

**PROCEEDINGS OF THE  
NATIONAL SEMINAR ON AGRICULTURE EXTENSION  
(FEBRUARY 27-28 2009)**

**SYMPOSIUM HALL, NASC COMPLEX, PUSA, NEW DELHI**

**1. Programme Schedule**

***Day 1: Friday, 27th February, 2009***

<b>REGISTRATION</b>	09.00 AM – 10.00 AM
<b>INAUGURAL SESSION</b>	10.00 AM – 10.30 AM
Arrival of Chief Guest Invocation and Lighting of the Ceremonial Lamp	10.00 AM – 10.05 AM
Welcome By Shri N.K. Das, Additional Secretary (Agri.)	10.05 AM – 10.08 AM
Introductory Remarks By Shri T. Nanda Kumar, Secretary (A&C)	10.08 AM – 10.18 AM
Release of Publications	10.18 AM – 10.20 AM
Inaugural Address By Shri Sharad Pawar, Union Minister for Agriculture	10.20 AM – 10.30 AM

***TEA 10.30 – 10.45 AM***

**TECHNICAL SESSION – I**

10.45 AM–12.15 PM

**KNOWLEDGE MANAGEMENT FOR AGRICULTURE  
EXTENSION**

**Panel:**

1. Dr. R.Dwarakinath, Former VC, University of Agriculture Sciences Bangalore - Chairman
2. Prof. A.G. Sawant, Former VC, and Former Member, Agriculture Scientists Recruitment Board
3. Dr. R.M. Prasad, Sr. Consultant, National Institute of Rural Development, Hyderabad
4. Dr. C. Prasad, Former DDG (Extension), ICAR, New Delhi
5. Shri L.Narayana Reddy, Farmer, Karnataka

**Key Presentations:**

1. Prof. Anil Gupta, Centre for Management in Agriculture, Indian Institute of Management, Ahmedabad
2. Dr. Gopi Ghosh, Asst. FAO representative, FAO India, New Delhi

**TECHNICAL SESSION – II**

**12.15 PM – 1.45 PM**

**PUBLIC EXTENSION SYSTEM WITH FOCUS ON  
CONVERGENCE**

**Panel:**

1. Shri N.K.Das, Additional Secretary, DAC – Chairman
2. Dr.Sanjeev Chopra, Secretary (Agriculture), Govt. of West Bengal
3. Dr.P.N.Mathur, Former DDG Extn., ICAR, New Delhi
4. Dr.D.S.Gangwar, Joint Secretary, Ministry of Rural Development, New Delhi
5. Dr.Venkat Subramanian, Zonal Coordinator, Zone III, ICAR, Shillong
6. Shri L.D. Jha, Farmer, Bihar

**Key Presentations:**

1. Shri P.N.Roy Chowdhury, Principal Secretary (Agriculture), Gujarat
2. Dr. K.A. Ponnusamy, Prof. Agricultural Extension, Tamil Nadu Agriculture University, Coimbatore

**LUNCH 1.45 PM – 2.30 PM**

**TECHNICAL SESSION – III**

**2.30 PM – 4.00 PM**

**ICT AND MASS MEDIA-ROLE IN AGRICULTURE EXTENSION**

**Panel:**

1. Dr. R.K.Samanta, VC, Bidhan Chandra Krishi Vishvavidyalaya, West Bengal- Chairman
2. Shri Sanjeev Gupta, Joint Secretary (IT), DAC, New Delhi
3. Shri L.P.Mandarwal, DDG, Doordarshan, New Delhi
4. Shri Ruchir Tiwari, Head, Agri Inputs, ITC-Agribusiness Division, Hyderabad

**Key Presentations:**

1. Dr. V. Ranga Rao, Chief Operating Officer, Agriculture Programmes, ETV
2. Shri J.Srinath, Coordinator, Content, M.S.Swaminathan Research Foundation, Chennai
3. Shri Nishikant Bholerao, Editor, Agro-I Sakal Papers Ltd.

