ANNUAL PROGRESS REPORT

(April 2015 to March 2016)

KVK, BOLANGIR

ORISSA UNIVERSITY OF AGRICUTURE & TECHNOLOGY, BHUBANESWAR

Contents

Instructions for Filling the Format

1. **Do not change/modify/ delete any column of any of the table. However, additional rows can be created, if required.**
2. **Do not merge columns, rows.**
3. **Please repeat the name of KVK in each table in the column "Name of KVK"**
4. **Do not fill the non-numerical values in numeric field**
5. **Do not repeat the unit while reporting data as it is already mentioned in the heading row**
6. **Strictly fill the data in desired unit only. If it is reported in other unit, convert it in the desired unit**
7. **Please mention only standard English names of crops (Do not mention Urd, Arhar, Til, Kulthi, Moong, Bajra, etc.)**
8. **Additional relevant information may be provided at the end of Format by creating heading "Additional Information"**
9. **Also read the instructions mentioned just below the table**
10. **Your suggestions for improvement in the format for your simplicity as well as data compilation may be given at the end of the format**
11. **Do not press any Enter Key in any of the columns while making entry in the columns of the table. Use only arrow key /Tab key/ mouse pointer while movement from one column/row to another.**
12. **Grey color cells in summary table need not to be filled.**
13. **Crop name should be spelled correct and standard English name should be used i.e Cereals, Pulses, Oilseed:- Rice (not use Paddy), Wheat, Barley, Kodo, Kutki, Maize, Jwar, Bajra, Pigeon pea (not use Tur, Arhar, Red gram), Blackgram (not use Urd), Greengram (not use Moong/Moongbean), Chickpea (not use Gram, Chana), Field pea, Horse gram (Kulthi), Lentil, Mustard (not use Rai, Sarsoan), Soybean, Linseed, Groundnut, Sesame (not use Til), Niger (not use Ram Til), Safflower (not use Kusum).**
    Vegetable :- Vegetable pea, Bottle guard, Bitter guard, Okra (not use Bhindi or Ladies finger).
    Fruits :- Mango, Guava, Custard apple, Pear etc.
    Spices :- Black Peeper, Turmeric, Ginger, Cardamom etc.

REPORTING PERIOD – April 2015 to March 2016

Summary of KVK Annual Report (Quantifiable Achievement) for the year 2015-16

S.N.	Quantifiable Achievement	Number	Beneficiaries (nos.)	
1	**On Farm Testing**			
	Proposed OFT			
	On Going OFT			
	Technologies assessed (Completed OFT)			
	Technologies refined			
	On farm trials conducted			
2	**Frontline demonstrations**			
	Proposed Frontline demonstrations			
	On Going Frontline demonstrations			
	FLDs conducted on crops			
	Area under crops (ha.)			
	FLD on farm implement and tools			
	FLD on livestock/ AH enterprises (Dairy/ Sheep and Goat/Poultry/ Duckery/ Piggery etc.)			
	FLD on Fisheries - Finger lings			
	FLD on other enterprises (Bee keeping, lac, mushroom, sericulture, value addition, vermi compost, etc.)			
	FLD on Women in Agriculture - (Nutritional garden, Income generation, Value addition, Drudgery reduction, etc.)			
3	**Training programmes**	**No. of Course**	**Duration (days)**	**Participants**
	Farmers			
	Farm women			
	Rural youth			
	Extension personnel/ In service			
	Vocational trainings			
	Sponsored Training			
	Total			
		No. of programmes	**Participants**	
4	**Extension Programmes**			
5	**Production of technology inputs etc**	**Qty**	**Beneficiaries (nos.)**	
	Seed (qt.)			
	Planting material produced (nos.)			
6	**Livestock**	**Qty**	**Beneficiaries (nos.)**	
	Livestock strains (Nos)			
	Milk Yield - Cow, Buffelo etc. (in liter)			
	Fish (Kg.)			
	Fingerlings (nos.)			
	Poultry-Eggs (nos.)			
	Ducks (nos.)			
	Chicks etc. (nos.)			

7	**Bio Products**	**Qty**	**Beneficiaries (nos.)**	
	Bio Agents -Earth worm (Kg.)			
	Trichoderma (kg.)			
	Bio Fertilizers- Vermi compost, Rhizobium, PSB , BGA , Mycorriza , Azotobacter , Azospirillum etc. (Kg.)			
	Bio Pesticide-Panchgavya, Neem Extract , Neem oil etc.(lit.)			
8	**Any other significant achievement in the Zone**	**Nos.**	**Participants/ beneficiaries**	
	Award (Best KVK award and scientist and farmer's award)			
	Publications (Res. Paper/ pop. Art./Bulletin,etc.)			
	KVK News letter			
	SAC Meetings conducted			
	Soil sample tested			
	Water sample tested			
	RWH System (Special training and field visit on RWH structure and MIS in KVKs)			
	KVK-KMA (Message and beneficiaries)			
	Convergence programmes			
	Sponsored programmes			
	KVK Progressive Farmers interaction			
	No. of Technology Week Celebrations			
	Attended HRD activities organized by ZPD			
	Attended HRD activities organized by DES			
	Attended HRD activities by KVK Staff(Refresher /Short course, Training programme etc.)			
9	Current status of Revolving Funds (Amt. in Rs.)			
10		**No. of blocks**	**No. of villages**	
	Outreach of KVK in the District			
11		**ICAR**	**SAU**	**Others**
	No. of important visitors to KVK (nos.)			
12		**Working (Yes/No)**	**No. of Update**	
	Status of KVK Website			
13		**Application received**	**Application disposed**	
	Status of RTI (nos.)			
14		**Query received**	**Query dissolved**	
	Citizen Charter (nos.)			
15		**Working (Yes/No)**	**No. of programme viewed**	
	E-connectivity			
16		**Filled**	**Vacant**	
	Staff Position			
17	Workshop/ Seminar/ Conference attended by staff of KVK (nos)			
18	Publication received from ICAR /other organization (nos.)			
19		**Particulars**	**Organization**	
	Agri alerts (epidemic, high serious nature problem, Cyclone etc. reported first time to ZPD, SAU, Agri. Deptt. and ICAR)			

GENERAL INFORMATION

1.1. Staff Position

(Summary of Staff position in KVK as on March, 2016)

Name of KVK	Sanctioned Posts	PC (1)		SMS (6)		PA (3)		Admn. (6)		Total	
		Sanc.	Filled	Sanc.	Filled	Sanc.	Filled	Sanc.	Filled	Sanc.	Filled
Bolangir	16	1	-	6	4	3	2	6	5	16	11

Name of KVK	Sanction post	Name of the incumbent	Discipline	Higist degree	Subject of specilization	Pay scale	Present pay	Date of joiing	Per./Temp.	Category
Bolangir	Sr.Scientist & Head	**Vacant** *SMS(PP) is in charge of P.C.*								
Bolangir	Scientist 1	Kamalakanta Behera	Agril. Extension	M.Sc(Ag)	Agril. Extension	15600+6000	19810+6000	19.04.10	Permanent	Others
Bolangir	Scientist 2	Smt. Sasmita Purohit	Home Sc	M.Sc (H.Sc.)	Food & Nutrition	15600+6000	23070+6000	11.06.10	Permanent	Others
Bolangir	Scientist 3	Smt. Swagatika Srichandan	Horticulture	PhD	Vegetable Science	15600+6000	19810+6000	19.08.11	Permanent	Others
Bolangir	Scientist 4	Ashis Kumar Das	Plant Protection	M.Sc(Ag)	Agril. Entomology	15600+6000	23070+6000	26.12.11	Permanent	Others
Bolangir	Scientist 5	**Vacant**								
Bolangir	Scientist 6	**Vacant**								
Bolangir	Programme Assistant	**Vacant**								
Bolangir	Farm Manager	Sagarika Muna	Horticulture	M.Sc(Ag)	Horticulture	9300+4200	9705+4200	01.01.16	Contractual	Others
Bolangir	Computer Programmer	Sri Rabi Narayan Satapathy	Computer	MCA	Information technology	9300+4200	15240+4200	13.11.09	Permanent	Others
Bolangir	Accountant / superintendent	**Vacant**								
Bolangir	Stenographer	Pratima Nayak	Steno cum Comp. Operator	B.A (Arts)	-	5,200+2400	5670+2400	14.02.14	Contractual	ST
	Driver	Biswabasi Sarangi	Driver cum Mechanic	Under Matric	-	5,200+1900	5640+1900	14.02.14	Contractual	Others
	Driver	Upendra Mishra	Driver cum Mechanic	Matric	-	5200+1900	6600+1900	06.05.11	Permanent	Others
	Supporting staff	Prafulla Palei	Peon-cum-Watchman	Under Matric	-	4750+1500	6010+1300	28.06.14	Permanent	Others
	Supporting staff	Krushna Ch Rout	Peon-cum-Watchman	Under Matric		4750+1500	4750+1500	01.12.14	Permanent	Others

1.2. DISTRICT PROFILE (detail of geographical area, cultivation, Land, resources, opportunities, irrigation, populations etc.)–

KVK Name	Agro-climatic zone	No . of Blocks	No. of Panchayats	Population	Literacy	SC and ST Population	No. of farmers	Average land holding
Bolangir	West central table land zone	14	285	16,48,000	65.5	6,41,941	1,95,112	1.11 ha

01	Agro-climatic zone	West central table land zone	
01	Geographical area in ha		6,57,500
02	Location	Longitude	82^0 39’ E to 85^0 15’ E
		Latitude	20^0 9’ N to 21^0 5’ N
03	Forest area (ha)		154385
04	Cultivated area (ha)	Highland	1,89,325
		Medium land	70,155
		Low	85,995
		Total	3,45,475
05	Irrigated area (ha)	Kharif	**76,770**
		Rabi	**30,100**
06	No. of Sub-division		03
07	No. of Blocks		14
08	No. of G.P.		285
09	No. of D.A.O. circle		03
10	No. of A.A.O. circle		28
11	No. of PACS		160
12	No. seeds sale centre	Govt.	28
13	Population as per 2011 census		16,48,997
		Male	8,30,097
		Female	8,18,900
14	Sex ratio		984
15	SC Population		2,94,777
16	ST population		3,47,164
17	Literacy rate		65.50 %
18	Average holding size in ha		1.11
19.	Average Rain fall		1289 mm
20.	Soil type		Mixed Red & black, Red, Laterite & Mixed red and yellow

1.3. DETAILS OF ADOPTED VILLAGE during the reporting period (Approved by competent Authority in meetings/workshops)

KVK Name	Village Name	Year of adoption	Block Name	Distance from KVK	Population	Number of farmers (having land in the village)
Bolangir	Uparjhar	2013	Deogaon	32	1207	152
Bolangir	Kaudia	2013	Patnagarh	42	506	90
Bolangir	Saragada	2013	Gudvella	39	634	98
Bolangir	Banabahal	2013	Puintala	20	534	103
Bolangir	Kareldhua	2010	Saintala	35	592	112

1.4. THRUST AREAS identified by KVK (Approved by competent Authority in meetings/workshop)

KVK Name	THRUST AREA
Bolangir	Crop diversification
Bolangir	Integrated Nutrient Management practices
Bolangir	Integrated Disease and Pest Management
Bolangir	Quality seeds and seedling production
Bolangir	Income generating activities for rural women/ school dropouts
Bolangir	Value addition to seasonal vegetables/fruits
Bolangir	Proper health management of domestic animals & birds
Bolangir	Weed management & Soil processing
Bolangir	Substitution of ruling varieties with improved/hybrid varieties
Bolangir	Market linkage and production strategies
Bolangir	Recycling of farm wastes through vermicomposting
Bolangir	Farm mechanization/drudgery reduction of farm women
Bolangir	Off season vegetable cultivation
Bolangir	Promotional of nutritional garden for nutritional security
Bolangir	Introduction of suitable varieties with improved packages of practices
Bolangir	Effective use of family labour through need based livelihood option

