



e - Bulletin

(October - December, 2016)

Department of Agriculture, Cooperation and Farmers Welfare
Ministry of Agriculture & Farmers Welfare, Govt. of India

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36th India International Trade Fair (IITF) 2016

Inauguration of Agriculture Pavilion by Hon'ble Union Minister of Agriculture

36th IITF 2016 was organized by MOA&FW at Pragati Maidan, New Delhi from 14-27th November, 2016. The theme of IITF 2016 was '**Digital India**' and DAC&FW was 'Digital Agriculture'. Sh. Radha Mohan Singh Hon'ble Union Minister of Agriculture visited agriculture pavilion on 15th November, 2016. Hon'ble Minister visited the theme area in which the details about flagship programmes such as Pradhan Mantri Fasal Bima Yojana (PMFBY), Pradhan Mantri Krishi Sinchai Yojana (PMKSY), National Agriculture Market (e-NAM), Paramparagat Krishi Vikas Yojana (PKVY), Drought Management, Blue Revolution, Rashtriya Gokul Mission, Kisan Call Centre, ICT and National Horticulture Mission were displayed. Sh. Radha Mohan Singh also appreciated the concept of Organic Village Model displayed in the theme area. He took interest in agriculture mechanization and technologies developed by ICAR and different divisions of DAC&FW.

While addressing the media representatives the Hon'ble minister discussed the role of farmers in the economy of the country and also schemes for animal husbandry, dairy and fisheries initiated by the government.



Per Drop- More Crop

Secretary (AC&FW) visited IITF



Shri. S. K. Pattanayak, Secretary, (AC&FW), Gol visited the Agriculture Pavilion and appreciated digital display of agricultural activities i.e. KCC, Mobile apps, Soil Health Card Scheme, Paramparagat Krishi Vikas Yojana, Pradhan Mantri Fasal Bima Yojana, Pradhan Mantri Krishi Sinchai Yojana, National Agriculture Market (e-NAM), Blue Revolution and National Gokul Mission. While



discussing with the officials of MOA & FW he said that it is a high time to promote Organic Farming which will not only give better quality organic produce but also add to the income of farmers.

Main attractions of Indian Agriculture in IITF 2016

ICAR Technologies

Indian Council of Agricultural Research (ICAR) through its Institutes displayed innovative technologies developed by them. ICAR showcased its schemes/programmes on post harvest management, livestock, dairy, fishery, poultry development and marketing aspects for increasing the income of farmers.

Machinery Show



Agri-entrepreneurs promoted under various schemes of MOA&FW displayed their products & services. Private companies & manufacturers of farm machineries & equipments also exhibited their new machines/tools like: Wheat Harvester cum Binder, Weeder, Rice Planter, Zero Tillage, Fruit Plucker, Tree Pruner, Sugarcane Harvester, Vegetable Planter and Multi Seeder for the benefit of farmers.

Skit shows

The stage artists disseminated information on ICT initiatives in Agriculture Extension Reforms, Crop Insurance, National Agriculture Market (NAM) and Vertical Agriculture in Urban Areas through skit shows. The skit on flagship programmes of DAC&FW for awareness of farmers was also liked by the Union Minister of Agriculture and Secretary (AC&FW).



Kisan Call Centre: For the first time KCC centre was setup in the IITF and queries of the farmers were replied by experts, on the spot.

Exposure visit of farmers in IITF



Farmers from the adjoining States of Delhi, Punjab, Haryana, Uttar Pradesh, Uttarakhand and Jharkhand visited the pavilion in large numbers and benefitted from the latest technologies displayed on agriculture & allied sector.



Technologies Displayed by Divisions of DAC&FW in IITF 2016

National Centre of Organic Farming (NCOF), Ghaziabad

National Centre of Organic Farming (NCOF), Ghaziabad demonstrated waste decomposer which was being sold at subsidised rate. The process of mass multiplication, different methods of foliar spray, drip irrigation, in-situ composting of crop residue and seed treatment by waste decomposer were explained to the farmers and visitors.



