

Proceedings of 23rd Scientific Advisory Committee Meeting, KVK, Kalahandi

The 23rd Scientific advisory committee meeting of KVK, Kalahandi was held on 20.01.2023 in the training hall of KVK, Kalahandi under the chairmanship of Dr. A.K.Dash, Nominee of the Honourable Vice Chancellor cum Prof (IFFCO Chair) and Dr. H. K. Sahoo DDE, DEE, OUAT, Bhubaneswar. Dr K.S.Das Principal Scientist, ICAR, ATARI, Kolkata and Dr.T.Gowda, Director, CSWCRI, Koraput joined on virtual mode. The list of other members attended the meeting is attached (Annexure-I).

The meeting started with a warm welcome address by Dr. H.N. Malik, Scientist (Animal Science) KVK, Kalahandi followed by a formal inauguration and lightening of the holy lamp by the dignitaries present in the meeting. Later D, D, E, D, E, E. briefed the purpose and objective of SAC meeting and the Chairman of this august house delivered the introductory remarks.

Agenda-1: Approval of the proceedings of the last SAC meeting.

The Senior Scientist & Head presented the proceedings of the last SAC meeting in the house which was held on 25.02.2022 and also highlighted on the activities undertaken based on the recommendations. The Chairman taking the consent of the members approved the proceedings

Agenda-2: Action taken on proceedings of the last SAC meeting

The Senior Scientist & Head presented the following actions taken on the recommendation of the 22nd SAC meeting

Sl. No.	Recommendation	Action taken
1.	Popularization of low water requiring crops and fodder.	- Four no of F & FW training were conducted covering 100 no. of beneficiaries on cultivation and management of fodder crops (village: Tentulipada, Badchirang, Rengali, Burat). - Low cost silage was demonstrated at village Sikerguda covering 20 nos. farmers. With collaboration with NABARD and an FPO Bamunikhal, one silage processing unit with capacity of 2500 quintal was established which benefited fifty nos. of farmers around the village. - In collaboration with ICARDA low water requiring fodder crops like spine less cactus was demonstrated was conducted at Th. Rampur block covering 40 nos. of farmers - Demonstration on dragon fruit was conducted covering 30 nos. of farmers (Vill: Khairabadi, Indramal, Rengali) - Four no of farmer & farm women training is conducted covering 100 no. of beneficiaries on dragon fruit cultivation.
2.	Promotion of Natural farming	- Eight nos. of demonstrations on natural farming conducted at villages; Kanakpur, Kendugupka, Dumerguda, M.Rampur (No. of beneficiaries-30), Area- 2ha - Four nos. of awareness was conducted covering 200 nos. of farmers at village kenduguka, Kamthana, Khaing and M.Rampur - Training cum method demonstration programme was conducted to aware and educate the farmers about natural farming followed by field visit (No. of farmers 110).