1.4. PROBLEM IDENTIFIED by KVK (Approved by competent Authority in meetings/workshop)

KVK Name	Problem identified	Methods of problem identification	Location Name of Village & Block
Bolangir	Severe soil erosion in sloppy uplands	Through PRA tools and Discussion with the group of farmer, farm women and rural youth	Budabahal,saintala Banabahal, Puintala
Bolangir	Soil acidity - Poor knowledge about soil testing and soil health management	Through District soil map and discuss with line department officers (Soil Chemist) and sample soil testing	Saragada, Gudvella Kaudia, Patnagarh, Budabahal,saintala
Bolangir	Non availability of waste land management techniques	Group discussion, PRA in sample villages	Kaudia, Patnagarh Uparjhar, Deogaon
Bolangir	Low and imbalance use of manures and fertilizers in all crops	Farmers meetings, harvest report, sample testing of crop & discuss with line department officers	Kareldhua, Saintala Banabahal, Puintala
Bolangir	Severe crop weed competition in Kharif upland crops	Discuss with farmers, crop observation, sample study and PRA	Saragada, Gudvella Uparjhar, Deogaon, Budabahal,saintala
Bolangir	Non availability of adequate inputs (seed, fertilizer, pesticides) in time	Discuss with farmers and fertilizer dealers, discuss with district administration and JQCI of agriculture department	Budabahal,saintala Banabahal, Puintala Saragada, Gudvella Kareldhua, Saintala,
Bolangir	Lack of storage facility for fruits and vegetables	Sample study, discuss with district civil officer, discuss with fruit & vegetable merchant, discuss with farmers and horticulture officer	Kareldhua, Saintala Kaudia, Patnagarh Uparjhar, Deogaon
Bolangir	Poor nutrient status and low water holding capacity of soil	Discuss with soil chemist & soil scientists of Zonal Research Station & ICAR institute and sample testing of soils of different villages	Banabahal, Puintala Saragada, Gudvella Uparjhar, Deogaon Budabahal,saintala
Bolangir	Lack of irrigation facility during Rabi/Summer except Hirakud command area	Discuss with farmers, discuss with irrigation department & district civil administration and personal observation during field visit.	Saragada, Gudvella Kaudia, Patnagarh Kareldhua, Saintala
Bolangir	Low availability and adoption of dryland farming technique	Through PRA tools and Discussion with the group of farmer, farm women and rural youth	Banabahal, Puintala Uparjhar, Deogaon Saragada, Gudvella
Bolangir	Inadequate knowledge about post harvest technology	Discuss with village leaders and old farmers, discuss with line department, sample observation, personal observation during field visit	Budabahal,saintala Banabahal, Puintala

2. On Farm Testing

Note-

*** Thematic area should be spelled correct and follow standard pattern i.e. Integrated Nutrient Management in place of INM or Inte. Nutrient Mngt. Etc.**

***Crop name should be spelled correct and standard English name should be used i.e Chick pea in place of gram/chana , Paddy in place of Rice/chawal , brinjal in place of egg plant/bhata/baigan etc.**

***Don't press enter key to navigate among column use arrow or tab key**

***don't add space before or after statement within the table cell**

2.1 Information about OFT

KVK name	Year	Season	Problem diagnose	Title of OFT	Category of technology (Assessment / Refinement)	Thematic Area	Crop/ enterprise	Farming Situation	No. of trial	Results (q/ha)			Net Returns (Rs./ha)			Recommendations
										FP (T_1)	RP (T_2)	T3	FP (T_1)	RP (T_2)	T3	
Bolangir	2015-16	Kharif	Low and wide variation of yield due to sowing at arrival of monsoon (july 1st wk)	Assessment of effect of different date of sowing in yield of Cotton	Assessment	Crop production	Cotton	Irrigated /Rainfed upland	7	5.74	6.25	6.42	13830	16125	16890	Ideal time of sowing Cotton is 4th week of June
Bolangir	2015-16	Kharif	Limited /No source of income for farm family in lean season due to late harvesting of grain maize	Assessment of suitable baby corn for income generation and fodder for livestock during lean season	Assessment	Crop Diversification	Corn	Irrigated upland	13	-	38	34		30000	23000	Ideal for fodder with av. yield of 18.5 t/ ha. when there is dearth of fodder for livestock

Bolangir	2015-16	Kharif	Low yield from paddy due to moderate/severe weed infestation in upland condition	Assessment of performance of herbicides in transplanted paddy	Assessment	Weed management	Paddy	Rainfed upland	10	35	40.2	40.8	18000	23240	23460	Application of Ethoxysulfuron @ 75 gm/ ha at 0-5 DAT
Bolangir	2015-16	Kharif	Difficulty in plucking mango in existing mango orchards due to erratic branching and excess height, weak crotch	Assessment of canopy management in new mango orchard	**Assessment**	Crop management	Mango	Irrigated upland	13	-	-	-	-	-	-	
Bolangir	2015-16	kharif	Low yield of chilli due to inadequate nutrient availability through drip irrigation	Assessment on fertigation in drip irrigated chilli	**Assessment**		Chilli	Irrigated upland	7	150	182	173	208100	269750	249825	
Bolangir	2015-16	Kharif	Low yield from cultivation of local varieties of Banana	Assessment on performance of tissue culture Banana	**Assessment**	Varietal substitution	Banana	Irrigated upland	7	346.8	675	621	137100	497500	444000	

Bolangir	2015-16	Kharif	Low yield of Brinjal due to poor flower & fruit setting caused by little leaf disease	Assessment of chemical management against little leaf in Brinjal	Assessment	Integrated Pest Management	Brinjal	Irrigated up land	13	273.5	310.7	318	152800	176560	182400	Drenching of tetracycline @ one tab/ 100 ml water for 3 days and need based spraying of Acetamiprid 20 SP @ 0.3 gm/ lit OR Spinosad 45SC @ 0.5 ml/lit at 10DAI
Bolangir	2015-16	Rabi	Low yield from local varieties of brinjal and disease and pest infestation	Assessment of performance of brinjal var. Arka Neelachal Shyama and Arka Neelachal Kranti	**Assessment**	Varietal substitution	Brinjal	Irrigated medium land	10	340	365	392	120750	133300	149500	
Bolangir	2015-16	Rabi	Low yield due to Imbalance male and female flowering resulting poor fruit setting	Assessment on application of growth regulator ethephon in Pumpkin	**Assessment**		Pumpkin	Irrigated medium land	13	272	325	307	100000	130300	118400	
Bolangir	2015-16	Rabi	Low yield of Groundnut due to severe weed infestation in upland condition	Assessment of suitable herbicides against weed management in Groundnut	Assessment	Weed management	Ground-nut	Irrigated upland	5	10.36	13.12	13.36	26800	36600	37800	Pre-emergence herbicide, Oxyflourofen @ 200ml/ha at 0-3 DAS, post emergence application of Quizolfop ethyl @ 1000ml/ha at 15-20 DAS , OR application of Imazethapyr @ 750 ml/ha at 15-20 DAS

Bolangir	2015-16	Rabi		Analysing various steps and channels involved in marketing of vegetables from farm to plate	Assessment	Market-led approach	Vegetables	Irrigated upland	30							Continuing
Bolangir	2015-16	Rabi	Farmer's are not getting Agril. related information regularly and timely	Assessment of effectiveness of KMA in adoption of Greengram cultivation	Assessment	ICT	Greengram	Irrigated upland	50							Continuing

2.2 Economic Performance

KVK name	OFT Title	Parameters			Average Cost of cultivation (Rs/ha)			Average Gross Return (Rs/ha)			Average Net Return (Rs/ha)			Benefit-Cost Ratio (Gross Return / Gross Cost)		
		Name and unit of Parameter	FP (T_1)	RP (T_2)	FP (T_1)	RP (T_2)	Refined Practice, if any (T_3)	FP (T_1)	RP (T_2)	Refined Practice, if any (T_3)	FP (T_1)	RP(T_2)	Refined Practice, if any (T_3)	FP (T_1)	RP (T_2)	Refined Practice, if any (T_3)
Bolangir	Assessment of effect of different date of sowing in yield of Cotton	Days to first plucking; no Boll dia; cm	137 3.38	129.2 3.72	12000	12000		25830	28485		13830	16485		2.15	2.37	-
Bolangir	Assessment of suitable baby corn variety for income	Length of Corn(dehusked):cm Fodder yield /ha. :Ton		10.118		27500	-		54000			26500			1.9	

	generation and fodder during lean season															
Bolangir	Assess-ment of performa-nce of herbicides in transplant-ed paddy	Weed biomass; gm	118.5	38.5	24000	25250		42000	48600		18000	23350		1.7	1.91	
Bolangir	Assessment of canopy management in new mango orchard	Continuing														
Bolangir	Assessment on fertigation in drip irrigated chilli	Pod length(cm), pod girth(cm)	6.7, 2.6	9, 3.1	91900	95212.5	-	300000	364000	-	208100	259787.5	-	3.3	3.75	-
Bolangir	Assessment on performance of tissue culture Banana	Bunch weight(kg)	17	25	270900	306850	-	408000	777600	-	137100	470750	-	1.5	2.53	-
Bolangir	Assessment of chemical management against little leaf in Brinjal	Extent of top leaf infestation ; %	22.7	13.46	66000	72000		218800	248560		152800	176560		3.31	3.45	
Bolangir	Assessme	No. of	5	7	8325	85700	-	204000	227100	-	120750	141400	-	2.45	2.63	-

	nt on performance of brinjal var. Arka Neelachal Shyama and Arka Neelachal Kranti	fruits/kg			0											
Bolangir	Assessment on application of growth regulator ethephon in Pumpkin	No. of fruits/plant	2.7	4.2	63200	65250	-	163200	189600	-	100000	124350	-	2.7	3.65	-
Bolangir	Low yield of Groundnut due to severe weed infestation in upland condition	No. of pods/plant(no.) No. of weed/ sq. mt.(no.)	16 395	21.53 32.13	25000	29000		51800	68550		26800	39550		2.07	2.36	
Bolangir	Analysing various steps and channels involved in marketing of vegetables from farm to plate	continuing														
Bolangir	Assessment of effective-ness of KMA in adoption	continuing														

	of Green-gram cultivation															

2.3 Information about Home Science OFT:

KVK Name	Year	Season	Problem diagnose	Title of OFT	Category of technology (Assessment/ Refinement)	Thematic Area	Details of Technology Selected for Assessment	Characteristics of Technology / Variety / Product / Enterprise	Farming / Enterprise Situation	No. of trials	Recommendations
Bolangir	2015	Kharif	Nonavailability of quality fodder to milch cow through out the year leading to low milk yield	Assessment of suitable fodder in backyard for milch cow	Assessment	Fodder cultivation	2 noded slits as planting materials,planting at 60*60 cm with application of FYM	Sweet in taste,continues in the field for 2 to 3 yrs,production starts after 60 days from date of sowing,yield-400-500 qtl/ha	Irrigated backyard	13s	kharif is suitable time for sowing and. as napier is good source of protein it enhances milk yield
Bolangir	2015-16	Rabi	Low spread of Oyster mushroom due to inadequate availability of quality and quantity of paddy straw	Assessment of different substrates for Oyster mushroom production	Assessment	Mushroom cultivation	Cutting the substrates into 2 inches,soaking in water for 20-30 hrs,boiling the substrates for 30-60 mins.,preparation of bed by using 200 gm of spawn inside a polythene of80x40 cm	Colour is grey during initiation of fruiting,later changes to white,biological efficiency 82-93 %,Production time Nov-Feb,	Enterprise	13	Farmers with inadequate provision of paddy straw may take cotton stalk,maize stover as alternate substrate
Bolangir	2015-16	Rabi	High drudgery & low efficiency of farmwomen involved in weeding manually	Assessment of drudgery reducing weeder for farmwomen for weed management in Brinjal	Assessment	Drudgery reduction	Weeding by using wheel hoe weeder and rake weeder in brinjal 2-3 times at 10 days interval	Having wt. 5kg,works upto a depth of50 mm	Enterprise	13	Suitable technology for reduce the drudgery of farmwomen & the intercultural operation is easier & working well in dry moisture condition of soil.
Bolangir	2015-16	Rabi	High drudgery & low efficiency due to use of traditional hand winnowing	Assessment of power operated paddy winnower for drudgery reduction of farmwomen	Assessment	Drudgery reduction	Separation of chaff through paddy winnower	Output 48kg/hr.	Enterprise	13	Good technology for drudgery reducing & time saving

