ACTION PLAN
2023-24

KVK, KANDHAMAL

SL. No	Name of Activities	Target (No.)	Total Beneficiaries (No.)
1	OFT	08	56
2	FLD	16	160
3	Training		
	F/FW	60	1500
	RY	20	300
	IS	9	135

On Farm Trials

OFT-1 Assessment of integrated nutrient management in Groundnut			
Season & Year	Kharif, 2023(2nd year)	**No. of Trials & area**	05 nos. & 0.4 ha
Crop	Groundnut	**Farming Situation**	Rain-fed Upland Irrig. Upland
Problem diagnosed	Poor plant growth, less effective pod formation, poor peg development and seed filling, low quality produce due to soil acidity and improper nutrient management practices	**Spread and intensity of problem**	800 ha, High Yield Gap : 25-40 %
FP	Application of FYM @ 1.5 t /ha with average fertilizer @ 22-23-18 kg N-$P_2O_5K_2O$/ha		
TO_1	STBFR+ FYM @ 2 t / ha + Lime @ 0.2 LR + S @ 40 kg /ha		RRTTS, Mahisapat, OUAT (2010)
TO_2	STBFR+ FYM @ 7 t / ha + Borax @ 15 kg /ha		AICRP on Groundnut, OUAT (2013-14)
TO_3	STBFR+ FYM @ 2 t / ha + lime @ 0.2 LR + Seed inoculation with *Rhizobium* @ 20 g/kg seed		AINP on Soil Biodiversity – Biofertilizer, OUAT(2014)
Characteristics of technology	• Liming enhances the nutrient availability • Sulphur application in groundnut increases the protein and oil yield • Boron application in groundnut improves ped development, proper filling of seeds and hence improve the quality of produce • FYM not only improves the physical, chemical and biological properties of soil but also improves the moisture holding capacity of soil and also supply plant nutrients • Judicious use of organic and inorganic sources is essential to maintain the soil health and sustainable productivity		
Observation Parameters	Plant height (cm), No of effective pods/plant, Shelling percentage, Initial and post harvest nutrient status of the soil	**Performance Indicator**	Yield (q/ha), Net return (Rs/ha), B:C ratio

OFT-2 Assessment of Integrated nutrient management in Mustard			
Season & Year	Rabi, 2023-24 (2nd year)	**No. of Trials & area**	05 nos.; 0.4 ha
Crop	Mustard	**Farming Situation**	Irrigated Up & Medium land Veg-Oilseed
Problem diagnosed	Poor plant growth, less silique and seed formation due to improper nutrient management practices	**Spread and intensity of problem**	8000 ha, High Yield Gap : 20-40 %
FP	Application of FYM @ 0.5 t/ha, average fertilizer @ 20.5-23-0 kg N-$P_2O_5K_2O$/ha		
TO_1	STBFR +5 t FYM + S @ 25 kg/ha and B @ 1 kg/ha		Annual Report-2011-12, OUAT
TO_2	STBFR + FYM @ 2 t/ha + Soil application of Zn @ 5kg/ha and B @ 1kg/ha along with S @ 40 kg/ha		AICRP on Micro and Secondary Nutrients, OUAT, 2017
TO_3	STBFR + FYM @ 2 t / ha + Biofertilizers (*Azotobacter*, *Azospirillum* and *PSB* @ 1:1:1, 4 kg each per ha incubated with FYM @ 1:25 ratio for 7 days		AINP on Soil Bio-diversity - Bio-fertilizers, Dept. of Soil Sc. & Agri. Chem OUAT-2014
Characteristics of technology	• Judicious use of organic and inorganic sources is essential to maintain the soil health and sustainable productivity • STBFR based N:P_2O_5:K_2O + FYM @ 2 t/ha + Soil application of Zn @ 5kg/ha and B @ 1kg/ha along with S @ 40 kg/ha increases the yield and yield attributing parameters • FYM not only improves the physical, chemical and biological properties of soil but also improves the moisture holding capacity of soil & supply plant nutrients • Combined application of Biofertilizer, FYM and NPK increases the growth, yield attributes and yield of mustard		
Observation Parameters	Plant height (cm); No of silique/plant; test weight (gm); Uptake of N,P & K (kg/ha); Change in soil nutrient status (pre & post harvest)	**Performance Indicator**	Yield (q/ha), Net return (Rs/ha), B:C ratio