National Fisheries Development Board (NFDB), Hyderabad

National Fisheries Development Board (NFDB), Hyderabad demonstrated the blue revolution guidelines, Matsya Bhart: a quarterly magazine, guidelines for importing Asian Seabass/Barramundi seed & fingerling, farming of Tilapia in India, establishment & operation of SPF shrimp brood stock multiplication centres, guide lines for import of ornamental fish and DVDs on fisheries in India. Information brochures on Blue Revolution were also distributed to the farmers.



National Horticulture Board (NHB), Gurugram



National Horticulture Board (NHB) provided information on development of commercial horticulture through production & post harvest management. Information on projects related to commercial horticulture development in protected cover, integrated post harvest management, capital investment subsidy schemes for construction/extension/modernization of cold storage, storage for horticulture products and technology development and transfer for promotion of horticulture was also given to the farmers/visitors.

National Dairy Development Board (NDDB), Anand

National Dairy Development Board (NDDB) showcased activities carried out through the state dairy federations and district milk unions for the economic and social development of dairy farmers. The focused topics for delivering the information were village based milk procurement system, production of high genetic merit bulls, ration balancing programme, clean milk production and animal health.

Department of Animal Husbandry (Government of Punjab)

Booklets on livestock keeping, brucellosis, minerals, rabies, different bull breeds and quality semen for breeding purposes were also displayed and distributed. The main focus was to educate farmers about improved breeding practices by using high quality semen, to enhance milk production in the country.

Directorate of Marketing & Inspection (DMI), Nagpur

Farmer oriented activities under Marketing Research and Information Network (MRIN) sub- scheme were displayed through scroll and posters. Posters on Agmarknet showing the availability of daily arrival, price of agricultural produce and Agri-market mobile app displayed were the centre of attraction for farmers. Published material on Agmark (Quality Control) was also distributed.

Directorate of Arecanut and Spices Development (DASD), Kerala

Live samples of spices grown, improved varieties, state-wise details of spices grown in the country, improved technologies of spices production and turmeric post harvest technologies were also displayed. Audio-visuals on latest production technologies, certification of nursery were played in the LED screens. The package of practices of spices along with latest publications was distributed to the farmers.



Directorate of Plant Protection, Quarantine and Storage (DPPQS), Faridabad



The activities of Integrated Pest Management (IPM) were displayed through posters, backdrop and panels. Videos on IPM and short films on natural enemies were played. Live specimens of Insect Pests and natural enemies, weed control by bio-agents, method of preparation of bio-pesticides were displayed and disseminated to the farmers/visitors.

Directorate of Cashewnut & Cocoa Development (DCCD)

The samples of cashew and cocoa gristle, cashew kernels, cocoa pods, beans, powder, butter, cashew apple bi-products and cocoa bi-products were displayed in the stall. Information on cashew & cocoa cultivation and schemes under MIDH through DCCD was delivered to the farmers/visitors.

CCS National Institute of Animal Health (NIAH), Baghpat

Literature on prevention for treatment of livestock diseases such as Foot & Mouth Disease, Brucellosis, Haemorrhagic septicemia, Peste Des Petits (PDP), John's disease, Ranikhet disease and Avian Influenza were distributed to farmers/visitors.

Department of Animal Husbandry, Government of Sikkim

Sikkim became the first Organic State of India. The Animal Husbandry Department, Government of Sikkim showcased the exhibits like woolen product prepared from the wool of yak, rabbit and sheep.

Indian Council of Agricultural Research (ICAR), IARI, Pusa, New Delhi

The seed of varieties of cereals, pulses, oilseeds, vegetables and flowers developed by ICAR were displayed in the stall. A list of demonstrated crop varieties is enlisted as under:



▪ Latest high yielding varieties of **Paddy (Rice)** P-11221, P01509, PRH, Pusa, PS-2511, P.B. 1, P.B.140, P.B. 1460; **Wheat**: HD-3086, HD-2967, HD-2733, HD-2851, WQ- S44, HD-3059, HD-2932, HD 2985, HD-2824, HD-3118; **Mustard**: Pusa Vijay, P.M. 30, P.M. 26, P.M. 27, P.M. 28; **Moong (Green Gram)**: Pusa Vishal; **Arhar (Pigeon Pea)**: Pusa 2001, Pusa 2002, Pusa 991, Pusa 92; **Pea**: Pusa Panna DDR 27 **Lentil**: Pusa Shivalik (L-4076, Pusa Marur 5 (L-4594), Pusa 4147 **Bengal Gram**: Pusa S47, BGD 72, Pusa 362, B.G. 1053, Pusa Chantlac) Pusa Hara 112; **Maize**: Pusa Composite 3, PEHM 3; **Pearl Millet (Bajra)**: Pusa 605 were displayed.