2.4 Economic Performance Home Science OFT:

KVK name	OFT Title	Performance Indicator / Parameter																					
		Output m2/h		Est. Energy Expenditure kj/min.		WHR beat/min		% reduction in drudgery		% increase in efficiency		Production per unit		Cost of input		Incremental income		Yield(Kg/ha)		Net Return		Saving in Rs	BC ratio
		T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2		
Bolangir	Assessment of suitable fodder in backyard for milch cow											480 lits/4 month/cow	570 lits/4 month/cow	7500	8500	12480	14820	480 lits/4 month/cow	570 lits/4 month/cow	4980	6320	1340	1.74
Bolangir	Assessment of different substrates for Oyster mushroom											20	14180	300	300	1600	11201440 0	20	14180	1300	820114 0 - 300	-480 -160 -1600	3.84.80
Bolangir	Assessment of drudgery reducing weeder for weed management in Brinjal	45	150	10	4.58	102	127		54.2		233												
Bolangir	Assessment of power operated paddy winnower for drudgery reduction	30	48	19.44	14.53	116	128	-	25.2	-	60												

	of farmwomen																					

2.5 Feedback from KVK to Research System

Name of KVK	Feedback
Bolangir	Length may be adjusted according to the height of the worker in wheelhoe weeder
Bolangir	Development of technology to minimize infection of mushroom in cultivation on substrate of drumstic
Bolangir	Calcium nitrate and magnesium sulphate when mixed causes choking of drip pipes, hence this may be subject to research
Bolangir	Low cost safer molecule may be recommended as a substitute for Spinosad and other novel molecules as they are very costly for farmers to use , though have promising effect
Bolangir	Mahua seed decorticator of adjustable height and more capacity may be developed
Bolangir	Short duration paddy var. with higher yield potential may be developed, preferably 90-100 days duration.
Bolangir	Safer and eco-friendly Molecules may be developed which may reduce the evapotranspiration in crops to combat drought like situation
Bolangir	Brinjal variety tolerant to little leaf disease of Brinjal through GMO may be developed

3. Achievements of Frontline Demonstrations

3.1. Follow-up for results of FLDs implemented during previous years

List of technologies demonstrated and popularized during previous years and recommended for large scale adoption in the district

KVK Name	Crop/ Enterprise	Thematic Area	Technology demonstrated	Details of popularization methods suggested to the Extension system	Horizontal spread of technology		
					No. of villages	No. of farmers	Area in ha
Bolangir	Marigold	Varietal substitution	Marigold var. Serakole planting at spacing of 45X30 cm, cultivation year round	Field day, Training to extension functionaries, Diagnostic visit	20	80	45
Bolangir	Paddy	Integrated Pest management	Rope dragging to dislodge leaf folders, Soil application of Fipronil @ 20 kg/ha., Release of Trichogramma parasite @ 50000/ha three times at 10 days interval, need based spraying of Monocrotophos @ 2ml/lit.	Field day, extension functionaries, media coverage	20	220	15
Bolangir	Maize	Integrated Pest management	Application of 4-5 granules of carbofuran per whorl, Erection of bird percher @ 10/ha, need based application of Profenophos @ 2ml/lit	Field day, extension functionaries, training	40	80	35
Bolangir	Brinjalp	Integrated Pest management	Destruction of infested shoots, Erection of Pheromone trap @ 20/ha. Need based spraying of cartap hydrochloride @ 1.5 gm/lit and triazophos @ 2.5 ml/lit alternately at 10 days interval	Field day, Training to extension functionaries, Diagnostic visit	50	400	80
Bolangir	Cauliflower	Integrated Pest management	Growing Mustard in bunds as trap crop for DB moth, Erection of PT @ 20/ha. Need based spray of Indoxacard + Novaluron @ 1 ml/lit	Field day, Training to extension functionaries, Diagnostic visit	16	200	30
Bolangir	Paddy	Weed Management	Pre-emergence application of herbicide Metsulfuron methyl + Chlorimuron ethyl @ 20 gm/ha. by mixing 40 kg sand	Field day, Training to extension functionaries, Diagnostic visit	10	50	30
Bolangir	Chilli	INM	Application of Zinc sulphate@ 25 kg/ha during final land preparation.	Field day, Training to extension functionaries, Diagnostic visit	8	20	5
Bolangir	Greengram	Crop management	Seed dressing, application of herbicide; soil application of Zypmite ,1% DAP (foliar spray), need based PP measures	Field day	30	200	50
Bolangir	Enterprise	Drudgery reduction	Demonstration of Mahua seed decorticator for drudgery reduction	Field day	16	150	-
	Livestock	Fodder management	Demonstration of urea treated straw as feed for milch cow	Field day	18	45	-

Note-

*** Thematic area should be spelled correct and follow standard pattern i.e. Integrated Nutrient Management in place of INM or Inte. Nutrient Mngt. Etc.**

***Crop name should be spelled correct and standard English name should be i.e Chick pea in place of gram, Paddy in place of Rice , brinjal in place of egg plant etc.**

***Don't press enter key to navigate among col use arrow or tab key**

***don't add space before or after statement within the table cell**

3.2 Details of FLDs implemented

KVK Name	year	Season	Thematic area	Technology demonstrated	Name of Crop/ Enterprise	Name of Variety/Technology/ Entreprizes	Crop- Area (ha) / Entrep - No.	Results (q/ha)		% change	No. of farmers				
								FP (T_1)	RP (T_2)		SC	ST	Others	General	Total
Bolangir	2015-16	Kharif	Varietal substitution	Short duration drought resistant variety, spacing 20X10 cm, line transplanting, NPK-80-40-40	Paddy	Sahabhagi	1	30	35	16	-	-	7	-	7
Bolangir	2015-16	Kharif	Weed management	Pre-emergence application of herbicide Metsulfuron methyl + Chlorimuron ethyl @ 20 gm/ha. by mixing with 40 kg sand	Paddy	Pooja	2	36	41	13.8	-	-	10	-	10
Bolangir	2015-16	Kharif	Varietal substitution	Kh onion, spacing-20X10 cm, seed rate 15 kg/ha, NPK-150:40:50, preemergence weedicide- pendimethalin @2.5 l/ha	Onion	Bhima Shweta	0.5	282	333	18	2	2	5	1	10
Bolangir	2015-16	Kharif	Ornamental Horticulture	Planting time-Aug(Kh), Nov(rabi), Feb(summer), spacing-45X45(Kh), 45X30(Rabi), 30X30(Summer)	Marigold	Serakole	0.5	110	132.6	20.5	3	3	3	1	10
Bolangir	2015-16	Kharif	Integrated Pest management	Erection of yellow trap @ 20/ha., Need based spraying of Diafenthiuron 50 WP @ 1gm/lit for management of whitefly	Brinjal	Charpolia	1	261.9	314.7	20.16	-	-	10		10
Bolangir	2015-16	Kharif	Integrated Pest management	Clipping of leaf tips at transplanting, Erection of bird percher @ 20/ha, Spraying of Flubendiamide 20 WP @ 1gm/ lit	Paddy	Pooja	2	30.17	38.07	28.1	-	-	10		10
Bolangir	2015-16	Kharif	Pulse Production	Seed rate 20 kg/ha, Spacing 60x30 cm, Seed dressing with Rhizobium @ 20 gm/kg, RDF, Need based PP measures	Redgram	Asha	5	9.2	13.8	50	2		9	2	13
Bolangir	2015-16	Rabi	Integrated Nutrient Management	Application of Zinc sulphate@ 25 kg/ha during final land preparation.	Chilli	Krishna	2	150	182	21.3	2	2	5	1	10
Bolangir	2015-16	Rabi	Varietal substitution	Hybrid tomato, Spacing-1.5X0.9m, stacking, pruning of shoots,seed rate-500gm, borax and zinc @25 kg/ha	Tomato	Swarna Sampad	0.5	320	770	140	2	2	5	1	10
Bolangir	2015-16	Rabi 2015-16	Pulse Production	seed dressing, soil micro nutrients zinc sulphate ,Plant Protection measures as per need	Chickpea	JAKI 9218	10	4.5	14.8	228	8	4	13		25
Bolangir	2015-16	Rabi 2015-16	Oilseed Production	soil micronutrients application zinc sulphate & Boron,PP Chemical as per need	Mustard	Parvati	10	3	6.8	126	4	3	18		25
Bolangir	2015-16	Rabi 2015-16	Pulse Production	Application of Herbicide,nutrient spray &Plant protection measures as per need	Groundnut	ICGV 91114	10				4	2	32		38

Bolangir	2015-16	Rabi 2015-16	Pulse Production	Seed dressing, application of herbicide & soil application of Zypmite plus,1% DAP as foliar spray, need based PP measures	Greengram	Pusa 9072	30	4	7.6	90	15	6	54		75
Bolangir	2015-16	Rabi 2015-16	Integrated Pest management	Sowing of Mustard along the bund of Cauliflower, Erection of P. trap for DB moth and need based spraying of Indoxacarb + Novaluron10 EC @ 1 ml/ lit. and Diafenthiuron 50WP @ 1 gm/lit alternately at 7 days interval	Cauliflower	Snowball	1	322.5	362.2	12.3	2	-	8		10

3.3 Economic Impact of FLD

KVK Name	Technology demonstrated	Name of Crop/ Enterprise	Parameters			Cost of cultivation (Rs/ha)		Gross Return (Rs/ha)		Average Net Return (Rs/ha)		Benefit-Cost Ratio (Gross Return / Gross Cost)	
			Name and unit of Parameter	FP (T_1)	RP (T_2)	FP (T_1)	RP (T_2)	FP (T_1)	RP (T_2)	FP (T_1)	RP (T_2)	FP (T_1)	RP (T_2)
Bolangir	Short duration drought resistant variety, spacing 20X10 cm, line transplanting, NPK-80-40-40	Paddy	Plant height(m), test weight(gm),no. of grains/panicle	1.12, 22,110	1.25, 24, 107	29300	29300	39300	45850	10000	16550	1.3	1.56
Bolangir	Pre-emergence application of herbicide Metsulfuron methyl + Chlorimuron ethyl @ 20 gm/ha. by mixing with 40 kg sand	Paddy	weed control efficiency Man days required	85 81	81 29	24000	26000	44660	50050	20660	24050	1.8	1.9
Bolangir	Kh onion, spacing-20X10 cm, seed rate 15 kg/ha, NPK-150:40:50, preemergence weedicide-pendimethalin @2.5 l/ha	Onion	Diameter of bulb(cm), average bulb weight(gm)	4.3, 78	6.5, 110	96340	107325	225600	266400	129260	159075	2.3	2.5
Bolangir	Planting time-Aug(Kh), Nov(rabi), feb(summer), spacing-45X45(Kh), 45X30(Rabi), 30X30(Summer)	Marigold	Flowering season, Durability(days), number of flowers/plant	Winter, 2, 59	Year round, 6, 67	80350	92728	132000	186633	51650	93905	1.6	2.01