		▪ Technical bulletin on natural farming was published for distribution among farmers. ▪ District 2000 Ha covered under BPKP. Farmers -2500
3.	Emphasis should be on Kharif onion cultivation in suitable agro-ecological pockets of the district	▪ On farm testing on varietal assessment of high yielding variety of Kharif onion (Var. Bhima Super & L-883) was conducted (Village : and Gandamer, Chahaka Golamunda. No. of beneficiaries: 7) in Kharif, 2022. Area-0.8Ha ▪ Training cum method demonstration programme was conducted to aware and educate the farmers about the relative advantage of kharif onion cultivation followed by field visit to the onion grower. ▪ Visualizing the potential of kharif onion in the district horticulture department also have distributed onion seeds (var. Agri Found dark Red) in a subsidized rate. ▪ In the year 2022-23, Approximately of 160 ha of land is covered under kharif onion in the district. ▪ Technical bulletin on scientific cultivation of kharif onion was published for distribution among onion growers.
4.	Breed evaluation of semi intensive poultry chicks suitable for backyard conditions in tribal pockets.	▪ On farm testing low input dual type chicken breeds (Chhabro and Kaveri) in semi-intensive rearing system was conducted at village Kendugupka and Majhiguda covering 10 no of farmers. ▪ Front line demonstration on poultry bird Aseel was conducted at village Tentulipada, Rengali and Burat covering 13 nos. of farmers. ▪ Kalinga brown breed of poultry birds (1500 nos. were supplied to beneficiaries (SHG and individual) under Dept. of Animal Husbandry of Kalahandi. ▪ Under revolving fund, 4050 no. of poultry chicks (i.e Kalinga brown, Aseel, Sonali etc.) was supplied to the farm families in the year 2022-23. ▪ Four no of F&FW training was conducted covering 100 no. of beneficiaries on rearing and brooding management in poultry.
5.	Special focus on management of major pest and disease of important crops	▪ A total of 08 no of training cum method demonstration programme was conducted including 200 no of beneficiaries. ▪ Diagnostic field visit was conducted in collaboration with agriculture department to examine the BPH infestation of in Kharif rice in Karlamunda ,jaipatna, Kesinga, Junagarh block. ▪ Demonstration on Integrated management of fall army worm in kharif maize was conducted in DFI village Rengali of Kesinga block. ▪ FLD on management on pod borer complex in arhar and pink boll worm in cotton was demonstrated in Boria, Rengali, Kamthana village (Beneficiaries:50). ▪ Technical guidance on diseases pest management through social network app (Whatsapp group, text message, audio and video message, youtube channel NRRI-Barta). Technical advisory (voice call) in collaboration with Reliance foundation.
6.	Promotion of location	▪ Two no. of Integrated Farming system (IFS) model was

	specific Integrated Farming system (IFS) model in adopted villages in convergence mode	developed in DFI village by KVK, Kalahandi ▪ Pond based farming system (Fishery+ horticulture) at village Dhaner, Dharmagarh. Sj. Aditya Kumar Sahu ▪ Fruit based farming system (Horticulture+ Agriculture) at village Boria, Kesinga. Sj. Indubhuwas swain ▪ With collaboration of horticulture department Horti-silvi based farming system (Horticulture+ Forestry) model is developed at village Ghantabahali, Junagarh . ▪ In the year 2022-23 watershed, Kalahandi has developed a total of 22 IFS units/farm pond in 4 blocks namely Bhawanipatna, in technical collaboration with KVK, Kalahandi. ▪ Off campus and on campus Training programmes were conducted on “Rice based IFS.” involving 40 nos. trainees.
7.	Promotion of popular varieties of seeds, quality planting material and breeds of poultry.	▪ Demonstration on grafted tomato, brinjal was conducted at Tentulipada village of Bhawanipatna block. (No. of beneficiaries:13) Area-2Ha ▪ 2000 nos. of Sonali, kalinga brown, Kuroiler, kadaknath poultry birds were distributed to farmers under SC-SP activities ▪ 4000 nos. of oyster mushroom spawn were also distributed among farmers under SC-SP programme. ▪ 200 nos. of apple ber, 500 nos. of moringa plants and 300 nos. of dragon fruit (var. red) were distributed among tribal farmers at Rengali, Burat, Bindaniguda and Badchirang village.
8.	KVK and department participation for strengthening the technical knowledge on processing and marketing for FPOs.	▪ Three days orientation programme on FPO management and game plan to Boards of directors and CEO of 6 FPOs (No. of participants: 30) ▪ Interaction with BODs and CEO for gap analysis of FPOs was conducted covering 40 nos. of participants. ▪ Three nos. of training on Oyester mushroom cultivation and marketing through FPO was conducted covering 75 nos. of farmers. ▪ In collaboration with NABARD and Mahashkati Foundation, training cum awareness programme on importance of FPO on Agri-marketing was conducted covering 200 nos. of farmers.
9.	Institutional linkage of KVK with the line department should be strengthened	▪ District level Research-Extension interface meeting is conducted in liaison with all department . ▪ Agriculture Dept.- Diagnostic field visit, E-pest surveillance, crop cutting and field day celebration and Resource sharing etc. ▪ Horticulture Dept.- inspection of private nursery, capacity building programme and joint field visit. ▪ Veterinary Dept.- Training programme, pranisampark mela and jointly organising animal health camp and supply of elite poultry birds. ▪ NABARD- monitoring the WADI programme and technical guidance to the farmer group. ▪ Watershed: Joint field visit and monitoring agricultural programme and sharing of technical knowhow ▪ Leading NGOs- Attending sponsored training programmes,