**TEA 4.00 PM – 04.15 PM**

**TECHNICAL SESSION – IV**

**4.15 PM – 5.45 PM**

**PRIVATE SECTOR INITIATIVES INCLUDING PUBLIC-PRIVATE PARTNERSHIP (PPP)IN EXTENSION**

**Panel:**

1. Smt. Radha Singh, Adviser, FICCI, New Delhi - Chairperson
2. Shri R.G. Agarwal, Chairman, Dhanuka Agritech Limited, New Delhi
3. Shri S.P.Singh, Head, Shree Maa Guru Gramodyog Sansthan,Varanasi,Uttar Pradesh

**Key Presentations:**

1. Shri Vivek Bharati, Member, Agriculture Committee, FICCI, New Delhi
2. Dr. Marco Ferroni, Executive Director, Syngenta Foundation for Sustainable Agriculture, Switzerland

## **Day 2: Saturday, 28<sup>th</sup> February, 2009**

*TECHNICAL SESSION – V*

*9.30 AM–11.00 AM*

### **FARMER LED AND MARKET LED EXTENSION SYSTEMS**

#### **Panel:**

1. Prof. Abhijit Sen, Member, Planning Commission, New Delhi – Chairman
2. Shri Parvesh Sharma, Principal Secretary (Agriculture), Madhya Pradesh
3. Smt. Poonam Malkondaiah, Commissioner Agriculture, Andhra Pradesh
4. Dr. K.D.Kokate, Director (Extn.), Mahatama Phule Krishi Vishvavidhalaya, Rahuri, Maharashtra

#### **Key Presentations:**

1. Prof. Abhijit Sen, Member, Planning Commission, New Delhi
2. Shri Popatrao Pawar, Farmer, Hiware Bazaar, Ahmednagar, Maharashtra
3. Smt. Palle Ramadevi, Farm woman, Vill. Etbarpalli, Andhra Pradesh

***TEA 11.00 AM – 11.30 AM***

### ***PLENARY SESSION***

***11.30 AM–1.00***

#### ***P.M.***

- Chairman : Prof. Abhijit Sen, Member Planning Commission, New Delhi
- Members : Shri T. Nanda Kumar, Secretary (A&C), Ministry of Agriculture  
Dr. S.M.Jharwal, Principal Adviser, Agriculture, DAC  
Dr. N.B. Singh, Agriculture Commissioner, DAC  
Shri N.K. Das, Additional Secretary (Agri.), DAC  
Shri Jiji Thomson, Joint Secretary (Extension), DAC

- ❖ Presentation of Recommendations on each Thematic Area – Respective Chairpersons / Co-Chair
- ❖ Summing up of Recommendations & Concluding Remarks - Secretary (A&C)
- ❖ Valedictory Address - Chairman
- ❖ Vote of Thanks - Joint Secretary (Extension)

**Lunch 1.00 P.M. to 2.00 P.M**

2. The inaugural session commenced with invocation of *Vande Matram* and lighting of the traditional lamp by the distinguished members on the dais. Welcoming all the participants, Shri N.K. Das, Additional Secretary, Ministry of Agriculture recalled the evolution of extension services and the gradual rise of pluralism in the extension network whereby along with the public extension agencies private, civil society and informal agencies have started making their presence felt. The important role played by the mass media and ICT were also highlighted. He also hoped that the two day seminar will come up with concrete recommendations for strengthening the extension services in the light of various challenges that are emerging.

2.1 Secretary (A&C) released two publications (i) Souvenir containing technical papers in the area of Extension including the lead papers from Panel members and (ii) a compendium of Agriculture Extension schemes of the Extension Division, Department of Agriculture and Cooperation. Secretary (A&C) highlighted the importance of agriculture in overall economic growth and the role of extension services in enhancing the Agricultural growth. This has underlined the need for multifaceted and complex extension services against the backdrop of myriad challenges of climate change, depletion of natural resources and problems of availability of agricultural labour. With 40% of the farmers still not reached by the extension network even after expansion of ATMAs, KCCs, KVKs and Agri Clinics services, there was a need for expansion of the network alongwith the participation by NGOs, self help groups and the private sector. Media especially the community radio have come to play an important role. Therefore, the purpose of the Seminar is to create a network of the diverse players in

the field to meet specialized requirements of farmers in the shortest possible time.