Bolangir	Erection of yellow trap @ 20/ha., Need based spraying of Diafenthiuron 50 WP @ 1gm/lit for management of whitefly	Brinjal	Extent of leaf infestation Whitefly/plant; no	25.6 108	12.1 52	66000	70000	209520	251760	143520	181760	3.17	3.59
Bolangir	Clipping of leaf tips at transplanting, Erection of bird percher @ 20/ha, Spraying of Flubendiamide 20 WP @ 1gm/ lit	Paddy	Dead Heart/ sq. mt; no Extent of Infestation; %	1.78 21	0.67 9.1	25000	28500	36204	45684	11204	17184	1.44	1.60
Bolangir	Seed rate 20 kg/ha, Spacing 60x30 cm, Seed dressing with Rhizobium @ 20 gm/kg, RDF, Need based PP measures	Redgram	No of pods/plant	165	268	23500	28000	41400	62100	17900	34100	1.7	2.2
Bolangir	Application of Zinc sulphate@ 25 kg/ha during final land preparation.	Chilli	Pod length(cm), pod girth(cm)	6.7, 2.6	9, 4	91900	94250	300000	364000	208100	269750	3.3	3.9
Bolangir	Hybrid tomato, Spacing-1.5X0.9m, stacking, pruning of shoots,seed rate-500gm, borax and zinc @25 kg/ha	Tomato	Number of fruits/plant, plant height(cm)	43, 58	72, 80	60000	80000	160000	385000	100000	305000	2.7	4.8
Bolangir	seed dressing, soil micro nutrients zinc sulphate ,Plant Protection measures as per need	Chickpea	No of pods/plant	105	40	15000/-	27000/-	22,500/-	70400/-	7,500/-	43,400	1.5	2.6
Bolangir	soil micronutrients application zinc sulphate & Boron,PP Chemical as per need	Mustard	No of siliqua/plant	70	180	10000	18000	18000	40,800	8000	22800	1.8	2.26
Bolangir	Application of Herbicide,nutrient spray &Plant protection measures as per need	Groundnut	continuing										

Bolangir	Seed dressing, application of herbicide & soil application of Zypmite plus,1% DAP as foliar spray, need basedPP measures	Greengram	No of pods/plant No of seeds/pod	22 6	30 10	12000	20,000	24000	45600	12000	25600	2	2.28
	Sowing of Mustard around the bund of Cauliflower, Erection of pheromone trap for Diamond back moth and need based spraying of Indoxacarb + Novaluron10 EC @ 1 ml/ lit. and Diafenthiuron 50WP @ 1 gm/lit alternately at 7 days interval	Cauliflower	Extent of Infestation; % Larva per 10 plants : No	27.5 11.67	11.25 0.55	75000	80000	258000	289760	183000	209760	3.44	3.62

3.4 Information about Home Science FLDs

KVK name	Year	Season	Thematic Area	Problem Identified	Technology to be Demonstrated as Solution to the Identified Problem	Crop/ Enterprise (crop/ Enterprise or Farming Activity)	Name of Variety/Technology/Entreprizes	Farming Situation	Proposed area (ha)	No. of Beneficiaries
Bolangir	2015	Kharif	Poultry management	Low income of farmwomen due to low productivity of local breed	Enterprise	*R.rooster chicks*	Rearing of 8 days old R.rooster chicks with proper vaccination & feed management	Homestead	150 chicks	10
Bolangir	2015	Kharif	Low cost protected raising of seedlings	Low germination,high mortality due to open space and water logging.	Enterprise	Nursery raising inside low cost polytunnel	Low cost polytunnel can cover the bed in ht. of 2 ft from the soil and can partially control the temp. & humidity for better germination of seedling	Homestead	10 unit (360 cubic ft)	10
Bolangir	2015-16	Rabi	mushroom cultivation	In adequate availability of paddy straw restricts spread of oyster mushroom cultivation	Enterprise	*P.sajorcaju*	Soaking ground nut hull in water for 20 hrs,boiling in water for 30 mins ,drain excess water &preparation of bed	Homestead	200 spawn bottles	10

Bolangir	2015	Kharif	Drudgery reduction	Low efficiency of farmwomen involved in mahua seed decortication manually	Enterprise	Mahua seed decorticator	Using Mahua seed decorticator for drudgery reduction of farm women	Homestead	1 no	10
Bolangir	2015-16	Rabi	Feed management of live stock	Low yield of milk due to eating untreated straw	Enterprise	Feeding of urea treated straw to milch cow	First soak 10 kg urea in water for 15 mins,drain out excess water ,prepare a paste by adding 150 gm maize powder+100 gm salt+150 gm Jaggery+200 gm dicalcium phosphate in 1 lit of water.Add the paste in soaked straw and cover a polythene for 4 hrs & give it to milch cow @ 3 kg	Homestead	1 qtl straw	10

3.5 Economic Performance Home Science FLDs:

KVK name	FLD Title	Performance Indicator / Parameter																					
		Output m2/h		Est. Energy Expenditure kj/min.		WHR beat/min		% reduction in drudgery		% increase in efficiency		Production per unit		Cost of input(Rs)		Incremental income(Rs)		Yield(Kg/ha)		Net Return Rs		Saving in Rs	BC ratio
		T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2	T1	T2
Bolangir	Demonstration of performance of dual purpose breed of poultry-R.rooster											1.75kg/bird 50 eggs/yr	3.5kg/bird 180eggs/yr	350	500	687	1585	1.75kg/bird 50 eggs/yr	3.5kg/bird 180eggs/yr	337	1085	748	3.17
Bolangir	Demonstration of Low cost polytunnel for off season nursery raising											900 nos seedlings	1500 nos seedlings	320	500	900	1500	900 nos seedlings	1500 nos seedlings	580	1000	420	3
Bolangir	Demonstration of Oyster mushroom by groundnut hull as substrate											2kg/bed	1.8kg/bed	30	30	160	144	2 kg/bed	1.8kg/bed	130	114	16	4.8

Bolangir	Demonstration of Mahua seed decorticator for drudgery reduction	1.7	9.8	404.93	57.58	127	114		85.78		476											
Bolangir	Demonstration of urea treated straw as feed for milch cow											4lit/day/cow	5lit/day/cow	10	20	120//day/cow	150/day/cow	4lit/day/cow	5lit/day/cow	110	130	20	7.5

Production per unit : Kg/ 30 beds(i.e. unit) , **Yield (Kg/ha.)** : kg/ 30 beds (i.e. unit)

Production per unit : no.of eggs / 30 birds(i.e. unit), **Yield (Kg/ha.)** : body weight in kg / 30 birds/year (i.e. unit)

Production per unit : Kg/ 30 beds(i.e. unit) , **Yield (Kg/ha.)** : kg/ 30 beds (i.e. unit)

3.6 Training and Extension activities proposed under FLD

KVK Name	Crop	Activity	No. of activities to be organized	Number of participants	Remarks
Bolangir	Paddy	Farmers Training, Field day	1, 1	25, 40	Demonstration beneficiaries selected from the trainees
Bolangir	Marigold	Vocational Training	1	10	Demonstration beneficiaries selected from the trainees
Bolangir	Onion	Farmers Training	1	25	Farmers group meeting conducted
Bolangir	Tomato	Farmers Training, Field day	2, 1	25, 30	Farmers group meeting conducted
Bolangir	Chilli	Farmers Training	1	25	Farmers group meeting conducted
Bolangir	Okra	Field day Farmers Training	1 1	30 25	Demonstration beneficiaries selected from the trainees
Bolangir	Greengram	Field day Farmers Training	1 1	30 25	Demonstration beneficiaries selected from the trainees
Bolangir	Mango	Field day Farmers Training	1 1	30 25	Demonstration beneficiaries selected from the trainees

3.7 Details of FLD on crop hybrids.

S. No.	Name of the KVK	Name of the Crop	Name of the Hybrids	Source of Hybrid (Institute/Firm)	No. of farmers	Area in ha.
1	Bolangir	Tomato	Swarna Sampad	ICAR, RCER, Ranchi	10	0.5
2	Bolangir	Chilli	Krishna	VNR	10	2

4. Feedback System

4.1. Feedback of the Farmers to KVK

Name of KVK	Feedback			
	Technology appropriations	Methodology used	Benefits of OFT/FLD	Future Adoption
Bolangir	Cultivation of Serakole variety of Marigold instead of local varieties.	Serakole can be cultivated throughout the year(3 crop per year)	Increase in B:C from 1.6 to 2.01 and self life from 2 to 6 days.	Expected adoption in 20 ha area.
Bolangir	Cultivation of indeterminate variety of tomato, Swarna sampad instead of determinate variety, JK Desi	Swarna sampad is suitable under both protected cultivation and open condition during du	Increase in B:C from 2.7 to 4.8 and number of fruits/plant from 43 to 72	Expected adoption in 57 ha area.
Bolangir	Paddy straw Mushroom cultivation through loose straw	Loose Paddy straw straw instead of neatly cut straw was used in growing Paddy straw mushroom	Yield obtained at par with the method using well cut paddy straw i.e. 1.3 kg/ bed.	Expected adoption by 500 farm families as loose straw is available adequately wrt straw in bundles .

4.2. Feedback from KVK to Research System.

Name of KVK	Feedback basic of OFT on Technology Tested
Bolangir	Canopy management with open center during the month of Oct-Nov at 75 cm from ground level ,allowing 4 primary and 3 secondary is the best.
Bolangir	In fertigation method through drip irrigation system,time of application should be adjusted depending upon the stage of crop.
Bolangir	Mahua seed decorticator of adjustable height and more capacity may be developed
Bolangir	Egg laying capacity of Rainbow rooster may be increased
Bolangir	Short duration paddy var. with higher yield potential may be developed, preferably 90-100 days duration.
Bolangir	Safer and eco-friendly Molecules may be developed which may reduce the evapotranspiration in crops to combat drought like situation

4. Documentation of the need assessment conducted by the KVK for the training programme

Name of KVK	Category of the training	Methods of need assessment	Date and place	No. of participants involved
Bolangir	FW/RY	Group meeting of Farmers, Training	27.04.15/Banbahal 30.04.15/Banbahal	25
Bolangir	FW/RY	Group meeting of Farmers, Training	20.06.15/ Tamiyan	30
Bolangir	FW/RY	Group meeting of Farmers, Training	30.06.15/ KVK	15
Bolangir	FW/RY	Farmers Scientist Interaction & Farmers fair	2.07.15/ Uparjhar	100
Bolangir	FW/RY	Group meeting of Farmers, Training	21.07.15/ Kareldhua	25
Bolangir	FW/RY	Group meeting of Farmers, Training	31.07.15 / Magurbeda	25
Bolangir	FW/RY	Group meeting of Farmers, Training	29.08.15/ Dhanrdadar	25
Bolangir	FW/RY	Group meeting of Farmers, Training	28.09.15/ Uparjhar	25
Bolangir	FW/RY	Group meeting of Farmers, Training	29.09.15/ Saragada	25
Bolangir	FW/RY	Group meeting of Farmers, Training	29.10.15/ Kaudia	25
Bolangir	FW/RY	Group meeting of Farmers, Training	30.10.15/ Kareldhua	25
Bolangir	FW/RY	Gap analysis	09.11.15/ Bolangir	30
Bolangir	FW/RY	Gap analysis	12.11.15/ Agalpur	30
Bolangir	FW/RY	Group meeting of Farmers, Training	18.12.15/ Kaudia	25
Bolangir	FW	Group meeting of Farmers, Training	23.12.15/ Budabahal	25
Bolangir	FW/RY	RKVY training	08.01.16/ Gudvella	25
Bolangir	FW/RY	Farmers Scientist Interaction & Farmers fair	13.02.16/ Budabahal	100
Bolangir	FW/RY	Technology week celebration	17.03.16/ Tamiyan	
Bolangir	IS	Meeting with Extension Personnels	21.06.14/ DDA Office	12
Bolangir	IS	Value Chain analysis on CDAP	18.08.15/ DDA office	30
Bolangir	IS	Group discussion Question & Answer method	05.12.14/ DDA office	70

Abbreviation Used

FW	(A) Farmers & Farm Women
RY	(B) Rural Youths
IS	(C) Extension Personnel
ONC	On Campus Training Programme
OFC	Off Campus Training Programme
M	Male
F	Female
T	Total
Thematic Areas for Training	
CRP	Crop Production
HOV	Horticulture – Vegetable Crops
HOF	Horticulture-Fruits
HOO	Horticulture- Ornamental Plants
HOP	Horticulture- Plantation crops
HOT	Horticulture- Tuber crops
HOS	Horticulture- Spices
HOM	Horticulture- Medicinal and Aromatic Plants
SFM	Soil Health and Fertility Management
LPM	Livestock Production and Management
WOE	Home Science/Women empowerment
AEG	Agril. Engineering
PLP	Plant Protection
FIS	Fisheries
PIS	Production of Inputs at site
CBD	Capacity Building and Group Dynamics
AGF	Agro-forestry
OTH	Others
RYH	Rural Youth
EXP	Extension Personnel