		virtual meetings and video calls, farmers scientist interaction, meetings, workshops and assessing field activities etc
10.	Processing and value addition of horticultural produce.	- Three residential training programme was conducted on processing and value addition of Mushroom, Tomato and Drumstick involving 50 no of participants. - To mitigate nutritional security and to promote millet cultivation in tribal areas, Odisha millet mission programme is operated in Kalahandi district approximately an area of 5812 ha. A convergence training was conducted on value addition and processing of millets involving WSGH. - In collaboration with ORMAS a district level meeting was organized for procurement of dehydrated mushroom to avoid distress sale of oyster mushroom. - Visualizing the distress sale of Chironji seed in the district, attempt is taken for processing of chironji through seed decortications.

Agenda- 3: Achievement made during Rabi 2021-22 and Kharif 2022.

The Senior Scientist & Head presented the overall achievements made by the KVK during the period from January 2022-December 2022 which was properly discussed by the house.

On farm testing: During the period, 10 OFTs were taken in different discipline and the result has been found satisfactory.

1. Assessment of sweet corn hybrids in irrigated medium land (FP-Cultivation of hybrid maize, TO1-Pusa Super Sweet Corn 1. (Spacing 60 x 30 cm, N: P: K requirement @ 120:60:60 kg per ha. Duration 80-85 days) (Source: IARI-2018-19) TO2-VL Sweet corn 1 (FSCH18) (Spacing 60 x 30 cm, N:P:K requirement @ 120:60:60 kg per ha. (Source: VPKAS, Almora, 2016) The result showed that Pusa Super Sweet Corn 1 get higher cob yield (with Husk) 94.4 q/ha

2. Assessment of Varietal evaluation of Kharif onion: cultivation of onion var. L-883 recorded highest yield 172.4 q/ha as over Bhima Super (158.1 q/ha) and Agrifound dark Red (142.5 q/ha)

3. Assessment of farm made feed formulation for cost effective milk production in cows: FP: Feeding of dairy cow with commercial feed @ 3 kg/day with straw feeding (10 kg) TO1: Feeding of dairy cow with low cost farm made feed @ 3 kg/day (Maize -40%, Oil cake -25%, Rice bran- 20%, chuni-10%, Mineral mix Salt-5% for six months with straw feeding (10 kg). TO2: Feeding of dairy cow with low cost farm made feed @ 3 kg/day (Maize -30%, Soybean meal-10%, Broken rice-10%, Oil cake -25%, Rice bran- 10 %, chuni-10%, Mineral mix Salt-5% for six months with straw feeding (10 kg). Feeding with TO1 yields better milk yield (6.16 ± 0.68^b Mean Milk Production (L/day) with high SNF (8.45%) than Farmer practices SNF (7.56%)

Frontline Demonstrations and Cluster Frontline demonstration: All total 17 frontline demonstrations have been conducted and cluster frontline demonstration Pulses covering 40ha Oilseed 30ha of area.

1. Demonstration of drought tolerant rice variety CR Dhan 801: Recommended Practice- Cultivation of Rice variety Lalat followed by Cultivation of rice variety CR Dhan- 801. The recommended practice showed a increase in Effective tillers/hill 16.46 and yield up to 42.28 q/ha over local practices 39.22 q/ha.

2. Demonstration on eco-friendly management of pod borer complex in pigeon pea: Recommended Practice-Chlorpyrifos 50%+Cypermethrin 5% EC @ 2 ml/lit water and Application of Azadirachtin 0.15% @ 1.5 Lit./ ha + Spinosad 45 SC @ 200 ml / ha at 50% flowering and second 15-20 days after 1ST spraying. The recommended practice showed % of infestation (18.64%) and yield 12.37 q/ha over local practices 10.28 q/ha.
3. Demonstration on grafted tomato in Rainfed condition: Cultivation of Hybrid Tomato Lakshmi followed by Grafted tomato saho. The variety produced yield 221.6 q/ha with 7.2 % wilt and in farmers field which is 50.5% higher yield than Farmer practice 147.2 q/ha.
4. Demonstration on perennial fodder cultivation (Super napier) on barren land and field bund for non competitive land use: FP: Feeding of cow with concentrate feed (1.5-2kg/day) and straw (10-12 kg/day) TO1: Planting of 400 rooted slips of super napier per 100 meter length of field with a spacing of 50 x 50 cm and feeding @ 10% of B.wt with concentrate feed (1.5-2kg/day) and straw (10-12 kg/day). For recommended practice yield 30.5 t/ha with Mean Milk Production (L/day) 6.05 ± 1.28^b Mean SNF 8.25% over Farmer practice Mean SNF 7.53%.