Besides this the post harvest products, value added flower products, live sample of flowers, Azolla, liquid biofertilizers, fruits and vegetables were also displayed in the pavilion.



Regional Fodder Station (RFS), Hisar, Haryana

The publicity material such as pamphlets and leaflets on cultivation method and package of practices for fodder crops i.e. sorghum, maize, bajra, oat, Chinese cabbage, lucerne, guar, berseem, etc were displayed. The seed of different fodder crops viz. Oat HJ-8, Oat OS-6, Bajra, Maize, Berseem, Chinese cabbage were displayed. Information on growing and benefits of Azolla for milk production was given to the farmers/visitors.



Training of Trainers (ToT) programmes on Skill Development

Skill Development has become the need of the hour to leverage the demographic dividend in India. In this regard the Ministry of Agriculture & Farmers Welfare has conducted 2 days Training of Trainers (ToT) programmes at regional level at ICAR-Agricultural Technology Application Research Institutes (ATARI) at 6 locations i.e. Ludhiana, Bengaluru, Jodhpur, Guwahati, Raipur and Budni jointly organized by Extension Division of ICAR and Agriculture Skill Council of India (ASCI).

The participants included Programme Coordinators, Subject Matter Specialists, Programme Assistants from 100 Krishi Vigyan Kendras (KVKs) and 8 National Training Institutes of DAC&FW who were trained as master trainers for conducting training on skill development.



Promotion of Digital Payments by DAC&FW:

Training Programmes were organized in Krishi Bhavan, New Delhi in which 600 employees were trained for cashless transactions. Two awareness programmes were organized in Motihari, Bihar in which Shri Radha Mohan Singh Hon'ble Union Minister of Agriculture was the Chief Guest. A total of 167 awareness programmes have been organized in Agricultural Mandis to promote cashless transactions and 18 encouragement-cum-training programmes have been organized by NAFED.



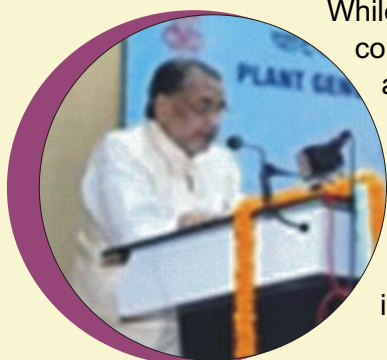
Swachhta Pakhwada Celebration:

271 Agricultural Mandis were covered in Swachhta Drive during the Swachhata Pakhwada. It has been decided to make provision of Rs. 10 lakhs for each mandi to set up waste management plants under e-NAM scheme. It was also decided to formulate a Solid & Liquid waste management in agriculture as a sub-scheme of Rashtriya Krishi Vikas Yojana (RKVY) for which 1% of the allocation of RKVY be made under this sub-scheme for release to the states. A video conference was held on 27.10.2016 with representatives of States/ UTs and they have been briefed about the “Swachhta Pakhwada Activities”. They have also been requested to make adequate provisions in their existing Schemes to prepare Compost from farm wastes.



Plant Genome Saviour Awards to the Conservers of Plant Diversity

Shri Radha Mohan Singh, Hon'ble Minister of Agriculture and Farmers Welfare, Govt. of India conferred the Plant Genome Saviour Awards/ Rewards / Recognitions to the farmers/ farming communities on 21st December 2016 in an award giving ceremony organized by Protection of Plant Varieties and Farmers Rights Authority, New Delhi. Dr. R.R. Hanchinal, Chairperson, PPV & FRA in his welcome address informed that the Authority has received about 12,771 applications for registration, out of which 6,827 belongs to farmers. The Authority has issued about 2,441 IPR certificates, out of which 892 have been issued to Farmers.