2.3 Hon'able Agriculture Minister could not attend the inaugural ceremony due to unavoidable circumstances and his inaugural speech was read out by the Dr. S.M. Jharwal, Principal Adviser, Department of Agriculture & Cooperation, Ministry of Agriculture.

2.4 The Inaugural Session concluded with the presentation of mementos to the dignitaries on the dais by Smt. Palle Rama Devi, a successful woman farmer from Andhra Pradesh.

### **3. TECHNICAL SESSION: 1**

#### **'KNOWLEDGE MANAGEMENT FOR AGRICULTURE EXTENSION**

##### **3.1 Panel:**

1. Dr. R.Dwarakinath, Former VC, University of Agriculture Sciences Bangalore – Chairman
2. Prof. A.G. Sawant, Former VC, and Former Member, Agriculture Scientists Recruitment Board
3. Dr. R.M. Prasad, Sr. Consultant, National Institute of Rural Development, Hyderabad
4. Dr. C. Prasad, Former DDG (Extension), ICAR, New Delhi
5. Shri L.Narayana Reddy, Farmer, Karnataka

### **3.2 Key Presentations:**

1. Prof. Anil Gupta, Centre for Management in Agriculture, Indian Institute of Management, Ahmedabad
2. Dr. Gopi Ghosh, Asst. FAO representative, FAO India, New Delhi

### **3.3 Major Recommendations:**

- Facilitate greater access of technologies to the resource poor farmers.
- Develop Knowledge creating networks and trigger innovations for sustainable agriculture.
- Encourage agro-biodiversity by networking farmers.
- Develop technologies for reduction of drudgery among farm labourers.
- Emphasize on protecting the knowledge rights of the people
- Cost sharing for extension services should not be insisted for resource poor farmers while partial recovery can be attempted from those who are involved in commercial farming
- Extension services should focus on knowledge gaps rather than unduly stressing material inputs.
- To map knowledge of farmers through Village Knowledge Management Systems

- Develop national database on pests and diseases to enable farmers to choose need based technologies.
- Revitalize the extension systems making it inclusive for farm laborers.
- Develop artificial intelligence based expert systems to enable farmers to derive farm specific management strategies.
- Create national fund for validating and value adding farmers innovations for solving technological and resource use problems
- Focus on agro food processing extension.
- Content, communication and collaboration need to be synergized.
- To exploit ICT, extension workers require more training
- Public extension require much more qualified manpower
- Developing a cadre of paraprofessionals
- Extension education program should inculcate technical, managerial, entrepreneurial and personality skills in rural youth and women
- Promote integrated farming among small and marginal farmers.
- Emphasize on market led farming- facilitated by farmer to farmer extension.
- Training institutions should identify agriprenuers and utilize them as trainers of farmers.

- Create awareness among stakeholders about UN sponsored FAO- 'solution exchange'.
- Promote farmers' interface once in a fortnight.
- Setup National Extension Council to integrate ICAR and extension activities of DAC.
- Continuous capacity building of stakeholders for knowledge management by trainers training institutions.
- Strengthen and scale up new institutional mechanism
- Separate extension strategies are to be framed for knowledgeable and resource rich farmers and less knowledgeable and resource poor farmers.
- Provision of adequate quality manpower at different levels to provide quality extension services.
- Capacity building of extension personnel is of utmost importance for bringing professionalism in extension. Suitable measures be initiated for regular training of personnel.
- Farmers managing farm schools must be trained adequately.
- Documentation and publication of successful case studies/models and effective dissemination among farmers and extension personnel.
- Knowledge management, market intelligence and post harvest management need to be integrated with the extension system.

- Agri-preneurship development may be made part of agriculture curriculum in agriculture universities.
- Manpower shortages need to be addressed by utilizing renowned, experienced, and retired experts from NARS (National Agriculture Research and Extension System).
- Extension approach should focus on developing entrepreneurial skills and competencies in the farmers.
- Rural youth need to be trained in farm mechanization for taking up custom hiring services.