OFT-3 Assessment of pond base horticulture farming system model			
Season & Year	Kharif, 2023 (2nd Year)	**No. of Trials & area**	05 nos. / 1.0 ha
Crop	Horticulture base Integrated Farming System Model (IHFS)	**Farming Situation**	Irrigated Medium land Paddy - Vegetable
Problem diagnosed	Low productivity due to single crop farming	**Spread and intensity of problem**	Spread is over 2500 ha with moderate intensity, Yield gap – 40 %
FP	Cultivation of Single crop near pond area		
TO_1	Vegetable (Bean in Kharif – Carrot in rabi - Green peas rabi -Summer tomato) in 400 sqr. mtr. area with Banana, Papaya in border in a distance of 4.5ft. Plant to Plant in ridge + Vermi composting + Mushroom in 50 sqr. mtr. Catchment area is 440 sqr. mtr. per trial.		***Source**: ICAR-Research Complex for Eastern Region, Patna, Bihar 2021*
Characteristics of technology	• Cultivation of more than one horticulture crop will increase productivity. • Integrated horticulture base farming system model provide throughout the year income. • Maximum utilization of nutrient, soil moisture, surface water & space.		
Observation Parameters	Productivity, Yield (q/ha) of all component	**Performance Indicator**	TFP, Net return (Rs/ha), B:C ratio

OFT-4 Assessment of Onion varieties			
Season & Year	Rabi, 2023-24 (New)	**No. of Trials & area**	05 nos. / 0.4 ha
Crop	Onion	**Farming Situation**	Irrigated Medium land Vegetable -Vegetable
Problem diagnosed	Low production, less market demand of un uniform size & light colour onion bulb	**Spread and intensity of problem**	Spread is over 2000 ha with moderate intensity, Yield gap – 30 %
FP	Cultivation of Onion variety ALR		
TO_1	Cultivation of Onion Variety ADR		**Source:** *ICAR-Directorate on Onion and Garlic Research, Pune 2014*
TO_2	Cultivation of Onion Variety Bhima Dark Red		
Characteristics of technology	Cultivation of onion variety Bhima Dark Red have attractive dark red colour, flat globe bulbs, maturity 95-100 DAT, Yield up to 20-22 t/ha		
Observation Parameters	Plant height (cm), Single bulb weight (gm)	**Performance Indicator**	Yield (q/ha), Net return (Rs/ha), B:C ratio

OFT-5 Assessment of weed management in Maize			
Season & Year	Kharif, 2023 (1st year)	**No. of Trials & villages**	07 nos., 1 ha
Crop	Maize	**Farming Situation**	Rainfed Up & Medium land, Maize-Fallow
Problem diagnosed	Low yield in maize due to heavy weed infestation	**Spread and intensity of problem**	2000 ha, High Yield Gap : 20 - 25 %
FP	Hand weeding at 40 -45 DAS		
TO_1	Pre-emergence application of Atrazine 50% WP @1.0 kg ai/ha	**Source:** AICRP on Maize, OUAT-2020-21	
TO_2	Application of Atrazine @ 1.0 kg ai/ha as pre-emergence followed by Tembotrione @120 g/ha as post emergence at 25 DAS(4-5 leaf stage)		
Characteristics of technology	• Atrazine is used as pre-emergence herbicide in maize for controlling broadleaf and grassy weeds • Tembotrione is a broad spectrum post emergence herbicide recommended for use along with surfactant for control of broad leaf and grassy weeds in corn		
Observation Parameters	Plant height (cm) No. of Weeds /m^2 weed control efficiency, Cob length (cm) and Cob weight (gm)	**Performance Indicator**	Avg. cob yield (q/ha), Net return (Rs/ha) & B:C ratio

