pigs, rabbits, goats, and poultry and about the disease management and feed production for these animals. He subsequently also spoke on fisheries where both ornamental as well as edible fish can be grown in Goa.

While speaking on all the above mentioned aspects of agriculture, Dr. Korikanthimath stressed once again on the need for pursuing Value Added Agriculture. He also gave details of infrastructural needs of each of these areas of agriculture.

The meeting concluded by a vote of thanks to Dr. Korikanthimath and his team at the ICAR, Goa.