#### **4. TECHNICAL SESSION: 1I**

##### **PUBLIC EXTENSION SYSTEM WITH FOCUS ON CONVERGENCE**

##### **4.1 Panel:**

1. Shri N.K.Das, Additional Secretary, DAC – Chairman
2. Dr.Sanjeev Chopra, Secretary (Agriculture), Govt. of West Bengal.
3. Dr.P.N.Mathur, Former DDG Extn., ICAR, New Delhi
4. Dr.D.S.Gangwar, Joint Secretary, Ministry of Rural Development, New Delhi
5. Dr.Venkat Subramanian, Zonal Coordinator, Zone III, ICAR, Shillong
6. Shri L.D. Jha, Farmer, Bihar

## **4.2 Key Presentations:**

1. Dr. Ashok Patel, Director SAMETI & SNO (ATMA), Gujarat
2. Dr. K.A. Ponnusamy, Prof. Agricultural Extension, Tamil Nadu Agriculture University, Coimbatore

## **4.3 Major Recommendations:**

- Involve progressive farmer from each panchayat as a link farmer to promote farmer to farmer extension.
- State governments should fill up vacancies of extension personnel in agriculture and allied departments within a reasonable time frame to tackle the problem of manpower shortage.
- All centrally sponsored schemes may be routed through ATMA.
- Comprehensive Agricultural Development Plan with SREP as a guiding tool should be developed for agricultural development of district.
- ATMA should be strengthened with dedicated manpower particularly a Project Director and a Deputy Project Director with a minimum tenure of at least 3 years
- Public extension should suitably utilize services of the retired extension functionaries & farm scientists in extension activities.
- State Government should be impressed not to assign non agricultural tasks to the extension personnel except in natural

- calamities, to make him more accountable for effective delivery of his services
- A national level Task Force to draw guidelines for convergence in planning and implementation under RKVY, NHM, FSM with NREGS and SGSY.
  - Chairman, Project Director and district level officers of line departments should be adequately sensitised in operationalising ATMA and SREP etc.
  - Capacity building of extension personnel should preferably precede launching of any new agricultural development programme.
  - For effective convergence, there should be paradigm shift from planning for schemes to planning for activities.
  - The linkages between Research and Extension should be formalized through institutional and functional interface at various levels.
  - The role of KVKs in ATMA is only peripheral. KVKs should participate in holistic way with ATMA.
  - Zonal project directorate of ICAR can be utilized for operationalizing the convergence of KVK activities with line departments at zonal level.

- Multi agency extension system involving public extension like ATMA, PRI's, civil society organizations(CSO'S/NGO'S) and community based organizations(CBO's/SHG's) be promoted with district as an operational area.
- The public extension system should facilitate adequate linkages with all the stakeholders and should involve NGO's and private sectors in the planning and execution of extension activities, mobilization of commodity interest groups and researchable issues to overcome the existing problems of man power shortages in the departments.
- Commodity based farmer interest groups need to be play an important role for technology management, input management and market support.
- Impact analysis of public extension system should be mainly based on objective results and outcome of the activities and also encompass equitable development
- To monitor effectively the operationalisation of Research – Extension linkages, a separate Monitoring & Evaluation Cell (Research-Extension-Farmer and Market Coordination Committee) to be operationalised with the Agricultural Production Commissioner (APC) in each state. Similarly, at district level ATMA should ensure R-E-F-M linkages.

## **5. TECHNICAL SESSION III**

### **ICT AND MASS MEDIA-ROLE IN AGRICULTURE EXTENSION**

#### **5.1 Panel:**

1. Dr. R.K.Samanta, VC, Bidhan Chandra Krishi Vishvavidyalaya, West Bengal- Chairman
2. Shri Sanjeev Gupta, Joint Secretary (IT), DAC, New Delhi
3. Shri L.P.Mandarwal, DDG, Doordarshan, New Delhi
4. Shri Ruchir Tiwari, Head, Agri Inputs, ITC-Agribusiness Division, Hyderabad

#### **5.2 Key Presentations:**

1. Dr. V. Ranga Rao, Chief Operating Officer, Agriculture Programmes, ETV
2. Shri J.Srinath, Coordinator, Content, M.S.Swaminathan Research Foundation, Chennai
3. Shri Nishikant Bholerao, Editor, Agro-I Sakal Papers Ltd.