OFT-6 Assessment of Integrated weed management in direct seeded rice			
Season & Year	Kharif, 2023 (2nd year)	**No. of Trials**	05 no.,1 ha
Crop	Paddy	**Farming Situation**	Rainfed –medium land, Rice-fallow
Problem diagnosed	Low productivity due to higher weed infestation in direct seeded rice, labour intensive	**Spread and intensity of problem**	22000 ha; High
FP	One manual weeding at 45 DAS		
TO_1	Application of pyrazosulfuron @ 20 g/ha as pre-emergence stage i.e., 0-3 DAS followed by Bispyribac sodium @ 25 g/ha as post-emergence i.e. 25 DAS	**Source-** AICRP on weed management, 2015	
TO_2	Pre-emergence application of Pendimethalin @ 1Kg a.i/ ha followed by Bispyribac-Na @ 25 g/ ha with one hand weeding at 45 DAS	**Source-** AICRP on weed management, 2014	
Characteristics of technology	Pyrazosulfuron ethyl:- It is one of the acetolactate syntheses (ALS) inhibiting herbicides Pendimethalin:- it controls annual grasses and broadleaf weeds Bispyribac Na:- it is a systemic herbicide that moves throughout the plant tissue & interferes in plant growth, ALS		
Observation Parameters	Plant height (cm), No. of tillers/hill, weed density/ m2	**Performance Indicator**	Yield (q/ha), Net return (Rs/ha), B:C ratio

OFT-7 Assessment of processing and packaging methods of tender Jackfruit			
Season & Year	Rabi, 2023-24 (2nd Year)	**No. of Trials & villages**	07 (Bakikamba, Sujeli)
Crop	Tender Jackfruit	**Farming Situation**	Homestead
Problem diagnosed	Poor price realisation from sale of whole tender jackfruit	**Spread and intensity of problem**	50 % (specific to district)
FP	Direct selling of whole tender jackfruit		
TO_1	Peeking of jackfruit by knife/paniki cut into pieces and packaging in polythene		**Source**-AICRP on PHET-2016-17
TO_2	Surface cleaning/dirt removal by washing, peeling and cutting into pieces. Dipping in 0.5% citric acid and 0.1% ascorbic acid for 7 minutes, surface drying and packaging in punnet pack or PP pouch with 0.0675% perforation and refrigerated storage at 10℃		
Characteristics of technology	TO_{1-} Shelf life 1 day, discoloration TO_{2-} Shelf life 5-7 days, colour retention		
Observation Parameters	Shelf life (Days), Sensory evaluation	**Performance Indicator**	Incremental income (Rs), Net income (Rs), BC ratio

OFT- 8 Assessment the performance of FPOs with varied levels of task and commodity to enhance profitability			
Season & Year	Kharif/Rabi-2022-23 (2nd year)	**No. of FPO**	01 & and 80 farmers (sample size 20 in each category)
Crop / commodity	Pulses, Ragi, and Turmeric	**Farming situation**	FPOs of different types
Problem diagnosed	Unorganised farmers fetching low price due to distress sale of farm produce		
FP	Farmers marketing their commodity through Intermediaries/ Local Traders (less price of produce)		
TO_1	FPO dealing with single commodity with single task i.e., Procurement and Marketing with market intelligence (Turmeric)		
TO_2	FPO dealing with multi commodity with multi task i.e., Ragi & Turmeric-Marketing input supply, technical support infrastructure support, grading, packing, branding and marketing		
Characteristics of technology	FP: Farmers marketing their produce through intermediaries- Middle Man, whole seller, Local Traders, Out Side Traders TO1: FPOs dealing with single commodity with single task – Marketing of specific commodity by various channels TO2: FPOs dealing with multi commodities with multiple tasks- services provided from Production to marketing of several commodities.		
Observation Parameters	Level of participation Group decision making information Annual turnover and Annual profit Share capital contributed	Status of Meeting /training of FPOs Dissemination of market and other related Market linkage and constraints Services/facilities provided to CIGs/FIGs , Market efficiency and Marketing cost	