5. TRAINING PROGRAMMES

1. **Training programmes should be strictly covered under above mentioned thematic areas only,**
2. **For category, training type and thematic area, mention code/abbreviations only**

Table 5.1. Details of Training programmes conducted by the KVKs

Name of KVK	Cate-gory	Training Type	Thematic area	Training Title	No. of Courses	Duration (Days)	Participants							
							Gen		SC		ST		Others	
							M	F	M	F	M	F	M	F
1	2	3	4	5	7	8	9	10	11	12	13	14	15	16
Bolangir	FW	OFC	HOV	Off season cultivation in pumpkin	1	1	-	-	-	-	4	-	21	-
Bolangir	FW	OFC	SFM	Soil testing and interpretation of result for judicious fertilizer use	1	1	-		--	-	-	-	25	-
Bolangir	FW	OFC	HOF	Manuring and fertilization in mango	1	1	-	-	-	-	4	-	21	-
Bolangir	IS	OFC	HOF	Orchard planning and lay out	1	1	-	-	1	1	-	-	8	-
Bolangir	FW	OFC	HOV	Seedling raising in kharif onion	1	1	-	-	3	-	-	-	22	-
Bolangir	FW	OFC	CRP	Weed management in Paddy	1	1	-	-	5	-	5	-	15	-
Bolangir	FW	OFC	HOF	After care management in Banana	1	1	-	-	2	-	-	-	23	-
Bolangir	FW	OFC	HOV	Use of biofertilizer in chilli crop	1	-	1	-	2	-	-	-	22	-
Bolangir	FW	OFC	HOV	Planting technique in potato	1	1	1	-	4	-	4	-	16	-
Bolangir	FW	OFC	HOV	Intercultural operation in Brinjal	1	1	-	-	3	-	5	-	17	-
Bolangir	FW	OFC	HOV	Training and pruning in tomato	1	-	-	-	4	-	-	-	19	-
Bolangir	FW	OFC	HOV	Importance of hormone in cucurbitaceous crop	1	1	1	-	5	-	3	-	16	-
Bolangir	FW	OFC	HOV	Propagation in pointed gourd	1	1	-	-	3	-	2	-	20	-
Bolangir	RY	ONC	HOO	Seed production in flowers	1	2	-	-	2	-	-	-	13	-
Bolangir	RY	ONC	HOV	Poly house vegetable production	1	2	--	-	2	-	-	-	13	-
Bolangir	RY	ONC	HOO	Propagation technique in ornamental plants	--	-	-	-	-	-	-	-	15	-

Name of KVK	Cate-gory	Training Type	Thematic area	Training Title	No. of Courses	Duration (Days)	Participants							
							Gen		SC		ST		Others	
							M	F	M	F	M	F	M	F
1	2	3	4	5	7	8	9	10	11	12	13	14	15	16
Bolangir	FW	OFC	WOE	Household food security by nutritional gardening	1	1				8		3		14
Bolangir	FW	OFC	WOE	Package of practice for milk mushroom	1	1				4		3		18
Bolangir	FW	ONC	WOE	Picking & postharvest treatment of paddystraw mushroom	1	1				7		3		15
Bolangir	RY	ONC	WOE	Spawn culture preparation	1	2				4		-		11
Bolangir	FW	ONC	WOE	Package of practice of paddy straw mushroom by using loose straw	1	1				5		2		18
Bolangir	FW	OFC	WOE	Economic empowerment of Women	1	1				6		3		16
Bolangir	RY	ONC	WOE	Vermicomposting & its application	1	2				4		2		9
Bolangir	FW	OFC	WOE	Backyard duckery	1	1				7		6		12
Bolangir	FW	ONC	WOE	Location specific drudgery reduction technologies for farmwomen	1	1				3		5		17
Bolangir	FW	OFC	WOE	Major fodder crops for livestock rearing	1	1				3		4		18
Bolangir	FW	OFC	WOE	Income generation activities for empowerment of women	1	1				7		4		14
Bolangir	FW	OFC	WOE	Feed management in backyard poultry	1	1				5		9		11
Bolangir	IS	OFC	WOE	Post harvest technology & value addition	1	1		2		3		2		3
Bolangir	FW	ONC	WOE	Design & development of low cost diet	1	1				4		3		18
Bolangir	RY	OFC	WOE	Value addition in fruits & vegetables for local marketing	1	3				3		2		10
Bolangir	FW	OFC	WOE	Skill improvement of women in agriculture	1	1				4		2		19
Bolangir	IS	ONC	WOE	Homestead vocation for farmwomen	1	1		2		3		2		3
Bolangir	FW	OFC	WOE	Minimization of nutrient loss in processing	1	1				2		2		21

Name of KVK	Cate-gory	Training Type	Thematic area	Training Title	No. of Courses	Duration (Days)	Participants							
							Gen		SC		ST		Others	
							M	F	M	F	M	F	M	F
1	2	3	4	5	7	8	9	10	11	12	13	14	15	16
Bolangir	FW	OFC	CBD	Im[portance and role of leadership for agriculture development	1	1		-	-	-	4	-	21	-
Bolangir	FW	OFC	CP	Seed dressing with microbial culture in pulse crop	1	1	1	-	6	-	1	-	17	-
Bolangir	FW	OFC	CBD	Importance and applicability of KMA	1	1	-	-	3	-	2	-	20	-
Bolangir	RY	ONC	CBD	Development of entrepreneurship qualities in Riral youth	1	2	-	-	2	-	-	-	13	-
Bolangir	FW	OFC	CP	Sustainable agricultural practices	1	1	1		5		3		16	
Bolangir	FW	OFC	CBD	Importance and formation of SHG for rural development	1	1				3		2		20
Bolangir	RY	OFC	CBD	Development of Para extension worker	1	2			2		1		12	
Bolangir		ONC	CBD	IFS for watershed areas	1	1	5		1		1		3	
Bolangir	FW	OFC	CBD	Management of Farmers field School	1	1	1		3		1		21	
Bolangir	FW	OFC	SFM	Decision making for purchase of complex fertilizers	1	1			4		1		20	
Bolangir	RY	OFC	CBD	Information backstopping of Farmers Club	1	1							15	
Bolangir	RY	ONC	CBD	Orientation and capacity building of grass root level extension worker	1	2							15	
Bolangir	FW	OFC	CP	Irrigation management in Mustard crop	1	1							25	
Bolangir	FW	OFC	CP	IPM in Mustard crop					1		3		21	
Bolangir	FW	OFC	CP	Weed and plant protection management in Groundnurt crop					8				17	
Bolangir	FW	OFC	CP	Modules of intercropping in field crops	1	1	3		3		1		18	
Bolangir	FW	OFC	PLP	Insect pest and disease management in Paddy Nursery	1	1	2		3		4		16	
Bolangir	FW	OFC	PLP	Insect pest and disease management in Paddy	1	1							19	6
Bolangir	FW	OFC	PLP	Chemical control of sucking insect and fungal diseases in Cotton	1	1	1		4		1		19	
Bolangir	FW	OFC	PLP	Management of Defoliators and Borers in Arhar	1	1							25	

Name of KVK	Cate-gory	Training Type	Thematic area	Training Title	No. of Courses	Duration (Days)	Participants							
							Gen		SC		ST		Others	
							M	F	M	F	M	F	M	F
1	2	3	4	5	7	8	9	10	11	12	13	14	15	16
Bolangir	FW	OFC	PLP	Management of Fungal diseases in Onion	1	1			6		1		18	
Bolangir	FW	OFC	PLP	Management fruitfly & borers in Cucurbit vegetables	1	1			2		2		21	
Bolangir	FW	OFC	PLP	Management of insect pest through natural enemies in field crops	1	1	2		3		-		20	
Bolangir	FW	OFC	PLP	Preventive methods for control of insect pest in stored grain	1	1	-		3		-		22	
Bolangir	FW	OFC	PLP	Rodent management in field crops	1	1			3		3		19	
Bolangir	FW	OFC	PLP	IPM in Cabbage and Cauliflower	1	1			2		3		20	
Bolangir	FW	OFC	PLP	IPM in Solanaceous vegetables	1	1	1		2				22	
Bolangir	FW	OFC	PLP	Methods of pest control in Mango inflorescence	1	2				1			5	19
Bolangir	FW	OFC	PLP	Management of wilt complex in Oilseed crops	1	1			1		24			
Bolangir	FW	OFC	PLP	Behavioural management ofinsect pests in vegetables	1	1					1		24	
Bolangir	RY	ONC	PLP	Development of Para-extension workers for Plant protection	1	3	-		2				13	
Bolangir	RY	ONC	PLP	Judicious application of Plant Protection Chemicals & their effectiveness	1	2	1		2		1		11	
Bolangir	FW	OFC	AEG	Maintenance of spraying equipments	1	1		-	14	-	3	-	8	-

Table 5.2. Details of Vocational training programmes for Rural Youth conducted by the KVKs

Name of KVK	Training title	Crop / Enterprise	Identified Thrust Area	Duration of training (days)	Number of Beneficiaries							
					Gen		SC		ST		Others	
					M	F	M	F	M	F	M	F
	Oyster mushroom spawn production technology	Enterprise	Mushroom production	5		2		1		2		5

Table 5.3. Details of training programme conducted for livelihood security in rural areas by the KVKs

Name of	Training title	Self employed after training	Number of

KVK		Type of units	Number of units	Number of persons employed	persons employed else where

Table 5.4. Sponsored Training Programmes : Not done

Name of KVK	Title	Thematic area (as given in abbreviation table)	Sub-theme (as per column no 5 of Table T1)	Client (FW/ RY/ IS)	Dura-tion (days)	No. of courses	No. of Participants								Sponsoring Agency	Fund received for training (Rs.)
							Gen		Others		SC		ST			
							M	F	M	F	M	F	M	F		

Table 5.5 Training Programmes for Panchayatiraj Institutions Office-bearers & members : NIL

Name of KVK	Title	Thematic area (as given in abbreviation table)	Sub-theme (as per column no 5 of Table T1)	Client (FW/ RY/ IS)	Dura-tion (days)	No. of courses	No. of Participants								Sponsoring Agency	Fund received for training (Rs.)
							Gen		Others		SC		ST			
							M	F	M	F	M	F	M	F		

Table 5.6 Evaluation/Follow up & Impact of the training programmes conducted by the KVK (all types of trainings)

Name of KVK	Title of the training	No. of trainees	Change in knowledge (Score)		Change in Production (q/ha)		Change in Income (Rs)		Impact on 1. Area expanded (ha) 2. No. of farmers adopted (no.) 3. % change in knowledge, production & Income
			Before	After	Before	After	Before	After	
Bolangir	Off season cultivation in pumpkin	25	4	8	272	359	163000	184000	80, 150 ; 100, 32, 13
Bolangir	Soil testing and interpretation of result for judicious fertilizer use	25	3	7	245	308	175000	210560	60,126;133, 25, 20
Bolangir	Manuring and fertilization in mango	25	2	5	300	737	300000	737000	150,255;150, 145, 145
Bolangir	Orchard planning and lay out	10	4	8	219	708	219000	708000	27,50;100, 223, 223