While addressing, Hon'ble Agriculture Minister informed that farmers and farming communities who have made important contribution towards advancement of Indian agriculture is praiseworthy, however, their contribution were not adequately recognized earlier. He congratulated all the awardees. He further informed that recently the Government has given approval for opening of three new branch offices of the Authority at Palampur (HP), for Northern Hill Zone, another at Pune, for Central and Western Zone and third at Shimoga (Karnataka) for Southern Zones so that the Authority shall have a better reach to the farmers and other stakeholders for implementation of various provisions of the PPV&FRA Act, 2001.

Farmers who have been conferred the Plant Genome Savior Community Awards (PGSC) Awards/Rewards and Recognitions are as follows:

- A. **Plant Genome Savior Community Awards 2013-14:** The award consists a ten lakh rupees cash prize, citation, certificate and memento.

The Awards were conferred to the following five groups/associations;

- 1) Farming Community of Village Sagam and Danwathpora, Dist-Anantnag, J & K,
- 2) Chengalikodan Banana Growers Association, Erumapetty, Thrissur, Kerala,
- 3) Sagar Krishnanagar Swami Vivekananda Youth Cultural Society, South 24 Parganas, West Bengal,
- 4) Khola / Canacona Chilli Cultivators Groups, Khola, Shirothi, South Goa,
- 5) Karen Welfare Association, Webi, Mayabunder, Middle Andaman, A& N Islands.



- B. **Plant Genome Savior Farmer Rewards 2014:** The reward carries a cash reward of Rs.1.5 lakh in cash, citation, certificate and memento.

The rewards were conferred to the:

Shri Ram Prakash Kesharwani (Chhattisgarh), Shri Shaji N. M (Kerala) and Shri Surendra Kumar (Uttar Pradesh).

- C. **Plant Genome Savior Farmer Recognition 2014:** The recognition carries Rs.1 Lakh in cash, citation, certificate and memento.

The Recognitions were conferred to the:

Shri N. A. Chandran (Kerala), Shri Aravind K (Kerala), Shri Rechanna M (Karnataka), Shri Shankarguru M.K. (Karnataka), Shri Prabhakar M. Keny (South Goa), Shri Budhram Kashyap, Shri Nitai Mistri, Shri Rohit Kumar Sahoo, Shri Bosaram Atami, Shri Manjeet Singh Saluja and Shri Kamal Kishore Kashyap from Chhattisgarh.



Achievements of Department of Agriculture, Cooperation & Farmers Welfare (DAC & FW) during last 30 months (June 2014 to December 2016)

- Rs. 711.46 crore released to the states in 2014-16 under Soil Health Management Scheme.
- Rs. 216.37 crore released for Soil Health Card (SHC) during 2014-16 (upto Dec 2016) and 460 Soil Testing Laboratories Sanctioned.
- Under Paramparagat Krishi Vikas Yojana (PKVY), against the Plan target of 10000 clusters, 9186 clusters have been approved up to December 2016.
- 250 mandis of 10 states have been integrated with National Agriculture Market (e-NAM) and in principle approval is given to integrate 399 mandis in 14 states with e-NAM. To facilitate assaying of commodities for trading on e-NAM, common tradable parameters have been developed for 69 commodities.
- 327 Farmer Producer Organization (FPOs) have been registered by Small Farmer Agri-business Consortium (SFAC) up to December 2016.
- A total of 913 lakh farmers (loanee 736 lakh and non loanee 177 lakh) have been covered under Crop Insurance Scheme during Kharif Season of 2014- 2016.
- During 2016-17, Rs. 2340 crore allocated to Pradhan Mantri Krishi Sinchayee Yojana (PMKSY) and 8 lakh hectare areas has been targeted under micro irrigation. Rs. 1512.65 crore has been released to the states up to Dec 2016. Total area brought under precision irrigation systems i.e. Drip and Sprinkler irrigation is 2.36 lakh ha and 18750 water harvesting structure created having 27835 ha potential for protective irrigation.
- Under Horticulture Development, NHB assisted 144 cold storage/CA storage projects with a financial assistance of Rs 217.79 Crores, 7.14 lakh MT additional cold storage capacity created, Funded 547 projects/events for transfer of technology and accredited 1206 nurseries for production of superior quality planting material.
- DAC&FW assigned NHB the task of setting up of Saffron Park at Pampore Pulwama (J&K) at a total cost of Rs. 24.45 crores. Rs. 500 crore special package announced on 07.11.2015 towards restoration of damaged horticulture areas and development of horticulture in J&K.