Front Line Demonstrations

FLD-1 Demonstration on integrated nutrient management in Turmeric			
Season & Year	Kharif, 2023 (1st Year)	**No. of Demo**	10 nos.; 1.0 ha
Crop	Turmeric	**Farming Situation**	Rainfed upland (Turmeric-Fallow)
Problem diagnosed	Low yield due application of suboptimal dose of organic inputs (FYM @ 0.5 t/ha)	**Spread and intensity of problem**	18000 ha , High Yield Gap : 20-30 %
FP	Application of FYM @ 0.5 t/ha and mulching with sal leaves @ 6 t/ha		
Demo	Integrated nutrient management practices	**Source :**RRTTS, G.Udayagiri, OUAT-2021	
Details of the technology	• Application of STBFR • Application of Vermicompost @ 5 t/ha • Mulching with sal leaves @ 12.5 t/ha • Application of biofertilizer (Azotobacter, Azospirillum and PSB , 12 kg/ha) incubated with FYM @ 1:25 ratio for 7 days		
Observation Parameters	Plant height (cm); Single rhizome weight	**Performance Indicator**	Yield (q/ha) Net return (Rs/ha) and B:C ratio

FLD-2 Demonstration on Organic nutrient management for maize + sweet potato (*Ipomoea batatas*) intercropping system (2:1)			
Season & Year	Kharif , 2023 (1st Year)	**No. of Demo**	10 nos.; 1.0 ha
Crop	Maize+ sweet potato	**Farming Situation**	Rainfed upland
Problem diagnosed	Poor plant growth, small cob formation of maize and poor yield of both the crops due to inadequate nutrient management practices	**Spread and intensity of problem**	250 ha , High Yield Gap : 25-35 %
FP	Application of sub optimal dose of organic manure i.e. FYM @ 1 t/ha only		
Demo	Organic nutrient management practices	**Source :** AICRP on DLAP, OUAT, 2021-22	
Details of the technology	Application of bio-consortia @ 5 kgha^{-1} incubated with FYM (1:25 ratio), FYM @ 5 t ha^{-1} and vermin compost @ 2 tha^{-1}		
Observation Parameters	Plant height (cm), cob length(cm) of maize; tuber diameter (cm), tuber length (cm) of sweet potato	**Performance Indicator**	Maize equivalent yield (q/ha) and B:C ratio

FLD-3 Demonstration on INM in Chilli			
Season & Year	Kharif, 2023 (2nd Year)	**No. of Demo**	10 nos.; 1.0 ha
Crop	Chilli	**Farming Situation**	Rain-fed Upland Veg – Fal Irrig. Upland Veg-Veg
Problem diagnosed	Poor plant growth, less flower and fruit formation due to improper nutrient management practices	**Spread and intensity of problem**	450 ha, High Yield Gap : 25 – 40 %
FP	Application of FYM @ 1 t /ha with fertilizer @ 20-20-30 kg N-$P_2O_5K_2O$/ha		
Demo	Integrated nutrient management practices	**Source :** AINP on Soil Bio-diversity -Bio-fertilizers, Dept. of Soil Sc., OUAT, BBSR , 2014	
Details of the technology	• Soil test based NPK application • Vermi-compost @ 5 t / ha • Bio-fertilizer (Azotobacter, Azospirillum and PSB, 1:1:1 @ 4 kg each per ha) incubated with FYM @ 1:25 ratio for 7 days		
Observation Parameters	Plant height (cm); No. of branches/ plant; Days to 50% flowering;; Uptake of N,P &K (kg/ha); Change in soil nutrient status (pre & post harvest)	**Performance Indicator**	Fresh fruit yield (q/ha) Net return (Rs/ha), B:C ratio

FLD-4 Demonstration on INM in Garden pea			
Season & Year	Rabi, 2023-24 (2nd Year)	**No. of Demo**	10 nos.; 1.0 ha
Crop	Garden pea	**Farming Situation**	Irrigated Up & Medium land Veg-Veg; Rice-Veg
Problem diagnosed	Poor plant growth, less branch & pod formation due to inadequate nutrient management practices	**Spread and intensity of problem**	1500 ha, High Yield Gap : 35-45%
FP	Application of FYM @ 1t /ha and fertilizer application @ 30-40-30 kg N-$P_2O_5K_2O$/ha		
Demo	Integrated nutrient management practices	**Source :**AINP on Soil Bio-diversity - Bio - fertilizers, Dept. of Soil Sc., OUAT, BBSR , 2014	
Details of the technology	•Application of FYM @ 5 t / ha •Application of lime @ 0.2 LR at the time of final ploughing •Soil test based NPK application •Seed inoculation with Rhizobium @ 20 gm/kg seed		
Observation Parameters	Plant height (cm); No. of pods/plant; Pod length (cm); No. of effective root nodules/plant; No. of seeds/pod; Change in soil nutrient status (pre & post harvest)	**Performance Indicator**	Green pod yield (q/ha), Net return (Rs/ha) and BC ratio