#### **5.3 Major Recommendations:**

- Prepare sound national and state level policies with reasonable tax & tariff reduction on information and communication technologies in order to utilize the benefits of technological developments in ICT sector

- ICT should be promoted for knowledge and information about technology; innovative farm technologies; capacity building of farmers to adapt technology, input/credit; post harvest technologies and marketing services.
- Government agencies should play a bigger role in both networking and content development at the district, state and national level
- Connectivity, Content and Sustainability should receive concurrent attention
- The information provided through ICT should be demand driven and should be relevant to the needs of farming community
- Community Radio station for agriculture and rural development should be promoted in Public – Private Partnership model.
- Community radio, Call centers and Mass media need to be harnessed for wider dissemination of best practices.
- Village Knowledge Centers, and online databases in local languages should be established. Liberal access should be ensured to vast pool of farm *knowledge* to all players in public and private domain.
- Farm journalism should be promoted by suitable arrangement for documenting success stories and best practices.



## **6. TECHNICAL SESSION IV**

### **PRIVATE SECTOR INITIATIVES INCLUDING PUBLIC-PRIVATE PARTNERSHIP (PPP) IN EXTENSION**

#### **6.1 Panel:**

1. Smt. Radha Singh, Adviser, FICCI, New Delhi -  
Chairperson
2. Shri R.G. Agarwal, Chairman, Dhanuka Agritech Limited,  
New Delhi
3. Shri S.P.Singh, Head, Shree Maa Guru Gramodyog  
Sansthan, Varanasi, Uttar Pradesh

#### **6.2 Key Presentations:**

1. Shri Vivek Bharati, Member, Agriculture Committee, FICCI,  
New Delhi
2. Dr. Marco Ferroni, Executive Director, Syngenta Foundation for  
Sustainable Agriculture, Switzerland

#### **6.3 Major Recommendations:**

- Extension service provided to farmers under PPP should encompass end to end handholding and be based on definite quantifiable parameters for monitoring
- Quantifiable parameter need to be defined for all stages in the PPP projects- right from selection of service provider to evaluation stage for successful implementation of PPP projects.

- Convert Directorates of extension (Centre and State level) as Special Purpose Vehicles to achieve specific goals by providing direct incentives.
- All the extension agencies/organizations working at district level have to be integrated under the proposed Special Purpose Vehicle (SPV) and the funding for these organizations should be routed through this SPV.
- Incentives should be granted to service provider based on third party evaluation.
- Continuous handholding is essential for success of agri-clinic and agri business centers. Consider enhancement of support for financial provision for handholding for ensuring successful establishment of agriclinics.
- Fringe benefit tax may be waived for private extension service providers promoting extension services under PPP framework
- Private extension service providers shall be selected based on objective criteria reflecting merit and competency.
- Policy framework should enable greater degree of private participation on PPP mode with suitable flexibility and incentivization

- There is no universal model for PPP in agri extension; it varies from location to location and project to project PPP policy should be flexible.
- As the private sector is actively engaged in agri extension and likely to operate specific areas/crops in its inherent business interests, a new framework for PPP should be developed that de-linking the private sector inherent business interests by incentivizing them to providing "Pure Extension Services'.
- Earmarking of funds for extension through private or PPP mode may be prescribed, mandated under various schemes having extension component.
- Extension services under PPP would foster national capability and also have a catalytic impact on government institutions for better delivery and needs a greater emphasis in policy, fund allocation and implementation.
- Incentivise the private sector for undertaking extension activities through appropriate fiscal/tax incentives
- State governments may take on board the reputed cooperatives/NGOs/Private sector/agripreneurs for leveraging their potential for extension on PPP platform.

