

## **EXTENSION METHODOLOGY FOR EFFECTIVE DISSEMINATION OF TECHNOLOGY TO THE FARMING COMMUNITY**

### **Background :**

Forty five programmes/schemes/projects/extension approaches implemented from 1960 onwards were analysed in terms of objectives, salient features/advantages and constraints/deficiencies. The details are given in Annexure – I.

Out of the forty five programmes, the salient features of the two major extension methodologies, namely, Training & Visit System (T&V System) and Tamil Nadu Agricultural Development Project (TNADP) implemented in the past and the on-going Agricultural Technology Management Agency (ATMA) approach are given below.

### **I. Training & Visit (T& V) System**

- Introduced in 1974-75 with Work Bank Fund
- Extension system was reorganized with single line of command
- Regular Monthly Fortnightly training programmes organized for the extension functionaries on the improved technologies of the crops
- Contact Farmer approach was introduced
- Pre-Scheduled visits were undertaken to disseminate crop technologies to the farming community
- Came to an end in 1990
- The T&V system created remarkable impact on increasing the foodgrains production, especially cereals
- Capacity Building of extension functionaries and regular dissemination of technologies were streamlined and the system was standardized.
- Remarkable infrastructure development in terms of buildings, vehicles etc., was made possible.
- In essence, there was more “Field Work” than “File Work”.

- However, all the developmental efforts were focused on crops alone that too cereals and largely in irrigated areas.
- The large-sized professional extension personnel of the Department of Agriculture was extensively used to disseminate crop technologies alone leaving other agri-related enterprises
- After the withdrawal of World Bank Fund, the Training & Visit dimensions got diluted year by year.

## **II. Tamil Nadu Agricultural Development Project (TNADP)**

- Introduced in Tamil Nadu in 1991
- The concept of BBES (Broad Based Extension System) was conceived for the first time in India
- There was provision to disseminate the improved technologies in Agriculture and allied enterprises but functionally did not take- off
- The programme was implemented in varied ways in different districts due to shortage of funds after the T&V system
- The capacity building programmes of extension functionaries were limited to fund made available by the State Government
- From 1991-2005, various development Departments were functioning in a compartmentalized manner resulting in duplication of activities and in many areas less relevant to the farmers' needs.
- However, there was enhancement of food grains production

## **III. ATMA: Agricultural Technology Management Agency**

### **Approach**

- Introduced in Tamil Nadu in 2007
- The extension system was reformed with new institutions in place at State, Districts, Blocks and village levels
- There is provision for participatory planning, execution, monitoring and evaluation of the scheme involving various stakeholders, namely, Farmers, Extension functionaries of all Development Departments, scientists, NGOs, Farmers organizations, Banks etc.

- Decentralized Decision making process with more say by the farmers themselves is inbuilt in the scheme
- Planning from below mechanism is possible for developing Strategic Research and Extension Plan (SREP) for each district for the holistic and integrated development of Agriculture and allied enterprises.
- Organizing the farming community into Farmers Interest Groups (FIGs), Commodity Interest Groups (CIGs), Farmers Registered Societies and Farmers Organizations (FOs) is the major functional approach of the new extension methodology
- There is a great scope for all the stakeholders to work together for enhancing sustainable and profitable farming in Tamil Nadu State
- Government of India provides 90% funds assistance with state Government share of 10%

#### **Gaps and Missing Links in ATMA**

- Structurally reformed but functionally need to be improved a lot
- Synergy among various stakeholders is far from satisfactory
- More focused on “Targets” and “Achievements” (Physical and Financial) rather than “Results”, “Deliverables” and “Outcome”
- Compartmentalized manner of functioning by the Development Departments continues in most of the places
- The interventions are not fully need based
- There is a still a wide gap in addressing the problems and issues relating to effective production, value addition and marketing of agricultural commodities
- Multiplicity of schemes, projects and programmes hinder the systematic and concerted implementation
- More “File work” than “Field work”
- Inadequate man power
- Lack of proper facilities for the mobility of the extension functionaries.

## **The present system :**

In order to analyse the on-going ATMA Model, six interactive discussion meetings were organised in Thondamuthur block of Coimbatore District in March & April. 2012 involving farmers, extension functionaries of the Department of Agriculture, Animal Husbandry, Horticulture, Forestry etc., input dealers, TNAU Scientists, banking institution and Co-operative personnel. The main agenda of the discussions was the analysis of Strengths, Weaknesses, Opportunities and Difficulties for triggering agricultural development so as to make farming sustainable and profitable within the existing framework of ATMA. In particular, the status and functioning of various institutional arrangements put in place at Village level (Commodity Interests Groups), Block level (Block Technology Team & Farmers Advisory Committee) and District level (Governing Board and ATMA Management Committee) was also deliberated. Further, the planning process, integrated farming system approach, technology delivery mechanisms, issues relating to production – value addition - marketing dimensions were also critically examined collectively by the stakeholders

## **Policy Suggestions**

Based on the outcome of the deliberations and views suggestions expressed by different stakeholders, the following policy advocacy points have been drawn.