FLD-5 Demonstration on application of PGR on Turmeric			
Season & Year	Kharif – 2023 (1st year)	**No. of Demo/Area**	10 / 2 ha
Crop	Turmeric	**Farming Situation**	Irrigated Up Land
Problem diagnosed	Low yield and un uniform finger size.	**Spread and intensity of problem**	6000 hectare
FP	Cultivation of without application of PGR		**Source :** RRTTS, POTTANGI , OUAT 2011
Demo	Cultivation of turmeric by two sprays of NAA@20 ppm at 45DAP and 90 DAP.		
Details of the technology	Two sprays of NAA@20 ppm at 45 and 90 DAP improved yield of turmeric (20.5 t/ha) by 30%, respectively.		
Observation Parameters	Rhizome weight (gm)/Plant, Finger length (cm.), Yield (q/ha)	**Performance Indicator**	Gross cost, Gross return, Net return (Rs/ha), B:C ratio

FLD-6 Demonstration on Banana variety Kaberi kalki			
Season & Year	Kharif 2023	**No. of Demo/Area**	10 / 0.2 ha
Crop	Banana	**Farming Situation**	Irrigated medium land (fallow-fallow)
Problem diagnosed	High maturity period of traditional variety, low bunch weight 15-20 Kg.	**Spread and intensity of problem**	2000 hectare
FP	Cultivation of local Banana verity champa		**Source:** NRCB Trichy 2022
Demo	Demonstration on Banana variety Kaberi kalki		
Details of the technology	Cultivation of Kaberi Kalki variety bunch size 25-30 Kg., Days to flowering 9 to 10 months, Days to maturity 3 months from fruit set.		
Observation Parameters	Yield q /ha, Numbers of finger per bunch, single finger weight (gm), single finger length (cm), bunch weight in Kg. maturity (Days)	**Performance Indicator**	Gross cost, Gross return, Net return (Rs/ha), B:C ratio

FLD-7 Demonstration on dual purpose use Chili variety Arka Harita			
Season & Year	Rabi – 2023 -24	**No. of Demo/Area**	10 / 0.2 ha
Crop	Chili	**Farming Situation**	Irrigated Medium Land
Problem diagnosed	High damage of chili due to. Powdery mildew and virus infection, low yield due to distress sale of green chili.	**Spread and intensity of problem**	2000 ha, High Yield Gap: 40%
FP	Cultivation of chili variety Shindoor		**Source :** IIHR, Bangalore 2012
Demo	Demonstration of Chili variety Arka Harita		
Details of the technology	High yielding chilli F1 hybrid developed by using MS line. Plants tall (1m) & spreading (90cm.). Fruits medium long (10 cm) with width 1 cm. Fruits are dark green and turn red. Tolerant to powdery mildew and viruses. Fresh yield 31 t/ hectare and dry yield 35 q / ha in 150-160 days.		
Observation Parameters	Fruit length (cm.), Single fruit weight (gm.), Yield (q./ha)	**Performance Indicator**	Gross cost, Gross return, Net return (Rs/ha), B:C ratio

FLD-8 Demonstration on Dolichos bean Arka Neelanchal prusti			
Season & Year	Rabi 2023	**No. of Demo/Area**	10 / 0.4 ha
Crop	Dolichos bean	**Farming Situation**	Irrigated medium Land (Vegetable – Vegetable)
Problem diagnosed	Low yield due to use of traditional variety	**Spread and intensity of problem**	250 hectare
FP	Cultivation of Dolichos bean variety local Sem (Bagha Nakhi)		**Source :** CHES - ICAR, 2021
Demo	Demonstration on Dolichos bean variety Arka Neelanchal Prusti		
Details of the technology	Demonstration of high yielding, pole type, round poded Dolichos bean variety Arka Neelanchal Prusti. Pods are oval, medium in size (7-7.5 cm long), straight, attractive green colour with bold & sweet seeds at edible maturity, Seeds are rich in protein (4.61g/100 g), iron (15 ppm) & zinc (37 ppm). Yield at 95 DAS.		
Observation Parameters	Plant height (cm), Single pod weight (gm/pod), Seeds / pod (nos), Yield q/ha , Maturity duration (Days)	**Performance Indicator**	Gross cost, Gross return, Net return (Rs/ha), B:C ratio