- Well defined MOU format have to be developed to a win-win situation for public, private partners and farmers in PPP in which resources and rewards are equally shared between the partners.
- Any extension intervention by the private sector should be in a project mode with quantifiable results and ensuring accountability aiming at profit maximization for farmers. Such private initiatives may be supported by government schemes, fiscal incentives and tax benefits to the extent of 150% of investment as deduction in expenditure. It has to be ensured that such intervention should result in bridging knowledge gaps, enhancing yields, protecting yield gains, minimizing Post Harvest losses, augmenting value-addition, increasing income and promoting eco-technologies routed in the principles of ecology, economics, equity and employment. Project based funding with clearly defined outlay-outcome matrix on the lines of log frame option has to be promoted under Public Private Partnership for effective delivery of extension services.
- Project allocation and funding for NGOs/Private Sector/Cooperatives should be based on competitive bidding.

- Input dealers could contribute to extension due to their extensive reach. To gainfully utilize their services, capacity building of input dealers in crop technology and management practices is essential on the lines of DAESI diploma of MANAGE. To encourage them the course fee for their capacity building should be subsidized.

## **7. TECHNICAL SESSION V**

### **FARMER LED AND MARKET LED EXTENSION SYSTEMS**

#### **7.1 Panel:**

1. Prof. Abhijit Sen, Member, Planning Commission, New Delhi – Chairman
2. Shri Parvesh Sharma, Principal Secretary (Agriculture), Madhya Pradesh
3. Smt. Poonam Malkondaiah, Commissioner Agriculture, Andhra Pradesh
4. Dr. K.D.Kokate, Director (Extn.), Mahatama Phule Krishi Vishvavidhalaya, Rahuri, Maharashtra

#### **7.2 Key Presentations:**

1. Shri Popatrao Pawar, Farmer, Hiware Bazaar, Ahmednagar, Maharashtra
2. Smt. Palle Ramadevi, Farm woman, Vill. Etbarpalli, Andhra Pradesh.

### **7.3 Major Recommendations:**

- Extension system should be supported through establishing model farms, model farmers, farming system models and model villages as hubs for extension activities.
- Extension service should seize the opportunities to work with people's initiatives
- Farmers managing the farm schools should be trained and re-trained to keep them abreast of latest in technology. They may be offered some incentives to recognize their services in extension
- Special emphasis should be on women farmers so that they are not left out of the extension network
- Content of the farm schools must be monitored so that commercial considerations do not creep into the working of the farm school
- The farmer led extension should be recognized as complimentary and supplementary to other channels of the extension
- Farmers interest groups (FIGs) particularly around commodities be promoted to aid in extension, input management and marketing support

- Extension focus should be re-oriented from not only production but also to agro-industrial and processing based extension
- Farm Schools and Farmer Field Schools should be adequately supported by technical backstopping of SAUs and KVKs

**8.** The Plenary Session of the Seminar was chaired by Prof. Abhijit Sen, Member Planning Commission and Presided over by Secy. (A&C). At the onset, Secy. (A&C) appreciated the overwhelming participation of all sections viz. Farmers, Extension Agencies of public and private sector, corporate, SAUs, ICAR Institutes, State Departments of Agriculture etc. in the seminar. He also complimented the farmers for having shared their experiences and urged to upscale these experiences. Summing up the major recommendations, Secy. (A&C) said that the essence of the seminar lies in:

1. Future extension taking care of all aspects of agriculture and allied sector activities
2. Promoting ICT application in agriculture with emphasis and focus on content, style and timeliness of the extension message.
3. Focusing on improving the extension efficiency and networking among extension / research agencies.

**8.1** Prof. Abhijit Sen, Member, Planning Commission of India in his concluding remarks, highlighted the need for:

1. bringing Extension under single umbrella;
2. Strengthening Convergence mechanisms under ATMA (with KVKs and other Agencies) Convergence at district level to be attempted on the lines of RKVY
3. Identifying the role of Panchayat Raj Institutions (PRIs) vis-à-vis the role of line Departments which may have to be streamlined.
4. Making future extension 'knowledge driven' rather than remaining 'input driven'. Farmers to be enabled to make informed decisions/choices. Agriculture subsidy which currently covers agriculture inputs may be partly diverted to enable farmers to buy knowledge.
5. Creating market demand for extension

**8.2** The Joint Secretary (Extension) proposed the formal Vote of Thanks.