1. Eventhough much emphasis has been laid in ATMA for facilitating the farmers in getting organised into **Commodity Interest Groups** (CIGs) and other **User Groups** (UGs), the field reality remains dismal. The farmers need to be motivated and encouraged to establish CIGs at cluster level. One practical successful factor could be linking the technology delivery and capacity building programme, input supply, subsidy provision etc., to such **Registered Farmers Associations or Societies**. To begin within each block, the establishment of at least four or five **Commodity Interest Groups** representing different clusters (a group of two to four villages) should be facilitated by the Block Technology Team (BTT) and Farmers Advisory Committee (FAC) on a pilot basis within six months time. Later, upscaling may be done in other places also.

2. Currently Strategic Research Extension Plan (SREP) is prepared without adequate participation of all stakeholders. The planning process, therefore, needs to begin with the conduct of **SWOC analysis** involving all the stakeholders cluster wise and considering the technologies available, on-going schemes, projects resources, opportunities etc., the **Village Development Plan** (VDP for big village) or **Cluster Development Plan** (CDP, for a cluster of two or three small villages) have to be prepared. The consolidation of all the Village Development Plans and Cluster Development Plans will emerge as **Block Development Plan** (BDP). The **District Development Plan** has to be arrived at by consolidating all the Block Development Plans (BDPs).
3. The **Farmers Organizations**, namely **CIGs**, **Registered Farmers Societies** need to be given priority for capacity building programmes (Training, Demonstrations, exposure visits etc.) establishment of community nurseries, provisions of subsidized inputs, supply of farm equipments and machineries for maintenance and hiring to nearby farmers, creating common storage and processing facilities, transporting and marketing agriculture produces and commodity collectively so as to get better price for the produces. A common format of objectives for the registered societies is given in Annexure – IV.
4. While implementing the extension interventions, **beyond ‘targets’ and ‘achievements’**, emphasis and focus needs to be on the **“results”** produced in the field. The ‘actual results’ produced in relation to production, value addition and marketing have to be documented and compared with the already determined ‘expected results’. Special attention and efforts are to be jointly made by the Block Development Team and Farmers Advisory Committee for monitoring the activities and assessing the results and processes for continuous improvement.
5. Based on the “Strengths, Weaknesses, Opportunities & Challenges” and considering resources available, on-going schemes and projects etc., the Block Technology Team (BTT) comprising extension functionaries of various development departments and the Farmers Advisory Committee members can jointly facilitate the establishment of **Model**

**Farms and Model Villages** adopting Integrated Farming Systems (IFS) approach blending economically viable and profitable combination of agriculture & allied enterprises in each block. Such model farms and model villages will serve as a training ground for other farmers to learn and replicate. Making such ventures mandatory would help infuse professionalism in the public extension system besides ensuring accountability of the extension system.

6. **Group Farming or Collecting Farming Approach** needs to be encouraged by channelizing the benefits and subsidies of the various development departments so as to facilitate the farmers to produce agricultural commodities in larger quantities with better quality so that collective marketing and higher income would be possible. The costs and income can be shared proportionate to the area, production and labour contribution by the individual farmers.
7. The Registered Farmer's Societies can be chosen to establish **Agricultural Processing Complexes (APC)** housing the agricultural equipments and machineries required by the farming community of the block concerned. The members of the societies willing to provide infrastructure facilities for the APC will have to be trained on the repair and maintenance of the equipments and machineries by the Department of Agricultural Engineering and TNAU Scientists. The Registered Societies can also rent the equipments and machineries to other farmers and get income. Government of India has funding provision for the establishment of such APCs. Further, this approach would immensely help the farming community **to address the problem of labour scarcity effectively.**

**Conclusion :**

Based on the field analysis and also earlier experiences of studying the extension systems, a new operational approach that can be adopted within the framework of on-going ATMA model has been developed under the title "Participatory & Synergetic Extension Model (PASEM) for Sustainable and Profitable Farming" for systematizing the visioning, planning, execution, implementation and evaluation processes in field level. Orienting the extension functionaries and farmers on the proposed operational methodology and approach may be done by State Agricultural Management and Extension Training Institute (SAMETI), Kudumianmalai. The step – by – step procedure of the operational methodology & approach are given in Annexure – II (English) & Annexure – III (Tamil).