FLD - 9 Demonstration on medium duration maize hybrid Kalinga Raj (OMH 14-27)			
Season & Year	Kharif 2023 (1st Year)	**No. of Demo**	10 nos. 1 ha
Crop	Maize	**Farming Situation**	Rainfed –medium land, maize-toria
Problem diagnosed	Low yield from traditional variety	**Spread and intensity of problem**	18000 ha; High
FP	Cultivation of locally available maize VNR 4226		
Demo	Cultivation of medium duration maize hybrid Kalinga Raj (OMH 14-27)	**Source :** AICRP on Maize, OUAT, 2020	
Details of the technology	Suitable for Kharif season, average yield: 79.5 q/ha, duration 92 days, resistant to rust, downy mildew, charcoal rot fusarium stalk and tolerant to drought		
Observation Parameters	Plant height (cm), Cob length (cm), cob weight (gm)	**Performance Indicator**	Yield (q/ha) , Net return (Rs/ha) & BC ratio

FLD- 10 Demonstration on application of bio consortia on rapeseed			
Season & Year	Rabi, 2023 (1st year)	**No. of Demo**	10 nos. 1 ha
Crop	Rapeseed	**Farming Situation**	Irrigated Medium land, maize-toria
Problem diagnosed	Low yield due to lack of nutrition	**Spread and intensity of problem**	8000 ha, High
FP	No seed treatment		
Demo	Application of bio-consortia (Azotobacter, azospirillum & PSB) at 1:1:1 @ 4kg/ha each along with 50-25-25 kg N-P2O5-K2O/ ha	**Source :** AICRP on Rapeseed and mustard, 2012	
Details of the technology	Application of bio-consortia (Azotobacter, azospirillum & PSB) at 1:1:1 ratio @ 4kg/ha along with 50-25-25 kg N-P2O5-K2O/ ha recorded the highest seed yield		
Observation Parameters	Plant height (cm), No of silique/plant, no. of seeds/siliqua	**Performance Indicator**	Yield (q/ha) , Net return (Rs/ha) & BC ratio

FLD-11 Demonstration on weed management in Garden pea			
Season & Year	Rabi 2022-23 (2nd Year)	**No. of Demo**	10 nos. 1 ha
Crop	Garden pea	**Farming Situation**	Irrigated Up & Medium land,Veg-Veg; Rice-Veg
Problem diagnosed	Low productivity due to heavy weed infestation, labour intensive	**Spread and intensity of problem**	2000 ha, High Yield Gap : 20 - 25 %
FP	One hand weeding at 20 DAS		
Demo	Application of herbicides for weed management	**Source :** IARI, New Delhi, Year 2014	
Details of the technology	Post-emergence application of Imazethapyr (10% SL) @ 750ml/ha at 20-30 DAS		
Observation Parameters	Plant height (cm); No. of Pods/Plant; Pod length (cm) and No. of seeds/pod	**Performance Indicator**	Green pod yield (q/ha), Net return (Rs/ha) and BC ratio

FLD- 12 Demonstration on weed management in transplanted rice			
Season & Year	Kharif 2023 (1st Year)	**No. of Demo**	10 nos. 1 ha
Crop	Rice	**Farming Situation**	Rainfed –medium land, Rice-fallow
Problem diagnosed	Low productivity due to higher weed infestation in transplanted rice, labour intensive	**Spread and intensity of problem**	22000 ha; High
FP	One hand weeding at 20-25 DAS		
Demo	Weed management in transplanted rice	**Source :** AICRP on weed management, OUAT, 2015	
Details of the technology	Pre-emergence application of Metsulfuron methyl 10% + Chlorimuron ethyl 10% (Almix) @ 20g/ha at 4 DAT		
Observation Parameters	Plant height (cm), No. of tillers/hill, weed density/ m2	**Performance Indicator**	Yield (q/ha) , Net return (Rs/ha) & BC ratio