- Coconut Development Board established 18 Nucleus Coconut Seed Gardens, 86 small Coconut nurseries, 361 organic manure units, 7,356 Coconut Producer Societies, 646 Coconut Producer Federations and 57 Coconut Producer companies.

- A total of 11862 farmers/beekeepers have been trained in scientific beekeeping by National Bee Board (NBB) during the period 2016-17 (Upto November, 2016). NBB has designed technical

standards for food grade plastic containers for storing honey. 10 Integrated Beekeeping Development Centres (IBDC), one in each state: Haryana, (Dept. of Horticulture, Kurukshetra), New Delhi (IARI, Pusa), Bihar (KVK, Piprakothi), Punjab (PAU, Ludhiana), MP (KVK, Morena), UP (IIVR, Varanasi), Manipur (CAU, Imphal), Uttarakhand (KVK, Dehradun), J&K (SKUAST, Srinagar) and Tamil Nadu (TNAU, Coimbatore) have been setup/ approved by NBB During the years 2015-16 & 2016-17 (upto Dec 2016).

- A scheme on “Sub-Mission on Agroforestry” is launched with aim “HAR MEDH PAR PED” during 2016-17. Budget provision is made for central share of Rs. 75 crore for the year 2016-17. Relaxation of transit regulations in pre-requisite for assistance under Sub-Mission on Agroforestry (SMAF). So far eight states have relaxed this regulation.

- Number of states under National Food Security Mission (NFSM) has been increased from 19 to 29 up to December 2016. Number of District under NFSM has been increased from 482 to 638 which is almost 32.36% increase. Presently 7 crops (Rice, Wheat, Pulses, Coarse Cereals, Sugarcane, Jute and Cotton) are being covered under NFSM.



- Out of Rs. 1700 crore under National Food Security Mission (NFSM), Rs. 1100 crore was allotted to pulses during 2016-17 which is more than 60% of total allocation.
- A special scheme under RKVY “Targeting Rice Fallow Areas in Eastern India for Pulses” has been initiated from Rabi 2016 bringing rice fallow areas under cultivation.
- 31000 clusters front line demonstrations through 574 KVKs were conducted during 2016-17.



- 150 seed hubs sanctioned for SAUs/KVKs/ICAR institutes. 15% allocation of pulses component of NFSM is earmarked for production of quality seed from Kharif 2016.
- Under National Mission on Oilseed and Oil Palm (NMOOP) seed subsidy for certified seed distribution of oilseed was increased by more than 100% (from Rs. 1200/- to Rs. 2500/- per qtl. and from Rs. 2500/- to Rs. 5000/- per qtl. of hybrids and sesame).

- Subsidy on water carrying pipes increased from Rs. 25/- per meter to Rs. 50/- per meter for HDPE pipes, Rs. 35/- per meter for PVC pipes and inclusion of HDPE laminates woven lay flat tubes with subsidy of Rs. 20/- meter from Kharif 2016.
- More than 16.0 lakh seed minikits of various oilseed crops were distributed during 2016-17.
- Ban on Indian Groundnut has been lifted by Vietnam. Process of pesticides registration has got accelerated with the approval of 55,248 registration certificates during 2014-15 to 2016-17. The pesticides registration for export has also got accelerated steeply with the approval of 2880 registration certificate during 2014-15 to 2016-17.
- IPM Package of Practice for 87 important agricultural crop revised and made available online.
- Three (03) New Branch Offices of Protection of Plant Varieties & Farmers Rights Authority (PPV&FRA) have been approved recently at Palampur (H.P.) for states of Northern Hill Zone, another at Pune (Maharashtra) for the Central and Western Zone States and third one at Shimoga (Karnataka) for Southern States.
- The amount of cash reward for “Plant Genome Saviour” Award to farmers, has been enhanced from Rs.1.00 lakh to Rs.1.50 lakh each and the amount of Farmers' Recognition has been enhanced from Nil to Rs. 1.00 lakh each during 2015.
- Norms for assistance for all categories increased by 1.5 times. The threshold for eligibility for assistance due to crop loss lowered to 33% from 50%. The admissibility for assistance raised from 1 ha. to 2 ha. in all cases. The financial assistance paid to the farmers in the event of death increased to Rs. 4 lakh from Rs. 1.5 lakh.
- Under Skill Development in Agriculture 100 KVKs and 8 national training institutes have been accredited by Agriculture Skill Council of India (ASCI) for skill training during 2016-17. Rs. 3.52 crores sanctioned for conducting 216 skill training during 2016-17. 132 Qualification Packs (Qps) developed by ASCI for skill training in agriculture and allied sector.