Allied activities: During this period a total of 80 nos. of training have been conducted of which 55 no of training for farmers & farm women, 11 nos. for rural youth, 14 no. for in-service personnel was conducted. A total of 1680 beneficiaries were trained under KVK for the above said period. Under revolving fund 10ha of paddy with total 426 Q (unprocessed) seed produced. A total of 1,08,388 no vegetable seedlings, 3100 kg vermicompost and 2 Kg of Bio-agent (*Earthworm-Eisenia Foetida*), 4021 no of mushroom spawn bottles and 115.6 Kg of mushroom and 5100 no of Poultry chicks were produced.

Agenda – 4: Action Plan

The Senior Scientist & Head presented the detailed Action Plan developed by the KVK for the year 2023-24 which includes 82 nos. of trainings for Farmers & farm women, 12 nos. of trainings for rural youth, 14 nos. of In-service personnel trainings, 17 nos. of FLDs, 10 nos. of OFTs for the above mentioned period.

Agenda – 5: Interaction among the members of SAC:

Interactions were made among the members and following action points were indicated
Dr. K.S. Das,

- Promotion and documentation of trellis system in horticultural crops.
- Well labelled flex boards in demonstration site.
- Soil testing data, Kisan Mobile Advisory slide should be included in the achievement slide.
- Special focus on feeding and heat stress management for dairy.
- Emphasis on NRRI based technology and drudgery reduction technology.
- Incorporate Fishery Programme in KVK.
- Impact assessment of different technology based on commodity.
- Uploading Data, Reports, Inputs and upcoming event in KVK Portal.
- Farmers problem based trial should be conducted.

Dr. T. Gowda

- Popularization of moisture conservation technology.
- Convergence with line department
- Social media use for popularization of technology.

- Focus on Horticulture based Agroforestry system.

Dr. H.K. Sahoo

- Development of plan on Natural farming
- Involvement of all line departments and convergence with them
- Convergence of different FPOs and stakeholders.

CDAO

- Popularization of BPH tolerant rice variety and its management practices in Koksara, Kalampur and Golamunda patches of the block.
- Highlighting different KVK activities in Dharmagarh block.
- One research trial on Rice to be conducted in irrigated ecosystem.

DDH

- Promotion of Exotic fruit crop in the district
- Need for area expansion of Kharif onion cultivation.
- Establishment of Button mushroom in KVK demo unit.
- Special focus on Nematode management in Tomato.

Dean,CA,Bhawanipatna

- More emphasis on cultivation of off season vegetable, leafy vegetable for nutritional security, high value crops and exotic fruits and vegetables.
- Research trial on protein rich, antioxidant rice variety.
- Involvement of Student of College of Agriculture, Bhawanipatna in KVK programme.

PD Watershed

- Highlighted the importance of integrated farming system model in watershed areas.
- Focused on working in water management practices in coffee.

SDVO

- Importance of Hydroponic and Pig Farming in the district.
- Popularization of Millet product.

Farmers

- Water use efficiency and resource conservation techniques should be disseminated to the farmers.
- Requirement of cold storage in the district.

FPO

- Consumer's preference to be taken to consideration during development of variety.

The Chairman appreciated the suggestions of the members and requested for their cooperation for better functioning of KVK. The following action points were suggested

- Promotion and documentation of trellis system in horticultural crops
- Feeding management of dairy animals.
- Social media use for popularization of technology
- Programme on natural farming
- Expansion of Kharif onion cultivation
- Focused on working in a convergence mode to resolve the emerging issues of the district.
- Processing and value added product of millets.
- Promotion of Exotic Fruits in the district.
- Developed different farming situation based farming system model.
- Management practices of Important Pest and Diseases.
- Impact assessment of demonstrated technologies.