FLD-13 Demonstration on protein rich spicy Mango bar			
Season & Year	Summer 2023-24 (2nd Year)	**No. of Trials & villages**	10 (Katingia, Laburi, Gomandi)
Commodity	Ripe mango	**Farming Situation**	Rainfed Up & Medium land
Problem diagnosed	Distress sale due to over production and post harvest loss	**Spread and intensity of problem**	48 %
FP	Preparation of mango leather (Extract pulp & sun drying)		
Demo	Preparation of value added product from ripe mango (Spicy mango bar)		**Source :**TNAU,2012
Details of technology	Extract mango pulp (80 gm), heat for 3 mins add corn flour paste (4 gm), sugar (50 gm), chili powder (0.75 gm), asafoetida (0.1 gm) and green gram flour (20gm)/ soy flour (20 gm) heat the mix on medium flame upto a TSS (Total suspended solids) of 45 brix. Cool the pulp to room temp at 0.1 % KMS (Potassium metabisulfite). Spread the finished pulp evenly in an aluminum tray to a thickness of 0.5 cm for sun drying.		
Observation Parameters	Shelf life, sensory evaluation, conversion ratio	**Performance Indicator**	Net income , B:C ratio

FLD-14 Demonstration on use of groundnut decorticator for drudgery reduction			
Season & Year	Kharif, 2023-24 (2nd Year)	**No. of Trials & villages**	10 (Penela, Gomandi, Jakamaha)
Crop	Groundnut	**Farming Situation**	Homestead
Problem diagnosed	High drudgery in decortications of ground nut	**Spread and intensity of problem**	65 %
FP	Manually farm women separate the kernels from ground nut by hitting each pod in the ground		
Demo	Use of groundnut decorticator		**Source :** CIWA, Bhopal, 2014
Details of technology	Reduces the physiological muscular efforts of farm women with increased output in lesser time. The fatigue of grip muscle is reduced up to 16.67% over the traditional tool		
Observation Parameters	% reduction of drudgery, WHR-beat/min, % increase in efficiency	**Performance Indicator**	Output (kg/hr)

FLD-15 Demonstration on Blue oyster Mushroom (*Hypsizygus ulmarius*)			
Season & Year	Rabi, 2023-24 (2nd Year)	**No. of Trials & villages**	07 (Kanbagiri, Lingagad, Badenaju)
Commodity	Mushroom	**Farming Situation**	Homestead
Problem diagnosed	Low yield of oyster mushroom due to low temperature	**Spread and intensity of problem**	60%
FP	Cultivation of oyster mushroom var. *Pleurotus sajorcaju*		
Demo	Cultivation of oyster mushroom var. *Hypsizygus ulmarius* having high market demand		**Source :** CTMRT, OUAT 2011
Details of technology	Large and fleshy appearance , better yield, shelf life of 32-40 days , 10-18 degree centigrade biological efficiency 80%		
Observation Parameters	Pin-head appearance (days), days of first flush, size of fruiting body, average fruit body wt, biological efficiency	**Performance Indicator**	Cost of intervention. additional income over additional investment Yield (q/ha), B:C ratio

FLD-16 Demonstration on effectiveness of short technology videos on technology adoption (2nd Year)			
Problem diagnosed	Less efficacy of existing dissemination modes i.e. text messages/verbal advisory		
F.P.	Farmers are getting text messages and advisories from various organization		
Demo	Preparation of small videos (1.5-2.0 minutes) on different activities of production process of selected commodities(Vegetable) and the same will be sent through WhatsApp to the identified farmers.		
Details of Technology	Production packages of prioritized commodities will be divided into different segments and short videos will be prepared and disseminated through WhatsApp at appropriate time		
Observation Parameters	Visually engaging/Informative and timeliness Understanding the method and process depicted in the video Retention , retrieval & re-use of the content	**Performance Indicator**	Awareness creation Knowledge acquisition & retention Real-time applicability Uptake of new practice Information sharing & spillover effects Change in perception and Adoption Rate