Bolangir	Seedling raising in kharif onion	25	3	7	250	315	125000	157500	20,55;133, 26, 12
Bolangir	Weed management in Paddy	25	3	6	30	45	39000	58500	16,50;100, 50, 50
Bolangir	After care management in Banana	25	2	6	345	675	408000	810000	200, 48; 200,95,98
Bolangir	Use of biofertilizer in chilli crop	25	3	8	208	330	416000	700000	45, 82;166 , 58, 68
Bolangir	Planting technique in potato	25	4	8	298	368	149000	184000	100, 250; 100, 23, 23
Bolangir	Intercultural operation in Brinjal	25	4	6	278	350	139000	175000	125, 400; 50, 26, 25
Bolangir	Household food security by nutritional gardening	25	4	8	142q/ha	172 q/ha	17390	39500	10,20,100,21,127
Bolangir	Package of practice for milk mushroom	25	4	9	.5 kg/bed	1.5 kg/bed	50/bed	225/bed	28,21,100,200,350
Bolangir	Picking & postharvest treatment of paddystraw mushroom	25	2	7	.5 kg/bed	1.5 kg/bed	50/bed	225/bed	28,21,100,200,350
Bolangir	Spawn culture preparation	15	1	6	-	-	-	-	-,-,-,500
Bolangir	Package of practice of paddy straw mushroom by using loose straw	25	4	9	.5 kg/bed	1.5 kg/bed	50/bed	225/bed	28,21,100,200,350
Bolangir	Economic empowerment of Women	25	4	9	-	-	1000	3000	25 SHGs,100,125,-,200
Bolangir	Vermicomposting & its application	15	3	9	-	1 qtl/unit	-	2000/unit	14 unit,14,200,-,100
Bolangir	Backyard duckery	25	5	8	1kg/bird	3.5kg/bird	180/bird	420/bird	15,20,-,60,250,133
Bolangir	Location specific drudgery reduction technologies for farmwomen	25	3	9	-	-	1500	4000	8 ha,56,250,166
Bolangir	Major fodder crops for livestock rearing	25	2	8	200 qtl/ha	400 qtl/ha	200000	400000	5,25,300,100,100
Bolangir	Income generation activities for empowerment of women	25	4	9	-	-	1000	3000	25 SHGs,100,125,-,200
Bolangir	Feed management in backyard poultry	25	5	8	1kg/bird	3.5kg/bird	180/bird	420/bird	15,20,-,60,250,133
Bolangir	Post harvest technology & value addition	10	4	9	-	-	1000	3000	25 SHGs,100,125,-,200
Bolangir	Design & development of low cost diet	25	2	6	-	-	700	1400	5 SHGs,34,200,-,100
Bolangir	Value addition in fruits & vegetables for local marketing	15	3	8	10 kg/day	45 kg/day	120	800	5 vill,32,6612.5,,12.5
Bolangir	Skill improvement of women in agriculture	25	3	5	-		-	-	30,66
Bolangir	Homestead vocation for farmwomen	10	4	9	-	-	1000	3000	25 SHGs,100,125,-,200
Bolangir	Minimization of nutrient loss in processing	25	3	9	-	-	11000	16000	-,40,-,200,-45.

Bolangir	Insect pest and disease management in Paddy	25	3	7	35	42	10000	14000	60,10;133, 20,40
Bolangir	Chemical control of sucking insect and fungal diseases in Cotton	25	4	8	5	8	20000	28000	27,5;100,60,40
Bolangir	Management of Defoliators and Borers in Arhar	25	3	7	8	11	25000	30000	20,10;133,60,20
Bolangir	Management of Fungal diseases in Onion	25	3	6	308	371	2,15,600	2,59,700	8,12;100,20,20
Bolangir	Management fruitfly & borers in Cucurbit vegetables	25	2	6	128	155	150000	180000	10,11;200,21,20
Bolangir	Rodent management in field crops	25	1	6	32	40	12000	18000	5, 8, 500, 25, 50
Bolangir	IPM in Cabbage and Cauliflower	10	4	9	290	330	40000	65000	10,11,125,14,62
Bolangir	IPM in Solanaceous vegetables	25	2	7	220	270	350000	62000	18,10,250,23,77
Bolangir	Management of wilt complex in Oilseed crops	25	2	7	10	14	5000	9000	10,10,250,23, 80
Bolangir	Judicious application of Plant Protection Chemicals & their effectiveness	25	3	9	200	245	1,50,000	1,90,0000	20, 12 ; 200, 22, 27
Bolangir	Im[portance and role of leadership for agriculture development	25	4	7					_,40;75,_,_
Bolangir	Seed dressing with microbial culture in pulse crop	25	3	7	4	6	15,000	20000	20,55;133,50,33
Bolangir	Importance and applicability of KMA	25	2	5	-	-	-	-	_,50;150,_,_
Bolangir	Development of entrepreneurship qualities in Riral youth	25	5	8	-	-	-	-	_,40;60,_,_
Bolangir	Sustainable agricultural practices	25	3	7	-	-	-	-	_,50;133,_,_
Bolangir	Importance and formation of SHG for rural development	25	4	8	-	-	-	-	_,60;50,_,_
Bolangir	Development of Para extension worker	25	1	4	-	-	-	-	_,10;300,_,_
Bolangir	IFS for watershed areas	25	2	5	-	-	-	-	_,10;150,_,_
Bolangir	Management of Farmers field School	25	4	8	-	-	-	-	_,_;50,_,_
Bolangir	Decision making for purchase of complex fertilizers	25	3	7	-	-	-	-	_,50;133,_,_

6. EXTENSION ACTIVITIES

Name of the KVK	Activity	No. of activities (Targeted)	No. of activities (Achieved)	Detail of Participants						Remarks		
				Farmers (Others)		SC/ST (Farmers)		Extension Officials		Purpose	Topic s	Crop Stages
				M	F	M	F	M	F			
Bolangir	Field Day	15	7	140	63	40	17	13	4	To aware the farmers regarding result of the demonstration contributing to yield maximisation	BPH in paddy,Pod fly in Arhar crop.Mgt practices of var.serakole(marigold),Mgt practices of Arhar,low cost vermicompost unit,khaki camp bell,bunch feeding and bunch wrapping in banana	Vegetative stage, Harvesting stage, Intercult ure stage,Fish netting stage, Marketing stage
Bolangir	Kisan Mela	2	1	254	196	212	88	35	15	Awareness about technological products and activities of mandatory work of KVK	Results of on farm trials and yield from recommended practice	-
Bolangir	Kisan Ghosthi	2	-	-	-	-	-	-	-	-	-	-
Bolangir	Exhibition	3	3	425	212	150	143	45	25	Awareness about technological	Farmers fair of KVK and other ring	-

Name of the KVK	Activity	No. of activities (Targeted)	No. of activities (Achieved)	Detail of Participants						Remarks		
				Farmers (Others)		SC/ST (Farmers)		Extension Officials		Purpose	Topic s	Crop Stages
				M	F	M	F	M	F			
										products	partners	
Bolangir	Film Show	5	5	58	28	44	21	5	2	Awarenes ss regardin g technolo gical package	Horticultu ral crops in protected condition, SRI, pesticide poisoning, cotton cultivation , drip irrigation, water harvesting	Growth stage of different crops
Bolangir	Method Demonstrations	10	12	10	2	15	8	2	-	To show the method of using technolo gical package	Neem oil emulsion preparatio n, Release tricho-card, Seed dressing with Biofertiliz er, placement of seed at right depth, line sowing, Erection of yellow trap, Stem applicatio n of pesticide, Soil sampling	Sowing of seed, Vegetati ve stage, Pre-land preparati on
Bolangir	Farmers Seminar	-	-	-	-	-	-	-	-			-

Name of the KVK	Activity	No. of activities (Targeted)	No. of activities (Achieved)	Detail of Participants						Remarks		
				Farmers (Others)		SC/ST (Farmers)		Extension Officials		Purpose	Topic s	Crop Stages
				M	F	M	F	M	F			
Bolangir	Workshop	4	-	-	-	-	-	-	-			
Bolangir	Group meetings	10	3	21	14	23	7	-	-	To sensitize the farmers regarding effective implementation of the FLD , OFT and other critical activities	Before executing FLD and OFT programmes	Before onset of cropping season
Bolangir	Lectures delivered as resource persons	-	48	505	320	395	258	15	5	Capacity building	Agril topics	-
Bolangir	Newspaper coverage	-	6	-	-	-	-	-	-	Information on KVK activities for Mass	Farmers fair, ATMA work monitoring ,field day, Akhi trutiya, SAC meeting	After the organization of the event as mentioned
Bolangir	Radio talks	-	5	Mass						Technological message for practising farmers	Scientific cultivation practices in groundnut, papaya,cottonempoerment of farm women.value added products	-

Name of the KVK	Activity	No. of activities (Targeted)	No. of activities (Achieved)	Detail of Participants						Remarks		
				Farmers (Others)		SC/ST (Farmers)		Extension Officials		Purpose	Topic s	Crop Stages
				M	F	M	F	M	F			
											from tomato	
Bolangir	TV talks	-	3	mass	-	-	-	-	-	-	KVK activities, Seedling production ,value added products	-
Bolangir	Popular articles	4	2	Mass	-	-	-	-	-	-	Weed management, pest management	-
Bolangir	Extension Literature	13	13	Mass	-	-	-	-	-	-	News letter,	-
Bolangir	Farm advisory Services	-	12	30	-	45	15	5	2	Knowledge and skill development of farmers	Crop technologies	-
Bolangir	Scientific visit to farmers field	50	98	150	21	187	32	7	-	Knowledge and skill development of farmers	Crop technologies	From sowing to harvesting at different stages
Bolangir	Farmers visit to KVK	800	721	220	156	259	86	-	-	To get knowledge and skill	Crop technologies	From sowing to harvesting at different stages
Bolangir	Diagnostic visits	30	75	187	123	165	112	10	3	To solve farmers field problem	Plant protection, Mushroom, Fruit	From sowing to harvesti

Name of the KVK	Activity	No. of activities (Targeted)	No. of activities (Achieved)	Detail of Participants						Remarks		
				Farmers (Others)		SC/ST (Farmers)		Extension Officials		Purpose	Topic s	Crop Stages
				M	F	M	F	M	F			
											and vegetable cultivation ,Pisciculture, Crop husbandry	ng at different stages
Bolangir	Exposure visits	-	-	-	-	-	-	2	-	To see succees points in other farmers field	Plant protection, Mushroom, Fruit and vegetable cultivation	At full bloom and harvest stage
Bolangir	Ex-trainees Sammelan	2	1	28	-	2	-	-	-	Farmers feed back on all the conducted trainings	Major trainings on plant protection, Pisciculture, Horticulture and Home Science discipline	-
Bolangir	Soil health Camp	2	1	30	-	-	-	-		Awarenes ss on soil testing and integrate nutrient manage ment	Soil test based nutrient manageme nt	-
Bolangir	Animal Health Camp	1					-	-	-		diseases	
Bolangir	Agri mobile clinic	-	-	-	-	-	-	-	-	-	-	-
Bolangir	Soil test campaigns	-	-	-	-	-	-	-	-	-	-	-
Bolangir	Farm Science Club conveners meet	-	2	53	-	27	-		-	To invigorat e the activity	Empower ment of Farm science	-

Name of the KVK	Activity	No. of activities (Targeted)	No. of activities (Achieved)	Detail of Participants						Remarks		
				Farmers (Others)		SC/ST (Farmers)		Extension Officials		Purpose	Topic s	Crop Stages
				M	F	M	F	M	F			
										of farmers club	Club	
Bolangir	Self Help Group conveners meetings	-	2	-	32	-	18	-	-	Awarenes s on non-land based income generatin g activities	Income generating activities to be taken for Women SHGs	
Bolangir	Mahila Mandals conveners meetings	-	-	-	-	-	-	-	-	-	-	-
Bolangir	Celebration of important days	3	3	61	44	11	14	7	4	Celebrati on to begin cropping season, empower ment of women in agricultu re	World food day,akhitri tiya Women in agriculture day	Pre-land preparati on stage, Rabi crop season

7. Literature Developed/Published (with full title, author & reference)

7.1 KVK Newsletters

KVK Name	Date of start	Periodicity	Number of copies printed	Number of copies distributed
Bolangir	**28.06.2016**	**Quarterly**	**1000**	**950**

7.2 Literature developed/published

KVK Name	Type	Title	Author's name	Number of copies
Bolangir	Folder	Duck rearing	S.Purohit	500
Bolangir	Booklet	International year of soil science & Importance of soil testing	A K Das, K . Behera	500
Bolangir	Booklet	Irrigation management in different crops	K . Behera, A K Das	500