The meeting ended at 3.00 pm with a vote of thanks by Senior scientist & Head, KVK, Kalahandi.

ANNEXURE-I**List of Members attended the SAC Meeting held on 20.01.2023 at 11.00 AM.**

Sl. No	Name	Designation & Address	Remarks
1.	Dr. A.K.Dash	Nominee of Honourable Vice Chancellor cum Prof (IFFCO Chair)	Chairman
2.	Dr. H.K.Sahoo	DDE, DEE, OUAT	Member
3.	Sj.A.K. Acharya	PD, Watershed, KLD	Member
4.	Dr. K.S. Das	Principle Scientist, ICAR-Agriculture Technology Application Research Institute, Kolkata	Member (On line)
5.	Dr. T.Gowda	Director Soil and Water Conservation Research Institute, Koraput	Member (On line)
6.	Dr. S.K.Tripathy	Dean, CAB.	Member
7.	Sj. S.S.Rao	CDAO, Kalahandi	Member
8.	Dr. B.S. Nayak	ADR, RRTTS, BPT	Member
9.	Dr. Prabhata Kumar Parida	SDVO, Kalahandi	Member
10.	Sj K.K.Mahaling	DDH, Kalahandi	Member
11.	Shri George M. Kerkatta	Dy. CEO, ORMAS	Member
12.	Srimukha Pan	CEO, DAPTA, Bhawanipatna	Member
13.	Dr. Amitabh Panda	Senior Scientist and Head, KVK, Kalahandi	Member Secretary
14.	Dr. B.B. Sahoo	Jr. Scientist(Horticulture)	Member
15.	Dr. S.K. Mohanty	Jr. Breeder & OIC AICRP on Castor, RRTTS, Bhawanipatna	Member
16.	Dr. Subhashree Das	Jr. Scientist (PBG) RRTTS, Bhawanipatna	Member
17.	Dr. S. S. Dash	RO,CIL, Bhawanipatna	Member
18.	Sri Ganesh Padhi	Assistant Field Manager, IFFCO, Kalahandi	Member
19.	Khira Sindhu Karua	ORMAS, Bhawanipatna	Member

20.	Ms Utkalika Naik	Scientist (Agronomy)	Member
21.	Dr. H. N. Malik	Scientist (Animal Science)	Member
22.	Mrs. Tulasi Majhi	Scientist (Horticulture)	Member
23.	Tribijayi Badjena	Scientist (Agriculture Extension)	Member
24.	Srikrushna Behera	Programme Assistant (Plant Physiology)	Member
25.	Ranjan Kumar Pradhan	AIR, Bhawanipatna	Member
26.	Brusaketu Samantaray	ASCO, Bhawanipatna	Member
27.	Laduram Jhanker	SPMO, OSSC, Bhawanipatna	Member
28.	Dusmanta Sahu	CEO, Agrani Chasi Farmer Producer Ltd. Dharmagarh	Member
29.	Gokulananda Pradhan	Farmer	Member
30.	Basanta Kumar Biswal	Farmer	Member
31.	Anita Karua	Farmer	Member
32.	Lingaraj Patra	Farmer	Member
33.	Kumudini Das	Farmer	Member
34.	Tusar Kanta Behera	Farmer	Member

- Expansion of Kharif onion cultivation
- Processing and value added product of millets.
- Promotion of Exotic Fruits in the district.
- Developing different farming situation based farming system model.
- Management practices of Important Pest and Diseases.
- Impact assessment of demonstrated technologies.

The meeting ended at 3.00 pm with a vote of thanks by Senior scientist & Head, KVK, Kalahandi.


21/6/23
Senior Scientist and Head
KVK, Kalahandi


21/06/2023
**Dy. Director (Extn.,
Directorate of Extn. Edn.
O.U.A.T., Bhubaneswar**


21/06/2023
**Professor and Head
Department of Soil Science
C.A., OUAT, BBSR**

Approved

21/6/23