Success Stories of Farmers

Shri M. Govinda Reddy from Andhra Pradesh

Enhancement of Productivity and Income by Soil Health Card based Recommendations

Shri M. Govinda Reddy hails from Settipalli Village of Chittoor District of Andhra Pradesh. Shri Reddy used to grow paddy with conventional method and applying fertilizers without soil testing in his farm. Recently with an advent of Soil Health Card program, he started applying fertilizers as per the recommendations of Soil Health Card issued to him. Before SHC, Shri Reddy used to add N:P:K in the ratio of 65:49:18 kg per acre but after the SHC, he started applying fertilizers as per recommendations and reduced N:P:K ratio to 52:16:26 kg per acre. He also increased FYM application 40 qtls per acre from 30 qtls per acre before issue of SHC. He applied bio-fertilizers at the rate of 2kg per acre as an additional source of plant nutrients.

By adopting Soil Health Card recommendations, his productivity of paddy increased by 172 kg per acre over previous year and saved to the tune of Rs. 2,900 per acre. Above all, Shri Reddy reduced excess use of Nitrogen and Phosphorus along with micronutrients hence cutting down the expenditure on fertilizers. Balanced fertilizer application helped to improve soil health, increase in the Soil Organic Carbon, maintain the favorable soil pH and water holding capacity of soil along with increased biological activities. Shri Reddy may be contacted at his mobile No. 9963415876.



Start up to Success: M. Saritha Reddy, A lady Agripreneur in Sustainable Organic Farming



M. Saritha Reddy, an agricultural graduate belongs to a farming family from Hyderabad, (Telangana). Her financial existence started as an employee of Biotech Agri Industry. Being experience in Agri Biotech Industry, she wanted to establish her entrepreneur to provide best quality products and extension services to farmers. Sairtha came to know AC&ABC scheme from MANAGE. She completed two month residential training under AC&ABC scheme at Participatory Rural Development Initiatives (PRDIS), Hyderabad. Being a sagacious woman, she started Navaratna Crop Science Private Limited (NCS), a research based Agri Biotech company at Hyderabad in 2011. Innovations of NCS are **Bhoo Shakthi**^{TM2} (Soil Kit for Soil Health

Management), **Bhooratna**^{TM3} (Biostimulants for imparting drought tolerance), **Bhoojeevan**^{TM4} (Plant Probiotics for Biopriming in plants), **EM Power**^{TM5} (Microorganisms for decomposing agricultural waste) and **Biofertilizers** (strains developed through in-house R&D for Nitrogen Fixing Bacteria, PSB and KSB). She also developed Corporate and direct marketing strategies for sales. Now NCS is having its own dealer network of 400 and 20 field staff for field work in the states of Andhra Pradesh, Karnataka, Maharashtra, West Bengal, Chhattisgarh, Himachal Pradesh, Madhya Pradesh, Orissa, Rajasthan, Tamil Nadu and Bihar.

Navaratnaa has bagged up Best Women Industrialist Award from Telangana State Govt. -2016 , . **“Dr. I.V.Subba Rao Ritunestam Puraskaram”**, by Shri.Venkaiah Naidu, Union Minister for Urban Development, Gol 2014, for her best agri-extension work , **National Award** from Ministry of Agriculture & FW, Gol, for her excellence in the field of Horticulture 2014.

Her vision is not only to promote agricultural value chain (food security of the Nation), but also to empower people at the bottom of social pyramid, especially women. Her contact no. is Ph: +91 40 6514 3358 M: +91 90101 11138 and : Email: info.navaratna@gmail.com