Bolangir	Booklet	Scientific cultivation practices of Mustard crop	K . Behera , A K Das,,	500
Bolangir	Booklet	Healthy soil for Healthy life	A K Das, K . Behera	500
Bolangir	Booklet	Pradhanmanntri Fasal Bima Yojana	KVK,Bolangir	1000
Bolangir	Booklet	Pesticides for plant Protection in Vegetables	A.KDas.S.Srichandan,K.Behera	500
Bolangir	Folder	Role of biofertiliser in increasing crop productivity	A.K.Das,K.Behera	500
Bolangir	Booklet	Marigold cultivation for self employment .	S.Muna,S.Srichandan	500
Bolangir	Booklet	Nutrient deficiency symptoms and correction measures in cruciferous vegetable	S.Srichandan,A.K.Das	500

7.3 Details of Electronic Media Produced NIL

KVK Name	Type of media (CD / VCD / DVD / Audio-Cassette)	Title of the programme	Number
Bolangir			

8. Production and supply of Technological products

8.1 SEED production

KVK Name	Major group/class	Crop	Variety	Quantity (qt.)	Value (Rs.)	Provided to No. of Farmers	Expected area coverage (ha.)
Bolangir	Seed(Foundation)	Paddy	Mandakini	106		To be sold to OSSC, Bhubaneswar	230
Bolangir	Seed(Foundation)	Paddy	Mrunalini	166		To be sold to OSSC, Bhubaneswar	285

8.2 Planting Material production

KVK Name	Major group/class	Crop	Variety	Nos.	Value (Rs.)	Provided to No. of Farmers	Expected area coverage (ha.)
Bolangir	Seedling	Marigold	Serakole	10000	10000	10	0.5
Bolangir	Seedling	Onion	Bhima shweta	250000	25000	10	0.5
Bolangir	Seedling	Tomato	Swarna sampad	4000	8000	10	0.5
Bolangir	Seedling	Brinjal	Arka neelachal shyama, Arka neelachal kranti	12000	12000	13	0.5

8.3 Production Units (bio-agents / bio pesticides/ bio fertilizers etc.) * Name of product should follow same pattern and spelled correct

KVK Name	Major Group Bio agent/Bio fertilizers/Bio Pesticides	Name of the Product	Qty (In Kg)	Qty (In No)	Value (Rs.)	Provided to No. of Farmers	Expected area coverage (ha.)
Bolangir	Bio Agents	Vermiculture	.2 kg	-	500/kg	1	10 units
Bolangir	Bio Agents	Vermicompost	10.9 qtl	-	1000/qtl	11	1
Katni	Bio Fertilizer						
Katni	Bio Fertilizer						

8.4 Livestock and fisheries production

KVK Name	Name of the animal / bird / aquatics	Breed	Type of Produce	Qty. (kg/qt./litre)	Value (Rs.)	No. of Beneficiaries

9. Activities of Soil and Water Testing Laboratory : Not available

9.1 Details of soil samples analyzed so far:

KVK Name	Status of establishment of Lab	Year of establishment	Details	No. of Samples	No. of Farmers	No. of Villages	Amount realized	Soil report distributed to the farmers (Nos)
Bolangir	Soil mini lab	2015	Soil testing by minikit lab. supplied by Nagarjuna Agrochemicals	80	601	08	NIL	601

9.2 Details of water samples analyzed so far : NIL

KVK Name	Status of establishment of Lab	Year of establishment	Details	No. of Samples	No. of Farmers	No. of Villages	Amount realized	Water report distributed to the farmers (Nos)
		`						

10. Rainwater Harvesting : Not available

Training programmes conducted by using Rainwater Harvesting Demonstration Unit

Name of KVK	Date	Title of the training course	Client (PF/RY/EF)	No. of Courses	No. of Participants including SC/ST			No. of SC/ST Participants		
					Male	Female	Total	Male	Female	Total

11. Utilization of Farmers Hostel facilities : Not available

KVK Name	Months	Year	Title of the training course	Duration of training	No. of trainees stayed	Trainee days (days stayed)	Reason for short fall (if any)	Accommodation available (No. of beds)

12. Utilization of Staff Quarters facilities : Not available

KVK Name	Year of construction	Year of allotment	No. of quarters occupied	No. of quarters vacant	Reasons for vacant quarters, if any
	-	-	-	-	-

13. Details of SAC Meeting

KVK Name	Date of SAC meeting	No. of SAC members attended	Major recommendations
Bolangir	**04.08.15**	**30**	Programme should be taken on hybrid paddy ,improved variety of pulses and oilseeds ,cash crop i.e, cotton to increase the productivity.
Bolangir			Programme should be taken under fodder crops through varieties like CO-1 ,CO-2, CO-3
Bolangir			YMV disease management in greengram crop variety HML- 668 may be assessed as it is a major threat to the crop.
Bolangir			Suitable variety of Summer marigold may be introduced in farmers field.
Bolangir			Programme should be taken under floriculture like marigold, rose and gladioli.
Bolangir			Trial on tissue culture banana may be conducted at adopted villages.
Bolangir	**29.12.15**	**30**	Long duration Rural youth training to be conducted in 3 phases in a gap of 4-5 days at different stages of crop.
Bolangir			No. of on campus trainings to be increased and number of off campus training to be decreased
Bolangir			In FLD programmes take only T1 &T2

Bolangir			Specific liquid fertilizer in protected culture under different crop.
Bolangir			Pollination problem in protected culture by use of blowers.
Bolangir			Goat semen collected if given in a particular patch its good. Yamuna pari breed & Beetle.
Bolangir			Pulse, mustard, ground nut, cotton requires micronutrient recommendation.
Bolangir			Farm mechanization is poor in district which needs awareness.

14. Status of Kisan Mobile Advisory (KVK-KMA)

KVK Name	No. of messages sent	No. of beneficiary		Sponsoring agency (NIC, Farmers Portal, etc.)	Major recommendations
		Farmers	Ext. Pers.		
	68	7800	200	Farmer portal	Integrated disease & pest management in major crops, , Mushroom cultivation, Production technology on Cereals, Pulses, Oilseeds; Nutrient management in Vegetables and Fruits, Weed management, Weather forecasting based activity, Management of livestock and Poultry, Market information on Prices

15. Status of Convergence with various agricultural schemes (Central & State sponsored)

KVK Name	Name of scheme	Name of Agency (Central/state)	Funds received (Rs.)	Activities organized	Operational Area	Remarks

16. Status of Revolving Funds (Rs.)

KVK Name	Account No.	Opening balance (Rs.)	Closing balance (Rs.)	Current status (Rs.)

17. Awards & Recognitions

KVK Name	Name of award /awardee	Type of award (Ind./Group/Inst./Farmer)	Awarding Organizations	Amount received

18. Details of KVK Agro-technological Park .

a) Have you prepared layout plan, where sent?

S .No.	Name of KVK	Technology park proposal developed(yes/no)	If yes, where sent ? (ZPD/DES/any other, pl. sp.)

b) Details about Technology Park

Name of KVK	Name of Component of Park	Detail Information (If established)
	Crop Cafeteria	
	Technology Desk	
	Visitors Gallery	
	Technology Exhibition	
	Technology Gate-Valve	

c). Crop Cafeteria-

Sr. No.	Theme of Crop Cafeteria	No. of Crop Cafeteria
1	IPM	4
2	INM	4
	Intercropping	4

19. Farm Innovators- list of 10 Farm Innovators from the District

Sr. No.	Name of KVK	Name of Farm Innovator	Name of the Innovation	Address of the farmer with Mobile No.
1	Bolangir	Omprakas Meher	Production of Oyster mushroom by using waste Newspaper substrate	Village:Tarabha, Bolangir- 9692016440
2	Bolangir	Satyabrata Thati	Floriculture	Village:Banbahal, Bolangir- 8658942615
3	Bolangir	Mukunda Badhei	Onion storage structure	Village:Magurbeda, Loisingha-
4	Bolangir	Manoj Meher	Cotton intercropping with Maize	Village:Kaudia, Patnagarh- 9937731046
5	Bolangir	Roopakanti Baghar	Brooding of 1 day old chicks	Village:Banabahal,Puintal
6	Bolangir	Hemakanti Meher	Production of Oyster mushroom by using Loose straw	Village:Kaudia, Patnagarh- 8018035133
7	Bolangir	Angad Biswal	Integrated Farming System	Village:Dhaunradadar, Loisingha- 9668736670
8	Bolangir	Jayaram Meher	Broccoli cultivation	Village:Kaudia,Patnagarh, -9937980234
9	Bolangir	Pradumna Teji	Relay cropping of Pointedgourd in single trellis system	Village:Magurbeda, Loisingha- 9937623894
10	Bolangir	Khirodra Biswal	Protected cultivation	Village:Dhaunradadarr,Loisingha 8260105499

20. KVK interaction with progressive farmers

Sr. No.	Date and month of interaction programme with progressive farmers	No. of progressive farmers to be participated
1	27.05.15	15
2	12.09.15	15
3	18.12.15	15
4	14.02.15	15

21. Outreach of KVK

Name of KVK	Number of Blocks		Number of Villages	
	Intensive	Extensive	Intensive	Extensive
Bolangir	Patnagarh	Titilagarh	7	7
Bolangir	Gudvella	Belpara	1	4
Bolangir	Saintala	Khaprakhol	4	4
Bolangir	Puintala	Loisingha	3	8
Bolangir	Deogaon	Agalpur	1	8
Bolangir		Bolangir	-	5

Intensive- OFTS, FLDS etc

Extensive- Literatures, Publications, Awareness programmes etc.

22. Technology Demonstration under Tribal Sub Plan on Pulses/ Programme on Harnessing Pulses/ Quality Protein Maize, if applicable.

Sr. No.	Name of crop under Technology demonstration	Area under the programme	No. of Extension Activities	Remarks / Lessons learnt

23. KVK Ring

Sr. No.	Name of Ring Partner	Sharing Activity	Lessons learnt/ Experiences gained.
1	KVK, Nuapada	Knowledge, Manpower	Development of para-extension workers
2	KVK, Kalahandi	Knowledge, Manpower	Qualitative development of literature and methodology on effective capacity building of Rural Youth
3.	KVK, Sonepur	Knowledge, Manpower	Observance/ Celebration of big programmes jointly with sharing of manpower and resources

24. **Important visitors to KVK**

Name of KVK	Name of Visitor	Date of Visit	ICAR	SAUs	Others	Remarks
Bolangir	Honble. MP Mr.K.N.Singhdeo	02.07.15	-	-	**Others**	To Participate in the Kharif farmers fair as chief guest
Bolangir	Dr.M.Muthukumar, (Collector & DM, Bolangir)	02.07.15	-	-	**Others**	To Participate in the Kharif farmers fair as chairman
Bolangir	Mr.Bijay Padhani(Zillaparishad president)	02.07.15	-	-	**Others**	To Participate in the Kharif farmers fair as guest of honour
Bolangir	Dr.R.Pattanaik, (Dean,College of Agriculture, Bhawanipatna, OUAT)	02.07.15	-	**SAUs**	-	To Chair the farmers – Scientist interaction during Farmers fair
Bolangir	Dr.S.Mohapatra, (DDE, OUAT)	02.07.15	-	**SAUs**	-	To Participate in the Kharif farmers fair as reprereresentative Of DEE,OUAT
Bolangir	Dr.S.Mohapatra, (DDE, OUAT)	4.8.15	-	**SAUs**	-	To chair the 7th SAC meeting of KVK
Bolangir	Dr.Manoranjan Kar (Hon'ble VC, OUAT)	29.12.15	-	**SAUs**	-	To chair the 6th SAC meeting
Bolangir	Dr. S. K.Rout, (DEE, OUAT)	29.12.15	-	**SAUs**	-	To participate in the 8th SAC meeting
Bolangir	Dr.R.Das (Director,Agropolytechnic, OUAT)	29.12.15	-	**SAUs**	-	To participate in the 8th SAC meeting
Bolangir	Mr.Jhintu Das(Tech. Officer ,Directorate of Rice Research, Patna)	20.01.16/ 21.0116	**ICAR**	-	-	Monitoring cluster demonstration on Oilseed & Pulses
Bolangir	Honble. MP Mr.K.N.Singhdeo	13.02.16	-	-	**Others**	To Participate in the Rabi farmers fair as chief guest
	Honble. MLA Titilagarh , Smt. Tukuni Sahu	13.02.16	-	-	**Others**	To Participate in the Rabi farmers fair as guest of honour
	Dr.Hemanta Sahu (JDE,DEE,OUAT)	13.02.16	-	-		To Participate in the Rabi farmers fair as Chairman