REVOLVING FUND ACTIVITIES 2023-24 Oilseeds

Name of KVK	Season	Crop	Variety	Class	Proposed Area(ha)
Kandhamal	Kharif	Niger	Utkal Niger 150	FS	1.0
Kandhamal	Rabi	Toria	Sushree	FS	1.5

Other crops

Name of KVK	Season	Crop	Variety	Class	Proposed Area(ha)
Kandhamal	Kharif	Turmeric	Roma, Rasmi and Rajendra sonia	TL	1.5

Quality planting materials (QPM) production

Name of KVK	Season	Crop	Variety	No. to be produced
Kandhamal	Kharif	Papaya	Honey Dew, Hybrid	1000
Kandhamal	Kharif	Drumstick	Hybrid	1000
Kandhamal	Kharif	Citrus	Seedling	500
Kandhamal	Kharif & Rabi	Tomato	Hybrid	14000
Kandhamal	Kharif & Rabi	Brinjal	Hybrid	13000
Kandhamal	Kharif & Rabi	Chilli	Hybrid	13000
Kandhamal	Rabi	Cauliflower	Hybrid	12000
Kandhamal	Rabi	Cabbage	Hybrid	12000
Kandhamal	Rabi	Capsicum	Hybrid	4000
Kandhamal	Rabi	Simala	Hybrid	2000

Other materials production

Name of KVK	Season	Name of the material	Variety/Breed	No./qty. to produced
Kandhamal	Round the year	Vermicompost	-	50 q
Kandhamal	Round the year	Vermin	*E. foetida*	20 kg
Kandhamal	Round the year	Vermi-wash	-	10 lit
Kandhamal	Round the year	Mushroom spawn	Paddy straw, Oyster	4500 nos.
Kandhamal	Round the year	Poultry chicks	Sonali, Kalinga Brown	2000 nos.
Kandhamal	Round the year	Azolla	-	200 kg
Kandhamal	Round the year	Mushroom	Oyster	75 kg
			Paddy straw	25 kg
Kandhamal	Round the year	Hill brooms		1.0 ha

PROPOSED TRAINING PROGRAMMES-2023-24

Discipline	Target							
	Farmers & Farm Women		Rural Youths		In-Service Personals		Vocational	
	No.	Participant	No.	Participant	No.	Participant	No.	Participant
Soil Science	12	300	03	45	02	30	01	05
Crop Production	12	300	04	60	02	30	-	-
Women in Agriculture	12	300	02	30	01	15	02	10
Horticulture	12	300	04	60	02	30	-	-
Agril. Ext	12	300	02	30	02	30	02	10
Total	**60**	**1500**	**15**	**225**	**09**	**135**	**05**	**25**

Sl.No.	Extension activities	No. of activities	No. of beneficiaries
1	Parthenium Awareness Programme	01	30
2	Food and Nutrition Day	01	30
3	Poshan Maha and Tree Plantation	02	150
4	Swacchata Abhiyan	08	200
5	Celebration of Girl Child Day	01	30
6	World Soil Day	01	150
7	Awareness Programme on Natural Farming	06	300
8	International Women's Day	01	30
9	Soil test campaign	02	45
10	Group meeting	20	500
12	Diagnostic field visit	80	620
13	Farmer Scientist Connect Meet cum Farmers Fair	04	420
14	National Farmers Day	01	50
15	AIR/DD Audio Talk	02	Mass
16	As Resource Person for GO'S, NGO'S	30	750
17	Mahila Kisan Diwas	01	50
18	World Food Day	01	50
19	Jal Shakti Abhiyan	06	300
20	Vigilance Awareness Week	1	17
21	OUAT Foundation Day	1	50
22	International Millets Conference	1	50

Soil and water sample analysis for the 2023-24

Soil				Water				Grand total (soil + water)	No. of soil health card issued
KVK lab.	Mrida Parikhyak	outside	Total	KVK lab.	Mrida Parikhyak	outside	Total		
547	103	0	650	15	5	0	20	670	1000