25. Status of KVK Website:

Sr. No.	Name of KVK	Date of start of website	No. of updates since inception	No. of visitors
1	Kvkbolangirzpdvii.org	April-2011	21	300

26. E-CONNECTIVITY

Name of KVK	Number and Date of Lecture delivered from KVK Hub	No. of lectors	Brief	Remarks

	Date	No. of Staff attended	No. of call received from Hub	No. of Call mate to Hub by KVK	organized by KVK	achievements	

27. Status of RTI

Sr. No.	Name of KVK	No. of RTI applications received	No. of RTI appeals	Remarks

28. Status of Citizen Charter

Sr. No.	Name of KVK	Query received(Nos)	Query Disposed(Nos)	Remarks

29. Attended HRD Programmes organized by ZPD

Name of KVK	Name of Staff	Post held	Programme attended (Nos)	Remarks
Bolangir	A. K. Das	Scientist(PP)	1	Zonal Workshop on KVK activities, Ujjain
Bolangir	S. Purohit	Scientist(Home science)	1	Work shop of SMS(H.Sc), Ujjain
Bolangir	S. Purohit	Scientist(Home science)	1	National workshop of KVK, Patna
Bolangir	S. Srichandan	Scientist(Hort)	1	National workshop of KVK, Patna
Bolangir	S. Srichandan	Scientist(Hort)	1	Work shop of SMS(Hort), Vanaras
Bolangir	K.K.Behera	Scientist(Ag.Extension)	1	National workshop of KVK, Patna
Bolangir	K.K.Behera	Scientist(Ag.Extension)	1	Extension Workshop at Jabalpur

Name of KVK	Total Number of staff Attended HRD Programme organized by ZPD (nos)	Total Number of Programme attended (Nos)
Bolangir	**4**	**7**

30. Attended HRD Programmes organized by DES

Name of KVK	Name of Staff	Post held	Programme attended (Nos)	Remarks

Name of KVK	Total Number of staff Attended HRD Programmes organized by DES (nos)	Total Number of Programmes attended (Nos)

31. Attended HRD Programmes by KVK Staff (Refresher course, Short course, Training programme etc.)

Name of KVK	Name of Staff	Post held	Programmes attended (Nos)	Remarks

Name of KVK	Total Number of staff Attended HRD Programmes by KVK staff (nos)	Total Number of Programmes attended (Nos)

32. Agri alert report (Epidemic, high serious nature problem, Cyclone etc. reported first time to ZPD, SAU, Agri. Deptt. and ICAR)

Name of KVK	Alert observed	Particulars	Reported to organization

33. DETAILS OF TECHNOLOGY WEEK CELEBRATIONS

Name of KVK	Types of Activities	No. of Activities	Number of Participants	Related crop/livestock technology
Bolangir	Challenges and opportunities in quality production of off season vegetables in Bolangir district.	1	30	Off season vegetable production
Bolangir	Importance and method of Seed treatment in pulse crop	1	30	Seed treatment
Bolangir	Development of Agri-enterpreneurship among farm women	1	25	Empowerment of SHG
Bolangir	Floriculture under protected cultivation	1	25	Floriculture
Bolangir	Skill and knowledge on use of biological control of insect pest in crops	1	25	Plant protection

34. INTERVENTIONS ON DROUGHT MITIGATION

Introduction of alternate crops/varieties

Name of KVK	Crops/cultivars	Area (ha)	Number of beneficiaries
Bolangir	Greengram	30	75
Bolangir	Groundnut	15	38
Bolangir	Mustard	10	25
Bolangir	Chickpea	10	25

Major area coverage under alternate crops/varieties

Name of KVK	Crops	Area (ha)	Number of beneficiaries
Bolangir	Oilseeds	25	63
Bolangir	Pulses	40	100

Farmers-scientists interaction on livestock management

Name of KVK	Livestock components	Number of interactions	No. of participants

Animal health camps organized

Name of KVK	Number of camps	No.of animals	No.of farmers

Seed distribution in drought hit states

Name of KVK	Crops	Quantity (qtl)	Coverage of area (ha)	Number of farmers
	Greengram	6	30	75
	Groundnut	12	15	38
	Mustard	6	10	25
	Chickpea	5	10	25

Seedlings and Saplings distributed

Name of KVK	Crops	Quantity (No.s)	Coverage of area (ha)	Number of farmers
Seedlings				
	Brinjal	10,000	0.25	10
	Tomato	10,000	0.25	15
	Onion	1,00,000	0.2	10
	Marigold	10,000	0.25	15
	Papaya	500	0.5	10

Bio-control Agents

Name of KVK	Bio-control Agents	Quantity (q)	Coverage of Area (ha)	No. of farmers

Bio-Fertilizer

Name of KVK	Bio-Fertilizer	Quantity (kg)	Coverage of Area (ha)	No. of farmers

Verms Produced

Name of KVK	Verms Produced	Quantity (q)	Coverage of Area (ha)	No. of Farmers

Large scale adoption of resource conservation technologies

Name of KVK	Crops/cultivars and gist of resource conservation technologies introduced	Area (ha)	Number of farmers

Awareness campaign

Name of KVK	Meetings		Gosthies		Field days		Farmers fair		Exhibition		Film show	
	No.	No. of farmers	No.	No. of farmers	No.	No. of farmers	No.	No. of farmers	No.	No. of farmers	No.	No. of farmers

35. Proposal of NICRA

1. **Technologies to be Demonstrated**

Name of Technology	Name of Crop	Area (ha.)	Yield	% change in Yield	No. of farmers benefitted

2. **Proposed Extension Activities in NICRA Village**

Name of Activity	Number of Participants/Beneficiaries to be Covered			
	Farmers	Farm Women	Official	Total

3. **Proposed Training Activities in NICRA Village**

Name of Activity	Number of Participants/Beneficiaries to be Covered			
	Farmers	Farm Women	Official	Total

4. **Proposed Activities for Fodder Bank**

Established (Years)	Capacity	Current Status

5. **Proposed Activities for Seed Bank**

Established (Years)	Capacity	Current Status

6. **Public Representative/District Administration Visited in NICRA Village**

Name of Representative/Officer	Designation	Date of Visit	Any Special Remark by Visitors

7. Feedback of Farmers for future improvement, if any.

Provision of training hall and hostel for effective capacity building.
Vocational training on Vaccination of poultry birds may be included
Increased productivity of fish ponds with seasonal water (water does not hold for 12 months) through scientific management .
Dehydration technique for mushroom should be taught to farmers at KVK campus.
More no. of field visits for mitigating field and non-land based agrarian problems.

36. Proposed works under NAIP (in NAIP monitoring format)

37. Case study / Success Story to be developed – Two best only in the following format

SUCCESS STORY – 1

Name of the KVK : Bolangir

Title –Khaki Campbell duck – A good source of income for farmwomen.

Introduction – Smt. Sushila Thati , W/o Sri Parameswar Thati a middle aged farmwoman of village Banabahal in Puintala Block of Bolangir District rearing 20 nos of local duck (Moti) in her farming system since 3 years back. Other major components of her farming system are cultivation of paddy, vegetable along with paddy straw mushroom and dhingiri Mushroom cultivation. But she was getting less profit from duckery unit.

KVK Intervention- By intervention of KVK , the following practices / technology was achieved :

- Floor space area will be 2 to 2.5sq. ft. Per bird.
- At least 5 ft height in case of roofed house & 10-12 ft height in thatched roof house
- Walls should be constructed with mud or low cost brick
- Two windows covered with wire net in opposite direction for cross ventilation
- Floor to be covered with 1 cm thickness sand

- Day old ducklings are to be kept in the house where floor is to be covered gunny bags which are to be changed for drying in every alternate day during the brooding period.

Vaccine(duck virus hepatitis,) after 4 weeks to protect viral diseases,vaccine cholera at 10 week to protect bacterial disease,plague vaccine after 3-4 month to plague diseases

- Chick mass added with equal af water should be provided in the plastic tray (1 tray for 20 birds)
- An electric ball (200 watt) to be hang at least 2 feet height from the floor to provide the necessary temperature during the brooding period. Chick guard are to be used to avoid moving away of ducklings from the source of light.
- A reflector may be fixed behind the ball, so that the heat and light will be spread over the area uniformly.

OUT PUT –. she has 100 nos. of khaki campbell duck in her unit. She gives vaccine to the duck in proper time with the contacts of local LI.

No of duck	Yield Body wt./no. eggs	Cost of cultivation	Gross Return	Net Profit
100	2.4kg/240nos	40000	120000	80000

OUT COME – Felicitated by Hon'ble collector of Bolangir during Farmers, Fair of KVK, Bolangir.
Purchased a groundnut decorticator and mahua seed decorticator

IMPACT – 156 farmwomen from Deogaon, Agalpur, Saintala block adopt this variety of breed .

SUCCESS STORY-2

Name of the KVK : Bolangir

TITLE : Crop diversification from paddy to Tissue culture Banana

Introduction : Manoj Meher a young farmer of Kaudia village having 2.5 ha of land where he cultivated Paddy/vegetables in 1.7 ha in Kharif and Green gram/Black gram in 0.8 ha in Rabi.His investment was Rs. 1,73,000/- per annum with net profit of Rs 3,19,200 /- per annum.

KVK intervention: By intervention of KVK , the following practices / technology was achieved :
Tissue culture Banana var. G –nane with Drip irrigation in 1 ha.
Weeding with Glyphosate @ 8ml/lDenavalling,
Foliar application of Nitrobenzene (2 ml/l),
Bunch feeding with potassium sulphate (7.5 gm)+urea(7.5 gm)+fresh cowdung (500 gm) Bunch wrapping with perforated polythene and Paper.

Output : Economics after KVK intervention

Season	Crop/Enterprise	Area (ha)	Yield	Cost of Cultivation (Rs)	Gross Income (Rs)	Profit (Rs)
Kharif	Banana	1.0	675	2,10,000	5,40,000	3,30,000
	Paddy	1.0	33	22,000	33,000	11,000
	Combination of vegetables	0.5	150	32,000	1,05,000	73,000
Rabi	Combination of Vegetables	2.0	490	1,15,000	3,43,000	2,28,000
	Green gram	0.4	2.8	4,000	11,200	7,200

				3,83,000	10,32,200	6,49,200

Outcome : Felicitated by KVK and Hoticulture department
He purchased a tractor
Impact :

Acreage of Banana cultivation increased from 900 ha. in 2009-10 to1400 ha in 2014-15
Blocks : Patnagarh, Deogaon, Agalpur

38. Well labeled Photographs for each activity of the KVK (Soft copies as well as hard copy- specially for all OFT along with the problem) –

Title of OFT	Problem	Related photograph
Assessment of effect of different date of sowing on yield of Cotton	**Low and wide variation of yield due to sowing at different time**	
Assessment of management of little leaf disease in Brinjal	**Low yield of Brinjal due to poor flower & fruit setting caused by little leaf disease**	
Assessment of herbicides for weed management in Groundnut	**Low yield of Groundnut due to severe weed infestation**	

Assessment of performance of herbicides in transplanted paddy	**Low yield from paddy due to moderate/severe weed infestation in upland condition**	
Assessment of fertigation scheduling in drip irrigated Chilli crop	**Low yield of Chilli due to inadequate nutrient availability through drip irrigation**	
Assessment of canopy management in new Mango orchard.	**Difficulty in plucking mango in existing mango orchards due to erratic branching & excess height, Weak crotch, pest and disease incidence, poor sunlight penetration**	
Assessment of qualitative performance of improved Brinjal varieties	**Low yield from local var. Muktakeshi, high incidence of pest & diseases**	

Assessment of drudgery reducing weeder for farm women for weed management in brinjal	**High drudgery and low efficiency due to manually weeding by farm women**	
Assessment of suitable fodder in backyard for milch cow	**Non-availability of quality fodder to milch cow throughout the year leading to low milk yield**	

SS & Head
KVK, Bolangir(ODISHA)